Table S1. Calorie reduction from the major food crops and marine fish in nations with nuclear weapons.

Table S2. Calorie reduction from the major food crops and marine fish in all nations calculated.

Table S3. Assumptions for the *Livestock*, *Partial Livestock,* and *No Livestock* cases.

Table S4. Number of people who would die from starvation after the simulated nuclear war in Year 2 for all nations for the *Livestock* case with trade off.

Table S5. Number of people who would die from starvation after the simulated nuclear war in Year 2 for all nations for the *Partial Livestock* case with trade off.

Table S6. Number of people who would die from starvation after the simulated nuclear war in Year 2 for all nations for the *No Livestock* case with trade off.

Table S7. Number of people who would die from starvation after the simulated nuclear war in Year 2 for all nations for the *Livestock* case with trade on.

Table S8. Number of people who would die from starvation after the simulated nuclear war in Year 2 for all nations for the *Partial Livestock* case with trade on.

Table S9. Number of people who would die from starvation after the simulated nuclear war in Year 2 for all nations for the *No Livestock* case with trade on.

**Table S1.**  Changes in caloric production (%) from the major food crops (maize, rice, soybean and spring wheat) and marine fish in Year 2 after simulated nuclear conflicts for the nations with nuclear weapons and the global average for all nations calculated. China here includes Mainland China, Hong Kong, and Macao.

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Nations** | **5 Tg** | **16 Tg** | **27 Tg** | **37 Tg** | **47 Tg** | **150 Tg** |
| China | -14.2 | -47.7 | -64.2 | -77.4 | -82.8 | -98.6 |
| France | -7.1 | -22.9 | -25.4 | -31.9 | -35.1 | -99.8 |
| India | -4.4 | -2.1 | -0.9 | -6.0 | -19.1 | -65.2 |
| Israel | 0.9 | -1.7 | -6.6 | -9.2 | -24.9 | -87.9 |
| North Korea | -18.1 | -89.0 | -91.1 | -98.6 | -98.9 | -99.4 |
| Pakistan | -2.2 | 25.4 | 24.4 | -10.3 | -12.3 | -81.8 |
| Russia | 6.0 | -64.3 | -84.2 | -90.1 | -90.3 | -99.3 |
| United Kingdom | 1.0 | -33.8 | -45.3 | -64.7 | -82.0 | -99.6 |
| United States | -13.8 | -50.6 | -67.0 | -81.2 | -90.2 | -99.7 |
| **Global Average** | **-6.9** | **-22.7** | **-32.8** | **-41.1** | **-48.0** | **-81.6** |

**Table S2.** Changes in caloric production (%) from the major food crops (maize, rice, soybean and spring wheat) and marine fish in Year 2 after simulated nuclear conflicts for all nations calculated. China here includes Mainland China, Hong Kong, and Macao.

| **Nation** | **5 Tg** | **16 Tg** | **27 Tg** | **37 Tg** | **47 Tg** | **150 Tg** |
| --- | --- | --- | --- | --- | --- | --- |
| Afghanistan | -16.9 | -22.3 | -27.1 | -29.2 | -32.9 | -100.0 |
| Albania | -12.0 | 24.3 | 12.7 | -18.5 | -13.1 | -98.5 |
| Algeria | -6.2 | 39.8 | 16.2 | 119.7 | 312.5 | -61.3 |
| Angola | 1.3 | -9.5 | -20.3 | -24.4 | -37.5 | -67.3 |
| Antigua and Barbuda | -2.6 | -7.4 | -6.8 | -6.3 | -7.3 | -17.1 |
| Argentina | -2.5 | 7.4 | -7.5 | -18.4 | -32.7 | -73.9 |
| Armenia | 13.9 | 4.7 | -1.2 | -3.3 | -35.3 | -99.5 |
| Australia | -7.7 | -20.7 | 7.4 | 32.2 | 36.0 | 24.2 |
| Austria | -33.9 | -63.9 | -70.1 | -93.4 | -91.9 | -100.0 |
| Azerbaijan | 5.4 | -11.9 | -13.1 | -18.1 | -28.7 | -100.0 |
| Bahamas | -0.6 | 0.0 | -4.5 | -5.4 | -6.6 | -26.3 |
| Bangladesh | -3.7 | 24.7 | 63.0 | 24.5 | 9.2 | -96.6 |
| Barbados | -2.7 | -9.2 | -11.4 | -10.6 | -11.1 | -14.5 |
| Belarus | 50.2 | 11.5 | -45.6 | -95.4 | -99.5 | -99.9 |
| Belgium | -18.5 | -35.8 | -37.2 | -52.2 | -68.3 | -99.8 |
| Belize | -1.5 | -3.4 | -4.4 | -3.6 | -11.2 | -47.1 |
| Benin | 7.4 | -9.5 | 0.7 | -6.1 | 1.7 | -60.4 |
| Bermuda | -2.7 | -3.8 | -8.3 | -15.2 | -19.2 | -57.0 |
| Bolivia | -4.1 | -17.2 | -28.5 | -38.3 | -41.6 | -72.6 |
| Bosnia and Herzegovina | -33.8 | -25.2 | -64.4 | -80.0 | -79.8 | -99.9 |
| Botswana | 17.5 | -3.2 | -2.9 | -13.1 | -24.5 | -71.5 |
| Brazil | -5.8 | -2.8 | -12.6 | -22.5 | -31.3 | -67.1 |
| Brunei | 0.1 | -1.3 | -2.3 | -3.0 | -4.4 | -10.4 |
| Bulgaria | -7.9 | 18.3 | 6.1 | -21.8 | -6.7 | -100.0 |
| Burkina Faso | 3.3 | -7.7 | -3.1 | 3.8 | -6.3 | -70.3 |
| Cambodia | -22.4 | -22.1 | -12.9 | -27.6 | -51.3 | -95.0 |
| Cameroon | 2.1 | -8.4 | -16.0 | -13.5 | -18.1 | -82.3 |
| Canada | -32.4 | -80.1 | -96.2 | -99.4 | -99.5 | -99.8 |
| Cape Verde | -1.0 | -4.5 | -5.0 | -6.0 | -7.0 | -11.8 |
| Central African Republic | -1.7 | -6.7 | -23.4 | -21.3 | -27.3 | -79.8 |
| Chad | 1.9 | 11.9 | 19.2 | 5.2 | 42.6 | -69.3 |
| Chile | 16.3 | -17.2 | 4.4 | 5.2 | -15.4 | -63.7 |
| China | -14.2 | -47.7 | -64.2 | -77.4 | -82.8 | -98.6 |
| Colombia | -6.6 | -9.5 | -19.4 | -28.1 | -33.2 | -85.9 |
| Republic of Congo | 2.7 | 6.0 | -6.3 | -7.9 | -11.1 | -43.2 |
| Costa Rica | -31.0 | 286.8 | 68.2 | 281.7 | 157.0 | 228.6 |
| Croatia | -16.6 | -24.4 | -47.2 | -72.0 | -72.0 | -99.8 |
| Cuba | 15.3 | 35.0 | 17.9 | 16.1 | 4.1 | -69.3 |
| Cyprus | 2.6 | -2.1 | 9.0 | 29.0 | 73.2 | -66.8 |
| Czech Republic | -8.6 | -23.3 | -35.4 | -93.7 | -88.1 | -99.6 |
| Denmark | 48.4 | 0.1 | -76.2 | -97.2 | -97.4 | -98.5 |
| Dominica | -2.4 | -7.4 | -8.1 | -8.3 | -9.0 | -12.3 |
| Dominican Republic | 13.0 | 77.1 | 38.5 | 59.1 | 39.0 | -30.7 |
| Ecuador | -5.5 | -12.2 | -15.2 | -15.1 | -21.2 | -68.3 |
| Egypt | -0.1 | -3.3 | -3.8 | -11.8 | -20.7 | -82.7 |
| El Salvador | 2.2 | 33.0 | 26.4 | 20.7 | 11.0 | -79.7 |
| Estonia | 75.3 | -72.2 | -96.2 | -96.4 | -96.6 | -98.2 |
| Ethiopia | -1.4 | -17.0 | -31.4 | -37.3 | -55.4 | -90.5 |
| Fiji | -3.4 | -2.7 | -3.3 | -4.5 | -3.2 | -10.1 |
| Finland | -48.2 | -96.7 | -97.1 | -97.1 | -97.3 | -98.5 |
| France | -7.1 | -22.9 | -25.4 | -31.9 | -35.1 | -99.8 |
| French Polynesia | -3.9 | -4.9 | -5.7 | -5.6 | -10.1 | -23.0 |
| Gabon | -2.0 | 0.4 | -14.8 | -13.6 | -17.7 | -61.1 |
| Gambia | -6.1 | -56.8 | -27.2 | 10.6 | -29.4 | 843.0 |
| Georgia | 5.6 | -21.1 | -49.9 | -64.9 | -69.0 | -98.3 |
| Germany | -5.6 | -35.9 | -37.1 | -84.9 | -86.4 | -99.9 |
| Ghana | 5.9 | -8.3 | -4.7 | -9.5 | -2.6 | -67.1 |
| Greece | -9.4 | 40.8 | 35.7 | 7.9 | 9.4 | -96.4 |
| Grenada | -15.7 | -28.5 | -29.4 | -28.5 | -29.0 | -30.5 |
| Guatemala | 0.9 | 5.0 | -0.1 | 2.8 | -10.1 | -82.6 |
| Guinea | -7.0 | -2.8 | -4.6 | 12.8 | 6.7 | -81.3 |
| Guinea-Bissau | -3.9 | 2.6 | 28.5 | 26.7 | 24.3 | -13.9 |
| Guyana | 28.1 | 127.8 | 93.4 | 87.8 | 86.6 | -4.8 |
| Haiti | 86.4 | 453.8 | 376.6 | 370.6 | 294.6 | 23.7 |
| Honduras | -1.2 | 8.3 | 10.7 | 5.9 | -4.2 | -74.4 |
| Hungary | -13.8 | -56.6 | -64.1 | -81.3 | -83.1 | -99.9 |
| Iceland | -9.0 | -18.2 | -29.1 | -33.4 | -35.6 | -64.5 |
| India | -4.4 | -2.1 | 0.9 | -6.0 | -19.1 | -65.2 |
| Indonesia | -2.4 | -1.5 | -13.9 | -17.1 | -26.9 | -64.5 |
| Iran | -8.9 | -15.8 | -30.0 | -34.2 | -37.9 | -98.0 |
| Iraq | -2.8 | -0.6 | -12.2 | -28.4 | -26.8 | -99.3 |
| Ireland | 9.1 | -26.0 | -32.5 | -45.6 | -68.3 | -97.4 |
| Israel | 0.9 | -1.7 | -6.6 | -9.2 | -24.9 | -87.9 |
| Italy | -10.1 | -17.8 | -29.7 | -52.2 | -49.9 | -98.3 |
| Jamaica | 17.9 | 94.2 | 90.2 | 78.5 | 49.3 | -16.7 |
| Japan | -7.3 | -50.0 | -66.9 | -79.6 | -84.7 | -93.4 |
| Jordan | 2.2 | -0.6 | -5.4 | -10.8 | -32.0 | -96.9 |
| Kazakhstan | -11.0 | -22.4 | -48.7 | -71.1 | -88.9 | -99.9 |
| Kenya | -4.0 | -20.1 | -25.0 | -34.2 | -42.4 | -84.9 |
| Kiribati | -4.8 | -10.9 | -12.7 | -17.2 | -19.4 | -31.9 |
| Kuwait | -0.4 | -9.5 | -6.3 | -16.5 | -18.5 | -93.7 |
| Kyrgyzstan | -7.5 | -29.8 | -53.2 | -70.4 | -88.0 | -100.0 |
| Laos | -18.1 | -44.8 | -51.5 | -55.2 | -64.9 | -99.0 |
| Latvia | 78.6 | -20.6 | -93.9 | -98.0 | -98.0 | -99.0 |
| Lebanon | 0.9 | -8.0 | -8.1 | 2.1 | 7.3 | -76.3 |
| Lesotho | 0.7 | -33.7 | -41.5 | -46.7 | -63.2 | -89.4 |
| Liberia | -3.5 | 7.6 | 8.2 | -3.9 | 5.4 | -79.0 |
| Lithuania | 65.5 | 12.2 | -70.0 | -98.9 | -98.9 | -99.4 |
| Luxembourg | -2.7 | -17.6 | -19.2 | -43.5 | -57.5 | -100.0 |
| Madagascar | -0.8 | 3.1 | -15.9 | -12.0 | -27.9 | -62.6 |
| Malawi | 6.5 | 4.2 | -10.5 | -23.3 | -41.5 | -69.3 |
| Malaysia | 0.7 | -6.3 | -16.3 | -11.0 | -14.8 | -60.2 |
| Maldives | -2.7 | 5.4 | 4.4 | -0.6 | -6.0 | -8.9 |
| Mali | -11.5 | -16.8 | -13.9 | 8.5 | -15.4 | -78.2 |
| Malta | 0.2 | 0.2 | 0.0 | -0.4 | -0.8 | -3.1 |
| Mauritania | -18.5 | -28.6 | -12.1 | -12.3 | -13.8 | -53.5 |
| Mauritius | -1.8 | -0.9 | -5.1 | -3.3 | -5.6 | -23.7 |
| Mexico | -8.0 | -25.5 | -37.9 | -44.8 | -57.3 | -93.9 |
| Moldova | -8.1 | -42.6 | -60.5 | -79.7 | -81.0 | -99.9 |
| Mongolia | -25.8 | -70.0 | -98.9 | -99.9 | -100.0 | -100.0 |
| Montenegro | -20.4 | -8.6 | -51.3 | -69.4 | -67.8 | -98.5 |
| Morocco | -10.6 | 39.3 | 5.7 | 87.9 | 95.4 | -83.5 |
| Mozambique | 23.1 | -3.5 | 3.1 | -3.1 | -18.3 | -51.7 |
| Myanmar | -6.3 | -25.3 | -44.9 | -59.0 | -74.2 | -97.9 |
| Namibia | 4.0 | -21.4 | -15.6 | -21.4 | -15.2 | -50.7 |
| Nepal | -11.8 | -32.5 | -39.2 | -49.4 | -64.2 | -97.5 |
| Netherlands | 7.7 | -32.6 | -32.8 | -55.9 | -76.3 | -97.3 |
| New Caledonia | -0.8 | -0.5 | -1.0 | -1.2 | -1.9 | -3.6 |
| New Zealand | -7.9 | -6.1 | -14.3 | -24.2 | -25.0 | -60.9 |
| Nicaragua | -4.0 | 5.8 | -5.5 | -5.4 | -12.6 | -73.4 |
| Niger | -5.1 | 11.9 | 41.0 | 48.0 | 45.0 | -67.7 |
| Nigeria | 2.0 | -5.6 | 1.2 | -6.0 | 4.2 | -67.0 |
| North Korea | -18.1 | -89.0 | -91.1 | -98.6 | -98.9 | -99.4 |
| Norway | -24.0 | -44.5 | -49.0 | -51.6 | -53.6 | -74.7 |
| Oman | -2.3 | 11.8 | -4.8 | 8.8 | -8.9 | 36.0 |
| Pakistan | -2.2 | 25.4 | 24.4 | -10.3 | -12.3 | -81.8 |
| Panama | -14.2 | 161.8 | 43.9 | 134.5 | 141.7 | 55.3 |
| Paraguay | 2.4 | -0.3 | -4.0 | -13.6 | -30.6 | -77.2 |
| Peru | -1.6 | -15.5 | -23.1 | -26.2 | -31.3 | -64.2 |
| Philippines | -4.2 | -20.8 | -6.1 | -6.7 | -2.1 | -51.9 |
| Poland | 24.5 | -5.8 | -19.3 | -94.0 | -92.2 | -99.9 |
| Portugal | 4.3 | -10.4 | -35.1 | -49.2 | -62.0 | -96.5 |
| Romania | -10.0 | -40.6 | -51.9 | -74.8 | -76.3 | -99.8 |
| Russia | 6.0 | -64.3 | -84.2 | -90.1 | -90.3 | -99.3 |
| Rwanda | -6.5 | -28.0 | -38.0 | -52.8 | -54.2 | -80.4 |
| Saint Kitts and Nevis | -1.4 | -7.0 | -5.4 | -6.1 | -5.7 | -15.0 |
| Saint Lucia | -4.0 | -9.9 | -11.0 | -9.4 | -9.7 | -14.8 |
| Saint Vincent and the Grenadines | -8.4 | -15.0 | -16.0 | -14.5 | -13.9 | -17.3 |
| Samoa | -4.4 | -2.1 | -1.5 | 0.7 | -0.9 | -8.1 |
| Sao Tome and Principe | -0.5 | 2.7 | 0.5 | 1.8 | 1.7 | -1.7 |
| Saudi Arabia | 6.0 | 31.0 | 19.9 | -1.9 | 39.8 | -45.5 |
| Senegal | -7.5 | -15.1 | 14.8 | 9.0 | 6.8 | -28.4 |
| Serbia | -21.5 | -60.1 | -70.3 | -83.8 | -86.6 | -100.0 |
| Sierra Leone | -12.0 | -8.3 | -11.5 | -4.6 | 13.0 | -77.0 |
| Slovakia | -10.4 | -37.9 | -42.0 | -78.4 | -78.4 | -100.0 |
| Slovenia | -22.3 | -53.2 | -63.0 | -83.4 | -81.4 | -99.9 |
| Solomon Islands | -6.0 | -5.9 | -8.9 | -10.7 | -10.4 | -14.4 |
| South Africa | -4.6 | -21.8 | -31.2 | -40.9 | -50.1 | -86.2 |
| South Korea | -6.1 | -48.5 | -58.6 | -83.6 | -91.7 | -95.7 |
| Spain | 3.4 | 24.4 | 7.9 | 19.1 | 10.6 | -96.2 |
| Sri Lanka | -15.0 | -4.0 | -4.9 | 0.5 | -11.0 | -19.4 |
| Sudan | 21.9 | 27.2 | 24.4 | 35.8 | 36.8 | -42.8 |
| Suriname | 32.2 | 200.3 | 170.1 | 165.4 | 161.0 | 43.7 |
| Sweden | -36.6 | -79.0 | -97.7 | -98.5 | -98.6 | -99.2 |
| Switzerland | -18.4 | -34.2 | -40.1 | -79.2 | -75.5 | -99.9 |
| Taiwan, province of China | -13.2 | -36.7 | -43.3 | -61.6 | -68.8 | -86.4 |
| Tajikistan | -15.0 | -45.2 | -52.6 | -62.0 | -76.8 | -100.0 |
| Tanzania | 2.2 | -37.6 | -42.6 | -46.6 | -53.7 | -82.1 |
| Thailand | -19.6 | -26.9 | -29.3 | -38.0 | -53.9 | -97.9 |
| Togo | 6.6 | -8.3 | -4.5 | -8.8 | 1.6 | -60.9 |
| Trinidad and Tobago | -2.3 | -7.0 | -7.3 | -7.9 | -7.7 | -10.3 |
| Tunisia | 1.7 | 13.6 | 35.3 | 97.5 | 113.0 | -64.4 |
| Turkey | 4.7 | 22.1 | 7.4 | 5.9 | 10.5 | -99.0 |
| Turkmenistan | -19.5 | -31.3 | -36.6 | -40.2 | -41.1 | -99.9 |
| Uganda | -11.5 | -28.7 | -41.5 | -60.5 | -72.0 | -94.6 |
| Ukraine | 17.2 | -23.2 | -25.8 | -69.1 | -68.7 | -100.0 |
| United Arab Emirates | 3.3 | 87.4 | 341.8 | -1.4 | -15.0 | -36.7 |
| United Kingdom | 1.0 | -33.8 | -45.3 | -64.7 | -82.0 | -99.6 |
| United States | -13.8 | -50.6 | -67.0 | -81.2 | -90.2 | -99.7 |
| Uruguay | -4.2 | -8.7 | -3.0 | -18.6 | -35.4 | -62.1 |
| Uzbekistan | -16.7 | -19.5 | -28.4 | -29.5 | -34.8 | -100.0 |
| Vanuatu | -1.7 | 0.7 | -2.9 | -7.7 | -7.3 | -13.6 |
| Venezuela | -3.5 | 15.5 | 3.3 | 4.4 | -4.3 | -72.1 |
| Vietnam | -8.1 | -34.7 | -48.8 | -54.2 | -65.4 | -96.0 |
| Yemen | 20.3 | 69.2 | 52.3 | 51.7 | 45.1 | -57.7 |
| Zambia | 6.7 | 0.2 | -18.1 | -28.0 | -42.2 | -69.8 |
| Zimbabwe | 9.2 | -4.9 | -9.2 | -19.0 | -37.2 | -69.2 |
| **Total** | **-7.0** | **-22.8** | **-32.3** | **-41.1** | **-48.1** | **-81.6** |

