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MORTALITY FROM ROAD CRASHES IN 183 COUNTRIES: A COMPARISON WITH LEADING CAUSES OF DEATH

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16. Abstract

This study compared, for individual countries, fatalities from road crashes with fatalities from three leading causes of death (malignant neoplasms, ischaemic heart disease, and strokes) and from all causes. The raw data, applicable to 2015, came from the World Health Organization.

The main findings are as follows:

(1) For the world, fatalities from road crashes represented 2.4% of fatalities from all causes. The highest percentage was in Oman (9.4%) and the lowest in Sweden (0.3%). The percentage in the United States was 1.3%.

(2) For the world, fatalities from road crashes corresponded to 15.4% of fatalities from malignant neoplasms. The highest percentage was in Gambia (122.7%) and the lowest in the United Kingdom (1.1%). The percentage in the United States was 5.8%.

(3) For the world, fatalities from road crashes corresponded to 15.3% of fatalities from ischaemic heart disease. The highest percentage was in Kenya (180.6%) and the lowest in Ukraine (1.3%). The percentage in the United States was 7.3%.

(4) For the world, fatalities from road crashes corresponded to 21.5% of fatalities from strokes. The highest percentage was in Qatar (166.1%) and the lowest in Bulgaria (2.5%). The percentage in the United States was 26.5%.

The appendix lists the percentages for each individual country.

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Introduction

This study was designed to place road fatalities in the broader public-health context of fatalities from leading causes of death. Specifically, the study compared mortality from road crashes with mortality from three leading causes of death: malignant neoplasms (cancer), ischaemic heart disease, and strokes. The analysis was performed for each member country of the World Health Organization (WHO). The raw data came from WHO and are applicable for 2015. This study is an update of Sivak and Schoettle (2014), which used data for 2008.[1]

Method

Estimated fatalities in 2015 from all causes, road crashes, malignant neoplasms, ischaemic heart disease, and strokes for the 183 individual WHO member countries (WHO, 2017) were the raw data for the analysis. The variables of interest were fatalities from road crashes as a percentage of fatalities from each of the other three causes of death and from all causes.

[1] According to WHO (2017), "due to changes in data and some methods, these [2015] estimates are not comparable to previously-released WHO estimates."

Results

Tables 1 through 4 present fatalities from road crashes as a percentage of the following leading causes of death for each country: all causes, malignant neoplasms, ischaemic heart disease, and strokes. For each cause of death, these tables include the 25 countries with the highest and lowest percentages, plus the following countries (if they are not already among the 25 highest or lowest ranked countries): the Unites States, Canada, Mexico, Argentina, Brazil, France, Germany, the United Kingdom, Australia, the Russian Federation, China, India, Japan, and South Korea. The 25 countries with the highest and lowest percentages are also mapped in Figures 1 through 4. (A complete list of these percentages for each of the 183 countries is shown in the appendix.)

Fatalities from road crashes as a percentage of fatalities from all causes

For the world, fatalities from road crashes represented 2.4% of fatalities from all causes (Table 1). The highest percentage for an individual country (9.4% in Oman) was 31 times the lowest percentage (0.3% in Sweden). The percentage in the United States was 1.3%.

In the following 10 countries, road crashes were responsible for the highest percentages of all fatalities: Oman, Qatar, Saudi Arabia, Venezuela, Kuwait, Jordan, Iran, United Arab Emirates, Rwanda, and Sao Tome and Principe (Table 1). The 10 countries with the lowest percentages were Sweden, the United Kingdom, Micronesia, Kiribati, Denmark, Germany, the Netherlands, Spain, Norway, and Switzerland.

The countries with the highest percentages (Figure 1) tended to be in South America, Africa, the Middle East, and Southeast Asia. Twenty of the 25 countries with the lowest percentages were in Europe.

Table 1

Fatalities from road crashes as a percentage of fatalities from all causes of death.

Rank	Country	%
1	Oman	9.4
2	Qatar	8.6
3	Saudi Arabia	8.1
4	Venezuela	7.5
5	Kuwait	7.2
6	Jordan	6.2
7	Iran	6.1
8	United Arab Emirates	6.0
9	Rwanda	5.3
10	Sao Tome and Principe	5.3
11	Zimbabwe	5.2
12	Libya	5.0
13	Algeria	4.8
14	Madagascar	4.8
15	Dominican Republic	4.7
16	Senegal	4.6
17	Malaysia	4.5
18	Kenya	4.4
19	Paraguay	4.4
20	Tanzania	4.3
21	Viet Nam	4.1
22	Liberia	4.1
23	Eritrea	4.1
24	Ecuador	4.0
25	Cape Verde	4.0
33	Brazil	3.7
68	India	2.9
74	China	2.7
88	Mexico	2.4
	World	***2.4***
95	South Korea	2.2
112	Argentina	1.8
129	United States	1.3
130	Russian Federation	1.2
145	Australia	0.8
146	Canada	0.8
159	Ukraine	0.6
160	Ireland	0.6
161	Austria	0.6
162	Serbia	0.6
163	Czechia	0.6
164	Israel	0.6
165	Hungary	0.6
166	France	0.6
167	Iceland	0.6
168	Estonia	0.5
169	Italy	0.5
170	Bulgaria	0.5
171	Barbados	0.5
172	Finland	0.5
173	Japan	0.5
174	Switzerland	0.5
175	Norway	0.4
176	Spain	0.4
177	Netherlands	0.4
178	Germany	0.4
179	Denmark	0.4
180	Kiribati	0.4
181	Micronesia	0.3
182	United Kingdom	0.3
183	Sweden	0.3

