

CORE INDICATORS 2019

HEALTH TRENDS IN THE AMERICAS



PAHO



Pan American
Health
Organization



World Health
Organization
REGIONAL OFFICE FOR THE
AMERICAS



25 YEARS AND BEYOND

CORE INDICATORS 2019

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TRENDS
IN THE
AMERICAS

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Washington, D.C.
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Abbreviations and Acronyms

ADD	acute diarrheal diseases: ICD-10: A00-A09
AIDS	Acquired Immunodeficiency Syndrome
APC	alcohol per capita
ARI	acute respiratory infections: ICD-10: J00-J22
ART	antiretroviral treatment
BCG	anti-tuberculosis vaccine (bacille Calmette-Guérin)
CI	core indicator
DTP3-vc	third dose of diphtheria-tetanus-pertussis-containing vaccine
GDP	gross domestic product
GNI	gross national income
HIV	human immunodeficiency virus
lb	live births
MDG	Millennium Development Goals
MMR1	first dose of measles, mumps, and rubella vaccine
NCD	noncommunicable diseases
PAHO	Pan American Health Organization
PCV3	third dose of pneumococcal conjugate vaccine
PLISA	PAHO's Health Information Platform for the Americas
Polio3	third dose of oral polio vaccine or inactivated polio vaccine
pop	population
PPP	purchasing power parity
SDG	Sustainable Development Goals
SDG3	Sustainable Development Goal 3: Ensure healthy lives and promote well-being for all at all ages
SHAA 2018–2030	Sustainable Health Agenda of the Americas 2018–2030
STEPS	STEPwise approach to chronic disease risk factor surveillance
UK	United Kingdom
UN	United Nations
US	United States of America
WHO	World Health Organization

Foreword

THIS YEAR, WE CELEBRATE A MILESTONE ACHIEVEMENT, the 25th anniversary of the publication of **Core Indicators**. Every year for the past quarter-century, this publication has provided the latest information on key health and health-related indicators for the Americas. Since the inception of the Core Indicators Initiative, the Pan American Health Organization (PAHO) has been at the global forefront for institutionalizing and monitoring a core body of population health information to guide the development of health policies and programs.

This year's edition presents selected core indicators data in a visual, thought-provoking format to illustrate notable trends over the past 25 years. Additionally, we are providing the traditional data tables on 82 core indicators for the countries, territories, and subregions of the Americas, grouped according to the following categories: demographic and socioeconomic, health status, risk factors, service coverage, and health systems. Information is also presented on 18 indicators of the Sustainable Development Goals (SDGs). For the complete set of core indicators data and complementary information, we invite you to visit PAHO's online Platform for Health Information at www.paho.org/plisa.

Since the adoption in 1997 of resolution CD40.R10 on the "Collection and Use of Core Health Data," PAHO has been positioned as a leading institution for monitoring the health of the population of the Americas. Since that time, our countries have taken advantage of improvements in technology. As a result, we are able to provide information in a more frequent and timely manner, thereby improving the production of evidence in health to inform decision-making. Also, it is important to recognize that our Member States have been continuously improving the coverage, quality, and availability of the data we collect, assuring that our Region is using the most recent and accurate information to monitor the Region's progress to ensuring healthier lives.

This year's publication presents an analysis on the following topics:

- **The demographic transition** highlights the importance of the rapid transformation our Region has experienced in the

last 25 years, with a decline in fertility, a reduction in the proportion of young people in the population, and longer life expectancy. This transformation is increasingly posing a challenge to our health systems to respond to the needs of our aging population.

- **The wealth distribution** illustrates the income inequality within our Region. This unequal distribution of wealth leads to persistent inequities in health, as the Americas continues to be one of the most inequitable regions of the world.
- **The epidemiological transition** continues to evolve in our Region. It is analyzed here through the perspective of the life course approach: the mortality trends in different stages of childhood; trends in selected communicable diseases (HIV, malaria, and tuberculosis); the elimination of vaccine-preventable diseases; and the alarming rise in the prevalence of overweight and obesity, key risk factors for noncommunicable diseases.
- **Out-of-pocket health expenditure** identifies the gaps among countries when comparing health spending as a proportion of the total health expenditure. The regional and subregional trends underscore the differences in the wealth among countries of the Region and the impact on national health expenditures.

The data presented herein were collected from the countries and validated by the Organization's technical entities. Collaborations with ministries of health and national statistical institutes in countries and territories of the Region of the Americas, as well as various specialized agencies of the United Nations system, were essential in the preparation of this publication.

I sincerely congratulate all of our countries and territories on this anniversary, and I remain confident that these data on the health situation of the population of the Americas will continue to be an invaluable source for policy-making and analysis of health systems performance, as we forge forward to meet the goals of the Sustainable Health Agenda of the Americas 2018–2030 (SHAA 2030).

Dr. Carissa F. Etienne
Director



Introduction

EACH YEAR, THE CORE INDICATORS DOCUMENT IS distributed in hard copy to provide regional data on a selected set of indicators. In addition to the printed document, data for 270+ indicators are published online, within the Core Indicators section of PAHO's Health Information Platform for the Americas (PLISA, according to the acronym in Spanish). Compliant with the terms outlined by Member States in Resolution CD40.R10 on the "Collection and Use of Core Health Data," much of the data are reported from countries, while the remaining data are obtained from UN Inter-Agency estimates to facilitate comparability among subregions and countries. The Core Indicators database contains a series of data from 1995 to 2019, and longer data series where available, for countries and territories in the Region of the Americas. These data are comparable to allow for trend analysis over time, by indicators, subregion, or country. More importantly, the data include sources and corresponding technical notes that are easy to locate and download. You can find this information and more at www.paho.org/plisa.

Core Indicators 2019: Health Trends in the Americas starts with a demographic overview of the Americas to demonstrate how the Region has changed over 25 years. These key demographic indicators provide valuable context to better understand the population's characteristics and their impact on health. Brief narratives accompany the graphics to highlight important information.

The second section, "Trends in Health, 1995–2019," presents trend data for health indicators of interest within the topics of life expectancy, mortality, communicable and noncommunicable diseases, and risk factors. This section highlights remarkable strides in improving the population's health within the Americas, while at the same time observing that there is still much more work ahead to ensure equitable health across the Region.

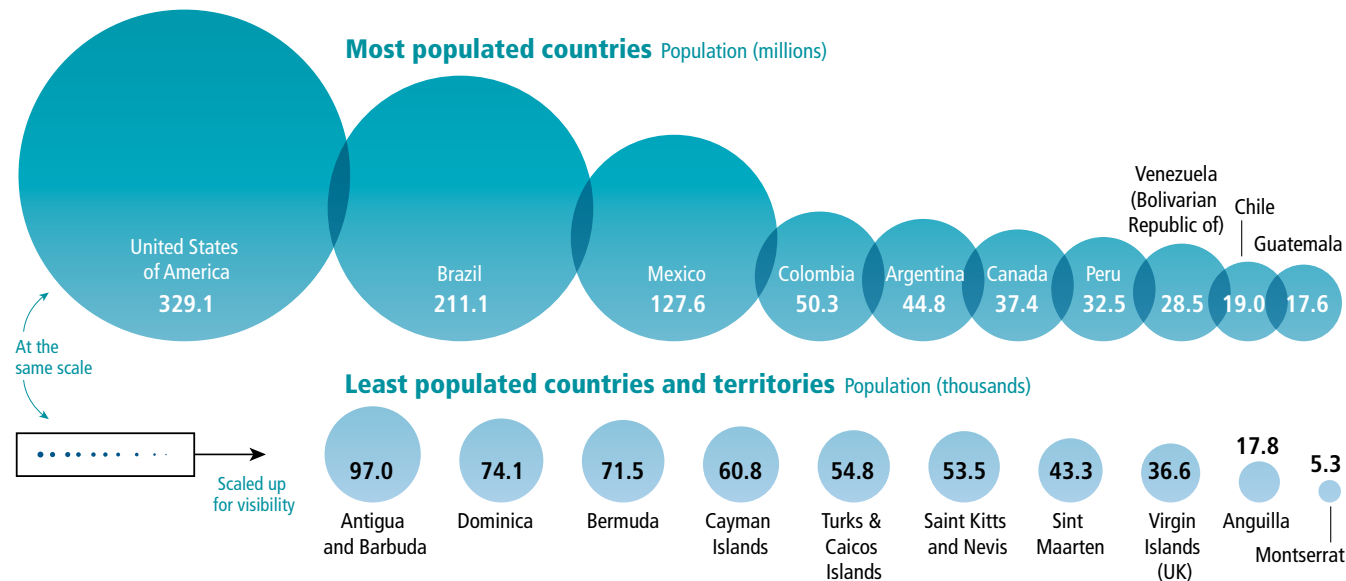
The third section contains the traditional Core Indicators Data Tables updated each year for the past 25 years. The information in these tables reflects the data obtained from the 2019 round of data collection, reported from countries and territories, and UN Inter-Agency estimates. Table footnotes and notes in the appendixes provide the source and the years covered for the corresponding data. Core indicators data are always available online on the PLISA platform at www.paho.org/data/index.php/en/indicators.html.

2019 >>>

Regional Demographic Context

Population 2019

THE TOTAL POPULATION OF THE AMERICAS was 1.01 billion inhabitants in 2019, having surpassed the 1-billion threshold in 2017. In the last 25 years, the Region as a whole has grown by 31%. In 2019, the 10 countries with the largest populations comprised 89% of the Region's total, and they have grown by 30% since 1995. In contrast, the 10 countries with the smallest populations comprise just 0.05% of the regional population; however, they have grown by 42% since 1995.



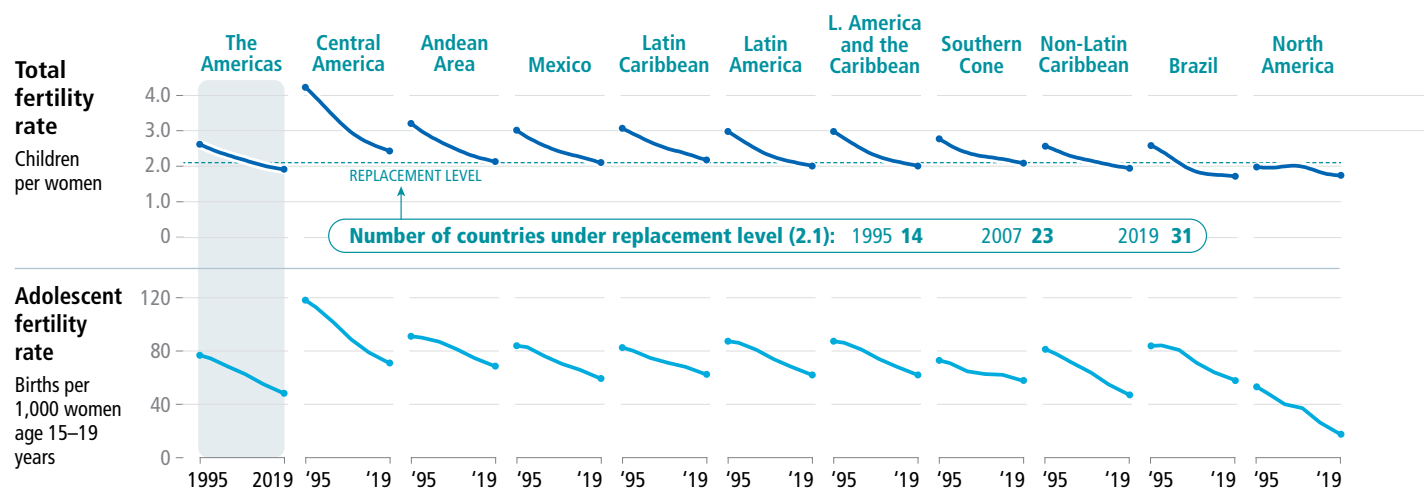
Source: PAHO. PLISA. Core Indicators 2019 (Internet).

Total fertility and adolescent fertility rate

by subregion, Region of the Americas, 1995–2019

TOTAL. Over the last 25 years, the fertility rate in the Americas has decreased from 2.6 in 1995 to 1.9 in 2019, falling below the replacement-level fertility of 2.1, the value which represents the average number of children per woman to ensure a stable population size. A fertility rate below 2.1 means that the population will decrease over time.