**Table S3.** Assumptions for the *Livestock*, *Partial Livestock*, and *No Livestock* cases. Livestock includes meat, dairy, eggs, and aquaculture. Inland fish capture, a minor source of food, is not considered in any of the cases

|  |  |  |  |
| --- | --- | --- | --- |
| Assumptions | *Livestock* | *Partial Livestock* | *No Livestock* |
| Reduction in cereals |  |  |  |
| Reduction in vegetables, fruit and nuts |  |  |  |
| Reduction in marine wild catch |  |  |  |
| Final product of biofuel |  |  |  |
| Marine fishery effort | Business as usual | Five times the effort12 | Five times the effort12 |
| Livestock, aquaculture | No change | Portion of livestock remains | Consumed in Year 1 |
| Livestock feed from crops | For animal feed | Portion for human consumption | Portion for human consumption |

**Table S4.** Number of people who would die from starvation (millions) after the simulated nuclear war in Year 2 for all nations assuming no trade under the *Livestock* case (livestock production is continued). The second column is the population in millions in 201045. 150 Tg + hw is half of the household waste added to food consumption, and 150 Tg + tw is total household waste added to food consumption.

| **Nation** | ***Population*** | **5 Tg** | **16 Tg** | **27 Tg** | **37 Tg** | **47 Tg** | **150 Tg** | **150 Tg +hw** | **150 Tg + tw** |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Afghanistan | *28.4* | 4.5 | 6.2 | 8.1 | 9.1 | 10.5 | 28.4 | 28.4 | 28.4 |
| Albania | *3.2* | 0.7 | 0.0 | 0.5 | 1.1 | 1.0 | 2.8 | 2.7 | 2.7 |
| Algeria | *37.1* | 19.6 | 11.6 | 16.4 | 0.0 | 0.0 | 30.4 | 29.3 | 28.2 |
| Angola | *19.5* | 0.0 | 1.2 | 3.4 | 4.3 | 7.0 | 13.1 | 12.6 | 12.1 |
| Antigua and Barbuda | *0.1* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Argentina | *40.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1.2 | 0.0 | 0.0 |
| Armenia | *3.0* | 0.7 | 0.8 | 1.1 | 1.3 | 1.9 | 3.0 | 3.0 | 3.0 |
| Australia | *22.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Austria | *8.4* | 0.0 | 2.9 | 3.9 | 6.4 | 6.5 | 8.4 | 8.4 | 8.4 |
| Azerbaijan | *9.1* | 1.7 | 2.8 | 3.4 | 3.7 | 4.4 | 9.1 | 9.1 | 9.1 |
| Bahamas | *0.4* | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 |
| Bangladesh | *151.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 145.4 | 144.9 | 144.4 |
| Barbados | *0.3* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Belarus | *9.5* | 0.0 | 0.0 | 3.0 | 8.4 | 9.3 | 9.5 | 9.5 | 9.5 |
| Belgium | *10.9* | 2.2 | 3.1 | 3.8 | 6.8 | 6.2 | 10.9 | 10.9 | 10.9 |
| Belize | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.2 | 0.2 | 0.2 |
| Benin | *9.5* | 0.0 | 1.1 | 0.2 | 0.8 | 0.1 | 5.8 | 5.5 | 5.1 |
| Bermuda | *0.1* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Bolivia | *10.2* | 0.0 | 0.0 | 0.0 | 0.7 | 1.2 | 5.7 | 5.7 | 5.7 |
| Bosnia and Herzegovina | *3.8* | 1.7 | 1.4 | 2.5 | 3.0 | 3.2 | 3.8 | 3.8 | 3.7 |
| Botswana | *2.0* | 1.3 | 1.4 | 1.4 | 1.5 | 1.5 | 1.8 | 1.8 | 1.8 |
| Brazil | *195.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 77.2 | 57.5 | 37.7 |
| Brunei | *0.4* | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 |
| Bulgaria | *7.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 7.4 | 7.4 | 7.4 |
| Burkina Faso | *15.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 10.1 | 9.3 | 8.5 |
| Cambodia | *14.4* | 1.9 | 1.9 | 0.5 | 2.8 | 6.5 | 13.3 | 13.2 | 13.2 |
| Cameroon | *20.6* | 0.0 | 0.2 | 1.9 | 1.2 | 2.4 | 16.8 | 16.4 | 16.0 |
| Canada | *34.1* | 0.0 | 18.5 | 30.2 | 33.3 | 33.5 | 34.0 | 33.9 | 33.9 |
| Cape Verde | *0.5* | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.4 | 0.3 | 0.3 |
| Central African Republic | *4.4* | 0.0 | 0.1 | 0.8 | 0.7 | 1.0 | 3.4 | 3.4 | 3.3 |
| Chad | *11.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 8.1 | 8.1 | 8.1 |
| Chile | *17.2* | 0.0 | 3.4 | 0.0 | 0.0 | 3.1 | 11.2 | 10.6 | 10.0 |
| China | *1367.4* | 66.3 | 570.7 | 823.1 | 1029.1 | 1117.4 | 1360.5 | 1359.4 | 1358.4 |
| Colombia | *46.4* | 1.6 | 3.7 | 8.3 | 12.1 | 14.4 | 37.1 | 36.5 | 35.9 |
| Republic of Congo | *4.1* | 0.8 | 0.7 | 1.4 | 1.3 | 1.6 | 3.1 | 3.1 | 3.1 |
| Costa Rica | *4.7* | 0.2 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Croatia | *4.3* | 0.0 | 0.4 | 1.5 | 2.7 | 2.7 | 4.2 | 4.2 | 4.2 |
| Cuba | *11.3* | 0.2 | 0.0 | 0.0 | 0.0 | 1.2 | 8.2 | 7.8 | 7.3 |
| Cyprus | *1.1* | 0.5 | 0.5 | 0.4 | 0.4 | 0.2 | 0.8 | 0.8 | 0.8 |
| Czech Republic | *10.6* | 0.0 | 0.0 | 0.7 | 8.9 | 8.5 | 10.5 | 10.5 | 10.5 |
| Denmark | *5.6* | 0.0 | 0.0 | 2.8 | 4.5 | 4.6 | 5.1 | 5.1 | 5.0 |
| Dominica | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Dominican Republic | *10.0* | 0.3 | 0.0 | 0.0 | 0.0 | 0.0 | 2.4 | 2.1 | 1.8 |
| Ecuador | *15.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 7.7 | 7.4 | 7.1 |
| Egypt | *78.1* | 8.3 | 9.5 | 22.3 | 27.2 | 32.2 | 68.0 | 65.4 | 62.9 |
| El Salvador | *6.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.6 | 4.6 | 4.5 |
| Estonia | *1.3* | 0.0 | 0.7 | 1.2 | 1.3 | 1.2 | 1.2 | 1.2 | 1.2 |
| Ethiopia | *87.1* | 0.0 | 0.0 | 12.8 | 18.8 | 37.5 | 75.2 | 75.1 | 75.0 |
| Fiji | *0.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Finland | *5.4* | 1.8 | 5.2 | 5.3 | 5.3 | 5.3 | 5.3 | 5.3 | 5.3 |
| France | *63.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 61.5 | 61.1 | 60.8 |
| French Polynesia | *0.3* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Gabon | *1.6* | 0.5 | 0.4 | 0.6 | 0.6 | 0.7 | 1.2 | 1.1 | 1.1 |
| Gambia | *1.7* | 0.5 | 1.1 | 0.8 | 0.2 | 0.8 | 0.0 | 0.0 | 0.0 |
| Georgia | *4.4* | 2.5 | 2.8 | 3.3 | 3.6 | 3.7 | 4.4 | 4.4 | 4.4 |
| Germany | *83.0* | 0.0 | 2.1 | 9.8 | 61.2 | 64.6 | 82.8 | 82.8 | 82.7 |
| Ghana | *24.3* | 0.0 | 1.1 | 0.1 | 1.3 | 0.0 | 16.2 | 14.7 | 13.1 |
| Greece | *11.1* | 0.3 | 0.0 | 0.0 | 0.0 | 0.0 | 10.5 | 10.4 | 10.3 |
| Grenada | *0.1* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Guatemala | *14.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 10.6 | 10.3 | 10.0 |
| Guinea | *10.9* | 0.2 | 0.0 | 0.0 | 0.0 | 0.0 | 8.7 | 8.5 | 8.2 |
| Guinea-Bissau | *1.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.2 | 0.1 | 0.0 |
| Guyana | *0.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Haiti | *9.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Honduras | *7.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 5.0 | 4.8 | 4.6 |
| Hungary | *10.0* | 0.0 | 1.3 | 2.9 | 6.1 | 7.0 | 10.0 | 10.0 | 10.0 |
| Iceland | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| India | *1205.6* | 0.0 | 0.0 | 0.0 | 0.0 | 118.8 | 745.9 | 707.9 | 670.0 |
| Indonesia | *240.7* | 0.0 | 0.0 | 0.0 | 0.0 | 17.9 | 133.8 | 121.1 | 108.4 |
| Iran | *74.5* | 11.0 | 14.6 | 27.4 | 31.5 | 33.1 | 73.2 | 73.0 | 72.8 |
| Iraq | *31.0* | 13.4 | 12.9 | 15.2 | 18.2 | 17.8 | 30.9 | 30.9 | 30.8 |
| Ireland | *4.5* | 0.0 | 0.1 | 0.5 | 0.6 | 1.7 | 3.0 | 2.7 | 2.4 |
| Israel | *7.4* | 3.4 | 4.4 | 4.3 | 4.4 | 4.1 | 6.3 | 6.0 | 5.7 |
| Italy | *60.5* | 9.6 | 13.4 | 20.5 | 31.3 | 31.0 | 58.2 | 57.7 | 57.3 |
