Indigenous Community Recognition, Identity, and Democracy: Evidence from Peru

Michael Albertus University of Chicago

October 2023

Collective recognition of indigenous claims to land and traditional authority has advanced rapidly in recent decades in many countries. How do these processes impact identity and views of democracy among individuals within communities themselves? I examine this in Peru, where the government has recognized thousands of indigenous communities covering one-third of the national territory. I leverage spatial and temporal variation in community recognition paired with detailed household survey data and find, using age cohort analysis, that the effects vary by generation in ways shaped by land access and scarcity. Experiencing recognition increases community self-identification, community membership, and positive views of democracy. But the effects are strongest among adults and near-adults at the time of recognition, who are best positioned to win greater access to scarce community land and invest in community life immediately post-recognition. Peru's communities, like in many postcolonial states, struggle with multigenerational reconstitution following legacies of land dispossession.

* I thank Pablo Beramendi, Dain Borges, Chris Carter, Thad Dunning, Ricardo Fort, Adriane Fresh, Scott Mainwaring, Aníbal Pérez-Lińan, Sue Stokes, Guillermo Trejo, and seminar participants at Notre Dame, Chicago, Berkeley, and Duke for helpful comments. Mauricio Espinoza, Siobhan Finnerty, Victor Gamarra, and Jiehan Liu provided excellent research assistance. Pedro Típula at the Instituto del Bien Común graciously shared expertise and data on community recognition.

Countries around the world define subnational indigenous identity groups and recognize collective claims to territory and self-governance. Nearly half of all countries now recognize forms of indigenous governance in their constitutions and many more do so through legal provisions (Cuskelly 2011, Holzinger et al. 2018). How does collective indigenous recognition impact identity and views of government among indigenous communities?

Scholars have long been concerned with the implications of this question. On the one hand, a large literature views strong subnational identity and categorical diversity as a challenge to nation-building and potentially undermining to democratic political practice (Tilly 1992, Fukuyama 2018). Others view advances in multiculturalism as enhancing democratic legitimacy and participation and supporting feelings of both non-dominant group self-identification and inclusion in an expanded view of the nation (Madrid 2012, Van Cott 2005).

Yet there are few direct studies of how collective indigenous recognition impacts identity and views of democracy in practice, and none that directly address dynamics and variation among individuals within communities themselves in ways that generalize. Understanding these dynamics is important because there is wide unexplained variation within communities and even within families in patterns of self-identification and views of government (e.g., Del Pozo 2004, Postero 2007). State recognition of indigenous communities can affect cohorts differently in ways that are both persistent and that can strongly shape patterns of identity and views of government within society. For instance, there can be considerable differences among generations, even within the same communities, that cut against trends toward non-dominant

¹ Most of the important scholarship to date on the causes and effects of indigenous recognition focuses on cross-national comparisons (Behr 2018, Holzinger et al. 2018), cross-sections of individual-level opinions (Fierro 2020), community trends (McMurry 2022), or ethnography (Fontana 2022). With some exceptions (e.g., Fontana 2022, McMurry 2022), this work tends to focus more on identity per se than the impact of policies of recognition.

group self-identification in younger generations. Identifying these differences and their origins can help shed light on the dividends and limitations of indigenous recognition.

This paper exploits the wide spatial and temporal variation in the state recognition of indigenous communities in Peru over nearly a century paired with more recent rich individuallevel survey data and argues that a crucial but overlooked factor – land access – is key in shaping intergenerational patterns of self-identification, views of democratic functioning, and confidence in government following the experience of state recognition. Peru is an important case for the recognition of indigenous communities given its large indigenous population. The 2017 census indicates that slightly over 25% of the population self-identifies as indigenous.² This places the country, along with Bolivia, Guatemala, Ecuador, and Mexico, as having one of the largest indigenous populations in the Americas and indeed the world. Peru's history of indigenous communities and community recognition over the last century also shares key parallels to similarly situated countries such as Bolivia, Ecuador, and Mexico (Yashar 2005), making it a fair case for testing the impacts of collective recognition. And the policies it has adopted toward indigenous communities, including collective property rights to ancestral lands, the recognition of indigenous governing institutions, and legal status are similar to those elsewhere in the Americas, Australasia, and Asia.

As in indigenous communities across the Americas and in many other regions, land is central to identity in Peru's indigenous communities. These communities have ancestral links to land and their residents disproportionately reside in rural areas that reflect that relationship. But land has long been scarce in many of Peru's indigenous communities and this problem has

⁻

² Estimates vary based on the measure used. Many Peruvians who self-identify as white or mestizo retain elements of indigenous identity (e.g., by speaking an indigenous language) and have a degree of ethnic consciousness (de la Cadena 2000).

grown over time with population growth. Throughout the Americas, and in Peru, Spanish colonizers and post-independence economic elites appropriated indigenous lands. After initial demographic collapse, indigenous populations later grew considerably. The result is that there is not enough land to go around in most communities and land tenure has long been insecure and informal.

Land scarcity has critical consequences that condition how state recognition of communities impacts self-identification and views of government within communities themselves. Official state recognition of a community makes its land more secure and therefore desirable and also increases potential for state benefits. This drives up demand for land among community members.

Using age cohort analysis, I find that adults at the time of experiencing recognition are more likely to self-identify as a member of an indigenous community over other identities than both those who are young when recognition occurs and those who are born into a recognized community. Adults and teenagers at the time of experiencing recognition are also more likely to become formally inscribed community members than those who are young and those who are born post-recognition. Adults are similarly more likely to report feeling that democracy works well, and they hold greater confidence in regional government, which is the key administrative level at which state recognition processes occur and community policies are formulated and executed in Peru.

I attribute these findings to the ability of adults and near-adults to claim access to land and community membership in the wake of state recognition. Accessing community land requires community membership, which in turn is only granted to participating individuals after reaching adulthood. I find that adults and near-adults at the time of recognition are more likely to

hold land and work in agriculture, and this runs through community land. These trends increase with age. These individuals are also more likely to participate in core community functions. In short, recognition encourages those who are well-situated to gain more land and invest in community life, which shapes self-identification and local community participation over time, including in democratic deliberation through community assemblies.

The findings suggest both promise and limitations to the state recognition of indigenous communities. Bolstering indigenous institutions simultaneously enhances attitudes toward the state and government among beneficiary populations. But these effects may not extend to subsequent generations where core resources like land are scarce. By exacerbating demographic pressure through dispossession, the colonial project continues to cast a shadow on the reconstitution of indigenous communities by limiting the multigenerational ability to reclaim heritage and livelihoods rooted in land access. Cognate policies of support or restitution may be necessary to facilitate a more comprehensive reconstitution of community identity and life.

INDIGENOUS RECOGNITION, IDENTITY, AND DEMOCRACY

Shifts in international law and domestic political conditions have generated widespread – though incomplete – acceptance for indigenous peoples' collective rights of self-determination in recent decades. Indigenous rights advocates have helped to advance this agenda through accords like the watershed ILO Convention 169 on Indigenous and Tribal Peoples in 1989 and the United Nations Declaration on the Rights of Indigenous People adopted in 2007, which recognize universal rights to collective self-determination for indigenous peoples.³ Many countries have adopted constitutions and laws to reflect this (Cuskelly 2011, Holzinger et al. 2018).

³ ILO Convention 169 defines indigenous peoples as "tribal peoples in independent countries whose social, cultural, and economic conditions distinguish them from other sections of the

With this shift has come a resurgence of identification among indigenous groups as culturally and socially distinct from dominant national ethnic groups. For instance, facing demands from indigenous peoples and in the context of a leftward political shift, many countries in Latin America, such as Bolivia, Ecuador, and Venezuela have adopted multicultural constitutions and citizenship regimes that recognize and protect ethnic and minority rights (Hooker 2005, Madrid 2012). And many countries in the region such as Chile, Colombia, Ecuador, and El Salvador recently began including census questions on ethnic identity (Loveman 2014). Countries as diverse as Australia, the Philippines, and Norway have also elevated rights, protections, and autonomy for indigenous groups.

But policies of indigenous recognition predate developments in recent decades. Countries over the past century have adopted policies ranging from the creation of indigenous territorial reservations to land restitution to the recognition of existing indigenous claims over land and an ability to operate under traditional authorities within those communities. For instance, Yashar (2005) highlights how Bolivia, Ecuador, and Peru began recognizing indigenous communities and rights to land and self-governance beginning in the early-mid 20th century. The same occurred even earlier in countries like the United States and Canada.

Of course, not all of these policies serve to practically strengthen the land claims or autonomy of indigenous communities. Some policies cordoned off indigenous groups to the margins of society as second-class citizens or non-citizens. Others used recognition to pry into communities through rules and regulations that aimed at assimilation of populations into national social and economic practices. In much of Latin America, this came in the guise of class-based

national community, and whose status is regulated wholly or partially by their own customs and traditions or by special laws and regulations."

recognition of indigenous groups as peasants, which unwittingly gave communities the space to strengthen local autonomy and authority systems (Yashar 2005).

Scholars have grappled with the consequences and normative implications of recognizing indigenous communities as distinct groups with collective rights to manage resources and aspects of self-governance. Numerous scholars have emphasized how ethnic diversity and identity politics more generally raises challenges to democratic functioning by generating inter-ethnic competition and distrust, eroding feelings of national solidarity and belonging, and corroding mutual toleration (e.g., Dahl 1998, Norris 2008, Fukuyama 2018). Recognizing collective rights and local autonomy in particular can complicate accountability mechanisms by introducing overlapping jurisdictions (Sieder 2002). It could also foster subnational authoritarian enclaves (Benton 2012), particularly where indigenous communities adhere to illiberal practices such as sexism and use autonomy to perpetuate them (Van Cott 2008, 226-230). Recognition could erode incentives for collective action that are important for indigenous communities to advance their political representation and demands (Carter 2021), and under some conditions exacerbate social differentiation between poor rural communities and generate social tensions (Fontana 2022).

By contrast, other scholars underscore how indigenous recognition and multiculturalism can deepen democracy by expanding rights and resources for disadvantaged groups and providing greater political space for non-dominant group self-identification (Madrid 2012, Van Cott 2008, Yashar 2005). Recognition is also symbolically important because of the history of discrimination, oppression, and inferiority associated with nonrecognition. As Van Cott (2005, 833) writes in the context of Latin America, "symbolic recognition after centuries of humiliation and domination is enormously important to Latin America's indigenous peoples, whose struggle is as much for substantive rights as it is for dignity and recognition of their status as peoples

existing prior to the Latin American state." Recognition can therefore not only enhance confidence in government but also renew enthusiasm for participation and engagement in political life. Recent findings suggest that at least in some circumstances, recognizing identities and traditional authorities can both enhance indigenous self-identification and complement state authority (McMurry 2022).

There is comparatively little empirical evidence on the effects of collective indigenous recognition relative to the rich theoretical literature on subnational identity more broadly. And the evidence that exists is structured in limited ways. Most important contributions use cross-sectional and cross-national comparisons (Behr 2018, Holzinger et al. 2018), which identify key trends but leave questions about the causal direction and do not drill down into specific communities. One recent exception is McMurry (2022), though there the focus is on the link between recognition and state strength.⁴ While McMurry exploits variation in community recognition timing to estimate causal effects, the community-level consequences cannot be disaggregated to examine differences among individuals within communities.

At the individual level, there is work examining how indigenous identification is related to views of democracy and feelings of political and social inclusion (e.g., Fierro 2020, Trejo and Altamirano 2016). Scholars have also examined individual-level determinants of indigenous self-identification such as economic well-being, skin color, and education (e.g., Telles 2014). But these contributions do not speak to the impacts of policies of indigenous recognition per se, nor to how these policies might differentially impact groups within communities in systematic ways.

To complement existing studies, I use wide spatial and temporal variation in recognition

⁴ Another is Fontana (2022), although she explores post-recognition intercommunal social conflict.

of indigenous communities within a single country and pair that with survey data in an effort to examine the causal impact of recognition on identity and views of democracy. This approach enables one of the first attempts to evaluate within-community consequences of recognition. This is important given that recognition, like other policy reforms, could have varying effects with target groups, especially when they provide limited or circumscribed benefits.

PERU'S INDIGENOUS COMMUNITIES

Indigenous institutions and practices have long played a crucial role in Peruvian society. Indigenous communities are at the heart of this. Many are located within Peru's mountainous highlands *sierra*, although they also extend to the coast and even into parts of the Amazon basin. Indigenous communities are groups of families that share a common territory; they represent the interests of their members and regulate access to resources, including land (Diez 2012).

Communities are nested within Peru's larger ethnic groups such as the Quechua and Aymara. They have territorial claims, are administered by community authorities, and are largely – but not exclusively – populated by indigenous peoples. Indigenous communities are the locus of customary practices such as communal landholding and reciprocal work arrangements, and while these still operate in most communities, they have declined in recent decades with market integration and development (Carter 2021). Many community members are bilingual speakers of both a native language and Spanish.

Today Peru's indigenous communities control over half of Peru's agricultural land and approximately one-third of the national territory (INEI 2014). Community members comprise roughly 11% of the country's population and their territories encompass an even larger portion of

the population.⁵ There are over 7,000 communities. Highlands and coastal communities known as "peasant communities" (*comunidades campesinas*) encompass over 6,100 of these and control the vast majority of indigenous territorial claims; they also have a long history of relations with the state and private economic actors. Nonetheless, they remain highly autonomous: a 2012 census of peasant communities indicated that only 6% were affiliated with other larger social or political organizations. Indigenous communities located in the Amazon basin known as "native communities" (*comunidades nativas*) have been largely geographically isolated until recently and many remain so.

Indigenous communities have nonetheless changed and adapted substantially over time. Most were disrupted by Spanish colonialism through taxation, land and labor appropriation, and various forms of control. The first decades following independence in 1821 exacerbated their precarity by facilitating the sale and appropriation of communal lands. The government also sought to assimilate and dominate indigenous peoples through a process of "mestizaje" (Remy 2013).

The Birth and Meaning of Modern Community "Recognition"

A new constitution in 1920 marked a change by creating mechanisms to grant legal recognition to indigenous communities and reestablish rights to communal landholdings.

Community recognition by the state entails legal status as distinct entities that nonetheless belong to the nation-state (Mallon 1983). Formal recognition and community status gives communities the capacity to interact with the state and public agencies as a group and enter into

_

⁵ Data on community members are from the 2017 censuses of peasant communities and native communities. There is also a considerable population that self-identifies as indigenous but that does not live within communities. And many communities incorporate some individuals not inscribed in community registers, especially where they encompass urban towns.

legal agreements with neighboring communities and private outside actors, enhancing their bargaining power with outsiders and amplifying their voice in procuring government infrastructure and services. Recognition also establishes rights over landholdings held by the community. But community recognition moved slowly initially. Only 783 communities had been recognized by 1940, all of them in the highlands and the coast. For the majority of unrecognized communities, legal mechanisms enshrined in the 1920 constitution had little practical impact (Yashar 2005, 229).

