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Infrastructure, state formation, and social change in Bolivia at the start of the twentieth century.

A dissertation submitted in partial satisfaction of the requirements for the degree Doctor of Philosophy

in

History

by

Nancy Elizabeth Egan

Committee in charge:

Professor Christine Hunefeldt, Chair Professor Michael Monteon, Co-Chair Professor Everard Meade Professor Nancy Postero Professor Eric Van Young

2019

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2019

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ABSTRACT OF THE DISSERTATION

Infrastructure, state formation, and social change in Bolivia at the start of the twentieth century.

by

Nancy Elizabeth Egan

Doctor of Philosophy in History

University of California San Diego, 2019

Professor Christine Hunefeldt, Chair Professor Michael Monteon, Co-Chair

This dissertation examines the role of train development and construction in Bolivian state formation and social change at the start of the twentieth century during the twenty years of Liberal Party governments. The study analyzes national planning for liberal development and studies the impact of one particular railroad, the Arica – La Paz line, in the province of Pacajes. Though development planning throughout this period was exclusively the realm of politicians and businessmen, their plans often depended on the participation of the same people and relationships that Liberal Party leadership wanted to change. This study shows how a wide range of groups within the border province of Pacajes responded, reacted, and developed alternative agendas to those pushed by liberals.

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Though Liberal Party leaders depicted the unimpeded advance of their plans to transform the nation into a liberal, modern, and centralized one, the details show a much more fragmented and varied result. That result often emerged from tensions and conflicts produced in those places and moments where the imagined project landed in a complex local reality, and came to reflect and produce many of the same contradictions that had been present for centuries. Because the Liberal Party's approach to railroads understood modernization and development as a way to force other changes within the nation, including in social relations, power, and identity, this dissertation focuses on aspects of everyday life directly impacted by their development reforms: work, markets, food production and transport, taxes, and the financing of local governments. This study engages in a dialogue with research on the history of indigenous and worker movements, the development of liberalism, and citizenship in Bolivia, by examining the profound impact of expanding capitalism in the daily lives of residents of one region and its implications for belonging and exclusion in the nation. I suggest that the years of Liberal Party rule and their partially successful project to build trains and transform the economy shaped the emergence of new movements and politics that would dominate discussions of the nation's future for many decades after.

INTRODUCTION

This dissertation examines the first decades of the twentieth century in Bolivia through the lens of transport infrastructure reform, especially train building projects, in order to understand how this particular aspect of Liberal Party governance shaped the country. To do this, the study traces the development of a national project, and follows the plan through its implementation and impact on a local level – in the province of Pacajes and town of Corocoro during the construction of the Arica – La Paz railroad. Examining the connections between infrastructure projects during the Liberal Party governments and state formation, as well as the conflicts and changes in different sectors of society, reveals the processes that led to dramatic alterations in social relations and power in Bolivia at the start of the twentieth century.

Plans for railroad construction and national modernization were developed among a small group, principally comprised of national elites and international businessmen. However, because those projects required workers, funding, and local government cooperation, their success depended on the participation of some of the very same people and relationships that were to be the principal objects of liberal transformations. Taking top-down plans for modernization to the implementation stage produced conflicts that required a wide swath of strategies to navigate: negotiation, repression, manipulation, cooptation, improvisation and more. In this process, the national government was not the only group or population to employ those strategies. Despite the exclusive nature of the

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planning process for projects like the Arica – La Paz Railroad, the numerous interests at work in the construction and operation of railroads made them sites of intervention by different sectors of the population who took advantage of the fractures and contradictions within the state. Throughout this study, I show how a wide range of groups within the border province of Pacajes responded, reacted, and in some cases developed alternative agendas – even if those entailed simply ignoring the state as they worked on the margins of the law. These responses impacted the outcomes of these projects and the shape of the state and the society that emerged from the twenty years of Liberal Party rule.

Simply put, despite the assertions made by Liberal Party officials that their plans to transform the nation into a liberal, modern, and centralized one continued unimpeded, the details of the projects show a much more fragmented and varied result. Instead of examining state formation under the Liberal governments by focusing on the establishment of institutions and representations, this study examines the places and moments where the imagined project landed in a complex local reality and came to reflect and produce many of the same contradictions, regardless of its apparent success. Because so much of the Liberal Party's agenda with respect to railroads understood modernization and economic development as a way to force other changes within the nation, this dissertation focuses on aspects of everyday life that were directly impacted by their development reforms: work, markets, food production and transport, taxes, and the financing of local governments. I suggest that the years of Liberal Party governance and their partially successful project to build trains and transform the nation's economy may have produced contradictory and unintended results in the realm of state building and social transformation.

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Viewing this time period in Bolivian history through the lens of railroads reveals that rather than producing new forms of governance and social relations that broke with the past, in many spheres of life the state turned towards Colonial Era practices of governance, effectively blending historical colonial policies with their vision of modernity. The constant push and pull between local and national authorities, and with or between subaltern populations, reflected the formation of a liberal nation state in which "competing claims to political legitimacy" were held in tension.¹ As the process advanced, the groups challenging state authority and hegemony grew and changed in ways that profoundly reshaped politics and society in the decades that followed.

Tensions in Bolivian state formation from Independence:

Examining the years of Liberal Party reforms first requires a solid discussion of the political, social, and economic dynamics that they sought to change, as well as those that shaped or limited their thinking. Many historiographical characterizations of Bolivian state formation during the nineteenth century emphasize the tensions created by the persistence of colonial practices and the spread of liberalism. The state's continuation of tribute for indigenous communities has been one of the objects of study for researchers approaching these contradictions and is particularly important for those seeking to understand the relationship between the new nation state and the majority indigenous population. Bolivian political leadership engaged in a short-lived attempt to undo many colonial policies,

¹ Christopher Krupa and David Nugent, "Off-Centered States," in *State Theory and Andean Politics*, ed. Christopher Krupa and David Nugent (University of Pennsylvania Press, 2015), 7.

including tribute, following Independence.² Reasons for its nearly immediate reinstatement are clear from a fiscal perspective. The Bolivian state, as Tristan Platt and others have shown, relied on income from tribute following Independence in part because the mining sector struggled to restart production at important levels.³ Two of the economic foundations of the Spanish colonial state in this part of the Andes had been the mining and metallurgical sectors, and the extraction of tribute and labor from indigenous populations. The decline of mining in the decades following the formation of the republic only increased the importance of indigenous tribute for the new nation's treasury.

By the 1860s, plans to eliminate tribute and break indigenous tenure over collective lands gained ground in political circles as the slow recuperation of the mining sector made the reform appear feasible.⁴ Though different groups within regional and national political

² While other Andean states maintained tribute for short period of time, Bolivia recreated the institutional relationship with *ayllus* seen under colonial rule and maintained this into the early twentieth century in certain places. Herbert S. Klein, *A Concise History of Bolivia* (Cambridge University Press, 2003); Brooke Larson, *Trials of Nation Making: Liberalism, Race, and Ethnicity in the Andes, 1810-1910* (Cambridge University Press, 2004); Tristan Platt, "The Andean Experience of Bolivian Liberalism. Roots of Rebellion in 19th Century Chayanta," in *Resistance, Rebellion, and Consciousness in the Andean Peasant World, 18th to 20th Centuries.*, ed. Steve J Stern (University of Wisconsin Press, 1998); Tristan Platt, *Estado Boliviano y Ayllu Andino. Tierra y Tributo En El Norte de Potosi* (La Paz: Vicepresidencia del Estado de Bolivia-Centro de Investigaciones Sociales, 2016); Silvia Rivera Cusicanqui, *Oppressed But Not Defeated: Peasant Struggles Among the Aymara and Qhechwa in Bolivia, 1900-1980* (United Nations Research Institute for Social Development, 1987).

³ Platt, Estado Boliviano y Ayllu Andino. Tierra y Tributo En El Norte de Potosi; Larson, Trials of Nation Making; Klein, A Concise History of Bolivia, 2003.

⁴ Recent research examining colonial and post-Independence mining has begun to question the characterization of certain periods of decline and emphasizes patterns like decentralized, indigenous, or even clandestine production as continuing throughout periods typically seen as unproductive. See: Rossana Barragán, "Working Silver for the World: Mining Labor and Popular Economy in Colonial Potosí," *Hispanic American Historical Review* 97, no. 2 (May 1, 2017): 193–222; Tristan Platt, "Caccheo y minería mediana en las provincias de Potosí: Lípez y Porco (1830-1850)," 2014, 34; Tristan Platt, "The Alchemy of Modernity. Alonso Barba's Copper Cauldrons and the Independence of Bolivian Metallurgy (1790–1890)," *Journal of Latin American Studies* 32, no. 1 (2000): 1–53; Gustavo Rodríguez Ostria, *Capitalismo, modernización y resistencia popular*

classes disagreed over how to break from these colonial practices, by the end of the War of the Pacific (1879-1883) both of the stable national political parties, the Conservative Party and the Liberal Party, supported the general aim.⁵ Their objectives also included centralizing power in the national government and re-orienting the economy towards intensive and modernized mining production.⁶ In this sense, both the Bolivian Conservative and Liberal Parties shared certain elements of what came to be understood as a national liberal agenda to establish oligarchic rule and an export economy.

However, despite the official continuation of tribute for nearly all of the nineteenth century, many national politicians maintained that they had in fact established the legal foundations of a liberal state well before the serious debates about eliminating tribute and breaking up autonomous indigenous community lands took hold in the 1860s, 1870s, and 1880s. Rossana Barragan's work on constitutions and citizenship details how the national political leadership emerging from Independence argued that maintaining tribute could be compatible with a modern republic.⁷ In spite of the political instability among ruling classes, the eleven National Constitutions enacted during the nineteenth century contained

^{1825-1952 (}Vicepresidencia del Estado de Bolivia-Centro de Investigaciones Sociales, 2014); Pablo Cruz and Florian Téreygeol, "El Mineral Rebelde. El Lado Indígena de La Produccion de Plata Durante Los Primeros Momentos de La Colonia (Bolivia, Siglos XVI-XVII)," *Revista de Arquelogía Histórica Argentina y Latinoamericana*, no. 12 (2018): 37–62.

⁵ Bolivia's participation in armed conflict ended before the cessation of military engagement between Peru and Chile. Slow implementation of the Dis Entailment law meant that many communities continued to pay tribute long after the passage of laws. Moreover, even after the elimination of tribute, a host of other taxes continued to be extracted from communities. See: Rivera Cusicanqui, *Oppressed But Not Defeated*; Silvia Rivera Cusicanqui, "La Expansión Del Latifundio En El Altiplano Boliviano," *Avances*, no. 2 (1978).

⁶ Klein, *A Concise History of Bolivia*, 2003; Manuel Contreras, "Bolivia 1900- 1939: Minería, Ferrocarriles y Educación," in *La Era de Las Exportaciones Latinoamericanas: De Fines Del Siglo XIX a Principios Del XX*, ed. Enrique Cárdenas (Fondo de Cultura Económica, 2003).

⁷ Rossana Barragán, *Indios, Mujeres y Ciudadanos: Legislación y Ejercicio de La Ciudadanía En Bolivia (Siglo XIX)*, Colección Textos Breves (La Paz: Fundación Diálogo, 1999).

important continuities, as did the Civil and Criminal codes passed in 1831.⁸ For the politicians writing those constitutions, they were 'modern' foundations for the nation, imported from European laws, and effectively permitted an implicit continuation of colonial hierarchies.⁹ The constitutions created two different categories of belonging to the new nation. "Nationals" were all people born in Bolivia; "Citizens" with full rights of suffrage, constituted a much smaller and select group. Proof of honor, income, a profession, freedom from servitude or slavery, certifications of morality and literacy, and being a man were among those bars set for citizenship. The consequences of these categories reached far beyond suffrage and included the rights of persons before the law and the consequences of judicial decisions.¹⁰ These new categories barred all women and all enslaved persons, as well as nearly all indigenous and mestizo or cholo working class men from citizenship throughout the nineteenth century and well into the twentieth.

Though later liberal reformers depicted their political opponents and predecessors as little more than colonial holdovers resisting the modernization of a liberal nation, many

⁸ Many constitutions were very similar to one another, passed to mark the beginning of a new political order. The bulk of the 1831 codes continued into the twentieth century, though with modifications. Barragán.

⁹ Barragán argues this question influenced the decision to mold the new legal system after Spanish codes and not Napoleonic ones. She says: "En otras palabras, el código español ofrecía un modelo funcional que establecía una ciudadanía estamental y de privilegio para los hombres de honra y fama, opuestos a una masa de infames, analfabetos, y mujeres de mala reputación y desconocidas.

^[...] Es decir que esta sociedad y nación estuvo conceptualizada como formada por grupos desiguales y jerárquicos, una visión que podía esconder y refuncionalizar las antiguas divisiones coloniales." Barragán, 49. See also: Marta Irurozqui Victoriano, *La armonía de las desigualdades: elites y conflictos de poder en Bolivia, 1880-1920* (Editorial CSIC - CSIC Press, 1994); Marta Irurozqui Victoriano, "La Amenaza Chola. La Participación Popular En Las Elecciones Bolivianas, 1900-1930," *Revista Andina* 26, no. 2 (1995): 357–88.

¹⁰ Punishments for crimes could be altered depending on the status of a person granted by this division, and for women, their rights to bring cases to court and to testify could change depending on further divisions, something seen, for example, among women deemed to be "honorable" or those classed as "public." Barragán, *Indios, Mujeres y Ciudadanos*.

foundations of colonial rule remained even in those governments claiming to be the antithesis. The colonial roots of modern Andean states have been by examined researchers like Irene Silverblatt who suggests that these patterns endured well-beyond the emergence of new Andean Republics, with colonial practices of governance shaping modern ones.¹¹ While colonial law had established a distinct legal code and set of "privileges," requirements, and rules for indigenous populations, and in general had reflected and reproduced societal caste divisions, new Bolivian law did erase many of the official legal distinctions between indigenous and non-indigenous groups. However, it did so by redrawing categories of privilege and legal power along the lines of 'citizen' and 'national,' and the boundaries between these groups was less fixed than it had been in the Colonial Period. Rossana Barragan states that the ambiguity in the legal constructions of difference and inclusion "made those into terrains of struggle and confrontation."¹² The new republican legal framework reproduced colonial hierarchies principally in the practices of governance, not necessarily in the letter of the law.

However, the reproduction of colonial hierarchies did not exclude the possibility that liberal ideas might spread, even among those populations elites had no intention of

¹¹Irene Silverblatt, "Haunting the Modern Andean State," in *State Theory and Andean Politics*, ed. Christopher Krupa and David Nugent, New Approaches to the Study of Rule (University of Pennsylvania Press, 2015), 167–85.

¹² Original quote: "Sin embargo, se redefinieron las bases de una diferenciación social. Se inauguraron un sistema en el que: 1. Las castas no fueron reconocidas pero permanecieron implícitas. 2. Los derechos y los llamados "privilegios" otorgados a los indígenas desaparecieron.
3. La ambigüedad de las diferenciaciones, junto a los estigmas asociados a los grupos y categorías, hizo de ellas un terreno de lucha y confrontación." Barragán, *Indios, Mujeres y Ciudadanos*, 54. Tristan Platt examines the use of claims to citizenship by indigenous leaders early in the republic despite attempts to deny them. See: Platt, "The Andean Experience of Bolivian Liberalism. Roots of Rebellion in 19th Century Chayanta."

including in the 'citizenry.' As Timo Schaeffer observes for the diffusion of such ideas in Mexico during a similar period: "revolutionary utopias of progress and social harmony that animated creole independence leaders [....] left their mark on popular culture but were not widely shared in elite circles.¹³ In the Andes, Christine Hunefeldt and Tristan Platt have shown how the claim to liberal rights may have been repurposed by exactly those populations that politicians had sought to exclude in the nineteenth century.¹⁴ Thus, not only were the practices of governance sites where colonial hierarchies might be reproduced, they were also spaces in which different populations may have asserted different ideas about how the state should work and their place within it. Questioning the reach and universality of the state:

Many researchers looking at the emergence of the Bolivian Republic from an economic perspective engage in a line of research that questions the hegemony of the national government throughout the nineteenth century.¹⁵ Questioning the ability of the national government to apply or implement a law casts doubt on the universality or reach of national legal reforms. This research points to the existence of regions, especially rural, peripheral, or indigenous ones that maintained a certain degree of autonomy or experienced sporadic yet very significant absences of national institutions. During much of the period of state reliance on tribute, the national government was a less present, centralized or controlling force across parts of the altiplano than the Colonial government

¹³ Timo H. Schaefer, *Liberalism as Utopia* (Cambridge University Press, 2017), 3.

¹⁴ Christine Hunefeldt, *Liberalism in the Bedroom: Quarreling Spouses in Nineteenth-Century Lima* (Penn State Press, 2010); Platt, "The Andean Experience of Bolivian Liberalism. Roots of Rebellion in 19th Century Chayanta."

¹⁵ Platt, "The Andean Experience of Bolivian Liberalism. Roots of Rebellion in 19th Century Chayanta."

had been for much of its existence, especially in certain economic realms of life.¹⁶ This did not mean that indigenous and rural populations lived free from state institutions altogether. However, in the decades following Independence, many national institutions encountered resistance to the application of laws from both indigenous and mestizo populations in rural areas. Territorial gaps in the government's hegemony resulted in some laws not being enacted or being applied in ways that deviated from congressional and presidential intensions.

Erick Langer's work hints at the complexity and the consequences of the regional economic and political fragmentation seen across the highlands throughout much of the nineteenth century.¹⁷ While he and others show how national policies like the 'feeble peso' (a devalued peso used for the internal market) boosted production and consumption of products from indigenous agricultural activities, and represented a clear instance of national policy affecting even far-flung regions of the country, Langer reminds us that practices like these may not have produced universal benefits across rural. Many other populations were very heavily engaged in trade across borders and may not have prospered

¹⁶ This could be described as the retraction of the nation state from its effective presence in everyday economic life. Erick D. Langer, "Bringing the Economic Back In: Andean Indians and the Construction of the Nation-State in Nineteenth-Century Bolivia*," *Journal of Latin American Studies* 41, no. 3 (August 2009): 527–51; Klein, *A Concise History of Bolivia*, 2003.

¹⁷ Langer, "Bringing the Economic Back In."

as a result of the protectionist policies.¹⁸ That group included many indigenous traders and merchants as well as other groups in border zones and commercial centers.¹⁹

Moreover, the recognition of lands in exchange for the payment of tribute was not equally important for all indigenous populations of the highlands. Land tenure patterns in heavily indigenous regions of the country varied. Brooke Larson argues that significant numbers of Indians did not possess lands in communities because they were landless or already living on haciendas, and therefore did not have the same established tributary relationship with the state as those persons living in autonomous communities.²⁰ Ana Teruel has examined the regional variations in the southern Bolivian highlands and valleys. She argues that communities with lands that were individually parceled long before the liberal reforms of the late nineteenth century were impacted very differently by liberal Dis Entailment laws than the autonomous communities found in abundance in the north of Potosi and the Department of La Paz.²¹ The same appears to be true in some communities

¹⁸ Platt, Tristan, "Calendarios Tributarios e Intervención Mercantil," in *La Participación Indigena En Los Mercados Surandinos: Estrategias y Reproducción Social, Siglos XVI a XX* (Ed. CERES, 1987); Tristan Platt, *The Weak and the Strong. Monetary Policies, Spheres of Exchange and Crises of Trust in 19th Century Potosi (Bolivia)* (CAS Occasional Paper 31, University of St Andrews, 2008); Tristan Platt, "Simón Bolívar, the Sun of Justice and the Amerindian Virgin: Andean Conceptions of the Patria in Nineteenth-Century Potosí," *Journal of Latin American Studies* 25, no. 01 (1993): 159; Erick D. Langer and Viviana E. Conti, "Circuitos Comerciales Tradicionales y Cambio Económico En Los Andes Centromeridionales (1830-1930)," *Desarrollo Económico* 31, no. 121 (1991): 91–111; Langer, "Bringing the Economic Back In."

¹⁹ Though not operating under the dual currency scheme, a similar process of growth in local production of foodstuffs destined for regional demographic (and especially mining centers) has been studied in Peru for the mid-nineteenth century period. Carlos Contreras, *Mineros and Campesinos En Los Andes. Mercado Laboral y Economia Campesina En La Sierra Central Siglo XIX.* (Lima: Instituto de Estudios Peruanos, 1988).

²⁰ Larson, *Trials of Nation Making*.

²¹ Ana A. Teruel, "La propiedad en tiempos previos a la Reforma Agraria boliviana. Estudio comparado de Potosí y Tarija," *Nuevo Mundo Mundos Nuevos*, 2015; Ana A. Teruel, "En torno al conocimiento histórico de los derechos de propiedad de la tierra en la frontera argentinoboliviana," *Estudios Sociales del NOA* 0, no. 14 (2014): 63–86.

in the Intersalar region, where parcels within communities were titled to individuals as early as the 1840s.²² Even though individuals with access to community lands paid tribute and received recognition of their corporate organization, the varied experiences of different populations may have played a role in determining the nature or degree of their regional political and economic participation.

The instability of the national government throughout the nineteenth century makes generalizing about the impact of legal reforms and liberal ideas difficult. While they certainly laid out frameworks that guided interactions with the state in many situations, the "singularity" of the Bolivian state during this period should not be assumed.²³ As Benedict Anderson has shown in broad terms, and Christopher Krupa and David Nugent detail for Andean states, one important step in the cultural construction of a state is the unification of disparate people, representations, and institutions into what is understood to be a whole or singular state in the imaginaries of the general population.²⁴ This process of unification in the cultural construction of a state is what makes a local tax collector, for example, a legitimate agent and representation of the state and not simply an individual skimming

²² These titles may not have presented a rupture with community-based determination of land access though they did represent a significant legal change for tax purposes with the state, possibly presenting a similar case to that outlined by Teruel. (Personal communication of the author with the community of Jirira, Oruro); Teruel, "La propiedad en tiempos previos a la Reforma Agraria boliviana. Estudio comparado de Potosí y Tarija."

²³ Aradhana Sharma and Akhil Gupta, *The Anthropology of the State: A Reader* (John Wiley & Sons, 2009); James Ferguson and Akhil Gupta, "Spatializing States: Toward an Ethnography of Neoliberal Governmentality," *American Ethnologist* 29, no. 4 (2002): 981–1002; Christopher Krupa and David Nugent, *State Theory and Andean Politics: New Approaches to the Study of Rule* (University of Pennsylvania Press, 2015).

²⁴ Benedict Anderson, *Imagined Communities: Reflections on the Origin and Spread of Nationalism* (Verso, 1991); Krupa and Nugent, *State Theory and Andean Politics.*

money from traders and transporters – and this imaginary construction wasn't uniform across different regions of Bolivia in the nineteenth century.

The successive coups and ruptures at the national level meant that institutional stability, where it existed throughout this period, may not have been created by the national government or its institutions but rather something found on the local level. Because of this, the struggle over legitimacy and representations of the state was replete with private interests and non-state institutions. Without dismissing the importance of the appearance of national institutions like the military at certain moments, local state and social institutions were clearly more present in people's daily lives.²⁵ Researchers approaching processes of state formation highlight the importance of everyday and commonplace interactions in constructing the meaning of the state for the population, because the "sphere of everyday practices is the primary arena in which people learn something about the state."²⁶ The lessons learned by a population interacting with local officials, and the meaning of the state they construct, do not necessarily reflect the intentions of national politicians.

Daily interactions with the "state" in much of Bolivia throughout this time period did not involve bureaucrats, but rather exchanges with local figures who took on multiple roles in their societies. Local governments were dominated by individuals who would have been well known to the local populations from the social and economic spheres of life and whose power did not only stem from their position in government. Moreover, stable

²⁵ In later chapters I explore how even repressive actions taken by police forces were sometimes carried out by private forces under the authority of local politicians.

²⁶ Sharma and Gupta, *The Anthropology of the State*, 2009, 11; Ferguson and Gupta, "Spatializing States: Toward an Ethnography of Neoliberal Governmentality," 2002; Gilbert Michael Joseph and Daniel Nugent, *Everyday Forms of State Formation: Revolution and the Negotiation of Rule in Modern Mexico* (Duke University Press, 1994).

institutions and figures that structured society and relationships also included local church representatives and in indigenous communities, their leaders, family, transporters, merchants, and artisans. In some regions, elements of ayllu social organization remained extremely important in shaping institutions like marriage or land inheritance patterns. Prior to the avalanche of new liberal reforms in the second half of the nineteenth century, a significant part of economic power and effective forms of state control was fragmented across smaller populations in the mostly rural nation.²⁷

Renewed liberal agendas and contradictions:

The consequences of this fragmentation and tension became clear as new liberal reforms advanced towards the end of the nineteenth century. As Brooke Larson notes in her comparative work on race and nation-building, Andean states moved into the twentieth century "without having built a hegemonic "language of contention" to replace the shattered colonial heritage of "dual republics" or to contain the resurgence of ethnic politics."²⁸

The resurgence of indigenous movements in Bolivia was very much sparked by the liberal land reform laws advanced at the end of the nineteenth century. Those reforms were integral to the overarching liberal project to change the organization of national political power and push forward development plans. The growing demand for many resources found in abundance in Bolivia clashed with infrastructure deficits, lack of investment, and labor shortages in extractive sectors of the economy. For national politicians looking to

 27 In certain aspects, these dispersed and very different interactions with the liberal state in different, and particularly rural populations can also be seen in Mexico. Schaefer, *Liberalism as Utopia*.

²⁸ Larson, *Trials of Nation Making*, 13.

establish oligarchic rule over a nation with an export-oriented economy, post-Independence policies and arrangements came to be seen as increasingly incompatible with their vision of modernization and economic development.²⁹ Previous policies and the retraction of the state from certain regions had opened niches in economic life that allowed some indigenous populations, in certain regions of the country, to create and maintain an important role in the economy that was not defined by their subjugation to large landowners, employers, or national institutions. When politicians sought to close those spaces, they were met with resistance.

The push for liberal reforms emerging at the end of the nineteenth century embodied two slightly different, yet connected, objections to the post-Independence arrangement. Brook Larson argues "their arguments were both philosophic," drawing on the inherent incompatibility between colonial relations or policies and liberal ideals, while they were also "pragmatic," and viewed an economic rearrangement of power as necessary for the expansion of liberal capitalism.³⁰ Historian Pilar Mendieta identifies two conceptual currents circulating among liberal reformers about how to break with the colonial pact.³¹ One sought to convert community lands into haciendas and turn residents into peones or colonos on haciendas, in what Brooke Larson calls a "refeudalization plan."³² The other sought to make community members into smallholders, a step

²⁹ Many historians have directly designated the entre period stretching from the end of the War of the Pacific through the first decades of the twentieth century as the period of oligarchic rule or the liberal period, regardless of which partisan or regional power held control of the national government. Klein, *A Concise History of Bolivia*, 2003; Larson, *Trials of Nation Making*. ³⁰ Larson, *Trials of Nation Making*, 214

³⁰ Larson, *Trials of Nation Making*, 214.

³¹ Pilar Mendieta Parada, "En defensa del pacto tributario: los indígenas bolivianos frente al proyecto liberal : S. XIX.," *Revista andina.*, no. 41 (2005): 131–54.

³² Larson, *Trials of Nation Making*, 218.

mimicking the creation of an individual subject before the state within an expanding capitalist model of production and real estate market. Nevertheless, by 1880, Republican laws and governance had not produced a complete break with the colonial past in demographic, political, or economic terms. And, regardless of the diversity of indigenous experiences and interests, national political classes increasingly saw the nation's indigenous population as a single racialized group, and turned to ideas like Social Darwinism to further argue their agenda.³³

The simultaneous push for a widespread economic reorganization of the country, a closure of spaces of indigenous agency or autonomy, and the diffusion new ideas about race, hygiene, and social engineering would produce a set of questions and contradictions that continued well into the first decades of the twentieth century and Liberal Party rule. Writing at the start of the twentieth century, then Liberal Party leader Bautista Saavedra articulated some of these questions in his often cited declaration:

What we should do with the indigenous race is organize and civilizing and humane colonization and submit them to autochthonous legislation, as the English have done in India; raise them from the humiliating condition in which they are placed, protecting them from the depredations of the mestizos and whites; call them to the army and to industry.³⁴

³³ Irurozqui Victoriano, *La armonía de las desigualdades*; Pilar Mendieta Parada, *Entre la alianza y la confrontación : Pablo Zárate Willka y la rebelión indígena de 1899 en Bolivia*, Travaux de l'IFEA (Lima: Institut français d'études andines, 2015); E. Gabrielle Kuenzli, "Acting Inca: The Parameters of National Belonging in Early Twentieth-Century Bolivia," *Hispanic American Historical Review* 90, no. 2 (2010): 247–81; Larson, *Trials of Nation Making*; Forrest Hylton, "Reverberations of Insurgency: Indian Communities, the Federal War of 1899, and the Regeneration of Bolivia" (PhD Thesis, New York University, 2010); Rivera Cusicanqui, *Oppressed But Not Defeated*; Marie Danielle Demelas, "Darwinismo a La Criolla: El Darwinismo Social En Bolivia 1880-1910," *Historia Boliviana* 1–2 (1980).

³⁴ Quote in original Spanish: "Lo que debemos hacer con la raza indígena es organizar una colonización civilizadora y humana, sometiéndola a una legislación autóctona, como lo han hecho los ingleses en la India; es levantarla de la condición humillante en que está colocada, protegiéndola contra las depredaciones del mestizo y del blanco; es llamarla al ejército y a las industrias." Bautista Saavedra, El Ayllu (La Paz, Bolivia, 1901), 155.

Researchers return to this particular statement so frequently because in it, Saavedra openly connects industrialization to modern colonialism and nation building. Moreover, Saavedra emphasizes the way that a liberal economic development plan and state expansion could transform the nation's indigenous population through their insertion into capitalism and modern state institutions at the lowest rungs of power.

Characterizations of the nation's indigenous majority during this time period were contradictory. On the one hand, biological constructions of difference spread in Bolivian society, as it did in many others during this time period.³⁵ The national census carried out and published at the beginning of the Liberal Party governments in 1900, described fixed biological categorizations of different populations and used those as a way to determine each group's future in the nation.³⁶ However at the same time, this construction clashed with certain aspects of the positions taken by liberals like Saavedra. While the census predicted the imminent disappearance of indigenous populations – a dubious assertion – every aspect of the modernization project required workers that in demographic terms, would have come from those populations. One of the questions addressed throughout this study is to what degree the position taken by liberal thinkers like Saavedra really differed

³⁵ For a discussion of the tensions between racial and ethnic constructions of indigeneity in Latin America and the Andes, see: Peter Wade, *Race And Ethnicity In Latin America* (Pluto Press, 1997); Larson, *Trials of Nation Making*; L. Gotkowitz, ed., *Histories of Race and Racism: The Andes and Mesoamerica from Colonial Times to the Present* (Duke University Press, 2011); Nancy Stepan, *"The Hour of Eugenics": Race, Gender, and Nation in Latin America*, Cornell Paperbacks (Cornell University Press, 1991).

³⁶ J.M. Gamarra, *Censo General de La Población de La República de Bolivia Según El Empadronamiento de 10. de Septiembre de 1900.* (La Paz, Bolivia: Oficina Nacional de Inmigración, Estadística y Propaganda Geográfica, 1902).

from some of the basic questions that Spanish colonial rulers had sought to resolve through the imposition of the mita and the 'dual republics' system itself.

However, looking forward to their hoped-for industrialization of the nation, Liberal Party leadership confronted the question of how fixed the roles and categories in their society really were. This became a central question for national development as the liberal economy grew.³⁷ Would transforming the economic activities and certain cultural practices of indigenous populations make them modern non-indigenous subjects as the liberals defined it? Would modernization and industrial growth turn indigenous populations into working-class cholos? And, what role in the nation and position of power would those new groups occupy?³⁸

On the eve of the twentieth century, tensions over land tenure and liberal reforms came to a head with the Federal War and the Willka Rebellion.³⁹ The Liberal and Conservative struggle for national and regional political domination ended with the Liberal Party assuming power and shifting the political center of the country to La Paz.⁴⁰ Pablo Zárate Willka, an Aymara authority and tentative ally of the Liberal Party leader José

³⁷ This was seen across Andean nations in different forms. Larson, *Trials of Nation Making*.
³⁸ This issue of economic participation and the construction of identity is approached in both its historical and contemprary dimensions in: Denise Y Arnold et al., ¿Indígenas u obreros?: la construcción política de identidades en el Altiplano boliviano (La Paz, Bolivia: UNIR, 2009).
³⁹ Hylton, "Reverberations of Insurgency: Indian Communities, the Federal War of 1899, and the Regeneration of Bolivia"; Mendieta Parada, *Entre la alianza y la confrontación : Pablo Zárate Willka y la rebelión indígena de 1899 en Bolivia*; Marta Irurozqui Victoriano, "The Sound of the Pututos. Politicisation and Indigenous Rebellions in Bolivia, 1825-1921," *Journal of Latin American Studies* 32, no. 1 (2000): 85–114; Ramiro Condarco Morales, *Zárate, el temible Willka: historia de la rebelión indígena de 1899* (La Paz, 1966).

⁴⁰ La Paz was already a major demographic and commercial center. Gamarra, *Censo General de La Población de La República de Bolivia Según El Empadronamiento de 10. de Septiembre de 1900.*, 1902.

Manuel Pando at the start of the war, continued to fight after the Liberal Party won – only with an agenda Liberals did not share. The rebellion led by Zárate Willka fought to retake lands, expel hacendados, and reinstate elements of ayllu social and political life that had been degraded during the previous decades. Larson summarizes the conflicting interests between Liberals and the Aymara movement:

For Pando, the enemy was simply the opposition party that had kept Liberals out of power since the beginning of civilian oligarchic rule in 1880. For indigenous communities under siege for more than two decades, the enemy transcended narrow party politics and implicated the whole social and moral order. Their common ideological ground was shallow, at best.⁴¹

Participants in the Willka rebellion understood their agenda to encompass far more than land rights. Historiographical discussions about many indigenous rebellions during this period have asked accompanying and slightly different questions: Did indigenous movements push to become integrated into the nation as liberal citizens or did they seek a kind of autonomy from the state or even the reestablishment of colonial 'dual' model? Tristan Platt, Pilar Mendieta, Forrest Hylton, Marta Irurozqui, Roberto Choque and many others have all engaged in important debates over this question, with some positing that all of these positions may not have been contradictory or mutually exclusive to indigenous leaders at all.⁴²

⁴¹ Larson, *Trials of Nation Making*, 231.

⁴² Platt, "The Andean Experience of Bolivian Liberalism. Roots of Rebellion in 19th Century Chayanta"; Tristan Platt, "Liberalism and Ethnocide in the Southern Andes," *History Workshop Journal* 17, no. 1 (1984): 3–18; Irurozqui Victoriano, *La armonía de las desigualdades*; Marta Irurozqui Victoriano, "¿Ciudadanos Armados o Traidores a La Patria? Participación Indígena En Las Revoluciones Bolivianas de 1870 y 1899.," *Iconos. Revista de Ciencias Sociales* 26 (2006); Hylton, "Reverberations of Insurgency: Indian Communities, the Federal War of 1899, and the Regeneration of Bolivia"; Forrest Hylton, Sinclair Thomson, and Adolfo Gilly, *Revolutionary*

As soon as Pando and the Liberal Party came to power, the government launched a brutal campaign of reprisals and executions of the rebellion's leadership and base.⁴³ Once in power, the Liberal Party moved towards implementing many of the same aims and reforms that had been discussed for decades, only with more intensity than their predecessors. Their maintenance of power at the national level for more than two decades gave them a continuity in governance that many previous nineteenth century regimes had lacked, and their effective domination of the political opposition gave them a unique degree of power for an elected government up to that point.⁴⁴ However, the tensions between liberal ideas and colonial practices, and the challenges of non-centralized state, would not be so neatly resolved.

Horizons: Past and Present in Bolivian Politics (Verso, 2007); Mendieta Parada, Entre la alianza y la confrontación : Pablo Zárate Willka y la rebelión indígena de 1899 en Bolivia; Pilar Mendieta Parada, "Caminantes Entre Dos Mundos: Los Apoderados Indígenas En Bolivia (Siglo XIX)," Revista de Indias 66, no. 238 (2006): 761–782; Roberto Choque Canqui, "La Servidumbre Indígena Andina de Bolivia," in El Siglo XIX: Bolivia y América Latina, ed. Rossana Barragán and Seemin Qayum, Travaux de l'IFEA (Lima: Institut français d'études andines, 1997), 475–485; Roberto Choque Canqui and Xavier Albó, Cinco siglos de historia (CIPCA, 2003).
⁴³ Klein, A Concise History of Bolivia, 2003; Mendieta Parada, Entre la alianza y la confrontación : Pablo Zárate Willka y la rebelión indígena de 1899 en Bolivia; Hylton,

[&]quot;Reverberations of Insurgency: Indian Communities, the Federal War of 1899, and the Regeneration of Bolivia"; Irurozqui Victoriano, *La armonía de las desigualdades*; Irurozqui Victoriano, "The Sound of the Pututos. Politicisation and Indigenous Rebellions in Bolivia, 1825-1921," 2000.

⁴⁴ The Conservative Party also ruled for nearly the same length of time, though appeared to have been less unified in its power and faced a significant opposition in the Liberal Party. In contrast, much of the opposition to Liberal Party rule arose from their own ranks. Liberal Party members and leaders like Daniel Salamanca, Bautista Saavedra, and even Jose Manual Pando (the first Liberal Party president) split to form the Republican opposition. The period of Republican Party governance following the Liberals could be seen in some ways as a reformed continuation of the Liberal Party. Klein, *A Concise History of Bolivia*, 2003.

Railroads, liberal states and societies:

This dissertation examines many of these same issues, though not through the lens of land reforms, resistance, or rebellions. Here, the emphasis is on the tensions and conflicts produced in other economic, social, and political spheres of everyday life. Following the suggestions made by historians like Erick Langer, this study expands the discussion about participation in the nation, and the inclusion or exclusion of different populations, into conflicts seen in the realms of mining, labor, and commerce.⁴⁵ And, like their counterparts in many other nations, liberals in Bolivia believed that changes in those aspects of life depended on modernization and the development of large-scale national railroad projects.

The Liberal Party's obsession with transport infrastructure and trains was not simply an attempt to solve infrastructural deficits in the mining sector. The party leadership understood them to be indispensable to the reformulation of social and power relations. Even though railroad promoters often couched their projects as mechanical solutions to very specific problems, trains were never only intended to lower transport costs. Much of this study parts from the argument that railroads were just as central to the formation of the liberal state and the struggles of subaltern populations as land reforms.

Focusing on these aspects of liberal reforms changed the periodization of this study in comparison to others that more explicitly focus on land tenure, indigenous movements, and political ideologies.⁴⁶ Though the first chapter of this dissertation reaches back into the

⁴⁵ Langer, "Bringing the Economic Back In."

⁴⁶ The periodization used here has also been used by other researchers focusing on both the development of tin mining and the expansion of rail networks connected to mining centers. Contreras, "Bolivia 1900- 1939: Minería, Ferrocarriles y Educación"; Manuel Contreras, "El

1860s and examines the emergence of a liberal development discourse involving modernization through railroads, that analysis highlights a very specific point: Liberal Party political leadership discussed the same rail lines as previous government – just as they did with other reforms like military conscription or the creation of civil institutions – however, they shifted strategies of governance in ways that produced change to a far greater degree than previous regimes. This was due, in part, to the kinds of dramatic economic change their policies unleashed in the daily lives of nearly all people in the altiplano.

Here, the focus is not on assessing whether Liberal Party governments failed or succeeded in implementing the ideals of liberalism, even positivist liberalism of the era.⁴⁷ Nor does this study emphasize the quantitative results or economic and productive changes in the mining sector in macroeconomic terms. Even while some chapters trace those outcomes, the principal focus is on what emerged from the state-backed railroad development agenda. In his studies of late twentieth century development programs, James Ferguson suggests that:"... It may be that what is most important about a "development" project is not so much what it fails to do but what it does do; it may be that its real importance in the end lies in the "side effects" Foucault, speaking of the prison,

Desarrollo Del Transporte En Bolivia, Una Aproximación Al Impacto Económico y Social de Los Ferrocarriles y Carreteras 1900-2015," in *Un Siglo de Economía En Bolivia. 1900 – 2015. Tomo 1*, ed. Iván Velásquez-Castellanos and Napoleón Pacheco Torrico (La Paz: Plural editores, 2017); Teodoro Salluco Sirpa, *La explotación del cobre en el distrito minero de Corocoro a principios del siglo XX, 1900-1930*, 2013; Luis Reynaldo Gómez Zubieta, "Políticas de Transporte Ferroviario En Bolivia 1860-1940," in *Visiones de Fin de Siglo : Bolivia y América Latina En El Siglo XX*, ed. Iris Villegas et al., Travaux de l'IFEA (Lima: Institut français d'études andines, 2016), 363–387. ⁴⁷ Charles A. Hale, *The Transformation of Liberalism in Late Nineteenth-Century Mexico* (Princeton University Press, 2016).

suggests gests that dwelling on the "failure" of the prison may be asking the wrong question.³⁴⁸ The liberal nation state and economy created by the Bolivian Liberal Party bore little resemblance to the utopic visions of enlightenment philosophers, just as was the case with many other liberal nation states around the world.⁴⁹ However, Ferguson emphasizes that investigating development projects in relation to the aims laid out by planners might be less-useful for understanding outcomes than beginning that search by asking: What was produced, how, and what end did it ultimately serve?⁵⁰ All aspects of Liberal Party governance, and especially railroads, did change both the Bolivian state and the society, regardless of whether the result reflected their intentions. The questions then are what processes and groups shaped those changes and what the results meant for both the state and the society over the long-term.

Throughout this dissertation, I return to an examination of three principal dynamics. They are: *the practices and policies laid out by the Liberal Party governments in consonance with their development agenda; the tension between local or non-centralized practices and the national project; and the creation of new social groups and the changing power relations within society as a result of these projects and reforms*. The

⁴⁸ James Ferguson, "The Anti-Politics Machine," in *The Anthropology of the State: A Reader*, ed. Aradhana Sharma and Akhil Gupta (Wiley, 2008), 272.

⁴⁹ The contradictions of the national discourses surrounding certain aspects of liberal philosophy and the regionalized practices surrounding participation throughout the nineteenth century has been discussed for the Mexican case and the general development of liberal ideas within the context of the expanding British Empire. See: Schaefer, *Liberalism as Utopia*; Hale, *The Transformation of Liberalism in Late Nineteenth-Century Mexico*; Uday Singh Mehta, *Liberalism and Empire: A Study in Nineteenth-Century British Liberal Thought* (University of Chicago Press, 1999). ⁵⁰ Foucault's approach might more specifically ask, what new subjects were produced? M. Foucault, *Discipline and Punish: The Birth of the Prison*, trans. A. Sheridan and A.M.S. Smith, Peregrine Books (Vintage Books, 1995).

sustained interventions of the Liberal Party that are examined throughout this study often appear to be responses to the consequences of their own actions, and/or the lack of implementation of their reforms by other state officials. Amidst this apparent improvisation however, those policies reveal some continuities. Many aspects of Liberal Party reforms reflected logics central to modern statecraft around the world: registering populations, commerce, the landscape, developing a state monopoly on abstracted knowledge of the population and territory, and the reordering of people and spaces.⁵¹ Examining the apparent contradiction between their espousal of a clear modernizing agenda with their development of policy, simply to 'put out fires' of their own making, points to the complexity and difficulty in characterizing much of the Liberal Party agenda and the degree to which the national government drove change.

Much of the improvisation of Liberal Party governments resulted from an inability to directly force the application of their laws or policies. Tensions arose in this process both between the state and different sectors of the population negatively effected by reforms, but also between different groups within the state, and especially in local governments. These conflicts reveal spaces within the state that allowed for different sectors of the population to intervene in the larger Liberal Party project, or to escape from it. The social and political spaces that lie between what was been characterized as hegemony (*sensu* Comaroff and Comaroff) and direct ideological opposition can be productive of new and alternative agendas.⁵² Studies examining responses to liberal state in

⁵¹ James C. Scott, *Seeing Like a State: How Certain Schemes to Improve the Human Condition Have Failed* (Yale University Press, 1998).

⁵² J. Comaroff and J.L. Comaroff, *Of Revelation and Revolution, Volume 1: Christianity, Colonialism, and Consciousness in South Africa* (University of Chicago Press, 1991); J. Comaroff

Bolivia tend to emphasize resistance, alliances, legal struggles and the like; and all of these appear in this study. However, the years of Liberal Party governance were times of reorganization for many groups and social movements. Looking at the tensions between centralized practices and non-centralized ones allows us to see how different groups employed strategies like evasion, contraband, and the appropriation or distortion of a policy or discourse during this period of transition as well. ⁵³

Moreover, as Anand, Gupta and Appel state in their ethnographic studies of current-day infrastructure projects, the seemingly obvious sometimes needs to be restated. Infrastructure "is an integral and intimate part of daily social life: it affects where and how we go to the bathroom; when we have access to electricity or the Internet; where we can travel, how long it takes, and how much it costs to get there."⁵⁴. Unequal access to infrastructure is understood to create 'differential belonging' within a society. Because the Liberal Party project placed the physical modernization of how people and goods moved at the center of their economic development agenda, the emblematic infrastructure and development projects pushed by Liberal Party governments can be understood to have played a key role in the creation of new publics.⁵⁵ Moreover, much of this project aimed to displace old 'publics.'

and J.L. Comaroff, *Of Revelation and Revolution Volume 2: The Dialectics of Modernity on a South African Frontier* (University of Chicago Press, 1991).

 ⁵³ James C. Scott, *The Art of Not Being Governed: An Anarchist History of Upland Southeast Asia* (Yale University Press, 2009); James C. Scott, "Cities, People, and Language," in *The Anthropology of the State: A Reader*, ed. Aradhana Sharma and Akhil Gupta (Wiley, 2009).
 ⁵⁴ Nikhil Anand, Akhil Gupta, and Hannah Appel, *The Promise of Infrastructure* (Duke University Press, 2018), 6.

⁵⁵ Anand, Gupta, and Appel, *The Promise of Infrastructure*.

The groups included and excluded in the Liberal Party project of modernization reveal much about the society and state that emerged from their twenty years of governance. Researchers like Nancy Postero, Brooke Larson, and others have pointed to the fundamental importance of the question of indigeneity, and the place or role of indigenous people, throughout the nation's social and political trajectory.⁵⁶ Neither the constructions of indigeneity nor its valorization have been static - and the same is true of other populations in Bolivian society like cholos.⁵⁷ Nancy Postero states: "Who counts as "indigenous" in any society is a fundamentally political question, since such representations emerge from struggles over particular social, cultural, environmental, and economic matters at particular moments (García 2008; Friedlander 1975)."58 Moreover, even the "integrating mechanisms of school, army barracks, and unions also generate new forms of violence and exclusion."59 In other words, programs of economic change and the expansion of state institutions can redefine the categories of identity and their subsequent power or valorization. The Liberal Party project points to a reformulation of power relations between groups identified as indigenous, cholo, and creole, and also between men

⁵⁶ Larson, *Trials of Nation Making*; Nancy Postero, *Now We Are Citizens: Indigenous Politics in Postmulticultural Bolivia* (Stanford University Press, 2007); Nancy Postero, *The Indigenous State: Race, Politics, and Performance in Plurinational Bolivia* (Univ of California Press, 2017); Nancy Postero and León Zamosc, *The Struggle for Indigenous Rights in Latin America* (Sussex Academic Press, 2004); Laura Gotkowitz, *A Revolution for Our Rights: Indigenous Struggles for Land and Justice in Bolivia, 1880–1952* (Duke University Press, 2008).

 ⁵⁷ Ximena Soruco Sologuren, La ciudad de los cholos: Mestizaje y colonialidad en Bolivia, siglos XIX y XX (Bolivia: Institut français d'études andines, 2013); Arnold et al., ¿Indígenas u obreros?
 ⁵⁸ Postero, The Indigenous State, 6.

⁵⁹ Postero, 9. Also, Shesko outlines the transformative power of the implementation of 'universal' military conscription and its varied impacts on identity and belonging in Bolivia. See: Elizabeth Shesko, "Conscript Nation: Negotiating Authority and Belonging in the Bolivian Barracks, 1900-1950" (PhD Thesis, Duke University, 2012).

and women within these collectives, precisely because the change wrought by those reforms encompassed such a wide swath of daily life.

Layout of Dissertation:

To address these issues the following chapters move from a national analysis of railroad development projects to a very local one focused on the province of Pacajes and the mining and provincial governmental center of Corocoro, right as the Arica – La Paz Railroad began to run through the area. In Chapter One I trace the development of elite thinking about trains, examine the implications of these plans, and then look to how different governments sought to make them concrete. Key to this analysis are the connections between Liberal Party policies regarding borders, the existence of regional and indigenous economic circuits, the consequences of the War of the Pacific, and the powerful role played by financial interests in the project for a national rail network.

Chapter Two focuses on the construction of the Arica – La Paz railroad and examines the complexity of the problems and of the groups involved in building a railroad through a challenging Andean landscape. Even though this particular railroad was guaranteed to be built by the Chilean government as a result of the 1904 Treaty signed by both nations, the process of construction experienced many of the same delays that plagued other rail lines. Addressing some of the reasons for this leads to a discussion of how the railroad plans across the country brought labor questions to the forefront of Liberal Party policies. As addressed in the chapter, challenges in recruiting the laborers needed to wield the picks and shovels on a railroad brought Liberal Party interests into line with those of mining companies, who also faced worker shortages. The focus of this chapter is not on

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how or whether the railroad increased production, but rather on how attempts to overcome labor shortages clashed with the interest of potential workers, and with those local government officials who did not want to change their relationship to indigenous workers. The Arica – La Paz construction project offers a concrete example of where liberal modernizing policies echoed Colonial Era ones that sought to discipline and control indigenous labor.

Chapters Three and Four turn to the impact of the train on regional governments and markets. Examining a key point along the Arica – La Paz line, the mining center and local provincial government seat of Corocoro, I look at how the local state was intricately intertwined with transnational commerce even prior to the railroad. The blurred lines between local authorities and the commercial world reveal the profound conflicts of interests impacting the fiscal reforms that accompanied railroads. Chapter Four focuses on the simultaneous changes within local marketplaces and their effect on the people buying and selling within them. Spaces of trade and consumption became sites where the tensions evident in the larger liberal project translated into physical confrontations and conflict between people going about their everyday lives.

Both of these chapters examine the multiple ways in which indigenous populations connected with local and transnational circuits of commerce and production, placing certain indigenous traders squarely within commercial and urban spheres. These chapters also focus on how the racialized and gendered patterns of exclusion from the marketplace created tensions in day to day life throughout the region. In both of these cases, the national macroeconomic changes sparked by Liberal reforms and the local governmental

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reforms of the marketplace become central to understanding the relationship of subaltern populations with the state.

Chapter Five focuses more specifically on the changes in the mining sector of Pacajes. Many well-established studies of the consequences of industrialization of the mining sector during this time highlight the formation of both a stable mining workforce and the development of labor organizations and struggles. While examining factors that contributed to these trends, this chapter focuses on the continuity of Colonial Era practices surrounding the characterization of indigenous mine labor and the disciplining of workers in the sector. Rather than focusing on the "Labor Question," or the problem presented to capital by the subsequent organization of proletarian labor, here I examine the tensions and struggles surrounding attempts to create a dependent workforce and what that meant for the indigenous rural communities and a growing permanent mining workforce.⁶⁰

In these chapters, I engage in a dialogue with the historiographical debates over models of modern liberal governance and development, and the continuation of colonial hierarchies and policies. Liberal Party leaders held up their projects as physical representations of a break with the colonial past in their march towards a unified and coherent state. Yet, in the daily practices and conflicts surrounding all of these technologies, both the social and political products of their rule reveal a mixing of the colonial with the modern across nearly all sectors of society and life.

⁶⁰See Drinot for a discussion and description of the "Labor Problem" in Peru at the start of the twentieth century. Paulo Drinot, *The Allure of Labor: Workers, Race, and the Making of the Peruvian State* (Duke University Press, 2011).

CHAPTER ONE: LIBERAL GEOGRAPHIES AND DEVELOPMENT DISCOURSES

In the nineteenth and early twentieth centuries, railroad planning and construction accompanied the rise of liberalism, pushes for modernization, and the growing export boom throughout Latin America. In the Andes, national elites and businessmen looked for ways to gain or to maintain a foothold in the changing economies of the region, to stimulate growth in extractive industries like mining, and to link their challenging mountainous geographies, by developing railroads and modernizing transport infrastructure. They envisioned this new form of transport as a tool for facilitating national progress and expansion, and consolidating or shaping national identities and connections. In many instances, these aims were seen as inextricably joined. Railroads and roads, and the discourses surrounding their introduction and construction, commanded central places in discussions about national and industrial expansion at the end of the nineteenth century across the Andes.⁶¹

While pursuing many of the same goals as their political peers in other nations in the region, the Bolivian Liberal Party took the quest for railroads at the start of the twentieth century to an extreme. During the first years of Liberal Party governments, different presidents and members of the party pursued reforms in transport infrastructure at the cost of national territory and the treasury. They signed an agreement with Brazil in

⁶¹ For a discussion on the relationship between liberalism, export capitalism, and railroads in the Andes see: Paul Gootenberg, *Imagining Development: Economic Ideas in Peru's "Fictitious Prosperity" of Guano, 1840-1880* (University of California Press, 1993); Kim A. Clark, *The Redemptive Work: Railway and Nation in Ecuador, 1895-1930* (Rowman & Littlefield Publishers, 1998).

1903 that relinquished rights to important rubber producing regions in the Amazon, and in 1904 they signed a treaty with Chile that ceded the mineral-rich Bolivian coastline that had been occupied by that nation during the War of the Pacific.⁶² These agreements have proven to be some of the most problematic and controversial legacies of Liberal Party, and their effects continue to dominate Bolivian foreign policy today. While the discussions surrounding these treaties today often focus on the violations by one or another party and the outstanding conflicts that were left unresolved, the principal physical products of those agreements – railroads – often get relegated to the sidelines in historiographical analysis of the agreements.⁶³ Railroads and modernization projects must be re-centered within the discussion of the Liberal Party legacy and the creation of the liberal nation state.

Here, the purpose is to explain the Bolivian Liberal hopes and their links to railroads in the first two decades of the twentieth century. Railroads were part of the deepest dreams of the Liberals and the international businessmen they worked with.⁶⁴ The development of railroads, the expansion of the state, and the modernization of the nation were linked in the eyes of many across the political spectrum.⁶⁵ Thus, while the Bolivian Liberal Party may have represented a political rupture in some senses, as they sat down to

⁶² The Treaty signed with Brazil was the Treaty of Petropolis, the Ley de 6 de enero de 1904. (Gaceta de Gobierno de Bolivia). The Treaty of Peace and Friendship signed with Chile, or the Treaty of 1904 as it is often called, was signed in 1904 by the parties and passed into law by the Congress in early 1905 via the Ley 4 de febrero de 1905, (Gaceta de Gobierno de Bolivia). The complete text of the treaty was approved by the congress on 10 of March, 1905.

⁶³ Francoise Martínez and Pablo Quisbert. "Resignación y ambición: La Política Exterior Liberal", *Historias bajo la lupa. La Guerra Federal* (La Paz: 1999); Loreto Correa Vera, "Del Poder a Los Tratados: Desarrollo y Ferrocarriles En Bolivia, 1870-1904," *Historia (Santiago)* 46, no. 2 (2013): 315–41.

⁶⁴ Arturo Escobar, *Encountering Development: The Making and Unmaking of the Third World* (Princeton University Press, 2001); Gootenberg, *Imagining Development*.

⁶⁵ Scott, Seeing Like a State; Gootenberg, Imagining Development; Clark, The Redemptive Work.

negotiate some of the most important treaties and diplomatic agreements in Bolivia's history, they pushed an agenda shared with many of their Republican Era predecessors.

Everyday people are not represented here. This is intentional; this chapter traces the genealogy and history of these projects and discourses in order to understand the actions taken by the Liberal Party governments and explore the impacts of their policies. These projects were principally promoted and discussed among political and business elites, often reaching into the offices of a New York bank or a London investment firm. Though working class and indigenous communities appeared in between the lines of the debates and arguments for these projects, they did not participate in the planning of these projects before they were built. State planning did not initially allow for any popular intervention.

There are two sections to the chapter: the origins of elite thinking from the mid- to the late nineteenth century; then, the attempt to implement these ideas once the Liberal Party dominated public office in the early twentieth century. Bolivia followed the economic examples of the north Atlantic economies, particularly Great Britain and the United States, and the decisions made by its South American neighbors to improve the profitability of trade and extractive industries by reducing transport costs. But the dream of railroads crossing the country and reaching international ports was larger. It included social and political transformations – to replace what they saw as a preindustrial set of societies with "progress." They completed some railroads but at a high cost that skewed all future choices with government debt and unfinished railroad projects. The long-term consequences did not lead to the outcome the elites had envisioned.

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Part One: Dreams of railroads.

In the early 1910s, North American and European geographers visiting Bolivia described it as a country in the midst of a dramatic transformation.⁶⁶ One of those writers, Isaiah Bowman, saw parallels in the transformation of Bolivia in 1910 with that seen in the lands west of the Mississippi River in the United States after the construction of the transcontinental railroad, which had sparked movement of goods and people and facilitated the colonization of the North American West. Bolivian Liberals overseeing the drafting of a general law regulating railroads in 1910 and those who worked on the treaties in 1903 and 1904, would have been very pleased with that analogy and depiction of the nation for a foreign audience.⁶⁷

Railroads and related industrial technologies figured prominently in liberal visions across the Americas as both a visible and physical product of national modernization and as a key agent producing 'progress'. As A. Kim Clark notes in her study of a national railroad project in Ecuador, liberals often saw technologies as motors for change, embracing a kind of positivist understanding of the power of technology to transform a society.⁶⁸ In the eyes of many proponents of railroads, the 'iron horses' were not simply tools to achieve their goals, they were agents of change that once placed in the landscape

⁶⁶ Isaiah Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," *Bulletin of the American Geographical Society* 42, no. 1 (1910): 22–37; Isaiah Bowman, "Trade Routes in the Economic Geography of Bolivia. Part II," *Bulletin of the American Geographical Society* 42, no. 2 (1910): 90–104; Isaiah Bowman, "Trade Routes in the Economic Geography of Bolivia. Part III," *Bulletin of the American Geography* of Bolivia. Part III," *Bulletin of the American Geography* of Bolivia. Part III, "*Bulletin of the American Geography* of Bolivia. Part III," *Bulletin of the American Geography* of Bolivia. Part III, "*Bulletin of the American Geography* of Bolivia. Part III," *Bulletin of the American Geography* of Bolivia. Part III, "*Bulletin of the American Geography* of Bolivia. Part III,"

⁶⁷ Ley General de Ferrocarriles, 3 de octubre de 1910. (Gaceta de Gobierno de Bolivia)
⁶⁸ This vision was also connected to a positivist turn in liberalism during the time period. Clark, *The Redemptive Work*; Hale, *The Transformation of Liberalism in Late Nineteenth-Century Mexico*; Schaefer, *Liberalism as Utopia*.

would produce the ends they desired. And indeed, the depth of the changes wrought by railroads may be hard for us to imagine today. Christian Wolmar states that to fully understand the magnitude of change wrought by the new technology of trains, one must put themselves in the place of someone who "…had never seen anything faster than a galloping horse." He continues: "Their horizons were necessarily limited, and the arrival of the iron road changed that forever."⁶⁹ For example, the railroad to Arica ostensibly made it possible to go from standing on the outskirts of La Paz to the Pacific port of Arica in less than 22 hours, when only a year before it would have required nearly a week of travel.⁷⁰ For other towns – especially those in the eastern valleys of Bolivia – this voyage would have taken far longer. Between the end of the nineteenth century and the first decades of the twentieth, many residents of the altiplano witnessed dramatic changes that included the arrival of steamships, trains, automobiles, and planes – all within one generation.

However, researchers examining the history of trains and other carbon-based transportation also identify the pitfalls of fetishizing and decontextualizing or depoliticizing technology.⁷¹ Clark points out that while liberal discourses about the railroads focused on their transformative power, trains were the products of different

⁷⁰ Bowman provides good descriptions of the changes in travel time between destinations just prior to the construction of many rail lines in the country. See: Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," 1910; Bowman, "Trade Routes in the Economic Geography of Bolivia. Part II"; Bowman, "Trade Routes in the Economic Geography of Bolivia. Part III." Also: Contreras, "Bolivia 1900- 1939: Minería, Ferrocarriles y Educación"; Contreras, "El Desarrollo Del Transporte En Bolivia, Una Aproximación Al Impacto Económico y Social de Los Ferrocarriles y Carreteras 1900-2015."

⁶⁹ Christian Wolmar, *Blood, Iron, and Gold: How the Railways Transformed the World* (PublicAffairs, 2010), xxi.

⁷¹ Michael Adas, *Machines as the Measure of Men: Science, Technology, and Ideologies of Western Dominance* (Cornell University Press, 1990).

contexts, influenced by particular structures of power, and utilized in different ways.⁷² In *The Redemptive Work*, Clark argues that "technology alone is not the motor of history, however; social and political struggles are."⁷³ Railroads were not neutral technological agents magically bringing modernity to any place; they were both shaped by and produced, power and conflict.⁷⁴ These projects were historical examples of what other researchers have described while examining infrastructure: "people working on things to work on each other, while those things work on them."⁷⁵

Writing for an English-speaking audience, Isaiah Bowman aimed to provide his readers with an idea of the context from which the desire for railroads emerged in the region. In his discussion of the economic geography of the country in 1910, a period of rapid construction of many railroads, he related some of the challenges posed by the lack of efficient transportation systems in the altiplano, and for the mining sector in particular.⁷⁶ For example, prior to the Antofagasta Railroad, the Guadalupe mine in Chichas, located near the border with Argentina, exported its silver ores more than 1300 miles over land to the Argentine port of Rosario, where it was then shipped across the Atlantic.⁷⁷ Before the Arica – La Paz Railroad and after the inauguration of Peruvian railroads, the mines of the Corocoro district mainly exported through the Peruvian port of Mollendo in a process that

⁷² Clark, *The Redemptive Work*.

⁷³ Clark, 5.

⁷⁴ For example: Adas, *Machines as the Measure of Men*; Clark, *The Redemptive Work*; Gootenberg, *Imagining Development*; David Wade Chambers and Richard Gillespie, "Locality in the History of Science: Colonial Science, Technoscience, and Indigenous Knowledge," *Osiris, 2nd Series* 15 (2000): 221–40.

⁷⁵ Anand, Gupta, and Appel, *The Promise of Infrastructure*.

⁷⁶ Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," 1910.