| Jamaica | *2.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.8 | 0.6 | 0.5 |
| Japan | *127.4* | 76.9 | 99.7 | 108.1 | 115.2 | 118.6 | 124.5 | 124.3 | 124.0 |
| Jordan | *6.5* | 4.1 | 4.5 | 4.5 | 4.7 | 4.7 | 6.3 | 6.3 | 6.3 |
| Kazakhstan | *15.9* | 0.0 | 0.3 | 4.6 | 8.6 | 11.9 | 15.9 | 15.9 | 15.9 |
| Kenya | *40.9* | 1.8 | 7.8 | 9.4 | 13.5 | 17.0 | 33.5 | 33.4 | 33.3 |
| Kiribati | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Kuwait | *3.0* | 2.6 | 2.6 | 2.6 | 2.7 | 2.7 | 3.0 | 3.0 | 3.0 |
| Kyrgyzstan | *5.3* | 0.1 | 1.2 | 2.3 | 3.2 | 4.0 | 5.3 | 5.3 | 5.3 |
| Laos | *6.4* | 0.2 | 2.2 | 2.7 | 3.0 | 3.8 | 6.3 | 6.3 | 6.3 |
| Latvia | *2.1* | 0.0 | 0.0 | 1.7 | 2.0 | 1.9 | 2.0 | 2.0 | 2.0 |
| Lebanon | *4.3* | 2.3 | 2.5 | 2.5 | 2.3 | 2.0 | 3.8 | 3.7 | 3.6 |
| Lesotho | *2.0* | 1.1 | 1.4 | 1.5 | 1.5 | 1.6 | 1.9 | 1.9 | 1.9 |
| Liberia | *4.0* | 1.0 | 0.6 | 0.6 | 1.0 | 0.7 | 3.3 | 3.3 | 3.3 |
| Lithuania | *3.1* | 0.0 | 0.0 | 1.5 | 3.0 | 2.9 | 3.0 | 3.0 | 3.0 |
| Luxembourg | *0.5* | 0.0 | 0.0 | 0.0 | 0.2 | 0.2 | 0.5 | 0.5 | 0.5 |
| Madagascar | *21.1* | 0.0 | 0.0 | 0.2 | 0.0 | 3.3 | 11.6 | 11.4 | 11.2 |
| Malawi | *15.0* | 0.0 | 0.0 | 0.0 | 0.7 | 4.1 | 9.3 | 8.8 | 8.3 |
| Malaysia | *28.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 14.2 | 12.0 | 9.8 |
| Maldives | *0.3* | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 |
| Mali | *14.0* | 0.0 | 0.4 | 0.3 | 0.0 | 0.4 | 9.8 | 9.0 | 8.2 |
| Malta | *0.4* | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 |
| Mauritania | *3.6* | 2.3 | 2.5 | 2.2 | 2.0 | 2.2 | 2.7 | 2.6 | 2.4 |
| Mauritius | *1.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Mexico | *117.9* | 14.1 | 33.6 | 46.6 | 54.1 | 67.5 | 106.7 | 105.1 | 103.5 |
| Moldova | *3.6* | 0.0 | 0.3 | 1.3 | 2.5 | 2.6 | 3.6 | 3.6 | 3.6 |
| Mongolia | *2.7* | 0.9 | 1.6 | 2.2 | 2.4 | 2.6 | 2.7 | 2.7 | 2.7 |
| Montenegro | *0.6* | 0.4 | 0.4 | 0.5 | 0.5 | 0.5 | 0.6 | 0.6 | 0.6 |
| Morocco | *31.6* | 6.9 | 0.0 | 2.3 | 0.0 | 0.0 | 26.7 | 25.7 | 24.8 |
| Mozambique | *24.0* | 0.0 | 0.0 | 0.0 | 0.0 | 1.2 | 10.5 | 9.8 | 9.1 |
| Myanmar | *51.9* | 0.0 | 5.6 | 17.5 | 26.2 | 35.4 | 50.1 | 50.0 | 49.9 |
| Namibia | *2.2* | 0.4 | 1.0 | 0.8 | 0.9 | 0.7 | 1.5 | 1.5 | 1.5 |
| Nepal | *26.8* | 1.8 | 7.7 | 9.4 | 12.5 | 16.4 | 26.2 | 26.2 | 26.1 |
| Netherlands | *16.6* | 0.0 | 4.0 | 6.5 | 11.7 | 11.2 | 16.3 | 16.3 | 16.2 |
| New Caledonia | *0.2* | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 |
| New Zealand | *4.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Nicaragua | *5.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 3.5 | 3.4 | 3.3 |
| Niger | *15.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 12.4 | 11.9 | 11.4 |
| Nigeria | *159.7* | 0.0 | 8.1 | 0.0 | 8.3 | 0.0 | 107.6 | 98.8 | 90.0 |
| North Korea | *24.5* | 6.7 | 22.1 | 22.5 | 24.1 | 24.3 | 24.5 | 24.5 | 24.5 |
| Norway | *4.9* | 2.7 | 4.4 | 4.6 | 4.6 | 4.7 | 4.7 | 4.7 | 4.6 |
| Oman | *2.8* | 1.8 | 0.6 | 1.4 | 0.2 | 1.1 | 0.0 | 0.0 | 0.0 |
| Pakistan | *173.1* | 0.0 | 0.0 | 0.0 | 0.0 | 12.1 | 143.6 | 141.1 | 138.7 |
| Panama | *3.7* | 0.9 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Paraguay | *6.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1.6 | 1.3 | 0.9 |
| Peru | *29.3* | 0.7 | 4.8 | 7.1 | 8.1 | 9.4 | 19.0 | 18.2 | 17.4 |
| Philippines | *93.4* | 0.0 | 10.5 | 0.0 | 0.0 | 0.0 | 43.5 | 37.0 | 30.5 |
| Poland | *38.2* | 0.0 | 0.0 | 0.7 | 34.2 | 34.0 | 38.1 | 38.1 | 38.1 |
| Portugal | *10.6* | 2.3 | 3.2 | 5.4 | 6.1 | 7.1 | 9.2 | 8.9 | 8.6 |
| Romania | *21.9* | 0.0 | 2.2 | 6.1 | 13.9 | 14.8 | 21.8 | 21.8 | 21.8 |
| Russia | *143.6* | 0.0 | 81.1 | 115.6 | 126.4 | 128.5 | 142.0 | 141.8 | 141.5 |
| Rwanda | *10.8* | 0.0 | 0.3 | 1.7 | 3.9 | 4.2 | 8.0 | 7.9 | 7.8 |
| Saint Kitts and Nevis | *0.1* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Saint Lucia | *0.2* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Saint Vincent and the Grenadines | *0.1* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.0 | 0.0 |
| Samoa | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Sao Tome and Principe | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Saudi Arabia | *27.3* | 19.2 | 18.1 | 18.8 | 20.0 | 17.9 | 23.2 | 22.5 | 21.9 |
| Senegal | *13.0* | 2.3 | 3.1 | 0.0 | 0.0 | 0.3 | 4.5 | 3.9 | 3.3 |
| Serbia | *9.6* | 0.0 | 2.9 | 4.8 | 6.7 | 7.2 | 9.5 | 9.5 | 9.5 |
| Sierra Leone | *5.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.3 | 4.2 | 4.1 |
| Slovakia | *5.4* | 0.0 | 1.4 | 1.8 | 3.9 | 4.1 | 5.4 | 5.4 | 5.4 |
| Slovenia | *2.1* | 0.5 | 0.9 | 1.2 | 1.5 | 1.5 | 2.0 | 2.0 | 2.0 |
| Solomon Islands | *0.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| South Africa | *51.5* | 0.0 | 6.0 | 11.1 | 16.5 | 21.7 | 41.9 | 40.4 | 38.9 |
| South Korea | *48.5* | 27.5 | 37.2 | 39.4 | 44.9 | 47.6 | 48.1 | 48.1 | 48.0 |
| Spain | *46.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 42.1 | 41.6 | 41.1 |
| Sri Lanka | *20.8* | 3.1 | 0.8 | 1.0 | 0.0 | 2.3 | 4.1 | 2.8 | 1.6 |
| Suriname | *0.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Sweden | *9.4* | 2.4 | 7.2 | 9.1 | 9.2 | 9.3 | 9.3 | 9.3 | 9.3 |
| Switzerland | *7.8* | 2.8 | 3.5 | 4.2 | 5.8 | 5.7 | 7.7 | 7.7 | 7.7 |
| Taiwan, province of China | *23.1* | 15.7 | 18.0 | 18.6 | 20.4 | 21.1 | 22.6 | 22.6 | 22.5 |
| Tajikistan | *7.6* | 2.5 | 4.0 | 4.6 | 5.2 | 6.2 | 7.6 | 7.6 | 7.6 |
| Tanzania | *45.0* | 0.0 | 7.9 | 10.6 | 13.0 | 17.2 | 33.2 | 33.1 | 33.0 |
| Thailand | *66.4* | 0.0 | 0.0 | 0.0 | 2.0 | 18.8 | 64.5 | 64.3 | 64.1 |
| Togo | *6.3* | 0.0 | 0.4 | 0.1 | 0.4 | 0.0 | 3.8 | 3.7 | 3.5 |
| Trinidad and Tobago | *1.3* | 1.1 | 1.1 | 1.1 | 1.1 | 1.1 | 1.1 | 1.1 | 1.1 |
| Tunisia | *10.6* | 4.0 | 3.2 | 2.6 | 0.0 | 0.0 | 8.0 | 7.5 | 7.0 |
| Turkey | *72.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 70.3 | 69.9 | 69.5 |
| Turkmenistan | *5.0* | 1.0 | 2.1 | 2.5 | 2.7 | 2.7 | 5.0 | 5.0 | 5.0 |
| Uganda | *34.0* | 0.0 | 6.3 | 11.4 | 18.6 | 23.8 | 32.9 | 32.8 | 32.7 |
| Ukraine | *46.1* | 0.0 | 0.0 | 0.0 | 24.3 | 24.7 | 46.0 | 46.0 | 46.0 |
| United Arab Emirates | *8.4* | 7.6 | 6.0 | 0.7 | 7.9 | 8.1 | 8.2 | 8.2 | 8.2 |
| United Kingdom | *62.3* | 3.7 | 21.6 | 27.8 | 37.4 | 46.2 | 55.9 | 54.8 | 53.8 |
| United States | *312.2* | 0.0 | 30.7 | 115.2 | 186.0 | 240.9 | 305.9 | 304.6 | 303.3 |
| Uruguay | *3.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Uzbekistan | *27.8* | 1.9 | 4.4 | 7.1 | 7.7 | 9.4 | 27.8 | 27.8 | 27.8 |
| Vanuatu | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Venezuela | *29.0* | 10.4 | 7.4 | 9.7 | 9.6 | 11.3 | 23.4 | 22.8 | 22.1 |
| Vietnam | *89.0* | 0.0 | 21.9 | 36.7 | 42.4 | 54.2 | 86.1 | 85.7 | 85.4 |
| Yemen | *22.8* | 12.9 | 9.0 | 10.3 | 10.4 | 11.0 | 19.3 | 19.2 | 19.1 |
| Zambia | *13.2* | 0.0 | 0.0 | 0.0 | 0.0 | 1.7 | 7.1 | 7.1 | 7.1 |
| Zimbabwe | *13.1* | 0.7 | 2.3 | 2.8 | 3.8 | 5.8 | 9.3 | 9.3 | 9.3 |
| **Total** | ***6703.0*** | **409.3** | **1249.4** | **1798.5** | **2363.8** | **2812.0** | **5442.0** | **5318.3** | **5195.7** |

