



UNIVERSITY OF THE PHILIPPINES
CENTER FOR
INTEGRATIVE AND
DEVELOPMENT
STUDIES



EMPOWERING LOCAL GOVERNANCE IN THE PHILIPPINES

Policy Studies for the
National Capital Region



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OPENING REMARKS

Teresa S. Encarnacion Tadem, PhD.
Executive Director
UP Center for Integrative and Development Studies

Distinguished guests, colleagues, and friends, good morning to all of you. On behalf of the University of the Philippines Center for Integrative and Development Studies (UP CIDS), I wish to welcome you all to the forum, “Empowering Local Governance in the Philippines: Policy Studies for the National Capital Region.” This forum, which is co-sponsored by two UP CIDS research programs, the Program on Social and Political Change (PSPC) and the Program on Alternative Development (AltDev), the Co-convenor and Convenor of which are Dr. Maria Ela Atienza and Dr. Eduardo Tadem, respectively. Also participating is the Education Research Program (ERP), the Convenor of which is Dr. Dina Ocampo, and the Islamic Studies Program (ISP), the Convenor of which is Dean Macrina Morados. This forum is part of the 2019 activities of the UP CIDS, which is the policy research unit of the UP System.

Founded in 1985 by then UP President Edgardo J. Angara, the UP CIDS is currently under the UP Office of the Vice President for Academic Affairs (UP OVPA). Since its inception, the UP CIDS has sought and encompassed various perspectives, methodologies, and ideologies in coming up with basic and policy-oriented research. Guided by the current UP administration’s strategic trajectory, the UP CIDS aims to

contribute to national development and knowledge creation through enhancing research, publications, and creative work. Its channels to implement this vision include events such as lectures, conferences, and forums, as well as publications, which include discussion papers, policy briefs, monographs, and the *Philippine Journal of Public Policy: Interdisciplinary Development Perspectives*. These publications are all available online, as well as in print. The UP CIDS presently has twelve programs, as well as the Local-Regional Studies Network (LRSN), which consists of the Cordillera Studies Center of UP Baguio and the Central Visayas Studies Center of UP Cebu.

The research programs of UP CIDS are grouped into three clusters. The first is the Education and Capacity Building Cluster, where we have the Education Research Program, which focuses on research on the basic education sector; the Program on Higher Education Research and Policy Reform (HERPR), which looks at issues and concerns in the country's colleges and universities; the Assessment, Curriculum, and Technology Research Program (ACTRP), which feeds into the Department of Education (DepEd)'s curriculum review; and the Program on Data Science for Public Policy (DSPP), which focuses on big data, the Co-convenor of which is Dr. Jalton Taguibao, one of our paper writers, while its Convenor is UP Diliman Vice Chancellor for Research and Development Fidel Nemenzo. The second cluster is the Development Cluster. It includes the Program on Escaping the Middle-Income Trap: Chains for Change (EMIT C4C), which documents the best practices of agriculture value chains. We also have the Political Economy Program (PEP), which engages government and business in the pursuit of a national industrial policy, and the Program on Alternative Development, which documents alternative political, economic, and social practices in the Philippines and in other Southeast Asian countries. The last is our newest program, the Program on Health Systems Development (PHSD), the Convenor and Co-convenor of which are from the UP College of Medicine, and it is concerned with constituting a primary healthcare system all over the country. Our third cluster is the Social, Political, and Cultural Studies Cluster. This includes the Program on Social and Political Change, with Dr. Atienza, who will be one of the presenters this morning, as

one of its Co-convenors. The program focuses on research involving constitutional change debates, constitutional performance assessment, electoral politics, and migration, among others. Then we have the Islamic Studies Program, which is presently looking into the problems confronted by the transition to the Bangsamoro Autonomous Region in Muslim Mindanao (BARMM) and other issues faced by Muslim Filipinos. The third is the Strategic Studies Program (SSP), which looks at the country's engagements in regional security and foreign policy. Finally, we have the Decolonial Studies Program (DSP), which focuses on different dimensions of coloniality and modernity and their adverse impacts on institutions in the Global South.

Today's forum, which draws on the research conducted by the UP CIDS on the implications of federalism in the National Capital Region (NCR) and the feasibility of forming a federal administrative region out of it, actually cuts across the themes of the various UP CIDS Programs, particularly those that study aspects of development. The project, which was funded by the Department of the Interior and Local Government–National Capital Region (DILG-NCR), was part of the initiative of the NCR Regional Peace and Order Council (RPOC), which was chaired by then Quezon City Mayor Herbert Constantine M. Bautista, to support the government's federalism campaign. We therefore also give special thanks to DILG-NCR and to Mayor Bautista, who regularly met with the group and went over our findings. I would also like to acknowledge the presence of representatives from the DILG-NCR, led by Ms. Jasmin Diaz.

We already submitted our report, but we'll just be adding three more papers to it. There are actually ten papers already in the report, and the DILG-NCR will edit and disseminate the report. On our side, I asked our paper writers if they are also open to publishing their papers into a volume, and the DILG-NCR would welcome an academic publication from this project. But in the meantime, we have produced policy briefs, which are all available online. Some of the presentations in today's forum already have their policy briefs. We have Dr. Kristian Karlo Saguin's "Urban Farming and Urban Land Use Dilemmas in Metro Manila" and Dennis dela Torre and Dr. Erwin Alampay's "Risk Transfer Mechanisms: Charting a Strategy on Local Insurance." We also look

forward to the release of two policy briefs by Dr. Guillermo Tabios III, first is “Alternative Water Sources for Metro Manila for Water Security and Resilience,” and the other one is “Urban Dimensions of Flooding and Holistic Flood Risk Management: The Case of the Pasig-Marikina River Basin in Metro Manila.” Of course, from Dr. Maria Lourdes Rebullida and Dr. Taguibao, we have “Solid Waste Management, Environmental Governance, and Sustainable Development: Prospects for the National Capital Region.” The others will produce their policy briefs in the coming months.

In today’s forum, the paper presentations will revolve around three thematic clusters, which are actually the clusters in the report that we submitted to the DILG-NCR. The first cluster is on social services, focusing on education, health, socialized housing, water services, and alternatives to privatization of social services. There are actually two more papers in this cluster which are concerned with the decentralization of social services in the Philippines and a mapping of the state of social service delivery in Metro Manila. Unfortunately, these papers will not be presented today. The second cluster is on urban development, which focuses on the urban dimensions of flooding, which will be presented by Dr. Tabios; solid waste management, to be presented by Dr. Rebullida and Dr. Taguibao; and urban farming and urban land use in Metro Manila, which will be presented by Dr. Saguin. The last cluster is on national-local concerns. Although the project mainly focuses on the local, we know that impacts could also be seen and experienced at the national level. We have a paper on local insurance for local government units (LGUs) and on fiscal decentralization. There is also a paper on Muslim migration in the NCR and in the former Autonomous Region in Muslim Mindanao (ARMM), but unfortunately, this will also not be presented today.

This forum comes at a time after the passing of former Senator Aquilino Pimentel, Jr., the father of the country’s Local Government Code. The papers that will be presented today have taken note of the late senator’s strong and ardent advocacy for empowering LGUs in whatever way possible. The presentations in today’s forum will show that there are indeed many possible opportunities by which this objective could

be attained. I am sure that the paper presentations will elicit questions and comments, and I look forward to a fruitful exchange of ideas during the open forum. Thank you.



Left to Right: Dr. Maria Lourdes Rebullida, PSPC Co-Convenor Dr. Maria Ela Atienza, Dr. Guillermo Tabios III, and AltDev Convenor Dr. Eduardo Tadem

PANEL ONE

Solid Waste Management, Environmental Governance, and Sustainable Development: Prospects for the National Capital Region

Maria Lourdes Genato Rebullida, DPA
Professorial Lecturer, Department of Political Science,
University of the Philippines Diliman

The first presentation, based on a paper authored by Dr. Maria Lourdes Rebullida and Dr. Jalton Taguibao, focused on the various issues surrounding solid waste management (SWM) in the National Capital Region (NCR). The study aims to contextualize the issue of solid waste management in the larger global context of environmental governance and sustainable development. Grounded in the Philippine setting, the authors looked into the prospects for better solid waste management within the NCR.

Four key messages were highlighted in the presentation. First, the management of solid waste, which is popularly referred to as “garbage,” is interlinked with other issues of development related to environmental governance, sustainable development, climate change, and disaster management.

The second point is on consumption and disposal. Since we have become a consumer society, we have been using more things every day, and therefore, disposing more solid waste. Dr. Rebullida differentiated two types of wastes. Solid waste, also referred to as domestic waste

and as garbage, is generated by homes and communities. On the other hand, industrial and chemical waste usually come in liquid form. Dr. Rebullida then emphasized the problems associated with solid waste and its impact on people, health, and the environment.

The third is the urgency of the solid waste problem. The Ecological Solid Waste Management Act of 2000 (Republic Act No. (RA) 9003) was enacted due to increasing solid waste generation and problems with its management. Nearly two decades after the legislation, the garbage problem remains unsolved.

The fourth point is about the law's implementation, which Dr. Rebullida describes as lackluster and with lingering gaps and failures. Despite challenges, she pointed out that some local government units (LGUs) have effectively managed their solid waste since the law's passage. These include the pioneering LGUs of Marikina City and Olongapo City, as well as other LGUs that won the Galing Pook Awards for their respective waste management systems.

In the presentation, Dr. Rebullida emphasized the current challenges confronting LGUs in the NCR in terms of solid waste management. Mainly, there is a need to empower both the national and local levels of government and enhance their relations in ensuring effective solid waste management. The study focused on the policy implementation issues and prospects for strengthening national and local government relations for solid waste management in the context of the NCR.

Dr. Rebullida discussed the global context of solid waste management in the Philippines. The governance framework for solid waste management that is advocated by the global community are the Sustainable Development Goals (SDGs) 2015–2030 of the United Nations (UN) and previously, the UN Millennium Development Goals (MDGs) 2000–2015. Governance emphasizes participation, collaboration, and empowerment, which are applicable in achieving SDGs 11 and 12 by pursuing the 4Rs of solid waste management: recovery, reduction, recycling, and reuse. The 4Rs are crucial in changing the way we live our everyday lives and in managing our solid waste. Moreover, collaborative governance in solid waste management emphasizes the

interrelationship between the national and local governments, and in turn, their relationships with civil society organizations and private businesses and enterprises.

In the Philippine context, Dr. Rebullida explained that solid waste management operates within a decentralized and devolved setup based on the 1991 Local Government Code and the Ecological Solid Waste Management Act. The Department of Environment and Natural Resources (DENR) undertakes the implementation of national policies on environmental protection, while the National Solid Waste Management Commission (NSWMC), with the Environmental Management Bureau (EMB) of the DENR serving as Secretariat, undertakes the planning, implementation, monitoring, and evaluation of nationwide policies pertinent to solid waste management. The NSWMC is multisectoral in composition, with representatives from designated national agencies; the private sector, particularly from recycling, manufacturing, and packaging entities; and non-government agencies that are active in environmental issues.

In the devolved administrative setup in the Philippines, there are three levels of local government that have designated functions for solid waste management. The province as the highest level undertakes national policies on the environment. Under the authority of the provinces are municipalities, which handle solid waste disposal, hygiene, and sanitation systems, and cities, which have an additional function for placing environmental management systems. At the lowest level are the barangays which are in charge of solid waste collection. The NCR is constituted differently, with 16 cities and one municipality and a region-wide administrative agency, the Metropolitan Manila Development Authority (MMDA).

