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QUINQUENNIAL REPORT 2013-2017
OF THE DIRECTOR OF THE
PAN AMERICAN SANITARY BUREAU

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OF THE DIRECTOR OF THE
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**Championing Health for Sustainable Development
and Equity: On the Road to Universal Health
2013-2017**

**Pan American Sanitary Bureau
Regional Office of the World Health Organization for the Americas**

September 2017

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To the Member States:

In accordance with the Constitution of the Pan American Health Organization, I have the honor to present the 2013-2017 quinquennial report on the work of the Pan American Sanitary Bureau, Regional Office of the World Health Organization for the Americas.

This report highlights the technical cooperation undertaken by the Bureau during the period February 2013 through July 2017, within the framework of the 2008-2013 and the 2014-2019 Strategic Plans of the Pan American Health Organization as defined by its Governing Bodies.

Carissa F. Etienne
Director
Pan American Sanitary Bureau

PREFACE

September 2017

1. The period under review, February 2013 to July 2017, covers the majority of my current tenure as the Director of the Pan American Sanitary Bureau—the PASB or Bureau—which is the secretariat of the Pan American Health Organization (PAHO) and the Regional Office for the Americas of the World Health Organization (WHO). In 2013, I was honored when PAHO’s Member States selected me as the 10th Director to lead this venerable and august Organization. Almost five years later, I still consider it an honor, a privilege, and a pleasure to be in the service of the countries of the Region of the Americas in the quest for health and wellness for all of their peoples.

2. At the start of my term, I advocated strongly for four priorities: reducing inequities in health, strengthening health systems, addressing the social and environmental determinants of health, and achieving universal health coverage. These priorities are reflected in the overall theme and content of the Strategic Plan of the Pan American Health Organization 2014-2019, “Championing Health: Sustainable Development and Equity,” which provides the current framework for our technical cooperation. I can safely say that with guidance and collaboration from our Member States, and in partnership with key stakeholders in other development agencies, civil society, and the private sector, we have made significant strides in addressing the priorities.

3. The Organization’s core values of equity, excellence, solidarity, respect, and integrity continue to guide the actions of both the Member States and the Bureau. PAHO has continued to address health development challenges, working steadfastly with the countries of the Americas to overcome them. Still relevant to our technical cooperation are the Organization’s core functions related to leadership and partnerships; research, knowledge generation, and dissemination; norms and standards; ethical and evidence-based policy options; technical cooperation for change and sustainable institutional capacity; and health situation trends. In performing these functions, we utilized national, subregional, and regional approaches as most appropriate; developed and implemented creative and innovative strategies where needed; and restructured the Bureau and made changes in its administrative systems and processes for greater efficiency and effectiveness.

4. Despite the many challenges, there have been many achievements and successes, due in large part to Member States working ever more closely with the Bureau to shape—and to take responsibility for the results of—the technical cooperation. Countries have been eager to contribute and share their experiences, lessons learned, and built capacity, in solidarity and for the good of all. We have had to move quickly to respond to threats and outbreaks of infectious diseases such as Ebola and Zika, even as we continued to prepare for and manage natural and man-made disasters and emergencies and the epidemic of noncommunicable diseases. Additionally, we continued to enhance our

efforts in health throughout the life course, striving to build resilient health systems and to make progress towards universal access to health and universal health coverage.

5. The era of the Millennium Development Goals (MDGs) ended in 2015. The Region as a whole achieved most of the MDGs, but despite progress towards the Goal 5 maternal mortality target, we did not achieve it. Therefore, while there is much to be celebrated, there was unequal progress, and inequality emerged as a barrier to greater achievements.

6. We now have the global Sustainable Development Agenda 2030 and its Sustainable Development Goals, the SDGs, to guide our actions in addressing the unfinished MDG agenda, protecting the gains made, and facing new challenges. There is a specific health goal—Goal 3—but the other SDGs have implications for health, and actions to address them must be part of PAHO's repertoire, in a strengthened partnership with non-health sectors, civil society, and the private sector, as necessary and as appropriate.

7. Through the forward-looking PAHO Strategic Plan 2014-2019 and the Organization's cross-cutting themes of gender, equity, human rights, and ethnicity, we have already begun to address the SDGs, which highlight the importance of the social determinants of health, adequate health financing, partnerships, and of leaving no one behind on the road to universal health and sustainable health development.

8. We have worked hard to maintain health high on the regional development agenda and to promote universal health, collaborating with the Organization of American States (OAS) to ensure that the final *Mandates for Action* document of the VII Summit of the Americas in April 2015 included support for priority health issues. The OAS and PAHO have formed an informal working group that began work in February 2016 to guide our collaboration over the next five years, and to persuade other entities to join us in a regional approach to the SDGs that addresses underlying determinants of health, health equity, and universal health.

9. The Health Agenda for the Americas 2008-2017 is coming to a close, and PAHO's Member States have moved efficiently to develop a new framework, with the Bureau's support. A Countries Working Group has drafted the Sustainable Health Agenda for the Americas 2018-2030, a new high-level framework tailored to the situation in the Region and aligned with the SDGs. The framework will be presented to the 29th Pan American Sanitary Conference in September 2017 for approval.

10. There will always be changing environments and circumstances that present both opportunities and challenges. A new WHO Director-General, Dr. Tedros Adhanom Ghebreyesus, was elected at the May 2017 World Health Assembly, and we look forward to working closely with him and his team. There have been changes in political administration in several PAHO Member States, with uncertainties regarding the implications of some of those changes for PAHO and WHO. However, we know that

health is a highly valued and unifying commodity for countries, being both a contributor to, and product of, sustainable development, and we are confident that our Member States will continue to demonstrate Pan Americanism and solidarity.

11. On 2 December 2017, PAHO will celebrate 115 years of continuous operations. The Organization might be categorized as a healthy centenarian, perhaps with the occasional ache or pain, but still very active and productive; thinking, analyzing, learning, and innovating; and taking actions for the prevention, early detection, and treatment of threats to its efficient and effective functioning.

12. The achievements highlighted here are the result of solidarity and joint efforts, and I express my sincere gratitude to PAHO's Member States; Member States and staff in other WHO regions; other United Nations agencies working in health; development partners; other key stakeholders in health, including those in civil society and the private sector; and all personnel of the Pan American Sanitary Bureau, in countries and in Washington, D.C., for their guidance, collaboration, and support over the period covered by this report. Together we shall advance towards the realization of a collective vision of a Region where all peoples, particularly the underserved, can achieve the highest attainable standard of health and well-being, allowing them to enjoy dignified and productive lives.

Carissa F. Etienne
Director
Pan American Sanitary Bureau

EXECUTIVE SUMMARY

13. Over the 2013-2017 period, the Pan American Health Organization, the Regional Office for the Americas of the World Health Organization, continued to undertake technical cooperation at the national, subregional, and regional levels in support of national health development. These efforts were led and coordinated by the Pan American Sanitary Bureau (PASB), PAHO's secretariat, and involved key national and international stakeholders and partners. PAHO's technical cooperation during this period, which began with Dr. Carissa Etienne assuming office as Director, has been guided primarily by the PAHO Strategic Plan 2014-2019. The Strategic Plan was developed with significant involvement of Member States utilizing a bottom-up process that took into consideration priorities determined at the country level through the development of PAHO/WHO Country Cooperation Strategies together with a priority-setting methodology. It also aligned with the WHO General Programme of Work, the Millennium Development Goals, the Health Agenda for the Americas 2008-2017, and, in its forward-looking formulation, the 2030 Sustainable Development Goals, to ensure PAHO's contribution to Member States' fulfilment of these major health-related international agreements and frameworks.

14. During the period, guided by resolutions approved by its governing bodies, PAHO emphasized a wide range of critical issues. These included health systems strengthening and resilience to advance toward universal access to health and universal health coverage; building national capacity to respond to health emergencies and disasters, and fulfill the requirements of the International Health Regulations (IHR) (2005); taking a life-course approach to health interventions, with emphasis on maternal, child, and adolescent health, as well as the health of older persons; reducing health inequities, with a focus on vulnerable groups, including ethnic and indigenous populations; reducing, and eliminating where possible, communicable diseases; preventing and controlling noncommunicable diseases (NCDs) and their risk factors; and addressing the social and environmental determinants of health through multisectoral and all-of-society mechanisms. The Organization also sought to improve its own institutional capacity and systems for greater efficiency and effectiveness of its technical cooperation.

15. Notable successes in health system strengthening and building resilience occurred in expanding access to services, such as through the *Mais Médicos* Program in Brazil; developing or updating health-related legislation and regulations, as in the establishment of the Caribbean Regulatory System; advocating for improvements in health financing and use of the fiscal space; building the capacity of human resources for health to contribute to progress to universal health, including through online training using the PAHO Virtual Campus for Public Health; improving access to medical products and technologies, including safer radiation services; and strengthening health-related research, information systems, knowledge management, and communication.

16. PAHO's Member States dealt with a myriad of emergencies, disasters, and disease outbreaks over the period, and there were significant improvements and

innovations—both internally in the PASB and in technical cooperation with countries—in mechanisms to respond to these events, especially in the context of mass gatherings such as the Summer Olympics in Brazil in 2016. Hurricanes, earthquakes, fires, migrant flows, and viral disease outbreaks were among the varied causes of health emergencies that tested Member States’ capacities, partnerships, and solidarity, as well as the timeliness and scope of PASB’s response and resource mobilization capabilities. The threat of Ebola virus, the widespread circulation of chikungunya and Zika viruses, and the resurgence of cholera in Haiti led to assessments that identified gaps and challenges in the development of national core capacities for IHR implementation. However, they also allowed responses that included new approaches and innovations, such as implementation of the PASB’s Incident Management System and strengthening of its Emergency Operations Center; improved guidelines for deployment of national and international Emergency Medical Teams; strengthening of disease surveillance systems; technology transfer of water-quality monitoring systems; and development of new partnerships to address identified priorities.

17. In addressing life-course interventions, an important milestone was the creation in 2013 of the initiative “A Promise Renewed for the Americas,” the regional chapter of a global interagency movement for which the PASB serves as the secretariat. The movement seeks to reduce inequities in reproductive, maternal, child, and adolescent health in Latin America and the Caribbean. Over the next 15 years, the regional chapter will help countries to develop and implement national operational plans to respond to equity concerns in these population groups, in the framework of the Global Strategy for Women’s, Children’s and Adolescents’ Health. Taking a holistic approach, the life-course interventions also included improvements in nutrition, with PAHO’s promotion of, and contribution to, the United Nations (UN) Decade of Action on Nutrition 2016-2025 and consideration of both under- and overnutrition. National interventions to prevent overweight and obesity included policy development and fiscal measures, the latter including taxation on sugar-sweetened beverages, as occurred in Barbados, Chile, Dominica, Ecuador, and Mexico.

18. PAHO’s commitment to reducing inequities in health remained one of the strong pillars of its technical cooperation, and the Organization worked assiduously to integrate the cross-cutting themes of gender, equity, human rights, and ethnicity into all its work. Actions included the creation by the Director of an interprogrammatic group to facilitate such integration; the groundbreaking approval by the 53rd Directing Council in 2014 of a resolution to address disparities in access to, and use of, health services by lesbian, gay, bisexual, and transgender people; development of a core set of indicators for gender and health; identification of priorities for the health of indigenous peoples and Afro-descendants; and PASB’s adoption of a new set of metrics for measuring changes in health inequality. In 2016, PAHO launched the Commission on Equity and Health Inequalities in the Region of the Americas in partnership with the Institute of Health Equity at University College London.

19. Despite continuing challenges in reducing communicable diseases, with PASB's technical cooperation, including the use of the PAHO Revolving Fund for Vaccine Procurement (the "Revolving Fund") and the PAHO Regional Fund for Strategic Public Health Supplies (the "Strategic Fund"), several Member States succeeded in eliminating some of these diseases at the national or subnational levels. The eliminated diseases include Chagas disease (Brazil, Chile, and Paraguay), onchocerciasis (Colombia, Ecuador, Guatemala, and Mexico), and trachoma (Mexico). In June 2015, Cuba became the first country in the world to receive validation of the elimination of mother-to-child transmission of human immunodeficiency virus (HIV) and syphilis. In April 2015, the International Expert Committee for Documenting and Verifying Measles, Rubella, and Congenital Rubella Syndrome Elimination determined that the Region of the Americas had eliminated endemic transmission of rubella and congenital rubella syndrome. At the 55th PAHO Directing Council in September 2016, the Committee announced the elimination of endemic measles from the Region, a historic milestone that capped a 22-year effort involving mass vaccination against measles, mumps, and rubella throughout the Americas. These diseases were the third, fourth, and fifth to be eliminated from the Americas, following smallpox in 1971 and polio in 1994, and all five represent first-in-the-world regional achievements. PAHO has now set its sights on the elimination of malaria in the Region's 21 endemic countries, cholera in Hispaniola, and HIV transmission Region wide; strengthening the "One Health" approach to addressing health issues at the human-animal-environment interface; and responding to increasing antimicrobial resistance. The increasing burden of NCDs, recognized at the national, subregional, regional, and global levels, generated a host of declarations, recommendations, guidelines, strategies, and action plans. PAHO developed regional plans of action for the prevention and control of both NCDs and childhood obesity, and fostered the formulation of national multisectoral NCD action plans, advocating for inclusion of nonhealth sectors, civil society, and the private sector. The Organization worked to strengthen Member States' capacity for development and implementation of legislation, regulations, and policies aimed at reducing the four main NCD risk factors: tobacco use (acting within the context of the WHO Framework Convention on Tobacco Control), unhealthy diet, physical inactivity, and harmful use of alcohol. PAHO also promoted the chronic care model for improved quality of care at the primary level, focusing on the four main NCDs: cardiovascular disease, diabetes, cancer, and chronic respiratory disease. In addition, PAHO included NCD medications for procurement through the PAHO Strategic Fund. In collaboration with partners, PASB spearheaded interventions to strengthen NCD risk factor surveillance, conduct research on the occurrence of chronic kidney disease from nontraditional or unknown causes in Central America, and address violence and injuries, particularly road traffic injuries and violence against women. The Organization continued its focus on mental health, working with countries to implement WHO's Mental Health Gap Action Program, which promotes scaling up of services for mental, neurological, and substance abuse disorders, especially in primary health care.

20. Recognizing the critical importance of addressing the social determinants of health and ensuring healthy and safe environments, PASB not only advocated for whole-

of-government, whole-of-society, and Health in All Policies (HiAP) approaches, but also developed a regional Plan of Action for Health in All Policies, which was approved by the 53rd Directing Council in 2014. PASB partnered with the Government of Suriname and others to hold the first regional HiAP workshop in Suriname in 2015 and established a partnership with institutions in Brazil, Chile, and Mexico to build capacity in HiAP. Prior to the 2016 Global Conference on Health Promotion in Shanghai, China, PAHO collaborated with the Ministry of Health in Chile and other partners to hold a Mayors' Pre-Forum. The Declaration of Santiago that resulted from the Pre-Forum called on the Region and the global community to promote health through local networks and develop policies and actions that address the determinants of health, human rights, and inequities, through HiAP and intersectoral action, in the framework of the SDGs.

21. In further efforts to secure safe, healthy environments, several of PAHO's Member States contributed to the final text of the Minamata Convention on Mercury; the Organization advocated for and contributed to interventions for workers' and consumers' health, including establishment of a regional CARcinogen EXposure (CAREX) database; and selected Member States participated in the Consumer Health and Safety Network coordinated by PAHO and the Organization of American States. Work continued to improve water and sanitation, with strengthening of countries' capacity to develop and use water safety plans and sanitation safety plans, as well as promotion of country involvement in the UN Global Analysis and Assessment of Sanitation and Drinking Water. PASB also addressed health-related aspects of climate change, advocating for inclusion of relevant text in the documents of the 20th and 21st Conferences of the Parties to the UN Framework Convention on Climate Change in 2014 and 2015, respectively, and contributing to the preparation of Member States for implementation of the WHO air quality guidelines, which address air pollution and its impact on climate change and health.

22. Internally, PASB's measures to improve its efficiency and effectiveness included governance, programmatic, management, and administrative innovations. Selected Member States, with support from PASB, formulated a new high-level framework for health development in the Region—the Sustainable Health Agenda for the Americas 2018-2030—to succeed the Health Agenda for the Americas 2008-2017. The Organization experienced deeper participation of Member States in its strategic planning and priority-setting processes, as well as in the monitoring and evaluation of programs and plans. PASB responded to adjustments in WHO's health emergency programs with adjustments of its own to maintain alignment and take advantage of lessons learned globally and regionally in responses to emergencies, disasters, and outbreaks.

23. PAHO continued to tailor its technical cooperation to address country and subregional health priorities, with the strengthening of mechanisms for country focus and updating of the Organization's Key Countries Strategy. PASB revamped PAHO's signature Technical Cooperation among Countries program to become the more strategic and inclusive program for cooperation among countries for health development, which makes operational the policy on cooperation for health development in the Americas

approved by the 52nd Directing Council in 2013, and strengthened the structure, development, and coordination of subregional technical programs.

24. Internally, substantial benefits have come from the introduction of the new PASB Management Information System (PMIS); enhancement of the Integrity and Conflict Management System; development of the new PAHO People Strategy for strengthening the PASB's own human resources; a new information technology strategy; continued development of the Organization's enterprise risk management structures and processes; and the establishment of mechanisms for learning from audit and evaluation findings. The positive results have included increased efficiency (despite the steep learning curve for the implementation of the PMIS), a working environment more conducive to quality performance, improved identification and mitigation of risks, and enhanced institutional learning.

25. Over the next five-year period, PAHO's functions and actions at the national, subregional, and regional levels—within the frameworks of the respective health policies, strategies, and plans; country and subregional cooperation strategies; and global health and development goals—will address selected priorities based on needs and gaps, while also building on successes and lessons learned. The priorities include universal health; IHR and emergency and disaster response capacity; antimicrobial resistance; equitable health for vulnerable groups (including women and children, ethnic groups, and indigenous populations), with continued mainstreaming of the cross-cutting themes of gender, equity, human rights, and ethnicity; elimination of communicable diseases where feasible; prevention and control of the main NCDs and their risk factors; determinants of health and multisectoral approaches (including response to climate change); access to essential medicines and health technologies; health and health-related SDG targets; and continued institutional strengthening. Partnerships, alliances, and collaborations with key stakeholders across sectors will continue to play major roles in the Organization's work and progress made by Member States in sustainable health development.

INTRODUCTION – PAHO AT 115 YEARS

26. Since the Pan American Health Organization was established in December 1902, its focus has broadened from the prevention and control of selected infectious diseases to include numerous other challenges to the health and well-being of the peoples of the Region of the Americas. It is vital to determine and address the underlying factors and root causes of threats to health and wellness by examining such issues as natural and man-made disasters and emergencies; emerging and reemerging communicable diseases; noncommunicable diseases, including mental disorders; and promotion of health throughout the life course.

27. PAHO's 115 years of experience at the forefront of regional public health and its 69 years of significant contributions to global public health as the WHO Regional Office for the Americas have served the Organization well. PAHO continues to focus on the priority needs of Member States, performing its core functions, innovating and improving, and sharing experiences and successes, all in pursuit of health.

28. However, with always-present resource limitations, there is need to identify the “priorities among the priorities” for the Organization's action at the regional, subregional, and national levels, including those countries that demand more focused attention because of their more precarious and vulnerable health situations. PAHO's strategic plans, developed in collaboration with Member States and other key stakeholders, provide the framework for the Organization's technical cooperation over defined time periods to achieve specific regional outcomes. The plans also facilitate tailored interventions at the subregional and national levels, giving particular attention to eight designated “Key Countries” and contributing to reduction in inequities and fulfillment of human rights obligations. (The Key Countries are Bolivia, Guatemala, Guyana, Haiti, Honduras, Nicaragua, Paraguay, and Suriname.) Importantly, close alignment of the strategic plans with WHO's General Programme of Work for the specific periods facilitates regional contributions to global health outcomes and goals.

29. This report presents some of the highlights of PAHO's technical cooperation with its Member States over the 2013-2017 period, within the framework of the PAHO Strategic Plan 2014-2019. To a significant degree, the chapters of the report mirror the six Categories¹ and 30 Program Areas of the Strategic Plan, but the report is not strictly organized according to the structure of the Strategic Plan. Selected processes, achievements, innovations, and challenges are presented, related to both the Organization's programmatic technical cooperation and the PASB's internal structure, systems, and processes.

¹ The Categories are Communicable Diseases; Noncommunicable Diseases and Risk Factors; Determinants of Health and Promoting Health throughout the Life Course; Health Systems; Preparedness, Surveillance, and Response; and Corporate Services/Enabling Functions.

30. The report incorporates lessons learned during the period, and it presents issues for consideration and action as the Organization looks to the future. The report also outlines threats and opportunities for the maintenance and sustainability of PAHO's quality technical cooperation with Member States, its partnerships with key stakeholders in health development, and the Organization's continued contribution to the health of the peoples of the Americas and beyond, in the era of the Sustainable Development Goals.

1. ACHIEVING UNIVERSAL ACCESS TO HEALTH AND UNIVERSAL HEALTH COVERAGE

Implementing the regional strategy for universal health

31. The countries of the Americas have made significant progress in improving access to health systems and services. However, inequities in wealth and other social determinants of health² persist throughout the Region, and have a significant impact on health and access to health services. The percentage of the population reporting access barriers varies greatly among countries, from 7% to 66%, and is highest in the poorest households. Thirty percent of the population does not have access to health care for financial reasons, and 21% does not seek care due to geographical barriers. Among the groups most affected are populations in conditions of vulnerability, such as very young and very old people; women; children; indigenous and Afro-descendant populations; migrants; lesbian, gay, bisexual, and transgender (LGBT) persons; and people with chronic or incapacitating diseases. In the last five years, about 1.2 million deaths could have been avoided in the Region if health care systems offered accessible, quality, timely health services. In a number of countries, 10% to 15% of the population still experiences catastrophic expenses, with out-of-pocket payments that put them at risk of impoverishment.³

32. Countries in the Region are diverse in size, resource capacity, and levels of development, and universal health provides a powerful unifying concept to guide health development and advance health equity. PAHO Member States reaffirmed their commitment to improving equity, health, and development with the approval of the regional Strategy for Universal Access to Health and Universal Health Coverage (Document [CD53/5, Rev. 2](#)) by the 53rd PAHO Directing Council in October 2014. The Strategy sets the goal, at both regional and country levels, of ensuring that “all people and communities have access, without any kind of discrimination, to comprehensive, appropriate, and timely quality health services determined at the national level according to needs, as well as access to safe, effective, and affordable quality medicines, while ensuring that the use of such services does not expose users to financial difficulties, especially groups in conditions of vulnerability.”⁴ Universal access to health and universal health coverage requires the adoption and implementation of multisectoral policies and interventions to address the social determinants of health, promoting a whole-of-society commitment to fostering health and well-being.

² The social determinants of health are the conditions in which people are born, grow, live, work, and age. These circumstances are shaped by the distribution of money, power, and resources at global, national, and local levels.

³ Atun R, de Andrade LO, Almeida G, et al. Health system reform and universal health coverage in Latin America. *Lancet*. 2015;385:1230-47.

⁴ Including services and interventions to promote health, prevent disease, provide care for illness (diagnosis, treatment, palliative care, and rehabilitation), and offer the necessary short-, medium-, and long-term care.

Regional advances towards universal access to health and universal health coverage

- Twenty countries and territories in the Region have developed comprehensive national health policies, strategies, and/or plans within the context of elements of the regional Strategy for Universal Access to Health and Universal Health Coverage: The Bahamas, Brazil, Canada, Chile, Colombia, Cuba, the Dominican Republic, Ecuador, El Salvador, Guyana, Honduras, Jamaica, Mexico, Montserrat, Peru, Saba, Trinidad and Tobago, the United States of America, Uruguay, and Venezuela.
- Fifteen countries have developed and implemented financial frameworks for universal health: The Bahamas, Brazil, Canada, Chile, Colombia, Costa Rica, Cuba, the Dominican Republic, Ecuador, El Salvador, Mexico, Panama, Peru, the United States, and Uruguay. Chile, Colombia, Guyana, Haiti, and Peru have included social protection in health as a basic tenet of their health systems, and El Salvador, Mexico, Peru, and Uruguay have developed or updated their guaranteed health care benefit packages.
- The Bureau also provided support to ministries of health in their work with ministries of finance and financial institutions to increase health financing; in 2016, Barbados and Saint Lucia completed detailed health financing strategies.
- Eleven countries have developed regulatory frameworks to advance towards universal health: Bolivia, Brazil, Colombia, Ecuador, El Salvador, Guatemala, Honduras, Nicaragua, Peru, Suriname, and Uruguay.
- Bolivia, Costa Rica, El Salvador, Mexico, and Uruguay, along with the Dominican Republic and other countries of the Caribbean, have worked to improve coverage with support from PAHO and the United Kingdom's Department for International Development (DFID), the Australian Agency for International Development (AusAID), and the Spanish Agency for International Development Cooperation (AECID).
- PASB undertook technical cooperation with countries to develop and implement road maps and action plans to advance towards universal health. This included the development of tools, capacity-building, and training. During the period, 715 professionals were trained in the essential public health functions; the design and management of health care services; parliamentary action and the right to health; the Productive Management Methodology for Health Services; health economics in the context of progress towards universal health coverage; and national health accounts.

Expanding access to health services

33. Transforming the organization and management of health services through the development of people- and community-centered models of care is key to expanding access to services. The countries of the Region have made important strides in that direction during this period, assigning priority to expanding access to primary health care. PASB's technical cooperation contributed to the design, expansion, and organization of integrated health services networks (IHSNs) in Argentina, Belize, Bolivia, Brazil, Ecuador, El Salvador, Guatemala, Nicaragua, Peru, and Suriname.

34. In 2015, PASB convened the regional forum "Equitable Access to Health Services: Experiences and Key Interventions" in Washington, D.C. The forum, attended by representatives of 16 Member States, analyzed experiences and provided recommendations for transforming the organization and management of health services,

increasing the resolution capacity of the first level of care within IHSNs, prioritizing and defining the progressive expansion of quality health services, and implementing change. The event demonstrated the wealth of experience being accumulated in the Region in the organization of health care networks, as countries continue to expand access to comprehensive and integrated quality health care. Closely linked with this work, PASB updated the Productive Management Methodology for Health Services, a methodology that is used to build and strengthen managerial capacity in health systems and services by improving the use of information and evidence for decision-making. The Bureau provided direct technical cooperation to several countries, including Brazil, Chile, the Dominican Republic, Ecuador, El Salvador, Guatemala, Guyana, Haiti, Mexico, Panama, and Peru, in the use of these tools to improve the management of health services.

Mais Médicos

35. The innovative *Mais Médicos* (“More Doctors”) Program was established in 2013 in Brazil, where health care is a constitutional right, and made operational through the Unified Health System (Sistema Único de Saúde (SUS)). The *Mais Médicos* Program aims to increase the availability of medical training in the country’s national universities, improve incentives for health professionals to work in underserved areas, and recruit personnel from outside the country to provide health services in such areas, as needed. Under a series of legal agreements, the PASB, the Ministry of Health of Brazil, and the Government of Cuba collaborated to address the identified short-term needs for health professionals, with the aim of increasing health service coverage and access to the SUS.

36. The program has reached an estimated 63 million people in historically underserved communities, with deployment of over 18,000 Brazilian and foreign health care professionals to more than 4,000 municipalities, most of them socioeconomically vulnerable areas in remote zones, on the outskirts of cities, or in Brazil’s 34 special indigenous health districts. While foreign medical doctors have provided the means to rapidly expand access to health services in the short term, Brazil has invested in the expansion of medical school enrollments and creation of new residency positions for specialists in order to scale up the domestic health work force.

37. PASB provided technical cooperation in specific aspects of the program, in particular the integration of Cuban doctors into the health system; planning and capacity-building for the health work force; development and implementation of a monitoring and evaluation framework; and documentation of best practices and lessons learned. In addition to increased access to primary health care for more than 60 million people in Brazil, independent evaluations of the *Mais Médicos* Program have also shown improved user satisfaction, with 95% of users expressing satisfaction with the performance of participating doctors and 86% reporting improvement in quality of care; a decline of 89% in service waiting times, despite a 33% increase in the average number of primary care visits per month; and a 32% increase in the number of home visits by doctors.

Strengthening stewardship and governance: health systems transformation and health law

38. PASB undertook high-level, targeted technical cooperation with 16 countries⁵ that are in the process of major health system transformations to advance to universal health, focusing on multidisciplinary and intersectoral approaches to health reform. Priority was given to several of PAHO's Key Countries, with intensified technical cooperation being provided to Bolivia, Guatemala, Guyana, Haiti, Honduras, and Suriname. In addition to the Bureau's technical cooperation to increase national health authorities' capacity in governance, stewardship, and leadership, during her visits to countries the Director championed increased dialogue across sectors and with multiple stakeholders, including health, finance, social development, legislative branches of government, and civil society.

39. PASB developed a framework to monitor progress in countries towards universal health, and used it in technical cooperation with Chile, Cuba, El Salvador, Jamaica, Panama, Peru, and Trinidad and Tobago, leading to the identification of key areas for future work in these countries. In 2015, PAHO undertook a review of the reference framework and tools for the essential public health functions (EPHFs) as a means to strengthen stewardship and improve capacities to support universal access to health and universal health coverage throughout the Region, and, in doing so, contribute to the development of resilient health systems, health security, and risk reduction. The EPHF review is consistent with recommendations from the 138th Session of the WHO Executive Board in January 2016 (Resolution [EB138.R5](#)), and as of mid-2017, an updated proposal and list of functions, including an analytical conceptual framework, was being discussed with countries throughout the Region and with other WHO regional offices.

Strategy on health-related law

40. Domestic laws are important instruments for the establishment of legal frameworks to strengthen national health systems, contribute to the fulfilment of the right to health and other human rights, and promote the enjoyment of the highest attainable standard of health. The regional Strategy for Universal Access to Health and Universal Health Coverage urges Member States to exercise leadership to influence policies, plans, legislation, regulations, and actions beyond the health sector that are related to human rights, in particular those affecting the underlying determinants of health. As a consequence, health-related law is a tool of growing importance for promoting health, equity, and access to health. Legal frameworks can be used to establish rights, limits, and responsibilities in areas such as tobacco control, food, healthy and safe environments, alcohol marketing, access to medicines and health technology, workers' health, and the rights of persons in conditions of vulnerability.

⁵ The Bahamas, Bolivia, Chile, Costa Rica, the Dominican Republic, Ecuador, El Salvador, Guatemala, Guyana, Haiti, Honduras, Jamaica, Panama, Peru, Suriname, and Turks and Caicos.

41. In October 2015, PAHO's 54th Directing Council approved a regional Strategy on Health-related Law (Document [CD54/14, Rev. 1](#)). The approach, developed through a consultative process led by a working group of Member States and coordinated by the Bureau, promotes the development, implementation, and review of laws and legal frameworks to protect human rights, advance health equity, promote solidarity and nondiscrimination in health, reduce risk factors, and address the social determinants of health. Consistent with Resolution [CD50.R8](#), which is on health and human rights, the Strategy on Health-related Law promotes strengthening the technical capacities of health workers in order to improve access and quality in health services, with emphasis on groups in situations of vulnerability. The strategy also calls for the exchange of strategic information—such as best practices and judicial decisions—among Member States and with international organizations, and for stronger coordination and collaboration between health authorities and the legislative branch at the national level.

42. At the country level, PASB contributed to updating basic health legislation, including the review and development of laws guiding health system organization and access to health, vaccines, NCD risk factor reduction (including tobacco control, alcohol regulation, marketing and labeling regulations for unhealthy foods, and marketing of breast milk substitutes), mental health, road safety, and human research. PASB supported El Salvador in drafting its new Integrated Health System Law; Honduras in developing a new legislative framework for social protection in health that integrates various health care providers into a single system with a uniform package of guaranteed services for the entire population; Panama in drafting a new health code; and Cuba in reviewing its public health legislation. These actions help build capacity and promote exchanges among legal advisors within ministries of health, parliamentary health commissions, and subregional international parliamentary organizations such as the Central American Parliament and the Andean Parliament, with which PASB has signed cooperation agreements.

Strengthening regulatory systems for medicines and other health technologies

43. Improving access to safe, quality-assured, effective medicines and other health technologies constitutes a priority area of work for the Bureau, within the context of universal access to health and universal health coverage. PAHO's technical cooperation aims to strengthen functional and context-specific regulatory systems for medical products, while promoting convergence and harmonization of the systems at the regional and global levels. PAHO's approach includes assessing regulatory performance; collecting and analyzing regulatory data to support institutional development; formulating regulatory models tailored to health system needs; and brokering collaboration among national regulatory authorities (NRAs), networks, and other stakeholders for the development of regulatory systems and specific regulatory functions. As a result of these efforts, 8 NRAs are now considered NRAs of regional reference, and more than 20 NRAs have made significant advances in the development of regulatory functions. The approach has also led to innovations, exemplified by the collaborative regulatory model being established in the Caribbean.

The Caribbean Regulatory System initiative

44. The Bureau contributed to the establishment of the Caribbean Regulatory System (CRS), a Caribbean-wide initiative to strengthen regulatory capacity, improve harmonization, and create a single entry point into the pharmaceutical markets of member countries of the Caribbean Community (CARICOM). The CRS was established in 2015 to support countries' transparent and accountable implementation of key regulatory activities, and to accelerate regulatory approval processes for key medicines, including reliance on PAHO-designated NRAs of regional reference that have already approved the products. As of July 2017, nine medicines have been reviewed and recommended for marketing authorization in CARICOM member countries.

45. The Bureau is working with the CRS to conduct assessments, develop a regional network for reporting pharmacovigilance and postmarketing surveillance issues, and consolidate and share information on problematic products in circulation. PASB also provided capacity-building opportunities by collaborating with the current NRAs of regional reference in Argentina, Brazil, Canada, Chile, Colombia, Cuba, Mexico, and the United States. Those efforts included successfully mobilizing resources to support CRS implementation, with such partners as the U.S. Food and Drug Administration, Health Canada, and the Bill & Melinda Gates Foundation.

Improving health financing: evidence, efficiency, and use of the fiscal space

46. The regional Strategy for Universal Access to Health and Universal Health Coverage recommends a benchmark of 6% of gross domestic product (GDP) as the minimum level of health spending needed for countries to achieve universal health. In support of this goal, the Bureau conducted studies in several countries and led a participatory process to develop a conceptual framework for improved efficiency in health financing and generation of additional financial resources for health. During the period under review, the Bureau collected information on out-of-pocket spending on health care for Canada and the Southern Common Market (MERCOSUR) countries to facilitate analysis of the determinants of spending and the impact of health expenditures on health care outcomes. A number of health economics units from the Region's ministries of health held discussions with partners—including the UN Economic Commission for Latin America and the Caribbean (ECLAC), the World Bank, and the International Monetary Fund (IMF)—on issues such as nonremunerated health care, fiscal space, and the prospects for expanding public health spending.