**Table S5.** Number of people who would die from starvation (millions) after the simulated nuclear war in Year 2 for all nations, assuming no trade, under the *Partial Livestock* case (assuming 50% of livestock grain feed is used for human consumption, and 50% of livestock grain feed is used to raise livestock). The second column is the population in millions in 201045. 150 Tg + hw is half of the household waste added to food consumption, and 150 Tg + tw is total household waste added to food consumption.

| **Nation** | ***Population*** | **5 Tg** | **16 Tg** | **27 Tg** | **37 Tg** | **47 Tg** | **150 Tg** | **150 Tg + hw** | **150 Tg + tw** |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Afghanistan | *28.4* | 4.2 | 5.9 | 7.5 | 8.3 | 9.6 | 28.4 | 28.4 | 28.4 |
| Albania | *3.2* | 0.6 | 0.0 | 0.2 | 0.9 | 0.8 | 2.9 | 2.9 | 2.9 |
| Algeria | *37.1* | 17.5 | 8.1 | 13.3 | 0.0 | 0.0 | 29.2 | 28.0 | 26.7 |
| Angola | *19.5* | 0.0 | 0.0 | 0.0 | 0.8 | 4.2 | 11.7 | 11.1 | 10.5 |
| Antigua and Barbuda | *0.1* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Argentina | *40.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Armenia | *3.0* | 0.6 | 0.8 | 1.0 | 1.1 | 1.8 | 3.0 | 3.0 | 3.0 |
| Australia | *22.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Austria | *8.4* | 0.0 | 1.8 | 3.0 | 6.7 | 6.6 | 8.4 | 8.4 | 8.4 |
| Azerbaijan | *9.1* | 0.5 | 1.9 | 2.2 | 2.6 | 3.5 | 9.1 | 9.1 | 9.1 |
| Bahamas | *0.4* | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 |
| Bangladesh | *151.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 145.7 | 145.2 | 144.8 |
| Barbados | *0.3* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Belarus | *9.5* | 0.0 | 0.0 | 0.0 | 8.2 | 9.3 | 9.5 | 9.5 | 9.5 |
| Belgium | *10.9* | 0.0 | 1.8 | 2.2 | 5.0 | 6.0 | 10.9 | 10.9 | 10.9 |
| Belize | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.1 | 0.1 | 0.1 |
| Benin | *9.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 5.3 | 4.8 | 4.4 |
| Bermuda | *0.1* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Bolivia | *10.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 5.2 | 5.2 | 5.2 |
| Bosnia and Herzegovina | *3.8* | 1.3 | 1.0 | 2.4 | 3.0 | 3.1 | 3.8 | 3.8 | 3.8 |
| Botswana | *2.0* | 1.4 | 1.5 | 1.5 | 1.5 | 1.6 | 1.8 | 1.8 | 1.8 |
| Brazil | *195.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 40.4 | 14.3 | 0.0 |
| Brunei | *0.4* | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 |
| Bulgaria | *7.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 7.4 | 7.4 | 7.4 |
| Burkina Faso | *15.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 9.9 | 9.1 | 8.3 |
| Cambodia | *14.4* | 0.6 | 0.5 | 0.0 | 1.5 | 5.7 | 13.3 | 13.2 | 13.1 |
| Cameroon | *20.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.4 | 16.4 | 16.0 | 15.6 |
| Canada | *34.1* | 0.0 | 5.7 | 28.4 | 33.4 | 33.6 | 34.0 | 33.9 | 33.9 |
| Cape Verde | *0.5* | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 |
| Central African Republic | *4.4* | 0.0 | 0.2 | 0.9 | 0.8 | 1.1 | 3.5 | 3.5 | 3.5 |
| Chad | *11.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 7.9 | 7.9 | 7.9 |
| Chile | *17.2* | 0.0 | 1.5 | 0.0 | 0.0 | 0.9 | 10.9 | 10.2 | 9.6 |
| China | *1367.4* | 0.0 | 467.9 | 757.6 | 990.9 | 1088.0 | 1361.3 | 1360.4 | 1359.5 |
| Colombia | *46.4* | 0.0 | 0.0 | 3.7 | 8.2 | 10.9 | 37.8 | 37.2 | 36.7 |
| Republic of Congo | *4.1* | 0.7 | 0.6 | 1.3 | 1.3 | 1.5 | 3.1 | 3.1 | 3.1 |
| Costa Rica | *4.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Croatia | *4.3* | 0.0 | 0.0 | 0.0 | 1.6 | 1.6 | 4.3 | 4.3 | 4.3 |
| Cuba | *11.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 7.7 | 7.2 | 6.7 |
| Cyprus | *1.1* | 0.4 | 0.4 | 0.3 | 0.2 | 0.0 | 0.8 | 0.8 | 0.8 |
| Czech Republic | *10.6* | 0.0 | 0.0 | 0.0 | 8.7 | 7.6 | 10.5 | 10.5 | 10.5 |
| Denmark | *5.6* | 0.0 | 0.0 | 0.7 | 4.7 | 4.8 | 5.1 | 5.1 | 5.0 |
| Dominica | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Dominican Republic | *10.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 2.0 | 1.7 | 1.4 |
| Ecuador | *15.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 7.9 | 7.6 | 7.3 |
| Egypt | *78.1* | 0.4 | 2.3 | 9.0 | 15.0 | 21.3 | 65.8 | 62.7 | 59.6 |
| El Salvador | *6.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.5 | 4.5 | 4.4 |
| Estonia | *1.3* | 0.0 | 0.6 | 1.2 | 1.3 | 1.2 | 1.3 | 1.3 | 1.3 |
| Ethiopia | *87.1* | 0.0 | 0.0 | 10.7 | 17.0 | 36.8 | 75.7 | 75.6 | 75.5 |
| Fiji | *0.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Finland | *5.4* | 0.5 | 5.3 | 5.3 | 5.3 | 5.3 | 5.3 | 5.3 | 5.3 |
| France | *63.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 62.2 | 62.0 | 61.8 |
| French Polynesia | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.1 | 0.0 | 0.0 |
| Gabon | *1.6* | 0.3 | 0.3 | 0.5 | 0.5 | 0.5 | 1.1 | 1.1 | 1.0 |
| Gambia | *1.7* | 0.4 | 1.1 | 0.7 | 0.2 | 0.7 | 0.0 | 0.0 | 0.0 |
| Georgia | *4.4* | 2.6 | 3.0 | 3.5 | 3.7 | 3.8 | 4.4 | 4.4 | 4.4 |
| Germany | *83.0* | 0.0 | 0.0 | 0.0 | 57.0 | 60.2 | 82.8 | 82.8 | 82.8 |
| Ghana | *24.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 15.2 | 13.4 | 11.7 |
| Greece | *11.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 10.4 | 10.3 | 10.2 |
| Grenada | *0.1* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Guatemala | *14.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 10.2 | 9.9 | 9.5 |
| Guinea | *10.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 8.5 | 8.2 | 8.0 |
| Guinea-Bissau | *1.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.1 | 0.0 | 0.0 |
| Guyana | *0.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Haiti | *9.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Honduras | *7.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.9 | 4.7 | 4.4 |
| Hungary | *10.0* | 0.0 | 0.0 | 0.0 | 2.7 | 3.7 | 10.0 | 10.0 | 10.0 |
| Iceland | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| India | *1205.6* | 0.0 | 0.0 | 0.0 | 0.0 | 65.7 | 720.5 | 680.5 | 640.4 |
| Indonesia | *240.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 122.7 | 108.6 | 94.6 |
| Iran | *74.5* | 0.0 | 0.3 | 14.2 | 18.4 | 21.2 | 72.9 | 72.7 | 72.5 |
| Iraq | *31.0* | 11.1 | 10.7 | 13.1 | 16.5 | 16.1 | 30.9 | 30.9 | 30.8 |
| Ireland | *4.5* | 0.0 | 0.0 | 0.0 | 0.4 | 1.9 | 3.7 | 3.6 | 3.4 |
| Israel | *7.4* | 3.7 | 4.2 | 4.3 | 4.4 | 4.5 | 6.6 | 6.5 | 6.3 |
| Italy | *60.5* | 0.0 | 0.0 | 8.2 | 23.9 | 22.8 | 58.6 | 58.3 | 57.9 |
| Jamaica | *2.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.7 | 0.6 | 0.4 |
| Japan | *127.4* | 71.5 | 98.2 | 108.5 | 116.5 | 120.0 | 125.2 | 125.0 | 124.8 |
| Jordan | *6.5* | 4.0 | 4.3 | 4.3 | 4.5 | 4.8 | 6.4 | 6.4 | 6.3 |
| Kazakhstan | *15.9* | 0.0 | 0.0 | 1.4 | 7.3 | 12.0 | 15.9 | 15.9 | 15.9 |
| Kenya | *40.9* | 2.9 | 9.0 | 10.7 | 14.6 | 17.9 | 34.4 | 34.2 | 34.1 |
| Kiribati | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Kuwait | *3.0* | 2.6 | 2.7 | 2.7 | 2.7 | 2.7 | 3.0 | 3.0 | 3.0 |
| Kyrgyzstan | *5.3* | 0.0 | 0.4 | 1.9 | 3.1 | 4.2 | 5.3 | 5.3 | 5.3 |
| Laos | *6.4* | 0.0 | 1.4 | 2.0 | 2.3 | 3.2 | 6.4 | 6.3 | 6.3 |
| Latvia | *2.1* | 0.0 | 0.0 | 1.7 | 2.0 | 2.0 | 2.0 | 2.0 | 2.0 |
| Lebanon | *4.3* | 2.0 | 2.3 | 2.3 | 2.0 | 1.8 | 3.7 | 3.7 | 3.6 |
| Lesotho | *2.0* | 1.1 | 1.4 | 1.5 | 1.5 | 1.7 | 1.9 | 1.9 | 1.9 |
| Liberia | *4.0* | 0.9 | 0.6 | 0.6 | 1.0 | 0.7 | 3.3 | 3.3 | 3.3 |
| Lithuania | *3.1* | 0.0 | 0.0 | 0.6 | 3.0 | 3.0 | 3.0 | 3.0 | 3.0 |
| Luxembourg | *0.5* | 0.0 | 0.0 | 0.0 | 0.2 | 0.2 | 0.5 | 0.5 | 0.5 |
| Madagascar | *21.1* | 0.0 | 0.0 | 0.0 | 0.0 | 2.0 | 11.1 | 10.9 | 10.7 |
| Malawi | *15.0* | 0.0 | 0.0 | 0.0 | 0.0 | 1.5 | 8.0 | 7.4 | 6.8 |
| Malaysia | *28.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 10.4 | 7.6 | 4.8 |
| Maldives | *0.3* | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 |
| Mali | *14.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 9.9 | 9.2 | 8.5 |
| Malta | *0.4* | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 |
| Mauritania | *3.6* | 2.5 | 2.7 | 2.3 | 2.2 | 2.3 | 2.9 | 2.8 | 2.6 |
| Mauritius | *1.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Mexico | *117.9* | 0.0 | 9.1 | 26.8 | 36.8 | 54.7 | 107.1 | 105.6 | 104.1 |
| Moldova | *3.6* | 0.0 | 0.0 | 0.0 | 1.8 | 1.9 | 3.6 | 3.6 | 3.6 |
| Mongolia | *2.7* | 1.1 | 1.9 | 2.5 | 2.6 | 2.7 | 2.7 | 2.7 | 2.7 |
| Montenegro | *0.6* | 0.4 | 0.4 | 0.5 | 0.5 | 0.5 | 0.6 | 0.6 | 0.6 |
| Morocco | *31.6* | 2.9 | 0.0 | 0.0 | 0.0 | 0.0 | 26.2 | 25.2 | 24.2 |
| Mozambique | *24.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 9.4 | 8.6 | 7.8 |
| Myanmar | *51.9* | 0.0 | 0.0 | 0.3 | 13.6 | 28.1 | 50.5 | 50.4 | 50.3 |
| Namibia | *2.2* | 0.5 | 1.1 | 0.9 | 1.0 | 0.8 | 1.5 | 1.5 | 1.5 |
| Nepal | *26.8* | 0.3 | 6.6 | 8.5 | 11.6 | 16.0 | 26.2 | 26.1 | 26.0 |
| Netherlands | *16.6* | 0.0 | 3.2 | 4.4 | 9.6 | 11.7 | 16.4 | 16.4 | 16.4 |
| New Caledonia | *0.2* | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.1 | 0.1 |
| New Zealand | *4.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1.1 | 0.7 | 0.4 |
| Nicaragua | *5.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 3.7 | 3.6 | 3.4 |
| Niger | *15.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 12.1 | 11.5 | 11.0 |
| Nigeria | *159.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 97.7 | 87.2 | 76.8 |
| North Korea | *24.5* | 5.7 | 22.1 | 22.5 | 24.3 | 24.4 | 24.5 | 24.5 | 24.5 |
| Norway | *4.9* | 3.1 | 4.5 | 4.7 | 4.7 | 4.7 | 4.8 | 4.7 | 4.7 |
| Oman | *2.8* | 1.9 | 0.7 | 1.5 | 0.2 | 1.2 | 0.0 | 0.0 | 0.0 |
| Pakistan | *173.1* | 0.0 | 0.0 | 0.0 | 0.0 | 4.2 | 140.1 | 137.4 | 134.6 |
| Panama | *3.7* | 0.4 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Paraguay | *6.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Peru | *29.3* | 0.0 | 1.0 | 3.8 | 5.0 | 6.7 | 18.1 | 17.3 | 16.4 |
| Philippines | *93.4* | 0.0 | 0.9 | 0.0 | 0.0 | 0.0 | 37.8 | 30.5 | 23.3 |
| Poland | *38.2* | 0.0 | 0.0 | 0.0 | 32.9 | 31.8 | 38.1 | 38.1 | 38.1 |
| Portugal | *10.6* | 1.7 | 2.8 | 5.1 | 6.1 | 7.2 | 9.8 | 9.6 | 9.5 |
| Romania | *21.9* | 0.0 | 0.0 | 0.0 | 9.5 | 10.4 | 21.8 | 21.7 | 21.7 |
| Russia | *143.6* | 0.0 | 70.8 | 111.4 | 123.7 | 124.9 | 141.9 | 141.7 | 141.5 |
| Rwanda | *10.8* | 0.0 | 0.3 | 1.8 | 3.9 | 4.2 | 8.0 | 7.9 | 7.9 |
| Saint Kitts and Nevis | *0.1* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Saint Lucia | *0.2* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Saint Vincent and the Grenadines | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Samoa | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Sao Tome and Principe | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Saudi Arabia | *27.3* | 18.1 | 16.3 | 17.2 | 18.9 | 15.7 | 22.6 | 21.8 | 21.1 |
| Senegal | *13.0* | 1.8 | 2.7 | 0.0 | 0.0 | 0.0 | 4.2 | 3.5 | 2.8 |
| Serbia | *9.6* | 0.0 | 0.0 | 0.2 | 4.3 | 5.3 | 9.6 | 9.6 | 9.6 |
| Sierra Leone | *5.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.1 | 4.0 | 4.0 |
| Slovakia | *5.4* | 0.0 | 0.0 | 0.1 | 3.4 | 3.5 | 5.4 | 5.4 | 5.4 |
| Slovenia | *2.1* | 0.4 | 1.0 | 1.2 | 1.6 | 1.6 | 2.0 | 2.0 | 2.0 |
| Solomon Islands | *0.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| South Africa | *51.5* | 0.0 | 0.0 | 4.6 | 11.1 | 17.3 | 41.4 | 39.8 | 38.2 |
| South Korea | *48.5* | 24.9 | 36.1 | 38.7 | 45.2 | 47.7 | 48.2 | 48.1 | 48.1 |
| Spain | *46.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 42.2 | 41.7 | 41.2 |
| Sri Lanka | *20.8* | 2.5 | 0.1 | 0.3 | 0.0 | 1.6 | 3.5 | 2.2 | 0.9 |
| Suriname | *0.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Sweden | *9.4* | 0.2 | 6.5 | 9.1 | 9.3 | 9.3 | 9.3 | 9.3 | 9.3 |
| Switzerland | *7.8* | 3.1 | 3.9 | 4.4 | 6.3 | 6.1 | 7.8 | 7.8 | 7.8 |
| Taiwan, province of China | *23.1* | 15.1 | 17.7 | 18.4 | 20.3 | 21.1 | 22.8 | 22.8 | 22.7 |
| Tajikistan | *7.6* | 0.9 | 3.1 | 3.8 | 4.5 | 5.8 | 7.6 | 7.6 | 7.6 |
| Tanzania | *45.0* | 0.0 | 6.2 | 9.2 | 11.7 | 16.1 | 33.4 | 33.3 | 33.2 |
| Thailand | *66.4* | 0.0 | 0.0 | 0.0 | 0.0 | 4.2 | 64.5 | 64.4 | 64.2 |
| Togo | *6.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 3.7 | 3.5 | 3.4 |
| Trinidad and Tobago | *1.3* | 1.1 | 1.1 | 1.1 | 1.1 | 1.1 | 1.1 | 1.1 | 1.1 |
| Tunisia | *10.6* | 2.6 | 1.7 | 0.4 | 0.0 | 0.0 | 7.7 | 7.1 | 6.6 |
| Turkey | *72.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 70.7 | 70.3 | 70.0 |
| Turkmenistan | *5.0* | 0.0 | 0.3 | 0.8 | 1.1 | 1.1 | 5.0 | 5.0 | 5.0 |
| Uganda | *34.0* | 0.0 | 6.1 | 11.3 | 18.9 | 23.9 | 33.0 | 33.0 | 32.9 |
| Ukraine | *46.1* | 0.0 | 0.0 | 0.0 | 7.0 | 6.9 | 46.0 | 46.0 | 46.0 |
| United Arab Emirates | *8.4* | 7.6 | 5.8 | 0.0 | 8.0 | 8.2 | 8.3 | 8.3 | 8.3 |
| United Kingdom | *62.3* | 0.0 | 11.7 | 20.0 | 33.8 | 46.2 | 59.1 | 58.5 | 58.0 |
| United States | *312.2* | 0.0 | 0.0 | 0.0 | 106.7 | 202.7 | 307.4 | 306.4 | 305.4 |
| Uruguay | *3.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Uzbekistan | *27.8* | 0.0 | 0.0 | 1.9 | 2.4 | 4.4 | 27.8 | 27.8 | 27.8 |
| Vanuatu | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Venezuela | *29.0* | 8.6 | 4.9 | 7.4 | 7.2 | 9.1 | 23.1 | 22.4 | 21.7 |
| Vietnam | *89.0* | 0.0 | 12.1 | 29.3 | 35.8 | 49.4 | 86.2 | 85.8 | 85.5 |
| Yemen | *22.8* | 12.9 | 8.8 | 10.2 | 10.2 | 10.8 | 19.4 | 19.3 | 19.1 |
| Zambia | *13.2* | 0.0 | 0.0 | 0.0 | 0.0 | 1.1 | 6.9 | 6.9 | 6.9 |
| Zimbabwe | *13.1* | 0.3 | 2.0 | 2.5 | 3.6 | 5.7 | 9.4 | 9.3 | 9.3 |
| **Total** | ***6703.0*** | **254.8** | **925.6** | **1426.2** | **2081.0** | **2512.2** | **5340.8** | **5205.1** | **5081.2** |

**Table S6.** Number of people who would die from starvation (millions) after the simulated nuclear war in Year 2 for all nations, assuming no trade, under the ***No Livestock*** case (assuming livestock is killed in Year 1 and 50% of livestock grain feed is used for human consumption). The second column is the population in millions in 201042. 150 Tg + hw is half of the household waste added to food consumption, and 150 Tg + tw is total household waste added to food consumption.