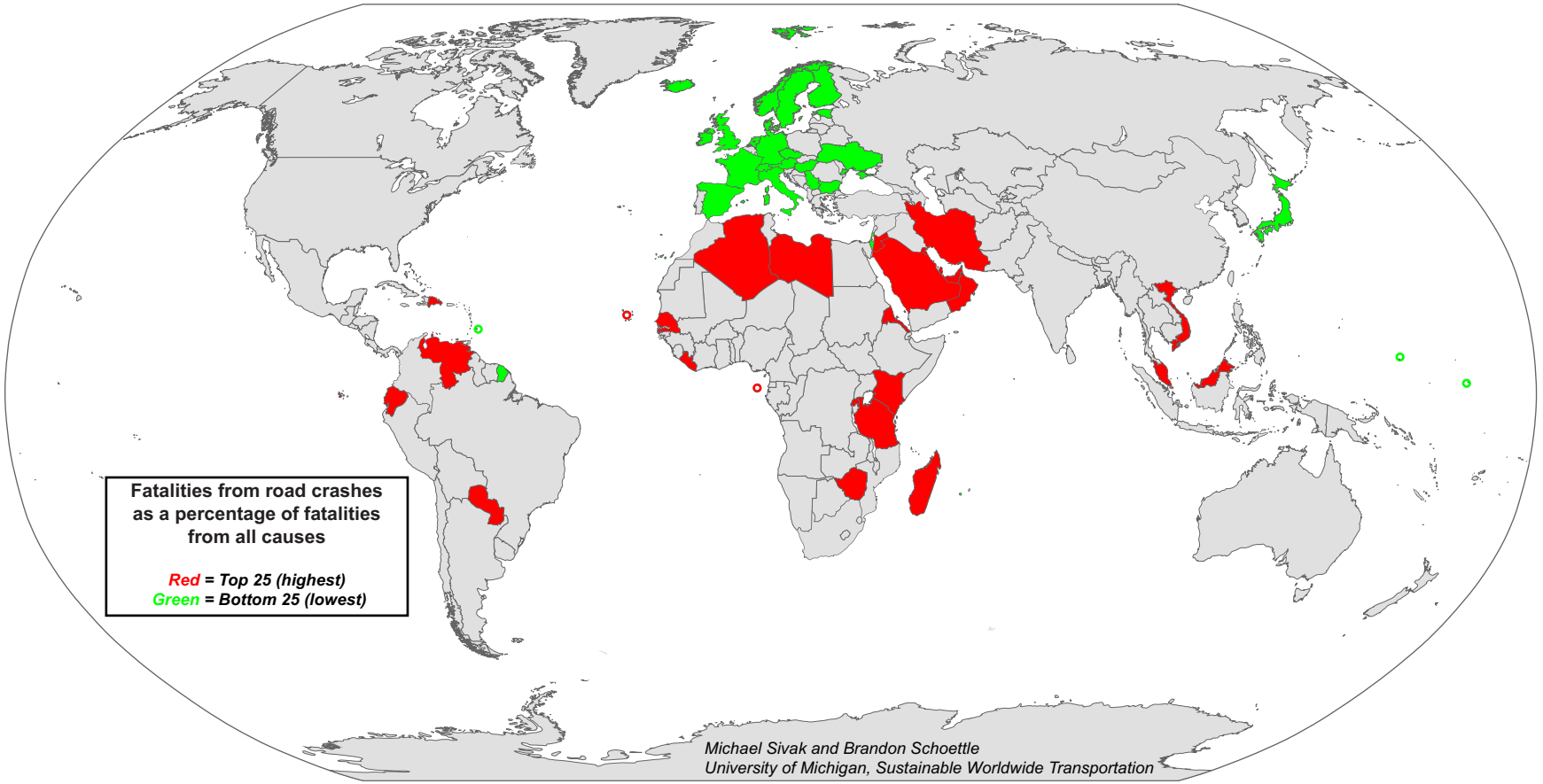

Figure 1. The 25 countries with the highest (red) and lowest (green) fatalities from road crashes as a percentage of fatalities from all causes of death.

Fatalities from road crashes as a percentage of fatalities from malignant neoplasms

For the world, the number of fatalities from road crashes corresponded to 15.4% of fatalities from malignant neoplasms (Table 2). The highest percentage for an individual country (122.7% in Gambia) was 112 times the lowest percentage (1.1% in the United Kingdom). The percentage in the United States was 5.8%.

In the following 10 countries, fatalities from road crashes corresponded to the highest percentages of fatalities from malignant neoplasms: Gambia, Niger, Oman, Liberia, Zimbabwe, Benin, Saudi Arabia, Sierra Leone, Burkina Faso, and Guinea-Bissau (Table 2). The 10 countries where fatalities from road crashes corresponded to the lowest percentages of fatalities from malignant neoplasms were the United Kingdom, Denmark, Sweden, the Netherlands, Germany, Spain, Norway, Japan, Switzerland, and Italy.

The 25 countries with the highest percentages were all located either in Africa or the Middle East (Figure 2). Twenty of the 25 countries with the lowest percentages were in Europe.

Table 2
Fatalities from road crashes as a percentage of fatalities from malignant neoplasms.