⁷⁷ Bowman, 24.

required the copper ores to change hands more than eight times in different cargo transfers before reaching overseas destinations.⁷⁸ According to Bowman: "The average cost of taking a ton of goods from Europe to the central cities of Bolivia by these same transport methods was equivalent to the transportation of the same ton a distance of 20,000 miles by railway at average rates or six times the world's circumference by steamship."⁷⁹ Bowman's view, which identified an inefficient and costly system that limited profits and investment in the mining sector echoed the observations of Bolivian politicians in the mid-nineteenth century. They, including Avelino Aramayo and Aniceto Arce, pushed for railroads while placing economic arguments at the center of their outlooks.⁸⁰ Aramayo argued in the 1860s, that the poor state of the economy and much of life on the altiplano was due to the lack of access to the necessary materials for industrial growth.⁸¹ As a mine owner and investor himself, he pointed to the frustrations created by the state of transport networks in the altiplano, using figures and arguments much like Bowman would many decades later.

However, Aramayo and many Bolivian politicians would take these economic arguments into the realm of politics and the future of the nation, linking railroads to the creation of a modern nation-state and way of life. Aramayo described the country as held back from development in all spheres of life because of the lack of economic and industrial development. In his view, geographic isolation, in part a product of the poor state of

⁷⁸ Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," 1910.

⁷⁹ Bowman, 25.

⁸⁰Arce and Aramayo, both occupying the dual roles as businessmen and politicians, were particularly important for the development and planning for railroads, and in Arce's case, the extension of the Antofagasta Railroad into Oruro. Herbert S. Klein, *A Concise History of Bolivia* (Cambridge University Press, 2003).

⁸¹ Avelino Aramayo, *Proyecto de una nueva vía de comunicación entre Bolivia i el Océano Pacífico* (London: W. & A. Webster, 1863).

transport networks, limited the creation of industrious persons and the liberal transformations that the country needed. Writing in the early 1860s about the importance of railroad development, he argued that:

Where wealth and work do not provide man with a certain degree of wellbeing and independence, where education and culture cannot develop as they should because of a lack of material resources, one cannot correctly hope that citizens come to know their duties and their rights so as to defend and safely conserve them. And, without these indispensable elements for the organization of social life and the government, in my mind, neither the empire of law and institutions nor the respect for dignity and natural rights are possible.⁸²

Aramayo expressed what others have identified in their studies of late nineteenth and early twentieth century liberalism throughout the region: the fulfillment of liberal political ideals necessarily involved mechanical, scientific and technological development.⁸³

In the Bolivian context, the notion that trains were needed immediately to develop the nation was nearly always tied to the requirements of the mining sector or the exploitation of natural resources. Even when railroads to the nation's lowlands or nonmining regions were discussed, arguments in favor of the projects included the development extractive economic activities, though many also included arguments for colonization and population growth.⁸⁴ The chief framework for constructing railroads

⁸² Quote in the original Spanish: "Allí donde la riqueza i el trabajo, no dan al hombre cierto grado de bienestar e independencia, donde la educación i la cultura, no pueden desarrollarse debidamente por la falta de recursos materiales, no puede esperarse ciertamente, que los ciudadanos lleguen a conocer sus deberes i sus derechos para defenderlos i conservarlos incólumes. I sin esos elementos indispensables para la organización de la vida social y del gobierno civil no es posible, en mi concepto, el imperio de la lei i de las instituciones ni el respeto a la dignidad i a los derechos naturales." Avelino Aramayo, *Ferrocarriles En Bolivia* (Paris: Tipografía Augusto Marc, 1867), 3.
⁸³ Gootenberg, *Imagining Development*; Clark, *The Redemptive Work*; Larson, *Trials of Nation Making*; Hale, *The Transformation of Liberalism in Late Nineteenth-Century Mexico*.
⁸⁴ These concessions for railroad building also included rights or obligations to colonize the

involved increasing the mining and export of silver, copper, tin, and other industrial metals. Had the Bolivians won the War of the Pacific (1879-1883), nitrate would have been added to this list – it instead went to Chile.

Politicians and elites in other Andean nations expressed the hope that railroads would be agents for national integration while also sparking development. Paul Gootenberg shows how Peruvian leaders like Don Manuel Pardo argued that railways would "accelerate rural mobility, cultural contact, and thus enlightenment among peasants."⁸⁵ In Peru, it was hoped that railroads would bring Lima into greater communication with the nation's interior by providing the physical means for greater movement, access to resources, and unite the nation from within. Clark and Gootenberg each identify how political leaders and elites in Peru and Ecuador connected railroads with economic and political liberalism. Clark cites others in Ecuador who expressed the idea that railroads could almost magically transform human minds, as well as English proponents who thought the technology could diminish hatreds and promote "the triumph of mutual affection."⁸⁶ In Latin America as elsewhere, positivists, liberals, and modernizers saw railroads as more than simply an economic tool. Economic development, political transformations, and social changes that eliminated regionalisms in favor of universals of citizenship all marched together with the advance of new forms of transport.

territory, and in some cases, control ports. See examples: Ley 16 de octubre 1880, https://www.lexivox.org/norms/BO-L-18801016-2.xhtml, Ley 10 de diciembre de 1888, https://www.lexivox.org/norms/BO-L-18881210-2.xhtml, Ley 8 de noviembre de 1905, https://www.lexivox.org/norms/BO-L-19051108.xhtml.

⁸⁵ Gootenberg, *Imagining Development*, 87.

⁸⁶ Clark, The Redemptive Work, 45.

Aramayo's ideas about the potential for railroads sounded similar to those of Ecuadorian President Eloy Alfaro. In her study, Clark cites Alfaro:

Without a railway, so much individual strength, thirsty for productive occupation and finding it nowhere, is wasted.... Naturally the result could be none other, both in economic and political terms, than this chaos throughout our being since the dawn of our existence. Without a railway, without facility for life, without average well-being for ninety percent of our brothers, how can we speak of true liberty... and true dignity, without which the genuine Republic cannot cease to be a mere myth?⁸⁷

Railroads were literally a route to modernity and a turn away from a chaotic past. Writing in the late 1890s, an official with the Bolivian Ministry of Government pressed the importance of transport infrastructure development in similar terms: "It is not solely a commercial issue for Bolivia, the question of transit; it is one of patriotism. Ideas travel together along wide roads; Beasts fall down paths."⁸⁸ Liberalism would not only be "performed" through the modernization of infrastructure; trains, roads, and the like would organize the nation in all senses.⁸⁹

Though an outsider to Bolivian politics, in 1910 Bowman wrote about how trains might help resolve some of the tumultuous relations between political classes based in different regions of the country. He argued that the poor connections between cities and

⁸⁷ Ecuadorian President Eloy Alfaro cited in Clark, 41.

⁸⁸ Original quote: "No es solamente medio comercial, para Bolivia, el de las vías; es vínculo de patriotismo. Por los amplios caminos viajan en conjunto las ideas; por las sendas caen las bestias." Alcibiades Gúzman, in *Ministerio de Gobierno, Servicio de Caminos (Prestación Vial), Ley, Reglamento, Ley de modificaciones su reglamentación, obligación del censo* (Imprenta "El Comercio" La Paz, 1894) 4. Archivo Nacional y Biblioteca Nacional de Bolivia (ABNB), Colección Folletos, Reference no. Bc 1501; Bb962.

⁸⁹ The notion that infrastructures fomenting certain economic models, especially liberal and neoliberal ones, are intricately connected to a performance by the state aimed at re-creating its representation in daily life has been widely discussed by anthropologists examining the topic. See: Anand, Gupta, and Appel, *The Promise of Infrastructure*.

ports had led to the creation of four very distinct political groups, namely those found in the cities of La Paz, Cochabamba, Oruro, and Sucre. Without emphasizing the Federal War or the numerous coups throughout the nineteenth century, Bowman proposed that distance and disconnection had fomented the tensions that had led to conflict since Independence. Connecting them would, in his words, lead to a "greater acquaintances and greater friendliness than has heretofore been possible" and would help consolidate a national political class.⁹⁰ Just as Peruvian proponents of lines connecting the south of Peru and Arequipa to the rest of the nation and to international ports thought these would help pacify a region with a turbulent political history, Bowman, Aramayo, and others thought these new forms of transport might help eradicate the infighting among the dispersed political leaders in Bolivia – a key step toward the consolidation of the nation.⁹¹ Historian Herbert Klein argues that the network of railroads and infrastructure constructed in the early twentieth century did indeed help foment the development of a national political class.⁹² Interrupting geographies:

Nevertheless, the discourses surrounding railroads in nations like Peru and Ecuador differed in some ways from those used in Bolivia. While in Peru and in Ecuador, national elites openly expressed the desire to use railroads as a way of capturing, drawing in, and transforming the rural world, as well as the inhabitants of that world, this does not appear

⁹⁰ Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," 1910, 31.

⁹¹ Paul Gootenberg, *Imagining Development: Economic Ideas in Peru's "Fictitious Prosperity" of Guano, 1840-1880* (University of California Press, n.d.); Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," 1910; Aramayo, *Ferrocarriles En Bolivia*; Aramayo, *Proyecto de una nueva vía de comunicación entre Bolivia i el Océano Pacífico*; Cesáreo Aramayo Ávila, *Ferrocarriles bolivianos* (Impr. Nacional, 1959).

⁹² Herbert S. Klein, A Concise History of Bolivia (Cambridge University Press, 2003).

to have been the case in Bolivia.⁹³ The political leaders cited in Clark's study of Ecuadorian railroads specifically addressed the importance of the project for the majority of the nation that lacked dignity and well-being. The suggestion that railroads would transform the population in this way implied that the entire nation might hold a stake in seeing the completion of the project – though the terms of those transformations were indeed problematic for rural and indigenous populations as Clark makes clear.⁹⁴

Discussions of railroads in Bolivia did not place the countryside or the indigenous residents of the altiplano at the center of the debate, or even explicitly include them. In Bowman's description of four independent clusters of political actors resident in very different cities, the vast territories found between these small cities appear void of politics, lacking interested political leaders. Studies of the time period now prove this false and place rural populations and indigenous populations at the center of important national and international conflicts, through their participation with the army, their social movements, or through alliances developed with political parties.⁹⁵ Political rhetoric of the time cast the formation of national politics as an essentially urban rather a rural phenomenon.

⁹³ Unlike the cases addressed by Clark and Gootenberg, I have not yet found a project that explicitly expresses this link as one of the intended effects, and it certainly does not appear to have been a priority in Bolivia.

⁹⁴ Clark, *The Redemptive Work*, 45.

⁹⁵ While nearly exclusively denied suffrage, indigenous leaders played key roles in many of the political upheavals throughout the time period, including in militias during the overthrow of Melgarejo and the War of the Pacific, and through political alliances with Liberal Party leaders in the late 1800s. The historiography addressing this includes: Mendieta Parada, *Entre la alianza y la confrontación : Pablo Zárate Willka y la rebelión indígena de 1899 en Bolivia*; Forrest Hylton, "Reverberations of Insurgency: Indian Communities, the Federal War of 1899, and the Regeneration of Bolivia" (New York University, 2010); Larson, *Trials of Nation Making*; Roberto Choque Canqui and Xavier Albó, *Cinco siglos de historia* (CIPCA, 2003); Condarco Morales, *Zárate, el temible Willka*; Irurozqui Victoriano, "The Sound of the Pututos. Politicisation and Indigenous Rebellions in Bolivia, 1825-1921," 2000; Irurozqui Victoriano, "¿Ciudadanos Armados

However, the omission of indigenous persons from descriptions of a train's impact proved to be a slight of hand. Aramayo's discussion of how the 'backwards' forms of transport thwarted the realization of a liberal state and citizenry made no direct mention of the nation's indigenous majority or their communities in the altiplano – but it did implicate them. Those communities not only occupied nearly all of the spaces between the cities and mines (in 1900 the country was overwhelmingly rural), they also participated in the economies and geographies that railroad developers wished to transform or supplant.⁹⁶

Railroads were intended to do many things, but in Bolivia one of those was to break the corporate power of indigenous populations and their economic activities rather than improve them. Allusions to the decadence of the altiplano and 'backward' forms of transport and the simultaneous debates over land reforms made this plain: the liberals wanted to break the corporate life of ayllus and their economies. This economic life included forms of exchange among indigenous merchants, transporters, and commercial groups that had expanded during the 19th century.⁹⁷ The forms of transport that Aramayo and others characterized as insufficient to ensure the material resources needed for development in all its senses, were undeniably linked to indigenous communities through

⁹⁶ Gamarra, Censo General de La Población de La República de Bolivia Según El Empadronamiento de 10. de Septiembre de 1900., 1902; Olivia Harris et al., La participación indígena en los mercados surandinos: estrategias y reproducción social, siglos XVI a XX (La Paz: Centro de Estudios de la Realidad Económica y Social, 1987).

⁹⁷ Rivera Cusicanqui, "La Expansión Del Latifundio En El Altiplano Boliviano," 1978; Platt, Tristan, "Calendarios Tributarios e Intervención Mercantil"; Ramiro Molino Rivero, "La Tradicionalidad Como Medio de Articulación Al Mercado: Una Comunidad Pastoril En Oruro," in *La Participación Indigena En Los Mercados Surandinos: Estrategias y Reproducción Social, Siglos XVI a XX* (Ed. CERES, 1987); Langer and Conti, "Circuitos Comerciales Tradicionales y Cambio Económico En Los Andes Centromeridionales (1830-1930)."

o Traidores a La Patria? Participación Indígena En Las Revoluciones Bolivianas de 1870 y 1899.," 2006.

the llamas they raised, the pack animal trains they often supplied and guided, the landscape they knew, and the pre-existent social relations within those circuits. Even in those regions where a hacendado or a mining company controlled much of the transport, the routes invariably passed through indigenous communities that were involved in the network.⁹⁸

The retraction of the state following Independence and even the growth of mining activity in the altiplano during the mid to late-nineteenth century before the running of major railroads, had placed these older transport networks in a new position, perhaps an advantaged one. The combination of increased demand for mule and llama transport with a limited supply, led to very high prices for moving goods through the region. Once a new mine opened or increased production, the cost of moving anything, be it minerals or consumer goods, often doubled because of high levels of competition for a limited number of pack animals. Even when mining companies controlled their own herds and traffic, the growth in demand for other goods and from smaller enterprises meant that those transport networks beyond the control of major businessmen, earned more money from moving goods through the region. According to Bowman, the opening of the Caracoles mine in the Litoral prior to the War of the Pacific, raised mule rates from 8 dollars (in US dollars in 1910) for every 300 pound load to over 15.⁹⁹ Getting goods farther inland cost even more.

⁹⁸ Larger mining companies certainly operated their own herds as detailed by Klein (2003), but recent work by Hanne Cottyn's traces indigenous community caravans traffic into Arica through to the late 19th century. Hanne Cottyn, "Renegotiating Communal Autonomy: Communal Land Rights and Liberal Land Reform on the Bolivian Altiplano: Carangas, 1860-1930" (Ghent University. Faculty of Arts and Philosophy, 2014).

⁹⁹ The costs calculated by Bowman were measured in US dollars at the time of his publication in 1910. Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," 1910.

port of Cobija to Potosi cost between 330 to 380 dollars. By 1871, a period of increasing production in the mines of the altiplano, getting a single mule load of bottled beer from Tacna or Cobija to Potosi cost between 36 and 42 dollars in transport alone.¹⁰⁰ These increases benefited those persons involved in the commercial circuit connected to animal transport, including the owners and breeders of those animals, and their guides. They also benefitted local production of consumer goods in the altiplano.¹⁰¹ While these were not exclusively indigenous niches in the economy, they were ones in which indigenous populations played an important role. During the nineteenth century, indigenous community tribute contributed half of the national government's income, and indigenous traders and transporters also provided significant sums to local state treasuries from the taxes, licenses, and tolls they paid. These economic patterns created certain interests in maintaining the so-called 'backward' forms of transport and trade – interests held by indigenous traders and transporters as well as many other merchants and local state governments. These made the rural regions of the highlands a fragmented political terrain ripe for unrest.

The money to be made off transport to and from the Bolivian altiplano in the nineteenth century attracted interested parties from other areas. Peruvian businessmen sought to capture some of what they saw as a lucrative business, establishing their first attempts at steamship services on Lake Titicaca before 1850.¹⁰² Bowman relates that it was

¹⁰⁰ Bowman.

¹⁰¹ Langer and Conti, "Circuitos Comerciales Tradicionales y Cambio Económico En Los Andes Centromeridionales (1830-1930)"; Platt, Tristan, "Calendarios Tributarios e Intervención Mercantil."

¹⁰² Cesáreo Aramayo Ávila, *Ferrocarriles bolivianos* (Impr. Nacional, 1959); Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," 1910.

an "early aspiration of the best Peruvian statesmen to see all the wealth that was originally carried by llamas and donkeys to the coast from Bolivia borne across Lake Titicaca by steamers and across the cold Maritime Cordillera by [their] railroads."¹⁰³ Calling to mind scenes from the film Fitzcarraldo, this project, set in motion long before the completion of any railroads to the Lake on the Bolivian side, required the disassembly of steamships in the coastal lowlands, the transport of the pieces, as cited by other writers, "on the backs of Indians and beasts," and then their reassembly on the shores of Lake Titicaca.¹⁰⁴ It was an ambitious project driven by a desire to monopolize the steam transport on the lake. Interests like those involved in the steamship project wanted to tap into more than just mineral wealth; they wanted control over the transport of a wide variety of very valuable exports from the highlands and eastern slopes of La Paz, including cocoa, coca, wool, and rubber, and to control the movement of imports back to the same regions.¹⁰⁵

¹⁰³ Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," 1910, 27–28.

¹⁰⁴ Aramayo Ávila, *Ferrocarriles bolivianos*, 55.

¹⁰⁵ Bowman's highlights the potential for rubber, chocolate, quina, and wool exports, sectors not always discussed in the historiography alongside mining. While these produced significant income in La Paz Customs, they were not usually mentioned in the plans for railroads.

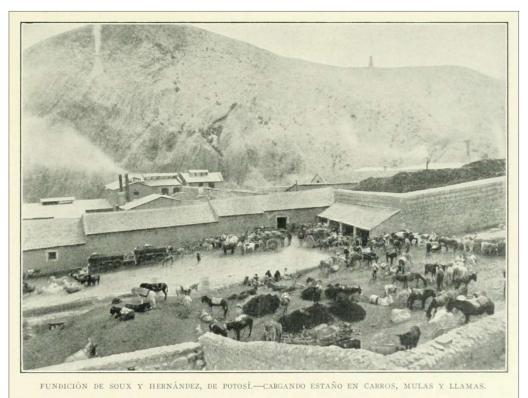


Figure 1.1: Photo of pack animals transporting mineral from Potosí at the start of the twentieth century. As seen in the photo for this postcard, this particular mining company organized its own animal transport of minerals to the nearby rail station in Uyuni prior to the completion of the railroad into Potosí. (Photo from turn-of-the-century postcard).

If railroads should be understood as technological interventions in an already existent landscapes, and framed by the structural contexts in which they are realized, Bowman's discussion of the cost of transporting minerals, consumer goods, and the money to be made from the activity, points towards a confluence of interests driving the development of rail lines in the region. Mining companies sought to dramatically reduce the cost of their operations, and lower the cost of industrial inputs.¹⁰⁶ Furthermore, they

¹⁰⁶ Erick Langer points to the difficulties faced by mine owners seeking to modernize their production chains. Erick D. Langer, "The Barriers to Proletarianization: Bolivian Mine Labour, 1826–1918," *International Review of Social History* 41, no. S4 (December 1, 1996): 27–51.

knew that lower costs of transport would enable them to export ores with a lower mineral content. Railroad companies and other interests in neighboring countries knew the potential revenues to be gained from investing in transport in this difficult terrain, especially if they could do it first and establish a near or total monopoly. Large-scale importers and merchants did not see transport as a small detail in their business, but rather a significant one that presented the opportunity to make a good deal of money or to continue to lose it. Bolivian politicians often formed part of one or all of these other groups. They were mine owners, merchants, and investors in many of these businesses. Not only did the push to develop railroads paint technology as profitable progress, it also would, in their minds, facilitate the expansion of their own oligarchic power. These projects meant pushing out the pre-existing commercial circuits and indigenous forms of transport that crisscrossed the region.

Seen through this lens, railroad projects can be understood as forming part of a larger project of modernization, including road reforms and the policy of replacing caravans with cart and carriage services. While the construction of roads for automobiles and trucks would occur very shortly after the inauguration of railroads, cart and carriage infrastructure and services complemented railroads in the late 19th century and the first decades of the twentieth.¹⁰⁷ They formed part of projects that involved building railroads, establishing new forms of over-land transport, creating new maps and geographical

¹⁰⁷ Some historians see cart and carriage as competition for railroads. I disagree on a particular aspect of this argument. Trains competed with caravans but not those cart and carriage services reliant on upgraded road networks and managed by official companies. This can been seen both in the inclusion of cart road construction in railroad concessions, the concessions of monopolies for those routes, and in particular, in the effect of carriage concessions on the non-official transport caravans. See: Gómez Zubieta, "Políticas de Transporte Ferroviario En Bolivia 1860-1940."

knowledge of the landscape, and centralizing control over who would operate transport services in the country. In other words, all of these projects represented a step towards making the transport sector and the landscape more legible to the state.¹⁰⁸ As the Bolivian Congress signed one railroad concessions and contract after another, they simultaneously required companies to build roads connecting to or running alongside the rail line, and contracted out carriage transport services between destinations to companies and businessmen, effectively establishing monopolies on those routes.¹⁰⁹

Researchers studying infrastructure and state formation point to the stakes the state held in this process. Concessions for companies to operate railroads and roads were handled through the national government and offered the possibility of consolidating 'who' ran transport, something seen as good, even if they resulted in monopolies on transport between certain destinations.¹¹⁰ All of these reforms were supposed to reduce costs by increasing the volume that could be moved with each load. Both cart and rail companies competed with the decentralized and 'disordered' (according to the state) patterns of caravan transport that had dominated much of the highlands for centuries.¹¹¹ Railroads and

¹⁰⁸ Scott, *Seeing Like a State*; Raymond B. Craib, *Cartographic Mexico: A History of State Fixations and Fugitive Landscapes* (Duke University Press, 2004).

¹⁰⁹ Many of the contracts for railroads in lowland regions of the country went further, requiring not only the construction of roads, but of the construction of other kinds of state infrastructure like post offices, government buildings, and schools. For some examples see: Ley de 16 de octubre de 1880; Ley de 10 diciembre de 1888; Ley de 27 octubre de 1890; Ley de 20 de noviembre de 1893; Ley de 20 de octubre de 1901; Ley de 8 de noviembre de 1905. (Gaceta de Gobierno de Bolivia).

¹¹⁰ Some good examples of these monopolies include: the contracts for carriages between Potosi and the Argentine border and the routes to and from some mining centers like Corocoro. Ley 2 de febrero de 1920; Ley de 14 de noviembre de 1906. (Gaceta de Gobierno)

¹¹¹ Cart and carriage transport required either building new roads or selectively reconditioning one in a region. They often required an engineer's survey prior to their operation and produced new scientific maps. Those maps however, often missed the numerous paths used by pack animals for both legal commerce and contraband. Though in some places animals and carriages followed the new routes cut by railroads for much of their trajectory, as was the case on Bolivia's southern

cart contracts for services 'ordered' and funneled traffic along pre-determined routes, established clear legal responsibility and entities, ensured that certain groups possessed the knowledge and materials necessary to maintain the new infrastructure, while they also changed power relations in the sector.¹¹²



Figure 1.2: Photo cart transport of minerals from Huanchaca. (Photo from turn-of-the-century postcard).

border with Argentina along the line from Villazón to Tupiza (personal communication: Viviana Conti).

¹¹² The know-how to maintain these new transport infrastructures may have been a particularly important question. Regardless of who owned or received the most profits from transport by pack animal, indigenous populations possessed knowledge of the most important part of the previous infrastructures of transport: the selective breeding and raising of the pack animals. For a discussion about the power relations involved in the maintenance of infrastructure, see: Anand, Gupta, and Appel, *The Promise of Infrastructure*.



Figure 1.3: Llama loaded with goods for transport. (Photo from turn-of-thecentury postcard).

Changes in transport throughout the region altered regional economies, especially indigenous ones. Many researchers have studied the preservation and even growth of highland economies during early to mid-nineteenth century from different lenses, including considerations of the impact of the "feeble peso," which guaranteed lower prices on regional goods.¹¹³ In Peru, researchers describe flourishing local trade in highland indigenous markets during the decades following independence.¹¹⁴ Indeed, the retraction of

¹¹³ Langer and Conti, "Circuitos Comerciales Tradicionales y Cambio Económico En Los Andes Centromeridionales (1830-1930)"; Rivera Cusicanqui, "La Expansión Del Latifundio En El Altiplano Boliviano," 1978; Harris et al., *La participación indígena en los mercados surandinos*.

¹¹⁴ Gootenberg, *Imagining Development*; Alberto Flores Galindo, Orlando Plaza J, and Teresa Oré, *Oligarquia y capital comercial en el sur peruano (1870-1930) ; Notas sobre oligarquia y capitalismo en Arequipa (1870-1940)* (Pontificia Universidad Catolica del Peru. Department de Ciencias Sociales, 1977); Heraclio Bonilla, "Islay y la economía del sur peruano en el siglo XIX," *Repositorio de la Universidad del Pacífico - UP*, January 1974, *Apuntes. Revista de ciencias sociales*, .2.83; Geoff Bertram, "Modernización y cambio en la industria lanera en el sur del Perú 1919-1930: un caso frustrado de desarrollo," *Apuntes. Revista de ciencias sociales*, February 26, 1977, 3–22.

the state in Bolivia following Independence permitted indigenous populations a degree of economic autonomy not present under the regulated colonial economic regimes.¹¹⁵ High costs of imports may supported indigenous markets for local goods, while also providing a way to earn money through the transport of high-value goods.¹¹⁶

Frustrated national plans and the barriers to 19th projects:

Many who studied or observed railroad construction in Bolivia note that it lagged behind other nations and generated intense conflict.¹¹⁷ The lag was not as great in comparison to other Latin American nations as it was to industrialized ones.¹¹⁸ Completion of all Bolivian railroads occurred decades after the start of congressional discussions about the routes and after the granting and rescission of multiple concessions and plans for the same route. Nineteenth century legislative records in Bolivia are littered with laws accepting proposals for, contracts for, and even authorizing payment for railroads that were never constructed. The history of these failures provided important lessons for the Liberal

¹¹⁵ Platt, Estado Boliviano y Ayllu Andino. Tierra y Tributo En El Norte de Potosi; Klein, A Concise History of Bolivia, 2003.

¹¹⁶ Bowman does describe how the arrival of railroads in general to the region impacted some markets and local production, specifically describing the impact of the extension of Argentine railways to the border with Bolivia and how it changed the textile markets in Huari, Oruro. Silvia Rivera also addresses how these processes displaced some local products. Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," 1910; Rivera Cusicanqui, "La Expansión Del Latifundio En El Altiplano Boliviano," 1978.

¹¹⁷ Klein, *A Concise History of Bolivia*, 2003; Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," 1910; Aramayo Ávila, *Ferrocarriles bolivianos*.

¹¹⁸ Aramayo Ávila, *Ferrocarriles bolivianos*; Luis Reynaldo Gómez Zubieta, "Políticas de Transporte Ferroviario En Bolivia 1860-1940," in *Visiones de Fin de Siglo : Bolivia y América Latina En El Siglo XX*, ed. Iris Villegas et al., Travaux de l'IFEA (Lima: Institut français d'études andines, 2016), 363–87, http://books.openedition.org/ifea/7273; Luis Reynaldo Gómez Zubieta, "Ferrocarriles Bolivia," accessed January 25, 2017, http://www.ferrocarrilesbolivia.com/home; Contreras, *Mineros and Campesinos En Los Andes. Mercado Laboral y Economia Campesina En La Sierra Central Siglo XIX.*, 1988; Contreras, "El Desarrollo Del Transporte En Bolivia, Una Aproximación Al Impacto Económico y Social de Los Ferrocarriles y Carreteras 1900-2015."

governments that came after, informing their priorities and directing their strategies to complete railroad projects.

Between 1860 and 1929 the Bolivian Congress addressed and passed a minimum of 170 pieces of legislation granting concessions, approving contracts, or arranging payments for railroad projects throughout the country.¹¹⁹ Of those 170 legislative actions, over 70 were contracts with companies for the construction of specific rail lines. However, these were not proposals for 70 different railroad lines; the Bolivian Congress approved contracts and concessions for the same lines again and again and again. The re-issuing of concessions and contracts for the same line created a legislative and legal mess, and despite congressional involvement and the proliferation of contracts, by 1929 Bolivia had only 8 major rail lines completed and functioning.¹²⁰ By the late 1950s that number would expand to 10.¹²¹ Private lines were entirely dependent on the state-backed lines that established connections to ports and major cities; they needed a larger national network to make sense.¹²²

¹¹⁹ Calculation from the collection of laws and decrees found in the Gaceta de Gobierno de Bolivia and the digital collection available from Lexivox.

¹²⁰ These were: Arica-La Paz, Antofagasta-Oruro, Oruro-La Paz, Guaqui-La Paz, Uyuni-Villazón, Rio Mulatos-Potosí, Oruro-Cochabamba, and Madeira-Mamoré (shut down in 1930). Others functioning by 1929 included branches to mining centers built by the mining companies in those centers. Machamarca-Uncia (Patiño) were very important. Luis Oporto, *Uncía y Llallagua: empresa minera capitalista y estrategias de apropiación real del espacio (1900-1935)* (La Paz, Bolivia: Plural editores, 2007).

¹²¹ The lines completed by the 1950s include: Potosí –Sucre, Yacuiba-Santa Cruz, and Santa Cruz to the shore of the Río Paraguay.Aramayo Ávila, *Ferrocarriles bolivianos*.

¹²² The most important private lines included those built by Simón Patiño to directly connect to his mines with railroads headed to coastal ports. These however, made no sense without the inter-city and international lines planned by the government.

Major Railroad Line	Year first discussed or approved in Legislature	Year inaugurated at final destination	Legislative approval of route and completion
Antofagasta – Oruro Line	1863	1891	28
Oruro – La Paz Line	1890	1917 (partially completed and functioning before)	27
La Paz – Guaqui Line	1881	1903	22
Arica – La Paz Line	1870	1913	43
Rio Mulatos – Potosí Line ¹²⁴	1890	1912	22
Potosí – Sucre Line	1890	1934	44
Uyuni – Atocha ¹²⁵ Villazón	1885	Atocha 1913 Villazón 1924	28 39
Oruro – Cochabamba Line	1890	1917	27
Madeira – Mamoré Line	1860	1912	52
Yacuiba – Santa Cruz Line	1874	1957	83
Santa Cruz – Río Paraguay	1874	1955	78

Table 1.1: Years to completion for major RR lines.¹²³

¹²³ These dates are drawn from laws passed by the Congress and from newspaper articles or ministry reports describing their inauguration and progress. Other lines were planned and partially constructed but never finished, like lines from La Paz into the Amazonian lowlands and the connection between Cochabamba and Santa Cruz on to the Río Paraguay. Some of these later saw the partial tracks pulled up once it became clear that the project would be permanently abandoned. Other projects changed their routes in significant ways that undermined their original purpose. ¹²⁴ This line was originally planned to depart from Oruro and enter Potosí directly, providing competition to the Antofagasta Railroad.

¹²⁵ This line was originally intended to depart from the border with Argentina and terminate in Potosí, without connecting to the Antofagasta line in Uyuni.

Every railroad that would be built during the 20th century had already been dreamed of, discussed on the floor of the Congress, and approved by the year 1890, with some having been approved in a slightly different configuration well beforehand. In all cases, the Bolivian legislature had attempted to get them built before the twentieth century. This was even the case for all of the lowland railroads finished in the 1950s.¹²⁶ By the time Bowman published his study in 1910, a decade after the Liberal Party came to power, only two international railroads were completely functioning: Guaqui – La Paz and Antofagasta – Oruro (with sections of Oruro – La Paz occasionally in service but under repair). However, by 1910, the Liberal Party was overseeing the construction of another five railroads. The Liberal Party leaders that pushed to build railroads did not envision the network they built; they mobilized or completed projects that had already been drawn up, approved by Congress, and stalled for decades.

At various points in the late 19th century and the start of the twentieth, different groups and politicians presented ambitious proposals for a national network of railroads and roads that would connect every major city and productive center of the country. Had these plans been built, Bolivia would have looked very different by the mid-20th century. The need for any railroad to become part of a larger network was evident, and often explicitly stated in contracts and concessions granted for internal routes. For example, a proposal and concession for a railroad linking Cochabamba to the Beni was granted with the condition that construction would begin within 12 months of the inauguration of the

¹²⁶ The maps of railroad plans resemble some of the later-twentieth century highway projects, indicating the persistence of desires to connect different geographical regions of the country and the perception of geographical barriers to unity and development.

Oruro – Cochabamba Line.¹²⁷ Concessions and contracts for lines between cities or mining centers included clauses laying out the timeline for construction in relation to the completion of an international line. However, before the completion of Arica – La Paz, Guaqui – La Paz, and Oruro – La Paz, all of those smaller lines ran to Antofagasta, and reinforced the monopoly of The Antofagasta (Chili) and Bolivia Railway.

Some of the proposals advanced through Congress by politicians and businessmen at the end of the nineteenth century appear to make no sense in relation to today's geography. From the 1860s onwards, many businessman and politicians appeared very interested in constructing a rail line from Lake Poopo, to Oruro, up the Desaguadero with a stop in Ulloma, crossing the Mauri River at Calacoto, and continuing through Pacajes on to the Peruvian border.¹²⁸ In other words, the line would have run west through sparsely populated areas of Carangas, and then up through another (very rural) region of Pacajes. However, the disconnectedness of places like Corque or Ulloma, and the relevance of say, Patacamaya, are products of the decisions made during this time period.¹²⁹ As I will explore in later chapters, the commercial networks existing prior to the construction of railroads appeared more like webs than lines, stretching across the altiplano to include many towns and areas that seem economically and demographically irrelevant now.

¹²⁷ Ley de 13 de octubre de 1891 (Gaceta de Gobierno de Bolivia).

¹²⁸ The last railroad concession granted for this route was approved by the Congress on the 27th of December, 1905. However, several previous contracts and concessions had been granted for this route covering everything from possible railroads, cart roads and services, and even steamship transport. See: Ley de 22 de noviembre de 1887, Ley de 16 de noviembre de 1889, Ley de 2 de diciembre de 1891. (Gaceta de Gobierno de Bolivia).

¹²⁹ Both Ulloma and Calacoto are towns located in the western section of Pacajes, Both towns appear to be today towns with few inhabitants. However, at the end of the nineteenth century, both towns were centers of commerce for the communities and mines then active around them.

Financing constituted one of the big barriers to getting many of these proposals built, and was one of the factors contributing to delays. Reynaldo Gómez Zubieta argues that throughout Bolivia's liberal period and its immersion in the export boom, politicians sought to finance their railroad dreams by mortgaging their export industries and state income.¹³⁰ And indeed that was what they did, at least on paper. In the 1860s, Avelino Aramayo offered guarantees on debt contracted by the state to potential builders that consisted of handing over significant proportions of state income from particular activities.¹³¹ He offered the income from Bolivian customs houses in Cobija, Oruro, and La Paz. Should either of those fail, the law passed by Congress allowed for using income generated by the Casa de la Moneda in Potosí to finance the project, and required the government to set aside a fund that included 8% of the total value of the bonds to be issued in London to finance construction. Aramayo, like many other Bolivian lawmakers after him, sought to apply income generated by specific economic activities and taxes directly to the repayment of railroad debt.

Bolivian mining was a potentially very profitable activity at the end of the nineteenth century. However, Aramayo's attempts to fund his dream of a national network in the 1860s highlighted some of the specific challenges Bolivia faced. Sent as an emissary to London to negotiate a bond issue needed for the railroad project, Aramayo encountered a problem. While he and others in Bolivia thought that the nation's relatively debt-free position might make financiers more likely to fund them, he found the opposite: "– On the contrary, to extend credit to a nation it is perhaps necessary that it already owe, because

¹³⁰ Zubieta, "Ferrocarriles Bolivia."

¹³¹ Aramayo, Proyecto de una nueva vía de comunicación entre Bolivia i el Océano Pacífico.

this is the way they know that a nation will fulfill its commitments and that they have the resources to do it."¹³²

Despite Bolivia's position as a mineral producing nation with little external debt in the 1860s, banks and lenders in London were skeptical precisely because they had never issued any bonds for the country. Aramayo related that one bank didn't see the guarantees of nitrate or mineral production as sufficient because they were unfamiliar with the state of Bolivian exports and mineral reserves.¹³³ When a bank did agree to issue bonds as the London and County Bank did for 1,500,000 pounds sterling with high interest rates, buyers bought up no more than 300,000 pounds worth of bonds.¹³⁴ The bank returned the money to investors and closed the negotiations with Bolivia.

Aramayo lowered his expectations after watching other Latin American countries seek out funds for similar projects. He saw countries like Mexico and Venezuela accepting offers for bonds at 60% and with interest rates of 6%. He then negotiated a deal with the London based firm Merton and Company for a loan of 70% liquid, 8% interest and 2% amortization. The Bolivian government rejected the agreement. Conflict with Chile (already heated by 1867) and internal political instability made all parties wary of any deal.¹³⁵ Aramayo was angered, arguing that the nation had passed up a project of great

¹³² Quote in original Spanish: "- Al contrario, para acreditar a una nación es necesario tal vez que deba, porque este es un medio por el que se da a conocer que sabe llenar sus compromisos con fidelidad i que no le faltan recursos para ello."Aramayo, *Ferrocarriles En Bolivia*, 10.
¹³³ The bank did however send a survey team back to South America with Aramayo. Their principal activity appears to have been traveling the mining regions of the Bolivian altiplano and Litoral to assess the value of minerals being produced. Aramayo, *Ferrocarriles En Bolivia*.
¹³⁴ These bonds were issued at 7% interest, emitted at 88% of value with a 2% amortization. Aramayo.

¹³⁵ Aramayo.

national importance, especially because it would establish a stronger Bolivian presence in the Litoral. Aramayo left London with no financing for his railroad plans.

Deals were eventually made for other railroads, but they too went sour.¹³⁶ By the end of the 1870s, Bolivia was no longer an unknown country with very little debt, but one with a history of bad debt and ongoing conflicts with both bondholders over the debacle that ensued after contracting for the construction of the Madeira – Mamoré Railroad, while it had also become a country at war with its neighbor over its coastline and mineral-rich territory. Both factors would further delay other projects. The consequences of the Church agreement for the Madeira – Mamoré Railroad and the lessons of Aramayo's attempts to secure financing, would influence decisions made in later decades and especially during the Liberal Party governments. Deals offered by foreign banks for large infrastructure projects were often detrimental to South American nations.¹³⁷ For a short time, the solution sought in Bolivia to get railroads built included seeking out train companies willing to put down the money and build it themselves.

The first international line, The Antofagasta (Chili) and Bolivia Railway, was constructed after the War of the Pacific and the Chilean occupation of the Litoral, along a path very similar to the one proposed by Aramayo. It was finished a couple of decades after Aramayo set out to London in search of funding for his network. The project was not financed by the state, but by private interests with heavy investments in Pulacayo,

¹³⁶ See: Bolivia Oficina Nacional de Inmigración Geográfica Estadística y Propaganda, *La empresa Church y el empréstito boliviano de 1872: sentencias judiciales: extinción de la deuda* (Impr. del Estado, 1902); Aramayo Ávila, *Ferrocarriles bolivianos*.

¹³⁷ Kenneth Duane Lehman, *Bolivia and the United States: A Limited Partnership* (University of Georgia Press, 1999); Fredrick B. Pike, *The United States and the Andean Republics: Peru, Bolivia, and Ecuador* (Harvard University Press, 1977).

Huanchaca, and other mines along the railroad route. Mining companies operating in Chilean occupied territory at the time, took the railroad to mines near the border and then later expanded into Bolivian territory.¹³⁸ The companies received payments from the Bolivian government equivalent to 6% of all the capital they invested in the project on the Bolivian side, and had guaranteed company control over the line.¹³⁹ This line became Bolivia's only functioning railroad during the nineteenth century and held an effective monopoly on rail transport to an international port for decades.

National sovereignty and borders:

Aramayo's proposal and the debates over the extension of the Antofagasta Railway into the altiplano shed light on what became one of the most important barriers to the development of railroads: national borders. Proposals prior to the War of the Pacific mostly sought to build lines to Cobija, with the exception of those proposed by foreign merchants in ports like Tacna. This was not because Cobija was the most convenient port geographically, nor because it was the most important – Arica was throughout much of the nineteenth century – but because these proposals ran entirely through national territory at the time they were proposed.¹⁴⁰

¹³⁸ Historian Gomez Zubieta suggests that the Antofagasta company may have moved forwards with construction before the official approval was passed. Zubieta, "Ferrocarriles Bolivia."
¹³⁹ Ley de 29 de noviembre de 1888 and Ley de 31 de octubre de 1889 (Gaceta de Gobierno de Bolivia). The model of paying 6% on capital investment became a standard feature of railroad contracts under Conservative Party governments. It was incorporated into the first General Law for railroads: Ley de 18 de noviembre de 1893 (Gaceta de Gobierno de Bolivia)
¹⁴⁰ For much of the altiplano, Arica and Iquique were much closer. The only exceptions were those mining centers located in the southwestern altiplano. Aramayo, *Proyecto de una nueva vía de comunicación entre Bolivia i el Océano Pacífico*. For a discussion of Arica's importance for commerce, see: Fernando Cajías, "El Norte y El Sur de Bolivia En Los Primeros Años Republicanos," in *El Siglo XIX: Bolivia y América Latina*, ed. Rossana Barragán and Seemin Qayum (Lima: Institut français d'études andines, 1997).

After the War of the Pacific, Bolivia was left with no sovereign Pacific port during the height of the export boom in Latin America. After the loss of the Litoral, all Bolivian infrastructure projects that aimed to reach Europe and the United States had to pass through a third party to reach any destination. The third parties – Argentina, Chile, Peru, Paraguay, and Brazil—were at times hostile to Bolivian interests.¹⁴¹ This was true in the Amazon on the Mamoré River, the waterways leading to the Rio de La Plata, and all routes leading from the highlands to the Pacific coast.

The origins and outcome of the War of the Pacific – the defeat of Peru and Bolivia by Chile – reverberated in political debates about international railroad projects. Plans in the 1880s to extend the Antofagasta Railroad from Chilean occupied coastal regions into the heart of the altiplano met with an important degree of opposition and became the topic of discussions, even among politicians in Chile.¹⁴² In a pamphlet published in 1885, Rodolfo Soria Galvarro responded to a Chilean politician who argued that Bolivia had no reason to fear the construction of this railroad.¹⁴³ Soria countered that every pass of the Chilean Railroad into Bolivian territory represented a threat to national sovereignty, just as the establishment of Chilean nitrate miners in the Litoral had for the Bolivian coast.¹⁴⁴ He argued that the wealth of production would be handed over to Chilean interests and moved through the hands of Chilean businessmen, meaning Bolivia's riches would benefit only

¹⁴¹ Travel through Argentina, Paraguay, Uruguay, and Brazil required diplomatic commercial agreements for passage on river ways. These agreements depended as much on the internal political changes of other countries as the willingness of Bolivian politicians to negotiate them.
 ¹⁴² Some aspects of the political controversy surrounding these questions can be found in the pamphlet: Rodolfo Soria Galvarro, *Tinaja o Nacion* (Cochabamba: Imprenta Arrazola, 1885).
 ¹⁴³ Soria Galvarro.

¹⁴⁴ Soria Galvarro; Klein, A Concise History of Bolivia, 2003.

foreigners. The freshness of the War of the Pacific and the fact that most of the questions and problems it had created remained unresolved made discussions of railroad transport de facto exchanges about sovereignty, state interests, and the intersections of national and foreign policy for Bolivia. Proponents of the railroad on the Bolivian side could be found in abundance, and many tried to position themselves as nationalists by arguing that the extension of the Antofagasta line was a patriotic duty that would strengthen Bolivia.

Much like Aramayo before him, Aniceto Arce (and other politicians who supported the extension of the Antofagasta railroad into Uyuni and Oruro) saw these railroads as necessary elements for bringing Bolivia into the modern age. Soria Galvarro and others who opposed this particular extension, also expressed consensus on this. Soria argued:

We believe the word 'railroad' to be synonymous with civilization, progress, fraternity; But, as we raise enthusiastic hymns and brilliant speeches to these magnificent means of communications, and to the workers of human perfection that make it of service to both the most powerful and to the indigent, we should also concern ourselves so that the elements of the progress of science are put to our service, and not twisted into an arm of expropriation and into a means of easy conquest.¹⁴⁵

Opposition to this proposal was not opposition to railroads. Though they cited some resistance to the technology in certain towns, politicians across the board accepted that trains were tools for 'progress.' The debate became one about sovereignty, nationalism, borders, and more. Soria Galvarro argued that if the railroad only reached Huanchaca, it would leave La Paz incapable of responding to a Chilean military invasion of the south. He

¹⁴⁵ Original quote in Spanish: "Creemos la palabra ferrocarril sinónima de civilización, de progreso, de fraternidad; pero así como tributamos entusiastas himnos, discursos brillantes a estas magnificas vías de comunicación y a los obreros de la perfección humana que los ponen al servicio tanto del más poderoso como el indigente, así también nos preocupamos de que los elementos de progreso de la ciencia pone al servicio nuestro, no los torne la codicia en arma de expropiación y en medio de fácil conquista." Soria Galvarro, *Tinaja o Nacion*, 2.

argued that only connecting the whole nation via rails would give the nation the economic advantage it needed while also allowing it to move troops quickly to the borders.¹⁴⁶ In these debates, moving exports through Peru meant collaborating with a nation that Soria then saw as an ally. Though Soria Galvarro lost this debate to Arce, a president with direct investment in the Antofagasta Railroad and mines in the southern altiplano, the fevered exchanges reveal the stakes and risks for Bolivia in its quest for railroads.

The War of the Pacific multiplied the challenges of railroad building and planning in ways that made Bolivia reliant on neighbors. Following the war, every major project ultimately involved the political conflicts not only in Bolivia, but in any neighboring nation as well. Supposedly simple questions of logistics, like getting the railroad ties needed for construction, required importing them through a foreign port and shipping them across the border and, therefore, diplomatic negotiations over how to do this without paying exorbitant taxes.¹⁴⁷ Bolivian officials in 1880 faced higher costs and dealt with more complications in acquiring and moving the raw materials needed for important infrastructure projects than their neighbors did – just as they do today. Such complications scared away foreign investments.

Despite the political embrace of railroads and infrastructure modernization by politicians on all sides during the nineteenth century, only one project was finished. By the start of Liberal Party governments in 1899, Antofagasta operated a monopoly that ran traffic right through the contested coastline occupied by Chile, what was once the Bolivian

¹⁴⁶ Soria Galvarro, *Tinaja o Nacion*.

¹⁴⁷ This was the reason many materials for the construction of railroads during the period of Liberal Party governments moved through Mollendo and not Antofagasta, despite that route requiring transfers onto ships, other railroads, and overland transport at different points.

Litoral, and over which real agreement had not been reached. Bolivia was still dealing with the fallout of the failed attempts to build the Madeira – Mamoré Railroad, and numerous other projects were held up by financial and diplomatic disputes. Forty years of discussions had gotten little built.

Part Two: New Liberals strategies for old plans.

The Liberal Party may have quickly abandoned certain things after winning the Federal War – federalism and their Aymara allies, for example – but they did not back away from the development of railroads. José Manuel Pando (1899-1904), Eliodoro Villazón (1909-1913), and Ismael Montes (1904 -1909 and 1913-1917) in particular, the first three Liberal Party presidents, became among the most aggressive proponents of railroads in Bolivia's history and used their knowledge of the previous failures in the efforts to get railroads built. Their attempts worked but at a very high price. Projects debated since the 1870s and 1880s began construction. The methods they used to do that created problems that remain today.

Early in the government of José Manuel Pando, a serious conflict flared in the lowland region of the Acre.¹⁴⁸ A rubber-rich area with very little state presence, the conflict centered on attempts by the Bolivian Congress to impose taxes on rubber exports from the region. Armed insurrection ensued, agitated by private interests. The government responded by negotiating an agreement with a foreign company that looked very much like the colonization schemes it had signed in the previous decades.¹⁴⁹ The agreement handed

¹⁴⁸ Klein, A Concise History of Bolivia, 2003.

¹⁴⁹ Ley 21 de diciembre de 1901, https://www.lexivox.org/norms/BO-L-19011221.xhtml. The agreement signed with the Bolivian Syndicate looked very much like those that had been signed

over rights to exploit rubber and other resources in exchange for cash and commitments to develop the region, pay taxes, and facilitate the expansion of state presence in the area. The deal was signed with the New York based "Bolivian Syndicate." However, this agreement quickly turned south and Bolivia lost control of the region in a short, violent battle that ended with Brazil annexing the region.

Bolivia began negotiations with Brazil to settle the conflict over the Acre. The Treaty of Petropolis, signed in 1903 and passed into law by the Bolivian Congress on January 6, 1904, ceded Bolivian claims to the Acre in exchange for several things.¹⁵⁰ First, the Liberal Party government accepted a payment of two million pounds sterling that, as laid out in the treaty, would be directed to the construction of railroads. Second, the agreement stipulated that Brazil would finance the completion of the Madeira-Mamore Railroad up to the border and the town of Guayaramerín. This move ensured the completion of the railroad that had begun with the disastrous Church affair. They also established that the terms of commercial agreements guaranteeing Bolivian commerce through Brazilian waterways would be negotiated between the two nations, and laid out the processes for conflict resolution.

At the same time that the Liberal government was negotiating the treaty with Brazil, they also began negotiations with Chile over the loss of the Bolivian Litoral. The Treaty of 1904, the "Tratado de Paz y Amistad" ("Treaty of Peace and Friendship") realigned national borders and laid out the terms under which Bolivia and Chile would

with the companies L'Africaine, Brabo, Suarez Arana, and others for the development of lowland regions.

¹⁵⁰ Ley de 6 de enero de 1904. "Tratado de Petropolis". (Gaceta de Gobierno de Bolivia) and Klein, *A Concise History of Bolivia*, 2003.

establish and resolve questions about the limits of their respective states' territorial control and commercial flows through the area. It ceded to Chile the Litoral that had stretched from mountains of the southern region of Lípez to the coast of Antofagasta (and included the mines of Caracoles and Chuquicamata, and the nitrate fields across the region).¹⁵¹ As part of the treaty, the Bolivian Liberals negotiated that Chile would construct the Arica – La Paz Railroad, pay guarantees on Bolivian obligations for the construction of certain other railroads, and agree to turn over the Arica – La Paz railroad (the Bolivian section) to the government 15 years after its inauguration. Chile agreed to allow Bolivia free commerce through the port of Arica and in fact, all of its Pacific ports (in very clear terms that the Bolivian government argues have been violated in recent decades) and to allow Bolivia complete sovereignty on customs through all Chile's Pacific ports (another part of the Treaty in question today).¹⁵² The treaty resulted in Chile paying very little in exchange for some of the most mineral-rich lands in the region.

In just a few years, the Bolivian Liberal Party governments signed treaties dealing with two important national territories in exchange for trade agreements, railroads, cash, and some underwriting on future railroad projects. The similarities of the terms of the agreements, and their timing, make clear that Bolivian Liberals wanted to fix their borders

¹⁵¹ The Treaty of Peace and Friendship, or the Treaty of 1904 as it is often called, was signed in 1904 by the parties and passed into law by the Congress in early 1905 via the Ley 4 de febrero de 1905, (Gaceta de Gobierno de Bolivia). The complete text of the treaty was approved by the congress on 10 of March, 1905.

¹⁵² Free transit of Bolivian commerce through Chilean ports and the right to establish sovereign customs houses within them was guaranteed by the treaty, and many allege that the privatization of ports (and ensuing fees for use), violate the Treaty. Furthermore, the Bolivian position today argues that this treaty and subsequent negotiations in later decades indicate that none had rejected the possibility of further negotiations for a sovereign path the coast.

with aggressive neighbors and wanted to build railroads to break through their landlocked situation.¹⁵³

The terms of the "Tratado de Paz y Amistad" with Chile are worth examining more closely because they indicate some of the intentions behind the Liberal Party's negotiations.¹⁵⁴ In the treaty, Chile agreed to back Bolivian obligations, up to 1,700,000 pounds sterling, on railroad projects begun in the 30 years following the signing of the treaty. In other words, Chile agreed to pay the interest Bolivia would owe from the issuance of bonds used to construct the railroads named in the treaty, up to the sum of 1,700,000 pounds, and not more than 100,000 pounds a year. They did not agree to pay for construction of that network, but rather to pay the guarantees on debt the Bolivian government would issue. Chile agreed to pay in cash a sum of 300,000 pounds, build the Arica – La Paz Railroad, and eventually turn it over to Bolivian control. The treaty also named the following lines as forming part of the project for a rail network that the Chilean guarantee would be applied to: Uyuni – Potosi, (what would become the Rio Mulatos Branch of the Antofagasta Railroad); Oruro – La Paz; Oruro – Cochabamba – Santa Cruz; La Paz – Beni; and Potosi – Sucre – Lagunillas – Santa Cruz. All of these lines had been debated extensively, approved by the Bolivian Congress prior to 1890 in some similar form, and had failed in part because of the outstanding questions regarding the border and the financial instability it brought.

¹⁵³ Francoise Martínez and Pablo Quisbert. "Resignación y ambición: La Política Exterior Liberal", *Historias bajo la lupa. La Guerra Federal* (La Paz: 1999); Loreto Correa Vera, "Del Poder a Los Tratados: Desarrollo y Ferrocarriles En Bolivia, 1870-1904," *Historia (Santiago)* 46, no. 2 (2013): 315–41.

¹⁵⁴ The terms of the treaty can be seen in the complete text approved by the Congress. Ley de 10 de marzo de 1905 (Gaceta de Gobierno de Bolivia).

Liberal Party leaders argued the agreements would provide the stability that would attract investors who had previously been wary because of the international conflicts.¹⁵⁵ Many, including some at the time of the signing, argued that the Liberal Party struck a poor bargain, one that traded the nation's long-term interests in favor of trains that benefitted only a powerful minority. The Liberal Party's bet on railroads risked national sovereignty right alongside the nation's treasury.

Serious offers to build railways did appear. Cesareo Aramayo Ávila cites Claudio Pinilla, the Foreign Minister at the time, and his declarations about the effects of the treaties: "For the first time, we have awakened the interest of the men of business, and capitalists are interested in our country."¹⁵⁶ The most important of those offers was the "Speyer Contract," which the Bolivian Congress approved in 1906.¹⁵⁷ Talks over this deal had been ongoing in New York at the same time that the treaty with Chile was being negotiated.¹⁵⁸ The Speyer contract outlined an ambitious plan to connect nearly all of the principal cities of the highlands and valleys to one another, with ports in the Amazon, on the border with Brazil, the Chilean coast, and the southern border with Argentina. The

¹⁵⁵ Aramayo Ávila, Ferrocarriles bolivianos; Claudio Pinilla, Contrato Ferrocarrilero. Discusión Del Contrato Speyer En El H. Senado Nacional. Discurso Pronunciado Por El Ministro de Relaciones Exteriores, Dr. Claudio Pinilla. (La Paz, Bolivia: Imprenta y Litografia Boliviana, 1906).

¹⁵⁶ Aramayo Ávila, *Ferrocarriles bolivianos*, 65; Pinilla, *Contrato Ferrocarrilero. Discusión Del* Contrato Speyer En El H. Senado Nacional. Discurso Pronunciado Por El Ministro de Relaciones Exteriores, Dr. Claudio Pinilla.

¹⁵⁷ Ley de 27 de noviembre de 1906. (Gaceta de Gobierno de Bolivia).

¹⁵⁸ Aramayo Ávila, Ferrocarriles bolivianos; Pinilla, Contrato Ferrocarrilero. Discusión Del Contrato Speyer En El H. Senado Nacional. Discurso Pronunciado Por El Ministro de Relaciones Exteriores, Dr. Claudio Pinilla.; Bolivia, Documentos Relacionados Con El Contrato Ferroviario de 1906 y Sus Emergencias. Publicación Reservada. (La Paz, Bolivia: Talleres La Republica, 1927).

lines that were to be constructed under the Speyer contract included: a line from Oruro to Viacha, including a link to the Arica – La Paz Railroad; the connection of both to the city of La Paz; a line from Oruro to Cochabamba; one from Oruro to Potosi; from Potosi to Tupiza via Cotagaita; a line from Uyuni to Potosi; and one from the city of La Paz to Puerto Pando in the Amazonian lowlands.¹⁵⁹ The contract required that all railroads constructed under the contract be physically compatible with one another using the same one meter gauge system, in order to create an interchangeable national system – with the exception of the line running from La Paz to Puerto Pando in the lowlands.¹⁶⁰ The contract stipulated the completion of all of these projects within 10 years. It was a very ambitious plan that would create a frenzy of construction and problems during the Liberal administrations.

The Speyer Contract:

The contract with the Speyer Company and National City bank opened a path towards financing railroads that had been closed to Bolivia by the end of the nineteenth century: building a national rail network through the issuance of bonds. The agreement entailed the emission of bonds for the construction of railroads, up to the sum of 5,500,000 pounds sterling, a figure that was also stipulated to be the cost of constructing all lines outlined in the agreement.¹⁶¹ The bond emission was to occur in two stages, with the principal buyers being the Speyer Company and the Bolivian government. The first

¹⁵⁹ Tupiza to the Border was to be built by the argentine government who would operate it until the costs were covered and then turn it over to Bolivia. .Zubieta, "Políticas de Transporte Ferroviario En Bolivia 1860-1940"; Zubieta, "Ferrocarriles Bolivia."

¹⁶⁰ The railroad to Puerto Pando also received special attention in the contract, which allocated a set figure of 1,200, 000 pounds sterling, specifically dedicated to its construction.

¹⁶¹ Ley de 27 de noviembre de 1906. (Gaceta de Gobierno de Bolivia).

emission, for a sum of 3,750,000 pounds of first mortgage bonds (referred to as the "primera hipoteca" on the lines to be built), would be issued at 5% interest for a period of twenty years from 1907. This first emission of bonds could either be bought and held by the National City Bank and the Speyer Company, or resold at a profit with the Bolivian government guaranteeing the interest for a period of twenty years. Speyer would have to pay out 3,000,000 pounds for the first emission. The second emission of bonds was for income bonds, for a sum of 2,500,000 pounds, also at 5% interest but for a period of 25 years. These were to remain secondary to the first, in order of payment, and were to be paid with the income generated from the operation of lines. The money generated from the lines, once running, would first be put towards the payment of the interests on these bonds, and the remainder would go to the concession operating the lines (be it Speyer or another company as they retained the right to lease operations). The company was also authorized to emit another 2,000,000 pounds in bonds should the original estimates prove to be insufficient for the completion of the lines, though the government would not, in theory, guarantee those.

All of these financial transactions were to be carried out through National City Bank, making the bank part owner of the debt, direct investor in the project, the company that was authorized to build and operate the lines (or lease out this activity), and the financial entity that managed all the government's money and financial responsibilities in the process.¹⁶² The government made a deposit of 2,400,000 pounds to National City Bank in 1906 to cover the guarantee on the bonds of the first mortgage, ensuring the full amount

¹⁶² This was specified in the contract. Ley de 27 de noviembre de 1906. (Gaceta de Gobierno de Bolivia).

for the repayment of the bonds two decades down the line, should anything go wrong. On top of that, the government also made monthly deposits to the bank. To cover these costs the government included in the contract a legal reform that moved the income generated from taxes on coca and alcohol in the Department of La Paz to a dedicated fund for payment of interests on bonds. They directly mention the Treaty with Chile, and state that the Chilean government would make further deposits to cover interests on certain future dates. According to Kenneth Lehman, Bolivia's annual obligation on these loans was over 180,000 pounds, of which 60,000 were to come from coca and alcohol income, and the rest either from the indemnity fund (Chile's commitments in the 1904 Treaty) or the nation's general funds.¹⁶³

Later criticism of this arrangement was resounding. Of the over 1000 miles of track outlined in the agreement, less than half was constructed as originally planned and along the routes that had been detailed in the contract.¹⁶⁴ These changes, which advantaged the Antofagasta Railroad, altered the impact of the plan in a profound manner. Frederick Pike states: "The Speyer Contract was a transaction which cost the National City Bank and Speyer and Company practically nothing, netted them several million dollars on the sale of their shares in the Bolivian Railway Company's stock, and won for [...] a British company the key to control of Bolivia's entire railway system."¹⁶⁵ Opposition to the contract arose in the Congress at the time, though it proved insufficient to stop its adoption and approval.

¹⁶³ Lehman, Bolivia and the United States.

¹⁶⁴ The construction went over budget and timelines, and this resulted in serious modifications to the plans. Though more than half the kilometers of lines were built, they did not follow the plan that had aimed to create competition with the Antofagasta Railroad. Pike, *The United States and the Andean Republics*.

¹⁶⁵ Pike, 164.

These discussions would continue for years after construction of all these projects had begun.¹⁶⁶ Some of the debates at the time of the passage of the contract referenced those that had appeared around the extension of the Antofagasta line to Oruro. In fact, Claudio Pinilla, the Minister of Foreign Affairs for Montes' government, invoked the arguments that had been used earlier by the Chilean politician Benjamin Vicuña Mackenna in his publication about another railroad (the Antofagasta Line). Pinilla took up the Chilean politician's argument and asserted that rejecting the contract would amount to the nation turning its back on the future. Pinilla thought this agreement was an opportunity to seize the future and liberate the country from the effects of the War of the Pacific that had strangled growth. He argued that Bolivia had lost more than the Litoral in the War, it had lost its momentum and its ambition. For Pinilla, only a complete rail transport network could erase that past and bring them forward.¹⁶⁷ Furthermore, he argued that no railroad network in Latin America had been made possible without the direct intervention of the government.¹⁶⁸

This last point had been one of the most controversial. Opponents like Daniel Salamanca from Cochabamba, then a Liberal Party member but also one of the future founders of the Republican Party, argued that it made no sense whatsoever for the government to basically pay for the construction of a railroad and then turn over the benefits of running it to a private company for decades afterwards, leaving the government

¹⁶⁶ El Comercio, 5 de enero, 1912, ""Misterios"

¹⁶⁷ Aramayo Ávila, *Ferrocarriles bolivianos*, 102.

¹⁶⁸ Aramayo Ávila, *Ferrocarriles bolivianos*.

with a large share of the costs and virtually no benefits.¹⁶⁹ Opponents questioned the wisdom in placing so much faith in one bank, which would be both the financial agent working for the state, the recipient of state payments, and its creditor for the entire project. They argued that cost estimates looked incorrect. Claudio Pinilla, the Foreign Minister, outlined the estimated costs of the lines at 5,584,000 pounds sterling and attempted to assure Congress that this would be the true cost for the network. He was wrong.

