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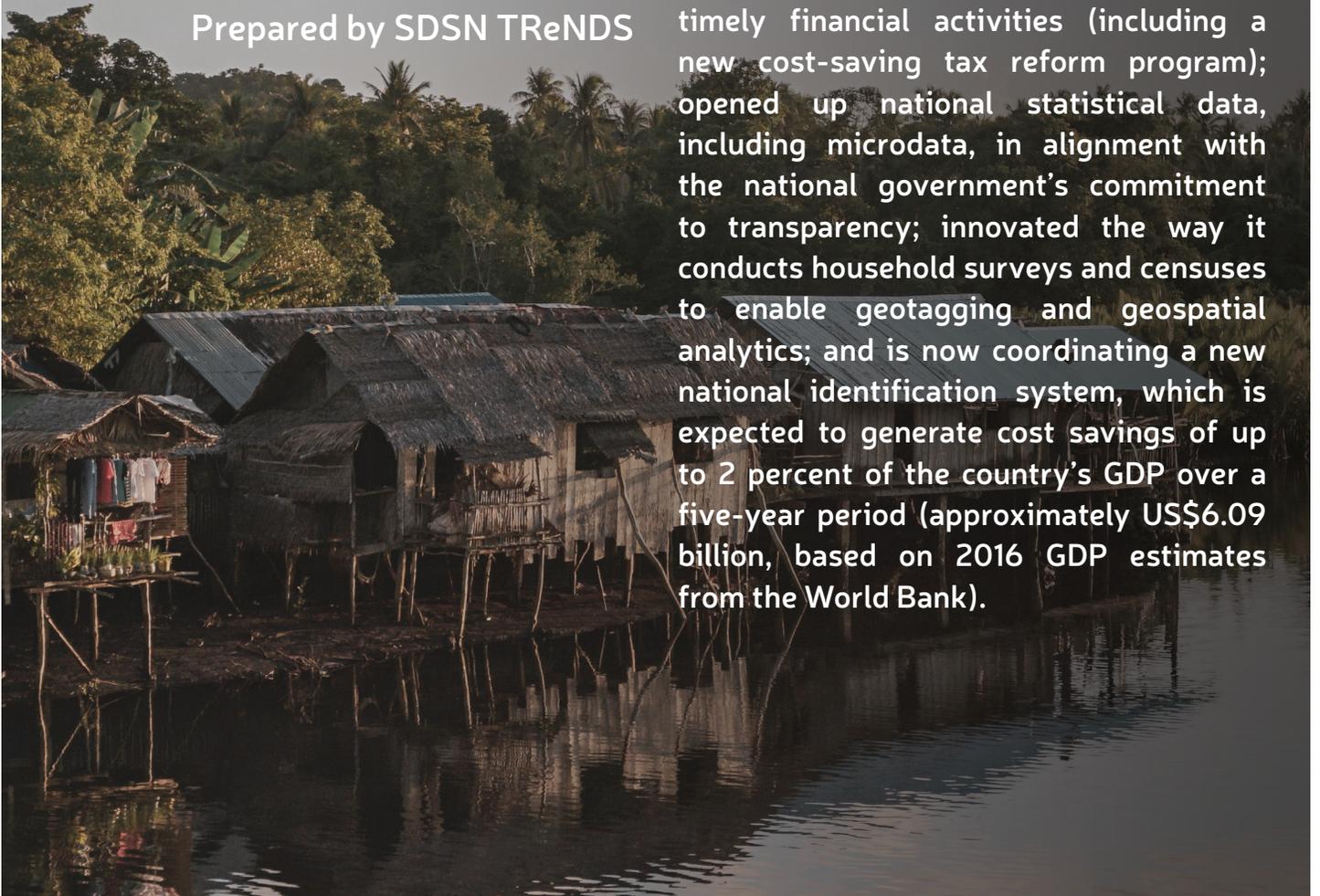
TRÉNDS

Thematic Research Network
on Data and Statistics

Improved Data Governance Leads to Better Economic Outcomes for Philippine Citizens

A Case Study of Reform of the
Philippine Statistics Authority
Prepared by SDSN TRéNDS

In 2013, the Philippines Government enacted legislation that merged four existing data-producing agencies into one comprehensive Philippine Statistics Authority (PSA). Despite the high transaction costs of the initial reform, it was believed that a single, centralized agency could improve the quality and timeliness of official statistics, as well as generate efficiencies in data collection. Five years since the legislation was enacted, the PSA has: improved the timeliness of national and regional accounts, supporting more accurate and timely financial activities (including a new cost-saving tax reform program); opened up national statistical data, including microdata, in alignment with the national government's commitment to transparency; innovated the way it conducts household surveys and censuses to enable geotagging and geospatial analytics; and is now coordinating a new national identification system, which is expected to generate cost savings of up to 2 percent of the country's GDP over a five-year period (approximately US\$6.09 billion, based on 2016 GDP estimates from the World Bank).