Rank	Country	%
1	Gambia	122.7
2	Niger	105.1
3	Oman	99.0
4	Liberia	89.0
5	Zimbabwe	82.5
6	Benin	80.2
7	Saudi Arabia	80.1
8	Sierra Leone	79.1
9	Burkina Faso	77.1
10	Guinea-Bissau	75.7
11	Guinea	75.2
12	Senegal	74.6
13	Kuwait	74.5
14	Togo	74.5
15	Angola	74.2
16	Congo	71.5
17	Dem. Rep. of the Congo	66.9
18	Central African Republic	66.7
19	Tanzania	65.5
20	Mauritania	65.0
21	Chad	64.8
22	Yemen	64.2
23	Namibia	61.9
24	Ghana	61.0
25	Cameroon	59.8
59	India	36.0
90	Brazil	21.1
96	Mexico	19.5
	World	***15.4***
113	China	11.6
121	Argentina	8.6
126	South Korea	7.2
127	Russian Federation	7.1
135	United States	5.8
155	Australia	2.9
159	Canada	2.7
160	Serbia	2.7
161	Malta	2.6
162	Singapore	2.5
163	Czechia	2.5
164	Austria	2.3
165	Hungary	2.3
166	Barbados	2.3
167	Israel	2.2
168	Estonia	2.2
169	Ireland	2.1
170	Slovenia	2.1
171	Iceland	2.1
172	Finland	2.0
173	France	1.9
174	Italy	1.9
175	Switzerland	1.7
176	Japan	1.5
177	Norway	1.5
178	Spain	1.5
179	Germany	1.5
180	Netherlands	1.3
181	Sweden	1.2
182	Denmark	1.2
183	United Kingdom	1.1

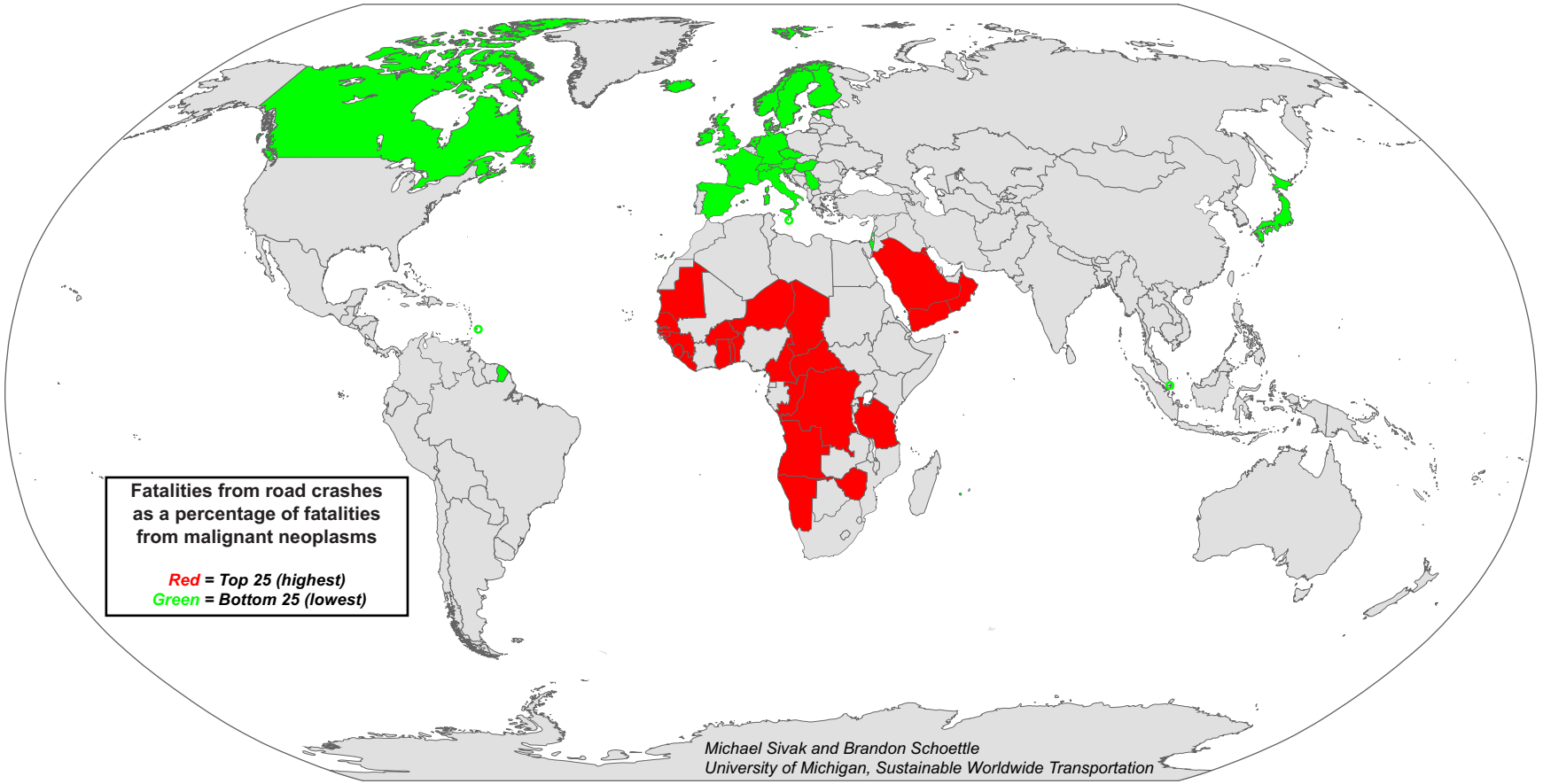

Figure 2. The 25 countries with the highest (red) and lowest (green) fatalities from road crashes as a percentage of fatalities from malignant neoplasms.

Fatalities from road crashes as a percentage of fatalities from ischaemic heart disease

For the world, the number of fatalities from road crashes corresponded to 15.3% of fatalities from ischaemic heart disease (Table 3). The highest percentage for an individual country (180.6% in Kenya) was 139 times the lowest percentage (1.3% in Ukraine). The percentage in the United States was 7.3%.