A series of mass protests and land occupations by indigenous groups in the southern

Andes in the early 1960s brought indigenous claims, particularly for land, back to the forefront.

Many communities broke free from private haciendas that had incorporated them and reclaimed land in the late 1960s and 1970s through a major government land reform program. The land reform was part of a broader government attempt to craft a more unified nation by moving away from ethnic categories (Seligmann 1995). The government dropped the term "Indian" and redefined indigenous communities as "peasant communities" in the Andes and "native communities" in the Amazon.⁶ These terms persisted, helping to demobilize "indigenous" as a salient political identity in Peru (Yashar 2005), though this has been shifting in recent decades.⁷

Few communities received full control of their own land during this period and only a minority of communities received legal recognition. Rather, most were incorporated into government-created land reform cooperatives and the state sought to impose new regulations on them regarding landholding and governance. In practice, however, this unintentionally enabled

.

stigma associated with being "indigenous."

⁶ The shift from referring to communities in ethnic terms (as "Indian" or "indigenous") to class-based terms (as "campesinos") occurred throughout much of Latin America in the 20th century.

⁷ Communities themselves overwhelmingly prefer these terms, in part due to remaining popular

communities to develop greater local autonomy and fostered traditional authority systems (Yashar 2005, 232-235). This process centered on peasant communities; native communities from the Amazon again remained at the sidelines.

A new wave of community recognition took place in the 1980s as land reform cooperatives broke up. Many communities took direct control of former cooperative land through that process and the government moved to legally recognize their new status (Castillo et al. 2004, 28). A pair of laws in 1987 accelerated this wave of state recognition and regulation of communities. These laws advanced the adjudication of community claims, regulated and recognized the communal governing bodies of communities, and defined the rights and duties of community members. Meanwhile, the state began to investigate and register the first few native communities, though they did not receive the same status of legal recognition nor were they subject to the same regulations as peasant communities.

Community recognition continued throughout the 1990s to the present as the benefits and rights associated with state recognition, along with regulations, have expanded. This most recent wave has shifted more toward the subdivision of existing peasant communities. Several factors have driven this trend (see, e.g., Bonfiglio 2017). The first are legal provisions and programs that protect community land as imprescriptible and relieve it of any tax burden, and that provide communities state funds and a consultative voice in rural public policies. Some peripheral settlements of existing communities have broken off to take advantage of these benefits and rights directly. The second is increased spending on social programs and public financing of local government. Many districts centered these funds on central community areas, providing

⁸ For instance, communities have access to the local participatory budget process and are eligible to serve as representatives of civil society in regional coordination councils.

incentives for peripheral settlements to form communities to capture and redirect local funds.

The third is economic diversification, which has weakened the communal institutions of some communities and engendered community splits.

Figure 1 shows the growth in community recognition since the 1920s using data from the IBC/CEPES (SICCAM 2016). The dynamic picture represents a "renaissance of Andean social groupings" that nonetheless are undergoing constant organizational change and adaptation in response to modernization and outside forces (Mendoza 2004, 28).

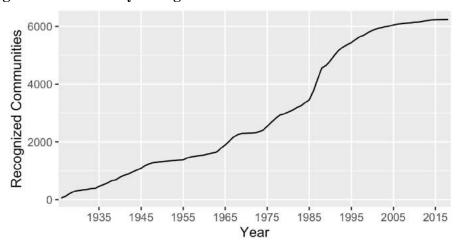


Figure 1. Community Recognition in Peru

Community Life and Links to Land

Community practices and governance are central to the life of indigenous community members because of the participatory structure and autonomous nature of communities. There are important commonalities across communities despite considerable variation in local practices. Community members hold "cargos," which are responsibilities to the community, such as serving on a night watch or planning community celebrations. Many communities practice various forms of unpaid reciprocal or community work assistance such as helping each other during harvesting season or contributing labor to public works projects such as road maintenance

or community school construction.⁹ And community members can gain access to available community land, whether as family plots, access to communal lands, or both. While recognition is collective, in most cases landholding and access to communal land is not.

Community members also participate in the community's main deliberative governing body, the General Assembly. The General Assembly decides who can be a member of the community, deliberates on matters of fundamental community importance, controls community rules, appoints individuals to *cargos*, sanctions and punishes community members who violate rules, and elects a Governing Board. The Governing Board, in turn, serves as the Assembly's administrative body and its legal representative to outside actors and the Peruvian government.¹⁰

Customary mechanisms of land distribution guide land access in ways tied to the life cycle of community members. Reaching adulthood in a community brings with it the right to become a community member (*comunero*), vote in the General Assembly, participate in adult-oriented community organizations, and, critically, to gain access to community land. But land does not come automatically at adulthood; access is shaped by fulfillment of community expectations in terms of active participation and meeting responsibilities, community status, and family needs such as supporting children and a marriage.

Land, Land Scarcity, and the Intergenerational Impact of State Recognition

Land is central to identity in Peru's indigenous communities. Communities have ancestral links to land and have long relied on its resources for their livelihoods. But land access is limited and there is a long history of tenure insecurity. Spanish colonists appropriated indigenous land,

⁹ Extensive and intertwined kinship networks help to maintain community spirit even when some of these more traditional practices fade (Mendoza 2004, 28).

¹⁰ This governing structure derives from the 1987 General Law of Peasant Communities. General assemblies, however, along with legal representatives, are longstanding traditions.

reducing the territorial base of many communities. This process deepened following independence as large haciendas spread across the country, enveloping many communities and pushing others to marginal areas. By the early to mid-20th century, roughly 20,000 haciendas alone controlled over half the country's land (Albertus 2021). Land reform restituted some lands to indigenous communities, but they were disadvantaged compared to resident (often mestizo) hacienda workers (McClintock 1981).

The result of this difficult history is that many communities have long faced land scarcity and insufficiency (Caballero and Álvarez 1980). Families facing land scarcity within these communities struggle to gain enough land to support themselves mainly through agriculture, and in severe cases do not have enough land to serve as a backstop against destitution in the case of unanticipated negative shocks like the death or illness of a family member, occupational injury, poor health, or a national financial or public health crisis. This intergenerational problem has contributed to enduring social and material disadvantages relative to Peru's mestizo majority (INEI 2017).

Concerns over land scarcity, while longstanding, have nonetheless grown over time with population growth, especially as major advances in basic health pushed down high infant mortality rates and extended lifespans. Jacobsen (1993), for instance, documents how population growth in the highlands Puno region in the late 1800s-mid 1900s worked alongside hacienda encroachment to make it increasingly difficult for pastoralists to access sufficient grazing lands to maintain their traditional livelihoods. Chatterjee (2023) demonstrates a similar pattern of growing demographic pressure on fixed land resources in the Antapampa region of Cusco in the mid-late 20th century. These trends have continued over time.

The backdrop of land scarcity, which characterizes most indigenous communities across the Americas and many elsewhere, shapes the consequences of community recognition by the state. Official state recognition makes a community's land more secure and therefore more desirable. By recognizing and outlining community land claims, it mitigates conflict and incursions by outside groups. It also generates more stable and predictable land access within communities by fostering more autonomous community-based allocation. Land is more attractive not only for production but also as an insurance mechanism and retirement security — often key among rural populations (Thiesenhusen 1989) — when its possession is more secure. Unrecognized communities face greater land precarity and have had to navigate shifting state-imposed guidelines over land use and allocation within communities that can considerably shuffle existing land use patterns. Finally, community recognition also enhances the prospects for and consultation in state investments in infrastructure and benefits.

I anticipate that these dynamics will drive up demand for land and investment in community life among eligible community members, and that this should operate most strongly among those who are at or near the age of qualifying for community land access. As discussed above, reaching adulthood brings with it the right to become a community member and gain access to community land provided an individual participates in community life, fulfills their responsibilities, and has need. Adults and near-adults at the time of recognition are therefore most likely to win greater access to community land in the wake of recognition and to invest in community life and governance. Through that mechanism of land and investment in community life, these individuals should develop a stronger sense of community pride and identity and evaluate governance in a more positive light.

Adults at the time of recognition are especially well positioned because they already

qualify for land access. Furthermore, and not entirely separately, having come of age in an unrecognized community and experienced community recognition as adults, they should be especially cognizant of the symbolic and governance impacts of official recognition. I expect these cohorts to develop more positive views of how democracy functions due to their participatory role in community life, and to vest greater confidence in the regional governments that are chiefly responsible for community recognition and policy administration.

Individuals who are very young at the time of community recognition and those born after recognition are less likely to gain access to community land resources where there is scarcity. By the time they come of age, years of increased demand for land access among older cohorts following recognition will have created more scarcity. This filters into customary mechanisms of land distribution. Because land is scarcer within the community, qualifying for it becomes relatively harder and the wait for land becomes longer. Recognition for these cohorts may be more symbolic, to the extent that this is transmitted across generations, and less material in nature. Facing these constraints and more limited access to a core community resource, when these cohorts come of age and make key livelihood choices, they are less likely to play as active a role in community life and governance. This does not necessarily imply that they will be financially worse off than older generations. To the contrary, forced out of agriculture, they may gain more lucrative opportunities in other economic sectors. But their community ties will be comparatively weaker.

While these hypotheses suggest clear intergenerational differences stemming from recognition, I *do not anticipate* sharp discontinuities across specific age thresholds. Differences across cohorts should stack up over time as individuals make life decisions over the course of years that shape their identity and views of government. These decisions can elapse slightly

differently in different communities for unobserved reasons, but over time they should drive a considerable wedge in outcomes between adults and the young/unborn at the time of recognition. The teenage cohort is something of a bridge cohort; they may anticipate and act toward post-recognition land access as they come of age (e.g., by enrolling as a community member), but they also might not ultimately get it.

DATA AND RESEARCH DESIGN

To test my hypotheses, I examine data on communities along with their formal recognition status and pair these data with individual survey respondents' self-identification and views on the government and democracy. The individual-level data I utilize is from a pooled sample of households from the Peruvian National Household Survey (ENAHO) for the period 2007-2020. ENAHO is the official annual household survey run by the Peruvian National Institute of Statistics to monitor household living conditions and public opinion on a range of issues. It contains detailed data about households and individual economic, demographic, and social characteristics.

Beginning in 2007, ENAHO introduced geolocation for respondents, which enables linking respondents the specific communities for the first time. It also includes information on respondent year of birth, allowing assignment of exposure to recognition at a certain point in an individual's life. Between 2007 and 2020, ENAHO surveyed an average of 72,000 individuals per year.¹¹

While the data I use are rich, detailed, and well matched to examining intergenerational variation in effects of experiencing recognition, they also present limitations to broader

17

¹¹ Further ENAHO sampling and coverage details are in the Appendix. It contains 182,111 respondents from identified communities and covers 1,763 communities.

inferences about recognition and alternative estimation approaches. As Figure 1 indicates, the vast majority of communities were recognized before 2007. There is also no register of as-yet unrecognized "candidate" communities, though the trend in Figure 1 suggests that group is now quite small. That precludes comparing individuals from recognized communities, all of which experienced some degree of treatment exposure by the time of the ENAHO surveys, with individuals from unrecognized communities. Furthermore, only six (relatively small) communities recognized during the ENAHO sample period were sampled both before and after recognition, and all sampled individuals were adults born before recognition. That limits the inferential power of a difference-in-difference approach to estimating intergenerational and more general effects of recognition. ¹³

Community Recognition

Community recognition is an official designation that is granted through a government decree. I gathered data on the status and timing of community recognition from the Instituto del Bien Común (IBC) and the Centro Peruano de Estudios Sociales (CEPES). These data combine several disparate databases of communities managed by different state agencies: the Ministry of Agriculture, the Ministry of Culture, and the Organization for the Formalization of Informal Property (COFOPRI). The IBC and CEPES cross-checked these sources against one another,

_

¹² It is nonetheless possible to compare community members to similarly situated rural individuals living nearby communities to gauge broader recognition effects. These support the main findings. See Appendix for more details.

¹³ Notwithstanding the very narrow sample (comprising less than 1% of all recognized communities and less than 0.5% of ENAHO sampled individuals living in communities), such an analysis does indicate a shift in self-identification and community membership among adults consistent with the findings below. There is also a trend toward more landholding, but it is not a statistically distinguishable one, perhaps because of the short amount of time elapsed since recognition in the period, the relatively small sample, or the fact that several of these communities already faced considerable land constraints.

investigated secondary sources, and visited regional governments and archives to verify information and acquire additional community maps. The resulting dataset records a total of 6,138 recognized peasant communities. It also records 1,129 native communities, nearly all of which have not been officially recognized and are therefore not included in the analysis.

Assigning Individuals to Communities

ENAHO collects geocoded information on where survey respondents live. This is critical because neither ENAHO nor any other major household survey collect data on specific community membership.

Assigning individuals to unique communities requires a complex and original intermediate step: mapping the territorial extent of communities. The most comprehensive and reliable source of community boundaries comes from a shapefile produced by the IBC. The IBC maps territorial boundaries for 69% of Peru's 6,138 communities.

I extend this data source in two ways. First, I build on it using a recent map of communities produced by COFOPRI. This map has very high overlap with the IBC data and adds a cartographic basis for an additional 1% of communities. More importantly, I turn to data from the Ministry of Culture's Database of Indigenous Communities (BDPI). The BDPI provides a list of populated areas that pertain to each indigenous community. From this data source and the geolocation of populated areas, I create an additional series of territorial polygons that incorporate populated areas uniquely assigned to a community with a one-kilometer buffer around them. This covers another 23% of all communities. Most of these additional polygons constructed from BDPI data do not overlap with polygons from the other data sources. The Appendix contains more details on constructing polygons from the BDPI data.

Combining these data sources yields the most comprehensive cartographic basis for

Peru's communities to date. It covers 93% of all officially recognized communities. 14

Figure 2 displays a map of indigenous peasant communities across Peru's national territory. They are concentrated in the Andean highlands, especially in the country's south and center. There are also peasant communities on the northern and central coast, and the government has begun recognizing a small number of peasant settler communities in the Amazon basin.

