

# **COUNTRY RISK: THE 2026 EDITION!**

You can run, but you cannot hide!

# A CREATURE OF HABIT!

- I am a creature of habit in both my personal and professional lives, and in the context of the content that I post online, there is a ritual that I follow with my data updates that I stick with every year.
- I start the year with my [general data update online](#), and follow up with a series of posts where I examine the implications for investing and corporate finance.
- Since 2008, I have also done annual updates on equity risk premiums in March of each year, with [the link to the 2026 update here](#), and country risk in July of each year, where I look at the topics in more details, paying attention to newer research on each topic.
- This year's country risk update is [now available](#), and as in prior years, I will spend this post looking what causes risk to vary across countries, how to measure those risk variations and the implications for businesses and investors.

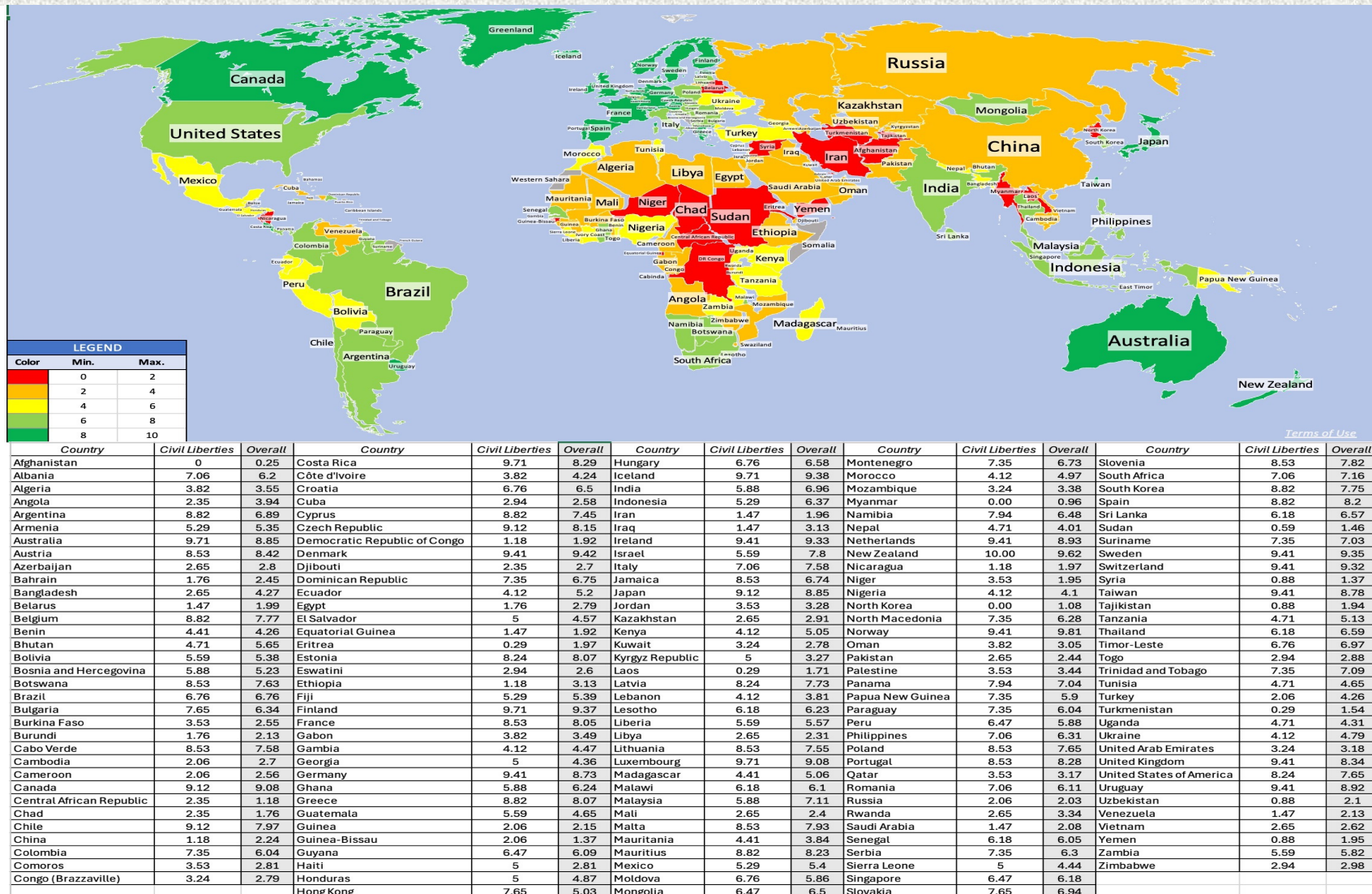
# THE RELEVANCE OF COUNTRY RISK

- **In my business school years, country risk was given short shrift**, reflecting a dollar-. For those who raised it as an issue, the response was that you could, as a company or investor with global exposure, diversify it away.
  - **For businesses**, the exposure to country risk comes from both the revenue side, as **larger portions of every company's revenues come from foreign markets**, and the cost side, as **production gets outsourced to cheaper locales overseas**.
  - **For investors**, the initial draw of investing in foreign markets might have been **diversification** but the **greater pull has come from greed, i.e., the belief that you can higher returns in the rest of the world**.
- At the risk of being hyperbolic, **there is no place to hide from country risk, for either businesses or investors**, and ignoring or dismissing country risk is not an option.

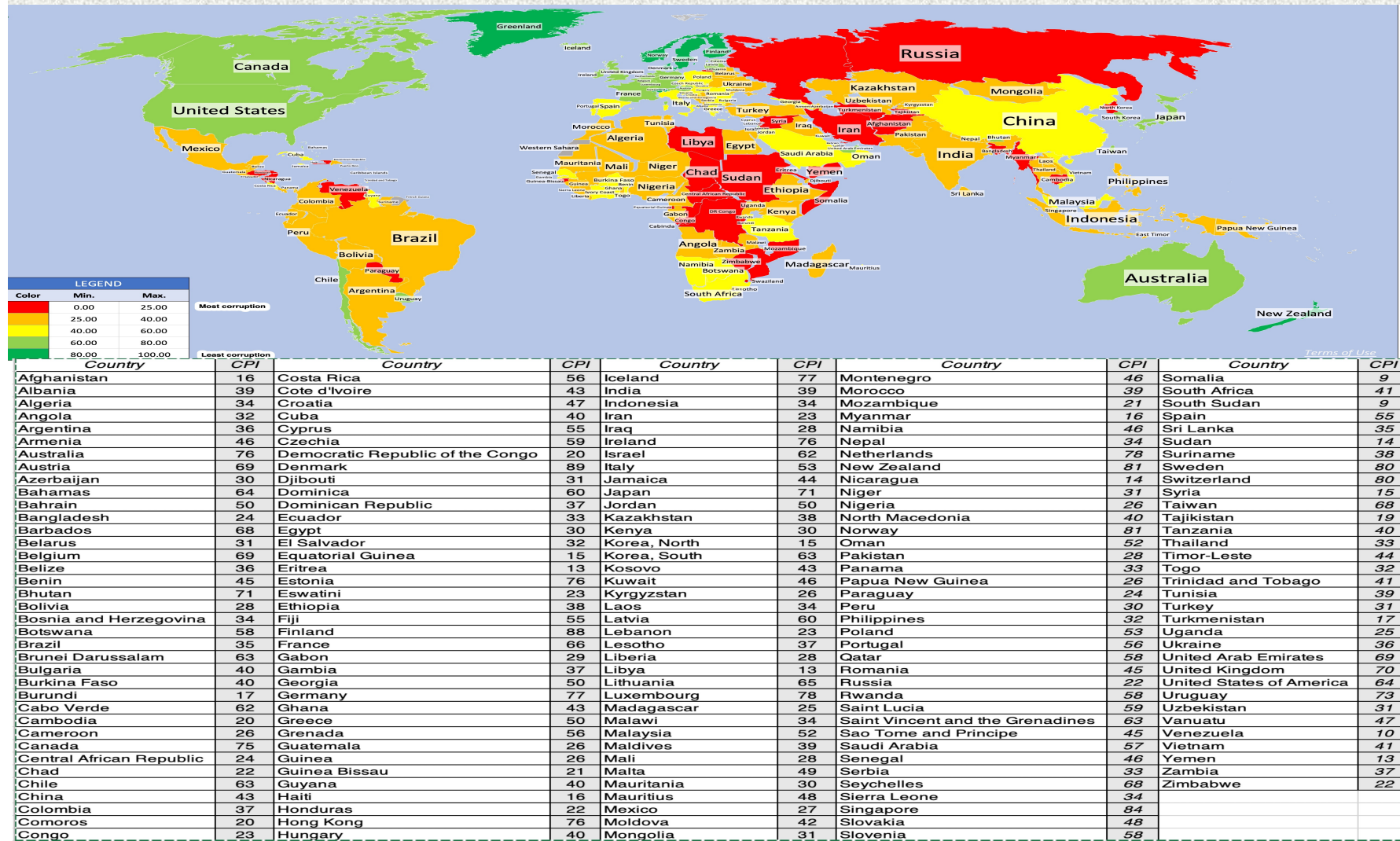
# COUNTRY RISK- DRIVERS

- I don't think that there would be much disagreement, if I assert that **it is riskier to invest in some parts of the world than others**, but there is likely to be plenty of disagreement on why there are risk differences and which parts of the world are riskiest.
- In the broadest sense, I have argued that variation in business risk across countries can be traced to four factors
  - the **political structure** of the country (democracy vs authoritarian),
  - the **prevalence of corruption** in the country (operating as a hidden tax and distorting business outcomes)
  - the **extent of violence** in the country (from internal and external forces)
  - the **strength of the legal system** in enforcing contractual obligations.