In the following 10 countries, fatalities from road crashes corresponded to the highest percentages of fatalities from ischaemic heart disease (Table 3): Kenya, Zimbabwe, Uganda, Burundi, Rwanda, Democratic Republic of the Congo, Somalia, Mozambique, Malawi, and Tanzania. The 10 countries where fatalities from road crashes corresponded to the lowest percentages of fatalities from ischaemic heart disease were Ukraine, Estonia, Bulgaria, Sweden, Germany, Hungary, Belarus, Latvia, Romania, and Czechia.

All 25 countries with the highest percentages were in sub-Saharan Africa (Figure 3). Twenty-three of the 25 countries with the lowest percentages were in Europe.

Table 3

Fatalities from road crashes as a percentage of fatalities from ischaemic heart disease.

Rank	Country	%
1	Kenya	180.6
2	Zimbabwe	148.8
3	Uganda	126.7
4	Burundi	115.7
5	Rwanda	108.6
6	Dem. Rep. of the Congo	107.4
7	Somalia	102.3
8	Mozambique	98.6
9	Malawi	98.3
10	Tanzania	93.5
11	South Sudan	88.6
12	Madagascar	88.5
13	Sao Tome and Principe	86.5
14	Liberia	81.0
15	Comoros	77.9
16	Zambia	77.3
17	Eritrea	75.8
18	Niger	73.7
19	Gambia	66.9
20	Senegal	66.9
21	Togo	59.4
22	Central African Republic	58.1
23	Ethiopia	57.8
24	Chad	57.6
25	Guinea	57.2
58	Brazil	28.6
69	South Korea	24.1
82	India	19.2
92	China	16.8
96	Mexico	15.8
	World	***15.3***
115	Argentina	10.2
124	United States	7.3
131	Australia	5.6
132	Canada	5.5
134	France	5.2
150	Japan	3.9
152	Russian Federation	3.6
159	Spain	3.1
160	Italy	3.1
161	Greece	2.9
162	Georgia	2.9
163	Norway	2.8
164	Iceland	2.7
165	Croatia	2.7
166	Switzerland	2.6
167	Austria	2.5
168	Moldova	2.5
169	United Kingdom	2.4
170	Malta	2.4
171	Lithuania	2.3
172	Finland	2.2
173	Micronesia	2.0
174	Czechia	2.0
175	Romania	2.0
176	Latvia	2.0
177	Belarus	2.0
178	Hungary	1.9
179	Germany	1.9
180	Sweden	1.6
181	Bulgaria	1.6
182	Estonia	1.5
183	Ukraine	1.3

