

Challenge of Global Country Risk Assessment

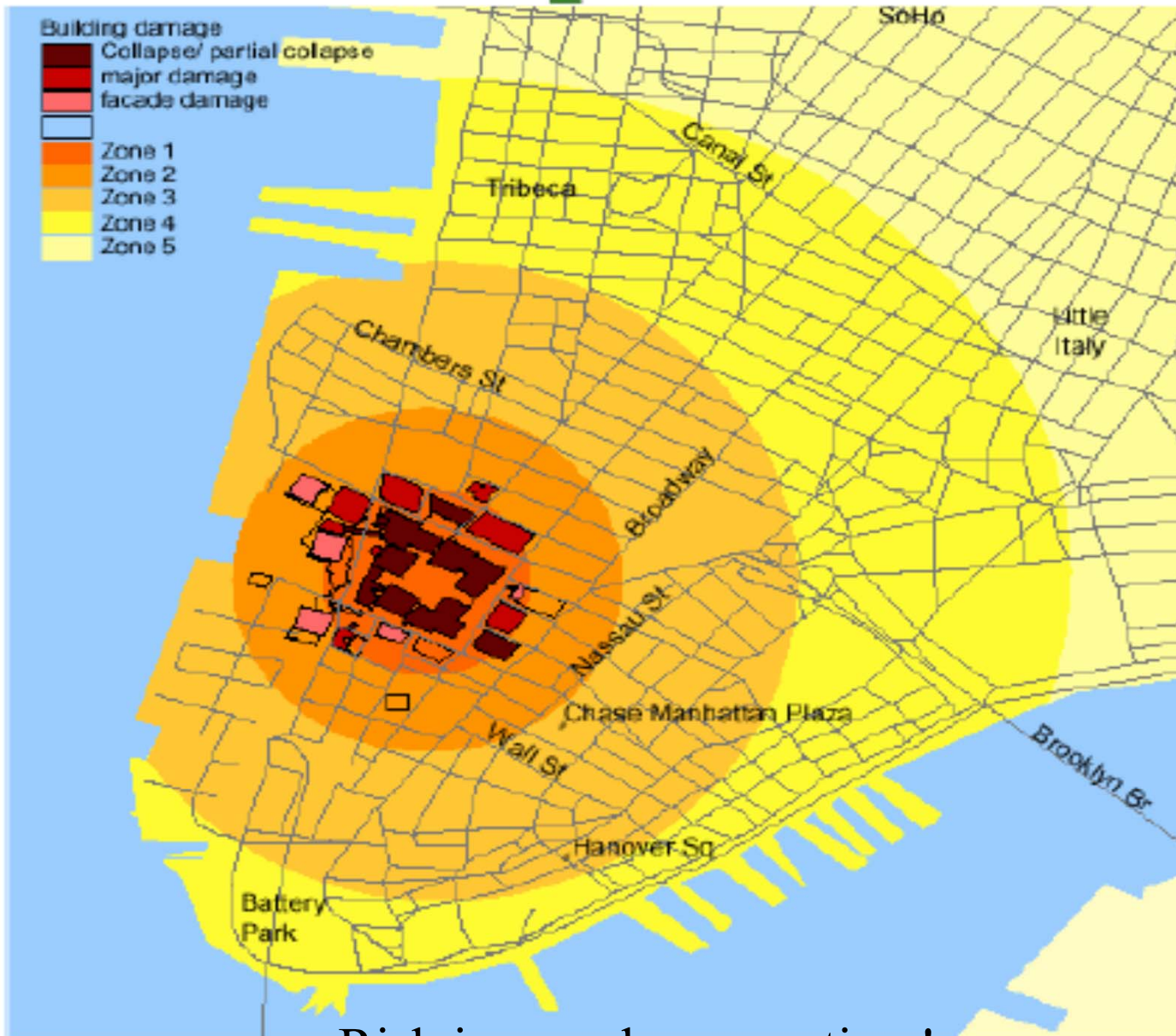
SK

Michel Henry Bouchet

September 2013