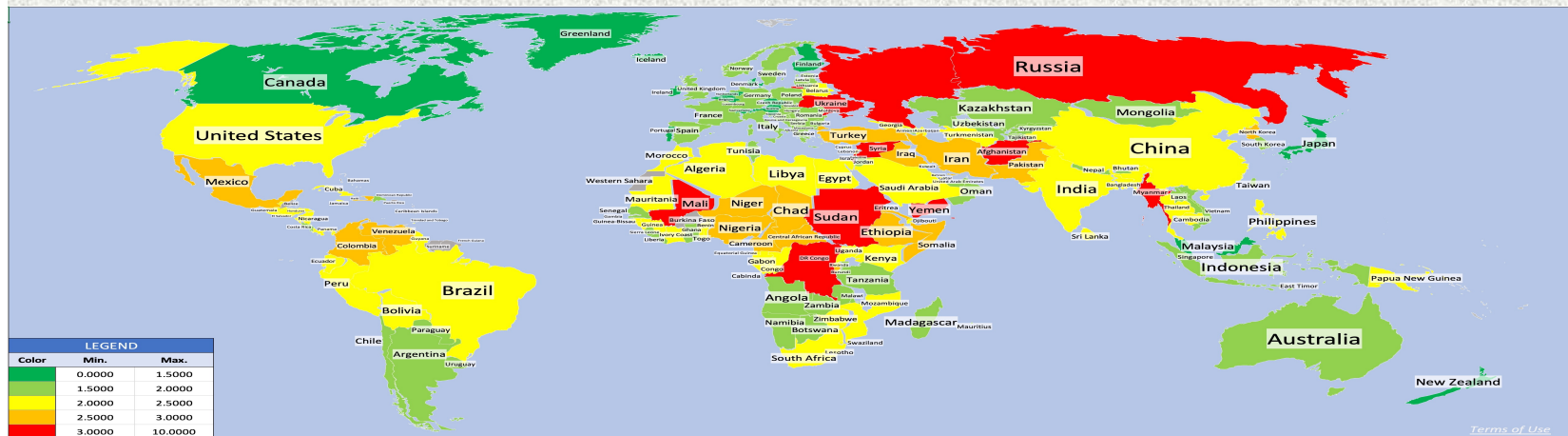
# 1. POLITICAL STRUCTURE



## 2. PREVALENCE OF CORRUPTION



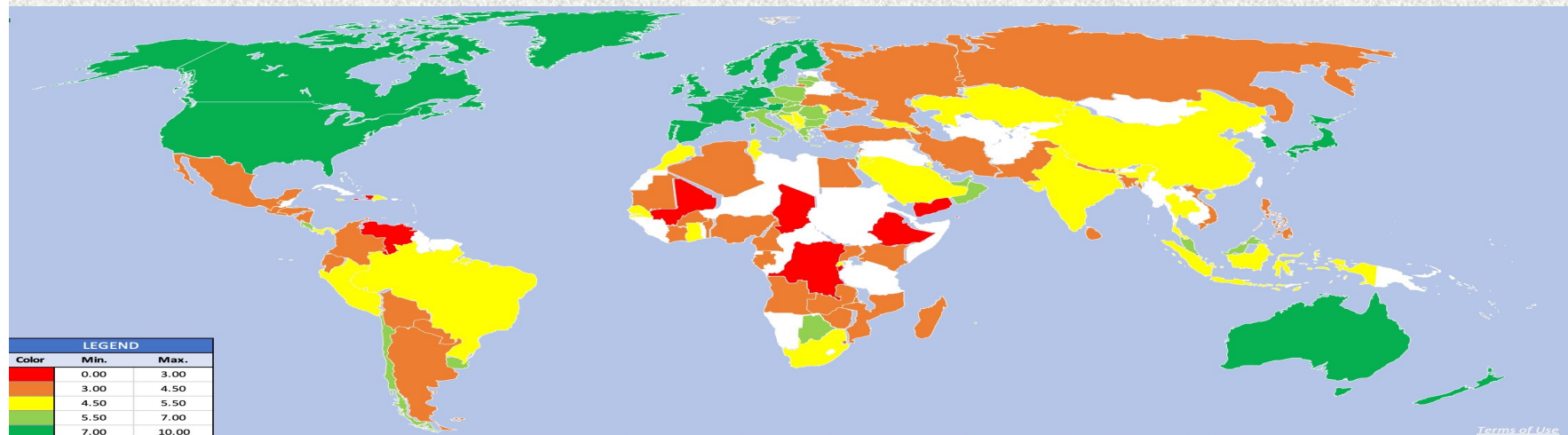
# 3. EXPOSURE TO VIOLENCE



| LEGEND |        |         |
|--------|--------|---------|
| Color  | Min.   | Max.    |
| Green  | 0.0000 | 1.5000  |
| Yellow | 1.5000 | 2.0000  |
| Orange | 2.0000 | 2.5000  |
| Red    | 2.5000 | 3.0000  |
|        | 3.0000 | 10.0000 |

| Country                  | Peace index | Country                      | Peace index | Country         | Peace index | Country               | Peace index | Country              | Peace index |
|--------------------------|-------------|------------------------------|-------------|-----------------|-------------|-----------------------|-------------|----------------------|-------------|
| Afghanistan              | 3.229       | Cuba                         | 2.123       | Iran            | 2.75        | Namibia               | 1.789       | South Africa         | 2.347       |
| Albania                  | 1.812       | Cyprus                       | 1.933       | Iraq            | 2.862       | Nepal                 | 1.987       | South Korea          | 1.736       |
| Algeria                  | 2.042       | Czechia                      | 1.435       | Ireland         | 1.26        | Netherlands           | 1.491       | South Sudan          | 3.117       |
| Angola                   | 1.987       | Democratic Republic of Congo | 3.292       | Israel          | 3.108       | New Zealand           | 1.282       | Spain                | 1.578       |
| Argentina                | 1.768       | Denmark                      | 1.393       | Italy           | 1.662       | Nicaragua             | 2.207       | Sri Lanka            | 2.075       |
| Armenia                  | 1.893       | Djibouti                     | 2.276       | Jamaica         | 2.047       | Niger                 | 2.759       | Sudan                | 3.323       |
| Australia                | 1.505       | Dominican Republic           | 1.996       | Japan           | 1.44        | Nigeria               | 2.869       | Sweden               | 1.709       |
| Austria                  | 1.294       | Ecuador                      | 2.459       | Jordan          | 1.957       | North Korea           | 2.911       | Switzerland          | 1.294       |
| Azerbaijan               | 2.067       | Egypt                        | 2.157       | Kazakhstan      | 1.875       | North Macedonia       | 1.799       | Syria                | 3.184       |
| Bahrain                  | 2.099       | El Salvador                  | 2.136       | Kenya           | 2.392       | Norway                | 1.644       | Taiwan               | 1.73        |
| Bangladesh               | 2.318       | Equatorial Guinea            | 2.004       | Kosovo          | 1.908       | Oman                  | 1.738       | Tajikistan           | 1.996       |
| Belarus                  | 2.267       | Eritrea                      | 2.542       | Kuwait          | 1.642       | Pakistan              | 2.797       | Tanzania             | 1.965       |
| Belgium                  | 1.492       | Estonia                      | 1.559       | Kyrgyz Republic | 1.988       | Palestine             | 2.811       | Thailand             | 2.017       |
| Benin                    | 2.211       | Eswatini                     | 2.094       | Laos            | 1.783       | Panama                | 2.006       | Timor-Leste          | 1.758       |
| Bhutan                   | 1.536       | Ethiopia                     | 2.688       | Latvia          | 1.558       | Papua New Guinea      | 2.23        | Togo                 | 2.381       |
| Bolivia                  | 2.005       | Finland                      | 1.42        | Lebanon         | 2.674       | Paraguay              | 1.981       | Trinidad & Tobago    | 2.02        |
| Bosnia & Herzegovina     | 1.895       | France                       | 1.967       | Lesotho         | 2.267       | Peru                  | 2.073       | Tunisia              | 1.998       |
| Botswana                 | 1.743       | Gabon                        | 2.238       | Liberia         | 1.939       | Philippines           | 2.148       | Turkiye              | 2.852       |
| Brazil                   | 2.472       | Gambia                       | 1.855       | Libya           | 2.478       | Poland                | 1.713       | Turkmenistan         | 2.019       |
| Bulgaria                 | 1.61        | Georgia                      | 2.185       | Lithuania       | 1.558       | Portugal              | 1.371       | Uganda               | 2.217       |
| Burkina Faso             | 3.016       | Germany                      | 1.533       | Madagascar      | 1.895       | Qatar                 | 1.593       | Ukraine              | 3.434       |
| Burundi                  | 2.574       | Ghana                        | 1.898       | Malawi          | 1.955       | Republic of the Congo | 2.132       | United Arab Emirates | 1.812       |
| Cambodia                 | 2.019       | Greece                       | 1.764       | Malaysia        | 1.469       | Romania               | 1.721       | United Kingdom       | 1.634       |
| Cameroon                 | 2.683       | Guatemala                    | 2.174       | Mali            | 3.061       | Russia                | 3.441       | United States        | 2.443       |
| Canada                   | 1.491       | Guinea                       | 2.253       | Mauritania      | 2.204       | Rwanda                | 2.036       | Uruguay              | 1.784       |
| Central African Republic | 2.912       | Guinea-Bissau                | 2.112       | Mauritius       | 1.586       | Saudi Arabia          | 2.035       | Uzbekistan           | 1.926       |
| Chad                     | 2.593       | Guyana                       | 2.149       | Mexico          | 2.636       | Senegal               | 1.936       | Venezuela            | 2.692       |
| Chile                    | 1.899       | Haiti                        | 2.731       | Moldova         | 1.918       | Serbia                | 1.914       | Vietnam              | 1.721       |
| China                    | 2.093       | Honduras                     | 2.347       | Mongolia        | 1.719       | Sierra Leone          | 1.887       | Yemen                | 3.262       |
| Colombia                 | 2.695       | Hungary                      | 1.5         | Montenegro      | 1.685       | Singapore             | 1.357       | Zambia               | 1.914       |
| Costa Rica               | 1.843       | Iceland                      | 1.095       | Morocco         | 2.012       | Slovakia              | 1.609       | Zimbabwe             | 2.223       |
| Côte d'Ivoire            | 2.066       | India                        | 2.229       | Mozambique      | 2.273       | Slovenia              | 1.409       |                      |             |
| Croatia                  | 1.519       | Indonesia                    | 1.786       | Myanmar         | 3.045       | Somalia               | 2.983       |                      |             |

# 4. LEGAL SYSTEM AND PROPERTY RIGHTS



| LEGEND |      |       |
|--------|------|-------|
| Color  | Min. | Max.  |
| Red    | 0.00 | 3.00  |
| Yellow | 3.00 | 4.50  |
| Orange | 4.50 | 5.50  |
| Green  | 5.50 | 7.00  |
|        | 7.00 | 10.00 |

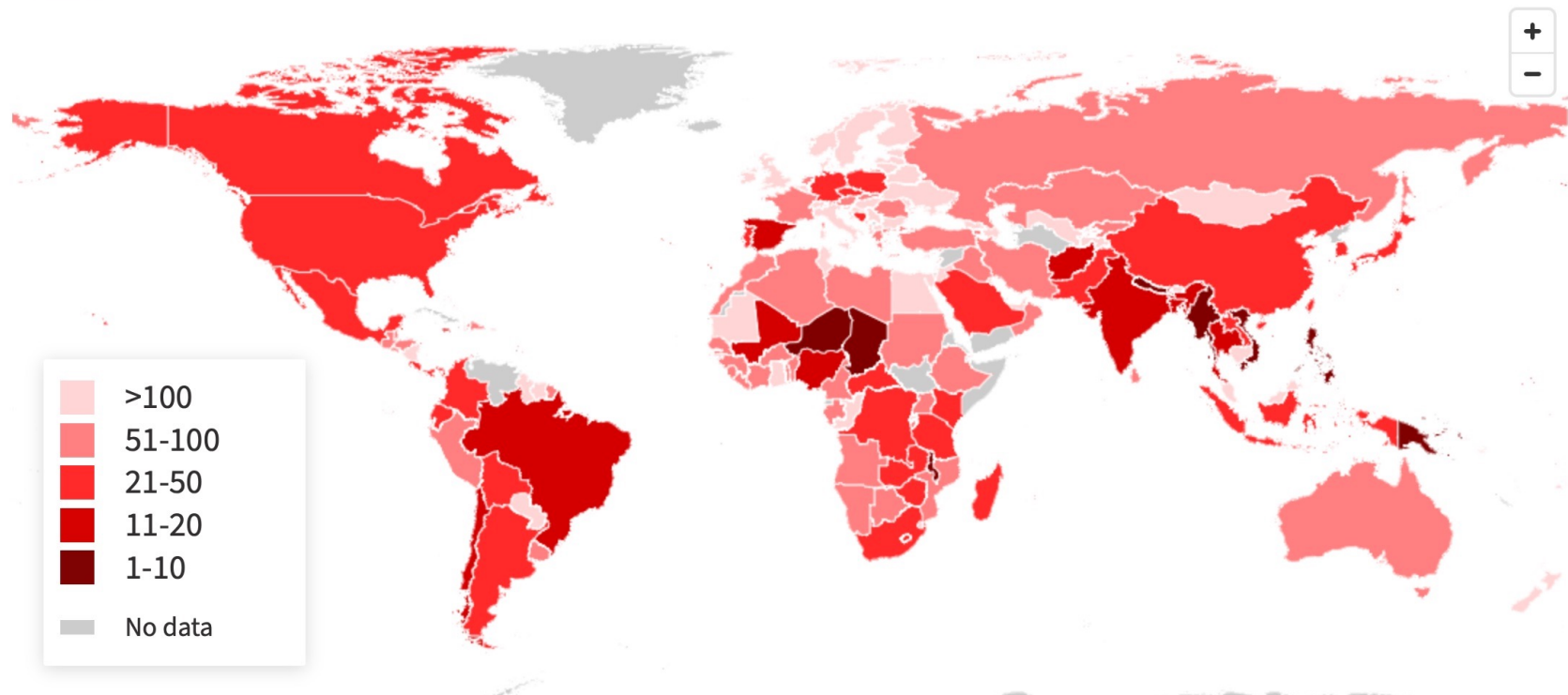
| Country                | IPRI  | Country            | IPRI  | Country         | IPRI  | Country                      | IPRI  |
|------------------------|-------|--------------------|-------|-----------------|-------|------------------------------|-------|
| Albania                | 4.723 | Denmark            | 7.775 | Lebanon         | 3.127 | Russia                       | 3.879 |
| Algeria                | 3.625 | Dominican Republic | 4.612 | Lithuania       | 6.601 | Rwanda                       | 4.89  |
| Angola                 | 3.385 | Ecuador            | 3.752 | Luxemburg       | 8.237 | Saudi Arabia                 | 5.074 |
| Argentina              | 4.263 | Egypt              | 3.793 | Madagascar      | 3.329 | Senegal                      | 4.517 |
| Armenia                | 5.124 | El Salvador        | 4.221 | Malawi          | 4.193 | Serbia                       | 4.917 |
| Australia              | 8.037 | Ethiopia           | 2.58  | Malaysia        | 5.942 | Singapore                    | 7.634 |
| Austria                | 7.741 | Finland            | 7.538 | Mali            | 2.859 | Slovakia                     | 6.315 |
| Azerbaijan             | 4.413 | France             | 7.626 | Malta           | 6.333 | Slovenia                     | 6.649 |
| Bahrain                | 4.601 | Gabon              | 3.357 | Mauritania      | 3.408 | South Africa                 | 4.915 |
| Bangladesh             | 3.231 | Georgia            | 5.367 | Mauritius       | 5.651 | Spain                        | 7.144 |
| Belgium                | 7.48  | Germany            | 7.711 | Mexico          | 4.326 | Sri Lanka                    | 4.471 |
| Benin                  | 3.94  | Ghana              | 4.823 | Moldova         | 4.755 | Swaziland                    | 4.22  |
| Bolivia                | 3.466 | Greece             | 5.939 | Montenegro      | 5.027 | Sweden                       | 7.561 |
| Bosnia and Herzegovina | 4.549 | Guatemala          | 4.161 | Morocco         | 5.063 | Switzerland                  | 8.008 |
| Botswana               | 5.528 | Haiti              | 2.133 | Mozambique      | 3.377 | Tanzania, United Republic Of | 4.122 |
| Brazil                 | 4.984 | Honduras           | 3.778 | Nepal           | 3.851 | Thailand                     | 4.79  |
| Brunei Darussalam      | 6.344 | Hungary            | 5.556 | Netherlands     | 7.408 | Trinidad And Tobago          | 4.843 |
| Bulgaria               | 6.185 | Iceland            | 7.523 | New Zealand     | 7.674 | Tunisia                      | 4.764 |
| Burkina Faso           | 3.392 | India              | 4.867 | Nicaragua       | 3.332 | Turkey                       | 4.053 |
| Burundi                | 2.792 | Indonesia          | 4.677 | Nigeria         | 3.028 | Uganda                       | 3.774 |
| Cameroon               | 3.16  | Iran               | 3.741 | North Macedonia | 4.985 | Ukraine                      | 3.504 |
| Canada                 | 7.756 | Ireland            | 7.594 | Norway          | 7.347 | United Arab Emirates         | 5.856 |
| Chad                   | 2.625 | Israel             | 6.562 | Oman            | 5.865 | United Kingdom               | 7.438 |
| Chile                  | 6.03  | Italy              | 6.952 | Pakistan        | 3.151 | United States of America     | 7.655 |
| China                  | 4.906 | Jamaica            | 5.336 | Panama          | 5.147 | Uruguay                      | 6.827 |
| Colombia               | 4.382 | Japan              | 7.909 | Paraguay        | 4.138 | Venezuela                    | 2.034 |
| Congo, Dem. Rep.       | 2.556 | Jordan             | 5.102 | Peru            | 4.566 | Vietnam                      | 4.306 |
| Costa Rica             | 6.111 | Kazakhstan         | 4.876 | Philippines     | 4.276 | Yemen, Rep.                  | 1.692 |
| Croatia                | 6.263 | Kenya              | 4.143 | Poland          | 5.977 | Zambia                       | 4.058 |
| Cyprus                 | 6.354 | Korea, Rep         | 7.215 | Portugal        | 7.102 | Zimbabwe                     | 3.236 |
| Czech Republic         | 6.984 | Kuwait             | 4.932 | Qatar           | 5.605 |                              |       |
| Côte d'Ivoire          | 3.945 | Latvia             | 6.428 | Romania         | 6.259 |                              |       |