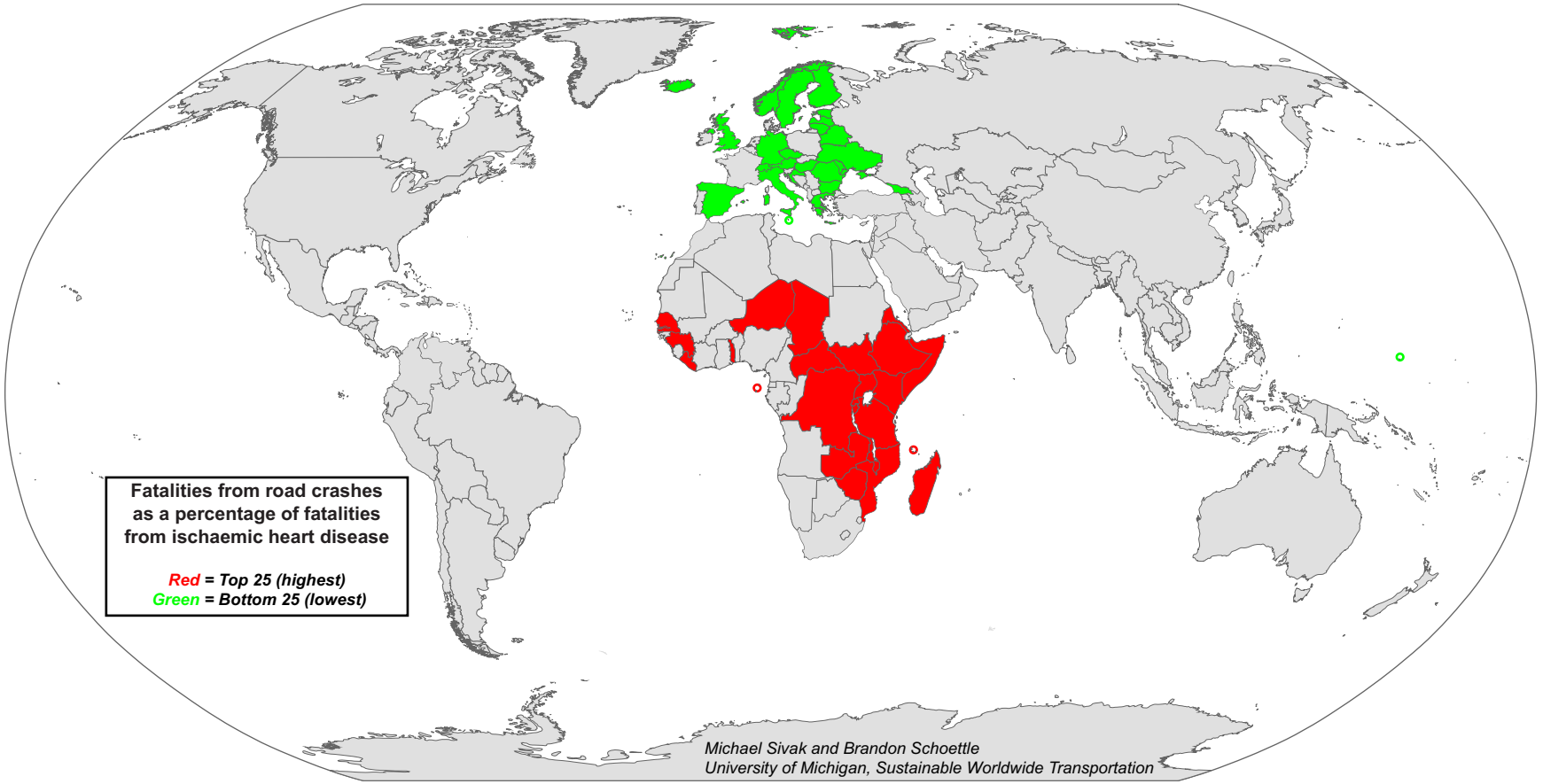

Figure 3. The 25 countries with the highest (red) and lowest (green) fatalities from road crashes as a percentage of fatalities from ischaemic heart disease.

Fatalities from road crashes as a percentage of fatalities from strokes

For the world, the number of fatalities from road crashes corresponded to 21.5% of fatalities from strokes (Table 4). The highest percentage for an individual country (166.1% in Qatar) was 66 times the lowest percentage (2.5% in Bulgaria). The percentage in the United States was 26.5%.

In the following 10 countries, fatalities from road crashes corresponded to the highest percentages of fatalities from strokes (Table 4): Qatar, Zimbabwe, Oman, Kenya, Malawi, Tanzania, Rwanda, Zambia, Venezuela, and Burkina Faso. The 10 countries where fatalities from road crashes corresponded to the lowest percentages of fatalities from strokes were Bulgaria, Kiribati, Micronesia, Montenegro, Latvia, Romania, Macedonia, Ukraine, Sweden, and Georgia.

The countries with the highest percentages (Figure 4) tended to be in sub-Saharan Africa and the Middle East. The countries with the lowest percentages were primarily in Europe.

Table 4
Fatalities from road crashes as a percentage of fatalities from strokes.

Rank	Country	%
1	Qatar	166.1
2	Zimbabwe	143.8
3	Oman	138.3
4	Kenya	117.2
5	Malawi	115.8
6	Tanzania	103.7
7	Rwanda	101.8
8	Zambia	101.7
9	Venezuela	98.4
10	Burkina Faso	94.3
11	Uganda	87.9
12	Burundi	86.0
13	Liberia	80.1
14	Guatemala	79.0
15	Kuwait	77.2
16	Dem. Rep. of the Congo	76.4
17	Saudi Arabia	75.9
18	South Sudan	74.9
19	Somalia	74.1
20	Niger	70.0
21	Mozambique	70.0
22	Sao Tome and Principe	69.0
23	Ethiopia	68.6
24	Ecuador	66.7
25	Gambia	65.5
59	Mexico	44.0
60	Brazil	43.6
65	India	40.1
91	United States	26.5
94	Argentina	24.8
	World	***21.5***
109	South Korea	21.2
118	Canada	16.5
126	China	12.8
128	Australia	12.3
141	France	9.6
158	Russian Federation	6.2
159	Norway	6.1
160	Belarus	6.1
161	Netherlands	6.1
162	Hungary	6.0
163	Germany	6.0
164	Spain	5.9
165	Denmark	5.8
166	Finland	5.6
167	Italy	5.3
168	Croatia	5.2
169	United Kingdom	4.9
170	Serbia	4.7
171	Barbados	4.7
172	Greece	4.7
173	Japan	4.6
174	Georgia	4.5
175	Sweden	4.4
176	Ukraine	4.2
177	Macedonia	4.1
178	Romania	3.9
179	Latvia	3.8
180	Montenegro	3.7
181	Micronesia	3.2
182	Kiribati	2.9
183	Bulgaria	2.5