47. In 2015, PASB commissioned a regional study on fiscal space for health, which analyzed the experiences of 14 countries in the Region. The results were incorporated into a working document titled *Fiscal Space for Increasing Health Priority in Public Spending in the Americas Region*.⁶ The document presents evidence that countries can successfully generate new resources for health to achieve the 6% GDP threshold for

⁶ Document available at <http://bit.ly/1X1YZW4>.

universal health, and recommends that these resources be mobilized from domestic sources. The study specifically recommended new or increased taxes, especially on products that are harmful to health; improved efficiency in health systems and public health spending; and improved tax administration. The report also suggests that countries seeking to create new fiscal space do so through inclusive dialogue based on the principles of the Strategy for Universal Access: the right to the highest attainable standard in health, equity, and solidarity. PASB continues to work with various partner organizations—including the Inter-American Development Bank (IDB), World Bank, IMF, ECLAC, and the Organization for Economic Co-operation and Development (OECD)—to increase awareness of policy options and interventions for raising the priority level for health funding and to improve the efficiency of health financing.

48. PASB provided direct technical cooperation in the review of national health financing policies and systems, aiming to reduce segmentation and improve equity and efficiency. The Bureau has supported countries in the production of health accounts using the System of Health Accounts (SHA) 2011 methodology, a global standard methodology created jointly by WHO, OECD, and Eurostat (the statistical office of the European Union) for tracking health and disease expenditure on an annual basis. As a result, health professionals from 15 countries have been trained, and the respective country teams are now capable of producing health accounts using that methodology.

Enhancing human resources for health

49. Health systems that seek to ensure universal health must place priority on primary health care and integrated services staffed by professionals working in interdisciplinary teams, and give special attention to groups whose health needs have traditionally been underserved. For the first time, the Region has reached the recommended target of 25 physicians and nurses per 10,000 people. Despite that progress, many health systems in the Americas are still fragmented, short on primary health care personnel, and top-heavy with medical specialists concentrated in urban areas. The countries need to overcome both shortages in numbers and inequitable distribution of human resources for health (HRH), and the Bureau's technical cooperation at the national and subregional levels has been strengthened to address policy formulation, planning and management, and capacity development.

50. PASB, the PAHO/WHO Collaborating Center on Health Workforce Planning and Research at Dalhousie University (Canada), and the Collaborating Center for Health Workforce Planning and Information at the Rio de Janeiro State University (Brazil) collaborated to complete the second and final assessment of the 20 regional goals for human resources in health (2007-2015) and an analysis of human resources programs linked to priority goals at the national level. The outcomes of this assessment were analyzed through country and subregional consultations (Central America, MERCOSUR, Caribbean, and Andean) to identify priorities and strategic orientations for strengthening human resources to support progress toward universal health.

51. Based on the strategic orientations, the Bureau drafted a regional Strategy on Human Resources for Universal Access to Health and Universal Health Coverage for presentation to the 29th Pan American Sanitary Conference in September 2017. The Strategy highlights the need for improved governance and stewardship of HRH; development of HRH capacities to expand access to health services based on principles of equity and quality; and partnerships with the education sector to respond to the health system's needs. The regional strategy is aligned with the WHO Global Strategy on Human Resources for Health: Workforce 2030 adopted by the 69th World Health Assembly in 2016 and the five-year action plan on health employment and inclusive economic growth (2017-2021)⁷ adopted by the 70th World Health Assembly in May 2017.

HRH capacity strengthening

52. In addition to traditional training methods, e-learning technologies and telemedicine have proven to be very useful tools in building HRH capacity, reducing professional isolation, providing cost-efficient opportunities to maintain and further develop clinical competence, and contributing to better quality of care in rural and hard-to-reach areas. The PAHO Virtual Campus for Public Health (VCPH) is a network of people, institutions, and organizations that share courses, resources, services, and activities related to education, information, and knowledge management. The Bureau invested in the VCPH during the period under review, resulting in significant growth in the number of courses and users. Fifty-eight courses with tutoring and 56 self-learning courses were developed, aligned with the objectives of the Strategy on Universal Access to Health and Universal Health Coverage. As of June 2017, the VCPH had more than 330,000 users.

Virtual learning for human resources for health

- PAHO's Edmundo Granda Ugalde Leaders in International Health Program continued to build the capacity of mid- to high-level managers and decisionmakers at the country, subregional, and regional levels. These persons were drawn from health and nonhealth entities in government, international organizations, and academia and other segments of civil society. During the 2013-2017 period, 201 professionals from 36 countries participated in the annual nine-month program, which is implemented through the PAHO VCPH.
- The Educational Virtual Clinic project, launched as part of the PAHO VCPH in 2013, enables health professionals and technicians to receive training in their workplaces, and can be accessed through desktop, laptop, and tablet computers or smartphones. It is currently used to develop websites and applications for tracking projects such as *Mais Médicos*.
- The Virtual Health Library (VHL), also available through the PAHO VCPH, allows countries that have a node in the Virtual Campus to share educational resources.

⁷ Document [A70/18](#).

53. The Bureau undertook technical cooperation with 19 Member States⁸ in an initiative to promote a “social mission” in the education of doctors and other health workers. The initiative aimed to produce health professionals with training and experience in primary care and integrated health service delivery, committed to the health needs of the most vulnerable persons in society, and willing to practice in underserved areas when needed. Bureau experts also worked with ministries of health and academic institutions in the countries to define national-level education and training requirements for professionals in community health centers and to develop technical recommendations for in-service training programs in those centers. The project produced a preliminary diagnostic tool and core indicators to measure progress in incorporating the social mission concept in medical schools and medical training.

54. PASB’s subregional technical cooperation in HRH capacity strengthening complemented its country-level interventions:

- a) The Subregional Program Coordination in the Caribbean collaborated with ministries of health in CARICOM countries and other actors to develop a subregional HRH road map 2012-2017, with specific milestones for improving the governance and skills of HRH in the Caribbean. HRH plans were completed in the British Virgin Islands, Grenada, Saint Lucia, and Saint Vincent and the Grenadines.
- b) In the Andean subregion, the Bureau supported the development and monitoring of a policy on HRH within the framework of the Andean Health Agency–Hipólito Unanue Agreement (ORAS/CONHU).
- c) In Central America, in its role as advisory body for the Council of Central American Ministers of Health (COMISCA), PASB worked with teams from the Member States of the Central American Integration System (SICA) to implement a development plan for human resources for health for Central America for 2013-2015 and to formulate a 2016-2018 successor plan.

Improving access to efficacious, safe, and quality medicines and other health technologies

55. Member States continue to prioritize access to medicines and health technologies, with the adoption of resolutions that guide the Bureau in promoting equitable access to quality vaccines, medicines, and other health technologies as a fundamental requisite for universal health. Resolution [CSP28.R9](#), Health Technology Assessment and Incorporation into Health Systems, which was adopted by the 28th Pan American Sanitary Conference in 2012, called for strengthening and expanded use of evaluation processes to inform decision-making. In 2016, the 55th Directing Council adopted Resolution [CD55.R12](#), Access and Rational Use of Strategic and High-cost Medicines

⁸ Argentina, Barbados, Brazil, Canada, Chile, Colombia, Cuba, Ecuador, Guatemala, Guyana, Jamaica, Mexico, Nicaragua, Panama, Peru, Trinidad and Tobago, the United States, Uruguay, and Venezuela.

and Other Health Technologies. The resolution urges Member States to develop policies and legal frameworks to regulate the pharmaceutical sector, promote transparency in pricing, strengthen regulatory systems to ensure the quality of medicines, and increase collective action through the utilization of joint procurement mechanisms, including the PAHO Strategic Fund and the PAHO Revolving Fund for vaccines.

56. The Regional Revolving Fund for Strategic Public Health Supplies, known as the PAHO Strategic Fund, has been highly successful in using pooled procurement at the regional level to improve access to medicines and health supplies. Currently, 30 countries and territories in the Americas use the Strategic Fund, which has maintained its important role in promoting access to high-quality, essential public health supplies for Member States, assisting countries in avoiding shortages and overcoming challenges in the procurement of new and high-cost medicines. The Strategic Fund has expanded its portfolio of medicines and medical products and renewed its focus on improving supply chain management capacities, working with Member States on all areas of the supply chain, supporting procurement planning for medicines, health technologies, and equipment. In 2013, PAHO negotiated and issued its first long-term agreements with manufacturers to establish standard prices for all Member States on selected essential medicines for the treatment of NCDs. For the year 2016, the total cost of commodities purchased through the Strategic Fund was US\$ 82 million, a cumulative increase of 800% during the preceding 10 years.

57. Since 2015, PASB has been collaborating with the Global Fund to Fight AIDS, Tuberculosis and Malaria (the Global Fund) and Member States to prevent stockouts of antiretroviral medicines (ARVs) in the Dominican Republic, Ecuador, El Salvador, Honduras, Nicaragua, and Paraguay by improving demand forecasting and other aspects of supply chain management. This included incorporation of a special inventory monitoring tool within the Regional Platform on Access and Innovation for Health Technologies (PRAIS). Successful forecasting of national needs for ARVs and laboratory reagents in Ecuador, Honduras, Nicaragua, and Paraguay prevented stockouts during 2016.

58. In 2015, the PAHO Strategic Fund received a boost through an agreement between PASB and the Global Fund that gives the Strategic Fund access to the Global Fund's Pooled Procurement Mechanism, which addresses key procurement-related issues, including ensuring the uninterrupted availability of supplies, product quality and safety, and negotiation of attractive prices. This agreement with the Global Fund is expected to demonstrate other benefits, including improved vendor performance and more rapid access to attractively priced medicines during situations of urgent need.

59. PASB consolidated a network of countries and institutions to strengthen capacity in decision-making regarding the evaluation, incorporation, and use of medicines and other health technologies in health systems. The Health Technology Assessment Network of the Americas (RedETSA), coordinated by PAHO, was established in 2011 and currently comprises 14 countries and 28 institutions sharing best practices, producing

reports, and supporting evaluation capacity. The regional Network of Pharmacovigilance Focal Points, established in 2012, now includes 35 countries working in close collaboration with the Latin American and Caribbean Network of Drug Information Centers (Red CIMLAC) to produce and evaluate safety information on medicines for regulatory decision-making. Alerts on substandard and falsified medical products are being shared through a 16-country regional network, which reports to the global alert system coordinated by WHO.

60. PASB supported initiatives to ensure the availability of safe blood and blood products in the Region. Technical and legal analyses, and subregional plans for blood safety and HIV for 2013-2017, were prepared for the Andean subregion, and for Central America and the Dominican Republic. A technical cooperation project involving PAHO and the blood products laboratory at the National University of Cordoba in Argentina enabled Brazil to make significant advances in the production and safety of blood products that will serve needs at the national and regional levels.

61. In addressing radiation safety, PASB's collaboration with the International Atomic Energy Agency (IAEA) played an important role in the development of the IAEA's 2016-2021 strategic plan, and in ensuring the safety and efficiency of radiation therapy equipment in the Region. In April 2016, the first coordination meeting for the project "Strengthening Cradle-to-Grave Control of Radioactive Sources" in IAEA member states in the Caribbean subregion was held in Jamaica. The Bureau advocated for and encouraged IAEA membership for several CARICOM member countries to facilitate their progress toward building core capacity to handle radiation emergencies, as demanded by the IHR. Between 2012 and 2016, Antigua and Barbuda, The Bahamas, Barbados, Dominica, Guyana, Saint Lucia, Saint Vincent and the Grenadines, and Trinidad and Tobago became members of the IAEA.

Strengthening information systems, knowledge management, communication for health, and research

62. Timely collection, analysis, disaggregation, management, and reporting of quality health and health-related data are essential aspects of efficient and effective information systems for health. The development, implementation, monitoring, and evaluation of evidence-based policies and programs that address health and its social determinants depend on such information, and disaggregation of data by age, sex, ethnicity, geographic location, and other variables allows the identification of inequities and the development of interventions to reduce them. In addition, surveillance systems that operate at subnational and national levels are essential to detect emerging and reemerging diseases with epidemic potential.

63. The reporting of up-to-date health information and its dissemination in appropriate formats to a wide range of stakeholders, including policymakers, the public, and development partners, are critical to inform advocacy, planning, programming, and adjustments in interventions to achieve priority health objectives. Too often, important

health information produced in, and concerning, the countries of the Americas—especially the smaller ones—does not receive the attention that it should and is, therefore, limited in its use and application. Strengthening information systems for health information and knowledge management remains among PAHO’s top priorities, along with communication for health.

64. There have been significant improvements in the quality and timeliness of health data in the Americas, though challenges remain:

- a) Antigua and Barbuda, The Bahamas, Haiti, and Jamaica developed new policies and action plans for their health information systems to improve the quality of their surveillance data.
- b) The British Virgin Islands, the Dominican Republic, Ecuador, and Sint Maarten began using a Web-based epidemiological surveillance system.
- c) Jamaica installed an integrated surveillance system for vaccine-preventable diseases.
- d) Training in the International Classification of Diseases, 10th Edition (ICD-10) was provided to facilitators from Bolivia, Ecuador, Paraguay, and Peru, and coders from El Salvador, Guatemala, Honduras, and Nicaragua. Subsequently, Bolivia and Ecuador provided ICD-10 training to health technicians at the subnational level. Through related training and the VCPH, over 60,000 physicians have been trained to improve death certificate completion.
- e) Argentina, Chile, Costa Rica, Ecuador, Guatemala, Paraguay, Uruguay, and Venezuela began using an electronic system provided by Mexico for ICD-10 mortality coding, and workshops for data quality were held in Chile, Guatemala, and Trinidad and Tobago.
- f) In order to improve mortality analyses, the PAHO mortality database is in an advanced process of expansion from five to 32 variables, providing the possibility of conducting more advanced statistical and epidemiological analyses, including multiple causes of death (comorbidities), in addition to the usual underlying cause of death.

65. In 2014, PAHO’s Regional Core Health Data and Country Profile initiative celebrated the 20th anniversary of its publication *Health Situation in the Americas: Basic Indicators*. The brochure is published annually and provides high-quality, up-to-date data to guide the Bureau’s technical cooperation and to facilitate monitoring and follow-up of regional and global health goals. Data are compiled, processed, and reviewed in collaboration with ministries of health and planning and statistics offices in Member States. In this initiative, the 52 countries and territories of the Region provide their core health indicators annually, and 20 countries in the Region now develop national “basic indicators” brochures to guide health sector priority-setting and decision-making. In 2016, the Core Health Indicators brochure was redesigned, and more than 100 indicators

were reviewed and updated. The current brochure monitors 17 of the 27 targets of the SDG 3, and there are plans to include additional SDG targets by 2018.

66. The [Health Information Platform](#) (PLISA) is a corporate system that aims to provide health data, statistics, and information to support the health analysis of Member States and PASB to reach their strategic objectives, including the monitoring of regional and national targets. PLISA compiles and stores different types of data and health indicators in a systematized, periodic, and standardized form, facilitating data analysis, preparation of reports, and dissemination of results. PLISA is also a website with interactive data visualization that makes the management of information and data more dynamic.

67. In November 2016, PAHO collaborated with the Ministry of Health in Jamaica to convene a ministerial meeting in Kingston on information systems for health. The meeting engaged Caribbean countries, regional entities and experts, and development partners in the formulation of a joint plan of action for innovating and improving a range of information systems and partnerships for health throughout the Caribbean. The meeting produced a comprehensive road map for strengthening information systems for health and for enhancing collaboration and coordination among national health ministries and actors across the Caribbean, using the PAHO model. PASB has initiated technical cooperation activities, including assessments of information systems for health, in Anguilla, Belize, Bermuda, the British Virgin Islands, Guyana, Jamaica, and the Turks and Caicos Islands. The assessment framework includes a “Maturity Model” tool that analyzes the phase of development of the information systems. The tool has been piloted in several Caribbean countries, and it is anticipated that the Spanish version will be piloted in Ecuador. A high-level meeting targeting Mesoamerican, Latin Caribbean, and Andean countries to present the information systems for health framework is planned for August 2017.

68. *Health in the Americas+*, the 2017 edition of PAHO’s flagship publication, will be launched at the 29th Pan American Sanitary Conference in September 2017. As a testament to the improvement in the availability of health information in the Region, all 52 countries and territories produced comprehensive health situation analyses with a forward-thinking vision of public health. The publication continues to be highly valued for the essential, concise, “one-stop” regional and country health data and analysis it provides, and the improved accessibility of the information to health authorities, policymakers, academicians, students, analysts, and the general public, through its print and digital formats.

69. During the period under review, the implementation of the regional Strategy and Plan of Action on Knowledge Management and Communications (Document [CSP28/12, Rev. 1](#)) resulted in significant outcomes, including the launch of [PAHO’s Institutional Repository for Information Sharing](#), which improved the capacity to systematize, preserve, and provide access to more than 30,000 documents. The documents include Governing Bodies mandates, scientific publications, and technical documents produced

by PAHO. Twenty countries in the Region gained access to the [WHO HINARI platform](#), which provides free or very-low-cost online access to the major journals in biomedical and related social sciences in more than 100 countries; PASB supported ministries of health in the Dominican Republic, Guatemala, Guyana, Jamaica, Nicaragua, and Paraguay in gaining access to, or organizing, training on HINARI.

70. As of June 2017, the Virtual Health Library (VHL) model had been applied in 107 national, thematic, and institutional initiatives in 30 countries as a result of technical cooperation provided by PAHO's Latin American and Caribbean Center on Health Sciences Information (BIREME). The VHL provides more than 26.7 million documents, of which more than 9.6 million are available in full text, and its technological platform continues to be updated in order to support the coordinating institutions at the national and regional levels. In addition, the Latin American and Caribbean Health Sciences Literature (LILACS) database indexes about 920 scientific journals from 27 countries in Latin American and Caribbean (LAC).

71. Information communication technologies have a major role to play in interventions aimed at improving health. The regional Strategy and Plan of Action on *eHealth* (Document [CD51/13](#)), approved at the 51st Directing Council in 2011, provides a framework for the Organization's technical cooperation in this area. Currently, 15 countries and territories are formulating and/or adopting eHealth policies, and PAHO has developed methodological documents to define political priorities with respect to eHealth, as well as guidelines that serve as a baseline for a strategy to strengthen and determine basic organizational and technological infrastructure in health information and services. A mid-term review of the implementation of the Strategy and Plan of Action presented to the 55th Directing Council in 2016 (Document [CD55/INF/12](#)) identified actions for progress, including: promote the formulation of national strategies in countries that do not have them, and work to include areas where progress has been made, such as the Internet of things, open data, and big data; promote the generation of evidence and development of guidelines on eHealth that favor decision-making and project development in a strategic and sustained manner; and establish a road map for the role of eHealth within the framework of the SDGs, especially SDG 3.

72. [The Pan American Journal of Public Health](#) (PAJPH), which is PAHO's peer-reviewed, monthly, trilingual, free-access scientific journal, published 53 issues over the reporting period. These included special issues on cardiovascular disease prevention and dietary salt reduction, equity in health systems, regulatory systems for medicines, tuberculosis, climate change, nutrition, the economics of tobacco control, HIV, chikungunya, and health system reform in Ecuador. The *Journal* has adopted an "open access" policy and a continuous-publication process, both of which help expedite the dissemination of new articles as they are approved.

73. During the period, 58 new PAHO/WHO collaborating centers were designated in the Americas, bringing the number of active collaborating centers in the Region to 182, out of more than 800 centers globally. Collaborating centers include research institutes,

university departments, laboratories, and other organizations and entities that carry out activities in support of PAHO/WHO's programs in a broad range of areas. These areas range from human resources for health and health technologies to communicable and noncommunicable diseases, nutrition, and mental health.

74. PASB has continued to provide technical cooperation in line with the Policy on Research for Health (Document [CD49/10](#), approved in 2009) and [WHO's Strategy on Research for Health](#) (approved in 2010). Research initiatives gained momentum during the period under review, as countries and subregional entities developed research policies and agendas. The WHO Global Observatory on Health Research and Development was launched, analysis of research outputs and capacities was released, and there was an increase in research registration. Such registration is currently required by nine countries (Bolivia, Brazil, Colombia, El Salvador, Guatemala, Panama, Peru, the United States, and Uruguay); five countries (Argentina, Brazil, Cuba, Peru, and the United States) have publicly accessible registries. Cochrane Caribbean opened in 2013, supporting the use and conduct of systematic reviews for public health. Research competitiveness is being improved with train-the-trainers programs in Latin America and the Caribbean. Partnerships with health authorities, academia, research institutions, and sponsors enabled the training of research teams from Colombia and from SICA and CARICOM member countries in grant writing and peer review.

75. PASB continues to advance the integration of ethics in health as mandated by Member States in 2012 (Document [CSP28/14, Rev.1](#)). Research ethics systems have been strengthened through the development, in collaboration with BIREME, of a new version of ProEthos—a software to improve ethics review of human subjects research—that facilitates the implementation processes by ethics review committees in nine countries of the Region (Argentina, Chile, Colombia, Costa Rica, El Salvador, Guatemala, Honduras, Panama, and Peru) as well as the development of normative frameworks that align with international ethical guidelines. The ethics review process for PAHO-supported research has been institutionalized, and proposals submitted to the PAHO Ethics Review Committee have tripled. Ethics guidance was developed in response to the emergency posed by the [Ebola](#) and Zika virus outbreaks, and PAHO led an ethics consultation and the development of [Ethics Guidance on Key Issues Raised by the Outbreak](#), which has been endorsed by [The Lancet](#) and [integrated into the Organization's technical cooperation](#). The integration of ethics into public health has been strengthened through the development of the [Making Fair Choices report](#), which provides guidance on ethical prioritization in advancing to universal health. In addition, PASB developed training material on public health, and provided public health ethics training to Ministry of Health staff from eight Latin American countries (Argentina, Chile, Colombia, Costa Rica, Ecuador, El Salvador, Peru, and Puerto Rico) and the chief medical officers in the Caribbean.

76. PASB continued to support health policy and systems research, including implementation research. The Improving Program Implementation through Embedded Research initiative, supported by the WHO Alliance for Health Policy and Systems

Research, identified the benefits provided by implementation research in 10 countries (Argentina, Bolivia, Brazil, Chile, Colombia, the Dominican Republic, Mexico, Panama, Peru, and Saint Lucia). National research priorities were established and are being implemented to varying degrees in Brazil, the Dominican Republic, Ecuador, Guyana, Honduras, Panama, Peru, and 18 Caribbean countries and territories.⁹ Coordination of research and evidence on the Zika virus outbreak has facilitated a regional research agenda, harmonization of research standards, and support for the conduct of cross-country research. There have been significant improvements in the institutionalization of standardized mechanisms to generate and use research evidence in Member States. Brazil, Chile, Colombia, the Dominican Republic, Ecuador, El Salvador, Mexico, Panama, Peru, and Trinidad and Tobago are integrating the PAHO/WHO-recommended approach for developing high-quality guidelines. Argentina, Brazil, Chile, Colombia, and Mexico have established evidence-informed rapid response mechanisms to support decision-making. At the subregional level, a Caribbean subregional road map was developed and a technical working group of Caribbean countries established to integrate mechanisms for health technology assessment, medicines selection, and guidelines development.

⁹ Anguilla, Antigua and Barbuda, Barbados, Belize, Bermuda, British Virgin Islands, Cayman Islands, Bahamas, Dominica, Grenada, Jamaica, Montserrat, St. Kitts and Nevis, St. Lucia, St. Vincent and the Grenadines, Suriname, Trinidad and Tobago, Turks and Caicos Islands.

2. RESPONDING TO HEALTH EMERGENCIES AND DISASTERS AND BUILDING CORE PUBLIC HEALTH CAPACITIES UNDER THE INTERNATIONAL HEALTH REGULATIONS

77. PAHO continued its long history of technical cooperation with countries in preventing, preparing for, and responding to natural and man-made emergencies and disasters, and worked with Member States to build core capacities for implementation of the International Health Regulations (2005) and the detection of, and response to, disease outbreaks.

Strengthening responses to natural and man-made emergencies and disasters

78. PASB took several measures to improve its technical cooperation for emergency preparedness and disaster relief, including:

- a) revision of its strategic approach to comprise three main lines of work: *a)* improving the capacity of Member States to provide a timely and appropriate response to disasters, complex emergencies, and other crises; *b)* enhancing the capacity of national health systems for emergency preparedness and disaster risk reduction; and *c)* increasing the effectiveness of PAHO and the UN Health Cluster in responding to disasters
- b) establishment of a new Emergency Operations Center (EOC) at its Washington, D.C., Headquarters and adoption of new policy and procedures to improve cooperation during emergency response operations
- c) training of existing and new members of the Regional Disaster Response Team in order to increase surge capacity

79. Over the period, PAHO's subregional technical cooperation in this area contributed to achievements in the subregions, as follows:

Andean subregion

- a) development of the Andean Strategic Plan for Disaster Risk Management in the Health Sector 2013-2017, which was approved by the ministers of health of the Andean region, and translation of its strategic lines into action; the latter was done in collaboration with ministries of health in Bolivia, Chile, Colombia, Ecuador, and Peru, and included the development of cross-border emergency plans
- b) formulation of a guide for humanitarian assistance among Andean countries, which was approved by the Andean Committee for Disaster Prevention and

Assistance (CAPRADE) and served as a technical reference for a similar guide for MERCOSUR countries

Central America

- c) creation of the Technical Commission for Risk Management in Health for Central America and the Dominican Republic, in collaboration with the U.S. Centers for Disease Control and Prevention (CDC), as an advisory body to COMISCA to monitor disaster preparedness, response, and cooperation
- d) development of a Central American Plan for Comprehensive Risk Management of Public Health Disasters and Emergencies 2013-2018, which was approved by COMISCA

The Caribbean

- e) expansion of the Safe Hospitals initiative in the subregion and initiation of the implementation of the Smart Hospitals initiative, in partnership with DFID
- f) institutional strengthening of the Eastern Caribbean Development Partners Group on Disaster Management, which facilitates coordination of external assistance to Eastern Caribbean countries affected by major disasters
- g) finalization of the Comprehensive Disaster Management Strategy and Results Framework 2014-2024 for CARICOM Member States
- h) establishment of a new CARICOM Disaster Assessment and Coordination Team that provides improved support for countries during emergencies, and better coordinates damage assessment and needs analysis

Safe Hospitals effort leads to Smart Hospitals initiative

Safe Hospitals

PAHO continued to promote risk reduction in the health sector through the Safe Hospitals initiative and the Hospital Safety Index (HSI), a tool for assessing the probability that a health facility will remain functioning in emergency situations. The Safe Hospitals initiative was first implemented in the Caribbean in 2004, and was subsequently included in the strategic plans of the Meeting of Ministers of Health of the Andean Area (REMSAA), the Andean Health Agency–Hipólito Unanue Agreement (ORAS/CONHU), and CAPRADE. Colombia, the Dominican Republic, Guatemala, Mexico, and Peru advanced in updating their respective building codes to ensure that all newly built hospitals can continue operating in disasters, and Colombia, Mexico, and Peru have invested heavily in improving the safety of new and existing health facilities.

The initiative has influenced global concepts regarding the functioning of hospitals in disasters, becoming a global priority and being implemented in more than 80 countries in all WHO Regions. In many countries, however, ensuring that all new health facilities are safe from disasters and that existing facilities are upgraded remains a challenge, primarily due to financial limitations and competing priorities. PASB developed an online dashboard to track planned and prospective new health care facilities, and is seeking agreements with international financial

institutions and development agencies to include safe hospital criteria in funding instruments.

Smart Hospitals

Building on Safe Hospitals, the Smart Hospitals initiative began in 2012, promoting a shift away from the traditional disaster response model to one that proactively seeks to minimize the health impact of disasters through climate adaptation, mitigation measures, and preparedness; reduce the carbon footprint of the health sector (which is one of the largest consumers of energy); and improve disaster resiliency.

Initial funding from DFID (approximately US\$ 11 million) supported “smarting” of health facilities in Saint Kitts and Nevis and Saint Vincent and the Grenadines. Key outputs of the first phase of the initiative included: a toolkit to guide the implementation of climate change mitigation measures in existing health care facilities; cost-benefit analysis of “climate-smarting” a hospital through environmentally friendly and disaster-resilient measures; and implementation of two Smart Health Facilities demonstration sites, at the Pogson Hospital in Saint Kitts and Nevis and the Georgetown Hospital in Saint Vincent and the Grenadines.

A second phase of the project began in May 2015 with funding of approximately US\$ 12.6 million to support “smarting” of health facilities in Dominica, Grenada, Saint Lucia, and Saint Vincent and the Grenadines. In September 2015 the Prime Minister of the United Kingdom announced additional funding (approximately US\$ 35 million) to extend the project to Belize, Guyana, and Jamaica, and increase support for the original participating countries. This second phase of the Smart Hospitals initiative, which runs until May 2020, includes training in the use of the HSI and the Green Checklist building rating system; assessment of health facilities for their safety and carbon footprint; and selection of facilities for retrofitting. In addition, training in contingency planning and methods to respond effectively to future events is being provided for health disaster coordinators, fire services staff, and other related personnel, with the goal of ensuring that each participating facility develops and maintains a comprehensive contingency plan. The project’s goal is to make 50 health facilities in these countries safer and greener by 2020. In addition, it will assess a total of 600 facilities to document, in an online database, their needs for future improvements.

PASB has teamed up with the Organization of Eastern Caribbean States (OECS) to conduct knowledge, attitudes, and practices studies and conservation training for health facilities’ personnel in Dominica, Grenada, Saint Lucia, and Saint Vincent and the Grenadines aimed at increasing awareness and influencing behavioral change for reduction of energy and water consumption. National multistakeholder meetings were held in Belize, Guyana, and Jamaica, to engage ministries of health, public works, planning, energy, and finance, and a town hall meeting was held in Saint Vincent and the Grenadines to promote community engagement.

The Smart Hospitals initiative is helping to improve national awareness of, and promote practical interventions for, climate change adaptation and mitigation, and has catalyzed interest and involvement beyond the health sector. Several countries have been promoting the “smarting” concept for infrastructure projects with development partners and adapting it to “smart communities,” “smart schools,” and “smart hotels.”

80. PAHO’s technical cooperation with Member States for several important health emergencies, included, but was not limited to, responses to:

- a) Severe rains and high winds due to a low-level trough system that impacted Dominica, Saint Lucia, and Saint Vincent and the Grenadines in December 2013. The so-called “Christmas trough” cost the health sector in Saint Vincent and the Grenadines an estimated US\$ 2.1 million, severely damaging the Milton Cato Memorial Hospital, which is the country’s only referral hospital, and flooding many of the 39 district health clinics.
- b) Tropical Storm Erika, which caused severe, widespread flooding and extensive damage in Dominica in August 2015. The Bureau rapidly deployed its Regional Disaster Response Team to assist the national authorities with emergency coordination, damage assessment, disease surveillance, and vector prevention and control. PASB mobilized internal and external financial resources to procure essential medicines and supplies for health care services, enable access to safe water and sanitation, and reduce environmental health risks.
- c) Hurricane Joaquin, which heavily impacted six islands in The Bahamas in October 2015. The Bureau again deployed its Regional Disaster Response Team to assist with assessment of the hurricane’s impact, identification of priority interventions, and management and coordination of supplies. PASB donated essential supplies to facilitate on-the-ground communication, continued health care services, emergency interventions for water and sanitation, and vector control.
- d) Hurricane Matthew, the most serious of several hurricanes that struck the Caribbean during the 2016 Atlantic hurricane season. A category 5 storm, Matthew affected hundreds of thousands of people in late September and early October, especially in The Bahamas, Cuba, the Dominican Republic, and Haiti. PAHO mobilized resources that allowed the deployment of 80 experts, including from the Global Outbreak Alert and Response Network (GOARN), to support logistics; coordination of Emergency Medical Teams (EMTs); damage assessment and needs analysis; water, sanitation, and hygiene; and health response coordination. These efforts ensured the supply of drinking water, distribution of equipment and essential supplies, epidemiological surveillance capacity, and uninterrupted medical services in the affected areas. In Haiti, where Matthew affected more than two million people directly or indirectly, the Bureau mobilized over US\$ 1.6 million to support local and national authorities in their response and recovery efforts. PASB supported the deployment of more than 1.5 million doses of oral cholera vaccine and their distribution and administration to more 800,000 people in the most affected departments of Grand’Anse and Sud.
- e) A toxic fire in Paraguay in October 2015, where the Bureau contributed to a preliminary public health risk assessment as part of a joint multiagency team that included Paraguayan government agencies, UN Environment Program (UNEP), the UN Development Program (UNDP), the UN Office for the Coordination of Humanitarian Affairs (OCHA), the Environmental Agency of São Paulo, and the secretariats of the Basel, Rotterdam, and Stockholm environmental conventions. PASB delivered a rapid assessment report that indicated a high possibility of

- exposure to dioxins and recommended a series of follow-up actions, which were incorporated into a proposal for funding from the UN Industrial Development Organization.
- f) A prolonged dry spell in Guatemala, lasting from late 2013 to March 2016, which resulted in major crop losses and precipitated a food and nutrition crisis, with higher rates of acute malnutrition in the most vulnerable groups—children under 5 years of age and pregnant women. The Bureau channeled over US\$ 1.6 million from the UN Central Emergency Response Fund and the European Civil Protection and Humanitarian Aid Operations to implement lifesaving interventions and preventive actions for the health and nutritional needs of vulnerable groups. The Bureau also supported the coordination and preparedness efforts of the Ministry of Health and other partners, through training of health workers on detection and treatment protocols for moderate and severe acute malnutrition, acute respiratory infections, and food-borne diseases; establishing mobile health teams; procuring essential health supplies; monitoring and reporting health data; implementing immunization campaigns; and putting in place protective measures for pregnant and lactating women.
 - g) A 7.8 magnitude earthquake that struck Ecuador in April 2016. Technical staff were deployed to the country from PAHO Headquarters and other PAHO/WHO country offices in less than 24 hours, and assisted in using the PASB Logistics Support System/Humanitarian Supply Management System (LSS/SUMA) to register and coordinate the movement of medicines and medical supplies. Ecuador's Ministry of Public Health utilized the new PAHO/WHO EMT minimum standards and coordinating mechanisms to deploy 28 national EMTs and 5 international EMTs (from Colombia, Germany, Peru, Spain, and the United States), making Ecuador the first country in the Region to put the standards into practice.
 - h) El Niño-related flooding in Peru that began in February 2017, affecting more than 1.2 million people. The flooding resulted in the collapse of 9 health facilities, affected more than 300 others, and caused increases in reported cases of leptospirosis, dengue, Zika, and chikungunya, among other diseases. PASB deployed national and international experts to support field operations and increase national surge capacity in coordination, health services, water and sanitation, epidemiology, mental health, and infectious diseases surveillance in the most affected areas.
81. In 2014 alone, the Bureau mobilized more than US\$ 8.6 million in humanitarian assistance to meet the health needs of persons affected by floods in Bolivia and Paraguay, the food crises in Guatemala and Honduras, and the eastern Caribbean “Christmas trough.”
82. According to estimates for 2015, almost 64 million people in the Americas were living outside their country of origin, 36% more than in 2000. In order to address the health impacts of irregular migration, the Bureau provided support to several Member

States that had unexpected migrant flows or internally displaced populations during the period under review.