# AND CLIMATE CHANGE?

## Climate Risk Index: Most Affected Countries

2024

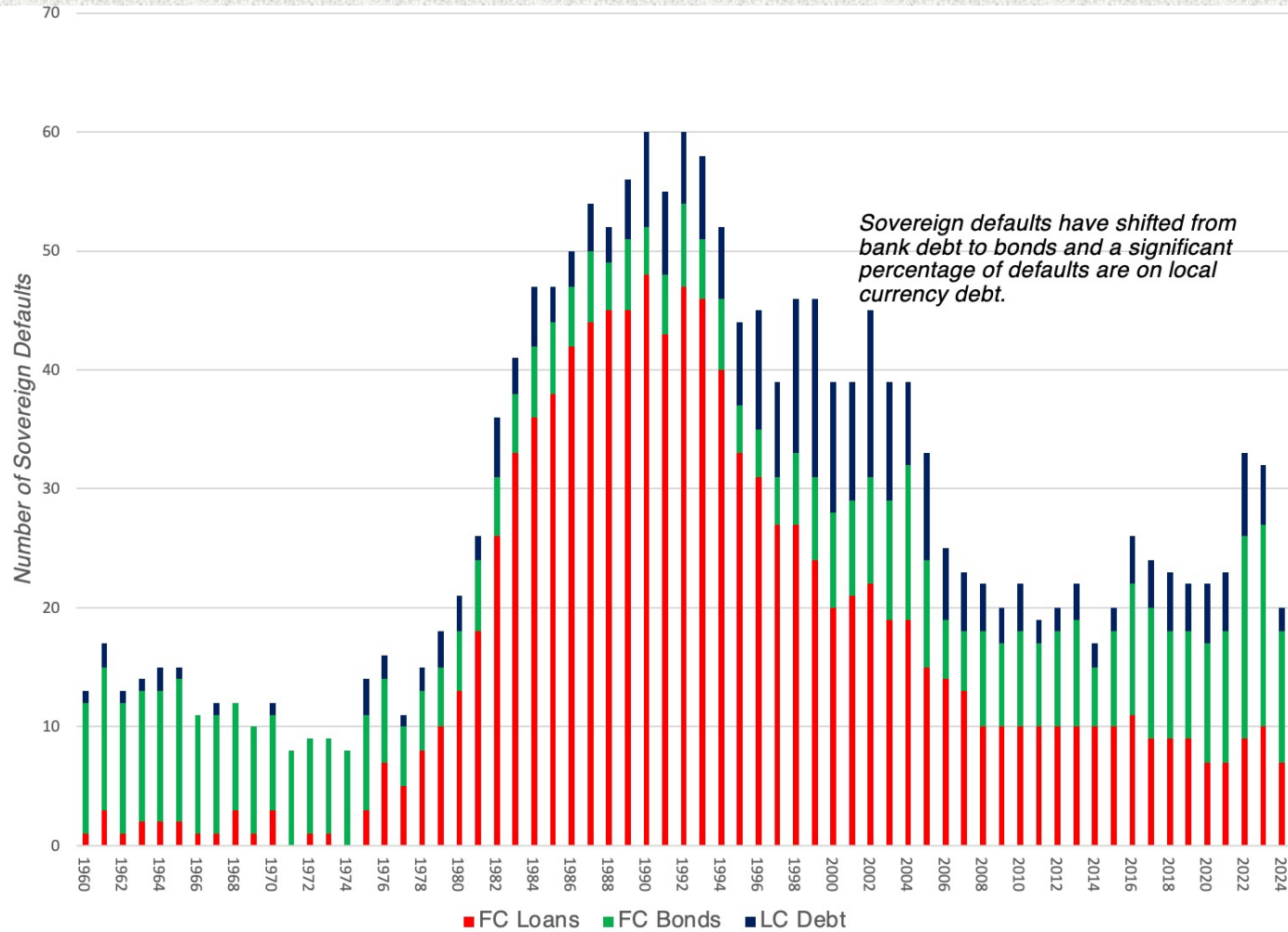
1995-2024



[Click here to use or share this map.](#)

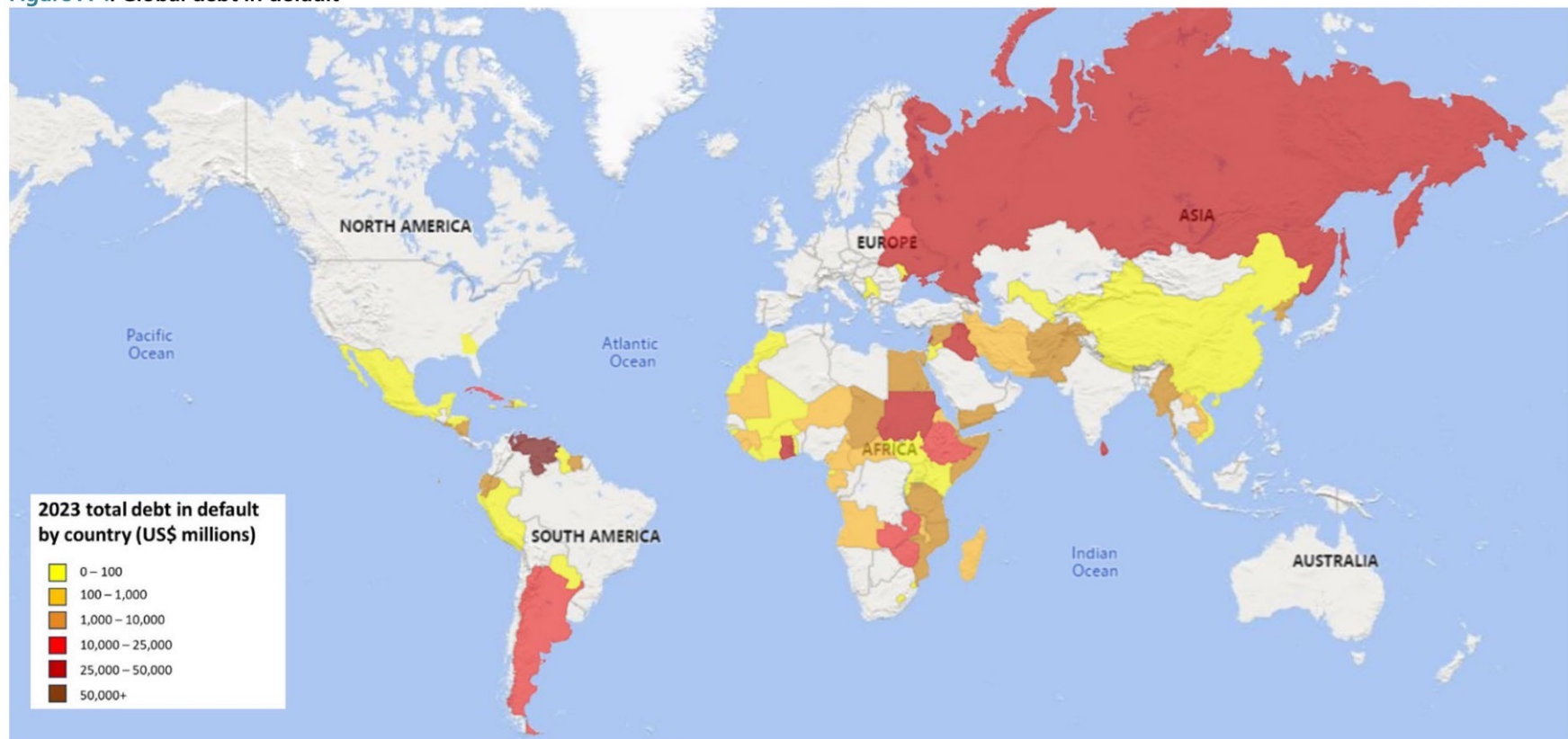
Source: Germanwatch 2025 | made with 23°