ADOLESCENT. There were an estimated 48.3 births per 1,000 women age 15–19 years in the Americas in 2019. However, these rates vary widely among countries. In North America, the adolescent birth rate is 17.6, while in Central America it is 71.1. Although the rate decreased by 37% in the 25-year period, teenage pregnancy rates in the Americas remain among the highest, globally.

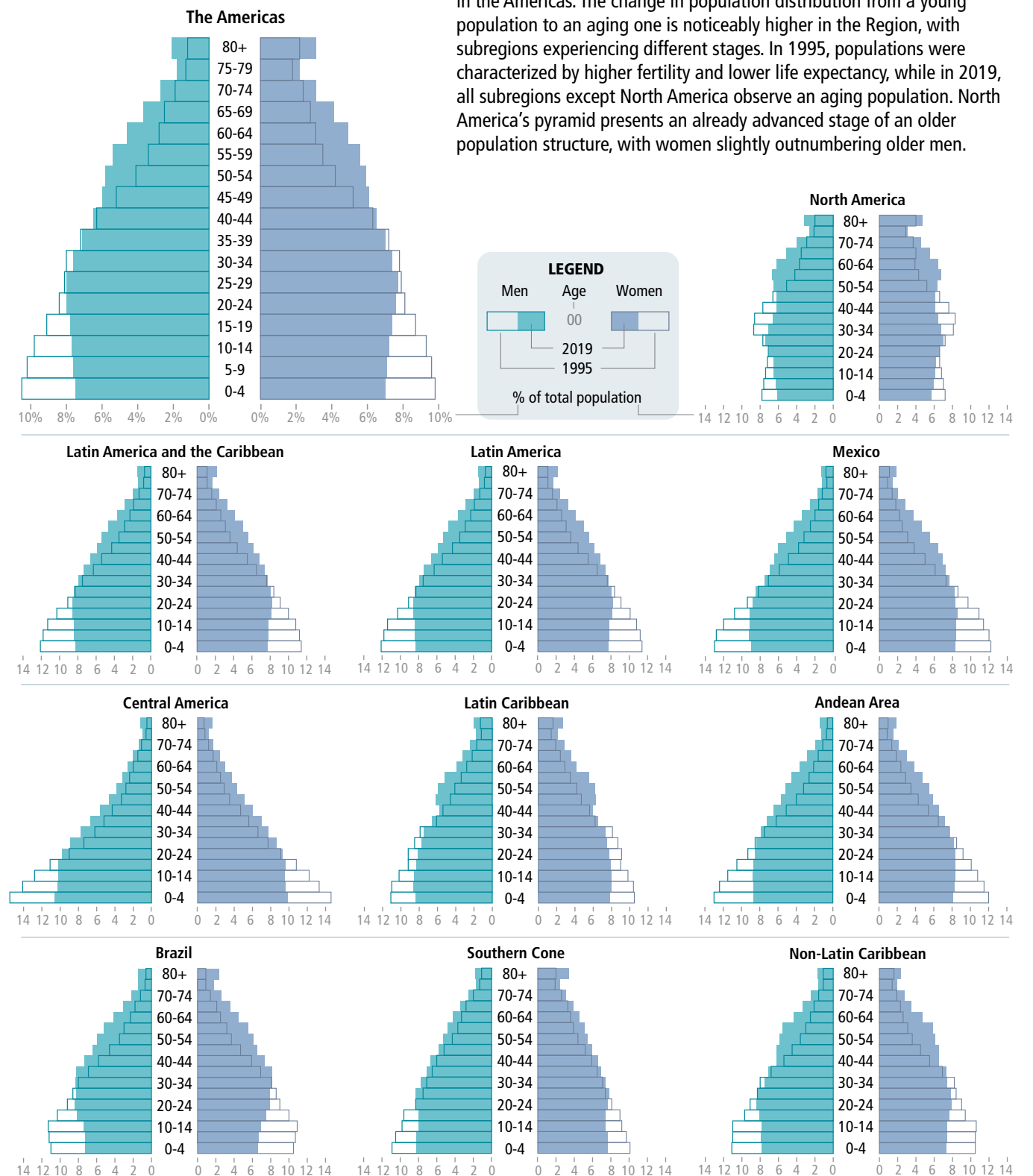


Source: PAHO. PLISA. Core Indicators 2019 (Internet).

Demographic transition

by subregion, Region of the Americas, 1995 and 2019

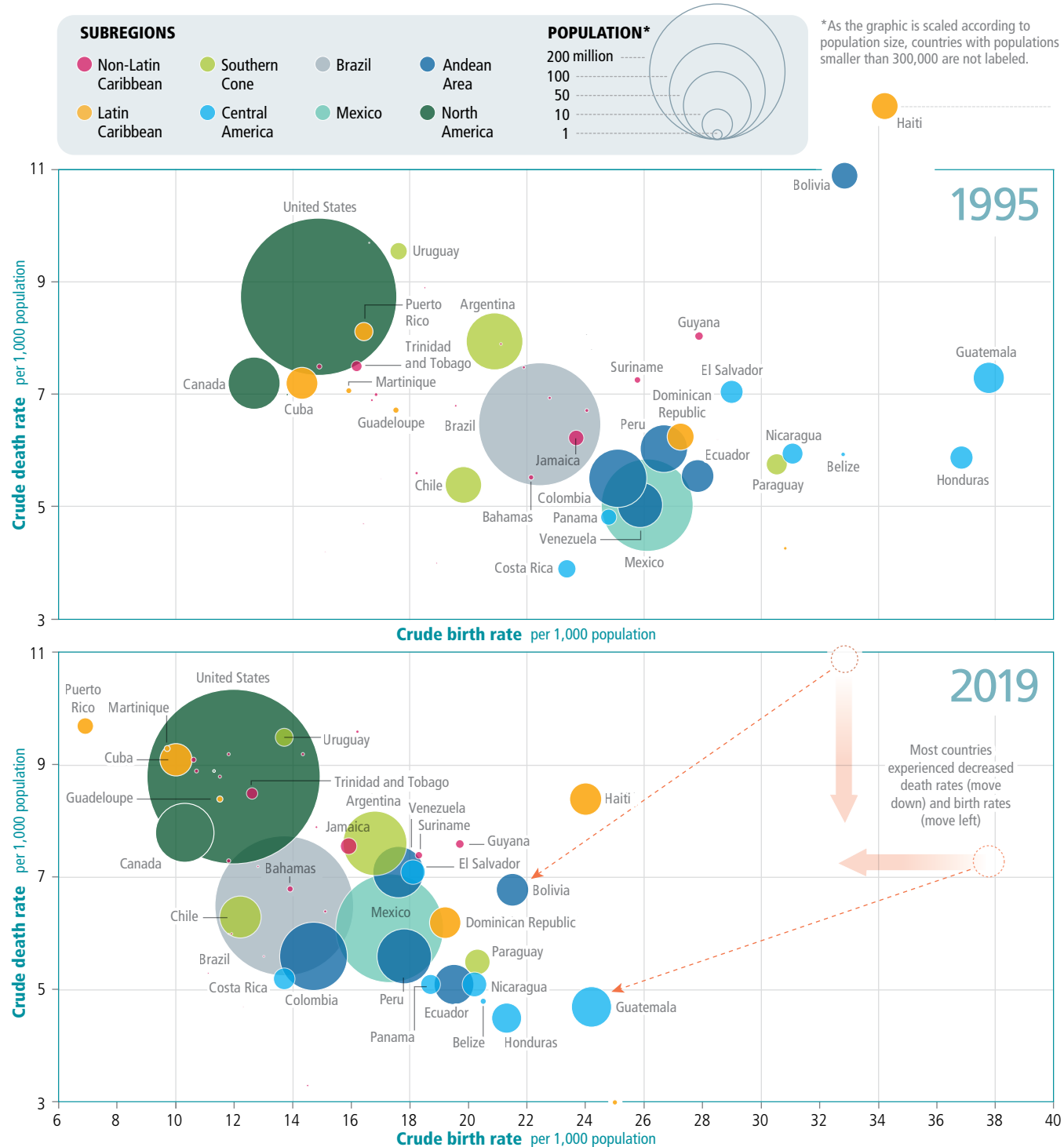
THE DEMOGRAPHIC TRANSITION OBSERVED IN 1995 continues today in the Americas. The change in population distribution from a young population to an aging one is noticeably higher in the Region, with subregions experiencing different stages. In 1995, populations were characterized by higher fertility and lower life expectancy, while in 2019, all subregions except North America observe an aging population. North America's pyramid presents an already advanced stage of an older population structure, with women slightly outnumbering older men.



Source: PAHO. PLISA. Core Indicators 2019 (Internet).

Birth and death rates by country and subregions of the Americas, 1995 and 2019

IN THE 25 YEARS SINCE 1995, all countries and territories in the Americas experienced a decrease in their crude birth rate. In some countries, this change was accompanied by a similar reduction in their crude death rate. Other countries experienced no change in their crude death rate, while still others observed an increase in their crude death rate. For example, the crude death rate in Bolivia decreased from 10.9 in 1995 to 6.8 per 1,000 population in 2019 and the crude birth rate decreased from 32.8 to 21.5 per 1,000 population during the same period. Similar trends are observed for Guatemala. These dynamics reflect the different maturation stages in each country's demographic and epidemiological transitions.

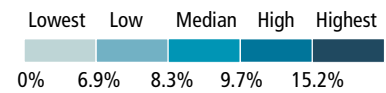


Source: PAHO. PLISA. Core Indicators 2019 (Internet).

Aging population by country, Region of the Americas, 1995 and 2019

IN 2019, THERE WERE 116 MILLION people age 65 years or over in the Americas, accounting for 12% of the Region's total population. This is almost double the number from 1995, when there were 62 million older adults in the Americas, representing 8% of the total population at that time. Apart from Canada and the United States of America, the countries with the highest proportion of an older adult population are in the Caribbean.

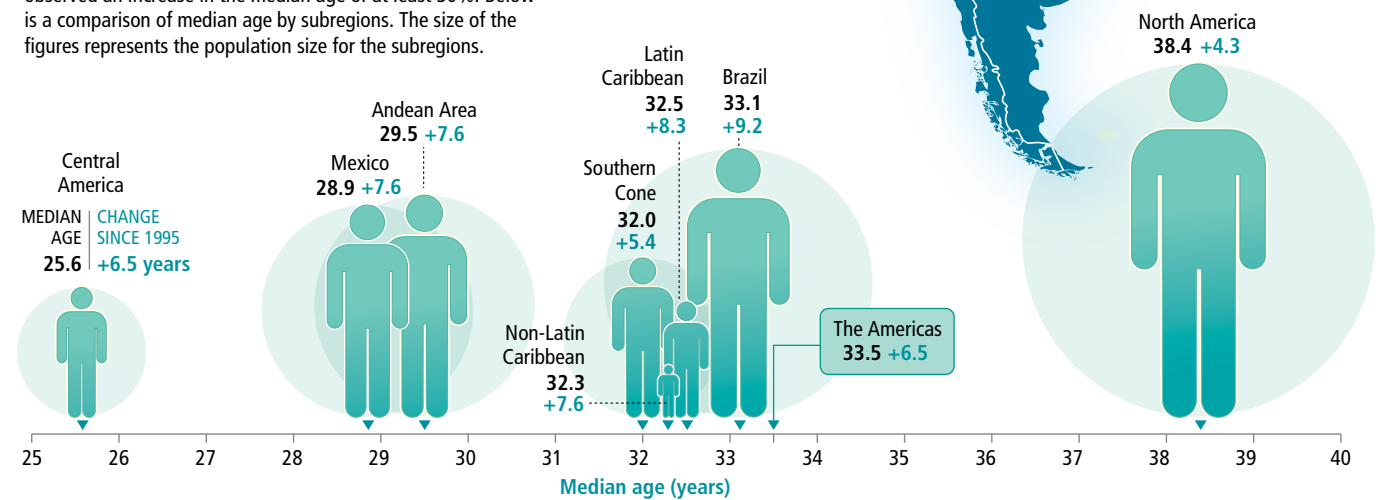
Population aged 65 or over (%)



Note: Only countries with populations above 90,000 are presented.

Median age by subregions, Region of the Americas, 1995 and 2019

In the Region of the Americas, the median age increased by 24% over the 25-year period, from 27.0 years in 1995 to 33.5 in 2019. All subregions, except North America and the Southern Cone, observed an increase in the median age of at least 30%. Below is a comparison of median age by subregions. The size of the figures represents the population size for the subregions.