The Bolivian Congress passed the contract and the National City Bank and Speyer and Company quickly established a new company, The Bolivian Railway Company, which would take charge of the contract. This separate company would be responsible for ensuring the construction of the railroads and for operating those lines once inaugurated.¹⁷⁰ However, the Speyer Contract allowed all parties in the contract to transfer responsibilities to others. So, Speyer and National City Bank turned their rights over to the Bolivian Railway Company, a separate corporate entity that they were the sole owners of, and the Bolivian Railway Company then turned around and contracted construction to another company, the South American Construction Company. They also moved quickly to establish an arrangement for financial services and payments in South America through the

¹⁷⁰ The terms of the contract allowed Speyer and the bank to transfer the agreement to a third party. According to various historians looking at the agreement, the movement of the contract to the Bolivian Railway Company was little more than paperwork move, the two original signatories to the contract remained the overwhelming owners of shares in the new company. See: Lehman, *Bolivia and the United States*. Modifications of the contract were discussed and debated in Bolivian newspapers. See: *El Diario*, 17 de noviembre, 1908, "Problema Parlimentaria" *El Diario*, 30 de octubre, 1908, "Modificaciones del Contrato Speyer," *El Diario*, 27 de noviembre, 1908, "Modificaciones del Contrato Speyer."

¹⁶⁹ The Republican Party (many of whom were also dissident Liberals like Salamanca), would lead the coup that ousted the Liberals from power. Aramayo Ávila; Klein, *A Concise History of Bolivia*, 2003.

W. R. Grace Company, a prominent Peruvian company owned by the famous Grace family.¹⁷¹ The subcontracting and passing off of parts of the contract should have been the first warning sign that something might go wrong. These arrangements distanced the original signers and the holders of the bonds for the railroads from the actual construction of the railroad and therefore responsibility, while also keeping them in a position to benefit from the deal by collecting payments on the bonds. Either the Liberal Party leadership were in over their heads while dealing with international financiers, or they held ulterior motives.

The chief engineer for the Bolivian Railway on the ground in La Paz was Rankin Johnson, an American who was pulled from railroad projects in Mexico to take over the management of operations in Bolivia.¹⁷² Communications between Johnson and Speyer reveal how complex and political the project became. Johnson often communicated with his employers through ciphered telegrams (keeping the codes in his possession at the advice of the Speyer Company), and engaged in extensive communication with President Montes.¹⁷³ Fear of espionage from potential competitors, and perhaps the revelation of

¹⁷¹ This relationship can be seen in the extensive communication between Rankin Johnson and his employers in New York. It was an issue of discussion with Rankin Johnson taking the position that WR Grace and the Peruvian Corporation held conflicting interests in managing the finances of the Bolivian Railway Company in South America, because it was operating the Guaqui Line and much of the Peruvian railway network, thus placing it as a potential competitor should Speyer and Cia be able to either buy Guaqui, or control another line to a Pacific Port. Buying Guaqui would have given the Bolivian Railway Company another route to a port, even though it would then rely on the Mollendo Railroad. Box 2, Folder 5. Rankin Johnson Papers 1895-1910, AIS.1965.01, Archives Services Center, University of Pittsburgh; El Comercio, 21 de abril, 1912, "El Ferrocarril Arica a La Paz."

¹⁷² Rankin Johnson worked on the Mexican International Railroad prior to moving to Bolivia to work with Speyer in 1906.

¹⁷³ The ciphered documents comprise much of the remaining telegrams in his personal papers. Though I have not decoded much of the communication, the consistent mention of Montes under the code name "Pagellus" together with an offer to hire Montes as their political agent once he

President Ismael Montes' personal interest in supporting the company, was so widespread that Johnson did not let his Bolivian assistants decode the encrypted communications.¹⁷⁴

Some of the reasons behind this secrecy are revealed in the engineer's personal notes and archives. The South American Construction Company quickly ran over budget on the construction of the line from Oruro to La Paz, and provoked conflicts with the Bolivian Congress on several fronts.¹⁷⁵ Bridges had to be rebuilt within a year of their inauguration. For several years running the South American Construction Company kept no records of labor costs and expenditures, and was frequently and publicly criticized for its bookkeeping.¹⁷⁶ The South American Construction Company continued to work on projects within the country despite the political blowback in Congress.

Johnson's evaluation of the planned rail network was pessimistic. He doubted the timeline, the budget, and the routes laid out in the contract.¹⁷⁷ The railroad network he had been hired to build was based on a study done by another engineer, Lee Sisson, several

stepped down from the presidency, make clear the closeness of the relationship between the Company and the President. See Box 2, Folder 5 and Box 2, Folder 1. Rankin Johnson Papers 1895-1910, AIS.1965.01, Archives Services Center, University of Pittsburgh.

¹⁷⁴ Box 1, Folder 2. Johnson even brought several trusted workers with him to Bolivia from the railroad projects in Mexico in response to these concerns about security and confidentiality. Box 1, Folder 3. Rankin Johnson Papers, 1895-1910, AIS.1965.01, Archives Service Center, University of Pittsburgh

¹⁷⁵ Box 1, Folio 5. And Box 5, Folder 42. Rankin Johnson Papers 1895-1910, AIS.1965.01, Archives Services Center, University of Pittsburgh.

¹⁷⁶ The failure of the new bridges contributed to the stop and start running of the line. Even though sections operated very early on, the entire set of repairs would significantly delay the official inauguration. Nevertheless, the South American Construction Company continued to be actively involved in the construction of the Cochabamba – Oruro line, as well as the line that would eventually connect Uyuni to Atocha and then Villazón. Box 5, Folder 42 and Box 5, Folder 50. Rankin Johnson Papers 1895-1910, AIS.1965.01, Archives Services Center, University of Pittsburgh.

¹⁷⁷ Box 5, Folder 50 Rankin Johnson Papers 1895-1910, AIS.1965.01, Archives Services Center, University of Pittsburgh.

years before.¹⁷⁸ Writing in the 1950s and reflecting on the plan, Cesareo Aramayo Ávila characterized the overall project as having embodied an "exaggerated optimism." ¹⁷⁹ Rankin Johnson felt the same way in 1908 when he expressed doubts about the viability of the studies on the proposed routes from Uyuni to Potosi, and from Potosi to Tupiza.¹⁸⁰ Though construction on Oruro to Cochabamba began quickly after Johnson's arrival, financial and logistical problems quickly brought activity to a halt. In fact, problems on all of the lines sparked tense communications between Johnson and New York investors over what to do. They decided to lease the Oruro – La Paz line to the Antofagasta (Chili) and Bolivia Railway Company, including giving them responsibility for the repairs needed to finish the line. Thus, within two years of starting the Speyer deal, the nature of the plan changed quickly. Rather than building a network that would provide the nation with alternatives to the Antofagasta monopoly, control of one of the most important lines in that strategy was effectively handed over to them.

Decoded telegrams and other communication between Rankin Johnson and Speyer point to the shifting political and economic terrain on which they were operating. The

¹⁷⁸ W. L. Sisson, *Informe Del Reconocimiento Sobre El Proyectada Sistema de Ferrocarriles Bolivianos*. (Imprenta y Litografia Boliviana, 1905).

¹⁷⁹ Aramayo Ávila, *Ferrocarriles bolivianos*, 70. *El Diario*, 30 de octubre, 1908.

¹⁸⁰ Box 1, Folio 5. Rankin Johnson also agreed with this assessment on lines that had never been in question, like the Oruro – Cochabamba Line, predicting it would take many more years than had been projected. He thought Sisson's projections were also impractical with regards to the lines to the south from Potosi. See Box 3, Folder 5, Correspondence from 1908. Rankin Johnson Papers 1895-1910, AIS.1965.01, Archives Services Center, University of Pittsburgh. Debates over the route the railroad to Potosi should take were also discussed publicly in newspapers. See: *El Diario*, 21 de octubre, 1908, *El Diario*, 22 de octubre, 1908, *El Diario*, 24 de octubre, 1908. Changes in the routes from Oruro to Potosí had already been made possible by modifications of the Speyer Contract which permitted them to re-examine previous plans if necessary. See: *El Diario*, 30 de octubre, 1908.

Antofagasta Railroad understood, very clearly, that the Bolivian Railway project, if carried out in conjunction with the construction of the Arica – La Paz line, would break their monopoly on rail traffic to and from the Bolivian highlands.¹⁸¹ During a period of stalled work and contract shuffling on the Arica railroad, Antofagasta attempted to take control of the construction and operation (for the 15 years outlined in the treaty).¹⁸² They proposed altering the route on the Bolivian side of the border, taking it to Oruro instead of La Paz, a move that would have forced traffic back into their terrain.¹⁸³ Doing this would have ensured their monopoly even after turning over control of the line to the Bolivian government, because all railroads to Antofagasta and Arica would have then gone through their station in Oruro. Controlling La Paz – Oruro would allow them to continue funneling rail traffic through Antofagasta. This would have reduced the Bolivian Railway Company and the Arica - La Paz Railroad to simple feeder lines for their own railroad. The desire to maintain their monopoly led the Antofagasta Railway to immediately propose the construction of lines parallel to those of the BRC to Tupiza and Potosí.¹⁸⁴

Though Antofagasta's attempts to control the Arica project were ultimately unsuccessful, their quick positioning reveals some of the basic conflicts of interest between

¹⁸¹ Lehman, Bolivia and the United States.

¹⁸² Box 2, Folder 5 and Box 2, Folder 1. Correspondence. Rankin Johnson Papers 1895-1910, AIS.1965.01, Archives Services Center, University of Pittsburgh.

¹⁸³ This is not mentioned in any of the histories written about the line, but does appear in the letters between Rankin Johnson and his employers in New York. It provides some interesting insights into the intrigues behind the scenes in the construction of these lines that have been left out of the official publications surrounding the contraction and construction process. Box 2, Folder 5 and Box 2, Folder 1. Correspondence. Rankin Johnson Papers 1895-1910, AIS.1965.01, Archives Services Center, University of Pittsburgh.

¹⁸⁴ Box 2, Folder 5. Correspondence. Rankin Johnson Papers 1895-1910, AIS.1965.01, Archives Services Center, University of Pittsburgh.

the private companies and the state during railroad planning and construction. All of these companies would fight to keep another line from doing anything that would reduce their profits; the government wanted more competition, more lines, and lower freight rates. Rankin Johnson told his employers in New York that had Antofagasta gotten what they wanted during that break in Arica's construction, the entire Bolivian Railway Company's project would have been ruined. It was Ismael Montes who intervened to stop the handover to Antofagasta, while he, unsuccessfully, tried to help the Bolivian Railway Company acquire the Guaqui – La Paz line.¹⁸⁵ Montes' interventions may have been influenced by Johnson, who repeatedly communicated to his employers that that he saw no way two rival companies could operate in Bolivia's transport sector – all lines would eventually be under the control of one company.¹⁸⁶ Johnson's observations that Argentina's diminishing interest in finishing (or really starting) the line between La Quiaca and Tupiza, meant that the entire southern portion of the Bolivian Railway Company's network would basically feed Oruro – Antofagasta.¹⁸⁷

¹⁸⁵ Buying Guaqui would have given the Bolivian Railway Company another route to a port, even though it would then rely on the Mollendo Railroad. Johnson pushed his employers to move aggressively and attempt to buy the line as early as 1908. Box 2, Folder 5. Rankin Johnson Papers 1895-1910, AIS.1965.01, Archives Services Center, University of Pittsburgh. Chilean builders of the Arica – La Paz Railroad also lamented their failure to buy the Guaqui line during this same period, as they argued it gave a third party an advantage to compete with the Arica line for traffic. They expressed that the Peruvian buyers and operators of the Guaqui line should be viewed as the enemy, possessing completely incompatible interests as those of Chile. *El Comercio*, 21 de abril, 1912, "El Ferrocarril Arica a La Paz."

¹⁸⁶ Box 2, Folder 5 and Box 2, Folder 1. Rankin Johnson Papers 1895-1910, AIS.1965.01, Archives Services Center, University of Pittsburgh.

¹⁸⁷ Box 2, Folder 1. Rankin Johnson Papers 1895-1910, AIS.1965.01, Archives Services Center, University of Pittsburgh.

If the Bolivian Railway Company had represented an attempt to break the monopoly of the Antofagasta line, it failed very quickly. Speyer, New York City Bank, and the Bolivian Railway Company's lease of the La Paz – Oruro line to Antofagasta signaled the end of that possibility. Summarizing these issues at the time, Isaiah Bowman wrote:

It is a step towards the consolidation of the interests of the two roads and will undoubtedly result in the unification of the railway systems of Bolivia. By the terms of the agreement now embodied in the law, the British Company (Antofagasta) guarantees the interest of the new line of the American company just completed between Viacha and Oruro and makes payment to the American syndicate for a majority of the line's stock.¹⁸⁸

In other words, investors aligned their interests. Plans for the other lines quickly shifted and resulted in all of the Speyer Contract lines feeding to Antofagasta – except for Guaqui, and the Arica – La Paz Railroad.¹⁸⁹

Liberal Party leaders had found a way to get construction moving on railroads, however, these railroads were being built and operated by companies working for their own interests that had little to do with Bolivian objectives. The reliance on Antofagasta produced serious logistical problems. Backlogs in the port, shortages of cars, and similar problems, as well as the fact that the service only ran 3 days a week into Oruro, meant that Bolivian exports and imports were still strangled.¹⁹⁰ Rankin Johnson's reports on the state of traffic in Antofagasta and the port reveal that both Bolivian exports and imports

 ¹⁸⁸ Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," 1910, 17.
 ¹⁸⁹ These changes included shifting the original plan for Oruro- Potosi – Tupiza, to two different lines: Uyuni (an Antofagasta station) – Tupiza, and Rio Mulatos (another Antofagasta station) – Potosi. What had been envisioned as competing lines providing a route to export via Argentina became two branches of the Antofagasta line.

¹⁹⁰ Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," 1910.

regularly sat waiting to move for months on end.¹⁹¹ Furthermore, Antofagasta's play to control Oruro to La Paz meant they could exercise pressure on the traffic along the Arica – La Paz line once it was finished by manipulating tariffs.¹⁹² Regardless of the geographic convenience of Arica for much of the altiplano, unfavorable rates between Oruro and Viacha, a necessary part of transit to Arica from many parts of the country and especially the mining centers of Oruro, would make it a less attractive option.¹⁹³

Construction on the Bolivian Railway Company's lines ran over budget and resulted in some lines to connect important cities (like Potosi – Sucre, Cochabamba – Santa Cruz, and La Paz to the Yungas and Amazon).¹⁹⁴ The half constructed network that the Bolivian Railway Company agreed to build, far over budget, was in such financial trouble that the entire company was eventually leased to the Antofagasta (Chili) and Bolivia Railway Company, for a period of over 90 years.¹⁹⁵ Antofagasta wound up controlling the operation of the network, while buying up the majority of shares in the railroad and nearly all of the bonds of the first mortgage.

All the complex maneuvers and concessions made by Liberal Party officials during treaty and contract negotiations resulted in the partial construction of their vision for a rail

¹⁹¹ Bowman. And Box 5, Folder 50. Rankin Johnson Papers 1895-1910, AIS.1965.01, Archives Services Center, University of Pittsburgh.

¹⁹² Zubieta, "Políticas de Transporte Ferroviario En Bolivia 1860-1940." And Box 2, Folder 1. Rankin Johnson Papers 1895-1910, AIS.1965.01, Archives Services Center, University of Pittsburgh.

¹⁹³ As will be discussed in other chapters, the Bolivian government sought to control tariffs as time went by and they wizened to the effects of these manipulations.

¹⁹⁴ The project began construction mid- 1910s, though it appears to have been abandoned as a project. The rail and ties put down were eventually taken up. Fondo Prefectura de La Paz, Administración Ferrocarriles, Box 286, ALP.

¹⁹⁵ Lehman, *Bolivia and the United States*.

network that went far over the original budget estimates.¹⁹⁶ Bolivian leaders in the late 1920s would have to confront the consequences for the national treasury.¹⁹⁷ Politicians in 1927, faced with overwhelming debt obligations created by mismanagement and other problems on the Bolivian Railway Company's lines, reviewed the Speyer Contract and concluded that the Bolivian Railway Company had been insolvent from the start.¹⁹⁸ They argued that Speyer and Company had used the Railway as a shell company without sufficient liquidity to buffer themselves against any difficulties in the construction process. Speyer had protected itself by being only the principle shareholder of the Railway, while they held onto the first mortgage bonds until they sold them at a profit to the Antofagasta Company.¹⁹⁹

By the 1920s, the Bolivia Railway Company entered bankruptcy, effectively moving all responsibility to the government to pay the interests and principle on the first mortgage bonds, which were then nearly all in the hands of the Antofagasta Railway that was also the leaseholder for the operation of the line. In the end, the government lost all its reserve funds that had been deposited to pay the interests on bonds, lost the money to pay

¹⁹⁶ Liberal Party officials would continue to promote and argue for the success of the agreement, publishing regular updates about the advances in construction of many different railroads. By 1912 they reported 748 kms of railway open to the public and in use, another 896 kms under construction, with a total of 2930 either planned or being studied, in construction, or running. See: *El Comercio*, 31 de marzo, 1912. Examples of positive reports included advances on construction of the railroad to Potosi and the status of the Arica line. *El Comercio*, 12 de abril, 1912, and *El Comercio*, 13 de abril, 1912.

¹⁹⁷ Documentos Relacionados con el Contrato Ferroviario de 1906 y sus emergencias (Bolivia: Imprenta La Republica, 1927).

¹⁹⁸ Zubieta, "Ferrocarriles Bolivia"; Aramayo Ávila, *Ferrocarriles bolivianos*; Lehman, *Bolivia and the United States.*; *Documentos Relacionados con el Contrato Ferroviario de 1906 y sus emergencias* (Imprenta La Republica, La Paz, 1927).

¹⁹⁹ Documentos Relacionados con el Contrato Ferroviario de 1906 y sus emergencias (Bolivia: Imprenta La Republica, 1927).

the principle on the first mortgage bonds, did not get money back from the second mortgage bonds they held, and wound up paying additional costs. Though railroads had been built as a result of this contract, Bolivia neither got the comprehensive national network they had envisioned, nor broke the Antofagasta's power. Aramayo Ávila and Reynaldo Gómez Zubieta both remark on the truncated results of the Speyer Contract and the attempt to build a national network. Aramayo Ávila states that the railroads constructed were "reduced and poorly planned", "strictly subjected in construction and projection to the needs of mining and the impositions of Antofagasta," and, by the time lowland rails were completed by mid-20th century, the network was "composed of two systems – occidental and oriental – totally distanced and without connection, except for the complicated and lengthy connection to Argentine lines."²⁰⁰

The contract and the treaties used by Liberal governments set in motion longstalled projects across the altiplano, and got many more railroads built than any other government in Bolivia's history. However, in the course of doing this, they indebted the nation, engaged in deals that were fraudulent, signed treaties ceding claims to formerly sovereign territory, and helped facilitate a rupture in their own party. Daniel Salamanca, Bautista Saavedra, José Manuel Pando, and other former Liberal Party members would split with Montes to form the Republican Party, at least in part because of these issues.²⁰¹

²⁰⁰ Connections from the highlands to Santa Cruz via rail required traveling to the Argentine border in La Quiaca, a trip from the border further south into the provinces of Jujuy and Salta, a transfer onto another line in the same provinces, a trip north to the border at Yacuiba through what is known as the Ramal, and then another transfer to the line that extended to Santa Cruz. Aramayo Ávila, *Ferrocarriles bolivianos*, 12.

²⁰¹ Daniel Salamanca and others would split and form the Republican Party in 1914 because of many different issues, but among them the disastrous financial consequences of Liberal Party deals like the Speyer Contract.

Table 1.2: Fate of Lines outlined in the Speyer Contract and the Treaties with Chile
and Brazil ²⁰²

Fate of Line
Constructed and operational in 1912. Shut
down by 1930. Occasional tourist use
today.
Constructed as the Rio Mulatos branch in
1912 as a feeder route to the Antofagasta
that connected Potosí to Uyuni and Oruro.
Operational through much of the 20 th
century. Non-functioning today.
Constructed and operational in1913 and
through much of the 20 th century. Non-
functioning today.
Constructed and operational to only to
Cochabamba in 1917. Partial construction
beyond Cochabamba, was mostly removed.
Non-functioning today.
Constructed and operational by 1909 to
Viacha, though with lengthy suspensions
for repairs. Non-functioning today.
Construction begun and halted into the
Yungas. Partially constructed line later
removed.
Constructed and fully operational by the
1930s. Non-functioning today.
Construction begun and halted. Partially
constructed line later removed.
Node changed from Potosí to Uyuni, then
passing through Atocha. Completed to
Villazón (Argentine border) in 1925, to
Tupiza prior. Functioning today

²⁰² Table composed by references in reports from government ministries, newspaper articles, and Gómez Zubieta, "Políticas de Transporte Ferroviario En Bolivia 1860-1940"; Aramayo Ávila, *Ferrocarriles bolivianos*; Contreras, "El Desarrollo Del Transporte En Bolivia, Una Aproximación Al Impacto Económico y Social de Los Ferrocarriles y Carreteras 1900-2015"; Klein, *A Concise History of Bolivia*, 2003.

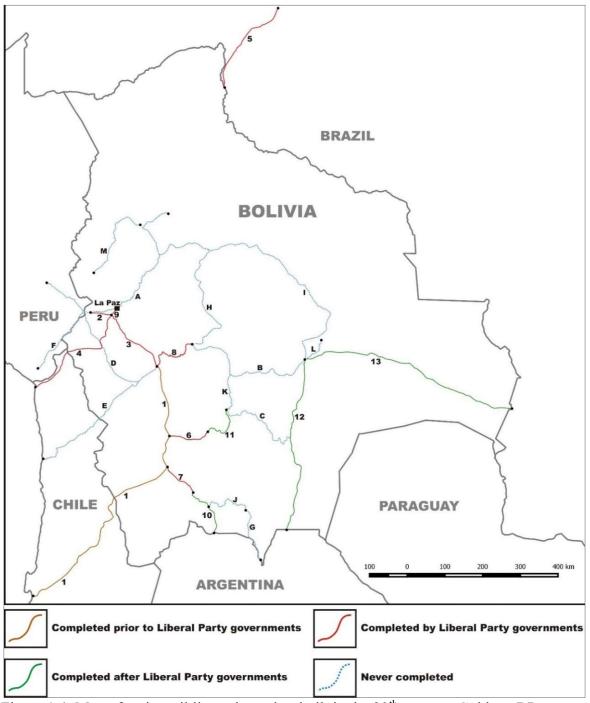


Figure 1.4: Map of major rail lines planned vs built in the 20th century. Guide to RR constructed: 1, Antofagasta – Oruro; 2, Guaqui – La Paz; 3, La Paz – Oruro; 4, Arica – La Paz; 5, Madeira – Mamoré; 6, Rio Mulatos – Potosí; 7, Uyuni – Atocha; 8, Oruro – Cochabamba; 9, Entry to La Paz; 10, Connection Atocha to Tupiza and Villazón; 11, Potosí – Sucre; 12, Santa Cruz – Yacuiba; 13, Santa Cruz – Rio Paraguay.

Discussion:

Over more than five decades, the politicians, businessmen, landowners, and miners dreamed of modernizing the Bolivia with railroads. In their speeches and publications on the subject, national leaders represented the new transport technology as much more getting goods from point A to B. From the 1860s onwards, speeches promoting these projects depicted them as wheels that would literally bring law and reason into the country. Small questions and debates arose about whether the projects would promote or weaken national sovereignty, depending on the route and timing of their construction. Bolivian politicians were not only driven by the goal of uniting the nation in abstract terms. The need to build more efficient forms of transport and establish a state presence played a key role in these economic plans and political visions for the nation. Economic development and political development were not seen as separate projects. Moreover, politicians held vested interests in these projects, in having state contracts subsidize their costs and increasing the value of their properties.

Paul Gootenberg has classed the debates in Peru over what to do with the nation's guano riches as a form of development discourse prior to the appearance of modern "development discourses" in the mid-twentieth century. And, despite the differences between the late-nineteenth century Peruvian reality and the Bolivian one, significant parallels can be found. The more common reading of Bolivian elites' push for railroads paints these as ways to subject the nation to global capital, and this narrative tends to paint those involved as *vendepatrias*. Something much more complex ran through the debates around modernization of the nation. None dreamt of creating an egalitarian utopia. Their

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visions about what a new Bolivia would look like involved industrializing the mining sector and export growth in general, but these debates included ideas about how to connect the country and strengthen exchanges among regions, or at least urban and industrial ones. The elites pushing these projects imagined a growing national capitalist exchange that would facilitate the growth of some kind of national unity – though only among certain groups.

However, Bolivian political leadership, and indeed that of any South American nation, was incapable of acting alone on these projects. Railroads required a lot of capital. Without a very large independent source within the country, something the national treasury did not hold, these projects required foreign capital that brought with it different interests and ideas about what the project should look like. Most of the international agents were driven by concerns that were very different than those of their Bolivian counterparts. For the international actors bidding on railroads in Bolivia, this was big business and the stakes were high. For these companies, investors, and engineers, a rail line between Bolivian cities, or one to connect a remote region of the country with an urban center in the hopes of stimulating growth and not taking advantage of already existing riches, promised few profits. Because their concessions aimed not only to build a rail line but to operate it as well, any competition worked to their disadvantage. The aims of politicians (competition, long-term development goals and not just short-term profits) turned out to be disadvantageous for private investors in a line. When it came time to decide which line was to be built and which not, if international investors were at the wheel, they decided based on their bottom line. The Arica – La Paz Railroad was an exception to this. It was built

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because of diplomatic maneuverings and at the cost of a foreign state. As a result, once the Speyer Contract plans began to fall apart, the Arica Railroad would become even more important.

The Liberal Party aimed to reorganize the nation's geography, echoing James Scott in his description of "legibility as a central problem of statecraft" for the modern nationstate.²⁰³ While his studies address a much wider set of practices surrounding modernization, this insight remains relevant to discussion about railroad planning. It was a technology that created perhaps the most "legible" form of land transport invented before the growth of air travel in the twentieth century. Goods and people moved along fixed routes, physically tied to the iron rails, and stopped at supposedly pre-determined points. The choice of a railway route cut a straight line across what were previously webs of commerce. These decisions moved some places into the spotlight or even built them from the ground up (Uyuni) and diminished the importance of others.

Railroad construction revealed more profound problems on the path to modernization. Bolivian political and industrial leaders proved no match for international interests, and it took decades for politicians to demand responsibility and accountability of the international firms. The populations reliant on preexistent and colonial forms of exchange and movement across the Andean topography, appeared to be an obstacle in the path towards the goals of all investors in these projects. Though this perspective was shared among the political leadership of other Andean nations, Bolivia's particular situation at the start of the twentieth century made the continued presence of autonomous

²⁰³ Scott, *Seeing Like a State*, 2.

and disperse circuits commerce across its national borders a more pressing issue for liberals. Bolivia's landlocked status also presented the country with many more challenges than other attempting to build railroad networks.

The frantic construction of so many lines at once during the period of Liberal Party governments placed strains not only on political relationships and the state treasury, but also on the relationship between the state and those communities and populations that had been left out of the planning process. Getting a railroad built and running created a new set of challenges for Liberal Party governments that required their continual political intervention.

CHAPTER TWO: BUILDING THE ARICA – LA PAZ RAILROAD.

Introduction:

During the years of intense railroad construction national government officials, municipal authorities, managers, and others, faced the challenge of going from planning for railroads to getting them built and running across the altiplano and the high-altitude passes of the Andean range. Though the Arica – La Paz Railroad grew out of political negotiations and Chile took responsibility for its construction per the 1904 Treaty, this was no guarantee that construction would run smoothly. Problems with financing did not disappear and the physical geography of the route pushed the limits of the engineers and workers.²⁰⁴ The resolution of even minor problems arising during the construction and inauguration of both the Arica – La Paz Railroad and the Speyer contract network required the Bolivian state to take action. Finding and maintaining a workforce for the projects created conflicts between government officials and agents of railroad companies, and these problems only became more acute as the number of projects that were being constructed simultaneously grew. Railroad construction brought liberal fantasies down to solid rock: elite discourses had to address the harsh realities.

Tracing this change requires following the original proposals for the Arica – La Paz Railroad in the nineteenth century and the narrative of building the line in the early

²⁰⁴ The ascent from the port of Arica required climbing to 4500 meters above sea level in a short distance, to the Bolivian altiplano. The river and gorge crossings called for numerous tunnels, bridges, and the use of rack and pinion for long stretches of the line. The rainy season and earthquakes also slowed construction. Alberto Decombe, *Historia del ferrocarril de Arica a La Paz* (Libr. e imp. de Artes i Letras, 1913).

twentieth century. Liberal Party governments were largely responsible for what happened. Most of the projects debated ideal results and, at the outset, paid relatively little attention to details other than financing construction. However, once those plans were set in motion, recruiting, retaining, and controlling the workforce and the material needs of construction proved to be consistent problems for all involved. Planning and funding the railroad required political, financial, and diplomatic negotiations; building the line however, involved changing the relationship between the state and different collectives in Bolivia, including local authorities, indigenous communities, and workers from different backgrounds.

Historical antecedents to the Arica – La Paz Railroad:

The Arica – La Paz Railroad ran through an established corridor. Connections between populations around Lake Titicaca and in the province of Pacajes to those on the Pacific coast near Arica and Tacna were deeply rooted in the history of the region. Though archaeological evidence reveals the existence of this connection during the pre-Hispanic Period, Spanish Colonial reforms changed the nature and importance of these circuits in ways that persisted well into the Republican Era.²⁰⁵ Viceroy Francisco Álvarez de Toledo's reforms in the early Colonial Period and the introduction of the amalgamation process in Potosí made this route a very important one within the Spanish Colonies. Toledo's reforms

²⁰⁵ Archaeological and historical research places Pacajes at the crossroads of flows of peoples and goods for the last five centuries. For a pre and early Colonial history of the region, see: Martti Parssinen, *Caquiaviri y La Provincia Pacasa: Desde El Alto - Formativo Hasta La Conquista Española (1-1533).* (La Paz, Bolivia: CIMA, 2005); Canqui and Albó, *Cinco siglos de historia*; Ariel J. Morrone, "Tras los pasos del mitayo: la sacralización del espacio en los corregimientos de Pacajes y Omasuyos (1570-1650)," *Bulletin de l'Institut français d'études andines*, no. 44 (1) (2015): 91–116.

required the development of new Pacific ports and routes to the highlands for both the movement of mercury into the highlands and the exportation of silver.²⁰⁶ Arica became a center of commerce for trade and transport of minerals and other goods between the altiplano and other Spanish colonies. What had previously been a community-based small-scale trading circuit became one of the corridors for some of the most important exchanges of silver in modern history.

The region also produced its own minerals. While Berenguela was mined for silver early in the Colonial Period, the principal mining activity was the extraction of copper, especially the abundant native copper deposits found in and around Caquingora, which would later become known as the mines of Corocoro.²⁰⁷ Spanish authorities initially showed little interest in copper during the early Colonial Period. However, by the mid-18th century, changes both in the demand for and the availability of bronze throughout the Spanish Colonies and in Spain, led to renewed interest in producing this mineral.²⁰⁸ Increased demand for copper and tin (two metals used in the production of certain bronzes) led to the granting of mining rights in Corocoro by religious authorities in Oruro, without

²⁰⁶ Tristan Platt, "Tiempo, Movimiento, Precios. Los Caminos Del Azogue Español de N.M. Rothschild Entre Almadén, Londres y Potosí 1835-1848," *Diálogo Andino*, no. 49 (2016): 143– 165.

²⁰⁷ The silver mines of Berenguela are described in the 17th century text of Barba and descriptions of colonial period copper can be found in Gavira. See: Alvaro Alonso Barba, *Arte de los metales: en que se enseña el verdadero beneficio de los de oro y plata por azogue: el modo de fundirlos todos, y como se han de refinar y apartar unos de otros* (los Huérfanos, 1817); Maria Concepción Gavira Márquez, "La Minería de Cobre y El Estaño En Alto Péru. Huanuni y Corocoro, 1750 - 1800." (n.d.), Bd/Fol 1986, Archivo Nacional Biblioteca Nacional de Bolivia.

²⁰⁸ Gavira Márquez, "La Minería de Cobre y El Estaño En Alto Péru. Huanuni y Corocoro, 1750 - 1800."; Jaime Rosenblitt, "De arrieros a mercaderes. Orígenes de los comerciantes de la región Tacna-Arica, 1776-1794," *Revista de Indias* 74, no. 260 (2014): 35–66; Jaime Rosenblitt, "El Comercio Tacnoariqueño Durante La Primera Década de Vida Republicana En Péru, 1824-1836," *Historia (Santiago)* 43, no. 1 (2010): 79–112.

the allocation of mitayo labor to those exploiting the ores.²⁰⁹ Connections between towns in Pacajes, like Corocoro, Caquiaviri, Calacoto, other mining centers in the altiplano, and Pacific ports grew in number and importance because of changes during the Bourbon Period.²¹⁰



Figure 2.1: Photo of Colonial Era Church in Pacajes (Photographed by author in 2011).

²⁰⁹ The absence of mitayos most likely meant that labor patterns in Corocoro, Caquingora and other mines in Pacajes resembled those seen in Oruro, with termporary wage laborers migrating to the mines from nearby communities. Ann Zulawski, *They Eat from Their Labor: Work and Social Change in Colonial Bolivia* (Pittsburgh: University of Pittsburgh Press, 1994).

²¹⁰ Gavira Márquez, "La Minería de Cobre y El Estaño En Alto Péru. Huanuni y Corocoro, 1750 -1800."



Figure 2.2: Photo of altar in abandoned Colonial Era church (Photographed by author in 2011).



Figure 2.3: Photo of Colonial Era church with animal and walking paths (Photographed by author in 2011).

Independence laid down national borders across this region where none had existed previously, though it did not disconnect the web of social and commercial relations that spanned national territories. The continued importance of the route led some Bolivian politicians to argue that the nation's reliance on Arica as a port throughout the nineteenth century limited the development of Cobija, a Bolivian Pacific port, and therefore the nation's sovereignty. Historian Fernando Cajías argues that even though the relationship between Peru and Bolivia changed over the years, as did the tariffs placed on Bolivian commerce through Arica, the port and its commercial center in Tacna remained more important for the nation's exports and imports than any sovereign one.²¹¹ Even through the mid-nineteenth century and the years just prior to the War of the Pacific, Arica remained the principal commercial port for the most populous regions of Bolivia: the Departments of La Paz and Cochabamba.²¹²

Aramayo's mid-nineteenth century proposal for a rail network beginning in the Bolivian Litoral can be seen as a project that aimed to develop a national alternative to Arica.²¹³ Developing infrastructure in the Bolivian Litoral was seen as a way to strengthen the Bolivian presence in this important region and provide an alternative to reliance on a Peruvian port. Yet, despite the importance of this project and the high tariffs occasionally

²¹¹ For the mid-1830s, Cajías describes Bolivia's commerce through Arica as significantly larger than the traffic in Cobija. Cajías, "El Norte y El Sur de Bolivia En Los Primeros Años Republicanos."

²¹² Cajías.

²¹³ Aramayo, Proyecto de una nueva vía de comunicación entre Bolivia i el Océano Pacífico.

imposed by Peru, Bolivian trade continued to flow through Arica in greater volumes than through any other port for much of the nineteenth century.²¹⁴

Growth in the cities of La Paz, Oruro, and Cochabamba, as well as rising prices for copper intensified this dynamic.²¹⁵ Increased international interest in copper by the midnineteenth century led to investments and development of Corocoro and the mining district surrounding it.²¹⁶ Corocoro reached its peak of pre-industrial production during the 1840s and 1850s and though the sector experienced a great deal financial volatility, it remained of interest to both Bolivian and international investors looking to get in on the copper boom.²¹⁷

The growth in copper production and the towns and cities in the region generated interest among different groups in the port of Arica and the town of Tacna. Jaime Rosenblitt has examined the role of commercial houses in Tacna in developing and fomenting cross-border trade throughout the area.²¹⁸ Merchant activity in Tacna, the historical commercial and population center in the region, depended both on regional trade between coastal regions of Peru and the highlands of both Peru and Bolivia, and the international commerce linking larger cities to the ports. The gradual accumulations of

²¹⁴ Even as contraband. Cajías, "El Norte y El Sur de Bolivia En Los Primeros Años Republicanos."

²¹⁵ Ramiro Jimenez notes that Bolivian investors in copper mines faced particular challenges that led to the region becoming a foreign-owned mining district. Ramiro Jiménez Chávez, "Comerciantes, Habilitadores e Inmigrantes En La Formación Del Capital Minero de Corocoro (1830-1870)," 1994.

²¹⁶ Jiménez Chávez.

²¹⁷ Jiménez Chávez.

²¹⁸ Rosenblitt, "El Comercio Tacnoariqueño Durante La Primera Década de Vida Republicana En Péru, 1824-1836."

capital from trade across the border in the 19th century (even in 'rustic' local goods or agricultural products) led to the expansion of investments in other activities and then a vested interest in the further development of the economic corridor. Merchants in Tacna expanded what they traded and with whom as their businesses grew, and actively began to invest in mining, in Corocoro and what is now the tripartite border region.²¹⁹

Coastal commercial interests presented the first serious proposals for a railroad stretching from the Tacna – Arica region into La Paz in 1870. The owners of the railway from Arica to Tacna hired engineers to study possible routes that would extend the Tacna line into the Bolivian highlands, to La Paz and then on to Potosi.²²⁰ The advantages of Arica for Bolivian commerce were obvious to both Bolivian and Peruvian merchants; it was closer to many productive centers and cities and its historically rooted relationships facilitated trade.²²¹ The timing of these proposals, coinciding with attempts to get a railroad from Antofagasta into the highlands, show that Tacneño interests clearly understood the potential of the technology to change commercial geography and possibly place them at a disadvantage in relation to other ports. However the War of the Pacific brought Tacneño attempts to build the railroad to a complete halt.

²¹⁹ Rosenblitt; Jaime Rosenblitt, *Centralidad geográfica, marginalidad política: la región de Tacna-Arica y su comercio, 1778-1841* (DIBAM, 2013); Jiménez Chávez, "Comerciantes, Habilitadores e Inmigrantes En La Formación Del Capital Minero de Corocoro (1830-1870)."
²²⁰ Decombe, *Historía del ferrocarril de Arica a La Paz*.

²²¹ Cajías, "El Norte y El Sur de Bolivia En Los Primeros Años Republicanos"; Rosenblitt, "El Comercio Tacnoariqueño Durante La Primera Década de Vida Republicana En Péru, 1824-1836"; Rosenblitt, "De arrieros a mercaderes. Orígenes de los comerciantes de la región Tacna-Arica, 1776-1794," 2014.

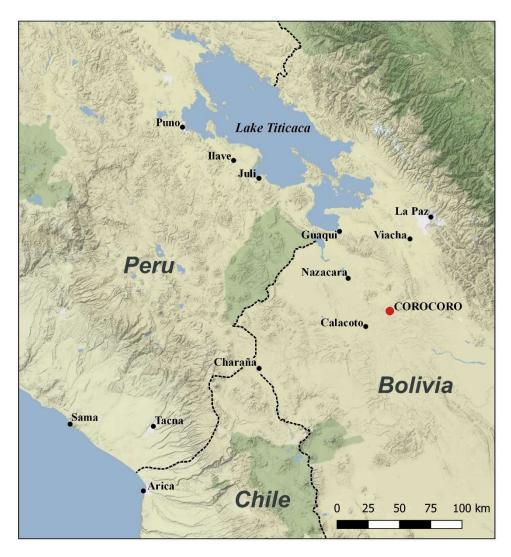


Figure 2.4: Map of border region and coastline.

The Chilean occupation of Tacna and Arica during and after the war impacted and delayed plans for a railroad from the coast to La Paz for decades after fighting stopped. In 1890 another serious proposal for this rail line was presented to the Bolivian Congress, one involving an English firm with commercial houses in Tacna.²²² That project, pushed by the

²²² Severino Campuzano, *Ferrocarril de Tacna a La Paz y Oruro. Motivos Que Impiden Su Planificación.* (Imp. y Lit. Boliviana, 1890).

business "Firth and Company," built off the earlier studies and proposed a continuation of the Arica – Tacna Railroad to La Paz via Desaguadero, and then on to Oruro along a route going through Corocoro. The proposal aimed to solve several problems discussed in the previous chapter: the lack of a rail connection into the city of La Paz and between other altiplano cities, the disconnectedness of other productive centers in the region, and the problematic and increasing dependence on the Antofagasta Railroad. Firth's proposal would have countered the monopoly of the Antofagasta line from the moment of its construction into Oruro.

However, the project faced insurmountable challenges. The proposal was accepted on November 4th, 1889, then cancelled by the Bolivian Congress only 6 months later.²²³ New legal timelines for the payment of deposits and the start of work, which had been intended to clear out the proliferation of undeveloped railroad concessions and avoid catastrophes like the Church scandal, had required Firth to pay the deposit within 5 months and advance the planning and construction of the line within 12 months.²²⁴ Firth's challenge to the revocation of his concession shed light on why he failed to meet those requirements.²²⁵ First, Firth's lawyer argued that competing concessions, including one that would run a line from Desaguadero to Oruro, would mean a loss of profits and he stated the investors wanted competing concessions revoked before they would put money in

²²³ Decombe, *Historia del ferrocarril de Arica a La Paz*; Severino Campuzano, "Ferrocarril Tacna a La Paz," 1890, Folletos, Biblioteca Costa de la Torre.

²²⁴ As discussed in the first chapter, the proliferation of contracts for the same lines overwhelmed the legal processes for new projects. Similarly, the abundance of speculators who took concessions on lines they were not serious about building became the impetus for laws like the ones that affected Mr. Firth.

²²⁵ Campuzano, Ferrocarril de Tacna a La Paz y Oruro. Motivos Que Impiden Su Planificación.

construction. Second, and most importantly, Firth and Company lacked the approval of the Chilean Congress to build the line from Tacna. Using the often-heard argument that all railroads had to be built from the port inland, uncertainty about Chile's position had stalled the start of construction and the advancement of funds that led to the cancellation of the contract.

This project had been important for two reasons. It would have constructed a rail line along the economic corridor connecting the Department of La Paz to its nearest coastline and it would have challenged the Antofagasta Railroad's play to establish a monopoly on transport and increasing reliance on the southern routes to Pacific ports. Firth's lawyer stepped into Bolivian politics and confronted Aniceto Arce's obvious preference for Antofagasta (a result of his own investments in mines in the southern altiplano), arguing that his client be granted an extension of time limits like that which had been given to the Cia. Huanchaca and the Antofagasta Railroad.²²⁶ Arce and Antofagasta won this political fight and no extension was granted to Firth, handing a victory to Antofagasta and Arce and a loss to Tacna interests.²²⁷

Later proposals in the 1890s met similar fates. Despite the expressed desire for rail connections to other Pacific ports, uncertain borders, conflicting interests, negotiations with Chilean administrators, and the difficulty in finding funding for a project of this magnitude meant that proposals amounted to little more than interesting pamphlets. All

²²⁶ Severino Campuzano, *Ferrocarril de Tacna a La Paz y Oruro. Breve Informe Del Abogado Severino Campuzano.* (Imp. y Lit. Boliviana, 1890).

²²⁷ Campuzano.

interests in La Paz and in Tacna understood the importance of the line region, though it became increasingly clear that getting it done would require the political cooperation and involvement of Chile and possibly Peru. Without a diplomatic agreement over Bolivian rights to use the Pacific ports and to build infrastructure into and out of them, any project that did not reflect Chilean interests would have little chance of advancing.

The Arica – La Paz Railroad:

The "Treaty of Peace and Friendship" signed in 1904 provided the framework for the Arica – La Paz Railroad's construction. The agreement laid out new borders and Chilean possession of the Bolivian Litoral, in exchange for several other things, including the construction of Arica – La Paz, the maintenance of the train's access to the port, and the freedom of Bolivia to use any Chilean port without charge for its commerce.²²⁸ The Treaty removed the political barriers that had halted projects like Firth's.

The Treaty required that Chile begin contracting the construction of the Arica – La Paz Railroad within one year of the treaty's signing. Chilean authorities in the region had already commissioned some studies of the route as early as 1903, in the midst of negotiations of the Treaty.²²⁹ By August 14th, 1905, the Chilean government called for proposals to build the line, and attempted to initiate the building process.²³⁰ The proposals

²²⁸ It also settled debt conflicts between Chilean and Bolivian companies that had been affected by the war. The debts were generally related to companies that had been held during the war or immediately afterwards, like the Cia. Corocoro de Bolivia, a Chilean mining company that operated in Corocoro.

 ²²⁹ Josias Harding, "Informe Preliminar Sobre Un Proyecto de Ferrocarril Entre El Puerto de Arica
 Y La Paz" (Imprenta Universitaria Santiago Chile, 1904), Folletos, Biblioteca Costa de la Torre.
 ²³⁰ Decombe, *Historía del ferrocarril de Arica a La Paz*.

can roughly be divided into two categories: those running from Arica to the south, across the border, and then northeast across the *altiplano* into La Paz; and those that proposed a line east out of Arica up to La Paz. Unlike previous discussions that called the line the Tacna – La Paz project, most proposals considered by Chilean administrators at the start of the twentieth century realigned the geographical focus to Arica instead of Tacna. These plans were to – at least in theory – require Tacneño commercial houses to transfer the bulk of their activities to Arica and promote the growth of the port as demographic and commercial center.²³¹ The plan would make Arica a commercial center in the region that though connected to Tacna, might come to rival it as an urban center.

The proposals that ran south from Arica followed similar paths to several preexistent pack animal trade routes.²³² The two serious proposals that took this direction moved inland and south from the port to the Bolivian border at Chilcaya, a crossing located in the highlands approximately hallway between Iquique and Arica and near important Borax mining operations. From Chilcaya, the proposed lines would have then run north east passing the Coipasa Salt Flat, run through Curahuara de Carangas, then Corocoro and into La Paz. In his 1910 publications, Isaiah Bowman described a similar route used frequently for contraband that left Oruro, crossed at Chilcaya, and continued on

²³¹ Plans for the 'chilenization' of the region included the purchase of lands for Chileans moving from the south into the region. The plan aimed at increasing the number of Chilean nationals in the region, but especially the growth of the population in Arica. Vol. 23 B, 1904, Foja 7, Fondo de la Intendencia de Tacna y Gobernación de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.

²³² Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," 1910; Alberto Decombe, *Historia del ferrocarril de Arica a La Paz* (Libr. a imp. de Artes i Letras, 1913).

to Iquique.²³³ The planners of railroads tapped into pre-existing trade routes and mountain passes for their modern technology, even if they modified a few points.

However, both of these southern proposals were excessively long, stretching nearly 800 kilometers.²³⁴ Though they left from the right place and arrived at the intended destination, and would have passed through several important productive centers and populations, 800 km of rail line made the plans too expensive. Projects that would connect the nitrate mining regions in the Atacama Desert by rail to other cities along the coast were already being developed, and some of those planned to cover the same territory included in the two southern proposals for the Arica Railroad.²³⁵ The only advantage of these southern routes, their avoidance of very steep grades, did not make up for their costs or distance.

The two proposed routes that left from Arica and headed east entailed climbing steep grades of the mountains via different rivers and gorges, but once across the border into Bolivia they were to then follow a very similar path: From the area around what is today Charaña, on to Calacoto, Corocoro (or very nearby), Viacha and then into La Paz. The principal difference between these routes was their planned starting points. One began the line in Tacna, and implied continued reliance on the Tacna – Arica Railroad and commercial powers in Tacna. Instead, the path that sidestepped Tacna and went right up the Lluta Gorge was chosen.²³⁶

²³³ Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," 1910.

²³⁴ Decombe, *Historia del ferrocarril de Arica a La Paz*.

²³⁵ Decombe.

²³⁶ Decombe.

The final route was significantly shorter than the two southern proposals, traveling 460 km instead of over 800.²³⁷ The steep grades along the chosen route increased construction costs, because extensive use of rack and pinion and would prove challenging for engineers. However, builders projected that this route would come in under the budgets of those that side-stepped the steep ascent.

The problems presented by this ascent point to the complex relationship between historical routes of animal transport, the physical geography of the Andean range, and the introduction of new transport technology. Paths used throughout the pre-Colonial, Colonial, and early Republican Periods were often chosen because of their suitability for caravans and other animal transport. Cart and carriage travel reduced the options for the traveler and transporter, because they required wider roads and less-steep climbs. However, the ascent from Arica up to the altiplano (and the return) presented serious technological challenges for the modern forms of transport in the twentieth century. The geography that had presented an advantage for pack animal transport created new obstacles for modern technology. While cart roads and train routes, like the paved automobile roads built after, used the existing and historical transport infrastructure in the region, each of the new forms of transport had different mechanical requirements. Accommodating those meant choosing which of the historical routes could be included in the new geography.²³⁸

²³⁷ Decombe.

²³⁸ Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," 1910; Decombe, *Historia del ferrocarril de Arica a La Paz*.

Despite careful planning, engineering challenges on the Arica – La Paz Railroad route pushed construction beyond its original timeline. The "Sindicato de Obras Públicas de Chile" contracted with the government for the construction of the railroad that followed the plans studied and created by Josias Harding."²³⁹ After a construction setback caused by an earthquake on August 16th, 1906, work advanced slowly, extending only 32 kilometers in the next year. By August of 1907, the Chilean government revoked the contract with the "Sindicato de Obras Públicas de Chile", and called for new proposals to finish construction.²⁴⁰

Deutsche Bank put forth a proposal to finance the line and contract with builders in Arica, however, the deal fell through.²⁴¹ In May of 1909, three to four years after the construction began, the Chilean government hired the Sociedad Sir John Jackson Ltd, for the completion of the project.²⁴² Engineers divided the route into sections, each overseen by different project managers. By August of 1909, construction from Viacha had begun.²⁴³ The new construction plans aimed to build from the Bolivian altiplano westward and from Arica to the east simultaneously, meeting in the middle, near the border. While these delays caused consternation in La Paz and as Bolivian newspapers pointed out, they might

²³⁹ The Sindicato was a construction firm that had originally proposed to construct more than one railroad in Bolivia, and even vied for the rights to build the network laid out in the 1904 Treaty (the lines given to Speyer). María Piedad Allende Edwards, *Historia del ferrocarril en Chile* (Chile: Pehuén Editores Limitada, 1993); Decombe, *Historia del ferrocarril de Arica a La Paz*; Sindicato de Obras Publicas de Chile, *Propuesta Para La Construccion de Los Ferrocarriles Bolivianos Indicados En El Tratado de 20 de Octubre de 1904. Propuesta Para La Construccion de La via de Iquique a Santa Cruz.* (La Paz, Bolivia: Imprenta Velarda, 1906).

²⁴⁰ Decombe, *Historia del ferrocarril de Arica a La Paz*.

²⁴¹ Decombe.

²⁴² Decombe; Allende Edwards, *Historia del ferrocarril en Chile*.

²⁴³ Decombe, *Historia del ferrocarril de Arica a La Paz*.

have represented a violation of certain terms of the 1904 Treaty, the construction companies did eventually upgrade some port facilities and inaugurate the entire line by 1913.²⁴⁴

Reports expressed a great deal of optimism about the project. The recent opening of the Panama Canal, together with the inauguration of the railroad, promised a new commerce through Arica. Projections of the mineral loads that could be exported via the railroad hovered around 40,000 tons a month.²⁴⁵ Discussions of Simon Patiño's interest in building another railroad from Oruro that would connect with the Arica – La Paz in western Pacajes created hope that mineral exports might increase even more.²⁴⁶ Ten years before the line's completion, Josias Harding had detailed some projected changes as well.²⁴⁷ He thought this railroad could help develop mines throughout the region including the sulfur deposits at Tacora, which he thought could quickly become some of the largest in the world. Mines at Berenguela, Chacarilla, and in the Corocoro area, would benefit with the reduction in export costs and lowered freight costs for the importation of

²⁴⁴ These delays in construction may have been a sign of a certain degree of non-compliance with the 1904 Treaty, in which Chile had agreed to contract and begin construction on the line within a year of the passage of the Treaty. Halting construction for as long as they did resulted in serious delays and pushed back completion of the line to nearly 10 years after the 1904 Treaty had been signed. Publications in La Paz admonished Chile for this and suggested that they might not be adhering to the principles of international law regarding bilateral treaties. See: *El Diario*, 12 de diciembre, 1908, "Pacta sunt servanda."

²⁴⁵ The opening of the Panama Canal appeared as an important part of the reasons for hope about the importance of the line. See: *El Comercio*, 18 de agosto, 1912, "Bolivia y la apertura del Canal de Panamá," *El Comercio*, 7 de diciembre, 1912, "El Canal de Panamá y sus efectos sobre el comercio mundial," *El Comercio*, 27 de diciembre, 1912, "Las tarifas del Canal de Panamá. Los ferrocarriles sudamericanos," and Decombe, *Historia del ferrocarril de Arica a La Paz*; Harding, "Informe Preliminar Sobre Un Proyecto de Ferrocarril Entre El Puerto de Arica y La Paz."
²⁴⁶ Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," 1910.

²⁴⁷ Harding, "Informe Preliminar Sobre Un Proyecto de Ferrocarril Entre El Puerto de Arica y La Paz."

industrial inputs. Just like other publications discussing the potential of railroads, the publications discussing the Arica – La Paz Railroad foresaw an industrialization of mines in the Department of La Paz, but they also argued that the impact of the railroad would extend beyond the mining sector and reach into the cities of the altiplano. Harding described fuel shortages in the city of La Paz that could be resolved by cheap imported kerosene, charcoal, coal, oil, and other fuels.²⁴⁸ According to the engineer, La Paz's shortages meant that they depended on the production of Aymara communities who sold yareta, queña, and charcoal in the cities and in mining centers.²⁴⁹ The railroad could lessen reliance on indigenous production of local fuels.²⁵⁰ Harding argued that the railroad would lower costs of imported foodstuffs, allowing flour, alcohol, and all kinds of foods to be brought to populations cheaply. The reduced travel time of Arica – La Paz in comparison to other railroads (18 to 22 hours vs 48 from La Paz to Antofagasta and 36 to Mollendo via Guaqui) would, he argued, make this new line an attractive and logical alternative for passenger travel.²⁵¹

²⁴⁸ Harding.

²⁴⁹ Yareta (a plant that burns well), queña (a species of tree), taquia (dried llama dung in pellets), and charcoal from different local sources, were used for local fuels, many cooking fuels in domestic settings in the altiplano and urban centers. Solluco Sirpa also details the use of these fuels for generators in the mining operations of Corocoro and the conflicts that ensued between indigenous producers and the companies vying for the limited supplies. See: Harding; Salluco Sirpa, *La explotación del cobre en el distrito minero de Corocoro a principios del siglo XX, 1900-1930*.

²⁵⁰ As the inauguration of the line neared, investors explored possible petroleum deposits in the town of Calacoto. By 1912, concessions for the exploitation of oil were reported in newspapers, though whether drilling occurred is unknown. *El Comercio*, 5 de enero, 1912 and *El Comercio*, 27 de Agosto, 1912.

²⁵¹ Decombe, *Historia del ferrocarril de Arica a La Paz*.

As the inauguration neared, Liberal Party officials worked to spread excitement about the line in local newspapers. During a test run of the line a reporter onboard the train described the experience of riding into Calacoto:

...the sun shines with singular intensity and the rarified air makes it such that the lines of the most distant objects become clear; the summits of snow-peaked mountains glow white; at their feet the green sheets of pastures extend outwards; and on the hills the indigenous settlements appear and in between the spirals of smoke rising from their chimneys, the spire of some church rises as a sign of life to interrupt the grandiose solitude of those plains. Near the line, llamas and alpacas graze, and they appear to look intelligently at the convoy that passes the herds and women shepherds with their somber and melancholy faces.²⁵²

Publications describing the railroad went beyond simply listing economic advantages of the technology, and poetically suggested that it provided a new way of seeing the country, a new way of experiencing geography, and that it gave riders access to a beautiful and previously distant region. The description portrayed modernity cutting through an idyllic and pristine pre-industrial countryside. Descriptions of railroads in Bolivian newspapers spread the notion that progress was something that could be experienced and seen, and that it was transformative. The inauguration of the railroad to Potosí was described as providing the "descendants of Juan Villaroal" with a visual representation of progress as the train approached the town.²⁵³ The Arica – La Paz railroad was bringing the world to the

²⁵² The original quote: "Allí el sol brilla con singular intensidad, el aire enrarecida hace que las líneas de los objetos más lejanos se destaquen con nitidez; las cimas de las nevadas montañas fulgen albas; a su pie se extiende la sabana verde de los cultivos de los pastales; en las colinas aparecen los caseríos y entre los espirales de humo de los hogares indígenas surge la torre de alguna iglesia como nota de vida que interrumpe la soledad grandiosa de aquellas pampas. Cerca de línea pastan las llamas, las aplacas, que parecen que miran con impresión de inteligencia el convoy que pasa y los rebaños o pastora indígenas de rostro sombrío y melancólico." *El Comercio*, 19 de abril, 1912, "De Arica a La Paz en ferrocarril."

²⁵³ El Comercio, 16 de mayo, 1912, "Un nuevo ferrocarril."

region, something newspapers saw as evident in the formation of football clubs, boy scouts, tennis courts, and schools for international commerce.²⁵⁴

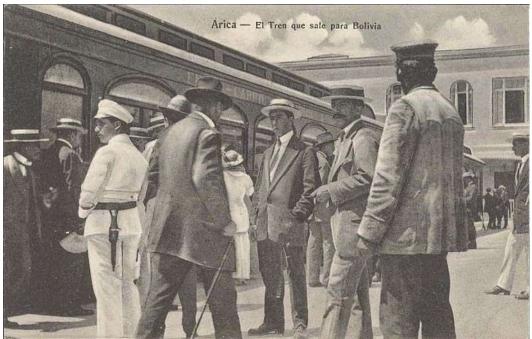


Figure 2.5: Postcard depicting the train station in Arica. This imagery was widely published in magazines and pamphlets at the time, and circulate in postcards, disseminating the imagery of modern subjects using the new train in Arica. (Photo from turn-of-the-century postcard).

However, the inauguration and running of railroads also presented problems that challenged these rosy depictions, and they too were communicated in the press. The consistent delays in the construction of lines from what is now El Alto, into the stations of

²⁵⁴ *El Comercio*, 31 de mayo de 1912, "La enseñanza comercial en Arica." Along with the development of these clubs, Bolivia established scholarships for students to attend the commercial school.

La Paz, revealed how difficult making the urban connection with La Paz would be because of the steep grades on the descent into the city.²⁵⁵ Moreover, as the construction of lines advanced, and it became clear that the financial commitments made on the projects would be difficult to meet, worries began to appear in publications about the future of the model proposed by the Liberal Party.²⁵⁶ Because the Arica – La Paz Railroad challenged or threatened other railroads, newspapers in other regions published negative articles about the train once it was inaugurated. A newspaper in Arequipa went out of its way to emphasize that a test run of the line took more than twice as long as expected and that ascent from sea level was so steep that passengers got sick all over the train as they became overwhelmed with altitude sickness.²⁵⁷

The news that most challenged the idealized depictions of train travel were the many reports of injuries to passengers, pedestrians, and workers along train lines across the country. More than one line derailed shortly after its inauguration.²⁵⁸ The Corocoro Branch

²⁵⁵ The steep grades of the descent into La Paz made the construction of lines running with heavy engine cars difficult. The electric and smaller cars used the by the Guaqui Railroad for the descent allowed for faster construction of this particular section of railroad and ensured that it was the earliest line to reach stations within the city itself. See for example: *El Comercio*, 6 de julio, 1912. The increased costs associated with this particular section of the Arica – La Paz Railroad even created some diplomatic tension with Chile over who should have to pay for this part of the extension of the line into the station in La Paz. *El Comercio*, 29 de diciembre, 1912.

²⁵⁶ For an example of this discussion see: *El Comercio*, 25 de Agosto de 1912, "Política Ferroviaria."

²⁵⁷ Reprint of article *from La Bolsa de Arequipa* in *El Comercio*, 3 de junio, 1913.

²⁵⁸ The Potosi line derailed shortly after its inauguration and decapitated the conductor. *El Comercio*, 20 de febrero, 1913. In other cases, pedestrians and workers were injured while trying to maneuver the tracks and the railcars. In one case, a man identified as an indigenous worker on the Bolivian Railway Company construction project, was killed while trying to run from his employer, who the newspaper depicted as having a history of violence and mistreatment of workers. *El Comercio*, 10 de diciembre, 1913. Other accidents occurred on well-established lines like the Antofagasta Railroad as well. *El Comercio*, 10 de octubre, 1913

of the Arica – La Paz Railroad was the most extreme example: On the day of its inauguration, loaded with passengers, government officials, and journalists covering the events, the train derailed and crashed, killing three workers and injuring others.²⁵⁹

Building the train:

The construction of the Arica – La Paz Railroad turned out to be more complicated than had been originally envisioned, and the problems went beyond earthquakes and financing. The extensive use of rack and pinion on the section of the railroad between Arica and the Bolivian border proved costly and lengthened the route.²⁶⁰ Though small changes were made that allowed engineers to not use the technology on certain sections, it was unavoidable on the steepest sections. The route crossed 48 bridges and ran through 79 tunnels. The heaviest construction of these was on the Chilean side of the border, though a significant number of bridges had to be built on the Bolivian side as well.

However, official histories of the railroad tend to omit a problem that was regularly discussed in the communication between government representatives and construction managers; picks, shovels, and the men to wield them were just as important as engineers or bankers – and they were in short supply. Resolving engineering problems and moving forward with the extensive and essential earthworks required a workforce comprised of some specialized workers, but also of non-specialized laborers in large numbers. The

 ²⁵⁹ *El Comercio*, 28 de octubre, 1913, "En el Ferrocarril a Corocoro. La comitiva oficial."
 ²⁶⁰ Rack and pinion technology allowed the train to climb grades it would not have been able to otherwise, however it did require significant investment of materials, money, and labor, and also slowed both construction and travel time along the track. Decombe, *Historia del ferrocarril de Arica a La Paz*.

simultaneous construction of many railroads and the growth of mining centers and cities dramatically increased pressure on the already small local workforce.²⁶¹

Bolivian businessmen and politicians alike decried labor shortages in sectors they saw as key for the nation's industrialization throughout the late nineteenth and early twentieth centuries.²⁶² As I will discuss in later chapters, mine owners regularly experienced labor shortages, and changes in productive sectors of the highland economy during the Liberal Party years only aggravated the situation. Railroad builders faced similar challenges in recruiting, maintaining, and disciplining a workforce.²⁶³ While some

²⁶¹ The published accounts of the Arica – La Paz Railroad do not document labor disruptions on the line, though the north of Chilean territory was a hotbed of labor disputes in nitrate mining throughout the years that this line was under construction. See: Sergio González Miranda, Ofrenda a Una Masacre (Santiago, Chile: LOM Ediciones, 2007); Julio Pinto Vallejos, Desgarros y utopías en la pampa salitrera: la consolidación de la identidad obrera en tiempos de la cuestión social (1890-1923) (Chile: LOM Ediciones, 2007). Other researchers have documented the competition for workers in the altiplano during this frenzy of construction. See: Manuel Contreras, "Mano de Obra En La Minería Estañifera de Principios Del Siglo, 1900-1925," Historia y Cultura, no. 8 (1985).

