



An 1880 photo of Hacienda Peotillos, San Luis Potosí, Mexico.

Photo by William Jackson Henry/Library of Congress.

MEXICO

Mexico's Second Land Reform

By Carola Binder

Land is at the center of rural and agricultural economies. Land is not only an economic resource but also a political resource, forming the crux of power relations among individuals, communities, and governments. Any effort to reform the regulations and laws regarding land is intensely political, altering the nature of all of these relationships.

Systems of land ownership and use vary across the world. In most developed countries, property rights to land are based on land titles. In the title system, the owners of land have clear property rights and can sell, rent, or use the land with minimal restrictions. In many developing countries, in contrast, property rights are established by contingent use of the land. Individuals or groups may acquire the usufruct of a property but not legal title. In this type of regime, the occupant of a plot of land

faces severe restrictions on how he can use the land. He maintains secure access to the land he occupies only if he demonstrates that he is farming it himself. He cannot leave the land idle, rent it out, or hire other laborers to work it without risking loss of usufruct.

Lack of complete property rights over land constitutes a major contributor to poverty. The development literature provides theoretical justification for strong property rights over land. When property rights are complete and enforced, agricultural productivity improves — and with it, so does the wellbeing of the global poor. Reforms to the incomplete land-rights systems across the world could bring tremendous progress toward reducing global poverty, which is largely concentrated in rural areas. Why is it, then, that effective land reform, despite its vast potential to improve human welfare, is rarely implemented?

Alain de Janvry, Professor of Agricultural and Resource Economics at UC Berkeley, discussed this question at a CLAS event in March 2015. Land reform, he explained, is very difficult to implement for political reasons, since landed elites typically control the state. In cases when autocratic regimes or foreign powers attain sufficient power to oppose the landed elites, they prefer to grant incomplete property rights over land as an instrument of political control.

Mexican history provides a prime example. Under the colonial regime in Mexico prior to the revolution of 1910, land was expropriated from the native indigenous communities by the elite and concentrated in large estates. By the turn of the 20th century, agriculture was booming, but extreme poverty and inequality sparked a revolution by peasant leaders. Following the revolution, as part of a settlement with the victorious revolutionary leaders, the autocratic government began a process of land reform in which land was taken from elite landholders and reallocated to peasant households. This land reform, considered Mexico's first land reform, eventually created 32,000 communities called *ejidos* on 52 percent of the Mexican territory, making it one of the largest land reforms in the world.

Beneficiaries of the first land reform were granted incomplete property rights, or usufruct, over a plot of land: they could use the land but could not sell, rent, or collateralize it. The most active period of land redistribution occurred under President Lázaro Cárdenas between 1934 and 1940. Redistribution continued at a slower pace until 1992, when around 3.5 million households — more than

