

# Living Life

## Assessing Bureaucratic Complexity in Citizen-Government Interactions

*Valeria Perotti*

*Marina Kayumova*

*Natália Mazoni Silva Martins*



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## Abstract

Bureaucratic complexity in citizen-government interactions can be an obstacle to accessing basic services and exercising civil rights. This paper presents a methodology to collect contributor-based data on the regulatory framework and compliance burden of six key citizen-government interactions: (i) civil registration and identification, (ii) voting, (iii) paying taxes, (iv) access to health care, (v) access to education, and (vi) access to utilities. The methodology was tested in Chile, Ghana, India, and Vietnam, and it provided an overview of the legal and regulatory frameworks. In addition, the study offers some interesting observations: (i) two of the four economies moved toward including digital components to civil registration and identification systems, making it easier to register births/deaths and obtain an

identification document; (ii) three of the four economies require a specific voter ID to cast a ballot, which can discourage citizens from engaging in elections; (iii) patients accessing certain services at primary health care facilities may experience longer waits for treatment than those seeking access to the same services in hospitals; and (iv) a student's ability to access quality education can be limited by school placement based on residential address in two of the four economies. The lessons learned suggest that future studies should use survey data collection to investigate the practical experience of citizens beyond procedures and legal requirements. In addition, focusing on fewer areas and including a larger set of countries could generate greater variability and more robust conclusions.

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*Valeria Perotti, Marina Kayumova, and Natália Mazoni Silva Martins*

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## 1. Introduction

Excessive bureaucratic complexity in interactions with governments can be a significant obstacle for citizens accessing basic services and exercising their civil rights. Excessive bureaucracy can also retard progress toward the goals of eliminating poverty and promoting shared prosperity. For example, the compliance burden generated by administrative rules has the effect of restricting access to political rights. Voter registration issues account for a large percentage of nonvoters during elections (Alvarez et al. 2008). Administrative barriers reduce enrollment in social programs and access to health care (Currie 2004; Moynihan and Herd 2010). Legal issues can prevent households from connecting to public utilities such as water and electricity (Banerjee et al. 2008). These are just a few of the issues that can arise from inefficient bureaucratic procedures.

Governments are organized differently. Some impose cumbersome bureaucratic procedures, while others aim to streamline and simplify the burden on citizens to meet their responsibilities and to access the goods and services to which they are entitled. However, there are currently little to no comparable, cross-country data available to assess the extent of regulatory burdens or to generate a stimulus for reform.

While the effect of bureaucratic burden on the private business sector is measured and constantly monitored by governments who regularly consult the World Bank's *Doing Business* database, to date little attention has been paid to the effects of bureaucracy on the lives of private citizens. Anecdotal evidence suggests that the cost (either monetary or cognitive) of key interactions such as voting, obtaining identification, registering a birth, or accessing health care have the potential to limit a citizen's access to basic rights and freedoms that should be universally guaranteed. The most vulnerable groups in the population are most at risk for infringement on access and rights. Drawing upon 78 participatory poverty assessments (PPAs) in different countries, the 2000 report *Voices of the Poor* remarked that "poor people's interactions with representatives of the state leave them feeling powerless, unheard, and silenced" (Narayan et al. 2000, 65). The report found that "the poor experience many barriers in trying to access government-provided services. These include bureaucratic hurdles, rules and regulations, the need for documents, and difficulties in accessing information" (Narayan et al. 2000, 65). When bureaucracy imposes excessively complicated procedures to access public services or state entitlements, the poor are more likely to be affected as more affluent and more educated citizens can better manage their way around the rules or more easily bear the costs of compliance. Simplifying the procedures and reducing the costs associated with citizen-government interactions would therefore empower the poor to take better advantage of the services and rights to which they are entitled.

This paper presents pilot results from a new World Bank project, *Living Life*. The project developed and tested a methodology to collect data on the bureaucratic complexity in citizen-government interactions that is essential for accessing basic services and for exercising fundamental rights and civic duties.

First, the paper discusses the current knowledge gaps and the project's contribution to the existing literature and evidence. Second, the paper presents the results from pilot data collected in four countries: Chile, Ghana, India, and Vietnam. Finally, the paper discusses lessons learned and next steps for improving its methodology and expanding data coverage to a larger number of countries.

## **2. Assessing Bureaucratic Complexity in Citizen-Government Interactions**

### **2.1. Aim and Scope**

Over the course of a lifetime, citizens interact with their governments to execute civic duties, to exert their rights, and to access basic services such as public goods. Just as governments have a key role to play in protecting citizens' rights, they must also offer citizens the proper conditions to exercise their civic duties and responsibilities or to enable access to basic goods and services that they provide or guarantee. The experiences of citizens across the globe vary widely in terms of the ease of interaction with their government bureaucracies. These differences may play an important role in understanding the causes of poverty and inequality.

*Living Life* assesses the regulatory framework and compliance burden for key citizen-government interactions, which can be grouped into civil registration and duties and access to basic services. Civil registration and duties include: registering a birth, registering a death, obtaining an identification document (ID), voting, and paying taxes. Basic services are those mentioned in the 2004 *World Development Report* (WDR) as having the largest impact on human development and include health, education, water, sanitation, and electricity (World Bank 2003).

The *Living Life* areas of study are designed to describe not only the relevant regulatory frameworks, but also the quality of interactions in terms of steps, time, and costs associated with a typical process for exercising rights or accessing services. In this study, procedures for exercising rights and accessing services are compared to recognized best practices, where available.

The study's focus is to understand the bureaucratic complexity that exists in interactions between citizens, their governments, and their agencies, rather than to assess the quality of service delivery and outputs. For some areas, the study includes an aspect of accountability by collecting information on available redress mechanisms in cases of bureaucratic errors.

*Living Life* attempts to fill the knowledge gap on interactions between citizens and governments. The pilot stage of the project has produced and tested a data collection methodology that could eventually be refined and scaled to a larger number of countries. Refining the methodology and expanding the data collection coverage can lead to the creation of a relevant set of indicators, can generate a global public database on bureaucratic quality, and can foster policy dialogue around key areas of public service provision.

### **2.2. Existing Evidence and Knowledge Gaps**

#### **2.2.1. Literature on bureaucracy, regulations, and individual outcomes**

Citizen interactions with governments are regulated and managed by administrative bodies or bureaucracies, whose role in distributing government resources and administering policy can have a relevant impact on inequality. Low institutional or bureaucratic quality is often associated with higher inequality (Chong and Calderon 2000). Although very limited evidence exists, some studies have found that "bureaucracy is prone

to abuse for partisan interest and thus affects the redistribution of state resources to the society” (Utama 2014, 9). Spinesi (2009, 245) also points out that “bad bureaucratic quality produces a waste of relatively scarce resources that can severely exacerbate income inequality and can damage the development performance” in both developed and developing countries.

Most of the empirical research has to date focused on the impact of bureaucratic complexity on organizations rather than on citizens. The World Bank’s *Doing Business* project (World Bank 2018a) and the vast empirical literature using its data provide numerous examples of how bureaucratic complexity can affect a firm’s ability to operate and grow.<sup>1</sup> There is no equivalent literature on the relationship between bureaucratic complexity and individual outcomes such as access to basic services or exercising of civil rights.

Among the few studies in this area, Moynihan and Herd (2010) show that the compliance burden generated by administrative rules in the United States restricts access to political and social rights such as voting and health care. Alvarez et al. (2008) analyzed data from the 2008 U.S. presidential election and found that reasons for not voting were registration issues (13 percent of nonvoters) and incorrect identification (7 percent of nonvoters). Currie (2004) showed that enrollment in social programs in the U.S. and in the U.K. was reduced by administrative barriers, and she remarked that filling the data gap for these barriers would substantially help better understand enrollment. Banerjee et al. (2008) reviewed access and affordability of infrastructure across Sub-Saharan Africa and remarked how connection costs and legal issues, such as land ownership and insecurities over land tenure, can prevent households from hooking up to otherwise available services.

The burden of complying with regulations often disproportionately affects disadvantaged groups such as lower-educated or poor individuals. This is the administratively disadvantaged as defined by Brodtkin and Majmundar (2010). For example, Gertler and van der Gaag (1990) found that the demand for health care in Côte d’Ivoire was more sensitive for lower-income individuals than for higher-income individuals to changes in the time required to obtain care. Bureaucratic complexity in interactions between citizens and governments can constitute an important obstacle to the delivery of basic services as well as to the ultimate objectives of eliminating poverty and promoting shared prosperity.

The 2004 WDR analyzed the mechanisms of service delivery and discussed the accountability relationships between citizens, service providers, and governments (World Bank 2003). Following the 2004 WDR publication, the World Bank promoted several data collection initiatives to measure service quality and performance in schools and health facilities as well as initiatives to analyze accountability systems (Dehn et al. 2003; Gauthier and Reinikka 2008; Fiszbein et al. 2011; Martin and Pimhidzai 2013). Most of these initiatives have focused on measuring inputs as well as service provider efforts and skills. They have not addressed issues such as administrative and cognitive costs for citizens to access services.

Another key element in measures of service delivery is accountability and the presence of mechanisms for grievance and redress. Evidence shows that accountability mechanisms improve the quality of service delivery.

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<sup>1</sup> See the survey by Djankov (2009).

For example, Deininger and Mpuga (2005) found that knowledge on how to report bureaucrat misbehavior or unsatisfactory service quality reduces the incidence of corruption and improves quality in health and education services in Uganda.

Finally, proof of identification is another crucial aspect of any bureaucratic interaction between citizens and governments. No matter how good the quality of the services, many people are prevented from accessing them by the lack of legal identity.<sup>2</sup> A study in Indonesia found that among the poorest households, individuals with a birth certificate were much more likely to have completed 12 years of schooling and were less likely to get married before age 18 (Sumner 2015).

Identification has been set as one of the United Nations Sustainable Development Goals (SDGs). SDG 16.9 recognizes the importance of identification not only as a proof of existence facilitating access to citizen rights, public services, jobs, financial institutions, and to family and property transactions, but also as a source of reliable health statistics<sup>3</sup> (Asian Development Bank 2007; World Bank and World Health Organization 2014; Dahan and Hanmer 2015). Planning and implementing health care and other social programs require an accurate accounting of population dynamics and health needs. The availability of quality data in these areas relies heavily on efficient civil registration and vital statistics (CRVS) systems. For example, the lack of proper data to track maternal deaths is an obstacle to progress in the related Millennium Development Goal (MDG) and subsequent SDG 3.1 (Danel et al. 2011).

The Identity for Development (ID4D) initiative has identified 10 other SDGs including social protection, disaster relief, women's empowerment, and ending major epidemics for which identification is a key enabler (World Bank 2016). However, only anecdotal evidence is available on how the inefficiency of CRVS systems may negatively affect their coverage across the world.<sup>4</sup> One example is a recent, small survey conducted with staff from the local Registry and health facilities in one district in Ghana. In this survey, 84 percent of respondents said that cost is a challenge to birth and death registration (Musah et al. 2015).

In sum, the registration of births and deaths and the procedures for getting legal identification are key citizen-government bureaucratic interactions, the (in)efficiency of which can impact on poverty and inequality. These (in)efficiencies have not been systematically assessed to date.