²⁶² Rodríguez Ostria, *Capitalismo, modernización y resistencia popular 1825-1952*; Langer, "The Barriers to Proletarianization: Bolivian Mine Labour, 1826–1918"; Aramayo, *Proyecto de una nueva vía de comunicación entre Bolivia i el Océano Pacífico*. Builders of the Arica – La Paz Railroad also reported shortages of workers once they began building from Viacha westward. Manuel Ossa, a builder proposing to take over the construction of the line during the stall in construction, presented a plan to recruit over 500 Italian workers to help build the line. However, his efforts were not successful and the contract was eventually granted to another builder, Jackson, in 1909. It remains unclear whether he was recruiting those workers from Argentina or from abroad, and whether part of this plan was incorporated into Jackson's project. See: *El Diario*, 7 de noviembre, 1908, "El Ferrocarril a La Paz."

²⁶³ The numbers of workers each month employed on many projects, even smaller ones, ranged from 1000 to over 2000. The Potosí line, a relatively small one, appears to have regularly employed more than a 1000 workers each month. However, how many days each worker labored on the project, or whether they were simply occasional day laborers remains unclear. Large fluctuations in the number of workers throughout the year might signal a relationship between day laborers obligations in other areas, for example during agricultural cycles. See *El Comercio*, 21 de septiembre, 1912. Work on the Cochabamba line appears to have employed a similar number of workers, at least during 1912 when the companies were attempting to repair sections of the construction that had been damaged. *El Comercio*, 9 de octubre de 1912, *El Comercio*, 20 de octubre, 1912, *El Comercio*, 23 de octubre de 1912.

workers from other nations participated in the construction of railroads within Bolivia, Ministers reported to Congress that highland indigenous workers from the communities of the altiplano comprised the majority of workers on the projects, at least as non-specialized labor.²⁶⁴ Historian Robert Smale has documented some labor unrest among small groups of foreign workers brought in to work on the Oruro – Cochabamba Line, and certainly there must have been other foreign workers, especially Chilean ones working on the Arica – La Paz Railroad and Argentinians on the southern railroads around Atocha.²⁶⁵ And, Chilean authorities in Arica and Tacna described the workforce building the line out of the port as being comprised of men from the region– a mix of nationalities quite similar to those working in the nitrate mines near the coast.²⁶⁶ However, correspondence between Rankin Johnson, his employers, other managers on railroad projects in Bolivia, and the reports of Bolivian Ministers and Municipal authorities, state that Aymara and Quechua speaking men from communities constituted the majority of workers hauling earth and opening the

²⁶⁴ Large-scale industrial projects across the continent took in immigrant workers. In A. Kim Clark's description of the construction of the Railroad in Ecuador she discusses the use of Jamaican immigrant labor on the construction of the Ecuadorian railroad. In the Bolivian case however, attempts to bring in workers were discussed as only promises and the workers that actually arrived were described as local. See: See: *El Diario*, 7 de noviembre, 1908, "El Ferrocarril a La Paz" and Clark, *The Redemptive Work*.

²⁶⁵ Smale documents threats of strikes on the Bolivian Railway Company lines in Oruro (as discussed by Departmental authorities), and Bolivian ministers also report the deportation of a few foreign workers from Tupiza for labor agitation. The Bolivian Railway Company and the Prefecture of La Paz both focus on the recruitment of Aymara men for earthworks and basic labor on the railroad. Further details about the composition of the workforce and the recruitment and presence of foreign workers would be an important question for further research, especially given the accusations of agitation and early attempts at labor organization. Robert L. Smale, "*I Sweat the Flavor of Tin*": *Labor Activism in Early Twentieth-Century Bolivia* (University of Pittsburgh Pre, 2010). Also See: *El Diario*, 7 de noviembre, 1908, "El Ferrocarril a La Paz."

²⁶⁶ Labor in the industries on the coastline were described as being principally comprised of workers from Peru, Bolivia, and Chile. González Miranda, *Ofrenda a Una Masacre*.

paths for the new railroads of the altiplano.²⁶⁷ Hopes that immigrant workers would build Bolivian railroads appear to have come to little. Newspapers would later suggest that foreign workers would come to work in large numbers in the nation's industries after the railroads were built, not for their construction.²⁶⁸

Documentation of railroad companies hiring practices have been only partially preserved, and the work regimes used on these projects are mostly discernible through descriptions in newspapers, municipal and court records, the prefecture of La Paz, as well as the limited documents of Rankin Johnson. No labor records from the construction of the principal line from Arica to La Paz appear in the archives in La Paz, Tarapacá, or Santiago, Chile. Yet, other sources fill in some of these gaps and give a good idea of the problems that arose during the construction of this and other nearby lines. The construction of the Corocoro Branch of the Arica – La Paz Railroad was particularly well-documented, and sources from the Bolivian Ministry of Public Works provide ample evidence of constant state intervention in the provision of labor to construction projects.²⁶⁹

²⁶⁷ Thomas F. O'Brien, *The Revolutionary Mission: American Enterprise in Latin America, 1900-1945* (Cambridge University Press, 1999); González Miranda, *Ofrenda a Una Masacre*; Pinto Vallejos, *Desgarros y utopías en la pampa salitrera: la consolidación de la identidad obrera en tiempos de la cuestión social (1890-1923)*; Sergio González Miranda, *Hombres y mujeres de la Pampa: Tarapacá en el ciclo del salitre* (LOM Ediciones, 2002); Juan Albarracín Millán, *El Poder Minero* (La Paz: AKAPANA, 1972).

 ²⁶⁸ El Comercio, 8 de marzo, 1912, "Ferrocarril Arica – La Paz. Hay que estar prevenidos."
 ²⁶⁹ Carlos Tejada Sorzano, *Ramal a Corocoro. Informe Del Inginiero C. Tejada Sorzano. Publicación Oficial. Dirección de Obras, Sección Ferrocarriles.* (La Paz, Bolivia: Imprenta Artística, 1913).

Labor recruitment for railroads:

Enganche systems of labor recruitment were widespread in the Andes throughout this time period and worked to recruit peasants with continued access to land – and therefore less need to enter into dependent wage-labor relationships – as contract workers on projects, especially in mining, roads, and railroads.²⁷⁰ This coercive system of labor recruitment, which can be roughly translated as "hooking in" a worker, often entailed the advancement of a good portion of a worker's wages in order to entice them to work, while the debt aimed to ensure they stayed the duration of the contract or beyond. Moreover, this system placed many of the costs of maintaining a labor force and bringing it to worksites on the workers themselves, effectively removing many responsibilities from employers.

However, this system was not always ideal for employers simply because, in certain situations, it may have been hard to enforce worker cooperation. Thomas O'Brien characterizes the use of *enganche* in some parts of Peru as less than ideal at the end of the nineteenth century:

At best, *enganche* constituted an expensive and inefficient method of labor control. Highland merchants who served as labor recruiters, or *enganchadores*, required advance payment of the loans made to peasants. Peasant resistance contributed substantially to the expense and inefficiency of *enganche*. Workers who fled before competing their contracts or who challenged the agreements in the courts became a growing problem for the Peruvian elite by the end of the century.²⁷¹

²⁷⁰ O'Brien, The Revolutionary Mission; Contreras, Mineros and Campesinos En Los Andes. Mercado Laboral y Economia Campesina En La Sierra Central Siglo XIX., 1988; Manuel Contreras, Tecnología Moderna En Los Andes: Minería e Ingeniería En Bolivia En El Siglo XX. La Paz: (La Paz: Biblioteca Minera Boliviana, 1994); Contreras, "El Desarrollo Del Transporte En Bolivia, Una Aproximación Al Impacto Económico y Social de Los Ferrocarriles y Carreteras 1900-2015."

²⁷¹ O'Brien, *The Revolutionary Mission*, 113.

Resistance, flight, and the use of legal systems to dispute the claims of *enganchadores* made the system less efficient or effective for employers than it might have been otherwise.

Some evidence exists that enganche was used in Pacajes during this period of railroad construction. In one particular case dealing with the repercussions of the enganche system in the Corocoro municipal records, a family approached the town government and asked for the exhumation of their family member who had died while visiting them.²⁷² The family wanted the municipality to produce an official death certificate in order to force the enganchador to stop pressing them for the repayment of debts. Just as O'Brien described for the Peruvian context, the labor recruiter who came after the worker in Corocoro appears to have had a system worked out to prevent his charges from disappearing and local authorities' reacted quickly with what also appeared to be an effective response.²⁷³

However, unlike the results of O'Brien's research of the dynamics in southern Peru, court cases or legal conflicts do not appear to have been that common in the regions surrounding the construction of the Arica – La Paz Railroad, even though researchers have identified the successful use enganche during this same time period in some Bolivian mining districts.²⁷⁴ In this one documented incident, no details are given about where the

²⁷² Box 19 (1907), Juzgado de Pacajes, ALP.

²⁷³ This was effective for the family of the deceased. The production of a certified death certificate appears to have liberated the family from the contracted worker's debts.

²⁷⁴ While O'Brien describes the use of enganche and the problems stemming from it as being regularly documented in the courts and judicial records in Peru, cases do not appear to have been that common in the Department of La Paz or in the Pacajes court system. The tactic was used in other mining regions in Bolivia. Contreras, *Tecnología Moderna En Los Andes: Minería e Ingeniería En Bolivia En El Siglo XX. La Paz:*; Contreras, "Mano de Obra En La Minería Estañifera de Principios Del Siglo, 1900-1925."

man was employed, opening the possibility that he had been employed in nitrate production and not on railroad construction.²⁷⁵ Either way, conflicts stemming from enganche contracts do not appear to be plentiful in the archives examined for this study. This makes determining the extent to which industries relied on the system to recruit and retain labor difficult to determine. However, the regular use of enganche systems for road, railroad, and mining work in Peru and other parts of Bolivia, and at nitrate operations in Tarapacá and Atacama, indicate that is highly probably it was used for the construction of the Arica – La Paz Railroad.

Enganche was not the only way to coerce workers into building the railroad. Rankin Johnson's communication with others involved in the construction of the Bolivian Railway Company's network, refer to the 'delivery' of workers to railroad construction sites by local government officials from other parts of the altiplano. In 1909, while trying to sort out the mess created by the South American Construction Company on the construction of the Oruro – La Paz rail line, Johnson wrote to the treasurer of the company regarding an outstanding legal claim.²⁷⁶ The company successfully sued the sub-prefect of Omasuyuos for failing to provide the workers he had been paid to bring to the construction project. The Ministry of Hacienda was occupied with a similar lawsuit around the same time over state authorities' failure to provide the promised number of workers for a road

²⁷⁵ González Miranda, Ofrenda a Una Masacre; González Miranda, Hombres y mujeres de la Pampa: Tarapacá en el ciclo del salitre; Pinto Vallejos, Desgarros y utopías en la pampa salitrera: la consolidación de la identidad obrera en tiempos de la cuestión social (1890-1923).
²⁷⁶ Box 2, Folder 2. . Rankin Johnson Papers 1895-1910, AIS.1965.01, Archives Services Center, University of Pittsburgh

construction project in the Department of Oruro.²⁷⁷ In the South American Construction Company case, the claimant argued that the sub-prefect of Omasuyos had contracted with the builder to provide workers to the company, and that the company had fulfilled its part of the contract by paying that official for each worker that he was supposed to have brought to them. The sub-prefect had simply not produced the workers.

Though labor contractors operating in the private sector may have recruited workers from around the altiplano through debt and the "enganche" system, Bolivian state officials actively acted as labor recruiters for the construction companies. Local authorities, mostly at the regional level, appear to have signed contracts with construction companies and were paid to use their positions to bring indigenous men from their provinces to work on railroads. While many of the details of how sub-prefects did this were not addressed in the legal conflicts that resulted from their failure to comply with the terms of the contracts they had signed, they do appear similar to enganche systems.

Day laborers from communities also traveled, apparently independently, to work for short periods of time on the construction of railroads. This flow of workers appears in the local archives only when something went very wrong. In one case, men from near Calacoto reported the death of a fellow community member and temporary railroad worker shortly after their return from a project just outside of Viacha (either the Arica – La Paz

²⁷⁷ This is a long-running dispute between Saturnina, viuda de Garrón, and the state, which is described in the correspondence of the Ministerio de Hacienda handling the payments to her from the court judgment. MH 1086, Ministerio de Hacienda, Correspondence Prefecturas, 1911, MH1086, p 37, 297. ABNB, Sucre.

Railroad or the line connecting La Paz to Oruro).²⁷⁸ During their slightly less than onemonth stint of working on the project as day laborers, the men describe regular mistreatment by supervisors that culminated in a brutal beating of the deceased man. His death, shortly after returning to his home, was deemed by the court to be the result of his mistreatment at the hands of the supervisor, and a homicide case was opened against the railroad construction supervisor.²⁷⁹

Despite the general scarcity of records addressing the construction process of the Arica – La Paz Railroad, the employment patterns and conflicts seen in the documentation for other projects in the Departments of Oruro and La Paz point to the use of multiple forms of labor recruitment and work regimes for the construction of railroads across the altiplano. State-recruited workers labored alongside groups of more permanent 'free' wage laborers, short-term day laborers, and likely next to others under enganche contracts. This mixture of coerced and free labor does not appear to have been all that exceptional in the history of these kinds of projects in the region, nor does the abysmal working conditions.

However, the direct involvement of local representatives of the state who 'gathered' workers for construction companies, and were then paid for it, does differ from many of the patterns discussed in other labor regimes in the region.²⁸⁰ A. Kim Clark

²⁷⁸ Box 19, Exp. 1. Juzgado de Pacajes, 1907. ALP, La Paz.

²⁷⁹ The outcome of this prosecution is unknown. Ibid.

²⁸⁰ The collection of the Prestación Vial may have been contracted out as well, by 1914 the Department of La Paz appears to have been accepting proposals for how to collect the tax across the province. In that call and subsequent publication and correspondence it appears that two things were happening. First, they argue specifically that no proposal should include collection of cash from indigenous men, because they would have to work. Second, it appears that the persons putting forth proposals, or laying out how much money they would bring in with the tax, may have been

describes similar activity in Ecuador in *The Redemptive Work*, though none of those descriptions appear to have been so overt and legalized the way they were in the Bolivian case.²⁸¹ The appropriation of indigenous labor by the state, which then sold it to private companies for a profit, was directly connected to a Liberal Party experiment at transforming the institution and tax known as the Prestación Vial.



Figure 2.6: Photo depicting terraplaining work on the Tupiza – Villazón Railroad. This was the precise kind of labor on railroads and road building that the Prestacion Vial workers were assigned to. In this case, the construction project used both the labor tax workers and wage laborers on all aspects of construction. (Photo from turn-of-the-century postcard).

sub-prefects. Tribunal Nacional de Cuentas, 10594, p 17 from the Boletín Departamental no445., and no 347 "Gastos", no 378 "Prestación Vial, Subprefecto Provincia Murillo." ABNB, Sucre. ²⁸¹ Clark, *The Redemptive Work*.

A Liberal Mita:

Spanish Colonial authorities focused many of their reforms in the Andes on the capture and control of indigenous labor. The Colonial mita for the mines of Potosi may be one of the best (worst) examples of this.²⁸² However, other mitas and forms of coerced labor existed throughout the Andes, and were often enforced by local authorities.²⁸³ After Independence, some of these regimes disappeared while others did not. The mita for mines in Potosi ceased to exist, but indigenous men were still required to provide their services, goods and time for the maintenance of mail networks (postillonaje), and to work on the maintenance of roads near their residences under the 'Prestación Vial.'²⁸⁴ This tradition, which entailed labor for the maintenance of roads was a widespread practice in many countries in the region and in some areas may have even been historically rooted in practices within indigenous communities. However, during the first decades of the twentieth century Bolivian politicians began to see the practice as a potential source of labor for their major infrastructure projects, and the reforms they passed fundamentally changed the nature of the obligation. Railroad builders who contracted with local

²⁸² Peter John Bakewell, *Miners of the Red Mountain: Indian Labor in Potosi, 1545-1650* (University of New Mexico Press, 1984); Ward Stavig, "Continuing the Bleeding of These Pueblos Will Shortly Make Them Cadavers: The Potosi Mita, Cultural Identity, and Communal Survival in Colonial Peru," *The Americas* 56, no. 4 (April 2000): 529–62; Bianca Premo, "From the Pockets of Women: The Gendering of the Mita, Migration and Tribute in Colonial Chucuito, Peru" *The Americas* 57, no. 1 (July 2000): 63–93.

²⁸³ Gabriela Sica, "Las Otras Mitas. Aproximaciones Al Estudio de La Mita de Plaza En La Jurisdicción de Jujuy, Gobernación de Tucumán, Siglo XVII," *Anuario de Estudios Americanos* 71, no. 1 (June 30, 2014): 201–26.

²⁸⁴ Choque Canqui, "La Servidumbre Indígena Andina de Bolivia"; Canqui and Albó, *Cinco siglos de historia*.

authorities may have been arranging for the use of at least some workers who were fulfilling those requirements.

The Prestación Vial law passed in 1880 created a legal 'tax' formalizing this tradition and required all male nationals between 18 and 40 years of age, regardless of origin, to either work, provide a substitute, or pay a fixed sum for the maintenance of roads.²⁸⁵ It would continue to exist in some form throughout nearly the entirety of the twentieth century in Bolivia. Throughout its more than one hundred years of official existence as a national law in Bolivia, the tax took on many different forms, and the changes in the law during the years of Liberal Party governments can be dizzying to follow. In its original form the tax provided different avenues to fulfill the requirement and supposedly left the option to do either open to all men, regardless of their origin or residence. The option to pay was supposed to be open to any man who, because of the exigencies of his profession or any other reason, could not take leave for the two days of work. Money and labor raised by the Prestación Vial was originally not to be used for any purpose other than road repair and construction.²⁸⁶ However, regardless of the legal

²⁸⁵ The use of indigenous labor for the maintenance or rural roads, even the organization of this work amongst communities must have pre-existed the passage of this law. Ley de 16 de octubre de 1880. Lexivox. https://www.lexivox.org/norms/BO-L-18801016-4.xhtml and Bolivia Ministerio de Instrucción Pública y Fomento, "Ley y Reglamento sobre prestacion vial y servicio de postas," 1897.

²⁸⁶ The language of the reforms of the law include sanctions for anyone, especially any local authority, who tried to use the men working on the prestación vial for purposes other than work on roads. Though not explicitly laid out in the texts, other publications from the time period indicate that these clauses may have been aimed at local landowners who tried to force workers to labor on the haciendas. See: *Fomento; Bolivia Ministerio de Fomento e Instrucción Pública, "Prestación vial : Ley de 17 de diciembre de 1901 y decreto reglamentario de 10 de abril de 1902.,"* 1902; *Bolivia Ministerio de Gobierno y Fomento, "Prestación vial ley de 9 de diembre de 1905 y decreto reglamentario de 19 de enero de 1906.,"* 1906.

terminology, in practice the Prestación Vial was a coercive and unequal obligation placed on residents of rural areas and indigenous communities. Though the legal codes may have sometimes embraced language that did not explicitly differentiate between the rights and obligations of indigenous and non-indigenous men, the implementation of the law effectively reproduced colonial hierarchies and practices.

During the first twenty years after the passage of the 1880 law, it was managed at the local level, paid either in cash or work, and often used to advance private interests by obliging men to work on haciendas and not on road maintenance outside of private properties. Most importantly, it was unequally implemented depending on the region and on the local authorities in charge.²⁸⁷ The Liberal Party worked to change this very early on in their governments by creating a national entity for its organization and planning.²⁸⁸ The Liberal Party redirected the Prestación Vial workforce and the money it raised to their national infrastructure priorities. They pushed municipalities to plan as they hadn't before. In 1900, the municipal government in Corocoro found itself scrambling to find "important public works" to which they could assign the laborers and contributions in the coming

²⁸⁷ For examples of the reported abuses of the prestacion vial, and the arguments in favor of it, see: El Comercio, 14 de abril, 1912, "Por la clase indigena," and the suggestions repeated by Tejada Sorzano in his report on the advance of the construction of the Ramal to Corocoro. Tejada Sorzano, *Ramal a Corocoro. Informe Del Inginiero C. Tejada Sorzano. Publicación Oficial. Dirección de Obras, Sección Ferrocarriles.*

²⁸⁸ The Liberal Party pushed for the centralization of planning for the prestacion vial first through the formation of local juntas or commissions that would formalize the registry of men in the region to be drafted or charged, and then create a local planning committee to centralize the work on roads. Of particular concern in the application of the reforms was the lack of complete registries of potential workers in rural areas, something which had either not been done or was not shared with other parts of the government. By Montes' first presidency, the prestacion vial from certain provinces was being directly assigned to specific projects through the passage of national laws in the congress. See for example: Ley de 6 de octubre de 1892, Ley 9 de enero de 1900, Ley 14 de enero de 1900, Ley 17 de diciembre de 1901, Ley 2 de diciembre de 1904, Ley 9 de diciembre de 1905, and Ley de 23 de noviembre de 1909, Ley de 23 de septiembre de 1915.

years, and they were admonished by national authorities for not being in full compliance with their responsibilities as outlined by the new Congress. ²⁸⁹ Those plans were then supposed to be submitted to national authorities, who would either approve or override them and assign the labor and funding to other projects.

The Liberal Party's reforms aimed to raise as much money and as large a workforce as possible. They gradually worked to try and balance the potential funds that could be raised in urban areas with the large workforce they could harness in rural ones.²⁹⁰ They tried to prohibit local authorities from requiring indigenous men to pay cash, and pushed local authorities to recruit labor from rural indigenous communities.²⁹¹ Under Liberal Party leadership, the upper age limit for the tax rose to 60, the distinctions between who should work and who should pay were supposedly clarified as the national government tried to standardize the creation of Prestación Vial registries throughout the country. In those first years of Liberal Party governments, over twenty years after the original law's passage, many regions lacked systematic registries for the tax and the national government did not

²⁸⁹ Box 33, Alcadia de Corocoro. ALP.

²⁹⁰ Debates during President Ismael Montes' first term point to the complexity of this balance. Initial reforms had eliminated the possibility of paying the obligation. However, municipal authorities in urban centers like Cochabamba quickly responded that this move would produce an excess of workers in places where little needed to be done and shortages in areas where much was required (and it eliminated funding that might have been used to compensate). Legislators backtracked and returned to the two-option system. See: Ministerio de Gobierno, *Memoria que presenta el Ministro de Gobierno Doctor Anibal Capriles ante el Congreso Ordinario en 1907* (Bolivia: Imprenta Artística, 1907); Fomento, "Prestación vial ley de 9 de diembre de 1905 y decreto reglamentario de 19 de enero de 1906."

²⁹¹ Some local authorities preferred to charge cash, because it ensured that would not be held accountable for the repayment of the value of the 'boletos' they received each year. See: Tribunal Nacional de Cuentas, 1914, Number 347, ABNB, Sucre. For examples of complaints about subprefects collecting money instead of forcing residents to work, see: Fondo Prefectura de La Paz, Administracion (Ferrocarriles), Box 286, Correspondence 1912-1920, ALP, La Paz.

have a full accounting of those that did exist.²⁹² The decentralized administration had facilitated the arbitrary assignment and enforcement of the law and left the power to exploit it in the hands of local officials. By 1913, the law punished local authorities who tried to only collect cash instead of organizing work for projects or those who required indigenous men to pay for substitutes. Liberal reforms worked to set a standard of requiring indigenous men to labor on the Prestación Vial and permit urban residents to pay.²⁹³ While the practice had always entailed exploitation in rural areas, the increasingly regulated form of the tax began to look like a mini-mita for Liberal Party infrastructure projects. Under the Liberal Party governments, the ambiguity between the requirements of work placed on indigenous men and the payment of cash demanded from creole and cholo men disappeared; indigenous men were supposed to work.

However, in places like Corocoro the national reforms that worked towards an indigenous/ non-indigenous division of these requirements did not fully resolve the question of who should pay the tax and who should work. The question in Corocoro was whether working in the mines or another industry exempted a man from an indigenous community from working and enabled them to pay. With mining interests in the town steering the debate, the town effectively re-categorized the identity of mineworkers for tax

²⁹² For example, procedures for the formation of registers of potential workers and tax payers were demanded in laws like Ley 9 de diciembre de 1904.

²⁹³ The Law specifically stated: "En ningún caso la raza indígena está obligada a pagar la prestación vial en efectivo, debiendo prestar sus servicios, ya sea personalmente o mediante sustitutos...." See: Ley 29 de noviembre de 1913, https://www.lexivox.org/norms/BO-L-19131129-14.xhtml. By 1914, the government bulletin clarified that indigenous men were exempt from the option of paying, and should work. Tribunal Nacional de Cuentas, NC10594, Boletín Departamental número 445, 1914, ABNB, Sucre.

purposes regardless of their origins.²⁹⁴ Municipal authorities appear to have agreed that men working in the mining industry at the time the tax was charged should be able to pay and not work (something that pleased mine owners), and that any agricultural worker should work and not pay (something that did not please hacendados).²⁹⁵ These decisions echoed debates from the Colonial Period over who had to work the mita and who didn't, as well as those surrounding who bore the burden of tribute throughout the nineteenth century. Local officials in Corocoro, while bowing to mining interests and not hacendados, reinforced the association between rural life and agricultural activity and the definition of indigeneity.

The Liberal Party engaged in these reforms because they wanted to use the Prestación Vial in the altiplano as a way to resolve the shortage of workers on certain kinds of modernizing infrastructure projects. The Liberal Party-led Congress rented Prestación Vial workers to private contractors building roads and railroads across the country. Previous practices had limited the distance that workers fulfilling the tax could be required to travel, but by the time the Arica – La Paz Railroad was under construction, the Liberal Party had already begun experimenting with changes to those rules that as well.²⁹⁶

²⁹⁴ Box 33, 1900-1904, Alcaldía de Corocoro, ALP, La Paz.

²⁹⁵ Ibid. The collection of the tax and time period for work on roads, both occurred at predetermined points during the year. Men from indigenous communities who were working in the mines at the time of collection do not appear to have had to work. Likewise, men who were in their communities had to work, regardless of whether they had worked in the mines previously. Mining companies ensured that they did not lose workers even a day.

²⁹⁶ The usual limitations on travel kept the distance around three leguas. Fomento, "Prestación vial ley de 9 de diembre de 1905 y decreto reglamentario de 19 de enero de 1906." And, the Ley 29 de noviembre de 1913.

Officials at the national level saw the construction of the Corocoro Branch of the Arica – La Paz Railroad as a test case for many things, including the use of the Prestación Vial for railroad construction. Planning for the main railroad from the coast had left the construction of the branches directly into certain mines and towns to be the responsibility of others. After evaluating proposals from private companies, the Bolivian government decided to build the branch to Corocoro on its own.²⁹⁷ The 10 km stretch of railroad was the first to be entirely planned, built, maintained, and then operated by the state.²⁹⁸ The Ministry of Public Works took over all aspects the project, and decided that the state would employ the Prestación Vial for all of the earthworks during the construction.²⁹⁹

Building the Corocoro Branch:

Looking at the history of delayed and troubled construction projects, many of which were scrapped because of financing problems and doubts of international financiers, the Minister of Public Works, Carlos Tejada Sorzano and others within the Liberal Party began to wonder if there was another way for Bolivia to achieve the goal of a national rail network. For the Minister, the use of the Prestación Vial in the project was not a minor detail, but rather an important part of the answer to how Bolivia could begin to modernize

²⁹⁷ For the mine of Tacora, the mine owners, the Vacarro Hmnos, a commercial enterprise in Tacna, paid for the construction of the branch to their mine.

²⁹⁸ Construction of the Guaqui – La Paz Railroad had been done with public funds but the rail line was not constructed by the government like the Corocoro Branch. It was also quickly rented out to be operated by a private company. See: *Proyecto para la construcción de ferrocarriles presentado al Señor Ministro de Fomento e Instrucción Pública, Dr. Andrés Muñoz por el Director General de Obras Públicas*. (Bolivia: Imprenta y Litografía Boliviana, 1903). Pamphlet M348 VI, ABNB; And, *Contrato de Arrendamiento con la Peruviana Corporación Limitada*. (Bolivia: Imprenta y Litografía Boliviana, 1904). Pamphlet M348VII, ABNB.

²⁹⁹ The construction project also employed more specialized labor, but because of the importance of the 'experiment' in using the prestacion vial for this kind of work, Tejada Sorzano and others emphasized this.

its transportation networks.³⁰⁰ Tejada Sorzano saw the entire project, from recruiting the Prestación Vial to employing the Ministry on the engineering aspects of construction, to running the train, as a step towards reducing costs and enabling national sovereignty.³⁰¹

To build the line, Congress allocated the workers fulfilling this labor tax obligation from various parts of Pacajes to the construction of the Branch via two laws.³⁰² The national government stepped over local management of the Prestación Vial and said that all of the funds and laborers for a period of 4 years from a large portion of the province of Pacajes, would go to the construction of the Corocoro Branch of the railroad and not to any local project or local authority. National officials overrode local ones on this issue and it appeared to have worked. Unlike other instances where the Prestación workforce failed to show up for large-scale infrastructure projects, this time they showed up in larger numbers than expected.³⁰³

Between mid-1912 to the start of 1913, roughly a quarter of the male residents of indigenous communities from the entire province Pacajes migrated to the Corocoro area to

³⁰⁰ Tejada Sorzano, *Ramal a Corocoro. Informe Del Inginiero C. Tejada Sorzano. Publicación Oficial. Dirección de Obras, Sección Ferrocarriles.*

³⁰¹ The government initially took proposals from private contractors to build the line. All of the proposals from private companies foresaw use of prestacion vial labor in part of their project, and included it in their budgets. They proposed paying the state per Prestacion worker the state provided. However, Tejada Sorzano pointed out that the contractors could easily have rejected the workers based on their own criteria and refused to pay the state. This part of his report raises questions about how common a practice this was, and whether the private contractors also had an interest in rejecting prestacion vial workers. Tejada Sorzano.

³⁰² Ley de 23 de noviembre de 1909 and Ley de 17 de octubre de 1911 (Gaceta de Gobierno). https://www.lexivox.org/norms/BO-L-19091123.xhtml

³⁰³ The idea of using the prestacion vial for major projects was not entirely new, although the scale of the project in Corocoro was unique. Some examples of previous allocations of the labor force for infrastructure including private companies include: https://www.lexivox.org/norms/BO-L-19061205-8.xhtml https://www.lexivox.org/norms/BO-L-19100106-1.xhtml https://www.lexivox.org/norms/BO-L-19121217 xhtml

https://www.lexivox.org/norms/BO-L-19121217.xhtml

work on the major earthworks for this branch of the Arica - La Paz Railroad.³⁰⁴ These men labored in exchange for minimal payment, a small bag of coca leaves, and a piece of paper: *boletos* that were proof of their fulfillment of the Prestación Vial requirement.³⁰⁵ Their labor cost the state basically nothing.³⁰⁶

The description of the day to day management of labor on the Corocoro branch suggests that this level of participation would have been impossible without some degree of coordination and participation among the indigenous men, especially in the organization of the timing of their arrival.³⁰⁷ Tejada Sorzano did not explicitly state that community leaders were involved in the organization of the work, although he detailed coordinated travel to and from the worksite, described the organization of groups of about 50 workers, many from the same community, and their work with supervisors some of whom were known to them.³⁰⁸ These supervisors were responsible for ensuring that no tools or

³⁰⁴ This is an estimation, and possibly a low one. The total number of workers who participated exceeded 6400, and the total indigenous male population of Pacajes between the ages of 18 and 99 registered in the 1900 Census was around 25,000. However, that population estimate included the totals from the entire province in 1900, which was much more extensive than the area around the construction of the railroad.Gamarra, *Censo General de La Población de La República de Bolivia Según El Empadronamiento de 10. de Septiembre de 1900.*, 1902; Tejada Sorzano, *Ramal a Corocoro. Informe Del Inginiero C. Tejada Sorzano. Publicación Oficial. Dirección de Obras, Sección Ferrocarriles.*

³⁰⁵ They received roughly 80 cents for 4 days work and bags of coca each day. Tejada Sorzano, *Ramal a Corocoro. Informe Del Inginiero C. Tejada Sorzano. Publicación Oficial. Dirección de Obras, Sección Ferrocarriles.*

³⁰⁶ Tejada Sorzano estimated that the cost of earthworks completed by the prestacion vial on the Corocoro Branch wound up being Bs 12, 253 in comparison to the roughly Bs 66000 estimated by the lowest bid from a private contractor. This included the full wages they paid to workers to complete the last kms, which they finished entirely with wage labor due to the specialized nature of the work.Tejada Sorzano.

 ³⁰⁷ In particular, the total failure of later attempts to use a similar formula in places where community leaders resisted tells us that some degree of participation was most likely involved.
 ³⁰⁸ Tejada Sorzano, *Ramal a Corocoro. Informe Del Inginiero C. Tejada Sorzano. Publicación Oficial. Dirección de Obras, Sección Ferrocarriles.*

equipment went missing, and Tejada Sorzano specifically celebrated the success of this system. He stated that workers who got sick and had to go home, all returned to finish their obligations.³⁰⁹ The workers ate, slept, and worked side by side with members of their own and neighboring communities, and returned to their communities in groups as well. This pattern of work (group migration and lodging, collective scheduling of travel and workdays) resembled the descriptions of how indigenous workers engaged in day laborer arrangements on other projects. Day to day work on the Corocoro branch appeared to resemble the wage work of indigenous men in other places – except for the pay.

Though the men who labored to fulfill the Prestación Vial requirements on this railroad branch came from all over Pacajes, patterns in the origins of workers point to the political implications of the project. Virtually no workers came from some of the largest haciendas in the region (Comanche or those near Nazacara) indicating the hacendados either negotiated their non-attendance, turned a blind eye to worker evasion of the call, or resisted the state on this issue.³¹⁰ This also points to the influence of hacendados, or their power, over those living within and working on their properties. The communities immediately surrounding the rail line had the highest levels of turnout, something expected given that laws authorizing the project had specified that those communities were obliged to fulfill their requirement on that construction project. However, nearly 2500 workers

³⁰⁹ Had these workers not returned, they would not have received boletos or tickets proving their completion of any of the days of the prestacion vial. Tejada Sorzano.

³¹⁰ Comanche and the communities within the territorial claims of the hacienda registered zero workers on the project, even though the hacienda was a major beneficiary of the railroad and the hacienda's quarry contributed much of the stone used in the construction. Nazacara and the haciendas in that region sent only 5 men to work during the duration of the project. See: Tejada Sorzano.

came from farther north (and even from the newly created province of Ingavi), and the numerous indigenous communities surrounding Jesus and Santiago de Machaca, with additional workers coming from the western regions of Pacajes, from Achiri and Berenguela. These particular groups of men from indigenous communities were under no legal obligation to work on this project.



Figure 2.7: Photo of the large hacienda "Comanche" in Pacajes. No workers from this hacienda, located very near to Corocoro, participated as Prestacion Vial laborers on the construction of the branch into the mining town (Photographed by author in 2012).

Tejada Sorzano declared the project a success and said that this level of participation indicated the potential to use the Prestación Vial for future railroad projects. He pointed out that this presented an advantage for the national government by providing a cheap workforce for large projects, but also reduced local abuses of the tax. Tejada wrote that the high level of participation in Pacajes during the Corocoro Branch construction made "one think of the abuses and demands that rural authorities commit with the Indians in the name of the Prestación Vial."³¹¹ He appeared to connect the surprising turnout for the Corocoro Branch's construction to a desire on the part of indigenous men to get out from under the demands of local authorities, though he did not reflect on the how the national government's plan constituted abuse as well.

Tejada recognized some problems that had arisen in the construction process, mentioning that men did not work as hard, or as well, while they were fulfilling their worktax obligations in comparison to how they worked as fully paid workers. He referred to this as a kind of soft resistance on the part of workers, whom he described as working slowly and exerting the least energy possible while working for their boleto. He mentioned difficulties in recruiting and maintaining more specialized laborers for the sections of the project that required them. His comparison of the quality of indigenous men's work when fulfilling the tax versus working as paid laborers implied that at least part of the wage labor workforce on the project included men who were also required to fulfill the Prestación

³¹¹ Original quote in Spanish: "… hace pensar en la serie de abusos y exacciones que las autoridades rurales cometen con los indios por motivo de la prestación vial." Tejada Sorzano, 11. Reports and opinions about the abuse of indigenous communities by local authorities across the country were authored by supporters of the Liberal government as arguments in favor of national control of the prestacion vial as well as the implementation of universal conscription and military service. The idea expressed by Liberals suggested that recruiting indigenous men into these national programs would enable them to get out from under the yoke of local officials who wanted to maintain colonial relations. See: *El Diario*, 22 de diciembre, 1908, "Notas Militares, en favor de la raza indígena, por Ismael Montes," and *El Diario*, 23 de diciembre, 1908, "En favor de la raza indígena."

Vial. Nevertheless, he saw the experiment with the Corocoro Branch as proof that the obligation could potentially provide massive numbers of workers for major infrastructure projects in the future.

Mining companies within Corocoro took note of this massive participation in the construction of the Corocoro Branch of the railroad. By early 1913, at least one mine owner took the Liberal Party project of creating an infrastructure mini-mita to its seeming logical colonialist extension, given the precedent of the Potosi mita. If indigenous men could be forced by the law to build a railroad, why not force them to work in the mines? The manager of the Cia Corocoro de Bolivia wrote to the newspaper El Comercio that worker shortages in the mining sector had become such a worry for all mining companies it was now a problem to be addressed by the national government. The success of the construction of the railroad had made mine owners "think about the enormous abundance of Indian workers in the altiplano and the great shortage of mineworkers seen in all the mines of Bolivia."³¹² He argued that since achieving the level of participation in the railroad project had not required much effort, due to what he called the "submissive" temperament of the population and their willingness to obey the law, there should be no problem getting them to work in the mining sector. Studies of the Corocoro mines published by Gustavo Rodriguez Ostria and Teodoro Salluco Sirpa present ample evidence

³¹² Original quote: "…hemos pensado en la enorme abundancia de operarios indios en la altiplanicie y en la gran escasez de mineros que se hace sentir en todas las minas de Bolivia." *El Comercio*, 11 de enero, 1913. Salluco Sirpa, *La explotación del cobre en el distrito minero de Corocoro a principios del siglo XX*, 1900-1930.

that this characterization of those workers as docile was incorrect.³¹³ However, that manager argued that indigenous men in the area were already accustomed to working in the mines, something seen in the fact that "during years of drought, the mining population of Corocoro increases considerably" as the "hungry Indians see the need to turn to mine work to eat."³¹⁴ He argued that drought in the countryside meant more workers and increased production of minerals in Corocoro. Wages in Bolivian mines were low, and in Corocoro even lower than average, and the government stood to benefit from the increased production and growth of the town. The companies in Corocoro urged the government to consider laws that would require indigenous men to work in the mines – a new mita.

The use of these laborers for the construction of the Corocoro Branch of the Arica – La Paz made the Liberal Party goal of using the Prestación Vial in this way suddenly seem viable. It also made others aware of the possibility of applying the same or similar laws to the mining sector. In the midst of debates about modernity and liberal development, these groups looked to colonial practices that had used the state to force indigenous men to labor in key industries. Though the proposal to create a state-organized form of coerced labor for the mining sector may not have been turned into law, both mine owners and Liberal Party leaders understood that having enough workers for their development goals in the altiplano required limiting the ability of indigenous men to move between places and jobs, or to

 ³¹³ Rodríguez Ostria, *Capitalismo, modernización y resistencia popular 1825-1952*; Salluco Sirpa, *La explotación del cobre en el distrito minero de Corocoro a principios del siglo XX, 1900-1930*.
 ³¹⁴ Original quote: "La preparación del indio para los trabajos mineros no sería obra de romanos. Durante los años de sequía, la población minera de Corocoro aumenta considerablemente; los indios hambrientos se ven la necesidad de recurrir al trabajo de las minas para ganar el pan, y la producción de estas crece en forma notable." *El Comercio*, 11 de enero, 1913 and Salluco Sirpa, *La explotación del cobre en el distrito minero de Corocoro a principios del siglo XX, 1900-1930*.

survive by their own forms of production. Despite the Corocoro mine owner's depiction of indigenous workers as pliable, or submissive and willing to comply with any legal obligation, the consideration of laws that would have imposed state obligations to work hinted that they, along with others in government, knew that the agency of indigenous men needed to be reduced if they wanted to force men into the forms of employment and work central to their goals.

The Liberal governments tried to reproduce the Corocoro model and use of the law extensively on other projects, and it was mostly unsuccessful. The Prestación was used extensively on major road projects and on the construction of barriers along rivers. In the few years after the construction of the Corocoro Branch, the Congress approved the use of the Prestación Vial for the construction of sections of the La Paz – Yungas Railroad, another attempt by the state to build a railroad itself. They wanted to use those laborers for the most back-breaking earthworks on the steep slopes into the valleys to the east of La Paz.³¹⁵ Liberals and other future governments in the decades that followed (the Republican Party governments as well), continued to assign the workforce to private contractors who would build roads for automobiles, pave plazas, construct telegraph lines and more.³¹⁶

³¹⁵ See: https://www.lexivox.org/norms/BO-L-19141117.xhtml and Fondo Prefectura de La Paz, Administración (Ferrocarriles), Box 286, Correspondence 1912-1920, ALP, La Paz.
 ³¹⁶ See examples: https://www.lexivox.org/norms/BO-L-19311201-2.xhtml

https://www.lexivox.org/norms/BO-L-19251030-2.xhtml https://www.lexivox.org/norms/BO-L-19251126.xhtml https://www.lexivox.org/norms/BO-L-19171213-4.xhtml https://www.lexivox.org/norms/BO-L-19161214-2.xhtml https://www.lexivox.org/norms/BO-L-19151028-1.xhtml The state also provided, either for a fee per worker that was paid by the company or for free, the prestacion vial workforce to private companies who were building roads and then running services on them. For an example see: https://www.lexivox.org/norms/BO-L-19111123-4.xhtml

However, most of these attempts to replicate the turnout in Pacajes didn't work as they had in 1912 and 1913. Prestación workers did not show up in large numbers or appeared at inopportune periods of the construction process, at the times that were convenient to the calendars of production in indigenous communities.³¹⁷ These patterns of movement and their timing of them did not meet the increasing need for a permanent workforce. Moreover, in some areas indigenous men continued to procure boletos through other means, either from local officials who continued to accept payments or from others who required them to work on their haciendas or smaller projects while ignoring the requests of national officials.³¹⁸

The use of the Prestación Vial for these major projects stirred debates between local officials, hacendados, and others who held ideas very much like Saavedra's about the transformative power of 'work,' and especially industrial labor, for indigenous men. During the years surrounding the construction of the Corocoro Branch and other railroads in and around the Department of La Paz, reporters and writers in *El Comercio* began to publish critiques of the abuse of the law. Though many of their interpretations ultimately echoed Tejada Sorzano's opinion that it was local provincial officials who were responsible for abuse, some began to examine or express concern about the levels of abuse

³¹⁷ For a discussion of the relationship between productive calendars and cycles in agricultural communities and industrial or state requirements see: Contreras, *Tecnología Moderna En Los Andes: Minería e Ingeniería En Bolivia En El Siglo XX. La Paz:*; Contreras, "Mano de Obra En La Minería Estañifera de Principios Del Siglo, 1900-1925"; Platt, Tristan, "Calendarios Tributarios e Intervención Mercantil"; Rodríguez Ostria, *Capitalismo, modernización y resistencia popular 1825-1952*.

³¹⁸ Fondo Prefectura de La Paz, Administración (Ferrocarriles), Box 286, Correspondence 1912-1920, ALP.

found in all forms of employment in infrastructure and mining sectors and called for people like hacendados to defend or protect those men.³¹⁹ Articles depicted supervisors as violent, and argued that they should be charged criminally for assault, abuse, or even homicide.³²⁰ Discussions about this issue began to take a particular interest in removing indigenous women and children from labor in these sectors, and especially mining, and even went so far as to propose national labor legislation regulating working conditions and rights.³²¹

By 1917 and 1918 members of the Liberal Party government seriously debated this new use of the Prestación Vial, focusing principally on the question of its efficacy. In an annual report to Congress, one official wrote about the disappointments of the institution over the nearly 30 years of its official existence:

The results obtained during the last thirty years, since it was established by law October 16th 1880, are less than satisfactory, and up to today it remains in the realm of the tentative and experimental [....] demonstrated by the fact that its regime is constantly modified. But, in one form or other, it is the only tax base if not for the construction or roads then for their maintenance, and because of this, it is convenient, without a doubt, to strike down those special laws and maintain this fiscal tax in its primitive character destined exclusively for the betterment of roadways.³²²

³¹⁹ As the construction projects advanced across the altiplano, it appears that more people began to advocate for the creation of charity groups that would act as "protectors" of indigenous interests. The conflicts between many of those speaking publicly about the issue centered on whether the protector should be local officials in rural areas, or the national government who would 'protect' by recruiting men to the army, the prestacion vial, and build schools. See for example: *El Comercio*, 14 de abril , 1912, "Por la clase indígena."

³²⁰ El Comercio, 10 de diciembre, 1913.

³²¹ *El Comercio*, 23 de julio, 1913.

³²² "Los resultados obtenidos en el trascurso de treinta años, desde que fue establecido en el país el indicado impuesto por ley 16 de octubre de 1880, son verdad poco satisfactorios y hasta hoy se encuentra todavía en el terreno de los tentativos y ensayos. La [ilegible] de esa ley como lo demuestra el hecho de que su régimen es constantemente modificada. Pero de un modo u otra, es la

The special laws this official referred to were the ones that had attempted to draw workers far from their communities to labor on large-scale projects and especially railroad projects. The attempts to replicate Corocoro had failed.

Carmen Solíz observed the recurrence of complaints about the Prestación Vial during the Agrarian Reform that followed the 1952 Revolution. The abuses described in the court cases resemble those seen at the end of the nineteenth century and the very start of the twentieth.³²³ In particular, residents of rural communities and workers on haciendas complained that local hacendados and authorities abused the tax and required men to work on private properties or were forced to pay more than the amounts laid out in the law. They also complained that local officials regularly demanded that men produce proof of having worked or paid the tax before they would be allowed to travel past checkpoints or access state institutions. Reforms of the Prestación Vial in the 1930s and 1940s point to a change of course from the Liberal Party's attempted reorganization of the tax. Congressional allocations of labor and monies to large-scale infrastructure declined after the Liberal and Republican Party governments returned power and control of the tax to local officials.

Despite a general consensus among Liberal Party officials at the national level, navigating and implementing Prestación Vial reforms proved difficult for several reasons,

única base tributaria, sino para la construcción de caminos al menos para su conservación, y por ello convendría sin duda, derogando aquellas leyes especiales, mantener en su carácter primitivo de impuesto fiscal destinado exclusivamente al mejoramiento de las vías de comunicación. *Memoria de Gobierno y Fomento 1918, Estadísticas de 1917* (Bolivia: Talleres Gráficos La Prensa, 1918) p. 131.

³²³ Maria Carmen Soliz Urrutia, "Fields of Revolution: The Politics of Agrarian Reform in Bolivia, 1935-1971" (PhD Thesis, New York University, 2014).

including direct refusals to follow the law by both local officials and indigenous men. The surprising degree of participation in the Corocoro Branch construction points to several possible interpretations. Some of those men that participated in the earthworks were already engaged in paid work in the area, either coming out of a stint in the mines or on railroad construction, and completed their eight days of labor on the line to obtain boletos. In other cases, it is quite probable that certain communities organized themselves to fulfill the requirement in an attempt to evade the abuses of local authorities. Regardless, the result of this participation was the same: Indigenous men throughout Pacajes had labored basically without pay for the state for more than a week, but they held four years of boletos as they walked away, and they could show them to local authorities and corregidores.

Later discussions of the use of the Prestación Vial on the Yungas – La Paz Railroad indicate that officials in Pacajes may have been less likely to sell boletos to community members than sub-prefects and prefects in other provinces.³²⁴ Local authorities in Pacajes did not offer indigenous residents the possibility of paying their way out of the obligation, precisely because they wanted to force them to work, or abuse their power to demand work.³²⁵

Discussion:

Examining of the construction of the Arica – La Paz Railroad and its branches, points to the challenges arising while moving from an ideal vision of a railroad to a real

³²⁴ Memoria de Gobierno y Fomento 1918, Estadísticas de 1917 (Bolivia: Talleres Gráficos La Prensa, 1918)

³²⁵ Tejada Sorzano, *Ramal a Corocoro. Informe Del Inginiero C. Tejada Sorzano. Publicación Oficial. Dirección de Obras, Sección Ferrocarriles.*

running one. Bolivia faced particular challenges as a result of the War of the Pacific, something evident in the delays and cancellations of plans for a railroad as important as the one connecting the Arica coastline to the Department of La Paz. Discourses about progress and modernization under-emphasized the importance of direct diplomatic negotiations for the resolutions of very fundamental problems that held back Bolivia's economic growth. While questions of national security and sovereignty did enter into debates about the necessity and desirability of one or another rail line, Bolivian politicians only partially admitted that a significant part of the holdup in the construction of an alternative to Antofagasta, and perhaps the most important alternative, may have been the lack of cooperation by neighboring countries before treaties were signed.

The development discourse of the 19th and early twentieth century rarely addressed the challenges that would come to the vex engineers attempting to build railroads from the coast to the altiplano, including the incredible geography of the Andean Pacific coastline in Tarapacá and along the border with Bolivia in Pacajes. Abstract discussions painted it as a landscape of potential mineral, agricultural, and rubber wealth; railroad engineers saw that very same landscape as one of the principal barriers to getting a railroad built. Unlike the magical portrayals of the technology, trains had to overcome challenges that pack animals had not faced. Trains could not have followed just any one of the many paths that crossed the cordillera; they were necessarily directed to certain ones because of technological and mechanical limitations. The routes of trains in the region were limited and determined by international diplomacy, financing, but also the complicated relationship between geography and engineering.

The construction of railroads, including Arica – La Paz, also required dealing with the complicated relationship between companies, workers, potential workers, and different levels of the state. Hidden within plans and discourses for railroads and modernization across the altiplano, was a modern reiteration of colonial labor relations. Whether through the use of enganche, which blurred the line between forced and free labor, abusive day laborer regimes, or the imposition of forced labor obligations via a state obligation, the Bolivian state applied very old solutions to the problems they faced in the absence of a 'modern' labor market. While looking forward to the industrialization of key industries at an abstract level, they looked back in time to resolve the worker shortage during a construction boom, echoing the very same Spanish colonial practices they sought to distance themselves from.

The Prestación Vial's obscurity in much of the historiography on this time period is due in part to the way in which the Liberal Party addressed the issue. While the question of labor shortages occasionally arose during the discussions about railroads and mining in the nineteenth century, it did not seriously enter the debate until the Tejada Sorzano's extensive use of the Prestación labor force for the construction of the Corocoro Branch. Instead, the Liberal Party began, from the start of their governments to try and transform this tax without much fanfare or conflict. They worked to naturalize a new kind of relationship between national authorities and indigenous men, while they also engaged in low-profile conflicts with local authorities over who had the right to control and direct potential workers. The institutionalization of this neo-'mita' resembled the kind of tutelage through forced industrial work that had been described by Liberals like Bautista Saavedra.

Its continuation well into the twentieth century in various forms reveals the degree to which this practice became normalized and naturalized among politicians, in particular in rural areas.

And, as during the Colonial Period, those persons subject to a coercive labor regimes worked to undermine or escape them. Avoiding unpaid work on railroads for paid work on the same or similar project, appears to have been an option used by some. Unlike the Colonial state however, the Liberal Party appears to have been less capable, or effective, at forcing the centralized control of this workforce in certain parts of the altiplano without some form of negotiated cooperation with local authorities or some kind of incentive for community participation. Punishment of non-compliers during those early years of the normalization of the Prestación Vial appears to have been directed at both individuals who failed to work or pay, and at the numerous local officials who failed to follow the rules laid out by national reforms.

The gaps between different levels of the state provided indigenous men in the province of Pacajes a way to use these internal state conflicts for their own ends. In other instances and other regions, it appears that slack adherence to orders requiring indigenous men to work the tax and not pay may have resulted in those men either working locally or paying for boletos, and then not showing up on projects that were far away. While the Prestación Vial in all its forms reproduced colonial domination, and shed light on how the construction of railroads in Bolivia produced and disciplined subjects, the inconsistencies in state practice and intra-state conflicts provided small openings permitting indigenous agency. Despite their stated desires Liberal Party reforms failed to fully recreate the mita

because of resistance from indigenous men and communities and local officials, even though these groups were driven by very different interests.

CHAPTER THREE: REGIONAL COMMERCE, LOCAL POLITICS, AND LIBERAL PROJECTS.

Introduction:

From the 1870s to the 1910s, those involved in planning and promoting the Arica – La Paz Railroad thought that it would quickly bring about specific transformations of the economy of the altiplano. The lowered costs of moving goods and people would revitalize this commercial circuit, grow exports and imports, industrialize the mining sector, and link La Paz to the rest of the world via the Pacific port of Arica. However, maintaining railroads and ensuring that they worked in this way required active and continued state interventions – just as getting them built had. Generating the funds needed to pay the national debt acquired for train construction and for financing new state institutions also required reorganizing tax structures throughout the country. While the new transport technology would help the state collect some of these funds, national officials were not the only parties interested in shaping commercial patterns. Controlling commerce across borders with little national presence was a daunting task that also required the growth of new state institutions, and it required the cooperation of existing local ones. Growing industries like mining and certain kinds of international commerce via the railroad proved much easier than controlling regional trade.

In this chapter, I examine how the Arica – La Paz Railroad affected flows of commerce across and through the province of Pacajes, and structured social and political relationships in the region. Because the train altered the commercial geography, it is

important to understand earlier commercial patterns in order to see the changes in local state formation and regional power relations that followed its construction. Sources describe the region as one with high levels of contraband and smuggling, both before and after the railroad's inauguration. When faced with controlling commerce and trade, local and national officials often found themselves in conflict with one another. Retracing the business practices of merchants throughout the region illustrates the ways in which their activities contributed to development of these intra-state contradictions and tensions.

Far from the image of a countryside disconnected from the industries of major cities and mining centers, rural and urban inhabitants of Pacajes lived within social and economic networks that were connected to both international and national markets. These were, in some cases, circuits with deep histories in the region. The construction and running of the Arica – La Paz Railroad did much of what it promised within the mining sector. However, instead of eliminating previous forms of commerce as it activated new 'modern' and industrial circuits, the railroad presented the 'traditional' forms of trade with new challenges to which they tried to adapt.

Problematic prophecies for the railroad:

Reports published about the Arica – La Paz Railroad around the time of the treaty's signing and during the line's construction expressed optimism for the project. The aperture of the Panama Canal around the same time would increase flows of commerce and trade

through South American Pacific ports, including Arica.³²⁶ As already mentioned, engineers such as Josias Harding published details what they expected in the mining sector and beyond.³²⁷ They thought this growth would change the lives of the residents across the region. They projected that the Arica – La Paz Railroad would alter consumer habits, expand the products available, and alleviate shortages of goods and foods in the altiplano. They echoed many of the economic arguments in favor of train development from the previous decades. The railroad was supposed to alter the material conditions of life that had hindered the development of the region and its residents in all senses.³²⁸

However, the triumphalist prophecies for the Arica – La Paz Railroad overlooked regional dynamics and particularities that troubled some of their predictions. Global and local economic changes, during the decades prior to the construction and inauguration of the railroad, had sparked a commercial crisis in Tacna and Arica. Changes in silver and mercury production altered the very trade patterns that had built the port, while the construction of rail lines from Antofagasta and Mollendo into the highlands had increased

³²⁶ Decombe, *Historia del ferrocarril de Arica a La Paz*; Harding, "Informe Preliminar Sobre Un Proyecto de Ferrocarril Entre El Puerto de Arica y La Paz"; David McCullough, *The Path Between the Seas: The Creation of the Panama Canal, 1870-1914* (Simon and Schuster, 2001).

³²⁷ Harding, "Informe Preliminar Sobre Un Proyecto de Ferrocarril Entre El Puerto de Arica y La Paz"; Decombe, *Historia del ferrocarril de Arica a La Paz*. Harding and Decombe both thought that once the railroad was complete it would entice mine owners to choose this route over the Antofagasta line and exportation via Mollendo. All of these authors also spoke extensively about how the expansion of commerce through the Panama Canal would increase the attractiveness of the Pacific ports of South America, including Arica.

³²⁸ The discussions about the potential of the Arica – La Paz Railroad directly mirrored those ideas that had been expressed by Aramayo nearly 50 years earlier. Aramayo, *Ferrocarriles En Bolivia*; Avelino Aramayo, *Proyecto de una nueva via de comunicacion entre Bolivia i el Oceano Pacífico* (W. & A. Webster, 1863).

competition for local merchants.³²⁹ And, prior to the Treaty with Chile, continued political uncertainty had made investment in the region unattractive or impossible, and this had limited the ability of many companies to ride out this downturn. Though some writers celebrating the railroad spoke about the impacts it would have in terms of 'revitalizing' the region, very few openly discussed why the region needed to be revitalized in the first place.

By the first years of the twentieth century, many of the mining companies operating in Pacajes that might have otherwise used Arica as their port of export, had shifted much of their trade to Guaqui, Puno, or another center that was serviced by a railroad.³³⁰ This meant that in the years prior to the railroad, commercial flows through Arica in all categories had declined from their mid-nineteenth century levels. The construction of the Guaqui – La Paz Railroad gave urban centers like La Paz a faster and cheaper alternative to Arica for commerce. This presented a challenge to the planners and promoters of the railroad. For

³²⁹ Platt, "Tiempo, Movimiento, Precios. Los Caminos Del Azogue Español de N.M. Rothschild Entre Almadén, Londres y Potosí 1835-1848"; Cajías, "El Norte y El Sur de Bolivia En Los Primeros Años Republicanos."

³³⁰ For example, the largest mining company operating in Corocoro, Pacajes, exported throughout the first decade of the twentieth century, via Guaqui, sending its minerals up the route along the Desaguadero River to Lake Titicaca, over the Lake via steamer, and out of the port of Mollendo via train. They imported industrial supplies and fuel through Mollendo as well. Salluco Sirpa, *La explotación del cobre en el distrito minero de Corocoro a principios del siglo XX, 1900-1930*; Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," 1910.Several other smaller operations from Corocoro are also listed as exporting through Guaqui, however, rescatista companies formed in Tacna comprised many of the same merchants who also traded goods into Corocoro, hinting that they may have very well sold goods in one direction and exported minerals through Arica. Vol 28, S/N "Sociedad Anónima de "Beneficio de Metales de Tacna" y la "Memoria presentada a los accionistas de la Sociedad Minera de Choquilimpie" [a sulfure mine near Tacora], Fondo de la Intendencia de Tacna y Gobernación de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.

the line to live up to expectations and not just recuperate what had been lost, it would have to spark exponential and rapid growth of commercial activity through Arica and Tacna.

Commerce and infrastructure before the Train:

The fall in international trade through Arica in the late nineteenth and early twentieth centuries did more than just cause a slump in the region's commerce; it altered the composition of the commercial sector in the port city and the town of Tacna. Commercial registers in newspapers from the region in the early 1890s identify the major importers and exporters operating in Tacna.³³¹ By the end of the first decade of the 20th century, many of the commercial houses and individuals moving goods to and from the highlands in 1909 and 1911 were ones that had operated much smaller business in the 1890s. Large companies and importers like Firth (the same who had put forth proposals for a railroad from Tacna), and those listed as important wholesale importers in 1893, mostly disappeared from the Bolivian customs records by the 1900s.³³² The commercial crisis in Arica and Tacna during the years just prior to the Arica – La Paz Railroad may have led those with the means and connections to follow the large-scale flows of commerce and trade to other ports, and left smaller shipments and local regional trade to local traders.³³³

³³¹ Vol 17, f 108, Periódico "El Tacora" 30 de junio de 1893. Fondo de la Intendencia de Tacna y Gobernacion de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.
³³² Vol 17, f 108, Periódico "El Tacora" 30 de junio de 1893. Fondo de la Intendencia de Tacna y Gobernacion de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.
³³³ For example Dauelsberg and Schubering, though operating in small numbers in 1911 through Arica, appear to moving a significant quantity of goods through Guaqui and Antofagasta, signaling that though they did not entirely abandon their operations in Arica, they did focus their business in ports connected by railroads. They were also accused of contraband activity in those other ports. Tribunal Nacional de Cuentas, Aduanas Arica 1909, 1911, Anexo Guías; and Ministerio de Hacienda, Correspondencia Aduanas, MH 458, p 170, 229. 345. ABNB.

Changes in levels of commercial activity between the coast and the highlands during these years and the consequences of the War of the Pacific resulted in the degradation of the existing transport infrastructure across the region. Chilean authorities administering the area were well-aware that many years of neglect had resulted in poorly maintained cart roads and paths for pack animals into the highlands.³³⁴ They began to slowly rebuild those long before the railroad was planned and continued to work on restoration and maintenance of some of those routes afterwards as well. The geography of trade via pack animal in the region comprised an extensive network reaching out like a net in many directions. Some roads and trails followed the routes that were eventually considered for the railroad, though unlike the rail line, they included many more detours and connections the way.³³⁵ Chilean officials identified several routes as the most important historically, including those leaving from Tacna and going to the highlands of Peru and Bolivia, specifically to Puno, Desaguadero, and Lake Titicaca, as well as those that headed towards the Tacora Volcano into Machaca and other parts of Pacajes. Some paths headed to the same highland regions but left from Arica and went up the Lluta Gorge, along a similar trajectory that certain sections of the railroad would later use. A third group of overland routes left from the region to the south, either moving towards

³³⁴ Vol 17, f. 84-86 (1893); Vol, 23B, f 71-80, 130-135 (1904), Fondo de la Intendencia de Tacna y Gobernación de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.
³³⁵ In particular, the pack animal routes that were monitored by the Intendencia de Tacna mapped flows of Bolivian merchants and caravans through Sama (and the port there), heading towards Candarave, up to the border region near Tacora and across the border into Pacajes,, as well as routes to the south towards borax mines, the salt flats, Carangas and other points. Vol 17, f312 (1894); Vol 23, f 415-436 (1904); Vol 23B, f 51-53 (1904), 1 Vol 28B, f157-160, 173-175 (1910), Fondo de la Intendencia de Tacna y Gobernación de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.

Sajama or slightly farther south into Carangas, Oruro, and Uyuni.³³⁶ Though proposed routes for the railroad followed many of the existing trade routes, the circuits of pack animal and cart travel connected many more places and crossed the border at less controlled points. These paths and roads were also connected to other nearby ports, including Ilo, Sama, and Pisagua – none of which had a Bolivian customs office.