On relationships within and across government levels, Dr. Rebullida asserted that central-national government agencies need to be enhanced to improve their solid waste management performance, as well as their relations with LGUs and the MMDA. Likewise, the LGUs of NCR also need to improve their interactions with one another and with the MMDA. The MMDA's setup is relatively complex, as it is not an LGU per se but a government organization mandated to develop Metro

Manila's LGUs. Studies indicate that relationships between the LGUs and the MMDA have not been harmonious during the early years, but have improved in the last two decades.

The findings of the study show that the NCR's biggest challenges in terms of solid waste management are inefficient waste collection, lack of disposal and recycling facilities, and the preponderance of improper waste disposal practices. Data has shown that as population in urban areas have increased over the years, the waste generated from these areas has increased as well. Dr. Rebullida pointed out that increasing population and accelerated industrialization and economic growth result in an increase in the consumption of products and materials, which thereby increases the production of wastes from both households and commercial establishments. The NCR is not supposed to have open dumpsites (based on current laws and policies), but these remain to be seen in different parts of the region. The LGUs that operate sanitary landfills face the problem of looking for new sites whenever current sites reach their maximum operational capacities.

Dr. Rebullida showed Japan and Malaysia as examples of countries where state policies are in place to meet the goals of creating a low-carbon society, promoting a culture of recycling, and sustaining a balanced ecology.

Japan provides an example of a culture that promotes people to reduce, reuse, and recycle resources. The country has a history of laws that support recycling and use of recycled materials. It also has well-established institutions that provide conditions that are conducive to innovation and coherence in terms of solid waste management systems.

Malaysia, on the other hand, experienced problems with solid waste management as it is a federation of states. Through decentralization in the 1990s, solid waste management became privatized. Citing the Malaysian case, Dr. Rebullida posed the question of privatization as a way to increase the efficiency and efficacy of solid waste management. According to her, Malaysia's initiatives

for recycling in the 1980s has recently progressed to national waste minimization.

As a way forward, Dr. Rebullida urged that the Philippine government and other stakeholders explore better ways of managing solid waste. The Philippines committed to the UN SDGs, which require efforts to reduce, recycle, and reuse waste to achieve in particular Goals 11 (Sustainable Cities and Communities) and 12 (Responsible Consumption and Production). These efforts should be accompanied by increasing awareness of and participation from the people.

Based on the findings of the study, “political will” in terms of implementation of policies and programs can improve solid waste management at different levels of local government. Moreover, the strengthening of both national and local governments towards effective undertaking of responsibilities on solid waste management is imperative, whether in a devolved or a federal administrative setup.

Dr. Rebullida noted that each barangay is tasked to prepare a ten-year SWM plan, to be submitted to the city or municipal level. Barangays need to finance their solid waste management systems, facilitate livelihood from recycling, and conduct information, education, and communication (IEC) programs. She, however, pointed out that materials recovery facilities (MRFs) in some barangays are not operational, or if MRFs are operational, these are not efficient and effective in solving problems in solid waste management.

In a similar manner, cities and municipalities are required to prepare and submit their SWM plans to the NSWMC for approval. Tasks that are similar as those done in barangays are undertaken at the city and municipal levels. In addition, city governments are in charge of waste-to-energy and disposal management technologies, such as biowaste and other renewable energy techniques.

The provincial level’s responsibility covers waste-to-energy facilities, as these entail more financing and covers a wider jurisdiction. They are likewise required to submit ten-year plans to the NSWMC for approval.

In summary, the common functions among different levels of local governance in terms of solid waste management include the formulation and implementation of ordinances and resolutions and imposition of sanctions; management of MRFs; and undertaking of the 4Rs. In addition, governance in solid waste management encourages the participation of communities, business, and civil society, such as in buying and selling of recyclable materials. Social enterprises in recycling also offer opportunities for financing and marketing of recyclable materials and products out of these.

Dr. Rebullida concluded her presentation by stating that all efforts to improve solid waste management within the framework of environmental governance in cities should be integrated and comprehensive. Key factors to be considered and interlinked with one another are people and civic culture, environmental citizenship, and conscious practices (such as the 4Rs); political leadership at the local level; environmental governance that engages both the national and local governments, civil society, and the private sector; and improving the planning, monitoring, and evaluation of policies at the national and local levels.

The State of Health, Delivery of Health Services, and Equity of Access in Metro Manila: Successes, Challenges, and Possible Ways Forward

Maria Ela L. Atienza, Ph.D.

Professor, Department of Political Science,
University of the Philippines Diliman and Co-convenor,
Program on Social and Political Change,
UP Center for Integrative and Development Studies

Dr. Atienza's presentation centered on the state of the delivery of health services in Metro Manila and possible ways forward towards better access to these services. According to Dr. Atienza, her study's focus on Metro Manila or the National Capital Region (NCR) is important in health service delivery studies because despite of the health issues that the region faces (such as outbreaks of polio, dengue, and leptospirosis), the literature on health service delivery in the Philippines focus more on rural areas. She stated that this is understandable given that many of the major hospitals with advanced services are concentrated in Metro Manila and that health services in rural areas are in need of improvement. However, she argued that this does not mean that Metro Manila does not have its own challenges, especially in terms of unequal access to health services.

An objective of her study is to look at the status of the utilization of health services in NCR, which was done by examining the situation at the regional and local levels of government and by pointing out some important issues and challenges. The paper also looks at potential alternatives in the context of current discussions about institutional or legal reforms, not just within local governments, but also in the government's overall structure.

Dr. Atienza's study uses the human security framework to assess the situation and access to health services in the NCR. She emphasized that human security has three dimensions: freedom from fear, freedom from want, and freedom to live with dignity. It addresses the protection of people both at the level of the individual and of the community, and involves protecting individuals from critical and pervasive threats. The human security framework also addresses factors that increase

vulnerability to poverty, disease, conflict, and disempowerment. It requires mechanisms to be established at different levels of government to protect communities from threats. Dr. Atienza emphasized that this covers both top-down and bottom-up or empowerment approaches in dealing with human security threats.

In particular, health security is concerned with the protection of individuals from sudden or chronic health threats and with efforts on how individuals can live healthy lives. Dr. Atienza pointed out that this is one of the important roles of both the national and local governments. What is specifically important is empowerment or freedom from fear of illnesses as a dimension of human security, or in this case, health security. According to Dr. Atienza, health concerns become security concerns due to the scale of the problem and the systemic inequality or deprivation surrounding individuals' health needs. This also involves the weakness of healthcare institutions and structural inabilities imposed by armed conflict or state collapse.

With the enactment of the Local Government Code (RA 7160) in 1991, health became the largest social service that was devolved to LGUs. However, this led to disparities in the provision of health services across LGUs. In spite of this, Dr. Atienza stated that there were exemplary cases through the years, particularly those that received the Galing Pook awards. She also mentioned that there were efforts by health workers—by lobbying Congress—to recentralize health services during the time of President Fidel V. Ramos. However, President Ramos vetoed the consolidated bill.

Dr. Atienza cited the 2019 Global Health Security Index which ranked the Philippines at number 53 out of 195 countries in terms of overall readiness in health security and related capabilities. She also pointed out that the scores of the country in the index means that it is not in a good position especially when it comes to handling pandemics. However, new laws like the Universal Healthcare Act of 2019, if properly implemented, will be important in responding to issues of health access, equity, and funding.

To contextualize the presentation, Dr. Atienza cited relevant background information and data on Metro Manila. The region has 16 highly urbanized cities and one municipality, and is the political, economic, and social center of the country. It is the smallest yet most densely populated region in the country. Moreover, Metro Manila contributes 36 percent to the country's gross domestic product (GDP), but in 2015, 11 percent of its population are living in informal settlements and are excluded from health services.

Despite the presence of state-of-the-art health facilities in Metro Manila, there are still problems when it comes to nutrition (e.g., micronutrient deficiency, maternal malnutrition), especially in urban poor communities. There are also high incidences of health personnel scarcity, lack of hospital beds in public hospitals, disparities in LGUs' priority regarding budget for health services, and outbreaks of diseases such as dengue and leptospirosis. According to Dr. Atienza, informal settlers in Metro Manila suffer from a number of problems such as lack of access to clean water and sanitation, improper solid waste management, and overcrowded public health facilities. On top of these issues, informal settlers typically do not have PhilHealth (health insurance) coverage and access to health services can be affected by patronage during election periods.

Dr. Atienza also cited findings from a master's thesis written by Amer Madcasim, Jr. in 2018 that was submitted to the UP Diliman Department of Political Science. The study found that there are differences in terms of the levels of prioritization in health budgets across LGUs in the NCR. This contrast is exemplified in Quezon City and in the City of Manila, where the former prioritizes health more than the latter. Dr. Atienza highlighted that the size of total local income does not have a direct effect on the quality of health services. There are also problems when it comes to inclusivity, specifically for the LGBTQIA+ sector and for Muslims. Moreover, there is the issue of credit-claiming for health programs by some politicians in order to gain political leverage. Madcasim's study also found out that Quezon City has more partnerships with the private sector and civil society organizations on health programs than Manila. However, Dr. Atienza

acknowledged that there might be changes in this regard with Mayor Isko Moreno's new administration in the city of Manila.

In terms of policy recommendations, Dr. Atienza suggested making health a human security issue in Metro Manila. Health issues involve freedom from fear from diseases and freedom to live with dignity. Approaches that espouse protection and empowerment are needed to respond to the needs of the poor and marginalized, who occupy a sizeable part of the constituents of the LGUs in the NCR. The individual LGUs and Metro Manila as a whole should address problems and issues with regard to accessing health services.

Dr. Atienza also provided a couple of policy options as ways forward. Initially, federalism for the entire country was being pushed by the Duterte administration, with NCR becoming a metropolitan state. Another option is to create a Metro Manila regional government which, however, would require an amendment of Article X of the 1987 Constitution. In addition, she stated that there is a need to amend certain sections of the 1991 Local Government Code, especially considering the impact of the Supreme Court decision on the sources of national income to be shared by LGUs ("the Mandanas ruling"). This involves a reform to the current internal revenue allotment (IRA) formula in the Code. Other related laws, particularly on electoral competition, should limit the use of health services for political patronage. Apart from these institutional changes, there is a need for partnerships on more agency- or actor-focused reforms such as community empowerment and participative decision-making in the NCR. Such reforms include improving local health boards, creating additional special local bodies related to health, if necessary, and improving dissemination of information on health and available local health services. Improving basic or primary health service delivery, particularly focusing on the prevention of diseases and promotion of good health in communities, will also lessen the number of people going to hospitals for curative services. Of course, the health system, which covers health personnel, facilities, and equipment, among others, must be strengthened. She also recommended that health services should focus on community services, community organizing, and proper information dissemination. In sum, Dr. Atienza stated that

there are opportunities and issues in pushing for a regional or more coordinated health system in Metro Manila and that these have an impact on the delivery of and access to health and other social services.