### **2.2.2. Existing data sources**

The *Living Life* study fills a gap in the existing data sources on governance, but it can also be analyzed in a complementary fashion with some existing indicators. Similar to *Doing Business*, *Living Life* captures three aspects of government-citizen administrative interactions (cost, time and steps required), which differentiate *Living Life* from other initiatives that focus on narrower topics such as payment methods (Economist Intelligence Unit 2011). The closest initiative to *Living Life* is the Inter-American Development Bank's *Simplifying Lives*

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<sup>2</sup> An estimated 1.5 billion people around the world lack proof of identity (World Bank, 2016).

<sup>3</sup> SDG 16.9 is: "By 2030, provide legal identity for all, including birth registration."

<sup>4</sup> For example, the Asian Development Bank (2007) report describes the official procedures and requirements in Bangladesh, Cambodia, and Nepal. Sumner (2015) describes recent reforms in Indonesia.

report, which assesses the quality of public services provided by the state in six countries in Latin America, as well as the citizens' degree of satisfaction (Pareja et al. 2016).

*Living Life* attempts to establish measures of bureaucratic efficiency, one factor among several that can prevent a country from progressing in key social outcome indicators as measured by the UN Human Development Index, the Organization for Economic Co-operation and Development's (OECD) *How's Life* report, the European Commission's Sustainable Development Indicators, or the Social Progress Imperative's Social Progress Index. Inefficient bureaucratic procedures may also hinder the effective realization of key democratic principles assessed by the International IDEA Democratic Accountability in Service Delivery and State of Democracy data or by the Varieties of Democracy data sets. The same democratic principles recognized by these legal assessments may not be achieved in practice if the related administrative requirements are too complicated or costly.

*Living Life* also complements four key cross-country indicators discussed in detail by Van de Walle (2005). The first set of indicators is taken from a paper published by the European Central Bank (ECB) and compares public sector efficiency covering 23 OECD countries in 1990 and 2000. A second set of indicators are taken from the World Bank's Worldwide Governance Indicators (WGI) released every two years. A third indicator is the World Economic Forum's annual Public Institutions Index (one of the pillars of the Global Competitiveness Index covering 117 countries). The fourth indicator is IMD Business School's annual indicator for government efficiency covering 60 countries.

Both the ECB's indicator and WGI overlap with *Living Life*'s areas of study. However, there are a few core differences. The ECB indicator measures the efficiency of government performance by comparing inputs (public spending as a share of gross domestic product (GDP)) to outcomes, while *Living Life* measures the ease of access to those basic public services as opposed to the outcomes or the quality of those outcomes. The WGI's Government Effectiveness Dimension captures "perceptions of the quality of public services, the quality of the civil service and the degree of its independence from political pressures, the quality of policy formulation and implementation, and the credibility of the government's commitment to such policies" (Kaufmann et al. 2010, 223). *Living Life*, on the other hand, attempts to establish more objective measures of bureaucratic performance by accounting for time, processes, steps, and costs. The World Economic Forum's Global Competitiveness Index's performance measurement of government institutions and the IMD Business School's world competitiveness rankings both examine enhanced economic growth and prosperity, whereas *Living Life* focuses on the quality of interaction between citizen and governments.

Because bureaucratic complexity is often an effective proxy for corruption, *Living Life* offers complementary insights on issues addressed by global, opinion-based and qualitative indicators such as Transparency International's Corruption Perceptions Index and the Global Corruption Barometer. Other relevant performance measurements include the Open Budget Index, the Public Integrity Index, and Freedom House's Civil Liberties and Political Freedoms Index.

Topic-specific initiatives such as those that collect data and analyze election outcomes dedicate efforts to understanding the societal impacts of voting. Extensive databases exist with relevant data on voting percentages of registered population, legislative frameworks for elections, and electoral management. Little research exists, however, focusing on the actual procedures and steps undertaken by citizens to register to vote and to fulfill their

civic duties. Where relevant data are available, topics are analyzed through the lens of government performance, rather than through the citizen's perspective and experience of the process. For example, the ACE Project's comparative data set analyzes registration systems adopted worldwide and relates them to government performance under three criteria: currency, accurateness, and completeness (ACE: The Electoral Knowledge Network 2013). It does not address the challenges faced by individuals in the context of each registration system, the requirements with which they need to comply, and the eventual burden of participating in democracy. This is a gap that *Living Life* aims to close.

### **2.3. Building the Pilot Methodology**

The methodology for *Living Life* was developed in several steps to incorporate as much feedback as possible from experts across the World Bank and from other teams who have worked on similar initiatives. The steps can be summarized into:

1. Development of the conceptual framework;
2. Questionnaire development;
3. Data collection; and
4. Data validation and coding.

#### **2.3.1. Development of the conceptual framework**

The first step identified the key interactions between citizens and governments for which data should be collected. As discussed in the next section, these key interactions were selected through consultation with experts across the World Bank Group as well as a thorough review of the literature. The selected interactions are seen as the interactions that the majority of citizens need to go through in order to execute their civic responsibilities and to access basic services as defined by the 2004 WDR. A fundamental aspect that was defined in the conceptual phase was the specific scope of each area included in the study. It was decided that only the bureaucratic aspects of each representative process would be studied without addressing issues of service quality as this would require a much more complex approach to data collection. For example, for access to education, *Living Life* observes how burdensome it can be to enroll a child in school, the required documentation, and the fees charged, but it does not include any measure of quality of the education provided.

Even within this limited scope, the initial plan for data collection was very ambitious as it entailed two respondent data groups. For each area of study and in each country, data would be collected through interviews with several experts who would answer questions about processes and regulations applying to a specific prototypical case (contributor data). Second, data was to be collected through a representative survey of citizens who would answer questions about their own experiences (user data). The objectives were to collect information on both the legal framework (or *de jure* situation) that the common citizen may not know as well as to assess the actual experience of the users of public services (*de facto* situation). However, while this represented the optimal approach, the limited budget was insufficient to pilot the user data component. As a result, only the contributor data collection methodology was developed and tested in the pilot.

In its current format, *Living Life* encompasses six areas that offer insights on aspects of several SDGs. The areas of study include civil registration and identification (registering a birth, registering a death, and obtaining a document of identification), voting, paying taxes, access to health, access to education, and access to utilities.<sup>5</sup> Table 2.1 lists all the areas of study and highlights the relevant associated SDGs.

**Table 2.1 - *Living Life* 6 Areas of Study**

	<b>Area of Focus</b>	<b>Related SDGs</b>
<b>1</b>	Civil registration and identification	1.4, 16.5, 10.2, 10.3, 16.5, 16.6, 16.9, 16.10
<b>2</b>	Voting	16.5, 10.2, 10.3, 16.6, 16.7, 16.10
<b>3</b>	Paying taxes	16.5, 16.6, 16.10
<b>4</b>	Access to health	1.4, 3.1, 3.2, 3.3, 3.4, 3.7, 3.8, 3d, 10.2, 10.3, 16.5, 16.6
<b>5</b>	Access to education	1.4, 4.1, 4.2, 4.3, 4b, 10.2, 10.3, 16.5, 16.6
<b>6</b>	Access to utilities	1.4, 6.1, 6.2, 7.1, 10.2, 10.3, 16.5, 16.6

### 2.3.2. Questionnaire development

The methodology is based on the application of topic-specific questionnaires to build a comprehensive data set. This is in line with the methodology developed by other World Bank projects such as *Doing Business*, *Women, Business and the Law*, and *Enabling the Business of Agriculture*.<sup>6,7,8</sup>

Once the six main areas of study were chosen, the team conducted extensive desk research and consultations with World Bank Group (WBG) experts to understand the particularities of each topic, to identify the type of data that should be collected, and to structure questions for maximum reliability of interpretation across respondents.

For each topic, questions required a description of procedures undertaken in each area of citizen-government interactions, the respective costs, time for completion, documents required, and the provision of the justifying legal and/or regulatory statute. Each questionnaire contained a preliminary section establishing concepts and the case assumptions in order to assist contributors in answering the questions and to guide the team during the coding process. For example, the questionnaire designed to collect data on voting asked respondents to answer the questions from the perspective of a 30-year-old man who resides in the main business city of the pilot economy and who is a citizen and/or legally recognized national of the pilot economy, either native or naturalized. The questionnaire referred to the assumed individual as the prototypical citizen. In the context of the voting questionnaire, the prototypical citizen had never voted before and wanted to know what he needs to do to be able to register and vote in a hypothetical upcoming election.

Case study assumptions were designed to gather comparable data across different areas of study by referring to prototypical individuals with the same gender, age range, and place of residence. However, the case

<sup>5</sup> Voting is a political right, but it is also a mandatory civic duty in some twenty countries around the world according to The World Factbook 2013-14. Washington, DC: Central Intelligence Agency, 2013.

<sup>6</sup> For further details on the *Doing Business* data set and annual reports, see <http://www.doingbusiness.org/>.

<sup>7</sup> For further details on the *Women, Business and the Law* data set and biannual reports, see <http://wbl.worldbank.org/>.

<sup>8</sup> For further details on the *Enabling the Business of Agriculture* data set and annual reports, see <http://eba.worldbank.org/>.

study assumptions approach applied to data collection also has limitations. It does not represent the variety of ways in which an interaction can take place or the heterogeneity of the people involved. To mitigate this issue and to control for diverging interpretations, the questionnaires include questions on whether the process differs according to the gender or to the marital status of the citizen following the approach initiated by the World Bank's *Women, Business and the Law* project (World Bank 2018b). Detailed information about all case assumptions, questionnaire definitions, and samples are provided under Data Notes in Appendix A.

Feedback provided by contributors during the first round of data collection was indispensable to understanding the relevance of questions that were being asked and refining the survey's structure for future data collection.

### **2.3.3. Data collection**

The methodology for data collection was applied in four economies representing different regions: Chile, Ghana, India, and Vietnam.

The *Living Life* team established a timeline for data collection starting with the contributor research phase that took place from April 2016 through May 2017. This contributor research phase consisted of identifying a group of local experts (contributors) through desk research and establishing contact with relevant government authorities, private firms, and professional associations for each of the specific topics approached by the study. A pool of over 850 contributors in all four pilot countries and across all areas of study was compiled and sorted by names, firms, specialties, languages, and contacts. Contributors were identified according to their level of expertise and relevance to the study. Contributors included academics, lawyers, statisticians, representatives of civil society and non-governmental organizations, government officials, registrars, or representatives of service providers such as health practitioners, university admissions officers, and staff from utility companies working in the four economies.

Data collection was carried out from October 2016 through July 2017. Selected contributors were contacted by phone and e-mail, were invited to collaborate in the study, were introduced to the methodology, and were informed that their collaboration would be on a *pro bono* basis. The team then sent out targeted questionnaires to each contributor. Contributors were expected to send back their answers within 3 to 4 weeks from the date of receipt. A follow-up phase took place between July and December 2017. During this time, the team contacted contributors to retrieve their completed questionnaires or to clarify questions that were not clear during the coding process. Although the team contacted over 850 contributors, only 118 respondents contributed effectively to the study by either filling out the questionnaires or answering questions over the phone.