Consumption, contraband, and the railroad:

The plethora of routes from the port multiplied the possible destinations for goods leaving ships and commercial houses in Arica and Tacna, though this was not always evident on customs forms. While archival sources detailing the contents of shipments and those persons and companies involved are only complete for a few years during this time period, those records are surprising.³³⁷ Despite the wide range of potential destinations for goods traveling along these pre-existing networks, one place in the Bolivian altiplano appeared consistently as the declared destination on Bolivian customs forms from the port of Arica: Corocoro. Fluctuations in fuel imports impacted the percentage of trade bound for the town, nevertheless throughout 1909 and 1911 (the two 20th century pre-railroad

³³⁶ Hannah Cottyn's research highilights the importance of the southern routes crossing into Carangas during the late-nineteenth century. Isaiah Bowman described this route as being part of an important corridor for contraband. Cottyn, "Renegotiating Communal Autonomy: Communal Land Rights and Liberal Land Reform on the Bolivian Altiplano: Carangas, 1860-1930"; Isaiah Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," *Bulletin of the American Geographical Society* 42, no. 1 (n.d.): 22–37.

³³⁷ Just as was the case with documentation of the construction process of the railroad, the records of individual shipments and flows of goods between the port of Arica and Bolivia for this time period are not very well preserved or complete. While the surviving documentation does contain sufficient information to paint a complete picture of commerce in the region. Detailed documents, the *guias* or *pólizas* for individual shipments that list the contents of shipments, their destinations, and the agents or commercial houses moving and paying the customs fees for the, are preserved in the archives for only a limited number of years. They are found for the years 1909, 1911, 1913, 1925 in the Tribunal Nacional de Cuentas, Aduana de Arica, Anexos Guias, ABNB.

years for which there are complete detailed import records), non-fuel imports, foodstuffs, and luxury items were nearly all bound for the small, mostly poor mining town and provincial seat in Pacajes.³³⁸

The tonnage of goods moving through Bolivian customs in Arica in those prerailroad years paled in comparison to decades prior and to the activity in Antofagasta during the same period. However, the contents of shipments bound for Pacajes challenge expectations of what the predominantly rural indigenous region with a small mining center might receive.³³⁹ In 1909, Corocoro received important shipments of sugar and flour, as well as over five tons of cognac, vermouth, single malt scotch, and champagne, direct from La Rochelle and Liverpool.³⁴⁰ It received Italian textiles, foodstuffs from California, sweetened condensed milk, canned mussels, salmon, and lobster, preserved pineapples and other fruits, hazelnuts, almonds, etc. In all, the municipality with around 8000 mostly indigenous residents, rural and urban, was recorded by customs as being the destination for 185 tons of high-end imported foodstuffs in 1909.³⁴¹ By 1911 the list of imports to Corocoro grew to include preserved tomatoes, crystal glassware, French perfume, olives, capers, and more.³⁴² In total, in 1911, 93% of all high-end imported alcohol declared in

³³⁸ In particular, in 1909, two importers moved fuel through Arica to La Paz. Their two shipments accounted for between a third and half of the imports from Arica bound for La Paz that year. Without those shipments, the percentages bound for Corocoro and La Paz in 1909 would appear nearly the same as they do in 1911. Tribunal Nacional de Cuentas, Aduana de Arica, 1909 and 1911, Anexos Guías, ABNB.

³³⁹ Gamarra, Censo General de La Población de La República de Bolivia Según El Empadronamiento de 10. de Septiembre de 1900., 1902.

³⁴⁰ Tribunal Nacional de Cuentas, Aduanas Arica, 1909, Anexo Guías. ABNB.

³⁴¹ Tribunal Nacional de Cuentas, Aduanas Arica, 1909, Anexo Guías. ABNB.

³⁴² Tribunal Nacional de Cuentas, Aduanas Arica, 1911, Anexo Guías. ABNB.

Arica as bound for Bolivia listed Corocoro listed as the final destination. This, in addition to over 290,000 kilos of flour from the U.S. and 145,000 kilos of sugar from other regions of Latin America. In all, 450 tons of consumer imports moved from the port and into rural Pacajes via pack animal in 1911. Virtually none of this was listed as being bought or managed by the railroad construction companies, mine owners, or the principal merchants associated with them.

However, Chilean authorities noted problems in the regulation of commercial flows throughout the region that complicate a simple or direct reading of these customs records. Administrators in Tacna and Arica expressed dismay at how frequently trade in the region escaped state controls by using poorly controlled paths across what was a very porous border.³⁴³ Many goods did not go where merchants said they would, and traders trafficked in goods that were never declared. Chilean authorities found this even more frustrating during the WW1 years when export of basic foodstuffs like flour was prohibited.³⁴⁴ The commerce across the highland borders appeared unpredictable to customs officials sitting in the port. Regional trade between Tacna and Arica and the highlands was the kind of commerce that politicians producing railroad and modernization discourses wanted to do away with. The "beasts" or pack animals climbed and descended paths on their way to

³⁴³ Officials often attempted to patrol parts of the most commonly used trails and kept records of the numbers of animals being trafficked or transported, for example, along some of the routes, as indications of the traffic along the routes. Vol 17, foja 297 (1893); Vol 23 fojas 415-436 (1904); Vol. 25 fojas 362-365 (1903), Fondo de la Intendencia de Tacna y Gobernación de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.

³⁴⁴ The start of the war provoked a panic over food supplies in various regions. In Arica-Tacna, the Intendencia barred the exportation of some basic foodstuffs, animals, and local fuels. Vol 45, fojas 114-115 (1914), Fondo de la Intendencia de Tacna y Gobernación de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.

many destinations, and not necessarily to those places or industries that politicians wanted them to go.³⁴⁵

The porosity of the border and the confusion surrounding the physical locations of national territorial limits worked in favor of merchants and transporters from all backgrounds who wished to evade either the Bolivian state or the Chilean one (or both). Indigenous populations living along the border regions made the work of officials who tried to control shipments very difficult by physically moving or removing border markers.³⁴⁶ When customs agents or police occasionally found deposits of imported alcohol in storage near the border, disputes sometimes focused not on whether they had been declared and paid for, but which side of the border the agents were from and which nation the goods were stored in.³⁴⁷ These borders were porous, but they were also, in some places, mobile. This ambiguity undermined attempts to establish or naturalize any one nation state's authority to control commerce entering or leaving its territory. If the normalized or naturalized vertical encompassment of a modern state is central to state hegemony and

³⁴⁵ Some of these 'beasts' were the product, whether for wool or food, border agents from both Bolivia and Chile trace the movement of animals as products too.

³⁴⁶ Fondo de la Intendencia de Tacna y Gobernación de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.

³⁴⁷ In this particular case, the insistence that the goods were being stored on the other side of the border then made the efforts of the police who had attempted to seize the goods not only illegitimate but also illegal. Vol 23B, f 51-53 (1904), Vol 45, f 116, 156-159, 222 (1914), Fondo de la Intendencia de Tacna y Gobernación de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.

territorial control a key aspect of state power, these things were incomplete and their construction was challenged by nearly everyone throughout this region.³⁴⁸

However, comparing the records from Bolivian customs with those from the Intendencia de Tacna provides insight into other aspects of trade through the region that added a layer of complexity to the accusations of contraband. First, much of the trade between Tacna and Bolivia would not have been registered by Bolivian customs in the port, because many local goods that headed to the highlands did not go through the port and were exempt from customs – or at least a lot of people thought they were.³⁴⁹ Many merchants and traders claimed that goods produced on the coast or on the Bolivian side of the border, and which were bound for consumption in the region should not be regulated or controlled by customs. These traders understood customs to be an institution with authority only over goods shipped between South American nations and Europe or North America, not those that flowed between the three nations that bordered one another in this economic corridor. And, while the customs records give the impression that commerce into the port constituted trade in luxury imports, the Chilean records hint at the interconnectedness between trade in non-luxury local goods and international ones. Livestock, coca, corn, chicha, and many other products flowed through the region in significant quantities. Some

³⁴⁸ For a discussion of the constructed nature of the vertical encompassment of the state see: Sharma and Gupta, *The Anthropology of the State*, 2009; Ferguson and Gupta, "Spatializing States: Toward an Ethnography of Neoliberal Governmentality," 2002.

³⁴⁹ The question of exemption from local transit taxes for this traffic was raised consistently by merchants and government authorities on the coast who were still trying to figure out how to apply parts of the ceasefire agreement from the 1880s. Vol 17, f 20-22, 35-36, 80-82, 104-105, 118-121, 125-127, 341, 363 (1893); Vol. 23, f 415, 417, 148, 420-424 (1904); Vol 41, f 8, 126-127, 136-137 (1910) Fondo de la Intendencia de Tacna y Gobernación de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.

were handled by merchants in commercial houses who had followed the processes of diversification and accumulation that has been described by Rosenblitt for the nineteenth century, while other parts of this kind of trade was managed by other groups, including indigenous merchants, not operating in conjunction with commercial houses.³⁵⁰ Administrators of the region sometimes simply didn't know what to do with this well-established cross-border trade in local products, however, they recognized that cows, sheep, corn, and coca crossed the border right alongside cognac and copper.

The problems with unregistered commerce in Arica – Tacna region do not appear to have been unique along the Bolivian borders during this time period. Bolivian ministries reported similar and more serious issues at other national borders. Border agents informed the Ministry of Hacienda of attacks on customs officials who refused to play along with payment schemes and turn a blind eye to smuggling.³⁵¹ In other places, customs officials were accused of extorting merchants to allow them to cross.³⁵² On Bolivia's southern border with Argentina, state customs warehouses were reportedly robbed by bandits who then crossed the border to escape police in the less-controlled rural valleys of the Argentine provinces of Salta and Jujuy.³⁵³ Similar problems were reported by importers working

³⁵¹ Ministerio de Hacienda, Correspondencia 1911-1912, MH 52 p 110-111, 113-115; Ministerio de Hacienda, Correspondencia con Prefectos, MH 1086, 1911, p. 101-102. Ministerio de Hacienda, Correspondencia Aduanas, 1911-1912, MH458, p 63, 345. ABNB.

³⁵⁰ Ibid. And Jaime Rosenblitt, "De arrieros a mercaderes. Orígenes de los comerciantes de la región Tacna-Arica, 1776-1794," *Revista de Indias* 74, no. 260 (2014): 35–66.

³⁵² Ministerio de Hacienda, Correspondencia, MH 52 p 92; Ministerio de Hacienda, Correspondencia Aduanas, 1911-1912, MH458, p 12, 52-53, 63, 91, 139-140, 229, 344, 406, 426-427. ABNB.

³⁵³ Ministerio de Hacienda, Correspondencia 1911-1912, MH 52 p 126-127; Ministerio de Hacienda, Correspondencia Aduanas, 1911-1912, MH458, p48, 165-166, 183, 198. ABNB.

through the Guaqui, Antofagasta, and Mollendo.³⁵⁴ On the periphery of those regions controlled by national institutions like Customs, the particularities of local geographies and relationships were used by those who would evade controls. Whether by taking advantage of non-centralized and poor oversight at remote customs points, corrupt state officials, using direct intimidation, or by playing hide and seek along the border, commercial circuits and traders challenged state control over the territorial borders of the nation.

The manner in which Chilean and Bolivian agents administered trade to and from the Pacific ports made fulfilling their assigned duties more difficult and presented opportunities for would-be smugglers. For a period following the signing of the 1904 Treaty, Bolivia's customs house in Arica was located right beside Chile's on the docks and not at the physical border.³⁵⁵ Goods declared for Bolivia were noted in both Bolivian and Chilean records, but any duties owed were paid only to Bolivia. Goods declared as bound for Chile were charged by Chilean customs officials and do not appear to have even been registered by Bolivian officials. Of course, only those goods that passed through ports were subject to this process; local products or those moving through smaller nearby ports like Sama were even harder to register and control.³⁵⁶ However, even many of the imported

³⁵⁴ *El Diario*, 21 de octubre, 1908; *El Diario*, 28 de octubre, 1908; *El Diario*, 29 de octubre, 1908, *El Comercio*, 3 de marzo de 1912. Ministerio de Hacienda, Correspondencia Aduanas, 1911-1912, MH458, p 29, 120, 167. ABNB.

³⁵⁵ A similar process was used in Antofagasta for a period of time. Ministerio de Hacienda, Correspondencia, 1911-1912, MH52 p 1-9; Ministerio de Hacienda, Correspondencia Prefectura, 1911-1912, MH 1086, p 471. ABNB.

³⁵⁶ The guias regularly included detailed descriptions of the % of goods that had been lost or damaged in port, or during the passage. Alcohol shipments appear to have regularly lost parts of their shipments while waiting in port. Tribunal Nacional de Cuentas Aduanas Arica, Anexo Guias ABNB.

goods in Arica that were listed as destined for Bolivia did not leave the port and immediately proceed to the border, but traveled into Tacna instead. The reasons for this were often apparent on customs declarations. Commercial houses in Tacna brought imported goods to their warehouses for storage before distribution. Shipments bound for Bolivia via the mountain pass called 'La Portada' necessarily went through Tacna, as that well-known route was accessed from the town.³⁵⁷ However, other customs forms simply listed goods as traveling 'over land.' Those might have followed any one of the historical routes in the region.³⁵⁸ Each transfer or crossroad provided an opportunity to change the direction of shipments and each stop meant that goods could be relabeled. Stealing customs forms was a good business, and reported by officials on both sides of the border.³⁵⁹ The physical distances between customs, the commercial house managing the good, territorial borders, and any stated destination, made even those goods declared to customs officials very difficult to trace once they left the office.

Importers based in commercial houses in Arica or Tacna were not the only traders moving through the area with unregistered goods. Bolivian government officials accused indigenous communities in the border regions and some well within the Department of La Paz, of moving very significant quantities of alcohol without going through intermediaries,

³⁵⁷ La Portada was a stopping point on a path just to the southwest of the Tacora Volcano, along the route from Tacna into the Tripart border region, or into Charaña and Pacajes.

³⁵⁸ Some of the other routes are described in the following texts: Cottyn, "Renegotiating Communal Autonomy: Communal Land Rights and Liberal Land Reform on the Bolivian Altiplano: Carangas, 1860-1930"; Harding, "Informe Preliminar Sobre Un Proyecto de Ferrocarril Entre El Puerto de Arica y La Paz"; Bowman, "Trade Routes in the Economic Geography of Bolivia. Part I," 1910. ³⁵⁹ Cases of suspect guias de aduanas are mentioned regularly. See example: Vol, 59, f. 358 (1919), Fondo de la Intendencia de Tacna y Gobernación de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.

commercial houses, or the institution of the Estanco de Alcoholes.³⁶⁰ At the start of the Liberal Party's governments, Ministers argued that the amount of aguardiente and wine moved clandestinely from Peru into Bolivian markets by indigenous traders from the Department of La Paz and Oruro far exceeded the volume moving legally into the country. They argued that the trade was nearly entirely controlled by communities along the western altiplano.

The government responded not by cracking down on the trade with repressive or disciplinary forces, but by creating the Estanco de Alcoholes, a state monopoly that would be the only legal importer of certain kinds of alcohols. Politicians were not concerned with the flow of expensive overseas liquors, those would continue to be handled separately and freely by importers. The national government wanted to control taxes charged on the alcohol the majority of the population consumed.³⁶¹ From the government of José Manuel Pando (1899- 1904) onward, the state began subcontracting out the operation of the

³⁶⁰ While speaking of the need to change the structure of simple alcohol importation the Bolivian Minister reported in 1900 that: "Los resguardos de la frontera, disperso y supeditados por la raza indígena en armas [...after various wars...], fueron insuficientes y quedo aquella abierta al comercio clandestina de alcohol... La raza indígena de toda nuestra frontera occidental, es la principal consumidora del alcohol y domina la altiplanicie y los boquetes y escarpas de la Cordillera y vive en estas regiones [...] Terminada la guerra, esa raza se mantuvo inquieta y aun insubordinada hasta el punto en que algunas regiones intimido a las autoridades que se les mando y vivió en cierta independencia; bajo esas condiciones la importación de alcohol por los indígenas no tuvo inconveniente." (page 23) "Memoria de Hacienda e Industria presentada a la Legislatura de 1900", Imprenta del Estado, 1900. The volume of traffic in allegedly contraband alcohol through the region was high and flowed in all directions, with Peruvian and Chilean alcohol entering Bolivia, and Bolivian alcohol heading to the other countries. Vol 17, f 312 (1894); Vol 23B, f 51-53 (1904); Vol 41 157-160 (1910); Vol 44, f 428; Vol 61, f 18 (1920), Fondo de la Intendencia de Tacna y Gobernación de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá. ³⁶¹ These other bottled alcohols, imported by international merchants were generally exempt from the limitations of the Estanco.

Estanco to private companies (importers) and especially to Simon Patiño.³⁶² However, even that did not slow the flows of all kinds of alcohol across the border with Peru.

In these discussions about contraband and cross-border commerce state authorities often contradicted themselves. On the one hand, ministers, border agents, and customs officials appeared frustrated by their inability to register and tax goods moving across nearly all Bolivian borders. They talked about the need to establish border patrols dedicated to catching smugglers, and they particularly focused on the unregistered traffic by indigenous populations. Chilean officials needed to both control the flows of their own national foodstuffs in the region to generate taxes and ensure food supplies, but also needed to regenerate or grow the port city for their own political ends by facilitating commercial growth. Bolivian officials needed the income from customs to repay debts, especially since they had dedicated some of those funds to the payment of railroad bonds. All possible reasons for both nation-states to control cross-border commerce were very clear in the discussions between officials, even while the interest in growing trade may have necessarily involved increasing the uncontrollable movement of goods across the poorly watched border.

While smuggling and contraband were forms of 'invisible' commerce, they were also activities that were widely and very publicly discussed, sometimes in great detail. The quantities of the goods moving through uncontrolled crossings were not always known to

³⁶² Patino's takeover of the Estanco guaranteed the government a payment of 1,000,000 bolivianos a year, plus 27% of the earnings of the Estanco each year on top of that. *El Comercio* 10 de mayo de 1912, 14 de mayo de 1912, 6 de Agosto de 1912. Ministerio de Hacienda, Correspondencia Prefecturas, 1911-1912, MH 1086, p 208, 359,363, ABNB.

national officials overseeing or managing customs and the border, though sometimes they appeared to have a good idea of the volume.³⁶³ Chilean officials identified many of the paths (though perhaps not all) used by smugglers. Bolivian ministers named the specific communities in the Department of La Paz that they accused of organizing the cross-border trade in alcohol with Peruvian producers. They also openly discussed how certain laws were being used by railroad and construction companies to bring in goods that were never intended to enter the Bolivian marketplace, much less flood it with imports.³⁶⁴ They knew that railroad companies were taking advantage of their tax-free import rights on many goods to then resell them in local marketplaces, and that the trains were used employees to bring in undeclared products.³⁶⁵ In Arica, Chilean authorities wanted commercial growth even while they knew that part of that growth might be produced by importers who also smuggled goods past them – and sometimes they knew who those merchants were.

Faced with this situation, the government did not respond by greatly expanding controls across the region, but rather with the creation of monopolies on the trade in certain

³⁶³ See, for example: *Memoria de Hacienda e Industria presentada a la Legislatura de 1900* (Bolivia: Imprenta del Estado, 1900).

³⁶⁴ Railroad and construction companies came under particular scrutiny because of the exemptions they had been given on the importation of supplies for their projects. They were accused in some cases of abusing the exemptions that were supposed to cover supplies for their workers, and instead, flooding the local marketplaces with cheap imported foods and tools (becoming merchants themselves). See examples: p 60, "Sección: Reglamentación Ferroviaria" in *Memoria presentada a la Legislatura de 1911 por el Dr Juan M Saracho, Ministro de Gobierno y Fomento*. (Bolivia: Talleres Gráficos La Prensa, 1911); same in *Memoria presentada a la Legislatura de 1912 por el Dr Anibal Capriles, Ministro de Gobierno y Fomento* (Bolivia: Talleres Gráficos La Prensa, 1912); *Memoria presentada a la Legislatura de 1915 por el Sr. Arturo Molina Campero, Ministro de Gobierno y Fomento* (Bolivia: Talleres Gráficos La Prensa, 1915); and Memoria presentada a la *Legislatura de 1916 por el Sr. Arturo Molina Campero, Ministro de Gobierno y Fomento* (Bolivia: Talleres Gráficos La Prensa, 1915); and Memoria presentada a la *Legislatura de 1916 por el Sr. Arturo Molina Campero, Ministro de Gobierno y Fomento* (Bolivia: Talleres Gráficos La Prensa, 1915); and Memoria presentada a la *Legislatura de 1916 por el Sr. Arturo Molina Campero, Ministro de Gobierno y Fomento* (Bolivia: Talleres Gráficos La Prensa, 1915); and Memoria presentada a la

³⁶⁵ Ministerio de Hacienda, Correspondencia Aduanas, 1911-1912, MH458, p 29, 230, 235, 303, 345, ABNB.

products that could be handed over to specific and known merchants. Moreover, as time passed and the railroad began to run, the Bolivian state moved its principal customs houses to railroad stations on the physical national border, effectively ignoring all non-railroad transport altogether.³⁶⁶ The state aimed to receive a set amount of money from the trade in certain goods they knew to be heavily smuggled, like alcohol, but they did not do this by expanding police or customs controls. When they did set up police forces in strategic places to control for smuggling, they often quickly closed the most important ones and then failed to adequately fund the remaining ones.³⁶⁷ While accusations of smuggling did not always result in punitive actions, some of the only raids on contraband appear to have occurred in mostly indigenous populations, like communities in the west of the province of Pacajes.

The Bolivian state needed income from customs to pay debts and parts of the national government appeared to have some detailed knowledges of smuggling circuits, however, the flows of unregistered goods didn't stop. While there are many explanations for this, not the least of which is that Bolivia simply lacked the resources, staff, and

³⁶⁶ The Bolivian government reorganized its customs offices after the running of the Arica – La Paz railroad, operating principally from Charaña and the town of Corocoro, instead of the port. They did create other offices, like one in Nazacara, but it was established right next to a poorly maintained bridge that merchants tried to, and could, avoid. The move to Charaña and Corocoro (with the intent to register the Corocoro Branch station) represented the state bureaucracy being constructed around, molding to, the geography of the railroad and not the previously existing circuits.

³⁶⁷ Both Chilean and Bolivian officials did similar things here. Chilean officials failed to send the adequate number of officials to the regions near the border, and Bolivian forces were shut down shortly after formation in some areas, or in terrible shape. *Memoria presentada a la Legislatura de 1916 por el Sr. Arturo Molina Campero, Ministro de Gobierno y Fomento* (Bolivia: Talleres Gráficos La Prensa, 1916); and *El Comercio*, 16 de noviembre de 1912, "Contrabando."

institutions to do so, resistance and failure to comply on the part of local officials and customs or border agents also played an important role. Ministers had notions about how this trade worked, but local officials dealing with these circuits understood the dynamics in great detail, in part because some were interested parties in the trade.

In places like Corocoro, local officials understood that imported goods supposedly bound for the town sometimes turned around and went right back to Chile or Peru, if they ever crossed the border at all.³⁶⁸ They knew this, and sometimes who was responsible for it, for several reasons. Many merchants, middle-men, and transporters played important roles in regional politics and contributed a very significant percentage of local budgets through taxes that were set and collected locally. Municipal authorities across the region also understood that when smuggling patterns shifted in ways that threatened the balance of supply in local markets, for example too much flour heading to larger cities or to Peru, bakers and vendors in their own towns would come to them complaining about high prices and scarcity of basic foodstuffs. Even though Bolivian customs records identified Corocoro as the only destination for sweetened condensed milk and French cognac imported through Arica between 1909 and 1911, there is no reason to assume that the town's residents consumed these things. Municipal authorities in places like Corocoro knew this very well.

³⁶⁸ Cajias describes how traders used this same pattern much earlier, in the 19th century. He states that merchants declared goods as bound for Bolivia through Arica and then used that declaration as a way to get goods into other parts of Peru. Cajías, "El Norte y El Sur de Bolivia En Los Primeros Años Republicanos." Municipal authorities received complaints throughout the first years of the twentieth century about foodstuffs being smuggled into Peru, even imported flour from Arica. Box 33, 1900-1904, Alcaldía de Corocoro, ALP.

The principal forms of trade linking Arica and Tacna to the Department of La Paz prior to the railroad had tied merchants to local populations in ways that train-based commerce did not. Animal and cart-based trade (contraband or not) necessarily required creating and maintaining commercial relationships and a physical presence in both urban and rural areas. Prior to the railroad, a commercial house in Tacna needed more than a few agents in a train station or a large city to ensure their goods were received and distributed. They needed local merchants and transporters to move goods, store them, distribute them, buy new goods, consign products, and pay and collect debts all across the region; and those people needed to be stationed in, and travel through, both urban and rural centers. This form of commerce required moving money and goods through an economy that was not reliant on banks or wire transfers, but rather on relationships. These merchants were embedded in communities and towns across the Department of La Paz, Tacna, Arica, and farther flung areas.

Merchants, the local state and taxation:

Nicanor Oviedo, a resident of Pacajes, was listed in records from Arica and Corocoro as a local merchant and an associate of the Tacna-based Vaccaro Hermanos commercial house.³⁶⁹ The Vaccaro Hermanos had been listed as grocers (but not as wholesale importers) in the 1893 records of merchants in the coastal region. However by the end of the first decade of the twentieth century their business had grown to include large-scale imports and ownership of sulfur mines at the Tacora Volcano.³⁷⁰ This family

³⁶⁹ Tribunal Nacional de Cuentas, Aduanas Arica, Anexo Guías, 1909, 1911. ABNB.

³⁷⁰ Decombe, *Historía del ferrocarril de Arica a La Paz*.

business even financed and built the railroad into their mines near the border. As a merchant in his own right, Nicanor Oviedo moved and sold imports for the Vaccaros and collected debts for them, while he also acquired and sold goods on his own.³⁷¹ The processes of wealth accumulation detailed by Rosenblitt and other, resulting from the trade in regional products and growing into mining, appeared to have continued throughout the general downturn in Tacna's commerce, even if at a reduced scale.³⁷²

However, Oviedo was more than simply a merchant from Corocoro. He bought and ran a hacienda in Pacajes and regularly functioned as a local tax collector in Pacajes.³⁷³ He won the rights to collect tolls at an important bridge near Nazacara, just northwest of Caquiaviri near an important transfer point for goods heading up and down the Desaguadero River.³⁷⁴ His hacienda, formerly part of an autonomous indigenous community, was located strategically very near the bridge.³⁷⁵ Oviedo sued and collected debts owed to him and his Tacna associates, participated in local politics in Corocoro, and his penchant for lawsuits meant he left behind a lot of documentation about his business dealings and practices.

³⁷¹ Tribunal Nacional de Cuentas, Aduanas de Arica, Anexo Guías, 1909, 1911, ABNB.

³⁷² Rosenblitt, "De arrieros a mercaderes. Orígenes de los comerciantes de la región Tacna-Arica, 1776-1794," 2014; Rosenblitt, *Centralidad geográfica, marginalidad política*; Langer and Conti, "Circuitos Comerciales Tradicionales y Cambio Económico En Los Andes Centromeridionales (1830-1930)."

³⁷³ Box 34, 1901-1920, Alcaldía de Corocoro; Box 25, Juzgado de Pacajes, ALP.

³⁷⁴ Box 33, 1900-1904, Alcaldía de Corocoro, ALP. For a description of the flows of minerals through this corridor prior to the railroad, see: Salluco Sirpa, *La explotación del cobre en el distrito minero de Corocoro a principios del siglo XX, 1900-1930.*

³⁷⁵ Box 25, Juzgado de Pacajes, ALP. Oviedo also described using "his jilicata" from the former community to collect debts for him across the province.

Oviedo's active role as both a tax collector on commercial flows and as a merchant provides insight into how the levels of the state possessed different knowledge about trade in the region, and illustrates why local officials may not have eagerly jumped at the chance to stop all smuggling and contraband. Oviedo's double role, as a tax collector on many of the same products he imported and sold was not unusual.³⁷⁶ Local tax collection was contracted out to the highest bidder in a similar way that the Estanco for simple alcohol had been at the national level. Municipal budgets, year after year, projected tax income on specific products and then received that exact amount every month of the year because they were being paid an agreed upon sum that had been determined during the selection of proposals.³⁷⁷ Bidding for the rights to collect taxes involved proposing a fixed amount of income to local government and then either not charging any more or pocketing the rest. Tax collection was connected to business and while trading in the product to be taxed was not a requirement for the position, it did provide an advantage to anyone trying to collect taxes on traders that might have been smuggling goods: knowledge of the commercial circuit and those persons involved.

³⁷⁶ Box 33, 1900-1904, Alcaldía de Corocoro, ALP.

³⁷⁷ Box 33, 1900-1904, Box 34, 1901-1920, Alcaldía de Corocoro, ALP.



Figure 3.1: Photo of house in Corocoro. Local church officials identified this house as having belonged to the Oviedo family before its donation to the parish (Photographed by author in 2011).

Bolivia's highly decentralized tax structure during this period promoted these kinds of double roles and to a certain degree, provided incentives for forms of 'internal contraband.' Storing goods in one city or town required paying a local tax in addition to import duties to the national government at a port of entry, and selling them in another market meant paying additional ones.³⁷⁸ For example, importing flour to Bolivia cost a merchant one sum in customs paid to the national institution, getting it across rivers and bridges meant paying tolls to local governments, storing it in the province of Pacajes cost

³⁷⁸ El Diario, 24 de noviembre de 1908, ""El vértigo de los impuestos."

another sum that was bound for provincial and municipal treasuries, and moving that good into another locality, like Oruro, meant paying an additional amount to that other municipality. Selling the good in any town required paying additional taxes to the municipality in the form of vendors' licenses. One national government official criticized this decentralized labyrinth of taxes in the following terms: "The duplication of taxes impedes interdepartmental traffic, as if each department were its own republic, with independent borders and customs."³⁷⁹

And try as it might, the national government found it very hard to stop municipalities from charging transit taxes on all products regardless of where that product was to be stored, sold, and consumed. Municipalities collected taxes on flour, sugar, salt, fuels, and alcohol and more.³⁸⁰ Some of these taxes were authorized by the national government, while others were not. Pacajes' strategic position on the border meant that not only could they charge taxes on the storage of goods recently brought into the country and bound for other markets, they could raise funds at crossroads or bridges that had to be crossed in order to reach other provinces and departments. Other municipalities took advantage of their positions not on the border, but on the roads leading into mining centers,

³⁷⁹ The cascade of local taxes did not just apply to imported goods, municipalities also tried to apply them to all goods, even national ones. From *El Diario*, 20 de noviembre de 1908, "Proyecto: Notas Parlamentarias": "Esta duplicación de impuestos impide el trafico interdepartamental, como si cada departamento fuese una república con fronteras y aduanas independientes. ... La dificultad se sube de punto con los diversos gravámenes que van creando los consejos y juntas municipales." ³⁸⁰ Records list the products the municipality taxed, regardless of whether it was bound for consumption or use in other places: These include (at least) flour, salt, carbon (local fuels), on the storage of all imported alcohol, on the storage and consumption of Peruvian alcohol, on bridge crossings and tolls for all nearby roads used for long-distance traffic, on muku, etc... They also charged other taxes like commercial license fees. Box 33, 1900-1904, Box 34, 1901-1920, Box 47, Alcaldía de Corocoro, ALP.

some railroads, and to growing cities. Funding local government required capturing rent on the flows of commerce through their jurisdictions. The practice was so extensive that national authorities argued it amounted to customs and represented a violation of the distribution of powers within the nation.³⁸¹

This state of affairs clashed with some of the financial promises made by the government to railroad bondholders. While proposals in the nineteenth century often promised tax revenues raised from the industries that might benefit from railroads as the guarantees to bondholders, Liberal Party governments promised that customs and tax revenues on many non-mining products would pay the interest owed to creditors. The national government 'mortgaged' customs income to pay for railroads; local governments financed themselves by charging taxes on consumer goods regardless of whether customs had been paid. Nevertheless, both levels of government reached the conclusion that sub-contracting out control of taxes and distribution of certain goods to known entities, merchants, and companies was the preferable method of ensuring state income.

Documentation of Nicanor Oviedo's activities point to some of the conflicts of interest that arose in these tax collection arrangements. He often collected taxes on the flour he was importing, storing, and distributing for his partners in Tacna. His hacienda not only produced goods for sale in the region but also provided storage facilities for himself

³⁸¹ Various Liberal Party presidents pushed the constitutional questions created by these conflicts, invoking and substantiating the right of the executive to intervene in certain elements of municipal governance. The conflicts can be seen in the repeated decrees and correspondence between these two levels of the state reprinted in the Memorias published by the Ministerio de Gobierno y Fomento throughout this time period.

and others who had just recently paid him a toll to cross the bridge at the nearby river.³⁸² This arrangement meant that for those years when he had won the rights to charge flour taxes, import storage taxes, and bridge tolls, he could pay the promised sums to authorities in Corocoro by only charging competitors. A merchant with the correct combination of tax collection rights could ostensibly operate their own business free from local taxes and bring in some side income as well.³⁸³ At no point did Oviedo or other local tax collectors report smuggled goods – and they wouldn't have if it meant that other merchants would also avoid paying them local taxes.



Figure 3.2: Photo of bridge over the Desaguadero River in Pacajes. Tolls were charged on this bridge in the same manner as those collected by Nicanor Oviedo at the Nazacara crossing (Photographed by author in 2012).

³⁸² Box 33, 1900-1904, Box 33, Box 34, 1901-1920, Alcaldía de Corocoro, ALP.

³⁸³This practice continued after the inauguration of the train. In 1919 records from the municipality include a discussion about the flour taxes in Pacajes and Chayanta, in which the division of income between the town and the tax collector is discussed. Box 34, 1901-1920, Alcaldía de Corocoro, ALP.

Collecting these local taxes from your competitors was complicated, especially when the bidding for tax collection rights opened yearly.³⁸⁴ Merchants like Oviedo won and lost these tax collecting positions from year to year, unlike the bidding for control of the Estanco de Alcoholes that was contracted for an extended period of time. Mistreatment of competitors would be repaid in kind when one lost the rights to collect the tax to another merchant, and overzealousness made collection harder than it would be otherwise.³⁸⁵

Fulfilling the promises made to local governments meant that one had to be able to produce the funds when the municipality required them. Ensuring that the funds came from taxes paid by others wasn't always easy, even when dealing with a bridge toll. Some transporters and merchants did try to avoid crossing rivers at controlled points and used less-traveled and less-watched routes to get their goods through the province and into towns when they didn't want to pay the sums being asked.³⁸⁶ One tax collector argued that the proliferation of clandestine routes around Corocoro made it impossible for him to pay the municipality the sum he had promised without stationing employees at every possible footpath for every night of the year.³⁸⁷ It appears that the most successful tax collectors were not those that took up the task in earnest and tried to charge merchants and

³⁸⁴ Box 45, Alcaldía de Corocoro, ALP.

³⁸⁵ Letting infrastructure fall apart, while creating other institutions, also made taxes harder to collect. By 1912 and 19133 (when Oviedo had given up the rights to collect the tax on the bridge near Nazacara), the tax collector reported that the bridge was in such poor shape that no merchant dared to use it any more. Interestingly, the change in routes used by importers coincided with the national government's decision to erect a small customs office right next to the bridge. In other instances, importers claimed that the taxes had been paid the year before. Box 34, Box 48, 1901-1920, Alcaldía de Corocoro, ALP..

³⁸⁶ Box 36, Alcaldía de Corocoro, ALP.

³⁸⁷ Box 36, Alcaldía de Corocoro, ALP.

transporters for all the goods actually entering the market, or those who saw it as an income generating enterprise. Rather, the most successful ones were those that did it only to meet the promised payment to the state, possibly through some kind of negotiated agreement with other merchants, and then went about their own business and let others do the same.

Jumping into the tax collection business without previous arrangements or connections to the commercial circuit made the job more complicated. This made certain taxes consistently more difficult to collect than others because they involved specific products from indigenous populations' economic activities that did not form part of the same set of commercial relationships as the trade in flour or other similar products. Most taxes collected in Corocoro had been applied to imports, however the state also taxed products of indigenous communities like salt, cooking fuels, and animals. The creation of a new tax on salt in the first years of Liberal governments was not well-received by these communities.³⁸⁸ And, even though some merchants took on the contract to collect the tax and the local government expected to incorporate the income in their annual budgets, armed resistance made this impossible. Communities, even some of the same ones who participated fully in the Prestación Vial work on the Corocoro Branch, simply refused to

³⁸⁸ Many communities challenged the right of the municipality to collect the tax by arguing that it was not a legal tax, and they won their argument, at least for a while. Box 39, Alcaldía de Corocoro, ALP; *El Diario*, 18 de noviembre de 1908; and p30, *Memoria presentada a la Legislatura de 1915 por el Sr. Arturo Molina Campero, Ministro de Gobierno y Fomento* (Bolivia: Talleres Gráficos La Prensa, 1915).

allow tax collectors near their goods and ran them off with threats of physical harm or death for years.³⁸⁹

Taxes on charcoal and local cooking fuels proved very difficult collect because they were either smuggled out of the province, or because 'taxes' were informally collected by other local officials who were often accused of abusing their authority.³⁹⁰ Tax collectors in Pacajes complained that the corregidor from Calacoto took advantage of the shortage of fuel in cities and smuggled the products to sell directly in Oruro and La Paz, where there was a great deal of demand. Whether acting as some kind of legitimate wholesaler of the yareta or charcoal produced by communities in the area, or abusing his authority to force exploitative sales of products, this figure took on the role of an intermediary that effectively evaded provincial controls and taxes. Corregidores, yet another representative of one level of the local state, undermined tax collection for municipal and provincial budgets. Meanwhile, city officials in places like La Paz and Oruro had no interest in ensuring taxes were paid to Corocoro; they only wanted the fuels in their cities. Just as Corocoro did not necessarily benefit much from ensuring that customs were paid on flour or alcohol, for example, other cities did not benefit from ensuring that taxes were paid at the starting point of a product's journey to market if those places were not located within their own jurisdictions. Corregidores, merchants, smugglers, and other could also take advantage of these conflicts of interest. And whether

³⁸⁹ One collector of the salt tax begged Corocoro to just let him pay his way out of the contract instead of attempting to go back and try and collect the tax from the community of Tarqui-Amaya. Box 39, Alcaldía de Corocoro, ALP.

³⁹⁰ Nicanor Oviedo himself was accused of taking goods from indigenous producers of fuel and charcoal, by force, if they did not pay. Box 38, Box 39, Alcaldía de Corocoro, ALP.

it was because of direct resistance or their having been subject to other forms of exploitation by merchants and corregidores, certain local commodities produced by indigenous communities were some of the hardest to register and collect taxes for. Year after year, anyone foolish enough to bid to collect taxes on salt, or charcoal, yareta and taquia produced by nearby indigenous populations found themselves indebted to the municipality and province, and caught in a web of lawsuits.

This degree of involvement by merchants in the affairs of local governments created conflicts between different levels of the state.³⁹¹ Overzealous enforcement of customs payments by a municipal official might have soured relations with merchants. Cities like Oruro and La Paz wanted products on their shelves or in people's kitchens, and they too earned their income from a different set of taxes than the national government. While the endless debates and the letters sent from the national government warning municipal officials throughout the country about their irregular tax collection activities might seem a bit dry, they reveal a profound structural conflict of interest over the fiscal powers of different levels of the state. Municipal and local authorities struggled with the national government over control of the Prestación Vial, taxes on the transit and storage of consumer goods, and the license fees they charged to merchants, because these were the sources of financing local government. These were the funds that built local schools, paid

³⁹¹ A good example can be found in ministerial discussions about the complicity of municipal official in contraband through Sorata, Omasuyos, Larecaja, and Camacho. See: *Memoria presentada a la Legislatura de 1912 por el Dr. Anibal Capriles, Ministro de Gobierno y Fomento* (Bolivia: Talleres Gráficos La Prensa, 1912) page 12 and p.10-11 in Apendix.

teachers, and kept any semblance of local government running. And, these institutions also represented important positions of power in these towns.

National officials understood municipal and departmental transit taxes to be a kind of decentralized customs structure with each municipality acting as if they were their own country - something that large-scale importers using railroads or new cart roads to get to mines and cities objected to. For Congress and the President, this was a constitutional issue.³⁹² The linear model of commerce supported by railroads that fed into industrialized mines and cities needed clear rules and national authority over importation and taxes; local officials benefitted from and were an integral part of the web of non-railroad decentralized commercial circuits and taxes, at least at the beginning of Liberal Party rule. Moving beneath all of these conflicts were the autonomous traders from indigenous populations that did not appear to make agreements with any level of the state over taxes, except, possibly, taxes on their labor if it was a way to stop the abuses of local authorities.

While complaining about dynamics like these, Liberal Party officials at the national level implemented policies that were not substantially different than municipal ones in their nature, rather only in their scale. Contracting out of the Estanco de Alcoholes neither reduced the amount of alcohol entering markets nor did it slow smuggling. It only guaranteed a certain amount of income to the state and put the business in the hands of one

³⁹² See: *El Comercio*, 6 de agosto de 1912, 11 de agosto de 1912; Sección "Municipalidades" en la *Memoria de Gobierno y Fomento presentada al Congreso Ordinario de 1908* (Bolivia: Taller Tipográfico y Litografía Miguel Gamarra, 1908); and Resolución Suprema 20 de enero de 1910 in *Anexos de la Memoria presentada a la Legislatura de 1910* (Bolivia: Talleres Gráficos La Prensa, 1910).

person or company. Despite the moralistic proclamations of Liberal Party politicians at the national level about the problem of alcohol consumption in the countryside and in mining centers, contracting out control of the importation of aguardiente to merchants did not slow consumption. As one merchant controlling the Estanco in the early years of Liberal Party governments plainly stated, any merchant "would try to sell all the alcohol they can... that's life in commerce."³⁹³

The national government placed control of the 'legal' trade in the hands of largescale importers and mine owners, some of whom, like Patiño, held vested interests in promoting their own products and controlling the prices of alcohol in their own mines. Meanwhile, the national government took a swipe at the merchants and traders from indigenous populations that had previously controlled supply and prices. Determining who controlled commerce became as important as regulating it; and this implied making one circuit legal and the other contraband. Local and national authorities did not always agree about 'who' that should be, but they did agree that independent indigenous traders and merchants were not contenders.

³⁹³ The shared interest was money for the state despite the proclamations about reducing alcohol consumption. In 1908 the businessman in charge of the Estanco de Alcoholes responded to criticism that he was allowing too much foreign alcohol into the country by saying that any merchant would "trataran de vender todo el alcohol que pueda.... Esta es la vida comercial." *El Diario*, 18 de noviembre de 1908. If Patino or others who came to handle the Estanco attempted to reduce the quantity of foreign alcohol, or to be more vigilant about stopping contraband, it may have been in order to advance their own investments or production within the country.



Figure 3.3: Photo of houses in Corocoro with storefront entrances (Photographed by author in 2011).

New patterns in exports and imports:

In theory, train transport was traceable and controllable. Goods got on the train, traveled along a single and unalterable path, and were then to be unloaded at points and stations that were fixed and had been declared prior to travel. The technology made commerce a little more legible and meant that officials were no longer dependent on the willingness of transporters to cross borders at the points where the state located offices, provided everyone used the train. The linear form of transport benefitted certain groups of merchants who did not want to be embedded in a region but saw opportunities in trading in and between extractive economic enclaves. Liberals had pushed for a model of development that would concentrate power and capital. In some senses, the Arica – La Paz Railroad produced exactly the kind of economic change they expected.

According to government reports, in 1913, the first year the Arica – La Paz Railroad ran, energy, mining, and other industrial imports rose significantly. The trend continued, with a few exceptions, throughout the years of increased production during World War I.³⁹⁴ Fuel imports into Pacajes rose by over 200% between 1916 and 1917, and large mining companies based in Pacajes began to the use Arica once again to export minerals and ores out of the country in very large quantities.³⁹⁵ Mining exports out of Corocoro, while not reaching the 40,000 ton goal, did reach some impressive levels during those first years, in part driven by World War I. By 1916, Corocoro mining companies increased their copper exports to over 25,000 tons, and the overall export freight handled by Arica – La Paz neared that shipped on the Guaqui Railroad around the same time (1916-1917), though it did not approach the import traffic on the other line.³⁹⁶ Arica came to handle about half of the volume of Bolivian exports moving through Antofagasta.³⁹⁷ During World War 1, the Corocoro Branch of the Arica – La Paz Railroad was, according to the official reports presented to the Congress, the most financially successful line in the country, operating with the highest profit margin even though the running stock was still

³⁹⁴ Apendice a la Memoria presentada a la Legislatura de 1917 (Sección Fomento) (Bolivia: Imprenta y Litografia Artistica, 1917); Memoria presentada a la Legislatura de 1916 por el Sr. Arturo Molina Campero, Ministro de Gobierno y Fomento (Bolivia: Talleres Gráficos La Prensa, 1916); Salluco Sirpa, La explotación del cobre en el distrito minero de Corocoro a principios del siglo XX, 1900-1930.

³⁹⁵ Apendice a la Memoria presentada a la Legislatura de 1917 (Sección Fomento) (Bolivia: Imprenta y Litografía Artistica, 1917); Memoria presentada a la Legislatura de 1916 por el Sr. Arturo Molina Campero, Ministro de Gobierno y Fomento (Bolivia: Talleres Gráficos La Prensa, 1916).

³⁹⁶ Apendice a la Memoria presentada a la Legislatura de 1917 (Sección Fomento) (Bolivia: Imprenta y Litografia Artistica, 1917); Memoria presentada a la Legislatura de 1916 por el Sr. Arturo Molina Campero, Ministro de Gobierno y Fomento (Bolivia: Talleres Gráficos La Prensa, 1916).

³⁹⁷ Ibid.

being rented from Chilean companies. The only area where the larger Arica – La Paz Railroad (and the Corocoro Branch) did not even come close to competing with other rail lines to ports was in passenger traffic. The line moved only a small fraction of the international passengers that their competitors did, a significant percentage of whom only moved between destinations in the province of Pacajes.³⁹⁸

Industrial inputs imported via the Arica – La Paz Railroad in its first decade of operation varied greatly from year to year, a dynamic that might have been due to changes in production processes and the strategies of mining companies in Corocoro. Increases in mineral production during this period were principally the result of the export of a kind of unprocessed copper ore that ministers referred to as 'rosicler.'³⁹⁹ Lower freight costs made it possible and profitable to extract mineral ores and export them without processing. Low quality copper ores required more complicated processing techniques, and those newer industrialized processes do not appear to have been done in the country. These trends in railroad traffic indicate that while the train did facilitate increases in production, it did not lead to as complete an industrialization of production as had been hoped.⁴⁰⁰ The process of

³⁹⁸ The unreliable functioning of the train line connecting Oruro to Viacha may have significantly contributed to the highly local character of passenger traffic and the predominance of minerals from Pacajes in the overall volume of exports. Ibid.

³⁹⁹ This differed from the native copper that had been traditionally mined and processed into 'barrillas' in the Corocoro district. Production and exportation of native copper appeared to hold after the running of the railroad. Ibid.

⁴⁰⁰ Salluco details some of the industrialization of extractive processes like the installation of lines in the mineshafts and increased use of generators and the like. However, I think the growth in exports of nearly entirely unprocessed ores points to the increased production of ores without a corresponding expansion of industrialized mineral and metal processing. Production of minimally processed varillas of copper remained roughly the same in the years before and after the railroad. Salluco Sirpa, *La explotación del cobre en el distrito minero de Corocoro a principios del siglo XX*, 1900-1930.

moving ores from one place to another changed as did the some of the methods of extraction, but industrial processing of ore in the region would come later.⁴⁰¹ Fluctuations in the importation of industrial inputs reflect this. Though customs registered an initial increase of industrial inputs in 1913, likely reflecting initial investments in certain technologies related to the extraction and loading of mineral, those fell during the WWI years in direct relation to increased exports in "rosicler."

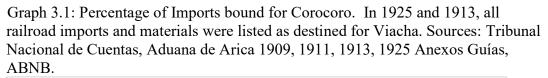


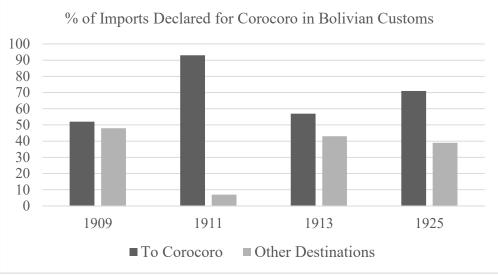
Figure 3.4: Loading platform at the Calacoto Station covered with mineral (Photographed by author in 2012).

⁴⁰¹ Rodríguez Ostria, *Capitalismo, modernización y resistencia popular 1825-1952*; Salluco Sirpa, *La explotación del cobre en el distrito minero de Corocoro a principios del siglo XX, 1900-1930*.

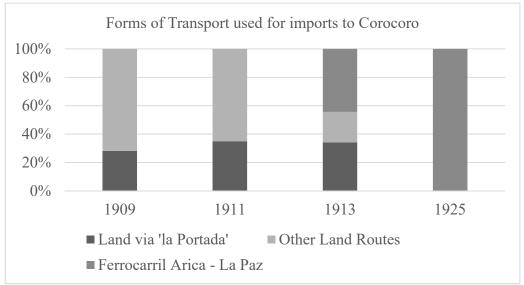
These particular changes recorded in Bolivian customs records from Arica following the inauguration of the railroad were the kind expected and desired by the promoters of the line for the copper mining industry. They were viewed as successes. However, a side by side comparison of the contents of imports and exports through the region both before and after the railroad raises interesting questions: Why do some categories of imports disappear altogether, some exports appear seemingly out of nowhere, and what might this indicate? While no customs papers for individual shipments of imports during the years of WWI remain in archives, records covering the functioning of the train its first year of operation (beginning after its opening for freight in 1913) have been preserved. They show that even though the train ran right by Corocoro, importers of consumer goods to the town did not move their products via that route. Imports bound for the mining center continued to travel over land even during the train's operation.⁴⁰²

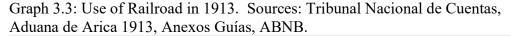
⁴⁰² Tribunal Nacional de Cuentas, Aduana de Arica 1913, Anexos Guías, ABNB.

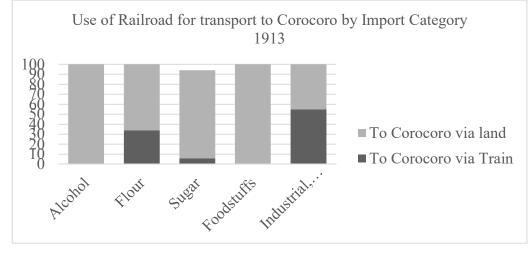




Graph 3.2: Forms of transport used for importation to Corocoro. Sources: Tribunal Nacional de Cuentas, Aduana de Arica 1909, 1911, 1913, 1925, Anexos Guías, ABNB.







Just a little over a decade after the train's inauguration, the import records from Bolivian customs in Charaña show that many merchant's failure to use the train in 1913, wasn't simply a dynamic seen in the first years of the train's operations. In 1925, the next year for which detailed import records have been preserved, nearly all of the imports recorded by customs traveled by train to their destination (99%), and the vast majority were once again bound for Corocoro.⁴⁰³ The high percentage of imports moving via rail was the result of the relocation of the principal customs office to the train station on the border in Charaña. The state relocated customs to fit the train's path, effectively creating border institutions to regulate the train and not much else cross-border traffic.

The contents of imports from 1925 were much less interesting than they had been previously. The railroad company and the two largest mining companies in Corocoro brought in nearly everything, and they nearly exclusively brought in fuel and work

⁴⁰³ Tribunal Nacional de Cuentas, Aduana de Arica 1925, Anexos Guías, ABNB.

materials. Some tools and flour or sugar were the only other goods brought in by merchants.⁴⁰⁴ A few mining companies imported flour by 1925, perhaps a sign of their attempts to create company stores, though they still did not import the largest quantities into Corocoro.⁴⁰⁵ While in the pre-railroad years the importation of goods like flour, sugar, and alcohol had been managed by dozens of different merchants and commercial houses, by 1925 only a few merchants traded via the train, and they did so only in flour and sugar. The concentration of commercial activity running along the rail line mirrored the increasing concentration of capital and power in the mining sector.⁴⁰⁶

The most interesting thing about the Bolivian customs records from Charaña in 1925 is what they don't contain. The Arica – La Paz Railroad brought in nearly half of the imports registered as leaving the port bound for Bolivia, supposedly for its own operations. The volumes of flour coming in to Corocoro represented a very significant increase, one far surpassing the growth in the town's population (an increase that would have made municipal officials who continued to tax the product very happy). However, no luxury items or textiles, no canned foods, no perfume, and surprisingly, not a single drop of alcohol moved through the Bolivian customs houses on this corridor in 1925.⁴⁰⁷ All of

⁴⁰⁵ Large mining companies in Corocoro do not appeared to have controlled worker consumption through pulperias during most of the years of Liberal Party governments, though they had tried. By 1925, they appear to be expanding or creating company stores, though even these records show that much of the flour and sugar imported to the town was still being handled by merchants who though connected to the mining sector, ran a lot of business through Corocoro into places like La Paz. ⁴⁰⁶ Salluco Sirpa, *La explotación del cobre en el distrito minero de Corocoro a principios del siglo XX, 1900-1930*; Elena McGrath, "Pre-Histories of Revolutionary Nationalism and the Welfare State: Corocoro, Bolivia 1918-1930," Zapruder World: An International Journal for the History of Social Conflict 3 (2016).

⁴⁰⁴ Tribunal Nacional de Cuentas, Aduana de Arica 1925, Anexos Guías, ABNB.

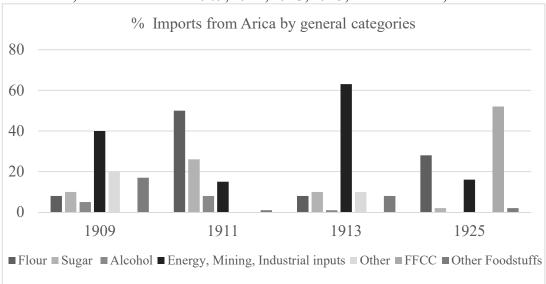
⁴⁰⁷ I have found no evidence of any legal prohibition on the importation of alcohol through this region throughout this time period.

those products dropped off the import records, and with them, many of the merchants that had been active in their trade both in Tacna and in Corocoro in previous decades. Trains had previously been accused of using their exemptions to flood the local markets with certain goods, and at least one mining company in Corocoro would later be suspected of doing the same, however the disappearance of all legal importation of alcohol, even the brand name imports exempt from the Estanco, raises questions about the persistence of commerce beyond the reach of the state.

Records from Tacna during the years between 1913 and 1925 present a very different picture of commerce across the border in the years following the inauguration of the Arica – La Paz Railroad than the one depicted in Bolivian customs records. The Intendencia of Tacna reported on the widespread sale of alcohol in communities and in small towns on both sides of the border surrounding the train line, and told of many caravan guides that had been paid in imported goods like flour or canned goods who were then getting caught trying to transport them back into Bolivia. They also report indigenous merchants trading in coca, coffee, and alcohol across the border.⁴⁰⁸ Officials reported on the continued traffic of goods between the Bolivian and Peruvian altiplano and ports like Sama, none of which would appear in Bolivian records. Included in the list of owners of the caravans of animals heading from Sama to points in Bolivia and back, were many of the same importers listed on the Bolivian customs records as bringing their goods into

⁴⁰⁸ Vol 45, f 245 (1914); Vol 59, f 324, 358, 363 (1919), Vol 61, f17-18, 29-30 (1920), Fondo de la Intendencia de Tacna y Gobernación de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.

Corocoro via Arica only 15 years earlier.⁴⁰⁹ Officials in Tacna and Arica gave the impression that Bolivian producers and merchants of food and alcohol served as important suppliers for mines in the area, and that the cross-border commerce in local products and alcohol, especially trade in those regional products that had always proved problematic for border and customs officials was doing just fine. Those products simply did not use the train.



Graph 3.4: Breakdown of imports from Arica by product. Sources: Tribunal Nacional de Cuentas, Aduana de Arica 1909, 1911, 1913, 1925, Anexos Guías, ABNB.

⁴⁰⁹ Including Oviedo's partners the Vaccaro Hermanos, and others like Canepa and Cia. Vol 59, f 312-314 (1919), Fondo de la Intendencia de Tacna y Gobernación de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.

Emergence of new (old) commodities:

Promoters of the railroad like Josias Harding would have been disappointed with the relatively slow passenger traffic and low levels of importation of consumer goods at the same time that they would have been pleased by the increased exports of minerals from Corocoro. However, exports from Pacajes traveling via the train in the 1920s included far more than copper ores produced by the large industrialized mining companies of the region. A significant percentage of exports recorded at Charaña comprised products that politicians promoting railroads had never discussed: especially wool and even mineral ores produced by very small simple operations that were collected and exported by rescatistas.

Discussions about the Arica project included the potential growth in mining and especially the production in large mines that could be industrialized to increase efficiency, but they didn't address the development of wool production or other commodities.⁴¹⁰ In 1924 and 1925, two years for which more detailed export records are preserved in archives, wool exports brought in more money for Bolivian customs on the border with Chile and Peru than copper exports. For many months during each of these years, that amount surpassed not only the income generated from copper, but the income collected for all other exports through Charaña combined.⁴¹¹ Even though tin produced the vast majority of

⁴¹⁰ The Bolivian Congress had passed laws addressing the traffic of animals, leather and wool, and even suggested a national project to investigate the potential further development of alpaca raising in Carangas, but these debates didn't appear in discussions of railroads. Those seemed heavily focused on urban development and the mining sector.

⁴¹¹ Taxes did not appear to be significantly higher on wool and leather, though mineral exports did slump during the 1920s. Nevertheless the percentage of income generated by wool exports through Charaña was still significant. Tribunal Nacional de Cuentas, Aduana de Charaña, 1924-1925, Anexos Guías, ABNB.

customs income across the country during this period, wool became a particularly lucrative commodity being exported by the Arica – La Paz Railroad from the Pacajes regional economy.

Southern Peru produced and exported large quantities of wool throughout the nineteenth and early twentieth centuries, and wool production was an essential part of the regional economy. This activity has been well-documented and studied by historians writing about that industry.⁴¹² Even with the historiographic focus on Peru, those studies show that the wool trade also involved producers in Pacajes and other parts of Bolivia. The market near Puno (at Vilque) functioned as a central node in the wool trade and in the regional trade of many other products. It was where rescatistas, or buyers and wholesalers of wool, bought up the independent production from communities and small haciendas (including those from the Bolivian altiplano), to then resell in Arequipa or other centers of the trade.⁴¹³ Studies of the major commercial houses dealing in wool based in Arequipa by historians like Galindo, Bonilla, and Bertram, state that especially for the period prior to the functioning of the Arica – La Paz Railroad, the production of wool in this northern part of the Bolivian altiplano flowed through Peruvian commercial houses and ports, though the percentages of Bolivian production within the overall volume remains unknown. The sudden appearance of wool on Bolivian export records did not result from the growth in

⁴¹² Galindo, J, and Oré, *Oligarquia y capital comercial en el sur peruano (1870-1930) ; Notas sobre oligarquia y capitalismo en Arequipa (1870-1940)*; Bertram, "Modernización y cambio en la industria lanera en el sur del Perú 1919-1930"; Bonilla, "Islay y la economía del sur peruano en el siglo XIX."

⁴¹³ Erick D. Langer, "Indian Trade and Ethnic Economies in the Andes, 1780-1880.," *Estudios Interdisciplinarios de América Latina y El Caribe* 15, no. 1 (2014).

production of a new commodity for export, or the sudden imposition of new taxes on that product, but reflected a change in the strategies and methods used by rescatistas to export it.

The records of goods moving across the border in the 1920s did not only detail large quantities of wool moving across the border via they train, they also discuss two other patterns worth discussing because of the insights they provide into the non-centralized nature of production in the regional economy. First, the Intendencia of Tacna registered the traffic of animals across the border and the breeding of animals for different purposes. Movement of llamas, sheep, alpaca, mules, oxen, cows, and goats were recorded by officials in Sama, regions near the border with Pacajes, Carangas, Puno, and likely, areas around Moquegua.⁴¹⁴ These animals were described as being moved for different purposes. Importers who appear on customs records as moving their products via the Arica – La Paz train maintained grazing lands on both sides of the border to raise animals for the benefit of the port and commerce in general⁴¹⁵ Thus even though they used the train to move certain goods, they also provided animals for continued overland traffic and transport of goods heading to and from the port, and likely supplied meat across the border. Though some of these merchants used the train for certain imports and exports, they also

⁴¹⁴ These lists included both indigenous traders and groups of animals moving goods owned by the Vacarro Hermanos (Oviedo's partners) and other commercial houses from Tacna previously identified as dealing extensively with Corocoro. Those commercial houses did not appear on Bolivian customs records after the inauguration of the train. Vol, 61, f 17-19, 29-30 (1920); Vol 59, f 312-314, 358 (1919), Fondo de la Intendencia de Tacna y Gobernación de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.

⁴¹⁵ Vol 336, (1922-1923), Fondo de la Intendencia de Tacna y Gobernación de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.

continued to move some portion of goods via animals into the region, possibly into areas not serviced by the train.

A significant portion of animal traffic recorded points to groups moving animals across the border to sell as food in Tacna and Arica. Those responsible for the movement of these animals crossed ethnic and national divides, with indigenous men and women from the entire cross-border region trading and moving animals right alongside a whole host of traders from different origins, including criollo merchants (many who hired local indigenous caravan guides) and groups identified as Arab and Chinese traders.⁴¹⁶ During the food crisis sparked by the start of World War 1, shepherds in indigenous communities located on the Chilean side of the border took their animals to Corocoro out of fear that they would be sequestered by Chilean authorities who had prohibited the exportation of meat.⁴¹⁷ Whether they crossed the border to continue pasturing the animals, or whether they took them to Corocoro to sell pre-emptively into the mining center is unknown. Either way, it is clear that the traffic in animals and the provision of meat constituted a sector of the local and regional economy that was never registered by the train. And, many reports of this trade, just like alcohol and coca, appeared to indicate that it often involved indigenous traders and community production that continued to circulate in a complex web of cross-border commercial and social relations.

⁴¹⁶ Ibid.

⁴¹⁷ Vol 59, f 363-364 (1919), Fondo de la Intendencia de Tacna y Gobernación de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.

The records also hint at the continued existence of a market for minerals produced by either very small-scale enterprises, or other means (by indigenous communities, caccheo, or by clandestine mining operations). Bolivian customs records in the 1920s registered rescatistas exporting copper, silver, tin, and other rarer minerals via the train, often only vaguely indicating the origins of the metals and ores.⁴¹⁸ Merchants on the coast had formed companies to buy up minerals for export from very small producers long before the train, as early as the 1901 (and quite probably before the downturn in regional trade in the late nineteenth century as well).⁴¹⁹ The persons involved in these operations appear to have followed the same pattern described by Jaime Rosenblitt for commercial houses in the region for the early to mid-nineteenth century.⁴²⁰ Though the export of Bolivian minerals through Arica does not appear to have been documented in the prerailroad years, by the 1920s, rescatistas based out of coastal commercial houses reappear on export records moving tin, silver, and copper, right alongside wool.⁴²¹ In spite of the concentration of the mining industry in Corocoro, small-scale extraction of ores continued in the surrounding areas and those producers used intermediaries just as wool producers did, sometimes even the same ones.