- a) PASB continued to support Colombia in addressing the health needs of internally displaced populations and helped the country to cope with a massive influx of both Venezuelan immigrants and returning Colombian expatriates who had been living in Venezuela.
- b) In Costa Rica, PASB mobilized support for coordination and response efforts addressing the needs of thousands of Cuban nationals stranded in northern border districts during their northward journey toward the United States. Among other activities, staff from the PAHO/WHO Costa Rica office and the Regional Disaster Response Team were deployed to equip and manage shelters and support the Ministry of Health's provision of psychosocial support to the migrants.
- c) In Haiti, PASB supported the Government during a mass repatriation of Haitians who had been living in the Dominican Republic. With financial support from Canada, PASB partnered with Haiti's Ministry of Public Health and Population to establish an advance health post and strengthen access to health care in existing border centers; enhance epidemiological surveillance and management of diarrheal illness; and procure emergency and supplemental health kits.

Implementing the International Health Regulations and confronting emerging viruses

83. Six of the 35 IHR States Parties in the Americas—Brazil, Canada, Chile, Colombia, Costa Rica, and the United States—determined that their core capacities for surveillance and response, including at designated points of entry, were in place by the established IHR deadline of June 2012. The other 29 States Parties obtained extensions, and PAHO provided technical cooperation for the development and implementation of national action plans.

84. In 2016, for the first time, all States Parties in the Americas submitted reports on IHR progress to the 69th World Health Assembly, a significant improvement from the 51% response rate in 2011, when the States Parties Annual Reports were instituted in their current format. The 2016 *Annual Reports of IHR States Parties in the Americas* submitted to the 70th World Health Assembly in 2017¹⁰ continue to show considerable heterogeneity in the status of the core capacities. Progress has been made across the 13 core capacities required by the Regulations, particularly related to designated points of entry, laboratories, surveillance, and management of zoonotic and food safety events. However, critical weaknesses remain in the areas of human resources and management of chemical events and radiation emergencies.

¹⁰ The report is available at <http://bit.ly/2r5Vwej>, Region of the Americas, pages 3-4.

85. In August 2016, PAHO Member States participated in the formal Regional Consultation on the WHO *Draft Global Implementation Plan for the Recommendations of the Review Committee on the Role of the International Health Regulations (2005) in the Ebola Outbreak and Response*. Recommendations emerging from the consultation suggested that PASB should focus on IHR implementation rather than on evaluations; the composite IHR Core Capacity Monitoring Framework should be adopted by the World Health Assembly, as mandated by IHR Article 54; and the conceptual and institutional gaps between the IHR and countries' health systems should be bridged at different levels. In September 2016, the 55th Directing Council endorsed the recommendations and conclusions through Decision [CD55\(D5\)](#), and in May 2017 the 70th World Health Assembly accepted the Global Implementation Plan for implementation of the IHR (2005) ([A70/16](#)). The Global Implementation Plan aims to, among other objectives, improve the monitoring and evaluation of, and reporting on, core capacities under the IHR. In anticipation of the rollout of the composite IHR Core Capacity Monitoring Framework, joint external evaluation (JEE) missions were hosted by Belize, Haiti, and the United States. The JEE's main objective is assessment of the host country's capacities in 19 technical areas, in order to provide baseline data for monitoring progress in reforming and improving public health security.

Strengthening surveillance and laboratory capacity

86. Influenza surveillance continued to improve, with the implementation of a severe acute respiratory illness (SARI) surveillance system in selected national hospitals in several Member States. The system was implemented in accordance with guidance developed after the 2009 H1N1 pandemic, and includes updates to align with recommendations in the WHO global standards for influenza surveillance. Presently, the Region of the Americas has strong diagnostic capacity for influenza detection, with 28 National Influenza Centers (NICs) and one WHO Collaborating Center. Almost all countries in the Americas currently have SARI or hospital-based influenza surveillance, and 17 countries¹¹ routinely conduct this surveillance, as measured by weekly SARI data reporting to PAHO. In addition, NICs throughout the Region compile, analyze, and disseminate weekly virologic data to monitor seasonal influenza viruses and viruses with pandemic potential, and to contribute to the selection of global vaccine strains. In order to integrate laboratory and epidemiologic data in countries, PAHO developed an information system, PAHOflu, which was installed in several countries. As of 2017, 11 countries¹² are routinely reporting integrated epidemiologic and laboratory surveillance data to PAHO.

87. Several of the Region's countries participate in a surveillance system for antimicrobial resistance based on routine data from microbiological laboratories. Barbados, Ecuador, Guatemala, Panama, and Paraguay strengthened their capacity to

¹¹ Argentina, Brazil, Canada, Chile, Colombia, Costa Rica, Cuba, Ecuador, El Salvador, Honduras, Jamaica, Mexico, Suriname, Saint Lucia, Paraguay, the United States, and Uruguay.

¹² Argentina, Brazil, Canada, Chile, Colombia, Costa Rica, Ecuador, Mexico, Paraguay, Suriname, and the United States.

identify, investigate, and respond to outbreaks linked to health care. The dissemination of microbiology standards contributed to standardization and agreement on procedures for the Latin American Surveillance Network of Antimicrobial Resistance. The Network, which PAHO launched in 1996, has a quality assurance program coordinated by Argentina's Malbrán Institute.

88. PASB's technical cooperation also contributed to:

- a) improvement in the capacity of information centers and laboratories to perform real-time polymerase chain reaction (PCR) and immunofluorescence tests for influenza and other respiratory viruses, and maintenance of essential supplies for laboratory diagnosis of bacterial meningitis and pneumonia in countries and the Caribbean Public Health Agency (CARPHA);
- b) inspection of laboratories in Brazil (National Institute of Quality Control in Health), Colombia (National Institute for Food and Drug Surveillance), and Mexico (Commission for Analytical Control and Expansion of Coverage);
- c) implementation of the 10th phase of the PAHO External Quality Control Program for Official Medicine Control Laboratories in 23 countries, in collaboration with the U.S. Pharmacopeia and with the participation of the national official drug quality control laboratories;
- d) development of a guide based on the Stepwise Improvement Process for strengthening laboratory quality management systems for the Caribbean, in consultation with health experts from countries and territories in the subregion; professionals from Caribbean countries were trained in biorisk management and were certified in the safe transport of infectious samples.

89. PASB played a significant role in preparations for mass gatherings in the Region in 2016. The Bureau undertook technical cooperation with Brazil in information management, alert and response operations, and command and control across key levels of government, in the context of the Zika outbreak and public health preparedness for the 2016 Summer Olympics in Rio de Janeiro. In collaboration with experts from Brazil and the Bureau, Peru carried out joint risk evaluations on massive events in preparation for the 24th APEC [Asia-Pacific Economic Cooperation] Economic Leaders' Meeting, in Lima in November 2016.

Addressing emerging viruses

90. The chikungunya virus, which first emerged in the Americas in late 2013, continued to spread throughout the Caribbean and beyond, with 40 countries and territories reporting local transmission of the virus by mid-2015. In collaboration with the U.S. CDC and the French Military Health Service, PASB developed and piloted tools to characterize cases and classify chikungunya deaths and improve case management for acute and chronic chikungunya; established mechanisms to share laboratory samples; and provided countries with laboratory reagents and quality control panels for diagnosis of

the disease. The Bureau also published weekly epidemiological updates on the spread of the disease.

91. The importance of achieving and maintaining core capacities at the national level as required under the IHR (2005) became even more apparent after the exponential spread of Ebola virus disease (EVD) in West Africa during the second half of 2014. The Bureau worked proactively with its Member States to raise awareness and strengthen preparedness for the potential introduction of the virus into the Americas. In October 2014, after the United States confirmed its first imported Ebola case, the Director activated the PASB's EOC and initiated the first-ever formal implementation of the Incident Management System (IMS). The Director also established a task force to assess the risk of EVD in the Americas, resulting in a framework for strengthening national preparedness for Ebola virus disease in the Americas. PASB worked with more than 26 countries to update national IHR plans within the context of the framework. The Bureau mobilized joint missions to countries, comprising experts from the PASB itself, CARPHA, the U.S. CDC's Caribbean office, and WHO's Global Outbreak Alert and Response Network (GOARN).

92. The PAHO expert missions identified a number of gaps in Member States' preparedness for the possible introduction of Ebola, including:

- a) excessive reliance on port-of-entry screening for detection of cases, with less emphasis placed on health services, where a first case was most likely to present;
- b) inadequate coordination of epidemiological capacity and health services, with insufficient emphasis on the detection of unusual health events and on the combined use of clinical and epidemiological information;
- c) fragmentation of health services, from detection to treatment to disinfection;
- d) major challenges to shipment of samples to biosafety level 4 laboratories for confirmation of EVD infection;
- e) limited numbers of trained personnel to staff designated isolation areas, with inadequate hospital infrastructure and infection prevention and control programs in some countries;
- f) insufficient personal protective equipment (PPE).

93. The Bureau provided technical cooperation in implementing recommendations from the expert missions and in assessing countries' future needs. Other support for Ebola preparedness included establishment of a regional stockpile of PPE and training in clinical management of Ebola, risk communication, infection prevention and control, and laboratory diagnosis and biosafety.

94. PASB also partnered with the OAS, IDB, the World Bank's regional unit for Latin America and the Caribbean, and the Development Bank of Latin America to develop financial mechanisms to strengthen countries' preparedness and response

capacities for outbreaks of emerging epidemic diseases, in line with IHR requirements. The IDB, CARPHA, and PAHO developed a project to strengthen Ebola preparedness in Caribbean countries. In addition to its work in the Region, the Bureau also supported the Ebola response in affected West African countries through deployment of staff to those areas and assistance to Member States with deployments of their nationals.

95. PAHO's emergency response and technical cooperation capacities were tested yet again in May 2015, when Brazil confirmed the first local transmission in the Americas of Zika virus, an arbovirus that causes symptoms similar to those of chikungunya and dengue. This virus was first detected in the Western Hemisphere on Chile's Easter Island in February 2014, coinciding with a series of confirmed Zika outbreaks on islands of French Polynesia and elsewhere in the Pacific. Chile's prompt reporting of the presence of the Zika virus to the PASB under the IHR placed the Bureau on alert for the virus' possible introduction into the continental Americas.

Milestones in the Zika virus epidemic in the Americas

- *February 2015:* Brazil responds to PASB's request for information on clusters of cases presenting with fever, muscle and joint pain, rash, and headache in its northeastern state of Maranhão.
- *May 2015:* PAHO issues its first Epidemiological Alert on Zika virus, providing information on the infection, laboratory testing, case management, and prevention and control measures.
- *July 2015:* Detection of extensive circulation of Zika virus in Brazil's state of Bahia, with increasing incidence of neurological anomalies, including Guillain-Barré syndrome (GBS).
- *August 2015:* Reports of an increase in microcephaly among newborns from clinicians in three other northeastern Brazilian states—Paraíba, Pernambuco, and Rio Grande do Norte.
- *October 2015:* Confirmation of 70-fold increase in detected cases of microcephaly in Pernambuco, with many mothers reporting a febrile rash during their pregnancies.
- *November 2015:* The Bureau deploys a team of GOARN experts to Brazil.
- *Late December 2015:* Local circulation of Zika virus reported in 11 countries and territories in the Americas, from Brazil in the south to Puerto Rico in the north.
- *December 2015:* The Director formally activates the Zika Incident Management System, enabling access to the PAHO Epidemic Emergency Fund and rapid mobilization of additional human and financial resources to coordinate the regional Zika response. Actions include:
 - procurement of materials and supplies, including immunoglobulin for treating patients with GBS and insecticides preapproved under the WHO Pesticide Evaluation Scheme
 - mobilization of multidisciplinary missions of experts to countries and territories, focusing on Key Countries and additional priority countries
 - in-country capacity-building in all aspects critical for an effective response
 - drafting or updating of technical guidance documents, in coordination with WHO
 - convening of regional and subregional workshops and expert consultations, including the first global discussion of a Zika virus research agenda, which brings together representatives of partner organizations, including the U.S. CDC, the Institut Pasteur International Network, and Brazil's Oswaldo Cruz Foundation (FIOCRUZ)
- *January 2016:* The Bureau convenes internal and external experts to develop guidelines for diagnosis and surveillance of microcephaly, as well as for care of pregnant women exposed to Zika virus and newborns with microcephaly/congenital Zika syndrome (CZS). PASB

coordinates with WHO Secretariat to develop criteria for early diagnosis of microcephaly/CZS, using ultrasound.

- *February 2016*: WHO convenes IHR Emergency Committee meeting, which concludes that Zika-related clusters of microcephaly meet the IHR criteria for declaration of a Public Health Emergency of International Concern (PHEIC). The WHO Director General formally declares a PHEIC and calls for urgent international coordination and collaboration to address the disease.
- *March 2016*: First meeting of the new Technical Advisory Group in Public Health Entomology, constituted by PASB's Director, to address the critical issue of vector control. Participants include WHO, FIOCRUZ, U.S. CDC, the U.S. Agency for International Development (USAID), Australia's Monash University, and the U.S. White House Office of Science and Technology Policy. Among other recommendations, the group emphasizes the need for stronger intersectoral action, especially through partnerships with communities and relevant productive sectors, to develop, implement, and sustain effective and economically viable mosquito reduction interventions.
- *March 2016*: The Bureau organizes a meeting titled "Towards the Development of a Research Agenda for Characterizing the Zika Virus Outbreak and its Public Health Implications in the Americas," in Washington, D.C.
- *April 2016*: With funding from the Wellcome Trust, the Bureau convenes an international consultation on Zika and ethics, involving ethicists and other professionals from ministries of health, PAHO, and WHO. Recommendations include access for all women to comprehensive sexual and reproductive information and services; provision of complete, accurate, up-to-date information about the Zika virus and CZS; and provision of adequate social support for women's reproductive decisions related to Zika virus infection and CZS.
- *June 2016*: Amid increasing concern about risks posed by the Zika outbreak to athletes and other persons attending the August 2016 Summer Olympics in Rio de Janeiro, Brazil, the Bureau provides information and analysis for consideration at the June 2016 meeting of the IHR Emergency Committee. The Bureau's report, together with information provided by Brazil, reviews epidemiological trends and demonstrates a decline in the incidence of Zika infections. The IHR Emergency Committee concludes that its earlier advice against restrictions on travel and trade remains valid.
- *July 2016*: Fifteen countries and territories in the Americas report Zika-related neurological disorders, and there are reports of microcephaly or congenital malformations believed to be related to locally acquired Zika infections in Brazil, Colombia, El Salvador, French Guiana, Martinique, Panama, Paraguay, Puerto Rico, and the United States.
- *November 2016*: Virtually the entire Region, with the exception of Uruguay, confirms locally acquired vector-borne transmission of Zika, and five countries (Argentina, Chile, Canada, Peru, and the United States) report non-vector-borne transmission of Zika, likely through sexual contact.

96. The Bureau took further action to develop guidelines for psychosocial support of pregnant women in areas with Zika virus circulation, and for safe blood transfusions and the production of safe blood products in the context of the Zika epidemic. PASB provided frequent updates on the epidemic for key stakeholders in Member States and for regional and subregional entities, and, building on previous technical cooperation initiatives for health systems strengthening and Ebola preparedness, developed a new assessment instrument for evaluating countries' capacities to respond to the Zika

epidemic and complications of the disease. The Bureau also partnered with the World Bank and the IDB to develop a combined assessment and costing tool to identify gaps in national health systems' response capacities and to estimate the cost of needed interventions. The tool was pilot-tested in Dominica and Honduras and has since been applied in El Salvador, Grenada, Guyana, Haiti, Nicaragua, and Panama, and two states in Brazil.

97. In supporting Brazil and providing regional coordination for the Zika response, the Bureau drew heavily on existing partnerships and networks, including the former Dengue Laboratory Network of the Americas. The network's laboratories agreed to expand their scope in order to provide integrated laboratory surveillance of all arboviruses, and the network is now known as the Arbovirus Diagnosis Laboratory Network of the Americas.¹³ Other crucial support for the Bureau's Zika response came from the PAHO Epidemic Emergency Response Fund, the WHO Contingency Fund for Emergencies, the Public Health Agency of Canada, Global Affairs Canada, DFID, U.S. CDC, the Bill & Melinda Gates Foundation, IDB, Norway (through WHO), and Spain (through AECID). More than US\$ 7 million and technical field missions of over 170 experts to 30 countries and territories were mobilized to support the countries' response to Zika. In addition, USAID provided US\$7 million for implementation of integrated vector management, with a focus on contributing to the achievement of global and regional targets set for control, interruption, and elimination of vector-borne diseases during the 2016-2018 period.

98. Many aspects of the Zika epidemic reinforced several of the Bureau's technical cooperation priorities and approaches, while other aspects have suggested the need for changing emphases and strengthening actions in certain areas. The response to Zika demonstrated that procedures and channels established as part of the IHR are essential and effective for processing and exchanging outbreak information, and that the Bureau's emphasis on technical cooperation to achieve the IHR core competencies, build strong and resilient health systems, and advance universal access to health and universal health coverage is both warranted and justified. The response also highlighted the importance and value of cross-border collaboration and cooperation among countries as strategies for detection and containment interventions. On the other hand, it became evident that vector control programs to control the *Aedes aegypti* mosquito infestation in the Region must be innovative, comprehensive, intersectoral, participatory, sustained, and adequately resourced. Integrated surveillance, prevention, and control of arboviral disease of public health importance, particularly for dengue, chikungunya, yellow fever, and Zika are critical. Front-line health providers must maintain a high index of suspicion and be alert for atypical clinical presentations and events, in order to ensure timely detection of an emerging disease. These traits must also be demonstrated at the regional level when reviewing event-based surveillance data and when responding appropriately, even in the absence of strong confirmatory evidence. Further, well-tailored risk communication is essential for conveying uncertainties in a manner that merits and preserves the public's

¹³ Information on the Network is available at <http://bit.ly/2r8HdYE>.

trust. Internal to the Bureau, interprogrammatic collaboration and development of new synergies among technical programs—including those that deal with communicable disease surveillance and control, disaster preparedness and response, health systems and services, and women's and children's health—resulted in greater efficiency and effectiveness in the response.

99. The critical finding that Zika virus could also be transmitted sexually gave cause for great concern, as this mode of transmission has the potential to amplify the spread of the virus even in the absence of mosquito vectors. Zika will remain on the regional public health agenda for the foreseeable future, and PAHO will continue to respond appropriately and effectively. The Organization has established a dedicated PAHO portal on the Zika virus that presents information tailored to a variety of audiences,¹⁴ and has published a document detailing a strategy for enhancing national capacity to respond to the Zika virus epidemic in the Americas.¹⁵

100. In January 2017, a sudden increase in cases of sylvatic yellow fever and their spread to areas with low vaccination coverage were reported in southeast Brazil. PASB intensified epidemic surveillance for epizootic and human cases of yellow fever and activated EOCs at the country and regional levels to support Brazil's Ministry of Health in responding to the outbreak. Subsequently, PASB activated its IMS to coordinate the Bureau's response, and the PAHO/WHO country office in Brasilia declared an emergency at the country level. This triggered immediate deployment of technical experts in laboratory diagnosis, clinical management, epidemiological surveillance, and vector control, coordinated by PASB, to support national authorities and provide direct technical cooperation to states affected by the outbreak.

101. PASB collaborated with the WHO Scientific and Technical Advisory Group on Geographic Yellow Fever Risk Mapping and with the International Coordinating Group on Vaccine Provision for Yellow Fever to enable mass vaccination campaigns targeting the affected states and newly defined risk areas. The Bureau also supported the Ministry of Health of Brazil to update the emergency response plan for yellow fever through introduction of the use of fractional doses in specific situations, as recommended by the WHO Strategic Advisory Group of Experts on Immunization; procure vaccines and supplies through the PAHO Revolving Fund; strengthen surveillance of adverse events following immunization; and develop a comprehensive and updated vaccination plan that includes vaccine production and risk communication.

¹⁴ The Zika virus PAHO portal is at <http://bit.ly/1NOCAmy>.

¹⁵ The strategy document is available at <http://bit.ly/2mnUDNR>.

Innovations for emergency, disaster, and outbreak response

Ensuring resilient health systems

“Resilience is an attribute of a well-performing health system moving toward universal access to health and universal health coverage.”

Resilient Health Systems (Document CD55/9, 2016)

102. Resilient health systems have the ability to absorb shocks and to respond and recover with the timely provision of needed services. In such systems, health actors, institutions, and populations have the capacity to prepare for, and effectively respond to, crises; maintain core functions; and, informed by lessons learned, reorganize if conditions so require. In recognition of the importance of resilient health systems in mounting an effective response to emergencies and disasters, and building on its technical cooperation in the areas of health systems strengthening and universal health, the Bureau developed a policy on resilient health systems (Document [CD55/9](#)), which was approved by the 55th Directing Council in 2016.

103. The policy affirms that investing in health systems resilience is considerably more cost-efficient than financing emergency responses, and that it will facilitate an integrated approach for PASB’s technical cooperation in the areas of disaster preparedness, risk reduction, and response; disease surveillance and outbreak management; and health system strengthening towards universal health. The policy calls for actions within a broader sustainable development framework that fosters human development, social participation, and economic and social stability. Key areas for investment to improve resilience include strengthening of the essential public health functions (EPHFs), especially governance and regulation; health surveillance and health information systems; and risk reduction and communication.¹⁶

104. The policy also calls for ensuring reserve capacity, with the necessary supply of appropriate health workers, financing, medicines, and health technologies to allow a rapid scale-up of health services during acute or sustained health events. Investments in primary health care services are also crucial, to make them universally available and integrated into service networks that are adaptable and responsive. A key component of these efforts is related to the IHR. The policy urges countries to continue strengthening IHR implementation, approaching it as a holistic process embedded in national policy development and planning, as well as legislative action and regulatory frameworks. The implementation should include improvements in health services organization to enable infection prevention and control; strengthening of health surveillance networks and laboratory capacity; and development of health workforce competencies in the areas of outbreak and emergency response.

¹⁶ PAHO document [CD42/15](#) (2000) provides information on the essential public health functions.

105. In order to advocate for the continued development of resilient health systems, the PASB organized a high-level session on resilient and responsive health systems during the 4th Global Symposium on Health Systems Research in Canada in November 2016.

Advancing the Emergency Medical Team initiative

106. PASB developed a new platform, Health Operations in Emergencies (HOPE), to facilitate the registration of international response teams. In addition, a guide for a Caribbean medical assistance team and standards for foreign medical response teams were developed, the latter in collaboration with WHO. These mechanisms aim to significantly improve national responses and international health cooperation in disasters, providing common criteria on the composition, essential skills, and equipment for response teams, and clearly defined processes for their mobilization.

107. The Bureau made progress with the implementation of the Emergency Medical Team (EMT) initiative, with strong focus on strengthening country capacities. By mid-2017, 15 countries (Argentina, Bolivia, Colombia, Costa Rica, Cuba, Ecuador, El Salvador, Guatemala, Honduras, Mexico, Nicaragua, Panama, Peru, Venezuela, and the United States of America) were adopting the initiative as part of their national systems to ensure that emergency medical teams can be requested and deployed in the shortest possible time in-country, to neighboring countries, or internationally. PASB developed a regional roster of EMT coordinators who can be activated by countries when the need arises. PASB organized a regional training course for the coordinators in 2016 that drew participants from 12 countries.¹⁷ Argentina, Bolivia, Colombia, Costa Rica, Cuba, Ecuador, Honduras, Mexico, Nicaragua, Panama, Peru, and Venezuela organized national workshops on EMT with PASB support, while Argentina, Chile, Colombia, Costa Rica, Cuba, Ecuador, and Peru advanced in the process of establishing their respective Medical Information and Coordination Cells (CICOMs) and developing their national EMTs in compliance with global standards.

108. The Bureau mentored EMTs from Barbados, Costa Rica, Ecuador, and the United States to prepare for WHO international EMT classification. In February 2017, after a rigorous verification process, an international expert mission confirmed that the EMT of the Costa Rican Social Security Fund met the standards and principles established by WHO and was ready for international deployment to emergencies and disasters. Costa Rica became the first country in the Americas to receive international EMT classification, during the 70th World Health Assembly in 2017. As of mid-2017, 29% of EMT global classification applications were from the Americas.

109. The Bureau supported national authorities in the use of the CICOM and EMT initiative in managing the responses to Hurricane Matthew in Haiti and Hurricane Otto in Costa Rica in late 2016. A draft declaration on minimum standards for Emergency

¹⁷ Argentina, Chile, Colombia, Costa Rica, Cuba, the Dominican Republic, Ecuador, Guatemala, Honduras, Panama, Peru, and the United States.

Medical Teams, proposed by Ecuador, was approved at the 10th Meeting of Ministers of Health of the South American Health Council (SSC) of the Union of South American Nations (UNASUR) in March 2017. In April 2017 the beta phase of the Regional Virtual CICOM platform—an online tool for information management and EMT coordination during emergencies—was finalized. The tool will undergo testing at the country level by the Ministry of Health of Chile, which supported the platform’s development, and at the regional level by PASB.

110. In tandem with the EMT initiative, the Bureau supported countries’ efforts to strengthen all-hazard preparedness. This included support for Peru’s Ministry of Health and the EsSalud national insurance program to develop preparedness and action plans to address the risks associated with El Niño, as well the first contingency plan for a major earthquake scenario in Lima and Callao. The latter plan was validated in October 2016 through a sector simulation exercise. Guidelines for chemical emergencies, epidemics, and migrant crises were reviewed by the Bureau and shared with the Ministry of Health of Costa Rica. In Haiti, the Bureau worked closely with the departments of Grand’Anse and Nord-Est to establish departmental EOCs capable of responding quickly and efficiently to medical and public health emergencies.

Improving organizational fitness for purpose

111. Based on evaluations of its response to the Ebola outbreak, recommendations made, and lessons learned, WHO established a new Health Emergencies Program (WHE) in 2016. In that same year, PASB reorganized its work in emergencies to be functionally aligned with the WHO program, while maintaining priority areas of work for the Region of the Americas that are not included in the global program. PAHO’s new Health Emergencies Department (PHE) brings together the former Department of Emergency Preparedness and Disaster Relief (PED) and the Unit of International Health Regulations/Epidemic Alert and Response and Waterborne Diseases (CHA/IR) under a consolidated management structure that reports to the Director. PAHO PHE continues to respond fully to the needs of Member States in the Americas, working and coordinating with WHO WHE as appropriate. PAHO’s PHE addresses five technical areas: infectious hazard management; country health emergency preparedness and IHR; health emergency information and risk assessment; emergency operations; and disaster risk reduction and special programs.

112. At the 55th Directing Council in 2016, PAHO’s Member States, being “profoundly concerned about possible severe manifestations and chronic outcomes of new viral diseases in the Region,” approved a new regional Strategy for Arboviral Disease Prevention and Control (Document [CD55/16](#)). The Strategy, which will guide the PAHO’s actions in this area, includes four lines of action:

- a) foster an integrated approach for arboviral disease prevention and control;
- b) strengthen health services capacity for the differential diagnosis and clinical management of arboviral diseases;

- c) evaluate and strengthen country capacity for surveillance and integrated vector control;
- d) establish and strengthen the technical capacity of the Arbovirus Diagnosis Laboratory Network in the Region of the Americas.

113. The 55th Directing Council also approved the Plan of Action for Disaster Risk Reduction 2016-2021 (Document [CD55/17, Rev. 1](#)), which incorporates gender, equity, human rights, ethnicity, and disability as cross-cutting areas to address group-specific needs that arise in emergencies and disasters.

114. The prestigious 2017 Dr LEE Jong-wook Memorial Prize for Public Health was awarded to the Henry Reeve International Medical Brigade (HRIMB) of Cuba at the 70th World Health Assembly in May 2017, in recognition of its emergency medical assistance to more than 3.5 million people in 21 countries affected by disasters and epidemics since the founding of the Brigade in September 2005. The presenter of the award reported that an estimated 80,000 lives have been saved as a direct result of the Brigade's front-line emergency medical treatments to patients in these countries.

3. IMPROVING HEALTH ALONG THE LIFE COURSE

115. PAHO recognizes the central role of family and community in promoting and protecting health as a social value and a human right, and uses a life-course approach, from preconception to old age, to address specific needs at key stages of life. This approach is, by its very nature, cross-cutting, and interventions related to the social determinants of health and equity are critical for improving health outcomes. Technical cooperation in this area seeks to accelerate reductions in maternal, neonatal, and infant mortality; promote the health, nutrition, and comprehensive development of children from infancy to adolescence; and address the health of older persons.

Promoting maternal, child, and adolescent health

Maternal and child health

116. PAHO's technical cooperation with Member States to reduce maternal and child mortality has included expanded coverage of antenatal care and childbirth with trained assistance; access to, and use of, modern contraceptives; and guidelines and training for improved obstetric and pediatric care. Countries including Argentina, Colombia, Dominica, the Dominican Republic, Haiti, and Paraguay have developed or advanced the implementation of national programs to reduce neonatal mortality and improve maternal health. Guyana implemented a neonatal care program at its main hospital that significantly lowered neonatal deaths at that facility. Bolivia, Brazil, Colombia, Guatemala, Mexico, and Nicaragua adapted and implemented the Code Red strategy for managing obstetric hemorrhage, while Brazil launched the Stork Network (Rede Cigonha), which uses expert committees and social mobilization to reduce maternal and neonatal mortality.

117. With support from PAHO and the UN Development Group for Latin America and the Caribbean (UNDG LAC), Bolivia, Brazil, Guatemala, Honduras, Mexico, and Peru developed a road map for implementing the Information and Accountability on Women's and Children's Health framework for reporting, oversight, and accountability on women's and children's health. Information needs in this area are also addressed through the Perinatal Information System (SIP) developed by PAHO's Latin American Center for Perinatology, Women and Reproductive Health (CLAP/WR). El Salvador, Honduras, Nicaragua, and Panama participated in a Technical Cooperation among Countries (TCC) project to strengthen their use of SIP to produce better and more complete information, particularly in the area of mother-to-child transmission of HIV and syphilis. As of June 2017, the SIP was being used as the national standard in 13 countries of the Region, as well as in some states of Mexico and in Bogotá, Colombia, to collect data on maternal and neonatal health. Five additional countries are in the process of implementing the SIP, and the Bureau has established a sentinel SIP network consisting of 20 health facilities from Argentina, Brazil, Colombia, the Dominican Republic, Guatemala, Honduras, and Nicaragua for the surveillance of severe maternal morbidity.

118. Despite these achievements, maternal health remains an area of major concern throughout the Region, and a special challenge for progress toward universal health. MDG 5 was one of the few MDGs that Latin America and the Caribbean did not achieve, as the 40% reduction in maternal mortality between 1990 and 2015 fell short of the targeted 75% reduction. The shortfall was the result of gaps in countries' abilities to ensure quality, comprehensive, universally accessible health services (including sexual and reproductive health services), in addition to poverty and other social determinants of health.

119. Leading causes of maternal death include obstetric hemorrhage, complications of unsafe abortion, and preexisting medical conditions such as diabetes, HIV, malaria, and obesity (whose health impacts can be exacerbated by pregnancy). Although access to health care has been advancing steadily in the Region, the shortage of skilled birth attendants and the prevalence of unattended home births continue to put women and their babies at serious risk and contribute to a high burden of maternal deaths.

120. CLAP/WR designed a new record-keeping module based on variables defined by WHO to document cases of severe maternal morbidity or "near misses." The clinical record has been incorporated into the SIP, with the aim of helping health professionals to anticipate and avoid severe complications in the care of pregnant women. In addition, mobile and web-based versions of the SIP software were developed in order to allow users to perform all SIP functions from a range of devices. CLAP/WR contributed to adapted versions of the SIP in Antigua and Barbuda, The Bahamas, Bolivia, Grenada, Saint Kitts and Nevis, Saint Vincent and Grenadines, and Trinidad and Tobago, and to the mapping of good practices for sharing and cooperation among countries. As part of the response to the Zika outbreak, CLAP/WR has also designed other SIP special modules for strengthening epidemiological surveillance of congenital defects and of Zika virus in pregnant women.

121. CLAP/WR has taken action to improve the collection and analysis of data on the quality of care provided to women in situations of abortion, both legal and illegal, and in cases of incomplete miscarriage, in order to better document and address this sensitive and relevant issue. The standard of care used was recently published in WHO guidelines and recommendations, as well as in WHO standards for evidence-based abortion care. CLAP/WR developed the Network of Care for Women in Abortion Situations (MUSA Network), which has sentinel sites covering almost all countries in Latin America. A work plan for refining the data collection form (SIP-A) according to country needs and incorporating it into SIP's Web-based and mobile applications was developed and implementation initiated. In collaboration with WHO, the SIP-A clinical record form will be used in a multicountry study on abortion care.

122. CLAP/WR spearheaded the "Zero Maternal Deaths from Hemorrhage" initiative, with support from the Latin American Federation of Societies of Obstetrics and Gynecology. As part of this initiative, the Bureau provided training for health professionals on the effective management of obstetric hemorrhage in clinical settings

and through national work plans, and provided equipment for use in national training workshops. The initiative targets subnational areas with high maternal mortality ratios (over 70 per 100,000 live births) in the participating countries of Bolivia, Brazil, Colombia, the Dominican Republic, Guatemala, Haiti, Honduras, Paraguay, Peru, and Trinidad and Tobago, five of which are PAHO Key Countries.

123. In the Americas, although the estimated neonatal mortality rate decreased by 58% from 22.1 to 9.3 per 1,000 live births between 1990 and 2014, its relative contribution to child mortality increased. Neonatal mortality currently accounts for 52% of deaths in children under 5 years of age. The causes of neonatal mortality have not changed, as over 85% of neonatal deaths are due to prematurity, birth defects, asphyxia, and infectious diseases. Effective, low-cost interventions exist for most of these causes, and as part of its technical cooperation in this area, the Bureau compiled, updated, and disseminated evidence on perinatal interventions across the continuum of care—preconception, prenatal, delivery, and postnatal. CLAP/WR designed a tool to evaluate the implementation of these interventions, with the aim of informing decision-making to improve the quality of care, particularly in the most vulnerable areas and population groups.

Adolescent health

124. PAHO contributed to Member States' efforts to address the multiple health challenges facing adolescents and youths in the Americas, including high fertility rates, substance use, violence, physical inactivity, and overweight and obesity. Low-income, and ethnic minority youth as well as those residing in border areas are disproportionately affected by many of these issues, and PASB focused both research and interventions on these groups. By 2013, 28 countries had established national adolescent health programs. The Bureau's technical cooperation addressed key areas of work, including prevention of gender-based violence, comprehensive sexual and reproductive health services, and prevention of adolescent pregnancy and HIV/AIDS.

125. Adolescent pregnancy has a major impact on maternal and child health, as well as socioeconomic outcomes. These pregnancies increase the health risks for both mothers and children, and reduce adolescent girls' chances for education and future employment. The adolescent fertility rates in Latin America and the Caribbean are among the highest in the world, exceeded only by sub-Saharan Africa, and PAHO has been a key actor in mobilizing partnerships and action to address this challenge. In 2014, COMISCA and the First Ladies of Central America endorsed a subregional plan for preventing adolescent pregnancy, based on the outcomes of an international symposium spearheaded by the Bureau earlier that year. Priority areas for action and PASB's technical cooperation include improving sexual and reproductive health services for adolescents, training of health workers, promoting supportive legislative and policy environments, expanding and improving sex education, and encouraging youth participation.