### **2.3.4. Data validation and coding**

The information provided by contributors was cross-checked with information collected by the team through desk research on the applicable laws, regulations, and information available on institutional websites. The collected data were also cross-referenced with other publicly available databases from nongovernmental, civil society, and international organizations.

The team followed up with contributors by phone to improve response rates, to fill in gaps in the data, or to clarify points that appeared to have been misunderstood. In cases where it was not possible to verify the

information through desk research (e.g. there was no publicly available regulation or translation was not available nor possible) or through contributor follow up, the data point was coded as “no data”.

Data coding was guided by coding rules outlined by the team based on good regulatory practices. The answers provided by multiple contributors on the same question were coded into a single value for each country. This process required the review of answers from all contributors, checks for inconsistencies among contributors, and following up as necessary through phone conversations, email, or desk research.

### 3. Pilot Results

This section presents the findings for the six areas selected by *Living Life*. Further details on surveys and variables can be found in the appendices.

Each subsection covers aspects ranging from legal requirements, time, costs, procedures, documents required, digital components, and other specific information pertaining to the area of study. Table 3.1 provides a snapshot of data collection efforts divided by area of study.

**Table 3.1 – Data collected for Each Area of Study**

	Legal Requirements	Time	Cost	Procedures	Documents Required	Digital Component
<b>Civil Registration and Identification</b>	✓	✓	✓	✗	✗	✓
<b>Voting</b>	✓	✓	✓	✗	✗	✓
<b>Paying Taxes</b>	✓	✓	✓	✗	✗	✓
<b>Access to Health</b>	✓	✓	✓	✓	✓	..
<b>Access to Education</b>	✓	✗	✓	✓	✓	..
<b>Access to Utilities</b>	..	✗	✓	✓	✓	✓

*Notes: 1) Cells with a check mark represent data collected by the team and published in this paper. Cells with a cross mark represent no data due to insufficient contributor responses and impossibility to retrieve the information through desk research. Cells with double dots represent data that the team did not attempt to collect: certain aspects (i.e. cost, digital components, and legal requirements) were not taken into consideration for some of the areas of study. 2) Access to Utilities data are not available for India; Digital Components data are only available for Chile and Ghana.*

#### 3.1. Civil Registration and Identification

Civil registration and identification serve as an instrument for citizens to access basic public services and to participate on equal conditions in the social, political, and economic lives of their communities (Ordonez and Bracamonte 2005). Less than a third of the world’s population is covered by accurate data on births and deaths, and about 1.1 billion people lack proof of identity (World Bank and Center for Global Development 2017). Around the world, two-thirds of annual global deaths are not registered, only 34 countries produce high quality cause-of-death data, and only two of the 49 lowest-income countries have functional CRVS systems (Danel et al. 2011). The absence of a birth certificate might induce a lifelong struggle with lack of documentation preventing school enrollment and access to health services as well as complicating the process of obtaining IDs. The ability to prove one’s identity is crucial for opening bank accounts, owning property, participating in elections, holding a formal sector job, and receiving social services (Duryea et al. 2006).

Anchoring civil registration in a regulatory framework is the first step towards not only completeness and accuracy of information about the life events of each citizen, but also towards ensuring access and ample registration to all and safeguarding basic human rights.

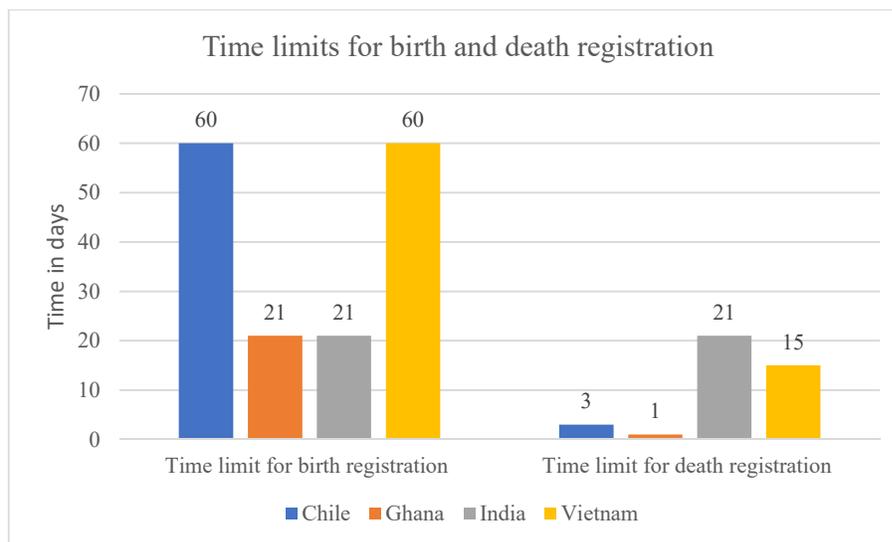
*Living Life's* Civil Registration and Identification focus area includes data on registering births and deaths as well as data on obtaining IDs. The topic covers the legal framework for each of the civil registration processes including procedures and requirements, time and cost to complete certain steps, the type of information collected at the time of registration, late registration, and the digitalization of registration mechanisms.

The study revealed that all four economies have mandatory legal provisions for civil registration, although the sanctions for non-compliance and procedures vary. While India and Chile have moved towards including digital components to civil registration and identification systems, Vietnam and Ghana rely on more traditional processes. The efficiency of identification systems measured by time taken to obtain a national identity card (NID) or passport also varies across economies.

### 3.1.1. Legal requirements

Birth and death registration is legally required in all four economies. Relevant laws also contain a specific time period within which records on births and deaths should be registered. These periods vary across different countries (Figure 3.1). Generally, countries establish shorter timeframes for death registration as opposed to birth registration. While a death should be registered within one day in Ghana, in India this time limit is 21 days. A birth should be registered within 21 days in both Ghana and India and within 60 days in Chile and Vietnam.

**Figure 3.1: Time Limits for Birth and Death Registration (in days)**



Source: *Living Life data*

Linking legally compulsory birth and death registration to incentives or penalties for non-compliance is a good regulatory practice according to the World Health Organization (WHO) (2013). Legislation can help establish the authority and duties of the registrar, which include enforcing and promoting registration of the population. Incentives or penalties can encourage people to come forward and register births and deaths (World Health Organization 2013). The 1969 Registration of Birth and Death Act in India details provisions for late

registration. Specifically, registrations outside the 21-day limit, but within 30 days from the time of birth or death, are subject to late registration fees. Registrations within one year from the date of a vital event require not only a late fee, but also an affidavit made before a notary public and the written permission of the registrar. In the event that registration is delayed for a period over a year, a magistrate's order is necessary in addition to a fee. Similarly, in Ghana, late registration fees apply if a birth or a death is registered after the legally established time limits. Delayed registration occurring after one year from the date of the event is possible only with a written authority of the registrar per the Registration of Births and Deaths Act 301 from 1965. In contrast, Vietnam does not establish any legal sanctions for non-compliance with the obligation to register a birth and a death. Although the same applies to Chile in case of a birth registration, late death registration is only possible with a court order.

When it comes to identification, some countries have general-purpose or foundational national identification documents (NIDs), while others have multiple, purpose-specific or functional IDs such as driver's licenses, voter IDs, or social security cards. Although no standard IDs have been adopted worldwide, there is an agreement that universal coverage is a key principle of any national identification system (World Bank and Center for Global Development 2017). Whereas various forms of identification are accepted as a proof of identity depending on the type of service being accessed in all four economies, India is the only economy where it is not mandatory to have a NID. The Aadhar System, an identification system in place in India since 2009, was introduced to unify civil registration in the economy. It does not replace, however, existing identification documents in India such as the PAN card, passports, driving licenses, etc.

### **3.1.2. Non-discrimination provisions**

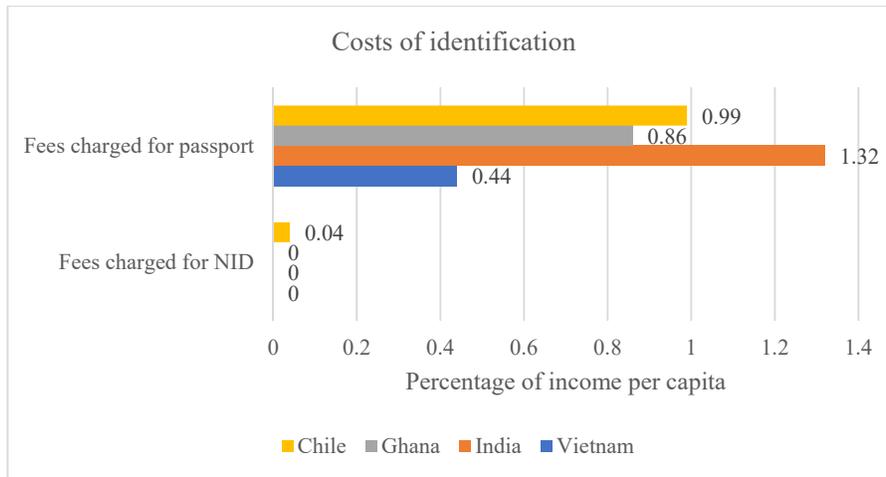
Nationality, origin, ethnicity, and marital status of parents should not impact a civil registration process (World Health Organization 2013). In three out of four surveyed economies, a person's place of birth is reflected in the birth certificate but not in the NID, while Chile is the only economy where the place of birth is printed or stored on both birth certificate and national ID card. None of the surveyed economies register or display the parent's marital status in neither of the documents. Out of the four surveyed economies, only Vietnam displays a person's ethnicity on birth certificates and national ID cards. In Vietnam, birth registration rates for children from ethnic minorities are 10% lower than the national average. Although Vietnamese laws do not contain discriminatory provisions based on ethnicity, minorities may fear to disclose sensitive information upon birth registration (UNICEF 2013).

### **3.1.3. Time and cost**

In line with good practices, birth and death registrations within the legally prescribed time limit are free of charge in all four economies. This ensures the complete and timely reporting of vital events (UN 2002).

The fees for identification services should not be prohibitive to the poor (World Bank and Center for Global Development 2017). With respect to NIDs, Chile is the only economy to charge a fee. Ghana, India, and Vietnam issue NIDs to citizens at no cost. Fees for issuing passports are charged in all four economies (Figure 3.2). The charges for issuing a passport are lowest in Vietnam and highest in India.

**Figure 3.2: Costs of Identification (expressed as % of income per capita)**



Source: Living Life data.

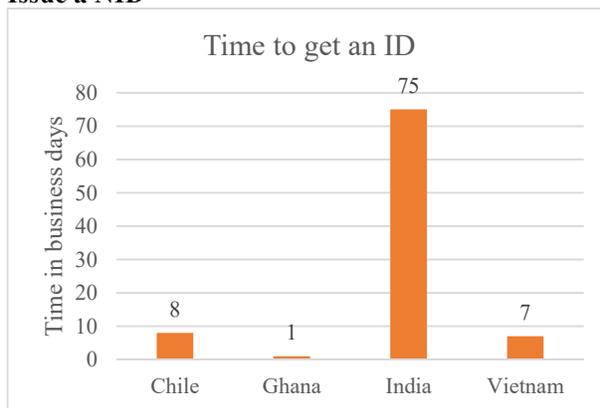
Notes: Cost expressed as percentage of GNI per capita using the Atlas Method in current (2016) U.S. dollars.