Urban Dimensions of Flooding and Holistic Flood Risk Management: The Case of the Pasig-Marikina River Basin in Metro Manila

Guillermo Q. Tabios III, Ph.D.
Professor Emeritus, Institute of Civil Engineering,
University of the Philippines Diliman

Dr. Tabios began his presentation by providing an overview of the Pasig-Marikina River and of its flooding. The river emanates from the Sierra Madre hinterlands and goes down to join the Pasig River all the way to Manila Bay. In 1985, the Manggahan Floodway was built to divert floodwaters from the Marikina River basin and to act as a temporary storage of floodwaters from the two rivers.

Dr. Tabios mentioned several concerns in terms of urban flooding. Forest denudation and quarrying in the Upper Marikina River basin had increased soil erosion and sediment load to the rivers. This contributes to flooding in the flood-prone areas of Cainta (in Rizal), Marikina City, and the CAMANAVA (Caloocan, Malabon, Navotas, and Valenzuela) area. Another reason for flooding is the Taguig River, which is considered as a disappearing river. Instead of floodwaters getting out of Taguig to the Laguna Lake and Manila Bay, it cannot do so because the river is gone. Moreover, the urban sprawl around the river restricts its flow. Local drainage is also a concern because inland floodwater has no outlet to flow to rivers and floodways. Dr. Tabios argued that garbage in the waterways hinders effective flow of floodwater. Similarly, the Manggahan Floodway has been occupied by both formal and informal settlements, which also affects floodwater flow. He also argued that lakeside housing is likewise prone to being flooded.

Dr. Tabios also discussed the impact of climate change on flooding. This is a big issue because the government does not provide the proper level of protection from flooding, even without considering

climate change. He argued that investments related to climate change protection, flood mitigation plans, and counterflooding are very small. Dr. Tabios explained that flood management is now a governance issue that is tied with economic problems and corruption.

When it comes to policy advocacy, Dr. Tabios pushes for holistic flood management. This requires looking at the different urban dimensions of flooding, not only the physical dimensions, but also the social and the political ones. One of the applications of holistic flood management is on addressing the flooding problem in the City of Manila. According to Dr. Tabios, as the city's esteros were originally swamplands, it is critical to restore these areas first before resorting to structural engineering measures. Moreover, he strongly advocated for a transdisciplinary approach to solve the flooding problem in Metro Manila and a paradigm shift which employs sustainability science.

Dr. Tabios explained the features of this transdisciplinary approach to flood management. First, there has to be stakeholder involvement. Second, every actor has to work collectively from problem identification and knowledge generation, to the development of sustainable solutions and project implementation. Third, there needs to be an iterative process of project development in consultation with stakeholders. According to Dr. Tabios, we are capable of transdisciplinarity through stakeholder participation, because as individuals, we can have a "community collective mind" through our individual experiences, physical observations, social narratives, ethical principles, aesthetic and sympathetic feelings, and capability for reflective synthesis. Lastly, decisions should be made in such a way that physical laws and constraints are satisfied and that these are ecologically sustainable, economically sound, socially justifiable, and politically acceptable.

As far as Metro Manila is concerned, Dr. Tabios pointed out that the problem lies in the uncertainty of climate- and weather-related dynamics, such as monsoons, typhoons, and intertropical convergence zones. In addition, social norms and attitudes, specifically in terms of disposing garbage and tolerating disasters, are another factor which

affects our response to the flooding problem. While the culture of disaster in the Philippines has become part of our daily lives, it has, however, transformed tolerance as a form of social coping mechanism. Thus, Filipinos have accepted flooding as a reality, instead of solving it in the long-term.

Dr. Tabios also highlighted the role of sustainability science in holistic flood risk management. The complexity and unpredictability of water resources systems requires holistic flood risk management to adopt sustainability science. According to Yoshikawa (2011), sustainability science has five elements, namely (1) the aim of study, (2) mode of change, (3) truth verification, (4) result of research, and (5) expected outcomes.

Dr. Tabios cites the Laguna Lakeshore Expressway Dike Project as an example of applying holistic flood risk management and sustainability science in addressing the flooding problem in Metro Manila. He stated that at first, there was a lot of opposition to the project. This was addressed by conducting eight stakeholder consultations, which resulted in six alternative lakeshore dike configurations. These plans were then subjected to an iterative process of review and value engineering with a team composed of engineers, a sociologist, an economist, a biologist, and other experts. The alternative configurations consider the following scenarios: (1) the full protection of human settlements through polder dikes, but with an obliterated fish spawning area; (2) the partial protection of human settlements, while retaining a fish spawning area; and (3) the full protection of human settlements and the retention of a fish spawning area through a combination of road and dike bridges.

In conclusion, Dr. Tabios stated that urbanization is inevitable due to population growth and economic progress. Urban sprawl, the expansion of paved areas, the reduction of the infiltration capacity of soils, river encroachment, and the occupation of river floodplains all result in increased risks of urban flooding. He emphasized that it is important to advocate for holistic flood risk management, which requires integrated water, land, coastal, and hazard management

to improve the functioning of river basins and to recognize that floods have beneficial impacts and can never be fully controlled. Dr. Tabios reiterated that flooding is a complex, dynamic, and uncertain problem; therefore, holistic flood risk management should employ a transdisciplinary approach and utilize sustainability science in addressing the flooding problem in Metro Manila.

Alternative Water Sources for Metro Manila for Water and Security Resilience

Guillermo Q. Tabios III, Ph.D.
Professor Emeritus, Institute of Civil Engineering,
University of the Philippines Diliman

Dr. Tabios' second presentation began with a discussion on the sources of Metro Manila's water supply. He pointed out that the region's biggest water source is the Angat Reservoir, which is augmented by the Umiray Watershed. Metro Manila also gets its water supply from the La Mesa Dam and the Laguna Lake. Angat and La Mesa provide 4,000 million liters per day (MLD), while the Laguna Lake provides the area with 200 to 300 MLD. However, Metro Manila's demand is at 5,600 MLD, thus the present water supply is not enough.

According to Dr. Tabios, the core of the problem is competing water usage. The Angat Reservoir releases to the Ipo Dam for the Metropolitan Waterworks and Sewerage System (MWSS) and to the Bustos Dam for the National Irrigation Administration (NIA). Dr. Tabios explained that competing water usage became a bigger issue when the 200-megawatt hydropower plant at the Bustos Dam was privatized. The facility is now owned by a joint venture between Korea Water Resources Development Corp. (K-Water) and San Miguel Corporation (SMC). He stated that K-Water and SMC would want to make more releases to Bustos Dam rather than to Ipo. However, Metro Manila's domestic water demand needs more supply than that of irrigation.

Dr. Tabios further stated that the water supply problem is aggravated during the summer, since the water demand of Metro Manila

cannot be fully supplied during the months of February to May. Out of a cumulative period of ten years, this is equivalent to about two to three years. Dr. Tabios warned that we might be encountering water shortages more often during summertime as the storage capacity of the Angat is slowly being reduced due to sedimentation. During the past 40 years, its storage capacity was reduced by 20 percent (from the original 1,050 million cubic meters to only about 800 million at present). Dr. Tabios pointed out that the Angat's capacity might be reduced by another 20 percent (or more) in the next 40 to 50 years; thus, he strongly suggested that Metro Manila has to look for other water sources.

Dr. Tabios explained that in contrast with the Angat Reservoir, the Umiray, Sumag, and Biliway Watersheds, which are located on the eastern slopes of the Sierra Madre, experiences Type III to IV climate, which brings evenly distributed rainfall throughout the year. The Angat Reservoir has a Type I climate, which means that there is a pronounced dry season from November to April and a wet season for the rest of the year. The amount of rainfall, and therefore of water yield, also explains the amount of water supply from the Angat.

Another issue that was highlighted by Dr. Tabios is groundwater pumping from Metro Manila's aquifer. In 2004, the National Water Resources Board (NWRB) issued a moratorium to end groundwater pumping to allow its aquifer to recover its piezometric levels from excessive pumping. When the piezometric levels in Quezon City, San Juan, and Makati recovered by 2012, Dr. Tabios studied if it is possible to lift the moratorium. He conducted a simulation of the water levels for the next 40 years. The study concluded that an additional water supply of around 650 MLD can be safely extracted on top of the current 780 MLD, summing up to around 1,430 MLD. However, Dr. Tabios noted that groundwater has become an unreliable water source due to pollution and water quality issues. In fact, its usage has been reduced to 800 MLD from 1,500 MLD back in the 1980s.

Dr. Tabios added that the Laguna Lake may be tapped beyond the currently permitted extraction amount of 450 MLD to augment Metro Manila's water supply. The lake can provide as much as 1,900 MLD, but Dr. Tabios strongly suggested that this has to undergo public

consultations and negotiations with relevant stakeholders in order to properly utilize the lake's water resources without compromising its ecological integrity.

Dr. Tabios explained that there are several alternative sources of water for Metro Manila. He identified surface water sources as potential sources for large-scale and bulk water supply developments. The Kaliwa–Kanan–Agos River System and the Pampanga River could also become alternative water sources. He further stated that groundwater can be tapped as a short-term water source to augment supply during critical periods, especially the dry season. Lastly, the optimal and conjunctive use of surface water and groundwater sources can serve as a long-term operational strategy to meet Metro Manila's increasing water demand. He noted that most studies conducted in the past investigated surface water and groundwater sources not in conjunction, but separately. This is an area of research that could be explored in order to address Metro Manila's growing water supply problem.

Reclaiming Public Services: Giving Back Ownership and Control of Water Services to the Public Sector

Eduardo C. Tadem, Ph.D.

Convenor, Program on Alternative Development,
UP Center for Integrative and Development Studies

Dr. Tadem opened his presentation by relating the key points made in the previous presentations. He explained that there can be no solid waste management without adequate water supply. He also noted that it is necessary to have adequate water sources not just in Metro Manila, but everywhere. Dr. Tadem then explained that his presentation will discuss the government's policy of privatizing water services. He argues that the privatization of water supply allocation and distribution in Metro Manila has been a failure and has not lived up to its promises.

Privatization is a global phenomenon that began during the 1980s, when the Philippine government started to prefer the privatization of practically every public utility and service. The policy was promoted by international financial institutions (IFIs), such as the World Bank and the International Monetary Fund. Privatization aims to reduce the extent of government involvement in business; promote competition, efficiency, and productivity; stimulate private entrepreneurship; and remove the monopolistic and bureaucratic tendencies of government-run agencies.

However, Jomo Kwame Sundaram, a Harvard-trained economist from Malaysia, argues that the promise of privatization remains unfulfilled. It has failed to stimulate private entrepreneurship and it sidelined small- and medium-sized enterprises. Large private enterprises are often monopolies themselves and the privatization of state-owned enterprises (SOEs) only adds to the problem of monopolies. Moreover, as private enterprises are only interested in taking over profitable state-owned enterprises, the government will be saddled with unprofitable businesses. As profit-making activities, privatized services result in inequalities in the delivery of services. Lastly, patronage and corruption frequently accompany privatization in many developing and transitional economies.

Dr. Tadem proceeded to discuss the case of Philippine water privatization. In August 1997, the government-owned Metropolitan Waterworks and Sewage Services (MWSS) was privatized. IFIs considered this move as one of the world's most successful privatization of a water utility, which was meant to improve access to water. However, the now-privatized MWSS encountered several issues, including inadequate coverage, unreliable services, inefficient management of water utilities, unsustainable service provisioning (especially in small towns), and low institutional and technical capacity in relation to utilities managed by LGUs.