Challenges remain as the PSA is still striving to make its work more effective and efficient, but it provides a compelling example of the value of investing in data governance and building high-level central data systems with the mandate to coordinate the production and use of a broad range of data and statistics across government.

Context

Current national data systems are often a complex weave of agencies, departments, and actors, each with different production timelines, reporting standards, and ways of working. As a result, data compiled by national statistical offices are often hard to reconcile and take a long time to publish (Espey et al. 2017). To overcome these challenges and to capitalize on new sources of data available from private sector partners, governments need strong, coordinated statistical systems. Centralized independent national statistical systems have long been called for by the United Nations Statistical Commission (UN Statistical Commission 2016), but the Sustainable Development Goals (SDGs) have created a new urgency given the need for timely, disaggregated data (United Nations 2015).

**On high-level governance: “[We have a] [very] strategic structure which gives two important ministerial positions an influential role in stats policymaking.”
– National Statistician Lisa Bersales, 2018**

The Philippines is a country ahead of the curve, having recognized the need for a more coordinated, consolidated statistical system in the late 1990s (Albert, Reyes, and Macasaquit 2008). At the Government’s behest, a group of statistical experts were commissioned to undertake an evaluation of the various Philippines statistical agencies and assess how “fit-for-purpose” the model was (Albert, Reyes, and Macasaquit 2008). They concluded that the system was too decentralized, resulting in communication breakdowns, delays in transmitting data from local to central offices (and thereafter publishing it), and human resource inefficiencies. They concluded that the statistical system and



official statistics themselves would benefit from being condensed and consolidated, particularly to ensure data could be effectively used for policy and planning purposes (Albert, Reyes, and Macasaquit 2008).

In 2013, as a result of this study and internal advocacy from the National Statistics Office (NSO) (Bersales 2018), the Philippine Statistical Act of 2013 (otherwise known as Implementing Rules and Regulations of Republic Act No. 10625) was passed (Republic of the Philippines 2013). This legislation consolidated four existing agencies—the NSO; the National Statistical Coordination Board; the Bureau of Agricultural Statistics; and the Bureau of Labor and Employment Statistics—into one agency, the Philippine Statistics Authority (PSA). The PSA aims to better coordinate the production of national statistics, both to better support policy and to improve quality of life for citizens by improving the quality of government services. The government’s investments in the reform process and the resultant impacts of the reform process on quality and timely data production show the benefits—and returns—of investing in a strong national data system.

Description of Data Solution

The PSA was created to streamline production and coordination of national statistics, i.e., improving timeliness and reducing inefficiency. The PSA’s mission is to “deliver relevant, reliable statistics and civil registration services for equitable development towards improved quality of life for all” (PSA, n.d.).

The centralized agency has mandates to produce official statistics, such as national financial accounts; manage the country’s civil registration and vital statistics system (CRVS); and oversee the implementation and management of a biometric ID program, approved by the legislature in 2018 (Burt 2018).

The PSA is managed by a National Statistician who reports to the Secretary of Socioeconomic Planning. It is governed by a board, which is chaired by the Secretary of Socioeconomic Planning and the Secretary of Finance (Bersales 2018).



Implementation

The recommendations of the expert advisors included the creation of a centralized agency with close ties to, but not directly governed by, the Office of the President (Albert, Reyes, and Macasaquit 2008). According to National Statistician Lisa Bersales, “It took time to actualize this recommendation.” Representatives across government were reticent as it would require major institutional reform, new budgetary allocations, and considerable changes to staffing. However, after much debate, the House of Representatives and the Senate agreed to the recommendation, “which was very good. [...] And thus [it was] enacted into law [...] signed by the President” (Bersales 2018).