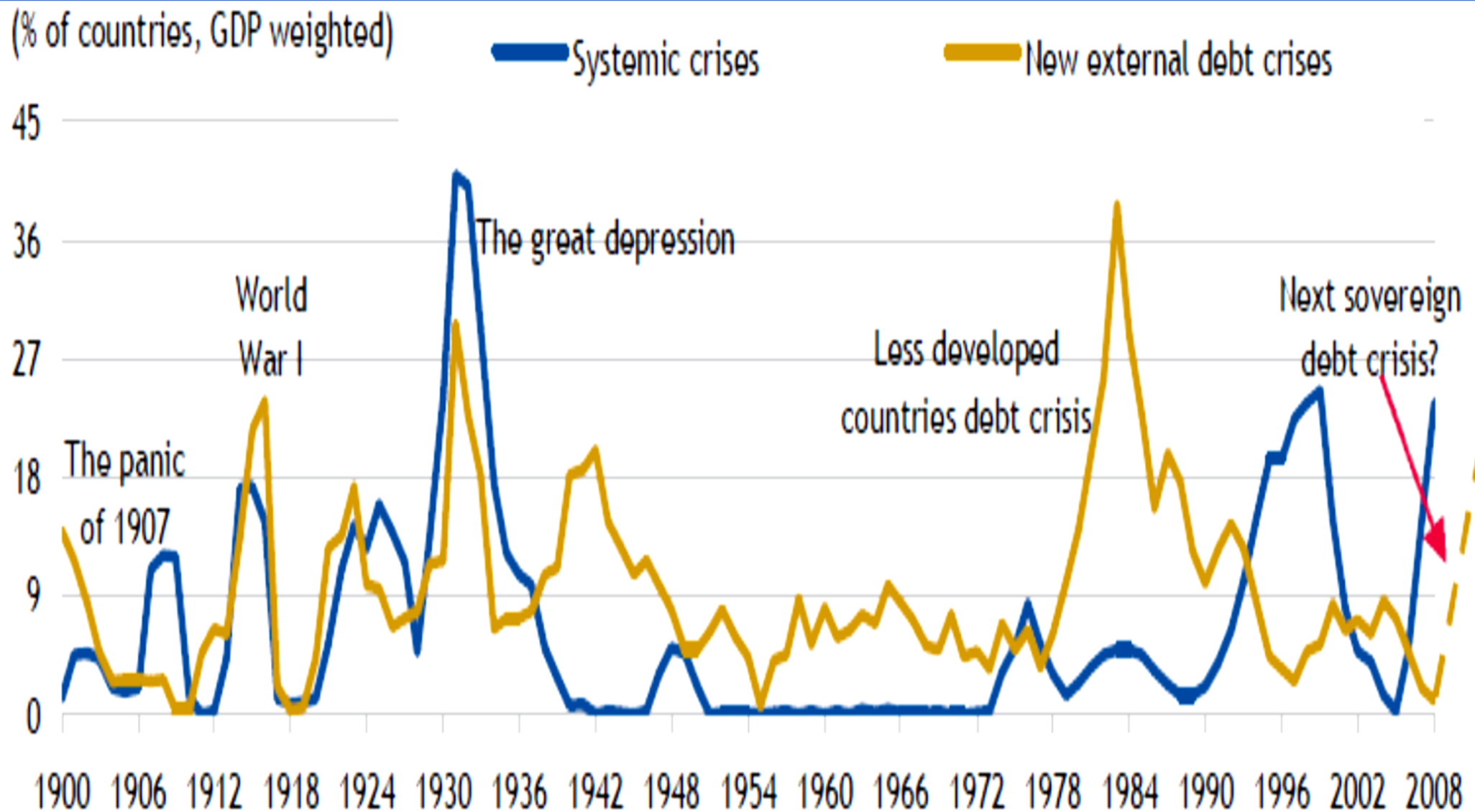
Risk = Uncertainty = Information deficit

You cannot predict risk



Risk is anywhere, anytime!