# I. SOVEREIGN DEFAULT RISK

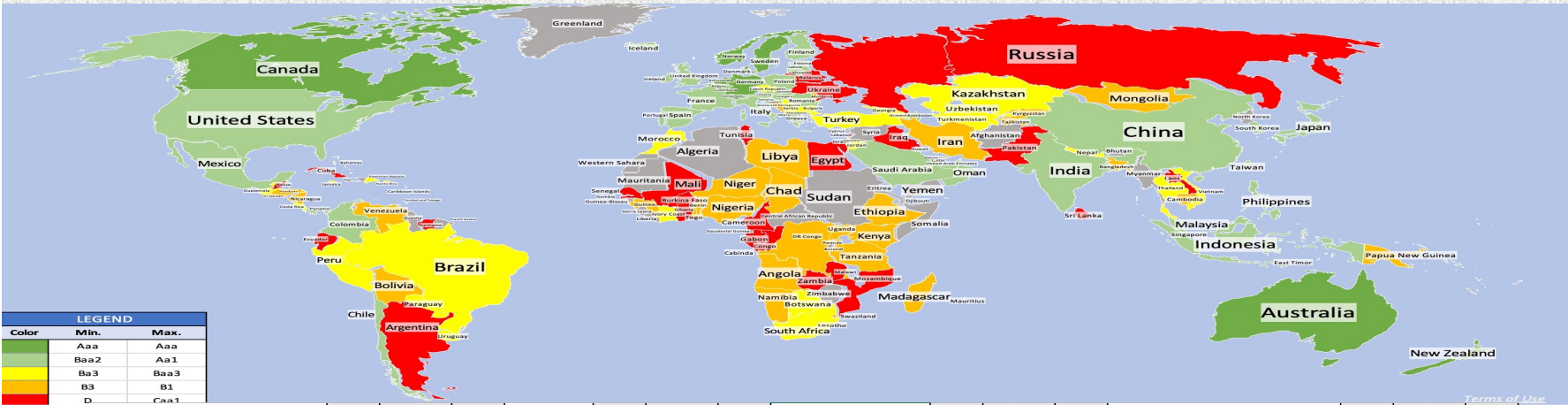


# ACROSS GEOGRAPHIES — END OF 2023

Figure A-1: Global debt in default

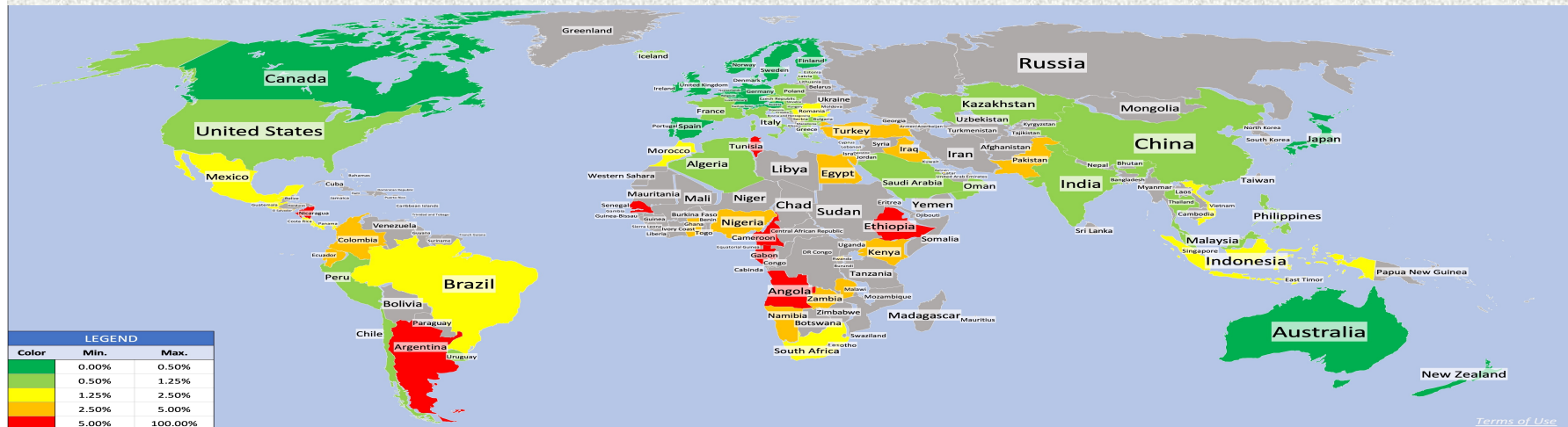


# MEASURING SOVEREIGN DEFAULT RISK - RATINGS



| Country                          | S&P  | Moody's | Fitch | Country     | S&P  | Moody's | Fitch | Country               | S&P  | Moody's | Fitch | Country                          | S&P  | Moody's | Fitch |
|----------------------------------|------|---------|-------|-------------|------|---------|-------|-----------------------|------|---------|-------|----------------------------------|------|---------|-------|
| Albania                          | BB   | Ba3     | NR    | Ecuador     | B-   | Caa1    | CCC+  | Libya                 | BB   | NR      | B     | Romania                          | BBB- | Baa3    | BBB-  |
| Andorra                          | A-   | Baa1    | A-    | Egypt       | B    | Caa1    | B     | Liechtenstein         | AAA  | NR      | NR    | Russia                           | CC   | Ca      | BBB-  |
| Angola                           | B-   | B3      | B-    | El Salvador | NR   | B3      | B     | Lithuania             | A+   | A2      | A+    | Rwanda                           | B+   | B2      | B+    |
| Argentina                        | B-   | Caa1    | B-    | Estonia     | AA-  | A1      | A+    | Luxembourg            | AAA  | Aaa     | AAA   | Saint Vincent and the Grenadines |      | B3      | NR    |
| Armenia                          | BB-  | Ba3     | BB-   | Ethiopia    | CCC  | Caa3    | RD    | Macao                 | NR   | Aa3     | AA    | San Marino                       | A-   | NR      | BBB   |
| Aruba                            | A-   | Baa3    | BBB   | Fiji        | BB-  | B1      | NR    | Madagascar            | B-   | NR      | NR    | Saudi Arabia                     | A+   | Aa3     | A+    |
| Australia                        | AA+  | Aa1     | AA    | Finland     | AA+  | Aa1     | AA    | Malawi                | NR   | NR      | NR    | Senegal                          | CCC+ | Caa1    | NR    |
| Austria                          | AA+  | Aa1     | AA    | France      | A+   | Aa3     | A+    | Malaysia              | A-   | A3      | BBB+  | Serbia                           | BBB- | Ba2     | BB+   |
| Azerbaijan                       | BB+  | Baa3    | BBB-  | Gabon       | B    | Caa2    | CCC-  | Maldives              | NR   | Caa2    | CCC-  | Seychelles                       | NR   | NR      | BB    |
| Bahamas                          | BB-  | Ba3     | BB-   | Gambia      | NR   | NR      | CCC   | Mali                  | B    | Caa2    | B-    | Singapore                        | Aaa  | Aaa     | AAA   |
| Bahrain                          | B    | B2      | B     | Georgia     | BB   | Ba2     | BB    | Malta                 | A-   | A2      | A+    | Slovakia                         | A    | A3      | A-    |
| Bangladesh                       | BB-  | B2      | B+    | Germany     | AAA  | Aaa     | AAA   | Mauritius             | BBB- | Baa3    | NR    | Slovenia                         | AA   | A2      | A+    |
| Barbados                         | B+   | C       | B+    | Ghana       | B-   | Caa1    | B     | Mexico                | BBB  | Baa3    | BBB-  | Solomon Islands                  | NR   | Caa1    | NR    |
| Belarus                          | CCC  | C       | CCC   | Greece      | BBB  | Baa3    | BBB   | Moldova               | B2   | B2      | B+    | South Africa                     | BB   | Ba2     | BB    |
| Belgium                          | AA+  | A1      | A+    | Grenada     | BB   | NR      | NR    | Mongolia              | BB-  | B1      | B+    | South Korea                      | AA   | Aa2     | AA-   |
| Belize                           | B-   | Caa1    | NR    | Guatemala   | BB+  | Ba1     | BB+   | Montenegro            | B+   | Ba3     | NR    | Spain                            | A+   | A3      | A+    |
| Benin                            | BB-  | B1      | B+    | Guinea      | B+   | NR      | NR    | Montserrat            | BBB- | NR      | NR    | Sri Lanka                        | CCC+ | Caa1    | CCC+  |
| Bermuda                          | A+   | A1      | NR    | Honduras    | BB-  | B1      | B     | Morocco               | BBB- | Ba1     | BB+   | Suriname                         | CCC+ | Caa1    | C     |
| Bolivia                          | CCC+ | Caa3    | CCC+  | Hong Kong   | AA+  | Aa3     | AA-   | Mozambique            | CCC+ | Caa2    | CC    | Swaziland                        | NR   | B2      | NR    |
| Bosnia and Herzegovina           | B    | B3      | NR    | Hungary     | BBB- | Baa2    | BBB   | Namibia               | NR   | B1      | BB-   | Sweden                           | AAA  | Aaa     | AAA   |
| Botswana                         | BBB- | Baa1    | NR    | Iceland     | A+   | A1      | A     | Nepal                 | NR   | NR      | NR    | Switzerland                      | AAA  | Aaa     | AAA   |
| Brazil                           | BB   | Ba1     | BB    | Ireland     | BBB  | Baa2    | BBB-  | Netherlands           | AAA  | Aaa     | AAA   | Taiwan                           | AA-  | Aa3     | A+    |
| Bulgaria                         | BBB+ | Baa1    | BBB+  | Indonesia   | BBB  | Baa2    | BBB   | New Zealand           | AA+  | Aaa     | AA+   | Tajikistan                       | B    | B2      | NR    |
| Burkina Faso                     | CCC+ | NR      | NR    | Iran        | NR   | B2      | B+    | Nicaragua             | B-   | B2      | B     | Tanzania                         | NR   | B1      | B+    |
| Cambodia                         | B    | B2      | NR    | Iraq        | B-   | Caa1    | B-    | Niger                 | NR   | Caa3    | NR    | Thailand                         | BBB+ | Baa1    | BBB+  |
| Cameroon                         | B-   | Caa1    | B     | Israel      | AA+  | Aa3     | AA    | Nigeria               | B    | B3      | B     | Togo                             | B+   | B3      | NR    |
| Canada                           | AAA  | Aaa     | AA+   | Israel      | A    | Baa1    | A     | North Macedonia       | BB-  | NR      | BB+   | Trinidad and Tobago              | BBB- | Ba2     | NR    |
| Cape Verde                       | B+   | NR      | B     | Italy       | BBB+ | Baa2    | BBB+  | Norway                | AAA  | Aaa     | AAA   | Tunisia                          | NR   | Caa1    | B-    |
| Chad                             | NR   | NR      | B-    | Ivory Coast | BB   | Ba2     | BB    | Oman                  | BB+  | Baa3    | BBB-  | Turkey                           | B    | B3      | BB    |
| Chile                            | A    | A2      | A     | Jamaica     | BB   | Ba3     | BB-   | Pakistan              | B-   | Caa1    | B     | Turkmenistan                     | NR   | NR      | BB-   |
| China                            | A+   | A1      | A     | Japan       | A+   | A1      | A     | Panama                | BBB- | Baa3    | BB+   | Uganda                           | B-   | B3      | B     |
| Colombia                         | BB   | Baa3    | BB    | Jordan      | BB-  | Ba3     | BB-   | Papua New Guinea      | B-   | B2      | B+    | Ukraine                          | CCC+ | Ca      | CCC   |
| Costa Rica                       | BB   | Ba3     | BB    | Kazakhstan  | BBB- | Baa1    | BBB   | Paraguay              | BBB- | Ba1     | BB+   | United Arab Emirates             | AA   | Aa2     | AA-   |
| Croatia                          | A    | A3      | A-    | Kenya       | B    | B3      | B-    | Peru                  | BBB- | Baa1    | BBB   | United Kingdom                   | AA-  | Aa3     | AA-   |
| Cuba                             | NR   | Ca      | NR    | Kuwait      | AA-  | A1      | AA-   | Philippines           | BBB+ | Baa2    | BBB   | Uruguay                          | BBB+ | Baa1    | BBB   |
| Cyprus                           | A-   | A3      | A-    | Kyrgyzstan  | B+   | B3      | B     | Poland                | A-   | A2      | A     | USA                              | AA+  | AA1     | AA+   |
| Czechia                          | AA-  | Aa3     | AA    | Latvia      | CCC+ | Caa2    | CCC+  | Portugal              | B3   | A3      | A     | Uzbekistan                       | CCC+ | Ba2     | BB    |
| Democratic Republic of the Congo | B-   | B3      | NR    | Latvia      | A-   | A3      | A     | Puerto Rico           | NR   | Ba1     | NR    | Venezuela                        | CCC- | WR      | WD    |
| Denmark                          | AAA  | Aaa     | AAA   | Lebanon     | SD   | C       | RD    | Qatar                 | AA   | Aa2     | AA    | Vietnam                          | BB   | Ba2     | BB+   |
| Dominican Republic               | BB   | Ba2     | BB-   | Lesotho     | NR   | NR      | B     | Republic of the Congo | CCC+ | Caa2    | CCC+  | Zambia                           | CCC+ | Caa2    | B-    |