| **Nation** | ***Population*** | **5 Tg** | **16 Tg** | **27 Tg** | **37 Tg** | **47 Tg** | **150 Tg** | **150 Tg + hw** | **150 Tg + tw** |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Afghanistan | *28.4* | 5.9 | 7.3 | 8.6 | 9.2 | 10.2 | 28.4 | 28.4 | 28.4 |
| Albania | *3.2* | 1.1 | 0.3 | 0.6 | 1.3 | 1.1 | 3.1 | 3.1 | 3.1 |
| Algeria | *37.1* | 19.1 | 10.3 | 14.8 | 0.0 | 0.0 | 29.7 | 28.5 | 27.3 |
| Angola | *19.5* | 0.0 | 0.0 | 0.1 | 1.1 | 4.5 | 11.9 | 11.3 | 10.7 |
| Antigua and Barbuda | *0.1* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Argentina | *40.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Armenia | *3.0* | 1.0 | 1.1 | 1.2 | 1.3 | 1.8 | 3.0 | 3.0 | 3.0 |
| Australia | *22.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Austria | *8.4* | 0.0 | 3.1 | 4.0 | 7.4 | 7.2 | 8.4 | 8.4 | 8.4 |
| Azerbaijan | *9.1* | 1.3 | 2.5 | 2.6 | 3.0 | 3.8 | 9.1 | 9.1 | 9.1 |
| Bahamas | *0.4* | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 |
| Bangladesh | *151.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 146.3 | 145.8 | 145.4 |
| Barbados | *0.3* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Belarus | *9.5* | 0.0 | 0.0 | 0.0 | 8.5 | 9.4 | 9.5 | 9.5 | 9.5 |
| Belgium | *10.9* | 1.9 | 3.8 | 4.0 | 5.7 | 7.4 | 10.9 | 10.9 | 10.9 |
| Belize | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.1 | 0.1 | 0.1 |
| Benin | *9.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 5.3 | 4.9 | 4.4 |
| Bermuda | *0.1* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Bolivia | *10.2* | 0.0 | 0.0 | 0.0 | 0.2 | 0.8 | 5.8 | 5.8 | 5.8 |
| Bosnia and Herzegovina | *3.8* | 1.6 | 1.3 | 2.6 | 3.2 | 3.2 | 3.8 | 3.8 | 3.8 |
| Botswana | *2.0* | 1.5 | 1.6 | 1.6 | 1.6 | 1.7 | 1.8 | 1.8 | 1.8 |
| Brazil | *195.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 54.0 | 30.2 | 6.5 |
| Brunei | *0.4* | 0.4 | 0.4 | 0.4 | 0.4 | 0.4 | 0.4 | 0.4 | 0.4 |
| Bulgaria | *7.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 7.4 | 7.4 | 7.4 |
| Burkina Faso | *15.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 10.1 | 9.3 | 8.5 |
| Cambodia | *14.4* | 1.0 | 0.9 | 0.0 | 1.9 | 5.9 | 13.4 | 13.3 | 13.2 |
| Cameroon | *20.6* | 0.0 | 0.0 | 0.3 | 0.0 | 0.8 | 16.6 | 16.2 | 15.8 |
| Canada | *34.1* | 0.0 | 7.5 | 29.2 | 33.6 | 33.7 | 34.0 | 34.0 | 33.9 |
| Cape Verde | *0.5* | 0.3 | 0.4 | 0.4 | 0.4 | 0.4 | 0.4 | 0.3 | 0.3 |
| Central African Republic | *4.4* | 0.2 | 0.4 | 1.2 | 1.1 | 1.3 | 3.6 | 3.6 | 3.6 |
| Chad | *11.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 8.0 | 8.0 | 8.0 |
| Chile | *17.2* | 0.0 | 3.7 | 0.0 | 0.0 | 2.9 | 12.0 | 11.5 | 11.0 |
| China | *1367.4* | 25.2 | 558.4 | 821.9 | 1031.9 | 1117.3 | 1362.3 | 1361.6 | 1360.8 |
| Colombia | *46.4* | 1.6 | 2.9 | 7.8 | 12.0 | 14.5 | 40.0 | 39.5 | 39.1 |
| Republic of Congo | *4.1* | 0.8 | 0.7 | 1.4 | 1.3 | 1.6 | 3.1 | 3.1 | 3.1 |
| Costa Rica | *4.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Croatia | *4.3* | 0.0 | 0.0 | 0.0 | 1.9 | 1.9 | 4.3 | 4.3 | 4.3 |
| Cuba | *11.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 8.0 | 7.5 | 7.0 |
| Cyprus | *1.1* | 0.6 | 0.6 | 0.5 | 0.4 | 0.2 | 0.9 | 0.9 | 0.9 |
| Czech Republic | *10.6* | 0.0 | 0.0 | 0.0 | 9.2 | 7.9 | 10.5 | 10.5 | 10.5 |
| Denmark | *5.6* | 0.0 | 0.0 | 1.2 | 4.9 | 4.9 | 5.2 | 5.1 | 5.0 |
| Dominica | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Dominican Republic | *10.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 3.5 | 3.2 | 2.9 |
| Ecuador | *15.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 9.4 | 9.1 | 8.9 |
| Egypt | *78.1* | 8.0 | 10.1 | 10.6 | 16.3 | 22.6 | 66.2 | 63.2 | 60.2 |
| El Salvador | *6.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.8 | 4.7 | 4.6 |
| Estonia | *1.3* | 0.0 | 0.7 | 1.3 | 1.3 | 1.3 | 1.3 | 1.3 | 1.3 |
| Ethiopia | *87.1* | 0.0 | 0.0 | 13.4 | 19.7 | 39.2 | 76.9 | 76.8 | 76.7 |
| Fiji | *0.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Finland | *5.4* | 1.3 | 5.3 | 5.3 | 5.3 | 5.3 | 5.3 | 5.3 | 5.3 |
| France | *63.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 63.0 | 62.9 | 62.9 |
| French Polynesia | *0.3* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.0 | 0.0 |
| Gabon | *1.6* | 0.3 | 0.3 | 0.5 | 0.5 | 0.6 | 1.1 | 1.1 | 1.0 |
| Gambia | *1.7* | 0.4 | 1.1 | 0.7 | 0.2 | 0.7 | 0.0 | 0.0 | 0.0 |
| Georgia | *4.4* | 3.0 | 3.3 | 3.7 | 3.9 | 4.0 | 4.4 | 4.4 | 4.4 |
| Germany | *83.0* | 0.0 | 0.0 | 0.0 | 61.7 | 63.9 | 82.9 | 82.9 | 82.8 |
| Ghana | *24.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 15.3 | 13.5 | 11.8 |
| Greece | *11.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 10.6 | 10.5 | 10.4 |
| Grenada | *0.1* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Guatemala | *14.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 10.5 | 10.2 | 9.9 |
| Guinea | *10.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 8.6 | 8.3 | 8.1 |
| Guinea-Bissau | *1.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.2 | 0.1 | 0.0 |
| Guyana | *0.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Haiti | *9.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Honduras | *7.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 5.2 | 5.1 | 4.9 |
| Hungary | *10.0* | 0.0 | 0.0 | 0.0 | 3.4 | 4.0 | 10.0 | 10.0 | 10.0 |
| Iceland | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| India | *1205.6* | 0.0 | 0.0 | 0.0 | 0.0 | 97.1 | 731.1 | 691.9 | 652.8 |
| Indonesia | *240.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 124.6 | 110.8 | 97.0 |
| Iran | *74.5* | 0.0 | 5.2 | 17.0 | 20.4 | 23.5 | 73.0 | 72.8 | 72.6 |
| Iraq | *31.0* | 11.5 | 11.0 | 13.4 | 16.6 | 16.3 | 30.9 | 30.9 | 30.9 |
| Ireland | *4.5* | 0.0 | 0.6 | 1.0 | 1.7 | 2.9 | 4.4 | 4.4 | 4.4 |
| Israel | *7.4* | 5.0 | 5.1 | 5.2 | 5.3 | 5.6 | 7.1 | 7.1 | 7.0 |
| Italy | *60.5* | 0.2 | 5.3 | 13.3 | 28.4 | 26.9 | 59.4 | 59.2 | 59.0 |
| Jamaica | *2.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1.0 | 0.9 | 0.7 |
| Japan | *127.4* | 79.2 | 102.8 | 112.2 | 119.1 | 121.9 | 125.6 | 125.5 | 125.3 |
| Jordan | *6.5* | 4.5 | 4.5 | 4.6 | 4.7 | 5.1 | 6.4 | 6.4 | 6.4 |
| Kazakhstan | *15.9* | 0.0 | 0.0 | 3.0 | 8.7 | 13.1 | 15.9 | 15.9 | 15.9 |
| Kenya | *40.9* | 5.7 | 11.6 | 13.4 | 16.8 | 19.9 | 35.5 | 35.4 | 35.3 |
| Kiribati | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Kuwait | *3.0* | 2.8 | 2.8 | 2.8 | 2.8 | 2.8 | 3.0 | 3.0 | 3.0 |
| Kyrgyzstan | *5.3* | 0.0 | 1.0 | 2.5 | 3.5 | 4.6 | 5.3 | 5.3 | 5.3 |
| Laos | *6.4* | 0.0 | 1.5 | 2.1 | 2.4 | 3.3 | 6.4 | 6.4 | 6.4 |
| Latvia | *2.1* | 0.0 | 0.0 | 1.8 | 2.0 | 2.0 | 2.0 | 2.0 | 2.0 |
| Lebanon | *4.3* | 2.3 | 2.5 | 2.5 | 2.3 | 2.1 | 3.9 | 3.8 | 3.7 |
| Lesotho | *2.0* | 1.2 | 1.5 | 1.5 | 1.6 | 1.7 | 1.9 | 1.9 | 1.9 |
| Liberia | *4.0* | 1.0 | 0.6 | 0.6 | 1.0 | 0.7 | 3.3 | 3.3 | 3.3 |
| Lithuania | *3.1* | 0.0 | 0.0 | 0.8 | 3.0 | 3.0 | 3.0 | 3.0 | 3.0 |
| Luxembourg | *0.5* | 0.1 | 0.1 | 0.1 | 0.2 | 0.3 | 0.5 | 0.5 | 0.5 |
| Madagascar | *21.1* | 0.0 | 0.0 | 0.0 | 0.0 | 2.7 | 11.6 | 11.4 | 11.2 |
| Malawi | *15.0* | 0.0 | 0.0 | 0.0 | 0.0 | 1.7 | 8.1 | 7.5 | 6.9 |
| Malaysia | *28.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 11.0 | 8.3 | 5.6 |
| Maldives | *0.3* | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 |
| Mali | *14.0* | 0.0 | 0.4 | 0.0 | 0.0 | 0.2 | 10.5 | 9.9 | 9.3 |
| Malta | *0.4* | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 | 0.3 |
| Mauritania | *3.6* | 2.7 | 2.8 | 2.5 | 2.4 | 2.5 | 3.1 | 3.0 | 2.9 |
| Mauritius | *1.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Mexico | *117.9* | 0.0 | 18.3 | 34.9 | 44.2 | 61.0 | 109.9 | 108.8 | 107.7 |
| Moldova | *3.6* | 0.0 | 0.0 | 0.2 | 1.9 | 2.0 | 3.6 | 3.6 | 3.6 |
| Mongolia | *2.7* | 1.5 | 2.2 | 2.7 | 2.7 | 2.7 | 2.7 | 2.7 | 2.7 |
| Montenegro | *0.6* | 0.4 | 0.4 | 0.5 | 0.6 | 0.6 | 0.6 | 0.6 | 0.6 |
| Morocco | *31.6* | 4.3 | 0.0 | 0.0 | 0.0 | 0.0 | 26.7 | 25.8 | 24.8 |
| Mozambique | *24.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 9.6 | 8.8 | 8.0 |
| Myanmar | *51.9* | 0.0 | 0.0 | 2.6 | 15.4 | 29.4 | 50.8 | 50.7 | 50.6 |
| Namibia | *2.2* | 0.6 | 1.1 | 1.0 | 1.1 | 0.9 | 1.5 | 1.5 | 1.5 |
| Nepal | *26.8* | 1.4 | 7.4 | 9.3 | 12.2 | 16.5 | 26.2 | 26.1 | 26.0 |
| Netherlands | *16.6* | 1.7 | 7.5 | 7.5 | 10.8 | 13.7 | 16.5 | 16.5 | 16.5 |
| New Caledonia | *0.2* | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.2 | 0.1 |
| New Zealand | *4.4* | 1.0 | 0.9 | 1.2 | 1.6 | 1.6 | 3.0 | 2.9 | 2.7 |
| Nicaragua | *5.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.0 | 3.9 | 3.8 |
| Niger | *15.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 12.3 | 11.8 | 11.3 |
| Nigeria | *159.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 98.4 | 88.1 | 77.7 |
| North Korea | *24.5* | 6.3 | 22.2 | 22.7 | 24.4 | 24.4 | 24.5 | 24.5 | 24.5 |
| Norway | *4.9* | 3.6 | 4.7 | 4.7 | 4.7 | 4.7 | 4.8 | 4.8 | 4.8 |
| Oman | *2.8* | 2.1 | 1.0 | 1.7 | 0.6 | 1.5 | 0.0 | 0.0 | 0.0 |
| Pakistan | *173.1* | 0.0 | 0.0 | 0.0 | 11.1 | 14.7 | 140.4 | 137.7 | 134.9 |
| Panama | *3.7* | 0.8 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Paraguay | *6.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Peru | *29.3* | 0.0 | 2.4 | 5.2 | 6.2 | 7.9 | 19.0 | 18.2 | 17.4 |
| Philippines | *93.4* | 0.0 | 4.7 | 0.0 | 0.0 | 0.0 | 40.1 | 33.1 | 26.2 |
| Poland | *38.2* | 0.0 | 0.0 | 0.0 | 33.9 | 32.5 | 38.1 | 38.1 | 38.1 |
| Portugal | *10.6* | 3.4 | 4.4 | 6.2 | 7.2 | 8.1 | 10.4 | 10.4 | 10.4 |
| Romania | *21.9* | 0.0 | 0.0 | 0.0 | 10.4 | 11.0 | 21.8 | 21.7 | 21.7 |
| Russia | *143.6* | 0.0 | 78.4 | 114.7 | 125.4 | 125.8 | 142.0 | 141.8 | 141.6 |
| Rwanda | *10.8* | 0.0 | 0.5 | 1.9 | 4.1 | 4.3 | 8.1 | 8.0 | 7.9 |
| Saint Kitts and Nevis | *0.1* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Saint Lucia | *0.2* | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Saint Vincent and the Grenadines | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Samoa | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Sao Tome and Principe | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Saudi Arabia | *27.3* | 20.0 | 18.2 | 19.0 | 20.5 | 17.6 | 23.5 | 22.9 | 22.3 |
| Senegal | *13.0* | 2.0 | 2.8 | 0.0 | 0.0 | 0.0 | 4.3 | 3.7 | 3.1 |
| Serbia | *9.6* | 0.0 | 0.0 | 0.9 | 4.9 | 5.7 | 9.6 | 9.6 | 9.6 |
| Sierra Leone | *5.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.2 | 4.1 | 4.0 |
| Slovakia | *5.4* | 0.0 | 0.3 | 0.6 | 3.6 | 3.6 | 5.4 | 5.4 | 5.4 |
| Slovenia | *2.1* | 0.7 | 1.2 | 1.4 | 1.8 | 1.7 | 2.1 | 2.1 | 2.1 |
| Solomon Islands | *0.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| South Africa | *51.5* | 0.0 | 2.1 | 8.0 | 14.1 | 20.0 | 42.8 | 41.4 | 40.1 |
| South Korea | *48.5* | 27.6 | 37.7 | 40.0 | 45.9 | 47.8 | 48.2 | 48.1 | 48.1 |
| Spain | *46.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 43.5 | 43.2 | 42.8 |
| Sri Lanka | *20.8* | 2.7 | 0.3 | 0.5 | 0.0 | 1.8 | 3.6 | 2.3 | 1.1 |
| Suriname | *0.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Sweden | *9.4* | 1.2 | 6.7 | 9.2 | 9.3 | 9.3 | 9.3 | 9.3 | 9.3 |
| Switzerland | *7.8* | 4.5 | 5.2 | 5.4 | 7.0 | 6.8 | 7.8 | 7.8 | 7.8 |
| Taiwan, province of China | *23.1* | 16.9 | 18.9 | 19.5 | 21.0 | 21.6 | 23.0 | 23.0 | 22.9 |
| Tajikistan | *7.6* | 1.3 | 3.5 | 4.1 | 4.8 | 5.9 | 7.6 | 7.6 | 7.6 |
| Tanzania | *45.0* | 0.0 | 7.4 | 10.4 | 12.9 | 17.1 | 34.3 | 34.2 | 34.1 |
| Thailand | *66.4* | 0.0 | 0.0 | 0.0 | 0.0 | 6.1 | 64.8 | 64.6 | 64.4 |
| Togo | *6.3* | 0.0 | 0.1 | 0.0 | 0.1 | 0.0 | 3.7 | 3.6 | 3.4 |
| Trinidad and Tobago | *1.3* | 1.2 | 1.2 | 1.2 | 1.2 | 1.2 | 1.2 | 1.2 | 1.1 |
| Tunisia | *10.6* | 3.3 | 2.4 | 0.8 | 0.0 | 0.0 | 8.1 | 7.6 | 7.1 |
| Turkey | *72.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 71.2 | 71.0 | 70.8 |
| Turkmenistan | *5.0* | 0.0 | 0.5 | 0.9 | 1.1 | 1.2 | 5.0 | 5.0 | 5.0 |
| Uganda | *34.0* | 0.3 | 7.2 | 12.2 | 19.7 | 24.3 | 33.2 | 33.2 | 33.1 |
| Ukraine | *46.1* | 0.0 | 0.0 | 0.0 | 8.5 | 8.0 | 46.0 | 46.0 | 46.0 |
| United Arab Emirates | *8.4* | 7.8 | 6.1 | 0.3 | 8.1 | 8.3 | 8.4 | 8.4 | 8.4 |
| United Kingdom | *62.3* | 0.0 | 18.4 | 26.0 | 39.0 | 50.5 | 62.2 | 62.2 | 62.2 |
| United States | *312.2* | 0.0 | 0.0 | 0.0 | 131.1 | 217.8 | 309.6 | 309.1 | 308.6 |
| Uruguay | *3.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Uzbekistan | *27.8* | 0.0 | 0.5 | 3.5 | 3.9 | 5.7 | 27.8 | 27.8 | 27.8 |
| Vanuatu | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Venezuela | *29.0* | 10.9 | 7.3 | 9.6 | 9.4 | 11.0 | 23.9 | 23.3 | 22.7 |
| Vietnam | *89.0* | 0.0 | 17.0 | 33.2 | 39.3 | 52.1 | 86.6 | 86.3 | 86.0 |
| Yemen | *22.8* | 13.5 | 9.5 | 10.9 | 10.9 | 11.4 | 19.6 | 19.5 | 19.4 |
| Zambia | *13.2* | 0.0 | 0.0 | 0.0 | 0.0 | 1.4 | 7.1 | 7.1 | 7.1 |
| Zimbabwe | *13.1* | 0.9 | 2.5 | 3.0 | 4.1 | 6.1 | 9.7 | 9.7 | 9.6 |
| **Total** | ***6703.0*** | **335.5** | **1122.4** | **1579.3** | **2238.8** | **2675.3** | **5413.0** | **5286.2** | **5159.4** |

**Table S7:** Number of people who would die from starvation (millions) after the simulated nuclear war in Year 2 for all nations assuming that trade would continue under the *Livestock* case (livestock production is continued). The second column is the population in millions in 201045. 150 Tg + hw is half of the household waste added to food consumption, and 150 Tg + tw is total household waste added to food consumption.