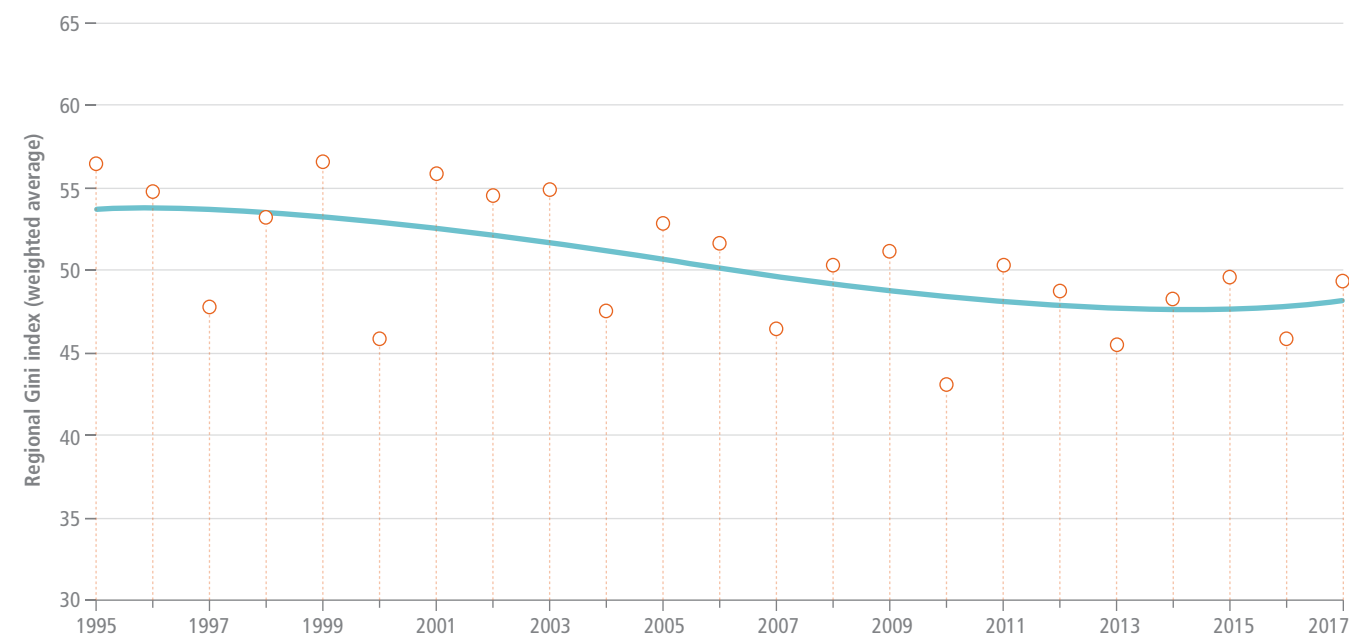


Source: PAHO. PLISA. Core Indicators 2019 (Internet).

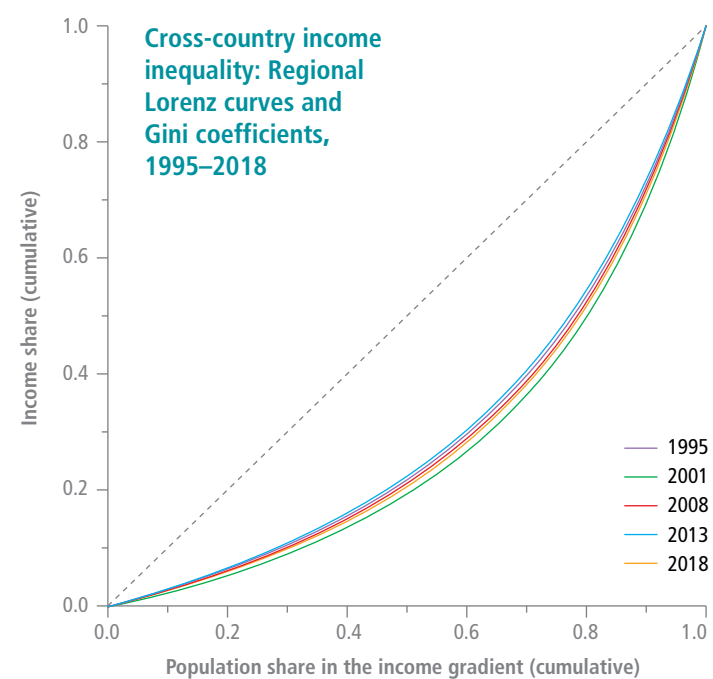
Income inequality Region of the Americas

THE AMERICAS IS ONE OF THE MOST INEQUITABLE REGIONS OF THE WORLD with respect to income distribution when comparing countries. This income inequality generates inequality in other social determinants, which, in turn, produces inequalities in health. The Gini index is a measure of disproportionality in the distribution of income among members of a population, ranging from 0 (equality) to 100, and is sometimes used as a proxy for measuring wealth. The graph shows the 1995–2017 trend in the weighted average of national Gini index, which highlights 1) the extreme level of income inequality (approximately 50% over time) and 2) the well-documented Gini index decrease by more than 10 percentage points during the Millennium Development Goals (MDGs) period (from 57% in 1999 to 46% in 2016).

Regional income inequality trend, 1995–2017



The graph to the right includes five Lorenz curves of regional income inequality over this time, using the gross national income per capita (GNI). It illustrates the persistence of income inequality in the Americas: the poorest 20% of countries have an income share of about 6% (that is, 6 out of every 100 dollars), whereas the richest 20% of countries have an income share close to 48%. That gap between the Lorenz curve and the diagonal line representing equality must be bridged in order to *leave no one behind*.



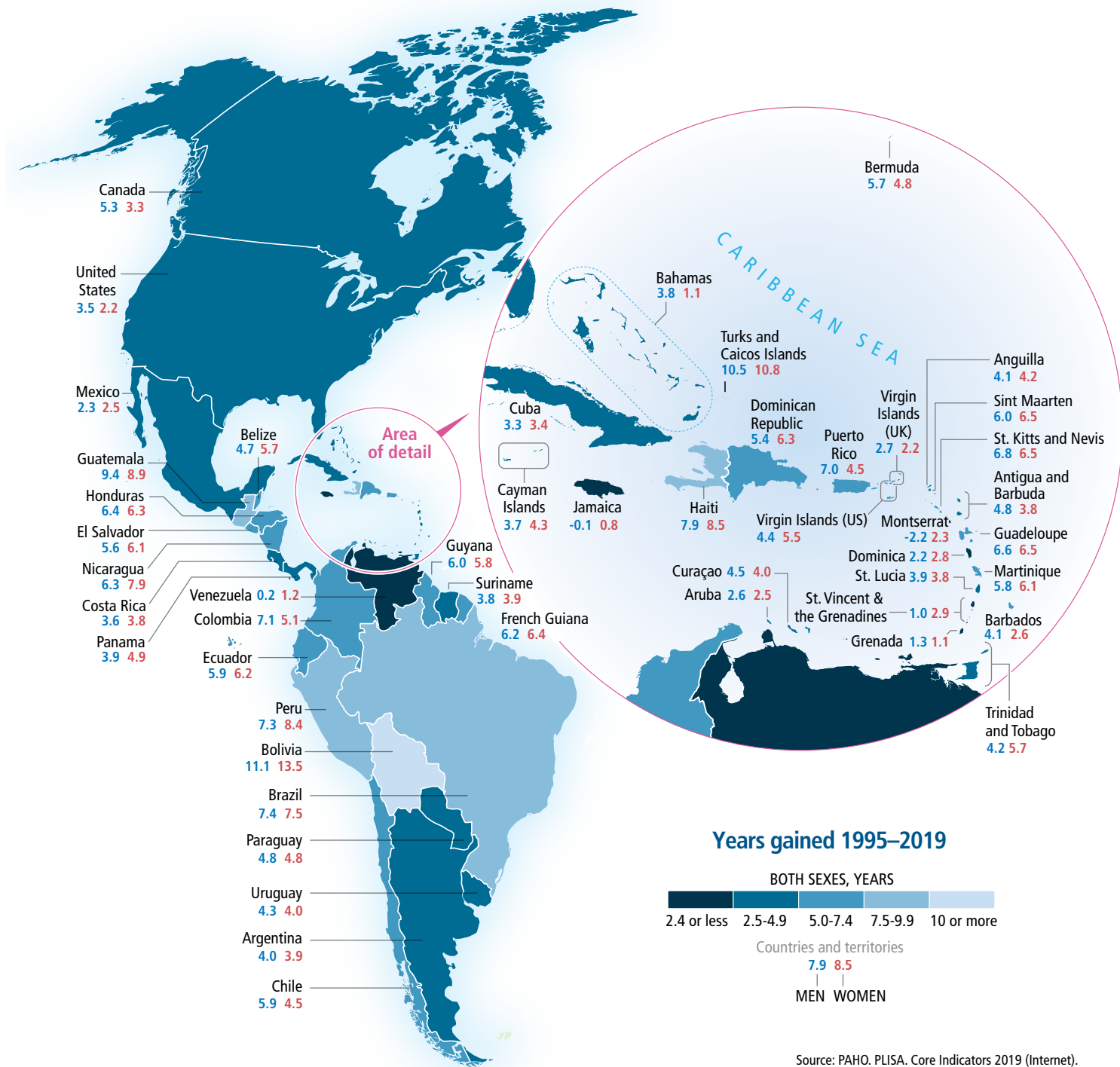
Source: PAHO. PLISA. Core Indicators 2019 (Internet).
Analysis: PAHO/WHO. Department of Evidence and Intelligence for Action in Health, 2019.

Trends in Health >>>
1995–2019

Years gained in life expectancy at birth

by country, Region of the Americas, 1995–2019

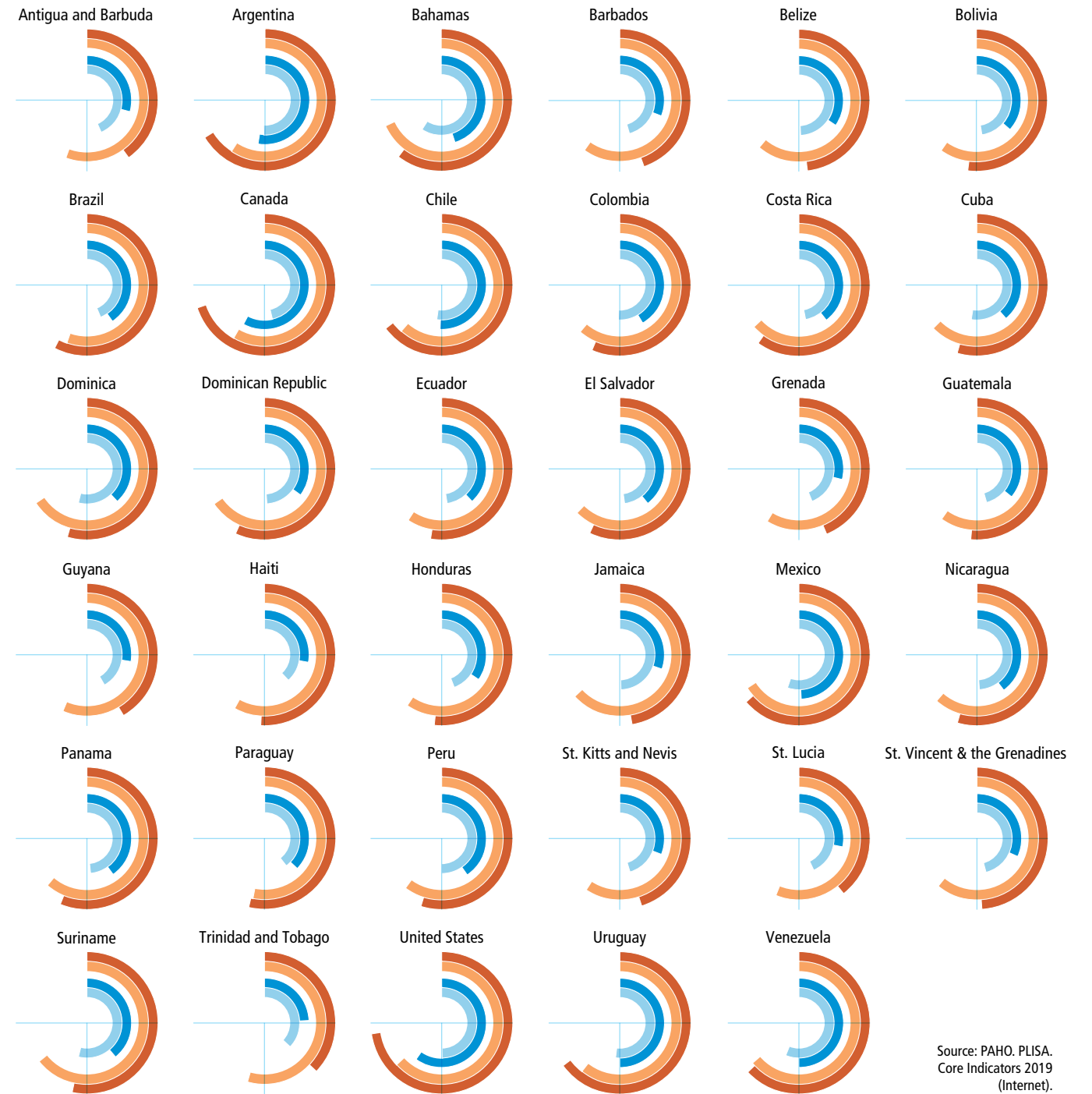
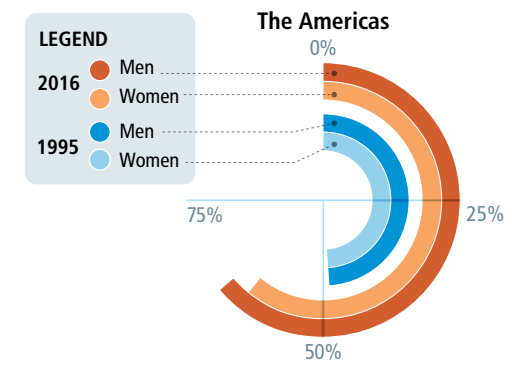
IN THE LAST 25 YEARS, THE AMERICAS MADE IMPORTANT PROGRESS in increasing the life expectancy from 72.3 to 76.9 years. The Plurinational State of Bolivia had the greatest gain in life expectancy, for both women and men (14 and 11 years, respectively). Other notable increases in total life expectancy are observed in Turks and Caicos (10.6 years), Guatemala (9.2 years), Haiti (8.2 years), Peru (7.8 years), and Brazil (7.6 years). Much smaller increases in life expectancy are observed for Grenada (1.0 year), the Bolivarian Republic of Venezuela (0.7 year), Jamaica (0.3 year), and Montserrat (0.1 year).