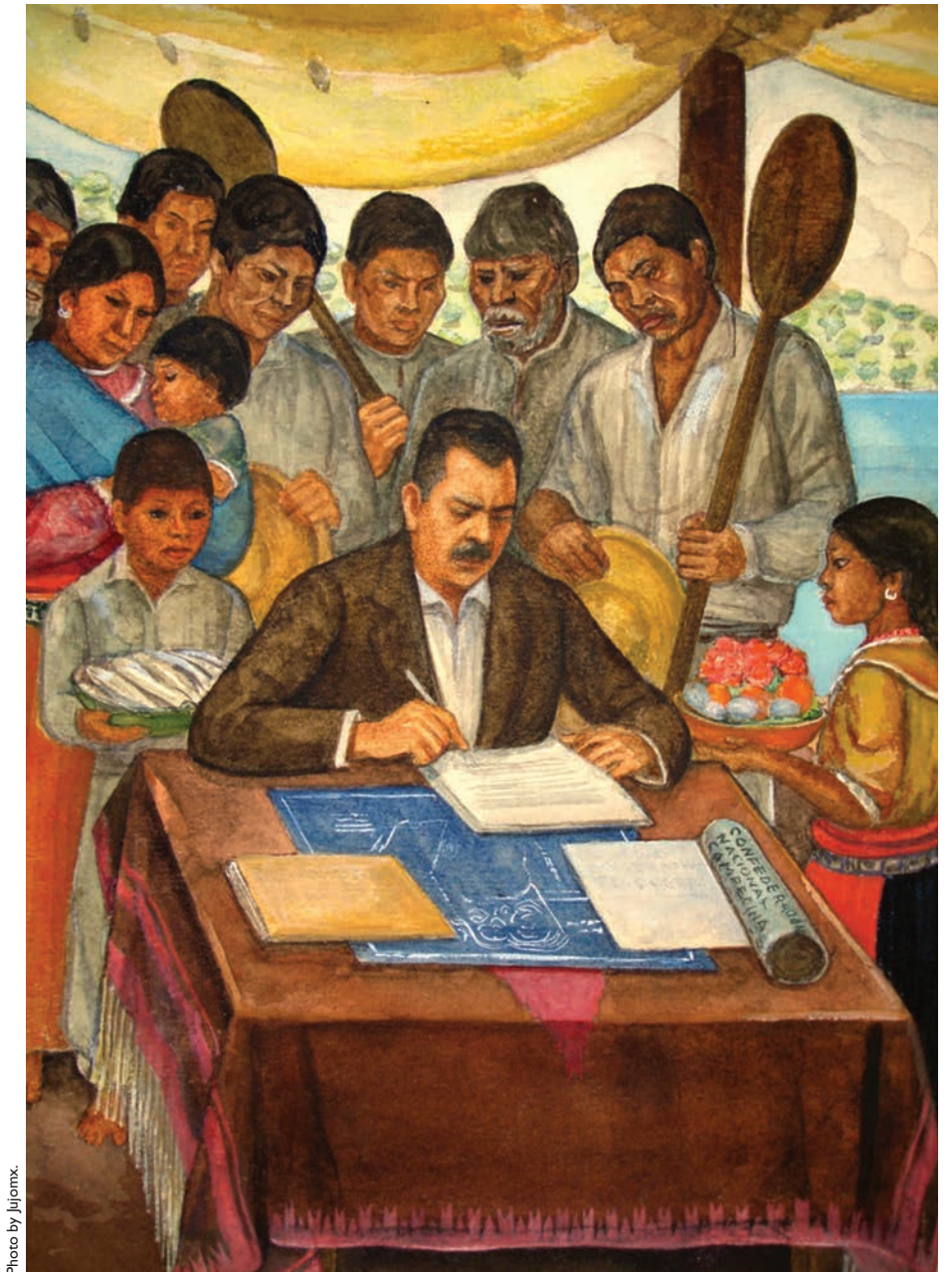


Photo by Jujomx.

Lázaro Cárdenas carried out dramatic land redistribution as Mexico's president.

half of the rural population — lived in the *ejidos*.

The *ejidos* were used as a very effective tool for political control. Individual farmers, called *ejidatarios*, were dependent on the state, which mediated their link to the market. The electoral system was deliberately set up so that there was a high level of geographic coincidence between each *ejido* and each electoral district, which meant that party bosses could see exactly how each *ejido* voted. Politicians did not have to provide

public goods to win elections; instead, the ruling party — the left-leaning Partido Revolucionario Institucional (PRI) — could secure control by threatening to punish the *ejidos* that did not vote for them.

In the early 1990s, Mexico was negotiating a free trade agreement with the United States and Canada, the North American Free Trade Agreement (Nafta). Mexican entry into the Organization for Economic Co-operation (OECD) was also on the horizon. Since Nafta

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required the complete elimination of import tariffs on all agricultural goods within 15 years, Mexican agriculture, after years of stagnation under the ejido system, would soon face competition from the United States. Technocrats within the PRI realized that a fundamental transformation was needed in order for Mexico to succeed in this new global context. In 1992, President Carlos Salinas, hoping to improve Mexico's ability to compete with food imports, decided to initiate a transition to more complete property rights for agricultural land. The technocratic wing of the PRI used its large congressional majority to amend the constitution, ending the first land reform and beginning what came to be known as Mexico's second land reform.

The second land reform, the Program for the Certification of Ejido Rights and Titling of Urban Plots (Procede), was rolled out between 1993 and 2006. Procede was a multiagency federal government effort that established boundaries for each ejido as a whole

and for individual land parcels within each ejido. The implementation process was not only relatively rapid, but also remarkably smooth. Agrarian tribunals settled disputes over boundaries. Under Procede, ejidatarios received certificates of ownership over their land parcels, allowing them to rent their land, hire outside labor to work the land, or leave the land fallow. They had none of these rights prior to receiving the certificates.