A Promise Renewed for the Americas – working for the reduction of inequities

The Bureau has served as the technical secretariat for A Promise Renewed for the Americas (APR LAC) since 2013, when the regional chapter of the interagency movement was created. The movement seeks to reduce the profound inequities in reproductive, maternal, neonatal, child, and adolescent health that persist in Latin America and the Caribbean. Participating agencies included the IDB, the Salud Mesoamérica Initiative, PAHO/WHO, the UN Children's Fund (UNICEF), USAID, and the World Bank.

Working in coordination with the global A Promise Renewed initiative, APR LAC has identified funding gaps and funding opportunities; created a digital database for articles and documents on health inequalities; and implemented a series of regional events aimed at fostering political and technical discussions on maternal and child health equity. At the country level, the movement has implemented a series of training workshops to build capacity in ministries of health for measuring and monitoring health inequalities at the national and subnational levels.

During 2016, APR LAC supported several countries in the Caribbean and Central America to identify population groups that have been left behind by past and present health and development efforts; examine the multilevel barriers that impede effective coverage and access to health and development for these population groups; and develop a better understanding of the underlying social mechanisms creating these barriers. APR LAC also helped countries respond to existing health inequalities using evidence-based and practical solutions.

In 2017, APR LAC officially became the interagency regional coordinating mechanism responsible for supporting Latin American and Caribbean countries as they interpret and adapt the Global Strategy for Women's, Children's and Adolescents' Health to their individual situations. Over the next 15 years, the mechanism will help countries develop and implement national operational plans for women's, children's, and adolescents' health that respond adequately to equity concerns and that are accompanied by indicators and monitoring frameworks with equity-based targets and goals. During the transition period, the member agencies held three subregional consultations to reach a common multisectoral understanding of the Global Strategy and its implications in each of the specific subregional contexts.

In July 2017, President Michelle Bachelet of Chile, as cochair of the High-level Steering Group for Every Woman Every Child, convened the High Level Meeting: Every Woman, Every Child, Every Adolescent, where the regional Commitment to Action of Santiago was launched. This Commitment seeks to initiate the regional implementation of the Global Strategy for Women's, Children's and Adolescents' Health and calls on regional multisectoral stakeholders to ensure that every woman, child, and adolescent in Latin America and the Caribbean not only survives, but also thrives, in a transformative environment. ([See Commitment here](#)).

Improving the health of older persons

126. The Bureau assisted with the development of a new Inter-American Convention on Protecting the Human Rights of Older Persons. Through their participation in a special OAS working group, Bureau experts contributed to the incorporation of health-related issues of special relevance to older adults, including access to palliative care, human rights in long-term care facilities, preferential access to comprehensive health services,

and legal mechanisms to guarantee informed consent and explicit expression of preferences for end-of-life support. Adopted by the OAS General Assembly in June 2015, the Convention is the first international treaty on the rights of older adults.

127. PAHO continued supporting Member States' efforts to adapt their health policies and systems to address the changing needs of rapidly aging populations and promote prevention and healthy lifestyles for healthy aging. As of mid-2017, 18 countries had developed policies, legal frameworks, and/or national plans on aging and health. At least 6 countries (Argentina, Brazil, Bolivia, Chile, Costa Rica, and Uruguay) have signed the Inter-American Convention on the Protection of Human Rights of Older Persons, and 5 have ratified it.

128. Health managers from several Latin American and Caribbean countries and territories participated in a 10-month specialization program on public health and aging created by PAHO and partners to improve primary health care for older adults. PAHO also brokered an agreement with the Inter-American Center for Social Security Studies and more than 15 Latin American and Caribbean universities to develop the University Consortium on Public Health and Aging, which would advocate for healthy aging as a main public health priority. Argentina, Brazil, Chile, Colombia, Costa Rica, Cuba, Mexico, and the United States are represented in the Consortium. With PASB's technical cooperation, evidence-based self-care programs were implemented in primary care and community health services in Argentina, Chile, Peru, and the countries of the Eastern Caribbean.

Improving nutrition

129. Nutrition achieved higher visibility on the political agenda of countries, with recognition of the critical role of unhealthy nutrition in the etiology of cardiovascular diseases, cancers, and diabetes by the 2011 UN High-level Meeting on the Prevention and Control of Noncommunicable Diseases. During the period under review, PAHO supported the development and implementation of nutrition policies, plans, and programs in several of the Region's countries. These included infant and young child feeding policies (notably the implementation and monitoring of the Code of Marketing of Breast-milk Substitutes) and the certification of hospitals as part of the Baby-Friendly Hospital Initiative. Code of Marketing legislation was developed in Bolivia, Brazil, Ecuador, El Salvador, Honduras, and Panama.

130. PASB supported several Caribbean countries and territories, including Barbados, Bermuda, Grenada, Guyana, Jamaica, and Suriname, in progressing towards certification of hospitals as Baby-Friendly. The Bureau also facilitated the visit of teams from Chile and Mexico to Brazil to learn about the latter's successful breast-feeding and human milk banking programs. Several publications were developed and disseminated, including ProPAN (Process for the Promotion of Child Feeding), a tool to promote programming in complementary feeding.

131. The Region demonstrated global leadership in confronting childhood obesity, with the unanimous approval by the 53rd Directing Council in 2014 of the regional Plan of Action for Prevention of Obesity in Children and Adolescents (Document [CD53/9, Rev. 2](#)). PAHO's technical cooperation with Member States has addressed implementation of the Plan's effective policy options to prevent obesity, including taxation of sugar-sweetened beverages (SSBs) and unhealthy food products (Barbados, Chile, Dominica, Ecuador, and Mexico); front-of-package labeling (Chile and Ecuador); innovative food based dietary guidelines (Brazil and Uruguay); regulation of the marketing of unhealthy products, especially to children (Chile and Mexico); open streets/"ciclovías recreativas" (Brazil, Chile, Colombia, Ecuador, Guatemala, Mexico, Peru, and the United States); and school nutrition (Brazil, Chile, Costa Rica, Ecuador, Trinidad and Tobago, the United States, and Uruguay). The Region also played an active role in advocating for the UN Decade of Action on Nutrition 2016-2025, proclaimed by the UN General Assembly in 2016.

4. REDUCING INEQUITIES IN HEALTH, WITH A FOCUS ON ETHNIC MINORITIES, INDIGENOUS POPULATIONS, AND PERSONS LIVING IN CONDITIONS OF VULNERABILITY

132. PAHO's Strategic Plan 2014-2019 specifies four cross-cutting themes—gender, equity, human rights, and ethnicity—that are to be incorporated on a priority basis across the spectrum of the Organization's technical cooperation. In 2014, the Director established an interprogrammatic working group to facilitate this process, with responsibilities that included ensuring that information relevant to these themes is shared across departments and units, and designing and implementing initiatives to promote collaborative work in these areas. The working group organized a training course for all PAHO staff on the social determinants of health in the context of the cross-cutting themes, and they also finalized guidelines for mainstreaming the themes into the Organization's work.

Advancing issues related to gender, equity, human rights, ethnicity, and health

Gender issues

133. The Bureau spearheaded the development of tools for providing comprehensive care for transgender persons and their communities, in response to Resolution [CD52.R6](#) from PAHO's 52nd Directing Council to address disparities in access to, and use of, health services by LGBT people, and as recommended in Concept Paper [CD52/18](#). Based on expertise generated in this area, PASB contributed to a technical dialogue for reframing transgenderism in the new International Classification of Diseases, and, in 2014, organized the first-ever Regional Meeting on the Health of Lesbian, Gay, Bisexual and Trans (LGBT) Persons and Human Rights. At this event, representatives of ministries of health, human rights organizations, universities, and civil society made recommendations for strategies and initiatives to collect and analyze data on the extent to which health services in the Region are meeting the needs of the LGBT community. The Bureau convened another meeting, in 2016, to identify the causes of disparities in health service access. In addition, a working group has reviewed and analyzed domestic laws and policies in the context of discrimination and exclusion of LGBT persons from health care services. As of mid-2017, data had been collected from the ministries of health of over 30 Member States and more than 25 nongovernmental organizations (NGOs), and the report was in the final drafting process.

134. In 2015, the Bureau presented to the 54th Directing Council an evaluation of the Plan of Action for implementing the Gender Equality Policy (Document [CD54/INF/2](#)), based on Member States' self-assessments. The evaluation found modest increases in the proportion of Member States with gender and health policies, plans, and budgets. In

addition, a relatively high percentage of the Bureau's technical units (72%) and of the PAHO Member States (88%) reported using sex-disaggregated data in guidelines that they produced. However, only 20% of the Member States reported actively monitoring their health sectors' commitments on gender mainstreaming. The evaluation report concluded that the Bureau and Member States had made uneven progress in implementing the PAHO Gender Equality Policy, and urged more sustainable budget allocations for this area of work and increased collection and analysis of sex-disaggregated data to support advocacy, policy-making, and programming.

135. Based on the evaluation of the implementation of the Gender Equality Policy, in 2015 the 54th Directing Council endorsed new priorities for advancing gender equality in health, including conducting research and applying innovative methodologies to address gender inequities in health; generating sector-specific evidence and gender analysis; and addressing emerging themes such as masculinities and the health concerns of LGBT communities.

136. In order to promote the generation of gender-related evidence, in 2014 the Bureau published the 6th edition of the statistical booklet *Gender, Health, and Development in the Americas: Basic Indicators 2013*. In 2016, PASB convened an expert group to review a core set of indicators on gender and health for the Americas as a whole, within the frameworks of universal health and the SDGs. Bureau experts also provided inputs on a set of gender equality indicators for the Caribbean—coordinated by UN Women—which were presented to Dominica, Guyana, Jamaica, and Suriname for consultation and later to CARICOM for validation and eventual adoption by its member countries.

137. The work of the Bureau on gender issues was enhanced by an innovative Strategy and Plan of Action on Strengthening the Health System to Address Violence against Women (Document [CD54/9, Rev. 2](#)), which was approved by PAHO's 54th Directing Council in 2015. The framework is the first of its kind in any WHO region, and takes a public health approach to the issue of violence against women, providing a road map for health systems to play a key role in multisectoral efforts to prevent and respond to such violence. At the request of COMISCA, the Bureau carried out mapping of approaches to gender equality within health policies, and to health within gender equality policies. Recommendations based on the mapping will be published in the second half of 2017.

138. PASB also completed work on core indicators for gender and health (in alignment with the Global Strategy for Women's, Children's and Adolescents' Health), emphasizing a core indicator on out-of-pocket expenditure on health as a key measure of advances toward gender equality in health. Discussions are being held with ECLAC on including this indicator in the Gender Equality Observatory for Latin America and the Caribbean.

Ethnic inequities

139. PASB undertook technical cooperation at the national, subregional, and regional levels to address the noticeable ethnic inequities in health that persist throughout the Region. This included playing an important role as co-chair of the UNDG LAC Interagency Group on Indigenous Peoples and working to improve the availability and quality of data on ethnicity and health.

140. In the South American Chaco region,¹⁸ PASB provided technical cooperation for a workshop titled “United to Action, Moving towards Universal Health in South American Chaco.” Representatives from ministries of health of the countries involved and indigenous peoples participated in this forum, an important outcome of which was the formulation of an intercountry project to advance universal health coverage among indigenous people.

141. In Paraguay, PASB contributed to the implementation of a strategy for the integrated network of health services in the Chaco and to the use of social autopsies in indigenous communities of Chaco. Social autopsies allow the identification of death from preventable causes, while promoting the empowerment of communities, as part of a participatory strategy to prevent maternal and perinatal deaths.

142. The Bureau participated in a regional technical meeting on Afro-descendant health convened in Cartagena, Colombia, in November 2015. The meeting provided a unique opportunity to identify and address Afro-descendants’ health priorities and challenges, and to design and implement effective health policies and programs with an intercultural perspective. As a follow-up to this meeting (and within the context of the International Decade for People of African Descent, 2015-2024, which has the theme “People of African descent: recognition, justice, and development”), the Bureau provided a report containing the most relevant health findings in the Region to the UN Working Group of Experts on People of African Descent. PASB also developed a proposal on health plans for Afro-descendants for the Central American and Andean subregions, with the involvement of representatives of ministries of health, experts on Afro-descendant health, and Afro-descendant leaders. This proposal formed the basis of a specific health plan for people of African descent for the Andean Subregion, which was presented at the 36th Meeting of REMSAA in April 2017.

143. In 2015, the Regional Meeting on Ethnicity and Health in the Americas was held at PAHO Headquarters in Washington, D.C., for ministers of health, regional and international experts, and representatives of indigenous and Afro-descendant populations. The meeting highlighted and discussed key issues to address ethnic disparities in health, facilitated dialogue on the United States-Brazil Joint Action Plan To Eliminate Racial and

¹⁸ The South America Chaco region includes northern Argentina, western Bolivia, a portion of the Brazilian states of Mato Grosso and Mato Grosso do Sul, and Paraguay. It is the largest continuous dry forest in the world and the second-largest forest biome (an area that can be classified according to the plants and animals that live in it) in South America.

Ethnic Discrimination and Promote Equality,¹⁹ and identified next steps for the development of a new regional policy on ethnicity and health.

144. PASB drafted the new Policy on Ethnicity and Health for presentation to the 29th Pan American Sanitary Conference in September 2017. The policy promotes an intercultural approach to health, geared to the following priority lines: *a)* generation of evidence; *b)* promotion of political action; *c)* social participation and strategic partnerships; *d)* recognition of ancestral knowledge, and traditional and complementary medicine; and *e)* capacity development at all levels. Building on the proposed policy, the Bureau advanced in the development of key ethnicity and health indicators, in line with one of the Organization's key strategic priorities, that of improving data and evidence on the health of indigenous, Afro-descendant, and Roma populations.

145. The Bureau's work in the area of gender, ethnicity, and health was notably strengthened through enhanced interprogrammatic collaboration among technical units. PASB collaborated with Member States, including Bolivia, Brazil, Ecuador, Guatemala, Guyana, Honduras, Nicaragua, Panama, and Peru, to develop and implement culturally appropriate interventions for indigenous people and Afro-descendants within programs for HIV, tuberculosis, hepatitis, malaria, disaster risk reduction, mental health, and maternal and child health, among others.

146. Recent achievements at the country level in the area of ethnic inequities have included:

- a) Bolivia: Development and dissemination of information on traditional Bolivian ancestral medicine in all its forms, modalities, and therapeutic procedures, in order to promote and strengthen the exercise and practice, as well as the gradual incorporation, of traditional doctors, midwives, and naturists, in their capacity as service providers.
- b) Guyana: Convening of a meeting in the indigenous village of Baramita in 2016 to discuss emerging mental health issues among the indigenous residents and development of a plan of action based on the discussions.
- c) Panama: In 2016, enactment of Law 17, on establishing the protection of the knowledge of traditional indigenous medicine, which represents an important step in the approach to indigenous peoples' health. The Consultative Committee on Traditional Indigenous Medicine was installed in March 2017, in compliance with Article 6 of Law 17.
- d) Ecuador: In February 2017, adoption of the Manual of Articulation of Ancestral Midwives, which aims to establish mechanisms for the improvement of maternal and neonatal health of the peoples and nationalities of the country, within the framework of the Model of Comprehensive Family, Community, and Intercultural Health Care, and of individual and collective rights.

¹⁹ The Joint Action Plan was signed in March 2008 and was the first bilateral agreement targeting racism.

Migrants' health

147. At the 55th Directing Council in 2016, PAHO's Member States approved a new policy on the health of migrants (Document [CD55/11, Rev.1](#)). The policy highlights the vulnerabilities of migrants and urges Member States to protect migrants' health and well-being by establishing health services that are inclusive and responsive to their health needs; institutional arrangements that provide access to comprehensive, quality, people-centered health services; mechanisms to provide financial protection in health; and intersectoral action and development of partnerships, networks, and multicountry frameworks.

148. In April 2017, Mexico and the PASB organized a meeting of Mesoamerican countries in Mexico City to discuss the health of migrants, especially the social determinants; interventions to reduce their health risks and increase their access to health services, particularly in border areas; and existing mechanisms and opportunities to improve collaboration and coordination among the countries. The ministers of health and senior health authorities of Belize, Colombia, Costa Rica, the Dominican Republic, El Salvador, Guatemala, Honduras, Mexico, Nicaragua, and Panama agreed to work together to meet the health needs of migrants in Mesoamerica. Representatives of the 10 countries signed the Ministerial Declaration on Migration and Health, which outlines a series of agreements on joint efforts to improve the available information on the health situation of migrants and to forge partnerships to meet their health needs in a comprehensive and timely manner. The ministers of health also made a commitment to promoting changes and improvements in their countries' regulatory frameworks to enable them to meet the health needs of migrants, share experiences, strengthen national and regional policies on migration and health so as to provide comprehensive care for migrants, and improve health surveillance of the migrant population.

Persons with disabilities

149. During the review period, PAHO's technical cooperation contributed to the development of a common policy for Andean countries on the care of persons with disabilities, including the development of plans for risk management in emergencies and natural disasters that include the needs of such persons. Implementation began in Bolivia, Chile, Colombia, Ecuador, Peru, and Venezuela in the areas of development and strengthening of networks for comprehensive rehabilitation services; use of WHO's International Classification of Functioning, Disability and Health (ICF); and interventions for social protection of people with disabilities. Argentina, Bolivia, Chile, Colombia, Costa Rica, Paraguay, and Venezuela began implementing the PAHO Community-based Rehabilitation Strategy, and baseline information was updated on the situation of persons with disabilities in Argentina, Brazil, Chile, Ecuador, Mexico, Paraguay, Peru, Uruguay, and Venezuela.

150. PAHO undertook technical cooperation with the Ministry of Health of Chile to improve data collection on disabilities. The IVADEC-CIF²⁰ tool was developed, based on the ICF framework, to assess the performance of daily living activities by persons with disabilities. The tool can be used to assess degrees of disability as well as the effects of interventions. It is intended for application in community settings and can be used for self-assessment by persons with disabilities or by significant informants. The qualitative information provided is analyzed and converted into quantitative indicators, including disability and performance indices, and dependency and mobility ratios.

151. PAHO's technical cooperation has addressed the adaptation and use of the tool in other Member States, given that IVADEC-CIF contributes to improved care for people with disabilities in a number of ways. The tool:

- a) supports transition to a biopsychosocial approach by allowing a performance analysis within the community context;
- b) provides a method of measuring the effects of assistive technologies and medications;
- c) facilitates the alignment of national systems for qualification and certification of disabilities with impact assessment of policies on disabilities and rehabilitation;
- d) facilitates the inclusion or reformulation of questions about disabilities in population surveys;
- e) contributes to diagnostics and situation analyses to develop local profiles on disabilities.

152. In 2014, the 53rd Directing Council recognized disability as a public health and human rights issue, as well as a development priority, and approved the regional Plan of Action on Disabilities and Rehabilitation (Document [CD53/7, Rev. 1](#)). This Plan of Action (which is aligned with the WHO Global Disability Action Plan 2014-2021) has three strategic lines of action:

- a) promote equity within the framework of the health policies, plans, and legislation on disability to improve governance;
- b) strengthen the health sector's habilitation and rehabilitation services network, which includes the provision of assistive technology and community-based rehabilitation;
- c) promote the production and analysis of data on disabilities, and support research.

153. By mid-2017, with PASB's technical cooperation, countries had made significant advances in the revision of national laws and the development of national plans on

²⁰ Instrumento de Valoración de Desempeño en Comunidad-Clasificación Internacional de Funcionalidad, Discapacidad y Salud (Instrument for the Evaluation of Performance [Functioning] in the Community, based on the WHO ICF).

disability and rehabilitation;²¹ in strengthening the disability components of their health surveillance systems through use of the ICF;²² and in developing and strengthening comprehensive rehabilitation services in the health sector linked to primary health care.²³

Human rights and health

154. The Bureau continued to advocate for, and provide guidance on, the integration of human rights principles into national health policies, programs, and interventions, including disaggregation of data to enable identification of vulnerable groups, strengthening of primary health care, and progress to universal health. This work was guided by the 2010 concept paper titled *Health and Human Rights* (Document [CD50/12](#)), which recognized that international human rights law is a valuable legal and conceptual framework for unifying strategies to better the health of poor and excluded social groups and to improve equity in health. As of mid-2017, 20 of the Region's countries included the right to health in their constitutions.

Measuring inequities in health

155. Indicators that report national averages do not demonstrate inequities in health. As part of PAHO's longstanding and renewed commitment to health equity and sustainable development in the framework of the SDGs, in 2014 the 53rd Directing Council approved a new set of metrics for measuring changes in health inequality (Document [CD53/10, Rev. 1](#)). The metrics comprise two measures of inequality for use in conjunction with four key indicators: infant mortality, maternal mortality, premature mortality due to NCDs, and mortality amenable to health care (premature deaths that would not have occurred if timely and effective health care had been available). The adoption of these metrics made PASB the first WHO regional office and the first agency of the UN system to use measurable health equity indicators and targets to evaluate the impact of its own technical cooperation programs.

156. In further efforts to support progress in advancing the SDGs, health equity, and universal health, and bolstered by the adoption of new metrics on health inequality, in 2016 the Bureau launched a Commission on Equity and Health Inequalities in the Region of the Americas. The Commission, the result of a partnership between PAHO and the Institute of Health Equity at University College London, comprises leading international experts on health policy and social determinants of health. The Commission will undertake the Review of Equity and Health Inequalities in the Americas, the first such comprehensive effort to gather evidence on health inequities in the Region. Over a two-year period, the Commission will investigate how socioeconomic and structural factors, as well as identity, influence health in the countries of the Americas; generate evidence;

²¹ Argentina, Bolivia, Chile, the Dominican Republic, Ecuador, Guyana, Haiti, Mexico, Panama, Paraguay, Trinidad and Tobago, Uruguay, and Venezuela.

²² Argentina, Brazil, Chile, Colombia, Ecuador, Honduras, Mexico, Panama, Peru, and Venezuela.

²³ Argentina, Bolivia, Brazil, Chile, Colombia, Costa Rica, Cuba, the Dominican Republic, Ecuador, Guyana, Mexico, Panama, Peru, and Venezuela.

make recommendations for action to reduce or eliminate persisting health equity gaps; and provide guidance for PAHO Member States to address the social determinants of health and the cross-cutting themes of gender, equity, human rights, and ethnicity. As part of the Commission's assessment, 15 Member States²⁴ are fulfilling their commitment to reviewing and addressing inequities and inequalities in health.

157. PASB intensified its technical cooperation to strengthen national capacities to measure, analyze, and monitor social, economic, and environmental inequalities in health at the national and subnational levels, enabling Member States' accountability in "leaving no one behind" as they pursue the 2030 Agenda. The Bureau is working with all countries to align their national health agendas with the SDGs, and 15 countries²⁵ of the Americas have conducted national consultations for the integration of the SDGs into their national health plans.

158. Overall, countries have strengthened their institutional capacities to quantify and analyze social inequalities in health, including the production of health equity profiles—mostly in maternal and child health—addressing the three dimensions of sustainable development: social, economic, and environmental. The Bureau collaborated with Member States to develop a series of health equity profiles across the Region, using equity stratifiers as proxy indicators of the social determinants of health, including income, geographical location, education, sex, and race. Analysis of the profiles facilitates the identification of health inequality gaps and gradients across the socioeconomic spectrum, and it helps countries to plan and implement actions to achieve a fairer distribution of health and well-being. By mid-2017, 11 countries²⁶ had completed health equity profiles, with three more in development (Bolivia, Colombia, and Paraguay). In addition, the ministries of health of eight countries—Belize, Costa Rica, the Dominican Republic, El Salvador, Guatemala, Honduras, Nicaragua, and Panama—signed a high-level political resolution committing to incorporate health inequality measurements on maternal, child, and adolescent health into their national strategic information systems.

159. PASB collaborated with the state of Tocantins and the Center for Information and Strategic Health Decisions (INTEGRA Saúde) in Brazil to develop an observatory of inequities and social determinants of health, which will guide the development of relevant policies, programs, and projects. The Bureau also contributed to the creation of the National Observatory of Health Inequities in Mexico. There are ongoing efforts to develop a strategic institutional approach for PASB's technical cooperation towards achieving the SDGs; to harmonize indicators across frameworks; and to develop baselines for SDG indicators. At Member States' request, in 2015 PASB formulated the

²⁴ Argentina, Belize, Brazil, Canada, Chile, Colombia, Costa Rica, Cuba, El Salvador, Jamaica, Mexico, Peru, Suriname, Trinidad and Tobago, and the United States.

²⁵ Argentina, Belize, Brazil, Costa Rica, Cuba, the Dominican Republic, Ecuador, El Salvador, Guatemala, Honduras, Jamaica, Mexico, Nicaragua, Panama, and Venezuela.

²⁶ Argentina, Aruba, The Bahamas, Brazil, Canada, El Salvador, Honduras, Mexico, Nicaragua, Panama, and Venezuela.

document *Preparing the Region of the Americas to Achieve the Sustainable Development Goal on Health*,²⁷ which provides a cross-reference between SDG 3 and the programmatic and technical resources available at PAHO and in the countries, including the most relevant mandates and technical documents.

160. As part of its commitment to strategic partnerships and progress towards SDG 17 (“Strengthen the means of implementation and revitalize the global partnership for sustainable development”), the Bureau collaborated with the Joint Summit Working Group and Summit Implementation Review group of the OAS to ensure that the final “Mandates for Action” document of the Seventh Summit of the Americas in April 2015 included support for priority health issues such as universal health, the IHR (2005), NCDs, food and nutrition, water and sanitation, and maternal and child health. The OAS and PAHO established an informal working group in September 2015 to identify joint actions focused on the SDGs and their targets, and the group began a five-year collaboration in February 2016 aimed at guiding and supporting national and regional efforts to advance the 2030 Sustainable Development Agenda, especially those goals which are outside of the scope of the health sector. The partnership’s first product was a publication aligning each SDG with existing mandates and interagency collaborations, aiming to promote synergies and cooperation; simplify coordination and reporting efforts by countries striving to achieve objectives under multiple international frameworks; and establish a broader interagency alliance on a regional approach to the SDGs that addresses health equity and the underlying determinants of health.

161. In September 2016, during a side event at the 55th Directing Council, Member States agreed to develop a new high-level framework to provide long-term vision and direction for health development in the Region, in the context of the 2030 Agenda for Sustainable Development and other global and regional mandates in health. The Bureau supported a 16-member Countries Working Group, chaired by Ecuador, with Panama and Barbados as vice-chairs, to draft that framework, the Sustainable Health Agenda for the Americas 2018-2030. The Agenda, which will be presented to the 29th Pan American Sanitary Conference in September 2017 for approval, contains 11 goals and more than 50 targets that PAHO Member States are expected to reach by 2030, in pursuit of universal access to health and universal health coverage, resilient health systems, and quality health services. The Agenda will constitute the highest-level strategic planning and policy framework for collective actions to enhance health and well-being throughout the Hemisphere, complementing work to attain the global SDGs.

162. PAHO continued to engage with UN Country Teams (UNCTs), roundtables, cooperation groups, Global Fund Country Coordination Mechanisms, peer review groups, interagency thematic groups, SDG working groups, and other similar groups that advise on, coordinate, monitor, and evaluate the implementation of health and health-related programs, to ensure alignment with national health priorities. The Organization has played an active role in leading or coleading the health component of the UN

²⁷ Available at <http://bit.ly/2rq0ZPa>.

Development Assistance Framework (UNDAF) in at least 20 countries in the Americas,²⁸ and contributed to the formulation of the UN Multi-Country Sustainable Development Framework in the Caribbean. For the 2017-2021 period, that UNMSDF covers 18 countries and territories²⁹ in the Caribbean and has four priority areas aligned with the SDGs,³⁰ seeking to accelerate the countries' progress towards these global goals. The "Healthy Caribbean" priority area of the Framework has outcomes of: *a*) universal access to quality health care services and systems and *b*) laws, policies, and systems introduced to support healthy lifestyles among all segments of the population. Both of those are priorities for PAHO's technical cooperation.

²⁸ Argentina, Barbados, Belize, Bolivia, Brazil, Colombia, Costa Rica, the Dominican Republic, El Salvador, Guatemala, Guyana, Honduras, Jamaica, Nicaragua, Panama, Paraguay, Peru, Suriname, Trinidad and Tobago, and Uruguay.

²⁹ Anguilla, Antigua and Barbuda, Aruba, Barbados, Belize, the British Virgin Islands, Curaçao, Dominica, Grenada, Guyana, Jamaica, Montserrat, Saint Lucia, Saint Kitts and Nevis, Saint Vincent and the Grenadines, Sint Maarten, Suriname, and Trinidad and Tobago.

³⁰ Information on the UNMSDF is at www.2030caribbean.org.

5. REDUCING AND ELIMINATING THE BURDEN AND IMPACT OF COMMUNICABLE DISEASES, INCLUDING VACCINE-PREVENTABLE DISEASES, NEGLECTED INFECTIOUS DISEASES, AND DISEASES COVERED BY THE GLOBAL FUND

163. During the reporting period, PAHO's technical cooperation supported Member States' efforts to prevent and control communicable diseases and to progress toward the elimination of those considered eliminable. The interventions focused on strengthening capacity, preparedness, surveillance, detection, risk reduction, and response to hazards to human health, including events of potential international concern as defined in the IHR. Determined efforts by Member States—in collaboration with PASB, their national institutions, civil society, the private sector, development partners, and other key stakeholders—have led to continued successes against infectious diseases at the national and regional levels.

Achievements in infectious disease elimination

Recent milestones in eliminating infectious diseases in the Americas

Chagas disease

Though progress has been made in reducing the prevalence of Chagas disease (which is a vector-borne disease caused by *Trypanosoma cruzi*), an estimated 6 million people in the Americas remain infected. PASB spearheaded subregional South-South cooperation that promoted vector control measures, universal screening of blood donors, and improved quality and coverage of medical care. These efforts led to several countries certifying the interruption of transmission by Chagas' principal vector in each country's entire territory or in specific geographic areas, meeting a regional goal set previously.

- In 2012, four countries and/or departments were certified as having interrupted transmission of the disease by the respective principal vectors: Belize; all municipalities of the department of La Paz, Bolivia; several endemic areas in Argentina; and the department of Alto Paraguay, Paraguay.
- In 2014, the state of São Paulo, Brazil, received verification from an international expert team assembled by PAHO/WHO that it had eliminated Chagas disease as a public health problem.
- In 2016, the interruption of vector transmission of *T. cruzi* was certified in Paraguay's department of Boquerón, an important public health milestone as Boquerón is part of the South American Chaco, an area with substantial social, epidemiological, and environmental risk factors for Chagas disease.
- Also in 2016, interruption of vector transmission was recertified in the six formerly Chagas-endemic areas of Chile.

Onchocerciasis

- In 2013, WHO officials certified Colombia as free of transmission of onchocerciasis ("river blindness"), making it the first country in the world to eliminate the disease. The achievement

followed the country's 16-year effort to control the disease in a remote community through the use of the antiparasitic drug ivermectin, epidemiological surveillance, and community education. The effort was led by Colombia's National Institute of Health, with support from the Ministry of Health and Social Protection, PAHO, the Carter Center's Onchocerciasis Elimination Program of the Americas, and Merck's Mectizan Donation Program.

- In 2014, Ecuador became the world's second country to be verified as having eliminated onchocerciasis.
- In 2015, Mexico became the world's third country to be verified as having eliminated onchocerciasis.
- In 2016, the WHO Director-General issued an official letter to Guatemala confirming the elimination of onchocerciasis transmission, making it the fourth country in the Region, and in the world, to be verified as having eliminated onchocerciasis.

Only two foci now remain in the Americas, both in the Yanomami region that straddles the border between Brazil and Venezuela. Elimination in that area presents more of a challenge because of its remoteness—access requires helicopters or extended river excursions—and the high mobility of its mainly indigenous nomadic population. However, interventions toward elimination continue through South-South cooperation between the two countries and technical cooperation from PAHO and other key stakeholders.

Trachoma

- In January 2017, WHO validated the elimination of trachoma as a public health problem in Mexico, which became the third country in the world, and the first in the Region, to achieve this goal.

Mother-to-child transmission of HIV and syphilis

In June 2015, the Americas became the first WHO region to carry out a formal country validation of achievement of elimination at the national level of mother-to-child transmission (MTCT) of HIV and syphilis. In close collaboration with WHO, the Bureau developed a validation strategy and tools, and PASB's Director appointed the independent Regional Validation Committee to undertake the process, with support from Bureau experts and UNICEF.

- In June 2015 Cuba became the first country in the world to receive validation of its elimination of MTCT of HIV and syphilis from WHO.
- As of mid-2017, 22 countries and territories in the Americas were reporting data consistent with elimination of MTCT of HIV, of which 20 also had data consistent with elimination of MTCT of syphilis. By mid-2017, several Caribbean countries had submitted requests for validation of the dual elimination of MTCT of one or both of these diseases. Anguilla, Bermuda, the Cayman Islands, and Montserrat were validated by WHO as having met all goals and targets for elimination of MTCT of HIV and syphilis.

PAHO has been monitoring the progress of Member States over the five-year span (2010-2015) of the PAHO Strategy and Plan of Action for the Elimination of Mother-to-Child Transmission of HIV and Congenital Syphilis (Document [CD50/15](#)). The most recent report, *Elimination of Mother-to-Child Transmission of HIV and Syphilis in the Americas: Update 2016*, showed that the number of new HIV infections among children 0-14 years in Latin America and the Caribbean declined by 55% between 2010 and 2015, from an estimated 4,700 to 2,100. This suggests that 28,000 HIV infections were averted in Latin America and the Caribbean due to interventions to prevent MTCT. Meanwhile, new cases of congenital syphilis syndrome doubled

in the Region between 2010 and 2015, from 10,850 to 22,800 children.

The Bureau has initiated development of a second phase of the dual elimination initiative, to target MTCT of other infections, such as hepatitis B and Chagas disease. The expanded initiative will strengthen MTCT efforts as integral to interventions for achievement of the SDGs.

Rubella and congenital rubella syndrome

- In April 2015, the International Expert Committee for Documenting and Verifying Measles, Rubella, and Congenital Rubella Syndrome Elimination in the Americas (IEC) reviewed epidemiological evidence presented by PAHO Member States and determined that the Region had eliminated endemic transmission of rubella and congenital rubella syndrome (CRS). Rubella and CRS are the third and fourth diseases to be eliminated from the Americas, following smallpox in 1971 and polio in 1994. In all four cases, the Region of the Americas was the first in the world to achieve elimination.

Measles

- In September 2016, the IEC declared measles the fifth vaccine-preventable viral disease to be eliminated from the Region of the Americas, culminating a 22-year effort involving mass vaccination against measles (rubeola), mumps, and rubella throughout the Americas.

Polio

- The Region has worked to maintain its polio-free status while supporting global polio eradication efforts under the Polio Eradication and Endgame Strategic Plan 2013-2018 of the Global Polio Eradication Initiative, which was endorsed by the 65th World Health Assembly in 2012. A central component of the Endgame Plan is the eventual global withdrawal of all oral polio vaccine (OPV) and the use of inactivated polio vaccine (IPV), through a phased process. The 32 countries and territories in the Region that were not already using IPV have introduced it into their schedules, and 36 switched from trivalent to bivalent OPV as part of the phased switchover. A second key component of the Endgame Plan is the destruction or containment of all polioviruses type 2 at essential facilities, and the regional plan calls for the containment of wild poliovirus types 1 and 3. PAHO Member States are in process of submitting reports on their containment activities.