Two private companies were granted franchises that covered water services in Metro Manila. Maynilad Water Services Inc. won the "west zone," while Manila Water won the "east zone." Moreover, an MWSS Regulatory Office was established as a provision in the concession agreement. Twenty years later, however, studies have shown the following problems linked to water privatization: unequal access due to rising prices of water, excessive profit-taking beyond allowable limits, inadequate and unreliable coverage (specifically in poor communities), poor water sanitation and wastewater treatment services, the increase of non-revenue water, inefficient management, the non-involvement and/or diminished role of LGUs and the local community, workers' welfare and unemployment issues, use of public funds for water privatization, and the general weakness of the regulatory process.

The failure of the Lopez-owned Maynilad epitomizes the shortcomings of water privatization in the Philippines. In 2008, Maynilad was taken over by a new set of private companies composed of Metro Pacific Investments Corporation, DMCI Homes, and subsidiaries Philippine Hydro, Inc. and Amayi Water Solutions, Inc.

The failures of Philippine water privatization were highlighted by the severe water crisis in Metro Manila from March to April 2019. Households serviced by Manila Water experienced water rationing and cutoffs. The company argued that the cause of the shortage was the critically low water level at the La Mesa Dam. However, this was contradicted by the fact that the other concessionaire, Maynilad, was

able to continue to provide water to its service area. Observers, including former MWSS officials, pointed to “mismanagement and corporate greed” for the fiasco. Eventually, calls were made to terminate Manila Water’s contract.

Dr. Tadem explained that the MWSS has a bigger liability for the problems of water privatization, as it has not done its job as a regulating agency. He added that the composition of the MWSS Board of Trustees violates its own Charter, which states that the Board should be composed of a civil or sanitary engineer, a business and finance manager, a lawyer, and a labor leader. Instead, the Board had six lawyers, two military men, and one chemical engineer. There was also conflict of interest in the relationship between the concessionaires and the regulatory agency.

Another issue that was highlighted was the fact that Manila Water has been expanding and making investments outside of Metro Manila, despite not being able to properly provide water services to its original customers. Manila Water has taken over local water utilities in various parts of the Philippines and has even invested in other countries such as Thailand, Indonesia, Singapore, and Vietnam.

Apart from this, there have been several pending court cases filed against the two water companies. To get around the issues raised against them, they are claiming that they are not public utilities and that they are just agents of the MWSS. These companies have also been passing their corporate income taxes to consumers. They even went as far as filing cases against the Philippine government in international courts in relation to the issue of corporate income taxes.

Dr. Tadem then provided alternatives to water privatization, especially since other countries are experiencing the same problems. He cited several studies in Latin America, Europe, Africa, the United States, and Asia. Forty-five (45) countries have begun important initiatives against water privatization and have campaigned to give local and national governments greater roles in managing water services, along with the provision of other public services such as education, housing, and health, among others.

The most popular alternative is deprivatization or remunicipalization. These terms refer to the act of giving public services back to the government, leading to public ownership, public management, and democratic control that is transparent and accountable. With these alternatives, citizens and civil society organizations are granted seats on the boards or the new public operators. Dr. Tadem explained that there have been 835 successful cases of deprivatization and remunicipalization in various parts of the world—267 of which are on water services in 1,600 cities and towns and in 45 countries.

Another alternative is public–non-profit partnerships, where public agencies work with civil society or community-based organizations in the provision and delivery of water services. Based on examples from other countries, non-profit formations were found to have the capacity to develop non-commercialized water systems. Dr. Tadem stressed that non-commercialized water systems are motivated by public service, rather than corporate profit.

However, Dr. Tadem pointed out that there remain several challenges to the practice of these alternatives, such as the difficulty in modifying or terminating contracts, non-disclosure of information by private companies, the economic power of private companies, obstacles caused by central governments, and the large funding requirements for implementation.

Dr. Tadem ended his presentation by highlighting the importance of political criteria and tripartite cooperation in pushing for viable public ownership of water services. He argued that political criteria are an essential factor in public services and emphasize participation, empowerment, equity, accountability, quality or safety, efficiency, transparency, solidarity, and replicability. He added that the aforementioned obstacles have not stopped the general trend of seeking alternatives to water privatization, especially through remunicipalization. The key for remunicipalization is a strong tripartite cooperation among public officials, water service workers, and the communities themselves. Finally, Dr. Tadem emphasized that the key drivers for reform are vibrant citizens' movements that work hand-in-hand with municipalities to claim back the ownership of basic services.

OPEN FORUM

Moderator:

Aimee Dresá R. Bautista

Former Assistant Professor, UP Department of Political Science

Solid Waste Management

An audience member from the office of Representative Alfredo Abelardo “Albee” Benitez (Third District, Negros Oriental) asked Dr. Rebullida about her thoughts on a proposed amendment to the Clean Air Act of 1999 which would allow thermal treatment or incineration of solid waste. He mentioned that the stakeholders who are promoting incineration had complaints on the current policy framework that restricts LGUs to adopt waste-to-energy technologies.

According to **Dr. Rebullida**, the issues on incineration and waste-to-energy technologies have been at the center of debates on reforms to solid waste management. However, the Philippines decided against these due to lack of political will. She further stated that there is enough research favoring those who oppose incineration. On the other hand, advocates of waste-to-energy technologies might continue to insist on utilizing these. Dr. Rebullida mentioned that there might be advances in waste-to-energy technologies that will address the resistance to incineration. She pointed out that the use of the word “incineration” itself is an anathema and waste-to-energy seems to be a warmer, more pleasing, and subtler terminology. Dr. Rebullida then invited her co-author Dr. Jalton Taguibao to further discuss the impact of waste-to-energy technologies and how the Renewable Energy Act can serve as a complementary law to resolve issues on solid waste management.

Dr. Taguibao explained that if we look at different policies on environment, energy, and solid waste management, there are portions of these policies that are conflicting with each other. For instance, the Renewable Energy Act was passed with the main purpose of commercializing renewable energy technologies so that these can be popularized and distributed through market mechanisms. On the

other hand, the Clean Air Act is part of our compliance to a global movement that recognizes the dangerous effects of air pollution and of greenhouse gas emissions. Dr. Taguibao argued that it is going to be tricky for Congress to amend the Clean Air Act and to come up with compromises and justifications to utilize waste-to-energy technologies, especially incineration. Moreover, Dr. Taguibao clarified that waste-to-energy technologies does not only include incineration, as there are other kinds of such technologies. He stressed, however, that efforts that could potentially increase carbon emissions are going to be in conflict with the Clean Air Act. For renewable energy, there needs to be a bigger effort to reduce waste, such as productive reuse of waste in energy production. He concluded that we should check waste-to-energy technologies and the extent of their emissions that could endanger the fundamental principles of the Clean Air Act.

A representative of the City Environment and Natural Resources Office (CENRO) of Parañaque City talked about the Solid Waste Management Act and added that the law does not have provisions on budget for LGUs. Moreover, he said that there is a need to align the law with the circular economy since most of our waste comes from consumption. He also argued that it is important to develop citizen engagement and to harmonize actions and policies with those at the national level in order to properly implement solid waste management. He further stated that while government agencies deal with one particular issue (i.e., solid waste management), programs and policies at the local level are fragmented and conflicting. Lastly, he suggested to devolve certain programs to LGUs and to create local offices related to solid waste management to better respond to specific concerns.

For better solid waste management, **Dr. Rebullida** suggested that policy approaches should be holistic, integrated, and comprehensive. It is important to have both top-down and bottom-up approaches, involving everyone from the level of the barangay up to the national administration. She noted that raising awareness about environmental issues, such as waste segregation and management, should begin in schools. She also stated that LGUs have commissioned garbage trucks to help them with solid waste management. She emphasized the need

to create recyclable plastic bags to avoid increasing wastes in landfills and cited that other countries are already using recyclable technologies.

The last point that Dr. Rebullida raised is the importance of coordination among the regional, provincial, and national levels of administration towards better implementation of solid waste management. She cited as example a green area in Tokyo, Japan where household waste (e.g., food, plastic, styrofoam, appliances, etc.) are properly recycled. According to Dr. Rebullida, this mechanism is made possible through technology, communication between local and national governments, and efficient planning.

Flood Mitigation

The representative of Rep. Albee Benitez asked Dr. Tabios if there is a sustainable engineering solution that will allow informal settlers to remain along the Mangahan Floodway while the Department of Public Works and Highways (DPWH) is conducting a rehabilitation project at the Pasig-Marikina River. Due to the project, informal settlers were relocated to off-city locations such as in Tanay, Rizal, forcing residents to transfer to an area with no livelihood, education, or healthcare.

Dr. Tabios cited a 2010 World Bank study about a massive flood control plan for Metro Manila. According to him, the budget for the plan is about Php 355 billion, with Php 200 billion supposedly allocated for Pasig-Marikina River and Laguna Lake flood mitigation. However, in terms of a smart solution, he suggested to not fix the flooding problem on the downstream, but to divert the floodwaters to the Pacific Ocean. Dr. Tabios said that such project will cost around Php 50 billion. He stated, however, that the study was not picked up because the Japanese did the Parañaque Spillway study. Instead of an open tunnel, Dr. Tabios pointed out that the latter study proposed to build a 30-meter deep hole tunneling from Laguna de Bay and pumping excess lake water to Manila Bay on the other side. He explained that this does not deal with the flooding problem, because it focuses on the upstream rather than the downstream.

For Dr. Tabios, the smartest solution for the Pasig-Marikina River would be to divert around 3,000 cubic meters of water to the Pacific Ocean. An example he provided is the water that went down the confluence of the Tayabas and Daraitan Rivers, which amounted from 2,400 to 2,500 cubic meters. Through this diversion, as much as 3,500 cubic meters of water can be picked up. There will also be no need to divert water to Laguna Lake, which will also cause flooding. Dr. Tabios also cited Kuala Lumpur as another example, where water from the Klang River is diverted using a 12-meter-diameter storm-water-road tunnel. He suggested that this can be done from Wawa Dam to the municipality of Infanta, Quezon. He added that this tunnel does not need to be of the same diameter, and that it is not difficult to bore a tunnel that will serve the same purpose as the one in Kuala Lumpur. He wrapped up his response by saying that the smartest solution is to divert floodwater from the Marikina River to the other side of Luzon to avoid flooding in Laguna Lake and Metro Manila.

The Deprivatization of Water Services

The representative of Rep. Albee Benitez (Third District, Negros Oriental) asked **Dr. Tadem** where the funds for rehabilitating water utility infrastructures using alternatives to privatization would come from. This is in consideration of the takeover of water districts in the country by private companies. He cited the Villar-owned Prime Water, which is setting up in Negros Occidental and Bacolod City. Another problem that he raised is that water districts are mandated by law to ensure sewerage. He mentioned a recent Supreme Court decision that requires Manila Water and Maynilad to pay Php 900 million for not providing sewerage.

Dr. Tadem first clarified that Maynilad is owned by Metro Pacific and DMCI Consulting and that Metro Pacific is managed, but not owned, by Manny Pangilinan. He clarified that Metro Pacific is owned by an Indonesian conglomerate, which involves the Salim family who were cronies of former Indonesian president Suharto. Moreover, Dr. Tadem added that Villar's Prime Water has been gobbling up local water utilities, such as in San Jose Del Monte City, Bulacan, which

formerly had a successful and efficient water service until it was taken over by the company. The residents of the city are now having problems with their water service because it will take a long time for Prime Water to put up the necessary facilities in the area. He added that setting up these facilities will take up roads and will make traffic intolerable in the area.