On regional coordination: “[We] are one of the few national government agencies that has a presence down to the provincial level. [...] This reach gives PSA strong influence in regional policy and planning. We are accessible to local government units for data needs, but also for technical assistance and coordination.”

– National Statistician Lisa Bersales, 2018

Once agreed, it was necessary to put in place an effective governance structure that would give the PSA high visibility within the Philippines Government and ensure it was sufficiently centralized to minimize waste and inefficiency, yet also empower and capacitate regional and provincial statistical offices to prepare timelier and more policy-relevant statistics. Three mechanisms were employed to achieve this:

- » A high-level board was created, chaired by two secretaries—the Secretary of Socioeconomic Planning and the Secretary of Finance. According to Bersales, having the Secretary of Finance engaged in the PSA’s governance “has been crucial to get (financial) support” (Bersales 2018).
- » It was decided the PSA would report into a secretary, rather than the executive office (the President), to ensure some neutrality and independence for official statistics. Bersales noted, “This



layer protects official statisticians so they are not too influenced by the President, and it's working really well" (Bersales 2018).

- » It was classified as an "attached agency," meaning the National Statistician reports to the Secretary of Socioeconomic Planning, but the work of the PSA is largely independent from that department.

Once the governance structure was arranged, the next major implementation step was building appropriate capacity. This involved extensive staff reassignment. As of 2017, the PSA had 3,412 total employees (PSA 2017). The reform process had resulted in approximately 1,200 retirements as of 2014/2015, and since then the PSA has been focused on filling vacancies. As of 2018, there were 600 empty positions (Bersales 2018), suggesting staff recruitment and retention is an ongoing challenge. Staff capacity is challenged by significant demand, as the PSA provides technical assistance and coordination to 17 sub-regions of the country (including 81 provinces). It is "one of the few national government agencies that has a presence down to the provincial level," notes Bersales. However, this reach does provide the benefit of "strong influence in regional policy and planning" (Bersales 2018).

Finally, new ways of working were implemented across the Authority to promote participatory planning methods. The Philippine Statistical Act specifically instructs the PSA to create inter-agency committees to discuss the data needs of the country. As of 2018, there were 17 of these committees at the national level that engage representatives from across government departments. They are a vital tool for the PSA to gather data from other departments and foster cooperation. However, there has been some critique of the committees for irregular meeting schedules and limited engagement; "there is concern that the technical committees are not meeting regularly. [...] Now, more than ever, the PSA and the entire Philippines Statistical System need help and technical advice on surveys and population projections, among others" (Albert 2017).



Funding

As of 2017, the PSA had an annual operating budget of approximately 3 billion Philippine pesos (US\$59.5 billion), which had remained broadly consistent since 2014 (PSA 2017). It generates revenue of over 1 billion pesos (approximately US\$18.5 million) from civil registry documents, publications and so on (PSA 2017). This revenue is contributed to the national treasury, and then the treasury reallocates 3 billion pesos to the PSA from central government, local authorities, and so on. In 2018, the operating budget substantively increased to 6 billion pesos as a result of the PSA's responsibility to manage the roll out of the new national ID system (Bersales 2018). The sizeable increase in resources demonstrates the government's confidence in the new Authority and its ability to oversee large-scale, cross-government programs. It also demonstrates the value that the government places upon accurate and timely data—specifically relating to identification and civil registration—for effective governance.

Impact

Since it was established in 2013, the PSA has witnessed a number of successes stemming from better coordination of agencies, centralized decision-making (also facilitating innovation), and reduced bureaucracy (enabling faster statistical production). The following section highlights six major areas of impact, including the creation of detailed household statistics that have enabled a new tax reform package (which, in turn, has the potential to generate millions of dollars), and the introduction of a new national biometric ID system, which is expected to result in efficiency savings equaling as much as two percent of the country's GDP (approximately US\$6.09 billion) over five years (World Bank, n.d.).

Open Data Sharing

A major priority of the PSA has been to promote a culture of open data, in alignment with the Philippines' commitment to the concept of open government as a signatory to the Open Government Partnership since 2011 (Open Government Partnership, n.d.). In 2016, President Rodrigo Duterte furthered this commitment via Executive Order No. 2 (issued July 24, 2016), which operationalizes the people's constitutional right to information and the state policy of full public



disclosure and transparency in public service (Open Government Partnership, n.d.).