Sustaining achievements in vaccine-preventable diseases

164. The Expanded Program on Immunization (EPI) is one of the Region's most important public health successes. From initially providing vaccines against six childhood diseases in its early years, the program has expanded to include as many as 14 vaccines. Where supported by the appropriate evidence, the countries of the Americas continued to lead the way in the introduction of new vaccines for rotavirus, pneumococcal disease, and human papillomavirus (HPV).

165. During the period under review, PAHO's technical cooperation included capacity-building for rapid monitoring of vaccine coverage and surveillance, and analysis of data on vaccine-preventable diseases. PAHO's ProVac Initiative continued to help countries to develop capacity for making evidence-based decisions on the introduction of new vaccines. ProVac empowers national teams to conduct their own economic analyses and

provides important indirect benefits, such as increased collaboration among national institutions, more effective planning for vaccine introduction, improved infrastructure for decision-making, and a solid platform for the wider promotion of evidence-based decision-making.

166. As part of PAHO's comprehensive technical cooperation approach on immunization, the PAHO Revolving Fund continued to provide crucial support for the Region's achievements in the prevention, control, and elimination of vaccine-preventable diseases. The Revolving Fund provides credit lines and makes bulk purchases on behalf of Member States to ensure a continuous supply of high-quality vaccines and syringes for national immunization programs. It has also contributed to the introduction of new vaccines. Noteworthy achievements were the Bureau's successful negotiations to make both HPV vaccines currently on the market available for procurement through the Fund at reduced prices, and the introduction of dog rabies vaccine into the Fund to support the regional rabies elimination goal. Forty-one countries and territories now participate in the Revolving Fund, which has become an example for other international organizations and other WHO regions of an effective mechanism to ensure an uninterrupted supply of affordable, quality vaccines. Key elements of PAHO's technical cooperation in this area include increasing Member States' awareness of global vaccine market dynamics and challenges, supporting demand planning, and ensuring the timely availability of quality vaccines and supplies.

167. Rising costs associated with the introduction of new, more expensive vaccines and widening target populations require careful consideration of cost efficiencies when developing annual EPI plans of action. In response to Member States' concerns about programmatic sustainability and demonstration of efficient use of resources to facilitate successful resource mobilization, the Organization led the revision of the EPI plan of action template introduced in the 1970s. The revision aimed to ensure consistency in reporting and to develop a more robust method to define budgets through periodic costing exercises of EPI interventions.

168. PAHO also launched a new companion tool to the EPI plan of action template called COSTVAC, which supports EPI teams in the collection of data on immunization costs at all program levels, and enables estimation of the total costs of the vaccination program in a given year, in order to develop more accurate budgets. Honduras was one of the first countries in the world to perform a comprehensive cost analysis of routine immunization using COSTVAC. The findings from its analysis were critical for the development of sustainability plans prior to the country's graduation from financing by Gavi, the Vaccine Alliance. The PAHO Revolving Fund has strengthened its collaboration with Gavi, particularly in supporting procurement and contributing to successful transition of some countries out of Gavi support. As of 30 April 2017, six countries in the Region are approved for various types of Gavi support: Bolivia, Cuba, Guyana, Haiti, Honduras, and Nicaragua.

169. PASB's technical cooperation for improving the cost-effectiveness of immunization programs also includes guidance on the use of new information and communication technologies, given the importance of timely, quality information and data analysis for evidence-based decision-making. Member States are increasingly using innovations such as managerial dashboards and electronic immunization registries (EIRs), which can improve the monitoring of vaccine coverage. However, it is important to ensure that EIRs are developed within the context of national eHealth strategies, are interoperable with other information systems for health, and are appropriately implemented, evaluated, and financed.

170. Since its inception in 2003, the annual Vaccination Week in the Americas (VWA) has become the Americas' largest regional health initiative. It has enabled vaccination of more than half a billion people in the Region, especially vulnerable and hard-to-reach populations. Increasingly, PAHO Member States have used VWA to combine immunization with other public health interventions, including deworming and vitamin A supplementation; diabetes and hypertension screening; HIV testing; sexual and reproductive health education; and vaccination of pets. VWA partners have included UNICEF, the Joint UN Program on HIV/AIDS (UNAIDS), UNDP, the Sabin Vaccine Institute, and U.S. CDC. VWA provided the inspiration and model for the WHO-endorsed global initiative, World Immunization Week, which first took place in 2012 and is also observed annually. The 15th Vaccination Week in the Americas, held 22-29 April 2017, focused on getting vaccines to indigenous groups, rural areas, and people living in border areas.

Responding to HIV, sexually transmitted infections, tuberculosis, and hepatitis

HIV and STIs

171. Considerable progress was made in the response to HIV and other sexually transmitted infections (STIs). The mid-term evaluation of the Regional HIV/STI Plan for the Health Sector 2006-2015 showed that during 2005-2011, the estimated incidence of HIV infection in Latin America and the Caribbean decreased from 21.1 to 19.1 per 100,000 population. In addition, between 2001 and 2011, there were declines of 38% and 60% in pediatric cases of HIV in Latin America and in the Caribbean, respectively.

172. In 2014, an estimated two million people were living with HIV in Latin America and the Caribbean (1.7 million in Latin America and 289,000 in the Caribbean), of which 46,000 were children (0-14 years old). Antiretroviral therapy (ART) coverage among the estimated population living with HIV in Latin America and the Caribbean increased significantly, rising from 8% in 2000 to 55% by the end of 2015 (56% in Latin America and 52% in the Caribbean), the highest coverage achieved among low- and middle-income settings globally. In the 2012-2015 period alone, ART coverage increased by 16%. At the end of 2014, the percentage of children (0-14 years old) estimated to be living with HIV who were on ART was 81% in Latin America and 35% in the Caribbean.

This scale-up of ART coverage has led to a significant decline in AIDS-related mortality in Latin America and the Caribbean, with a reduction of 25% among adults between 2012 and 2015. Between 2000 and 2014, the decline among children was 78%.

173. PAHO refocused its technical cooperation on HIV/STIs, prioritizing optimization of HIV care and treatment, elimination of HIV and congenital syphilis MTCT, prevention and care for key populations, and generation of broad strategic information. In these efforts, the Organization:

- a) rolled out the Treatment 2.0 initiative to improve the efficiency and effectiveness of HIV treatment and care through optimization of the use of antiretroviral drugs, expansion of access to point-of-care diagnostics, adaptation of service delivery models, and mobilization of community participation;
- b) partnered with the Global Fund to strengthen countries' capacity for procurement and supply chain management, thus reducing stockouts of antiretroviral drugs and related health products, and to create a new regional platform to monitor antiretrovirals, managed by the PAHO Strategic Fund;
- c) partnered with the U.S. CDC to help countries review and revise syphilis-testing algorithms and introduce point-of-care testing;
- d) developed a training package for health care providers on integration of gender and human rights in HIV and sexual and reproductive health services;
- e) collaborated with the Health Commission of Nicaragua's National Assembly and provided technical expertise for a national consultation, which contributed to approval by the Assembly of a new law guaranteeing the rights of persons with HIV.

Enhancing HIV treatment and care: Treatment 2.0

Treatment 2.0's ART optimization is based on the principles of rational use of antiretroviral (ARV) medicines; simplification and standardization of ARV regimens across different populations; revision of national guidelines according to the most recent scientific evidence and global WHO recommendations; innovation in drug selection; and use of fixed-dose combinations to promote adherence to lifelong treatment. Increasing access to, and use of, generic ARV medicines has lowered the costs of ART, allowing countries to scale up ART programs in response to the broader eligibility criteria recommended by WHO in 2013 and, subsequently, to adopt the "treat all" approach (initiating ART for all those infected with HIV) recommended in 2016.

PASB organized subregional consultations to prepare for implementation of the Treatment 2.0 platform, followed by Treatment 2.0 missions to 12 countries.³¹ The missions brought together technical, programmatic, and financial perspectives, and used a structured approach to identify and address barriers to the expansion and sustainability of ART programs. Mission teams had

³¹ Argentina, Bolivia, the Dominican Republic, Ecuador, El Salvador, Guatemala, Honduras, Nicaragua, Panama, Paraguay, Uruguay, and Venezuela.

staff from PASB (experts on HIV, TB, medicines and technologies, health systems, and the PAHO Strategic Fund); UNAIDS and other UN agencies; the Global Fund; bilateral partners such as the U.S. CDC, the U.S. President's Emergency Plan for AIDS Relief (PEPFAR), and USAID; and civil society. Led by national AIDS programs, the missions engaged with national TB programs; social security; procurement, planning, and finance offices; regulatory agencies; academia and other civil society representatives; professional organizations; and the private sector.

Outputs of these missions included updated treatment guidelines aligned with WHO recommendations; optimized use of ART plans for reducing the number of regimens; increasing use of fixed-dose combinations to migrate patients to the new recommended regimens; a significant increase in the use of the PAHO Strategic Fund for the procurement of ARVs and other commodities; and strengthened engagement of civil society and patient organizations.

The implementation of Treatment 2.0 represents an innovative and participatory approach to collaboration and engagement with a wider group of multisectoral stakeholders, and it has increased PASB's leadership and visibility. The Organization is now recognized as a key technical cooperation partner in ensuring countries' up-to-date approach to HIV prevention and control, especially as they prepare new proposals for the Global Fund.

174. During the reporting period, Barbados and five of PAHO's Key Countries—Guatemala, Guyana, Nicaragua, Paraguay, and Suriname—asked PASB to conduct joint technical missions or assessments to review their national response to HIV, including the care and treatment principles of the Treatment 2.0 initiative. Countries also requested a comprehensive review of, and recommendations for, their health system response to HIV/STIs. These joint missions and assessments were critical in helping countries to address the financial and technical challenges of advancing universal access to HIV services, promote innovation, and improve the quality, efficiency, effectiveness, and sustainability of HIV prevention, care, and treatment programs. As of mid-2017, Argentina, Barbados, Brazil, Canada, Mexico, Panama, Paraguay, Peru, and the United States had reviewed and adapted their guidelines to the new WHO "treat all" recommendation, and The Bahamas, Bolivia, Haiti, Jamaica, Suriname, and Trinidad and Tobago were planning to adopt this recommendation in 2017.

175. Led by PASB and UNAIDS, in 2015, Member States committed to achieving ambitious HIV prevention targets for 2030, with certain intermediate milestones to be met by 2020. Since December 2016, country assessments have been carried out, with analysis of country data, development of country fact sheets, and face-to-face "national HIV prevention day" events in Argentina, Colombia, Ecuador, Guatemala, Honduras, Nicaragua, and Paraguay. There have also been HIV prevention meetings in Brazil, Costa Rica, the Dominican Republic, Panama, and Trinidad and Tobago. This process, which enables sharing of best practices, is catalytic for national policy and strategy review in the area of HIV prevention and will result in a regional publication on HIV prevention in Latin America and the Caribbean that will be offered as a tool for policymakers and program planners.

176. In 2016, the 55th PAHO Directing Council approved the new regional Plan of Action for the Prevention and Control of HIV and Sexually Transmitted Infections 2016-2021 (Document [CD55/14](#)), which builds on the achievements of the previous regional Plan (for 2006-2015) and the 2010 Strategy and Plan of Action for the Elimination of Mother-to-Child Transmission of HIV and Syphilis. The 2016-2021 Plan urges Member States to increase and optimize their investment in the response to HIV and STIs and sets out actions to end AIDS and STIs as public health problems in the Americas by 2030. By the end of 2016, 19 countries and territories³² had developed national strategies showing alignment between national and regional targets. As of mid-2017, countries were in the process of updating the strategies that are approaching their end dates, using guidance documents from WHO, UNAIDS, and PAHO as blueprints.

Tuberculosis

177. By 2013, the Region of the Americas had already achieved and surpassed the global Stop TB Partnership targets of reducing tuberculosis cases and deaths by 50% by 2015. In 2015 there were an estimated 268,200 incident cases of TB in the Americas, equivalent to 27 cases per 100,000 population. However, multidrug-resistant tuberculosis (MDR TB) and TB/HIV coinfection remain significant challenges for the Region. TB primarily affects the poorest populations, and national data from several countries indicate a concentration of TB in large cities, where accelerated urbanization has led to the creation of urban slums where residents are highly vulnerable to the disease.

178. During the period under review, several countries implemented nationwide programs for PAHO-recommended case management of MDR TB, introduced new technologies for TB diagnosis (GeneXpert and line probe assays), and adopted special approaches to TB control in indigenous populations. Suriname adopted a new National Strategic Plan for Tuberculosis Control. A new regional center of excellence for tuberculosis was established in El Salvador to train new staff members of TB programs on implementing the Stop TB Strategy.

179. In partnership with USAID, PAHO developed an innovative framework for tuberculosis control in large cities, which seeks to involve national and local authorities in the fight against the disease. The initiative incorporates all-of-society, intersectoral approaches; attention to the social determinants of health; and social protection for persons with TB and their families. The initiative was piloted in three cities in 2014: Bogota, Colombia; Guarulhos, Brazil; and Lima, Peru. Interventions included involvement of a variety of health service providers in TB control activities; incorporation of other social actors in control activities; and integration with other programs at the primary care level. In 2016, four new cities became part of the initiative: Guatemala City, Guatemala; Tijuana, Mexico; Asuncion, Paraguay; and Montevideo, Uruguay. There are three other cities in the pipeline to join: San Jose, Costa Rica;

³² Anguilla, Antigua and Barbuda, Belize, Brazil, the British Virgin Islands, Costa Rica, Cuba, Dominica, the Dominican Republic, El Salvador, Guyana, Haiti, Mexico, Panama, Paraguay, Peru, Saint Kitts and Nevis, Suriname, and the Turks and Caicos Islands.

Santiago, Chile; and Guayaquil, Ecuador. The initiative has generated strong political commitment and active participation of authorities from different sectors, civil society, and the private sector. This commitment has translated, for the first time, into budgetary allocations of municipal funds for TB control, which encourages success and sustainability.

180. The Bureau coordinated assessments to evaluate progress toward TB elimination in member countries of the Organization of Eastern Caribbean States (OECS), with support by the Global Fund/Regional Green Light Committee. It also coordinated a meeting of the respective national TB and HIV program managers to review the assessment findings and identify ways to advance TB elimination in their countries. PASB also provided technical cooperation for the development of a regional initiative to strengthen TB laboratory networks in 20 Member States and enhance the capacity of three TB Supranational Reference Laboratory Network laboratories in the Americas, in Argentina, Chile, and Mexico. The initiative is financed by the Global Fund, and ORAS/CONHU serves as principal recipient of the regional three-year grant, which ends in December 2019. PAHO serves as a subrecipient, through an agreement signed in March 2017.

Viral hepatitis

181. The lack of robust strategic information on viral hepatitis in the Region has limited a full understanding of the burden of disease and has impeded the development of a public health response. In 2013, PAHO positioned viral hepatitis as an area of work within a newly established unit dealing with HIV, STIs, TB, and viral hepatitis. In 2015, the 54th Directing Council approved the regional Plan of Action for the Prevention and Control of Viral Hepatitis (Document [CD54/13, Rev. 1](#)). The Plan of Action builds and expands on the existing regional framework for combating viral hepatitis in the Americas. Its strategic lines are: promoting an integrated comprehensive response; fostering equitable access to preventive care; fostering equitable access to clinical care; strengthening strategic information; and strengthening laboratory capacity to support diagnosis, surveillance, and a safe blood supply.

182. In support of the implementation of the regional Plan of Action, and to address the paucity of data and information, in 2015 PAHO organized a technical consultation on strategic information, surveillance, and monitoring related to viral hepatitis. The consultation led to the publication of a monitoring framework for hepatitis B and C, including a list of recommended indicators and definitions to use in establishing systems at the country level. In 2016, PAHO organized two subregional consultations on strategic information, the first with Cuba and the countries of South America, the second with Central American countries and the Dominican Republic. The subregional events assessed and reviewed policies and practices for the development of public health responses to viral hepatitis, with a strong emphasis on strategic information and relevant systems.

183. PAHO also developed a data-mining protocol that allows countries to collect data and information that may be available, but which are widely dispersed throughout the health system. These data are used to develop baseline reports that highlight gaps and obstacles in health information systems, and to inform the development of public health responses. As of mid-2017, Argentina, Brazil, Chile, Colombia, El Salvador, Panama, Paraguay, and Peru had published reports based on the protocol, and Guatemala, Honduras, Haiti, and Jamaica were in the process of data collection and analysis. Twenty-one countries have established an organizational structure within their ministries of health to coordinate the response to viral hepatitis, and 15 have finalized a national strategy or plan for the prevention and control of the disease. In 2016, PAHO published the document *Hepatitis B and C in the Spotlight*, the first-ever report on viral hepatitis B and C in the Americas. The report gives an overview of the viral hepatitis epidemics in the Region and the health sector response, and assesses progress toward achieving the targets of the regional Plan of Action for the Prevention and Control of Viral Hepatitis.

184. The PAHO Strategic Fund supported countries' response to viral hepatitis by negotiating lower prices for the new, higher-priced direct-acting antivirals (DAAs), which have achieved treatment cure rates of over 90% for chronic hepatitis C infections. In 2017, Colombia became the first country to begin the process of purchasing DAAs through the Strategic Fund.

185. Brazil will host the second World Hepatitis Summit, in São Paulo in November 2017. The Summit is a high-level global event co-organized by WHO and the World Hepatitis Alliance to advance the public health agenda for hepatitis. PAHO is contributing to the preparations for the event, which is expected to heighten the response to hepatitis epidemics, including through enhanced political commitment and partnerships among civil society—including academia and professional associations—and public health institutions. Significant synergy with HIV programming is expected to offer a suitable platform for the unfolding public health response.

Advancing prevention and control of malaria and neglected infectious diseases

Working for malaria elimination

186. Though malaria remains endemic in 21 PAHO Member States, several countries attained the MDG 6 target of reducing the incidence of, and deaths from, the disease, with more than a 62% reduction in cases and a 61% reduction in deaths over the 2000-2015 period. However, an increased number of cases were reported in seven countries in 2015—Colombia, the Dominican Republic, Guatemala, Honduras, Nicaragua, Peru and Venezuela—leading them to update their malaria strategic plans, strengthen their malaria surveillance systems, and improve their rapid response capacity.

187. The Bureau officially engaged as a partner in the Haiti Malaria Elimination Consortium, launched in February 2015 with a grant from the Bill & Melinda Gates

Foundation to support malaria elimination in the island of Hispaniola. The Consortium includes the U.S. CDC (lead agency), PAHO, the Carter Center, the Clinton Health Access Initiative, the London School of Hygiene and Tropical Medicine, and Tulane University's Center for Applied Malaria Research and Evaluation. The Consortium's work will contribute to meeting the targets of the malaria elimination initiative and the binational Haiti-Dominican Republic plan to eliminate malaria and lymphatic filariasis from Hispaniola by 2020.

188. The Guiana Shield, which includes northern Brazil, a small part of eastern Colombia, French Guiana, Guyana, Suriname, and Venezuela's Bolivar and Amazonas states, is known for its gold reserves. Mining is a major source of employment, with cross-border movement in areas that favor malaria transmission, but provide limited access to health services. The Guiana Shield countries strengthened cross-border coordination of their malaria control methods, and, as a result of increasing malaria incidence in Guyana and Venezuela, PAHO promoted a strategic framework that emphasizes the risk for emergence and spread of antimalarial resistance in this region and that supports the elimination of *Plasmodium falciparum* malaria. In French Guiana, PAHO also collaborated closely with the Pasteur Institute, which was designated as a WHO Collaborating Center for Malaria.

189. Member States officially adopted the Plan of Action for Malaria Elimination 2016-2020 (Document [CD55/13](#)) during the 55th PAHO Directing Council in September 2016. By mid-2017, 20 of the 21 malaria-endemic countries in the Region had expressed their commitment to eliminate malaria, and 14 had developed corresponding national malaria elimination plans or road maps. The malaria elimination certification process in Argentina began in 2015, and in Paraguay in 2016. Six other countries—Belize, Costa Rica, Ecuador, El Salvador, Mexico, and Suriname—are among 21 countries worldwide that are considered to have the potential to achieve zero indigenous malaria cases by 2020.

190. PAHO has observed Malaria Day in the Americas in November of each year since 2007, to promote awareness, recognize past and current efforts, build commitment, and mobilize action toward elimination of the disease. The Organization has also recognized and promoted malaria "best practices" through its Malaria Champions of the Americas contest, carried out in coordination with the UN Foundation, the Milken Institute School of Public Health at the George Washington University, the Center for Communication Programs at the Johns Hopkins University Bloomberg School of Public Health, and the Global Health Consortium at Florida International University's Stempel College of Public Health and Social Work. The winners and top finalists of the contest are announced on Malaria Day in the Americas, highlighting their country-level innovations.³³ The countries honored have included Brazil, Colombia, and the Dominican Republic in 2013; the Dominican Republic, Guatemala, and Honduras in 2014; Brazil and Honduras in 2015; and Costa Rica, El Salvador, and Suriname in 2016.

³³ Information on Malaria Champions is available at <http://www.paho.org/campeonesmalaria/?lang=en>.

191. Despite many advances, malaria transmission increased in a few countries during 2016, especially Colombia, Ecuador, Nicaragua, and Venezuela. This was driven primarily by environmental, social, political, and economic conditions in the affected areas—and confirms the fragility of achievements. Malaria elimination efforts are especially challenged by difficulties related to the ability to reach mobile populations, border communities, and other vulnerable groups; the effects of emergencies, disasters, and epidemics; and issues pertaining to drug shortages and supply chain management.

Mobilizing resources from the Global Fund to Fight AIDS, Tuberculosis and Malaria

192. A key area of PAHO's technical cooperation with Member States in infectious disease prevention and control is the mobilization of resources from the Global Fund. For the 2014-2016 funding cycle, 37 funding proposals were submitted to the Global Fund from the Region of the Americas, all of which were approved. This provided US\$ 626 million in new resources for the Region to fight HIV, TB, and malaria. The funding contributed to, among other interventions, efforts in three of the Organization's Key Countries: in Haiti, decreasing the high prevalence of HIV and TB; in Honduras, reducing locally transmitted malaria cases and achieving zero cases of *P. falciparum* malaria by 2017; and in Suriname, improving and expanding malaria diagnosis, treatment, and surveillance, especially in mining areas. By April 2017, seven new proposals from six countries were submitted to the Global Fund to address specific challenges related to HIV (Cuba, Guyana, Nicaragua, and Paraguay), HIV/TB (Haiti), and malaria (Haiti and Honduras).

193. PAHO's technical cooperation addressed epidemiological assessment, country program review, programmatic and financial gap analysis, and development of national strategic plans, with ongoing support for the implementation phase of these proposals based on specific country needs. PASB played a critical role in coordinating stakeholders and ensuring the technical soundness of a concept and final proposal for the Elimination of Malaria in Mesoamerica and the Island of Hispaniola (EMMIE). Under this Global Fund-supported regional initiative, Belize, Costa Rica, the Dominican Republic, El Salvador, Guatemala, Haiti, Honduras, Nicaragua, and Panama—four of these being PAHO Key Countries—benefited from seed funding to accelerate malaria elimination. The Bureau organized a second round of malaria data verification missions in the nine participating countries and noted an overall improvement in the quality of surveillance systems in most of them; a second EMMIE grant was approved in 2016.

194. Under the Global Fund's "Investing to End Epidemics" strategy for 2017-2022, the 17 eligible countries of Latin America and the Caribbean will be able to access new funding representing a total of US\$ 303.3 million during 2017-2019. However, 8 countries—Belize, Costa Rica, Cuba, the Dominican Republic, El Salvador, Panama, Paraguay, and Suriname—will be transitioning out of Global Fund eligibility during the same period. PAHO's technical cooperation will contribute to the identification and mobilization of replacement resources to maintain the achievements in these countries.

Eliminating neglected infectious diseases

195. During the period under review, several countries launched new national plans of action and interventions for the control and elimination of neglected infectious diseases (NIDs):

- a) Haiti treated nearly 8 million people for lymphatic filariasis, which represents about 60% of the total population at risk for this disease in the Americas. At the end of 2016, 46 communes (population, 3.1 million) in that country met the criteria to stop mass drug administration and entered the surveillance phase for elimination.
- b) By 2016, Brazil and the Dominican Republic had also interrupted transmission of lymphatic filariasis in most of their original endemic areas, and only one of several foci remained active in both countries.
- c) In July 2017, a PAHO mission to Guyana verified considerable progress towards elimination of lymphatic filariasis and provided recommendations to accelerate current efforts.
- d) Colombia launched a new campaign to provide surgery to correct trachomatous trichiasis (trachoma-induced ingrown eyelash) and prevent blindness, and to accelerate the elimination of trachoma. In 2015 and 2016, other transmission foci were discovered in indigenous populations in the Amazon region, and the SAFE strategy (surgery, antibiotics, facial cleanliness, and environmental improvement) has been implemented, with PAHO's technical cooperation.

196. Several countries developed action plans for the control of geohelminths, and Honduras and Paraguay, two of PAHO's Key Countries, launched mass deworming campaigns, while Brazil implemented a campaign targeting school-age children to treat geohelminths, detect and treat early signs of leprosy, and detect trachoma in high-risk children. In 2014, 8.7 million pre-school-age children (67% of the at-risk population) were treated for geohelminths in 9 countries, and 27.2 million school-age children (81% of the at-risk population) were dewormed in 12 countries. Ten countries regularly receive donations of deworming drugs from WHO, supported by PAHO. PAHO also provided technical cooperation to document schistosomiasis elimination in selected Caribbean countries.

197. PASB combined its expertise in neglected infectious and vaccine-preventable diseases to support integration of deworming for geohelminths into immunization activities during Vaccination Week in the Americas 2014. As a result, Honduras implemented its first national campaign to deworm and vaccinate children, and Nicaragua integrated a new component for rapid coverage monitoring into its ongoing campaign for deworming and vaccination, targeting children under 5 years of age. Suriname's EPI plan for 2017-2021 includes geohelminth control, and related activities will be implemented in tandem with the immunization program, within the framework of the Integrated Health Systems in Latin America and the Caribbean Project (2016-2019). The Integrated Health

Systems initiative is the result of a partnership between PAHO and Canada's Department of Foreign Affairs, Trade and Development (DFATD).

198. Human rabies case numbers have been falling since the establishment of the regional program for dog-mediated rabies elimination in 1983. During the period under review, PASB's technical cooperation contributed to strengthening laboratories for diagnosing rabies in Brazil, Chile, Colombia, the Dominican Republic, Ecuador, Haiti, and Peru, through training and the establishment of a new network of rabies diagnostic laboratories. The Bureau also cooperated with the Dominican Republic and Haiti to update their programs to control dog-transmitted rabies. In 2016, 12 cases of dog-mediated human rabies were reported by three countries in Latin America and the Caribbean (Bolivia, Guatemala, and Haiti).

199. PAHO's technical cooperation further contributed to improved capacities for rabies control as a result of agreements reached at several key events: a meeting of the directors of rabies programs of the Americas; a workshop on rabies surveillance, prevention, and control in which Central American countries participated; and the launch of the rabies control plan for the Andean Subregion, which prioritized Bolivia, a PAHO Key Country. With technical cooperation from PAHO's Pan American Foot-and-Mouth Disease Center (PANAFTOSA), the surveillance, prevention, and control of rabies in both humans and animals have been strengthened in 18 countries.³⁴ PASB's technical cooperation is contributing to strengthening national mass dog vaccination campaigns in El Salvador, Guatemala, and Nicaragua. In Haiti, access to human postexposure prophylaxis treatment has improved through training of health workers, provision of treatment guidelines, and donation of human rabies vaccines by Brazil and Paraguay, in an expression of solidarity and Pan Americanism.

200. During the 55th PAHO Directing Council in 2016, Member States endorsed the Plan of Action for the Elimination of Neglected Infectious Diseases and Post-elimination Actions 2016-2022 (Document [CD55/15](#)), which provides the overarching framework and political mandate for work to control and prevent NIDs in the Region during that period. An ongoing challenge, however, is the limited political commitment to achieve specific NID control and elimination targets in certain countries.

Intervening for cholera elimination in Hispaniola

201. In January 2010, a devastating earthquake rocked Haiti. Ten months later, the country experienced one of the largest cholera epidemics in modern history. Cholera transmission in Hispaniola has slowed significantly since the epidemic's early stages, but Haiti and the Dominican Republic continue to battle the disease. In early 2012, the President of Haiti and the President of the Dominican Republic committed to activities that could lead to cholera's elimination in Hispaniola. With technical support from

³⁴ Belize, Bolivia, Brazil, Chile, Colombia, Costa Rica, the Dominican Republic, Ecuador, El Salvador, Guatemala, Haiti, Mexico, Nicaragua, Panama, Paraguay, Peru, Uruguay, and Venezuela.

PAHO, UNICEF, and the U.S. CDC, the two leaders issued a call to action for a cholera-free Hispaniola. Haiti's Ministry of Public Health and Population and its National Directorate for Water Supply and Sanitation (DINEPA), in collaboration with PAHO, UNICEF, and the U.S. CDC, developed a National Plan for the Elimination of Cholera in Haiti 2013-2022. The National Plan highlights four areas of action: water and sanitation, epidemiological surveillance, health promotion for behavior change, and care of infected persons in health institutions. PASB's technical cooperation addressed cholera control and elimination from the start, and included direct collaboration between the PAHO/WHO offices in Haiti and the Dominican Republic, mobilization of resources, and facilitation of additional technical assistance through the Regional Coalition for Water and Sanitation to Eliminate Cholera in the Island of Hispaniola, for which PASB serves as the secretariat. PAHO has supported the characterization of cholera dynamics in Haiti through the enhancement of surveillance capacities. The objective is to strengthen targeted interventions, including use of oral cholera vaccine, awareness-building in the population; and water and sanitation activities.

Regional Coalition for Water and Sanitation to Eliminate Cholera in the Island of Hispaniola

The Regional Coalition for Water and Sanitation to Eliminate Cholera in the Island of Hispaniola was created in June 2012 by PAHO, in partnership with UNICEF, the U.S. CDC, AECID, and the Inter-American Association of Sanitary Engineering (AIDIS).

The Coalition was launched at AIDIS's 33rd Congress in Bahia, Brazil, and its creation was a response to the 2012 "call to action" by the Government of Haiti and the Government of the Dominican Republic for the international community to mobilize resources for major new investments in water and sanitation, aimed at eliminating cholera. With technical cooperation from the Coalition, both countries developed detailed national plans of action for eliminating cholera by 2022. Haiti's plan calls for US\$ 2.2 billion in investments over 10 years, including US\$ 443.7 million for the first two years, while the Dominican Republic's plan calls for US\$ 77 million in investments over 10 years, including US\$ 33 million for the first two years.

Reported cases of cholera in Haiti declined from a high of 340,311 in 2011 to 58,809 in 2013 and 41,421 in 2016, an overall reduction of 87.8%. Due to improved detection and rapid treatment, the case-fatality rate decreased from 2.2% at the start of the epidemic in 2010 to 1.1% in 2016. The number of reported cases showed a similar trend in the Dominican Republic, from 20,851 in 2011 to 1,954 in 2013 and 1,159 in 2016. However, the case-fatality rate was 1.6% in 2011, and was reported as 2.3% in 2016, causing concern regarding the management of persons with the disease.

202. In 2014, PAHO provided technical cooperation for a cholera vaccination campaign in six Haitian communes considered at high risk of cholera, and for a Total Sanitation Campaign launched in several communes by the Haitian Government and former UN Secretary-General Ban Ki Moon. The Organization also partnered with UNICEF to convene a meeting of global cholera experts and officials from Haiti's Ministry of Public Health and Population and DINEPA. Technical discussions concluded

that cholera elimination may be achieved within 10 years and that it is crucial to increase investments for expansion of water and sanitation coverage in urban and rural areas.

203. PASB facilitated technology transfer of an innovative water quality monitoring system known as SIS-KLOR (Residual Chlorine Surveillance System) from Haiti to the Dominican Republic and Colombia. This low-cost mobile technology system uses Short Message Service (SMS) text messaging to convey real-time information collected by teams responsible for obtaining and evaluating water samples. SIS-KLOR can be used in remote and difficult-to-access areas, and was one of the innovations that grew out of the response to Haiti's 2010 earthquake, through partnerships among PASB, DINEPA, the Ministry of National Education and Vocational Training, UNICEF, and various NGOs.

Progress in addressing the animal health-human health interface

204. The 17th Inter-American Meeting at the Ministerial Level on Health and Agriculture (RIMSA 17) was held in Paraguay in 2016, with the theme of "One Health and Sustainable Development Goals." The nexus between animal health and public health in diverse ecosystems is fully expressed in the concept of "One Health," which requires intersectoral, interprogrammatic, and interdisciplinary governance of initiatives to promote and protect the health of people, animals, and the environment in an integrated manner. RIMSA 17 analyzed veterinary public health issues in the field of food safety, the eradication of foot-and-mouth disease (FMD) in the Americas, and the prevention and control of zoonotic diseases. RIMSA 17 also accepted recommendations to adopt the "One Health" approach for issues related to the interface between human and animal health. Such an approach is essential to the prevention and control of diseases, and to the mitigation and containment of antimicrobial resistance.

205. The year 2016 marked the animal health milestone of four consecutive years in the Americas without FMD, a debilitating and often-fatal livestock disease. In 2015, Bolivia, Ecuador, and Paraguay received formal recognition of their FMD-free status from the World Organization for Animal Health (OIE). They joined Peru, which achieved that status in 2012. Brazil and Suriname are expected to receive their FMD-free recognition in 2018. The continued absence of FMD attests to the success in the Americas of the Hemispheric Program for the Eradication of Foot and Mouth Disease (PHEFA). However, the June 2017 outbreak of the disease in Colombia demonstrates the ongoing risk of virus circulation in the Region and the need to strengthen national vaccination programs focusing on at-risk cattle populations. PANAFTOSA developed, field-tested, and promoted risk-based surveillance strategies aimed at increasing the detection threshold for FMD, while ensuring efficient use of resources. The innovative risk-based strategies, which also target influenza, are important tools for countries' decision-making in managing risks to public health that arise at the human-animal-environment interface. By strengthening country capacity to rapidly detect and report public health risks, these new tools are also contributing to the achievement of core capacities for implementation of the IHR.

206. PANAFTOSA established a FMD vaccine and antigen bank at the request of the South American Commission for the Fight against Foot-and-Mouth Disease (COSALFA). PANAFTOSA also moved its UN Food and Agriculture Organization (FAO)/OIE reference laboratory for FMD to Brazil's National Agricultural Laboratory in Minas Gerais. In order to ensure continued support for FMD eradication, including the coordination of the PHEFA Action Plan for 2011-2020, PAHO established a trust fund as an additional financing mechanism. PANAFTOSA has contributed to improved surveillance, preparedness, and response related to high pathogenic avian influenza, hydatidosis (cystic echinococcosis), and epizootics of nonhuman primates and vectors for yellow fever in the Region.

207. Bolivia, Panama, Peru, Uruguay, and Venezuela strengthened their laboratory capacity for analysis of food-borne pathogens. In addition, a South-South cooperation project involving Brazil, Colombia, and Cape Verde, as well as a North-South cooperation project between Canada and Caribbean countries, were expanded to include strengthening of food safety, along with capacity-building for evaluating microbiological and chemical risks.