Dr. Tadem emphasized that deprivatization is going to be very expensive. According to him, what the government can do is to raise funds for deprivatization and comply with all the requirements for efficient and competent water services. He argued that the government is wasting so much on unnecessary expenditures and have foregone revenues in favor of incentives for private companies and foreign investors. Furthermore, he stated that companies that situate themselves in special economic zones enjoy benefits such as free import and export of products, many years of tax holidays, a mere five-percent income tax, and subsidies based on various laws. He also cited cases of tax evasion by these companies, which contribute to foregone revenues. Dr. Tadem emphasized that the government can generate more money by getting rid of tax evasion and corruption, including in water regulatory agencies.

Another possible way to generate funding is through a “wealth tax,” as proposed by American presidential candidates Bernie Sanders and Elizabeth Warren. Dr. Tadem explained that this tax measure imposes tax not just on income, but also on the wealth of the country’s billionaires. The total wealth of the Philippines’ richest 40 families is equivalent to one-fourth of the Philippines’ national income. The amount that will be generated from the “wealth tax” can be used to fund public services, especially for the poor and the marginalized. Dr. Tadem argued that these potential revenue sources can double or triple the government’s budget.

To conclude his response, Dr. Tadem cited another issue that the Philippines is facing in terms of lack of revenues: automatic debt servicing. This was put in place during the Marcos dictatorship and extended under Corazon Aquino’s leadership. This policy requires

the government to give debt servicing the first cut of the General Appropriations Act (GAA). He argued that the Philippines is the only country that has such policy and even the poorest countries in Africa and Latin America do not have such a debilitating law.

Health Services

A student from the Pamantasan ng Lungsod ng Maynila asked Dr. Atienza why the progress of health services in the country is very slow. He mentioned that they were conducting an assessment of health facilities in Metro Manila and they determined some issues such as the low salaries of healthcare workers and lack of facilities. In addition, he asked Dr. Atienza about her recommendations on how to expedite the progress of the country's health services.

Dr. Atienza explained that the national government does not consider health services as a priority based on the budget that the sector receives annually. However, she also argued that it is also an issue of a weak health movement lobby in the country. While there are health organizations helping grassroots efforts, she said that more needs to be done. She argued that the reason for the efficiency of healthcare programs in other countries—whether they have a federal, devolved, or unitary setup—is a strong involvement of civil society organizations (CSOs) at all levels of government. CSOs push for the enactment and implementation of healthcare reforms both at the national and local levels. Dr. Atienza added that there is good coordination between the public and private sectors. In Metro Manila's case, the issue based on existing studies is that health services are dependent on the funding given by LGUs. She argued that it is crucial to examine where the funds go, as these should go to personnel services, hospitals, and primary healthcare services.

Dr. Atienza pointed out that the Department of Health (DOH) sent a group of its personnel to Cuba in 2016 to learn about the latter's successful healthcare system. Cuba does not have the latest technologies, but they have an effective basic or primary healthcare system that focuses on the prevention of diseases and health promotion, which thereby reduces costs for curative healthcare.

Furthermore, she stated that it is important to empower barangay health workers and community organizations who can provide basic health services, because hospital services are expensive. She also emphasized the importance of information dissemination to avoid the spread of diseases. Dr. Atienza added that it is equally important to engage schools and the private sector in ensuring the success of healthcare services at the local and national levels. In terms of hospitalization, Dr. Atienza cited Makati City as a model wherein every citizen, whether rich or poor, is entitled to the same package of healthcare services. She also stated that we also need to focus on healthcare personnel, which are integral to the operation of the healthcare system. She argued that the government should provide higher compensation for nurses, midwives, and other healthcare workers so that they do not choose to work abroad. This can be done if the Philippine Congress allocates more funding to increase the salaries and benefits of the country's healthcare workers.

She concluded by emphasizing the importance of demanding quality healthcare services from the government. She argued that even if healthcare is not as concrete and tangible as roads, jobs, or electricity and water, it is still a very important public service. Finally, the country must have a holistic plan for healthcare, the environment, and water services. This can be achieved if there are technical experts to explain issues among these services not just to local and national officials, but also to citizens so that the latter can appreciate the interconnections of these.



Left to Right: Dr. Rogelio Alicor Panao, Dr. Kristian Saguin, Asst. Prof. Chester Arcilla, and Mr. Elvin Uy

PANEL TWO

Risk Transfer Mechanisms: Charting a Strategy on Local Insurance

Dennis dela Torre

Chief Science Research Specialist, UP Resilience Institute

Mr. dela Torre began his presentation by providing an overview of risk transfer mechanisms (RTMs). He first defined *risk transfer* as the process in which a party takes financial responsibility for losses in the event of a shock or emergency. He explained that in simple terms, an RTM is an insurance for climate change and disasters. To illustrate the global state of RTM, Mr. dela Torre presented a map that shows the depth of insurance penetration in various countries. Insurance penetration refers to the ratio of premium volume to gross domestic product (GDP) (Beck and Webb 2003). Mr. dela Torre pointed out the irony that even though countries that are prone to climate disasters should have greater insurance coverage, such is not the case in reality. In fact, the Philippines' insurance penetration is less than USD 10 per capita.

According to Mr. dela Torre, risk transfer is a source of financing during disasters; if there is no insurance, who will pay for losses and damage to properties? Risk transfer shifts the burden of financing from individuals to an insurer. In the case of the Philippines, our standard is local insurance. Individuals can use the money from the insurer whenever there is a disaster or emergency. He further explained that when a household is not insured, it is considered as *risk retention*, which

means that someone else pays for the damages. Mr. dela Torre pointed out that risk retention is what is largely happening in the Philippines. Specifically, the country has National and Local Disaster Risk Reduction and Management Funds, or more popularly known as “calamity funds.” Mr. dela Torre stated that these are where the national government and LGUs get funds whenever the country is hit by disasters. These funds mainly are used for disaster response, recovery, and rehabilitation.

Mr. dela Torre proceeded to discuss his study with Dr. Erwin A. Alampay of the UP National College of Public Administration and Governance (UP NCPAG). Their study examines the case of Quezon City and seeks to determine the gaps and barriers to implementing risk transfer at the level of local government. They found that financing for disaster rehabilitation is taken from the local government’s internal funds. Mr. dela Torre emphasized that the goal should be to introduce RTM in order to make Quezon City more resilient and to not rely solely on internal funds for disaster financing. Moreover, an RTM will provide additional funding sources to finance disaster risk reduction (DRR) interventions.

Mr. dela Torre then explained the categories of risk transfer by using the Global Financing for Disaster Risk Reduction (GFDRR)’s classification: the first is *sovereign disaster risk transfer*. This refers to financial strategies that aim to increase the financial response capacity of governments in the aftermath of natural disasters, while protecting their long-term fiscal balances. An example of this is when the national government gets funding from institutions like the World Bank for DRR expenditure. The second one, *property catastrophe risk insurance*, is the one people are most familiar with. This pertains to insurance penetration among homeowners, small and medium enterprises, and public entities. The third classification is *disaster microinsurance*, which facilitates insurance for microenterprises, households, and families.

In the next part of his presentation, Mr. dela Torre showed the country’s National Disaster Risk Reduction and Management (NDRMM) Plan. The plan states that communities should have access to effective and applicable disaster risk financing and insurance and that the Department of Finance (DOF) is the key agency responsible for this

aspect of the plan. He also highlighted that it is stated in the law that there should be risk transfer for disasters. Additionally, Mr. dela Torre mentioned that there also has to be catastrophe insurance at the local level. He further discussed the concept of *parametric insurance*, which refers to payments made upon assessment of damage data, such as wind speed and amount of rainfall for, in this example, a typhoon. After the assessment, all areas affected by the disaster will automatically be given insurance payouts within days or two weeks. This insurance is important especially for the poor so they can quickly recover from the typhoon. Mr. dela Torre argued that for each risk identified by parametric insurance, there must be social protection through RTM. He stated that national policy allows the use of parametric insurance as part of the financial arsenal for those who are in need. However, he pointed out that the country currently focuses on sovereign financing, particularly relying on funding from the World Bank. Mr. dela Torre argued that this is not an appropriate measure for LGUs in the Philippines. It is important to identify all types of social financing sources or social protection mechanisms at the national level. He added that risk layering should be applied in these cases. Risk layering involves retaining the risks for small but recurrent losses, particularly for individuals and households. Risks for severe but less frequent losses are transferred to cooperative or mutual insurance schemes or to commercial insurers.

Before ending the presentation, Mr. dela Torre presented the results of their gap analysis on Quezon City's RTM. First, the city's Hazard, Vulnerability, and Risk Assessment do not completely inform risk transfer options planning. Second, the causative link between risk transfer expenditure and assets or sectors that need social protection are not established. Third, the Local Disaster Risk Reduction and Management Fund (LDRRMF) investment planning process for risk transfer is not synergized with traditional property insurance expenditure. Lastly, there is a large gap on the implementation of risk transfer due to an absence of clear guidelines at the subnational level.

To conclude, Mr. dela Torre provided some recommendations. First, national agencies must address the major implementation gap by formulating clear guidelines and regulations for the utilization of the LDRRMF for risk transfers. Second, the LDRRMF investment planning

process for risk transfers must be synergized with traditional property insurance expenditure by designating the Local Disaster Risk Reduction and Management Offices (LDRRMO) as the lead planning department. Finally, he recommended that the Hazard, Vulnerability, and Risk Assessment, together with a loss and damage framework that allows the targeting of vulnerable sectors at the local level, should inform risk transfer options by integrating a risk layering approach.

Does Fiscal Decentralization Benefit the Margins?: Examining the Uneasy Relationship Between Transfers and Local Fiscal Governance

Rogelio Alicor L. Panao, Ph.D.

Associate Professor, Department of Political Science, University of the Philippines Diliman

To establish the context of his presentation, Dr. Panao discussed fiscal decentralization in the Philippines, where LGUs (i.e., provinces, cities, municipalities, and barangays) have the liberty to create their own funding mechanisms. This falls under the concept of fiscal autonomy as guaranteed by the Constitution. He also explained that while taxing power is a legislative function, it is delegated to the LGUs as stated in the Constitution.

Dr. Panao added that the national government grants funding to LGUs in the form of Internal Revenue Allotment (IRA). This is a form of fiscal transfer which benefits LGUs as they are provided a relatively steady source of funding for their local programs and projects. However, he argued that in general, the IRA benefits wealthier cities than poorer provinces. Dr. Panao was particularly interested in the effect of IRA on local fiscal governance. His study sought to find, in the context of Philippine decentralization, whether fiscal transfers induce local governments' dependence on the central government.

To answer this question, Dr. Panao began the discussion with the debates on fiscal transfer in existing literature. One advantage of fiscal transfers, according to previous studies, is that these address the mismatch in the capacity of subsidiary government units at all levels and across regimes to produce infrastructure and services necessary for productive inputs by subsidizing revenue-generating processes. In countries where transfers follow a matching process, intergovernmental grants induce more revenue efforts to finance local expenditure. On the other hand, evidence-based studies also suggest that without revenue decentralization, fiscal transfers have a negative effect on economic growth and expenditure decentralization. Dr. Panao also argued that it can be used as a political tool to finance particularistic interests. Another potential downside is that it can result in uneven income

distribution and can induce LGUs to commit to financing public goods that they cannot sustain. These issues are common in countries like China, Thailand, and Mexico.

