**In which countries is dengue currently spreading, and what precautions should people take when travelling to those countries?**

In 2023, there were over 6 million cases and 6000 deaths globally due to dengue virus (DENV) infection, marking historic milestones for the virus. In the first 11 weeks of 2024, dengue cases surged to nearly 3 million with more than 780 deaths within the World Health Organization's (WHO) American region, encompassing over 40 countries, territories, or islands. Countries in the northern hemisphere are bracing themselves for another potentially record-breaking year as the onset of summer and the rainy season draws near, eliciting a sense of anticipation and surprise among observers.

Dengue fever, a mosquito-borne illness, is caused by four distinct serotypes of the dengue virus within the Flaviviridae family. Transmission to humans occurs through the bites of *Aedes aegypti (L.)* and *Aedes albopictus* (Skuse) mosquitoes. Currently, Dengue Virus (DENV) is endemic in over 125 countries, with reported cases to the World Health Organization (WHO) escalating annually. While the majority of infections (>80%) exhibit no or mild symptoms, leading to lifelong immunity against the specific serotype, reinfection with different serotypes, termed secondary or tertiary dengue infection, poses a significant risk of severe dengue, potentially culminating in fatal outcomes.

**Geographical hotspots:**

In 2023, two distinct hotspots of dengue virus circulation emerged: the South American region and the South and Southeast Asian region (see Table 1). Among the top five countries with DENV infections in 2023 were Brazil (2,569,746 cases), Bangladesh (321,179 cases), Peru (264,764 cases), Mexico (216,277 cases), and Burkina Faso (237,291 cases). Additionally, three European countries reported indigenous dengue cases in 2023: Italy (82 cases), France (43 cases), and Spain (3 cases), while the United States documented a record 156 locally transmitted cases of DENV.

Table 1: Worldwide dengue cases and deaths per million population

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Country | WHO regions [1] | Continents [2] | Population | Case | Death | Cases/million | Deaths/million | References |
| Djibouti | WHO Eastern Mediterranean Region | Africa | 1136455 | 0 | 0 | 0.00 | 0.00 | [3] |
| Egypt | WHO Eastern Mediterranean Region | Africa | 112716598 | 0 | 0 | 0.00 | 0.00 | [3] |
| Libya | WHO Eastern Mediterranean Region | Africa | 6888388 | 0 | 0 | 0.00 | 0.00 | [3] |
| Morocco | WHO Eastern Mediterranean Region | Africa | 37840044 | 0 | 0 | 0.00 | 0.00 | [3] |
| Tunisia | WHO Eastern Mediterranean Region | Africa | 12458223 | 0 | 0 | 0.00 | 0.00 | [3] |
| Sudan | WHO Eastern Mediterranean Region | Africa | 48109006 | 10412 | 66 | 216.43 | 0.30 | [3] |
| Bahrain | WHO Eastern Mediterranean Region | Asia | 1485509 | 0 | 0 | 0.00 | 0.00 | [3] |
| Iran | WHO Eastern Mediterranean Region | Asia | 89172767 | 0 | 0 | 0.00 | 0.00 | [3] |