| **Nation** | ***Population*** | **5 Tg** | **16 Tg** | **27 Tg** | **37 Tg** | **47 Tg** | **150 Tg** | **150 Tg +hw** | **150 Tg + tw** |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Afghanistan | *28.4* | 0.5 | 2.5 | 4.7 | 5.8 | 7.3 | 28.4 | 28.4 | 28.4 |
| Albania | *3.2* | 0.0 | 0.0 | 0.0 | 0.1 | 0.0 | 2.7 | 2.7 | 2.7 |
| Algeria | *37.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 19.8 | 17.0 | 14.3 |
| Angola | *19.5* | 0.0 | 0.0 | 1.5 | 2.5 | 5.5 | 12.3 | 11.7 | 11.1 |
| Antigua and Barbuda | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Argentina | *40.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 20.9 | 18.5 | 16.0 |
| Armenia | *3.0* | 0.0 | 0.0 | 0.0 | 0.0 | 1.0 | 3.0 | 3.0 | 3.0 |
| Australia | *22.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Austria | *8.4* | 0.0 | 3.1 | 4.1 | 6.7 | 6.7 | 8.4 | 8.4 | 8.4 |
| Azerbaijan | *9.1* | 0.0 | 0.0 | 0.0 | 0.6 | 1.7 | 9.1 | 9.1 | 9.1 |
| Bahamas | *0.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Bangladesh | *151.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 145.2 | 144.6 | 144.1 |
| Barbados | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Belarus | *9.5* | 0.0 | 0.0 | 3.1 | 8.7 | 9.4 | 9.5 | 9.5 | 9.5 |
| Belgium | *10.9* | 0.0 | 0.1 | 0.8 | 4.4 | 4.9 | 10.9 | 10.9 | 10.9 |
| Belize | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.2 | 0.2 | 0.2 |
| Benin | *9.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 5.1 | 4.6 | 4.1 |
| Bermuda | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Bolivia | *10.2* | 0.0 | 0.0 | 1.2 | 2.4 | 2.8 | 6.5 | 6.5 | 6.5 |
| Bosnia and Herzegovina | *3.8* | 0.5 | 0.1 | 1.9 | 2.7 | 2.8 | 3.7 | 3.7 | 3.7 |
| Botswana | *2.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.3 | 1.3 | 1.3 | 1.3 |
| Brazil | *195.2* | 0.0 | 0.0 | 0.0 | 2.1 | 21.7 | 106.1 | 91.4 | 76.7 |
| Brunei | *0.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Bulgaria | *7.4* | 0.0 | 0.0 | 0.0 | 0.5 | 0.0 | 7.4 | 7.4 | 7.4 |
| Burkina Faso | *15.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 10.2 | 9.4 | 8.6 |
| Cambodia | *14.4* | 1.5 | 1.4 | 0.0 | 2.4 | 6.2 | 13.3 | 13.2 | 13.1 |
| Cameroon | *20.6* | 0.0 | 0.0 | 0.3 | 0.0 | 0.8 | 16.4 | 16.0 | 15.6 |
| Canada | *34.1* | 2.5 | 24.0 | 31.1 | 33.3 | 33.5 | 33.9 | 33.9 | 33.9 |
| Cape Verde | *0.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Central African Republic | *4.4* | 0.0 | 0.0 | 0.5 | 0.4 | 0.7 | 3.3 | 3.3 | 3.3 |
| Chad | *11.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 7.9 | 7.9 | 7.9 |
| Chile | *17.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 9.8 | 9.1 | 8.3 |
| China | *1367.4* | 0.0 | 516.1 | 785.6 | 1005.8 | 1100.2 | 1360.0 | 1358.9 | 1357.8 |
| Colombia | *46.4* | 0.0 | 0.0 | 0.4 | 5.1 | 7.9 | 35.8 | 35.0 | 34.3 |
| Republic of Congo | *4.1* | 0.0 | 0.0 | 0.2 | 0.2 | 0.5 | 2.7 | 2.7 | 2.7 |
| Costa Rica | *4.7* | 0.5 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Croatia | *4.3* | 0.0 | 0.0 | 1.2 | 2.5 | 2.6 | 4.2 | 4.2 | 4.2 |
| Cuba | *11.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 6.8 | 6.2 | 5.5 |
| Cyprus | *1.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.5 | 0.5 | 0.5 |
| Czech Republic | *10.6* | 0.0 | 0.0 | 1.4 | 9.0 | 8.7 | 10.5 | 10.5 | 10.5 |
| Denmark | *5.6* | 0.0 | 0.0 | 3.8 | 5.2 | 5.2 | 5.4 | 5.4 | 5.4 |
| Dominica | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Dominican Republic | *10.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Ecuador | *15.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.7 | 8.4 | 8.1 | 7.8 |
| Egypt | *78.1* | 0.0 | 0.0 | 0.0 | 0.0 | 3.7 | 61.8 | 57.7 | 53.6 |
| El Salvador | *6.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.1 | 4.0 | 3.9 |
| Estonia | *1.3* | 0.0 | 0.8 | 1.2 | 1.3 | 1.3 | 1.3 | 1.3 | 1.3 |
| Ethiopia | *87.1* | 0.0 | 3.9 | 17.7 | 23.2 | 40.7 | 75.8 | 75.7 | 75.7 |
| Fiji | *0.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Finland | *5.4* | 1.5 | 5.2 | 5.3 | 5.3 | 5.3 | 5.3 | 5.3 | 5.3 |
| France | *63.2* | 0.0 | 0.0 | 0.0 | 2.2 | 5.1 | 61.6 | 61.3 | 61.0 |
| French Polynesia | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Gabon | *1.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.1 | 0.9 | 0.8 | 0.8 |
| Gambia | *1.7* | 0.0 | 0.8 | 0.2 | 0.0 | 0.3 | 0.0 | 0.0 | 0.0 |
| Georgia | *4.4* | 0.0 | 0.1 | 1.6 | 2.4 | 2.7 | 4.4 | 4.4 | 4.4 |
| Germany | *83.0* | 0.0 | 0.1 | 6.6 | 60.8 | 64.0 | 82.5 | 82.4 | 82.3 |
| Ghana | *24.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 15.1 | 13.3 | 11.5 |
| Greece | *11.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 10.2 | 10.1 | 10.0 |
| Grenada | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Guatemala | *14.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 10.7 | 10.5 | 10.2 |
| Guinea | *10.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 8.5 | 8.2 | 7.9 |
| Guinea-Bissau | *1.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Guyana | *0.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Haiti | *9.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Honduras | *7.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.9 | 4.6 | 4.4 |
| Hungary | *10.0* | 0.0 | 3.2 | 4.5 | 6.9 | 7.7 | 10.0 | 10.0 | 10.0 |
| Iceland | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| India | *1205.6* | 0.0 | 0.0 | 0.0 | 0.0 | 142.1 | 756.2 | 719.1 | 682.0 |
| Indonesia | *240.7* | 0.0 | 0.0 | 0.0 | 7.8 | 35.5 | 141.6 | 129.9 | 118.1 |
| Iran | *74.5* | 0.0 | 0.0 | 10.9 | 16.1 | 18.5 | 72.8 | 72.6 | 72.3 |
| Iraq | *31.0* | 0.0 | 0.0 | 0.0 | 3.9 | 2.7 | 30.7 | 30.7 | 30.7 |
| Ireland | *4.5* | 0.0 | 0.0 | 0.3 | 0.9 | 2.3 | 3.9 | 3.8 | 3.7 |
| Israel | *7.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 5.4 | 5.0 | 4.6 |
| Italy | *60.5* | 0.0 | 0.0 | 3.2 | 18.5 | 18.3 | 57.0 | 56.3 | 55.6 |
| Jamaica | *2.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Japan | *127.4* | 0.0 | 55.6 | 81.2 | 101.1 | 109.8 | 122.6 | 122.2 | 121.7 |
| Jordan | *6.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.4 | 6.1 | 6.1 | 6.0 |
| Kazakhstan | *15.9* | 0.0 | 1.5 | 5.3 | 9.0 | 12.0 | 15.9 | 15.9 | 15.9 |
| Kenya | *40.9* | 0.0 | 2.4 | 4.3 | 9.1 | 13.1 | 32.5 | 32.4 | 32.2 |
| Kiribati | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Kuwait | *3.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 2.9 | 2.8 | 2.8 |
| Kyrgyzstan | *5.3* | 0.0 | 0.5 | 1.8 | 2.9 | 4.0 | 5.3 | 5.3 | 5.3 |
| Laos | *6.4* | 0.4 | 2.3 | 2.8 | 3.1 | 3.9 | 6.3 | 6.3 | 6.3 |
| Latvia | *2.1* | 0.0 | 0.0 | 1.9 | 2.1 | 2.0 | 2.1 | 2.1 | 2.1 |
| Lebanon | *4.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 2.8 | 2.5 | 2.3 |
| Lesotho | *2.0* | 0.0 | 0.4 | 0.6 | 0.7 | 1.1 | 1.7 | 1.7 | 1.7 |
| Liberia | *4.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 3.0 | 2.9 | 2.9 |
| Lithuania | *3.1* | 0.0 | 0.0 | 1.8 | 3.0 | 2.9 | 3.0 | 3.0 | 3.0 |
| Luxembourg | *0.5* | 0.0 | 0.0 | 0.0 | 0.2 | 0.2 | 0.5 | 0.5 | 0.5 |
| Madagascar | *21.1* | 0.0 | 0.0 | 0.4 | 0.0 | 3.4 | 11.7 | 11.5 | 11.3 |
| Malawi | *15.0* | 0.0 | 0.0 | 0.0 | 1.6 | 4.8 | 9.6 | 9.1 | 8.7 |
| Malaysia | *28.3* | 0.0 | 0.0 | 0.3 | 0.0 | 0.0 | 16.8 | 15.1 | 13.3 |
| Maldives | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Mali | *14.0* | 0.0 | 0.4 | 0.4 | 0.0 | 0.5 | 9.8 | 9.0 | 8.2 |
| Malta | *0.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Mauritania | *3.6* | 0.5 | 1.0 | 0.0 | 0.0 | 0.0 | 1.7 | 1.3 | 1.0 |
| Mauritius | *1.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Mexico | *117.9* | 0.0 | 6.1 | 23.6 | 33.6 | 51.5 | 103.8 | 101.8 | 99.8 |
| Moldova | *3.6* | 0.0 | 0.9 | 1.7 | 2.7 | 2.8 | 3.6 | 3.6 | 3.6 |
| Mongolia | *2.7* | 0.2 | 1.3 | 2.2 | 2.4 | 2.6 | 2.7 | 2.7 | 2.7 |
| Montenegro | *0.6* | 0.0 | 0.0 | 0.2 | 0.3 | 0.3 | 0.6 | 0.6 | 0.6 |
| Morocco | *31.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 24.9 | 23.6 | 22.3 |
| Mozambique | *24.0* | 0.0 | 0.0 | 0.0 | 0.0 | 1.1 | 10.4 | 9.7 | 9.0 |
| Myanmar | *51.9* | 0.0 | 7.3 | 18.9 | 27.3 | 36.2 | 50.4 | 50.2 | 50.1 |
| Namibia | *2.2* | 0.0 | 0.6 | 0.3 | 0.5 | 0.1 | 1.3 | 1.3 | 1.3 |
| Nepal | *26.8* | 0.0 | 6.2 | 8.0 | 11.3 | 15.6 | 26.2 | 26.1 | 26.0 |
| Netherlands | *16.6* | 0.0 | 1.0 | 2.4 | 8.4 | 10.8 | 16.4 | 16.3 | 16.3 |
| New Caledonia | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| New Zealand | *4.4* | 0.0 | 0.0 | 0.0 | 0.1 | 0.2 | 2.0 | 1.8 | 1.5 |
| Nicaragua | *5.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 3.8 | 3.6 | 3.5 |
| Niger | *15.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 12.4 | 11.9 | 11.4 |
| Nigeria | *159.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 98.6 | 88.2 | 77.9 |
| North Korea | *24.5* | 3.1 | 21.6 | 22.1 | 24.1 | 24.3 | 24.5 | 24.5 | 24.5 |
| Norway | *4.9* | 2.2 | 4.4 | 4.6 | 4.7 | 4.8 | 4.7 | 4.7 | 4.7 |
| Oman | *2.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Pakistan | *173.1* | 0.0 | 0.0 | 0.0 | 0.9 | 13.2 | 143.9 | 141.5 | 139.0 |
| Panama | *3.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Paraguay | *6.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.9 | 4.4 | 4.2 | 4.1 |
| Peru | *29.3* | 0.0 | 0.0 | 2.8 | 4.1 | 5.9 | 18.3 | 17.4 | 16.6 |
| Philippines | *93.4* | 0.0 | 7.1 | 0.0 | 0.0 | 0.0 | 41.2 | 34.4 | 27.6 |
| Poland | *38.2* | 0.0 | 0.0 | 0.0 | 34.2 | 33.8 | 38.0 | 38.0 | 38.0 |
| Portugal | *10.6* | 0.0 | 0.0 | 0.6 | 2.3 | 4.2 | 8.8 | 8.4 | 8.0 |
| Romania | *21.9* | 0.0 | 4.0 | 7.5 | 14.7 | 15.5 | 21.8 | 21.8 | 21.8 |
| Russia | *143.6* | 0.0 | 76.1 | 113.7 | 125.6 | 127.8 | 142.2 | 142.0 | 141.9 |
| Rwanda | *10.8* | 0.0 | 1.8 | 3.0 | 4.9 | 5.1 | 8.4 | 8.3 | 8.3 |
| Saint Kitts and Nevis | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Saint Lucia | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Saint Vincent and the Grenadines | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Samoa | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Sao Tome and Principe | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Saudi Arabia | *27.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 8.7 | 5.7 | 2.7 |
| Senegal | *13.0* | 0.0 | 0.2 | 0.0 | 0.0 | 0.0 | 2.0 | 1.1 | 0.3 |
| Serbia | *9.6* | 0.0 | 3.9 | 5.5 | 7.1 | 7.5 | 9.5 | 9.5 | 9.5 |
| Sierra Leone | *5.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.3 | 4.2 | 4.1 |
| Slovakia | *5.4* | 0.0 | 0.7 | 1.1 | 3.7 | 3.9 | 5.4 | 5.4 | 5.4 |
| Slovenia | *2.1* | 0.0 | 0.6 | 0.9 | 1.4 | 1.4 | 2.0 | 2.0 | 2.0 |
| Solomon Islands | *0.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| South Africa | *51.5* | 0.0 | 1.8 | 7.4 | 13.4 | 19.0 | 41.2 | 39.6 | 37.9 |
| South Korea | *48.5* | 0.0 | 19.2 | 25.4 | 40.8 | 47.1 | 48.0 | 47.9 | 47.9 |
| Spain | *46.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 40.7 | 40.0 | 39.3 |
| Sri Lanka | *20.8* | 0.5 | 0.0 | 0.0 | 0.0 | 0.0 | 1.8 | 0.4 | 0.0 |
| Suriname | *0.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Sweden | *9.4* | 1.3 | 6.9 | 9.1 | 9.2 | 9.2 | 9.3 | 9.3 | 9.3 |
| Switzerland | *7.8* | 0.0 | 0.9 | 1.8 | 5.0 | 4.8 | 7.7 | 7.7 | 7.7 |
| Taiwan, province of China | *23.1* | 0.0 | 7.4 | 9.3 | 14.8 | 17.0 | 21.9 | 21.7 | 21.6 |
| Tajikistan | *7.6* | 0.1 | 2.5 | 3.3 | 4.1 | 5.6 | 7.6 | 7.6 | 7.6 |
| Tanzania | *45.0* | 0.0 | 11.6 | 14.0 | 16.2 | 19.9 | 34.4 | 34.3 | 34.2 |
| Thailand | *66.4* | 1.7 | 7.6 | 9.6 | 16.8 | 29.9 | 64.8 | 64.6 | 64.4 |
| Togo | *6.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 3.5 | 3.3 | 3.2 |
| Trinidad and Tobago | *1.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Tunisia | *10.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 5.5 | 4.6 | 3.7 |
| Turkey | *72.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 70.3 | 69.8 | 69.4 |
| Turkmenistan | *5.0* | 0.3 | 1.5 | 2.0 | 2.1 | 2.2 | 5.0 | 5.0 | 5.0 |
| Uganda | *34.0* | 0.0 | 6.1 | 11.3 | 18.6 | 23.8 | 32.9 | 32.8 | 32.7 |
| Ukraine | *46.1* | 0.0 | 1.0 | 4.1 | 28.6 | 29.0 | 45.9 | 45.9 | 45.9 |
| United Arab Emirates | *8.4* | 0.0 | 0.0 | 0.0 | 2.7 | 5.5 | 7.2 | 7.1 | 7.0 |
| United Kingdom | *62.3* | 0.0 | 6.9 | 15.4 | 28.7 | 40.9 | 54.3 | 53.0 | 51.6 |
| United States | *312.2* | 0.0 | 86.4 | 152.3 | 207.1 | 251.6 | 305.6 | 304.3 | 303.0 |
| Uruguay | *3.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.6 | 1.6 | 1.5 | 1.3 |
| Uzbekistan | *27.8* | 0.0 | 1.6 | 4.6 | 5.2 | 7.1 | 27.8 | 27.8 | 27.8 |
| Vanuatu | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Venezuela | *29.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 18.4 | 17.2 | 16.0 |
| Vietnam | *89.0* | 0.0 | 23.2 | 37.4 | 42.8 | 54.5 | 85.3 | 84.9 | 84.4 |
| Yemen | *22.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 11.6 | 11.2 | 10.8 |
| Zambia | *13.2* | 0.0 | 0.0 | 1.2 | 2.7 | 4.7 | 8.7 | 8.7 | 8.7 |
| Zimbabwe | *13.1* | 0.0 | 0.0 | 0.0 | 0.5 | 3.2 | 8.0 | 8.0 | 8.0 |
| **Total** | ***6703.0*** | **17.1** | **953.6** | **1521.6** | **2155.8** | **2684.4** | **5422.7** | **5292.6** | **5163.5** |

**Table S8.** Number of people who would die from starvation (millions) after the simulated nuclear war in Year 2 for all nations, assuming that trade would continue, under the *Partial Livestock* case (assuming 50% of livestock grain feed is used for human consumption, and 50% of livestock grain feed is used to raise livestock). The second column is the population in millions in 201045. 150 Tg + hw is half of the household waste added to food consumption, and 150 Tg + tw is total household waste added to food consumption.