Trujillo

Lima

Peasant Community

Department Boundary

Figure 2. Indigenous Communities Across Peru

Outcomes Linked to Identity and Views of Government

In estimating the effects of official community recognition, I examine several outcomes linked to identity and views of government. I examine two outcomes linked to identity, one

¹⁴ The remaining 7% of communities cannot be clearly located and assigned a polygon. Of the nearly 5,700 communities with a cartographic basis, 84% were recognized and titled as of 2017.

20

subjective and one behavioral. The first captures subjective self-identification with an indigenous community over other groups. When asked which group they feel most identified with, individuals can indicate (i) their department, province, district, or town; (ii) their ethnicity or race; (iii) their peasant or indigenous community; (iv) their religious group or position; (v) other. I code indigenous community self-identification among those who choose answer (iii). This is a far more salient identification and marker of indigeneity than ethnicity or race. Within communities, less than 2% of individuals identified first with their ethnicity or race whereas over 34% identified with their community. Given weak ethnic ties and cross-community interaction in Peru (e.g., Madrid 2012, Yashar 2005), community identity is the lens into indigenous identity. ¹⁵

A second identity outcome captures whether a respondent, or a household member, reports being formally inscribed in a community. This variable was only added to the survey beginning in 2012. It is worth noting that this outcome differs from the first: an individual may report being a member of a community through an administrative designation but principally identify along other lines. This variable is not simply a mechanical result of the recognition process. Enrollment at adulthood is a simple process, such that this variable is not just capturing status among adults from the time of recognition.¹⁶

-

¹⁵ When prompted nonetheless specifically on ethnicity, approximately 50% of community residents in the ENAHO sample self-identify as Quechuan and about 5% as Aymaran, the two largest non-mestizo ethnic groups represented. I also examined the effects of recognition on ethnic self-identification (i.e., respondents who self-identified as Quechuan, Aymaran, native to the Amazon, or from another indigenous group). This question was asked in ENAHO from 2012-2020. Results are sensitive to model specification, varying from statistically insignificant to a small 1-2% boost in indigenous self-identification for adults and near-adults compared to the youngest cohorts at the time of recognition.

¹⁶ Inscription can be done easily with a community registrar and member of the governing board, who verifies kinship and birth information (which is typically pro forma in small communities) as well as a form of participation, such as attendance at a General Assembly. Community enrollment can also somewhat anticipate recognition, since the recognition process requires submitting membership roles to gauge authenticity.

I also examine how community recognition impacts views of democratic functioning and confidence in government. On democratic functioning, respondents rank how well they believe democracy functions on a scale of very poorly (1) to very well (4). This question does not cue them to think about national-level or local-level democratic practice but is instead general in nature. It asks about democracy in the present rather than in a retrospective sense. In terms of government confidence, I focus on confidence in regional (departmental) government since this administrative level is responsible for nearly all of the bureaucratic process of community recognition from receiving and processing initial petitions to inspecting community territorial claims, gathering input from neighboring communities, and emitting final decisions on recognition. Regions pass along final documentation to the national level for inscription in national registers. Regions also formulate and administer policies for communities in their jurisdiction.¹⁷ Survey respondents are asked simply whether they have confidence in their regional government on a scale of none (1) to a lot (4).¹⁸

The Appendix contains descriptive statistics for these and other variables.

Controls

The analysis also includes several control variables from the ENAHO survey. ¹⁹ I include a variable for gender since individuals may differ in self-identification and their views of government based on it. Another control is whether an individuals' mother tongue is a native, non-Spanish language. This is a less immediately malleable marker of indigeneity and may be linked to how an individual relates to the state and the importance they place on community

¹⁷ Accordingly, I find no impact of recognition on trust in national government.

¹⁸ The specific wording of each of these survey questions is in the Appendix.

¹⁹ Results are also similar when including community-level controls for geography, agricultural suitability, road access, and mining presence (see Appendix). I do not include them here because these variables are generally statistically insignificant and reduce the sample size.

recognition and identity.

Estimation Framework

I combine the community-linked household survey data, including birth year, with data on the timing of community recognition to examine the impact of official community recognition on identity and views of government. This approach enables the estimation of a specification in which an individual's residence within a community and date of birth jointly determine their exposure to community recognition and the conditions that preceded or followed it. This facilitates the comparison of individuals who were born into already recognized communities to those who were young at the time of recognition and those who were in older cohorts and became adults prior to the recognition of their community, zooming in on a range of age brackets of interest including those around the cutoff of adulthood.²⁰

This type of age cohort analysis has been widely used in economics to examine relationships such as how school construction impacts educational achievement (Duflo 2001) and how civil conflict shapes human capital accumulation (Leon 2012). It has rarely been employed in political science.

Identifying an individual's year of birth and community of residence enables calculating how old each individual was when a community was recognized and therefore how it may have impacted them. I use this information to compare self-identification and views of government among those affected by community recognition as adults or near-adults with those of younger cohorts that are less well positioned to claim valuable and scarce community resources like

-

²⁰ The estimations incorporate all people residing in communities rather than just self-reported community members because membership itself can be shaped by recognition. Furthermore, individuals who are not reported as community members may nonetheless have close community ties, for instance unmarried women or individuals who choose not to perform community responsibilities and are not formally inscribed as community members.

land.21

I estimate the impact of community recognition on identity and views of democracy using the following regression specification, which exploits both birth cohort and geographical variation in recognition:

(1)
$$y_{ijt} = \alpha + \sum_{l=-80}^{65} d_{ijl}\beta_l + X'_{ijt}\delta + \omega_d + \varphi_t + \varepsilon_{ijt}$$

where y_{ijt} is the outcome of interest for individual i located in community j in year t. d_{ijl} is a dummy that indicates whether individual i in community j is age l in the year of community recognition. For reasons indicated below, I group ages into cohorts. Individuals born after community recognition form the control group, and this dummy is omitted from the regression. 22 X_{ijt} is a vector of individual characteristics, including mother tongue, gender, and years of education. ω_d are district fixed effects where community j is in district d and ϕ_t are year of birth fixed effects. 23

District fixed effects help to capture heterogeneity across space in self-identification and views of government for unobserved reasons, such as state presence or local inter-community ties. I also cluster standard errors at this level. Birth year fixed effects capture potential time trends in self-identification and views of government; they therefore ensure that the findings are *not driven*

_

²¹ Of course, recognition may impact all cohorts whether born before or after recognition, generating broader impacts on communities. Further analysis in the Appendix compares community members to rural individuals living nearby communities. The findings indicate that intergenerational effects reflect a large portion of the broader effects of recognition.

²² Results are similar if the control group is restricted to individuals born in the 10 years after recognition.

²³ There can be anywhere between one and several communities in a given district. Estimates using community or town fixed effects are generally less precise given that small communities may only have a small number of individuals sampled, rendering their outcomes colinear with the fixed effects and dummies and exacerbating potential bias due to small samples. See Appendix for the distribution of sampled individuals by community.

by broader age-related trends. For instance, younger cohorts might be systematically more (or less) likely to self-identify as indigenous for reasons unrelated to their exposure to community recognition, and birth year fixed effects would absorb this trend. Each coefficient β_l in Equation (1) can be interpreted as an estimate of the impact of community recognition on a given birth cohort. I generate estimates using a linear probability model because this facilitates interpretation of the coefficients and is far more efficient than estimating probit or logit regressions given the large number of fixed effects and clusters for estimating standard errors.²⁴

One potential concern about the estimation approach is the possibility of errors in individuals' reported age. Missing information on birth month or mistakes in reported age due to transcription or the lack of a birth certificate could lead to assigning exposure to community recognition with some error. Estimating a large number of age cohort year dummies can also generate inefficient estimates. I minimize these potential problems by principally analyzing recognition exposure across age cohort groups of interest and theoretical relevance rather than assigning it to specific years of birth. I define the following groups: those born after recognition, those who were young at the time of recognition (0-12), teenagers who were not of age at recognition (13-17), young adults at recognition (18-25), mature adults at recognition (26-40), and older adults at recognition (41-65). Equation (1) is therefore estimated using age cohort group dummy interactions instead of age cohort year dummy interactions. Teenagers at the time of recognition are on the cusp of qualifying for community membership and benefits, young adults are positioned to make key life decisions and can join community life independently for the first time, mature adults have potential for some pre-existing community experience and many are at

-

²⁴ Results are robust to using alternative estimators such as probit models when the outcome is binary.

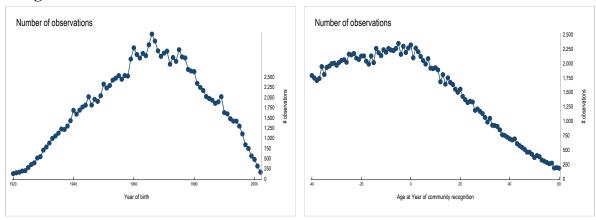
the age of raising young families, and older adults can have longstanding community experience, prominence and influence, and larger families.

Another consideration is migration. Neither ENAHO nor any other survey data record individual histories of residence. I therefore use current community of residence to proxy for which community an individual lived in at the time of recognition. Results are similar when restricting the sample to individuals who remained in their district of birth during their lifetime (see Appendix Part VIII), since these are the individuals who have most likely remained in their communities for life. The survey data and research design also cannot capture individuals who might have left their community. Those who are young at the time of recognition or born after it, facing more limited land access and less connection with the community, could migrate elsewhere. This is hard to quantify precisely, but to the extent it operates, it is likely to bias the estimates of age cohort differences downward; any estimated differences in the expected direction would likely be larger if more of the young who "lost out" left and if we could perfectly observe residence at the time of recognition. Analyses of sample composition by age and recognition exposure, however, suggest that any out-migration effects are unlikely to be large (see Appendix Part VIII). The ratio of younger people to adults does not vary much between communities recognized more recently versus long ago, nor does it differ much between communities and neighboring rural villages. Below and in the Appendix I address additional concerns about potential migration into communities and the presence of outsiders. I also examine restrictions of the sample to individuals from the most rural communities where inmigration and out-migration tends to be most limited.

Figure 3 displays the distribution of survey respondents by birth year and age at the time of community recognition. There are individuals in the household survey born between 1920 and

the 2000s, though most are born between the 1940s and 1990s. This time period spans over 80% of the communities recognized. There are also a considerable number of observations across age brackets at the time of community recognition. While many sampled individuals were born into already recognized communities, there are also many people who were young or adults at the time of recognition. The sample becomes sparser for those who were in their fifties or older at recognition.

Figure 3. Survey Respondents by Year of Birth and Age at Time of Community Recognition



RESULTS

Table 1 presents the main results of how community recognition impacts individuals within communities.²⁵ Columns 1-4 use the full sample of communities. Column 1 indicates that adults older than 25 at the time of recognition are most likely to self-identify as a member of an indigenous community over other identities. These individuals are 3-4 percentage points more likely to do so than the omitted comparison group of those who were born into a recognized community. This compares to 34% of individuals within communities who self-identify most

_

²⁵ Raw data on the main outcomes by age at the time of community recognition versus birth year are strongly suggestive of the age cohort-level effects of recognition and support the findings (see Appendix).

closely with their indigenous community. Younger individuals are indistinguishable from those born after recognition. Further analysis indicates that the effects for adults are driven by a decline in identifying with one's region or town. There is a smaller and more borderline effect on teenage cohorts that is about one-third the size for that of adults.

Table 1. Community Recognition, Identity, and Views of Government

	Communities < 10,000 people							
	Self-Identifies with Community	Community Member	Feels Democracy Works Well	Trust in Regonal Government	Self-Identifies with Community	Community Member	Feels Democracy Works Well	Trust in Regonal Government
Age at Recognition								
Young (0-12)	0.011	0.025**	0.012	-0.008	0.013*	0.030***	0.019**	-0.005
	(0.007)	(0.010)	(0.009)	(0.010)	(0.007)	(0.010)	(0.010)	(0.011)
Teenagers (13-17)	0.015*	0.050***	0.018	0.022	0.019**	0.056***	0.028**	0.030*
	(0.009)	(0.014)	(0.013)	(0.015)	(0.009)	(0.013)	(0.013)	(0.017)
Young adults (18-25)	0.010	0.043***	0.045***	0.033**	0.014	0.049***	0.052***	0.035**
	(0.010)	(0.016)	(0.014)	(0.015)	(0.010)	(0.015)	(0.014)	(0.016)
Adults (26-40)	0.035***	0.037*	0.059***	0.055***	0.040***	0.049***	0.061***	0.064***
	(0.012)	(0.019)	(0.015)	(0.017)	(0.012)	(0.018)	(0.015)	(0.019)
Adults (41-65)	0.043***	0.027	0.076***	0.043*	0.049***	0.046*	0.088***	0.045*
	(0.017)	(0.025)	(0.020)	(0.023)	(0.017)	(0.024)	(0.020)	(0.025)
Controls								
Native mother tongue	0.071***	0.092***	0.061***	-0.020**	0.072***	0.092***	0.064***	-0.025**
	(0.008)	(0.015)	(0.009)	(0.010)	(0.008)	(0.015)	(0.010)	(0.010)
Female	0.000	-0.017***	0.011***	-0.005**	0.001	-0.017***	0.011***	-0.006**
	(0.001)	(0.001)	(0.002)	(0.002)	(0.002)	(0.002)	(0.003)	(0.003)
Constant	0.027	0.330	2.261***	1.325***	0.090	0.371	1.550***	1.392***
	(0.153)	(0.233)	(0.496)	(0.294)	(0.177)	(0.271)	(0.022)	(0.428)
Year of birth FE	YES	YES	YES	YES	YES	YES	YES	YES
District FE	YES	YES	YES	YES	YES	YES	YES	YES
Observations	166,623	121,090	134,869	133,107	139,969	100,044	110,389	108,780
R-squared	0.164	0.536	0.067	0.079	0.140	0.467	0.072	0.082
Districts	824	811	821	822	774	760	771	772
Additional Cohort Compar	risons							
Young adults vs. Young	-0.000	0.018	0.034	0.041	0.001	0.020	0.033	0.040
Two-sided p-value	0.9800	0.0306	0.0049	0.0017	0.9071	0.0188	0.0062	0.0033
Adults (26-40) vs. Young	0.025	0.012	0.047	0.063	0.027	0.020	0.041	0.069
Two-sided p-value	0.0010	0.2731	0.0001	0.0000	0.0005	0.0764	0.0005	0.0000

^{***} p<0.01, ** p<0.05, * p<0.1. Robust standard errors clustered by district in parentheses. Omitted baseline is individuals born post-recognition.