The PSA created a national Open Data Portal in 2014 that now has more than 3,000 data files available (Republic of the Philippines, n.d.). As of 2017, the PSA committed to make this portal the central database for all publicly available information released under Executive Order No. 02. In an interview with CNN Philippines, the Presidential Communications Secretary said, “While the FOI [Freedom of Information] Program enhances the public’s right to government information, Open Data Philippines provides the central portal where requested and proactively disclosed data and information may be accessed” (CNN Philippines Staff 2016).

On data sharing and timeliness: Prior to the unification of the agencies, “[It] was difficult for the compiler to get timely information. [...] You needed an MOU [Memorandum of Understanding] or data sharing agreement, so any innovation that one agency needed to do that would affect the others took a lot of institutional buy-in and time.”

– National Statistician Lisa Bersales, 2018

The PSA has also started making microdata for household surveys freely available, rather than at cost (Albert 2017). It also makes national financing statistics, including the balance of payments and national accounts, publicly available every quarter (Bersales 2018). As a result of these efforts, Open Data Watch’s Open Data Inventory ranked the Philippines second only to Singapore in the Southeastern Asian region in 2016, and 64th worldwide. By 2017, the Philippines had catapulted up to No. 23 out of the 125 countries assessed worldwide (Open Data Watch 2018b). The Open Data Inventory assesses the coverage and openness of official statistics “to help identify gaps,



promote open data policies, improve access, and encourage dialogue between national statistical offices (NSOs) and data users” (Open Data Watch 2018a).

Although the impact of these open data sharing efforts is hard to ascertain, it has given the general public mechanisms through which to demand access to local data. It also provides a suite of data and tools to better support government participatory processes, such as the following bottom-up-budgeting programs—Budget ng Bayan and Pera ng Bayan—and the Philippine Government Electronic Procurement System (PhilGEPS) (Pacis 2017).

Investing in CRVS and National ID Systems

A major priority for the PSA has been to improve the timeliness and the quality of CRVS data, specifically birth, death, and marriage records. To support these improvements, in 2014 the PSA set up a Civil Registration and Administrative Support Division (CRASD) in accordance with Act No. 10625 and as directed by the National Statistician (who is also the CRVS system’s Civil Registrar General). CRASD issues, processes, and authenticates CRVS documents. Its priorities include the recording and storing of vital events while protecting the identity of Filipinos (World Bank and PSA 2017). CRASD has particularly sought to advance the use of “PhilCRIS” by local civil registry offices. Created in 2010, PhilCRIS is an application developed for the Windows operating system that enables the encoding of civil registry documents (PSA, n.d.). The software is able to print and issue certified copies of documents while also securely storing data. As of September 30, 2016, 1,090 cities and municipalities—covering 66 percent of the country—agreed to implement PhilCRIS (World Bank and PSA 2017).

It is hard to measure the precise impact of these CRVS-based systems on identity registration rates or outcomes, but the PSA’s innovative management of the national CRVS system has been credited with improving registration rates after Typhoon Haiyan (known locally as Super Typhoon Yolanda) in 2013. The typhoon caused widespread destruction in the Eastern Visayas in the Philippines. Approximately



14.1 million people were affected; 4.1 million individuals were displaced and over 6,200 people lost their lives (Abouzahr et al. 2014). Many people lost civil registration documents such as birth certificates, which are crucial for enabling family reunifications, obtaining government benefits, and accessing basic services. Fortunately, the majority were able to recreate their civil registration records thanks to the provincial and central databases. This greatly facilitated the urgent issuance of replacement certificates. In addition, the Department of Social Welfare and Development and the Philippine Statistics Authority launched a mobile registration project to reach 100,000 people in the provinces of Leyte, Samar, and Eastern Samar and replace damaged or lost birth, marriage, and death certificates (Abouzahr et al. 2014; World Bank and PSA 2017).

