

Current Research and Selected Publications

Current Research

Book Manuscript. *An Economic History of the Piece of Eight: Resources, Policy, and Monetary Outcomes in the Americas, 1500–1800* (with Jane Knodell). Under contract with Columbia University Press.

This book investigates how the Spanish American silver peso—the “piece of eight”—became the first coin to achieve near-global circulation in the early modern world. Widely accepted across Europe, the Americas, Africa, and Asia, the peso emerged as a foundational instrument of international trade and finance. Yet its success presents a striking puzzle: how did a coin produced in distant colonial mints—often under conditions of limited administrative capacity and strong incentives for opportunistic behavior—become one of the most trusted monetary instruments of the early modern global economy?

Drawing on archival evidence and a wide range of secondary sources, the book traces the evolution of the peso from its Castilian origins to the Bourbon reforms of the eighteenth century. Its trajectory spans early seventeenth-century crises of quality—most notably the debasement scandal at the Potosí mint—and the subsequent transformation of minting under the Bourbon monarchy. Central to these reforms were the reorganization of mint governance and the introduction of new minting technologies, which facilitated the transition to a more reliable coinage. This transformation culminated in the milled peso, a uniform and tamper-resistant coin that restored confidence in Spanish silver across global markets.

As the reformed coin circulated through Atlantic trade networks, it assumed a central role in British North America, where chronic shortages of specie made imported silver essential to monetary exchange. In this setting, merchants and colonial authorities assessed, rated, and regulated foreign coinage in circulation, and through these practices increasingly privileged the Spanish milled peso for its consistency and reliability. By the mid-eighteenth century, the Spanish silver peso had become the monetary anchor of British North America and ultimately served as the model for the United States dollar.

The history of the piece of eight that we examined in this book sheds light on a broader and often elusive question: how monetary credibility was constructed and sustained in the early modern world.

Work in Progress

i. *A Failed State? The War of the Pacific and the Limits to State Capacity in Peru.*

This paper argues that the War of the Pacific marked a decisive fiscal and institutional turning point in Peruvian state capacity. By transferring the nitrate base to Chile, the war eliminated the pledgeable export rents that had sustained sovereign borrowing and fiscal centralism. The resulting insolvency tightened the state’s intertemporal budget constraint, deepened exclusion

from international capital markets, and forced a reconfiguration of Peru's fiscal architecture. Fiscal decentralization initially followed—not as the product of regional bargaining, but as the only administratively feasible response to a state deprived of centralized rents and unable to enforce broad direct taxation. Yet in the absence of enforcement capacity, decentralization proved fragile. A more durable equilibrium emerged during the Aristocratic Republic (1895–1919): a low-capacity regime based on indirect taxation and delegated collection through elite-controlled private organizations. Credibility shifted from external capital markets to a domestically embedded coalition in which the overlap between economic and political elites reduced renegotiation risk, stabilized extraction, and helped lay the foundations for Peru's subsequent export-led expansion.

ii. *From Silver to Guano and Beyond: Rent Concentration and Credible Commitments in the Making of the Peruvian State.*

How do geographically concentrated natural resources shape state formation? This paper develops an incentive-based account of nineteenth-century Peru that links natural resources to the evolution of state formation. In contrast to dependency interpretations that emphasize class conflict and external control, and to accounts that attribute political stabilization to the resolution of early republican warlord competition through windfall revenues, I argue that resource abundance mattered because it was transformed into a collateralizable, intertemporal fiscal instrument. Guano's extraordinary international demand enabled the Peruvian state to pledge future revenues in long-term sovereign borrowing, shifting the fiscal regime from persistent deficits financed through high-interest short-term debt to structured long-term external finance. This transformation altered elite incentives, facilitated fiscal centralization, and produced a comparatively more stable political order. As guano depleted, efforts to replicate this collateral-based commitment regime with nitrate revenues revealed the fragility of a state whose credibility rested on exhaustible, territorially concentrated rents. The Peruvian state ultimately unraveled when the nitrate-backed extension of this commitment regime collapsed amid the fiscal and military shocks of the War of the Pacific, exposing the structural limits of resource-based credibility as a foundation for durable state formation.

Selected Publications

Books

Deuda y Compromisos Creíbles en América Latina. El Endeudamiento Externo Peruano entre la Independencia y la Posguerra con Chile, 1820–1890 (From Guano to Grace and Beyond: Peruvian Sovereign Debt in Comparative Perspective). Banco Central de Reserva del Perú and Instituto de Estudios Peruanos, Lima, 2017.

The book examines the evolution of Latin American sovereign debt in the nineteenth century, with particular emphasis on the Peruvian experience. It argues that the development of credible commitments between Latin American States and their creditors was central to shaping financial relations with international lenders.