 ⁴¹⁸ Tribunal Nacional de Cuentas, Aduana de Charaña, 1924-1925, Anexos Guías, ABNB.
 ⁴¹⁹ Vol 28, f 28 (1901), Fondo de la Intendencia de Tacna y Gobernación de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.

⁴²⁰ Rosenblitt, "De arrieros a mercaderes. Orígenes de los comerciantes de la región Tacna-Arica, 1776-1794," 2014.

⁴²¹ These minerals could have been bought up from smaller mining companies in the region, but they also could have been the product of caccheo (independent legal extraction) or from clandestine mining operations, which had continued in the Department of La Paz for at least part of the Liberal Party governments. See: *El Comercio*, 7 de febrero de 1912.

Trade patterns mimic those that have been studied in the Colonial Period and early Republican Period.⁴²² As merchants and intermediaries moved through these kinds of overland circuits that were seen before and after the inauguration of the railroad, they bought and sold along the way from ports to those productive centers that were nodes in the regional economy. They accumulated capital and relationships that permitted the growth of their operations, and continued trading in everything from export commodities to the local foods needed for consumption by everyone in the region. Residents of growing mining and urban centers at the start of the twentieth century needed more than imports of alcohol or flour to live. Vegetables, potatoes and chuño, meat, dairy, cooking fuels, salt, simple alcohols, coca, and chicha constituted the bulk of most people's daily consumption. Merchants that engaged in this form of mobile commerce articulated both global and local networks and appear to have done this before the railroad, just as the overland traffic and trade that was labelled 'contraband' continued to do this afterwards. The producers and consumers within this market often didn't live along the train lines or at the large and important stations. Transforming or redrawing the maps of commercial geography and the relationships built throughout regions was a long-term project that the inauguration of a train didn't achieve overnight.

Moreover, just as the discussions of politics and modernization produced by trains had ignored the relevance of the indigenous world in the nation's political struggles, the model of train development overlooked the deep integration of commerce into rural areas

⁴²² See, among others: Ximena Medinaceli, *Sariri: Los Llameros y La Construcción de La Sociedad Colonial* (Bolivia: Plural Editores, 2010).

of the highlands. The proliferation of merchants and commercial activity into regions like those in Pacajes was reflected in the Bolivian census of 1900. At the start of the twentieth century, government officials reported similar percentages of merchants in rural populations and provinces as in some of the nation's major cities. The census of 1900 reported that 82% of the population of the Pacajes lived in rural areas, the overwhelming majority of whom were identified as indigenous.⁴²³ However, approximately the same number of persons in Pacajes earned their living through commerce as in La Paz. This number either meant that every resident of an urban area of Pacajes earned their living from commerce (and 'urban' included very small towns), or that merchants were dispersed into both rural and urban areas. Census officials stated that they only recorded that profession for those persons who relied on it for their livelihood and participated in registered commercial activity (possibly those paying licenses to operate). Though some of these 'professions' are questionable because of widespread patterns of multiple economic activities (wage labor, agriculture, and trade) within indigenous communities, the authorities tightly limited this census category. The census did not include agricultural producers or shepherds who sold their goods occasionally in the category of merchant, nor did it include all those other persons who produced goods for trade, like wool and textiles, or who participated in the movement of goods and raised pack animals.⁴²⁴ In other words, even though the Liberal Party development of trains in the region would increase the

⁴²³ Gamarra, Censo General de La Población de La República de Bolivia Según El Empadronamiento de 10. de Septiembre de 1900., 1902.

⁴²⁴ Pacajes recorded very high percentages of persons listed as making textiles, yarn, raising animals for wool and meat, and relatively fewer agriculturalists than other provinces in the Department of La Paz. However, I suspect that communities often engaged in some combination of all of these activities to different degrees and when necessary.

importance of mining, and as a consequence, concentrate a significant proportion of international commerce in the hands of those with ties to capital in ports and major mining centers, a very significant portion of the region's population had relied on these older circuits and patterns of trade for their livelihoods. Changing those patterns involved upending the network of social relations that had maintained the region's economy.

Widespread participation in commerce, like that seen in Pacajes, was not exceptional; it reflected patterns in provinces across the Bolivian altiplano. Omasuyos, where over 92% of the population was listed as residents of rural areas, was reported to have 7% of its population participating in registered commerce.⁴²⁵ Across the Department of La Paz, between 4 to 13% of residents of very rural provinces reported being professional merchants, compared to 10% of the population in the urban center of the city of La Paz. Some very rural provinces like Inquisivi had higher percentages of their population active in commerce than the city of La Paz. The abundant descriptions of widespread participation in commerce across the border call attention to the historical roots of merchant activity and commodity production within indigenous communities that have typically been understood as campesinos nearly exclusively engaged in agricultural production.⁴²⁶

⁴²⁵ Gamarra, Censo General de La Población de La República de Bolivia Según El Empadronamiento de 10. de Septiembre de 1900., 1902.

⁴²⁶ William Roseberry, *Anthropologies and Histories: Essays in Culture, History, and Political Economy* (Rutgers University Press, 1989); Harris et al., *La participación indígena en los mercados surandinos*; Langer, "Bringing the Economic Back In"; Langer, "Indian Trade and Ethnic Economies in the Andes, 1780-1880."

No national or regional censuses were finished after the 1900 effort until about mid-twentieth century, though some local censuses and data were published by city governments and politicians. Those show two very clear demographic patterns following the inauguration of different railroads in the Department of La Paz. First, they show increasing urbanization of the towns in the region. La Paz grew significantly, though perhaps not at the rates seen in the mid-twentieth century.⁴²⁷ Corocoro was described as having undergone an exponential growth in population.⁴²⁸ The sub-prefect of Pacajes, writing in the mid-1910s, talked about the expansion of the mine labor workforce in clear and somewhat depressing terms. For Eduardo Lima, the town had grown, mines had grown, but not necessarily in the desired way. He depicted the area as one suddenly filled with desperate people working in poor conditions, and merchants who were ever more agitated about the state of affairs. Lima described the beginning of the transformation of Corocoro from an important regional political and commercial center into a mining camp, and most of its inhabitants had not benefitted from this shift.

By 1919 and 1920, tensions along the border had sharpened, but not necessarily between nations. Applications for licenses to carry firearms increased, many made by traders and transporters moving goods and animals between the three nations.⁴²⁹ Despite the lack of alcohol imports recorded in Bolivian customs, officials described tambos

⁴²⁷ Luis S. Crespo, Censo Municipal de La Ciudad de La Paz. Comision Central Del Censo (Bolivia: Taller Tipografía Litográfica de José Miguel Gamarra, 1910); Klein, A Concise History of Bolivia, 2003; Eduardo A. Lima, Corocoro: apuntes, críticas y observaciones (Salesiana, 1918).
⁴²⁸ Lima, Corocoro: apuntes, críticas y observaciones; Salluco Sirpa, La explotación del cobre en el distrito minero de Corocoro a principios del siglo XX, 1900-1930.

⁴²⁹ Vol 336, (1923), Fondo de la Intendencia de Tacna y Gobernación de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.

increasing their sale of contraband alcohol.⁴³⁰ Bolivian production of alcohol and coca, and Bolivian merchants of both products, supplied many mining centers in Tarapacá and southern Peru, and Eduardo Lima described the expansion of peripheral fairs on the edges of Corocoro that supplied a poor and growing population.⁴³¹ The networks of rural commerce and economic activity tied to indigenous communities and the poorer rungs of non-indigenous merchants were not erased by the concentrated powers using the train for imports and export; they remained a part of the region's rural economic activity. Those circuits became increasingly marginalized and pushed into the shadows during a period of chaotic social change.

While the Liberal Party negotiated with municipalities and prefects over certain issues, the concentration of specific forms of commerce into the hands of fewer merchants and the displacement of other circuits to the margins of the railroad geography, gave the Bolivian government a powerful tool to override local disobedience: they could split political jurisdictions.⁴³² The growth of Viacha, a town that grew in power and population as a result of the decision to place railroad workshops and transfer stations from nearly all of the important rail lines crossing the northern altiplano within the town, created a new and important demographic center. Similar processes unfolded across the altiplano. As

⁴³⁰ Vol 44, (1916), Fondo de la Intendencia de Tacna y Gobernación de Arica, Archivo Histórico Vicente Dagnino, Universidad de Tarapacá.

⁴³¹ Lima, *Corocoro: apuntes, críticas y observaciones.*

⁴³² These demographic changes were long-term processes. The division of jurisdictions, the creation of new provinces and municipalities occurred across the altiplano, even for many years after the inauguration of new railroads and the end of the Liberal Party's power. One of the most dramatic examples was the creation of the planned town of Villazón, to provide the Bolivian city at the end of the Argentine railroad to the border, and the push for its economic independence (in terms of taxes) from Tupiza.

populations grew around new stations and centers, the Liberal Party saw the very real need to create new political institutions in these spaces, while it also saw an opportunity to occupy the political landscape that emerged with the creation of new jurisdictions. In Corocoro, the decision to break off a good part of the province, create a new one (Ingavi) even before the inauguration of the Arica – La Paz Railroad, and place that new political and administrative center in Viacha was not well-received by other local authorities, who understood that this move would take from them a significant portion of trade and tax income – and power.⁴³³ Corocoro had always been a mining center, yes – but it had also been a commercial, judicial, and political center.⁴³⁴ The Liberal Party's railroad project had created new political and population centers that depended on the railroad geography and model of development, and that reduced Corocoro's monopoly on regional political power.⁴³⁵

Discussion:

National officials called some of the commerce flowing through Pacajes and the border region contraband, both before and after the railroad. Doing this ignored part of the nature of trade in the region and its historical construction. Just as the Treaty of 1904 got the railroad built, it also redefined the border and state institutions in different ways. Trade

⁴³³ Box 38, Alcaldia de Corocoro, ALP. Ley 16 de diciembre 1909; Ley 20 septiembre de 1912.
⁴³⁴ The creation of Ingavi even led to proposals to make it a center where imported flour could be stored tax-free, something that challenged one of the foundations of the local budgets in Corocoro. Why store flour in Pacajes if you could do it in Viacha, just a little further along the railroad, for free?

⁴³⁵ In Viacha, the presence of the Federación Obrera and other worker's organizations, many connected to the railroad, also created new political dynamics that the Liberal Party had to deal with. Hence, the appearance of Liberal Party presidents in events in Viacha during periods of potential labor unrest *.El Comercio*, 11 de Agosto de 1912, "Ingavi".

across the region was founded on commercial circuits dating back to the early Colonial Period. It was profoundly changed by the transformation of macro-economic patterns and transport technology, but it also attempted to adapt to it. Part of the reason behind this was because, during the downturns in the regional economy, these circuits did not only serve mining centers but rather the entire cross-border area. When merchants slipped in and out of national export and import records, they were not suddenly choosing to smuggle one good or another, they were continuing with a pattern of trade that did not fit into the geography and power structure being created by the railroad. They moved and worked in areas that had not been prioritized by state reforms. The regional trade often confounded customs officials who did not understand how to register it, were frustrated by how it escaped them, or who were annoyed by the confusion over how it fit into national norms for imports and exports. However, it was the web that brought much of the food to people's tables.

Liberal Party leaders at the national level struggled with local governments that had been built by these circuits and depended on them. Merchants not only occupied positions in municipalities, they provided the funds for the operation of the state at the local level. Contradictions within the state provided openings for many to operate or live at the edge of state control. When the nation moved customs infrastructure to fit the train's path, they captured the growing flows of goods moving along that path and within the parts of the economy that had constituted the focus of liberal development goals. However, these changes also made other commercial circuits invisible. On the ground, those that did not necessarily benefit from the changes sparked by the train continued to use the overland

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routes that the creation of new state institutions had effectively made increasingly illegible. Centralizing the state, something the Liberal Party has been describe as putting high on its agenda, did not happen overnight, was a negotiated process, and most importantly, was often negotiated from within the state. Both the pre-railroad and the post-railroad regional economies connected local producers and consumers to international hubs of trade, even if only through intermediaries. The questions surrounding changes in the regional economy were not whether to connect Pacajes to the port, but rather which set of relationships and interests should, would, or could, be connected by the railroad.

Those left out of the negotiated transformation of the region and the state that accompanied the train had to shift strategies if they were to survive these changes, and no group was more effected by this than the indigenous populations of Pacajes. While some non-indigenous merchants and traders did get a seat at the table during the discussion of new economic dynamics and the state institutions being formed, the most powerful traders from indigenous populations were uniformly excluded. This occurred at the national level with high-volume commerce in goods like alcohol, but it also occurred at the local level within marketplaces. While export patterns do point to indigenous communities producing certain commodities during this time period, the construction of economic power highlighted the existence of divisions in the regional economy along ethnic lines. These divisions were perhaps most clearly seen in the local marketplaces.

CHAPTER FOUR: LIBERAL MARKETPLACES

Introduction:

Trade across the province of Pacajes, both before and after the construction of the Arica - La Paz Railroad, shaped many aspects of life within the region. It brought in revenues for local governments, while the persons involved in this commerce were woven into economic and political power structures. At the national level, the relationships between politicians, mine owners, and businessmen appeared very much the same. The combination of new technologies and the transformation of industries fomented concentration of power and money – as it was meant to do. However, these shifts in relationships did not occur without conflict, whether between municipalities and the national government, merchants and border officials, or between people going about their lives in the marketplaces and on the streets of smaller towns and cities.

Promoters of railroads often wrote about their real or imagined projects with a focus on macroeconomic changes. However, at the local level, in towns like Corocoro, the effects of these projects were felt in daily life, and many people's responses to them also occurred in markets and streets. Municipal and provincial authorities in Pacajes spent a significant portion of their time dealing with people who had not been included in decisions about development and modernization of transport infrastructure and industry. These officials mediated conflicts between guild-affiliated market vendors, butchers, bakers, and residents looking for food and work. Just as transforming life in the altiplano at the national level had involved mediating and balancing collective or corporate interests, local governance was focused on doing the same within the marketplace. The very visible

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hand of the state shaped the micro economy and the subjects within it. Far from minutiae, conflicts over something as simple as the right to sell bread, revealed how power worked. Fights over food prices, the rights to sell, who could and should engage in commerce and where they could do that, were all struggles over much more complex social questions.

Having discussed regional trade, it is important to examine social relations and tensions in the markets of Pacajes and the town of Corocoro. I identify efforts in local government to cater to the sometimes conflicting interests of importers, mining companies, market guilds, and other sectors of the local population. As the Liberal Party model of development expanded into the daily lives of residents, it altered relationships and power, and brought about structural and demographic changes and new public demands. In response, the state created new taxes, transformed the spaces allocated for commerce, implemented disciplinary and fiscal controls. Colonial policies were resuscitated alongside modern ones, just as had been done with the Prestación Vial.

Women of all backgrounds figured prominently in the local marketplace. Therefore, this discussion of colonial power and social divisions in markets reveals connections between the global and the very local, but it also shows how gendered and racialized divisions worked within a local market throughout the period of Liberal Party governments. Discussions of the future involved colonial beliefs about Indians and modern discourses surrounding race and hygiene. Struggles between female vendors of food in Coroccoro reflected the larger national struggles for power, inclusion, and exclusion. Far from simple occupants of market stalls, women in these occupations intervened in local politics, pushed back on other persons involved in commerce, and participated in the

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reshaping of power relations – though they were not always successful. Perhaps most importantly, women were at the center of food circulation, and surprisingly, capital circulation among poor and working classes. These women from all backgrounds constituted another one of the groups most affected by Liberal economic changes, because of their central roles in family and community survival.

Making markets, feeding people:

Importers of flour, cognac, or those supplying certain materials for the mining sector comprised only one link in the chain of regional commerce in Pacajes. Despite their power, they did not even constitute the majority of persons involved in trade or who held a stake in commerce. Market vendors, intermediaries, indigenous populations in rural communities and those laboring in mines and on haciendas, specialized laborers and artisans, and other urban residents, all represented important segments of the population that could either challenge local state authority or play roles that facilitated its agenda. Changes or distortions in the economy that made it hard for any of these other groups to eat and feed their families became flashpoints of conflict. And, as discussed in the previous chapter, trade in imports and certain exports was not disconnected from the distribution chain of basic or local foods. While the municipality benefited from the tax revenue generated by importers and therefore usually left them along alone, if supplies of food ran short or prices rose too high, local governments intervened.

In 1904, the municipal government in Corocoro received complaints about the prices of food in town.⁴³⁶ The town faced both shortages of basic goods and rising food costs. The writers of these letters argued that intermediaries in the town bought from importers at high prices and then resold goods in town at markups of over 40%. According to the letter writers, this meant that most foods were now beyond the reach of the town's poor population. Fears of social unrest grew. One person, Mr. Bernal, a politically active resident of the town, provided more details about the causes of these dynamics:

... the importers, coming to place their goods in the market of the plaza, meet with the *regatonas* and vendors one or two miles outside the town, and these persons, under the pretext of getting those to their houses, contract the entire shipment, of potatoes, eggs, chuños, etc...., without anyone else intervening in the sale – the sale completed, the product goes to market with a big markup and the poor, who make up most of our population, the miner also, in general buy it at this high price...⁴³⁷

In other words, many importers traveling through the region sold goods through local intermediaries and regatonas (resellers from the central plaza or small shops who were mostly women), instead of selling directly to local consumers.⁴³⁸ Many of the goods they listed were agricultural products that would have been produced in the altiplano and not

⁴³⁶ Box 39, Alcaldía de Corocoro, ALP. [mislabeled as Juzgado de Pacajes]

⁴³⁷ "Resulta pues que los importadores viniendo a poner sus artículos en el mercado publicó a la plaza más claramente, tropiezan una o dos millas afuera de la ciudad con las regatonas y otros abarcadores y estos bajo pretexto de hacerlos llegar a su casa contratas todo el cargamento sean papas huevos chuños etc. Sin que en la compra intervenga ninguna otra persona – consumado así la compra sale al mercado con fuerte alza y el pobre, que forma la mayor parte de nuestra población el minero en general lo compra también a precio subido…." Box 39, Alcaldía de Corocoro, ALP. [mislabeled as Juzgado de Pacajes]

⁴³⁸ Regatonas, nearly all (if not always all) women, comprised a group of resellers of a variety of goods in the town plaza. A registry of regatona guild members from 1901 lists the composition of the group and their placement within the markets of the town's central plaza. Box 38, Alcaldía de Corocoro, ALP.

brought in on a ship through Arica or another port. These were products picked up for sale by importers and caravans while conducting business in their moving commercial circuits through rural and urban areas. Just like importers trading in this manner, the women buying these goods and taking them into town for sale in the marketplace formed part of a network of relationships linking global and local production.

Bernal proposed establishing a new market, a municipal 'Abasto,' to lower costs and increase supplies of basic foods. Under the scheme, the town would guarantee both housing for producers who wished to sell their products directly in Corocoro and a space for sale of their goods to both other vendors and the general public, in exchange for a 10% fee that would go to the municipality for upkeep and rent of the facilities.⁴³⁹ Again, he supplied more specifics:

The obligation the municipality would take on to compete with the importers to bring articles to the Abasto is understood to be with the producers, Indians and hacendados, who are not buying from any plaza, take their products to sell in this market – more specifically these are from Copacabana, Carabuco, Escoma, Guaicho, Sorata, Achacachi, Juli, Pomata, Puno, Ylari, Guaqui, Taraco and other places to the north, from Umala, Ayo, Topohoco, some of our eastern valleys and other places. Of the hacendados, we understand them to be those that do not consign their goods (there are also hacendados among the Indians)....⁴⁴⁰

⁴³⁹ Box 39, Alcaldía de Corocoro, ALP. [mislabeled as Juzgado de Pacajes]

⁴⁴⁰ "La obligación que contraería la municipalidad de competer a los importadores de llevar sus artículos al abasto, se entiende pues, con los indios y hacendados productores que sino comprar de ninguna plaza, toman sus frutas para venderlos en este mercado- estos son precisamente los de Copacabana, carabuco, escoma, guaicho, Sorata, Achacachi, juli, pomata, puno, ylari, guaqui, taraco, y otros puntos del norte, umala, ayo, topohoco, algunas valles de nuestro oriente y otros puntos … en cuanto a los hacendados se entiende de aquellos que no consignan sus artículos (hacendados también hay entre indios). Box 39, Alcaldía de Corocoro, ALP. [mislabeled as Juzgado de Pacajes].

Bernal's proposal aimed to get sellers from indigenous communities and haciendas who did not deal through importers, directly into the new Mercado de Abasto where the local government could work to control prices.



Figure 4.1: Map of indigenous communities identified as trading in Corocoro markets in 1904.

The description of market dynamics reveals several things. Half of the communities identified as selling into the town market that were described as 'local' at various points in

these conversations were (and are) located on the Peruvian side of the border, not in Bolivia. Indigenous communities from Juli and Puno moved goods into Pacajes with the same frequency as those from Achacachi or Sorata. Moreover, the geographic range of the communities and haciendas described as selling in the town hint at the distances traveled by indigenous sellers and producers to get their goods into marketplaces across the altiplano. Sorata and the valleys of Cochabamba are all much farther from Corocoro than the border with Chile or the city of Oruro, and some of the communities, like Puno, are nearly as far from Corocoro as Arica. Not only did authorities in Corocoro see some crossborder trade as basically local, regardless of national maps, but indigenous populations trading in potatoes also effectively acted as though they did as well, incorporating Bolivian towns and mining centers in their trading circuits.

Bernal described the project as one that would create competition for importers, however, the details he provided about how local trade functioned, and who would be included and excluded from the new scheme indicate that the real effect would not be so simple. The Abasto project pointed to a realignment of power in the marketplace. Not all products were to be included in the plan, nor were all traders.⁴⁴¹ Bernal detailed the exemptions: "The merchants in goods that are of primary necessity are: Julian Herrera, Valenzuela, Calvina, and others..... they cannot be obligated to bring their goods to the Abasto, because they are not in the same conditions as those mentioned previously. These

⁴⁴¹ More specifically, the municipality did not consider communities or haciendas crossing the border with goods to be importing anything.

can sell as they wish anywhere...⁷⁴⁴² Large-scale importers were not required to participate in the Mercado de Abasto. The Herreras and Valenzuelas (whose businesses worked similarly to Oviedo's and the Vaccaros though registered more mineral exports through Guaqui) could continue selling to regatonas from the plaza and into other stores in the town and elsewhere. Alcohol, imported flour, and sugar were not included in any discussion about the basic and necessary foodstuffs to be brought into the Abasto or to be regulated in the local market. Moreover, many of the names of merchants he mentioned also appear to have had very close ties to mining companies operating in the region. Perhaps because of this, municipal records do not convey any significant discontent on the part of importers or mining companies over these proposed interventions.⁴⁴³

Supporters of the project did foresee a different objection to their plan: the costs that would be assumed by the local government.⁴⁴⁴ In defense of the Abasto, some in Corocoro articulated a very clear position about the role of a municipal government:

The municipality is created to attend to the needs of the people, and especially the people in need, the proletariat, and one of the vital necessities [...] is life, for the conservation of which the municipality should abandon everything [...] If the Abasto is one of the most practical

⁴⁴² Los negociantes en artículos de primera necesidad como lo son aquí: Julián Herrera, Valenzuela, Calsina y tantos otros de este género no podrán ser obligados a llevar sus mercaderías al abasto, por que no están en igual condición con los anteriormente citados. Estos pueden vender como mejor les plazca y en cualquier lugar....." Box 39, Alcaldía de Corocoro, ALPz. [mislabeled as Juzgado de Pacajes]

⁴⁴³ As of yet, I have found no protests or objections to this particular plan by importers. Later conflicts surrounding increases in taxes for licenses to operate commercial enterprises in the town are common.

⁴⁴⁴ Anticipating this kind of objection may have been common sense, given the allocation of funds by the national government for markets in other cities (when those cities pushed Congress to help fund the projects), and the discussion over the need to make the investment in La Paz's markets.

ways, the town should make the sacrifice for the people and find the funds. $^{\rm 445}$

And Bernal continued describing the existence of similar markets in other mining areas: "In all of the mining centers, Guanchaca, Oruro, and others, there exist Abastos if not just for the simple aim of benefiting the poor miner, for whom it is necessary to provide more or less cheap nutrition, because they earn little and exert themselves much."⁴⁴⁶ Other towns across the Bolivian highlands were working to either establish new markets or refurbish and formalize those that already existed during this period.⁴⁴⁷ Moreover, these were markets that would be established by local governments, and at least in theory, the state could work to control prices within them. Throughout the period of Liberal Party governments, Congress reassigned taxes so that some mining centers and large cities could do just what Bernal had proposed. Even before 1904, cities like Oruro had intervened to build markets and set price limits for urban residents and the mining workforce. Other cities would follow suit over the next 20 years.

⁴⁴⁵ Quote: "La municipalidad esta pues creada para velar por las necesidades del pueblo y especialmente del pueblo que necesita, del pueblo proletario y una de las necesidades vitales y una playable es la vida, por cuya conservación debe abandonar todo el municipio, esta tiene el derecho de buscar el mayor beneficio posible para el pueble si el abasto es uno de los más prácticos, debe hacerse una sacrificio por el pueblo y para el pueblo buscar fondos." Box 39, Alcaldía de Corocoro, ALP. [mislabeled as Juzgado de Pacajes]

⁴⁴⁶ Quote: "En todos los centros mineros, Guanchaca, Oruro, y otros, existen casas de abasto no por simple objeto sino por beneficiar al pobre minero a quien es preciso proporcionarle el medio de alimentación bastante más o menos barata porque gana poco y consume mayor fuerza." Box 39, Alcaldía de Corocoro, ALP. [mislabeled as Juzgado de Pacajes]

⁴⁴⁷ *El Diario*, 23 de diciembre de 1908, "Mercado Principal" and various other projects throughout the country authorized by the national government, see: Ley de 22 de octubre de 1913; Le de 9 de noviembre de 1918; 24 de noviembre de 1914; 19 de enero de 1900;

The argument placing the responsibility for these kinds of interventions squarely in the realm of municipal responsibilities is interesting for several reasons. The national government, in this early period of Liberal Party rule, rarely spoke of the proletariat or the fate of mine workers except to state that more bodies were needed to work in all industries and modernization projects. However, municipalities and mining centers sensed an urgency about these questions and others related to the growing populations of their towns. Authorities in Corocoro moved before the national government to fund other kinds of proposals aimed at ameliorating discontent in mining centers, very rudimentary (and problematic) health programs, and subsidies for certain mutual aid societies.⁴⁴⁸ Projects like the Abasto spoke to the awareness of local authorities at the municipal level of the potential "Labor Problem" in their own towns nearly a decade before it appeared as a recurrent and serious item on the national agenda or in national newspapers.⁴⁴⁹

However, this discussion also reveals the lack of mining company control over worker's food and daily consumption. In other mining centers in Bolivia during this same period, mine owners were aggressively moving to establish company stores and prohibit

⁴⁴⁸ These programs included the creation of a town library, public subsidies for pharmacies to lower prices, even though by 1919 the rudimentary hospital would be under full control of the Cia Corocoro de Bolivia, it does not appear to have always been so. By 1912, the town was subsidizing at least some activities of the Sociedad Obreros de la Cruz. By 1919, proposals for a night school and a school for artisans (a demand of labor federations for 10 years prior) were being taken up by the municipality. Mineworkers engaged in some curt exchanges with the town council over how to arrange hours for the school so that it would fit into their work schedules... Box 39, Box 73, Alcaldía de Corocoro, ALP. In La Paz, the government donated land to the "Obreros de la Cruz" so that they could establish a social club for similar activities. Decreto Supremo de 26 de noviembre de 1906, and Ley de 16 de Agosto de 1911.

⁴⁴⁹ Drinot, *The Allure of Labor*.

the growth of markets trading in cash and not scrip.⁴⁵⁰ In Corocoro, and quite possibly in other mining centers like it with a history of more dispersed patterns of mine ownership and more diversified economies, company stores did yet dominate the marketplace. The connections between local government finances and the larger merchants in the region, hint that companies who sought to establish their own stores and company scrip may have encountered resistance from powerful local figures and workers, at least until a restructuring of the local power structure and state financing changed the interests at play. Power in the marketplace and the role of guilds:

The decision to leave many importers alone while moving other sellers into the Abasto effectively pushed any potential tensions created by the project further down the chain of commercial relationships. Separating flour, sugar, and imported alcohol from vegetables, potatoes, chuño, aji and other local products, maintained importer autonomy from the state when it came to the sale and management of their overseas products, and reinforced the physical separation of foods according to the wealth of the seller and consumer. Not everyone in Corocoro bought the vermouth or condensed milk that made it into stores and storage houses. However, everyone bought the basic goods that would be sold in both the town plaza and the Mercado de Abasto. The Abasto project did not create competition between flour importers, but rather between bakers and buyers, and between

⁴⁵⁰ Contreras describes attempts to fine mineworkers who bought supplies outside of company stores in other mining camps. Contreras, "Mano de Obra En La Minería Estañifera de Principios Del Siglo, 1900-1925"; Contreras, *Tecnología Moderna En Los Andes: Minería e Ingeniería En Bolivia En El Siglo XX. La Paz:*

the vendors of potatoes, chuño, fruits and vegetables who were to now occupy different marketplaces.⁴⁵¹

Some of this competition between vendors of everyday foodstuffs throughout the town pre-dated the Abasto Project. In this sense, it might be more accurate to characterize the project as formalizing two pre-existing markets instead of creating a new one, and bringing them under the control of the local state. It might have also been a sign that the municipality would not protect any one group of small-scale vendors. The producers and sellers that were to be shuffled into the new market had already been selling in and around the town in one way or another, in competition with the vendors in the plaza who were well-organized into guilds. The project created two markets; one that was principally organized and managed by registered guild vendors, and another comprised mostly of indigenous men and women.

How far back guild organization among market women in the town plaza reaches is unknown at this point, but even several years prior to the Abasto plans those collectives were coordinating with the municipality to determine the layout of stalls in the town's plaza and which members would occupy them.⁴⁵² This coordination does not appear in the

⁴⁵² Guilds were active throughout the 19th century in Bolivia, and during the Colonial Period. Research has tended to address men in professional guilds up until the 1930s, when women appeared as forces within anarchist and socialist movements. See: Colonial and Republican Era references to guilds: Karen Spalding, "Social Climbers: Changing Patterns of Mobility among the Indians of Colonial Peru.," *Hispanic American Historical Review* 1, no. 4 (1970): 645–64; Kuenzli, "Acting Inca"; Ivanna Margarucci, "Cocinando La Revolución En La Ciudad de La Paz, 1927-1946," *Archivos de Historia Del Movimiento Obrero y La Izquierda*, no. 7 (2015): 79–99; Ineke Dibbits and Taller de Historia y Participación de la Mujer (La Paz, *Polleras libertarias: Federación Obrera Femenina, 1927-1964* (La Paz: Taller de Historia y Participación de la Mujer,

⁴⁵¹ Some bakers appear to have bought through pre-designated providers of flour. Box 39, Alcaldía de Corocoro, ALP.

documentation to be the result of a major reform, but rather a commonplace and regular conversation between the guilds comprised nearly entirely of women (roughly 95%) and the town. This particular relationship between guilds and the local state had resulted in negotiated spaces of formal commerce for part of the town prior to the Abasto and the railroad.

Registers of guild members in the central plaza from 1901 listed over 220 members, with groups separated according to the service they provided and the goods they sold.⁴⁵³ Many groupings were very specific. They included guilds of fruit sellers, flower sellers, vegetable sellers, bread sellers and bakers, those dealing in onions and garlic or only in ají, and of course, regatonas. The list also separated out clothes washers, cobblers, and copper merchants or 'cobreras' (who bought mineral for resale to rescatistas).⁴⁵⁴ They were grouped very much like markets in Bolivia today, where sellers of the same products

^{1986);} Eugenia Bridikhina, "La mujer, en la historia de Bolivia : imágenes y realidades de la colonia, antología," 2000; Silvia Rivera Cusicanqui, *Los artesanos libertarios y la ética del trabajo* (Ediciones del THOA, 1988); Guillermo Lora, *Historia del movimiento obrero boliviano 1848-1900.* (La Paz: Editorial "Los Amigos del Libro," 1967).

⁴⁵³ Box 38 (1901), Alcaldía de Corocoro, ALP.

⁴⁵⁴ The presence of cobreras in the Marketplace and listed as having created their own guild suggests that a separate market for copper ores existed within the town. Rodriguez Ostria and others indicate that this practice of buying up smaller quantities of ores in marketplaces was linked to the continued practice of caccheo or kajcheo, terms that either refer to the semi-sanctioned harvesting of minerals by mineworkers on their time off, or a labor arrangement which involved companies paying workers for a percentage of what they brought out of the mines. The second arrangement occurred alongside direct employment of mineworkers in places like Potosi well into the 20th century. Some of the questions raised by the continued presence of these cobreras in the plaza of Corocoro are the degree to which this activity occurred, how formal was the arrangement, and how did this mineral get to market. Absi points to these activities as being tightly connected both to continued links between indigenous communities and mine labor, and as being precursors to the mineworker cooperatives so dominant in the Bolivian mining industry today. Rodríguez Ostria, *Capitalismo, modernización y resistencia popular 1825-1952*; Pascale Absi, *Los ministros del diablo: El trabajo y sus representaciones en las minas de Potosi* (Institut français d'études andines, 2005); Jane E. Mangan, *Trading Roles* (Duke University Press, 2005).

are all located together, side by side. There were more vendors than there were spaces or stalls in the town plaza, but the guilds resolved this by providing the municipality with a list of members who had priority in occupying stalls on different days.⁴⁵⁵

Yet, if guild-affiliated women effectively organized the town's marketplace prior to 1904, where did the vendors Bernal sought to funnel into the Abasto sell their goods before this project? It is clear that they sold their goods everywhere and anywhere they could or were permitted to by the women of the guilds.⁴⁵⁶ While Bernal only discussed the problems created by regatonas buying from importers, vendors from the market in the plaza also bought from indigenous women and men bringing their products to the town. Groups not selling their products to guild members or intermediaries for placement in the central plaza, sold on side streets and on the outskirts of town, in temporary fairs. Though the women in the guilds marked their territory within the central plaza, they engaged in commerce outside of that space as the buyers of products from indigenous producers. All residents of the town would have bought the kinds of products sold by guild women, though not just anyone could sell where they liked. Which vendor worked in what space very much depended on who that person was, and guild membership was key for ensuring the right to move freely and seek out the support of the state. Gender, identity and race, urban or rural residence, and as a consequence, degrees of access to the local state, were all intertwined in complicated ways.

⁴⁵⁵ The regular interaction between market guild leadership and the municipality often involved the territorial limits that had been established in this relationship between vendor and state. Box 38, Alcaldía de Corocoro, ALP.

^{456 456} Box 39, Alcaldía de Corocoro [mislabeled as Juzgado de Pacajes]; Box 40, Alcaldía de Corocoro, ALP. [mislabeled as Juzgado de Pacajes]

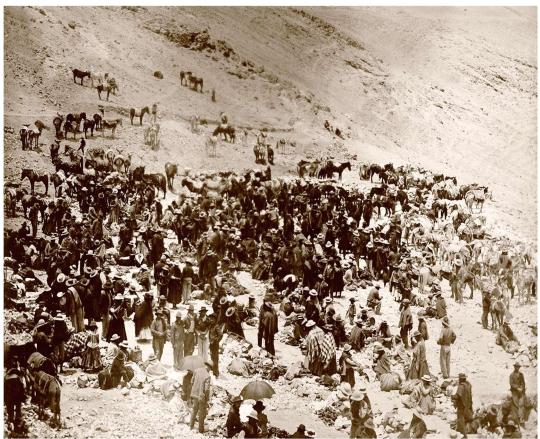


Figure 4.2: Photo of a campesino market on the outskirts of Oruro at the end of the nineteenth century. Communities from across Pacajes, including those identified as selling in Corocoro, also traveled to this market. The transitory and informal nature of campesino markets on the outskirts of mining towns was described by writers like Eduardo Lima, and by historians like Manuel Contreras. (Photo from turn-of-the-century postcard)

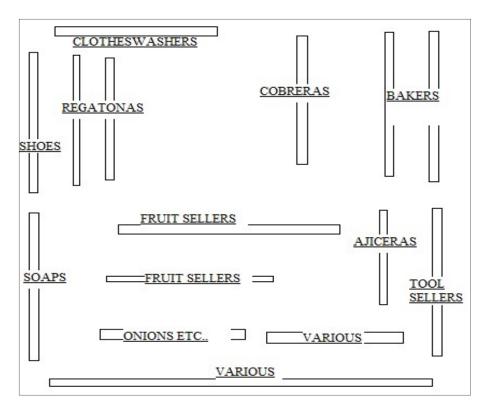


Figure 4.3: Recreated map of the organization of part of the market in the central plaza of Corocoro as determined by the municipality and guilds in 1901. In contrast to the fairs on the edge of town, the central market was organized according to fixed spatial criteria and the grouping of different vendor's guilds.⁴⁵⁷

Indigenous niches in local markets:

However, the differentiation of vendors was also based on what they sold. Three very important products were noticeably absent from the documentation describing both the activities of guild members and those to be sold in the Abasto: meat, chicha, and coca. Each of these products, in one way or another, bore a mark of indigeneity, either because of who produced and sold the good or because of the productive chains that linked the

⁴⁵⁷ Box 38, Alcaldía de Corocoro, ALP.

product with indigenous populations. The commercial circuits and relationships that brought these products from producer to consumer provide a different view of what might have been certain niches in the local economy where these particular groups of vendors gained a third and separate space.

Chicheras and butchers in Corocoro were well organized and systematically paid their patents or licenses, and used both to appeal to the government. Both of these groups were both deemed by outsiders to be indigenous or tied to indigeneity through the historical associations of the product they sold.⁴⁵⁸ Chicheras appeared to have been paying taxes in an organized and collective manner to the municipality of Corocoro as early as the 1870s, if not before.⁴⁵⁹ Despite this, chicha was not sold in the plaza.

Chicha had been the focus of Spanish authorities who attempted to control its production and consumption throughout the Colonial Period, especially in mining towns.⁴⁶⁰ They argued that chicha was a vice that made the indigenous populations of the mining centers unmanageable. Liberal Party governments expressed similar ideas about all kinds of alcoholic drinks consumed by indigenous populations. They attempted to charge higher taxes on chicherías and control its production and consumption. Chicha was monitored and discussed in similar ways as the traffic in aguardiente by indigenous communities. In contrast to the market guilds of the plazas, chicheras paid taxes not only in the form of

⁴⁵⁸ Box 34, Box 37, Box 38, Alcaldía de Corocoro, ALP.

⁴⁵⁹ Box 38 Alcaldía de Corocoro, ALP.

⁴⁶⁰ Mangan, *Trading Roles*.

licenses to sell the product, but also paid additional taxes when they bought or brought in the basic ingredients (muku), regardless of what national laws indicated.⁴⁶¹

Butchers in Corocoro were also well organized at this point in the years of Liberal Party governments, much to the chagrin of others who sought to enter the market. Complaints from foreign butchers who moved to the town and attempted to set up their own points of sale, described butchers in the town as acting like a highly-organized indigenous mafia.⁴⁶² Because many indigenous communities, both nearby and even across the border in Chile, supplied the animals for slaughter, the relationships between the butchers and others in the supply chain put them at a distinct advantage over others seeking a foothold in the sector. The indigenous families that sold meat to the town's population cultivated and maintained particular relationships with those persons and communities bringing livestock into the town

Both of these groups confronted accusations that their practices presented a threat to the public health of the town, whether in moral or physical terms. Butchers faced complaints about their methods of disposal of animal waste products.⁴⁶³ As part of the push for modernization of the town's infrastructure, the town prioritized the creation of a new slaughterhouse in a part of town that would include more modern facilities and provide them with disposal sites not as near the populated areas or key water sources.⁴⁶⁴ The town

⁴⁶¹ I have found documentation of Chicheras paying patents as guild members as far back as 1875. Box 40 [mislabeled Juzgado]; Box 47, Alcaldía de Corocoro ALP.

⁴⁶²In particular, Argentine butchers and vendors decried the monopoly held by indigenous men in the town. Box 33, 1900-1904, Box 34, 1901-1920, Alcaldía de Corocoro, ALP.

⁴⁶³ Box 33, 1900-1904; Box 34, 1901-1920; Box 38, Alcaldía de Corocoro, ALP.

⁴⁶⁴ Box 33, 1900-1904; Box 34, 1901-1920; Box 38, Alcaldía de Corocoro, ALP.

also worked to establish standard weights and measures for the sector.⁴⁶⁵ The arrival of butchers and meat sellers from outside of the circuits connected to indigenous communities coincided with these modernizing reforms of the sector (new slaughterhouses and uniform measures that created intermediaries in the distribution chain for meat). How the indigenous families working in this sector fared following these reforms is not entirely clear, though documents from later in the Liberal period described them as being in a much less-powerful position than they had been at the start of the 1900s. The introduction of new modern regulations and intermediaries like slaughterhouses had diminished their control of the marketplace.

Chicheras faced constant challenges to their businesses, confronted the attacks on their businesses directly and collectively, and engaged the state on more than one level. In their defense of chicha, they took on class, accusations of immorality, and allegations that they spread disease. While rich merchants imported cognac and whiskey for consumption in the town and other areas with no apparent condemnation, and the national distribution monopoly on legal pure alcohol held by powerful merchants or businessmen was celebrated, the municipal government in Corocoro repeatedly violated national laws by imposing heavy taxes on chicheras and on muku. The letters from the leader of the chicheras written during the first years of Liberal Party governments provide us with an idea of these women's collective position: "As the foundation of taxes is equality, according to Article 16 of the Constitution, taxes on articles considered to be goods of first necessity have been suppressed; for meat, basic foods. Chicha is today one of these goods,

⁴⁶⁵ Box 37, Box 38, Alcaldía de Corocoro, ALP.

and is consumed by working people... and the proletariat as a basic food."⁴⁶⁶ Citing the constitution and laws regulating the taxation of certain goods, these women (either themselves or through an intermediary) neither invoked differences among chicheras nor did they even enter into a discussion over the discourses about drunkenness or morality. They put forward an argument that situated chicha among the basic necessities of a worker's life and then used the constitution to try and guarantee their freedom to operate. The legal citations in their response hint that they had counsel (something guild women in the plaza did not appear to have), and indicated a degree of power and organization quite impressive in comparison to the complaints brought forward by other small-scale merchants and vendors. Market guilds presented their complaints directly to the authorities through their leadership.

Municipal and Departmental authorities did not like this argument, but the Department of La Paz grudgingly ordered the lowering of some taxes that had been aimed at chicheras, and the elimination of others (the tax on muku in particular). In their response to the protests of organized chicheras, the prefecture said it was a shame that they had to order the municipality to back down because "...it is publicly known that chicha establishments are centers of immorality" and that they contributed to the spread of diseases.⁴⁶⁷ While the chicheras won the fight at the Departmental level, municipal

⁴⁶⁶ Quote: "Como la base del impuesto es la igualdad según lo determine el art 16 de la Constitución Política del Estado, se ha suprimido la que pesaba sobre algún artículo de primera necesidad, como la carne, los víveres; la chicha es hoy un artículo de primera necesidad, y también se consume por la gente trabajadora… y proletaria como un alimento." Box 39 (1903), Alcaldia de Corocoro, ALP.

⁴⁶⁷ "…está a la conciencia pública que los establecimientos de chichería son especialmente en nuestra población focos de inmoralidad." Box 39 (1903), Alcaldía de Corocoro, ALP.

authorities do not appeared to have followed these orders and continued to attempt to charge and raise taxes on chicha and muku over the decades. Struggles between chicheras and the municipality continued despite laws prohibiting taxation on beverages made with national ingredients.⁴⁶⁸ Those laws may have been meant to support large-scale alcohol producers in the southern provinces of the country, but chicheras worked to force their product into this category.

Before the reforms that created a new slaughterhouse and the attempts to change how and where chicha was sold, butchers slaughtered animals in arroyos outside of town while chicheras set up shop along side streets in neighborhoods mostly occupied by mineworkers. However, in all the municipal documentation examined for this study, the glaring absence of coca from the discussions is surprising. Who sold coca and how it was brought to town isn't addressed in these documents. Debt collection cases from the Department of La Paz during this time period show that female market vendors accepted loads of coca for the repayment of debts, and that coca was trafficked across the region and across borders, but no documents examined thus far describe where, how, and by whom it was sold within the town of Corocoro. Perhaps most importantly, the spaces of sale of coca do not appear to have been of great concern to the municipality.

⁴⁶⁸ Only a few years later the government would begin a series of legal reforms to clarify exactly which alcoholic beverages were subject to additional tax. The general tendency was to create tax exemptions for all alcohol, wine, beer, etc. produced with Bolivian ingredients. See for ex: Ley de 24 de 1906; Ministerio de Hacienda, Correspondencia Prefecturas, MH 1086, p 483. ABNB.

Gender in the marketplace:

The predominance of women in Andean marketplaces is obvious to anyone who has visited the region, just like many other parts of the world. However, some dynamics contributing to the particularities of the gendered division of labor in Bolivia can be traced back centuries into the Colonial Period. Jane Mangan's historical studies of women and markets in Colonial Potosí demonstrates how important women's participation in the marketplace proved for the survival of the entire family in the new mining towns of the Andes.⁴⁶⁹ Indigenous women arriving with their families to Potosí to fulfill men's mita requirements or simply to work as miners, traded goods they brought with them from home with indigenous women from other regions. As men worked in the mines either as mingas or mitayos, women also traded in ores and metals that had been acquired through kajcheo, juqeo, or clandestine metal production.⁴⁷⁰ By doing this women ensured the survival of the family unit and accessed the money they needed in the new cash-based colonial economy. In this role, these women formed the foundation of local colonial economies and held together part of the social fabric of these new cities.

At the same time, male and female merchants from other origins occupied important roles in the hierarchies of Colonial markets. Spanish and mestizo women, often widows seeking the means to survive and who were legally empowered to trade independently, comprised a middle layer of merchants between indigenous women and the

⁴⁶⁹ Mangan, *Trading Roles*.

⁴⁷⁰ Mangan; Stavig, "Continuing the Bleeding of These Pueblos Will Shortly Make Them Cadavers"; Bianca Premo, "From the Pockets of Women: The Gendering of the Mita, Migration and Tribute in Colonial Chucuito, Peru.," *The Americas: A Quarterly Review of Inter-American Cultural History* 57, no. 1 (2000): 63–93.

prestigious or wealthy male merchants who dealt directly with more expensive and overseas goods.⁴⁷¹ Jane Mangan points out that women of all origins acted as pawnbrokers and sources of credit, both between one another and with clients. Many of their transactions and trading activities involved women and men of similar, if not the same, ethnic backgrounds. However, commercial relationships also crossed ethnic lines and hierarchies of power, especially in the exchange of goods, the advance of inventory, and access to credit. The pawning of items facilitated a process of commodification of goods and the monetization of trade.⁴⁷² While Potosí's population was diverse, a complex gendered racial hierarchy of vendors and clients structured the towns' marketplaces.

At the start of the twentieth century, Corocoro's markets exhibited certain similarities and differences from the Colonial Period examples. Importers and larger-scale merchants, who were mainly criollo or foreign men, maintained a position of power both in their interactions with the state and in their dealings with guild-affiliated women in the town. Indigenous women from the countryside, or those with only partial and transient residence in the town, occupied different commercial spaces in the town than those women affiliated with the guilds. More importantly, they sold goods that were often the direct products of their own community production and labor. In Corocoro, it appears that the more direct a seller's connection to an indigenous community, the more likely that woman

⁴⁷¹ Mangan, *Trading Roles*.

⁴⁷² Graeber and others emphasize the importance of pre-existent conceptualizations of debt relationships for the transition to and expansion of monetized economies. David Graeber, *Debt: The First 5,000 Years* (Melville House, 2011).

would sell outside the center of town, on the edge of the neighborhoods occupied by transient workers of similar origins.

And, just as was the case in Potosi, the trade in minerals in Corocoro by cobreras at the start of the twentieth century points to a continuation of practices like kajcheo, and the coexistence of a non-centralized market for minerals alongside mining companies.⁴⁷³ The recognition of the cobrera's guild by the municipality indicates that this practice was seen legitimate in 1901, or at least not viewed as criminal. These aspects of market organization in Corocoro mirrored much of what was seen in colonial cities like Potosí.

However, comparison of these two temporal and geographical contexts also reveals substantial differences. Corocoro was a much smaller, poorer, and more peripheral mining center at the start of the twentieth century than Colonial Potosi.⁴⁷⁴ While some demographics may have been similar (a heavily indigenous majority without much money, alongside a much smaller and wealthier criollo population), many of the categories so clearly defined during the colonial period can be difficult to discern in Corocoro. The

⁴⁷³ Gustavo Rodriguez Ostria describes these de-centralized practices in t Corocoro throughout the 19th century and Teodoro Salluco Sirpa has detailed complaints by cobreras over the prices of taquia, a llama dung based fuel they used for basic smelting of metals. Rodríguez Ostria, *Capitalismo, modernización y resistencia popular 1825-1952*; Salluco Sirpa, *La explotación del cobre en el distrito minero de Corocoro a principios del siglo XX, 1900-1930*.

⁴⁷⁴ Estimates of Corocoro's population vary a great deal. The 1900 census places the population at around 10,000, in both the rural and urban parts of the jurisdiction, while other writers from the 1910s give much higher figures, near 20,000 at certain moments during World War 1, and recent publications examining prefectural documents and mining companies place that figure even higher. However, the instability or transient nature of part of the local population contributes to uncertainty over these figures. See: J.M. Gamarra, *Censo General de La Población de La República de Bolivia Según El Empadronamiento de 10. de Septiembre de 1900.* (La Paz, Bolivia: Oficina Nacional de Inmigración, Estadística y Propaganda Geográfica, n.d.); Lima, *Corocoro: apuntes, críticas y observaciones*; Salluco Sirpa, *La explotación del cobre en el distrito minero de Corocoro a principios del siglo XX, 1900-1930.*

identities of the women affiliated with market guilds were not directly stated in documentation, and the social boundaries between guild vendors and the groups of women working outside of the central plaza were also less respected in the early 1900s. The Abasto project, while echoing some of the interventions made in colonial Potosi that resulted in the organization of the qhatu, pushed women vendors who were stable urban residents into competition with women from communities who were less rooted in the urban sphere. This competition was created among women selling some the same products. Whether intentional or not, that project worked to blur power relations between these women.

This created predictable tensions and conflicts. Though records do not specify whether there were limitations on who could buy goods in the central plaza, guild members actively worked to exclude all non-members from selling in that space. They bought products from indigenous vendors who came to sell their foodstuffs and other things on the outskirts of town in temporary fairs, but they did not want those groups entering the principal commercial areas of town. Guilds from the plaza fought to defend their share of commerce in the town and what they saw as their own ownership of certain territories. They defended their territory using three tactics: they invoked their rights as tax payers and guild members; they employed arguments and discourses that mixed colonial and modern stereotypes of women from the countryside to argue that they were unhygienic and unfit to operate within the town; and they allegedly resorted to direct violence and the intimidation of competitors on the peripheries of the town.

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Guild members paid municipal licenses that permitted them to officially engage in commerce. This was not an arrangement introduced during the years of Liberal Party governments. It was connected to the historical patterns of taxes at the municipal level and, just as discussed in the previous chapter, these fees provided reliable income for local government. However, during the first decades of the twentieth century and especially after the inauguration of the railroad, the local government became stricter in its enforcement of payment and raised the prices on these licenses.

Shortly after the discussions about the creation of the Abasto, and after the first steps taken to advance the proposal, the municipal government called on the population, and on merchants or vendors, to consider the importance of local taxes. The president of the council wrote about taxes and those who failed to pay them in the following terms:

"...The town needs to interiorize that taxes are an obligation of the citizen to the State, whether it be national, local, or municipal..... When this obligation is unselfishly fulfilled the locality is that which advances.... It is necessary to convince oneself that without money, one cannot speak about any of the comforts which are immutable elements for existence... Nonetheless they excuse themselves, wish everything from the municipality, which of course lacks the power to satisfy the demands of the public without the consensus of the collective.⁴⁷⁵

Customs may not have mattered, but local taxes certainly did.

⁴⁷⁵ Quote: "El pueblo en este orden necesita interiorizarse que los impuestos son una obligación al ciudadano para con el Estado, cuando es Nacional y si local, para el municipio. …Cuando esta obligación se llena abnegadamente, es el pueblo, la localidad la que alcanza ventajas… Preciso es convencerse, sin dinero no puede hablar ninguna comodidad se carecería de los elementos inmutables para la existencia, no bastante se escusa el concurso, queriendo alcanzarle todo del municipio que desde luego carece del poder de abastecer a las exigencias publicas sin el concurso de la colectividad." Box 40, Alcaldía de Corocoro, ALP. [mislabeled as Juzgado de Pacajes]

Invoking taxes as the obligation of citizens to the state reveals an important contradiction evident in all levels of the Bolivian government during this time period. Who could be called upon to act as a citizen? The law made it clear: women (of any origin) were not citizens. They could not vote, even with an education and enough income, and above all, their gender limited many other rights of representation.⁴⁷⁶ Indigenous men were also not citizens a priori. Though their nationality was recognized and some could gain the right to vote, their citizenship was often denied through the application of carefully crafted legal clauses that were intended to exclude most of them.⁴⁷⁷

However, behind the lofty talk of citizen's obligations to the state, the local government wanted funds to promote and build projects like the Abasto and maintain or expand public services, like electricity at certain hours of the night or the cleaning of local sewer canals. Taxes were just as important for the Liberal modernization project at the local level as they were at the national level. And, this tax burden also fell on those at the bottom of the commercial ladder. By doing this, and establishing or perhaps reinforcing colonial notions of tax payment as guaranteeing certain rights, the government opened the door for guild women to claim rights in the political sphere in spite of their lack of citizenship.

⁴⁷⁶ See the Constitutions of 1860 and 1880. However, women in Bolivia did exercise important degrees of freedom in the commercial and economic spheres. See the Código Mercantil Santa Cruz, 13 de noviembre de 1834; and Barragán, *Indios, Mujeres y Ciudadanos*.

⁴⁷⁷ Marta Irurozqui Victoriano, "The Sound of the Pututos. Politicisation and Indigenous Rebellions in Bolivia, 1825-1921," *Journal of Latin American Studies* 32, no. 1 (n.d.): 25; Irurozqui Victoriano, "La Amenaza Chola. La Participación Popular En Las Elecciones Bolivianas, 1900-1930"; Irurozqui Victoriano, *La armonía de las desigualdades*.



Figure 4.4: Women vendors selling goods alongside the railroad, early twentieth century (Photo from turn-of-the-century postcard).

Guild women did not take up the discourse of citizenship when interacting with the state. Rather, they invoked their payment of taxes as the basis upon which they should be able to legitimately address the state and require it to defend their rights – a kind of tax-payer citizenship not unlike the tributary-citizenship seen in indigenous community claims to rights.⁴⁷⁸ The groups of women that did this in Corocoro included both vendors from the plaza and groups of chicheras. Their collective pressure on the state appears remarkable because it was one of the few spheres of life in which women presented themselves as a collective demanding recognition of economic rights, and one of the few instances in which women invoked rights outside of their roles within the family. When the market

⁴⁷⁸ The claims of market women in Corocoro provide an interesting parallel to the claims of tributary citizenship that has been studied by researchers examining indigenous movements in the nineteenth century.

vendors addressed the state through their guild, they addressed the local state as economic tax-paying subjects and therefore political subjects with rights. Collective organization provided guild-affiliated women with access to the state. Though reforms of the commercial codes following Independence gave women more liberty in economic activity than female merchants had possessed during the Colonial Period, it was their collective organization as tax payers that enabled them to intervene in politics.⁴⁷⁹ Female guild leaders argued that the incursion of non-affiliated vendors into certain spaces in town violated the rights they had gained by the payment of taxes, and that it undermined the government's own arguments about the need for residents to step up and pay for the modernization of the region.

Some of these guilds went much farther in their arguments, employing or echoing the complicated and racist modernization discourses so common throughout the Liberal Party period. Chicheras do not appear to have done this, but others did. For example, bakers and bread vendors who had been vocal on a wide range of issues from the price of flour to tax increases, regularly objected to indigenous women selling bread throughout the town without forming part of the guild, saying they were effectively "contraband bakers."⁴⁸⁰ Though very near the bottom of the flour distribution chain in the province, organized bread sellers saw or depicted the indigenous women selling rustic breads as occupying an even lower position in the local power structure. In one of the numerous complaints to local officials, the bakers denounced the permissiveness of local authorities

⁴⁷⁹ Código Mercantil Santa Cruz, Ley de 13 de noviembre de 1834.

⁴⁸⁰ Box 39 Alcaldía de Corocoro, ALP.

who refused to kick out those women and complained that they represented a public health risk to the town's consumers, saying: "The Indians make bread full of the filth of their dirty feet..."⁴⁸¹ Time after time, many of the same collectives of women that invoked their rights as tax paying merchants also worked to control the geography of commerce by using stereotypes and tropes that denigrated indigenous women. This hygiene complaint, one of the most consistent arguments used, appealed to the new modernizing instincts of national and local elites and the resilient discriminatory constructions of indigeneity seen across the country.

The persistence of these complaints indicates that the municipality was either not effective in their defense of the women's guilds, or that they weren't particularly interested in doing so. Considering the Abasto project in light of this, one could interpret it as not simply a way to get more goods into the town at lower prices but rather as a reform that would 'formalize' the commerce already occurring, and therefore undermine a fundamental part of the guild's legitimacy that was grounded in their status as tax-payers and as hygienic modern vendors. Bringing sellers from indigenous communities into the Abasto, a new space organized to modern standards and managed by the town, and then registering those sellers and charging them taxes brought money into the local treasury and created a marketplace that was not managed by the guild women.

⁴⁸¹ This use of language and stereotypes may have become more prevalent in the years following the railroad. Original quote: "Los indios elaboran panes lleno de mugre de sus pies sucios". Box 39 Alcaldía de Corocoro, ALP.

These guild affiliated vendors upped the ante by invoking the discourses of public hygiene surrounding food and spaces of consumption. By doing this they echoed the incipient hygiene discourses developing across the nation, which combined colonial era prejudices about indigenous residents of rural areas with modern ones that associated urban indigenous practices with the notion of a biological threat. ⁴⁸² These were discourses already circulating throughout Corocoro as municipal authorities began developing public hygiene inspection of residences (especially indigenous ones). Indigenous women were targeted early in the Liberal Party period for their child raising practices, which had been described by mining company managers as potentially dangerous for the economic future of the town. Mining managers argued the high rates of infant mortality, which they argued resulted from how indigenous women raised children, would cause a demographic decline that would force the mines to shut down for lack of workers and bring commerce to a halt.⁴⁸³ Thus, whether consciously chosen as a strategy or instinctively employed to differentiate themselves, the guilds reinforced many of these discourses. Women from the plaza distanced themselves from indigenous women, while chicheras invoked the proletariat (as Bernal had done). Regatonas differentiated themselves because they paid taxes and were modern, and ultimately, in their own words, they were not Indians.

Women in the guilds from the plaza were also accused of intimidating indigenous women and men at the edge of town throughout the first two decades of the twentieth

 ⁴⁸²Ann Zulawski, Unequal Cures: Public Health and Political Change in Bolivia, 1900-1950 (Duke University Press, 2007); Nicole L. Pacino, "Liberating the People from Their 'Loathsome Practices:' Public Health and 'Silent Racism' in Post-Revolutionary Bolivia," *História, Ciências, Saúde-Manguinhos* 24, no. 4 (2017): 1107–24; Larson, *Trials of Nation Making*.
 ⁴⁸³ Box 48, Alcaldía de Corocoro, ALP.

century. In the different accounts, police or members of the community urged the municipal government to intervene in the conflicts that occurred as vendors procured products from members of indigenous communities. The women from the plaza were accused of tricking indigenous producers and forcing them to sell at ridiculously low prices, or directly taking the products. Bernal described these incidents in 1904, long before the railroad arrived and other tensions rose. These conflicts continued long after the establishment of the Abasto as well. Fifteen years after Bernal brought his project to the municipality, and several years after the inauguration of the Arica – La Paz Railroad, a police officer described this scene: "...on Saturdays and Sundays each week, various merchants of much-needed goods gather on the Avenue San Jorge and, abusing the indigenous race take from them by force at infamous prices, the goods they bring to this city to sell, and they hit and strike them cruelly...."484 He described vendor's guilds from the plaza and other merchants abusing indigenous producers and sellers in order to claim the goods for sale in the town. By doing this in San Jorge, a growing and new mineworker neighborhood on the edges of town, these groups also acted to limit indigenous access to the central points of sale within the town.⁴⁸⁵ And yet, just as had been the case with the

⁴⁸⁴ "...de que los días sábados y domingos de cada semana, se constituye en la Avenida San Jorge, varios comerciantes de mercaderías de primera necesidad y abusando de la raza indígena, les quiten por la fuerza por precios completamente ínfimos los víveres que traen a esta ciudad [para] su venta, y además los pegan y estropean de una manera cruel...." Box 38 (1919), Alcaldia de Corocoro ALP.

⁴⁸⁵ Barrio San Jorge was a rapidly growing neighborhoods of mineworkers (temporary and permanent) located along one of the roads leading out of the town to the north. Lima, *Corocoro: apuntes, criticas y observaciones.*

constant complaints made about non-registered vendors operating all around town, here too the local state was either incapable of intervening or not interested in doing so.

These descriptions of violence and the spaces in which it occurred hint at a division of the commercial geography that at once separated urban non-indigenous vendors from indigenous ones, and yet linked them together by positioning female vendors from the plaza as intermediaries between indigenous production and urban consumption. Fairs and mobile markets set up on the edges of town, managed by indigenous populations who traveled to sell their products, sold to consumers of the town directly. Should they want to bring their products into the center of town, they either faced violence or had to work through guild vendors and other intermediaries, including the new power structure in the municipal market.486 At the same time, however, women guild vendors also functioned as intermediaries between the criollo-run male world of large-scale importers who sold goods bought while traveling or on consignment and the local consumer in Corocoro. The women occupying stalls of the town plaza marketplace functioned as nodes in the local economy that articulated the world of indigenous community agricultural production, the international trade in some food commodities, and the consumers of a small mining town. That point of connection became the focus of police officials who saw it as a relationship fraught with conflict.

Whether these complaints and descriptions were accurate or not, they raise important questions about the differentiation of women selling goods in the town and the

⁴⁸⁶ Lima.

categories used to describe all female market vendors in Bolivia. Who was chola, who was mestiza, who was Indian, and what did this mean? In descriptions of rural regions and towns in the nineteenth century, Olivia Harris points to the difficulty of assuming certain power relations between 'mestizos' and indigenous populations at certain historical moments.⁴⁸⁷ Processes of accumulation, a product of the resurgence of indigenous economies during part of the 19th century, may have meant that the only real difference between *mestizos* and *indígenas* in certain places, was that the former insisted that they were not Indians.