| Iraq | WHO Eastern Mediterranean Region | Asia | 45504560 | 0 | 0 | 0.00 | 0.00 | [3] |
| Jordan | WHO Eastern Mediterranean Region | Asia | 11337052 | 0 | 0 | 0.00 | 0.00 | [3] |
| Kuwait | WHO Eastern Mediterranean Region | Asia | 4310108 | 0 | 0 | 0.00 | 0.00 | [3] |
| Lebanon | WHO Eastern Mediterranean Region | Asia | 5353930 | 0 | 0 | 0.00 | 0.00 | [3] |
| Palestine | WHO Eastern Mediterranean Region | Asia | 5371230 | 0 | 0 | 0.00 | 0.00 | [3] |
| Qatar | WHO Eastern Mediterranean Region | Asia | 2716391 | 0 | 0 | 0.00 | 0.00 | [3] |
| Syria | WHO Eastern Mediterranean Region | Asia | 23227014 | 0 | 0 | 0.00 | 0.00 | [3] |
| United Arab Emirates | WHO Eastern Mediterranean Region | Asia | 9516871 | 0 | 0 | 0.00 | 0.00 | [3] |
| Yemen | WHO Eastern Mediterranean Region | Asia | 34449825 | 951 | 1 | 27.61 | 0.04 | [3] |
| Afghanistan | WHO Eastern Mediterranean Region | Asia | 42239854 | 1700 | 1 | 40.25 | 0.02 | [3] |
| Saudi Arabia | WHO Eastern Mediterranean Region | Asia | 36947025 | 2259 | 0 | 61.14 | 0.00 | [3] |
| Pakistan | WHO Eastern Mediterranean Region | Asia | 240485658 | 24352 | 0 | 101.26 | 0.00 | [3] |
| Oman | WHO Eastern Mediterranean Region | Asia | 4644384 | 2016 | 0 | 434.07 | 0.00 | [3] |
| Somalia | WHO Eastern Mediterranean Region | Africa | 18143378 | 755 | 1 | 41.61 | 0.02 | [3] |
| Malta | WHO European Region | Africa | 535064 | 0 | 0 | 0.00 | 0.00 | [4] |
| Armenia | WHO European Region | Asia | 2777970 | 0 | 0 | 0.00 | 0.00 | [4] |
| Azerbaijan | WHO European Region | Asia | 10412651 | 0 | 0 | 0.00 | 0.00 | [4] |
| Georgia | WHO European Region | Asia | 3728282 | 0 | 0 | 0.00 | 0.00 | [4] |
| Israel | WHO European Region | Asia | 9174520 | 0 | 0 | 0.00 | 0.00 | [4] |
| Kazakhstan | WHO European Region | Asia | 19606633 | 0 | 0 | 0.00 | 0.00 | [4] |
| Kyrgyzstan | WHO European Region | Asia | 6735347 | 0 | 0 | 0.00 | 0.00 | [4] |
| Tajikistan | WHO European Region | Asia | 10143543 | 0 | 0 | 0.00 | 0.00 | [4] |
| Turkey | WHO European Region | Asia | 85816199 | 0 | 0 | 0.00 | 0.00 | [4] |
| Turkmenistan | WHO European Region | Asia | 6516100 | 0 | 0 | 0.00 | 0.00 | [4] |
| Uzbekistan | WHO European Region | Asia | 35163944 | 0 | 0 | 0.00 | 0.00 | [4] |
| Albania | WHO European Region | Europe | 2832439 | 0 | 0 | 0.00 | 0.00 | [4] |
| Andorra | WHO European Region | Europe | 80088 | 0 | 0 | 0.00 | 0.00 | [4] |
| Austria | WHO European Region | Europe | 8958960 | 0 | 0 | 0.00 | 0.00 | [4] |
| Belarus | WHO European Region | Europe | 9498238 | 0 | 0 | 0.00 | 0.00 | [4] |
| Belgium | WHO European Region | Europe | 11686140 | 0 | 0 | 0.00 | 0.00 | [4] |
| Bosnia and Herzegovina | WHO European Region | Europe | 3210847 | 0 | 0 | 0.00 | 0.00 | [4] |
| Bulgaria | WHO European Region | Europe | 6687717 | 0 | 0 | 0.00 | 0.00 | [4] |
| Croatia | WHO European Region | Europe | 4008617 | 0 | 0 | 0.00 | 0.00 | [4] |
| Cyprus | WHO European Region | Europe | 1260138 | 0 | 0 | 0.00 | 0.00 | [4] |
| Czech Republic | WHO European Region | Europe | 10495295 | 0 | 0 | 0.00 | 0.00 | [4] |