Selected Journal Articles

Monetary History and Institutions

i. *Resource Endowments, Agency Problems, and Monetary Outcomes in Two Colonial American Mints, 1600–1700* (with Jane Knodell). *Journal of Iberian and Latin American Economic History* (*Revista de Historia Económica*), 2022.

This paper examines how differences in resource endowments and institutional incentives shaped monetary outcomes across two colonial American mints. It argues that variations in silver supply, governance structures, and principal–agent problems influenced coin quality and credibility. By comparing mint operations, the paper highlights how weak monitoring and misaligned incentives could undermine monetary reliability, while more disciplined institutional arrangements supported more consistent coinage.

ii. *Resource Endowments and the Problem of Small Change: Insights from Two American Mints, 1600–1700* (with Jane Knodell). *Financial History Review* 28(3): 344–363, 2021.

This paper analyzes the persistent problem of small-denomination coin shortages in colonial economies. It shows how underlying resource constraints and mint incentives affected the production of fractional coinage, leading to chronic imbalances in currency supply. The analysis emphasizes how institutional design and the economic environment (particularly resource endowments) jointly determined the availability of small change and, more broadly, the efficiency of everyday market exchange.

Sovereign Debt and Fiscal History

i. *Military Conquest and Sovereign Debt: Chile, Peru and the London Bond Market, 1876–1890* (with Kirsten Wandschneider and Richard Sicotte). *Cliometrica* 4(3): 293–319, 2010.

This paper studies how military conflict and territorial redistribution affected sovereign debt markets in the late nineteenth century. Focusing on Chile and Peru during and after the War of the Pacific, it shows how conquest altered expectations of repayment capacity and access to international capital. The findings underscore the role of geopolitical outcomes in shaping investor perceptions and sovereign creditworthiness.

ii. *The Fiscal Impact of the War of the Pacific* (with Richard Sicotte and Kirsten Wandschneider). *Cliometrica* 3(2): 97–121, 2009.

This paper provides the first systematic, in-depth analysis of the fiscal consequences of the War of the Pacific for Bolivia, Chile, and Peru. It demonstrates how the redistribution of natural resources—most notably Chile’s acquisition of nitrate-rich territories—generated sharply divergent fiscal trajectories across the three countries. While Peru and Bolivia suffered a pronounced decline in fiscal capacity due to the loss of key revenue sources and economic disruption, Chile experienced substantial gains from its expanded export base. A counterfactual exercise estimates what their fiscal positions would have been in the absence of the wartime redistribution of natural resources, underscoring the decisive role of resource endowments in shaping postwar fiscal outcomes.

iii. *War and Foreign Debt Settlement in Early Republican Spanish America* (with Richard Sicotte). *Journal of Iberian and Latin American Economic History* (Revista de Historia Económica) 27(2): 247–289, 2009.

Upon gaining independence, most Spanish American countries had accumulated substantial external debts, and by 1829 all had defaulted. Debt settlement proved protracted, and renewed access to international credit was delayed for decades. Drawing on newly assembled data on sovereign bond prices and a reconstruction of the region's debt history, this paper challenges the conventional view that these outcomes reflected inherently unsustainable debt burdens. Instead, it identifies persistent international and domestic conflicts as the principal drivers of default and delayed settlement. Contrary to prevailing interpretations, wars were financed predominantly through domestic borrowing, and governments systematically prioritized domestic creditors over foreign bondholders, reflecting clear political incentives to sustain internal support. In this context, war redirected scarce fiscal resources toward emergency expenditures and domestic debt service, at the expense of foreign debt repayment.

iv. *Guano, Credible Commitments and Sovereign Debt Repayment in Nineteenth-Century Peru*. *The Journal of Economic History* 69(2): 358–387, 2009.

This paper provides the first systematic reconstruction of Peruvian sovereign debt and assembles a novel dataset on bond prices that had not previously been compiled. It demonstrates that political instability was not an insurmountable barrier to accessing foreign credit. Instead, guano revenues enabled the Peruvian state to establish credible commitments with international creditors by pledging future export earnings. This mechanism transformed Peru's borrowing capacity—making it the largest borrower in Latin America for much of the guano period—and facilitated sustained access to foreign capital. At the same time, the paper highlights the structural vulnerabilities associated with dependence on a single, exhaustible resource.

v. *Bourbon Intervention in the Peruvian Tobacco Industry, 1752–1813*. *Journal of Latin American Studies* 39: 567–593, 2007.

Drawing on extensive archival research, this paper offers the first comprehensive study of the tobacco industry in colonial Peru. It shows how Bourbon intervention transformed the industry into a major source of fiscal revenue, second only to silver in its contribution to the colonial treasury. By reconstructing the organization of production, distribution, and monopoly administration, the paper demonstrates the capacity of the late colonial state to reshape incentives and extract resources. More broadly, it uses the tobacco industry as a lens to illuminate the dynamics of state-building in eighteenth-century Spanish America.