The certification process made property rights much more complete, but still not fully complete. The certificates were not exactly the same as land titles in developed countries. Recipients of land certificates under Procede could sell land, but only to other members of the same ejido community. However, the members of an ejido could also vote to turn all or part of the ejido certificates into fully private property, allowing unrestricted sales to non-ejidatarios.

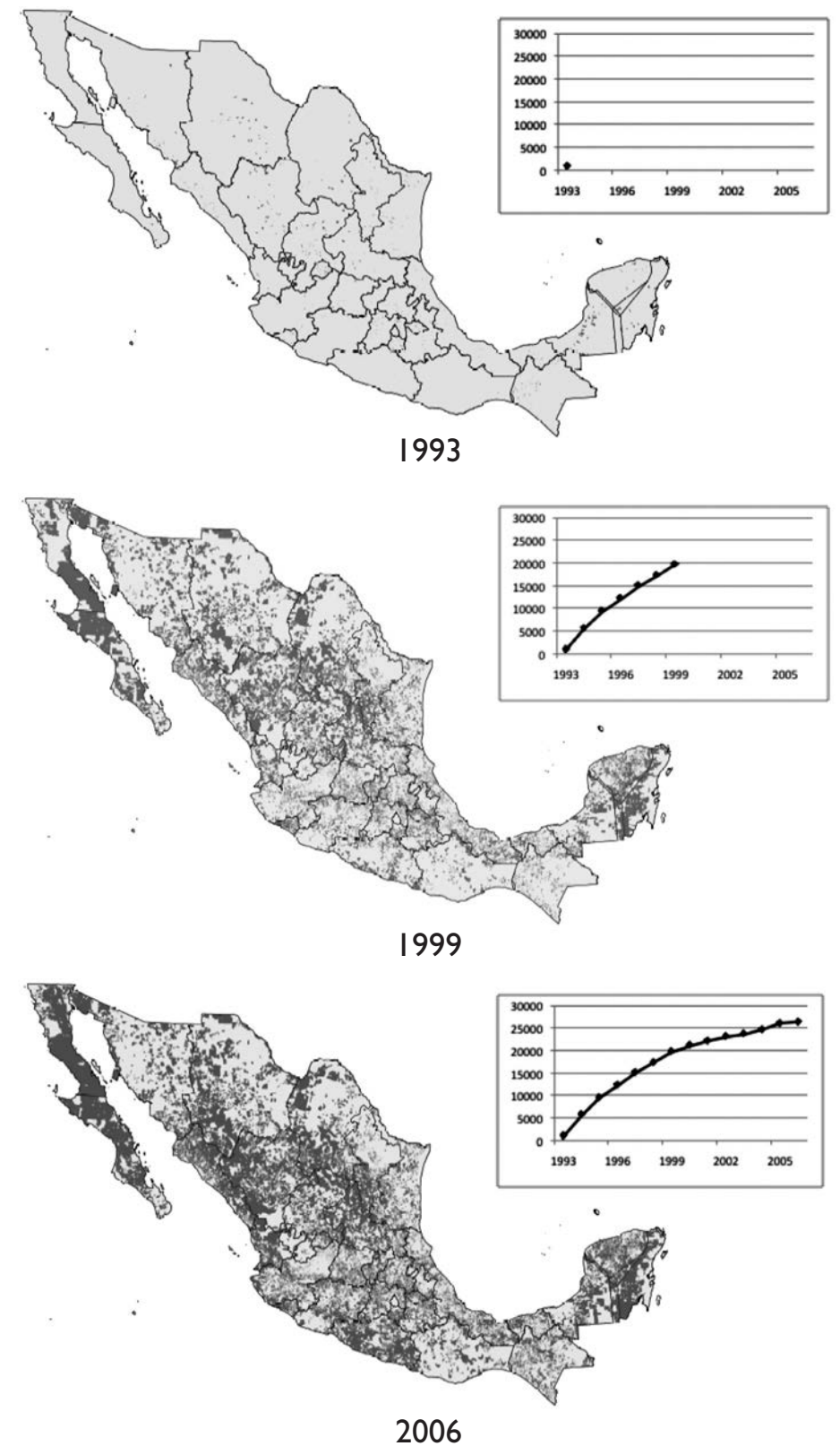
In joint work with Elisabeth Sadoulet, Kyle Emerick, Marco Gonzalez-Navarro, and Daley Kutzman, de Janvry uses the rollout of Procede to study the political, economic and social effects of strengthening property rights. Since certification of property rights were granted at different times in different areas, the researchers can contrast outcomes in areas with strong property rights and in those without. They use administrative data from the certification program, matched with electoral outcomes over six federal congress elections.