The efficiency of ID services can also be assessed by the time taken to obtain a NID and passport from the day of request until the day of delivery of the document. Legally prescribed timeframes vary significantly among the four economies from 1 day to obtain an ID in Ghana to 60-90 days in India. In India, obtaining a passport should take 3 days, and in Ghana the process lasts 15 days according to the law. However, time required in practice may deviate from the time prescribed by law.

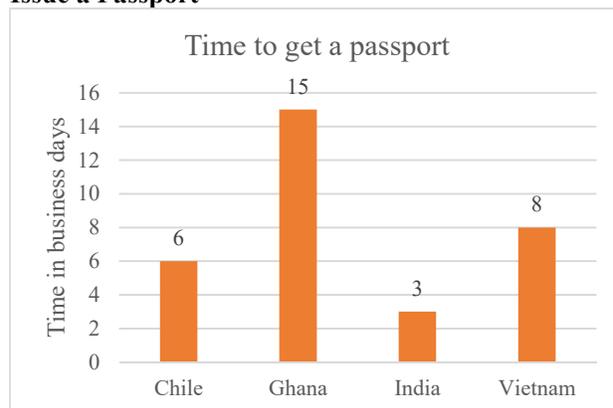
Contributors reported much longer times required in practice for obtaining passports. For example, it takes Ghanaian citizens twice as long to get a passport at 30 days in practice compared to the 15 legally prescribed. Similarly, Indian citizens seem to experience significant delays while obtaining their passports at 30 days, as opposed to the 3 days prescribed legally. In contrast, the provision of national ID cards in India is more streamlined in practice at 30 days within the legal timeframe of 75 days. However, due to the limited number of respondents, the data on days required in practice should be interpreted with caution.

Figures 3.3. and 3.4 below provide a graphic of the time required to legally obtain an NID and passport in each of the four economies.

**Figure 3.3: Legally Prescribed Timeframes to Issue a NID**



**Figure 3.4: Legally Prescribed Timeframes to Issue a Passport**



Source: Living Life data

Note: In September 2017, Ghana introduced a new Ghana Card that is supposed to be issued in less than one day.

### 3.1.4. Digital components

Registration processes and the quality of data can be significantly improved with the uptake of information and communication technology (ICT).<sup>9</sup> Electronic registration systems detect duplicate registrations of the same event, link records, ensure interoperability, inexpensively archive documentation, and reduce administrative burden on citizens by easing procedures and saving time (World Health Organization 2013).

The government of India has introduced electronic civil registration systems. For example, domiciliary birth and death can be registered online through the official centralized Civil Registration System portal.<sup>10</sup> For domiciliary events within the required reporting period of 21 days, a user must login, fill in an online application form, attach the required supporting documents, and submit the request. The details of the registered event are communicated by e-mail to the user or can be checked from the portal by quoting the application reference number. When requesting a passport, citizens of India may start the process online by logging in to the official government website using a personal username and password, filling out an application form, paying a fee, and scheduling an appointment.<sup>11</sup> To complete the process, citizens in India must then appear at the Passport Office with the form and required documents.

Likewise, Chile has digitized some of the processes by allowing its citizens to request copies of birth and death certificates online.

## 3.2. Voting

Voter registration is crucial for political participation in a democratic context. Excessive bureaucracy in registration to vote is a burden for a portion of the eligible population. Reducing bureaucracy in voter registration increases the number of newly registered voters (Nickerson 2015).

*Living Life's* Voting focus areas include data on the rights and legal obligations to vote in different types of elections (national and local), voter registration procedures and requirements, the availability of technology for voter registration, non-discrimination provisions, and the availability of redress mechanisms in case of inaccuracies in the voter registry.

The research revealed that although voting is not mandatory in all four economies, 3 out of 4 countries require citizens to be included in the voters list whether they cast a ballot in the elections or not. While in Chile citizens can vote presenting their NID, in the remaining countries voting is only possible with a specific voter ID

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<sup>9</sup> Pareja et al. (2016) found that the low level of effective interoperability remains one of the main shortcomings of public administration in the LAC region.

<sup>10</sup> <http://crsorgi.gov.in/web/index.php/auth/signUp>.

<sup>11</sup> <http://passportindia.gov.in/AppOnlineProject/online/procEFormSub>.

card. The need for a specific voter ID can undermine citizens' ability to exercise their voting rights. Online voter registration is only possible in India, and online voting is not permitted in any of the surveyed countries.

### **3.2.1. Legal requirements**

Economies around the world have adopted different electoral systems to fit their political frameworks. Voting is compulsory in nearly 13% of the world's economies. In 85% of the economies, casting a ballot during elections is not mandatory, while in 2% of the economies there are no elections at all<sup>12</sup> (International IDEA 2017). In all four economies included in this report, voting is not mandatory and therefore there are no sanctions for non-voters. In Chile, India, and Vietnam, although voting is voluntary by law, it is compulsory for citizens to be on the voter registry list. The Constitution of Ghana, on the other hand, states that citizens are entitled to be registered as a voter, which does not constitute an obligation to be included on the registry.

### **3.2.2. Non-discrimination provisions**

The Convention on the Elimination of All Forms of Discrimination against Women (CEDAW), adopted in 1979 by the United Nations General Assembly, mandates that women should not be discriminated based on their marital status. Such practice impairs women from exercising their rights and freedoms in the political, economic, civil, and social spheres. *Living Life* attempted to capture variations on procedures and requirements based on gender. The data found that in Ghana, Chile, and Vietnam voter registration provisions are equal for women and for men regardless of their marital status. However, in India, married women must state the name of their husbands when applying to register to vote. Unmarried women should indicate the names of their mothers and fathers when registering to vote. This is not required for married or unmarried men. This provision is established in India's 1960 Registration of Electors Rules.

### **3.2.3. Voter registration procedures and documents required**

In Chile and Vietnam, the voters list is generated automatically based on a pre-existing civil registry. From a public administration point of view, this type of voter registration system enables the production of more reliable and up-to-date voters lists with higher coverage since they account for all citizens that are already registered in a civil registry database. However, such a register can be very costly to establish and maintain. Automatic registration cuts back on most procedures that a person would have to go through to register to vote. It also cuts the time needed to perform data entry and to compile voter lists (ACE 2013).

When voter registration is directly drawn from a pre-existing civil registry, citizens only need to go through one procedure when they are registered in the public civil registry for the first time. In Chile, this happens when an individual is registered at birth and obtains his NID. Once registered at birth, the individual is

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<sup>12</sup> <https://www.idea.int/data-tools/data/voter-turnout/compulsory-voting>.

automatically included in the list of eligible voters when s/he turns 18 years old. In Vietnam, citizens need to be included in the registry of their permanent or temporary residence, and the voter list is drawn up by the People's Committee from a pre-existent civil registry 40 days before polling day.<sup>13</sup>

In Ghana, voter lists are generated periodically before each election. Eligible voters must self-register through the election management center within the registration period established by the electoral authority, which is not explicitly determined by the law. In practice, this type of voter registration can take place within a relatively short time frame, which can challenge a citizen's ability of registering to vote.

India employs the continuous register system through a process of intensive revision, which takes place every five years. During the intensive revision period enumerators go on door-to-door to collect information about prospective electors, thus including voters in the registration list. Voters that are left out of the voter registration list can register during a period called summary revision, which takes place every year, by submitting the required form and documents up to 10 days before the last day of the deadline for candidates to register their nominations. While this type of voter registration may increase registration rates, voters may face an additional burden to comply with specific requests made by the Electoral Commission in order to keep information in the registry accurate and updated (ACE 2013).

Citizens in Chile can cast their votes by presenting their NIDs or Chilean passports. A special voter card or voter ID is issued to citizens upon registration in Ghana, India, and Vietnam. Voters in India can present other documents such as NIDs, passports, driver's licenses, or official documents with a photo as proof of identity on election day. Voters in Ghana and Vietnam can only cast their votes upon presenting their voter identity card. The existence of a single-purpose document (i.e. a special voter card or voter ID) that every citizen must present in order to cast a vote can limit the percentage of potential voters in countries where voting is not mandatory, especially when citizens do not have an easy access to the required documentation (Wang 2012).

Vietnam is the only surveyed economy in which citizens receive a stamp on their voting cards as a way of attesting that they voted in a certain election. In Chile, Ghana, and India, voting receipts do not exist.

#### **3.2.4. Digital components**

Online voter registration can offer many advantages. It can be cost effective, since electronic data entry can be faster than processing paper forms, which can reduce working time by staff. It can also improve the accuracy of voter rolls because it reduces the possibility of errors from illegible handwriting or manually entered voter information. It is also convenient for voters due to the possibility of registering to vote without having to personally go to an election office to fill out paperwork and eventually wait in line (Maluk et al. 2015; Ponoroff

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<sup>13</sup> Socialist Republic of Vietnam. Law n. 85/2015/QH13. 25 jun. 2015. On election of deputies to the national assembly and people's councils. Hanoi, jun. 2015.

2010). From the voter's perspective, online registration is convenient and easy, and it is an extra incentive for citizens to register in countries where voting is not mandatory (Pew Research Center 2014). Personal presence is not required to register to vote in India, and voter registration can be done online through the National Voter's Service Portal.<sup>14</sup> In Ghana, personal presence is required, and online voter registration is not possible. In Chile and Vietnam, online voter registration is not possible since voter registration is done automatically based on a previous civil registry database.

Online voting is not permitted in any of the surveyed economies. Implementation of online voting processes can be hard in developing countries due to a lack of universal internet access (Thakur 2014). As a result, electors cast their votes either through manually marking of ballots or through electronic voting machines in India. Manually marking of ballots is the only form of casting a vote in Chile, Ghana, and Vietnam (ACE 2013).

### **3.2.5. Redress mechanisms**

Electors can request redress in case of inaccuracy or omission in the voter registration process in all surveyed countries. The process to seek redress in both Chile and India is relatively simple. Citizens can either change information online (in Chile) or in person at the local electoral office, bringing a document of identification and filing a form indicating voter information that needs to be changed. In Vietnam, voters can request corrections of mistakes in the register within 30 days of the posting of the electoral register at the electoral registry agency, and changes must be made within 5 days of filing a complaint.

Voters in Ghana can only have access to their personal data and request adjustments of any inaccuracies during an exhibition period in which voters can visit an electoral exhibition center and inform the exhibition officer about the corrections that need to be made. If the correction is minor and does not require printing a new card, the change can be made at the electoral exhibition center. If the change requires printing a new card, voters need to visit the Electoral District Office to collect biometrics before a new card can be issued.

## **3.3. Paying Taxes**

Optimally designed tax systems promote balanced economic growth, minimize distortions, and reduce income inequality (Garnier et al. 2013; Amin et al. 2018). Depending on the system's complexity, compliance with the tax systems might involve significant costs for citizens (Vaillancourt et al. 2016). *Living Life's* Paying Taxes focus area includes data on income taxes, deductions, procedures for appeals, and digital technologies in taxation.