According to Dr. Panao, the susceptibility of local fiscal resources to political capture depends on the nature of the revenue. Locally sourced income is less prone to capture than formula-based transfers. For this reason, improving local tax collection is more efficient than assigning a larger share of national revenue to local governments.

In the case of the Philippines, a majority of LGUs are dependent on the IRA. Dr. Panao inferred that this might be due to the fact that LGUs have limited taxing power under the Local Government Code, which they fail to take advantage of. The IRA is commonly used as a panacea for local development, but this does not respond to inequalities experienced by LGUs. Moreover, because the IRA is given by the central government, the setup undermines the fiscal and political accountability mechanisms for local officials.

The proposed Bayanihan Federalism Constitution supposedly seeks to address these inequalities. However, it does not address the flaws in the current decentralization setup. According to Dr. Panao, the proposed federal constitution has some advantages, but it does not offer any delineation as to what revenue powers are available to provinces, municipalities, and cities. Moreover, the proposal does not address the problems on duplication, underprovision, and accountability. Dr. Panao added that federated regions are only entitled to not less than 50 percent of national taxes, which does not solve the issue of fiscal dependence. Another significant point that Dr. Panao raised is that the proposal aims to establish a Federal Intergovernmental Commission. The proposed commission has the power to determine which regions should receive more funds. Of the 15-member commission, five are appointed by the president (the chair and two members, the secretary of budget, and the secretary of finance). Under the charter draft, the commission has the power to determine which regions are entitled to a share in the equalization fund, which amounts to three percent of annual general appropriations.

To examine if fiscal transfers induce fiscal dependence, Dr. Panoa gathered election and fiscal spending data from the Commission on Elections (COMELEC) and the Bureau of Local Government Finance (BLGF). The dataset covers 81 provinces and 144 cities and spans from 1992 to 2016. Dr. Panoa then created panel models to test if IRA crowds out local revenue generation and if LGUs that rely more on local income spend more for public welfare. Based on the models, provinces are overly dependent on IRA, sourcing practically 82 percent of their income from the national government. Cities, while less dependent, still source 64 percent of their income from the IRA. The findings show that IRA tends to crowd out local revenue and this is more pronounced in provinces than in cities. Dr. Panoa also made interesting observations about a number of political factors. For instance, public welfare spending tends to increase during the year before an election. Also, the farther the LGUs are from Metro Manila, the more reliant they are on IRA. Dr. Panoa said it might be interesting for future studies to look at spending patterns and find whether they are related to local elections.

Dr. Panoa concluded his presentation by saying that the empirical tests in his study validated the doubts raised by scholars about the IRA. He also explained that the reason why the study is conducted is to provide a caveat on unconditional transfers as a fiscal device, which is something that the proposed federalist charter seemed to have overlooked. Dr. Panoa recommended the following minimum standards for any fiscal reform: widening of the taxing power of LGUs, providing clarity for devolved functions, and instituting a fiscal equalization program that only funds for inherent disabilities (e.g., geographic location, conflict, etc.). As a last point, Dr. Panoa argued that reforms are possible even without changing the 1987 Constitution.

Urban Farming and Urban Land Use Dilemmas in Metro Manila

Kristian Karlo C. Saguin, Ph.D.

Associate Professor, Department of Geography, University of the Philippines Diliman

As an introduction to his presentation, Dr. Saguin explained that urban farming has a long history in Metro Manila and other cities. Urban farming has been used by the urban poor and migrants as a way to survive crises and to produce food on their own. More recently, many LGUs have been promoting urban agriculture to address hunger and poverty, as well as to improve the well-being of citizens and to build community funds. In addition, urban farming is framed to improve resilience and waste reduction through composting and various kinds of environmental services. Given these, there are many urban farming projects that are actually supported by the government. Some projects cited by Dr. Saguin include multiple demonstration farms, community gardens, and the use of schools and parks for urban farming activities. He also mentioned that there are non-government-initiated practices (mostly led by individuals) in residential areas, subdivisions, and many in-between spaces. Dr. Saguin highlighted that there are various techniques involving urban farming, the most common of which is vertical farming or container gardening done in constrained spaces or rooftops. Technologies such as hydroponics and aeroponics are also utilized in vertical farms or container gardens.

For his study, Dr. Saguin surveyed the 17 LGUs in Metro Manila to examine urban agriculture activities and programs. According to his findings, the decentralization of some functions of LGUs with regard to agriculture and environmental concerns has contributed to urban agriculture activity in the NCR. Most of these projects are often spearheaded by local government offices or are associated with politicians, such as in Quezon City and Parañaque City.

Furthermore, the national government supports many of these urban farming activities. The Department of Science and Technology

(DOST) and the DENR provide seeds and technologies for urban farming, while the Department of Social Welfare and Development (DSWD) encourages 4Ps (Pantawid Pamilyang Pilipino Program) beneficiaries to participate in community gardening projects. The Department of Education (DepEd) also includes gardening as part of its program on nutrition and health in schools. Despite support from the national government, Dr. Saguin pointed out that there is no overarching framework or legislation that exists for urban agriculture. Although there are bills in both houses of Congress that promote urban agriculture, these have been stalled. Dr. Saguin also highlighted that urban agriculture is related to laws such as the Solid Waste Management Act, and that among the 17 LGUs in Metro Manila, only Markina City has an ordinance on urban agriculture.

Dr. Saguin mentioned that land availability is the biggest problem for urban agriculture in Metro Manila. In the last 20 years, there have been many developed areas in Metro Manila that made it difficult to plant crops. Dr. Saguin explained that this is tied to the region's history of land conversion and the planning philosophy that considers open spaces as idle or unproductive. Because of this mindset, many vacant spaces were converted into industrial, commercial, or residential spaces. For example, from 2008 and 2019, most of the agricultural and green spaces in Taguig City were converted into subdivisions.

Dr. Saguin added that environmental conditions, polluted water, and lack of sunlight can be a problem for vertical farms. While LGUs provide trainings and seminars on managing urban gardens, they have reported that these are not sustainable because residents typically abandon the project. One of the reasons that Dr. Saguin identified is that it takes a lot of effort and time to grow crops in the city. Others do not have income to support gardens and farms, while there are those who do not have the interest to farm at all. Issues of sustainability are likewise tied to increasing land values, conversions, and exclusions in urban areas. Dr. Saguin stated that some areas where individuals were previously allowed to farm were converted due to changing social relations or policies in subdivisions or villages.

Another problem that Dr. Saguin identified is in terms of governance. He explained that government projects tend to exclude farmers since the targets are mostly urban residents. This is the reason why the urban poor are hesitant to farm due to insecurity, land tenure, and land availability. Moreover, there are multiple projects that are dependent on the agenda of particular politicians. This becomes a sustainability problem because there is no assurance that the next administration will continue the project. Dr. Saguin also pointed out that there is no integrative approach when it comes to urban planning, as integration is often absent in most land use and development plans. He added that the plans are usually top-down and there is little space for bottom-up initiatives.

Based on these challenges, Dr. Saguin discussed some potential solutions to address issues in urban farming in Metro Manila. The first is to insert urban farming in the agenda of land use and development plans. It should become a permanent fixture of the urban landscape and should not be considered as something that could be put up for profit. Second, the government should recognize that apart from vertical farming, there are other types of urban farming that could be promoted. Third, the government should identify and survey potential lands for urban farming. He argued that there are many areas for urban farming that should be granted to the urban poor. The identification of lands for urban farming should be coupled with a formal mechanism that will allow for better access to these areas. According to Dr. Saguin, an example of this is an initiative by the local government of Muntinlupa City wherein the urban poor are given access to vacant lots in subdivisions. However, the homeowners' associations of subdivisions remain hesitant to implement this project. The final recommendation is to establish urban farming councils that will engage in urban farming and food systems planning at the local, regional, and national levels. Dr. Saguin suggested that barangays can spearhead this initiative.

In conclusion, Dr. Saguin explained that urban farming should not be taken in isolation, but should rather be integrated with other

concerns like food security, poverty, health, waste management, climate change, and other aspects of sustainable development. For instance, compost from household waste can be used for urban farming. He cited an example in Barangay Holy Spirit in Quezon City, where there is an integration of organic waste management and urban farming. Finally, Dr. Saguin stated that there is a need to emphasize urban farming and social equity in broader discourses on food sovereignty, right to the city, and urban land tenure.

Ensuring the Affordability of Socialized Housing: Towards Livable and Sustainable Homes for the Poor

Chester C. Arcilla, Ph.D.

Assistant Professor, Department of Social Sciences, University of the Philippines Manila

Dr. Arcilla opened his presentation by emphasizing the importance of discussing the problems that Filipino informal settlers in urban areas encounter. He explained that there has been an increasing number of Filipinos who move to cities to look for employment opportunities and this has contributed to the increase in the number of informal settlers in Metro Manila and neighboring areas. In 2009, the number of Filipinos living in urban areas had overtaken those who live in rural areas. According to Dr. Arcilla, around 44 percent of informal settlers in Metro Manila live in Quezon City as of 2011.

He argued that the lack of affordable housing in Metro Manila should be addressed to ease the burden of informal settlers. Before presenting the challenges to affordable housing, Dr. Arcilla first provided its definition. The United Nations Human Settlement Programme (UN-Habitat 2011, 10) defines affordable housing as “adequate in quality and location and does not cost so much that it prohibits its occupants from meeting other basic living costs or threatens their enjoyment of basic human rights.” Dr. Arcilla clarified this further by saying that when individuals pay for their houses, they should not sacrifice expenses for basic needs, including food, education, and transportation.

Based on this definition, Dr. Arcilla identified several issues related to affordable housing. He explained that it is difficult to compute for housing affordability due to changes in income. This is especially related to the concepts of pre-relocation and post-relocation incomes with respect to remote resettlements. This means that whenever a household is relocated, their standard of living (i.e., the ability to earn income) changes. Moreover, UN-Habitat identified land accessibility as a primary constraint to affordable housing. Increasing prices of land directly affects the affordability of housing, which makes it difficult for families to pay for these.

Dr. Arcilla cited several legal bases, including the Constitution, the Local Government Code, and the Urban Development Act of 1992, that mandates LGUs to provide housing for the poor. In addition, the Department of Human Settlements and Urban Development Act of 2018 recognizes that affordable housing does not only cover shelter, but also entails access to livelihood.

The next part of the presentation focused on socialized housing. Dr. Arcilla cited the current definition of socialized housing, which pertains to the provision of housing for the poorest 30 percent of Filipinos. At present, the Housing and Urban Development and Coordinating Council (HUDCC) determines the price ceiling for socialized housing. Dr. Arcilla pointed out, however, that the country's approach to socialized housing is privatized, as the National Housing Authority (NHA) regulates the price of building socialized housing and provides incentives to the private sector for constructing the shelters.

Since the 2000s, the NHA has adopted what is called the "completed housing approach." This refers to offering socialized house and lot units for purchase to target beneficiaries through subsidized loans that can be repaid within a graduated 30-year amortization schedule. However, Dr. Arcilla noted several issues that affect this approach, including the costs of land and construction and interest that adds to the payments of beneficiaries. He stated that the government's response to these problems is to build housing in off-city resettlements to lower costs.