The effects of recognition on self-reported community membership are in Column 2. Membership trends somewhat earlier among age cohorts than self-identification, which may reflect prospective attempts at gaining access to community resources by individuals of formative age—attempts which may lead to investment in community but may or may not yield land on the hoped-for timeline. Young adults age 18-25, adults age 26-40, and teenagers age 13-17 at the time of recognition are most likely to claim community membership after official recognition. These cohorts are 3.7-5% more likely to claim community membership than

individuals born after community recognition. This is considerable given that about 41% of individuals within communities claim membership. Adults age 41-65 and younger individuals age 0-12 at the time of recognition are also more likely to claim community membership than the comparison group, though the magnitude of the effects declines considerably relative to teenagers and young adults and for adults the effects are statistically insignificant.

Column 3 reports results on views of how well democracy functions. The effects are again concentrated among adults. All adult cohorts over age 18 at the time of community recognition report that democracy functions better than the comparison group of individuals born after recognition. The estimated effects are statistically strong and range from 0.045-0.076. This is approximately one-tenth of a standard deviation of this variable, which in turn represents a shift from reporting, for instance, that democracy works well versus poorly. Those who were young at the time of recognition are indistinguishable from those born after recognition.

The estimated impact of recognition on trust in regional government are in Column 4.

Again, adult cohorts report greater trust in regional government, which is the key administrative level at which the process of community recognition operates. Estimated effects range from 0.033-0.055 for adult cohorts over age 18 compared to post-recognition birth cohorts. This compares to an average of 1.7 for this variable on a four-point scale.

The results in Columns 1-4 represent a durability in the shift in identity and views of government following community recognition. Differences among cohorts are observed even decades after recognition.²⁶

The remaining Table 1 columns replicate Columns 1-4 but restrict the sample to communities with less than 10,000 inhabitants as calculated using community polygons and

29

²⁶ For instance, the results hold when restricting to communities recognized prior to 1990.

individual-level geolocated data from the 2007 census. Whereas the effects are anticipated to operate most strongly among those who are, could plausibly become, or have close ties to, community members, there are some communities whose boundaries incorporate a considerable number of outsiders who are not impacted by recognition. This is particularly true of communities that contain urban centers. Individuals from elsewhere can migrate to these areas in search of employment or educational opportunities but do not interact with the local community. Communities with less than 10,000 inhabitants – which constitute 98% of identified communities and contain 85% of community respondents – are those least likely to be impacted by these dynamics.²⁷ Their more rural character also makes land more central to community life.

As anticipated, the results in Columns 5-8 are similar to those in Columns 1-4 but generally strengthen in both statistical and substantive significance. These columns now pick up some minor, residual effects among younger cohorts, especially on identity outcomes, but also exhibit stronger results among adults and near-adults across the board vis-à-vis those born after recognition.

The Table 1 findings, as expected, do not necessarily indicate a sharp discontinuity between cohorts in the outcomes. But there is an unmistakable trend across cohorts, with the greatest magnitude of effects consistently residing among adult and near-adult groups at the time of recognition. Narrower cross-cohort comparisons also yield similar conclusions. Some of these additional comparisons of potential interest are provided in the bottom rows of Table 1. The

_

²⁷ Results are also similar when taking a different approach: restricting only to people who were born in the same district where they reside at the time of being surveyed (see Appendix). This alternative approach is also imperfect. For instance, it excludes individuals who could indeed be community members, such as women who marry into a community from outside of it. Finally, I examined whether recognition has differential effects by age on people living in communities who were not born in that district. The effects are mild (see Appendix).

differences between the young and young adults, for instance, are statistically significant for all but self-identification with community. And the differences between the young and adults age 26-40 are significant for all outcomes when focusing on rural communities.

Mechanisms

What explains why adults and near-adults at the time of recognition are most likely to report identifying with their community and to express positive assessments of democracy and regional government? Several pieces of information suggest that land access and associated investment in community life is a driving mechanism.

Full community membership, including the right to vote in the general assembly and the right to access community land, is only extended to participating individuals after they reach adulthood. This is important because it shapes individual choices following community recognition. Official recognition makes community land more secure and gives communities greater access to benefits, increasing demand for land and investment in community life among eligible community members. Adults and near-adults are positioned to most quickly act on this in the years immediately following recognition as they make choices about where to live and what type of employment to seek.

The community of Chalco in Ayacucho is illustrative. With recognition and newfound autonomy as it split off San Antonio de Cuchucancha, the community divided its common grazing area among families with usufruct rights since it was no longer used for livestock. It also allocated urban plots for a new roadside town. There was high demand for this land and more stable expectations for access now that the community was autonomous. Community membership quickly grew as resident adults and near-adults joined community life and snapped up land (Naganoma 2012, 63-64).

Younger cohorts, including those born after recognition, could in theory respond to post-recognition incentives in similar ways to adults – unless land is scarce and has already been largely claimed by other community members. Because first movers who win more community land and invest in community life develop power and authority within communities, younger cohorts and especially those born post-recognition find it more difficult to access sufficient community resources as a livelihood and are therefore less likely to assume community responsibilities or to be impacted by recognition. Del Pozo (2004), for instance, documents the problem of "landless youth" in communities in Puno who want land but face increasing scarcity within communities; some have even begun organizing on that basis, driving a potential "confrontation between generations" (Del Pozo 2004, 181).

Table 2 examines these hypotheses. It again restricts the sample to smaller communities to focus on rural areas. The dependent variable in Column 1 is the log size of land owned.

Column 2 is a dummy variable for whether an individual works in agriculture. These columns indicate that adults and near-adults at recognition are more likely to hold larger plots of land within the community and to work in agriculture compared to those born after recognition.

Young adults, for instance, hold on average 8.4% more hectares of land than those born after recognition. These trends increase with age and likely with power and community seniority.

Columns 3-5 examine how individuals acquired and hold their land. Individual data on land acquisition and tenure are from the 2012 agricultural census. The sample is restricted to individuals living in the census's most fine-grained enumeration blocks ("SEAs") that can be assigned to community polygons. Adults and near-adults at the time of recognition are less likely to receive their land by inheritance or to own it and are more likely to hold it as a community member compared to those born after recognition.

Table 2. Land and Community Life Mechanism

	Landholding Size	Works in Agriculture	Got Land by Inheritance	Has Land as Owner	Has Land as Community Member	Belongs to a Ronda Campesina
Age at Recognition						
Young (0-12)	0.057***	0.012	-0.006	-0.010	0.015*	0.007**
	(0.012)	(0.008)	(0.008)	(0.009)	(0.008)	(0.003)
Teenagers (13-17)	0.075***	0.029***	-0.024**	-0.025**	0.024**	0.007*
	(0.018)	(0.009)	(0.011)	(0.012)	(0.012)	(0.004)
Young adults (18-25)	0.084***	0.030***	-0.034***	-0.028**	0.028**	0.013***
, ,	(0.018)	(0.010)	(0.013)	(0.014)	(0.013)	(0.005)
Adults (26-40)	0.094***	0.032**	-0.053***	-0.048***	0.039**	0.013**
,	(0.022)	(0.013)	(0.016)	(0.017)	(0.016)	(0.005)
Adults (41-65)	0.104***	0.039**	-0.080***	-0.074***	0.051**	0.017**
,	(0.029)	(0.016)	(0.021)	(0.023)	(0.021)	(0.007)
Controls	,	,	,		,	,
Native mother tongue	0.039***	0.080***	-0.024**	-0.061***	0.056***	0.007***
-	(0.012)	(0.012)	(0.011)	(0.012)	(0.014)	(0.002)
Female	-0.043***	-0.008***	-0.024***	-0.002	0.025***	-0.003***
	(0.003)	(0.002)	(0.003)	(0.004)	(0.003)	(0.001)
Constant	0.245***	0.760***	0.692***	0.815***	0.144***	0.025***
	(0.083)	(0.179)	(0.072)	(0.059)	(0.054)	(0.009)
Year of birth FE	YES	YES	YES	YES	YES	YES
District FE	YES	YES	YES	YES	YES	YES
Observations	151,723	151,723	154,399	161,289	154,399	144,297
R-squared	0.348	0.354	0.401	0.495	0.611	0.355
Districts	808	808	765	765	765	774
Additional Cohort Compar	risons					
Young adults vs. Young	0.027	0.018	-0.028	-0.018	0.014	0.006
Two-sided p-value	0.0239	0.0019	0.0001	0.0126	0.0274	0.0900
Adults (26-40) vs. Young	0.037	0.020	-0.047	-0.039	0.025	0.005
Two-sided p-value	0.0107	0.0113	0.0000	0.0005	0.0088	0.1589

^{***} p<0.01, ** p<0.05, * p<0.1. Robust standard errors clustered by district in parentheses.

All models restrict to communities with less than 10,000 people.

Column 6 turns to participation in a core institution in rural communities: *rondas* campesinas. These are local citizen policing groups that perform various functions, such as conducting night watches and settling disputes among community members. These groups proliferated once the government endorsed them in the late 1980s during the Shining Path insurgency and most have since come under firm communal government control. Its members are typically well-respected and trusted community members. While all age cohorts born before recognition are more likely to participate in a *ronda campesina* than individuals born after recognition, the magnitude of the effects are twice as large for adults at the time of recognition.

As in Table 1, the Table 2 results indicate a clear trend across cohorts rather than a sharp discontinuity, with the largest effects consistently concentrated among adult and near-adult

groups at the time of recognition. The bottom rows of Table 2 present some additional cross-cohort comparisons of interest. Nearly all of these narrower comparisons are also statistically significant, suggesting how the effects stack up over time. The differences between young adults and the young are discernible across all outcomes, and differences between adults age 26-40 and the young are discernible for all but participation in a *ronda campesina*, though even this one is quite close.

Table 3 presents placebo tests for the land and community life mechanism. These analyses leverage the fact that although collective community land titles to communal resources typically follow after recognition, in some cases communities never received a land title. These are places where recognition does not confer as much land security and should not increase demand for land and community life to the same extent. Consistent with this, Table 3 indicates no robust cross-cohort effects among these communities.

Table 3. Placebo Tests Using Untitled Communities

	Self-Identifies	Community	Feels	Trust in
	with	Member	Democracy	Regonal
	Community		Works Well	Government
Age at Recognition				
Young (0-12)	0.018	0.064*	-0.030	-0.040
	(0.021)	(0.037)	(0.042)	(0.035)
Teenagers (13-17)	0.033	0.103*	-0.025	0.004
	(0.028)	(0.056)	(0.064)	(0.048)
Young adults (18-25)	-0.004	0.065	0.028	0.015
	(0.033)	(0.058)	(0.075)	(0.056)
Adults (26-40)	0.020	0.080	0.022	0.103*
	(0.031)	(0.076)	(0.068)	(0.059)
Adults (41-65)	0.014	0.088	0.055	0.046
	(0.048)	(0.094)	(0.084)	(0.060)
Controls				
Native mother tongue	0.073***	0.072***	0.035*	-0.015
	(0.019)	(0.024)	(0.020)	(0.024)
Female	-0.001	-0.013***	0.014**	-0.015*
	(0.004)	(0.004)	(0.006)	(0.009)
Constant	0.521*	0.469**	2.995***	2.149***
	(0.271)	(0.223)	(0.092)	(0.059)
Year of birth FE	YES	YES	YES	YES
District FE	YES	YES	YES	YES
Observations	16,265	11,521	13,200	13,134
R-squared	0.143	0.540	0.089	0.093
Districts	135	131	135	135

^{***} p<0.01, ** p<0.05, * p<0.1. Robust standard errors clustered

by district in parentheses.

Table 4 presents a final piece of evidence linked to the importance of land and land scarcity in shaping the effects of recognition. This table returns to the full set of communities and the dependent variables from Table 1 but splits the sample into communities within the highlands Sierra region and communities on Peru's coast.²⁸ Land is particularly important to community life – and land constraints are particularly acute – in the rugged highlands where land quality is relatively poor and irrigation very limited despite the importance of agricultural and pastoralist lifestyles (Caballero and Álvarez 1980, Jacobsen 1993). Coastal communities, by contrast, are more likely to have corporate bodies and businesses through which members earn income and livelihoods (Mendoza 2004). This makes land and land constraints less salient on the coast.

Table 4. Impacts of Recognition in the Highlands Versus the Coast

	Highlands				Coast			
	Self-Identifies with Community	Community Member	Feels Democracy Works Well	Trust in Regonal Government	Self-Identifies with Community	Community Member	Feels Democracy Works Well	Trust in Regonal Government
Age at Recognition								
Young (0-12)	0.014*	0.029***	0.019*	-0.007	-0.023	-0.007	-0.032	-0.024
	(0.008)	(0.011)	(0.010)	(0.011)	(0.015)	(0.035)	(0.021)	(0.034)
Teenagers (13-17)	0.019**	0.055***	0.023	0.025	-0.033	0.003	-0.038	-0.012
	(0.010)	(0.014)	(0.014)	(0.016)	(0.024)	(0.051)	(0.034)	(0.047)
Young adults (18-25)	0.018*	0.051***	0.045***	0.029*	-0.070***	-0.001	0.044	0.079*
	(0.010)	(0.016)	(0.016)	(0.016)	(0.023)	(0.058)	(0.032)	(0.043)
Adults (26-40)	0.042***	0.048**	0.057***	0.063***	-0.035	-0.005	0.053	-0.068
	(0.012)	(0.019)	(0.017)	(0.018)	(0.041)	(0.080)	(0.045)	(0.054)
Adults (41-65)	0.053***	0.042*	0.082***	0.047*	-0.119***	-0.047	-0.021	-0.004
	(0.017)	(0.026)	(0.021)	(0.024)	(0.041)	(0.103)	(0.065)	(0.073)
Controls								
Native mother tongue	0.072***	0.098***	0.065***	-0.021**	0.004	0.032	0.006	0.001
	(0.008)	(0.016)	(0.009)	(0.010)	(0.019)	(0.023)	(0.061)	(0.040)
Female	0.001	-0.018***	0.013***	-0.005*	-0.001	-0.007**	0.004	-0.006
	(0.002)	(0.002)	(0.003)	(0.003)	(0.003)	(0.003)	(0.007)	(0.008)
Constant	0.051	0.408	2.243***	1.284***	0.040	-0.090	2.992***	0.841***
	(0.152)	(0.280)	(0.502)	(0.300)	(0.028)	(0.064)	(0.037)	(0.074)
Year of birth FE	YES	YES	YES	YES	YES	YES	YES	YES
District FE	YES	YES	YES	YES	YES	YES	YES	YES
Observations	140,235	99,412	110,417	109,224	21,485	18,026	20,023	19,526
R-squared	0.133	0.454	0.073	0.075	0.151	0.372	0.065	0.059
Districts	798	784	794	795	464	399	439	437

^{***} p<0.01, ** p<0.05, * p<0.1. Robust standard errors clustered by district in parentheses.