Adult overweight and obesity

by country, Region of the Americas, 1995 and 2016

OVERWEIGHT AND OBESITY (defined as having a body mass index ≥ 25 kg/m²) are major risk factors for cardiovascular diseases, diabetes, and some types of cancer. The prevalence of overweight and obesity has dramatically increased over the past 20 years. Countries with the highest prevalence of overweight and obesity are the United States of America (68%), Mexico (65%), Canada, and the Bahamas (both 64%).

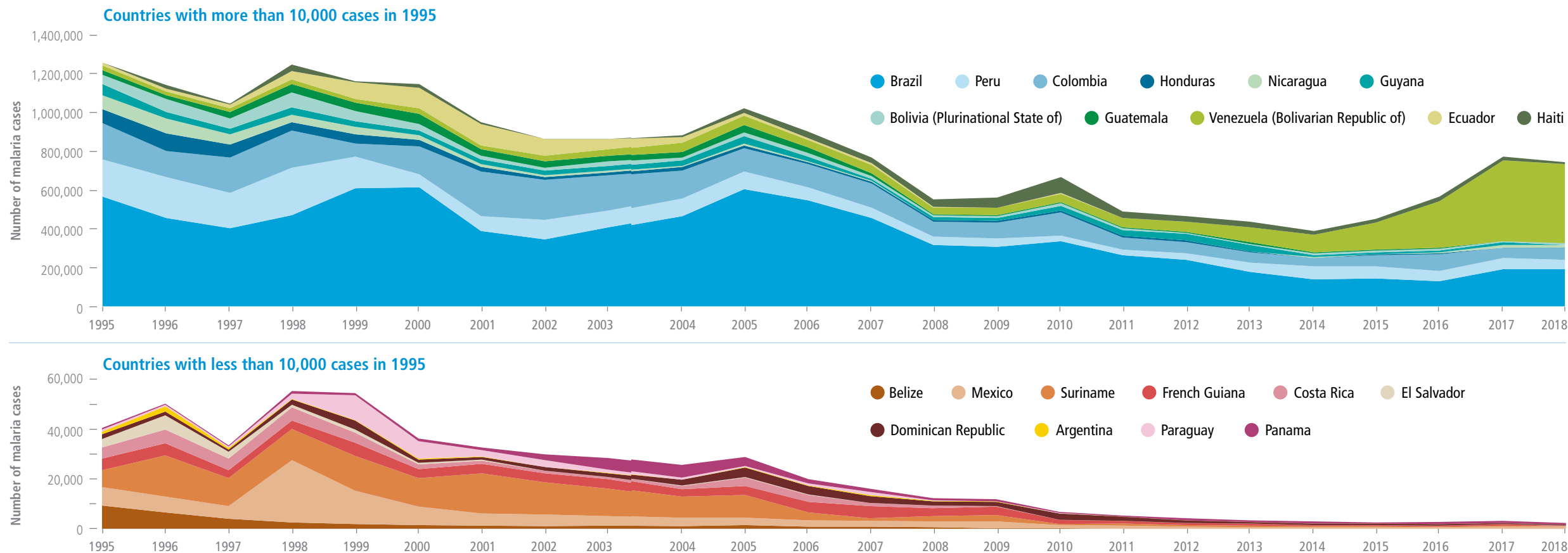


Source: PAHO. PLISA. Core Indicators 2019 (Internet).

Malaria

by endemic country, Region of the Americas, 1995–2018

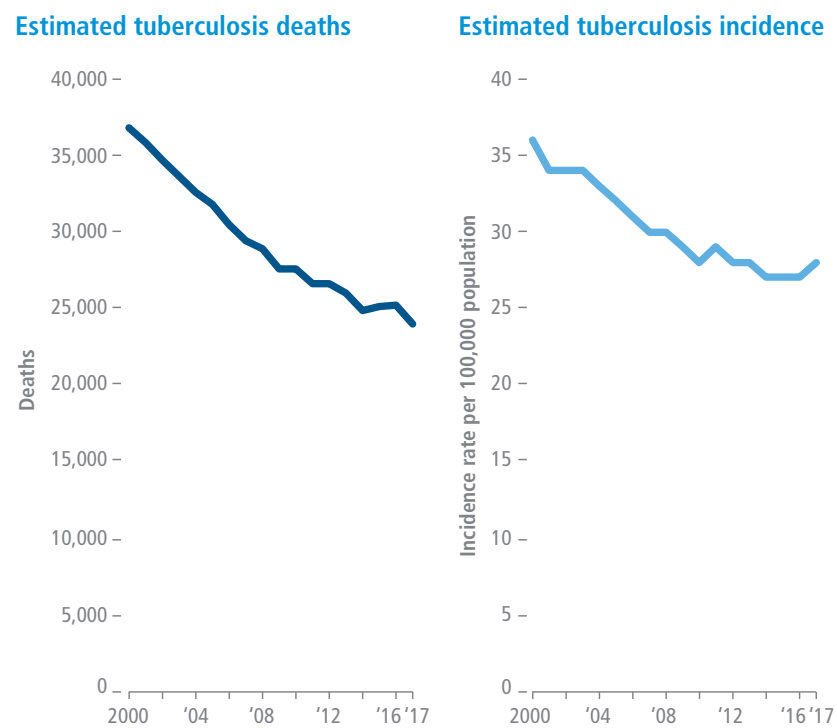
MALARIA INCIDENCE IN THE AMERICAS decreased over the past two decades, although more recently there have been increases associated with local outbreaks and epidemics in a few countries. In 1995, the Region had 21 malaria-endemic countries. Since then, WHO has certified Paraguay (in 2018) and Argentina (in 2019) to have eliminated malaria. Several countries have also observed significant decreases in malaria cases, especially Ecuador and Suriname—each of which had an outbreak in 2001 and 1996, respectively. The increased malaria incidence in Haiti was associated with the aftermath of the 2010 earthquake.



Tuberculosis

Region of the Americas, 2000–2017

IN THE LAST 18 YEARS, DEATHS FROM tuberculosis in the Americas have decreased by 35%, with an average annual reduction of 3%. Tuberculosis deaths have been consistently decreasing, reaching a low of approximately 24,000 deaths in 2017. The estimated incidence has also decreased, although not at the desired rate, with an average annual reduction of 2% between 2000 and 2017. When analyzing the trends, it is important to take into account the implementation of diagnostic methods that allow more cases to be identified, thereby leading to an increase in reported incidence.

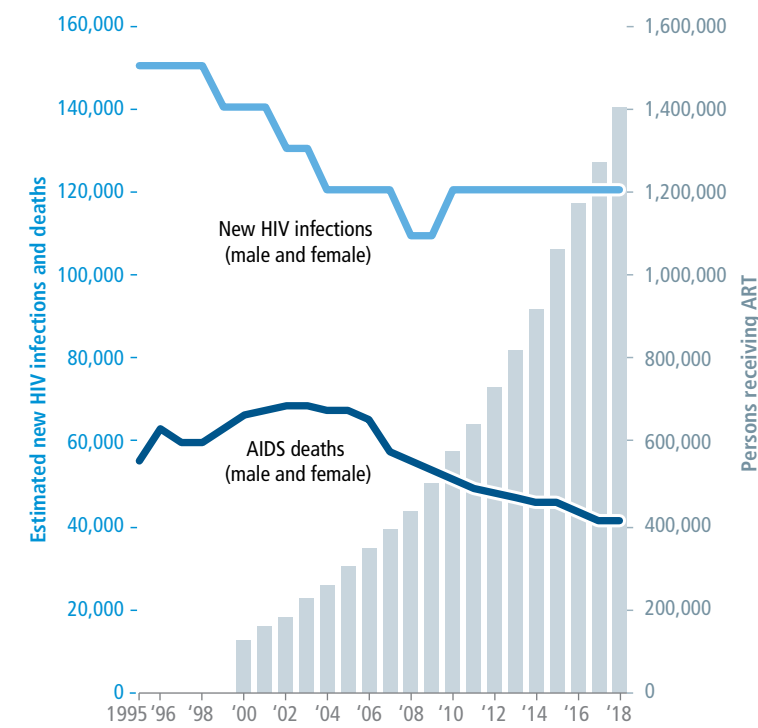


Source: Global tuberculosis report 2018 (Internet). Geneva: World Health Organization; 2018. Licence: CC BY-NC-SA 3.0 IGO. Available from: https://www.who.int/tb/publications/global_report/en/.

HIV

Latin America and the Caribbean, 1995–2018

THE NUMBER OF PEOPLE RECEIVING antiretroviral treatment (ART) has increased exponentially since the introduction of ART provision by national AIDS programs in Latin America and the Caribbean almost two decades ago, in 2000. As a result, deaths due to AIDS started to noticeably decrease. However, while new infections began to consistently decrease in 1995, after 2004, the number stagnated at around 120,000 new HIV infections annually, well short of what is required to achieve the SDG target of reducing new HIV infections 90% by 2030. A combination of evidence-based interventions, as recommended by WHO, must be implemented to prevent new HIV infections. At the same time, efforts must concentrate on scaling up early ART in order to further reduce mortality.