Given these issues, Dr. Arcilla's study asks if the poor can really afford the government's socialized housing. Globally, housing prices are three times (two and a half in the Philippines) a family's gross income. Moreover, around 30 percent of the gross income of families is usually spent on mortgages or rent. However, a family is considered as "severely cost-burdened" if more than 50 percent of its gross income is paid for housing and utilities. Based on Dr. Arcilla's study, from 2003 to 2006, the poorest 10 percent of Filipinos are severely cost-burdened in accessing socialized housing. This is backed by a study conducted by the Home Guaranty Corporation (2005), which found that only Filipinos who belong to the seventh decile can afford the lowest-priced socialized housing in 2003. Based on data from 2015, the poorest 70

percent of Filipinos cannot afford socialized housing at the ceiling price of Php 450,000. Dr. Arcilla further argued that the difference between the actual cost of housing payments by the poor and the prices that private shelter producers find economically feasible suggests that the crisis is a problem for low-income households. Low-cost socialized housing, subsidized loans, and long amortization terms are inadequate to address the housing needs of the poorest Filipinos.

Furthermore, off-city resettlements have low occupancy rates. Dr. Arcilla noted that as of 2017, around 46 percent of socialized housing units are unoccupied. This is mainly due to the fact that most families relocated in off-city resettlements suffer from increased cost of living, increased transportation costs, and livelihood displacement. They also endure the lack of social services due to the influx of poor residents, which burden the capacity of LGUs.

Dr. Arcilla stated that there are several policy directions that can be done with regard to affordable housing in Metro Manila. First, there is a need to develop housing affordability indicators that incorporate the effects of relocation and account for post-relocation household net incomes. Second, the government should provide income-based subsidies and institute income-restoration measures funded by development project revenue streams. In-city housing should also be considered as a significant component of a comprehensive poverty reduction program. Next, it is important to institutionalize participatory governance at the national, local, and institutional levels. Alternative tenure modalities within an equitable urban land reform program should also be institutionalized. He also emphasized the need to develop a clear and integrated framework on employment generation based on equitable urban and regional agricultural development.

As a final note, Dr. Arcilla stated that it is important to reframe the dominant dystopian concept of slums. Slums are pro-poor communities that have developed over a long period in spite of government neglect and poverty. These contain pro-poor economies and architecture and do not subscribe to the usual separation of livelihood and habitation. With increasing labor informality, slums provide social support among the poor—in the form of social networks, credit, exchange of labor,

and charity. He argued that whether we have a federal government or we stick to the status quo, it is important to integrate housing and livelihood as the centerpiece of urban planning.

Basic Education and Federalism: Implications and Options for the National Capital Region

Elvin Ivan Y. Uy

Director for Operations, Philippine Business for Social Progress

The first part of Mr. Uy's presentation examined the education and workforce landscape in the Philippines and in the NCR. In terms of basic and functional literacy, the Philippines has one of the highest rates in Southeast Asia. Mr. Uy pointed out that definitions of basic and functional literacy vary by country. As of 2013, the Philippines' basic and functional literacy rates are at around 96 and 90 percent, respectively.

Mr. Uy went on to discuss statistics on basic education in the Philippines. Based on 2015 data from the Philippine Statistics Authority (PSA), he pointed out that there is a decline in the number of 15- to 19-year-old students who are attending school. He attributed this to the fact that individuals are legally allowed to be employed starting at the age of 15. Another interesting trend is that there is a significant number of male learners who drop out of school. Mr. Uy argued that this is due to the concept of opportunity cost, where boys are pressured to work for income instead of continuing their education. Moreover, males tend to suffer from economic and social pressures that force them to look for employment at an early age.

Meanwhile, data from 2017 showed that there are more than 27 million basic education learners in the country, including those who are in the Alternative Learning System (ALS). Mr. Uy also showed that from 2013 to 2017, the total enrollment for kindergarten and elementary have declined, while the total enrollment for high school has steadily increased. Moreover, elementary National Achievement Test (NAT) scores have gone down from 2015 to 2017, while high school NAT scores have remained flat.

In terms of education funding, there has been a sizeable increase in DepEd's budget both nominally and per capita. The department's budget

grew from Php 175 billion in 2010 to Php 580 billion in 2018. However, DepEd continues to face chronic challenges in basic education access, quality, and governance. There have been disparities in basic education based on income and sex. The median years of completed education for females is only 5.6, while it is 4.5 for males. Moreover, only 60.3 percent of the poorest quintile are able to attend high school, as opposed to 89.9 percent for the wealthiest quintile. Mr. Uy characterized this problem as education poverty—the scarcity of knowledge or education due to poverty.

Another important factor to consider is the ability of students to attend classes. This is measured by the net attendance rate (NAR). For the entire Philippines, the NAR of elementary students is at 93 percent, while for high school students, it is at 78 percent. However, when it comes to low-income families, the NAR of high school students drops to 60 percent.

Mr. Uy then presented the funding for basic education in the NCR. He explained that there are two types of education expenditure. The first is the Special Education Fund (SEF), which comes from one percent of real property tax and is only spent on education. The second are general funds, which are not strictly allocated for education. In terms of SEF, NCR spent Php 9,429 per public school student in 2016. According to Mr. Uy, the SEF per capita changes depending on the Schools Division Office (SDO). He pointed out that the Makati City SDO had the highest SEF per capita, while the SDOs of Malabon City, Marikina City, and Navotas had the lowest amounts. He explained that when a local government's property tax is high and enrollment rate is low, the per capita expense will increase. Although not shown in the data, Mr. Uy argued that per capita expense is not a determinant of students' NAT performance.

Another data that Mr. Uy presented is the median years of completed education in relation to family income and labor force by region. He noted that NCR by far has the highest average income in any region and its working age population is more than 9 million. In terms of years of completed education of males and females in the

whole country, there is a one-year age gap between the sexes. However, there is a huge gap in years of completed education in other regions.

The succeeding part of the presentation focuses on the proposed Bayanihan Federalism Constitution and the key changes that it offers with regard to education. First, complete and quality education is now explicitly stated as a social and economic right in the draft charter. Second, the federal government shall have exclusive power over basic education, culture, and language development. Lastly, the proposed constitution states that there should be free public education in the kindergarten, elementary, secondary, and tertiary levels.

Despite the changes proposed in the Bayanihan Federalism Constitution, Mr. Uy argued that whether the system of governance is unitary or federal is not a definitive determinant of the kind of basic education cycle a country has. In a scenario where the federal government has the exclusive power, basic education will remain to be centralized, similar to our current system. In a second scenario where basic education becomes a shared power between the federal and regional governments, the federal government will be responsible for basic education standards, national assessments, resource provision for strategic areas, and assistance to regions. On the other hand, the regions will handle localization and indigenization of learning content, human resource development, and creation of new public schools or learning centers.

According to Mr. Uy, the most important consideration with respect to federalism are the powers and roles of regional and local governments. He quoted former Chief Justice Hilario Davide, Jr. when he said that the proposed federal charter will be the “massacre of the LGUs” because LGUs are barely mentioned in the plans to create federated regions. Mr. Uy argued that a true and meaningful decentralization can only be possible with empowered and sufficiently-resourced LGUs.

In closing, Mr. Uy discussed a number of policy recommendations on basic education and federalism. The first is that the powers and functions of regional governments and their relations to the national and local governments must be clearly delineated and determined. He also recommended internalizing the costs and benefits of basic education at the local level, while underscoring the fact that equity considerations require uniform standards across jurisdictions. Mr. Uy pointed out that the “big bang” approach to devolution rarely works and that there should be a new system that improves equity in education. Finally, he argued that radical shifts in governance require a strong civil service and continuous human resource development.

OPEN FORUM

Moderator:

Marielle Y. Marcaida

*Assistant Professor, Department of Political Science,
University of the Philippines Diliman*

The IRA for LGUs

A representative from the office of Representative Alfredo Abelardo “Albee” Benitez (Third District, Negros Oriental) asked Dr. Panao about the recent Supreme Court ruling on the Mandanas case, which clarifies the share of IRA from national taxes. Since the ruling may increase the IRA allocation for LGUs by 2022, he asked Dr. Panao if this will impact the fiscal dependency of LGUs. He also asked Dr. Panao if mandating LGUs to spend their IRA for specific projects will undermine the local economy.

Dr. Panao explained that the Constitution states that LGUs should have fiscal autonomy and the power to raise their own revenue. But according to him, the fact that fiscal autonomy is done through the IRA will not contribute to the fiscal autonomy and accountability of LGUs.

Dr. Panao stated further that changes can be introduced without changing the Constitution. He explained that as proposed constitutional changes will not only change the IRA but the entire system, he has doubts over how this will solve the issue of fiscal dependence of LGUs.

Lastly, Dr. Panao challenged Representative Benitez to file a bill that will address the problems of fiscal imbalance and inequalities among LGUs. This bill should be able to strike a balance between making LGUs fiscally independent and helping LGUs that lack financial resources.

Socialized Housing and Land Values

An audience member from the local government of Parañaque City talked about local housing development in Parañaque City in relation to Dr. Arcilla's presentation. He explained that the LGU sets aside a land disposition fund for local housing and mentioned that in 2018, Congress only approved Php 12 million for land disposition. He also stated that the reason why the price of land has increased is due to zonal land values in NCR. He argued that while LGUs try to optimize land use, this has been restricted due to expensive land values. Given these considerations, he asked Dr. Arcilla if there is a way for the plans of LGUs to be integrated in the national framework.

The representative of the Parañaque City government also stated that their LGU has several suggestions in terms of land use and local housing and that they can send these to Dr. Arcilla. However, he mentioned one suggestion in particular, which is to subsidize the ownership of land and site development costs in order to ease local housing expenses.

Moreover, he likewise discussed the influx of families moving to Metro Manila. According to a study conducted by the Parañaque City LGU, the main reason why people prefer to live in Metro Manila is accessibility to basic services such as livelihood, health services, and education. He explained that they recognize that this is a valid reason and that they have to work with this fact. He also stated that he has not heard of a plan from the national government to subsidize land and development costs. Despite the reformatting of the HUDCC, he argued that such responsibilities still go back to the LGUs.

Dr. Arcilla acknowledged that LGUs have made innovations for inclusive housing, but they are still faced with several problems. First, there is a disjunct between the national government and LGUs in terms of planning. Since the NHA is in charge of site selection for housing projects, the agency is faced with the problem of expensive land values. The NHA does not have any choice but to establish houses in off-site locations to be able to produce shelters. On the other hand, LGUs are in charge of in-city houses. The Parañaque City government

representative explained that there is a huge gap between the role of in-city housing and national housing policy.

The second problem, according to Dr. Arcilla, is land availability. He cited a 2016 World Bank study which stated that there are around 3,000 hectares of unused land in Metro Manila. He explained that this data was hard to retrieve, but it is important to help urban poor communities. The problem is that even when there is land, most of these areas are used for commercial purposes (e.g., the land behind Trinoma Mall).

Dr. Arcilla argued that this kind of framework should be changed and that options such as public rental and land agreements should be explored. It is also important to consider that the urban poor need to be given land titles so they do not have to worry about being evicted from their homes. His suggestion is for the government to own the land and to stipulate in a contract that the urban poor cannot be evicted (i.e., for 50 years) from the property.