| **Nation** | ***Population*** | **5 Tg** | **16 Tg** | **27 Tg** | **37 Tg** | **47 Tg** | **150 Tg** | **150 Tg + hw** | **150 Tg + tw** |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Afghanistan | *28.4* | 0.0 | 1.9 | 3.9 | 4.8 | 6.2 | 28.4 | 28.4 | 28.4 |
| Albania | *3.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 2.9 | 2.9 | 2.9 |
| Algeria | *37.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 16.2 | 12.9 | 9.5 |
| Angola | *19.5* | 0.0 | 0.0 | 0.0 | 0.0 | 2.7 | 11.0 | 10.3 | 9.6 |
| Antigua and Barbuda | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Argentina | *40.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 18.1 | 15.2 | 12.2 |
| Armenia | *3.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.6 | 3.0 | 3.0 | 3.0 |
| Australia | *22.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Austria | *8.4* | 0.0 | 1.3 | 2.6 | 6.7 | 6.6 | 8.4 | 8.4 | 8.4 |
| Azerbaijan | *9.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 9.1 | 9.1 | 9.1 |
| Bahamas | *0.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Bangladesh | *151.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 145.5 | 145.0 | 144.5 |
| Barbados | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Belarus | *9.5* | 0.0 | 0.0 | 0.0 | 8.2 | 9.4 | 9.5 | 9.5 | 9.5 |
| Belgium | *10.9* | 0.0 | 0.0 | 0.0 | 0.0 | 1.7 | 10.9 | 10.9 | 10.9 |
| Belize | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.2 | 0.2 | 0.1 |
| Benin | *9.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.4 | 3.9 | 3.3 |
| Bermuda | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Bolivia | *10.2* | 0.0 | 0.0 | 0.1 | 1.5 | 1.9 | 6.2 | 6.2 | 6.2 |
| Bosnia and Herzegovina | *3.8* | 0.0 | 0.0 | 1.5 | 2.5 | 2.6 | 3.8 | 3.8 | 3.8 |
| Botswana | *2.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.2 | 1.3 | 1.3 | 1.3 |
| Brazil | *195.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 83.1 | 64.4 | 45.7 |
| Brunei | *0.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Bulgaria | *7.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 7.4 | 7.4 | 7.4 |
| Burkina Faso | *15.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 10.0 | 9.2 | 8.4 |
| Cambodia | *14.4* | 0.1 | 0.0 | 0.0 | 1.1 | 5.3 | 13.3 | 13.2 | 13.1 |
| Cameroon | *20.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 16.1 | 15.6 | 15.2 |
| Canada | *34.1* | 0.0 | 17.6 | 30.5 | 33.5 | 33.6 | 33.9 | 33.9 | 33.9 |
| Cape Verde | *0.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Central African Republic | *4.4* | 0.0 | 0.0 | 0.6 | 0.5 | 0.8 | 3.4 | 3.4 | 3.4 |
| Chad | *11.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 7.7 | 7.7 | 7.7 |
| Chile | *17.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 8.5 | 7.6 | 6.8 |
| China | *1367.4* | 0.0 | 400.6 | 712.0 | 962.7 | 1067.1 | 1360.8 | 1359.9 | 1358.9 |
| Colombia | *46.4* | 0.0 | 0.0 | 0.0 | 0.0 | 2.6 | 36.1 | 35.4 | 34.7 |
| Republic of Congo | *4.1* | 0.0 | 0.0 | 0.2 | 0.2 | 0.5 | 2.7 | 2.7 | 2.7 |
| Costa Rica | *4.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Croatia | *4.3* | 0.0 | 0.0 | 0.0 | 1.4 | 1.4 | 4.3 | 4.3 | 4.3 |
| Cuba | *11.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 6.2 | 5.5 | 4.7 |
| Cyprus | *1.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.2 | 0.2 | 0.1 |
| Czech Republic | *10.6* | 0.0 | 0.0 | 0.0 | 8.9 | 7.9 | 10.5 | 10.5 | 10.5 |
| Denmark | *5.6* | 0.0 | 0.0 | 0.6 | 5.2 | 5.3 | 5.4 | 5.4 | 5.4 |
| Dominica | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Dominican Republic | *10.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Ecuador | *15.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 8.7 | 8.5 | 8.2 |
| Egypt | *78.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 57.9 | 52.8 | 47.6 |
| El Salvador | *6.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.1 | 4.0 | 3.8 |
| Estonia | *1.3* | 0.0 | 0.7 | 1.3 | 1.3 | 1.3 | 1.3 | 1.3 | 1.3 |
| Ethiopia | *87.1* | 0.0 | 1.4 | 15.9 | 21.8 | 40.2 | 76.4 | 76.3 | 76.2 |
| Fiji | *0.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Finland | *5.4* | 0.0 | 5.2 | 5.3 | 5.3 | 5.3 | 5.3 | 5.3 | 5.3 |
| France | *63.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 62.2 | 62.0 | 61.8 |
| French Polynesia | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Gabon | *1.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.9 | 0.8 | 0.7 |
| Gambia | *1.7* | 0.0 | 0.8 | 0.2 | 0.0 | 0.2 | 0.0 | 0.0 | 0.0 |
| Georgia | *4.4* | 0.0 | 0.0 | 1.5 | 2.3 | 2.6 | 4.4 | 4.4 | 4.4 |
| Germany | *83.0* | 0.0 | 0.0 | 0.0 | 54.4 | 57.8 | 82.5 | 82.4 | 82.3 |
| Ghana | *24.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 14.0 | 12.0 | 10.0 |
| Greece | *11.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 10.2 | 10.1 | 9.9 |
| Grenada | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Guatemala | *14.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 10.6 | 10.3 | 10.0 |
| Guinea | *10.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 8.3 | 8.0 | 7.7 |
| Guinea-Bissau | *1.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Guyana | *0.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Haiti | *9.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Honduras | *7.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.7 | 4.5 | 4.2 |
| Hungary | *10.0* | 0.0 | 0.0 | 0.4 | 4.9 | 5.7 | 10.0 | 10.0 | 10.0 |
| Iceland | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| India | *1205.6* | 0.0 | 0.0 | 0.0 | 0.0 | 90.5 | 731.4 | 692.3 | 653.2 |
| Indonesia | *240.7* | 0.0 | 0.0 | 0.0 | 0.0 | 15.0 | 132.5 | 119.7 | 106.8 |
| Iran | *74.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.8 | 72.4 | 72.1 | 71.8 |
| Iraq | *31.0* | 0.0 | 0.0 | 0.0 | 0.3 | 0.0 | 30.7 | 30.7 | 30.7 |
| Ireland | *4.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.7 | 4.2 | 4.1 | 4.1 |
| Israel | *7.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 5.3 | 4.9 | 4.4 |
| Italy | *60.5* | 0.0 | 0.0 | 0.0 | 7.2 | 5.6 | 57.7 | 57.1 | 56.5 |
| Jamaica | *2.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Japan | *127.4* | 0.0 | 39.3 | 73.6 | 99.1 | 109.8 | 123.6 | 123.2 | 122.9 |
| Jordan | *6.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 6.1 | 6.1 | 6.0 |
| Kazakhstan | *15.9* | 0.0 | 0.0 | 2.9 | 8.1 | 12.3 | 15.9 | 15.9 | 15.9 |
| Kenya | *40.9* | 0.0 | 3.4 | 5.4 | 9.9 | 13.9 | 33.3 | 33.2 | 33.0 |
| Kiribati | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Kuwait | *3.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 2.9 | 2.9 | 2.9 |
| Kyrgyzstan | *5.3* | 0.0 | 0.0 | 1.2 | 2.6 | 4.0 | 5.3 | 5.3 | 5.3 |
| Laos | *6.4* | 0.0 | 1.5 | 2.1 | 2.4 | 3.3 | 6.3 | 6.3 | 6.3 |
| Latvia | *2.1* | 0.0 | 0.0 | 1.9 | 2.1 | 2.0 | 2.1 | 2.1 | 2.1 |
| Lebanon | *4.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 2.6 | 2.4 | 2.2 |
| Lesotho | *2.0* | 0.0 | 0.4 | 0.6 | 0.7 | 1.1 | 1.7 | 1.7 | 1.7 |
| Liberia | *4.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 3.0 | 2.9 | 2.9 |
| Lithuania | *3.1* | 0.0 | 0.0 | 1.1 | 3.0 | 3.0 | 3.0 | 3.0 | 3.0 |
| Luxembourg | *0.5* | 0.0 | 0.0 | 0.0 | 0.1 | 0.2 | 0.5 | 0.5 | 0.5 |
| Madagascar | *21.1* | 0.0 | 0.0 | 0.0 | 0.0 | 2.2 | 11.2 | 11.0 | 10.8 |
| Malawi | *15.0* | 0.0 | 0.0 | 0.0 | 0.0 | 2.4 | 8.4 | 7.9 | 7.3 |
| Malaysia | *28.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 14.8 | 12.8 | 10.7 |
| Maldives | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Mali | *14.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 9.9 | 9.2 | 8.5 |
| Malta | *0.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Mauritania | *3.6* | 0.6 | 1.1 | 0.0 | 0.0 | 0.0 | 1.9 | 1.6 | 1.2 |
| Mauritius | *1.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Mexico | *117.9* | 0.0 | 0.0 | 0.0 | 9.4 | 33.5 | 104.0 | 102.0 | 100.1 |
| Moldova | *3.6* | 0.0 | 0.0 | 0.8 | 2.2 | 2.3 | 3.6 | 3.6 | 3.6 |
| Mongolia | *2.7* | 0.3 | 1.5 | 2.4 | 2.6 | 2.7 | 2.7 | 2.7 | 2.7 |
| Montenegro | *0.6* | 0.0 | 0.0 | 0.2 | 0.4 | 0.3 | 0.6 | 0.6 | 0.6 |
| Morocco | *31.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 23.9 | 22.4 | 21.0 |
| Mozambique | *24.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 9.3 | 8.5 | 7.7 |
| Myanmar | *51.9* | 0.0 | 0.0 | 2.4 | 15.2 | 29.2 | 50.7 | 50.6 | 50.5 |
| Namibia | *2.2* | 0.0 | 0.6 | 0.3 | 0.5 | 0.1 | 1.3 | 1.3 | 1.3 |
| Nepal | *26.8* | 0.0 | 4.8 | 6.9 | 10.3 | 15.0 | 26.1 | 26.0 | 25.9 |
| Netherlands | *16.6* | 0.0 | 0.0 | 0.0 | 0.0 | 5.9 | 16.4 | 16.4 | 16.4 |
| New Caledonia | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| New Zealand | *4.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.7 | 0.3 | 0.0 |
| Nicaragua | *5.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 3.8 | 3.7 | 3.6 |
| Niger | *15.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 12.1 | 11.6 | 11.0 |
| Nigeria | *159.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 87.6 | 75.4 | 63.2 |
| North Korea | *24.5* | 1.7 | 21.6 | 22.1 | 24.2 | 24.4 | 24.5 | 24.5 | 24.5 |
| Norway | *4.9* | 1.5 | 4.5 | 4.7 | 4.7 | 4.8 | 4.8 | 4.8 | 4.7 |
| Oman | *2.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Pakistan | *173.1* | 0.0 | 0.0 | 0.0 | 0.0 | 5.4 | 140.4 | 137.7 | 135.0 |
| Panama | *3.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Paraguay | *6.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 3.6 | 3.4 | 3.2 |
| Peru | *29.3* | 0.0 | 0.0 | 0.0 | 0.0 | 1.0 | 16.4 | 15.4 | 14.4 |
| Philippines | *93.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 36.9 | 29.5 | 22.1 |
| Poland | *38.2* | 0.0 | 0.0 | 0.0 | 32.6 | 31.3 | 38.0 | 38.0 | 38.0 |
| Portugal | *10.6* | 0.0 | 0.0 | 0.0 | 0.0 | 2.7 | 9.4 | 9.2 | 8.9 |
| Romania | *21.9* | 0.0 | 0.0 | 1.3 | 11.3 | 12.1 | 21.8 | 21.7 | 21.7 |
| Russia | *143.6* | 0.0 | 65.5 | 109.4 | 122.7 | 124.0 | 142.2 | 142.0 | 141.8 |
| Rwanda | *10.8* | 0.0 | 1.9 | 3.1 | 4.9 | 5.2 | 8.4 | 8.4 | 8.3 |
| Saint Kitts and Nevis | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Saint Lucia | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Saint Vincent and the Grenadines | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Samoa | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Sao Tome and Principe | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Saudi Arabia | *27.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Senegal | *13.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1.5 | 0.6 | 0.0 |
| Serbia | *9.6* | 0.0 | 0.0 | 1.9 | 5.3 | 6.0 | 9.6 | 9.6 | 9.6 |
| Sierra Leone | *5.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.1 | 4.1 | 4.0 |
| Slovakia | *5.4* | 0.0 | 0.0 | 0.0 | 3.0 | 3.1 | 5.4 | 5.4 | 5.4 |
| Slovenia | *2.1* | 0.0 | 0.4 | 0.7 | 1.4 | 1.3 | 2.0 | 2.0 | 2.0 |
| Solomon Islands | *0.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| South Africa | *51.5* | 0.0 | 0.0 | 0.2 | 7.3 | 14.1 | 40.6 | 38.8 | 37.1 |
| South Korea | *48.5* | 0.0 | 10.8 | 19.1 | 39.9 | 47.1 | 48.1 | 48.0 | 47.9 |
| Spain | *46.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 40.7 | 40.0 | 39.3 |
| Sri Lanka | *20.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1.2 | 0.0 | 0.0 |
| Suriname | *0.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Sweden | *9.4* | 0.0 | 6.0 | 9.1 | 9.2 | 9.2 | 9.3 | 9.3 | 9.3 |
| Switzerland | *7.8* | 0.0 | 0.2 | 1.0 | 5.1 | 4.7 | 7.8 | 7.8 | 7.8 |
| Taiwan, province of China | *23.1* | 0.0 | 0.8 | 3.7 | 12.0 | 15.2 | 22.3 | 22.2 | 22.1 |
| Tajikistan | *7.6* | 0.0 | 1.0 | 1.9 | 3.0 | 4.9 | 7.6 | 7.6 | 7.6 |
| Tanzania | *45.0* | 0.0 | 10.2 | 12.8 | 15.1 | 19.1 | 34.6 | 34.5 | 34.4 |
| Thailand | *66.4* | 0.0 | 0.0 | 0.0 | 2.6 | 19.4 | 65.0 | 64.8 | 64.7 |
| Togo | *6.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 3.3 | 3.2 | 3.0 |
| Trinidad and Tobago | *1.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Tunisia | *10.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.4 | 3.2 | 2.1 |
| Turkey | *72.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 70.6 | 70.3 | 69.9 |
| Turkmenistan | *5.0* | 0.0 | 0.0 | 0.0 | 0.2 | 0.3 | 5.0 | 5.0 | 5.0 |
| Uganda | *34.0* | 0.0 | 6.0 | 11.2 | 18.8 | 23.8 | 33.0 | 33.0 | 32.9 |
| Ukraine | *46.1* | 0.0 | 0.0 | 0.0 | 15.8 | 15.8 | 45.9 | 45.9 | 45.9 |
| United Arab Emirates | *8.4* | 0.0 | 0.0 | 0.0 | 2.4 | 6.0 | 7.8 | 7.7 | 7.6 |
| United Kingdom | *62.3* | 0.0 | 0.0 | 3.6 | 22.8 | 40.2 | 58.2 | 57.5 | 56.8 |
| United States | *312.2* | 0.0 | 0.0 | 45.3 | 153.3 | 226.5 | 307.3 | 306.3 | 305.3 |
| Uruguay | *3.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1.0 | 0.8 | 0.6 |
| Uzbekistan | *27.8* | 0.0 | 0.0 | 0.0 | 0.0 | 1.3 | 27.8 | 27.8 | 27.8 |
| Vanuatu | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Venezuela | *29.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 17.2 | 15.9 | 14.5 |
| Vietnam | *89.0* | 0.0 | 15.5 | 31.7 | 37.9 | 50.9 | 85.9 | 85.5 | 85.1 |
| Yemen | *22.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 11.3 | 10.8 | 10.4 |
| Zambia | *13.2* | 0.0 | 0.0 | 0.7 | 2.2 | 4.4 | 8.6 | 8.6 | 8.6 |
| Zimbabwe | *13.1* | 0.0 | 0.0 | 0.0 | 0.0 | 2.9 | 8.0 | 8.0 | 8.0 |
| **Total** | ***6703.0*** | **4.2** | **626.4** | **1162.2** | **1861.2** | **2352.5** | **5321.2** | **5182.2** | **5044.8** |

**Table S9.** Number of people who would die from starvation (millions) after the simulated nuclear war in Year 2 for all nations, assuming that trade would continue, under the ***No Livestock*** case (assuming livestock is killed in Year 1 and 50% of livestock grain feed is used for human consumption). The second column is the population in millions in 201042. 150 Tg + hw is half of the household waste added to food consumption, and 150 Tg + tw is total household waste added to food consumption.