All the four surveyed countries have progressive tax systems, in which the tax rate increases as an individual's income increases. Chile is the only country where taxpayers are not eligible for tax deductions based on their dependents. In all economies, tax appeals must be submitted to the tax authorities within 30 to 90 days, a period that is in line with the typical timeframe for tax appeals (21 to 90 days according to Crawford 2013, p.

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<sup>14</sup> <http://www.nvsp.in/>.

302). While tax authorities legally have between 30 and 60 days to put in effect a decision on a tax appeal in Chile, Ghana, and Vietnam, this time frame is stretched to 365 days in India.

### 3.3.1. Deductions

Tax deductions are applied automatically to taxpayers satisfying the criteria established through legislation (Barreix et al. 2017). Tax deductions are intended to compensate disadvantaged individuals or to encourage specific behaviors or expenditures that would be beneficial for society (Poterba 2011; Doerrenberg et al. 2015). In Ghana, India, and Vietnam, tax deductions are applied if an individual has dependents. In Ghana, tax deductions are defined as a fixed amount of 3.45% income per capita for an individual who has a dependent spouse or at least two dependent children.<sup>15</sup> In Vietnam, a deduction of 7.89% income per capita is applied for each dependent. In India, tuition fees paid for the education of any two children qualify for income tax deductions. In Chile, no deductions can be applied based on dependents (Table 3.2).

**Table 3.2: Taxpayer Eligibility for Deduction and Respective Amounts**

Country	Is the taxpayer eligible for any deduction based on his dependents?	Deduction amounts (income per capita)
<b>Chile</b>	No	0%
<b>Ghana</b>	Yes	3.45%
<b>India</b>	Yes	Amount of tuition fees
<b>Vietnam</b>	Yes	7.89%

Source: Living Life data.

Notes: Cost expressed as percentage of GNI per capita using the Atlas Method in current (2016) U.S. dollars.

### 3.3.2. Appeals

The credibility of a tax appeal system is determined by the independence of the appeal body. When tax authorities are dealing with appeals, the possibility of conflict of interest is higher (Crawford 2013). In all four economies, appeals should be first submitted to tax authorities.

The timely resolution of appeals should be ensured by making the appeals process time-bound. The typical timeframe for the relevant tax authority to put in effect a decision on tax appeals ranges from 21 to 90 days, according to an OECD survey of 44 countries, including Chile and India (OECD 2009). To file an appeal, a taxpayer must submit the required documents within 30 days after a tax notice is received in Ghana and India, and within 90 days in Chile and Vietnam (Table 3.3).

**Table 3.3: Time Limits in Appeal Procedures**

Country	Time limit for filing appeals after a tax notice is received by the taxpayer (days)	Time limit for the relevant authority to put in effect a decision on the tax appeal (days)
<b>Chile</b>	90	60
<b>Ghana</b>	30	60
<b>India</b>	30	365
<b>Vietnam</b>	90	30

Source: Living Life data

<sup>15</sup> According to Ghana's Income Tax Act (Act 896), one currency point is equivalent to one Ghana cedi.

Effective appeal mechanisms also provide for timeliness of appeal decisions. Imposing reasonable time limits to decide on tax appeals is a good practice (Crawford 2013). Appeal decisions should be made within 30 days in Vietnam, and within 60 days in Ghana and Chile. In contrast, it takes a year for the relevant authority to put in effect a decision on a tax appeal in India. Long time frames for a decision on an appeal not only present uncertainty, but also affect the financial health of a taxpayer. In case of an adverse decision, a taxpayer might incur an excessive expense to pay the penalty as well as interest on any unpaid tax (Crawford 2013).

### **3.3.3. Digital technology**

The adoption of digital technology benefits both taxpayers and public authorities and promotes efficiency in tax administration (PWC and World Bank 2018). In recent years, income tax e-filing systems have become more prominent. The opportunity to pay taxes electronically provides convenience to taxpayers and reduces time, costs of compliance, and calculation errors. For the tax authorities, electronic filing minimizes the workload and reduces the cost of processing and handling tax forms (Che Azmi and Kamarulzaman 2010). Tax authorities in Chile, India, and Vietnam offer taxpayers the functionality of filing taxes online. In Ghana, tax filing cannot be done online. After a tax notice is received by a taxpayer, an appeal procedure is possible in all four surveyed economies. In India, appeal documents can be submitted electronically, whereas in Ghana, Chile, and Vietnam, the required documentation should be filed in person.

## **3.4. Access to Health**

Ensuring healthy lives and promoting well-being for all is essential to sustainable development. While many efforts have been set forth to increase life expectancy and to reduce child and maternal mortality, there is still much more that needs to be done to completely eradicate a wide range of diseases and address persistent and emerging health issues.<sup>16</sup> One of the targets of SDG 3.8 is to “achieve universal health coverage, including financial risk protection, access to quality essential health care services and access to safe, effective, quality and affordable essential medicines and vaccines for all.” Understanding the barriers to access to health care is an important step towards achieving this goal.

To understand the administrative barriers that citizens face while seeking access to health care services, *Living Life* collected data on procedures, requirements, time, and costs in accessing six different health care services provided by public health institutions in the surveyed economies.<sup>17</sup> These six services include family planning (oral contraception), antenatal care, skilled birth attendance, diphtheria-tetanus-pertussis (DTP) immunization, HIV testing and antiretroviral therapy (ART), and tuberculosis testing and treatment. These services were selected because “they involve health interventions from which every individual in every country should benefit – no matter what the country’s level of socioeconomic development or epidemiological

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<sup>16</sup> Goal 3 of the Sustainable Development Goals aims to ensure healthy lives and promote well-being for all at all ages.

<sup>17</sup> The term “procedure” in this section is defined as an interaction between patients and health care providers and should not be interpreted as a medical procedure (i.e. medical test or treatment). Complete definitions can be found on Appendix A.

circumstances, and no matter what type of health system it may have – and because recent, comparable data are available for most countries,” according to the World Health Organization-World Bank first monitoring report on universal health coverage (World Health Organization-World Bank 2015).

The study on access to health revealed that procedures undergone by citizens in most of the health services provided by public health institutions are streamlined in all four pilot countries. However, the study found that patients accessing family planning services, antenatal care, and HIV/AIDS testing and treatment through primary health care (PHC) centers experienced time to treatment that was almost twice as long as patients seeking the same services through hospitals.

### **3.4.1. Public health facilities**

The Access to Health questionnaire attempted to capture the process for accessing public health institutions that are most commonly used for each of the services provided. Health facilities were categorized as primary health care (PHC) centers, hospitals, or other such as outpatient clinics (OPC) available in the public health system.

While HIV testing and treatment services are provided at PHC centers in Chile and at hospitals in both Ghana and India, HIV services in Vietnam are provided at OPCs funded mostly by donors. OPCs are co-located either in district health centers or in hospital settings but are not well integrated into the country’s public health system.<sup>18</sup>

### **3.4.2. Procedures and requirements**

For most of the treatment services provided by public health facilities, patients go through an average of 2 to 3 procedures. The number of procedures does not vary by the type of facility, but rather by the type of service provided.

Women in Vietnam must undergo 1 procedure in order to access family planning services, consisting of going to the pharmacy and receiving the combined oral contraceptive. In Ghana, women undergo 2 procedures to access this service, consisting of scheduling an appointment with the health care provider, and then attending the appointment on the scheduled day and time to receive the combined oral contraception. In both Chile and India, family planning services are offered after a set of 3 procedures: scheduling an appointment with the health care provider, attending the appointment on the scheduled day and time, and retrieving the combined oral contraception at a pharmacy.

In all four economies, women undergo 2 procedures in order to access antenatal care services, which consist of scheduling a visit or appointment with the health care provider and attending the appointment on the day and time scheduled.

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<sup>18</sup> More information available at [http://www.lmgforhealth.org/sites/default/files/Policy\\_OPC\\_A4\\_final25Sept.pdf](http://www.lmgforhealth.org/sites/default/files/Policy_OPC_A4_final25Sept.pdf).

The same two procedures were also observed for patients seeking DTP immunization. Parents must also bring the child’s document of identification and vaccination/immunization card/booklet to record the shot received.

To get tested for HIV/AIDS, patients in all four economies undergo an average of 3 procedures: i) going to health facility to request an appointment for HIV/AIDS testing, ii) being examined by a health professional and receiving pre-test counseling, and iii) taking a blood sample for testing. In all four economies, if results are positive, patients receive post-test counseling and are referred to antiretroviral therapy (ART), a practice that is in compliance with the World Health Organization’s Guiding Principles for expanded testing and counseling.<sup>19</sup>

Patients testing positive for HIV are recommended to start ART, the goal of which is to prevent HIV-associated mortality and enable a normal life for patients (Kavanagh et al. 2015). Patients can receive ART in Chile by applying to *Garantía Explícita de Salud (GES)*, which requires a scheduled appointment at the health facility. Once patients meet the requirement and schedule the appointment, they go through a consultation to receive informed consent and a prescription for ART medication, obtain ART medication at the pharmacy, and complete a total of 4 additional procedures. In Ghana and India, patients go through 2 separate procedures to start ART therapy which include appearing at the health facility where they will undergo a physical examination and retrieving ART medication to start treatment. Vietnam has the longest process for starting ART treatment with 5 procedures that need to be completed by patients including i) attendance at a health facility and registration for consultation; ii) completion of a health assessment by the practitioner; iii) submitting an application for ART treatment; iv) pilot testing of the medication for adherence, and v) starting of ART treatment.

Procedures for tuberculosis testing in the four economies vary according to the type of test performed at the health facility and subsequent requests made by doctors according to the initial diagnostic. In general, patients in all four economies go through an average of 3 procedures to be initially tested for tuberculosis: i) scheduling appointment for tuberculosis testing, ii) attending appointment to be tested, and; iii) returning to the health facility for either test reading or to retrieve initial test results. If results are positive or inconclusive, doctors can request other tests (i.e. chest x-ray, sputum analysis) to confirm the diagnostic, in which case citizens would go through additional procedures according to the doctor’s recommendations. Tuberculosis treatment can start upon confirmation of diagnosis in all four economies. Table 3.4 below provides a summary of the number of procedures between citizens and health care providers by service and economy.

**Table 3.4: Summary of Procedures by Economy by Type of Service**

Type of Service	Chile	Ghana	India	Vietnam
<b>Obtain combined oral contraception</b>	3	2	3	1
<b>Obtain an antenatal care visit</b>	2	2	2	2
<b>Obtain DTP immunization</b>	2	2	2	2
<b>HIV/AIDS testing</b>	3	3	2	3
<b>HIV/AIDS treatment (ART)</b>	4	2	2	5

<sup>19</sup> WHO’s Guiding Principles outlines three principles that should be followed by all services offering HIV testing and counselling: HIV testing should be voluntary; Confidentiality must be protected; Post-test support services should be offered. More information can be found at [http://www.who.int/3by5/publications/briefs/en/testing\\_counselling.pdf?ua=1](http://www.who.int/3by5/publications/briefs/en/testing_counselling.pdf?ua=1).