| Denmark | WHO European Region | Europe | 5910913 | 0 | 0 | 0.00 | 0.00 | [4] |
| Estonia | WHO European Region | Europe | 1322765 | 0 | 0 | 0.00 | 0.00 | [4] |
| Finland | WHO European Region | Europe | 5545475 | 0 | 0 | 0.00 | 0.00 | [4] |
| Germany | WHO European Region | Europe | 83294633 | 0 | 0 | 0.00 | 0.00 | [4] |
| Greece | WHO European Region | Europe | 10341277 | 0 | 0 | 0.00 | 0.00 | [4] |
| Hungary | WHO European Region | Europe | 10156239 | 0 | 0 | 0.00 | 0.00 | [4] |
| Iceland | WHO European Region | Europe | 375318 | 0 | 0 | 0.00 | 0.00 | [4] |
| Ireland | WHO European Region | Europe | 5056935 | 0 | 0 | 0.00 | 0.00 | [4] |
| Latvia | WHO European Region | Europe | 1830211 | 0 | 0 | 0.00 | 0.00 | [4] |
| Lithuania | WHO European Region | Europe | 2718352 | 0 | 0 | 0.00 | 0.00 | [4] |
| Luxembourg | WHO European Region | Europe | 654768 | 0 | 0 | 0.00 | 0.00 | [4] |
| Moldova | WHO European Region | Europe | 3435931 | 0 | 0 | 0.00 | 0.00 | [4] |
| Monaco | WHO European Region | Europe | 36297 | 0 | 0 | 0.00 | 0.00 | [4] |
| Montenegro | WHO European Region | Europe | 626485 | 0 | 0 | 0.00 | 0.00 | [4] |
| Netherlands | WHO European Region | Europe | 17618299 | 0 | 0 | 0.00 | 0.00 | [4] |
| North Macedonia | WHO European Region | Europe | 2085679 | 0 | 0 | 0.00 | 0.00 | [4] |
| Norway | WHO European Region | Europe | 5474360 | 0 | 0 | 0.00 | 0.00 | [4] |
| Poland | WHO European Region | Europe | 41026067 | 0 | 0 | 0.00 | 0.00 | [4] |
| Portugal | WHO European Region | Europe | 10247605 | 0 | 0 | 0.00 | 0.00 | [4] |
| Romania | WHO European Region | Europe | 19892812 | 0 | 0 | 0.00 | 0.00 | [4] |
| Russia | WHO European Region | Europe | 144444359 | 0 | 0 | 0.00 | 0.00 | [4] |
| San Marino | WHO European Region | Europe | 33642 | 0 | 0 | 0.00 | 0.00 | [4] |
| Serbia | WHO European Region | Europe | 7149077 | 0 | 0 | 0.00 | 0.00 | [4] |
| Slovakia | WHO European Region | Europe | 5795199 | 0 | 0 | 0.00 | 0.00 | [4] |
| Slovenia | WHO European Region | Europe | 2119675 | 0 | 0 | 0.00 | 0.00 | [4] |
| Sweden | WHO European Region | Europe | 10612086 | 0 | 0 | 0.00 | 0.00 | [4] |
| Switzerland | WHO European Region | Europe | 8796669 | 0 | 0 | 0.00 | 0.00 | [4] |
| UK | WHO European Region | Europe | 67736802 | 0 | 0 | 0.00 | 0.00 | [4] |
| Ukraine | WHO European Region | Europe | 36744634 | 0 | 0 | 0.00 | 0.00 | [4] |
| Spain | WHO European Region | Europe | 47519628 | 3 | 0 | 0.06 | 0.00 | [4] |
| France | WHO European Region | Europe | 64756584 | 43 | 0 | 0.66 | 0.00 | [4] |
| Italy | WHO European Region | Europe | 58870762 | 82 | 0 | 1.39 | 0.00 | [4] |
| Algeria | WHO Region of Africa | Africa | 45606480 | 0 | 0 | 0.00 | 0.00 | [5] |
| Angola | WHO Region of Africa | Africa | 36684202 | 0 | 0 | 0.00 | 0.00 | [5] |
| Botswana | WHO Region of Africa | Africa | 2675352 | 0 | 0 | 0.00 | 0.00 | [5] |
| Burundi | WHO Region of Africa | Africa | 13238559 | 0 | 0 | 0.00 | 0.00 | [5] |
| Cameroon | WHO Region of Africa | Africa | 28647293 | 0 | 0 | 0.00 | 0.00 | [5] |