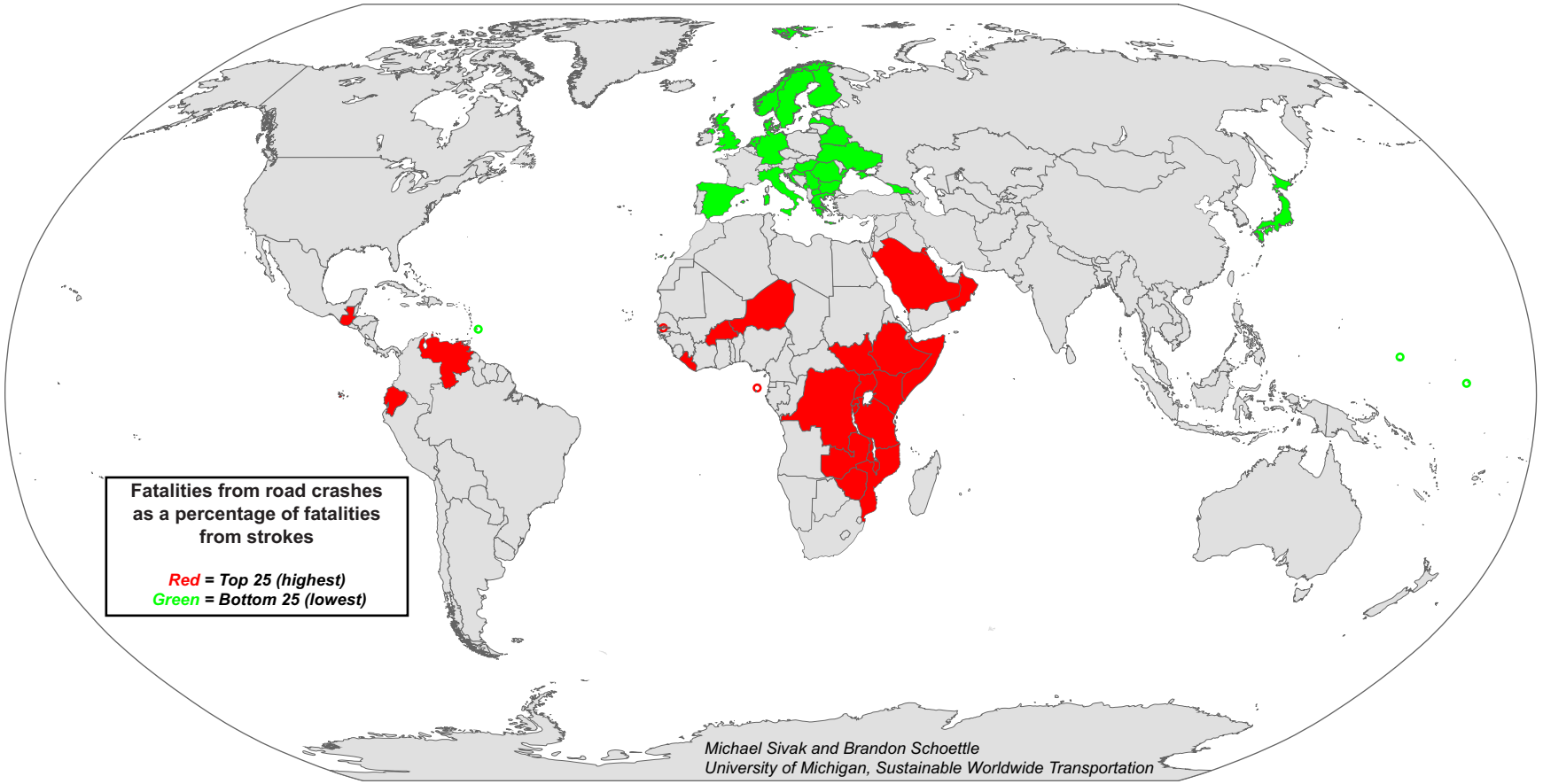

Figure 4. The 25 countries with the highest (red) and lowest (green) fatalities from road crashes as a percentage of fatalities from strokes.

Discussion

Fatalities from road crashes as a percentage of fatalities from all causes

For the world, fatalities from road crashes represented 2.4% of fatalities from all causes (Table 1). For three countries on one extreme, this percentage exceeded 8% (9.4% in Oman, 8.6% in Qatar, and 8.1% in Saudi Arabia). On the other extreme, in three countries this percentage was 0.3% (Sweden, the United Kingdom, and Micronesia). The percentage in the United States was 1.3%.

Fatalities from road crashes as a percentage of fatalities from leading causes of death

The key findings concerning fatalities from road crashes as a percentage of fatalities from malignant neoplasms, ischaemic heart disease, and strokes are presented in Table 5. For the world, these percentages were 15.4%, 15.3%, and 21.5%, respectively.

Table 5
Key findings concerning fatalities from road crashes as a percentage of fatalities from three leading causes of death.

Cause of death	World	United States	Maximum	Minimum	Maximum/ minimum
Malignant neoplasms	15.4%	5.8%	122.7% (Gambia)	1.1% (United Kingdom)	112
Ischaemic heart disease	15.3%	7.3%	180.6% (Kenya)	1.3% (Ukraine)	139
Strokes	21.5%	26.5%	166.1% (Qatar)	2.5% (Bulgaria)	66

Table 6 lists the number of countries where fatalities from road crashes exceeded 100%, were between 60% and 100%, or were less than 3% of fatalities from each of these three leading causes of death. Of particular note is the fact that the number of fatalities from road crashes exceeded the number of fatalities from malignant neoplasms, ischaemic heart disease, and strokes in 2, 7, and 8 countries, respectively. The corresponding number of countries where this percentage was between 60% and 100% is 22, 13, and 22, respectively.

Table 6
Number of countries at the extremes of fatalities from road crashes as a percentage of fatalities from malignant neoplasms, ischaemic heart disease, and strokes.

Cause of death	Fatalities from road crashes		
	>100%	60% to 100%	<3%
Malignant neoplasms	2	22	30
Ischaemic heart disease	7	13	23
Strokes	8	22	2

How fatalities from road crashes can correspond to a high (or low) percentage of fatalities from another cause

For a country to have fatalities from road crashes corresponding to a high percentage of fatalities from another cause requires either a high fatality rate per population from road crashes, or a low fatality rate per population from the other cause, or both. The converse applies to a low percentage. (Because both of the rates are per population, these statements apply to the absolute numbers as well.)

Let us consider the following three examples.[2] In the first example, Oman and Qatar are the two countries where fatalities from road crashes represented the two highest percentages of fatalities from all causes. This is the case primarily because these two countries had low fatality rates per population from all causes (Oman the 5th lowest, and Qatar the lowest). (Their rank order in terms of the fatality rate per population from road crashes was only the 38th and 116th highest, respectively.) In the second example, all three of the SUN countries (Sweden, the United Kingdom, and the Netherlands) had very low fatalities from road crashes as a percentage of fatalities from all causes (the 1st, 2nd, and 7th lowest, respectively). This is primarily the case because all three countries had a low fatality rate per population from road crashes. Indeed, these countries had the 4th, 3rd, and 10th lowest rates, respectively. (Their rank order in terms of the fatality rate per population from all causes was only the 51st, 57th, and 63rd highest, respectively.) In the third example, fatalities from road crashes in the Netherlands represented the 4th lowest percentage of fatalities from malignant neoplasms. This was the case because the Netherlands had both a low fatality rate per population from road crashes (10th lowest) and a high fatality rate per population from malignant neoplasms (12th highest).