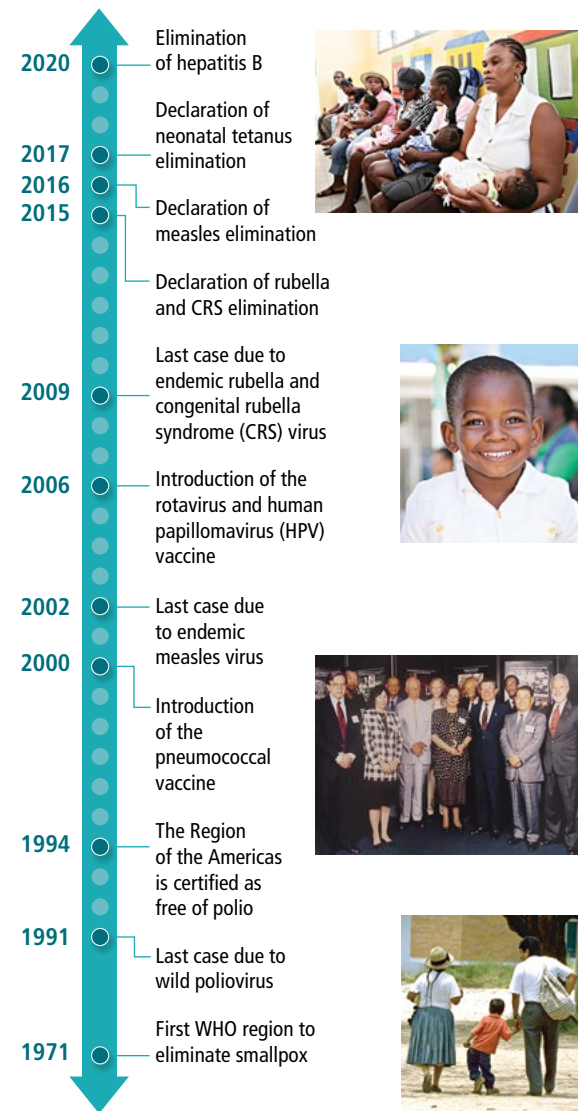


Note: The graphic has two y-axes: on the left side are number of HIV cases and number of AIDS deaths, and on the right side are the number of people receiving ART. Please note the difference in the two scales when interpreting data.

Elimination of vaccine-preventable diseases

Region of the Americas

THE AMERICAS HAS LED THE WAY in the elimination of vaccine-preventable diseases. In 1994, the Region was certified as being free of the indigenous wild poliovirus. In 2015, the International Expert Committee determined that the Region had interrupted the endemic transmission of rubella. In 2017, Haiti achieved elimination of neonatal tetanus, and consequently, the Region of the Americas was declared free of this disease. The Americas is also on track to eliminate mother-to-child transmission of hepatitis B.



Source: PAHO/WHO. Department of Family, Health Promotion and Life Course/Comprehensive Family Immunization Unit, 2019.

Child mortality

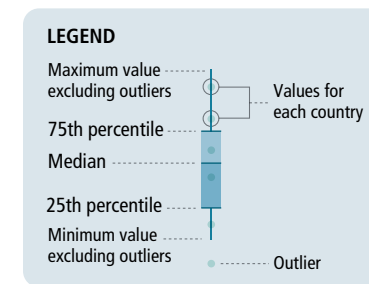
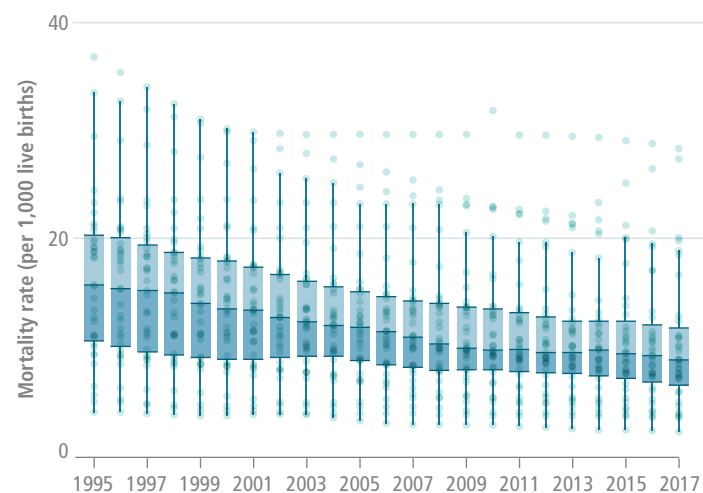
Region of the Americas, 1995–2017

THE AMERICAS HAS MADE REMARKABLE PROGRESS in reducing deaths of children under 5 years of age (under-5 mortality rate). Thousands of children throughout the Region now have a better chance of survival. Remarkably, the median under-5 mortality rate of 28.0 per 1,000 live births in 1995 was nearly halved to 15.0 in 2017. Among the countries of the Americas, a child's risk of dying before his/her 5th birthday has decreased substantially over time.

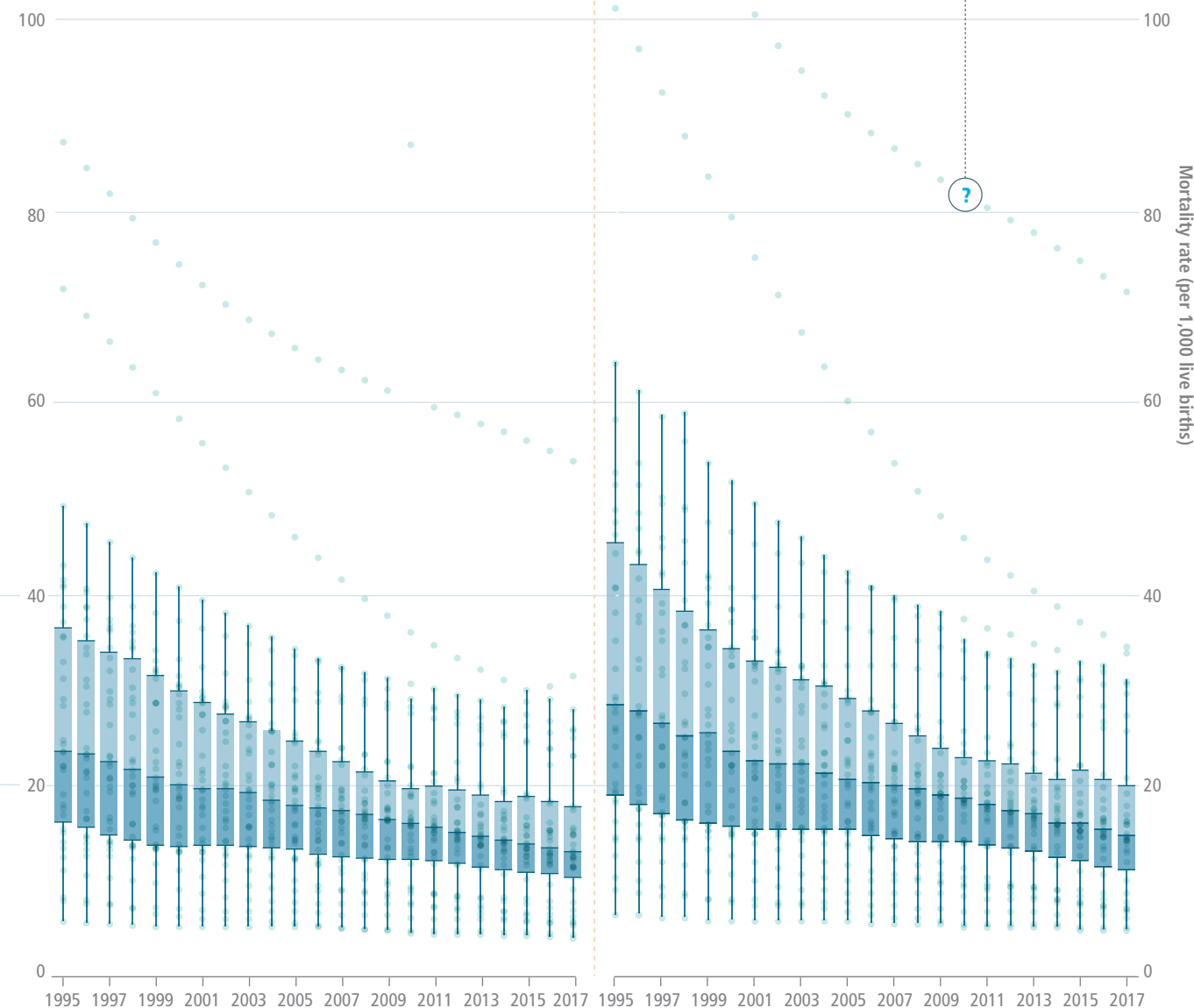
The risk of dying in the first year of life (infant mortality rate) was reduced by 55% between 1995 and 2017 in the Region. The regional median decreased from 23.6 deaths in 1995 to 13.1 deaths per 1,000 live births in 2017. In 1995, a wide range of variability was observed for infant mortality rates among countries. As of 2017, mortality rates ranged from about 4 to 59 deaths per 1,000 live births.

The decrease in the risk of dying in the first 28 days of life (neonatal mortality rate) is evident. However, important differences persist between countries in terms of the magnitude and rate of decrease. In 2017, the median neonatal mortality rate in the Region was 8 deaths per 1,000 live births, with a range between 2 and 30 deaths per 1,000 live births.

Distribution of neonatal mortality rate



Distribution of infant mortality rate



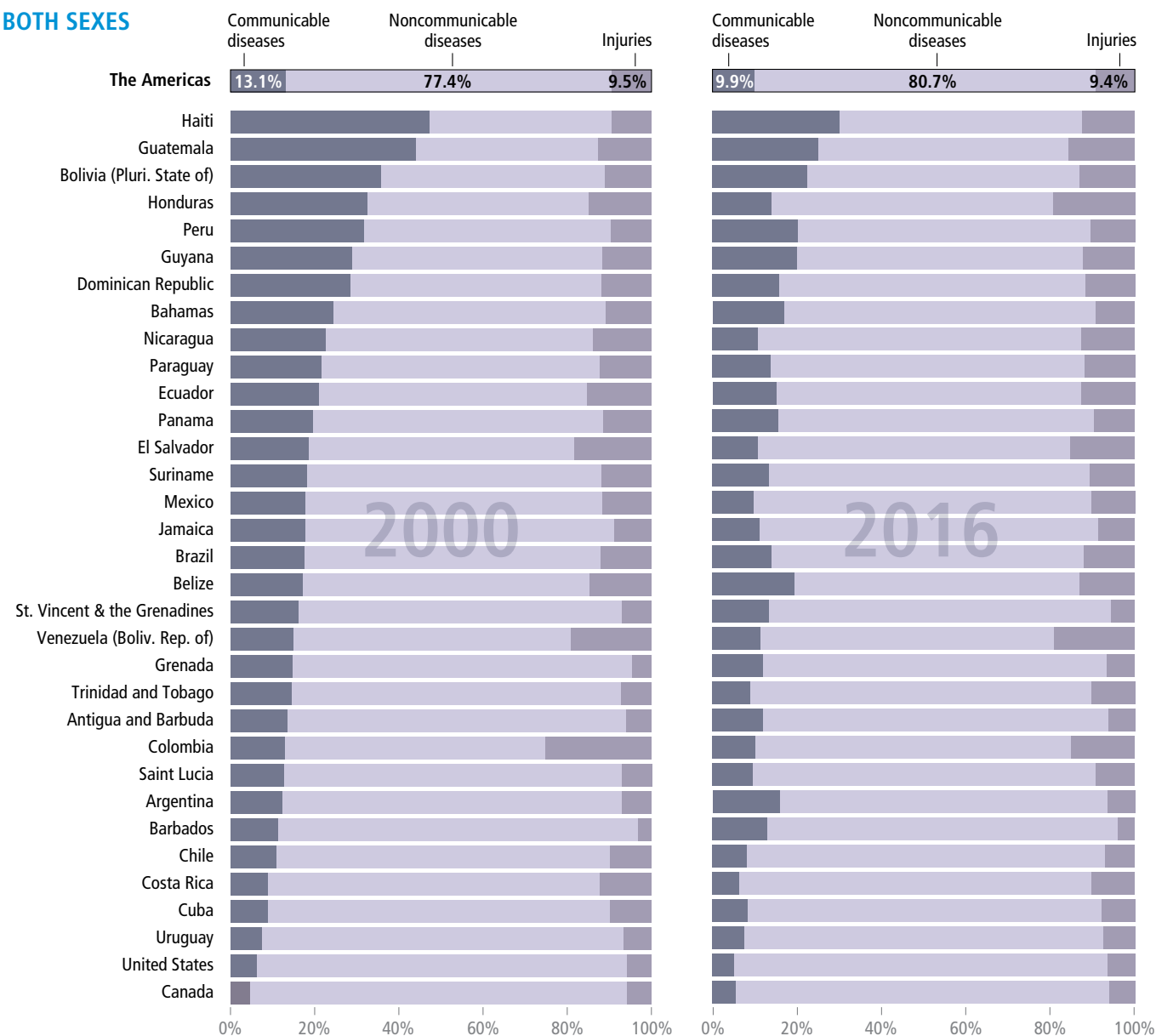
Source: PAHO. PLISA. Core Indicators 2019 (Internet).