208. In the Caribbean, PASB coordinated with the University of the West Indies, the Inter-American Institute for Cooperation on Agriculture (IICA), and FAO to launch the "One Health Leadership Series." The Series is a capacity-building program that promotes cross-sector action by bringing together professionals from the health, agriculture, and environmental sectors. The program is based on the CARICOM "One Health" policy, which was developed by PAHO and FAO and ratified by the CARICOM ministers of health and ministers of environment in 2014 and 2015, respectively. The policy and leadership series address health issues at the human-animal-environment interface, including food safety and security, tourism, zoonotic diseases, water supply and quality, and climate change.

Containing antimicrobial resistance

209. The Region of the Americas has been a pioneer in confronting antimicrobial resistance (AMR) from a public health perspective. PASB's technical cooperation has included strengthening laboratory-based surveillance of AMR; promoting appropriate use of antimicrobials; strengthening infection prevention and control practices; promoting integrated AMR surveillance; and improving regulatory processes. However, in recent decades the AMR situation has worsened due to inappropriate use of antimicrobial drugs in human and veterinary medicine, lack of preventive and control measures for health care-associated infections, and failure to develop new antimicrobial drugs. It became evident that more work would be needed to make an impact on AMR containment and to quantify the impact.

210. In 2015, PASB presented the regional Plan of Action on Antimicrobial Resistance (Document [CD54/12, Rev. 1](#)) to the 54th Directing Council. That Plan of Action was based on WHO's global action plan on antimicrobial resistance (WHO documents

[A68/20](#) and [A68/20 Corr.1](#)) approved at the 68th World Health Assembly in 2015; work done in the Region since the 1990s; contributions from experts within and outside the Organization; results of consultation and intersectoral dialogue; and contributions from various ministries of health in the Region. Directing Council Resolution [CD54.R15](#) approved the Plan of Action on AMR and called on Member States to renew their commitment to develop and implement national action plans to address AMR; establish effective AMR surveillance systems; and promote the appropriate and responsible use of antimicrobial drugs. The resolution also asked that PASB consolidate and expand collaboration with FAO and OIE to combat AMR in accordance with the “One Health” initiative, and apply multidisciplinary and intersectoral approaches in its technical cooperation with Member States, taking into consideration health promotion, human rights, gender equality, universal access to health, and universal health coverage.

211. All the countries in the Region have AMR laboratory-based surveillance. In addition, Canada and the United States are enrolled in the Global Antimicrobial Surveillance System program managed by WHO, and Argentina, Brazil, and Nicaragua are in process of enrolling in the program. Laboratory assessments for AMR detection and notification have been conducted in Barbados, Belize, Grenada, Saint Vincent and the Grenadines, and Suriname. With Canada’s support, pilot projects on AMR integrated surveillance have been developed in Belize, Grenada, and Guyana.

212. PAHO’s technical cooperation in AMR focuses on the development of national action plans that are aligned with the global and regional plans of action and that emphasize multisectoral action among the health, animal, and agriculture sectors, within the “One Health” approach. In January 2017, PASB collaborated with the Global Health Consortium at Florida International University to convene a Regional Expert Consultation on Monitoring and Evaluation of AMR Interventions in Washington, D.C. The experts reviewed country-specific strategies for AMR monitoring and proposed preliminary output indicators for monitoring and evaluating AMR awareness, surveillance, containment, and economically sustainable AMR research, in line with the 2015 WHO global action plan on antimicrobial resistance.

6. REDUCING THE BURDEN AND IMPACT OF CHRONIC NONCOMMUNICABLE DISEASES AND THEIR RISK FACTORS

213. Noncommunicable diseases are the leading causes of illness, disability, and death in the Americas. They account for 79% of all deaths in the Region, and 35% of those deaths are premature, that is, they occur in persons aged 30 to 69 years. PASB's technical cooperation facilitated advocacy by countries of the Caribbean, which had long recognized the need to address these disorders. This work helped bring NCDs to global attention and contribute significantly to events that led to the 2011 UN High-level Meeting on the Prevention and Control of Non-communicable Diseases and the Meeting's resulting Political Declaration.

214. In 2012, the 28th Pan American Sanitary Conference approved the regional Strategy for the Prevention and Control of Noncommunicable Diseases (Document [CSP28/9, Rev. 1](#)), which was aligned with the WHO Global Strategy for the Prevention and Control of Noncommunicable Diseases. Following the adoption in 2013 of the WHO Global Action Plan for the Prevention and Control of Noncommunicable Diseases 2013-2020, PAHO launched its regional Plan of Action for the Prevention and Control of Noncommunicable Diseases (Document [CD52/7, Rev. 1](#)), which is adapted to the Region's needs and guides the Organization's technical cooperation in this area.

215. Like the global frameworks, PAHO's regional strategy and plan of action emphasize the four highest-burden NCDs in the Americas—cardiovascular diseases (CVDs), cancer, diabetes, and chronic respiratory diseases—and their four main risk factors: tobacco use, unhealthy diet, physical inactivity, and harmful use of alcohol. The frameworks seek to raise the profile of NCDs in countries' development and economic agendas and to promote whole-of government, health-in-all-policies, whole-of-society approaches, with a multisectoral response to NCDs that involves government, civil society, and the private sector.

Combating NCDs and their risk factors

Policies, plans, and programs

216. During the reporting period, PAHO's technical cooperation contributed to:

- a) Development or revision of national multisectoral NCD policies, strategies, or plans in Antigua and Barbuda, Belize, Costa Rica, Dominica, Ecuador, Guyana, Nicaragua, Panama, Paraguay, Saint Kitts and Nevis, and Suriname.
- b) Integration of new or enhanced programs for NCD care into national health services. Dominica, Saint Lucia, Saint Vincent and the Grenadines, and Suriname launched programs for integrated management of chronic diseases focused on

- primary care, while Colombia, Ecuador, Jamaica, Mexico, and Peru developed new programs specifically for the prevention and control of cancer.
- c) Improvement in self-management of chronic diseases, through implementation of the Chronic Care Passport, a patient-held booklet that fosters adherence to medication, encourages self-care and prevention, and facilitates NCD data collection; capacity-building in diabetes self-management through an online course offered by the PAHO VCPH; and implementation of the Chronic Disease Self-Management Program (CDSMP). The CDSMP consists of peer-led, community-based workshops that empower older adults to manage their chronic conditions in coordination with health care teams, and to remain active members of society. Evidence indicates that participants improve their health status, health behavior, and self-care, and make fewer emergency room visits. The model was adapted by CARICOM to better address the needs of Caribbean countries, and implementation of that chronic care model is included in the NCD strategies or action plans of several CARICOM countries. The CDSMP has been rolled out in all Eastern Caribbean countries and has been well integrated into health services at all levels. The experience has been documented and presented to Brazil, Chile, Peru, and the United States to promote cooperation among countries.
217. PAHO launched the SaltSmart Consortium and the Women's Cancer Initiative within the framework of the Pan American Forum for Action on NCDs (PAFNCD):³⁵
- a) The SaltSmart Consortium brings together government health and nutrition experts, civil society (including universities), and industry representatives. The Consortium endorsed a multiyear plan to cut dietary salt consumption in the Americas in half by the year 2020. It includes campaigns to raise public awareness of the importance of salt reduction and steps to reduce salt in industrially processed foods. In 2014, the Consortium produced a series of principles and specific targets to guide efforts in the Region to reduce the amount of salt in a variety of foods. Antigua and Barbuda, Barbados, and Saint Vincent and the Grenadines have been implementing a salt reduction project that uses a social marketing approach to target young mothers with school-age children. In 2017, technical teams from Brazil, Costa Rica, Paraguay, and Peru were trained to use social marketing strategies to reduce discretionary salt intake.
- b) The Women's Cancer Initiative is the result of a partnership between PAHO and leading global and regional cancer prevention organizations. The Initiative is committed to reducing breast and cervical cancers, the leading cancers among women in Latin America and the Caribbean. The three-year Initiative began in 2013, and activities were implemented at the regional level and in countries that included Argentina, Bolivia, Chile, Costa Rica, Ecuador, El Salvador, Guatemala, Peru, Saint Kitts and Nevis, and Saint Vincent and the Grenadines. The Initiative

³⁵ PAFNCD was established by PAHO in 2009 as an open platform to help address the NCD epidemic in the Americas, enable an all-of-society approach, and promote and contribute to the implementation of the regional Strategy for the Prevention and Control of Noncommunicable Diseases.

addresses advocacy and communication; capacity-building for detection, diagnosis, treatment, and care; improved access to services and treatment; wider vaccination against HPV; and expanded research. PASB has prepared an analysis and report on progress in cervical cancer prevention and control to be discussed during the 29th Pan American Sanitary Conference in September 2017.

Innovations in technology for cervical cancer screening

Cervical cancer is highly preventable, and PASB has been advancing the application of a new technology, HPV testing, to improve the effectiveness of screening programs, as well as HPV vaccines to prevent cervical cancer.

In 2013, PAHO and WHO issued new evidence-based guidelines on cervical cancer screening, which included the use of HPV testing as a primary screening tool. The Bureau organized multistakeholder policy dialogues in Costa Rica, Ecuador, El Salvador, Guatemala, and Nicaragua to disseminate the new evidence and discuss policy changes. This led to the development and rollout, with PASB support, of new national policies and plans supporting screening programs based on HPV testing.

The Bureau also led demonstration projects on HPV testing in Chile, Saint Kitts and Nevis, and Saint Vincent and the Grenadines, and has prepared a program guide on planning, implementation, and evaluation of screening programs that incorporate HPV testing, building on experiences in low- and middle-income settings.

PASB facilitated a series of events to exchange scientific information and share country experiences, including a regional meeting with stakeholders from 20 countries and six international organizations, and a public-private sector dialogue with HPV test manufacturers on how to make the tests more affordable and accessible. As a result of that dialogue, the Bureau established criteria and standards for selecting HPV tests and has collaborated with the WHO Prequalification of Medicines Program for these tests to be included in the PAHO Strategic Fund, in order to allow Member States to purchase them at affordable prices.

Legislation and regulation

218. Legislative and regulatory initiatives have major roles to play in NCD prevention and control, particularly in addressing NCD risk factors. Reducing exposure to tobacco, unhealthy foods, and alcohol, and enabling physical activity by “making the healthy choice the easy choice” have been shown to be very cost-effective in reducing NCDs. Fiscal policies, such as increasing excise taxes on harmful products, can discourage the consumption of these products and decrease health costs, while generating new revenues that can be used for health interventions. Over the period under review, PAHO’s technical cooperation contributed to the development of several legislative and regulatory initiatives in the countries of the Region.

219. PAHO implemented its REGULA Initiative, which is aimed at enhancing countries’ abilities to develop and implement legislative, regulatory, and fiscal measures for NCD risk factor reduction. The Initiative builds on ongoing technical cooperation for

implementation of effective measures aimed at curbing tobacco use and the harmful use of alcohol, and promotion of healthy eating and physical activity. These measures include introducing or increasing taxes on tobacco, alcohol, and sugar-sweetened beverages (SSBs); price incentives for healthy food products; effective nutrition labeling; health warnings for tobacco and food products; and restrictions on marketing of harmful products, including a complete ban in the case of tobacco. As part of its work under this Initiative, the Bureau developed a technical reference document and convened a group of experts from Brazil, Canada, Chile, Colombia, Mexico, Peru, and the United States to review the document and propose lines of action for technical cooperation in this area. The group identified four key lines of action for the Bureau: *a)* ongoing surveillance of NCD risk factors and evaluation of regulatory processes; *b)* development of organizational structures, financing, and processes for regulatory entities; *c)* development of technical expertise on controlling NCD risks; and *d)* promotion of research on the effectiveness of, and best practices in, regulatory action to reduce NCD risks. Through a grant from the OPEC Fund for International Development, the Initiative is currently focusing on activities in Bolivia, Guatemala, and Honduras, three of PAHO's Key Countries.

Tobacco control

220. Several countries continued on the path to implementation of the WHO Framework Convention on Tobacco Control (FCTC):

- a) In 2013, Suriname enacted strong tobacco control legislation, banning the smoking of tobacco products in all indoor public places and workplaces, providing rules on the packaging and labeling of cigarettes, and banning all forms of tobacco advertising, promotion, and sponsorship.
- b) In 2016, Colombia enacted Law 1819/Tax Reform, which modified Law 223 of 1995, increasing tobacco taxes from the previous level of 659 pesos per 20-unit pack to 1,400 pesos per 20-unit pack in 2017 and to 2,100 pesos per 20-unit pack in 2018. The law also introduced a progressive increase in the specific component of tobacco taxes, which, from 2019, will be adjusted to the consumer price index plus four points.
- c) In 2016, Peru's Ministry of Economy and Finance approved, by Presidential Decree No 112-2016-EF, a 157% increase in the excise tax on tobacco products, from 0.07 to 0.18 Peruvian soles per cigarette.
- d) In January 2017, Barbados passed legislation to ensure that e-cigarettes are subject to the same controls and health warnings on packaging as regular cigarettes.
- e) In June 2017, Guyana had the first reading in the National Assembly of the Tobacco Control Bill 2017, aimed at preventing public exposure to secondhand smoke and banning advertising of tobacco products, including e-cigarettes.

221. In 2013 and 2014, respectively, Nicaragua and Uruguay became the world's first two countries to ratify the new WHO Protocol to Eliminate Illicit Trade in Tobacco Products. In 2015, Ecuador became the third country, followed by Panama in 2016 and Costa Rica in 2017. The Protocol, which is supplementary to the FCTC but also a new treaty in itself, sets out measures to fight the illegal tobacco trade. These include licensing, tracking, and tracing tobacco products, as well as monitoring and regulating tobacco sales. The Protocol also promotes international cooperation, including extradition of suspected participants in the illicit tobacco trade. The Internal Revenue Service of Ecuador developed a tracking and tracing system for tobacco products (and alcoholic beverages, including beer), which has been operational since March 2017. Ecuador has collaborated with other countries interested in implementing similar systems as part of South-South cooperation, through the Latin American Intersectoral Network on Fiscal Policies for Tobacco Control.

222. The Bureau organized subregional workshops on tobacco and trade, where officials from ministries of health and finance worked together to develop fiscal scenarios for amending their tobacco tax structures to meet both health and revenue targets. The workshops in Central and South America led to the development of proposals for tobacco tax increases in Colombia and Peru and to the creation of subregional networks to discuss tax harmonization and strategies to eliminate illicit trade in tobacco products.

223. In 2017, Colombia and El Salvador were the only two countries from the Region of the Americas selected to participate in the FCTC Project 2030, among 15 countries selected globally. The FCTC Secretariat developed the project to support Parties to the WHO FCTC that are eligible to receive official development assistance. The project, which runs from April 2017 to March 2021, will contribute to achievement of the SDGs by advancing implementation of the FCTC and supporting its incorporation into national health and development agendas.

Healthy nutrition, physical activity, and prevention of overweight and obesity

224. Thirteen countries³⁶ passed laws and/or implemented national policies or regulations to promote healthy nutrition and physical activity in accordance with PAHO/WHO guidelines. The measures include taxes on SSBs; restrictions on the marketing of unhealthy food and beverages to children; provision of healthy school meals; and requirements for labeling industrially processed foods, in order to confront the growing problem of overweight and obesity in both children and adults. Paraguay approved new regulations to reduce the salt content of industrially produced bread, and Argentina passed a sodium reduction law (Act 26905), which entered into force in December 2014.

³⁶ Barbados, Bolivia, Brazil, Canada, Chile, Colombia, Costa Rica, Dominica, Ecuador, Mexico, Paraguay, Peru, and Uruguay.

Taxes on sugar-sweetened beverages

Mexico has the world's highest per capita soda consumption and one of the highest rates of death from diabetes. In response, the country approved a new law in 2013 establishing taxes on SSBs, as a public health measure to reduce demand. The law mandates a tax of 1 peso per liter on sugary beverages, in both liquid and powdered form, and an 8% tax on energy-dense hyperprocessed foods ("junk food"). It also includes new restrictions on advertising unhealthy food products to children, as well as new requirements for food labeling.

This groundbreaking achievement in Mexico was the result of joint efforts by the Ministry of Finance, the Ministry of Health, the federal Congress, academia, civil society, and international organizations. PASB supported advocacy for the legislation by organizing three special forums with the participation of international experts and policymakers: an "economic forum," a "legislation forum," and a "media forum." In addition, the Bureau compiled scientific evidence, developed fact sheets on the use of fiscal policies to modify consumption patterns in favor of healthier choices, and facilitated dialogue between the Government and civil society. The revenues generated by the new taxes will be used to provide safe drinking water in schools throughout Mexico.

In 2014, PASB published a report, *Taxes on Sugar-sweetened Beverages as a Public Health Strategy: The Experience of Mexico*, which documents Mexico's efforts and describes how supporters of the tax initiative were able to overcome the active opposition of the soft drink industry and its allies. The report cites preliminary results of a study conducted jointly by Mexico's National Institute of Public Health (INSP) and the University of North Carolina at Chapel Hill (United States), which found an average 6% reduction in sales of the taxed beverages during the tax's first year, as compared with the previous year. Further assessment found a 10% decline in the second year, for an average of 8% over the two-year period.

Mexico's experience has informed similar efforts in Barbados, Chile, Dominica, and Ecuador, which all implemented SSB taxes between 2014 and 2016. As of mid-2017, Jamaica banned the provision of SSBs with government-provided school lunches, and Trinidad and Tobago banned the provision or sale of SSBs in and around government or government-supported schools, and both countries are considering imposing SSB taxes.

Harmful use of alcohol

225. PASB brought together experts on alcohol marketing and regulation from countries in the Americas and Europe, and from Australia, India, and South Africa, to review evidence on the effects of alcohol marketing, particularly on young people, and on the effectiveness of voluntary, as opposed to statutory, regulation. The experts concluded that alcohol advertising and promotion should be regulated, monitored, and evaluated by governments independently of the alcohol industry and that comprehensive bans on alcohol marketing are most effective. They called on the Bureau to provide guidance to Member States in developing and enacting legislation in this regard. In 2017, PASB published a technical note detailing the evidence for alcohol marketing regulation and key elements for developing and implementing effective legislation, including the use of human rights principles and standards to protect children and other vulnerable groups.

226. The Bureau undertook technical cooperation with Chile, Colombia, Costa Rica, Ecuador, Grenada, Jamaica, Paraguay, Peru, Saint Kitts and Nevis, and Suriname in the development or strengthening of national alcohol policies and plans, promoting population-based measures as the core of national alcohol-related activities. The national interventions were complemented by a subregional workshop on alcohol policy development and health-related law held in Belize for Central American countries. Another measure was the inclusion of the topic of prevention of harmful use of alcohol in REGULA subregional workshops on fiscal policies and the investment case for NCD prevention and control.

Countering industry resistance

227. Following the introduction of legislation and regulations, there has been resistance and “pushback” from the producers and purveyors of the products deemed harmful to health. These efforts have ranged from attempts to influence the public and government officials to legal action to block implementation of the measures. In response to requests from Member States, the Bureau provided support not only in the technical aspects of effective legislation and regulations, but also in countering industry tactics. The support included:

- a) Chile: Collaboration between PAHO/WHO and FAO country offices to counter industry attempts to block implementation of new regulations requiring front-of-package warning labels on processed foods high in sugar, salt, or saturated fat, and provision of arguments to counter questions from the alcohol industry on PAHO/WHO data on alcohol consumption and harms.
- b) Costa Rica: Provision of arguments to the Minister of Health on perceived conflicts of interest related to the participation of alcohol industry representatives on a commission tasked with reviewing and approving alcohol advertising. The proposed industry participation was deemed unconstitutional and was blocked.
- c) Ecuador: Submission of an amicus brief³⁷ defending regulations requiring front-of-package nutrition labeling for processed foods.
- d) Jamaica: Assistance to the Ministry of Health in defending new tobacco control measures against industry opposition, including through advocacy at the prime ministerial level, and commission of a study on the effect of the alcohol trade on tourism and the perceived impact of alcohol taxation. The study demonstrated that tourism is not perceived as a barrier to alcohol taxation.
- e) Peru: Provision to the Congress’ health committee and the Minister of Health of written support from the Director for legislation on healthy food for children and adolescents, and provision of evidence by the Bureau’s technical experts to inform discussions about new regulations to implement the law. PAHO also

³⁷ Amicus briefs are legal documents filed in court cases by someone who is not a party to an action, but who has a strong interest in the matter. The briefs advise the court of relevant, additional information or arguments that the court might wish to consider.

- supported the provision of expert evidence to counteract alcohol industry arguments concerning proposed legislation on alcohol-related fiscal measures.
- f) Uruguay: Submission of an amicus brief defending tobacco control legislation that was challenged by Philip Morris International at the World Bank Group's International Centre for Settlement of Investment Disputes. In a historic milestone, Uruguay won the lawsuit in July 2016.

Other interventions for NCD prevention and control

228. In 2014, PAHO Member States adopted a new Plan of Action for the Prevention of Obesity in Children and Adolescents (Document [CD53/9, Rev. 2](#)). The first of its kind in any WHO region, the Plan of Action seeks to halt the rapidly growing obesity epidemic in children and youth in the Americas. It targets the increasingly “obesogenic” environments in the Region, the result of urbanization, modernization, and global marketing and trade. These forces have increased both the availability and the affordability of energy-dense, nutrient-poor, ultraprocessed foods and beverages, at the expense of whole, fresh foods, while also reducing opportunities for physical activity. To counteract these conditions, the Plan of Action proposes five strategic lines of action: *a)* primary health care and promotion of breast-feeding and healthy eating; *b)* improvement of school nutrition and physical activity environments; *c)* fiscal policies and regulation of food marketing and labeling; *d)* other multisectoral actions; and *e)* surveillance, research, and evaluation. With PAHO's technical cooperation, several countries in the Region, especially in the Caribbean, have developed strategies and plans to prevent childhood obesity. PASB also contributed to the formulation of the Healthy Caribbean Coalition's³⁸ Civil Society Action Plan for the Prevention of Childhood Obesity in the Caribbean.

229. PASB's technical cooperation for NCD prevention and control included several partnerships and alliances, including:

- a) Collaboration with the U.S. CDC and other stakeholders to spearhead the Cardiovascular Risk Reduction Project (previously known as the Standardized Hypertension Treatment Project), an innovative effort to develop and implement a framework for standardized treatment of hypertension. The initiative, launched in 2013 in Latin America and the Caribbean, comprises three main pillars: *a)* identifying a core group of essential medicines to treat hypertension, *b)* increasing the availability of such medicines, and *c)* improving hypertension care. The Bureau contributed to the design of the project and forged alliances with stakeholders and ministries of health to promote its implementation in Barbados, Chile, Colombia, and Cuba. Results from the first 18 months of the pilot in Barbados included improved hypertension control and prescribing practices. In

³⁸ The Healthy Caribbean Coalition (HCC) is an umbrella nongovernmental organization for civil society organizations working in NCD prevention and control in the Caribbean. HCC is in official relations with PAHO.

- 2016, Chile, Colombia, and Cuba became the first of a network of countries that are integrating the approach into their health delivery systems and national NCD programs. The Bureau developed two virtual courses aimed at strengthening implementation of the approach in participating countries. As of mid-2017, 30,000 people had enrolled in the hypertension control course, and 5,000 in the more recently launched secondary prevention course for primary care teams. Lessons learned from the framework's implementation in the Americas will help facilitate its application worldwide.
- b) Leadership of interagency efforts under the Inter-American Task Force on Noncommunicable Diseases, which supports coordination and collaboration across agencies on multisector approaches for NCD prevention and control. Members of the Task Force include the OAS, IDB, World Bank, IICA, and ECLAC. Activities have dealt with such issues as tobacco taxation, the economics of NCDs, and advocacy with social development ministers.
 - c) Partnership with FAO in the Region to preserve, strengthen, and/or recover health-promoting and sustainable food systems to end all forms of malnutrition.

230. The Bureau strengthened its work on the economics of NCDs, risk factors, and mental health, with the objectives of facilitating intersectoral dialogue for a better understanding of the economic dimensions of NCD issues within and beyond the health sector; boosting the effectiveness of advocacy for increased resources for NCD prevention and control; and promoting policy coherence on NCDs and risk factors across sectors. Under this framework, in 2016 the Bureau gathered researchers on the economics of NCDs from within and outside the Region to identify gaps, opportunities, and priority areas for future policy-focused economics research to support multisectoral action on NCDs. In May 2017, PASB convened a meeting in Barbados with representatives of ministries of health and finance from 17 Caribbean countries and territories. The participants presented and discussed evidence on the cost-effectiveness of taxation of tobacco, alcohol, and SSBs as a tool to combat NCDs and to facilitate intersectoral dialogue and policy coherence. Among the international partners represented at the event were Bloomberg Philanthropies, CARICOM, CARPHA, and academicians and others from civil society.

231. Through its collaboration with Harvard University's T.H. Chan School of Public Health, the Bureau applied WHO's EPIC model to estimate the impact of NCDs on aggregate economic output. The collaboration applied Harvard's EPIC-H Plus model, which quantifies the impact of NCDs on aggregate output through reduced labor supply (due to morbidity and mortality) and reduced capital resulting from increased costs of health spending for NCDs and mental conditions. When the model was applied to Costa Rica, Jamaica, and Peru, it was estimated that if no action were taken, lost GDP between 2015 and 2030 as a result of NCDs would be equivalent to 142% of Costa Rica's 2013 GDP, 105% of Jamaica's 2013 GDP, and 255% of Peru's 2013 GDP. These and other findings of the collaboration were presented at the World Economic Forum on Latin America in Medellin, Colombia, in June 2016. The partnership also includes

development of guidelines for countries in the Americas to calculate similar estimates on their own, using the EPIC-H Plus model. Studies on the investment case for NCDs are being conducted in Jamaica and Peru in order to estimate the return on investment of a selected set of NCD interventions.

232. The Bureau contributed to improvements in NCD and risk factor surveillance through development of a technical package to assess country capacity to monitor NCDs and their risk factors, identify gaps in monitoring, establish priorities, and track progress toward global and regional NCD commitments. The package was applied in countries of the Andean Subregion in 2015 and provided useful input for the development of plans to improve countries' NCD surveillance capacity; its use will be expanded to other subregions. PASB also continued its technical cooperation with countries in their use of population-based surveys to strengthen surveillance of NCDs, their risk factors, and mental health disorders. In 2016, the Bureau piloted the use of two new technologies for collecting data through household surveys: Web-based tablet computers for data entry and devices for biochemical measurements that allow more accurate monitoring of cholesterol levels and diabetes. Ecuador was the first country in the Region to use mobile devices to implement the WHO STEPS survey, including at the subnational level, and the process received positive reviews from both the Ministry of Health and the National Statistics Office. The Bureau has procured a stock of these devices and will rotate them among Member States for use in these national surveys.

Update on chronic kidney disease from nontraditional or unknown causes in Central America

PASB has led interprogrammatic technical cooperation that has marshalled resources and initiated dialogue among research teams, policymakers, and interest groups, in order to advance evidence-based interventions to address the epidemic of chronic kidney disease from nontraditional or unknown causes (CKDnT). This disorder affects primarily young adult men in farming communities in Central America that are already burdened by socioeconomic disadvantages.

Responding to a proposal from El Salvador, the Bureau developed a concept paper (Document [CD52/8](#)) outlining the impact and challenges of CKDnT in Central America and calling for urgent international action. The statement, which reaffirmed the Declaration of El Salvador signed by Central American countries in April 2013, was formally adopted by the 52nd PAHO Directing Council in October 2013 (Resolution [CD52.R10](#)). A growing number of research groups, including PAHO/WHO collaborating centers, have begun investigations in the field, and the Bureau is supporting the development of a comprehensive research agenda to advance knowledge about the natural history of the disease and its cause(s). The Consortium for the Epidemic of Nephropathy in Central America and Mexico (CENCAM) was formed to undertake relevant research.

PASB, in collaboration with the U.S. CDC, the Latin American Society of Nephrology and Hypertension (SLANH), the Executive Secretariat of COMISCA, and representatives of the health ministries of Central American countries, has developed a proposal for a case definition to be used in epidemiological surveillance as well as a clinical case definition. Although the disease's etiology remains unknown, the scientific community has reached consensus on

characterization of the disease, establishing that CKDnT is essentially occupational in character. Therefore, strengthening environmental and occupational health promotion is a critical strategy for CKDnT prevention.

El Salvador has updated its legal framework for pesticide control, where the use of 53 highly toxic active ingredients has been prohibited. Guatemala has approved new national regulations on occupational health and safety, including measures for the prevention of chronic kidney disease (CKD). Guatemala is also working to modify its regulations on the management of domestic pesticides.

Collaboration has been strengthened between the Bureau and the PAHO/WHO Collaborating Centers in occupational and environmental health, which have incorporated CKDnT into their support activities. Countries have conducted training on intersectoral action to address environmental risks, clinical toxicology, and risk assessment methodology. The Bureau, together with the PAHO/WHO Collaborating Centers in occupational and environmental health, is developing protocols for situation analysis and implementation of preventive and corrective interventions in work environments. The Bureau has also implemented an online tutorial course with regional experts on prevention, diagnosis, and treatment of acute pesticide poisoning, as well as a virtual course on CKD, available through the PAHO Virtual Campus for Public Health.

There have been advances in incorporating comprehensive care for CKD into the health services, including the development of clinical care guidelines for CKD patients at the first level of care, updating of national standards, and development of services for prevention and comprehensive care of CKD.

233. Bureau staff undertook a mid-term assessment of the implementation of the regional Plan of Action for the Prevention and Control of Noncommunicable Diseases, which aims to reduce premature deaths from the four leading NCDs by 15% by 2019. The assessment found a stable pattern or a modest decline in premature NCD mortality in nearly all of the countries and territories of the Region. However, fewer than half appeared to be on track to meet the 15% reduction target, with the slowest progress being observed in Central America and the Caribbean.

234. Ministries of Health in 38 countries and territories in the Region provided information for the review of the regional Plan of Action. They highlighted actions needed to improve the current NCD situation, including intensifying political, technical, and financial commitments to NCDs, especially in the Central American and Caribbean subregions; prioritizing the establishment of national NCD plans, targets, and multisectoral NCD commissions in countries that do not yet have them; focusing on obesity prevention; making alcohol policies a priority within the NCD and health agenda and putting in place demand reduction interventions; and making full use of the PAHO Strategic Fund to increase access to, and affordability of, NCD essential medicines, particularly medicines to improve blood pressure control and prevent cardiovascular diseases.

235. WHO and the Minister of Public Health of Uruguay are co-conveners of a global conference on the prevention and control of NCDs to be held in Montevideo, Uruguay, in October 2017. Presidents and ministers of health from several countries are expected to take part and to agree on a road map providing guidance for countries on how to influence public policies in nonhealth sectors and to improve normative consistency on the issue of NCDs. PASB is playing a major role in the preparations for the conference, and will participate in its implementation and follow-up.

Advances and innovations in mental health

236. PAHO continued its technical cooperation to improve mental health policies, programs, and interventions in the Region of the Americas, working with national counterparts and civil society to address this underserved, but priority, public health issue. With PASB's technical cooperation, countries throughout the Region advanced in the implementation of WHO's Mental Health Gap Action Program (mhGAP), which promotes scaling up of services for mental, neurological, and substance use (MNS) disorders at primary care level. PASB contributed to ongoing training in mhGAP, including through PAHO's VCPH, reaching thousands of primary health care workers and achieving positive changes in attitudes and practices towards MNS disorders. Belize successfully replicated mhGAP trainings after some of its general practitioners participated in the 2013 virtual training course, and Colombia began its own mhGAP training through the PAHO Virtual Campus, aimed at academic institutions and professional associations. Chile has systematically incorporated mhGAP training and implementation into its health systems and as part of the curriculum for nonspecialized health professionals. In Mexico, one northern city where mhGAP was initiated in 2012 reported an increase of over 300% in the number of people being treated for mental health conditions in primary health care.

237. Several countries and territories in the Region completed or advanced in developing mental health policies and legislation:

- a) Anguilla, Antigua and Barbuda, Barbados, the British Virgin Islands, Costa Rica, Panama, Suriname, and Venezuela developed new, or updated existing, national mental health policies and plans.
- b) Argentina announced regulations related to its National Mental Health Law, which protects the rights of people suffering from mental disorders, while Jamaica and the British Virgin Islands conducted reviews of mental health legislation.
- c) Professionals from Anguilla, Antigua and Barbuda, and Jamaica received training on psychological first aid (PFA) in disasters and emergencies, and drafted mental health and psychosocial components for their national health disaster plans. The Bahamas, Suriname, and Trinidad and Tobago also provided training on mental health in disasters and PFA.

238. PAHO has been working with the Dominican Republic in efforts to renew its national mental health system. There have been significant advances, particularly during the last two years. An important investment has allowed repurposing of the national psychiatric hospital to become the Psychosocial Rehabilitation Center, for people with long-lasting, severe mental disorders. This center has excellent residential accommodations and has substantially improved patients' quality of life, raising the possibility that they can successfully return to their communities. The country has prioritized ambulatory mental health care and the development of specialized units within general hospitals, so that care for acute and emergency cases, which was previously provided by the psychiatric hospital, is now provided by general hospitals.

239. PASB's technical cooperation to improve access to mental health treatment and enhance the quality of services considers users of mental health services and their families as active participants in the process of care. In 2013, in collaboration with the Ministry of Health of Brazil, PASB organized a first-of-its-kind regional meeting, in Brasilia, with representatives of users' and families' organizations. The meeting objectives were to share personal and institutional experiences on the human rights, autonomy, and empowerment of users and their families, and to promote their involvement in decisions related to mental health care. Some 100 representatives from 18 countries³⁹ participated in the meeting, from which emerged the Brasilia Consensus. The Consensus calls for concrete action by countries to implement international principles on mental health and human rights, to establish and strengthen associations of users and their families, and to create a regional network of these associations.

240. Over the review period, PASB coordinated a series of exchanges between Chile and Canada on the mental health needs of indigenous groups. The countries shared and compared initiatives and practices for common mental health issues in different indigenous communities, resulting in a joint commitment to address the problems identified. Preliminary discussions outlined future actions focused on training and interventions in mental health, as well as the inclusion of Argentina and Brazil, which participated in the planning discussions.

241. Each year, about 65,000 people in the Region of the Americas—nearly 70% of them men—take their own lives. Suicide is a preventable cause of death, and in May 2016 a regional workshop was held in Costa Rica with the objective of strengthening countries' capacities to implement preventive measures for suicidal behaviors. Also in 2016, within the framework of World Suicide Prevention Day, held every year on September, PAHO launched a new publication titled *Prevention of Suicidal Behavior*, which provides essential information on suicidal behavior and on the main strategies to address it, from surveillance to the evaluation of interventions.

³⁹ Argentina, Barbados, Belize, Bolivia, Brazil, Chile, Costa Rica, the Dominican Republic, Ecuador, El Salvador, Honduras, Jamaica, Mexico, Panama, Paraguay, Peru, Suriname, and the United States.

Suicide Observatory for Central America and the Dominican Republic

Each year, more than 800,000 people die from suicide around the world, and 76% of these deaths occur in low- and middle-income countries. Suicide is the second leading cause of death among persons aged 15 to 29 years, and it is a significant cause of death across the lifespan, impacting individuals of all ages. The prevalence, characteristics, and methods of suicidal behavior vary widely among communities and demographic groups. This makes up-to-date information on suicide essential in order to develop effective preventive interventions.