Accordingly, Table 4 indicates strong intergenerational effects of recognition in the highlands. By contrast, there are no consistent discernible patterns among age cohorts within

 28 I define highlands areas as districts above 1,500 meters above sea level.

35

coastal communities.

ALTERNATIVE EXPLANATIONS

There are two main alternative explanations that could undercut the argument that the effects of community recognition vary across age groups within communities due to land access and associated investment in community life: wealth effects and cohort-based artifacts of organizational efforts linked to recognition.²⁹

Community recognition may not only increase demand for community land and shape investment in community life through land ownership. It may also channel greater ad hoc benefits to communities such as access to selected government spending programs, though there are no comprehensive or enduring catch-all programs for communities. Adults and near-adults at the time of recognition may be best positioned to capture these benefits and do so in ways that give them enduring power and advantages within the community. They may have especially strong incentives to identify with their community to win other benefits, can use them to shape local democracy to their advantage, and foster links to regional bureaucracies that enhance their reported confidence in government. Wealth may also foster attitudinal and value shifts that directly impact identity and civic engagement.

Column 1 of Table 5 tests this proposition using data on annual household expenditures to proxy for wealth.³⁰ Contrary to this alternative, adults at the time of recognition are *less wealthy* than individuals born post-recognition by an estimated 5-11% depending on the cohort. That these

_

²⁹ I also examined three other alternatives: experiences with discrimination, democratic "learning," and consequences from Peru's internal war with Shining Path from 1980-2000. I do not find evidence in favor of these (see Appendix).

³⁰ ENAHO does not contain comprehensive information on access to government spending programs, though individuals can report receiving benefits from a few selected programs like Comedor popular or Vaso de leche. Results for these indicate no cross-cohort differences.

cohorts have larger landholdings but less wealth is consistent with working in agriculture and investing in community life, which is not lucrative compared to outside opportunities but which does deeply shape the nature of involvement in local governance. This finding, however, raises the question of whether adults who gain more land post-recognition are passing on financial benefits to their children. While this may happen to a degree, it is equally plausible that younger generations, forced out of agriculture due to land scarcity, pursue employment in somewhat more lucrative non-agricultural sectors. Regardless, their community ties are weaker and they have a poorer evaluation of government. This suggests that the salutary effects of recognition on indigenous identification and views of government may be fleeting, a point I return to in the conclusion.

A second alternative is that the organization required to petition the state for recognition shapes adults or has selection effects among adults that then quickly become community members and invest in community life. The adult groups that organize to protect community resources and win recognition may be more dedicated to community life, agriculture, and deliberation through community assemblies than subsequent cohorts who are not involved in this process. Several pieces of evidence, however, suggest this does not drive the findings. There is typically a lag between the initial steps to gain community autonomy and government recognition. While systematic data are unavailable, case studies indicate that this can range from several years to many decades (Diez Hurtado 2012). Recognition requires the absence of opposition from neighboring groups and top-down action from willing state actors. ³¹ Local opposition can cause considerable delays. And that recognition has tended to happen in waves suggests that a favorable state response is not guaranteed, posing an external constraint to any given case. Consequently, age cohorts at the

-

³¹ Part of the petitioning process requires acknowledgment from neighboring groups regarding community boundaries.

time of recognition typically capture different individuals from initial organizers. Furthermore, the Table 3 placebo tests are more consistent with a land rather than organization mechanism since organization would have occurred even in those untitled communities.

Table 5. Alternative Explanations

Alternative:	(i) Wealth	th (ii) Organizational Efforts				
	Annual	Self-Identifies	Community	Feels	Trust in	
	Household	with	Member	Democracy	Regonal	
	Expenditure	Community		Works Well	Government	
Age at Recognition						
Young (0-12)	-0.007	0.011	0.026**	0.011	-0.003	
	(0.011)	(0.007)	(0.011)	(0.009)	(0.011)	
Teenagers (13-17)	-0.015	0.017*	0.050***	0.019	0.027*	
	(0.015)	(0.009)	(0.014)	(0.014)	(0.015)	
Young adults (18-25)	-0.053***	0.011	0.044***	0.044***	0.036**	
	(0.017)	(0.010)	(0.017)	(0.015)	(0.015)	
Adults (26-40)	-0.074***	0.036***	0.037*	0.056***	0.059***	
	(0.020)	(0.012)	(0.020)	(0.016)	(0.018)	
Adults (41-65)	-0.113***	0.042**	0.030	0.076***	0.049**	
	(0.028)	(0.017)	(0.026)	(0.021)	(0.024)	
Controls						
Native mother tongue	-0.150***	0.073***	0.094***	0.062***	-0.023**	
	(0.013)	(0.008)	(0.016)	(0.010)	(0.011)	
Female	-0.037***	0.000	-0.017***	0.013***	-0.006**	
	(0.003)	(0.001)	(0.002)	(0.002)	(0.003)	
Constant	8.040***	0.072	0.481**	1.558***	1.415***	
	(0.389)	(0.177)	(0.220)	(0.024)	(0.425)	
Year of birth FE	YES	YES	YES	YES	YES	
District FE	YES	YES	YES	YES	YES	
Observations	181,578	155,321	112,920	124,920	123,231	
R-squared	0.433	0.168	0.537	0.069	0.083	
Districts	859	802	789	799	800	

^{***} p<0.01, ** p<0.05, * p<0.1. Robust standard errors clustered by district in parentheses.

Columns 2-5 drop communities that filed 1920s petitions of complaint to the state.

Nonetheless, to test the organization alternative more directly, I code data from Kapsoli and Reateguí (1987) on several hundred community petitions of complaint to the Trusteeship of the Indian Race (*Patronato de la Raza Indígena*) in the 1920s – a decade of notable community action – over treatment by landowners or state officials.³² These petitions were filed by the most organized and mobilized communities which could muster the resources for legal petitions. They

-

³² I also investigated potential political socialization around land activism by examining areas that experienced major land-related uprisings in the early 1960s and comparing individuals age 18-30 at the time against younger people 0-17 less likely to be involved. There were no effects on the main dependent variables.

are the most likely candidates of robust subsequent social organization and mobilization for quick recognition once they pursue it, whereas communities that did not file such petitions are less likely to be as organized. Columns 2-5 of Table 5, however, show that the main findings remain robust among communities that *did not* file early petitions.³³

CONCLUSION AND IMPLICATIONS

Governments around the world have grappled with – and continue to grapple with – how to reconcile with their indigenous communities. Collective recognition of indigenous claims to land and traditional authority is a central policy. This paper finds that an ambitious and longstanding program of indigenous community recognition in Peru supports indigenous community self-identification, community membership, positive views of democratic functioning, and confidence in government. But the effects are present mainly among adults and near-adults at the time of recognition and they wane or even disappear for younger cohorts. I attribute this to the fact that adults and near-adults are best positioned to win greater access to scarce community land and invest in community life in the years immediately following recognition.

The findings hold important implications for the treatment of indigenous communities, land restitution, and land use. Indigenous communities around the globe have faced land dispossession and exploitation through colonial and postcolonial attempts at extermination, assimilation, and marginalization. This has dramatically reduced, and in some cases entirely eliminated, traditional landholdings and homelands. Distributing more land to these communities

_

³³ The main findings are also not stronger among early petition communities. I further tested this using additional data on 1900s-1960s community social movements/protests and find similar results among communities that did not engage in either social movements or petitions (see Appendix).

is complicated and expensive. Many are now hemmed in by private property owners whose property rights are supported by governments. Granting land back to communities in those cases requires negotiating with and compensating private property owners. As countries such as Colombia and South Africa have shown, that can be done, but it is a slow and arduous process that is complicated by political resistance and tight budgets. And in cases where indigenous communities neighbor one another, there simply is no extra land to go around.

Recognizing and supporting what remains within communities can have enduring consequences, but it is not sufficient to reconstitute vibrant communities and identities. Scarcities in core resources like land mean that not all would-be community members have a realistic opportunity to fully partake in community life. As those first in line access scarce benefits and hold onto them, other individuals could benefit from additional policies of support and restitution, such as in-kind payments along the lines being made available in South Africa for victims of land dispossession, in order to eliminate the negative consequences of scarcity within communities. Where this is politically or financially infeasible, there are other community-level solutions available. Public or public-private investments in more efficient land use and management could make more resources available to go around. Governments could encourage a shift in customary decision-making around land allocation that results in more equitable distribution across generations, though many communities are rightfully wary of interference in their governance. More palatable might be working with communities to provide resources and opportunities, both material and cultural, to meaningfully engage and cohere younger postrecognition generations in day-to-day governance and community life.

Without addressing these intergenerational issues, the findings in this paper suggest fleeting benefits to community recognition. Recognition can support collective identity,

community engagement, and views of governance in the short to medium term, driven by its effects among adult and near-adult age cohorts at the time of recognition. But these effects are not necessary passed on to subsequent generations when there is land scarcity and population growth. In the long term, it may even dilute community life by fostering detachment among the next generation.

Along these lines, the findings also raise important considerations for future studies of the consequences of indigenous recognition. Attention to the intergenerational consequences of recognition is important if scholars and policymakers are to appropriately gauge net impact. For instance, if recognition policies are recent and effects are measured only among adults, as is frequently the case, that may overestimate long-term consequences by failing to consider how access to benefits can attenuate among subsequent cohorts.

REFERENCES

Albertus, Michael. 2021. Property Without Rights. Cambridge University Press.

Behr, Daniela. 2018. "The Developmental Consequences of the De Jure State-Traditional Relationship." Working Paper.

Benton, Allyson Lucinda. 2012. "Bottom-up Challenges to National Democracy: Mexico's (Legal) Subnational Authoritarian Enclaves." *Comparative Politics* 44(3): 253-271.

Bonfiglio, Giovanni. 2017. "Las Municipalidades de Centro Poblado en el Perú." Mimeo.

Caballero, José María, and Elena Álvarez. 1980. Aspectos cuantativos de la reforma agraria, 1969–1979. Lima: Instituto de Estudios Peruanos.

Carter, Christopher. 2021. "The representational effects of communal property: Evidence from Peru's indigenous groups." *Comparative Political Studies* 54(12): 2191-2225.

Chatterjee, Rohan. 2023. When A World Moves On: Land, Life and Struggle in the Peruvian Andes. PhD Dissertation, University of Chicago.

Cuskelly, Katrina. 2011. Customs and Constitutions: State Recognition of Customary Law around the World. Bangkok: International Union for Conservation of Nature and Natural Resources.

Dahl, Robert. 1998. On Democracy. New Haven: Yale University Press.

De la Cadena, M. 2000. *Indigenous Mestizos: The politics of race and culture in Cuzco, Peru, 1919-1991*. Duke University Press.

Del Pozo, Ethel. 2004. De la hacienda a la modernización. Lima: IFEA.

Diez, Alejandro. 2012. "Gobierno comunal: Entre la propiedad y el control territorial. El caso de la comunidad de Catacaos." In Raúl Asensio, Fernando Eguren, and Manuel Ruiz, eds., *Perú: El problema agrario en debate. S*EPIA XIV, Lima, pp. 115-148.

Diez Hurtado, Alejandro. 2012. *Tensiones y Transformaciones en Comunidades Campesinas*. Lima: CISEPA-PUCP.

Duflo, Esther. 2001. "Schooling and labor market consequences of school construction in Indonesia." *American Economic Review* 91(4): 795-813.

Fierro, Jaime. 2020. "Indigenous people, recognition, and democracy in Latin America." *Ethnic and Racial Studies* 43(15): 2746-2765.

Fontana, Lorenza. 2022. Recognition Politics. Cambridge University Press.

Fukuyama, Francis. 2018. *Identity: The Demand for Dignity and the Politics of Resentment*. New York: Farrar, Straus and Giroux.

Holzinger, Katharina, Roos Haer, Axel Bayer, Daniela Behr, and Clara Neupert-Wentz. 2018. "The Constitutionalization of Indigenous Group Rights, Traditional Political Institutions, and Customary Law." *Comparative Political Studies* 52 (12): 1775–809.

Hooker, Juliet. 2005. "Indigenous inclusion/black exclusion: Race, ethnicity and multicultural citizenship in Latin America." *Journal of Latin American Studies* 37(2): 285-310.

INEI. 2014. Características socioeconómicas del productor agropecuario en el Perú. IV Censo Nacional Agropecuario 2012. Lima: INEI.

INEI. 2017. Perú: Condiciones de vida de la población según origen étnico. Lima: INEI.

Jacobsen, Nils. 1993. *Mirages of Transition: The Peruvian Altiplano, 1780-1930*. Berkeley: University of California Press.

Kapsoli, Wilfredo, and Wilson Reateguí. 1987. *El campesinado peruano*, 1919-1930. Universidad de San Marcos.

Leon, Gianmarco. 2012. "Civil conflict and human capital accumulation the long-term effects of political violence in perú." *Journal of Human Resources* 47(4): 991-1022.

Loveman, Mara. 2014. *National colors: Racial classification and the state in Latin America*. Oxford University Press.

Madrid, Raúl. 2012. The Rise of Ethnic Politics in Latin America. Cambridge University Press.

Mallon, Florencia. 1983. *The Defense of Community in Peru's Central Highlands*. Princeton University Press.

McClintock, Cynthia. 1981. *Peasant Cooperatives and Political Change in Peru*. Princeton University Press.

McMurry, Nina. 2022. "From Recognition to Integration: Indigenous Autonomy, State Authority, and National Identity in the Philippines." *American Political Science Review* 116(2): 547-563.

Mendoza, Román Robles. 2004. "Tradición y modernidad en las comunidades campesinas." *Investigaciones Sociales* 8(12): 25-54.

Naganoma, Claudia. 2012. "Procesos de formación y transformación de comunidades campesinas." In Diez Hurtado, Alejandro, ed., *Tensiones y Transformaciones en Comunidades Campesinas*, pp. 39-72. Lima: CISEPA-PUCP.

Norris, Pippa. 2008. *Driving Democracy: Do Power-Sharing Institutions Work?* Cambridge University Press.

Postero, Nancy. 2007. *Now we are citizens: Indigenous politics in postmulticultural Bolivia*. Stanford University Press.

Remy, María. 2013. *Historia de las comunidades indígenas y campesinas del Perú*. Lima: Instituto de Estudios Peruanos.

SICCAM. 2016. *Directorio de comunidades campesinas del Perú*. Lima: Instituto del Bien Común and Centro Peruano de Estudios Sociales.

Seligmann, Linda. 1995. Between Reform and Revolution: Political Struggles in the Peruvian Andes, 1969–1991. Stanford: Stanford University Press.