<b>Tuberculosis testing</b>	3	3	3	3
<b>Tuberculosis treatment</b>	3	3	3	2

Source: Living Life data

### 3.4.3. Time and Cost

All antenatal care appointments and visits are free of charge when done through the public health system in all economies. Pregnant women do not need to be accompanied by someone else to attend an antenatal appointment. The World Health Organization (2016) recommends a minimum of eight antenatal visits to reduce perinatal mortality and to improve women’s pregnancy experiences. Even though antenatal care is widely available and free of charge, UNICEF data indicates that 87% of pregnant women in Ghana, 74% of pregnant women in Vietnam, and only 45% of pregnant women in India received at least four antenatal care visits 2014 when the World Health Organization’s recommendation was for pregnant women to receive a minimum of four antenatal visits.<sup>20</sup>

Having a skilled birth attendant at the time of birth is free of charge in Chile, Ghana, and India when pregnant women opt to deliver in public health institutions. In these three economies, it is not possible to have a skilled birth attendant at the pregnant woman’s home at the time of birth, as opposed to in Vietnam where skilled birth attendants are available for home births. No data was collected for Vietnam regarding the cost of having a skilled birth attendant at the time of birth.

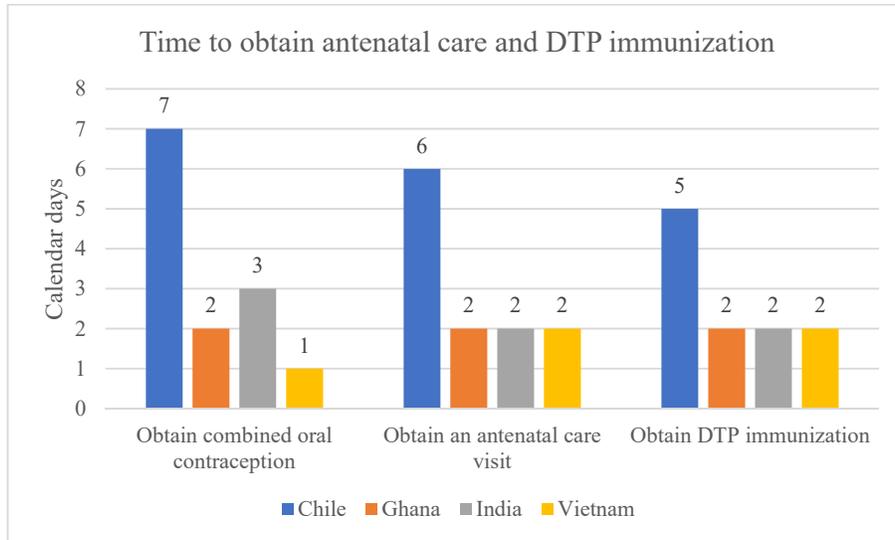
DTP immunization is mandatory by law in all four economies through their national expanded immunization programs. The World Health Organization recommends 3 initial doses, followed by 3 booster doses that should be administered to children and adolescents with at least 4 years between each booster dose.<sup>21</sup> Although all surveyed economies provide the first three doses of DTP immunization for free during the first semester of life, only Chile and India provide subsequent booster doses of the vaccine free of cost.

The data on time from initial contact to onset of treatment was provided by a limited number of respondents. As a result, the evidence is not representative of the average citizen experience. The average time in practice reported by contributors to access to antenatal care treatment and to obtain DTP immunization is 2 days in 3 out of 4 pilot economies. The time to obtain a combined oral contraception in all four countries varies. Figure 3.5 shows the time it takes for a woman to access family planning services, to receive antenatal care, and to have access to DTP immunization for her children in all four economies.

**Figure 3.5: Time to Receive Family Planning, Antenatal Care, and DTP Immunization Services in Public Health Facility (calendar days)**

<sup>20</sup> UNICEF global databases, 2016, based on Multiple Indicator Cluster Surveys (MICS), Demographic and Health Surveys (DHS) and other nationally representative sources. No data available for Chile in 2014. Available at: <https://data.unicef.org/topic/maternal-health/antenatal-care/>.

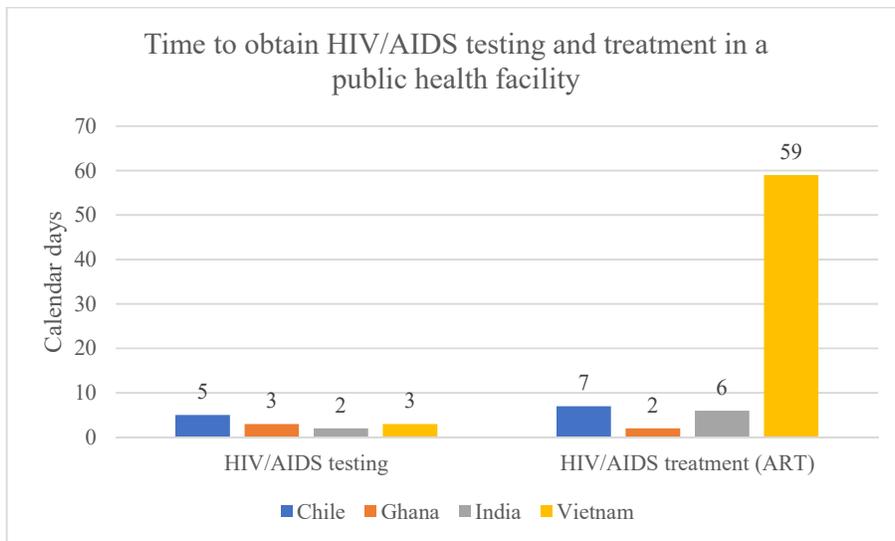
<sup>21</sup> Summary of WHO Position Papers – Recommendation for Routine Immunization (Updated on March 2017). Available at [http://www.who.int/immunization/policy/Immunization\\_routine\\_table1.pdf](http://www.who.int/immunization/policy/Immunization_routine_table1.pdf).



Source: Living Life data

While the time frame to obtain HIV/AIDS testing reported by contributors in all four economies ranged from 2 to 5 days, the total time it takes to start HIV/AIDS treatment can vary from 2 days in Ghana up to 59 days in Vietnam, where patients undergo pre-therapy adherence counseling sessions before receiving their ART medications (Trinh et al. 2011). Figure 3.6 shows the time it takes to obtain both HIV/AIDS treatment in a public health facility in all four economies.

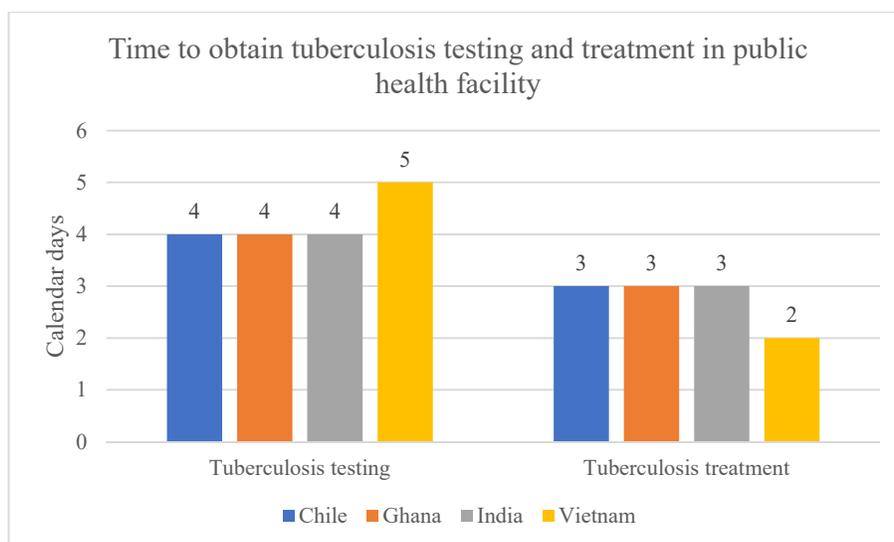
**Figure 3.6: Time to Obtain HIV/AIDS Treatment in a Public Health Facility (calendar days)**



Source: Living Life data

The timeframe to obtain tuberculosis testing and treatment reported by contributors is the same in Chile, Ghana, and India. In Vietnam, it takes 1 day longer to access to tuberculosis testing than in other countries. On the other hand, Vietnamese citizens can start tuberculosis 1 day sooner than citizens in the other three economies (Figure 3.7).

**Figure 3.7: Time to Obtain Tuberculosis Treatment in a Public Health Facility (calendar days)**



Source: Living Life data

### 3.5. Access to Education

Education can contribute to an individual's long-term social and financial opportunities. Inclusive education systems are the foundations of more equitable societies (OECD 2008). *Living Life's* Access to Education focus area aims to understand bureaucratic challenges for accessing each level of education including enrollment procedures, requirements, and costs.

Access to Education data found that primary school enrollment is free and compulsory in all surveyed economies. Secondary school enrollment is free of charge in all economies except Vietnam. Public tertiary education is only available for a fee in all economies. While in India and Vietnam students are assigned to specific primary and secondary schools based on their residential address, this criterion is not imposed in Chile and Ghana, where children can be enrolled in any public primary or secondary school.

#### 3.5.1. Procedures and requirements

The minimum requirement to be enrolled into primary education in all four economies is the attainment of the age established by legislation to start compulsory basic education (Table 3.5). In order to move to secondary education students must have completed primary school as proven by relevant records or certificates. Enrollment into tertiary education is conditional upon the successful completion of secondary education as proven by relevant examinations or certificates.

**Table 3.5: Compulsory School Enrollment by Age**

Country	From what age	Until what age
Chile	5	18
Ghana	4	18
India	6	14
Vietnam	6	11

Source: Living Life data

Chile is the only country where part of the enrollment process in preschool, primary, and secondary education can be done online, and consists of only 2 procedures. The first procedure is through an online portal powered by the Ministry of Education and is comprised by four steps: i) searching and selecting the school, ii) registering and inputting personal information about the student, iii) choosing the order of preference of selected schools, and iv) retrieving results about the school in which the student can be enrolled and choosing to accept or decline the offer. The second procedure is conducted at the chosen educational institution when parents finalize the enrollment process.<sup>22</sup>

In Ghana, India, and Vietnam, one must follow on average two procedures, neither of which can be done online. These include going to the school to check if a child can be admitted and submitting the required documents. In Ghana, the required documents include a birth certificate and a weight card. In Ghana, matriculation to secondary education is automatic upon completion of the primary level. In India, in addition to a birth certificate and a proof of address, parents must submit specific documentation to satisfy the requirements for the Right of Children to Free and Compulsory Education Act 2009, which contains a provision to admit 25% of the children from disadvantaged groups. This additional documentation includes a caste certificate, an income certificate, and a certificate of belonging to a disadvantaged group. A certificate of primary education completion is required when matriculating to secondary school. In Vietnam, the list of required documents includes a birth certificate, the household booklet, and the child’s vaccination book.

In many countries, school enrollment is dependent on proof of residence. In India and Vietnam, students are assigned to specific primary and secondary schools based on their residential addresses. In Chile and Ghana, public primary and secondary school assignment is not tied to the student’s residential address. The residency requirement, however, might present obstacles to access to education for people lacking official residency status, migrants, internally displaced people, and marginalized groups of the population (UNESCO 2010).