⁴⁸⁷ Harris et al., *La participación indígena en los mercados surandinos*.



Figure 4.5: Bolivian marketplace from turn-of-the-century postcard.



Figure 4.6: Indigenous residents from turn-of-the-century postcard.

Ximena Soruco emphasizes the relational nature of the category of "cholo" in early twentieth century Bolivia, and describes the group as one essentially defined by what it wasn't.⁴⁸⁸ She details the growing economic challenge the cholo community presented to Liberal elites and criollos, because for some members of the group their economic accumulation was significant. Marta Irurozqui has studied that same process in the political sphere.⁴⁸⁹ Cholos, and especially cholas, were effectively excluded from being or becoming criollo because of their connections with the indigenous world, and yet were also not considered Indians belonging to the campesino world.⁴⁹⁰ Xavier Albó has described cholos in recent decades as being urban Aymaras who translate certain logics and ways of Aymara life to the urban spheres of places like El Alto.⁴⁹¹ At the start of the twentieth century, the women in the town plaza of Corocoro were located in-between worlds, and occupied that position in a large part due to their economic activity and roles.⁴⁹² They were defined by those with more power as not belonging, regardless of how much money they accumulated and, though connected to indigenous populations in many ways, they did not always treat or identify those groups as equals in commercial activity or before the state.

⁴⁸⁸ Soruco Sologuren, *La ciudad de los cholos*.

⁴⁸⁹ Irurozqui Victoriano, "The Sound of the Pututos. Politicisation and Indigenous Rebellions in Bolivia, 1825-1921," n.d.; Irurozqui Victoriano, "La Amenaza Chola. La Participación Popular En Las Elecciones Bolivianas, 1900-1930."

⁴⁹⁰ Marcia Stephenson, *Gender and Modernity in Andean Bolivia* (University of Texas Press, 2010); Marisol de la Cadena, "'Women Are More Indian': Ethnicity and Gender in a Community near Cuzco," in *Ethnicity, Markets, and Migration in the Andes*, by Enrique Tandeter, ed. Brooke Larson and Olivia Harris (Duke University Press, 2012), 329–48.

⁴⁹¹ Xavier Albó, "Bases Étnicas y Sociales Para La Participación Aymara En Bolivia La Fuerza Histórica Del Campesinado," in *Ciudades de Los Andes : Visión Histórica y Contemporánea*, ed. Eduardo Kingman Garcés, Travaux de l'IFEA (Lima: Institut français d'études andines, 2014), 375–87.

⁴⁹² Stephenson, Gender and Modernity in Andean Bolivia.

Both indigenous women and female guild-affiliated vendors faced accusations of moral decadence and were depicted as threats to 'order' in some way. Laura Gotkowitz and others have pointed out that the depiction of cholas as morally questionable sexualized women was widespread and deeply rooted, possibly a construction related to their very public independence and economic power.⁴⁹³ Just as indigenous women were subject to discourses that painted them as bad mothers spreading disease, cholas throughout this time period also faced moral judgements that worked to differentiate them from criolla elite women. In this sense, and perhaps because of their commercial relationships with indigenous producers, cholas were seen as more closely connected to indigeneity by town authorities, even if that relationship was fraught and undesired. While some mestizo women working in plazas may have moved closer to the category of criolla by taking on symbolic markers of identity (especially dress), many cholas who moved in commercial spheres at the start of the twentieth century in Bolivia did not do this.⁴⁹⁴ They adopted and developed different forms of displaying power, expressing an identity that was neither of the criollo world, nor the rural indigenous one.

Railroads as creators of new conflicts:

Idealized projections of how railroads would change the way people consumed clashed with the reality on the ground in towns like Corocoro very early on. Though littered with lofty language about national development, the planned liberal growth

⁴⁹³ Laura Gotkowitz, "Trading Insults: Honor, Violence, and the Gendered Culture of Commerce in Cochabamba, Bolivia, 1870s–1950s," *Hispanic American Historical Review* 83, no. 1 (2003): 83–118; Soruco Sologuren, *La ciudad de los cholos*.

⁴⁹⁴ Soruco Sologuren, La ciudad de los cholos; de la Cadena, "Women Are More Indian.""

reflected the ambitions of one class. The discussions of railroads seemed to presume that rail lines to international ports would reduce food shortages and spark industrial activity, and as a result, reduce certain social tensions. This did not happen. While many people ate bread and as a result were impacted by changes in prices for imported flour, the structure of the marketplaces described in detail in Corocoro point to a continued and important role for local or regional agricultural goods. Meat was not brought in by train at this point; local indigenous communities and haciendas still provided that good to consumers. The displacement or reduction in relative power of the non-linear networks of trade did not reduce market vendor reliance on 'local' food producers and traders of potatoes, chuño, and the like; it only moved them to the edges of the formal economy and disempowered them in relation to the local state. Even after the creation of the Abasto in Corocoro and the construction or refurbishing of markets in cities across the altiplano, newspapers and local officials consistently complained of food shortages and high prices. Feeding people remained a source of consistent conflict and would become a very serious problem for politicians across the country.

Beginning around 1908, and coinciding with the growth in the construction and running of railroads, and increased mining production, national newspapers began to make the issue of food scarcity and high prices a national discussion.⁴⁹⁵ These complaints coincided with an international economic crisis in 1907, and even though the macro economy and the mining sector may have recovered very quickly, the incomes of regular

⁴⁹⁵ *El Diario*, 30 de octubre de 1908, "La crisis económica. Actitud de Obreros."; *El Diario* 7 de noviembre de 1908, "Hacienda en peligro. Carestía de carne."; *El Diario*, 21 de noviembre de 1908.

people did not. By 1912, even pro-Liberal papers like *El Comercio* got on board, describing commercial houses and markets as spaces full of commercial speculators exploiting working people, urban residents, and even rural Bolivian producers of food.⁴⁹⁶ Not only were the very persons that liberals had claimed would bring products of the world to urban Bolivian suddenly characterized in the national press as vultures, even smaller intermediaries and market vendors were cast in a negative light. Figures like José Gutierrez Guerra (who would be the last Liberal Party president) began to publicly promote the idea of consumer cooperatives as ways to sidestep merchants who monopolized flows of goods and manipulated prices.⁴⁹⁷

While some of this conversation in newspapers like *El Comercio* may have simply been a ploy to garner support for the Liberal Party among the rapidly organizing working classes of cities like La Paz or at least try to shift blame for the situation, the problem of rising food prices was real.⁴⁹⁸ Some articles in La Paz newspapers focused on how capital flight and exchange rates contributed to the problem, suggesting that the exteriorization of the nation's growing wealth had left speculators room to take advantage of the growing

⁴⁹⁶ *El Comercio*, 2 de mayo de 1912, Comerciantes, especuladores, y el sistema cooperativo."; 4 de junio de 1912, "Cooperativa nacional de consumos"

⁴⁹⁷ Although the proposals backed by J. Gutierrez included 100 boliviano costs to buy into the coop, something putting it out of reach for most of the population. The proposals for consumer coops even appeared in Corocoro in 1919, although the model described in the proposal then appeared to be more similar to a pasanaku or pasamano. Each worker could contribute weekly, and the selection of the person who would receive the goods would be picked weekly until everyone received their shares. Box 38, Alcaldia de Corocoro, ALP.

⁴⁹⁸ Appeals to the newly forming worker's organization by political parties appears to have begun around this time. By 1914, Daniel Salamanca and others, who separated from the Liberal Party to form the Republican Party, were accused by the Montes government of agitating workers against the government.

need for imports and opened the door for currency manipulation.⁴⁹⁹ However, other important factors lay behind the problem. Environmental crises, including a prolonged drought and the spread of livestock diseases had reduced the supplies of food available to vendors in city marketplaces.⁵⁰⁰ However, most importantly, many buyers in the marketplaces were simply short of the cash they needed to survive; this was neither a new problem nor was it a product of increasing reliance on imports to feed urban populations.

Multiple factors had contributed to the expansion of indigenous participation in the national economy during the 19th century, including varied exchange rates and the weakening of repressive state regimes in indigenous rural areas. However, the model of railroad-driven industrial and capitalist development marked a change. In Corocoro specifically, and the Department of La Paz more broadly, it is clear that this expansion of mining and railroads was accompanied by an increased demand for cash in all parts of the highlands, and this made even poor consumers or agricultural producers vulnerable to monetary and macroeconomic changes.

Most of the marketplace transactions that were mediated by small-scale female vendors, even those from indigenous communities required money. Most women could not use financial institutions to access cash or credit, or to deposit their savings and pay

⁴⁹⁹ El Comercio, 10 de enero de 1912, 11 de enero de 1912, "Carestía de víveres en La Paz."; 23 de enero de 1912, "El Cambio."; 24 de enero de 1912, "La situación económica."; and the discussion of political dissension in *Memoria presentada a la Legislatura e 1915, por el Sr. Arturo Molina Campero, Ministro de Gobierno y Fomento* (Bolivia: Talleres Gráficos La Prensa, 1915).
⁵⁰⁰ Paleo climatological data point to a period of drought beginning in the late 19th century throughout the altiplano and extending into the first decades of the 20th, something explored by both Cruz et al and Klein. See: Klein, *A Concise History of Bolivia*, 2003; Pablo Cruz et al., "Rain-Fed Agriculture Thrived despite Climate Degradation in the Pre-Hispanic Arid Andes," *Science Advances* 3, no. 12 (2017): e1701740.

creditors.⁵⁰¹ This was not a new problem faced by women traders, they had relied on personal relationships to run their businesses for generations, and had done this through very particular mechanisms. Many of the market women described by Mangan during the Colonial Period managed multiple systems or logics of exchange. Foods and goods were both forms of payment in markets and inventory that could be sold for cash, just as objects with cultural value could be pawned for specific values.⁵⁰² Even though some forms of non-currency based exchange occurred in markets, money became more important as the liberal economy expanded and the state's tax demands on the popular economy increased. Just as women in marketplaces mediated between a rural world of local agricultural production and the spheres of international merchants, they had also historically mediated these different systems of exchange and value.

Samples of debt collection cases from the early twentieth century in La Paz and Pacajes show us how credit, advances of inventory, direct cash loans, and the placement of guarantees formed an essential part of the functioning of marketplaces and local economies.⁵⁰³ In these exchanges, those female vendors working in the town's marketplace became intermediaries in the movement of cash between the circuits of commerce

⁵⁰¹ Aside from social barriers in accessing banks, no banks apparently operated in Corocoro throughout this time period. By the late 1910s, sub-prefect Eduardo Lima argues that a branch of the Banco Nacional should be established in this town of tens of thousands of people. Lima, *Corocoro: apuntes, críticas y observaciones*; Salluco Sirpa, *La explotación del cobre en el distrito minero de Corocoro a principios del siglo XX, 1900-1930*.

⁵⁰² Mangan, Trading Roles; Zulawski, They Eat from Their Labor: Work and Social Change in Colonial Bolivia.

⁵⁰³ This analysis of court cases is drawn from a sample of 356 cases throughout the time period stretching from 1880 to 1930, though the sample is concentrated on the years of Liberal Party rule. The samples are drawn from the Collection Corte Superior de Distrito, Boxes 325, 356,524, 525, 526, 527, 1107/1114, 1049, 1149; from the Juzgado de Pacajes, Boxes 19, 22-25, 29, 60; from the Juzgado de Instrucción Partido Civil, Boxes 1-3, ALP.

dominated by importers, and the circuits of indigenous producers and sellers. In the absence of financial institutions in Corocoro and the exclusion of nearly women and indigenous populations from those that existed in other cities, market women became banks and loan makers. The proliferation of debt-collection and debt-related legal fights shows the degree of conflict involved in these interactions.⁵⁰⁴ Women with cash or inventory used new freedoms to operate in the commercial sphere without male authorization to legalize their loans, exchanges of inventory and more.⁵⁰⁵ They were not the only persons who circulated capital through loans or who received or advanced products – all merchants did this. However, women in commerce did this in somewhat different ways than men.

An initial analysis of cases from the Department of La Paz (including Pacajes) during the period of Liberal Party government shows that women were involved in nearly half of debt collection conflicts brought before the court, either as creditors or debtors, and that they initiated the legal actions in over 30% of the sample. However, only 13% of the cases they brought against debtors involved unpaid debts between female vendors. In other words, women needed money and inventory and moved both amongst themselves, but they did not operate within a gendered enclave of capital exchanges. They may have advanced

⁵⁰⁴ This analysis is drawn from a sample cases from courts that often mixed criminal and civil records. Despite this, at least 209 of the 356 court cases in the sample were direct debt-collection cases (26%), conflicts over payment for goods or advances on goods (21%), or inheritance cases with an intervening creditor (12%). More than half of all the court cases examined in this research was entirely focused on resolving property possession with a creditor claim, or on cash or inventory owed.

⁵⁰⁵ Nearly all of these cases involved loans, advances on goods, or guarantees on debt, most of which were legalized and notarized at the time the debt was created.

goods to other women involved in commerce and gotten repaid by them more frequently, but they also lent money and advanced goods openly and frequently to men. They notarized and formalized those transactions. These were not "informal" arrangements in any way.

Female merchants who grew their cash reserves also accumulated the power to engage with men from a certain position of economic and legal power.⁵⁰⁶ These patterns echo Ximena Soruco's discussion of the potential power of the cholo class and how this might have been seen as a threat by criollo men.⁵⁰⁷ These examples also point to the very real potential for stratification among women in the market place, something Soruco describes as the emergence of a cholo 'elite.' Some women clearly used the extension of credit and loans as a strategy for capital and property accumulation. Just as was described in the conflicts at the edges of Corocoro, female market vendors' interactions with indigenous populations was fraught with problems and tensions. Some market women used short-term loans and arrangements like anticréticos, as sources of financing, ways to save their money without going through a bank, or as a method of increasing their wealth.⁵⁰⁸ When loan and debt agreements failed, loan makers were able to turn some property

⁵⁰⁶ In some of these cases, women involved in commerce or those lending money as what appeared to be their principal economic activity, lent to men who owned businesses or residences in and around the Plaza Murillo, collecting the rights to the business or properties for unpaid debts. ⁵⁰⁷ Soruco Sologuren, *La ciudad de los cholos*.

⁵⁰⁸ Anticréticos are still used in the Bolivian real estate market today. They involve one party paying a lump sum of cash to an owner in exchange for use of the property during a fixed period of time. At the end of the contract, that sum must be repaid, sometimes with additional amounts added on. It is a legal way for a property owner to gain access to a large sum of money, without losing property or paying monthly interest rates. Problems arise when the person who received the funds is unable to fulfill the agreement at the end of the time period. It differs from a rental arrangement in that payments are not necessarily regular or continual.

owners into rent-paying tenants producing goods for them.⁵⁰⁹ Women loaning money collected on debts owed by indigenous men in communities by taking land titles that had been left as guarantees, indicating how the Dis Entailment laws that produced individual land-titling of former collective lands may have opened the door to new kinds of exploitation. 16% of the debt cases from the years of Liberal Party governments that were sampled for this study involved the claiming of former community lands, and nearly all of those cases involved a female loan maker and an indigenous male debtor. None involved indigenous women as debtors turning over land.⁵¹⁰

The use of debt as a method of exploitation and alienation of indigenous families from land has been described by other researchers.⁵¹¹ While researchers affirm that the vast majority of former community lands lost during this period were transferred into large estates owned by hacendados, the use of debt to acquire lands may represent this dynamic on a smaller scale; small parcels lost one by one as a result of a loan that could not be repaid.⁵¹² The full impact of this smaller and slower process on the overall loss of land by formerly autonomous communities is not clear. However, it does suggest that very local market dynamics, in which small-scale merchants and vendors stood as the gate-keepers to the monetized marketplace for poorer rural residents, may have been a factor in the loss of

⁵⁰⁹ Women used anticréticos both in urban and rural contexts as a way to circulate money, and in some cases required debtors to work rural lands to pay back funds if they could not produce the cash amount owed. See examples: Boxes 22 and 25 (1907-1908), Juzgado de Pacajes, ALP.
⁵¹⁰ In the simple of cases taken for this study, no indigenous women appear as holders of land titles that were given as guarantees on debts.

⁵¹¹ Silvia Rivera Cusicanqui, "La Expansión Del Latifundio En El Altiplano Boliviano," *Avances*, no. 2 (n.d.).

⁵¹² Erwin P. Grieshaber, "Survival of Indian Communities in Nineteenth-Century Bolivia: A Regional Comparison," *Journal of Latin American Studies* 12, no. 2 (1980): 223–69.

indigenous lands to non-community members. Everyone active in this expanding capitalist marketplace possessed different degrees of relative power and access to money, whether that was a group of persons from an indigenous community running contraband alcohol, a small group of families producing potatoes, or a merchant and vendor dealing with both. Wealth differences and stratification also existed among women market vendors.⁵¹³ While the details of many debt collection cases involving indigenous men and women in commercial spheres remain blurry, they do suggest that some portion of those debt relationships were formed in the context of previously existent trading relationships. This may be one of the reasons that some of these merchants accepted payment for cash loans in agricultural products in some cases, and in others, did not evict the persons living on the lands they took over legally, but rather established a tenancy agreement and were paid the debts owed in products produced off the lands.

Given the economic pressures felt throughout the countryside at this time, it is not surprising that men in Pacajes would have been looking to gain access to cash, just like women entering commerce. And women also lost in some of these transactions, especially when they took too large a quantity of goods on advance. Though some women vendors and merchants moved goods and capital at the same rates and values as male traders, others found themselves very indebted as well, and lost parts of their businesses, property, and autonomy as a result. ⁵¹⁴ Women living more permanently in rural indigenous areas did not

⁵¹³ Soruco Sologuren, *La ciudad de los cholos*.

⁵¹⁴ Juzgado de Instrucción de Pacajes, Caja 19, 1907, ALP. In that case, the female merchant advanced goods and collected on debts that were of similar value to male importers operating out of Nazacara and lending/advancing goods into La Paz.

appear to seek out debt like men did, perhaps because they mostly lacked land titles needed for guarantees on loans.⁵¹⁵ As the capitalist economy and markets expanded throughout the region, winners and losers emerged among all groups in the local marketplace.

The instability of financial institutions throughout this time period led to various banks closing and to the new national bank absorbing their notes.⁵¹⁶ Descriptions from 1912 of conmen traveling to rural and indigenous areas buying up the notes issued by the failing Banco Agricola at half their value, indicate that this instability was not disconnected from the daily lives of indigenous populations, who in that case describing events in Pacajes and Omasuyos were swindled out of half the value of their savings.⁵¹⁷ Even while many market women and indigenous populations lacked access to financial institutions, subaltern, or working class and indigenous market dynamics were not disconnected from the national economic processes described in city newspapers. The financial instability may have pushed these sectors of the population further into debt relations with vendors and merchants. When financial institutions faltered, the entire popular economy moved through and relied upon different social relationships to keep afloat.

World War 1 and its impact on the economy has been thoroughly addressed by historians examining Bolivia's macro economy and mining production in general. These

⁵¹⁵ The absence of women title-holders in communities and the abundance of cases in which widows were expelled from communities points to the need to advance research on the gendered aspects of liberal land reforms.

⁵¹⁶ See the closure of the "Ahorro del Hogar". Box 1149, CSD, ALP; and *El Comercio*, 16 de noviembre de 1912.

⁵¹⁷ El Comercio, 11 de agosto de 1912 "Banco Agrícola"

dynamics were not divorced from the basic problem of feeding people in local markets. In 1914, interest rates spiked, financial institutions called in debt and floundered, and many refused to advance credit or risk their metal reserves.⁵¹⁸ The start of the war brought uncertainty, and Bolivia's exports dipped dramatically at first.⁵¹⁹ Perhaps most importantly, for those faced with either losing their job or trying to sell goods to ever poorer and moreworried consumers, other nations implemented restrictions on the exportation of food products and tightened their borders. Thus, increasing preoccupation spread among merchants, and not only those dealing with overseas imports. Local circuits of trade, like the potatoes described as being brought into Corocoro by Peruvian communities and producers, were also transnational, and therefore doubly impacted by fluctuating exchange rate or currency crises and the restrictions on cross-border trade in foods. Credit crises in the nitrate and sulfur mines on the Chilean coast pushed thousands of Bolivian workers back into the country seeking work and increased the population of people desperate for income, housing, and food. The Bolivian government relocated 8000 returning Bolivian workers into mining centers and tried to temporarily prop up those sectors to prevent layoffs and closures.⁵²⁰ This crisis exacerbated already simmering political and economic

 ⁵¹⁸ Memoria presentada a la Legislatura de 1915 por el Sr Arturo Monina Campero, Ministro de Gobierno y Fomento. (Bolivia: Talleres Gráficos La Prensa, 1915).
 ⁵¹⁹ Ibid.

⁵²⁰ Memoria presentada a la Legislatura de 1915 por el Sr Arturo Monina Campero, Ministro de Gobierno y Fomento. (Bolivia: Talleres Gráficos La Prensa, 1915). p. 9-10; and Pinto Vallejos, Desgarros y utopías en la pampa salitrera: la consolidación de la identidad obrera en tiempos de la cuestión social (1890-1923); González Miranda, Ofrenda a Una Masacre; González Miranda, Hombres y mujeres de la Pampa: Tarapacá en el ciclo del salitre.

tensions and contributed to the instability and social unrest seen throughout 1914 and 1915.

The unrest of 1914 referred to in newspapers involved dissidents factions of the Liberal Party breaking off to form the Republican Party, their alleged agitations of urban working classes, the active and independent mobilization of worker's federations, attempted uprisings in the countryside, and a declaration of a state of siege by President Ismael Montes.⁵²¹ Though the government would try to quell fears and place the responsibility for the hardships people felt during this time on the external global uncertainties created by the start of the war, deeper structural problems had emerged or been created during the years of Liberal Party governance that made this unrest possible.

In Corocoro, traffic in essential products like flour and sugar became concentrated in the hands of the fewer importers using the new train, precisely at the moment of instability brought on by the war.⁵²² And even though merchants who used the train effectively disconnected a portion of their trade from some of the previous circuits linking rural production to the marketplace in the mining town, the growing population of the region still depended to a great degree on those circuits that did not necessarily move their trade to the new rail lines. In the midst of these changes, while the national government began to act on certain kinds of contraband, specifically those run by indigenous communities (raiding deposits in different towns in Pacajes), the local government

⁵²¹ Memoria presentada a la Legislatura de 1915 por el Sr Arturo Monina Campero, Ministro de Gobierno y Fomento. (Bolivia: Talleres Gráficos La Prensa, 1915).

⁵²² Salluco Sirpa, *La explotación del cobre en el distrito minero de Corocoro a principios del siglo XX, 1900-1930*.

implemented changes in its taxation structure that raised the pressure on small-scale merchants and vendors.

During the years surrounding the inauguration of the trains through Pacajes, Corocoro redrew the tax categories for vendors and merchants operating in the region. In effect, some small-scale female market vendors suddenly found themselves being asked to pay taxes equal to those paid by merchants like Nicanor Oviedo. Even Oviedo complained that he was not an importer operating at the same scale as those that used the train, and requested that his own taxes be lowered.⁵²³ Bakers and bread vendors now had to buy their flour from fewer importers who raised prices both because of export restrictions in place in other countries and because the increasing concentration in the industry permitted it. Pressure on participants in local markets grew right as the number of poorly paid mine workers living in the town increased. Instead of encouraging the growth of a formalized marketplace and the number of vendors operating in it, the local state raised taxes and tolls charged on non-railroad commerce.⁵²⁴

Sectors of the economy that had been closely tied to indigenous circuits of production and sale, like butchers, appeared to be very angry about these reforms and the aggressiveness of the local state in collecting new and higher taxes from them and not from others. In 1919 indigenous butchers argued that the rise in the cost of living for everyone, even those in the countryside, made it necessary for indigenous communities to raise the

⁵²³ Box 34, Box 37, Box 38, Alcaldía de Corocoro, ALP.

⁵²⁴ These struggles led merchants not using the train to complain that the municipality was helping to establish a monopoly and that those who benefitted would be able to arbitrarily fix prices on goods like flour. Box 34, 1901-1920, and Box 37, Alcaldía de Corocoro, ALP.

prices for animals, and that this translated into higher prices at every step in the chain of sale. They argued this did not make them merchants on the same scale as importers. They said police and other merchants strong-armed them sometimes taking animals away from them as a way of charging them for the patents or licenses, and that they were not the only group of indigenous traders subject to this same abusive dynamic.⁵²⁵ Just as the Abasto had begun to exert pressure on those further down the commercial chain, the concentration of power brought by the railroad, the crises provoked both by the war and by increased copper production, and the resulting new state policies doubled the humiliations felt by those with less power in the market. The transformation of a town into a fairly poor mining camp was well underway, and the concentration of commerce was a key step in this process.

If the local state had previously settled on a kind of tacit agreement with merchants or exhibited a kind of permissiveness in relation to the previous patterns of trade, due in part to their reliance on taxes paid by commerce, why did they change course? Or did they? One of the possible explanations can be found in the volume of trade and imports and the continuance of certain tax structures. The municipality continued to charge taxes on the storage of flour, and despite the growth of places like Viacha, the volume of that product being imported to Corocoro grew exponentially with the train. In other words, the local government could earn more by dealing with an ever shrinking number of importers

⁵²⁵ In 1919, the same year that butchers and meat sellers in Corocoro wrote describing the abuses they suffered and asking for the taxes to be lowered, different groups in La Paz also wrote to the municipality of Corocoro asking them to intervene in the abusive forms of tax collection that indigenous producers and vendors were being subject to in Pacajes. Box 38, Alcaldía de Corocoro, ALP.

and they no longer needed the cooperation of those involved in older and non-centralized circuits of trade. In 1904, the municipality had played favorites among merchants, prioritizing the freedoms of importers in the pre-train economy while pressuring all others. The train's arrival may have only changed 'who' was favored among the importers.

Writing in the midst of the WW1-driven boom of copper production in Corocoro, the sub-prefect of the province, Eduardo Lima, described the growth of what could be called informal and mostly indigenous markets that spread on the edges of the town and in nearby rural areas.⁵²⁶ He described the mineworker population of the town as completely reliant on these markets for their sustenance because of the lower prices available for everything.⁵²⁷ As indigenous producers and vendors of meat described in 1919, the War had brought on a crisis and despite the growth in production in the town, everyday people still lived that crisis in their everyday lives.⁵²⁸ And, just as had been the case with attempts to control borders and contraband, the response of many persons being pushed into ever more precarious situations resulted in the growth of the 'disordered' markets that reformers in 1904 had tried to do away with.⁵²⁹ Higher taxes on the lowest rungs of the commercial

⁵²⁶ Lima, *Corocoro: apuntes, críticas y observaciones.*

⁵²⁷ Lima. Preference for these cheaper fairs was also seen in those regions where companies had established their own pulperias. Companies attempted to fine workers who bought from those spaces. Contreras, "Mano de Obra En La Minería Estañifera de Principios Del Siglo, 1900-1925"; Contreras, *Tecnología Moderna En Los Andes: Minería e Ingeniería En Bolivia En El Siglo XX. La Paz:*

⁵²⁸ Box 37, Alcaldía de Corocoro, ALP.

⁵²⁹ Even the collector of the alcohol taxes had trouble meeting his promised amount. In 1919, the tax collector wrote the municipality asking for their help in ensuring that the tax was collected, because without it he would not be able to turn in the contracted amount. This contrasts with the previous pattern, in which the only taxes that were difficult to collect were either those charged on goods produced by indigenous communities or those being collected by outsiders. It is possible that the pressures on merchants created by the new tax schemes on patents and commercial licenses

ladder worked to push those vendors and consumers into the unregistered market, increasingly dealing and trading in the fairs on the periphery of both the town and tax laws. The violent conflicts between merchants, vendors, and indigenous producers and sellers at the edges of the town described by police officers in 1919, were the product of longstanding conflicts amplified and intensified by an economic model that sought to push all of them out.⁵³⁰

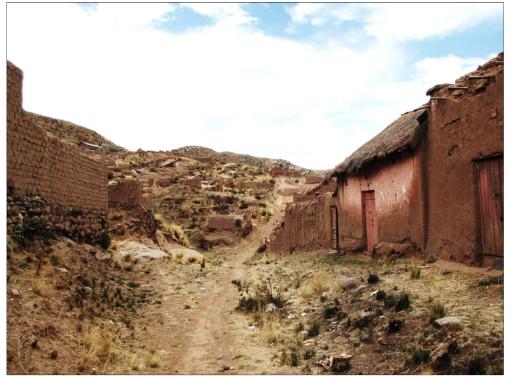


Figure: 4.7: Photo of paths through an abandoned mineworker neighborhood on the outskirts of Corocoro (Photographed by author in 2012).

made many traders in alcohol less likely to pay even a part of their commerce. Box 38, Alcaldía de Corocoro, ALP.

⁵³⁰ Box 37, Box 38, Alcaldía de Corocoro, ALP.

At the national level, Liberal Party leadership, faced with increasing opposition and discontent from all levels of society, mimicked the patterns seen within the town of Corocoro. Patiño, large-scale importers and exporters, and other commercial actors with high levels of capital and power continued to operate as they liked. Smaller merchants and vendors experienced increasing tax pressures and increased costs for operating. Neighboring countries had tried to halt the outflow of foodstuffs in the immediate aftermath of the start of World War I, for fear of global shortages. In Bolivia, the problem of food shortages and high prices in comparison to wages became so endemic that Liberal President José Gutierrez Guerra continued to try an implement similar measures, including ones that threatened merchants who marked up prices at over 8% of the cost, well up to the end of the 1919 and 1920, in the second phase of the WW1 produced crisis. ⁵³¹ By that point, the situation had become so severe in many cities and mining towns that the Liberal Party, which had begun its time in power extolling the virtues of the free market, turned to strict market controls. They attempted to require importers and local foods producers to turn over their goods to municipal centers for distribution as a method of price controls.⁵³² Though these policies impacted on imported goods like flour, rice and sugar that were brought in to some mining and city centers by train, these regulations mostly applied goods considered to be 'basic necessities.' In places like Corocoro, these were products of the

⁵³¹ Among the many laws passed near the end of Gutierrez's term, see examples: Ley 27 de enero 1920 (https://www.lexivox.org/norms/BO-L-19200127-3.xhtml), Ley 30 de septiembre de 1919 (https://www.lexivox.org/norms/BO-L-19190930.xhtml).

⁵³² Ibid. These regulations included confiscating the foodstuffs of market vendors who failed to comply with limits on profits in the resale of food.

regional over-land circuits of commerce operating in and around Pacajes and southern Peru, and these were the products sold in popular marketplaces not commercial houses.

The minority of merchants in Corocoro who retained power and money throughout this period, revealed their vision of the future through proposals to form schools to train youth in the operation of businesses that were focused on international trade with mining companies, large cities, and economic enclaves. Rather than following the models of merchants like the Vaccaro Hermanos and Oviedo who had built their businesses through commerce in a wide range of products from many different producers across both rural and urban economies, the town's leadership decided in 1919 and 1920 to create its own commercial school that was dedicated to training accountants and specialists in international export and import, and the global trade in minerals.⁵³³ No women were admitted to the school.

Discussion:

The local marketplace in Corocoro and the relationships that made it function reveal how very small-scale vendors articulated global trade with indigenous community production both before and after the inauguration of the Arica – La Paz Railroad. More specifically, women in commerce articulated these two spheres of commerce by engaging

⁵³³ The interest in training young men in how to become international merchants and accounts got its start in 1911 when a portion of the income from the Aduanas in Arica was used to pay scholarships and stipends to young Bolivian men to study at the new Commercial School being set up there (Tribunal Nacional de Cuentas, Aduanas Arica 1911, Comprobantes, ABNB). This continued, and in 1919 the Municipality of Corocoro aimed to found its own Commercial School, aimed at integrating young men over the age of 15 with primary school finished, the curriculum included foreign languages, political economy, accounting, and training in commercial and civil codes. Box 39, Alcaldía de Corocoro, ALP.

with both worlds, circulating capital between them, and drew the socio-spatial boundaries that determined how different products and persons moved, sold, and consumed goods needed for survival in the town. Commercial dynamics both reflected the differences between women, and continually formed and reformed ethnic and racial boundaries in the local sphere. Just as theory drawn from infrastructure studies points to the double nature of technology – its birth from social struggles and its power to transform them and shape them at the same time – the marketplace, when understood as a place constructed by different collectives, legal structures, and political reforms, worked in a similar way. These were physical spaces constructed by a confluence of interests, people, politics, and capital. As the capitalist economy expanded throughout the Liberal Party governments at the start of the twentieth century, the structures around local markets also began to change the people in them and the power they held.

Political reforms at the local level did not always work in consonance with national policies, sometimes even empowering circuits that evaded attempts at national controls. However, state policies converged on the questions about who should and would have the upper hand and power in the commercial sphere. Resolving problems created by growth in the mining sector and the advancement of Liberal Party development projects effectively pushed the lower rungs of merchants and vendors into competition with one another while it enhanced the freedom and privilege of a particular set of more powerful actors in trade. However, the net effect of both the train and local policies may have paradoxically increased reliance on (and the importance of) informal fairs and peripheral spaces of

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commerce and consumption by the growing groups of residents of cities and mining centers.

Unlike periods of the nineteenth century where prohibitions on imports and state controls over currency had produced favorable conditions for local populations that produced foodstuffs, the reforms and measures put in place by Gutierrez and others at the end of the years of Liberal Party governments had the opposite effect. Their resolution of food shortages effectively encouraged importation and concentration. Their application of Dis Entailment laws hamstrung communities and their ability to retain community members, effectively pushing people out of possible participation in rural activities and rights to access land. This, combined with population growth produced tensions throughout regions like Pacajes, was reflected in conflicts. Increased demands for cash, combined with consistent currency crises, pushed more vulnerable families and groups into troublesome debt relationships. Prices paid to producers of foods like potatoes, chuño, corn, and other basic goods fell, while the tax burden on the sellers of those foods rose. This combination helped produce an overall impoverishment of producers and many vendors, an increasing stratification in terms of accumulation among merchants, and an increase in the push factors contributing to rural-urban migration. It may have also deepened the reliance of poor and new urban groups on forms of commerce that had been marginalized and pushed to the periphery. The mining, industrial, and construction sectors that had been previously short of labor and desperate for workers, may have found some of those workers as a result of these market reforms, railroad induced capital concentration, and the growing tensions

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surrounding the inheritance of land rights and ownership. Drought was not the only reason to migrate to the mines for work.

CHAPTER FIVE: MAKING WORKERS, REMAKING INDIANS: THE MINES IN COROCORO.

Introduction:

Politicians in Bolivia envisioned railroads as inextricably connected to the development and expansion of mining activity throughout the country, and this link or aspect of the projects constituted one of the principal reasons the projects found supporters across party lines. As the rail lines advanced, many involved in the mining sector and in local governments of mining towns implemented reforms aimed at accommodating and promoting the kinds of changes they expected. Municipal officials in Corocoro anticipated growth in the town, and managers of mining companies foresaw exactly how production could increase and what that implied. Both local officials and company representatives identified problems from their point of view that had to be addressed if the town and industry were to grow in the ways they wanted.

High on their list in Corocoro at the start of the twentieth century, was an attempt to discipline miners. Changes were evident under Liberal Party governments as early as 1908 in the copper mines of Pacajes, when a labor rebellion broke out. Rather than a simple reaction to a top-down reform, the incident in Corocoro in 1908 demonstrates changes in the labor regime and the increase in the number of mine workers during this period of railroad construction and Liberal Party reforms.

Elite interests on this issue did not always align in the ways Liberal reformers might have anticipated. The reforms implemented to discipline workers in the region

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combined colonial and modern practices, in some cases directly mirroring the kind of colonial relations between the state and indigenous workers that was seen during the application of the Prestación Vial to major infrastructure projects. The resulting struggles over control of these changes shows us the complicated reality of attempts to both create a proletariat and transform a town into a modern mining camp.

Regional mining practices:

The mines of the Corocoro district have been treated very lightly in Bolivian historiography of mining in part because of the mineral found in the earth: copper. Research on the history of mining in the Andes and Bolivia in particular, from the Colonial to the Republican periods, have mostly focused on studies of the history of silver and tin.⁵³⁴ The tendency is such that mines extracting metals other than these particular ones have been omitted from some of the most important studies of Bolivian mining. And in some ways this makes perfect sense. The importance of tin and silver, both in the local and global economies is undeniable. The political and cultural power of workers in those mines has led to a significant body of historiographical and anthropological literature – some of

⁵³⁴ Many works address silver and tin production in both the Republican and Colonial periods, see, among many others: Antonio Mitre, *Bajo un cielo de estaño: fulgor y ocaso del metal en Bolivia* (La Paz: Asociación Nacional de Mineros Medianos, 1993); Antonio Mitre, *El enigma de los hornos: la economía política de la fundición de estaña : el proceso boliviano a la luz de otras experiencias* (La Paz, Bolivia: Asociación Nacional de Mineros Medianos : ILDIS, 1993);
Bakewell, *Miners of the Red Mountain*; June C Nash, *We Eat the Mines and the Mines Eat Us: Dependency and Exploitation in Bolivian Tin Mines* (New York: Columbia University Press, 1979); Stanley J. Stein and Barbara H. Stein, *Silver, Trade, and War: Spain and America in the Making of Early Modern Europe* (JHU Press, 2000); Luis Oporto, *Uncía y Llallagua: empresa minera capitalista y estrategias de apropiación real del espacio (1900-1935)* (Plural editores, 2007); Kendall Brown, *A History of Mining in Latin America: From the Colonial Era to the Present* (UNM Press, 2012); Ann Zulawski, *They Eat from Their Labor: Work and Social Change in Colonial Bolivia* (Pittsburgh: University of Pittsburgh Press, 1995).

them classics.⁵³⁵ Tin mining produced wealth for mining barons unparalleled in the 20th century in Bolivia, and with this the *Rosca* dominated national politics from the start of the twentieth century to the 1952 Revolution.⁵³⁶

However, Eric Langer identifies the problem inherent in focusing only on large and well-capitalized enterprises in centers like Huanchaca (the mine which played an important role in the creation of the Antofagasta Railroad) or Llallagua. He states that "in terms of technology and thus in the number of laborers employed, it was hardly a typical mining operation."⁵³⁷ It could also be argued that these large and well-capitalized mines were also atypical in the political power their owners held. Well-capitalized mining operations played important roles in the sector, the national economy, and Bolivian politics – something readily apparent in their advocacy for railroads – but they did not represent the all, and definitely not the majority of mine owners in a numerical sense. The proliferation of mineral wholesalers throughout the first decades of the twentieth century, many of whom made their wealth by buying the production from smaller regional mining operations, points to the diversity of the sector. One member of the *Rosca*, Moritz (Mauricio) Hochschild, build much of his business by doing just this: buying the mineral from very small mining concessions across the country and then handling the export and

⁵³⁵ Absi, Los ministros del diablo: El trabajo y sus representaciones en las minas de Potosí; Nash, We Eat the Mines and the Mines Eat Us: Dependency and Exploitation in Bolivian Tin Mines; M.T. Taussig, The Devil and Commodity Fetishism in South America (University of North Carolina Press, 1980).

⁵³⁶James Dunkerley, *Rebellion in the Veins: Political Struggle in Bolivia, 1952-1982* (Verso, 1984); Klein, *A Concise History of Bolivia,* 2003.

⁵³⁷ Langer, "The Barriers to Proletarianization: Bolivian Mine Labour, 1826–1918," 31.

processing.⁵³⁸ Likewise, as Langer points out, regional differences in both production and labor patterns were significant and perhaps more marked in these smaller operations than in the larger mines and mining camps.⁵³⁹ Different regional dynamics of labor migration, transport, commercial, climate or other patterns, led to very different practices in the day to day operating of the mines.

The mining sector in Corocoro was characterized by a distinct historical pattern of dispersed capital and production prior to the period of Liberal Party governments and the arrival of the Arica – La Paz Railroad. Though extraction of copper in the area predated the arrival of the Spanish, production of this metal, along with tin, remained peripheral in all senses for most of the first three centuries of colonial rule.⁵⁴⁰ Crises in the production of copper in Spain, and the growing demand for bronze for the fabrication of artillery, renewed interest in Corocoro's copper deposits during the Bourbon Reforms in the late eighteenth century.⁵⁴¹ Rights to exploit the copper mines were managed by the Convent of San Juan de Dios in Oruro, and income generated from the granting of contracts were paid into the Caja Real in the same jurisdiction. These rights appear to have been granted to multiple small enterprises, with unknown levels of production. Estimates for this period

⁵³⁸ Klein, A Concise History of Bolivia, 2003.

⁵³⁹ Ibid. Langer's studies of the dynamics on Aramayo's mines in the southern regions of the altiplano sheds light on models that incorporated ownership of haciendas alongside mining operations and the interchange of capital, labor, and production between the two investments – something very different than the model of ownership and production seen in mines that constitute the central focus of other studies.

⁵⁴⁰ Barba, Arte de los metales; Gavira Márquez, "La Minería de Cobre y El Estaño En Alto Péru. Huanuni y Corocoro, 1750 - 1800."

⁵⁴¹ Concepción Gavira Marquez, "La Mineria de Cobre y El Estaño En Alto Peru. Huanuni y Corocoro, 1750 - 1800.," n.d., Bd/Fol 1986, Archivo Nacional Biblioteca Nacional de Bolivia.

are few and far between because the miners with contracts to work in Corocoro did not receive any mita labor nor did they pay the quintal, the 20% tax on production that went to the colonial state.⁵⁴² This difficult to document Colonial Era production in Pacajes most-likely occurred alongside continued small-scale or even clandestine production by indigenous communities, as it had in other peripheral mineral regions of the altiplano for centuries.⁵⁴³ Nevertheless, the work of historian Concepcion Gavira Márquez points to increased and continued production of copper in the district in the Colonial Period, without much intervention by colonial authorities, with only short interruptions during the 1780-1783 cycle of rebellions and the War for Independence.⁵⁴⁴

Following Independence, production of copper in the region increased despite some dramatic periodic fluctuations in metal prices and production. The boom in demand for industrial metals around the globe in the 19th century led to increased copper production from the 1830s onwards. Historian Ramiro Jiménez asserts that during the 19th century, Bolivian investors in Corocoro lost ground and were gradually excluded from ownership of mining enterprises in the district because they lacked the capital to survive significant drops in metal prices.⁵⁴⁵ Though many invested as individuals or in newly formed

⁵⁴² According to Gavira they were the only mining concessions in the Oruro district that did not pay the 20%. Other miners in the district did pay it, and other producers of copper and tin did as well, like those in Coquimbo on the coast. Gavira Marquez.

 ⁵⁴³ Barba, *Arte de los metales*; Cruz and Téreygeol, "El Mineral Rebelde. El Lado Indígena de La Produccion de Plata Durante Los Primeros Momentos de La Colonia (Bolivia, Siglos XVI-XVII)."
 ⁵⁴⁴ Gavira demonstrates that production in Corocoro continued during the Tupac Amaru and Tupac Katari rebellions, though at significantly reduced levels. Significant slowdown and some stoppage in production appears to have occurred during the War for Independence as well.Gavira Marquez, "La Mineria de Cobre y El Estaño En Alto Peru. Huanuni y Corocoro, 1750 - 1800."

⁵⁴⁵ Ramiro Jiménez Chávez, "Comerciantes, Habilitadores e Inmigrantes En La Formacion Del Capital Minero de Corocoro (1830-1870)," 1994, Bd 7858, Archivo Nacional Biblioteca Nacional de Bolivia.

commercial societies in the 19th century, most wound up being bought out by mining entrepreneurs backed by foreign capital. As a result of the instability in prices, and the need for deeper pockets to ride out the sector's crises, Corocoro's mining industry, though only 100 km from La Paz, became inextricably connected to international capital.⁵⁴⁶

Just as merchants throughout the area had worked in close connection to Tacna and Arica based interests, the mining sector underwent processes of consolidation in which those coastal interests and investors (and their overseas partners) grew to control ever larger portions of production. By the start of the Liberal Party governments, the majority of production was in the hands of 6 companies, whereas previously in the 19th century there had been dozens. And while this configuration may have been more dispersed than other mining districts, one of those companies, the Compañía Corocoro de Bolivia, was responsible for roughly half of the region's copper production at the start of the twentieth century.

After recovery from the international financial crisis of 1907 (provoked in part by speculation in copper production) the mining sector in Corocoro underwent yet another process of consolidation. Perhaps in response to the crisis, the changes produced by the running of the Guaqui Railroad, or in anticipation of the arrival of the Arica – La Paz line, the Sucesión Bertha, Carreras Hermanos, JK Child and Company, moved to join their

⁵⁴⁶ Though the most important transfer of Bolivian-owned mines to foreign capital occurred slightly later than the time periods addressed by Rosenblitt, the pattern does appear to follow the movement of commercial capital into other productive sectors in the region he discusses. Rosenblitt, "El Comercio Tacnoariqueño Durante La Primera Década de Vida Republicana En Péru, 1824-1836"; Rosenblitt, *Centralidad geográfica, marginalidad política*; Jiménez Chávez, "Comerciantes, Habilitadores e Inmigrantes En La Formacion Del Capital Minero de Corocoro (1830-1870)."

concessions, selling to the newly created company The Corocoro United Copper Mines of Bolivia, Ltd.⁵⁴⁷ By 1909, two foreign-owned companies were responsible for nearly all of the copper production registered in Corocoro.⁵⁴⁸

The events of August 1st, 1908:

Competition in the mining sector was widespread. Companies fought over supplies to their mines and processing plants, and they disputed the limits of concessions on a regular basis. In his study of copper production in Corocoro during this period, Teodoro Salluco Sirpa details various conflicts between companies over the rights to buy fuels, especially taquia, a locally produced fuel that was readily adapted to the region's processing mills and motors.⁵⁴⁹ The consolidation of several companies into one that would compete with the historically powerful Cia Corocoro de Bolivia, was a process that did nothing to lessen the competition between the different interests in town. These dynamics aside however, every mining company shared certain agendas, and where those converged they were willing to cooperate with one another to advance all their interests.

Mid-way through 1908, the mining companies in Corocoro began to construct a united front on questions related to pay and contracts for their workers. The Cia. Corocoro de Bolivia played a central role in organizing the agenda.⁵⁵⁰ According to records

⁵⁴⁸ Eduardo A. Lima L, *Corocoro: apuntes, críticas y observaciones* (Salesiana, 1918); Ostria, *Capitalismo, modernización y resistencia popular 1825-1952.*

⁵⁴⁷ Gustavo Rodríguez Ostria, *Capitalismo, modernización y resistencia popular 1825-1952* (Vicepresidencia del Estado de Bolivia-Centro de Investigaciones Sociales, 2014).

⁵⁴⁹ Salluco Sirpa, *La explotación del cobre en el distrito minero de Corocoro a principios del siglo XX, 1900-1930*.

⁵⁵⁰ Box 23, Juzgado de Pacajes, ALP.

describing the incident, the mine owners had organized not to lower wages or increase hours; rather, they sought to fix their workers in place, to make them stay in the mines by forcing a month-long contract that included monthly pay for all employees. As the manager of the Cia. Corocoro stated in testimony, they sought "to make the workforce stable... to stop them from going here and there as they feel like it."⁵⁵¹ In other words, they wanted a workforce that could not leave when they wanted and could not change employers when they pleased. Given the previous examination of the diversity of economic activities in the region, especially among indigenous populations, the agenda formed by the mining companies appeared to be the creation of a permanent workforce that would be dependent on them for wages. Moreover, the abundance of work for specialized workers in other growing mines or on railroad projects also presented companies with competition for even those regular workers. The companies wanted to make a dependent and fixed proletariat. Just like railroad construction companies that struggled to recruit workers for their projects at precisely this same time, the mine owners faced the reality of a workforce with little need or desire to enter into a relationship of wage dependency in an unattractive and dangerous workplace, and companies struggled to keep workers on the job throughout the year or even each month or week.⁵⁵² Moreover, the generalized shortage of experienced mine workers across the country meant that those workers able to move mines, could change worksites in search of better wages and conditions.⁵⁵³ While railroad

⁵⁵¹ Ibid.

⁵⁵² And the working conditions described by all accounts appear to have been horrific. See: L, *Corocoro*; Ostria, *Capitalismo, modernización y resistencia popular 1825-1952*; Juan Albarracin Millan, *El Poder Minero* (La Paz: AKAPANA, 1972).

⁵⁵³ Contreras, *Tecnología Moderna En Los Andes: Minería e Ingeniería En Bolivia En El Siglo XX. La Paz:*; Contreras, "Mano de Obra En La Minería Estañifera de Principios Del Siglo, 1900-1925."

builders struggled and negotiated with the state and labor contractors over how to recruit and maintain the workforces they needed, the mining companies in Corocoro took different stance in 1908, and attempted to force a change by coordinating and timing their reforms in work regimes.

In late June and early July, 1908, a group of workers from the workshops and mills of the different mining companies met with managers in the offices of the Cia Corocoro. The companies in the town were preparing to change the terms of work contracts, effectively eliminating day to day contracts, for the establishment of monthly ones. This group of workers, artisans and specialized laborers, worked full-time in the sector and might not have unanimously objected to the installation of longer-term contracts at good wages, provided those contracts were paid.⁵⁵⁴ However, as a group they opposed these changes. The mining companies approached them with only the promise of monthly pay and something the companies called a weekly 'socorro', which consisted of a weekly handout of bread and a few other foodstuffs to help them get through the month.⁵⁵⁵ These groups of workers decided that the arrangement was unacceptable. They refused to accept the 'socorros' that were offered in lieu of weekly remuneration, and refused to receive their

⁵⁵⁴ This group of workers included: Carpenters, ironworkers, machinists, and specialists in the founding processes. They might have benefitted from monthly contracts had they desired to work consistently for the same company. Other researchers have noted that lack of timely pay even for full-time and contracted workers was a problem throughout this time period that aggravated labor disputes. Contreras, *Tecnología Moderna En Los Andes: Minería e Ingeniería En Bolivia En El Siglo XX. La Paz:*; Contreras, "El Desarrollo Del Transporte En Bolivia, Una Aproximación Al Impacto Económico y Social de Los Ferrocarriles y Carreteras 1900-2015."

⁵⁵⁵ Box 23, Juzgado de Pacajes, ALP.

pay in one lump sum every month. These initial negotiations resulted in a temporary continuation of the status quo of weekly contracts and pay for at least one month.

The conflict flared up again at the end of July, 1908, and another round of negotiations began. During the night of Friday, July 31st and stretching through to the morning of August 1st, the workshops and mills of Corocoro buzzed with exchanges over whether they would receive their full weekly pay or whether managers would once again attempt to impose their reforms.⁵⁵⁶ Around midday on the 1st of August, the manager of the Cia Corocoro de Bolivia entered the company's workshop and attempted to calm workers struck and stopped working. The supervisor assured them that they would be paid their next week's wages on August 6th, after working that day. Apparently, some artisans had received their weekly pay the day before, though the rest of the workforce had not.⁵⁵⁷ Managers also indicated that workers would receive a weekly 'socorro', which was waiting outside the door to the workshop and ready to be handed over.

Several leaders shouted their opposition to this proposal.⁵⁵⁸ A few workers disappeared out the back to receive their bread and the other foodstuffs included in the "Socorro", only to be whipped with *chicotes* by their fellow workers when coming back

⁵⁵⁶ The testimonies sometimes contradict one another about whether certain workers from the workshop did indeed receive their pay on the 31st of July, while others did not. One potential explanation for this is that only those that worked that day received their pay, and those that worked August 1st would have been paid by management that day. Box 23, Juzgado de Pacajes, ALP.

⁵⁵⁷ It is clear from all testimony that the bulk of laborers in the mine shafts had not been paid at the end of July. Box 23, Juzgado de Pacajes, ALP, La Paz.

⁵⁵⁸ One worker from inside the workshop is quoted as having shouted that the managers would now "see the miracle of the lord!" in reference to the consequences of company actions. Box 23, Juzgado de Pacajes, ALP.

into the workshop. Leaders stood up and told management that should they take this offer, they would be left vulnerable to the rage of the other workers in the mines. They also stated that the 'indiada' was restless, and looking for any excuse to cause troubles for the company and the town.⁵⁵⁹ They said that the Indians were newly federated and looking for any excuse to come in and sack the mines and destroy everything. They said that should that happen, the others wouldn't distinguish between managers, townspersons or artisans; all would be targeted.

The negotiation moved from the workshop to the management offices. The heads of all the other smaller companies in town were called to participate in that meeting.⁵⁶⁰ That afternoon, while they were discussing the terms of contracts and pay for the sector inside the office, a large crowd gathered outside. The crowd became increasingly agitated as the afternoon progressed.⁵⁶¹ According to accounts of the negotiation, as it became clear that no agreement was to be reached that day, the stones came through the window.

The crowd that was gathered outside the Cia Corocoro de Bolivia's main office destroyed all the windows and doors.⁵⁶² Those persons meeting and negotiating within fled quickly. The crowd outside then divided into groups of roughly 200 people, and each went

⁵⁵⁹ Box 23, Juzgado de Pacajes, ALP.

⁵⁶⁰ The other mining companies called in included: JK Child, Carrera Hnos, and Noel Berthin, (three of the companies that would unite under the Corocoro United Copper Mines only a year later). Box 23, Juzgado de Pacajes, ALP.

⁵⁶¹ The numbers of participants in the uprising varies significantly from one testimony to another, however, here I have estimated the number based on the testimonies of all events and all actors during the uprising as nearing one thousand, though this estimate is not firm. Box 23, Juzgado de Pacajes, ALP.

⁵⁶² Ibid.

to different management offices in the town and the surrounding mines.⁵⁶³ One by one the buildings of different mining companies in the Corocoro district were destroyed. Some buildings were blown up with powder normally used in the mine shafts, some were burnt to the ground, others lost all their windows, doors, desks, safes, etc.... Some accountants and administrative workers were hospitalized for their injuries, while others sought refuge in the homes of townspeople and hid there.

The town called in their repressive forces, which did not consist of professional police. Instead, other men from the town set out to form an armed guard, and they were endowed with police powers during the events to restore order. Many of these deputized citizens were described in passing as merchants. They spread out through the streets and tried to suppress the rebellion, and appear to have done so within about 24 hours. Surprisingly, the court documents do not describe any fatalities and the uprising may not have even made news outside of the district.⁵⁶⁴

The archival account of the events of August 1st, 1908 ends at that point. However, it is worth noting that in the testimonies taken after the initiation of legal proceedings, the only individual workers identified and accused by name of participating, were male artisans involved in the negotiations with management and the exchanges in the workshop. Many of these men were initially accused of fomenting the violence and property destruction. Yet, each of those workers initially accused was eventually released on the

⁵⁶³ This number is given in: Box 23, Juzgado de Pacajes, ALP.

⁵⁶⁴ The fragmented court records report injuries, but no serious injuries among mineworkers. It is possible that they did occur but are not recorded in the surviving documentation of the events.

testimony of a town merchant or vendor who provided them with alibis.⁵⁶⁵ In other words, one after another, other men involved in commerce (perhaps even the very merchants who set out to suppress the uprising on the night of August 1st) testified that the men accused of leading the rebellion, had actually been calmly walking the streets or sitting in one of their establishments during the height of the destruction.⁵⁶⁶

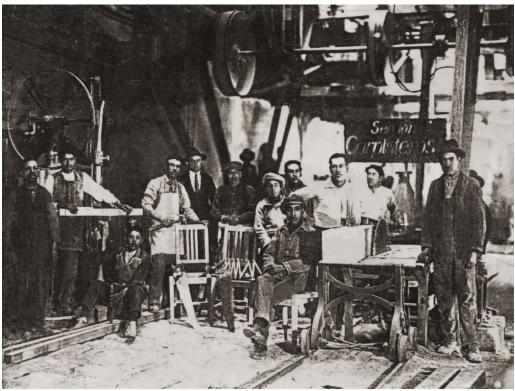


Figure 5.1: Photo of woodworking shop and carpenters in Corocoro at the start of the twentieth century. (Photo from turn-of-the-century postcard).

⁵⁶⁵ Box 23, Juzgado de Pacajes, ALP.

⁵⁶⁶ Because the surviving documentation is incomplete the possibility that other accused were eventually charged with fomenting the rebellion or participating in it. However, all those men listed as having spoken up in the workshop and having participated in the negotiations were cleared.

Modernization of the mining sector in Corocoro:

Most mineworker struggles focus on wages and working conditions, and the historiography generally mirrors this. At different points in Corocoro's history, and especially towards the end of the years of Liberal Party rule and WW1, labor organizing in the region focused on these same issues.⁵⁶⁷ Gustavo Rodriguez Ostria has evened detailed short-term strikes of day laborers pushing for higher wages in the mid-nineteenth century in Corocoro.⁵⁶⁸ And, delays in the payment of wages during the Liberal Period did spark many small conflicts in mines around the country.⁵⁶⁹ Many of these struggles have been contextualized within the growth and history of the mineworker labor movement and organization that grew in the years follow WW1 and into the 1920s. Here, the focus of analysis is not those issue, but rather a dynamic in the mines that has been less-explored and is directly connected to debates surrounding the Prestación Vial and labor on railroad construction: How did mining companies make people work, when and how they wanted? The conflict in Corocoro's mining sector in 1908 centered on company attempts to discipline workers into becoming the workers they wanted.

The existing historiography on 19th and very early 20th century mining in Bolivia makes clear that a mining proletariat, where it existed this early on, comprised only a small

⁵⁶⁷ Salluco Sirpa, *La explotación del cobre en el distrito minero de Corocoro a principios del siglo XX, 1900-1930*; McGrath, "Pre-Histories of Revolutionary Nationalism and the Welfare State."
 ⁵⁶⁸ Rodríguez Ostria, *Capitalismo, modernización y resistencia popular 1825-1952*.

⁵⁶⁹ Ostria, Capitalismo, modernización y resistencia popular 1825-1952; Contreras, Tecnología Moderna En Los Andes: Minería e Ingeniería En Bolivia En El Siglo XX. La Paz:; Contreras, "Mano de Obra En La Minería Estañifera de Principios Del Siglo, 1900-1925."

portion of workers engaged in the mining sector.⁵⁷⁰ The norm in Corocoro appears to have been that workers spent an average of 3 weeks in the mine at any one point.⁵⁷¹ This transient workforce moved between their rural communities, different mines, and other temporary work according to agricultural cycles and economic need.⁵⁷² Some of these workers were experienced in the mines, but it was historically not the only work for the indigenous men and women that labored in Corocoro.⁵⁷³

Despite the complaints about worker shortages in debates surrounding railroads and the Liberal Party's development project, the previous regime of using temporary labor may have made sense to some mine owners in the past. Small mining enterprises in Corocoro with little capital to ride out the ups and downs of metal prices would not have been able to

⁵⁷⁰ Ostria, Capitalismo, modernización y resistencia popular 1825-1952; Smale, I Sweat the Flavor of Tin; Brown, A History of Mining in Latin America; Carlos Contreras, La fuerza laboral minera y sus condiciones de funcionamiento: Cerro de Pasco en el siglo XIX (Documento de Trabajo, 16. Serie: Historia, 2). (IEP, 2000); Carlos Contreras, Mineros and Campesinos En Los Andes. Mercado Laboral y Economia Campesina En La Sierra Central Siglo XIX. (Lima: Instituto de Estudios Peruanos, 1988); Contreras, Tecnología Moderna En Los Andes: Minería e Ingeniería En Bolivia En El Siglo XX. La Paz:

⁵⁷¹ Ostria, *Capitalismo, modernización y resistencia popular 1825-1952*.

⁵⁷² This pattern of migration is seen today in the Bolivian altiplano, see: Vassas-Toral (2015) and Pascale Absi, *Los ministros del diablo: El trabajo y sus representaciones en las minas de Potosí* (Institut français d'études andines, 2005).. For a historical perspective on this pattern in Perú see Contreras, *Mineros and Campesinos En Los Andes. Mercado Laboral y Economia Campesina En La Sierra Central Siglo XIX.*, 1988. and for historical perspectives on migration the Bolivian altiplano see:Harris et al., *La participación indígena en los mercados surandinos*; Brooke Larson, Olivia Harris, and Enrique Tandeter, eds., *Ethnicity, Markets, and Migration in the Andes: At the Crossroads of History and Anthropology* (Duke University Press, 2012).

⁵⁷³ And, it does appear that the workforce was both male and female. Sub-prefect of Pacajes Eduardo Lima wrote in 1917 that women worked inside the mining shaft in underground mining operations, something somewhat surprising given the typical characterization of women as only comprising the workforces outside the mine. Lima estimates that in 1917 over 20% of the mineworkers in Corocoro were women, and he argues that women need to be removed from the underground workforce because of the supposed moral degradation and promiscuity that this work led them to engage in. It is possible that the general shortage of workers in the region led to a greater participation of women in the underground mining workforce as it did during the Chaco War. Lima, *Corocoro: apuntes, críticas y observaciones*; Absi, *Los ministros del diablo*.

maintain a full-time and fixed workforce, and the town may not have wanted to deal with the repercussions of large layoffs of men with no land to return to. A fluctuating workforce with continued ties to agrarian life and production lifted some company responsibility for ensuring the reproduction of the workforce.⁵⁷⁴ Daily or weekly contracts flourished in the 19th century at least in part because they buffered small enterprises from the consequences of employing a proletariat. The part of the workforce that was permanent possessed skills that might have enabled them to move into other mining regions, or to other cities. Avoiding wage dependency permitted continued ties to other spheres, including their communities. For much of the 19th century, when highly unpredictably patterns of production made work in the industry unstable, and when rural communities experienced more security in their agricultural production, this arrangement may not have been one that temporary indigenous mine workers objected to either.

Mining companies in Corocoro pushed to alter this arrangement at the start of the 20th century because of changes in national infrastructure and the increasing capital consolidation. Railroad expansion, though still in its infancy at the start of the twentieth century in Bolivia, fostered increases in the district's copper production.⁵⁷⁵ The reduction of transport costs, sparked by the inauguration of lines from Puno, Guaqui, Oruro, and the connection of Oruro to Viacha, allowed mine owners to dramatically lower the "Law" of mineral extracted from mines – even in places like Corocoro, where the railroad had not yet directly arrived. Previous patterns of production and transport had incentivized the

⁵⁷⁴ Jiménez Chávez, "Comerciantes, Habilitadores e Inmigrantes En La Formacion Del Capital Minero de Corocoro (1830-1870)."

⁵⁷⁵ Gómez Zubieta, "Políticas de Transporte Ferroviario En Bolivia 1860-1940."

extraction of native copper or very high quality ores, and their basic processing into 'barillas' for export. This process employed workers in the mines and in the processing and basic smelting of barillas. Exporting these higher quality ores meant that companies could make the high transport costs they paid prior to railroads worth their while.