Epidemiological transition

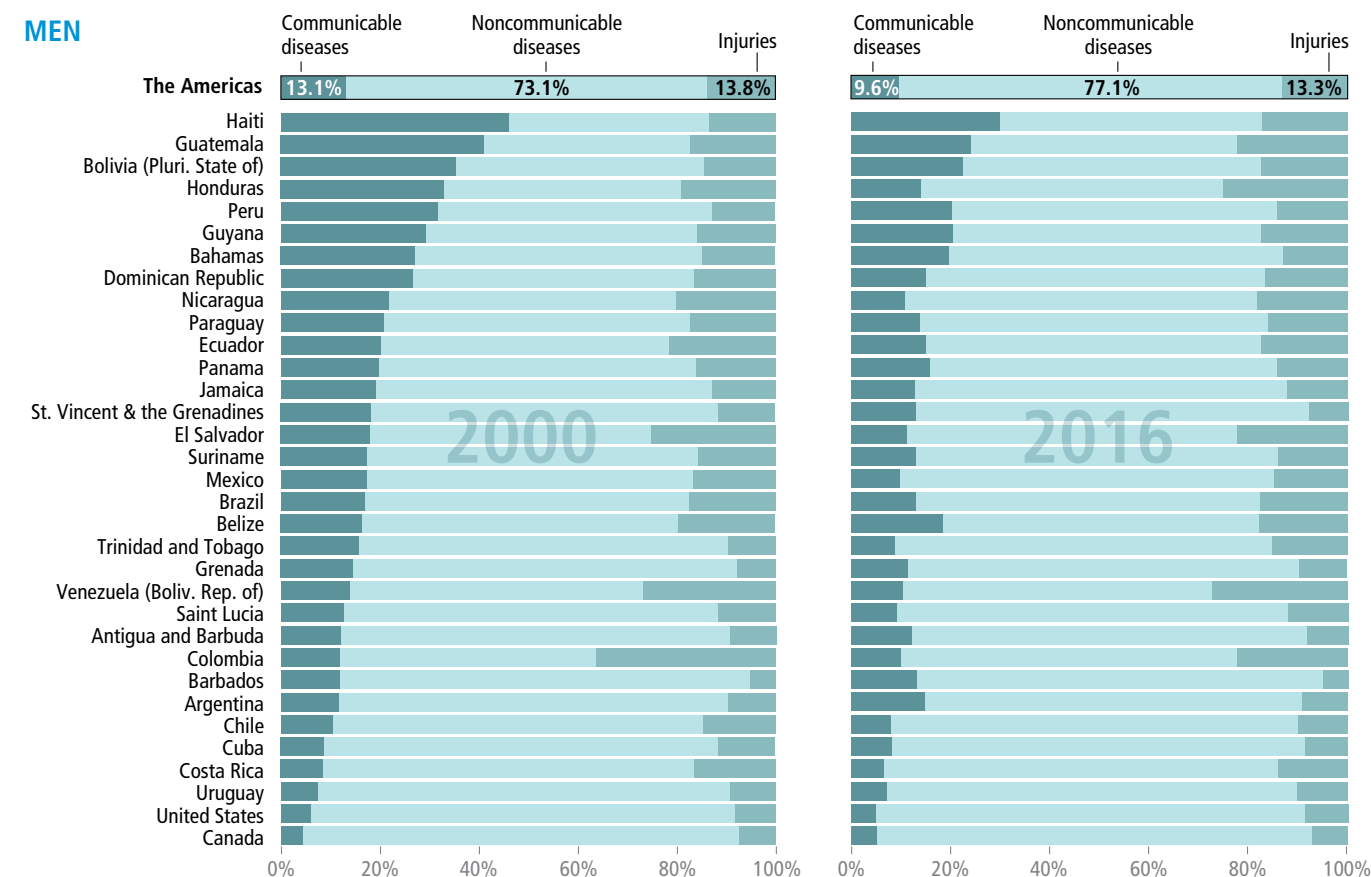
by country, Region of the Americas, 2000–2016

MORTALITY, ANALYZED BY BROAD CAUSE GROUPS, shows a predominance of noncommunicable diseases (NCDs) in 2000. NCDs (including cardiovascular diseases, cancer, diabetes, and others) accounted for 77% of all deaths in 2000, increasing to 81% of all deaths in 2016. Meanwhile, a gradual decrease was observed in deaths from communicable, neonatal, maternal, and nutritional diseases, evident especially in Haiti, Guatemala, and Bolivia, which reported values of 47%, 44%, and 36% in 2000, to less than a third of deaths from these diseases in 2016. In Colombia, the proportion of injuries (including violence and self-harm) was 25% in 1995 and 15% in 2016. Overall, the largest difference between male and female cause of death is death from injuries, which is substantially higher for men than women. The Region continues to face a demographic and epidemiological transition, with the double burden of implementing interventions tailored to the challenges and risks of each population segment, with the participation of multiple sectors, actors, and civil society.

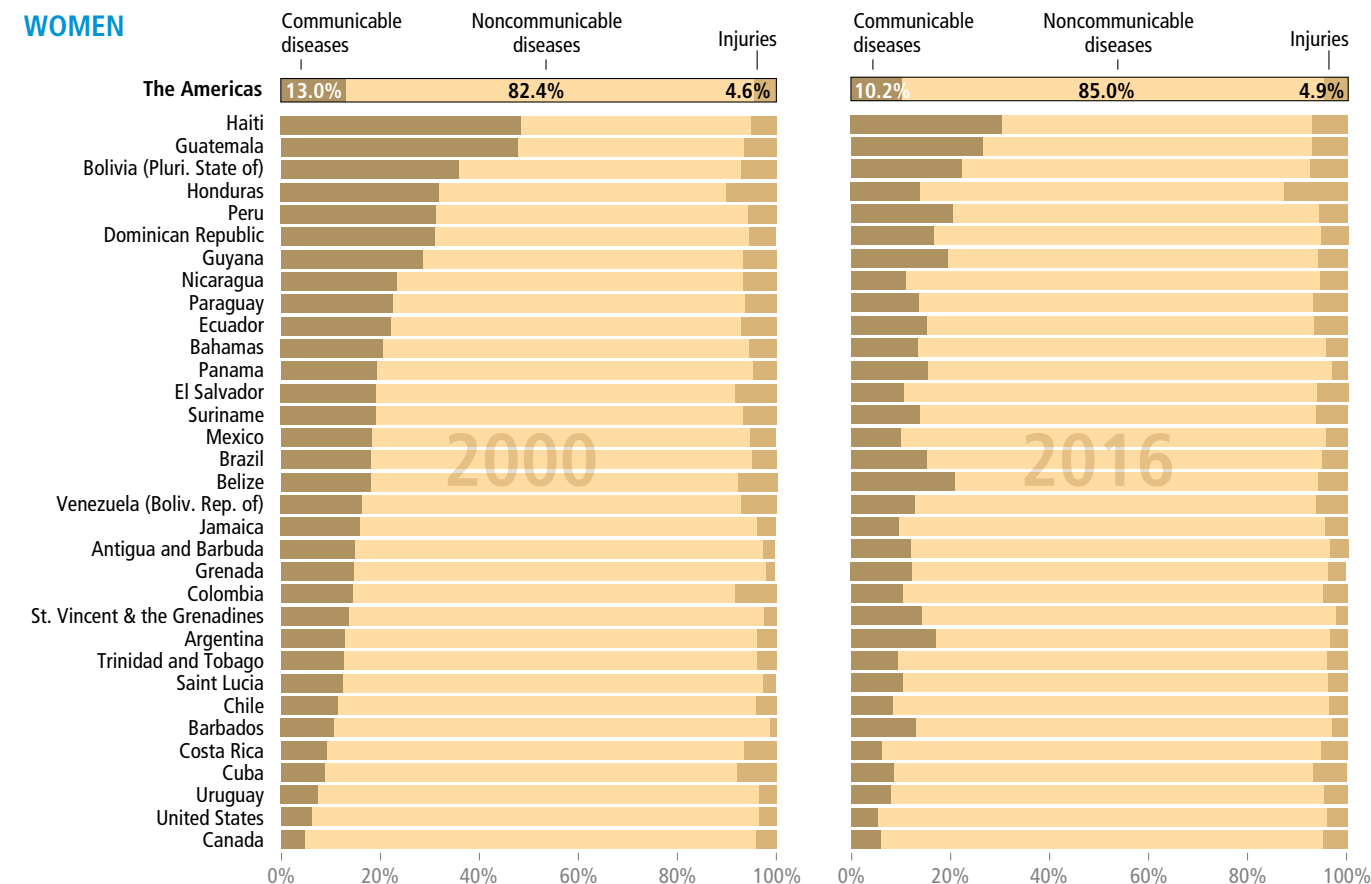
BOTH SEXES



MEN



WOMEN



Source: PAHO. PLISA. Core Indicators 2019 (Internet).

Out-of-pocket expenditure in health spending

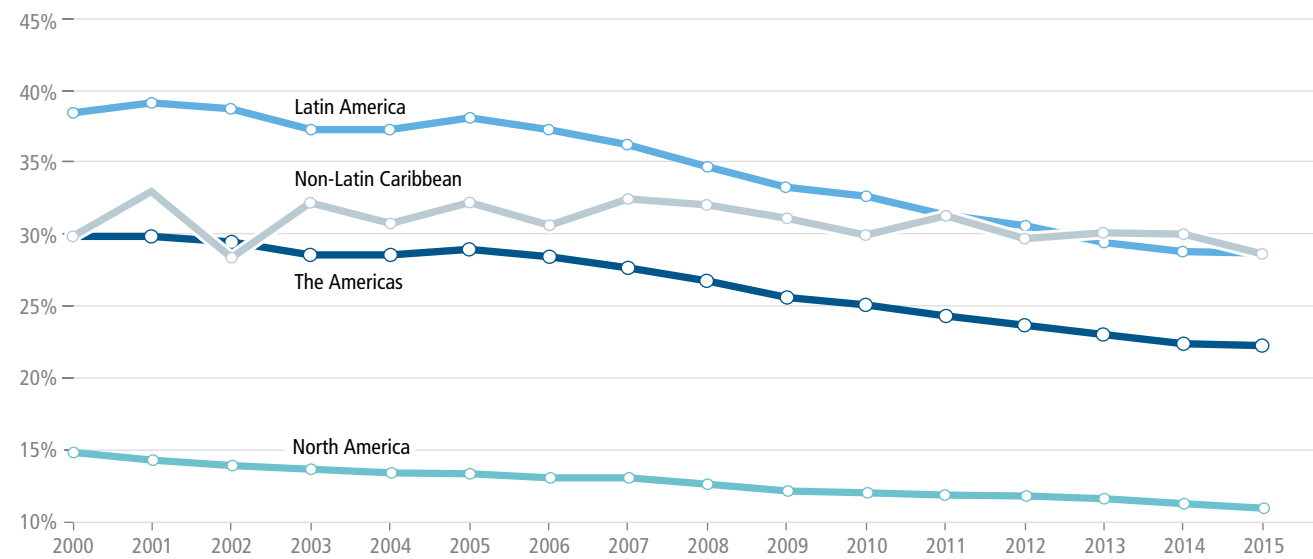
UNIVERSAL HEALTH, THE FOUNDATION of an equitable health system, is a fundamental aspiration for the Americas. An essential attribute to achieve universal equity is the capacity of the health system to guarantee access irrespective of the ability to pay. To track such capacity, *out-of-pocket spending as a percentage of the current health spending* (OOP%CHE) is used as a core indicator. The trend lines in the graph highlight the indicator's general progress in the Americas—particularly, its high level (30% regionally) and downward drift.

The bubble graph is a weighted equiplot that shows the distribution of OOP%CHE across income quartiles (i.e., the four colored bubbles) for 2000, 2005, 2010, and 2015, illustrating the persistence of inequality gaps. In fact, the gap between the poorest quartile of countries and the richest increased between 2000 and 2015. In 2015, while the richest quartile spent half as much as in 2000, the poorest quartile has shown little improvement.

The size of each bubble represents the population size of each quartile. The distance between the extreme quartiles represents the magnitude of the absolute inequality gap.