In addition to investing in CRVS, the government has prioritized a new biometric ID system. In August 2018, President Duterte signed the Philippine Identification System (PhilSys) law (as Republic Act 11055) that will provide a unique identification number for every Filipino (Congress of the Philippines 2017). It is hoped that this national ID system, which will be managed by the PSA, will help fill spending leaks within governmental social protection programs caused by poor targeting and limited understanding of individuals' access to services. Currently, there are 33 different identification cards issued by a variety of government agencies (Mayhew 2018). The new system, managed by one agency—the PSA—will collect a person's common reference number and basic information. This will include biometrics, voter status, Philippine passport number, taxpayer identification number (TIN), Philippine Health Insurance Corporation (PhilHealth) number, Professional Regulation Commission (PRC) number, and driver's license number. The PSA hopes to “provide ID numbers and capture biometrics in five years for 107 million Filipino citizens and non-Filipino residents” (Mayhew 2018). According to news reports, Duterte said the program would cut red tape, reduce corruption, improve the delivery of basic services, and serve as a tool to keep the public safe (Mateo 2018).

Although the measure is expected to cost 25 billion pesos over five years (US\$462 million), the PSA estimates that it will result in savings



equaling as much as two percent of the country's GDP (Mayhew 2018). That equates to approximately US\$6.09 billion over five years, based on the Philippines' 2016 GDP (World Bank, n.d.).

Timely Financial Data

The economic performance of countries is often evaluated through national accounts data, which present the output, expenditure, and income activities of the country's economic actors. These include households, corporations, and the government. National accounts provide estimates for the money value of income and output per year or quarter, including GDP (Ruggles 1987).

On innovation: "I emphasize to all of the users of our data that we cannot continue doing more and more surveys, so we are promoting data ecosystems that use administrative data and big data. That's our messaging now."

– National Statistician Lisa Bersales, 2018

In the Philippines, national accounts are collected quarterly. Upon the establishment of the PSA, the Secretary of Finance requested that national accounts be made available earlier to make them more useful for policy and budgetary decisions (Bersales 2018). Prior to the unification of the agencies, "[It] was difficult for the compiler to get timely information. [...] You needed an MOU [Memorandum of Understanding] or data sharing agreement, so any innovation that one agency needed to do that would affect the others took a lot of institutional buy-in and time" (Bersales 2018). In creating the PSA, the hope was to minimize these kinds of institutional delays and therefore speed up the timeliness of statistics. In the case of national accounts, this was achieved; by 2017, the national accounts were available 10 days earlier. According to Lisa Bersales, National Statistician, "To do this we had to push for quarterly industry surveys to be done 20 days



earlier. If we were not one agency it would not have been possible” (Bersales 2018).

In addition, the PSA altered the production of regional GDP estimates in a further effort to gather economic statistics more quickly. Prior to 2013, the National Statistics Office produced annual reports for regional GDP in all 17 regions of the country. Regional statistical offices took over this responsibility starting in 2014, enhancing local capacity and contributing to delivery of the reports three months earlier than when under the National Statistics Office (Bersales 2018).

Improvement in the timeliness of national and regional accounts has meant more accurate financial information that can inform regional budgetary process. This has enabled more accurate spending estimates and allocations. Bersales noted that the shortened timeline for producing the regional reports has allowed these reports to better align with regional budgetary reports: “If it were not for creation of PSA this would not have been pushed as fast” (Bersales 2018).

Surveys Guiding National Economic Policy

Other ways that the PSA’s high-quality economic data have contributed to efficient financial administration of the country is through its Family Income and Expenditure Survey (FIES). The 2015 results of this survey were used to undertake a comprehensive tax reform package in 2018 (Manasan 2017). The tax reform lowered income taxes and increased excise taxes on various products, such as fuel. For example, Department of Finance staff cited FIES data in describing the tax reform as a progressive one: “It is the top 10 percent, or around two million households, that consume more than half of the fuel in the country. The same study said that the top 1 percent of Filipino households consume 13 percent of fuel” (Elemia 2017). Overall, the proposed tax reforms are expected to generate additional revenues of 51.3 billion pesos in 2018 (US\$949 million), 9.65 billion pesos in 2019 (US\$178 million), and 99.9 billion pesos in 2020 onwards (US\$1.8 billion) (Manasan 2017). Bersales said, “This is [how we show] the value of our data to the Department of Finance. We showed them that this survey gives you all the data



you need for tax reform. [We said] [with] the money you gave us for this report, you'll be able to get 30 million pesos in additional taxes!" (Bersales 2018).