What/Where will be the next financial crisis?



Note: Dotted line added by Fitch for illustrative purposes

Source: Reinhart and Rogoff, 2009

What is Risk about?

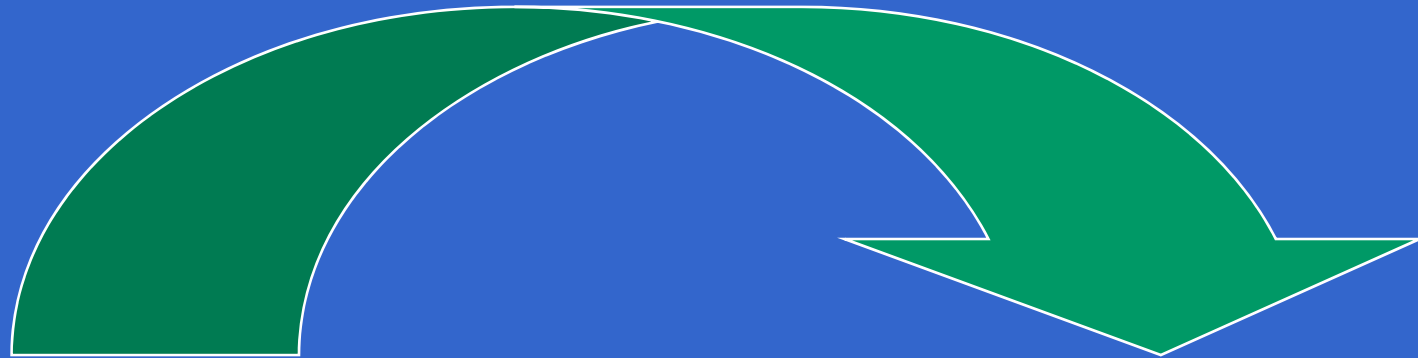
☞ Risk stems from a situation of uncertainty regarding current or future situations, where information about the situation's outcome is insufficient, lacking or simply wrong!



- Information availability is, in itself, a measure of risk (BOP, debt data, governance...)
- Information scarcity then requires taking action that might produce negative and costly consequences (investigation time, transaction cost, delays...)



Risk has to do with **uncertainty** regarding the future, hence the need of tackling the future prospects!



« Ancient times » = circular time (until the Middle Age)

« Modern time » = linear time of ...Economic & Financial Time!



The « discovery » of risk



Pascal 1654



Fermat 1654



1703

Leibniz



Markowitz 1952



Michel H. Bouches SKEMA (c) 2013



B. Mandelbrot

1997

Country risk analysis?



- **Assessment of a foreign entity's ability and willingness to meet its external obligations in full and in time**
- Foreign entity? Private firm, country government, bank, supplier, client, partner..
 - Country risk is composed of a complex combination of **political, financial and macro-economic risk**



Tackling country risk

COUNTRY + RISK

- ☞ Country = sovereign entity, culture and values, geographical distance, national laws and regulations, socio-political parameters
- ☞ Risk = lack of perfect information in real time, spill-over effect, abrupt changes



The interplay of **country risk** with the **global economy**

Capital flows
Exchange rates
Interest rates
IFIs
Global trade
Financial market access
Rating agencies
Global GDP
Global terrorism

Macroeconomic
Financial
Socio-political



How does Country Risk materialize?