# SOVEREIGN CDS SPREADS



| Country        | Sovr CDS | Net of Swiss | Country     | Sovr CDS | Net of Swiss | Country     | Sovr CDS | Net of Swiss | Country        | Sovr CDS | Net of Swiss |
|----------------|----------|--------------|-------------|----------|--------------|-------------|----------|--------------|----------------|----------|--------------|
| Abu Dhabi      | 0.65%    | 0.52%        | El Salvador | 3.49%    | 3.36%        | Kuwait      | 0.90%    | 0.77%        | Russia         | NA       | NA           |
| Algeria        | 1.21%    | 1.08%        | Estonia     | 0.77%    | 0.64%        | Latvia      | 0.84%    | 0.71%        | Rwanda         | 2.96%    | 2.83%        |
| Angola         | 5.03%    | 4.90%        | Ethiopia    | 33.19%   | 33.06%       | Lebanon     | NA       | NA           | Saudi Arabia   | 0.97%    | 0.84%        |
| Argentina      | 5.22%    | 5.09%        | Finland     | 0.24%    | 0.11%        | Lithuania   | 0.83%    | 0.70%        | Senegal        | 10.05%   | 9.92%        |
| Australia      | 0.20%    | 0.07%        | France      | 0.59%    | 0.46%        | Malaysia    | 0.68%    | 0.55%        | Serbia         | 1.99%    | 1.86%        |
| Austria        | 0.28%    | 0.15%        | Gabon       | 7.44%    | 7.31%        | Mexico      | 1.59%    | 1.46%        | Slovakia       | 0.64%    | 0.51%        |
| Bahrain        | 2.99%    | 2.86%        | Ghana       | 3.70%    | 3.57%        | Mongolia    |          | -0.13%       | Slovenia       | 0.79%    | 0.66%        |
| Belgium        | 0.40%    | 0.27%        | Germany     | 0.19%    | 0.06%        | Morocco     | 1.29%    | 1.16%        | South Africa   | 2.20%    | 2.07%        |
| Brazil         | 2.21%    | 2.08%        | Greece      | 0.63%    | 0.50%        | Namibia     | 3.32%    | 3.19%        | Spain          | 0.36%    | 0.23%        |
| Bulgaria       | 0.78%    | 0.65%        | Guatemala   | 1.66%    | 1.53%        | Netherlands | 0.20%    | 0.07%        | Sri Lanka      | NA       | NA           |
| Cameroon       | 5.85%    | 5.72%        | Hong Kong   | 0.38%    | 0.25%        | New Zealand | 0.26%    | 0.13%        | Sweden         | 0.18%    | 0.05%        |
| Canada         | 0.29%    | 0.16%        | Hungary     | 1.20%    | 1.07%        | Nicaragua   | 5.30%    | 5.17%        | Switzerland    | 0.13%    | 0.00%        |
| Chile          | 0.80%    | 0.67%        | Iceland     | 0.59%    | 0.46%        | Nigeria     | 3.39%    | 3.26%        | Thailand       | 0.67%    | 0.54%        |
| China          | 0.52%    | 0.39%        | India       | 0.85%    | 0.72%        | Norway      | 0.15%    | 0.02%        | Tunisia        | 7.07%    | 6.94%        |
| Colombia       | 2.51%    | 2.38%        | Indonesia   | 1.43%    | 1.30%        | Oman        | 1.22%    | 1.09%        | Turkey         | 2.83%    | 2.70%        |
| Costa Rica     | 1.83%    | 1.70%        | Iraq        | 3.86%    | 3.73%        | Pakistan    | 4.87%    | 4.74%        | Ukraine        | NA       | NA           |
| Croatia        | 0.91%    | 0.78%        | Ireland     | 0.31%    | 0.18%        | Panama      | 1.65%    | 1.52%        | United Kingdom | 0.38%    | 0.25%        |
| Cyprus         | 0.62%    | 0.49%        | Israel      | 0.99%    | 0.86%        | Peru        | 1.13%    | 1.00%        | United States  | 0.56%    | 0.43%        |
| Czech Republic | 0.53%    | 0.40%        | Italy       | 0.61%    | 0.48%        | Philippines | 1.02%    | 0.89%        | Uruguay        | 0.79%    | 0.66%        |
| Denmark        | 0.19%    | 0.06%        | Japan       | 0.49%    | 0.36%        | Poland      | 0.94%    | 0.81%        | Venezuela      | NA       | NA           |
| Dubai          | 0.99%    | 0.86%        | Kazakhstan  | 1.22%    | 1.09%        | Portugal    | 0.37%    | 0.24%        | Vietnam        | 1.39%    | 1.26%        |
| Ecuador        | 4.62%    | 4.49%        | Kenya       | 4.21%    | 4.08%        | Qatar       | 0.58%    | 0.45%        | Zambia         | 3.03%    | 2.90%        |
| Egypt          | 3.55%    | 3.42%        | Korea       | 0.42%    | 0.29%        | Romania     | 2.25%    | 2.12%        |                |          |              |

## II. COMPOSITE COUNTRY RISK SCORES

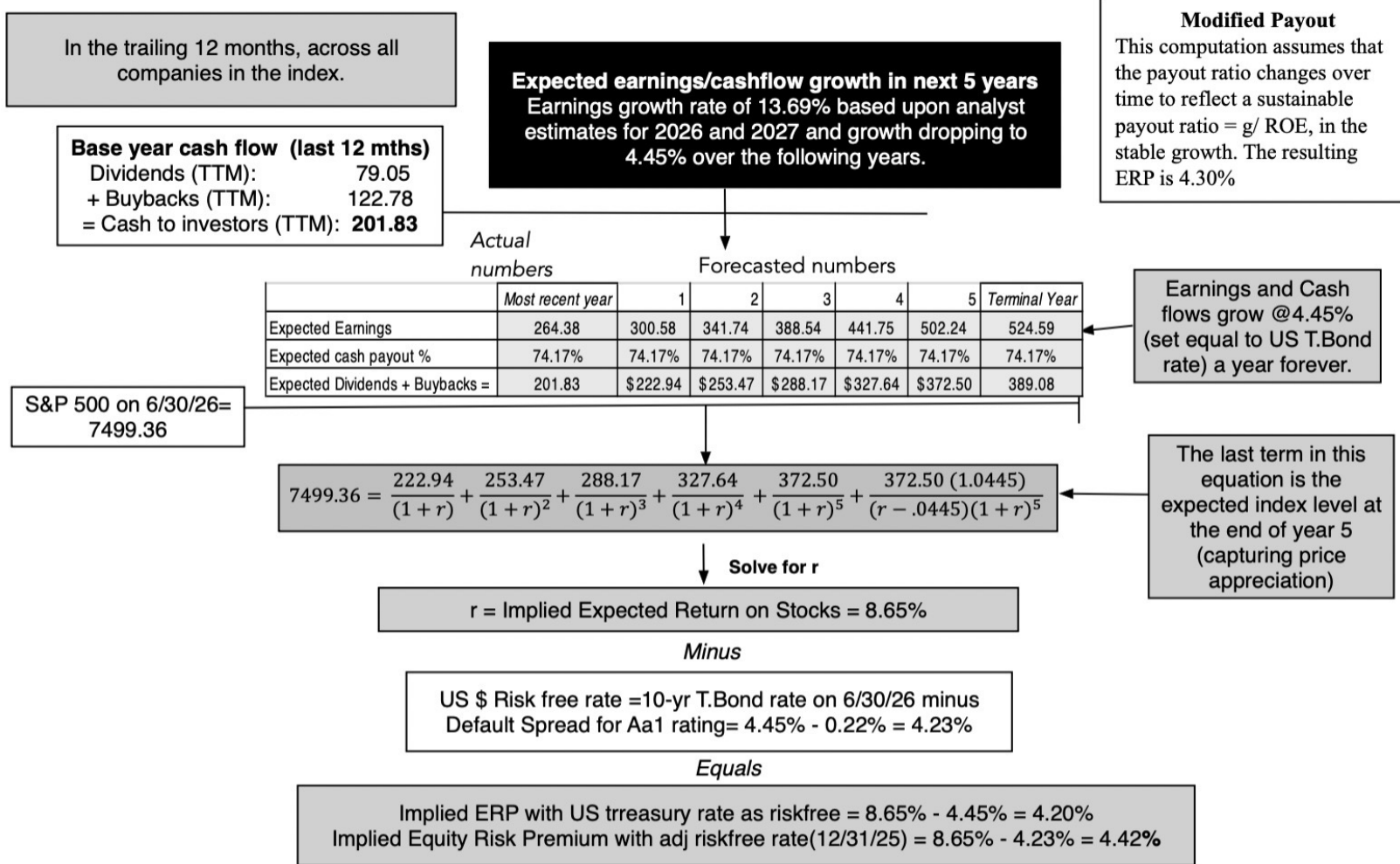
| Country                     | Economist | PRS  | Country            | Economist | PRS  | Country    | Economist | PRS  | Country          | Economist | PRS  | Country          | Economist | PRS  | Country                  | Economist | PRS  |
|-----------------------------|-----------|------|--------------------|-----------|------|------------|-----------|------|------------------|-----------|------|------------------|-----------|------|--------------------------|-----------|------|
| Albania                     | 48        | 72.8 | Croatia            | 40        | 72.8 | Indonesia  | 40        | 67.0 | Myanmar          | 60        | 55.0 | Myanmar          | 60        | 55.0 | Somalia                  | NA        | 55.3 |
| Algeria                     | 50        | 66.3 | Cuba               | 83        | 49.5 | Iran       | 50        | 58.8 | Namibia          | 60        | 70.3 | Namibia          | 60        | 70.3 | South Africa             | 45        | 68.3 |
| Angola                      | 63        | 63.8 | Cyprus             | 50        | 74.3 | Iraq       | 68        | 58.0 | Netherlands      | 15        | 81.8 | Netherlands      | 15        | 81.8 | South Korea              | 25        | 80.0 |
| Argentina                   | 63        | 71.5 | Czech Republic     | 38        | 79.0 | Ireland    | 33        | 84.8 | New Zealand      | 35        | 78.3 | New Zealand      | 35        | 78.3 | Spain                    | 30        | 74.8 |
| Armenia                     | NA        | 67.0 | Denmark            | 13        | 86.5 | Israel     | 25        | 72.0 | Nicaragua        | 65        | 69.0 | Nicaragua        | 65        | 69.0 | Sri Lanka                | 58        | 65.8 |
| Australia                   | 28        | 77.5 | Dominican Republic | 43        | 73.5 | Italy      | 35        | 76.5 | Niger            | NA        | 58.8 | Niger            | NA        | 58.8 | Sudan                    | 85        | 46.0 |
| Austria                     | 18        | 77.5 | Ecuador            | 58        | 68.0 | Jamaica    | 65        | 76.5 | Nigeria          | 58        | 63.8 | Nigeria          | 58        | 63.8 | Suriname                 | NA        | 68.3 |
| Azerbaijan                  | 50        | 75.5 | Egypt              | 55        | 61.5 | Japan      | 28        | 79.0 | North Korea      | NA        | 52.5 | North Korea      | NA        | 52.5 | Sweden                   | 8         | 79.8 |
| Bahamas                     | NA        | 76.8 | El Salvador        | 63        | 72.5 | Jordan     | 53        | 64.3 | North Macedonia  | 53        | NA   | North Macedonia  | 53        | NA   | Switzerland              | 13        | 88.0 |
| Bahrain                     | 48        | 66.8 | Equatorial Guinea  | 70        | NA   | Kazakhstan | 53        | 75.5 | Norway           | 20        | 86.8 | Norway           | 20        | 86.8 | Syria                    | 80        | 58.0 |
| Bangladesh                  | 58        | 64.3 | Estonia            | 25        | 70.5 | Kenya      | 61        | 63.3 | Oman             | 40        | 75.8 | Oman             | 40        | 75.8 | Taiwan                   | 30        | 85.5 |
| Belarus                     | 63        | 65.5 | Ethiopia           | 75        | 58.5 | Kuwait     | 38        | 79.0 | Pakistan         | 55        | 58.0 | Pakistan         | 55        | 58.0 | Tanzania                 | 55        | 66.5 |
| Belgium                     | 25        | 74.8 | Fiji               | 53        | NA   | Laos       | 63        | NA   | Panama           | 48        | 71.5 | Panama           | 48        | 71.5 | Thailand                 | 43        | 68.8 |
| Bolivia                     | 58        | 58.8 | Finland            | 23        | 77.8 | Latvia     | 30        | 72.0 | Papua New Guinea | 55        | 68.3 | Papua New Guinea | 55        | 68.3 | Togo                     | NA        | 60.5 |
| Bosnia and Herzegovina      | 48        | NA   | France             | 25        | 73.5 | Lebanon    | 85        | 45.3 | Paraguay         | 58        | 70.3 | Paraguay         | 58        | 70.3 | Trinidad and Tobago      | 63        | 73.5 |
| Botswana                    | 48        | 72.5 | Gabon              | 63        | 69.3 | Liberia    | NA        | 57.8 | Peru             | 40        | 68.8 | Peru             | 40        | 68.8 | Tunisia                  | 68        | 60.5 |
| Brazil                      | 45        | 70.5 | Gambia             | NA        | 67.0 | Libya      | 73        | 68.0 | Philippines      | 58        | 68.8 | Philippines      | 58        | 68.8 | Turkey                   | 40        | 62.5 |
| Brunei                      | NA        | 80.8 | Germany            | 15        | 80.0 | Lithuania  | 20        | 74.3 | Poland           | 33        | 74.3 | Poland           | 33        | 74.3 | Turkmenistan             | 50        | NA   |
| Bulgaria                    | 25        | 72.3 | Ghana              | 60        | 70.0 | Luxembourg | 18        | 84.0 | Portugal         | 33        | 79.3 | Portugal         | 33        | 79.3 | Uganda                   | 55        | 63.0 |
| Burkina Faso                | NA        | 61.5 | Greece             | 63        | 69.5 | Madagascar | 65        | 61.0 | Qatar            | 45        | 70.5 | Qatar            | 45        | 70.5 | Ukraine                  | 80        | 58.0 |
| Cambodia                    | 65        | NA   | Guatemala          | 43        | 72.3 | Malawi     | 80        | 54.3 | Romania          | 43        | 64.5 | Romania          | 43        | 64.5 | United Arab Emirates     | 45        | 79.5 |
| Cameroon                    | 68        | 59.3 | Guinea             | NA        | 59.5 | Malaysia   | 35        | 74.5 | Russia           | 48        | 70.5 | Russia           | 48        | 70.5 | United Kingdom           | 28        | 75.3 |
| Canada                      | 25        | 80.8 | Guinea-Bissau      | NA        | 60.8 | Mali       | NA        | 59.8 | Saudi Arabia     | 40        | 78.5 | Saudi Arabia     | 40        | 78.5 | United States of America | 25        | 69.3 |
| Chile                       | 48        | 74.0 | Guyana             | NA        | 76.0 | Malta      | 20        | 77.5 | Senegal          | 68        | 59.3 | Senegal          | 68        | 59.3 | Uruguay                  | 48        | 76.3 |
| China                       | 28        | 70.8 | Haiti              | NA        | 55.8 | Mauritius  | 53        | NA   | Serbia           | 50        | 67.3 | Serbia           | 50        | 67.3 | Uzbekistan               | 65        | 75.5 |
| Colombia                    | 53        | 64.0 | Honduras           | 58        | 66.5 | Mexico     | 35        | 68.5 | Seychelles       | 65        | NA   | Seychelles       | 65        | NA   | Venezuela                | 88        | 55.3 |
| Congo (Brazzaville)         | 73        | 63.3 | Hong Kong          | 38        | 80.5 | Moldova    | 50        | 63.8 | Sierra Leone     | 75        | 62.5 | Sierra Leone     | 75        | 62.5 | Vietnam                  | 43        | 72.8 |
| Congo (Democratic Republic) | 70        | 56.8 | Hungary            | 45        | 73.5 | Mongolia   | 73        | 71.0 | Singapore        | 28        | 87.0 | Singapore        | 28        | 87.0 | Yemen                    | 85        | 50.8 |
| Costa Rica                  | 45        | 75.5 | Iceland            | 50        | 83.5 | Morocco    | 43        | 72.3 | Slovakia         | 38        | 67.5 | Slovakia         | 38        | 67.5 | Zambia                   | 70        | 65.5 |
| Côte d'Ivoire               | 70        | 65.8 | India              | 35        | 70.3 | Mozambique | 83        | 50.3 | Slovenia         | 28        | 76.0 | Slovenia         | 28        | 76.0 | Zimbabwe                 | 70        | 66.0 |