Sieder, Rachel. 2002. "Recognizing indigenous law and politics of state formation in Mesoamerica." In Rachel Sieder, ed., *Multiculturalism in Latin America*, pp. 184–207. London: Palgrave/Macmillan.

Telles, Edward. 2014. *Pigmentocracies: Ethnicity, race, and color in Latin America*. University of North Carolina Press.

Thiesenhusen, William, ed. 1989. Searching for Agrarian Reform in Latin America. Boston: Unwin Hyman.

Tilly, Charles. 1992. Coercion, Capital and European States, A.D. 990–1992. Cambridge: Wiley-Blackwell.

Trejo, Guillermo, and Melina Altamirano. 2016. "The Mexican Color Hierarchy," in Juliet Hooker and Alvin Tillery, eds., *Racial and Class Inequalities in the Americas*. Washington, DC: American Political Science Association.

Van Cott, Donna Lee. 2005. "Building Inclusive Democracies: Indigenous Peoples and Ethnic Minorities in Latin America." *Democratization* 12(5): 820–837.

Van Cott, Donna Lee. 2008. Radical democracy in the Andes. Cambridge University Press.

Yashar, Deborah. 2005. Contesting Citizenship in Latin America. Cambridge University Press.

Appendix

Indigenous Community Recognition, Identity, and Democracy: Evidence from Peru

Contents

I. Descriptive Statistics	1
II. Constructing Community Polygons	1
III. Communities and Populations Represented in ENAHO Sample	2
IV. Distribution of Sampled Individuals by Community	5
V. ENAHO Survey Questions for Main Outcomes in Analysis	5
VI. Additional Details on Process of Recognition	6
VII. Outcomes by Age at Time of Recognition Versus Year of Birth	6
VIII. Addressing Migration and the Presence of Outsiders	8
IX. Robustness to Adding Community-Level Controls	11
X. Robustness of Organizational Alternative to Data on Social Movements	12
XI. Additional Alternative Explanations	13
XII. Broader Effects of Recognition	15

I. Descriptive Statistics

Variable	Obs.	Mean	Std. Dev.	Min	Max
How well democracy works (1=very bad, 4=very good)	134,869	2.44	0.66	1	4
Trust in regional government (1=none, 4=a lot)	133,107	1.7	0.78	1	4
Self-identifies with community	166,623	0.34	0.47	0	1
Community member	121,090	0.58	0.49	0	1
Lives in Coast	181,578	0.14	0.35	0	1
Lives in Highlands	181,578	0.83	0.38	0	1
Lives in Amazon	181,578	0.03	0.17	0	1
Born after community recognized	181,578	0.62	0.49	0	1
Young (0-12) when community recognized	181,578	0.15	0.35	0	1
Teenagers (13-17) when community recognized	181,578	0.05	0.21	0	1
Young adults (18-25) when community recognized	181,578	0.06	0.24	0	1
Adults (26-40) when community recognized	181,578	0.08	0.27	0	1
Adults (41-65) when CC was recognized	181,578	0.05	0.21	0	1
Log size of land owned (hectares)	181,578	0.57	0.74	0	6.9
Works on agricultural activities dummy	181,578	0.72	0.45	0	1
Got land from inheritance	170,784	0.49	0.50	0	1
Has land as owner	178,531	0.62	0.49	0	1
Has land as community member	170,784	0.32	0.47	0	1
Belongs to a ronda campesina	172,678	0.05	0.22	0	1
Log household annual expenditure (soles)	181,578	9.39	0.75	4.8	12.2
Filed 1920s petition of complaint	181,578	0.07	0.25	0	1
Native mother tongue	181,578	0.51	0.5	O	1
Female	181,578	0.52	0.5	O	1

II. Constructing Community Polygons

The most comprehensive and reliable source of community boundaries comes from a shapefile produced by the IBC. The IBC maps boundaries for 4,236 (69%) of Peru's 6,138 communities. I extend this data source in two ways. First, I build on it using a recent map of communities produced by COFOPRI. This map has very high overlap with the IBC data and adds a cartographic basis for an additional 64 communities (1% of all communities).

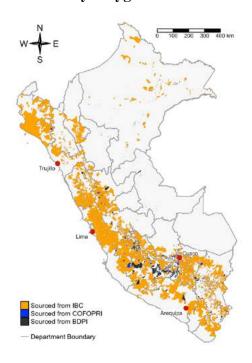
Next, I turn to data from the Ministry of Culture's Database of Indigenous Communities (BDPI). The BDPI provides a list of populated areas that pertain to each indigenous community. I first matched indigenous communities from the BDPI data to the SICCAM dataset described in the paper based on department, province, district, and community names. From this data merge and the geolocation of populated areas from BDPI, I create an additional series of community polygons that incorporate populated areas uniquely assigned to a community with a one-kilometer buffer around them.

These polygons were created through an iterated process described below. They cover 1,379 communities (23% of all communities).

- 1. Identify polygons drawn from BDPI data that do not overlap IBC/Cofopri polygons and that do not overlap with each other. There are 465 of these polygons, constituting 8% of all communities.
- 2. Identify polygons drawn from BDPI data that intersect partially but not entirely with IBC/Cofopri polygons. This could occur because of the convexity of polygons created using BDPI data based on populated areas or if a community has a border conflict with an existing community that is fully mapped and verified by IBC/Cofopri. Most of these overlaps are small compared to overall community polygons. I "cut" the overlapping portion of these polygons, giving priority to the IBC/Cofopri polygons with precisely delimited boundaries. There are 302 of these polygons, constituting 5% of all communities.
- 3. Identify polygons drawn from BDPI data that overlap partially with other polygons drawn from BDPI. This could again occur because of the convexity of polygons using BDPI data or because of border disagreements. I split the intersecting part equally in these cases and assign it to the nearest polygons. There are 601 of these polygons, constituting 10% of communities.
- 4. Identify polygons drawn from BDPI data that are entirely contained within IBC/Cofopri polygons. These occur when there are single communities that split but are not reflected in the IBC/Cofopri data. They are quite rare, making up only 11 polygons, or 0.2% of communities.

The map below displays all of the identified community polygons in Peru based on the data source used the calculate them.

Community Polygons Based on Data Source



III. Communities and Populations Represented in ENAHO Sample

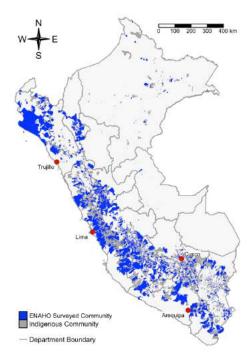
ENAHO is a highly regarded household survey conducted by the National Statistics Institute (INEI) that is widely used for policymaking and in academic scholarship on issues like poverty

and education. ENAHO is conducted using stratified random sampling based on population areas and is independent in each of Peru's 24 departments. The sampling frame used for selection is based on complete census information along with current cartographic information. In urban areas, the primary sampling units are towns with more than 2,000 inhabitants; the secondary units are local groupings that have on average 120 houses; the tertiary units are individual households. In rural areas, there are two primary sampling units: towns with 500-2,000 individuals and blocks of rural areas that have on average 100 houses. The secondary units are accordingly twofold: in the first set, local groupings that have on average 120 houses; in the second set, individual households. The tertiary units for the first group are in turn individual households. Further details are available in ENAHO documentation. See, for instance, ENAHO, 2016, "Ficha Técnica: Encuesta Nacional de Hogares," Lima, Peru: INEI.

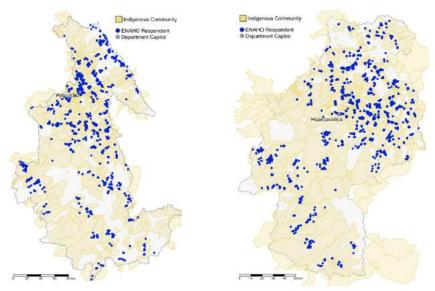
The ENAHO sample used in the paper contains 182,111 respondents from identified communities and covers 1,763 recognized communities for which polygons can be constructed. Of this sample, 79 individuals are dropped because recognition year for their community could not be verified. Another 454 individuals age 65 or older at the time of recognition are dropped since this category is less relevant theoretically and there are too few of them in the sample to include them in the estimations.

The following map indicates which communities are in the ENAHO sample. There is broad spatial coverage of communities in the ENAHO sample.

Communities in ENAHO Sample

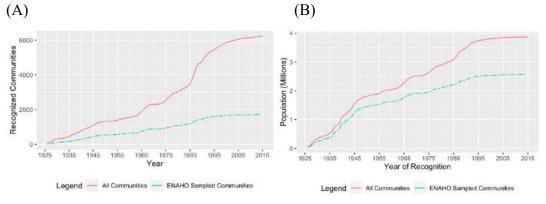


The following maps zoom in on ENAHO sampling and community boundaries in Ayacucho (left) and Huancavelica (right). Again the maps indicate good spatial coverage. Unsampled communities tend to be smaller in size.



The figure below indicates how the ENAHO sample of communities compares to the overall sample in terms of the number of communities and population of those communities by year of recognition. Subfigure (A) indicates the number of communities in the ENAHO sample by year of recognition compared to recognition across all communities. ENAHO covers communities recognized across the whole temporal spectrum of recognition, and in relatively similar proportion by year, though the share of communities recognized in the sample is lower starting around the 1990s with the increase in communities at that period. Subfigure (B) indicates overall community populations circa 2007 in the ENAHO sample of communities by year of recognition. These populations are calculated using individual-level population census data from 2007, including the community these individuals reside in. (Data on contemporaneous community population are unavailable in any official records and cannot be reconstructed from census data.) It then tracks the year of recognition for these individuals' communities. This figure indicates that communities recognized earlier in the process, especially in the 1940s and 1950s, tended to be more populous than communities recognized more recently. Communities recognized in the late 1980s and 1990s tended to be relatively smaller communities by population. Overall, subfigure (B) indicates that communities represented in the ENAHO sample cover a large portion of the population living in communities across year of recognition.

Communities and Populations (Circa 2007) Represented in ENAHO Sample by Year of Recognition

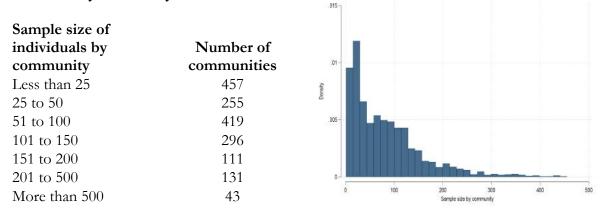


The table below presents these data in a different way. It shows the number of sampled individuals who reside within communities according to the time period in which their community was recognized. More recently recognized communities do not contribute as much to the estimates because there are few individuals born after or just before recognition who are of age to be surveyed by 2007 in communities recognized after 1990.

Date of			
recognition	Freq.	Districts	Communities
Period 1921-1940	45,757	260	292
Period 1941-1950	40,523	233	243
Period 1951-1960	13,052	97	96
Period 1961-1970	23,839	183	249
Period 1971-1980	14,419	147	200
Period 1981-1990	27,343	232	379
Period 1991-2000	13,900	145	213
Period 2001-2010	2,236	29	38
Period 2011-2016	509	11	11
Total	181,578	859	1721

IV. Distribution of Sampled Individuals by Community

The table below indicates the sample size of individuals by community that are captured in ENAHO surveys used in the paper. The histogram below is a density plot of the sample size of individuals by community.



V. ENAHO Survey Questions for Main Outcomes in Analysis

Self-identification with community: "With which group (community) do you feel most identified with? (1) Your department, province, district, or town; (2) Your ethnicity or race; (3) Your peasant or indigenous community; (4) Your religious group or position; (5) Other."

Community member: "Are you or is one of the household members inscribed in a peasant community?"

Feels democracy works well: "In the country, democracy functions: (4) very well; (3) well; (2) poorly; (1) very poorly; (5) don't know."

Trust in regional government: "Do you have confidence in regional government? (4) a lot; (3) some; (2) little; (1) none; (5) don't know."

VI. Additional Details on Process of Recognition

Community recognition is both a bottom-up and a top-down process. It requires action from a community, but it also critically depends on favorable national environment. And it requires the consent of neighboring groups, who need to affirm that the petitioning community's boundaries are accurate. Most processes take years and it is not easy to anticipate the timing of the final outcome. While systematic data are unavailable, case studies indicate that this can range from several years to many decades (Diez Hurtado 2012). This implies that age cohorts at the time of recognition typically capture different individuals from initial organizers. And it casts doubt on the alternative explanation that the organization required to petition the state for recognition shapes adults or has selection effects among adults that then quickly become community members and invest in community life. Below are additional official details of the recognition process according to SUNARP (the National Superintendence of Public Registry).



Requisitos para iniciar el trámite de reconocimiento de una comunidad campesina

Antes de iniciar el proceso de titulación, la comunidad tiene que estar reconocida como comunidad campesina por la Dirección Regional Agraria (DRA) de su gobierno regional. Para ello, el presidente de la comunidad debe presentar una solicitud dirigida a la DRA, adjuntando los siguientes documentos:

- Copias legalizadas de las actas de Asamblea General, donde se acuerda solicitar su inscripción como Comunidad Campesina, precisando el nombre; la aprobación del Estatuto de la Comunidad y la elección de la Directiva Comunal.
- Copia del DNI del presidente comunal elegido por asamblea
- Censo de poblacional: Padrón o lista de todas familias que viven en la comunidad.
- Croquis del territorio comunal con indicación de linderos y colindantes.

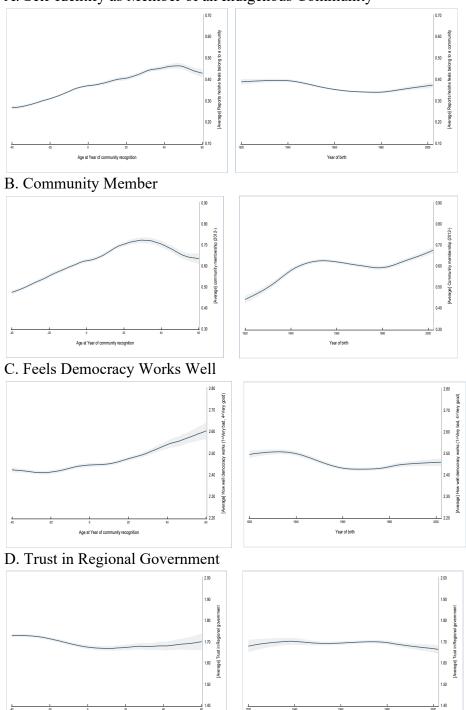
Con este documento de reconocimiento, la comunidad tiene que registrarse como persona jurídica en SUNARP. Luego, los comuneros deben comunicar a la DRA que su comunidad aún no tiene un título, para que el Gobierno Regional asigne fondos al proceso de deslinde y titulación de su comunidad.