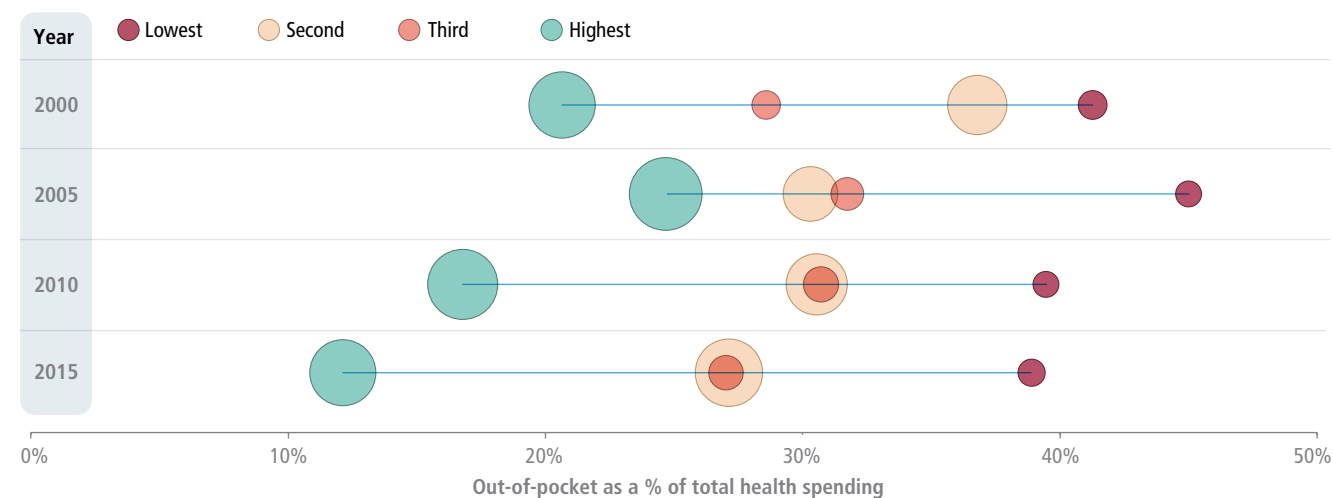
Out-of-pocket spending as percentage of the current health spending

by subregions, Region of the Americas, 2000–2015



Wealth-related inequalities in health spending

by country quartiles of gross national income per capita, Region of the Americas, 2000, 2005, 2010, and 2015



Source: PAHO. PLISA. Core Indicators 2019 (Internet). Analysis: PAHO/WHO. Department of Evidence and Intelligence for Action in Health, 2019.

2019 >>>
Core Indicators Data Tables

INFORMATION PRESENTED IN THIS PUBLICATION SUPERSEDES THAT OF PREVIOUS EDITIONS.

FOR THE MOST RECENT UPDATES IN CORE INDICATOR DATA, REFER TO PLISA.

SDG: 3.1.1

17

Maternal mortality ratio reported (100,000 lb)

18

Maternal deaths reported

SDG: 3.1.1

19

Maternal mortality ratio, estimated (*) (100,000 lb) 2015

20

Infant mortality rate reported (1,000 lb)

21

Infant deaths reported

SDG: 3.2.2

22

Neonatal mortality rate reported (1,000 lb)

SDG: 3.2.1

23

Under-5 mortality rate reported (1,000 lb)

24

Under-5 deaths due to (%)

ADD 2016

ARI 2016

Table with 10 columns: Region, Maternal mortality ratio, Maternal deaths, Infant mortality rate, Infant deaths, Neonatal mortality rate, Under-5 mortality rate, Under-5 deaths due to (%), ADD 2016, ARI 2016. Rows include Region of the Americas, Latin America, Central America, Latin Caribbean, Andean Area, Southern Cone, and Non-Latin Caribbean.

SDG: 3.3.3

26

Malaria 2018

27

Dengue 2018

28

Cholera 2018

29

Measles 2018

30

Yellow fever 2018

31

Leprosy 2018

32

New HIV diagnoses Rate (100,000 pop) 2018

33

Sex ratio (male : female) 2018

SDG: 3.3.2

34

Tuberculosis incidence estimated (100,000 pop) 2017

(confidence interval)

INFORMATION PRESENTED IN THIS PUBLICATION SUPERSEDES THAT OF PREVIOUS EDITIONS.

FOR THE MOST RECENT UPDATES IN CORE INDICATOR DATA, REFER TO PLISA.

Table with 11 columns: Selected diseases, reported cases (Malaria, Dengue, Cholera, Measles, Yellow fever, Leprosy), New HIV diagnoses, Sex ratio, Tuberculosis incidence, Region of the Americas. Rows include Region of the Americas, North America, Latin America, Central America, Latin Caribbean, Andean Area, Southern Cone, and Non-Latin Caribbean.

Notes: (...) Data are not available or not shown. (-) Value is zero. CI 17-23: (A) Study; (B) Preliminary; (C) Survey; (D) Data have one or more of the following limitations: coverage of maternal deaths and live births, differences in the maternal death definition, different denominators used, the analysis of only confirmed maternal deaths, and coverage of infant and neonatal deaths; (E) Estimate; (F) Public sector only. CI 19: (*) Estimates of the United Nations' Inter-Agency Group with 80% of confidence interval.

CI 26-31: (G) Imported; (H) Measles/Rubella Weekly Surveillance Bulletin, 2018; (I) Re-establishment of endemic transmission; (J) Unpublished data; (#) 2 imported and 8 unknown cases. CI 32-33: (B) Preliminary; (F) Public sector only. CI 34: (8) Confidence interval at 95%.

APPENDIX I: DEFINITIONS

Median age (years) (CI 2)

Divides the population into two parts of equal size; that is, there are as many persons with ages above the median as there are with ages below the median. *UN estimates*

Mean years of schooling (CI 12)

The average number of completed years of education of a country's population aged 25 years and older, excluding years spent repeating individual grades. *UNESCO estimates*

Gini index (CI 16)

Measures income inequality. The Gini is zero if everyone had the same income and 100 if a single person had all the income. *World Bank estimates*

Maternal mortality ratio (CI 17), infant mortality rate (CI 20), neonatal mortality rate (CI 22), and under-5 mortality rate (CI 23)

Countries reported data to PAHO from vital statistics, surveys, studies, or national estimates. An increase in values will not always reflect worsening health status; it can also represent an improvement in the coverage and quality of information. *Country data*

Mortality indicators (CI 24–25, 35–48)

Presented according to the World Health Organization (WHO) Global Burden of Disease list.

- For data with J) note: PAHO Regional Mortality Estimates (2018). Mortality rates were computed after applying an algorithm to correct for unknown age and sex and to account for a redistribution for deaths from ill-defined causes and events of undetermined intent as presented in Health Statistics from the Americas, 2006 edition (<http://www.paho.org/HSA2006>).
- For data with K) note: WHO Global Mortality Estimates (2018). Methods are available from: http://terrance.who.int/mediacentre/data/ghe/GlobalCOD_method_2000_2016.pdf?ua=1.
- All rates are age-adjusted death rates using the WHO World Standard Population data (<https://www.who.int/healthinfo/paper31.pdf>).
- Data were excluded for Curaçao 2007, Cayman Islands 2013, and Virgin Islands (UK) 2010. Data were not available for Sint Maarten. *PAHO/WHO estimates*

Dengue cases (CI 27)

The number of suspected and laboratory-confirmed cases from dengue and severe dengue. *Country data*

Leprosy cases (CI 31)

Cases registered for treatment as of 31 December of a given year. *Country data*

Stunting in children aged <5 years (%) (CI 51)

Percentage of stunting (height-for-age less than –2 standard deviations of the WHO Child Growth Standards median) among children aged 0–5 years (0–59 months). *WHO estimates*

Overweight in children aged <5 years (%) (CI 52)

Percentage of overweight (weight-for-height above +2 standard deviations of the WHO Child Growth Standards median) among children aged 0–5 years (0–59 months). *WHO estimates*

Overweight and obesity in adults, age-standardized (%) (CI 53)

Percentage of population aged 18 years and older with a body mass index (BMI) of 25 kg/m² or higher. *WHO estimates*

Prevalence of insufficient physical activity in adults, age-standardized (%) (CI 54)

Percent of adults aged 18 years and older attaining less than 150 minutes of moderate-intensity physical activity per week, or less than 75 minutes of vigorous-intensity physical activity per week, or equivalent. *WHO estimates*

Prevalence of current tobacco use in adolescents (%) (CI 55)

Persons aged 13–15 years that have used at least once any tobacco product, smoked or smokeless, during the 30 days prior to the survey. *Country data*

Prevalence of current tobacco smoking in adults, age-standardized (%) (CI 56)

Persons aged 15 years and over that smoked any tobacco product during the 30 days prior to the survey, age-standardized. This includes daily and occasional smokers. *WHO estimates*

Alcohol consumption in adults (liters per person/year) (CI 57)

Total alcohol per capita consumption (APC) is defined as the total (sum of recorded APC 3-year average and unrecorded APC) amount of alcohol consumed per adult (aged 15 years and older) over a calendar year, in liters of pure alcohol, adjusted for tourist consumption. *WHO estimates*

Prevalence of raised blood pressure, age-standardized (%) (CI 58)

Percent of population aged 18 years and older with raised blood pressure defined as systolic blood pressure ≥140 mm Hg or diastolic blood pressure ≥90 mm Hg. *WHO estimates*

Prevalence of raised blood glucose/diabetes, age-standardized (%) (CI 59)

Percent of population aged 18 years and older with fasting glucose ≥126 mg/dl (7.0 mmol/l) or history of diagnosis with diabetes or use of insulin or oral hypoglycemic drugs. *WHO estimates*

Population using improved water supplies, safely managed (%) (CI 60)

Proportion of population using an improved basic drinking water source that is located on premises, available when needed and free of fecal (and priority chemical) contamination. “Improved” drinking water sources include: piped water into dwelling, yard or plot; public taps or standpipes; boreholes or tubewells; protected dug wells; protected springs; packaged water; delivered water and rainwater. *WHO and UNICEF estimates*

Population using improved sanitation facilities, safely managed (%) (CI 61)

Proportion of population using safely managed sanitation services, including a hand-washing facility with soap and water, is currently being measured by the proportion of the population using a basic sanitation facility that is not shared with other households and where excreta is safely disposed in situ or treated off-site. “Improved” sanitation facilities include: flush or pour flush toilets to sewer systems, septic tanks or pit latrines, ventilated improved pit latrines, pit latrines with a slab, and composting toilets. *WHO and UNICEF estimates*

Population using clean fuels and technology (%) (CI 62)

Total proportion of households that use fuels and clean technologies for cooking, heating, lighting, among others. Excludes solid fuels and/or kerosene. *WHO estimates*

Contraceptive prevalence use, modern methods (%) (CI 70)

Women aged 15 to 49 years, married or in union, who are currently using (or whose sexual partner is using) one modern method of contraception. Modern contraceptive methods include female and male sterilization, injectable and oral hormonal pills, intrauterine devices, implant (including Norplant), vaginal barrier methods, diaphragm, the female condom, and emergency contraception. *UN estimates*

Unmet need for family planning (%) (CI 71)

Women who are fecund and sexually active but are not using any modern method of contraception, and report not wanting any more children or wanting to delay the next child. Expressed as percentage of fecund women who are married or in union. *UN estimates*

Health expenditure as % of GDP (CI 77)

- **Public expenditure:** Health expenditure financed by compulsory sources of funds such as taxes, social security contributions, and compulsory employers’ and employees’ contributions to health insurance schemes, including fiscal transfers to these. Expressed as a percentage of the gross domestic product (GDP).
- **Private expenditure:** Health expenditure financed by voluntary sources of funds such as payment of private insurance premiums (prepayment) and out-of-pocket expenditure in health services and goods at the time of care (direct payment). Expressed as a percentage of the GDP. *WHO estimates*

Out-of-pocket expenditure as % of total health expenditure (CI 78)

Direct payment for health services and goods at the time the individual or household benefits from care and at the point of service. Includes formal payments (such as consultation fees, payment of medicines at pharmacies, and any type of co-payment) as well as informal and excludes any subsequent reimbursement. Expressed as a percentage of total expenditure in health. *WHO estimates*

Mortality garbage codes (%) (CI 82)

Proportion of deaths that were assigned to causes that are not considered useful for public health purposes; using algorithms developed by Naghavi et al. (2010) [Algorithms for enhancing health utility of national causes-of-death data. *Pop Health Metrics*. 2010;8:9] and adapted by PAHO/CRAES. *PAHO/WHO estimates*