[2] The fatality rates per population in these examples are based on the raw data in WHO (2017).

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Appendix

Country	Fatalities from road crashes as % of fatalities from leading causes of death			
	All causes	Malignant neoplasms	Ischaemic heart disease	Strokes
WORLD	**2.4**	**15.4**	**15.3**	**21.5**
Afghanistan	1.9	27.8	16.4	27.1
Albania	1.8	7.7	7.2	8.5
Algeria	4.8	38.7	27.9	41.1
Angola	1.8	74.2	56.7	47.6
Antigua and Barbuda	1.9	9.7	13.0	23.9
Argentina	1.8	8.6	10.2	24.8
Armenia	1.6	5.9	5.2	13.7
Australia	0.8	2.9	5.6	12.3
Austria	0.6	2.3	2.5	9.5
Azerbaijan	1.5	9.9	3.9	11.1
Bahamas	1.7	10.0	12.2	23.0
Bahrain	3.0	26.5	14.0	53.5
Bangladesh	2.4	21.5	18.3	16.1
Barbados	0.5	2.3	4.3	4.7
Belarus	0.9	6.0	2.0	6.1
Belgium	0.7	2.7	5.3	11.2
Belize	3.7	34.4	34.8	54.5
Benin	3.1	80.2	47.3	47.7
Bhutan	2.4	29.2	14.5	32.8
Bolivia	3.5	32.4	31.8	45.2
Bosnia and Herzegovina	1.6	8.9	7.4	8.8
Botswana	3.0	47.7	41.4	46.4
Brazil	3.7	21.1	28.6	43.6
Brunei Darussalam	2.3	10.6	15.6	28.1
Bulgaria	0.5	3.0	1.6	2.5
Burkina Faso	3.5	77.1	56.2	94.3
Burundi	3.5	55.5	115.7	86.0
Cambodia	3.2	23.9	23.7	28.7
Cameroon	2.7	59.8	54.0	46.7
Canada	0.8	2.7	5.5	16.5
Cape Verde	4.0	45.5	26.2	22.7
Central African Republic	2.3	66.7	58.1	40.0
Chad	1.9	64.8	57.6	48.4
Chile	2.0	8.0	17.7	21.8
China	2.7	11.6	16.8	12.8
Colombia	3.7	19.5	22.1	56.2
Comoros	3.9	57.0	77.9	60.4
Congo	3.5	71.5	56.1	55.5
Costa Rica	3.1	13.4	19.1	46.5
Côte d'Ivoire	1.9	54.3	32.8	30.9
Croatia	0.7	2.8	2.7	5.2
Cuba	0.9	3.6	4.4	9.4
Cyprus	0.9	3.9	4.8	12.9
Czechia	0.6	2.5	2.0	7.0
Dem. Rep. of the Congo	3.5	66.9	107.4	76.4
Denmark	0.4	1.2	3.5	5.8
Djibouti	3.1	45.8	51.6	47.6
Dominican Republic	4.7	28.6	25.6	47.6

(continued)

Appendix (continued)

Country	Fatalities from road crashes as % of fatalities from leading causes of death			
	All causes	Malignant neoplasms	Ischaemic heart disease	Strokes
Ecuador	4.0	24.4	40.1	66.7
Egypt	2.1	15.9	9.6	21.5
El Salvador	2.9	18.1	18.4	62.7
Equatorial Guinea	2.0	44.8	36.1	40.0
Eritrea	4.1	49.8	75.8	56.7
Estonia	0.5	2.2	1.5	7.9
Ethiopia	3.8	54.6	57.8	68.6
Fiji	0.8	7.3	4.5	10.6
Finland	0.5	2.0	2.2	5.6
France	0.6	1.9	5.2	9.6
Gabon	2.8	53.2	36.3	34.3
Gambia	3.7	122.7	66.9	65.5
Georgia	0.9	6.4	2.9	4.5
Germany	0.4	1.5	1.9	6.0
Ghana	3.1	61.0	38.4	36.2
Greece	0.7	3.0	2.9	4.7
Grenada	0.8	4.2	5.1	8.1
Guatemala	3.7	37.4	39.2	79.0
Guinea	2.9	75.2	57.2	53.1
Guinea-Bissau	2.7	75.7	51.1	50.7
Guyana	1.9	23.8	10.8	16.6
Haiti	1.8	25.1	15.4	17.6
Honduras	3.7	25.1	24.2	49.8
Hungary	0.6	2.3	1.9	6.0
Iceland	0.6	2.1	2.7	8.4
India	2.9	36.0	19.2	40.1
Indonesia	2.2	18.6	15.3	12.0
Iran	6.1	38.4	24.8	52.3
Iraq	3.3	33.1	19.9	45.2
Ireland	0.6	2.1	3.6	9.9
Israel	0.6	2.2	5.2	10.5
Italy	0.5	1.9	3.1	5.3
Jamaica	1.5	7.9	13.6	11.3
Japan	0.5	1.5	3.9	4.6
Jordan	6.2	42.0	34.2	62.8
Kazakhstan	2.7	12.7	13.7	27.5
Kenya	4.4	44.9	180.6	117.2
Kiribati	0.4	3.8	3.9	2.9
Kuwait	7.2	74.5	25.3	77.2
Kyrgyzstan	3.2	29.9	8.9	23.8
Laos	2.2	19.4	17.7	23.9
Latvia	0.7	3.1	2.0	3.8
Lebanon	3.1	19.9	9.1	34.3
Lesotho	2.0	47.3	41.6	44.3
Liberia	4.1	89.0	81.0	80.1
Libya	5.0	40.5	21.4	46.5
Lithuania	0.9	4.3	2.3	6.4
Luxembourg	1.2	4.1	7.2	16.6
Macedonia	0.8	4.1	4.5	4.1