1. **CREDITOR** = Payment arrears, default, rescheduling, write down and/or write off

2. **INVESTOR** = **Capital control: Limits on dividend and capital repatriation**

Contractual obligations and legal commitment :
contract repudiation, bureaucracy, political upheaval

Business climate: corruption, weak infrastructure and institutions, strikes

Public guarantees: unilateral suspension

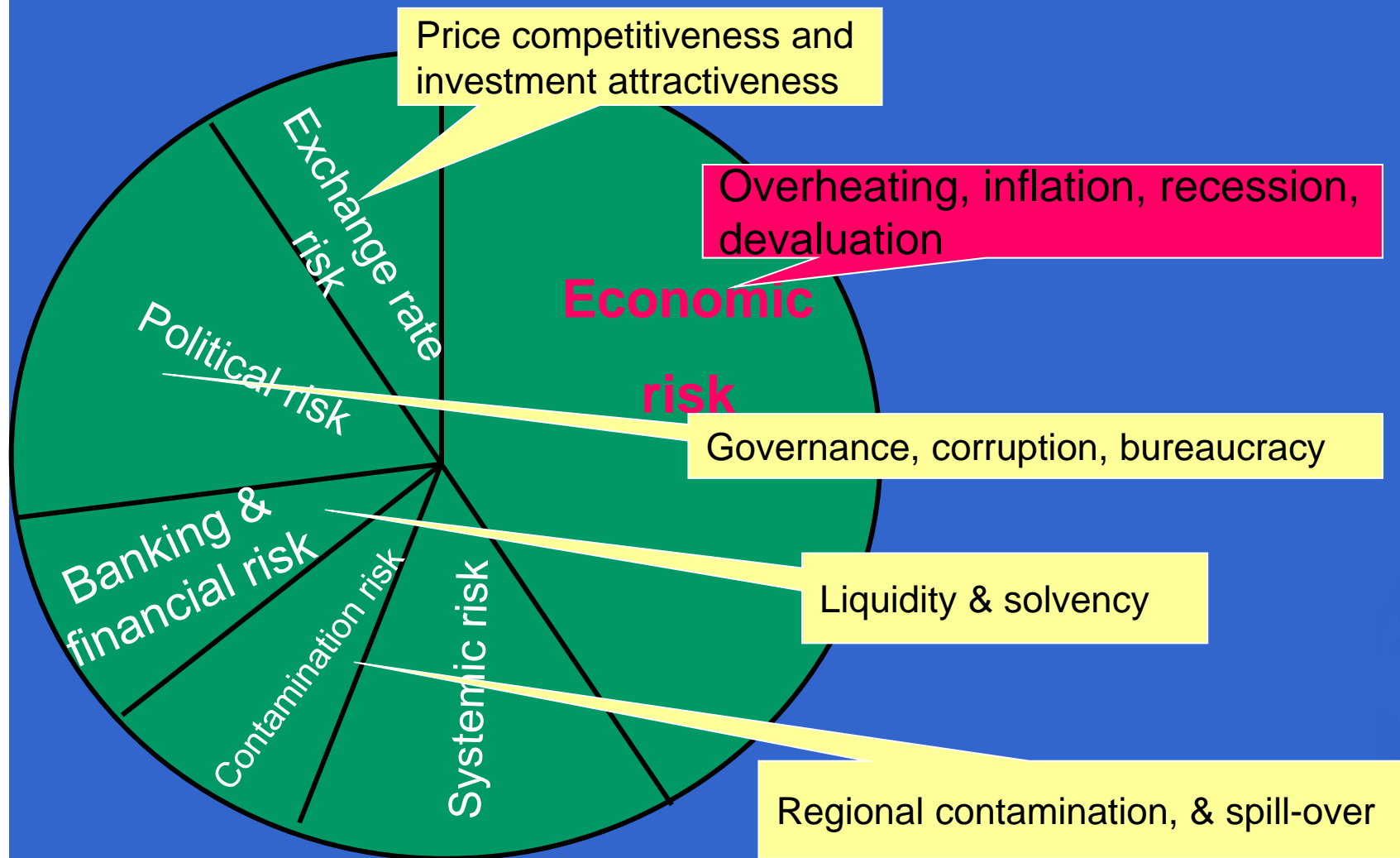
3. **TRADE PARTNER** = **Supply and purchases** (imports of goods & services) = delays, defective merchandise, exchange rate overvaluation

Sales (exports of goods & services) = payment arrears



Main Country-Risk component

- Globalization= volatility + spill-over of risk components!