Another point that Dr. Arcilla brought up is the concept of incremental housing among the poor. This means that they build their houses depending on their income, therefore their homes are usually incomplete. The Parañaque City government representative suggested that it is possible to provide assistance to the poor so they can complete their houses.

Finally, Dr. Arcilla noted the importance of the support for people's planning from both the national government and the LGUs. According to him, the government's plans do not typically match the realities of the poor. When agencies like the DPWH set a one-year timeline, it also needs to consider the timeline of grassroots planning. He emphasized that it is critical for communities to be involved in planning in order for them to be empowered.

Mr. dela Torre added to the discussion by explaining that there is a higher value for land use in the private sector. He stated that there is an inherent budget assumed by capitalists in the form of tenant eviction costs. According to Mr. dela Torre, this is important if we want to encourage cross-sectoral convergence. He pointed out that this can

be interpreted as the equity of the one who will benefit the most. There is a cost to this and the private sector might be convinced to put tenant eviction costs as part of the longer-term equity solution.

Mr. dela Torre also suggested framing the relocation problem as a climate and disaster risk reduction issue to benefit informal settlers. He explained that there is external financing for climate change adaptation projects referred to as the People's Survival Fund (PSF). He strongly encouraged policymakers and planners to look at this aspect because the PSF from the national government, which is coursed through the Climate Change Commission, is at around Php 1 billion. He also mentioned that the UP Resilience Institute can provide a briefing on how to access the PSF, as well as another external financing, the Green Climate Fund. According to Mr. dela Torre, these major financing avenues are available to LGUs, and he hopes that the national government can also tap the fund for long-term solutions.

The Gender Gap in Education

The third question was directed to Mr. Uy by **Ms. Aimee Dresla Bautista (former Assistant Professor, UP Department of Political Science)**. She asked about the disparity in terms of median years of completion for males and females and the practical implications of this disparity, because she thinks that a one-year difference might not have a big impact.

Mr. Uy explained that in terms of the gender gap in education, females tend to stay longer and perform better in school than males. However, it is important to examine if this trend also translates in other sectors such as labor and the economy. He then raised that the best indicator for this examination is labor force participation rate.

According to Mr. Uy, the labor force participation rate for males falls between 74 to 78 percent, while the rate for females is about 46 to 47 percent (this has never breached 48 percent). He further stated that the Philippines has the lowest female labor force participation rate in Southeast Asia. Some of the reasons cited for this trend are cultural, religious, or social norms. For Mr. Uy, this is the biggest problem that the country is facing, especially since females tend to be more educated.

He pointed out that although the country invests in public and private education for female learners, this does not translate to productive endeavors after they finish their studies. Furthermore, he explained that this does not mean that taking care of families is not productive. In fact, since most women tend to stay at home, they contribute to the productivity of their partners. But he explained that since half of the country's population falls under the age of 24, more Filipinos are in the productive age in terms of labor. Mr. Uy also stated that we have a demographic dividend that will allow the Philippines to economically progress in the next three decades if the population is sufficiently educated and trained.

Mr. Uy argued that the country has to maximize the investment that it has been dedicating for education by encouraging more women to participate in the labor force. However, the low participation rate of females despite good education performance is a challenging issue to address. He also stated that this has been a research question that drives many studies and social programs. One specific example is the efforts of the Philippine Business for Social Progress (PBSP), a non-government organization. The organization has been using different approaches to make women more productive in the labor force, such as mainstreaming of reproductive health and gender inclusion in workplaces and sensitizing the demand side. The PBSP also works to ensure that employers make jobs available for both men and women. Another significant lens that Mr. Uy highlighted is the importance of educating children to not adhere to gender stereotypes on the types of work that they can do. This approach is hoped to be able to provide more opportunities for inclusion of the LGBTQIA+ within the labor force.

Land Availability in Subdivisions

The last question came from **Dr. Teresa Encarnacion Tadem (Executive Director, UP Center for Integrative and Development Studies)**, which was about how urban farming and fishing may be affected by the development of more subdivisions in Metro Manila.

Dr. Saguin explained that there are a lot of available areas for urban farming in Quezon City, Marikina City, and Muntinlupa City. Based on interviews, many homeowners' associations have their own community garden projects. He also brought the issue of informal settlements near subdivisions. An example of this is in Barangay Holy Spirit in Quezon City, where informal settlers were allowed to farm in vacant subdivision lots since the 1980s and 1990s. However, **Dr. Saguin** pointed out that informal settlers lost access to these lots since the subdivision put up a wall in the area. This resulted in a conflict between the homeowners' association and the informal settlers. Another example is a subdivision near Rodriguez, Rizal, where community gardens are used to claim space from informal settlers. According to Dr. Saguin, the farming needs of the two communities differ: for informal settlers, urban farming ensures food security; while for homeowners, urban farming tends to be a hobby.

In addition, **Mr. de la Torre** raised the issue of land conversion for residential purposes. In connection to climate change, he cites that there is a specific policy area for land use, land-use change, and forestry (LULUCF) as a contributor to greenhouse gas emissions. Mr. de la Torre argued that it is important to incorporate this policy area in macro-level or national policymaking on land use and climate change adaptation, in the hopes of putting a stop to land conversions.

PUBLIC FORUM:

EMPOWERING LOCAL GOVERNANCE IN THE PHILIPPINES

Policy Studies for the
National Capital Region

08 NOVEMBER 2019

9:00 AM - 3:00 PM

UP CIDS Conference Hall

Lower ground floor, Ang Bahay ng Alumni
Magsaysay Ave., UP Diliman, Quezon City

PANEL ONE (9:45 AM - 11:45 AM)



Solid Waste Management, Environmental Governance, and Sustainable Development: Prospects for the National Capital Region

MARIA LOURDES G. REBULLIDA, DPA
Professorial Lecturer, Department of Political Science, UP Diliman



The State of Health, Delivery of Health Services, and Equity of Access in Metro Manila: Successes, Challenges, and Possible Ways Forward

MARIA ELA L. ATIENZA, Ph.D.
Co-Convenor, Program on Social and Political Change, UP CIDS
Professor, Department of Political Science, UP Diliman



Urban Dimensions of Floodings and Holistic Flood Risk Management: Case of Pasig-Marikina River Basin in Metro Manila

and
Alternative Water Sources for Metro Manila for Water Security and Resilience
GUILLERMO Q. TABIOS III, Ph.D.
Professor, UP Institute of Civil Engineering



Reclaiming Public Services: Giving Back Ownership and Control of Water Services to the Public Sector

EDUARDO C. TADEM, Ph.D.
Convenor, Program on Alternative Development, UP CIDS

PANEL TWO (1:00 PM - 3:00 PM)



Charting a Strategy on Local Insurance:

Risk Transfer Mechanism
DENNIS DELA TORRE
Research Fellow, Center for Local and Regional Governance
National College of Public Administration and Governance
UP Diliman



Does Fiscal Decentralization Benefit the Margins? Examining the Uneasy Relationship Between Transfers and Local Fiscal Governance

ROGELIO ALICOR L. PANO, Ph.D.
Assistant Professor, Department of Political Science, UP Diliman



Urban Farming and Urban Land Use Dilemmas in Metro Manila

KRISTIAN KARLO SAGUIN, Ph.D.
Assistant Professor, Department of Geography, UP Diliman



Ensuring the Affordability of Socialized Housing: Towards Livable and Sustainable Homes for the Filipino Poor

CHESTER ARCILLA, Ph.D.
Assistant Professor, Department of Social Sciences, UP Manila



Basic Education and Federalism: Implications and Options for the National Capital Region

ELVIN UY
Director for Operations, Philippine Business for Social Progress

organized
by:



For more information contact us at pspc.cids@up.edu.ph

CLOSING REMARKS

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I would like to thank you all for coming on behalf of the UP Center for Integrative and Development Studies (UP CIDS), as well as the paper presenters. I would also like to thank the Department of the Interior and Local Government–National Capital Region (DILG-NCR), Jasmin Diaz, and her colleagues. As I mentioned before, the report that we presented will be disseminated by the DILG-NCR. On the part of UP CIDS, we are coming out with policy briefs and a book volume containing our studies, which will hopefully come out by next year. For the first time, we have discussed topics about local governance using a multidisciplinary perspective. This usually comes from the perspective of public administration, but notice that we come from different disciplines. This rarely happens; therefore, we want to come out with these publications. Thank you very much for coming and we hope to see you again!

REFERENCES

- Beck, Thorsten, and Ian Webb. 2003. "Economic, Demographic, and Institutional Determinants of Life Insurance Consumption across Countries." *The World Bank Economic Review* 17, no. 1 (June): 51–88. <https://doi.org/10.1093/wber/lhg011>.
- Home Guaranty Corporation. 2005. "The Implications of the Family Income and Expenditure Survey on Housing Demand and Affordability." Makati City: Home Guaranty Corporation. <http://www.hgc.gov.ph/downloadable/ImplicationofFIES0905.pdf>.
- United Nations Human Settlements Programme (UN-Habitat). 2011. *Affordable Land and Housing in Asia*. Nairobi: United Nations Human Settlements Programme.
- Yoshikawa, Hiroyuki. 2011. "Science and Technology for Society." In *Sustainability Science: A Multidisciplinary Approach*, edited by Hiroshi Komiyama, Takeuchi Kasuhiko, Hideaki Shiroyama, and Takashi Mino, 256–71. Tokyo: United Nations University Press.

APPENDIX

Policy Briefs from the “A Study on the Implications of Federalism in the National Capital Region and Considerations for Forming the Federal Administrative Region” Research Program

Serial Number	Title	Author/s
UP CIDS Policy Brief 2019-08	Reclaiming Public Services: Giving Back Ownership and Control of the Water Sector to Local Government	Teresa S. Encarnacion Tadem and Eduardo C. Tadem
UP CIDS Policy Brief 2019-10	Urban Farming and Urban Land Use Dilemmas in Metro Manila	Kristian Karlo C. Saguin
UP CIDS Policy Brief 2019-13	Risk Transfer Mechanisms: Charting a Strategy on Local Insurance	Dennis G. Dela Torre and Erwin A. Alampay
UP CIDS Policy Brief 2019-15	Ensuring the Affordability of Socialized Housing: Towards Liveable and Sustainable Homes for the Poor	Chester Antonino C. Arcilla
UP CIDS Policy Brief 2019-17	Alternative Water Sources for Metro Manila for Water Security and Resilience	Guillermo Q. Tabios III

UP CIDS Policy Brief 2019-19	Urban Dimensions of Flooding and Holistic Flood Risk Management: The Case of the Pasig-Marikina River Basin in Metro Manila	Guillermo Q. Tabios III
UP CIDS Policy Brief 2020-06	Solid Waste Management, Environmental Governance, and Sustainable Development: Empowering Intergovernmental Relations in the National Capital Region	Maria Lourdes Genato Rebullida and Jalton Garces Taguibao
UP CIDS Policy Brief 2020-09	The Uneasy Relationship Between Transfers and Local Fiscal Governance	Rogelio Alicor L. Panao
UP CIDS Policy Brief 2020-10	Basic Education and Federalism: Implications and Options for the National Capital Region	Elvin Ivan Y. Uy and Dina S. Ocampo
UP CIDS Policy Brief 2020-11	Health and Access in Metro Manila: Challenges and Possible Ways Forward	Maria Ela L. Atienza

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