| Central African Republic | WHO Region of Africa | Africa | 5742315 | 0 | 0 | 0.00 | 0.00 | [5] |
| Comoros | WHO Region of Africa | Africa | 852075 | 0 | 0 | 0.00 | 0.00 | [5] |
| Democratic Republic of the Congo | WHO Region of Africa | Africa | 102262808 | 0 | 0 | 0.00 | 0.00 | [5] |
| Equatorial Guinea | WHO Region of Africa | Africa | 1714671 | 0 | 0 | 0.00 | 0.00 | [5] |
| Eritrea | WHO Region of Africa | Africa | 3748901 | 0 | 0 | 0.00 | 0.00 | [5] |
| Gabon | WHO Region of Africa | Africa | 2436566 | 0 | 0 | 0.00 | 0.00 | [5] |
| Gambia | WHO Region of Africa | Africa | 2773168 | 0 | 0 | 0.00 | 0.00 | [5] |
| Guinea-Bissau | WHO Region of Africa | Africa | 2150842 | 0 | 0 | 0.00 | 0.00 | [5] |
| Kenya | WHO Region of Africa | Africa | 55100586 | 0 | 0 | 0.00 | 0.00 | [5] |
| Lesotho | WHO Region of Africa | Africa | 2330318 | 0 | 0 | 0.00 | 0.00 | [5] |
| Liberia | WHO Region of Africa | Africa | 5418377 | 0 | 0 | 0.00 | 0.00 | [5] |
| Madagascar | WHO Region of Africa | Africa | 30325732 | 0 | 0 | 0.00 | 0.00 | [5] |
| Malawi | WHO Region of Africa | Africa | 20931751 | 0 | 0 | 0.00 | 0.00 | [5] |
| Mauritania | WHO Region of Africa | Africa | 4862989 | 0 | 0 | 0.00 | 0.00 | [5] |
| Mozambique | WHO Region of Africa | Africa | 33897354 | 0 | 0 | 0.00 | 0.00 | [5] |
| Namibia | WHO Region of Africa | Africa | 2604172 | 0 | 0 | 0.00 | 0.00 | [5] |
| Republic of Congo | WHO Region of Africa | Africa | 6106869 | 0 | 0 | 0.00 | 0.00 | [5] |
| Rwanda | WHO Region of Africa | Africa | 14094683 | 0 | 0 | 0.00 | 0.00 | [5] |
| Seychelles | WHO Region of Africa | Africa | 107660 | 0 | 0 | 0.00 | 0.00 | [5] |
| Sierra Leone | WHO Region of Africa | Africa | 8791092 | 0 | 0 | 0.00 | 0.00 | [5] |
| South Africa | WHO Region of Africa | Africa | 60414495 | 0 | 0 | 0.00 | 0.00 | [5] |
| South Sudan | WHO Region of Africa | Africa | 11088796 | 0 | 0 | 0.00 | 0.00 | [5] |
| Tanzania | WHO Region of Africa | Africa | 67438106 | 0 | 0 | 0.00 | 0.00 | [5] |
| Uganda | WHO Region of Africa | Africa | 48582334 | 0 | 0 | 0.00 | 0.00 | [5] |
| Zambia | WHO Region of Africa | Africa | 20569737 | 0 | 0 | 0.00 | 0.00 | [5] |
| Zimbabwe | WHO Region of Africa | Africa | 16665409 | 0 | 0 | 0.00 | 0.00 | [5] |
| Guinea | WHO Region of Africa | Africa | 14190612 | 1 | 0 | 0.07 | 0.00 | [5] |
| Nigeria | WHO Region of Africa | Africa | 223804632 | 72 | 0 | 0.32 | 0.00 | [5] |
| Benin | WHO Region of Africa | Africa | 13712828 | 6 | 1 | 0.44 | 2.29 | [5] |
| Ghana | WHO Region of Africa | Africa | 34121985 | 18 | 0 | 0.53 | 0.00 | [5] |
| Togo | WHO Region of Africa | Africa | 9053799 | 8 | 1 | 0.88 | 1.13 | [5] |
| Niger | WHO Region of Africa | Africa | 27202843 | 148 | 0 | 5.44 | 0.00 | [5] |
| Senegal | WHO Region of Africa | Africa | 17763163 | 248 | 1 | 13.96 | 0.07 | [5] |
| Chad | WHO Region of Africa | Africa | 18278568 | 1342 | 1 | 73.42 | 0.01 | [5] |
| Ivory Coast | WHO Region of Africa | Africa | 28873034 | 3895 | 27 | 134.90 | 0.20 | [5] |
| Ethiopia | WHO Region of Africa | Africa | 126527060 | 21469 | 17 | 169.68 | 0.10 | [5] |