### 3.5.2. Costs

Recognizing the importance of preschool education, the Incheon Declaration calls for the provision of at least one year of free and compulsory pre-primary education (UNESCO 2016). Preschool education is free of charge in Chile and India. In Vietnam, lower income households pay reduced fees for preschool education. To obtain the reduction, a household must be certified as a “poor family” by the People’s Committee at the Ward Level.

Primary education is compulsory and free in all four pilot economies in line with UNESCO’s recommendations and the Universal Declaration of Human Rights (Table 3.6).

**Table 3.6: Access to Free Education by Level and by Economy**

<b>Economy</b>	<b>Preschool</b>	<b>Primary</b>	<b>Secondary</b>	<b>Higher</b>
<b>Chile</b>	✓	✓	✓	✗
<b>Ghana</b>	✗	✓	✓	✗

<sup>22</sup> Information about the enrollment process in Chile can be found on the Ministry of Education enrollment portal at <https://www.sistemadeadmisionescolar.cl/como-se-postula/>.

<b>India</b>	✓	✓	✓	✗
<b>Vietnam</b>	✗	✓	✗	✗

Source: *Living Life* data

Note: Cells with check marks indicate that education is available for free, while cells with cross marks indicate that education is not available for free.

The International Covenant on Economic, Social, and Cultural Rights lays down the provisions for the progressive introduction of free secondary education, which is already available in Chile, Ghana, and India, but not in Vietnam. In all four surveyed economies, higher education is only available for a fee. Chile is currently undergoing reforms to make higher education free of charge.<sup>23</sup>

### 3.6. Access to Utilities

Access to water and adequate sanitation are not only essential to the realization of human rights, but also crucial for poverty reduction and achievement of the sustainable developing goals.<sup>24</sup>

To measure citizens' ability to access essential utilities such as electricity, water, and sanitation, *Living Life* collected data on procedures, requirements, time, costs, and documents required for establishing a new household connection to the electrical grid, to the water system (defined as water service pipe connected with in-house plumbing to one or more taps), and to the sanitation system. The study also includes data on billing and payment methods and redress mechanisms such as the availability of smart meters and consumption benchmarking. Electricity data was not collected for India.

The study on Access to Utilities found that electricity, water, and sanitation services are provided by state-owned companies in three of four surveyed economies, with Chile being the only country to have undergone a privatization process that handed over the supply of utilities to private companies. Ghana is the only country that does not have a sanitation system in place in the main business city. Online payment of water bills is only possible in Chile, India, and Vietnam, while citizens in Ghana must make payments in person at designated offices or banks.

#### 3.6.1. Utility providers

Electricity, water, and sanitation services in Santiago, Chile are supplied by companies with a private majority shareholder, a reflection of the privatization process that the country went through in the 1980s (Baer 2014). Chile cannot, therefore, be considered a country where services are offered by the State, although electricity is regulated by the 1982 Electricity Act enacted by the Government of Chile (Pollitt 2004).

<sup>23</sup> <https://www.telesurtv.net/english/news/Chiles-Congress-Approves-Free-Higher-Education--20180125-0007.html>.

<sup>24</sup> As recognized by Resolution 64/292 of the United Nations General Assembly.

The electricity suppliers are state-owned in Ghana and Vietnam. Electricity in Ho Chi Minh City, Vietnam is supplied by Electricity of Vietnam (EVN), which is an integrated state-owned monopoly that covers all elements from power generation, to distribution, to retail of energy.<sup>25</sup> In Accra, Ghana, electricity is supplied by the Electricity Company of Ghana.

Water and sanitation services in Mumbai, India are both provided through a single public utility supplier, an agency under the Municipal Corporation of Greater Mumbai.<sup>26</sup> In Ho Chi Minh City, water and sanitation services are provided by separate public utility suppliers, the Saigon Water Corporation and the District Urban Drainage Service.<sup>27,28</sup> Although Accra provides water services through its state-owned company, Ghana Water Company Limited, there is no public sanitation provider. A waterborne sewerage system is available to roughly five percent of households and most solid and liquid waste is collected in septic tanks and latrines. Each household builds an individual septic tank to handle solid and liquid waste, which is then collected by private sanitation service companies once tanks are full. Oftentimes, households dispose of their liquid waste water into storm water gutters (Government of Ghana 2008).

### **3.6.2. Procedures and cost**

In Chile, Ghana, and Vietnam, citizens have to undergo 3 procedures to have their households connected to the electric power network. These three procedures include applying to request a new connection, receiving a field inspection by a utility professional for the provision of a quotation, and paying the quotation to obtain service. In Chile, an additional procedure is required to signing an electricity supply contract. A final inspection is not required in any of the economies.

In Ghana, there is a cost attached to filing an application to request a new electricity connection. Households in Accra purchase a supply application form for USD\$2.38. In Vietnam and in Chile, users can fill out application forms for free.

Electricity service fees in Ghana are charged either through prepayment or meter credits, also called Smart Cash, where consumers purchase a certain amount of credits that will then be applied to household electricity consumption. In other countries, electricity service fees are usually calculated and charged post-consumption, meaning that the service fee is calculated and assessed only after the meter is read and total consumption for the period is defined. There are no best practices regarding payment methods for electricity. While utility companies can benefit from prepayment plans to reduce financial risks and service costs, some studies argue that these plans can detrimentally affect consumers – especially low-income and vulnerable consumers – in a multitude of ways.

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<sup>25</sup> More on the topic here <https://blogs.duanemorris.com/vietnam/2017/08/01/the-price-of-power-in-vietnam-not-all-dollars-and-cents/>.

<sup>26</sup> <http://www.mcgm.gov.in>.

<sup>27</sup> <http://www.sawaco.com.vn>.

<sup>28</sup> <http://udc.com.vn/en/>.

With prepayment plans, consumers are more prone to paying burdensome transaction fees and face an increased risk of electricity shut-off when prepaid credits have been exhausted (Howat and McLaughlin 2012).

In order to have their households connected to the water network, citizens in all four economies have to go through 3 procedures including requesting a feasibility study, requesting water connection service, and paying a connection fee. In Chile, citizens must go through an additional procedure that involves obtaining a final inspection before having the water turned on. A final inspection is not required procedure in Ghana, India, or Vietnam. However, a final construction inspection is important to verify whether there are leaks or damages in the piping work that could compromise the construction.<sup>29</sup>

In Chile, it is possible to submit a joint request for a water and sanitation feasibility study, whereas in India these are two separate procedures despite both services being supplied by the same provider. In Ghana and Vietnam, water suppliers are not the same as sanitation suppliers. As a result, it is not possible to request a joint feasibility study for connection to both utilities.

### **3.6.3. Online procedures and digital components**

It is not possible to request a new electricity connection online in Chile or Ghana. The study did not capture data on this aspect for Vietnam or India. In both Chile and Ghana, citizens are required to have a meter installed in the connected household.

Paying the water bill online is possible in Chile, India, and Vietnam through the water utilities' websites. In Ghana, payments are only accepted in person at the utility company's regional or district offices, through dedicated kiosks, or through authorized banks, financial institutions, and private collectors.<sup>30</sup>

## **4. Conclusions and Lessons Learned**

Citizens all over the world deal with bureaucratic complexity in their interactions with governments, governmental agencies, and service providers. Two of the four economies surveyed by *Living Life* still lag in implementation for the digital components of civil registration and identification systems, which may increase the bureaucratic complexity faced by citizens to register births and deaths or to obtain an ID.

In three of the four surveyed economies, citizens are required to have a specific, single-purpose document or voter ID card to cast a ballot. In none of the four economies is voting mandatory. Requiring citizens to go through a specific set of procedures that can be both costly and time consuming to access these specific documents can discourage citizens from engaging in the election processes.

The lack of electronic or online resources and the requirement of presenting documents, forms, and payments of fees in person can be substantial obstacles for citizens to exercise their rights and to access basic services. For example, while tax e-filing systems are available in three of the four surveyed economies, tax payers can only submit tax appeals electronically in one economy, while citizens in the remaining surveyed economies

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<sup>29</sup> <http://www.agcs.allianz.com/assets/PDFs/white%20papers/AGCS%20Water%20Damage%20Loss%20Control%20Guide%20053112rev.pdf>.

<sup>30</sup> [http://www.gwcl.com.gh/pay\\_points.html](http://www.gwcl.com.gh/pay_points.html).

must submit their appeals in person. The possibility of filing and paying taxes online is convenient to taxpayers as it reduces the time and costs of compliance while also mitigating calculation errors. Taxpayers would benefit from integrated systems that offer the possibility of submitting appeals online, which could in return optimize the response time by tax authorities, provide more security, and reduce uncertainty.

The absence of electronic or online resources for new utility connections or for paying utility bills also adds an extra layer of bureaucracy to citizen interactions with utilities providers as in person processes are oftentimes costlier and time consuming.

In the surveyed economies, the number of procedures between citizens and health care providers for access to services does not vary according to the type of facility, but by the type of service provided. However, patients accessing certain services at PHC centers may experience longer times to treatment than patients who seek access to the same services in hospitals.

Students are assigned to specific primary and secondary schools based on their residential addresses in half of the surveyed economies, which might limit students' abilities to access quality education regardless of their residency or housing status.

A few general lessons can be drawn from the *Living Life* pilot. First, the surveys designed for this study attempted to collect data on both the legal/procedural requirements, and the practical side of citizen interaction with governments and services providers. The team concluded that contributor-based data collection is an adequate tool for soliciting responses on legal and procedural regulations, but it does not provide a complete picture of the practical aspects of citizen-government interactions. User experiences vary due to individual circumstances and factors that are not always associated to the legal and regulatory framework applicable to each set of interactions. While contributors can provide accurate information on the legal requirements, documents and procedures undergone by citizens while accessing public services and goods, they cannot represent the variety of experiences faced by different individuals. This was mainly observed while attempting to collect data for areas such as paying taxes, access to health, access to education, and access to utilities. In these areas, the most relevant information regarding interactions lies in the practical experience of respondents rather than on what is written in laws or regulations. Therefore, surveys aimed at collecting data from a representative sample of households would be the optimal approach to retrieve data about citizen-government interactions based on the respondents' own experiences.

Moving forward, the team should refine and redesign the questionnaires according to the type of data collection – contributor-based or household survey – with relevant questions that target specific audiences. Household surveys must have questions that are crafted in a more straightforward and intuitive manner. Contributor-based questionnaires should be more technical and require respondents to indicate the corresponding legal basis for their answers.

A second lesson learned was that the initial scope of the project was too complex and nuanced to be dealt with using limited human and financial resources. Each area of study requires technical skills, extensive research, and in-depth sector-specific analysis in order to convey the project's ultimate goal, which is to measure bureaucratic complexity in citizen-government interactions. Moving forward, *Living Life* would benefit from refinement of its methodology by selecting only two or three areas of study for in-depth data collection and

analysis. Adding a larger set of countries for data collection may result in greater variability and more robust conclusions.