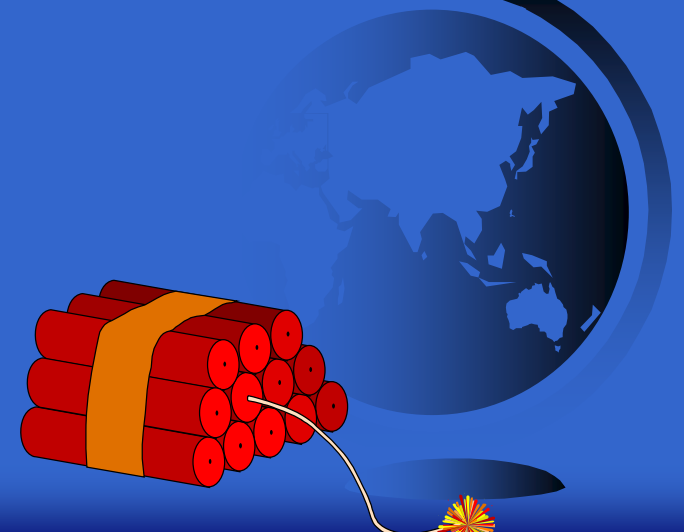


Main components of global risk

- Economic risk
- Financial and transfer risk
- Exchange risk
- Commodity risk
- Political risk
- Cultural environment risk
- Operational risk
- Legal and contractual risk
(repudiation, confiscation, bribes...)
- Regional contamination risk
(spill-over effect)
- Systemic risk (global crisis)