| Mali | WHO Region of Africa | Africa | 23293698 | 4427 | 29 | 190.05 | 0.15 | [5] |
| Mauritius | WHO Region of Africa | Africa | 1300557 | 265 | 0 | 203.76 | 0.00 | [5] |
| Sao Tome and Principe | WHO Region of Africa | Africa | 231856 | 69 | 0 | 297.60 | 0.00 | [5] |
| Cape Verde | WHO Region of Africa | Africa | 598682 | 410 | 0 | 684.84 | 0.00 | [5] |
| Burkina Faso | WHO Region of Africa | Africa | 23251485 | 146,878 | 688 | 6316.93 | 0.11 | [5] |
| Martinique | WHO Region of the Americas | North America | 366981 | 13239 | 6 | 36075.44 | 0.00 | [6] |
| Canada | WHO Region of the Americas | North America | 38781291 | 0 | 0 | 0.00 | 0.00 | [6] |
| Cuba | WHO Region of the Americas | North America | 11194449 | 0 | 0 | 0.00 | 0.00 | [6] |
| Dominica | WHO Region of the Americas | North America | 73040 | 0 | 0 | 0.00 | 0.00 | [6] |
| Greenland | WHO Region of the Americas | North America | 56643 | 0 | 0 | 0.00 | 0.00 | [6] |
| Haiti | WHO Region of the Americas | North America | 11724763 | 0 | 0 | 0.00 | 0.00 | [6] |
| Saint Pierre and Miquelon | WHO Region of the Americas | North America | 5840 | 0 | 0 | 0.00 | 0.00 | [6] |
| USA | WHO Region of the Americas | North America | 339996563 | 156 | 0 | 0.46 | 0.00 | [6] |
| Bermuda | WHO Region of the Americas | North America | 64069 | 1 | 0 | 15.61 | 0.00 | [6] |
| Sint Maarten | WHO Region of the Americas | North America | 44222 | 1 | 0 | 22.61 | 0.00 | [6] |
| Anguilla | WHO Region of the Americas | North America | 15899 | 1 | 0 | 62.90 | 0.00 | [6] |
| Virgin Islands | WHO Region of the Americas | North America | 98750 | 7 | 0 | 70.89 | 0.00 | [6] |
| Trinidad | WHO Region of the Americas | North America | 1534937 | 126 | 0 | 82.09 | 0.00 | [6] |
| Saint Vincent | WHO Region of the Americas | North America | 103698 | 15 | 0 | 144.65 | 0.00 | [6] |
| Saint Lucia | WHO Region of the Americas | North America | 180251 | 60 | 0 | 332.87 | 0.00 | [6] |
| Puerto Rico | WHO Region of the Americas | North America | 3260314 | 1242 | 0 | 380.94 | 0.00 | [6] |
| Bahamas | WHO Region of the Americas | North America | 412623 | 243 | 1 | 588.92 | 0.00 | [6] |
| Cayman Islands | WHO Region of the Americas | North America | 69310 | 42 | 0 | 605.97 | 0.00 | [6] |
| El Salvador | WHO Region of the Americas | North America | 6364943 | 5788 | 0 | 909.36 | 0.00 | [6] |
| Montserrat | WHO Region of the Americas | North America | 4386 | 6 | 0 | 1367.99 | 0.00 | [6] |
| Mexico | WHO Region of the Americas | North America | 128455567 | 277963 | 203 | 2163.88 | 0.09 | [6] |
| Dominican Republic | WHO Region of the Americas | North America | 11332972 | 27972 | 62 | 2468.20 | 0.03 | [6] |
| Antigua | WHO Region of the Americas | North America | 94298 | 254 | 0 | 2693.59 | 0.00 | [6] |
| Barbados | WHO Region of the Americas | North America | 281995 | 771 | 0 | 2734.09 | 0.00 | [6] |
| Jamaica | WHO Region of the Americas | North America | 2825544 | 8180 | 6 | 2895.02 | 0.00 | [6] |
| Honduras | WHO Region of the Americas | North America | 10593798 | 34050 | 49 | 3214.14 | 0.02 | [6] |