VII. Outcomes by Age at Time of Recognition Versus Year of Birth

The following figure compares the main outcomes of interest by age at the time of community recognition versus year of birth. In particular, self-identification as part of an indigenous community, community membership, and views that democracy works well clearly indicate cohort-based trends with respect to the time of community recognition. That is indicated by the notable positive slopes for these variables in the lefthand side figures. That the lefthand side

figures clearly differ in shape and take larger values for certain age cohorts than the righthand side figures, which merely show time trends in these variables by a respondents' year of birth, is strongly suggestive of the age cohort-level effects of recognition. These trends are also present for trust in regional government in part (D), albeit to a lesser degree.

A. Self-Identify as Member of an Indigenous Community



Year of birth

VIII. Addressing Migration

As the paper indicates, I use current community of residence to proxy for which community an individual lived in at the time of recognition since the latter are not available. Given the research design and ENAHO survey data, it is not possible to track survey respondents who were born into communities but later left them back to those same communities. At the same time, there are some communities whose boundaries incorporate outsiders who may not be impacted by recognition. This section of the appendix attempts to gauge these concerns, bound their likely impacts, and provide some robustness tests. The analyses in the paper that restrict the sample to more rural communities with less than 10,000 people also help to address some of these concerns because these communities tend to be particularly stable, especially from the point of view of containing few outsiders.

A. Analyzing sample composition by age and recognition exposure to assess emigration

If community recognition is strongly shaping emigration differentially by age cohort, then the sample composition should differ systematically as a function of age and recognition exposure. For instance, if it is inducing out-migration among younger and post-recognition cohorts, then we should later see fewer of these individuals in communities compared to cohorts that were adults at the time of recognition. One way to assess that is to examine whether the sample composition and the ratio of people who are younger to older shifts as we look at communities recognized a long time ago versus more recently. For more recently recognized communities, say those recognized in the 1990s, people who are age 18-25 at the time of the ENAHO survey would have been young at the time of recognition or born after it. They should be at the prime time of life for out-migration if a lack of land access is entirely driving them away. Meanwhile, individuals who are in their late 20s or older from these communities at the time of ENAHO would have experienced recognition as teenagers or adults and had more incentives to stay. If out-migration is strongly operating, that should be reflected in these age cohort ratios. Now consider communities recognized in the distant past, say in the 1940s. Individuals who are age 18-25 at the time of the ENAHO survey would have been born after recognition. However, the same is true of adults from age 26 into their 70s, and anyone older would have been young at the time of recognition. In other words, if recognition shaped out-migration in these areas, by the time of the ENAHO survey any adult-young gap in migration from the time of recognition should have been erased since older adults at the time of recognition had died. That implies that compared to these communities with earlier recognition, the ratio of young people to older people in more recently recognized communities should distinctly decline.¹

I. Sample composition by age at survey and time of recognition within communities:

Decade of recognition	18 - 25 at Enaho	26 - 40 at Enaho	41 - 64 at Enaho	+65 at Enaho	Total	Young/adult ratio
	(1)	(2)	(3)	(4)		
Period 1921-1940	8,261	12,068	17,726	7,702	45,757	28%
Period 1941-1950	7,142	10,579	15,885	6,917	40,523	27%
Period 1951-1960	2,321	3,279	5,186	2,266	13,052	27%

¹ There are comparatively fewer communities to examine this dynamic for (and therefore fewer sampled individuals) in communities very recently recognized in the 2000s or later.

Period 1961-1970	3,869	5,656	9,631	4,683	23,839	25%
Period 1971-1980	2,536	3,548	5,783	2,552	14,419	27%
Period 1981-1990	4,889	7,214	10,900	4,340	27,343	27%
Period 1991-2000	2.424	3.744	5.533	2.199	13.900	26%

The table above, however, indicates that the ratio of individuals age 18-25 at the time of the ENAHO survey compared to individuals age 26-64 is basically constant across decades of recognition from the earliest recognitions through the 1970s, 1980s, and even into the 1990s. That casts doubt on major differentially induced out-migration by age in younger post-recognition cohorts. To the extent that it operates at all, it is probably on the order of at most about a percentage point.

In addition to looking at whether the young/adult ratio within communities diminishes for communities with more recent recognitions, another potentially relevant baseline comparison for the young/adult ratio in communities is the young/adult ratio in nearby rural areas that neighbor communities. The next table below examples the ENAHO sample composition in non-community rural towns by age at the time of survey and the time of nearby community recognition. This is based on data from a sample of 59,093 rural individuals from the same districts as communities sampled by ENAHO but who live outside communities. I define rural individuals as those living in towns with less than 2,000 people. I then group those individuals into cohorts according to the time of nearby community recognition to ensure that the comparisons are sensitive to potentially shifting broader generational effects. Where there is more than one community recognized in a district, I create age cohorts for rural individuals outside communities based on median community recognition year.

The young/adult ratio in these rural towns is almost exactly the same as the ratio within neighboring communities over time. And the ratio is again fairly constant over time, though it dips slightly for the 1990s period, perhaps linked to a slightly smaller sample in that time period. Again, comparing these two tables does not suggest major differential out-migration in communities among the young, both more generally and with respect to the timing of recognition.

II. Sample composition by age at survey and the time of nearby community recognition in rural areas that neighbor communities.

Decade of recognition	18 - 25 at Enaho	26 - 40 at Enaho	41 - 64 at Enaho	+65 at Enaho	Total	Young/adult ratio
	(1)	(2)	(3)	(4)		
Period 1921-1940	1,263	1,819	2,774	1,205	7,061	27%
Period 1941-1950	1,272	1,839	3,127	1,482	7,720	26%
Period 1951-1960	775	1,192	1,623	566	4,156	28%
Period 1961-1970	1,124	1,599	2,824	1,246	6,793	25%
Period 1971-1980	1,330	1,988	3,067	1,542	7,927	26%
Period 1981-1990	3,719	5,048	7,862	3,163	19,792	29%
Period 1991-2000	869	1,481	2,215	777	5,342	24%

B. Restricting sample to nonmigrants

Another consideration linked to migration is the presence of outsiders. Here I show that the results are similar when restricting the sample to individuals and communities that are least likely to contain outsiders. First, I restrict the sample, as in some of the analyses in the paper, to communities with less than 10,000 inhabitants as calculated using community polygons and individual-level geolocated data from the 2007 census. These are small, mainly rural communities where in-migration from outsiders is less likely. I then further restrict the sample to individuals who still reside in their district of birth, since these are the individuals who are most likely to have remained in their communities for life. This is the only individualized data related

to migration in the ENAHO survey data. The main results are reported to the right. They are largely similar to the main results, and in several cases are stronger. Nonetheless, I do not use this restriction criteria in the main paper for several reasons. First and foremost, people may move into communities and be impacted by recognition dynamics. A common example is women who marry into a community from outside and can become members and access resources through marriage. This restriction would exclude them and other outsiders who move into communities and eventually become members. Secondarily, the nonmigration variable is imperfect in that it cannot capture whether people move into a community from a nearby locale within the same district.

	Self-Identifies with Community	Community Member	Feels Democracy Works Well	Trust in Regonal Government
Age at Recognition				
Young (0-12)	0.012	0.022**	0.036***	0.007
9 (/	(0.008)	(0.011)	(0.012)	(0.013)
Teenagers (13-17)	0.011	0.040***	0.037**	0.058***
9 (/	(0.011)	(0.014)	(0.016)	(0.020)
Young adults (18-25)	0.004	0.033**	0.064***	0.034*
- , ,	(0.011)	(0.015)	(0.016)	(0.019)
Adults (26-40)	0.034**	0.042**	0.079***	0.075***
	(0.013)	(0.018)	(0.018)	(0.023)
Adults (41-65)	0.042**	0.030	0.101***	0.056*
	(0.019)	(0.024)	(0.023)	(0.031)
Controls				
Native mother tongue	0.079***	0.108***	0.050***	-0.027**
	(0.011)	(0.018)	(0.011)	(0.014)
Female	-0.000	-0.022***	0.009**	-0.006
	(0.002)	(0.002)	(0.004)	(0.004)
Constant	0.281	0.433*	1.571***	1.362***
	(0.267)	(0.259)	(0.027)	(0.467)
Year of birth FE	YES	YES	YES	YES
District FE	YES	YES	YES	YES
Observations	87,963	54,323	66,985	66,286
R-squared	0.129	0.435	0.080	0.094
Districts	711	697	706	708

*** p<0.01, ** p<0.05, * p<0.1. Robust standard errors clustered by district in parentheses. All models restrict to communities with less than 10,000 people and to individuals who reside in their district of birth.

C. Examining impacts of recognition by age among people in communities born elsewhere

Finally, I examined whether recognition has differential effects by age on people living in communities who were born in another district. The dependent variable in these tests is whether an individual's current district of residence is not the district of birth. I then ran a similarly specified set of tests to those in the main analysis. Because we are estimating these regressions on people living within communities, this can effectively only capture in-migration. It is worth noting that while these analyses can cast some suggestive light on population movements into communities relative to the time of recognition, they are not a considerable threat to inference given that the analyses in Part (B) of this section above indicates that the results hold (and strengthen somewhat) when dropping these individuals from the analysis.

The table below nonetheless presents some of the key comparisons of coefficients: for the young vs. young adults at the time of recognition, for teenagers vs. young adults, and for teenagers vs. adults age 26-40. These comparisons, while mixed, suggest that in-migration tends to be slightly higher among adults before community recognition. In-migration into already recognized communities is more restricted among the young and those born after recognition. There could

be several dynamics behind this. Perhaps a stronger community identity keeps outsiders out or makes communities more aware of outsiders. There could also be a dynamic through marriage

Migration

could also be a dynamic through marriage markets in that since land access is more scarce post-recognition, it could become harder to attract an outside mate. But again, and in concert with the Part (B) findings above, these dynamics should bias against the identity finding since people from outside are less likely to identify with the community and the narrowed post-recognition baseline of the young at the time of recognition is composed of more "purely" community people. It should also bias against the views of democracy and regional government findings since again, the narrowed youth comparison set is more likely to be community people born and raised and therefore more steeped in and eligible for community governance.

D :	Migration
Pairwise tests of	(Communities
differences between the	< 10,000
coefficients for:	people)
Young - Young adults	-0.023
Two-sided p-value	0.0015
F statistic	10.1
Teenagers - Young adults	-0.007
Two-sided p-value	0.3708
F statistic	0.8
Teenagers - Adults 26-40	-0.021
Two-sided p-value	0.0252
F statistic	5.0

IX. Robustness to Adding Community-Level Controls

The results are robust and very similar when including community-level controls for geography, agricultural suitability, road access, and mining presence. The table below presents the results.

					Communicies	< 10,000 pcop	ic	
	Self-Identifies	Community	Feels	Trust in	Self-Identifies	Community	Feels	Trust in
	with	Member	Democracy	Regonal	with	Member	Democracy	Regonal
	Community		Works Well	Government	Community		Works Well	Governmen
Age at Recognition								
Young (0-12)	0.010	0.026**	0.012	-0.008	0.013*	0.029***	0.019**	-0.006
	(0.007)	(0.011)	(0.009)	(0.010)	(0.007)	(0.010)	(0.010)	(0.011)
Teenagers (13-17)	0.014	0.049***	0.018	0.022	0.019**	0.054***	0.027**	0.029*
	(0.009)	(0.014)	(0.013)	(0.015)	(0.009)	(0.013)	(0.013)	(0.017)
Young adults (18-25)	0.010	0.043***	0.046***	0.033**	0.013	0.047***	0.050***	0.034**
	(0.010)	(0.016)	(0.014)	(0.015)	(0.010)	(0.015)	(0.014)	(0.016)
Adults (26-40)	0.035***	0.039**	0.059***	0.056***	0.039***	0.048***	0.059***	0.063***
` '	(0.012)	(0.019)	(0.015)	(0.017)	(0.012)	(0.018)	(0.015)	(0.018)
Adults (41-65)	0.042**	0.029	0.075***	0.043*	0.048***	0.043*	0.084***	0.044*
, ,	(0.016)	(0.025)	(0.020)	(0.023)	(0.016)	(0.022)	(0.020)	(0.026)
Individual Controls								
Native mother tongue	0.068***	0.086***	0.059***	-0.019*	0.068***	0.087***	0.062***	-0.023**
raure memer tengue	(0.007)	(0.014)	(0.009)	(0.010)	(0.008)	(0.015)	(0.009)	(0.010)
Female	0.000	-0.017***	0.011***	-0.006**	0.001	-0.017***	0.011***	-0.006**
1 cinate	(0.001)	(0.001)	(0.002)	(0.002)	(0.002)	(0.002)	(0.003)	(0.003)
Community Controls	()	()	()	()	()	()	()	()
Elevation	0.000**	0.000**	0.000	-0.000	0.000**	0.000*	0.000	-0.000
Elevation	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)	(0.000)
Slope	0.002	0.004	0.003	-0.001	0.002	0.002	0.003*	-0.000
Stope	(0.002)	(0.003)	(0.002)	(0.002)	(0.002)	(0.003)	(0.002)	(0.002)
Cultivated Land	-0.000	0.003)	0.002)	0.002)	-0.001	0.003)	-0.000	0.002)
Cuntivated Land	(0.001)	(0.001)	(0.001)	(0.002)	(0.001)	(0.002)	(0.001)	(0.001)
Road density	-0.037	-0.113***	-0.024	-0.008	-0.047	-0.143***	-0.045	-0.010
noad density	(0.023)	(0.035)	(0.023)	(0.028)	(0.028)	(0.047)	(0.029)	(0.029)
Active mining	0.096	0.075	0.024	0.002	0.028)	0.047)	0.016	0.005
Active mining	(0.079)	(0.075)	(0.024)	(0.033)	(0.075)	(0.072)	(0.028)	(0.038)
Constant	-0.134	0.057	2.132***	(0.033)	-0.073	0.188	1.413***	1.528***
Constant						(0.294)		
Year of birth FE	(0.172) YES	(0.267) YES	(0.504) YES	(0.311) YES	(0.193) YES	(0.294) YES	(0.112) YES	(0.445) YES
District FE	YES	YES	YES	YES	YES	YES	YES	YES
Observations	166,311	120,894	134,604	132,846	139,924	99,999	110,354	108,748
R-squared	0.164 822	0.539	0.067	0.079	0.141 773	0.470	0.072	0.082
Districts		809	819	820		759	770	771

^{***} p<0.01, ** p<0.05, * p<0.1. Robust standard errors clustered by district in parentheses.