However, when companies in Corocoro began to gain access to railroads, two very important things changed. Increased investment and consolidation gave them a financial cushion for their operations, and cheaper transport meant they could export ores that were either of lower quality or required different forms of processing than those available in the town. The promise of the completion of the Arica-La Paz railroad in the near future, meant that company managers in 1908 foresaw an even further reduction in transport costs. ⁵⁷⁶ Taking more ores out of the mines, even without processing them, required more workers, especially underground workers and those who could sort and load ore.⁵⁷⁷

Creating a disciplined workforce and town:

Mining regions, and the company towns that dominate them, have been studied as extreme examples of the exertion of power over workers by their employers. This model grew to be particularly important at the end of the nineteenth century. If railroads were physical manifestations of progress to nineteenth century politicians, and new markets and roads the same to local politicians, mining companies saw the company town in a similar way. Given the correct infrastructure surrounding the mining operation, political support, and the capital investment, the model offered advantages to companies. In most of these

⁵⁷⁶ Jiménez Chaves (1997).

⁵⁷⁷ Lima, Corocoro: apuntes, críticas y observaciones.

places, the company extended its control over the housing, food consumption patterns, health care, and the lives, of its workforce.⁵⁷⁸

However, Corocoro had not been a company town throughout the course of its existence. A mining center yes, but as the previous chapters have shown, it was also a political center (provincial capital), a judicial center, religious one, and a node in regional commerce that was not necessarily tied to the mining activity in the region. In other words, even though companies in the area could sometimes draw from a workforce that possessed work experience and knowledge of the mine, potential workers had a very long tradition of relative independence and were embedded in a region with many non-mining interests.⁵⁷⁹ Extending mining company control over workers, and especially altering their pay or trying to make them dependent on the company for consumption through company stores, was a step guaranteed to produce conflict in the pre-railroad context of the region.

Just as the temporary labor regimes had made sense in the nineteenth structure of the regional economy and the mining sector, the predominance of small-scale or decentralized commerce in relation to the mining operations also followed a certain logic. The flexibility of labor relations and the large and productive rural and commercial spheres had all developed in a somewhat complementary manner. Workers could not rely on a

⁵⁷⁸ *Company Towns in the Americas* provides a good overview of these processing throughout the continent. (Vergara and Dinius, 2011).

⁵⁷⁹ Despite the insistence on the centrality of mining, something that cannot be entirely denied, Corocoro also served as an organizing point for commerce between the altiplano, the port of Arica, and the commercial center of Tacna. See Cajias (1997) for a historical discussion of the importance of Arica for Bolivia's exports to the Pacific through the 19th century, and the records of the Aduanas de Arica (ABNB) for a better idea of Corocoro's role. The coordination of imports and exports through Corocoro will be addressed in later sections of this paper.

company store that would be shut down and could not pay for goods with scrip from a nonexistent employer. Decentralization of production and ownership in mining during the previous decades had meant that the varied marketplaces and circuits of trade became a backbone of the regional economy. Moreover, the local municipal government maintained important interests in maintaining some of those commercial circuits. The town's political structures, economic power, the diversity of the population, had all been shaped by the patterns that mining companies wanted to change in 1908. A mining company moving into the provision of foods as a supplement or replacement for part of pay, would have faced significant challenges from more than just certain groups of workers; they would have confronted the town's politically active commercial sectors, especially the smaller-scale merchants and vendors that mineworkers relied on for their food.

Just as was the case during the changes in the Prestación Vial during this same time period, the multiplicity of regional, national, and international interests meant that while one group lost allies on a particular issue, they could regain them on others where they found common ground. By 1908 mining companies had already developed allies in the municipal government on some other issues, including ones that dealt with aspects of urban life. When company managers referred to the problematic mobility of workers, they not only referred to the movement of workers away from the mines, but also addressed what they saw as a larger problem of an 'undisciplined' workforce they needed to control. On this point, they shared concerns with the local municipal government and the national one, who also wanted greater control and increased legibility of certain populations.

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At the national level, one of the most obvious examples of this was the reorganization of disciplinary and repressive state forces. The Liberal Party pushed for the centralization of police powers under the national government in 1910, though discussions began earlier and continued for many years after.⁵⁸⁰ They worked to standardize police forces at the same time they were also working to establish better border controls and increase military conscription and army presence throughout the country.⁵⁸¹ Struggles over local vs national control of the police produced a kind of power sharing agreement between different parts of the state. Prefects maintained the ability to call out or redirect police forces to put down unrest, the national government tried to recruit, train, and retain a professional force instead of the occasional and improvised forces seen in many places. The use of local citizens in Corocoro during the 1908 mineworker conflict was a good example of what the national government wanted to eventually replace. So long as local authorities could retain some control over these forces, prefects did not wholly object to this move that would also benefit mining and railroad companies, as well as some national institutions.

⁵⁸⁰ Ministerio de Gobierno y Fomento. *Anexos a la memoria presentada a la legislatura de 1910*. (Bolivia: Talleres Gráficos La Prensa, 1910).

⁵⁸¹ Ministerio de Gobierno y Fomento. Anexos a la memoria presentada a la legislatura de 1910.
(Bolivia: Talleres Gráficos La Prensa, 1910); Ministerio de Gobierno y Fomento. Memoria presentada a la Legislatura de 1911 por el Dr. Juan M Saracho, Ministro de Gobierno y Fomento.
(Bolivia: Talleres Gráficos La Prensa, 1911); Ministerio de Gobierno y Fomento. Memoria presentada a la legislatura de 1912 por el Dr. Aníbal Capriles, Ministro de Gobierno y Fomento.
(Bolivia: Talleres Gráficos La Prensa, 1912); Ministerio de Gobierno y Fomento. Memoria presentada a la legislatura de 1912 por el Dr. Aníbal Capriles, Ministro de Gobierno y Fomento.
(Bolivia: Talleres Gráficos La Prensa, 1912); Ministerio de Gobierno y Fomento. Memoria presentada a la Legislatura de 1916 por el Sr Arturo Molina Campero, Ministro de Gobierno y Fomento y Fomento.

At both the local and national level, the expansion of construction of railroad projects, the growth in mining, and the movement of people that both of these processes provoked, made the lack of health institutions impossible to ignore. The local state's agenda often included some basic programs of urban infrastructure: sewers, lighting, cleaning the streets, etc.... Both the private and public interests also sought to address health problems that had nothing to do with who sold bread, but rather whether the increased movement of people through the region would translate into new diseases. Even the railroad itself would become a health issue by gathering more than a thousand workers on a construction project into one small town for payday, market day, and all kinds of social activity.⁵⁸² These booms in temporary populations in small towns with little infrastructure for water and sewers created the perfect conditions for health problems or diseases to spread.

However, while responding to real problems, the solutions sought by both private interests and the state reflected a combination of Colonial Era attitudes and modern ones on race, hygiene, criminality, and order. On a local level, the municipality and the mining companies expressed similar worries about mineworker housing and Aymara family and cultural practices. In addition to attempting to force worker stability through contracts, companies wanted to guarantee worker presence in town through the construction of an entirely new mineworker neighborhood on the edge of town. This neighborhood became one of the places police officers described as being a site of regular conflict between

⁵⁸² Ministerio de Gobierno y Fomento. Anexos a la memoria presentada a la legislatura de 1910. (Bolivia: Talleres Gráficos La Prensa, 1910).

different groups of merchants in 1919. It was also one of the places that indigenous populations selling their goods used for fairs. The housing initiative was supported by municipal authorities. Municipal records are unclear about what living in these houses really involved and whether it entailed dependency on the particular company, however the plan did meet serious resistance. While not appearing to have battled mining companies on this issue directly at that point, mineworkers often chose to continue living elsewhere.⁵⁸³

In their studies of the region both Silvia Rivera Cusicanqui and Gustavo Rodriguez Ostria state that residence patterns for indigenous workers in Corocoro throughout the first decades of the twentieth century were organized in terms of their communities of origin.⁵⁸⁴ Rivera relates that Aymara communities from the surrounding regions kept houses in Corocoro, which they used when they came to the provincial capital for a variety of activities including: filing court documents, interactions with local government authorities, and occasional wage work in the city. Extending use of these residences to workers would not have been that different from patterns seen in places like Oruro during the Colonial Period.⁵⁸⁵ Workers involved in court records often listed both their origins, their residence in the town and those of their housemates on court documents requiring their personal information. However, some of those that did not live in houses like these for one reason or another, and did not move into Barrio San Jorge, continued to gather together on the periphery of town, refusing to inhabit the company houses. Eduardo Lima, the sub-prefect of the region in the mid-1910s, complained that even by the time of his writing indigenous

⁵⁸³ Lima (1918).

⁵⁸⁴ Rodríguez Ostria (2014) and Rivera (1983)

⁵⁸⁵ Zulawski, *They Eat from Their Labor*.

workers in the mines were so staunch in their rejection of company housing that they preferred to live in precarious *chozas* or sleep in groups in the open air on the edge of town rather than live in the mining neighborhood of San Jorge.⁵⁸⁶ Though, he also admitted that company housing there was little better than a 'choza.'

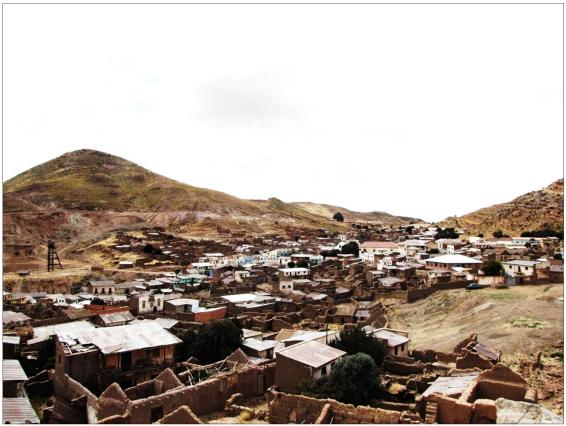


Figure 5.2: Photo of Corocoro from the mostly abandonded mineworker neighborhood located to the north of the plaza (Photographed by author in 2011).

⁵⁸⁶ Lima (1918).

These housing patterns formed part of a larger community-based network of temporary migration to the city, in which community and family relationships remained intact and perhaps even guided or determined the movements of workers. Documents related to employment on construction projects demonstrate the persistence of these same patterns even in other industries.⁵⁸⁷ Short-term engagements with wage labor point towards the continuation of corporate forms of organization among workers, driven together to the work because of community or family needs, production cycles, and as the consequences of certain types of conflicts, like those seen in Pacajes prior to the use of the Prestación Vial for the construction of the Corocoro Branch of the Arica – La Paz Railroad.⁵⁸⁸ This pattern translated to the mines of Corocoro.

Political leaders and mining company managers directed efforts aimed at altering these patterns, and intervening in community and family relations in the town. While managers focused on 'reforming' housing pattern or restricting worker movement and tying them to the mines, town officials tried to alter the conduct of indigenous women and men. When it came to disciplining workers, companies and the local state coordinated their

⁵⁸⁷ Despite the absence of company archives in Corocoro for this era, we can gain insight into labor patterns by examining the movements of workers into and out of other forms of work on industrial projects in the region. For a discussion of contracting patterns on the Chilean coast see Gonzalez (2007) and Pinto (2007). For an example of this pattern among indigenous workers on Bolivia railroads see: ALP, Juzgado de Pacajes, Box 19 (1907). For a discussion of these dynamics in regions where mining companies incorporated haciendas into their production chains see: Langer, "The Barriers to Proletarianization: Bolivian Mine Labour, 1826–1918"; Erick D. Langer, "Labor Strikes and Reciprocity on Chuquisaca Haciendas," *The Hispanic American Historical Review* 65, no. 2 (1985): 255–277.

⁵⁸⁸ Work on the construction of the Corocoro Branch of the Arica-La Paz railroad was primarily carried out by indigenous workers fulfilling their prestacion vial requirements. However, the motivations behind their widespread participation in this project appears to have been, for many communities, a desire to evade the abuse of local corregidores.

efforts. Municipal authorities began, in the first decade of the twentieth century to inspect the houses of the indigenous residents and workers by deploying hygiene monitors.⁵⁸⁹ While these monitors were especially active during times of illness in the town, their activities continued even during times of relative health.⁵⁹⁰ Monitors classified the occupants of houses, their patios, their sleeping quarters and other parts of their houses as 'desaseado' or 'infecciosa.' They gave regular reports on the results of their visits to the municipal council and targeted houses for actions, with fines or threats of removal, destruction of the house, etc... They do not appear to have visited the houses of criollo merchants in the town.

The usually unstated aims of mining company executives and local authorities' attempts to change Aymara cultural practices became very explicit at times. One mine manager went so far as to propose a scheme in 1906 aimed at changing the child-raising practices of indigenous mineworker families and ensuring the reproduction of the workforce through the creation of an incentive program.⁵⁹¹ He argued that the demographic growth of the workforce was at risk because of deficiencies in Aymara culture and hygiene that resulted in high levels of infant mortality:

This fact... denotes unfortunate ignorance, neglect, lack of cleanliness, and worst of all, the parents' lack of love for their children; and beyond all ethical or religious questions, it constitutes a true threat to the prosperity of Corocoro; for without a new generation of workers to replace the current ones in the coming years the mines would have to stop, the merchants close their doors for lack of buyers.... In light of this sensitive

⁵⁸⁹ ALP, Alcaldía de Corocoro, Box 38.

⁵⁹⁰ They were particularly active during times of flu outbreaks and one known outbreak of plague in nearby areas.

⁵⁹¹ Box 48, Alcaldía de Corocoro, ALP.

circumstance, I make the following offer, always with the moral approval of this Honorable Council.... I will pay through my agents in Corocoro, the sum of 10 bolivianos to every mother of the indigenous race whose child, born between the 1st of March 1906 and the 28th of February 1907... lives 12 months.⁵⁹²

Interests in the mining sector presented indigenous women as a threat to the town just as some guild vendors had, except this time with a different emphasis. Mining companies were preoccupied by what a shrinking workforce meant for their businesses. His fellow members on the municipal council applauded this proposal, though no further records document its implementation. His suggestion, along with others attempting to improve the 'cleanliness' and 'morality' of indigenous workers, clearly shows that in the eyes of local officials, creating a permanent mining workforce and an industrious town would require changing Aymara men and women, and their family relations.⁵⁹³

The disciplining of indigenous mineworker families has deep roots in the

Republican and Colonial eras. National and local officials in mining centers expressed

⁵⁹² Original quote: "Este hecho Señor, denota desgraciadamente ignorancia, descuido, falta de aseo, o peor que todo, falta de amor para sus hijos, de parte de las padres; y fuera de toda cuestión de ética o de religión, constituye una verdadera amenaza a la prosperidad de Corocoro; pues sin una nueva generación de trabajadores para reemplazar los actuales en los años venideros las minas tendrían que parar sus trabajos por falta de brazos, los comerciantes cerrar sus despachos por falta de compradores... en vista de esta circunstancia tan sensible, me permito hacer la siguiente oferta contando siempre con el apoyo moral de esta Honorable Junta... pagaré por medio de mis agentes in Corocoro la suma de diez bolivianos a toda madre de la raza indígena cuyo hijo o hija nacido entre el primero de marzo de 1906 y el veintiocho de febrero de 1907....cumpla doce meses." ALP, Alcaldía de Corocoro, Caja 48, Carta entre Sr Barba, ex-miembro de la Junta Municipal y los integrantes de 1906.

⁵⁹³ The repeated employment of terms referring to hygiene should be briefly addressed. The town lacked the basic infrastructure to ensure the health of its residents and it did experience regular epidemics. These interventions formed part of a package of reforms that included calls for better infrastructure and institutions that would addressing these problems. The targeted focus of these programs on elements of Aymara life and residence, and in particular on women, points to the problematic underpinnings of the projects.

similar sentiments as early as the 1850s when they formed special mining police forces.⁵⁹⁴ These forces, though temporary and ineffective, were established for the mines of Corocoro, Potosí, and Paría mid-nineteenth century. The law creating them tasked the new forces with overseeing the workers, ensuring that they entered and left the mine at the times ordered by companies, that they were not drunk, that they did not move residence in the town, that they maintained hygiene in those residences, and ensured that all vendors stopped the sale of alcohol to workers on Sundays (in an attempt to eliminate "Saint Monday").⁵⁹⁵

Many of the attempts to regulate and discipline behavior and habits in the town are the same as those seen around the world, in particular attempts to ensure work on Mondays, though some in Corocoro were tinged with remnants of Spanish Colonial Era policies and discourses about indigenous peoples in the Andes. Chicheras were accused of contributing to the drunkenness of mine workers. In both the Liberal context and the colonial one, if mine owners wanted to keep workers in the mines it meant they had to challenge the persistent mobility of altiplano residents, but it also entailed reforming their drinking habits.⁵⁹⁶ Whether their movements arose from a desire to avoid the mita or from patterns of production and trade in the countryside, the problem these presented for mining

⁵⁹⁴ Decreto Supremo de 12 de Junio de 1856 (levivox.com). Also cited in Rodríguez Ostria (2014).
⁵⁹⁵ 'San Lunes' appears to have been widespread in mines throughout Bolivia. See Rodríguez Ostria, *Capitalismo, modernización y resistencia popular 1825-1952*; Gustavo Rodríguez Ostria, *El Socavon y El Sindicato: Ensayos Históricos Dobre Los Trabajadores Mineros, Siglos XIX-XX* (Bolivia: ILDIS, 1991); Contreras, *Tecnología Moderna En Los Andes: Minería e Ingeniería En Bolivia En El Siglo XX. La Paz:*; Contreras, "Mano de Obra En La Minería Estañifera de Principios Del Siglo, 1900-1925.".

⁵⁹⁶ See: Bakewell, *Miners of the Red Mountain*; Zulawski, *They Eat from Their Labor*; Mangan, *Trading Roles*; Larson, Harris, and Tandeter, *Ethnicity, Markets, and Migration in the Andes*.

interests was the same. For colonial authorities, regulation and control of these movements took a central place in their policy-making. Colonial authorities identified the very same practices related to childrearing, housing, drink, and other collective gatherings, as problematic.⁵⁹⁷ Under Spanish rule, authorities spoke of these practices as making Indians prone to idolatry or vice; Liberals said it made them 'unmodern' and unhygienic.⁵⁹⁸ When it came to work, the reforms aimed at changing mine worker life in Corocoro at the start of the twentieth century looked very much like Colonial ones.

While mining companies sought to discipline workers into a permanent, static, and sober workforce, municipal authorities advanced a parallel and at times, complementary project within the town. Town officials were less concerned about whether mineworkers came and went every week or every month, but they were interested in ensuring the application of new and modern forms of government, and this entailed imposing 'order' in the town. Both the companies and local state authorities shared the goals of preparing the town for a boom in growth that would come with the arrival of the railroad. Once again, neither interest group (company or State) saw anything un-modern at all about invoking or reiterating Spanish Colonial Era or explicitly coercive practices in the name of modernity.

Contradictions of modernization: Fear of the Labor Problem.

Fixing workers in one place, tying them to work in an industry or a place, created certain problems while it resolved others. National debates in Bolivia surrounding the

 ⁵⁹⁷ Mangan (2010) provides an excellent discussion of the questions of drink and behavior on the streets of Potosí and the municipal attempts to control and restrict these practices spatially.
 ⁵⁹⁸ Colonial officials concerns about idolatry and vice are widespread in the Cronicas of official and visitors.

railroad, work, growth, and indigenous populations expressed a variety of opinions and depictions of the situations of workers, and especially indigenous ones, throughout the country. Throughout the years of Liberal Party governments, newspapers in La Paz published opinions expressing several contradictory positions. One the one hand, the obsession to suppress the Willka Rebellion at the start of the twentieth century led to depictions of Aymara savagery and the political threat of indigenous leadership. Elite discussions of hygiene portrayed indigenous practices as threats to health. Debates over how to control the smuggling of alcohol from Peru and Chile that was organized by members of certain Aymara communities simultaneously positioned those traders as threats to health (promoting alcoholism), and as savvy merchants taking advantage of the lack of border control.

However, many newspapers also included many descriptions of local elite's abuse of indigenous populations via the Prestación Vial and other labor regimes that took on a very paternalistic tone. These publications responded that either philanthropic societies should be formed to protect Indians, 'as had been done for animals in other places', or that education and transformation through industry and the military should be ensured to strengthen and prepare the population for the new modern Bolivia.⁵⁹⁹ Both positions argued that a fundamental change had to occur, that exploitation of indigenous populations and workers was rife and widespread, and that this was not sustainable in the long-run.

⁵⁹⁹ See for example the exchanges in *El Comercio* on the 11th of March, "Exacciones a la raza indígena," and the 13th of March "Para que el indio no se le explote. Hay que ilustrarlo." 1912.

Moreover both agreed that the state should play an active role in changing both the habits of indigenous populations and the actions of those who would exploit them. The debate centered on whether industrial work and integration into national institutions would do that, or whether a more paternalistic model of state relations with indigenous populations should continue.

However, even the desired growth of numbers of workers stirred fears that where openly discussed in newspapers at the time. The construction of each international railroad brought forth predictions about the pending influx of foreign workers into the country. While the articles celebrated aspects of this, describing these new workers and how their skills and ambition might help transform the Bolivian worker, they also feared the introduction of 'dangerous' ideas coming in from outside of the country. In one article written in 1912 about the imminent arrival of the Arica – La Paz Railroad, the author describes the state of worker – employer relations in Bolivia as if it were composed of islands of peace and tranquility across the altiplano.⁶⁰⁰ The article stated that negotiations of wages and conditions had always been conducted harmoniously between the classes in Bolivia, depicted the countryside as a bastion of tranquility, and urged the nation to be on guard for subversive elements sneaking in among foreign workers. The proposed solution: immigration laws that would weed out anarchists and communists.

Deportations of foreign workers involved in organizing labor or political movements had occurred throughout the country, even in regions where the railroad had

⁶⁰⁰ "Ferrocarril Arica – La Paz. Hay que estar prevenidos.", *El Comercio*, 8 de marzo, 1912.

not yet reached.⁶⁰¹ However, the depiction of all labor agitators as foreign, something found in many discussions of the topic, was more than skewed. Though the early years of Liberal Party rule have not been studied as a time in which widespread and well-organized rebellions occurred with frequency, the countryside was full of conflict, confrontations between communities, communities and haciendas, and between colonos on haciendas. Conflicts like the one described in 1908 in Corocoro appeared to be occurring with some regularity, and direct conflicts were emerging between mine companies and indigenous producers of fuel in Corocoro over prices and contracts.⁶⁰² Workers in La Paz, Oruro, Viacha, and other cities had already begun organizing around May Day from 1907 onwards, and by 1913, worker's federations were pressing for Sundays off, the funding of worker's schools, and pushing for the passage of national labor laws.⁶⁰³

The exchanges seen in national newspapers and playing out in some of the conflicts in Corocoro combined debates surrounding what researchers have termed the "Indian Question" and the "Labor Problem." Politicians like Bautista Saavedra had called proudly for the transformation of Indian men into citizens by making them workers and soldiers.

⁶⁰¹ Ministerio de Gobierno y Fomento. Memoria que presenta el Ministro de Gobierno Doctor Aníbal Capriles ante el Congreso Ordinario en 1907. (Bolivia: Imprenta Artistica, Castille y Cia, 1907); Ministerio de Gobierno y Fomento. Memoria que presenta el Ministro de Gobierno Doctor Aníbal Capriles ante el Congreso Ordinario en 1907 (Bolivia: Imprenta Artística, 1908); Ministerio de Gobierno y Fomento. Memoria presentada a la Legislatura de 1911 por el Dr. Juan M Saracho, Ministro de Gobierno y Fomento (Bolivia: Talleres Gráficos La Prensa, 1911), Ministerio de Gobierno y Fomento. Memoria presentada a la legislatura de 1912 por el Dr. Aníbal

Capriles, Ministro de Gobierno y Fomento (Bolivia: Talleres Gráficos La Prensa, 1912). 602 "Ecos de Pacajes", *El Comercio*, 8 de mayo 1913.

⁶⁰³ See, for example: "Nuestras fabricas" en *El Comercio*, 1, 3 y 6 de mayo de 1913, "En la Federacion Obrera" en *El Comercio*, 4 de mayo de 1913, "Legislación Obrera" en *El Comercio*, 21 y 22 de agosto de 1912.

He saw the discipline (and exploitation) of industrial work and state institutions as the way to take away the 'vices' of culture from potential indigenous workers and bring them in to the new liberal world, economy, and state. Others saw this process begin, and wanted immediately to stop it. For them, making industrial workers made problems. They cast aside fears of Aymara rebellion and invoked a fictional colonial peace, replete with 'child-like' Indians who needed protection from the new world that was emerging. For national elites and especially Liberal Party leaders, the question they confronted was: How to gather a workforce that was essential to their national plan, suppress those elements of indigenous culture that might spark rebellion, and transform the workers, without doing it so well that they might realize themselves as a proletariat? Hidden behind these fears was the already well-known existence of a collective identity in the mines that was based on both culture and work.

Disciplining culture and workers:

In descriptions of the exchanges between workers and mining company managers on the eve of the 1908 rebellion, the managers conceded weekly pay to the artisans of the workshops and mills for both the previous week and the week to come, though not to the main group of mineworkers.⁶⁰⁴ They clearly stated that workers would be paid after they completed work on August 6th. Worker reactions to these statements, even those artisans of the workshop, was anything but celebratory. While this offer might appear to have been a concession to certain workers, essentially stating that they would not move to monthly contracts, it was in fact a change in labor practices equally as important as the switch to

⁶⁰⁴ ALP, Juzgado de Pacajes, Box 23

monthly contracts. August 6th, like July 31st and August 1st, September 21st, Carnival, Holy Week, and other days, were extremely important moments of celebratory expression and of tensions in mining towns in Bolivia. Offering pay to workers after their shifts on August 6th would have required that they work on Bolivian Independence Day. This broke with the practice of absenteeism (in some cases with pay) on important cultural and religious holidays.⁶⁰⁵

Worker absences from Bolivian mines at the turn-of-the-century were significant. Gustavo Rodriguez Ostria estimates that worker absenteeism topped 100 days a year for festivals of various kinds.⁶⁰⁶ Carnival could entail up to 20 days of worker absences from the mines and workshops, while the 6th of August usually meant a full week of missed work.⁶⁰⁷ For mining companies seeking to modernize their workforce and dramatically increase their production, this loss of workdays was unacceptable.

However, companies in Corocoro in the 1900s benefitted from a political context that many of their predecessors lacked: a Liberal Party government that supported measures aimed at reducing mineworker absences, and that was actively expanding state disciplinary institutions and empowering municipalities to act on the question. The Liberal Party, aided by the Municipal Government of Corocoro, enacted a series of reforms to curb the festivities that detracted from productivity.

⁶⁰⁵ Ostria, Capitalismo, modernización y resistencia popular 1825-1952.

⁶⁰⁶ Ibid.

⁶⁰⁷ Langer, "The Barriers to Proletarianization: Bolivian Mine Labour, 1826–1918"; Ostria, *Capitalismo, modernización y resistencia popular 1825-1952*.

While mining companies and local elites may have occasionally clashed when stopping working absences meant toning down celebrations shared by the entire town, they joined together to present a united front when the combination of alcohol and mineworkers converged with rituals in the mineshafts in ways they saw as threatening. In a rare case of a Republican era document describing mineworker rituals in detail, officials in Corocoro at the start of the 1900s pushed mining companies to suppress the rites performed at the mines. They described the following scene at mineshafts:

...There they raise altars, to kneel before the idol called 'ahuicha,' they spill the blood of animals with which they stain the mouths of the mines in holocaust to the idol, believing to feed it with the blood of the sacrificed victims in order to prevent the "aizas" inside the shaft, because the 'anchanchu' or the demon, when it does not have blood to drink, send the workers to their deaths.⁶⁰⁸

A unanimous decision by the town's officials had made attempting to stop this ritual a priority. Couching his desire to suppress these rituals in the language of modernity, the representative of the Municipal Council continued, stating that "it is not possible to tolerate customs so barbarous" in the 20th century.⁶⁰⁹ He describes the practices as ones that must be "exterminated." Documents from Corocoro for over thirty years after this letter continue to refer to the barbarity of mineworker rituals around Carnival and other feast days, and

⁶⁰⁸ Original Quote: "Allí se levantan altares para doblar la rodilla ante el ídolo llamado 'ahuicha,' se derrame sangre de animales con la que mancha las bocaminas en holocausto de tal ídolo, al que creen alimentar con el líquido extraído de las victimas sacrificadas a fin de evitar en el interior de los trabajos "los aizas", por que el 'anchanchu' o demonio cuando no tiene sangre que beber, manda la muerte a los obreros". ALP, Alcaldía de Corocoro, Box 33.

relate the woes of mining company managers who tried to break with the tradition of donating animals for sacrifice.⁶¹⁰



Figure 5.3: Photo of preparations for carnival celebrations in the mines of Pulacayo in 1905. (Photo from turn-of-the-century postcard).

⁶¹⁰ See: ALP, Alcaldía de Corocoro, Box 37, document from 1939. Mining Company managers in the 1930s who attempted to stop the tradition of donating a bull for sacrifice in the mines were faced with physical threats from groups of mineworkers. This pattern of requiring Company managers to comply with ritual obligations, a sort of company cargo, is also discussed by historian Eric Langer in another Bolivian context. See: Langer, "Labor Strikes and Reciprocity on Chuquisaca Haciendas."



Figure 5.4: Photo of an indigenous mineworker from Pulacayo and Huanchaca at the start of the twentieth century (Photo from turn-of-the-century postcard).

The rituals describe in 1901 appear strikingly similar to those surrounding the Tío.⁶¹¹ And, like the rites practiced in mines today, these were collective cultural expressions of shared experiences as mineworkers, shared conditions of work, and of a shared identity.⁶¹² Ethnographers of mining in Bolivia provide ample evidence of the direct

⁶¹¹ This particular ritual described in this document deserves a more detailed analysis than the one provided here. Nonetheless, it is important to note the significant differences between the ritual described here and the descriptions of the relationship between mineworkers and the Tío in ethnographies from the second half of the twentieth century. Principally, the fact that the 'demon' of the mine does not appear to be the 'socio' of mineworkers but rather a dangerous force that must be suppressed. The invocation of the 'ahuicha' or awicha as a moderating force appears to mirror some of the dynamics described by Pascale Absi in her analysis of the Tata Kajchu in the mines of Potosí. Absi, *Los ministros del diablo*.

⁶¹² Absi, Los ministros del diablo: El trabajo y sus representaciones en las minas de Potosí; Nash, We Eat the Mines and the Mines Eat Us: Dependency and Exploitation in Bolivian Tin Mines.

connections between rituals like this one and collective labor actions of mineworkers. Anthropologist Pascale Absi cites documents from the mid-18th century describing a mineworker revolt preceded by ritual actions in the mine.⁶¹³ In her ethnography of Bolivian mineworkers, June Nash points to the regular occurrence of mineworker revolts on dates symbolically important in ritual calendars and on which similar rites would have been performed.⁶¹⁴ And, here in Corocoro, the mineworker revolt of 1908 occurred on Saturday, August 1st, a day marking important ritual offerings to the 'hungry' month of August.⁶¹⁵ Contemporary practices related to the Tío in the mines occur on Fridays and Tuesdays. The convergence of these two in Corocoro point to a very large gathering occurring in the mines for ritual purposes all night before the uprising in 1908.

The connection between rituals like these to mineworker uprisings for these early years of collective actions is well established. Considering the structure of mine work and the close relationship between community/family relations and work relations in the mining town it is not difficult to imagine that community-based forms of collective organization would transfer to the mining environment. Similarly, given the profound implications and the content of the invocations described in the rituals, it is clear that

 ⁶¹³ Absi, Los ministros del diablo: El trabajo y sus representaciones en las minas de Potosí.
 ⁶¹⁴ Nash, We Eat the Mines and the Mines Eat Us: Dependency and Exploitation in Bolivian Tin Mines.

⁶¹⁵ The month of August is a particularly powerful month in the ritual calendar, referred to in Aymara as Lakan Phaxi, or 'mes con boca', the month with the mouth, during which the earth opens, both for beneficial offerings to the pachamama, but also for other more malevolent forces and illnesses. Offerings at the start of the month should feed the hungry month. Gerardo Fernández Juárez, "Kharisiris de Agosto En El Altiplano Aymara de Bolivia," *Chungará (Arica)* 38, no. 1 (2006): 51–62; Gerardo Fernández Juárez, "Kharisiris y Violencia Ritual: Agosto En El Altiplano Aymara," *Revista Textos Antropológicos*, n.d., 181.

resistance and rebellions following rituals like these would express a form of indigenous mineworker collective identity.

Attempts by artisans in the mining workshops to distance themselves from the 'indiada' add another layer of complexity to the dynamics seen in the 1908 unrest. Their insistence that they worked July 31st (a Friday) and their presence in the workshop on August 1st (the day marking the start of the culturally loaded month of August in the Aymara altiplano), implies, possibly, their non-involvement in these activities. Their dance with management, in which they appeal as a collective of workers but simultaneously work to distance themselves from the vast majority of the other workers in the mineshafts, reveals the ways in which claims to certain class identities may have involved balancing discourses about both worker identity and indigeneity. In contrast to August 6th, a celebration of national identity and one in which artisans confirmed their participation, the gatherings on Fridays in the mines or at the start of August, may have entailed a deep association with indigeneity. Just like municipal authorities who were willing to join with mining company managers in opposing indigenous rituals they saw as threatening but opposed attempts to discipline national identity, the artisans in the workshop sought to draw this same distinction, regardless of what their actual origins were. Just as guild affiliated female vendors in marketplaces expressed and used discourses that distanced them from indigenous women with more direct ties to the rural Aymara world, the workers in the shops and mills in 1908 did something very similar. They worked with the men and women they called the 'indiada,' yet they also tried to clarify that they did not pertain to the group.

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To a certain extent, this strategy worked. Artisans were invited in to negotiate with managers; the 'indiada' was not. Those very same workers describe the 'indiada' as being 'recently federated', separately from them. The workers of the workshops and mills actively participated in the Obreros de la Cruz, a Catholic mutual aid society that does not appear to have been revolutionary, was founded as early as 1885, and received subsidies from the municipal government in the years following the 1908 events.⁶¹⁶ The notion that indigenous mineworkers in Corocoro may have been recently federated hints at a form of collective organization among the 'indiada' in the mines that has not really been discussed in historiography of mine workers, along with the possibility that forms of Aymara community movements may have been involved in collective forms of worker action.

Discussion:

The convergence of forces set in motion by modernization, railroads, industrialization, capital consolidation in mining, urbanization, or at the very least, the desire or expectation of these all these changes, produced dramatic effects across the altiplano, even in smaller towns like Corocoro. Centuries of temporary work relationships between indigenous communities and small mining enterprises changed quickly as the demand for more workers, and more pliable ones, grew in anticipation of the changes further growth of the liberal economy would bring. Town officials and local authorities in Corocoro sought to mirror these changes by advancing a modernizing agenda in parallel to that promoted by companies.

⁶¹⁶ ALP, Alcaldía de Corocoro, Box 73.

However, implementation of these reforms in the mining sector and in mining towns meant seeking out and employing colonial solutions to what were essentially the same colonial problems in a modern industrial context. Hygiene, allusions to identity in ways that point to a racialization of indigeneity, and the invocation of progress do point towards at least some discursive breaks with the past. However, the objects and focus of their interventions, the problem identified by both the local State and mining interests do not. Condemnations of idolatry, drunkenness, vice, the intransigence of Aymara communities, their unwillingness to work in the mines permanently, their mobility, the persistence of corporate bonds, harken back to the repeated problems that drove many colonial policies towards indigenous communities of the altiplano. It is very easy to deny the 'modernity' of these pushes in Corocoro. The recurrence to modified versions of Colonial Era discipline during the Liberal Period could be an indicator that the modernizers weren't very modern, to put it bluntly. However, it could also indicate that the modern tactics and strategies of discipline, coercion of labor and culture, were rooted at least in part, in the Spanish Colonial enterprise.

Similarly, within this strange mix of Colonial or at least pre-Industrial labor relations we find important indicators of labor agitation and collective actions based on a collective identity, as indigenous mineworkers. The mining workforce in Corocoro was comprised of diverse groups of workers from different backgrounds with very different aspirations and identities. These differences may or may not have determined the outcomes of these early manifestations of mineworker resistance prior to the formal establishment of unions. However, despite the apparent absence of militant worker organizations in 1908, it

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is clear that organized resistance was very much alive. The overlapping of rituals expressing and defining indigenous mineworker identity point to some possible origins of resistance and the militancy of mineworkers in their double condition as both indigenous Bolivians and as mineworkers, during a period of attacks against both identities. This does not eliminate nor reduce the importance of other ideologies among mineworkers in the decades that followed. However, as Eric Langer points out in his article on the processes of proletarianization of Bolivian mineworkers: "the development of labor consciousness did not follow European patterns."⁶¹⁷

The growth of the town and of mineworker organizing and activism following the boom in production during World War 1 raises further questions connected to all these issues. If the new workers that filled the ranks of the labor federations by 1918, were migrants from the countryside, where did they come from and why? Writers describe the labor conditions and the general state of the town during that time period in pretty dismal terms. Were those new workers from the countryside all of them? Did a good portion of them arrive in the town because they left previous jobs in the nitrate mines on the coast? Did the train's impact on regional and rural production create conditions that expelled people and families from the countryside? Did debt peonage and relationships become a way of forcing workers into the mines? These are all questions worthy of further research. Why a worker would organize once they became dependent on wages is not that difficult to understand. However, given the deep history of connections between communities in Pacajes, independent forms of commerce, their general mobility, and the pattern of

⁶¹⁷ Langer, "The Barriers to Proletarianization: Bolivian Mine Labour, 1826–1918," 50.

occasional labor in the mines of Corocoro, perhaps the better question to ask is: why would these formerly temporary mineworkers (both male and female) not only go to the mines during World War 1, but stay there as well?

The particular alignment of interests in Corocoro on the issues addressed in this chapter reveal that different levels of the state, local and national, aligned with mining interests when it came to disciplining or transforming the workforce of the mining regions in Pacajes. Their unified actions shed light on aspects of the modernization process not openly addressed in the pamphlets discussing railroads or the need for industrial enlightenment. In the deployment of their desired transformative policies, they encountered challenges in multiple forms, but especially in the day-to-day functioning of a viable and strong Aymara social fabric, social and community ties that enabled members of communities to escape the conditions of dependency required by the industrial model, at least for a while.

CONCLUSION

The first decades of the twentieth century in Bolivia can be examined through multiple lenses. This dissertation focused on a particular aspect of the Liberal Party's agenda that was central to understanding their vision of the nation, and which brought about significant social, political, and economic changes. The preceding chapters worked to clarify the relationship between Liberal Party development projects and processes of state formation in everyday life, and show how the gaps and failures in the process of train and institution building provided different sectors of society with spaces to resist the project and in doing so, produced some dynamics that Liberals did not expect or desire. This study also shows how the profound economic changes brought about by the railroadrelated reforms wrought havoc in the daily lives of residents and required constant state reactions and responses, despite their inconsistencies.

Railroads and massive infrastructure projects are often connected to state planning and expansion. In Bolivia, after the War of the Pacific, *all* railroad projects had to be connected to the state planning and formation of more than one state. Investors, speculators, and others in the train business, saw a great deal of risk in building anything within Bolivia's national territory that did not have a guaranteed path to a port of export. The changes in the Bolivian Railway Company's plans and the historical rejection of plans for a railroad between Tacna and La Paz, examined in Chapters One and Two, emphasized the depth of this problem. Bolivian leadership had to get neighboring nations' approval for their own national network. Getting a railroad network built in the altiplano necessarily

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involved rethinking the territorial boundaries of the nation, the state institutions implicated in that question, and resolving questions of war and peace with neighbors. These projects were never only about getting minerals to port, because they had to address the state first if they were to be built.

The historical exploration of how elites thought about and discussed railroads and roads revealed continuities between political parties across many decades. The Liberal Party, the Conservative Party, as well as people like Pacheco, Aramayo, and others, all agreed on the need to build roads, railroads, and modernize the nation. Examination of the discussions and debates circulating in the decades prior to the Federal War revealed how this cohesion and agreement across party lines installed these projects as priorities for all governments. The Liberal Party neither imagined a new network nor thought up new institutions they would build around it. They took plans and ideas that had circulated for decades – from railroad projects, to the Prestación Vial, population registries, and tax reforms – and got them moving.

As the projects were set in motion, bonds and mortgages signed in New York and London, and the rails in place, the stakes of the Liberal Party bet on railroads rose exponentially and they faced a cascade of new challenges and problems. A significant part of this research focused on identifying how the national government responded to the changes their own plans had produced. Signing treaties and commercial agreements with neighboring nations redefined the territorial boundaries of the state and as a consequence, the operations of the state along the border. Increasing imports and exports changed patterns of commerce in ways that created conflict with those invested in previously

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important circuits and relationships. New national debt obligations required altering fiscal and tax arrangements within the state. Taking on such large construction projects in regions that experienced worker shortages meant that the Liberal Party governments actively discussed the question of how to force people to become workers in this new model. When they did get workers for a project, bringing 2000 of them into a small town for payday and the markets that appeared around the, created health emergencies that required new state powers to intervene. And, nearly all of their projects required registering people and goods in different and new ways, and in attempting this, the ability of different populations to evade the state became ever clearer. If the stakes of the projects rose for national politicians, they became even higher for subaltern populations attempting to navigate the changing economic and political world around them. Setting in motion these projects forced issues before the Liberal Party and the general population that might not have been prioritized otherwise.

However, even though some of the Liberal Party's actions could be characterized as reactive (perhaps to problems of their own making), their responses reflected the same agenda shared by politicians modernizing nations around the world. They responded to punctual and pressing situations, improvising, yes, but also by implementing policies that aimed to, increase state legibility over many different spheres of life in the country, expand and naturalize the spatialization and vertical encompassment of the state, and redefine boundaries between the state and civil society.⁶¹⁸ Though transport projects were not the

⁶¹⁸ Sharma and Gupta, *The Anthropology of the State*, 2009; James Ferguson and Akhil Gupta, "Spatializing States: Toward an Ethnography of Neoliberal Governmentality," *American Ethnologist* 29, no. 4 (n.d.): 981–1002.

only reasons behind this push, infrastructure was an essential part of the "performance of liberalism" and making the Bolivian state.⁶¹⁹

Colonial Liberals, Modern Colonialism:

In recent years, historians of Bolivia have begun to develop a historiography of state institutions in the realms of health, education, the military, and so forth.⁶²⁰ Much of this literature looks to the Liberal Party governments as a time period during which some of these institutions were first envisioned, significantly reformed, or founded. But, they also emphasize that later governments, especially the MNR Revolutionary state, solidified and expanded these institutions in more inclusive ways than Liberals did. Similarly, historiography of the mining sector, indigenous movements, and the development of claims for citizenship and inclusion in the nation, all point to this period as one in which the Liberal Party set forth a model that was essentially exclusionary. Day-to-day studies of everyday life during this period have been relatively fewer but generally argue that where and when the Liberal Party led governments expanded the state into the lives of most people, they did so in an incomplete way at best, or to repress indigenous and working-class populations. The research presented throughout this dissertation confirms these assessments.

Looking at the infrastructure projects promoted by the Liberal Party adds to discussions about why this was. As other researchers have pointed out, the Liberal Party

⁶¹⁹ Anand, Gupta, and Appel, *The Promise of Infrastructure*.

⁶²⁰ Pacino, "Liberating the People from Their "loathsome Practices"; Shesko, "Conscript Nation"; Zulawski, *Unequal Cures*.

like the Conservatives before them, reinforced and represented oligarchic interests, mixing state expansion with personal and class advantage. Some politicians advocating for the construction of a railway to one region owned a mine in that same region, just as many who pushed for the Dis-entailment Laws that would strip indigenous communities of lands were also landowners, or at least wanted to be. The ranks of Liberal Party leadership were filled with lawyers, merchants, importers, mine owners, hacendados, and other ambitious men who fulfilled multiple roles at the same time. Local governments looked very much the same. Even when elites struggled over regional power, they did not seriously consider upending the structures that guaranteed their dominance.

The aspects of state expansion examined here embodied the contradictions of oligarchic rule from their beginnings. They blurred the lines between private and state interests even as they worked to centralize and institutionalize state power. The examination of tax collection practices in Pacajes and at the national level reveal some of these contradictions pretty starkly. The national government sought to systematically take certain tax collection powers, or commercial rights, out of the hands of certain individuals and institutions to supposedly place them under the control of the national government. However, in practice, even as the tax income moved to the nation, the sub-contracting out of the same institution later ensured that profits moved right back into private hands. The Estanco de Alcoholes was a perfect example of this. Who had control of the new state institutions became as important as whether they existed or not, and hanging on to power became very important for the Liberal Party leaders.

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The question of who would control commerce in areas surrounding railroad projects, major cities, or mining centers, directly placed Liberal Party leadership in a confrontational position with respect to others in rural regions and small towns. The exclusion, marginalization, and domination of indigenous populations was present and evident not only in the racial discourses of the period, or those policies with respect to land tenure and recognition of community leadership, but in the organization of economic life that accompanied trains and liberal development. When discussing modernization and trains, Bolivian Liberals and Conservatives did not do what their peers in some other Andean nations did: they do not appear to have envisioned the inclusion of the indigenous countryside to any significant degree. They discussed how trains could unite political factions and connect urban areas. They even talked about trains fomenting the colonization of the lowlands with new immigrant populations – but didn't mention those already living there. They discussed industrialization of mining centers, but not the people living in them or around them, except when they wanted workers. Railroads, it appeared, would steam right past or through the communities of the altiplano on their way to make other people and areas into modern cosmopolitan places and subjects; they were bridges crossing over, what was hoped, were empty spaces. Yet we know the altiplano was not empty, and that Liberal and Conservative Party leaders knew that the Aymara communities were very capable of involving themselves in both politics and economics.

Just beneath the surface of the railroad and infrastructure development discourses of this time period lay an essentially colonial vision of society and power. From their inception, railroad projects aimed to displace patterns of transport and forms of commerce and production in which the communities of the altiplano had gained a foothold during the nineteenth century, and which reflected pre-industrial patterns of trade and production. These older commercial circuits supplied cities, towns, and mining centers with basic foodstuffs and luxury imported goods. Multiple chapters here examined the complexity of relationships between importers and merchants, vendors and regional producers; relationships that connected the local to the global, and one locality to another. The commercial relationships and routes in Pacajes and the Tacna region embodied a different logic than the one promoted or created by the railroad. They were not bridges crossing from point A to B, but webs that caught and drew in communities, cities, haciendas, and mining centers of the altiplano. Breaking with the past and the 'backward' forms of transport and commerce meant excluding the people that had been central to this organic web. That exclusion meant increasing the economic pressures on indigenous and worker populations, lowering their incomes, and pushing them towards dependence on the new institutions emerging in the liberal economy.

Though 'modern progress' was invoked in speeches about railroads, state policies applied to indigenous populations during the implementation of development projects or in anticipation of them, mirrored policies of the Spanish Colonial state. Modernizing Corocoro's 'hygiene' meant focusing on changing the same habits that had been the focus of authorities in Colonial Potosi, often using the same methods. Concerns about alcohol consumption led to new taxes on muku and regulations on the female vendors of chicha – the same centuries-old approach of Colonial authorities in mining towns. How to get 'Indians' to work when and how industries wanted them to, became an obsession. Though

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the Liberal Party did not create the Prestación Vial, they did try to take control of it from local officials and put indigenous men to work on some of the most important projects for national development. They used the state to forcibly gather workers, and then sold the labor force to private enterprises in a re-envisioning of the colonial mita.

Anthropologists studying infrastructure and development highlight how the "distributional justice" in access to new technologies and infrastructure produces "differentiated belonging."⁶²¹ These questions are very present throughout this study. Who could take advantage of freight rates on the train and who couldn't? How did this alter power relations, experiences of modernity? This study suggests that infrastructure projects can produce differentiated belonging simply because they may aim to do just that from the start. These were not transport and modernization projects built where none had existed previously; they were meant to displace already functioning networks. Trains were the gears that potentiated the advance of a larger liberal project. Both the geography of the train network and the state formation project produced and reproduced colonial social relations within a modern reality. Policies like labor taxes were no more about only saving money than the Colonial mita was about providing labor for Potosi; forced labor created subjects and constructed power relations, whether under colonialism or liberalism. Reforming marketplaces and pushing all female food vendors into competition with one another created a new category of market women that crossed previously rigid ethnic or racial divides. In the long-history of the region, displacement of indigenous and non-

⁶²¹ Nikhil Anand, "Leaky States: Water Audits, Ignorance, and the Politics of Infrastructure," *Public Culture* 27, no. 2 (76) (May 1, 2015): 305–30; Anand, Gupta, and Appel, *The Promise of Infrastructure*.

centralized forms of production, commerce, or transport, produced a new strategy of rule, while it also produced many of the collectives that would come to challenge the state and power structures in the decades that followed, leading right up the 1952 Revolution.

Because, as others have so nicely put it, "different forms of governance can, in practice, appear to be very much the same" (Sharma and Gupta 2006), the convergence of Colonial and Liberal Party policies raise questions about what these continuities imply about Bolivian state formation as a long-term process.⁶²² Internal colonialism has most often been the framework used to describe the colonial push of the liberals in Bolivia, and I do not think this study contradicts the essence of that argument. Yet, this study shows that these policies might not have represented a new form, but rather constituted a push to restore the Colonial state and power structures; state formation not as a project of liberal internal colonialism but as the restoration of colonialism in an industrialized context. If so, and the seeds of some of the modernizing reforms of Liberal state formation project can be found in the proto-modernization of the Colonial Period, what does that tell us about the differences between the two forms of government and the underlying logics of both?

Disputed state formation:

Throughout this dissertation the results of the Liberal Party project did not always line up with the plans or expectations of those persons creating policy. Projects like the Arica – La Paz Railroad were shaped by the contexts they were built in, the tensions pulling on them, and the reactions of those who were affected by them. The impact of these

⁶²² Aradhana Sharma and Akhil Gupta, eds., *The Anthropology of the State: A Reader* (Wiley, 2006).

influences and pressures on both the railroad projects and the Liberal state formation process were all the greater at the start of the twentieth century because the national government was malleable or absent from certain areas of life. Thus, the discourses and plans laid out by the Liberal Party portray a coherent project of state formation, but an examination of how those plans were executed presents us with a very different picture.

In the previous chapters, several important spheres of tension and conflict emerged surrounding projects like the Arica – La Paz and the Bolivian Railway Company's network. They can be roughly grouped into: power struggles between different levels of the state (specifically between the national and local government); tensions in commercial relationships and spaces (especially produced by the displacement certain commercial circuits and ensuing crises); and struggles over the autonomy vs dependency of certain groups in the new model (in particular the autonomy of indigenous persons and the recruitment of an industrial workforce). These were sites where different sectors of society could intervene in and influence the outcome of the project to some degree. While by no means the only examples of conflicts where groups sought to alter state policy - conflicts over indigenous lands were undeniably important throughout this period – the conflicts around railroads raise different questions about the time period. For example, if the singularity of the nation state breaks down in such a way that one part of it competes with the other, how do you characterize that state? What did the state mean then to those persons who interacted with multiple levels of government that all contradicted one another? Does this change what we see as the legacy of twenty years of Liberal Party

governance and our understanding of the constructions of citizenship or the cultural processes of state formation?

As the Liberal Party prioritized and pushed border, tax, and registration reforms they faced resistance from local authorities over implementation. Some of these conflicts questioned 'who' really represented or embodied the legitimacy of the state. Prior to this period, municipalities appear to have operated with a great deal of autonomy, something they sought to maintain in the face of attempts to centralize power. They wanted to continue charging taxes that amounted to customs, control the police, indigenous labor, population registries, and more. Moreover, local practices in Corocoro and Pacajes, revealed the very blurry boundaries between 'state' officials and private citizens. Were elected national authorities and local merchants charged with tax collection duties agents of the state who acted with the same legitimacy? Did the civilians armed with restoring order during the 1908 mineworker conflict in Corocoro hold the same powers as the police, and if so, who held the power to 'legitimately' enact violence in that town?

Liberal Party leadership chose their battles with municipal and departmental authorities carefully, and the result was a confusing mix of compromised reforms and the occasional confrontation between politicians.⁶²³ The repeated reforms of the Prestación Vial was a good example of this conflict, one that arose from competing interests and the inability to force the unified implementation of one policy. The reorganization of a national police force, something that would have shifted control of repressive powers from local

⁶²³ This result is very much in dialogue with Timo Schaefer's studies of liberalism in Mexico. Schaefer, *Liberalism as Utopia*.

municipal and departmental authorities to a national institution and 'professionalized' force, sparked discontent. The result was the delegation of control of a national police force to local authorities. Though reforms appeared to centralize power on paper, their implementation was delayed and fragmented by negotiation and resistance.

Historians like Pilar Mendieta have explored how both Conservative and Liberal Parties sought to employ strategies of alliance building to maintain their power during their respective twenty year terms.⁶²⁴ This study shows how the Liberal Party demonstrated its capacity to do just that when dealing with municipalities and prefects, when they responded with pragmatic compromises to those in local government who would simply ignore national laws – and they did this only when politics demanded it. However, the social and economic changes produced by infrastructure projects, like the Arica – La Paz Railroad, handed the national government reasons to fraction jurisdictions and break the power of local states embedded in and interested in maintaining previous models of governance. The Liberal Party development plan handed the state another tool in their struggle for the centralization of power, and one that might have had a significant impact on the political landscape for decades after they left power. The creation of new jurisdictions meant the creation of new political terrain to occupy. In other words, the

⁶²⁴ Mendieta Parada, Entre la alianza y la confrontación : Pablo Zárate Willka y la rebelión indígena de 1899 en Bolivia; Mendieta Parada, "Caminantes Entre Dos Mundos: Los Apoderados Indígenas En Bolivia (Siglo XIX)"; Marta Irurozqui Victoriano, "¿Ciudadanos Armados o Traidores a La Patria? Participación Indígena En Las Revoluciones Bolivianas de 1870 y 1899.," Iconos. Revista de Ciencias Sociales 26 (2006).

economic changes produced by development plans altered the political geography of the nation for years afterwards.

These practices hint at the formation of a negotiated state, with great regional variation, shaped by the push and pull of different layers of government and its agents. Negotiation occurred within the state itself, and not necessarily with different subaltern populations that pushed back on government policies. The Liberal Party did move to centralize power, but this was not an immediate or effective power grab across the different levels of government. It was a continuous process with varied results and degrees of efficacy, and one which all groups involved had to negotiate with caution if they wanted to remain in power.

Manipulation, evasion, and the re-utilization of the state and technology:

In Pacajes and Corocoro, different groups of people attempted to manipulate bureaucratic processes and the discursive construction of political and racial categories used by the Liberal state, in order to advance their own agendas. These maneuvers were very clear in struggles over commercial regulation and relationships, and in the labor reforms of the Liberal Party governments. Merchants appealed to the state invoking their rights as taxpayers to defend their private commercial interests and territory. Both guildaffiliated merchants and skilled artisans in the workshops surrounding the mines, employed the colonial and liberal constructions that associated indigeneity with danger or poor hygiene, in an attempt to establish the legitimacy of their own claims to rights. Mining companies and large landowners sought exemptions of their own workers from the Prestación Vial requirements, and attempted to use the fine print in national laws to

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advance their interests. Indigenous men in Corocoro and throughout Pacajes took advantage of conflicts over the control of Prestación Vial, working on the local branch of the railroad in order to procure the documents that would help them escape local authorities. Success or failure in these attempts depended in part, on the ability to read discord in bureaucratic processes and discursive constructions of different layers of the state. And, when claims to rights appeared within these contexts, they often were based on a basic notion of tax payer rights not the universal notion of citizenship. The incomplete construction of processes and institutions, and the contradictions and discord between authorities who were charged with the implementation of a reform, provided different groups in the region with an opportunity to move around power structures. Not all groups succeeded in this to the same degree. The oligarchic aims of the Liberal Party political agenda and the continued colonial hierarchies meant that indigenous men trying to get out from under abusive local authorities had to do this by subjection to another form of exploitation, though even that respite was temporary.

However, looking at these attempts to re-purpose state processes and social institutions, it becomes hard to differentiate between manipulation and evasion of the state. Smuggling was a good example of how the state expansion project and the confusion surrounding it, enabled many to evade state controls altogether. Technologies intended to create greater legibility were used to do just the opposite, for example when the train became a tool used by smugglers. Border markers were made mobile and used to unfix borders, while poorly implemented registries became tools to hide. Taxes paid in one place became a way to move that same product into a different nation, municipality, or region to

evade other taxes. The construction of a new customs house in one location multiplied the possibilities of over-land smuggling through other mountain passes. The disparate and incomplete expansion of state institutions, and the conflicted bureaucracies that accompanied, provided spaces for different groups to not only attempt to manipulate the state but also to escape it.

The existing historiography on this time period, especially the political history, the struggle of indigenous movements, and of worker movements clearly outlines the goals and agendas of those who sought rights, incorporation, recognition, or other more material claims. Those histories also include moments where people or groups collectively confronted power, sometimes violently through rebellions. Indeed, the Liberal Party's first years of governance were marked by their attempted repression of the Willka Rebellion and Aymara movements across much of the altiplano at the beginning of their governments, and those continued throughout their twenty years of government at different scales. Yet, throughout this study of day to day life, commerce, and social relations in this border region as the railroad was built, evasion appears to have been employed with a great deal of regularity, and certainly more so than violent or direct confrontational resistance to the state. Non-confrontational actions that deny the legitimacy of the state to act in certain ways or certain spheres might also reflect a long-term or older construction of the imagined relationship between the state and population. ⁶²⁵ Why pay taxes on one good, or in one way, and not another? Are these actions simply reflections of opportunistic evasion? Do they result from a lucid distillation of the interests working behind a policy change? Or,

⁶²⁵ Scott, The Art of Not Being Governed.

might they reflect a deeper understanding of the limits and legitimacy of the state to operate in certain spheres of life, especially work, movement, and commerce? State formation as a long-term process usually addresses the gradual formation or installation of the legitimacy of the state in the imaginaries of its subjects. What do long-term patterns of smuggling and tax evasion tell us about popular perceptions of state legitimacy?

While 'escape' from the attempted expansion of state institutions by indigenous communities of the altiplano has not been the focus of many studies on the liberal state in Bolivia, it is beginning to occupy an important place in research on the Colonial Period in the region. Avoidance of the mita, clandestine metal production, and other such activities are the focus of studies examining how indigenous communities responded to colonial domination. In those discussions, this strategy appears alongside physical conflict and resistance, direct or selective collaboration, and the use of judicial and legal recourses as part of the wide range of tools used in response to the machinations of Colonial Rule. This study suggests that examinations of the liberal state in Bolivia might benefit from including an examination of the ways indigenous communities may have sought out invisibility and/or employed flight from the state as a strategy, alongside claims to citizenship, rebellion, and the use of the legal system as a tool.

The dynamics surrounding the railroad in Pacajes during this time period also point to some other explanations for the widespread evasion of authorities by indigenous and non-indigenous merchants. By seeking to displace pre-existing networks, or create new circuits where ones had existed for centuries prior, the Liberal Party development project drove a linear model of economic development and built state institutions along the rails.

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In effect, the state either left certain circuits outside of the eye of new state institutions or by moving those institutions to align with their new road or rail line, made older circuits invisible. Part (though not all) of what would come to be made 'illegible' by these new institutions, were pre-existing circuits that did not change – it was the state that changed. Many of these networks labeled as smuggler routes kept alive a commercial geography, the human relationships within it, the social networks; all of which were being pushed aside or into invisibility by the Liberal Party project.

Why preserve these older relationships instead of simply adapting them to the new train geography? The tensions and conflicts over control of commerce and the place of indigenous and working class populations in the economic life of the region occurred within the larger context of a liberal state advancing over indigenous collective land tenure, political leadership, and forms of autonomous organization. Moreover, the economic changes in the railroad and mining sectors amplified demands for labor in the altiplano. Mine owners historic complaint in Pacajes had been that they were dependent on the success or failure of indigenous communities yearly agricultural cycles to recruit workers. In other words, when things went well in communities, men and women had little need to spend much time in the mines. Limiting the mobility of indigenous persons, capturing their time, eliminating their sources of autonomy and independence (all factors seen in the 1908 conflict in the mines of Corocoro), became priorities for both the government and private sector companies. What role did commerce play in sustaining indigenous community autonomy or resilience? Was it beneficial, or did it also create divisions within the community? Was smuggling a form of indigenous resilience? Or was it a factor that

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worked to further fracture communities and entrap individuals into exploitative debt relationships?

Trains formed an integral part of a Liberal Party project to reshape the country at the start of the twentieth century. Throughout this study, these projects are used as a way to gain insight into the years of Liberal Party governments in Bolivia, and though much of the push of this analysis works against a magical vision of technology, trains did produce changes in Bolivia's social, economic, and political life. Neither politically neutral nor only the manifestations of other historical conflicts, these modernizing transport projects were "terrain[s] of power and contestation" that worked to organize "multiple spheres of life and government."⁶²⁶ The different groups and interests that intervened in these projects and their impact on the results, showed that these railroads were never singular in their meaning. Both the railroad and the state that formed around it, came to mean very different things to different groups within Bolivian society at the start of the twentieth century.

The railroads built and operating, or nearly finished by the time the Liberal Party was overthrown in 1920, dramatically altered the political, economic, and social landscape of Bolivia for the rest of the twentieth century. In Corocoro and Pacajes, these processes facilitated the conversion of the town into a mining camp, consolidation of capital for importers, exporters, and mining companies, and the dramatic growth in both mineral production and the town's population. In the last years of Liberal Party power, the region saw its first real organized and sustained strikes, sparked by new worker organizations in

⁶²⁶ Anand, Gupta, and Appel, *The Promise of Infrastructure*.

Corocoro and at the national level, and the spread of a renewed indigenous movement throughout the altiplano.⁶²⁷ Women appeared in large numbers alongside newly organized male workers throughout the country.⁶²⁸ The installed expectations imagined by Liberal politicians didn't quite come to fruition, and non-elites too came to expect things from the new geography, economy, and the state.⁶²⁹ Railroads like Arica – La Paz were examples of how "people work on things to work on each other", only to find that their projects have irreversibly changed them as well.⁶³⁰

⁶²⁷ Ostria, *Capitalismo, modernización y resistencia popular 1825-1952*; Salluco Sirpa, *La explotación del cobre en el distrito minero de Corocoro a principios del siglo XX, 1900-1930*; McGrath, "Pre-Histories of Revolutionary Nationalism and the Welfare State"; Roberto Choque Choque Canqui and Xavier Albó, *Cinco siglos de historia* (CIPCA, 2003); Gotkowitz, *A Revolution for Our Rights*.

⁶²⁸ Dibbits and Taller de Historia y Participación de la Mujer (La Paz, *Polleras libertarias*; Ana Cecilia Wadsworth and Ineke Dibbits, *Agitadoras de buen gusto: historia del Sindicato de Culinarias (1935-1958)* (TAHIPAMU, 1989).

⁶²⁹ Timo H. Schaefer, *Liberalism as Utopia* (Cambridge University Press, 2017).

⁶³⁰ Anand, Gupta, and Appel, *The Promise of Infrastructure*.

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