(continued)

Appendix (continued)

Country	Fatalities from road crashes as % of fatalities from leading causes of death			
	All causes	Malignant neoplasms	Ischaemic heart disease	Strokes
Madagascar	4.8	50.4	88.5	61.7
Malawi	3.8	42.7	98.3	115.8
Malaysia	4.5	28.2	22.1	43.3
Maldives	1.0	6.7	4.7	11.1
Mali	2.5	58.5	53.2	50.1
Malta	0.7	2.6	2.4	7.9
Mauritania	3.1	65.0	45.7	50.0
Mauritius	1.7	13.9	9.7	21.3
Mexico	2.4	19.5	15.8	44.0
Micronesia	0.3	2.9	2.0	3.2
Moldova	1.0	6.8	2.5	6.6
Mongolia	3.1	16.4	14.7	18.2
Montenegro	1.0	4.6	4.2	3.7
Morocco	3.3	25.4	18.5	29.7
Mozambique	3.2	40.9	98.6	70.0
Myanmar	2.4	19.7	34.7	17.3
Namibia	3.5	61.9	45.4	58.4
Nepal	2.6	29.5	16.1	31.8
Netherlands	0.4	1.3	3.2	6.1
New Zealand	0.9	3.1	4.8	10.8
Nicaragua	3.1	22.7	21.7	43.3
Niger	3.2	105.1	73.7	70.0
Nigeria	1.7	47.3	49.2	45.1
North Korea	2.2	12.6	17.1	10.6
Norway	0.4	1.5	2.8	6.1
Oman	9.4	99.0	47.6	138.3
Pakistan	2.0	24.2	10.2	24.8
Panama	2.1	12.2	15.5	25.7
Papua New Guinea	2.2	17.9	21.5	25.8
Paraguay	4.4	27.7	30.7	40.0
Peru	2.5	14.7	20.8	40.6
Philippines	1.6	15.7	8.8	12.3
Poland	0.9	3.8	3.4	8.1
Portugal	0.8	2.9	6.5	6.3
Qatar	8.6	49.8	54.2	166.1
Romania	0.7	3.4	2.0	3.9
Russian Federation	1.2	7.1	3.6	6.2
Rwanda	5.3	44.9	108.6	101.8
Saint Lucia	2.6	13.2	23.8	21.5
Saint Vincent and the Grenadines	1.8	9.3	11.0	17.2
Samoa	3.0	34.5	16.6	29.4
Sao Tome and Principe	5.3	57.5	86.5	69.0
Saudi Arabia	8.1	80.1	36.7	75.9
Senegal	4.6	74.6	66.9	60.5
Serbia	0.6	2.7	3.3	4.7
Seychelles	1.0	5.5	6.8	14.3
Sierra Leone	2.0	79.1	41.3	38.7
Singapore	0.8	2.5	4.2	11.5
Slovakia	0.9	3.2	3.2	9.3

(continued)

Appendix (continued)

Country	Fatalities from road crashes as % of fatalities from leading causes of death			
	All causes	Malignant neoplasms	Ischaemic heart disease	Strokes
Slovenia	0.7	2.1	3.3	6.7
Solomon Islands	3.5	32.8	26.5	33.1
Somalia	2.1	49.5	102.3	74.1
South Africa	2.2	19.5	28.6	35.3
South Korea	2.2	7.2	24.1	21.2
South Sudan	2.8	46.1	88.6	74.9
Spain	0.4	1.5	3.1	5.9
Sri Lanka	2.5	18.2	12.4	21.9
Sudan	3.3	58.4	22.8	36.3
Suriname	2.6	18.3	17.8	17.8
Swaziland	2.7	47.8	43.9	48.5
Sweden	0.3	1.2	1.6	4.4
Switzerland	0.5	1.7	2.6	8.1
Syria	2.5	25.9	13.8	33.0
Tajikistan	3.2	35.8	14.3	28.0
Tanzania	4.3	65.5	93.5	103.7
Thailand	3.9	22.8	34.1	38.9
Timor-Leste	2.5	24.5	25.3	30.2
Togo	3.6	74.5	59.4	57.7
Tonga	1.0	5.3	6.8	11.3
Trinidad and Tobago	1.4	9.4	7.5	15.7
Tunisia	3.5	32.0	21.8	23.9
Turkey	1.6	6.7	8.6	15.8
Turkmenistan	2.3	21.3	7.1	16.3
Uganda	3.7	42.9	126.7	87.9
Ukraine	0.6	4.4	1.3	4.2
United Arab Emirates	6.0	55.3	24.2	53.1
United Kingdom	0.3	1.1	2.4	4.9
United States of America	1.3	5.8	7.3	26.5
Uruguay	1.8	7.1	14.3	22.0
Uzbekistan	1.6	20.5	4.8	18.3
Vanuatu	3.2	28.2	19.8	27.2
Venezuela	7.5	46.6	41.3	98.4
Viet Nam	4.1	22.2	38.4	22.9
Yemen	3.8	64.2	19.2	34.0
Zambia	3.1	50.2	77.3	101.7
Zimbabwe	5.2	82.5	148.8	143.8