To capture geography, I use mean community elevation and slope. Data are constructed by overlaying 30 arc second (1 km) resolution satellite data from the USGS on community polygons. I use a variable for the share of cultivated land area to tap agricultural suitability. Data are based on overlaying 5 arc-minute resolution satellite data from the Global Agro-Ecological Zones project on community polygons. For road access, I constructed a measure of road density based on community polygon area and the length of national, departmental, and local roads using 2006 data from Peru's Ministry of Transportation. Active mining data for the years covering the ENAHO survey (2007-2020) are constructed based on Peru's mining cadaster database (GeoCatMin), which is maintained and updated by the Instituto Geológico, Minero, y Metalúrgico and contains information on over 52,000 concessions. I calculate active mining based on geolocating approved and active mining rights and overlaying them with community polygons. Across the board, these variables are generally either statistically or substantively insignificant (typically both). Meanwhile, the main results are very similar to those in the paper.

X. Robustness of Organizational Alternative to Data on Social Movements

The test of the alternative explanation of organizational efforts in Table 5 of the paper relies on data on community petitions over mistreatment to the state in the 1920s. This was a decade of considerable community mobilization and action in the early 20th century that took place before official community recognition. But communities also organized against landowners and the state outside of the petitioning process, particularly in the early-mid 1900s. Two regions of especially notable community action were the northern coast, where large export-oriented agricultural enterprises relied on large labor forces, and in the southern Andes region, where there were a series of uprisings and land invasions in the 1950s and 1960s against landowners. Peter Kammann coded these events in his 1982 book, *Movimientos campesinos en el Peru: 1900-1968* (Lima: Universidad Mayor de San Marcos). I linked these data to specific communities. These mobilized communities are, akin with those that petitioned, the more likely candidates of robust subsequent social organization and mobilization for quick recognition once they pursue it. In keeping with this, I then constructed a new measure of community organization as "1" where communities engaged in

either social movements or petitions by combining the Kammann data with the data from Kapsoli and Reateguí (1987) used in the paper. I do not use this as the main measure in the paper because the Kammann data only cover 7 of Peru's departments (those with seemingly more peasant and indigenous organization) whereas the Kapsoli and Reateguí petition data cover the whole country. Nonetheless, to test whether this potential for organization in the recognition process may be driving results, I examine, as in the paper, communities that did not engage in either social movements or petitions. If the alternative explanation of organization is driving the findings, then they should disappear in this sample. The results in the table at right, however, indicate that the results remain robust and similar. This casts further doubt on this alternative explanation.

	Self-Identifies	Community	Feels	Trust in
	with	Member	Democracy	Regonal
	Community		Works Well	Government
Age at Recognition				
Young (0-12)	0.013*	0.032***	0.014	-0.001
	(0.007)	(0.010)	(0.010)	(0.011)
Teenagers (13-17)	0.022**	0.058***	0.023	0.028*
	(0.009)	(0.013)	(0.014)	(0.016)
Young adults (18-25)	0.016	0.050***	0.045***	0.038**
	(0.010)	(0.016)	(0.015)	(0.016)
Adults (26-40)	0.042***	0.048**	0.059***	0.065***
	(0.012)	(0.019)	(0.016)	(0.018)
Adults (41-65)	0.049***	0.044*	0.088***	0.049**
	(0.017)	(0.025)	(0.022)	(0.025)
Controls				
Native mother tongue	0.071***	0.094***	0.061***	-0.022*
	(0.009)	(0.016)	(0.010)	(0.011)
Female	-0.000	-0.016***	0.012***	-0.006**
	(0.001)	(0.002)	(0.003)	(0.003)
Constant	0.063	0.465**	1.549***	1.417***
	(0.177)	(0.220)	(0.024)	(0.427)
Year of birth FE	YES	YES	YES	YES
District FE	YES	YES	YES	YES
Observations	149,393	108,610	120,350	118,768
R-squared	0.170	0.541	0.070	0.081
Districts	776	762	773	774
*** > <0.01 ** > <0.05	* n < 0.1 Dobu	at atondond on	mona alwatanad	

^{***} p<0.01, ** p<0.05, * p<0.1. Robust standard errors clustered by district in parentheses

XI. Additional Alternative Explanations

This section addresses three additional alternative explanations for the main findings beyond the two that are addressed in the paper: experiences with discrimination, democratic "learning," and the internal war with Shining Path and associated violence from 1980-2000.

i) Discrimination

It is possible that adults and near-adults at the time of recognition may win greater respect from the state and in society more broadly. They may consequently face less discrimination from government offices, private businesses, in education, and other everyday interactions. This could in turn enhance pride in indigenous identity, encourage investment in community life through membership, and enhance perceptions of democracy and confidence in regional government. Meanwhile, these effects may fade among younger cohorts who did not directly fight for recognition and did not experience recognition firsthand. Outsiders may also return to stigmatizing these younger cohorts. The first column of the table below tests this alternative using self-reported data on whether individuals have experienced

discrimination by state institutions, the private sector, or in society in the previous year. This variable is available in ENAHO surveys from 2014-2019. Aside from a small negative effect among young adults, there are no consistent impacts of recognition on experiences of discrimination.

ii) Democratic "Learning"

Another alternative explanation is democratic "learning." Adults and near-adults at the time of community recognition may be more likely to realize that democracy is especially important for fulfilling their demands and over time become more committed democrats than younger cohorts who are not positioned to understand recognition as a lived experience in the same way. In turn, democratic learning among older cohorts may shape their views of identity and inclusion in democracy and their confidence in government. The second column of the table at right tests this alternative using an ENAHO survey question on the overall importance of democracy. Responses range from not important (1) to

	Democratic
Discrimination	Learning
-0.008	-0.019**
(0.006)	(0.008)
-0.009	-0.015
(0.009)	(0.011)
-0.022***	-0.009
(0.008)	(0.011)
-0.011	-0.011
(0.008)	(0.012)
-0.013	-0.020
(0.010)	(0.017)
-0.021***	-0.047***
(0.006)	(0.007)
-0.021***	-0.004**
(0.004)	(0.002)
-0.049	3.071***
(0.103)	(0.043)
YES	YES
YES	YES
38,293	143,213
0.091	0.041
738	823
	-0.008 (0.006) -0.009 (0.009) -0.022*** (0.008) -0.011 (0.008) -0.013 (0.010) -0.021*** (0.006) -0.021*** (0.004) -0.049 (0.103) YES YES 38,293 0.091

*** p<0.01, ** p<0.05, * p<0.1. Robust standard errors clustered by district in parentheses.

very important (4). Aside from a marginally significant and substantively weak negative coefficient among young cohorts, there are no distinguishable differences among age groups within communities. While adults and near-adults are more likely than post-recognition cohorts to report that democracy functions well, they are not more likely to assess it as especially important. In further analysis, I also split the sample into communities recognized during periods of democracy and those recognized during periods of dictatorship. Results are similar in both groups.

iii) Internal Conflict with Shining Path

A final alternative explanation is that perhaps the results are driven by Peru's internal war with Shining Path and violence from 1980-2000. This conflict was highly disruptive to selected rural areas and it also coincided with a considerable number of community recognitions in the late 1980s. To test this alternative, I turn to data from the conflict era. First, I use data on conflict events from the Truth and Reconciliation Commission final report database (https://sites.google.com/a/pucp.pe/informe-final-de-la-cvr--peru/). Second, I create a proxy for guerrilla control based on whether or not there was a mayor in office in 1989, which was around the height of the conflict. Data are from Piedad Pareja and Aldo Gatti (1990), Evaluación de las elecciones municipals de 1989, Lima: Instituto Nacional de Planificación. Where elections could not be held or mayors chose not to assume office out of fear for their safety, the mayor's office was vacant and I code guerrilla control as "1." I then rerun the main analyses from Columns 1-4 of Table 1 in the paper in two ways. First, among communities in districts with low-level conflict or no conflict (specifically, districts in the bottom 90% of conflict events, which includes the more than half of the country's districts with no conflict at all). Second, among communities in districts not under guerrilla control as proxied for with the presence of an elected mayor in 1989. These two samples each capture, in somewhat different ways, communities less impacted by the conflict. The results in the table below indicate that the main findings hold in both of these samples despite the smaller number of observations and slight reduction in power. This casts doubt on the likelihood that the conflict is somehow driving the findings.

Tests of Shining Path Alternative

	Bottom 90% Conflict Events				No Guerrilla Control			
	Self-Identifies with Community	Community Member	Feels Democracy Works Well	Trust in Regonal Government	Self-Identifies with Community	Community Member	Feels Democracy Works Well	Trust in Regonal Government
Age at Recognition								
Young (0-12)	0.010	0.026**	0.013	-0.005	0.003	0.034**	0.022*	-0.011
	(0.008)	(0.011)	(0.011)	(0.012)	(0.009)	(0.015)	(0.012)	(0.014)
Teenagers (13-17)	0.005	0.047***	0.023	0.022	0.008	0.058***	0.034**	0.021
	(0.011)	(0.015)	(0.016)	(0.019)	(0.013)	(0.019)	(0.016)	(0.021)
Young adults (18-25)	0.009	0.038**	0.042**	0.040**	0.004	0.049**	0.059***	0.032
	(0.011)	(0.016)	(0.018)	(0.018)	(0.013)	(0.021)	(0.017)	(0.020)
Adults (26-40)	0.039***	0.036*	0.056***	0.055***	0.031**	0.054**	0.073***	0.046**
	(0.012)	(0.020)	(0.019)	(0.021)	(0.015)	(0.026)	(0.017)	(0.023)
Adults (41-65)	0.039**	0.034	0.063**	0.043	0.041*	0.045	0.093***	0.065**
	(0.018)	(0.024)	(0.025)	(0.028)	(0.022)	(0.035)	(0.025)	(0.032)
Controls								
Native mother tongue	0.066***	0.081***	0.064***	-0.013	0.063***	0.077***	0.053***	-0.020*
	(0.007)	(0.011)	(0.010)	(0.011)	(0.009)	(0.013)	(0.013)	(0.011)
Female	-0.000	-0.017***	0.012***	-0.009***	-0.002	-0.019***	0.013***	-0.006*
	(0.002)	(0.002)	(0.003)	(0.003)	(0.002)	(0.002)	(0.003)	(0.003)
Constant	-0.101***	0.337	2.271***	1.574***	-0.096**	0.326***	1.543***	2.009***
	(0.034)	(0.235)	(0.492)	(0.317)	(0.037)	(0.084)	(0.028)	(0.034)
Year of birth FE	YES	YES	YES	YES	YES	YES	YES	YES
District FE	YES	YES	YES	YES	YES	YES	YES	YES
Observations	121,509	88,133	99,729	98,725	97,139	71,739	80,961	80,196
R-squared	0.159	0.511	0.067	0.074	0.182	0.521	0.065	0.078
Districts	637	625	634	635	474	467	473	474

^{***} p<0.01, ** p<0.05, * p<0.1. Robust standard errors clustered by district in parentheses.

XII. Broader Effects of Recognition

While the results in the paper demonstrate clear intergenerational heterogeneity in the effects of indigenous community recognition consistent with a land access mechanism, they do not speak to the broader effects of recognition on communities and their inhabitants as a whole. Recognition may impact all cohorts, whether born before or after recognition.

To estimate the potentially broader effects of recognition, I compare individuals who live within indigenous communities to rural individuals from the same district sampled by ENAHO who live outside communities. I define rural individuals as those living in towns with less than 2,000 people. Although it would be ideal to compare individuals from recognized communities to otherwise similar individuals in as-yet unrecognized communities, there is no such register of communities. I include the same controls as in the main analyses in the paper. I also include year of birth fixed effects to control for potential time trends in identity and views of government and district fixed effects to limit the comparison set of individuals to those who live near recognized communities. To ensure that the estimates are also sensitive to the generational effects in prior analyses, I compare age cohorts of individuals within communities at the time of recognition to outside rural individuals at similar ages at the time of community recognition. Where there is more than one community recognized in a district, I create age cohorts for individuals outside communities based on median community recognition year.

The results in the table below indicate that recognition boosts reported community membership across all age cohorts within communities, albeit to a considerably greater degree among adults and near-adults. It also boosts indigenous self-identification for all cohorts living at the time of recognition (and the effects for those born into recognized communities are borderline statistically significant). However, the effects of recognition on assessments of how well democracy works are only statistically distinguishable for adult cohorts compared to the general population. And there are few discernible effects for trust in regional government. Individuals

who are young at the time of recognition or born after it express, if anything, somewhat less confidence in regional government compared to the general population and adults express somewhat more confidence. Overall, the findings indicate that intergenerational effects reflect a large portion of the broader effects of recognition.

	Self-Identifies	Community	Feels	Trust in				
	with	Member	Democracy	Regonal				
	Community		Works Well	Government				
Age at Recognition								
Unborn (born after recognition)	0.018	0.068***	0.003	-0.021				
	(0.011)	(0.018)	(0.013)	(0.015)				
Young (0-12)	0.031***	0.092***	0.017	-0.032**				
	(0.011)	(0.019)	(0.014)	(0.015)				
Teenagers (13-17)	0.036***	0.111***	0.025	-0.004				
	(0.012)	(0.020)	(0.017)	(0.019)				
Young adults (18-25)	0.032***	0.112***	0.038**	-0.001				
	(0.012)	(0.021)	(0.016)	(0.019)				
Adults (26-40)	0.060***	0.107***	0.050***	0.018				
	(0.012)	(0.023)	(0.016)	(0.018)				
Adults (41-65)	0.068***	0.093***	0.071***	-0.001				
	(0.014)	(0.025)	(0.020)	(0.028)				
Controls								
Native mother tongue	0.072***	0.087***	0.073***	-0.026***				
	(0.007)	(0.012)	(0.009)	(0.009)				
Female	-0.001	-0.017***	0.010***	-0.009***				
	(0.001)	(0.002)	(0.002)	(0.002)				
Constant	0.208	-0.499***	1.646***	1.902***				
	(0.133)	(0.021)	(0.021)	(0.459)				
Year of birth FE	YES	YES	YES	YES				
District FE	YES	YES	YES	YES				
Observations	185,829	133,737	147,812	145,990				
R-squared	0.138	0.492	0.067	0.078				
Districts	744	740	744	744				
*** p<0.01, ** p<0.05, * p<0.1. Robust standard errors clustered								

^{***} p<0.01, ** p<0.05, * p<0.1. Robust standard errors clustered

by district in parentheses.