*The Economist: Low (high) scores indicate less (more) country risk*  
*PRS: High (low) scores indicate less (more) country risk*

### III. COUNTRY EQUITY RISK

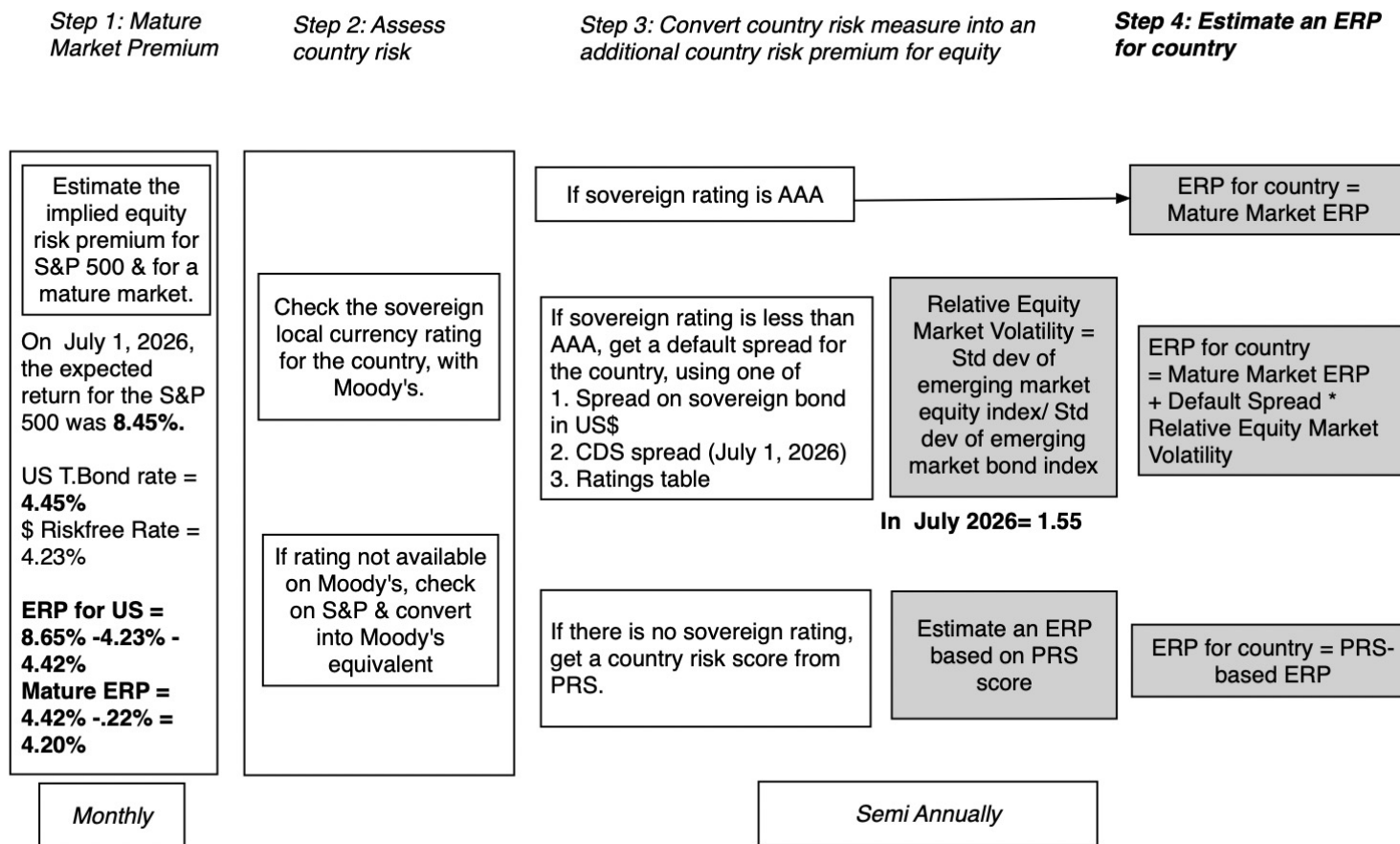
- I started estimating country equity risk premiums, and while the details and data that I use have changed over the last three decades, the basic structure has remained unchanged.
- I start with an estimate of the equity risk premium for a mature market, and build a country risk premium, if needed, for riskier countries.
  - Until 2025, I estimated the mature market premium by computing an implied equity risk premium for the S&P 500, and using that as the base, arguing that the US, as a Aaa rated country (at least according to Moody's), represented a mature market.
  - The Moody's downgrade for the US, from Aaa to Aa1, has thrown a wrench into that approach, requiring adaptation.

# IMPLIED ERP FOR S&P 500 IN JULY 2026 (AND A MATURE MARKET ERP)



# COMPUTING ERP FOR COUNTRIES - STEPS

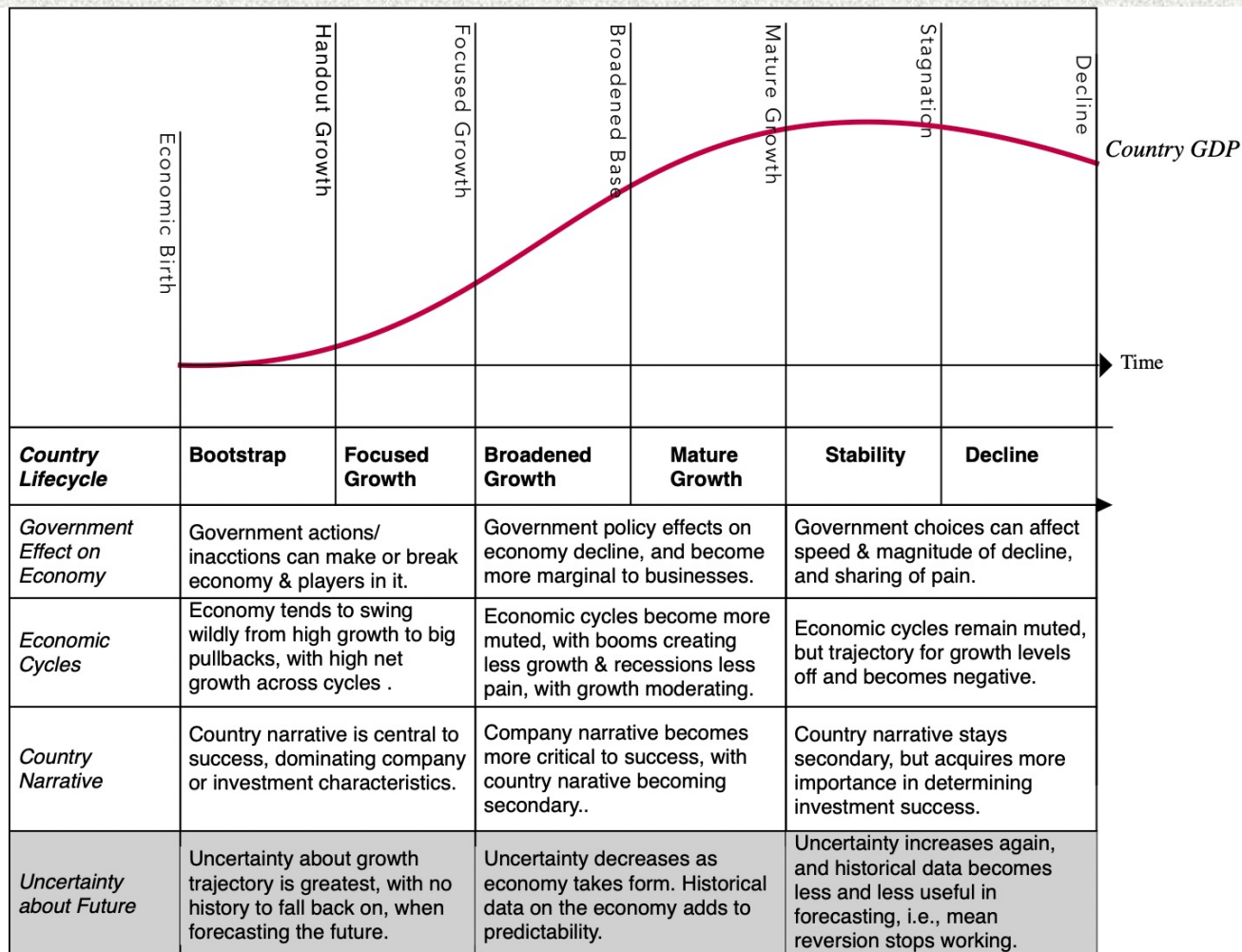
## ERP Estimation Procedure - July 1, 2026