In Central America, evidence on suicide has suffered from significant underreporting and heterogeneity in collection methods, hindering reliable assessment of the problem. To address this, PASB partnered with COMISCA to develop a Suicide Observatory. Launched in December 2013, the Observatory provides a virtual platform for compiling timely information on suicidal behavior, in order to support evidence-based planning and allow countries to address risk factors more effectively.

By mid-2016, the eight member countries of SICA—Belize, Costa Rica, the Dominican Republic, El Salvador, Guatemala, Honduras, Nicaragua, and Panama—were entering data on suicide from 2010 onto the platform, using a common set of variables. The Observatory has also started the process of collecting data on suicide attempts, since previous attempts are the main risk factor predictive of death by suicide in the general population. PASB continues to provide technical cooperation, including capacity-building, for this process, and will follow up with monitoring and evaluation. The Bureau plans to expand this first-of-its-kind network in the Region to other countries in order to improve the quality of vital registration data on suicide.

Update on harmful use of alcohol, violence, and injury prevention**Alcohol**

242. Harmful use of alcohol is a critical risk factor for mental health and other NCDs and also for injuries and reproductive problems. Over the reporting period, much of PASB's technical cooperation on the subject has been guided by the WHO Global Strategy to Reduce the Harmful Use of Alcohol ([A63/13](#)), which was approved at the 63rd World Health Assembly in 2010, and by the 2011 regional Plan of Action to Reduce the Harmful Use of Alcohol (Document [CD51/8, Rev. 1](#)). These frameworks promoted the creation of the Pan American Network on Alcohol and Public Health (PANNAPH), to connect ministry of health focal points responsible for alcohol-related topics with regional experts and civil society. PANNAPH reviews progress in the regional Plan of Action, and four of the Region's focal points participate in a global council for the implementation of the Global Strategy to Reduce the Harmful Use of Alcohol. Another new entity is the Latin American section of the International Network on Brief Interventions for Alcohol & Other Drugs (INEBRIA Latina), which was created based on INEBRIA's model of a global network of researchers and clinicians.

243. In 2013, PAHO launched a series of six online courses related to reducing the harmful use of alcohol. One course, for health policymakers, focuses on developing and

implementing alcohol and drug policy. Another course, targeted at health professionals, is on screening and brief interventions for alcohol and drugs, especially in primary health care settings. The courses are provided free of charge, and Guatemala, Mexico, and Uruguay have adopted and complemented them with face-to-face training sessions and webinars in partnership with major universities, local experts, national drug councils, and PAHO/WHO collaborating centers. Two new virtual courses were launched in 2017, one on advocacy for alcohol policy and another on alcohol and pregnancy.

244. The Organization coordinated collaborative research on the role of alcohol consumption in nonfatal injuries treated in emergency room settings. Ten countries (Argentina, Brazil, Canada, the Dominican Republic, Guatemala, Guyana, Mexico, Nicaragua, Panama, and the United States) used the same protocol to investigate the relative risk of an alcohol-related injury in persons over 18 years of age. The data were analyzed through a partnership with two PAHO/WHO collaborating centers, in Mexico and the United States, and the results were summarized and published, along with evidence-based recommendations, in the book *Prevention of Alcohol-related Injuries in the Americas: From Evidence to Policy Action*. The book, published in December 2013, documents the significant burden of alcohol consumption on health systems and societies as a whole. It also describes ways to reduce alcohol-related injuries, including the use of cost-effective policies to decrease harmful drinking at both population and individual levels.

245. In 2015, the Bureau published the *Regional Status Report on Alcohol and Health in the Americas*, which examines the patterns and consequences of alcohol use in the Region and evaluates progress made since the enactment of the WHO Global Strategy and the PAHO regional Plan of Action. An emerging area of interest in the Region relates to the role of alcohol during pregnancy and the development of fetal alcohol spectrum disorders. Related research and service integration began in Argentina, Brazil, Chile, and Uruguay, and, as of mid-2017, capacity-building activities were under way in Chile. A virtual course on this subject will be launched in 2017.

246. Over the period under review, the Organization also worked to strengthen countries' implementation of the 2011 regional Plan of Action on Psychoactive Substance Use and Public Health (Document [CD51/9](#)), undertaking technical cooperation with ministries of health, in coordination with other sectors. New collaborations began in 2017 to examine alcohol, drugs, and driving, as well as alcohol and TB, the latter at both the regional level and in Peru. This initiative includes a systematic review of the literature and research on integration of services.

247. Despite these efforts, alcohol per capita consumption is still high in the Region and is predicted to increase if no additional measures are taken. Heavy episodic drinking and alcohol use disorders are prevalent in adults and adolescents, and alcohol-specific mortality rates are high. A mid-term review of the 2011 regional Plan of Action to Reduce the Harmful Use of Alcohol was reported at the 55th Directing Council in 2016 (Document [CD55/INF/12](#)) and showed unsatisfactory progress, as did the alcohol-related

indicators of the PAHO Strategic Plan 2014-2019. The review proposed several actions to improve the situation, including development of alcohol policy standards for adoption by Member States; formulation of national alcohol policies and plans that can lead to a relative reduction in the harmful use of alcohol by at least 10%; alcohol marketing control to change cultural norms and to protect young people from pressure to drink; promotion of fiscal policies as an effective way to reduce the harmful use of alcohol, as well as to increase revenues for governments; and advocacy to raise awareness.⁴⁰ The Bureau has established a technical advisory group (TAG) to provide guidance and support to PAHO's work in the area of alcohol policy. The TAG will also make specific recommendations to the Director on strategies to strengthen technical cooperation with Member States and policy dialogue among key stakeholders in the Region. The first meeting of the TAG is planned for November 2017.

Violence

248. PAHO's technical work on violence prevention included:

- a) In collaboration with the U.S. CDC, publication of the report *Violence against Women in Latin America and the Caribbean: A Comparative Analysis of Population-based Data from 12 Countries*. This was the first comparative report with nationally representative data on violence against women in Latin America and the Caribbean.
- b) Cooperation with the Andean Community to standardize indicators for gender-based violence, in order to facilitate future comparative analyses.
- c) Contribution to the development of national plans for the prevention of violence and injuries in Trinidad and Tobago and gender-based violence in Guyana, in conjunction with PAHO/WHO collaborating centers.
- d) Capacity strengthening for primary prevention of violence against women in Bolivia, Costa Rica, Ecuador, El Salvador, Guatemala, Paraguay, and Peru. In Guatemala, this work included the development of local plans for prevention of violence and crime, as part of the Joint Program on Conflict Prevention and Peacebuilding, which is sponsored by the MDG Achievement Fund.
- e) Contribution to the implementation of the USAID-funded Violence and Injury Prevention Project in Ciudad Juárez, which became a model for other cities and municipalities in Mexico. As part of this project, the Organization helped to strengthen the Observatory for Safety and Peaceful Coexistence at the Autonomous University of Ciudad Juárez; build capacity among primary care and social service providers, first responders, and community organizations; and improve the knowledge management and communication skills of the media and the community.

⁴⁰ In this respect, the Healthy Caribbean Coalition established an annual Caribbean subregional Alcohol Reduction Day, starting in 2016. Information at <http://bit.ly/2tH5GCO>.

- f) Provision of training in information gathering and analysis on violence prevention, enabling the appointment of national focal points in several countries to provide data for WHO's *Global Status Report on Violence Prevention 2014*.
- g) Contribution to assessing and strengthening surveillance systems on violence and injuries in several countries, including Belize, Haiti, and Trinidad and Tobago, with support from the U.S. CDC's National Center for Injury Prevention and Control, a PAHO/WHO collaborating center.

249. The Bureau published the *Status Report on Violence Prevention in the Region of the Americas, 2014*, which provides updated information on interpersonal violence prevention in the Americas. The report is based on the *Global Status Report on Violence Prevention 2014*, a collaborative report produced by WHO and its regional offices, UNDP, and the United Nations Office on Drugs and Crime (UNODC). For the regional report, the Bureau gathered information from 21 countries in the Americas, representing 88% of the Region's population. The report estimates that there were 165,617 homicides in low- and middle-income countries in Latin America and the Caribbean in 2012, a rate of 28.5 homicides per 100,000 people, more than four times the global homicide rate (6.7 per 100,000), though three-quarters of the countries have national action plans to reduce violence. Three-quarters of the homicides were carried out with firearms, despite the report's findings that all countries have laws regulating the weapons. However, a third of the countries were lacking data, suggesting that much planning and policy-making is done in the absence of evidence. The status report supports policy-making in Member States and the design of effective plans and initiatives, including programs to reduce the availability and harmful use of alcohol; laws and programs to reduce access to firearms and knives; efforts to change gender norms that help perpetuate violence against women; programs to improve parenting and life skills in children and adolescents; and public information campaigns to prevent elder abuse.

250. The Bureau conducted a review of the intersections of violence against children and violence against women to identify entry points for coordinating prevention and response efforts across the life course, and its findings were published in the journal *Global Health Action*. A second review, done in collaboration with UNICEF and Johns Hopkins University, assessed the strengths and weaknesses of national health protocols that guide the health sector response to children exposed to violence. This work, which was published in [BMC Public Health](#), provides guidance for the Bureau's work with Member States, along with two other publications: [INSPIRE: Seven Strategies for Ending Violence against Children](#), which was copublished with Member States and nine other agencies and translated by the Bureau, and [Health Care for Women Subjected to Intimate Partner Violence or Sexual Violence: A Clinical Handbook](#), which was translated into Spanish by the Bureau.

251. In collaboration with a number of partners, the Bureau developed the [Every Hour Matters](#) campaign, to raise awareness of the importance of quickly accessing post-rape care. The Bureau also collaborated with UN Women, UNICEF, and the United Nations Population Fund (UNFPA) to organize regional meetings and workshops in Honduras,

Panama, Trinidad and Tobago, and Washington, D.C., on prevention of, and response to, violence against women; methodologies for measuring violence prevalence; and indicators for tracking progress in the implementation of prevention and response strategies.

Injury prevention

252. During the review period, and in the context of the UN Decade of Action for Road Safety 2011-2020, several countries in the Americas, including Dominica, Ecuador, Guyana, and Uruguay, developed, approved, or implemented new plans and laws aimed at reducing traffic fatalities. In Ecuador, PAHO helped to develop technical norms on the use of protective helmets by motorcyclists, and the country improved its legislation on traffic injury risk and protective factors. El Salvador enacted a law to set up a national fund for victims of traffic accidents, raising the public profile of this issue. Mexico moved ahead in its implementing the Mexican Road Safety Initiative in all states.

253. A master plan for strengthening road safety in Central American cities was developed in 2015 with technical cooperation from PAHO and WHO. The plan was designed for the countries of the Mesoamerica Project—Belize, Colombia, Costa Rica, the Dominican Republic, El Salvador, Guatemala, Honduras, Mexico, Nicaragua, and Panama—and was unanimously approved by the ministers of health, infrastructure, and transportation from the participating countries. Based on a global model developed by the UN Road Safety Collaboration, the Mesoamerica plan provides a basis for action that can be contextualized in different cultures, and by different governments, businesses, and institutions.

254. The Bureau has published reports on road safety in the Americas, providing updated information on national and regional road traffic injury rates, legislation on main risk factors, and country progress in this area. The 2015 *Report on Road Safety in the Region of the Americas* revealed that some 150,000 people died from traffic injuries in Latin America and the Caribbean in 2010. Of these fatalities, 27% were pedestrians, 20% motorcyclists, and approximately 4% were bicyclists. The report notes that 42% of the population in Latin America and the Caribbean is now protected by drinking-and-driving laws. However, of the 14 countries that have legislation setting blood alcohol concentration limits, only five of them—Costa Rica, Ecuador, Honduras, Panama, and Saint Vincent and the Grenadines—report having strong enforcement. Similarly, laws on motorcycle helmet use have improved, but more efforts are needed to enforce those laws and ensure that helmets meet quality standards. The report calls for stronger traffic law enforcement to reduce road deaths and especially to protect the most vulnerable road users.

255. In 2015, PASB contributed to the 2nd Global High-Level Conference on Road Safety, which was held in Brazil. The Conference convened over 100 ministers of transport, health, and interior, and their representatives, and resulted in the Brasilia Declaration, which was adopted by PAHO Member States and later endorsed by the 70th

UN General Assembly and the 69th World Health Assembly. The Declaration welcomes the inclusion of road safety in the 2030 Agenda for Sustainable Development and recommends regional actions to strengthen road safety management; improve legislation and enforcement; promote safer roads and vehicles; encourage the use of sustainable modes of transportation; protect vulnerable road users; improve postcrash response and rehabilitation services; and strengthen global cooperation and coordination on road safety.

256. In 2016, the Bureau convened a regional meeting on alcohol, drugs, and road traffic injuries, in collaboration with WHO and with the participation of Member States, to discuss the situation in the Region. The meeting led to the development of a regional protocol that can be adapted by countries to conduct studies in emergency rooms on nonfatal road traffic injuries involving passengers, drivers, or pedestrians, assessing the role and associated risk of alcohol and other drug consumption prior to the injury. This information is expected to facilitate improvements in road safety and decreases in the harm from alcohol- and drug-related injuries. The IDB is contributing to the implementation of the studies, starting with Jamaica and Chile in 2017.

257. Brazil and Mexico were part of the launch in 2015 of the second phase of the Bloomberg Philanthropies Initiative for Global Road Safety, which was led at the global level by WHO and in the Americas by PAHO. The landmark program consolidated the health sector's role in road traffic injury prevention efforts, based on the set of benchmarks in the 2004 *World Report on Road Traffic Injury Prevention*. Within the framework of this Initiative, PASB promoted data improvement, cross-sector integration, and capacity-building for traffic safety professionals, journalists, NGOs, and other road safety stakeholders. The Bureau also undertook technical cooperation with countries to develop road safety plans and policies, improve legislation, and develop educational materials.

7. ADDRESSING THE SOCIAL DETERMINANTS OF HEALTH AND ENSURING HEALTHY AND SAFE ENVIRONMENTS

Promoting Health in All Policies

258. Health in All Policies (HiAP) is seen as a new and innovative expression of intersectoral action and as “the practical arm” to implement the Rio Political Declaration on Social Determinants of Health. As defined in the 2013 Helsinki Statement on Health in All Policies, it is “an approach to public policies across sectors that systematically takes into account the health implications of decisions, seeks synergies, and avoids harmful health impacts in order to improve population health and health equity.” Although the term refers to “in all policies,” this does not mean the approach must be present in all initiatives. Rather, it refers to the objective of ensuring that concern and responsibility for health impacts and health equity are considered systematically in all sectors.

259. With support from the Bureau, Canada, and WHO, Mexico conducted and documented an analysis of economic rationales for nonhealth sectors to address social determinants of health. PASB assisted Honduras and Peru in strengthening capacity to measure and monitor health disparities within the framework of social determinants of health. PASB has also worked with countries to build capacity to undertake intersectoral work, advocate for HiAP, and advance health equity.

260. The Organization also developed and disseminated a tool to help countries document and systematize examples of intersectoral work at the national, subnational, and local levels that demonstrate the HiAP approach. Countries used the tool to develop their own case studies, and Brazil, Chile, El Salvador, and Mexico gathered evidence demonstrating that a HiAP approach can have important effects on health equity. Several of the case studies were presented at the 8th Global Conference on Health Promotion in Helsinki in 2013. They included Brazil’s Bolsa Família (Family Grant) program and its Brasil Sem Miséria (Brazil without Extreme Poverty) initiative; Canada’s experience with health equity in all policies; Chile’s Choose Healthy Living initiative; Ecuador’s National Good Living Plan; El Salvador’s Intersectoral Health Commission; and Mexico’s National Agreement for Nutritional Health - Strategy to Control Overweight and Obesity.

261. In 2014, the 53rd Directing Council approved the regional Plan of Action on Health in All Policies (HiAP) 2014-2019 (Document [CD53/10, Rev. 1](#)), the first of its kind among WHO regions. The Plan of Action is consistent with the 2014 WHO Health in All Policies Framework for Country Action, which promotes a public policy approach that systematically considers the potential health implications of all policy decisions. The Plan of Action notes that the synergy among health promotion, social determinants of health, social justice, and human rights is embodied in the HiAP concept. The Plan of

Action also emphasizes the contribution that this approach would make in addressing health issues that need a concerted intersectoral approach. Among these issues are noncommunicable diseases, universal health, and environmental sustainability and health equity.

262. In 2015, the Bureau convened an expert consultation in which leading global experts produced a five-year road map with recommendations and proposed actions to implement the regional Plan of Action on Health in All Policies. In line with their recommendations, the Bureau established a special task force to define a core group of indicators from across the SDG framework that can be used to promote intersectoral actions and monitor their impact on health. The task force will also provide countries with demand-based technical expertise and guidance on implementing the SDGs.

263. Also in 2015, PASB partnered with the Government of Suriname, Durham University (United Kingdom), and the Government of South Australia to hold the first regional training workshop on HiAP in Suriname. The Government of Suriname endorsed the approach, expressed its intent to institutionalize it, and, with PASB's technical cooperation, convened a second workshop in 2016 in Suriname to continue the process. The workshop participants comprised representatives of government ministries and selected nongovernment entities. The attendees formed eight intersectoral working groups, which formulated and negotiated 12 intersectoral policies for approval by the country's Council of Ministers. Through the PAHO/WHO representative office, PASB has continued its advocacy for, and facilitation of, the process in Suriname.

264. PASB established a partnership with the National Institute of Public Health (INSP) of Mexico, FIOCRUZ of Brazil, and the Latin American School of Social Sciences (Chile) for capacity-building for HiAP at the local, national, and regional levels. In February 2017, the partners conducted a strategic evaluation of capacity-building for HiAP in the Region, which identified strengths and weaknesses of the program to date and produced a two-year work plan and an outline for a strategic analytical report.

265. The governance required to address social determinants of health is not feasible without the participation of civil society and local communities. Prior to the 9th Global Conference on Health Promotion in November 2016 in Shanghai, China, a "mayors' pre-forum" was held in Santiago, Chile, jointly organized by PAHO, the Ministry of Health of Chile, and the Latin American and Caribbean Health Promotion Managers Network. The purpose of the event was to renew the commitment of mayors and national governments of the Americas to fostering healthy cities, municipalities, and communities. A declaration signed by over 40 mayors called on the Region and the global community to promote health at the municipal level through local networks and to foment "policies and actions that address the determinants of health, human rights, and inequities through Health in All Policies and intersectoral action within the framework of the Sustainable Development Goals."

Towards healthy environments

Chemical safety

266. In 2016, the 69th World Health Assembly approved Resolution [WHA 69.4](#), “The role of the health sector in the Strategic Approach to International Chemicals Management towards the 2020 goal and beyond,” which references SDG Target 12.4⁴¹ and calls for the development and implementation of a road map for chemical safety. PAHO has been a strong advocate for the development of this road map and has played an active role in the dissemination of the resolution, facilitating consultations with Member States that included subregional fora in Jamaica and Uruguay for English- and Spanish-speaking countries, respectively. In February 2017, PASB participated in the first intersessional meeting in relation to the Strategic Approach for International Chemical Management (SAICM), a policy framework for promoting chemical safety around the world, which was convened in Brazil. Discussions were held on Resolution WHA69.4 and recommendations made for the development of national work plans to implement the chemical safety road map. In 2017, the 70th World Health Assembly approved the road map to enhance health sector engagement in SAICM.

267. PASB received a grant from the SAICM Quick Start Program, for a project to strengthen the poison control center network in Central America (El Salvador, Guatemala, Honduras, Nicaragua, and Panama) through establishment of a virtual platform for the network and tutorial courses on pesticides and mercury from the PAHO VCPH.

268. The 2013 Minamata Convention on Mercury, a global treaty to protect human health and the environment from the adverse effects of mercury, will enter into force in August 2017, and the first Conference of Parties is confirmed for September 2017. The Minamata Convention assigns important roles to WHO, PAHO, and ministries of health, and calls on WHO and PAHO to develop and implement strategies and programs to identify and protect populations at risk from mercury exposure, and to promote the phaseout of mercury in medical devices and products. PASB is promoting the replacement of mercury thermometers and sphygmomanometers in public hospitals as part of its technical cooperation to protect health workers, in conjunction with collaborative initiatives including the Health Care without Harm coalition and the Global Network of WHO Collaborating Centers in Occupational Health. PASB and WHO are supporting development of a health strategy for national action plans to eliminate or reduce the use of mercury in small-scale gold mining.

269. In May 2014, the 67th World Health Assembly approved Resolution [WHA67.11](#), “Public Health Impacts of Exposure to Mercury and Mercury Compounds: the Role of

⁴¹ Target 12.4: By 2020, achieve the environmentally sound management of chemicals and all wastes throughout their life cycle, in accordance with agreed international frameworks, and significantly reduce their release to air, water, and soil in order to minimize their adverse impact on human health and the environment.

WHO and Ministries of Public Health in the Implementation of the Minamata Convention.” This resolution guides and facilitates WHO’s and PASB’s work with Member States, the Minamata Convention intergovernmental negotiating committee, the Conference of the Parties, UNEP, UNDP, the Global Environment Facility, and other international organizations in advancing the Convention’s provisions in Member States. PASB is helping to disseminate WHO guidelines on mercury exposure levels and to promote information exchange in the Region. PASB has also translated the WHO technical guidance document *Replacement of mercury thermometers and sphygmomanometers in health care* into Spanish and disseminated it in the Region of the Americas. Consistent with the Minamata Convention and as a participant in WHO’s Global Health Care Waste Project, Argentina has been actively working to phase out mercury-containing devices and equipment from its health services, including switching from mercury to digital thermometers and reducing the use of mercury-containing amalgam in dentistry.

Workers’ and consumers’ health

270. In 2015, the 54th Directing Council approved a new Plan of Action on Workers’ Health document for the period of 2015-2025 (Document [CD54/10, Rev. 1](#)) and accompanying Resolution [CD54.R6](#). The Resolution urged Member States to advocate for equality and the promotion of workers’ health as a priority, and to adopt effective measures to control employment and working conditions as social determinants of health; increase universal coverage; and strengthen health systems and health equity. In collaboration with WHO, PASB contributed to the development of National Outlook on Workers’ Health efforts in Cuba, Colombia, the Dominican Republic, and Jamaica, in order to identify needs and gaps, with the aim of developing national plans of action on workers’ health. In 2017 Argentina, Guatemala, and Guyana initiated the process to develop their national plans of action, and Bolivia and Honduras plan to follow suit. These plans of action emphasize the need for updating legal frameworks and technical regulations on workers’ health, and address the critical situation of the expanding informal sector—including informal employment—which impacts national and regional progress and development.

271. A renewed effort was launched in early 2017 to address the health work force based on the International Labor Organization (ILO)/WHO Global Framework for National Occupational Health Programs for Health Workers. PASB, in collaboration with WHO and the network of collaborating centers in occupational health, is building capacities in occupational health and safety for health institutions. This includes implementing the ILO/WHO HealthWISE tool, which addresses working and employment conditions for health workers. The tool was piloted in the United States, and additional pilots will be done in The Bahamas and in Grenada, while a Spanish-language version of the tool will be piloted in Colombia and Honduras.

272. PASB has spearheaded initiatives to address the epidemics of and the data gap related to occupational diseases. These initiatives include:

- a) Identification of exposures to carcinogens. In order to identify who, where, and how workers are exposed to carcinogens at the workplace, countries are implementing CAREX (CARcinogen EXposure) national projects under PAHO's guidance, and in conjunction with CAREX Canada and PAHO/WHO collaborating centers in occupational health. CAREX estimates occupational exposures to carcinogens and provides important information for the development of public health policies and recommendations on the prevention of occupational cancers by means of exposure control. A total of 24 countries participated in three international workshops to train ministries of health, cancer institutes, industrial hygienists, and other key stakeholders on developing national CAREX projects.
- b) Updating of technical guides for diagnosis of occupational diseases. This is being done with the support of two collaborating centers.
- c) Classification of chronic kidney disease from nontraditional or unknown causes (CKDnT) as an occupational disease. The framework for occupational and environmental surveillance of chronic kidney disease of undetermined origin for the Mesoamerican countries is nearing completion.
- d) Strengthening information systems. An overview of information systems for identification, registration, and reporting of occupational diseases, injuries, and fatalities at work has been completed, in order to identify needs and gaps.
- e) Strengthening stakeholder collaboration. PASB continues to work with Member States; other UN agencies, particularly ILO; OAS; and other stakeholders and networks to build capacity to monitor, document, and address conditions and trends that affect workers' health.

273. PASB recognizes the significant impact that consumer products can have on health. In August 2015, PASB organized the first International Workshop on Consumer-Related Injuries (CRI) in the Dominican Republic, with participants from national health sectors and consumers' associations in 19 countries. Participants agreed on the definition of CRI and pledged to initiate the collection of data that will allow estimation of the burden of unsafe products and facilitate joint development of mitigating measures. Argentina, Canada, Chile, Colombia, Costa Rica, and the United States have made significant progress with CRI data. PAHO continues to participate in the Consumer Safety and Health Network (CSHN), which has existed since 2010, organized by the OAS and PAHO.

Water and sanitation

274. PASB worked with countries to develop and implement water and sanitation strategies and plans. The interventions included implementation of water quality monitoring parameters in Antigua and Barbuda; assessment of water, sanitation, and hygiene in The Bahamas; implementation of the WHO-International Water Association (IWA) methodology at the ministerial level and locally with partners in Colombia, Costa Rica, and Paraguay; development of a water safety plan (WSP) based on the

methodology developed by WHO and IWA in Grenada; and implementation of a program for removing arsenic from water supplies in rural communities in Nicaragua. Resource recovery and reuse sites have been identified in Lima, Peru, for pilot projects to generate evidence on the application of sanitation safety plans (SSPs) for WHO's SSP manual, in collaboration with the International Water Management Institute and the Swiss Tropical and Public Health Institute.

275. PASB continued to strengthen countries' capacity in the use of WSPs and SSPs, with both face-to-face and virtual training. Face-to-face training on WSPs was undertaken in Argentina, Brazil, and Jamaica, and the virtual WSP self-learning course has been available through the PAHO VCPH since May 2016. In May 2017, the SSP virtual course, developed in collaboration with AECID, was placed online, with free access for all professionals interested in the safe management of water and sanitation services.

276. PASB developed new regional coordination tools for risk management in water, sanitation, and hygiene during emergencies, including a "coordination checklist" and a "rapid guide" for defining the responsibilities of the UN Cluster and a new Virtual Coordination Platform. Belize, Colombia, Costa Rica, Ecuador, El Salvador, Guatemala, Honduras, Nicaragua, and Paraguay incorporated these tools into their water and sanitation coordination mechanisms.

Climate change and health

277. Climate change is recognized as a serious threat to public health. At the global level, WHO estimates that between 2030 and 2050, climate change will produce an additional 250,000 deaths annually due to malnutrition, malaria, diarrhea, and heat stress. As part of its work in this area, PASB took a leadership role at the 20th Conference of the Parties to the UN Framework Convention on Climate Change (UNFCCC COP20), which was held in December 2014 in Lima, Peru. PASB advocated strongly for explicit consideration of the health dimensions of climate change, especially as they relate to issues of equity. During COP21 in 2015, PASB and WHO collaborated with other agencies to advocate for the inclusion of health-related topics in the Paris Agreement, which was signed by 197 Member States and ratified by 153.⁴² The Bureau is preparing the WHO-UNFCCC country profiles on climate and health for the Americas, which aim to project health-related scenarios related to climate change, such as heat waves, flooding, disasters, and selected vector- and water-borne diseases. Scenarios for Brazil, Colombia, Mexico, Peru, and the United States have already been published, and those for Canada, Costa Rica, and Panama are being finalized. Work is ongoing to develop scenarios for the Caribbean and for other countries of the Region.

278. In the Americas, air pollution is the leading environmental health risk, and PASB worked to strengthen Member States' capacities to address ambient and household air

⁴² Status as of July 2017.

pollution and their effects on health. In 2014, PASB became a partner of the Global Alliance for Clean Cookstoves⁴³ and in 2016 participated in the annual meeting of the Climate and Clean Air Coalition (CCAC).⁴⁴ The Bureau launched the WHO air quality guidelines for indoor air quality at a regional meeting in Honduras in 2015, where the importance of incorporating the health sector into relevant discussions was highlighted. The WHO air quality guidelines seek to mitigate air pollution and its impact on both climate change and health at the local level, and meeting participants reviewed existing national programs in their respective countries for reducing the use of solid fuels and transitioning to cleaner technologies and fuels. In 2016, WHO, UNEP, and CCAC launched the BreatheLife⁴⁵ campaign to raise the awareness of air pollution and its health effects; PASB is organizing a regional workshop in Colombia in October 2017 to launch the campaign in the Americas.

279. PASB has developed an open online course on climate change and health, in collaboration with the National Institute of Public Health (INSP) of Mexico, to raise awareness of, and strengthen capacities on, climate change and health. As of mid-July 2017, the course has had more than 3,400 participants from 23 countries. The Organization is currently updating the course and developing modules in English, and is also designing a training course for health representatives to facilitate the development of chapters on health in national adaptation plans (NAPs) for climate change. The Bureau also supported countries to participate in UNEP-UNDP trainings for the development of these NAPs, as part of the effort to integrate health topics into the climate change agenda.

⁴³ Website available at: <http://cleancookstoves.org/>.

⁴⁴ Website available at: <http://www.ccacoalition.org/en>.

⁴⁵ Website available at: <http://breathelife2030.org/>.

8. ADVANCING PASB'S INSTITUTIONAL DEVELOPMENT AND CAPACITY

280. The Bureau continued to pursue policies and practices to enhance its leadership, management, efficiency, transparency, accountability, and ethics, and to promote fair treatment in the workplace. The recommendations of both internal and external evaluations and audits were carefully analyzed, discussed with Member States, and implemented as appropriate, resulting in initiatives and developments at the institutional level that enhanced the Bureau's operations and impact.

Leadership and governance

PAHO Budget Policy

281. Over the reporting period, the PAHO Budget Policy approved by the 28th Pan American Sanitary Conference in 2012 has guided resource allocation for operations at the regional, subregional, and country levels. The Policy incorporated recommendations made by PASB's Office of Internal Oversight and Evaluation Services (IES) based on its evaluation of the previous budget policy, as well as adjustments in response to the Organization's own lessons learned. Changes included new standards and resources for PAHO's country presence to maintain robust engagement with Member States, the incorporation of income inequality (the Gini coefficient) into an expanded needs-based assessment of countries, a results-based component designed to accelerate the achievement of programmatic targets in countries, and improved modeling and statistical techniques to provide more realistic and workable resource distribution results.

282. PASB presented the findings of an interim assessment of the 2012 PAHO Budget Policy to the 158th Session of the PAHO Executive Committee in June 2016 (Document [CE158/12](#)), recommending continued application of the Budget Policy for the 2016-2017 biennium. However, the Bureau noted that since its implementation, there have been several changes in policies and procedures that may affect the PAHO Budget Policy. A thorough evaluation of the Budget Policy is scheduled for 2018 to ensure that it continues to respond to changing health needs and consistently allocates resources in an equitable manner.

WHO Reform

283. The ongoing process of WHO reform, launched in 2011 in response to changing needs for global public health leadership, continued to advance. PAHO's Director initiated and maintained close dialogue with Member States in order to keep them fully apprised of new developments; to seek their feedback on critical issues; and to provide advice on the process and its implications for PAHO. Several PAHO Member States played pivotal roles in negotiations at the global level by leading or participating in WHO working groups.

284. Many of the reforms contemplated by WHO had already been adopted by PASB, prior to their implementation at WHO's Headquarters, including in the programmatic, managerial, and budget areas. WHO advanced three issues of particular importance to PASB and PAHO Member States: *a)* proposed changes in WHO's governance structure, *b)* the proposed new Framework on Engagement with Non-State Actors (FENSA), and *c)* the creation of a new WHO Health Emergencies Program. The proposals included new lines of command and accountability, and raised the possibility of serious challenges to PAHO's constitutional framework. That framework establishes PAHO as the specialized agency for health within the inter-American system and affirms PAHO as an independent entity, which, along with its Director, is directly accountable to the Member States of the Americas. Considering this special status, which is unique among WHO regional offices, the Bureau and PAHO Member States provided input into the negotiations that emphasized the importance of aligning PAHO with the new reforms in ways that would strengthen decision-making and transparency at the global level, while simultaneously respecting PAHO's status as an independent international organization.

285. With regard to WHO governance reforms, PAHO Member States supported recommendations for increased regional coordination and alignment with WHO in the areas of management and transparency, but also underscored the importance of regional specificities.

286. In negotiations on FENSA, delegates from the Americas emphasized that since 2005, PAHO has had its own guidelines for collaborating with non-State actors, including the private sector, NGOs, foundations, and academic institutions. On the understanding that FENSA would provide an additional means to ensure engagement with non-State actors, utilizing a principled, implementable, and balanced approach without compromising the Organization's independence, credibility, or reputation, the Bureau submitted FENSA to PAHO's 55th Directing Council in 2016 for consideration. The Directing Council approved Resolution [CD55.R3](#), adopting FENSA; specifically replacing the Guidelines of the Pan American Health Organization on Collaboration with Commercial Enterprises, as well as the Principles Governing Relations between the Pan American Health Organization and Nongovernmental Organizations; and instructing that FENSA be implemented in a consistent and coherent manner, respecting PAHO's Constitution and in accordance with PAHO's legal status.

287. PAHO Member States presented a joint statement to the 69th World Health Assembly in 2016 expressing their support for the new WHO Health Emergencies Program (WHE), while highlighting that PAHO's Department of Emergency Preparedness and Disaster Relief (PED) has been extremely effective in responding to emergencies and disasters in the Region of the Americas, based on 40 years of experience, expertise, and lessons learned. The countries emphasized that their support for the new WHO Program assumes that PAHO's regional program will continue to respond fully to the needs of Member States in the Americas, while working in a coordinated manner with the WHO Program. PASB has restructured PED into the PAHO Health Emergencies Department (PHE) for greater functional alignment with WHO.

Transparency, accountability, and risk management

Learning from audits and promoting evaluation

288. IES conducted audits in several PAHO/WHO country offices and assessed their adherence to results-based management, among other issues. In 2014, the Bureau hired an internal auditor to assess the risks and internal controls of the *Mais Médicos* Program in Brazil. The auditor will perform four internal audit assignments annually on the Program for its duration. In addition, on the recommendation of PAHO's Audit Committee, the Ethics Office collaborated with PAHO/WHO country office in Brazil to provide training in both Portuguese and Spanish to the entire *Mais Médicos* team. The training focused on potential risks in the program; existing Bureau-wide efforts and initiatives to identify, prevent, and combat fraud, corruption, and workplace misconduct; and policies and programs designed to promote a work environment where all personnel are treated with dignity and respect.