The present research project, however, has proven itself useful in outlining specific legal and regulatory frameworks for the selected citizen-government interactions, which can be used for future reference and the eventual development of more sophisticated research tools.

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# Appendix A: Data Notes

## Surveyed cities

Data collection was performed in the main business cities of each of the surveyed economies: Santiago in Chile, Accra in Ghana, Mumbai in India, and Ho Chi Minh City in Vietnam. The criteria for choosing the mentioned cities was drawn from the *Doing Business* report published in 2017.

## Case assumptions

Each topic-specific questionnaire received its own case study assumption and was designed with the intent to guide contributors answering the questions and enabling standardized answers from respondents.

### a. Registering a Birth

The questionnaire reflects the situation of a typical birth in the main business city of each economy. Each question was completed under the assumption that the person conducting the procedure was a man in a registered marriage (unless otherwise specified in questionnaire sections) who was the father of the child. Respondents also took into consideration the following assumptions:

- The birth was a live birth;
- Both parents of the child are alive;
- The birth occurred in a licensed public health care facility (e.g. hospital, clinic);
- The birth was attended by trained medical professionals (e.g. doctor, midwife);
- The birth is being registered by a married father who is in a registered marriage (unless specified otherwise) within one week of the birth;
- The birth certificate is being requested by a married father who is in a registered marriage (unless specified otherwise) within one week of the birth;
- The birth takes place in the main business city of the pilot country;
- The birth registration and certification take place in the main business city of the pilot country; and
- If the economy provides a “short” and a “long” form of the birth certificate, please assume that the application refers to the “long” (unabridged) certificate.

### b. Registering a Death

The questionnaire reflects the situation of a man in the main business city of the pilot country who wants to register the death of his father. As such, the following assumptions about the individual in question were taken into consideration:

- The citizen is a 30-year-old man, who resided in the main business city of the pilot country and is a citizen, a legally recognized national of the pilot country, either native or naturalized;
- The deceased person is the 80-year-old father of the citizen. The father is also a citizen and is survived by his wife and two children (one adult son and one adult daughter);
- The death has happened by natural causes while the deceased person was at home; and  
The deceased resided in the main business city, unless otherwise stated.

### c. Getting an ID

The questionnaire reflects the situation of a man in the main business city of the pilot country who wants to obtain a document for legal identification. As such, the following assumptions about the individual in question were taken into consideration:

- The citizen is a 25-year-old married man, who resides in the main business city of the pilot country and is a citizen, a legally recognized national of the pilot country, either native or naturalized; and

- The individual has been registered at birth, has a birth certificate, and has never applied for a document of identification before.

**d. Voting**

The voter is a 30-year-old man, who resides in the main business city of the pilot country and is a citizen, a legally recognized national of the pilot country, either native or naturalized. He never voted before and wants to know what he needs to do in order to be able to register and vote in the next election.

**e. Paying Taxes**

The questionnaire reflects the situation of a taxpayer that is a 30-year-old man who resides in the main business city of the pilot country and is a citizen, a legally recognized national of the pilot country, either native or naturalized. He has three dependents: a wife and two children of ages 6 and 12. He is employed by a private company. Questions were answered keeping in mind the tax policies in place for the fiscal year ending in 2017. The taxpayer is the only income earner in the household and his gross earnings are equal to 3 times the economy’s gross national income (GNI).<sup>31</sup>

Country	Gross Earnings in Local Currency Units (per year)
Chile	CLP 27,670,000.00
Ghana	GHS 8,676.00
India	INR 307,930.00
Vietnam	VND 129,500,000.00

**f. Access to Health**

The questionnaire reflects the reality of citizens seeking access to various health services in the main business city of each of the pilot countries. Each health service outlined in the questionnaire has its own specific set of case assumptions that serve as parameter for the answers, as explained below:

- i. Family planning:** The woman is a sexually active, married, between 21-49 years old, in good health condition and medically eligible for the use of combined oral contraceptives. She resides in the main business city and is a citizen, a legally recognized national of the pilot country, either native or naturalized. She is formally employed, and she does not have private health insurance.
- ii. Antenatal Care:** The pregnant woman is a married 30-year-old who has not given birth or been pregnant before. She has no complications during the pregnancy and her childbirth method is set to be natural (vaginal) delivery. She resides in the main business city and is a citizen, a legally recognized national of the pilot country, either native or naturalized. She is formally employed, and she does not have private health insurance.
- iii. Skilled Birth Attendance:** The pregnant woman is a 30-year-old married woman who has not given birth or been pregnant. She has no complications during the pregnancy and her childbirth method is set to be natural (vaginal) delivery. She resides in the main business city and is a citizen, a legally recognized national of the

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<sup>31</sup> The case assumptions in the questionnaires reflect 3 times the GNI per capita Atlas Method (in current USD) as made available by the World Bank Database for the year 2015. The GNI per capita was converted into LCU using the Official Exchange Rate (LCU per USD) as made available by the World Bank Database for the year 2015.

pilot country, either native or naturalized. She is formally employed, and she does not have private health insurance. The skilled birth attendant is a skilled health professional (i.e. doctor, nurse, or midwife).

- iv. **Children Immunization:** The parent is a 30-year-old woman who is married and has a one-year-old male child. They both reside in the main business city and are citizens, legally recognized nationals of the pilot country, either native or naturalized. The woman is formally employed, and neither she nor the child have private health insurance. The DTP coverage means the immunization among 1-year-old children.
- v. **HIV/AIDS:** The patient is a 40-year-old sexually active, married man that has never been tested for HIV/AIDS before. He resides in the main business city and is a citizen, a legally recognized national of the pilot country, either native or naturalized. He is formally employed and he does not have private health insurance.
- vi. **Tuberculosis:** The patient is a 40-year-old man who resides in the main business city and is a citizen, a legally recognized national of the pilot country, either native or naturalized. He is formally employed, and he does not have private health insurance.

Diseases approached by the questionnaire were chosen based on the World Health Organization-World Bank first monitoring report on universal health coverage, which identified a set of core indicators that cover issues such as reproductive and newborn health, child immunization, infectious diseases therapy, and improved water sources and sanitary facilities (World Health Organization-World Bank 2015). These issues were chosen because they involve health interventions “from which every individual in every country should benefit – no matter what the country’s level of socioeconomic development or epidemiological circumstances, and no matter what type of health system it may have” (World Health Organization-World Bank 2015, 1).

#### **g. Access to Education**

The questionnaire reflects the situation of the following prototypical citizen:

- The household consists of a man and a woman, married to each other, two sons of 3 and 12 years of age, and two daughters of 6 and 18 years of age.
- They are all citizens of the main business city and reside in the pilot country. None of the children has been held back any grade;
- The household income is not subject to any tax exemption or special regime, and does not qualify for government subsidies; and
- For each level of education, the questionnaire refers to the largest public co-educational institution in the main business city of the pilot country. For tertiary education, it is considered the application to an undergraduate program in Business Administration.

#### **h. Access to Electricity**

The questionnaire reflects the situation of a 30-year-old man that lives with his spouse in the main business city of the surveyed economy. Both are citizens and/or legally recognized nationals of the pilot country, either native or naturalized. They never had a connection to the power grid before and want to know what they need to do in order to be able to have an electricity connection in their house.

- The house is in the process of being finished and is in compliance with all necessary licenses and permits;
- The house is located in the urban area of the main business city and within 150 meters of the power network;

- The house has two bedrooms, one bathroom, one kitchen, and one living room. The total area of the house is 120 square meters;
- The customer does not have taxes or public fees that are currently pending payment;
- Number of persons per household: 2 (two);
- The household income is not subject to any tax exemption or special regime, and does not qualify for government subsidies; and
- Household energy consumption varies between pilot countries according to the table below.<sup>32</sup>

Country	Household energy consumption (per year)
Chile	7,757 kWh
Ghana	765 kWh
India	1,530 kWh
Vietnam	2,879 kWh

- Household electricity load is 60 Amperes, or the typical capacity for a house of the size described above in the region. Contributors were asked to specify whether the capacity in the region is different from 60 amperes.<sup>33</sup>

#### **i. Access to Water and Sanitation**

The questionnaire reflects the situation of a 30-year-old man that lives with his spouse in the main business city of the pilot country. Both are citizens and/or legally recognized nationals of the pilot country, either native or naturalized. They have never had access to a piped water and sewerage connection before and want to know what they need to do in order to be able to have access to it.

- The house is in the process of being finished and is in compliance with all necessary licenses and permits;
- The house is located in the urban area of the main business city of the pilot country and is located close to the water and sewerage network;
- The customer does not have taxes or public fees that are currently pending payment;
- The household income is not subject to any tax exemption or special regime, and does not qualify for government subsidies;
- Number of persons per household: 2 (two); and
- Household water consumption: 100 cubic meters per year.<sup>34</sup>

#### **Procedures, time, and cost**

The following concepts were defined and included in each of the questionnaires in order to assist contributors while answering the questionnaire, and the team during the coding process:

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<sup>32</sup> Electric power consumption calculated per household of two persons, according to the Electric Power Consumption (kWh per capita per year) index as defined by the International Energy Agency data set for 2013, available at the World Bank's DataBank.

<sup>33</sup> Electricity load was defined by the team based on Bank wide consultation with experts in Electricity.

<sup>34</sup> Household water consumption calculated per household of two persons based on the average domestic consumption (cubic meters per person per year) between the four pilot countries according to the Freshwater Withdrawal Index by World Water Database (2010 Update).

- a) **Procedure:** A procedure is an interaction between the citizen and the government or administrative branch, directly or indirectly. Procedures can be simultaneous, and their time and completion should be counted jointly, and not subsequently. A step is a component part of a procedure. Steps may include submitting, filing, signing, etc.
- b) **Time:** Time is recorded in calendar days and captures the median duration of each procedure. The minimum time for a procedure is 1 day (e.g. even if a procedure is completed within less than 24 hours, it should be considered as a day). For procedures that can be completed online in less than 1 day, the duration should be noted as “Less than one day (online procedure).”
- c) **Cost:** Cost reflects only official fees and taxes. Cost are reported by contributors in units of the local currency and are recorded in this paper as a percentage of the country’s income per capita calculated using the Atlas Method in current (2016) U.S. dollars.
- d) **Legal Basis:** When asked to provide a legal basis, the answers should be based on statutory or codified law for civil law systems and case on law for common law systems. Customary law is not taken into account unless it has been codified. The answers are based solely on the letter of the law and not the implementation or practice thereof.
- e) **Survey City:** Each economy’s survey city was drawn from the *Doing Business* report, which chooses the main business city in each economy.
- f) **Variation component:** Although each questionnaire has its own set of assumptions, there are certain variations described in specific questions. Those variations were added to the questionnaires in order to understand if procedures differ or change if different assumptions are present.

### **Legal requirements**

Where indicated in each questionnaire, questions are aimed at capturing legal obligations, requirements, documents, deadlines, and timeframes established by codified laws, regulations, and other legally binding documents that are part of an economy’s legislative framework.

### **Digital component**

Where indicated in each questionnaire, questions attempt to collect data regarding the possibility of completing steps and procedures online and the adoption of electronic systems and/or digitized databases by service providers.