A political implication of Procede was a marked shift to the right in federal congress elections. This shift is in line with a political science theory called "vested interest theory," which predicts that expanding the ownership of productive assets benefits more conservative parties. Asset-owning individuals, according to the theory, prefer politicians that are more pro-market, favoring less state intervention and lower taxes. Indeed, in areas where land was more valuable, the shift to the right was even more pronounced, as vested interest theory predicts. This shift was quite costly for President Salinas and his party, the PRI. Salinas had originally hoped to transform the PRI into the pro-market party, but segments of his party opposed the transformation. The transformation of the PRI failed, and the party lost significant power. The Partido Acción Nacional (PAN), seen as the pro-market party, gained an increase in votes in congressional elections. PAN also gained control of the presidency for the first time in 2000-2006 and again in 2006-2012.

The political consequences of the second land reform demonstrate why the transition to stronger property rights across the world is so politically difficult to implement. Another political science theory, "distributive politics theory," argues that political parties offer material incentives to constituents who reciprocate with their votes. But voter reciprocity is more likely when the material benefits are short-term and repeated, so that voters recurrently exchange votes for continuation of benefits. A one-time, irreversible benefit — such as the awarding of a land certificate — is less likely to elicit a reciprocal voter response. Even though recipients of the certificates benefited materially from the second land reform under Salinas, they did not reciprocate by voting for his party. Other left-leaning parties know that they have a lot to lose. If they grant land property rights to their constituents, they will likely lose a share of the vote to parties further to the right.

Procede also had implications for economic efficiency, both within the agricultural sector and in the overall economy. The property rights literature usually argues that strong property rights improve economic outcomes by enhancing investment incentives. In fact, this was the motivation of the technocrats in the PRI who advocated for Procede. But de Janvry and his co-authors use the experience of Procede to test the importance of two other channels through which improved property rights affect economic outcomes. The first is by enabling migration that improves the allocation of labor between the agricultural and non-agricultural sectors. The second is by allowing more optimal farm sizes.

Both channels were quite important. Procede had significant



The spread of ejido land certification under Procede. (Images courtesy of Alain de Janvry.)

effects on migration and labor allocation. Before Procede, the ejido system linked land rights to land use. Land could not be

left fallow. A state-level Mixed Agrarian Commission determined the requirements for using land productively within each ejido. If an

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A Mexican land title certificate issued in 1992.