289. The implementation of internal audit recommendations continued to improve: the cumulative implementation rate of the recommendations since 2011 increased from 87% (576 out of 663 recommendations) as of 31 December 2015 to 90% (613 out of 678) as of 31 December 2016. IES also initiated the collection and organization of the vast amount of information available from previous evaluations and produced the Organization's first list of all evaluations performed both internally and by external stakeholders, a critical first step in analyzing and understanding the lessons learned from these activities. In March 2015, the Bureau produced the first of a series of twice-yearly reports that will consolidate the major lessons learned from evaluation reports, for dissemination across the Organization. The goal is to use the evaluations, which have a scope beyond individual programs or country offices, to facilitate ongoing improvements and decision-making processes in the Bureau, and to add to institutional memory and development.

290. IES continued to collaborate with WHO's evaluation function to foster a systematic and harmonized approach to evaluative work. IES distributed and promoted the WHO *Evaluation Practice Handbook* in the PASB and facilitated the PASB aspects of the WHO country presence evaluation, for which Mexico was one of eight countries worldwide selected for in-depth case studies.

Managing risks

291. PAHO continued to implement its Enterprise Risk Management (ERM) program for identifying, monitoring, evaluating, and managing ongoing risks inherent in PAHO's business operations and technical cooperation activities. A PAHO ERM Policy was approved in 2013, closely followed by the publication of a new ERM Handbook. Risk assessments were performed for several technical and administrative programs and projects, and risk management focal points were trained in risk assessment at PAHO Headquarters and in Barbados, Brazil, and Panama.

292. A corporate risk register was established in 2014 to strengthen the culture of risk management in the Organization and enable each cost center to document the main risks to the implementation of its biennial work plan, their probability and potential impact, and the implementation of mitigation actions. The risk register is reviewed at regular intervals in coordination with the corporate planning process.

293. In 2015, the ERM program was updated, and the corporate ERM Standing Committee (ERMSC) was reestablished, to ensure that effective management of risks is made operational as a core management function. The ERMSC has broad representation of senior managers to advise PASB's Executive Management on improving the culture of accountability and integrating risk management into other organizational processes. In 2016, the ERM program was integrated into the planning process for the 2018-2019 biennium. Based on a comprehensive analysis of the 2016-2017 risk register, the 2018-2019 risk register was revised to consolidate risks common to all entities, and revised guidance was disseminated through a newly established ERM network. PASB's Executive Management regularly reviews the evolution of the main corporate risks, identifies the risk owners for each of these risks, and provides feedback and guidance on mitigation measures to assigned risk owners, through the ERM program. In addition, PAHO's Audit Committee regularly receives ERM reports.

Strategic planning, resource coordination, and reporting

294. The Organization continued to implement a results-based management framework, with important advancements made in conjunction with the development of the PAHO Strategic Plan 2014-2019. This Strategic Plan was the first ever to be developed in collaboration with a Member State consultative group appointed by PAHO's Executive Committee. The plan addressed priority regional health needs while aligning programmatically with the WHO General Programme of Work, and included a refined results chain to better reflect achievements and joint accountability of the PASB and Member States, as well as improved results statements and indicators for outputs, outcomes, and impact. The new indicators were incorporated into the Performance Monitoring and Assessment process to enhance the contribution of this key component of the results-based approach in enabling PAHO entities at all levels to monitor progress and improve managerial accountability.

295. In 2014, PAHO developed an innovative and robust methodology to systematically and objectively identify the priority program areas where its technical cooperation clearly adds value, based on the Hanlon Method for Prioritizing Health Problems. Through Resolution [CD53.R3](#), the 53rd Directing Council requested that the Director "continue to undertake consultations with Member States to refine the programmatic priority stratification framework and apply it to future programs and budgets." In 2016, in collaboration with the Strategic Plan Advisory Group, which comprises representatives from 12 Member States, PASB further adapted and refined the Hanlon methodology to produce a revised Programmatic Priorities Stratification Framework (Document [CD55/7](#), 2016). National consultations were conducted in more

than 36 countries and territories in the Region to identify the priority program areas for the 2018-2019 biennium. The methodology has also been incorporated into the WHO 2016 guidelines for developing Country Cooperation Strategies (CCSs).

296. The Bureau has proposed amendments to the PAHO Strategic Plan 2014-2019 based on several factors: new and emerging priorities in the Region; the 2016 refinements to the PAHO-Hanlon methodology for priority-setting; the results of the prioritization exercises conducted with Member States; and PAHO's functional alignment with WHO's Health Emergencies Program. Among other adjustments, the amended version of the Strategic Plan, which is to be presented to the 29th PAHO Sanitary Conference in September 2017, includes revised program areas in Category 1 (Communicable Diseases) and Category 5 (Health Emergencies), resulting in an increase from 30 to 34 program areas. Changes to the Program and Budget 2016-2017 may be necessary to align with the revisions proposed.

297. In a major innovation, the 2016-2017 Program and Budget adopted an integrated budget approach, in which Member States moved from approving only the regular budget portion of PAHO's programs to approving the full budget. This facilitated a more complete budgetary picture for Member States and greater flexibility for the Bureau in managing resources to ensure maximum funding of all PAHO programs.

298. In November 2015, the first joint end-of-biennium assessment by the Bureau and PAHO Member States was implemented, the first process of this kind to be undertaken in any WHO region. In assessing the implementation of the 2014-2015 Program and Budget and the first two years of the current Strategic Plan, this exercise provided a unique opportunity for the Bureau and Member States to jointly review public health gains, gaps, challenges, opportunities, and lessons learned. The assessment was facilitated by the rollout of the Bureau's new Strategic Plan Monitoring System, developed in collaboration with, and formally approved by, Member States, as part of the PAHO Strategic Plan 2014-2019.

299. The joint assessment began with country-level assessments, which were validated by Bureau technical staff and consolidated into organization-wide results. The findings were presented to the 55th Directing Council in 2016 in a document titled *Preliminary Report of the End-of-Biennium Assessment of the Program and Budget 2014-2015/First Interim Report on the PAHO Strategic Plan 2014-2019* ([CD55/5](#)). There was 100% participation in this first joint assessment, with all 52 countries and territories of the Region involved. PAHO Member States have recommended that the experience be shared with WHO and other WHO regions as a best practice in transparency, accountability, and reporting.

300. PAHO's Member States all ascribe to subregional, regional, and global agreements and mandates, and the countries and territories have much in common. However, they also show significant variations in size, geography, capacity, ethnicity, culture, and health status. PASB has always recognized that "one size does not fit all,"

and while its technical cooperation has sought to identify interventions that can benefit groups of countries, it has also analyzed and worked with the attributes that make countries unique.

Tailoring technical cooperation

Country-focused cooperation

A 2013 assessment of the implementation in the Americas of the WHO Country Focus Policy resulted in recommendations to strengthen the PAHO's country focus. This assessment was the second of its kind for PASB; a previous assessment in 2003 resulted in the establishment of the Country Support Unit (CSU) at PAHO Headquarters. The more recent assessment triggered the January 2014 restructuring of the CSU to become the Office of Country and Subregional Coordination (CSC), to more appropriately reflect its strategic and analytic functions and to improve alignment with the WHO reform high-level implementation plan. The assessment also affirmed the importance of ensuring an up-to-date PAHO/WHO Country Cooperation Strategy for each country, to provide a framework for tailored technical cooperation from all levels of the Organization to address agreed national health development priorities.

National voluntary contributions

National voluntary contributions, which are funds provided by individual Member States to PAHO solely for technical cooperation in their respective countries, enable the Organization to focus on the provision of needed technical expertise—rather than on seed funding or mobilization of financial resources—to address specific national health and development priorities. During 2014-2015, Member States contributed a total of US\$ 254.2 million in national voluntary contributions to implement national technical cooperation programs. In addition, the *Mais Médicos* Program has achieved levels of implementation in excess of US\$ 1.163 billion.

Cooperation among countries for health development

The Organization's brand of triangular cooperation, Technical Cooperation among Countries (TCC), has long been recognized as an excellent mechanism for promoting good practices, sharing knowledge and expertise, and demonstrating solidarity, Pan Americanism, and South-South cooperation. Aware that both international health cooperation and TCC have evolved over time towards a broader concept of horizontal partnerships and cooperation among countries, PAHO Member States, in October 2013, approved a new policy on cooperation for health development in the Americas (Document [CD52/11](#)).

PASB commenced implementation of this policy with the establishment of a task force on cooperation among countries for health development (CCHD) and conducted an assessment of its TCC over the 2008-2013 period. Recommendations were made for making CCHD more strategic and inclusive of nonhealth sectors, civil society, and the private sector where appropriate, in order to continue advancing national health development. This broader modality better leverages health development expertise and generates new models for future collaborative efforts, particularly to address challenges associated with the Sustainable Development Agenda. PASB is uniquely positioned to spearhead CCHD, given its longtime role as convener of the Region's leading stakeholders in public health. The Bureau has implemented a mechanism to finance CCHD projects and developed procedural guidelines, project templates, and evaluation methodologies, which are being disseminated to Member States and strategic partners. Since 2014, there have been 51 qualifying projects under this cooperation modality, either completed or ongoing.

In addition, the Bureau created the Program for Strengthening Cooperation for Health Development in the Americas, in partnership with the FIOCRUZ Center for International Relations in Health, a PAHO/WHO Collaborating Center for global health and South-South cooperation. The Program aims to strengthen the capacities of international relations offices in countries, and representatives of 33 Member States participated in face-to-face meetings, virtual sessions, and work with mentors in areas connected with diplomacy and health cooperation, current global health challenges, global health governance, health in regional and subregional integration processes, and health in foreign policy.

Streamlining subregional technical cooperation

Subregional political integration entities in the Americas have existed since the mid-20th century. These entities represent groupings of countries through which PAHO's Member States jointly address issues, share experiences, and collaborate with each other. Given the importance of their political and decision-making power and the significant opportunity that they present to strengthen technical cooperation, PASB has, over the years, explored and implemented mechanisms to interact and cooperate with these entities in matters related to health.

For many years the Caribbean subregion has had a subregional program coordinator, a subregional biennial work plan (BWP), and, more recently, a formal subregional cooperation strategy that responds primarily to the CARICOM health agenda, the Caribbean Cooperation in Health (CCH). The subregional cooperation strategy complements, rather than duplicates, the CCSs within the subregion, and the CARICOM Secretariat is the Organization's major subregional counterpart in its implementation.

The disestablishment of five CARICOM regional health institutions (RHIs) culminated in the incorporation of their functions into the Caribbean Public Health Agency, which was established in 2011 through an intergovernmental agreement among CARICOM member countries. CARPHA began operations in January 2013, and PAHO, which previously managed two of the five RHIs as specialized centers,⁴⁶ provided significant human and financial resources for CARPHA's establishment. PASB continues to contribute to, and collaborate with, CARPHA in areas of common interest, including NCD prevention and control, strengthening core capacity for IHR implementation, and disaster prevention and response.

The Central and South American subregions have also had subregional BWPs, with technical advisors and CSC providing oversight of their implementation. However, since 2013, PASB has taken steps to strengthen the technical cooperation in these subregions through more structured collaboration with the respective major political integration entities to develop the subregional situation analyses and BWPs. More recently, PASB initiated the appointment of a subregional program coordinator for each of these two subregions.

PAHO's subregional technical cooperation strategy will continue to take advantage of opportunities to work strategically with the integration entities, and will foster cross-subregional exchanges where appropriate, strengthening and building on the CARICOM-SICA collaboration that already exists.

⁴⁶ PAHO's specialized centers were the Caribbean Epidemiology Center (CAREC) and the Caribbean Food and Nutrition Institute (CFNI).

301. Resources for development cooperation are becoming increasingly difficult to mobilize for the mostly middle-income countries of Latin America and the Caribbean. Therefore, it is imperative that PASB expand its support base beyond its traditional partners, and develop new approaches to mobilizing resources. In March 2017, PAHO and the Quebec (Canada) Ministry of Health and Social Services signed an agreement to engage in joint action on priority health issues, including health system strengthening, maternal and child health, and the social determinants of health. Activities under the agreement will include training sessions and seminars, dissemination of strategic information, development of joint projects, and the exchange of knowledge and experiences.

302. The shifting funding landscape and range of influential actors investing in health and development demand innovative and different methods of engagement. The Bureau made it an explicit priority to mobilize resources required to close the funding gap and achieve the objectives of the PAHO Strategic Plan 2014-2019, by restructuring and reprofiling specific departments, and recruiting new staff with the talents, professional skills, and competencies that the Organization now needs.

Management and administration

Human resources management

303. In 2014, the Bureau launched a human resources initiative titled A People Strategy for 2015-2019, with the goal of strengthening the Organization's most important asset: its human capital. The People Strategy aims to ensure that the Bureau can attract and retain top talent with the right skills and competencies, and that the Bureau's working environment enables staff members to perform at their best. The process to develop the People Strategy included staff surveys and working groups that considered three areas: work force architecture, skills renewal, and modernization of country offices and centers. Five overarching themes were developed and integrated into the People Strategy: strengthening alignment and agility; fostering talent at every level; driving performance and accountability; providing inspiring leadership for change; and creating a world-class work environment and an enabling human resources function.

304. PASB continued to offer extensive opportunities for its staff to develop new skills and knowledge, including the development of a new Learning Portal and individual learning plans for different units and departments. In 2016, the Bureau launched a new corporate e-learning platform in cooperation with WHO and began producing PAHO-specific learning modules to address key professional development competencies.

305. The Bureau implemented a new competency-based map that identifies core competencies for all Bureau staff—technical, administrative, and managerial—and the competency map was fully incorporated into all job descriptions and interviews in staff selection processes. The Bureau also continued to foster ethical conduct in its operations and activities, with several important initiatives to improve staff awareness of ethical

issues, address possible conflicts of interest, and enable improvements in the work environment, through the PAHO Integrity and Conflict Management System.

Enhancing PAHO's Integrity and Conflict Management System

PASB's Integrity and Conflict Management System (ICMS) aims to promote and enable transparency, ethics, and workplace fairness. The ICMS consists of a number of resources, including the Ethics Office (ICMS coordinator), the Office of the Ombudsman, IES, Human Resources Management (HRM), the Office of Legal Counsel (LEG), and the PAHO Board of Appeal. There is a toll-free, confidential Ethics Helpline, and the PAHO Staff Association actively engages with staff and the administration to ensure fairness and equity. Examples of the achievements of selected ICMS entities are summarized below.

Ethics Office

- Provided training on ethical issues, including development and implementation of a new e-learning course that focuses on the principles defined in the Bureau's Code of Ethical Principles and Conduct, the Policy on the Prevention and Resolution of Harassment in the Workplace, and the Zero Tolerance for Fraud and Corruption policy, among others. The aim of the course is to illustrate how mutual respect and collegial working relations can produce a more effective and productive work environment.
- Launched an initiative in 2014 to heighten staff awareness of ethical issues, with a new conflict-of-interest disclosure program designed to ensure that the private interests of staff do not interfere with their official duties or undermine the integrity of the Organization.
- Developed a new survey on the Bureau's ethical climate and work environment, designed to assess the work environment in different Bureau offices and to gauge awareness among staff about ICMS policies and resources. The survey also measured how comfortable people feel in working at PAHO and whether they feel that their work is valued. The results of the survey will be used to identify specific areas of concern that require additional attention.

Office of the Ombudsman

- Identified workplace concerns from PAHO personnel and developed recommendations to address them. Top issues included supervisory effectiveness, department climate, respect and treatment, career progression and development, work-related stress, work-life balance, and administrative decisions and application of rules. The recommendations included the reestablishment of an "in-person" orientation program for new employees; review of contract provisions regarding national and international PAHO consultants, with a view to strengthening compliance with both their letter and spirit; and consistent application of rules and policies related to PAHO workers contracted through employment agencies.
- Led the Respectful Workplace initiative, an intervention developed through a participatory process that included interdepartmental working groups and PAHO Staff Association representation. The initiative was launched in July 2015 to foster a climate of respect and inclusion throughout the Organization, and builds on earlier efforts by HRM in 2013, and the "Make Kindness Contagious" campaign led by the Special Program on Sustainable Development and Health Equity in 2014. In 2016, a training seminar on conflict resolution was developed and offered to staff at Headquarters and in country offices. An e-learning course to generate awareness of the early signs of conflict of interest will be launched in 2017.

306. As of 2012, the Bureau achieved gender parity among professionals both at Headquarters and in the country offices. This trend has continued, as reflected in staffing statistics for 2016 that show that 52% of posts in the professional and higher categories were held by women and 48% by men. In PAHO country offices and technical centers, the percentage of women in the professional categories increased from 47% in 2015 to 50% in 2016. However, the Organization continued to face the challenge of ensuring gender parity in senior-level managerial positions, and actions were being taken to identify solutions, including the establishment of a working group on gender parity to consider innovative ideas for attracting and retaining good candidates.

PASB Management Information System

307. In 2013, PASB signed a number of contracts with various software providers and for change management services, and recruited external as well as internal project managers in a continuation of efforts to establish the PASB Management Information System (PMIS) and ensure a more agile and efficient administrative infrastructure. PASB constituted and trained a PMIS implementation team, and developed detailed work, training, and change management plans. Formal PMIS training for staff began in November 2014.

308. The implementation of the system's first components, the Human Capital Management module and payroll component (phase 1) replaced many of the Bureau's human resources legacy systems, and a "Go Live Support Center" assisted staff during the rollout process. Lessons learned in phase 1 were documented to help improve functionality in phase 2, which saw implementation of the system's finance portion to replace core legacy financial systems.⁴⁷ Phase 2 was completed in January 2016, along with a Post-Go-Live Center that provided support to all PASB staff. A number of other existing systems continued to operate outside the scope of PMIS, including e-recruitment, taxes, pension, staff health insurance, and SharePoint.

309. In 2016, the Bureau completed the implementation of the PMIS, on time and within budget. Fully operational in four languages, PMIS supports 180 business processes and handles transactions in 24 different currencies, serving over 2,000 users in more than 30 locations throughout the Americas. The complexity and magnitude of the project presented significant challenges, including steep learning curves for staff, the need to manage unexpected system behaviors, and impact on staff workload balance. PASB devoted significant staff time and resources to Organization-wide training, change management, and system stabilization. Overall, the rollout has been accomplished with relatively minimal disruption to the implementation of the Bureau's technical programs and day-to-day operations. This experience is in marked contrast to that of many large international organizations when implementing new enterprise resource planning

⁴⁷ Including AmpesOmis, AMS/FMS (Award Management System/Financial Management System), FAMIS (Financial Accounting Management Information System), ADPICS (Advance Purchasing Inventory Control System), and SOS (Simplified Online Search).

systems, and it is attributable to good planning and the extraordinary efforts of Bureau staff at both Headquarters and field levels.

310. The PMIS has produced tangible benefits in streamlining many business processes, maximizing transparency, and fostering accountability and collaboration. PASB foresees greater benefits once the system is fully stabilized and the new ways of working are fully assimilated. PMIS is unique within the UN because it is cloud-based, permitting paperless business continuity, regardless of location. The UN System Staff College (UNSSC) selected PAHO as a case study of effective and efficient implementation of an enterprise resource planning system. UNSSC recognized that PMIS has driven improvements in PAHO's policies and standard operating procedures and has enhanced professionalism among PAHO personnel.

311. Capitalizing on the implementation of the PMIS Human Capital Management module, business processes related to human resources were reviewed and integrated. The cloud-based system has a robust mobile interface that allows users to perform tasks on tablets and smartphones, in addition to working from personal computers. This capability is especially important given PAHO's requirement to allow staff to approve transactions regardless of role and location. Further, to support human resources talent acquisition and recruitment, the recruiting platform Stellis was launched in early 2017. Designed jointly with WHO, the system uses cloud-based talent management software that brings the Bureau up to industry standards, and is expected to improve transparency and accountability in managing selection processes across the Organization.

Information technology

312. During the period under review, PASB approved a new information technology (IT) strategy and introduced a new IT governance process to coordinate expenditures on technology projects in all PAHO entities. In addition, the Internet domains of PAHO country offices and centers were merged into a single PAHO domain, and computer software was standardized, in order to reduce complexity, increase security, simplify support, and facilitate the implementation of future IT and knowledge management initiatives. A new "PAHO in the Cloud" initiative was implemented, allowing Headquarters staff to access their desktop environments from anywhere and on any device, and to remotely access PAHO tools, services, and shared repositories.

313. In 2014, the Bureau completed a comprehensive IT assessment that resulted in recommendations for further modernization of this key area of institutional support. The recommendations were incorporated into an updated IT strategy for 2015-2019, with five focus areas: technical program support, country office support, PMIS, IT innovation, and maintaining stable IT operations. The strategy responds to important changes in the Bureau's IT needs and environment, including the introduction of the PMIS, growing demands from PAHO technical programs, the proliferation of cloud-based services, anticipation of an unusually high turnover of IT personnel in the next five years, information security challenges, and the expansion of social media into the workplace.

The new strategy provides a framework for IT management, offers a mechanism for determining levels of investment and allocations across the entire IT portfolio, and gives a benchmark for total IT spending. The Bureau further revised the IT governance process to improve decision-making and priority-setting for all IT-related projects and investments.

314. In a continuation of the implementation of the updated IT strategy, in 2015 an innovative, multilingual cloud-based Service Request System (SRS) was instituted to support all users and systems across the Bureau. The SRS enables users to triage, prioritize, assign, and escalate requests to the appropriate resource and track their resolution. In addition, a new tablet-based paperless system was created for conferences and meetings; Internet security at Headquarters was improved, with new software for Web content monitoring and filtering, and with last-generation firewalls; and network upgrades were made to improve data speed and application response, with additional improvements in backup systems and data recovery. Virtual collaboration systems were strengthened, with legacy institutional Web-conferencing services being replaced by higher-bandwidth, cloud-based WebEx services. The adoption of Microsoft Office services (Office 365) also increased efficiencies in communication and collaboration within a secure, managed, and cost-effective cloud environment.

315. In the area of technical program support, improvements focused on developing and supporting health technical information systems and integrating existing health information platforms to improve ease of use and reduce overall costs for the Organization. Improvements included deployment of a new invoice verification system for the *Mais Médicos* Program in Brazil; improvements in the PAHO Mortality Database; assessment of the PAHO Health Information Platform (PLISA); and the implementation of a vaccine surveillance tool and a new dengue application that will allow countries to transmit their surveillance data to PLISA using a standardized format.

316. Country office support focused on improved centralized service delivery, with reduction of local physical infrastructure in favor of strong and secure connectivity and simplified management of IT services. Internet bandwidth was increased in order to enhance country office connectivity both to the cloud and to Headquarters' systems; telephone and server infrastructures were upgraded; and a number of desktop computers were replaced.

Strategic communication

317. PASB recognized the need to better articulate PAHO's remarkable story—including Member States' achievements and innovations in public health—to potential new partners, as well as to enhance the ability of staff across the Organization to develop more diversified relationships with nontraditional social and health investors. In this regard, a new communications strategy was defined for the Organization, with the aim of promoting PAHO and enhancing its reputation as a learning and forward-looking organization, a credible and preferred source of health information, and a reliable and

trustworthy partner in health development. PASB applied innovative technologies and communication platforms, including greater use of virtual conferencing, to strengthen communication with Member States and participation in networks within, and outside of, the Region.

318. The Bureau continued to produce and disseminate numerous technical documents and informational brochures, posters, and other products to promote health and provide technical guidance, increasingly distributing the materials through its website and reducing the need to print them. PASB enhanced its coverage of global and regional public health–related events, by taking advantage of such social media tools as Twitter, Flickr, YouTube, Facebook, and Facebook Live. Facebook Live facilitated interviews with the PASB Director, ministers of health, and other key health champions, and enabled technical entities to more easily communicate “live.” Both the PAHO Internet and intranet pages were redesigned, with the latter featuring a “Country Focus” highlight that reports news and developments submitted by country offices.

319. Importantly, media outreach has been strengthened through targeted messaging and direct responses to media queries. Improvements in strategic communication have contributed to stronger positioning and ranking of the Organization within the international community.

9. CONCLUSION AND LOOKING FORWARD TO 2030

320. PAHO's technical cooperation contributed to continued capacity strengthening and many successes in countries, and at the subregional and regional levels, during the period of this report. PAHO's Member States and PASB made use of well tested modalities, such as the development and use of policies and guidelines, but also devised creative and innovative ideas, approaches, and tools, as in the use of eHealth and the introduction of new technologies and information-sharing platforms, to address priority public health issues in the Region of the Americas. Member States demonstrated their solidarity and collaborated closely with PASB and each other as they sought to reduce health inequities, make progress towards universal health, and ensure the well-being of their populations. However, there were many challenges during the period, and many of them remain.

321. Though poverty has declined significantly in the Region over the past decade, inequity in health is still one of the most important public health challenges in the Americas. Most countries of the Region recognize health as a basic right, and their push to universal health is a tangible expression of the progressive realization of the right to health and the reduction of health inequities. Increasingly, countries are aware of the importance of information systems for health that provide disaggregated data related to the social determinants of health, and that take into account data from nonhealth sectors, as they develop policies, plans, and programs for equitable health development.

322. The importance of inclusiveness as a strategic focus to reduce health inequities is also gaining ground. The health sector alone cannot do all that is needed for the health and well-being of the national population and disadvantaged, underserved, and vulnerable population groups. Multisectoral collaboration and action are imperative, with involvement of civil society and the private sector. Such involvement should be within the framework of national health policies, strategies, and plans, to ensure cohesive action towards agreed health development objectives and identification of roles, responsibilities, and resources.

323. Resource allocation and mobilization to support the Organization's technical cooperation is likely to assume even greater importance in the future, if the Region's achievements are to be protected and new challenges dealt with efficiently and effectively. There will be a need to more strongly emphasize mechanisms for enhancing traditional and nontraditional partnerships and for devising efficient and effective methods to take greater advantage of countries' capacities, expertise, and such resources as cooperation among countries for health development.

324. Other challenges, which affect some countries in the Region more than others, include: inadequate financial resources due to economic difficulties; frequent changes in governments and political administrations, sometimes with interruptions in policy development and/or implementation; limited capacity to identify, document, and address health inequities and the social determinants of health, including through interculturalism

and social protection; inadequate attention to prevention and primary health care, with continuing overemphasis on treatment and tertiary care; limitations in human resources for health (in numbers, categories, and distribution); interference from industry entities, particularly with regard to NCD prevention and control; recurring emergencies and outbreaks that distract attention and divert resources from other important health development issues; and uncontrolled immigration that has the potential to overwhelm local and national health systems.

325. Several countries are close to eliminating selected communicable diseases, including mother-to-child transmission of HIV and congenital syphilis, and some neglected infectious diseases. With continued political will, adequate resources, strengthened health systems, and effective partnerships, PAHO's technical cooperation will enable the final steps to elimination. However, other communicable diseases, such as Zika virus and its complications, mandate continued interventions to prevent, detect, and control them, and to deal with their health and social consequences.

326. The major programmatic priorities are likely to remain on the health and development agendas of PAHO's Member States for the foreseeable future. These priorities include health systems strengthening for universal health and resilient health systems; preparedness for, and response to, disease outbreaks and natural and man-made disasters; prevention and control of communicable and noncommunicable diseases; and addressing health throughout the life course, including the social and environmental determinants of health. Other issues, such as the health of migrants, indigenous peoples, and Afro-descendants are also high on countries' agendas.

327. The fight against noncommunicable diseases must continue to include legislation and regulatory frameworks to prevent and control the risk factors. This will enable behavior change and the adoption of healthy lifestyles, in tandem with continuous quality improvement in treatment and rehabilitation. Greater effort must be devoted to providing evidence of the negative national economic and productivity impacts of NCDs, including mental disorders, in order to drive advocacy, scaling-up of prevention and control efforts within the health sector, and stronger involvement of nonhealth sectors. Tackling the epidemic of overweight and obesity in the Region will be critical.

328. PASB's technical cooperation will continue to respond to national, subregional, and regional health priorities and to strengthen national capacity to address them. These efforts will be guided by resolutions and recommendations from PAHO's Governing Bodies within the framework of global, regional, and subregional mandates and agreements, as well as national policies, strategies, and plans. Major international frameworks to guide PAHO's work in addressing the challenges include the SDGs, the Framework Convention on Tobacco Control, the International Health Regulations, the Sustainable Health Agenda for the Americas 2018-2030, the remaining period of the PAHO Strategic Plan 2014-2019, and a new strategic plan for 2020-2024 that will be developed. The tailoring of technical cooperation to achieve the objectives in these instruments will be guided by subregional and country cooperation strategies formulated

in close collaboration with the respective subregional and national authorities, and with the participation of other key stakeholders in health.

329. The main priorities for the Organization's technical cooperation and institutional development over the next five years will be:

- a) advancing universal health through resilient health systems based on the primary health care approach, and ensuring universal access to quality and comprehensive services throughout the life course
- b) ensuring that all countries can meet and sustain their obligations under the IHR (2005), with strong national and regional emergency and disaster preparedness and response capacity
- c) driving the response to antimicrobial resistance in the Americas, in collaboration with the animal health and agricultural sectors
- d) promoting renewed focus on equitable health for all women and children, ethnic groups, indigenous populations, and persons living in conditions of vulnerability, while continuing to emphasize and mainstream gender, equity, human rights, and ethnicity in all of PAHO's work
- e) advancing the elimination of communicable diseases, with expansion of the number of countries certifying elimination of malaria, TB, and neglected infectious diseases; working towards elimination of HIV transmission in the Region by 2030; and expanding vector control initiatives
- f) ensuring that the Region is on course to reduce NCD mortality by 25% by 2025, and by 33% by 2030, by addressing risk factor reduction, strengthening health systems, and improving national capacity for NCD surveillance and response
- g) advocating for improvements in the determinants of health through multisectoral approaches, and leading the regional health sector response to climate change
- h) increasing access to medicines across the Region, with promotion of increased production, technology transfer, pooled purchasing, and improved supply chain management
- i) ensuring that the Region is on track to achieve all the targets of SDG 3, as well as the health-related targets in other SDGs
- j) continuing PAHO's institutional strengthening, with deepening of the commitment to country focus, through scaling up the development of CCSs, promoting CCHD, undertaking differentiated technical cooperation to address country-specific priorities, and enhancing subregional cooperation; through ongoing efforts for more efficient and effective governance and managerial and administrative systems; and by enabling financial sustainability through diversification of long-term resourcing and greater efficiency

330. In addressing these priorities, PASB will seek to—among other strategies—continuously strengthen information systems for health; measure and monitor inequities; promote, and contribute to the implementation of, internationally agreed, legally binding instruments; incorporate lessons learned; share experiences, good practices, and information; promote, facilitate, and monitor multisectoral, whole-of-government, whole-of-society, Health In All Policies approaches; create and enhance partnerships; and implement strategies to mobilize the human, technical, and financial resources needed to achieve technical cooperation objectives.

331. PAHO's efforts will play a major role in enabling technical cooperation successes and in achieving national health development goals. Among these are the Organization's strategic partnerships and alliances; its promotion of, and contribution to, South-South, North-South, and triangular cooperation; and its resource mobilization capacity. PAHO's dual status as the specialized agency for health of the inter-American system and the WHO Regional Office for the Americas gives it access to a wide range of expertise and provides added value to its role as broker, convener, and facilitator in catalyzing actions at subnational, national, subregional, regional, and global levels.

332. The Pan American Sanitary Bureau will work to maintain PAHO's fitness for purpose, performing its core functions, scanning the global environment, celebrating successes, and anticipating and preparing for eventualities, in order to “get the job done,” in service to PAHO's Member States and the health of the peoples of the Americas.

Acronyms and abbreviations

AECID	Spanish Agency for International Development Cooperation
APR LAC	A Promise Renewed for the Americas
ART	antiretroviral therapy
BIREME	Latin American and Caribbean Center on Health Sciences Information
BWP	biennial work plan
CAPRADE	Andean Committee for Disaster Prevention and Assistance
CARICOM	Caribbean Community
CARPHA	Caribbean Public Health Agency
CAREX	CARcinogen EXposure
CCHD	cooperation among countries for health development
CCS	Country Cooperation Strategy
CDC	Centers for Disease Prevention and Control (United States of America)
CKD	chronic kidney disease
CKDnT	chronic kidney disease of nontraditional or unknown causes
CLAP/WR	Latin American Center for Perinatology/Women and Reproductive Health
COMISCA	Council of Central American Ministers of Health
CRS	congenital rubella syndrome
CSC	Country and Subregional Coordination (PAHO office)
CVD	cardiovascular disease
CZS	congenital Zika syndrome
DFID	Department for International Development (United Kingdom)
DINEPA	National Directorate for Water Supply and Sanitation (Haiti)
ECLAC	Economic Commission for Latin America and the Caribbean
EMT	Emergency Medical Team
EOC	Emergency Operations Center
EPHF	essential public health function
EPI	Expanded Program on Immunization
FAO	United Nations Food and Agriculture Organization
FCTC	Framework Convention on Tobacco Control
FENSA	Framework on Engagement with non-State Actors
FIOCRUZ	Oswaldo Cruz Foundation (Brazil)
FMD	foot-and-mouth disease
GDP	gross domestic product
HCC	Healthy Caribbean Coalition
HiAP	Health in All Policies
HIV/AIDS	human immunodeficiency virus/acquired immune deficiency syndrome
HPV	human papillomavirus
HRH	human resources for health
HSI	Hospital Safety Index
IAEA	International Atomic Energy Agency
ICD	International Classification of Diseases
ICF	International Classification of Functioning, Disability and Health
ICMS	Integrity and Conflict Management System
IDB	Inter-American Development Bank
IES	Internal Oversight and Evaluation Services
IHR	International Health Regulations

IICA	Inter-American Institute for Cooperation on Agriculture
IMF	International Monetary Fund
IMS	Incident Management System
INSP	National Institute of Public Health (Mexico)
IHSN	integrated health service network
IT	information technology
MDR TB	multidrug-resistant tuberculosis
MERCOSUR	Southern Common Market
mhGAP	Mental Health Gap Action Program
NCD	noncommunicable disease
NGO	nongovernmental organization
NID	neglected infectious disease
NRA	national regulatory authority
OAS	Organization of American States
OECS	Organization of Eastern Caribbean States
ORAS/CONHU	Andean Health Agency–Hipólito Unanue Agreement
PAHO	Pan American Health Organization
PASB	Pan American Sanitary Bureau
PED	Department of Emergency Preparedness and Disaster Relief (PAHO)
PHE	Health Emergencies Department (PAHO)
PHEFA	Hemispheric Program for the Eradication of Foot-and-Mouth Disease
REMSAA	Meeting of Ministers of Health of the Andean Area
RIMSA	Inter-American Meeting at the Ministerial Level on Health and Agriculture
Rio+20	UN Conference on Sustainable Development
SICA	Central American Integration System
SIP	Perinatal Information System
SIP-A	Perinatal Information System clinical record for abortion
SSB	sugar-sweetened beverage
SSP	sanitation safety plan
STI	sexually transmitted infection
SUS	Unified Health System (Brazil)
TB	tuberculosis
TCC	Technical Cooperation among Countries
UN	United Nations
UNAIDS	Joint United Nations Program on HIV/AIDS
UNDG LAC	United Nations Development Group for Latin America and the Caribbean
UNDP	United Nations Development Program
UNEP	United Nations Environment Program
UNICEF	United Nations Children’s Fund
U.S.	United States of America
USAID	United States Agency for International Development
VCPH	Virtual Campus for Public Health
WHA	World Health Assembly
WHE	Health Emergencies Program (WHO)
WHO	World Health Organization
WSP	water safety plan

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