# COUNTRY ERP IN JULY 2026

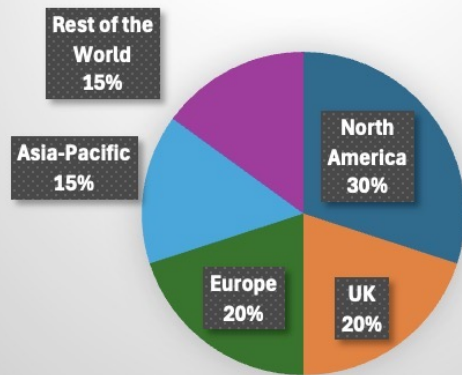
| Country                        | Rating | CRP    | ERP    | Country              | Rating | CRP    | ERP    | Country            | Rating | CRP    | ERP    | Country                     | Rating | CRP    | ERP    | Country                      | Rating | CRP    | ERP    |
|--------------------------------|--------|--------|--------|----------------------|--------|--------|--------|--------------------|--------|--------|--------|-----------------------------|--------|--------|--------|------------------------------|--------|--------|--------|
| Abu Dhabi                      | Aa2    | 0.61%  | 4.81%  | Congo (Republic of)  | Caa2   | 11.14% | 15.34% | Indonesia          | Baa2   | 2.36%  | 6.56%  | Mongolia                    | B1     | 5.57%  | 9.77%  | Solomon Islands              | Caa1   | 9.28%  | 13.48% |
| Albania                        | Ba3    | 4.45%  | 8.65%  | Cook Islands         | Ba3    | 4.45%  | 8.65%  | Iran               | NR     | 11.14% | 15.34% | Montenegro                  | Ba3    | 4.45%  | 8.65%  | Somalia                      | NR     | 12.38% | 16.58% |
| Algeria                        | NR     | 5.57%  | 9.77%  | Costa Rica           | Ba3    | 4.45%  | 8.65%  | Iraq               | Caa1   | 9.28%  | 13.48% | Montserrat                  | Baa3   | 2.72%  | 6.92%  | South Africa                 | Ba2    | 3.72%  | 7.92%  |
| Andorra (Principality of)      | Baa1   | 1.98%  | 6.18%  | Côte d'Ivoire        | Ba2    | 3.72%  | 7.92%  | Ireland            | Aa3    | 0.74%  | 4.94%  | Morocco                     | Ba1    | 3.10%  | 7.30%  | Spain                        | A3     | 1.48%  | 5.68%  |
| Angola                         | B3     | 8.04%  | 12.24% | Croatia              | A3     | 1.48%  | 5.68%  | Isle of Man        | Aa3    | 0.74%  | 4.94%  | Mozambique                  | Caa2   | 11.14% | 15.34% | Sri Lanka                    | Caa1   | 9.28%  | 13.48% |
| Argentina                      | Caa1   | 9.28%  | 13.48% | Cuba                 | Ca     | 14.85% | 19.05% | Israel             | Baa1   | 1.98%  | 6.18%  | Myanmar                     | NR     | 14.85% | 19.05% | St. Maarten                  | Ba2    | 3.72%  | 7.92%  |
| Armenia                        | Ba3    | 4.45%  | 8.65%  | Curacao              | Baa3   | 2.72%  | 6.92%  | Italy              | Baa2   | 2.36%  | 6.56%  | Namibia                     | B1     | 5.57%  | 9.77%  | St. Vincent & the Grenadines | B3     | 8.04%  | 12.24% |
| Aruba                          | Baa3   | 2.72%  | 6.92%  | Cyprus               | A3     | 1.48%  | 5.68%  | Jamaica            | Ba3    | 4.45%  | 8.65%  | Nepal                       | Ba3    | 4.45%  | 8.65%  | Sudan                        | NR     | 27.20% | 31.40% |
| Australia                      | Aaa    | 0.00%  | 4.20%  | Czech Republic       | Aa3    | 0.74%  | 4.94%  | Japan              | A1     | 0.87%  | 5.07%  | Netherlands                 | Aaa    | 0.00%  | 4.20%  | Suriname                     | Caa1   | 9.28%  | 13.48% |
| Austria                        | Aa1    | 0.34%  | 4.54%  | Denmark              | Aaa    | 0.00%  | 4.20%  | Jersey (States of) | Aa3    | 0.74%  | 4.94%  | New Zealand                 | Aaa    | 0.00%  | 4.20%  | Swaziland                    | B2     | 6.81%  | 11.01% |
| Azerbaijan                     | Baa3   | 2.72%  | 6.92%  | Dominican Republic   | Ba2    | 3.72%  | 7.92%  | Jordan             | Ba3    | 4.45%  | 8.65%  | Nicaragua                   | B2     | 6.81%  | 11.01% | Sweden                       | Aaa    | 0.00%  | 4.20%  |
| Bahamas                        | Ba3    | 4.45%  | 8.65%  | Ecuador              | Caa1   | 9.28%  | 13.48% | Kazakhstan         | Baa1   | 1.98%  | 6.18%  | Niger                       | Caa3   | 12.38% | 16.58% | Switzerland                  | Aaa    | 0.00%  | 4.20%  |
| Bahrain                        | B2     | 6.81%  | 11.01% | Egypt                | Caa1   | 9.28%  | 13.48% | Kenya              | B3     | 8.04%  | 12.24% | Nigeria                     | B3     | 8.04%  | 12.24% | Syria                        | NR     | 11.14% | 15.34% |
| Bangladesh                     | B2     | 6.81%  | 11.01% | El Salvador          | B3     | 8.04%  | 12.24% | Korea              | Aa2    | 0.61%  | 4.81%  | Norway                      | Aaa    | 0.00%  | 4.20%  | Taiwan                       | Aa3    | 0.74%  | 4.94%  |
| Barbados                       | C      | 27.20% | 31.40% | Estonia              | A1     | 0.87%  | 5.07%  | Korea, D.P.R.      | NR     | 14.85% | 19.05% | Oman                        | Baa3   | 2.72%  | 6.92%  | Tajikistan                   | B2     | 6.81%  | 11.01% |
| Belarus                        | C      | 27.20% | 31.40% | Ethiopia             | Caa3   | 12.38% | 16.58% | Kuwait             | A1     | 0.87%  | 5.07%  | Pakistan                    | Caa1   | 9.28%  | 13.48% | Tanzania                     | B1     | 5.57%  | 9.77%  |
| Belgium                        | A1     | 0.87%  | 5.07%  | Fiji                 | B1     | 5.57%  | 9.77%  | Kyrgyzstan         | B3     | 8.04%  | 12.24% | Panama                      | Baa3   | 2.72%  | 6.92%  | Thailand                     | Baa1   | 1.98%  | 6.18%  |
| Belize                         | Caa1   | 9.28%  | 13.48% | Finland              | Aa1    | 0.34%  | 4.54%  | Laos               | Caa2   | 11.14% | 15.34% | Papua New Guinea            | B2     | 6.81%  | 11.01% | Togo                         | B3     | 8.04%  | 12.24% |
| Benin                          | B1     | 5.57%  | 9.77%  | France               | Aa3    | 0.74%  | 4.94%  | Latvia             | A3     | 1.48%  | 5.68%  | Paraguay                    | Ba1    | 3.10%  | 7.30%  | Trinidad and Tobago          | Ba2    | 3.72%  | 7.92%  |
| Bermuda                        | A1     | 0.87%  | 5.07%  | Gabon                | Caa2   | 11.14% | 15.34% | Lebanon            | C      | 27.20% | 31.40% | Peru                        | Baa1   | 1.98%  | 6.18%  | Tunisia                      | Caa1   | 9.28%  | 13.48% |
| Bolivia                        | Caa3   | 12.38% | 16.58% | Gambia               | NR     | 5.57%  | 9.77%  | Liberia            | NR     | 11.14% | 15.34% | Philippines                 | Baa2   | 2.36%  | 6.56%  | Turkey                       | Ba3    | 4.45%  | 8.65%  |
| Bosnia and Herzegovina         | B3     | 8.04%  | 12.24% | Georgia              | Ba2    | 3.72%  | 7.92%  | Libya              | NR     | 5.57%  | 9.77%  | Poland                      | A2     | 1.05%  | 5.25%  | Turks and Caicos Islands     | Baa1   | 1.98%  | 6.18%  |
| Botswana                       | Baa1   | 1.98%  | 6.18%  | Germany              | Aaa    | 0.00%  | 4.20%  | Liechtenstein      | Aaa    | 0.00%  | 4.20%  | Portugal                    | A3     | 1.48%  | 5.68%  | Uganda                       | B3     | 8.04%  | 12.24% |
| Brazil                         | Ba1    | 3.10%  | 7.30%  | Ghana                | Caa1   | 9.28%  | 13.48% | Lithuania          | A2     | 1.05%  | 5.25%  | Qatar                       | Aa2    | 0.61%  | 4.81%  | Ukraine                      | Ca     | 14.85% | 19.05% |
| Brunei                         | NR     | 0.74%  | 4.94%  | Greece               | Baa3   | 2.72%  | 6.92%  | Luxembourg         | Aaa    | 0.00%  | 4.20%  | Ras Al Khaimah (Emirate of) | A3     | 1.48%  | 5.68%  | United Arab Emirates         | Aa2    | 0.61%  | 4.81%  |
| Bulgaria                       | Baa1   | 1.98%  | 6.18%  | Guatemala            | Ba1    | 3.10%  | 7.30%  | Macao              | Aa3    | 0.74%  | 4.94%  | Romania                     | Baa3   | 2.72%  | 6.92%  | United Kingdom               | Aa3    | 0.74%  | 4.94%  |
| Burkina Faso                   | Caa1   | 9.28%  | 13.48% | Guernsey (States of) | A1     | 0.87%  | 5.07%  | Macedonia          | Ba3    | 4.45%  | 8.65%  | Russia                      | NR     | 3.72%  | 7.92%  | United States                | Aa1    | 0.22%  | 4.42%  |
| Cambodia                       | B2     | 6.81%  | 11.01% | Guinea               | NR     | 11.14% | 15.34% | Madagascar         | NR     | 9.28%  | 13.48% | Rwanda                      | B2     | 6.81%  | 11.01% | Uruguay                      | Baa1   | 1.98%  | 6.18%  |
| Cameroon                       | Caa1   | 9.28%  | 13.48% | Guinea-Bissau        | NR     | 9.28%  | 13.48% | Malawi             | NR     | 14.85% | 19.05% | Saudi Arabia                | Aa3    | 0.74%  | 4.94%  | Uzbekistan                   | Ba2    | 3.72%  | 7.92%  |
| Canada                         | Aaa    | 0.00%  | 4.20%  | Guyana               | NR     | 1.98%  | 6.18%  | Malaysia           | A3     | 1.48%  | 5.68%  | Senegal                     | Caa1   | 9.28%  | 13.48% | Venezuela                    | Caa3   | 12.38% | 16.58% |
| Cape Verde                     | B1     | 5.57%  | 9.77%  | Haiti                | NR     | 12.38% | 16.58% | Maldives           | Caa2   | 11.14% | 15.34% | Serbia                      | Ba2    | 3.72%  | 7.92%  | Vietnam                      | Ba2    | 3.72%  | 7.92%  |
| Cayman Islands                 | Aa3    | 0.74%  | 4.94%  | Honduras             | B1     | 5.57%  | 9.77%  | Mali               | Caa2   | 11.14% | 15.34% | Sharjah                     | Ba1    | 3.10%  | 7.30%  | Yemen, Republic              | NR     | 14.85% | 19.05% |
| Chile                          | A2     | 1.05%  | 5.25%  | Hong Kong            | Aa3    | 0.74%  | 4.94%  | Malta              | A2     | 1.05%  | 5.25%  | Sierra Leone                | NR     | 8.04%  | 12.24% | Zambia                       | Caa2   | 11.14% | 15.34% |
| China                          | A1     | 0.87%  | 5.07%  | Hungary              | Baa2   | 2.36%  | 6.56%  | Mauritius          | Baa3   | 2.72%  | 6.92%  | Singapore                   | Aaa    | 0.00%  | 4.20%  | Zimbabwe                     | NR     | 6.81%  | 11.01% |
| Colombia                       | Baa3   | 2.72%  | 6.92%  | Iceland              | A1     | 0.87%  | 5.07%  | Mexico             | Baa3   | 2.72%  | 6.92%  | Slovakia                    | A3     | 1.48%  | 5.68%  |                              |        |        |        |
| Congo (Democratic Republic of) | B3     | 8.04%  | 12.24% | India                | Baa3   | 2.72%  | 6.92%  | Moldova            | B2     | 6.81%  | 11.01% | Slovenia                    | A2     | 1.05%  | 5.25%  |                              |        |        |        |