| Turks and Caicos Islands | WHO Region of the Americas | North America | 46062 | 182 | 0 | 3951.20 | 0.00 | [6] |
| Guatemala | WHO Region of the Americas | North America | 18092026 | 72358 | 119 | 3999.44 | 0.03 | [6] |
| Belize | WHO Region of the Americas | North America | 410825 | 1688 | 0 | 4108.81 | 0.00 | [6] |
| Panama | WHO Region of the Americas | North America | 4468087 | 20924 | 18 | 4682.99 | 0.00 | [6] |
| Grenada | WHO Region of the Americas | North America | 126183 | 628 | 1 | 4976.90 | 0.00 | [6] |
| Costa Rica | WHO Region of the Americas | North America | 5212173 | 30649 | 0 | 5880.27 | 0.00 | [6] |
| Saint Kitts | WHO Region of the Americas | North America | 47755 | 284 | 1 | 5947.02 | 0.00 | [6] |
| Nicaragua | WHO Region of the Americas | North America | 7046310 | 181096 | 4 | 25700.83 | 0.00 | [6] |
| Guadeloupe | WHO Region of the Americas | North America | 395839 | 11751 | 7 | 29686.31 | 0.00 | [6] |
| Saint Martin | WHO Region of the Americas | North America | 32077 | 1272 | 0 | 39654.58 | 0.00 | [6] |
| Saint Barthelemy | WHO Region of the Americas | North America | 10994 | 737 | 0 | 67036.57 | 0.00 | [6] |
| Antilles | WHO Region of the Americas | North America |  | 0 | 0 | 0.00 | 0.00 | [6] |
| Azores | WHO Region of the Americas | North America |  | 0 | 0 | 0.00 | 0.00 | [6] |
| Barbuda | WHO Region of the Americas | North America |  | 0 | 0 | 0.00 | 0.00 | [6] |
| Grenadines | WHO Region of the Americas | North America |  | 0 | 0 | 0.00 | 0.00 | [6] |
| Guernsey | WHO Region of the Americas | North America |  | 0 | 0 | 0.00 | 0.00 | [6] |
| Jersey | WHO Region of the Americas | North America |  | 0 | 0 | 0.00 | 0.00 | [6] |
| Nevis | WHO Region of the Americas | North America |  | 0 | 0 | 0.00 | 0.00 | [6] |
| Saba | WHO Region of the Americas | North America |  | 0 | 0 | 0.00 | 0.00 | [6] |
| Sint Eustatius | WHO Region of the Americas | North America |  | 0 | 0 | 0.00 | 0.00 | [6] |
| Chile | WHO Region of the Americas | South America | 19629590 | 0 | 0 | 0.00 | 0.00 | [6] |
| Curacao | WHO Region of the Americas | South America | 192077 | 0 | 0 | 0.00 | 0.00 | [6] |
| Falkland Islands | WHO Region of the Americas | South America | 3791 | 0 | 0 | 0.00 | 0.00 | [6] |
| Tobago | WHO Region of the Americas | South America | 1534937 | 0 | 0 | 0.00 | 0.00 | [6] |
| Uruguay | WHO Region of the Americas | South America | 3423108 | 48 | 0 | 14.02 | 0.00 | [6] |
| Venezuela | WHO Region of the Americas | South America | 28838499 | 4809 | 8 | 166.76 | 0.05 | [6] |
| Aruba | WHO Region of the Americas | South America | 106277 | 22 | 0 | 207.01 | 0.00 | [6] |
| Suriname | WHO Region of the Americas | South America | 623236 | 279 | 3 | 447.66 | 0.01 | [6] |
| Ecuador | WHO Region of the Americas | South America | 18190484 | 27838 | 33 | 1530.36 | 0.02 | [6] |
| Colombia | WHO Region of the Americas | South America | 52085168 | 131784 | 90 | 2530.16 | 0.04 | [6] |
| Argentina | WHO Region of the Americas | South America | 45773884 | 130287 | 75 | 2846.32 | 0.03 | [6] |