Innovation

One of the major ambitions of the PSA since its inception has been to employ more innovative methods for the production of official statistics, thereby increasing their depth, coverage, timeliness, and quality. They aim to work more effectively to produce such data not only across government departments, but also with external actors such as academics or private companies. The high demands for data resulting from the SDG agenda have further underscored the importance of such an approach, so that the burden of producing data does not fall solely on the PSA. According to Lisa Bersales, "we cannot continue doing more and more surveys, so we are promoting data ecosystems that use administrative data and big data. That's our messaging now" (Bersales 2018).

A good example of this new approach is the PSA's recent efforts to use geospatial data to give location-based reference household surveys and to improve the accuracy and coverage of the census. Select survey programs now employ tablets with GPS capability, so that the enumerator can acquire sample households' coordinates. Data are then sent to a central server and are overlaid with geospatial imagery to provide a detailed image of their location, thereby enabling the survey team to identify any geographical or infrastructural features of note (Manasan 2017). The PSA is planning to use these methods to conduct the 2020 census, and as such has developed a five-year rolling program (from 2016 to 2020) to update and enhance geographic information-based, digitized census maps for the entire country. The program hopes to prepare the PSA to undertake geospatial analysis and intelligent data visualization (Manasan 2017).

Ongoing Challenges

The PSA faces a number of challenges in coordinating national data collection across government. A 2016 study conducted by the former National Statistical Coordination Board Secretary General Romulo



Virola found that data users in the country had seen improvements in the Philippines Statistical System since the PSA was established, but it had yet to reach its full potential (Virola 2016). Users specifically highlighted the need for better time-use data, violence data, and data disaggregation—for example, data relating to those with disabilities. The quality and quantity of produced data are challenged by statistical capacity and the PSA’s lack of control over the production and use of geospatial data, as described below.

Statistical Capacity Development

The restructuring of the Philippines statistical system required considerable changes in staffing; five years in, there are still more than 600 vacancies and there is concern that human resources are still too limited (Bersales 2018; Albert 2017). According to a study by PARIS21, the PSA’s Philippine Statistical Development Program 2011-2017 strategy advocated for greater statistical capacity development through stronger institutions and a focus on technical, professional, and career development, but the PSA’s plan to realize this is “a wish list with no resources, no capacity, and no manpower” (PARIS21 2014). National Statistician Lisa Bersales acknowledges that there have been challenges, but says the PSA is now employing different approaches to attract new recruits, including promoting “open data, [and] developing a better website. [...] Convincing employees and officials [of the need for these investments] took some effort but eventually [they] realized this is how we move forward.” However, she noted that the new national ID program will increase the burden on the PSA, both in strengthening existing capacity to operate the system but also recruit new specialists (Bersales 2018).

In response to its capacity challenges, the PSA has revised the Philippine Statistical Development Program strategy to provide a clearer path to achieving its capacity-related objectives—resulting in the Philippine Statistical Development Program 2018-2023 (PSA, n.d.).



Coordinating with the National Mapping and Resource Information Authority

The use of geospatial data is crucial for national statistical systems to modernize, expand their coverage, their ability to disaggregate data, and find more cost-effective ways of doing business (Espey and et al. 2017). Geospatial data in the Philippines is the remit of the National Mapping and Resource Information Authority (NAMRIA), which was not included among the statistical agencies merged through the creation of the PSA; it remains a separate entity under the Department of Environment and Natural Resources. The separation of their functions creates “some problems,” as the PSA and NAMRIA have two separate sets of plans, do not actively work to combine methodologies, and duplicate expenses (Bersales 2018). For example, during a recent presentation of the PSA plan to the Department of Finance, “one interesting result was the budget department realized that they were giving [a] subscription of ArcGIS to two different agencies,” showing the duplication across departments (Bersales 2018). The Department of Finance and PSA are therefore working to ensure collaboration and thus maximize efficiency across agencies.

Conclusion

Five years since the passing of the Philippine Statistical Act and the creation of the Philippine Statistics Authority, the country is benefiting from a high-level, well-resourced entity able to coordinate the production of statistics across government, encourage innovation, and ensure timeliness. Although the initial process of disbanding four agencies and merging them into one was challenging and there have been considerable delays with staff recruitment, the fact that the PSA has been charged with managing the new national ID program suggests confidence in the new institution from the executive branch of government. The high-quality, timely financial information used to inform national accounts and tax reform shows the value to governments of a largely independent statistical office that can effectively coordinate across government to manage ever-increasing data demands associated with the SDGs.



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