# FROM COUNTRY RISK TO COMPANY RISK – A LIFE CYCLE PERSPECTIVE

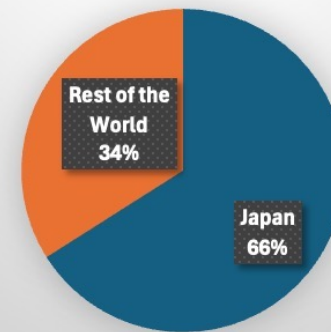


# COMPANY ERP — INCORPORATION VS OPERATIONS

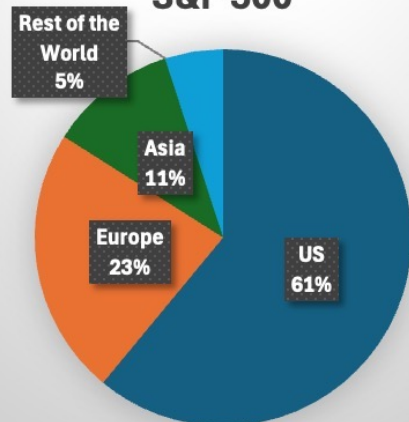
**FTSE 100**



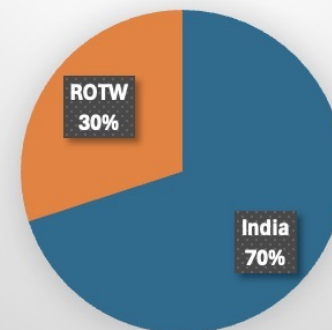
**Nikkei 225**



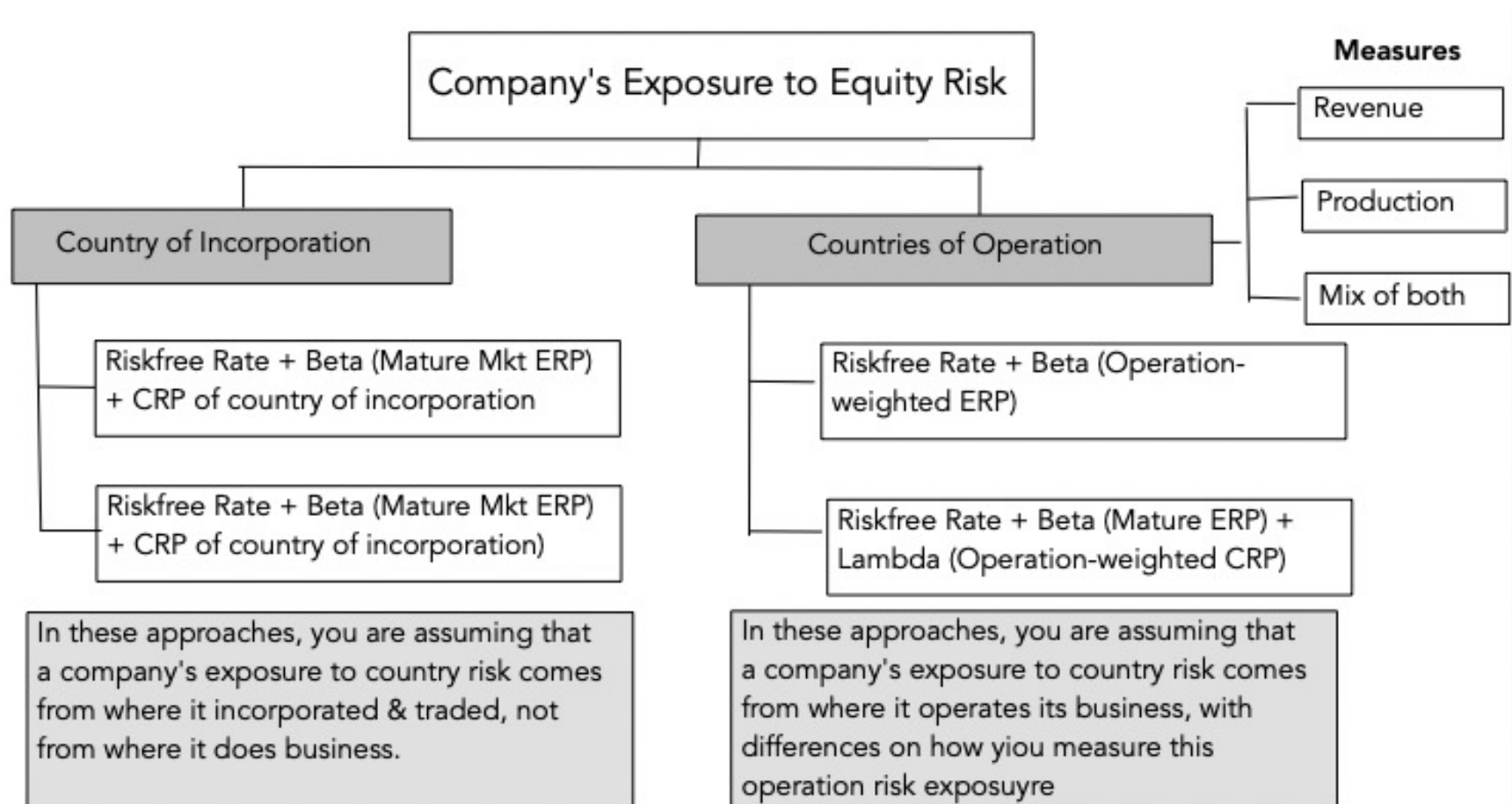
**S&P 500**



**Sensex**



# COMPANY ERP: WEIGHTING OPERATIONS



# PROJECT RISK PREMIUMS

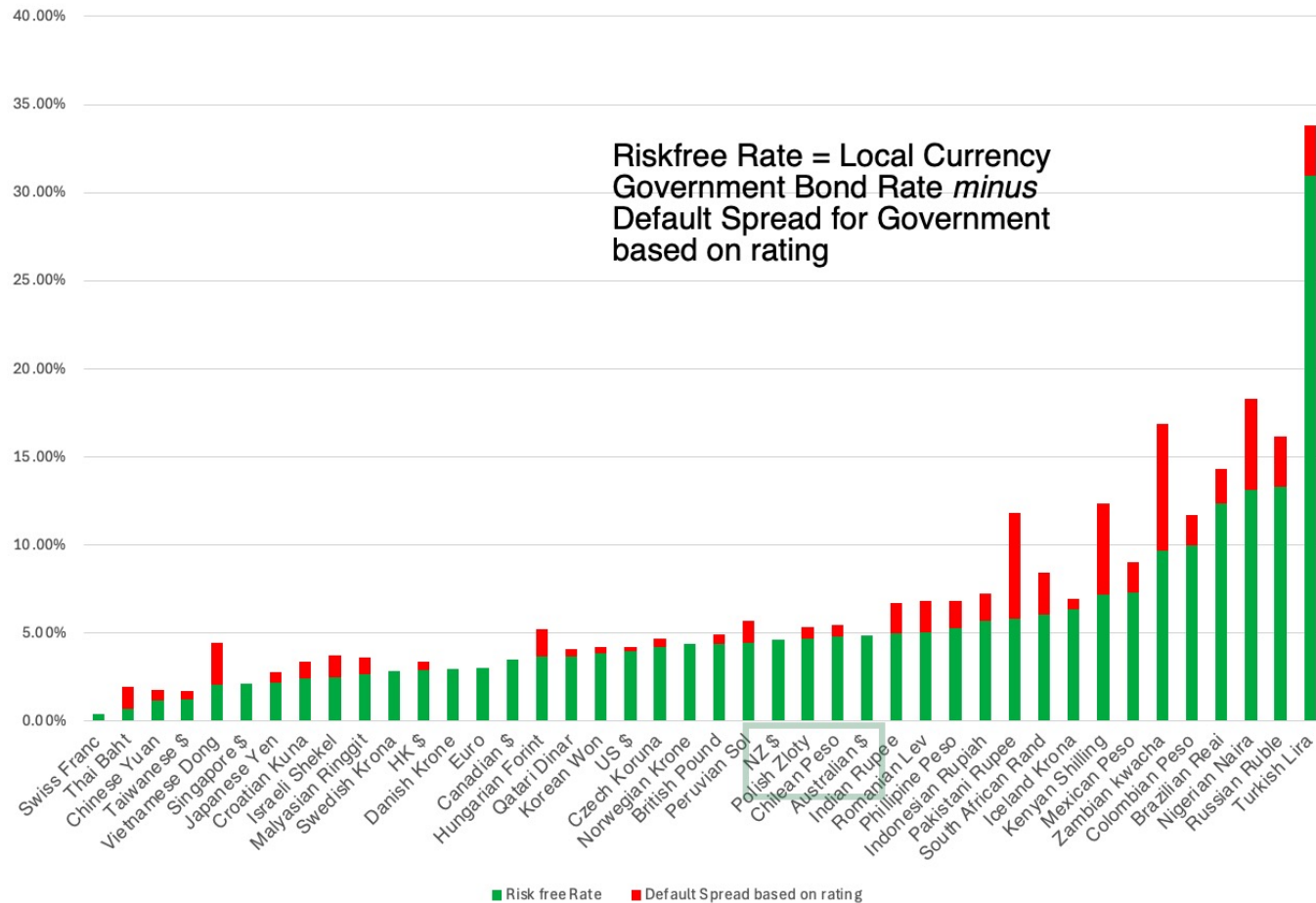
- For a multinational with many businesses, the project cost of equity will have to then also reflect the business the project is in, in addition to country risk.
  - Thus, the cost of equity for a GE Appliances for a project in India should reflect the beta for the appliance business, in addition to the country risk for India.
  - In contrast, a GE aircraft project in Hungary should be computed using the beta for an aircraft project and the country risk for Hungary. It is also possible that country risk is not easy to isolate, if the production facilities are in one country but revenues are generated in another.
  - If the GE appliance factory in India will be producing products that will be sold in Japan, should we be showing the country risk of India or Japan in the cost of equity calculation? The answer, as was the case in the earlier section on valuation, is that it depends on where the company sees risk coming from.

# CURRENCY QUESTIONS

- For some of you, it may seem odd that I have spent almost an entire post talking about country risk without talking about currencies.
- The reason is simple. Currencies are measurement mechanisms, and while they may be affected by the same political and economic factors that drive country risk, they don't determine country risk.
- It is true that hurdle rates are affected by both the equity risk premiums that you estimate and the riskfree rate that you use, and that riskfree rates vary across currencies.

# RISKFREE RATES IN CURRENCIES – JULY 2026

Riskfree Rates in Currencies: July 1, 2026



# WHY VALUE SHOULD BE CURRENCY INVARIANT!

- While this may sound farfetched, the value that you derive for the project or company should be the same using either currency, if you are consistent about estimating your cash flows in the same currency:

The diagram illustrates the concept of currency invariance in valuation. It features a central equation for the 'Value of asset' and two boxes on the right labeled 'Inflation in your expected cashflows' and 'Inflation in your discount rate'. A box labeled 'Currency Choice' has arrows pointing to both inflation boxes, indicating that the choice of currency affects both the cashflow estimates and the discount rate used in the calculation.

$$\text{Value of asset} = \frac{E(CF_1)}{(1+r)} + \frac{E(CF_2)}{(1+r)^2} + \frac{E(CF_3)}{(1+r)^3} + \dots + \frac{E(CF_n)}{(1+r)^n}$$

- Since much or almost all of the difference in riskfree rates come from inflation differentials, matching the high discount rate in a currency with high inflation with a high growth in cashflows for the same reason and the low discount rate in a low inflation currency with the low growth in cashflows estimated in the same currency will yield results that are consistent.

# ESTIMATING RISKFREE RATES IN ANY CURRENCY

- The riskfree rate in any currency can be computed from a base currency (dollar or Euro) riskfree rate and the difference in expected inflation between the local and base currencies:

$$\text{Riskfree rate in Currency} = (1 + \text{US Treasury Bond rate}) \cdot \frac{(1 + \text{Expected Inflation Rate in Currency})}{(1 + \text{Expected Inflation Rate in US \$})} - 1$$

- The implication of this approach is that currency pegs, when they do exist, will hold only if the inflation in the pegged currency matches or is close to the inflation in the index currency to which it is pegged.
- It is true that the estimates of riskfree rates will only be as good as the expected inflation rates that are embedded in the estimation, but the good news is that being wrong on expected inflation will be largely offsetting, since both your cashflows and your discount rates will be wrong in the same direction.

# CONCLUSION

- In my posts on globalization, I talked about the side costs of its rise in the last few decades. One of the side costs is that there are fewer companies that are entirely local-country focused in both their revenues and production, and as a result, almost every business and investor is exposed to risk in other parts of the world.
- The problem with country risk is that while its consequences are economic, it has its sources in history, politics and governance structures. The measures of country risk, whether they be entity-based like sovereign ratings, or market estimates like sovereign CDS spreads, reflect this interplay.
- My equity risk premiums are works-in-progress and reflect simplistic assumptions and short cuts that I have taken, and I am open to suggestions on improvements that I can make.