APPENDIX II: NOTES

- Data included in this publication are the latest available information available to PAHO/WHO as of September 2019.
- This edition presents the latest available data; the earliest year limit is 2009. For mortality data (indicators 24–25, 35–48, and 80–82), data for 2015 and 2016 are presented; for communicable diseases (indicators 20–31), data from 2016 to 2018 are presented.
- Rates are calculated based on population data from World Population Prospects (WPP) and the U.S. Census Bureau International databases.
- International agencies are continuously revising and improving their methodologies, which can result in differences from previously reported data.
- Data were reviewed for completeness, consistency, and comparability, but users should interpret data with caution as definitions and estimates may differ among countries. Data sources were defined to ensure comparability between countries in this edition. Therefore, the data presented in this publication may differ from national statistics.
- Rates of the following countries should be viewed with caution due to their small number of events: Anguilla, Antigua and Barbuda, Aruba, Barbados, Bermuda, Cayman Islands, Curaçao, Dominica, French Guiana, Grenada, Montserrat, Saint Kitts and Nevis, Saint Lucia, Saint Vincent and the Grenadines, Sint Maarten, Turks and Caicos Islands, and the Virgin Islands (UK) and Virgin Islands (US).
- We continue to collect core indicators from Bonaire, San Eustatius, and Saba (BES). In this edition, however, BES data are not included.
- The regional and subregional aggregates for rates, ratios, and proportions are weighted averages using population, age-specific population groups, births, deaths, and urban and rural populations as appropriate. Sums are presented for absolute numbers.
- Subregional figures are only shown when data are available for at least 50% of the population within the subregion.
- For this publication, Latin America includes Mexico, Central America, the Latin Caribbean, the Andean Area, Brazil, and the Southern Cone. Latin America and the Caribbean comprises Latin America and Non-Latin Caribbean. Brazil and Mexico are shown separately due to their population size.

APPENDIX III: DATA SOURCES

2019 Regional Demographic Context and Trends in Health, 1995–2019

All Core Indicators 2019 data for graphics can be found in: Pan American Health Organization. PLISA. Core Indicators 2019 (Internet), 2019. (<http://www.paho.org/data/index.php/en/indicators.html>).

Demographic and Socioeconomic Indicators

CI 1-11, except CI 10: United Nations, Department of Economic and Social Affairs, Population Division. World Population Prospects: The 2019 Revision. New York. Accessed June 24, 2019 (<http://esa.un.org/wpp/>). For countries with less than 90,000 inhabitants: the U.S. Bureau of the Census. International Data Base. Washington, D.C., June 2019 update. Accessed July 18, 2019 (<https://www.census.gov/data-tools/demo/idb/informationGateway.php>).

CI 10: United Nations, Department of Economic and Social Affairs, Population Division. World Urbanization Prospects: The 2018 Revision. New York. Accessed June 24, 2019 (<http://esa.un.org/unpd/wup/>).

CI 12: UNESCO. Institute for Statistics (UIS). Data Centre, UIS Estimates. Accessed June 24, 2019 (<http://data.uis.unesco.org>).

CI 13-16: The World Bank. World Development Indicators 2019. Washington, D.C. June 2019 update. Accessed June 24, 2019 (<http://datbank.worldbank.org/data/home.aspx>).

Health Status Indicators

CI 17-23, except CI 19: PAHO/WHO. Data provided by ministries of health or national health agencies of countries. Washington, D.C., 2019. As of September 2019.

CI 19: United Nations Inter-Agency Group. Trends in Maternal Mortality: 1990 to 2015. Estimates by WHO, UNICEF, UNFPA, World Bank, and the United Nations Population Division. Geneva, 2015. Accessed June 24, 2019 (<http://www.who.int/reproductivehealth/publications/monitoring/maternal-mortality-2015/en/>).

CI 24-25, 35-48: PAHO/WHO and CARPHA. Regional Mortality Database 2018. Washington, D.C.; and WHO Global Mortality Estimates 2018. Geneva. As of June 28, 2019.

CI 26-31: PAHO/WHO. Data from ministries of health or national health agencies of countries, compiled by PAHO’s Departments of Communicable Diseases and Environmental Determinants of Health; Family, Health Promotion and Life Course; and Health Emergencies. Washington, D.C., 2019. As of September 2019.

CI 32-33: PAHO/WHO. Rates calculated by the Health Analysis, Metrics and Evidence Unit within the Department of Evidence and Intelligence for Action in Health, based on data provided by ministries of health or national health agencies of countries. Washington, D.C., 2019. As of August 2019.

CI 34: WHO. Global Tuberculosis Report 2018. Geneva, 2018. Accessed September 3, 2019 (https://www.who.int/tb/publications/global_report/en/).

Risk Factor Indicators

CI 49: PAHO/WHO. Data provided by ministries of health or national health agencies of countries. Washington, D.C., 2019. As of September 2019.

CI 50–59 (except CI 55 and CI 57): PAHO/WHO. Data compiled by the Department of Noncommunicable Diseases and Mental Health from the WHO Global Health Observatory. Geneva. Accessed June 24, 2019 (<http://apps.who.int/gho/data/node/home>).

CI 55: PAHO/WHO. Data compiled by the Department of Noncommunicable Diseases and Mental Health from the Global Information System on Alcohol and Health (GISAH) from ministries of health or national health agencies of countries. Washington, D.C., 2019. As of June 2019.

CI 57: PAHO/WHO. Data compiled by the Department of Noncommunicable Diseases and Mental Health. Washington, D.C., 2019. As of June 2019.

CI 60–61: WHO/UNICEF. Joint Monitoring Programme (JMP) for Water Supply and Sanitation. Geneva. Accessed June 24, 2019. (<https://washdata.org/data>).

CI 62: PAHO/WHO. Data compiled by the Department of Communicable Diseases and Environmental Determinants of Health from the WHO Global Health Observatory. Geneva. Accessed June 26, 2019. (<http://apps.who.int/gho/data/node/imr>).

Health Coverage Indicators

CI 63-69: PAHO/WHO. Data compiled by the Department of Family, Health Promotion and Life Course. Washington D.C., 2019. As of September 2019.

CI 70-71: United Nations, Department of Economic and Social Affairs, Population Division (2019). Model-based Estimates and Projections of Family Planning Indicators 2019. New York, 2019. Accessed June 30, 2019. (http://www.un.org/en/development/desa/population/theme/family-planning/cp_model.shtml).

CI 72-73: PAHO/WHO. Data provided by ministries of health or national health agencies of countries. Washington, D.C., 2019. As of September 2019.

Health Systems Indicators

CI 74-76: PAHO/WHO. Data provided by ministries of health or national health agencies of countries. Washington, D.C., 2019. As of September 2019.

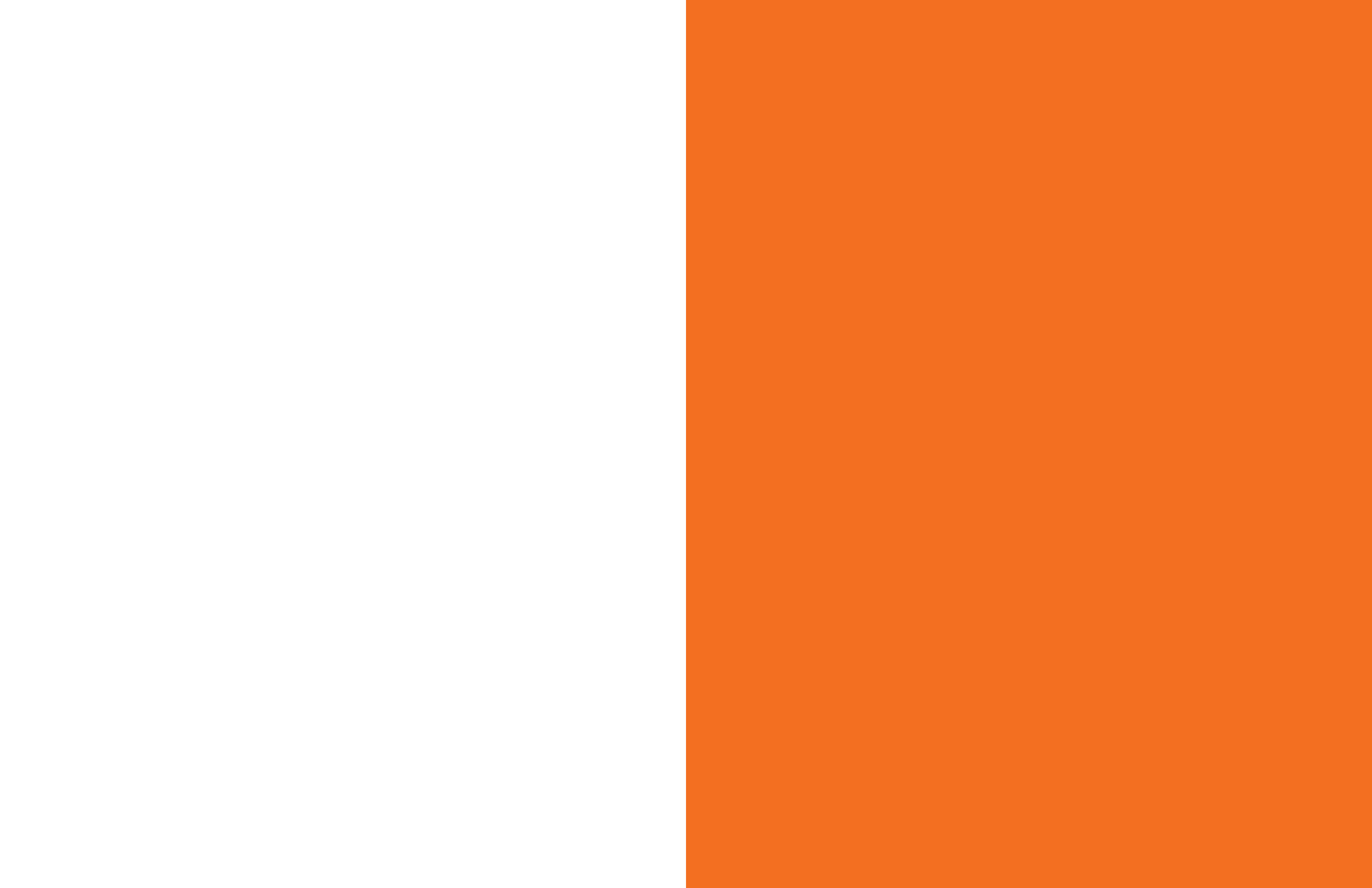
CI 77-78: PAHO/WHO. Data compiled by the Department of Health Systems and Services from the Global Health Expenditure Database. Washington, D.C., 2019. As of August 2019 (<http://www.who.int/health-accounts/ghed/en/>).

CI 79: PAHO/WHO. Data compiled by the Department of Health Systems and Services. Washington, D.C. As of August 2019.

CI 80-82: PAHO/WHO and CARPHA. Regional Mortality Database 2018. Washington, D.C. As of June 28, 2019.

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EACH YEAR, CORE INDICATORS IS PRODUCED IN hard copy to provide regional data on selected indicators. In addition to the printed document, data for 270+ indicators are published annually online, within the Core Indicators section of PAHO's Health Information Platform for the Americas (PLISA, according to the acronym in Spanish). Compliant with the terms outlined by Member States in Resolution CD40.R10 on the "Collection and Use of Core Health Data," much of the data are reported from countries, while the remaining data are obtained from UN Inter-Agency estimates to facilitate comparability among subregions and countries. The Core Indicators database contains a series of data from 1995 to 2019 for countries and territories in the Region of the Americas. These data are comparable to allow for trend analysis over time, by indicators, subregion, or country. More importantly, the data include sources and corresponding technical notes that are easy to locate and download. You can find this information and more at www.paho.org/plisa.

Core Indicators 2019: Health Trends in the Americas presents trend data for selected health indicators of interest. The document uses infographics accompanied by brief narratives to highlight the remarkable strides in improving the population's health within the Region of the Americas, while at the same time observing that there is still much more work ahead to ensure equitable health across the Region.

The Core Indicators 2019 Data Tables contain the data obtained from the 2019 round of data collection, reported from countries, and from UN Inter-Agency estimates. All Core Indicators data are available online on PAHO's PLISA platform.



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