| Peru | WHO Region of the Americas | South America | 34352719 | 274227 | 441 | 7982.69 | 0.06 | [6] |
| French Guiana | WHO Region of the Americas | South America | 312155 | 2684 | 0 | 8598.29 | 0.00 | [6] |
| Paraguay | WHO Region of the Americas | South America | 6861524 | 63216 | 24 | 9213.11 | 0.00 | [6] |
| Bolivia | WHO Region of the Americas | South America | 12388571 | 156774 | 88 | 12654.73 | 0.01 | [6] |
| Brazil | WHO Region of the Americas | South America | 216422446 | 3088723 | 1184 | 14271.73 | 0.08 | [6] |
| Guyana | WHO Region of the Americas | South America | 813834 | 27709 | 0 | 34047.48 | 0.00 | [6] |
| Ascension Island | WHO Region of the Americas | South America |  | 0 | 0 | 0.00 | 0.00 | [6] |
| Bhutan | WHO South-East Asia Region | Asia | 787424 | 0 | 0 | 0.00 | 0.00 | [7] |
| North Korea | WHO South-East Asia Region | Asia | 26160821 | 0 | 0 | 0.00 | 0.00 | [7] |
| Timor-Leste | WHO South-East Asia Region | Asia | 1360596 | 0 | 0 | 0.00 | 0.00 | [7] |
| India | WHO South-East Asia Region | Asia | 1428627663 | 94198 | 91 | 65.94 | 1.38 | [7] |
| Myanmar | WHO South-East Asia Region | Asia | 54577997 | 4968 | 23 | 91.03 | 0.25 | [7] |
| Indonesia | WHO South-East Asia Region | Asia | 277534122 | 70000 | 500 | 252.22 | 1.98 | [7] |
| Nepal | WHO South-East Asia Region | Asia | 30896590 | 51243 | 20 | 1658.53 | 0.01 | [7] |
| Bangladesh | WHO South-East Asia Region | Asia | 172954319 | 321179 | 1705 | 1857.02 | 0.92 | [7] |
| Thailand | WHO South-East Asia Region | Asia | 71801279 | 159219 | 179 | 2217.50 | 0.08 | [7] |
| Sri Lanka | WHO South-East Asia Region | Asia | 21893579 | 89799 | 61 | 4101.61 | 0.01 | [7] |
| Maldives | WHO South-East Asia Region | Asia | 521021 | 3223 | 0 | 6185.93 | 0.00 | [7] |
| Brunei | WHO Western Pacific Region | Asia | 452524 | 0 | 0 | 0.00 | 0.00 | [8] |
| Japan | WHO Western Pacific Region | Asia | 123294513 | 0 | 0 | 0.00 | 0.00 | [8] |
| Mongolia | WHO Western Pacific Region | Asia | 3447157 | 0 | 0 | 0.00 | 0.00 | [8] |
| South Korea | WHO Western Pacific Region | Asia | 51784059 | 0 | 0 | 0.00 | 0.00 | [8] |
| Taiwan | WHO Western Pacific Region | Asia | 23923276 | 0 | 0 | 0.00 | 0.00 | [8] |
| China | WHO Western Pacific Region | Asia | 1425671352 | 17788 | 1 | 12.48 | 0.08 | [8] |
| Singapore | WHO Western Pacific Region | Asia | 6014723 | 9663 | 0 | 1606.56 | 0.00 | [8] |
| Philippines | WHO Western Pacific Region | Asia | 117337368 | 195603 | 657 | 1667.01 | 0.39 | [8] |
| Vietnam | WHO Western Pacific Region | Asia | 98858950 | 166619 | 42 | 1685.42 | 0.02 | [8] |
| Cambodia | WHO Western Pacific Region | Asia | 16944826 | 31567 | 39 | 1862.93 | 0.02 | [8] |
| Malaysia | WHO Western Pacific Region | Asia | 34308525 | 120418 | 96 | 3509.86 | 0.03 | [8] |
| Laos | WHO Western Pacific Region | Asia | 7633779 | 31997 | 20 | 4191.50 | 0.00 | [8] |
| Cook Islands | WHO Western Pacific Region | Oceania | 17044 | 0 | 0 | 0.00 | 0.00 | [8] |
| Fiji | WHO Western Pacific Region | Oceania | 936375 | 0 | 0 | 0.00 | 0.00 | [8] |