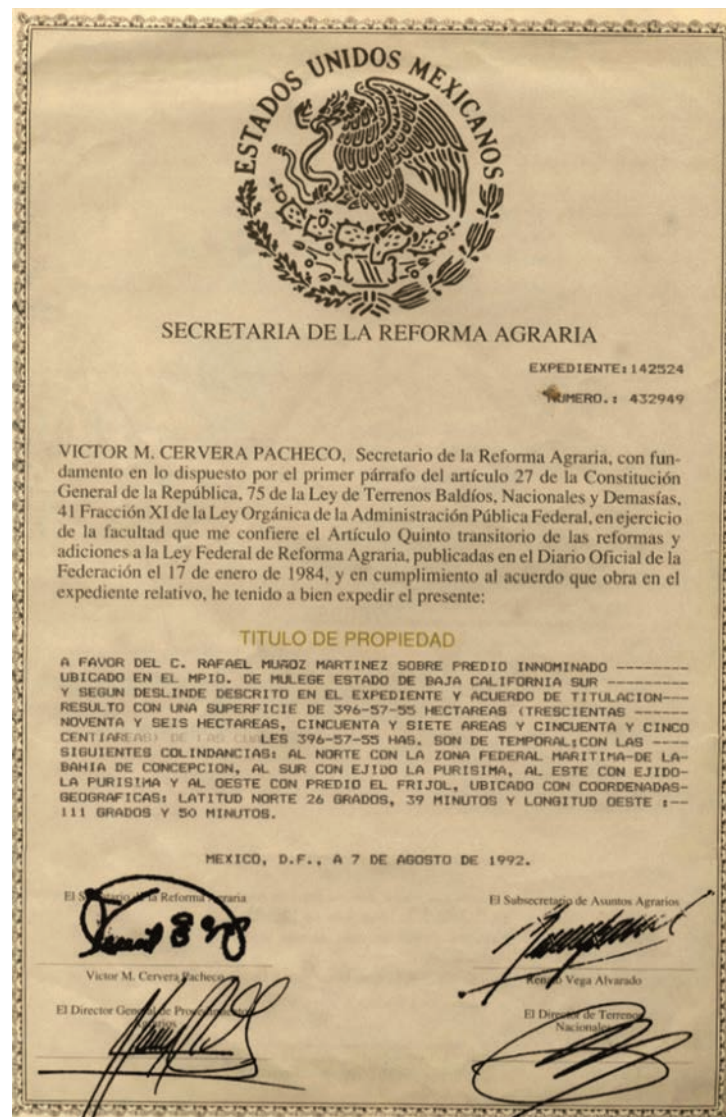


Image courtesy of Fulano Jingo



Photo by Eneas De Troya

Ejidatarios walk down railroad tracks returning from a communal project.

ejidatario left his land, or did not farm it productively according to the commission's standards, he would lose his usufruct over it. The commission would simply reassign the land to the next person on a waiting list. This "use-it-or-lose-it" restriction resulted in an inefficient over-allocation of labor to agriculture. When households received certificates and had more flexibility to leave their land without losing it, they began to migrate off of their farms to find better work opportunities elsewhere. Households that obtained a certificate were 28 percent more likely to subsequently have a member migrate. Young people, especially, left the ejido for outside work opportunities. Households with better land for agriculture were less likely to migrate away than those with smaller, lower-quality land. This migration pattern improved agricultural productivity. Land use patterns in the former ejidos became similar to private land-use patterns, resulting in efficiency gains.

Procede also brought about efficiency gains because of an increase in the average farm size. Prior to certification of land ownership, ejidatarios could not consolidate multiple plots of land into larger farms. Individuals farmed small plots, unable to benefit from economies of scale. Consolidation of land holdings

following Procede alleviated the efficiency loss from sub-optimally small farms. Since agricultural productivity increased, overall agricultural production did not fall, even though the share of labor in agriculture declined.

Importantly, the efficiency gains from Mexico's second land reform were reaped by labor and remained with the people. The development literature is unfortunately full of too many examples of asset transfers to the poor that are quickly dissipated. Procede is a large-scale counterexample. Procede was not only one of the largest asset transfers in history but also an asset transfer to the poor that was not dissipated. The 3.5 million certificate recipients benefited from greater wealth and land security. In this sense, Procede was an enormous success.

The transformation of the Mexican economy and society under the second land reform is still incomplete. So far, the community aspect of the ejidos has shown tremendous resilience. Recall that the members of an ejido can vote to convert the certificates of ownership into fully private property, which would allow land to be sold without restriction to non-members of the ejido. This conversion to fully private property, called *dominio pleno*, requires a two-thirds majority vote.

Only 10 percent of ejidos have voted for *dominio pleno*. The remaining 90 percent continue with the certificate system. De Janvry predicts that *dominio pleno* is likely to increase, but only gradually, as urbanization spreads. The slow uptake of *dominio pleno* demonstrates the value of community to ejido residents, who recognize the capacity of the community for governance, protection, socialization, and environmental protection, even in the context of globalization. The question going forward is whether modernization and diversification can coexist with community preservation. This, he concludes, will depend on national policies toward growth and decentralization.

The effects of Procede on politics, labor allocation, farm size, and general welfare hold important implications for other developing countries. The value added per worker in developing countries is about four times higher in the non-agricultural sector than in the agricultural sector. Reallocation of workers away from agriculture can thus lead to large efficiency gains. But distortions, including incomplete property rights, limit this reallocation. Distortions also result in inefficiently

A newly built private residence in an ejido in southern Mexico.



Photo by Eduardo Robles Pacheco

small farm sizes in many of these countries. Property rights reforms that reduce these distortions have high potential to improve the welfare of many people. Despite these large benefits, political considerations may block the implementation of reforms.

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