| **Nation** | ***Population*** | **5 Tg** | **16 Tg** | **27 Tg** | **37 Tg** | **47 Tg** | **150 Tg** | **150 Tg + hw** | **150 Tg + tw** |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Afghanistan | *28.4* | 1.8 | 3.5 | 5.0 | 5.7 | 6.9 | 28.4 | 28.4 | 28.4 |
| Albania | *3.2* | 0.0 | 0.0 | 0.0 | 0.1 | 0.0 | 3.1 | 3.1 | 3.1 |
| Algeria | *37.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 16.9 | 13.7 | 10.4 |
| Angola | *19.5* | 0.0 | 0.0 | 0.0 | 0.0 | 3.4 | 11.3 | 10.7 | 10.1 |
| Antigua and Barbuda | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Argentina | *40.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 21.6 | 19.2 | 16.8 |
| Armenia | *3.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.7 | 3.0 | 3.0 | 3.0 |
| Australia | *22.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Austria | *8.4* | 0.0 | 2.4 | 3.4 | 7.3 | 7.1 | 8.4 | 8.4 | 8.4 |
| Azerbaijan | *9.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.3 | 9.1 | 9.1 | 9.1 |
| Bahamas | *0.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Bangladesh | *151.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 146.1 | 145.7 | 145.2 |
| Barbados | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Belarus | *9.5* | 0.0 | 0.0 | 0.0 | 8.4 | 9.4 | 9.5 | 9.5 | 9.5 |
| Belgium | *10.9* | 0.0 | 0.0 | 0.0 | 0.0 | 2.9 | 10.9 | 10.9 | 10.9 |
| Belize | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.2 | 0.2 | 0.2 |
| Benin | *9.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.5 | 3.9 | 3.4 |
| Bermuda | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Bolivia | *10.2* | 0.0 | 0.0 | 1.1 | 2.4 | 2.8 | 6.7 | 6.7 | 6.7 |
| Bosnia and Herzegovina | *3.8* | 0.0 | 0.0 | 1.8 | 2.7 | 2.7 | 3.8 | 3.8 | 3.8 |
| Botswana | *2.0* | 0.0 | 0.0 | 0.0 | 0.1 | 0.3 | 1.3 | 1.3 | 1.3 |
| Brazil | *195.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 95.2 | 78.6 | 62.0 |
| Brunei | *0.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Bulgaria | *7.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 7.4 | 7.4 | 7.4 |
| Burkina Faso | *15.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 10.2 | 9.4 | 8.7 |
| Cambodia | *14.4* | 0.5 | 0.4 | 0.0 | 1.4 | 5.6 | 13.4 | 13.3 | 13.2 |
| Cameroon | *20.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 16.2 | 15.8 | 15.4 |
| Canada | *34.1* | 0.0 | 19.3 | 31.3 | 33.7 | 33.8 | 34.0 | 33.9 | 33.9 |
| Cape Verde | *0.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Central African Republic | *4.4* | 0.0 | 0.0 | 0.8 | 0.7 | 1.0 | 3.6 | 3.5 | 3.5 |
| Chad | *11.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 7.8 | 7.8 | 7.8 |
| Chile | *17.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 9.6 | 8.9 | 8.2 |
| China | *1367.4* | 0.0 | 494.7 | 778.9 | 1005.6 | 1097.6 | 1361.9 | 1361.1 | 1360.3 |
| Colombia | *46.4* | 0.0 | 0.0 | 0.0 | 3.1 | 6.2 | 38.3 | 37.7 | 37.2 |
| Republic of Congo | *4.1* | 0.0 | 0.0 | 0.3 | 0.3 | 0.6 | 2.8 | 2.8 | 2.8 |
| Costa Rica | *4.7* | 0.3 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Croatia | *4.3* | 0.0 | 0.0 | 0.0 | 1.7 | 1.7 | 4.3 | 4.3 | 4.3 |
| Cuba | *11.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 6.6 | 6.0 | 5.3 |
| Cyprus | *1.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.3 | 0.3 | 0.2 |
| Czech Republic | *10.6* | 0.0 | 0.0 | 0.0 | 9.3 | 8.2 | 10.5 | 10.5 | 10.5 |
| Denmark | *5.6* | 0.0 | 0.0 | 0.8 | 5.3 | 5.3 | 5.4 | 5.4 | 5.4 |
| Dominica | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Dominican Republic | *10.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Ecuador | *15.0* | 0.0 | 0.0 | 0.4 | 0.4 | 1.5 | 10.2 | 10.1 | 9.9 |
| Egypt | *78.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 58.3 | 53.3 | 48.3 |
| El Salvador | *6.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.5 | 4.4 | 4.3 |
| Estonia | *1.3* | 0.0 | 0.8 | 1.3 | 1.3 | 1.3 | 1.3 | 1.3 | 1.3 |
| Ethiopia | *87.1* | 0.0 | 4.3 | 18.6 | 24.5 | 42.6 | 77.6 | 77.5 | 77.5 |
| Fiji | *0.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Finland | *5.4* | 0.3 | 5.3 | 5.3 | 5.3 | 5.3 | 5.3 | 5.3 | 5.3 |
| France | *63.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 62.8 | 62.7 | 62.6 |
| French Polynesia | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Gabon | *1.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.1 | 0.9 | 0.9 | 0.8 |
| Gambia | *1.7* | 0.0 | 0.9 | 0.2 | 0.0 | 0.3 | 0.0 | 0.0 | 0.0 |
| Georgia | *4.4* | 0.0 | 0.2 | 1.8 | 2.6 | 2.8 | 4.4 | 4.4 | 4.4 |
| Germany | *83.0* | 0.0 | 0.0 | 0.0 | 58.3 | 60.8 | 82.5 | 82.4 | 82.3 |
| Ghana | *24.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 14.1 | 12.2 | 10.2 |
| Greece | *11.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 10.5 | 10.4 | 10.3 |
| Grenada | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Guatemala | *14.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 11.0 | 10.8 | 10.5 |
| Guinea | *10.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 8.3 | 8.0 | 7.8 |
| Guinea-Bissau | *1.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Guyana | *0.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Haiti | *9.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Honduras | *7.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 5.1 | 4.9 | 4.7 |
| Hungary | *10.0* | 0.0 | 0.0 | 1.5 | 5.6 | 6.0 | 10.0 | 10.0 | 10.0 |
| Iceland | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| India | *1205.6* | 0.0 | 0.0 | 0.0 | 0.0 | 121.7 | 741.9 | 703.7 | 665.4 |
| Indonesia | *240.7* | 0.0 | 0.0 | 0.0 | 0.0 | 19.6 | 135.3 | 122.7 | 110.2 |
| Iran | *74.5* | 0.0 | 0.0 | 0.0 | 0.0 | 3.1 | 72.5 | 72.2 | 72.0 |
| Iraq | *31.0* | 0.0 | 0.0 | 0.0 | 0.7 | 0.1 | 30.8 | 30.8 | 30.7 |
| Ireland | *4.5* | 0.0 | 0.0 | 0.0 | 0.0 | 1.1 | 4.5 | 4.5 | 4.4 |
| Israel | *7.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 5.9 | 5.5 | 5.2 |
| Italy | *60.5* | 0.0 | 0.0 | 0.0 | 13.5 | 11.3 | 58.8 | 58.5 | 58.1 |
| Jamaica | *2.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Japan | *127.4* | 0.0 | 45.4 | 78.5 | 102.5 | 112.3 | 124.1 | 123.9 | 123.6 |
| Jordan | *6.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 6.2 | 6.2 | 6.1 |
| Kazakhstan | *15.9* | 0.0 | 0.0 | 4.6 | 9.6 | 13.5 | 15.9 | 15.9 | 15.9 |
| Kenya | *40.9* | 0.0 | 6.0 | 8.1 | 12.2 | 15.8 | 34.4 | 34.3 | 34.2 |
| Kiribati | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Kuwait | *3.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 3.0 | 3.0 | 3.0 |
| Kyrgyzstan | *5.3* | 0.0 | 0.0 | 1.8 | 3.1 | 4.4 | 5.3 | 5.3 | 5.3 |
| Laos | *6.4* | 0.0 | 1.7 | 2.3 | 2.6 | 3.4 | 6.4 | 6.4 | 6.4 |
| Latvia | *2.1* | 0.0 | 0.0 | 1.9 | 2.1 | 2.1 | 2.1 | 2.1 | 2.1 |
| Lebanon | *4.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 2.9 | 2.7 | 2.5 |
| Lesotho | *2.0* | 0.0 | 0.5 | 0.7 | 0.8 | 1.2 | 1.8 | 1.7 | 1.7 |
| Liberia | *4.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 3.0 | 3.0 | 2.9 |
| Lithuania | *3.1* | 0.0 | 0.0 | 1.2 | 3.0 | 3.0 | 3.0 | 3.0 | 3.0 |
| Luxembourg | *0.5* | 0.0 | 0.0 | 0.0 | 0.1 | 0.2 | 0.5 | 0.5 | 0.5 |
| Madagascar | *21.1* | 0.0 | 0.0 | 0.0 | 0.0 | 2.9 | 11.7 | 11.5 | 11.3 |
| Malawi | *15.0* | 0.0 | 0.0 | 0.0 | 0.0 | 2.6 | 8.6 | 8.0 | 7.5 |
| Malaysia | *28.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 15.8 | 13.9 | 12.0 |
| Maldives | *0.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Mali | *14.0* | 0.0 | 0.6 | 0.1 | 0.0 | 0.4 | 10.6 | 9.9 | 9.3 |
| Malta | *0.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Mauritania | *3.6* | 0.9 | 1.4 | 0.3 | 0.2 | 0.2 | 2.1 | 1.9 | 1.6 |
| Mauritius | *1.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Mexico | *117.9* | 0.0 | 0.0 | 6.0 | 18.7 | 41.3 | 107.5 | 106.0 | 104.5 |
| Moldova | *3.6* | 0.0 | 0.0 | 1.1 | 2.3 | 2.4 | 3.6 | 3.6 | 3.6 |
| Mongolia | *2.7* | 0.7 | 1.9 | 2.7 | 2.7 | 2.7 | 2.7 | 2.7 | 2.7 |
| Montenegro | *0.6* | 0.1 | 0.0 | 0.3 | 0.4 | 0.4 | 0.6 | 0.6 | 0.6 |
| Morocco | *31.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 24.5 | 23.1 | 21.7 |
| Mozambique | *24.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 9.5 | 8.8 | 8.0 |
| Myanmar | *51.9* | 0.0 | 0.0 | 4.7 | 17.0 | 30.5 | 51.0 | 51.0 | 50.9 |
| Namibia | *2.2* | 0.0 | 0.7 | 0.5 | 0.6 | 0.2 | 1.3 | 1.3 | 1.3 |
| Nepal | *26.8* | 0.0 | 5.6 | 7.7 | 10.9 | 15.6 | 26.1 | 26.0 | 25.9 |
| Netherlands | *16.6* | 0.0 | 0.0 | 0.0 | 0.0 | 7.0 | 16.5 | 16.5 | 16.5 |
| New Caledonia | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| New Zealand | *4.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1.2 | 0.8 | 0.4 |
| Nicaragua | *5.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.0 | 3.9 | 3.8 |
| Niger | *15.9* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 12.4 | 11.9 | 11.4 |
| Nigeria | *159.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 88.6 | 76.6 | 64.5 |
| North Korea | *24.5* | 2.3 | 21.8 | 22.3 | 24.4 | 24.5 | 24.5 | 24.5 | 24.5 |
| Norway | *4.9* | 2.1 | 4.6 | 4.8 | 4.8 | 4.8 | 4.8 | 4.8 | 4.8 |
| Oman | *2.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Pakistan | *173.1* | 0.0 | 0.0 | 0.0 | 12.4 | 15.9 | 140.7 | 138.0 | 135.3 |
| Panama | *3.7* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Paraguay | *6.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 3.9 | 3.7 | 3.5 |
| Peru | *29.3* | 0.0 | 0.0 | 0.0 | 0.1 | 2.3 | 17.3 | 16.4 | 15.5 |
| Philippines | *93.4* | 0.0 | 5.4 | 0.0 | 0.0 | 0.0 | 40.5 | 33.6 | 26.7 |
| Poland | *38.2* | 0.0 | 0.0 | 0.0 | 33.3 | 31.9 | 38.0 | 38.0 | 38.0 |
| Portugal | *10.6* | 0.0 | 0.0 | 0.0 | 1.2 | 3.7 | 10.2 | 10.1 | 10.0 |
| Romania | *21.9* | 0.0 | 0.0 | 3.5 | 12.2 | 12.8 | 21.8 | 21.8 | 21.7 |
| Russia | *143.6* | 0.0 | 74.3 | 113.2 | 124.6 | 125.0 | 142.3 | 142.2 | 142.0 |
| Rwanda | *10.8* | 0.0 | 2.0 | 3.2 | 5.1 | 5.2 | 8.5 | 8.4 | 8.3 |
| Saint Kitts and Nevis | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Saint Lucia | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Saint Vincent and the Grenadines | *0.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Samoa | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Sao Tome and Principe | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Saudi Arabia | *27.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Senegal | *13.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1.8 | 1.0 | 0.1 |
| Serbia | *9.6* | 0.0 | 0.3 | 2.7 | 5.8 | 6.5 | 9.6 | 9.6 | 9.6 |
| Sierra Leone | *5.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.2 | 4.1 | 4.0 |
| Slovakia | *5.4* | 0.0 | 0.0 | 0.0 | 3.3 | 3.3 | 5.4 | 5.4 | 5.4 |
| Slovenia | *2.1* | 0.0 | 0.6 | 0.9 | 1.6 | 1.5 | 2.1 | 2.1 | 2.1 |
| Solomon Islands | *0.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| South Africa | *51.5* | 0.0 | 0.0 | 3.8 | 10.6 | 17.0 | 42.1 | 40.5 | 39.0 |
| South Korea | *48.5* | 0.0 | 12.9 | 20.8 | 40.9 | 47.2 | 48.1 | 48.0 | 47.9 |
| Spain | *46.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 42.4 | 42.0 | 41.5 |
| Sri Lanka | *20.8* | 0.5 | 0.0 | 0.0 | 0.0 | 0.0 | 1.5 | 0.1 | 0.0 |
| Suriname | *0.5* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Sweden | *9.4* | 0.0 | 6.2 | 9.1 | 9.2 | 9.2 | 9.3 | 9.3 | 9.3 |
| Switzerland | *7.8* | 0.0 | 1.5 | 2.0 | 5.8 | 5.5 | 7.8 | 7.8 | 7.8 |
| Taiwan, province of China | *23.1* | 0.0 | 2.6 | 5.3 | 13.1 | 16.1 | 22.8 | 22.7 | 22.7 |
| Tajikistan | *7.6* | 0.0 | 1.4 | 2.2 | 3.3 | 5.0 | 7.6 | 7.6 | 7.6 |
| Tanzania | *45.0* | 0.0 | 11.4 | 14.1 | 16.3 | 20.1 | 35.5 | 35.4 | 35.3 |
| Thailand | *66.4* | 0.0 | 0.0 | 0.0 | 5.2 | 21.2 | 65.3 | 65.2 | 65.1 |
| Togo | *6.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 3.4 | 3.2 | 3.1 |
| Trinidad and Tobago | *1.3* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Tunisia | *10.6* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 4.8 | 3.7 | 2.7 |
| Turkey | *72.1* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 71.2 | 71.0 | 70.7 |
| Turkmenistan | *5.0* | 0.0 | 0.0 | 0.0 | 0.2 | 0.3 | 5.0 | 5.0 | 5.0 |
| Uganda | *34.0* | 0.1 | 7.0 | 12.1 | 19.6 | 24.2 | 33.2 | 33.1 | 33.1 |
| Ukraine | *46.1* | 0.0 | 0.0 | 0.0 | 17.3 | 17.0 | 45.9 | 45.9 | 45.9 |
| United Arab Emirates | *8.4* | 0.0 | 0.0 | 0.0 | 3.3 | 6.9 | 8.3 | 8.3 | 8.3 |
| United Kingdom | *62.3* | 0.0 | 0.6 | 11.3 | 29.4 | 45.6 | 62.1 | 62.0 | 62.0 |
| United States | *312.2* | 0.0 | 0.0 | 73.9 | 176.1 | 240.7 | 309.5 | 308.9 | 308.3 |
| Uruguay | *3.4* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1.3 | 1.1 | 0.9 |
| Uzbekistan | *27.8* | 0.0 | 0.0 | 0.1 | 0.5 | 2.6 | 27.8 | 27.8 | 27.8 |
| Vanuatu | *0.2* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Venezuela | *29.0* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 18.5 | 17.3 | 16.1 |
| Vietnam | *89.0* | 0.0 | 21.9 | 37.0 | 42.7 | 54.6 | 86.8 | 86.5 | 86.2 |
| Yemen | *22.8* | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 11.7 | 11.3 | 10.9 |
| Zambia | *13.2* | 0.0 | 0.0 | 1.0 | 2.5 | 4.6 | 8.8 | 8.8 | 8.8 |
| Zimbabwe | *13.1* | 0.0 | 0.0 | 0.0 | 0.6 | 3.4 | 8.3 | 8.3 | 8.3 |
| **Total** | ***6703.0*** | **9.5** | **769.9** | **1318.5** | **2014.2** | **2514.9** | **5400.5** | **5271.3** | **5143.4** |