| Kiribati | WHO Western Pacific Region | Oceania | 133515 | 0 | 0 | 0.00 | 0.00 | [8] |
| Marshall Islands | WHO Western Pacific Region | Oceania | 41996 | 0 | 0 | 0.00 | 0.00 | [8] |
| Micronesia | WHO Western Pacific Region | Oceania | 544321 | 0 | 0 | 0.00 | 0.00 | [8] |
| Nauru | WHO Western Pacific Region | Oceania | 12780 | 0 | 0 | 0.00 | 0.00 | [8] |
| New Zealand | WHO Western Pacific Region | Oceania | 5228100 | 0 | 0 | 0.00 | 0.00 | [8] |
| Niue | WHO Western Pacific Region | Oceania | 1935 | 0 | 0 | 0.00 | 0.00 | [8] |
| Palau | WHO Western Pacific Region | Oceania | 18058 | 0 | 0 | 0.00 | 0.00 | [8] |
| Papua New Guinea | WHO Western Pacific Region | Oceania | 10329931 | 0 | 0 | 0.00 | 0.00 | [8] |
| Samoa | WHO Western Pacific Region | Oceania | 225681 | 0 | 0 | 0.00 | 0.00 | [8] |
| Solomon Islands | WHO Western Pacific Region | Oceania | 740424 | 0 | 0 | 0.00 | 0.00 | [8] |
| Tonga | WHO Western Pacific Region | Oceania | 107773 | 0 | 0 | 0.00 | 0.00 | [8] |
| Tuvalu | WHO Western Pacific Region | Oceania | 11396 | 0 | 0 | 0.00 | 0.00 | [8] |
| Vanuatu | WHO Western Pacific Region | Oceania | 334506 | 0 | 0 | 0.00 | 0.00 | [8] |
| New Caledonia | WHO Western Pacific Region | Oceania | 292991 | 4 | 0 | 13.65 | 0.00 | [8] |
| Australia | WHO Western Pacific Region | Oceania | 26439111 | 1023 | 0 | 38.69 | 0.00 | [8] |



**Map:** Global country-wise map showing the number of dengue cases and deaths per million population in 2023

Table 2: Continent-wise dengue cases and deaths per million population

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
|  | Population | Case | Death | Cases/million | Deaths/million |
| Africa | 1461016836 | 190423 | 832 | 8350.86 | 4.39 |
| Asia | 4743623830 | 1398762 | 3436 | 31629.86 | 5.25 |
| Europe | 741125581 | 128 | 0 | 2.12 | 0.00 |
| North America | 603825477 | 691686 | 477 | 252454.52 | 0.17 |
| Oceania | 46002973 | 1027 | 0 | 52.34 | 0.00 |
| South America | 441552300 | 3908400 | 1946 | 94510.33 | 0.29 |
| Total | 8037146997 | 6190426 | 6691 | 387000.03 | 10.11 |



**Map:** Global WHO region-wise map showing the number of dengue cases and deaths per million population in 2023

Table 3: WHO region-wise dengue cases and deaths per million population

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
|  | Population | Case | Death | Cases/million | Deaths/million |
| WHO Region of Africa | 1220068494 | 179256 | 765 | 8092.82 | 4.06 |
| WHO Region of the Americas | 1045377777 | 4600086 | 2423 | 346964.85 | 0.46 |
| WHO Eastern Mediterranean Region | 794054270 | 42445 | 69 | 922.37 | 0.39 |
| WHO European Region | 931558270 | 128 | 0 | 2.12 | 0.00 |
| WHO South-East Asia Region | 2087115411 | 793829 | 2579 | 16429.77 | 4.64 |
| WHO Western Pacific Region | 1955086989 | 574682 | 855 | 14588.10 | 0.55 |
| Total | 8037146997 | 6190426 | 6691 | 387000.03 | 10.11 |



**Map:** Global continent-wise map showing the number of dengue cases and deaths per million population in 2023

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