Quantifiable but
ultimately
judgmental

Subjective,
Insurable and diversifiable



Country risk assessment

Reliable and updated information

= Economic intelligence

= **Robust risk analysis**



Analysis and information sources

IMF & World Bank

UNCTAD

BIS

OECD

EBRD

Coface

Moody's, S&P, Fitch

CIA & State Department

Transparency International

Michel H. Bouchet/SKEMA (c) 2013

La globalisation

Introduction à l'économie
du nouveau monde

Michel-Henry
Bouchet

Préface de
Françoise
Crouigneau,
rédactrice en chef,
Les Échos

PEARSON
Education

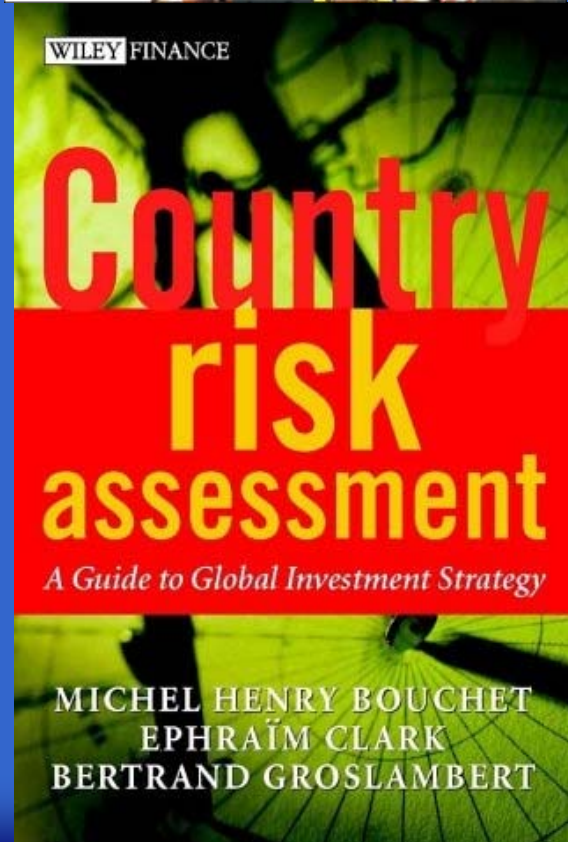


WILEY FINANCE

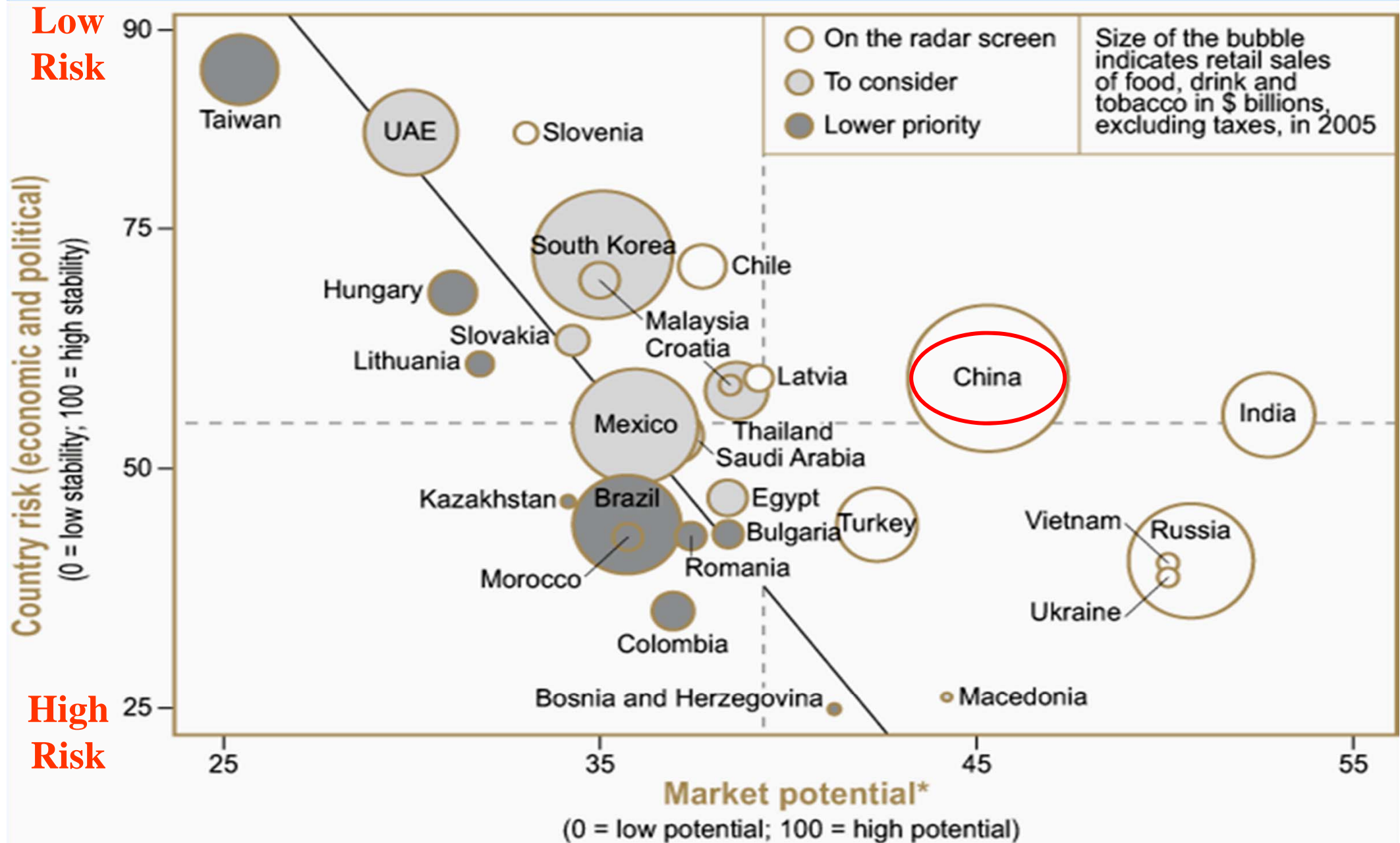
Country risk assessment

A Guide to Global Investment Strategy

MICHEL HENRY BOUCHET
EPHRAÏM CLARK
BERTRAND GROSLAMBERT



Most attractive emerging markets

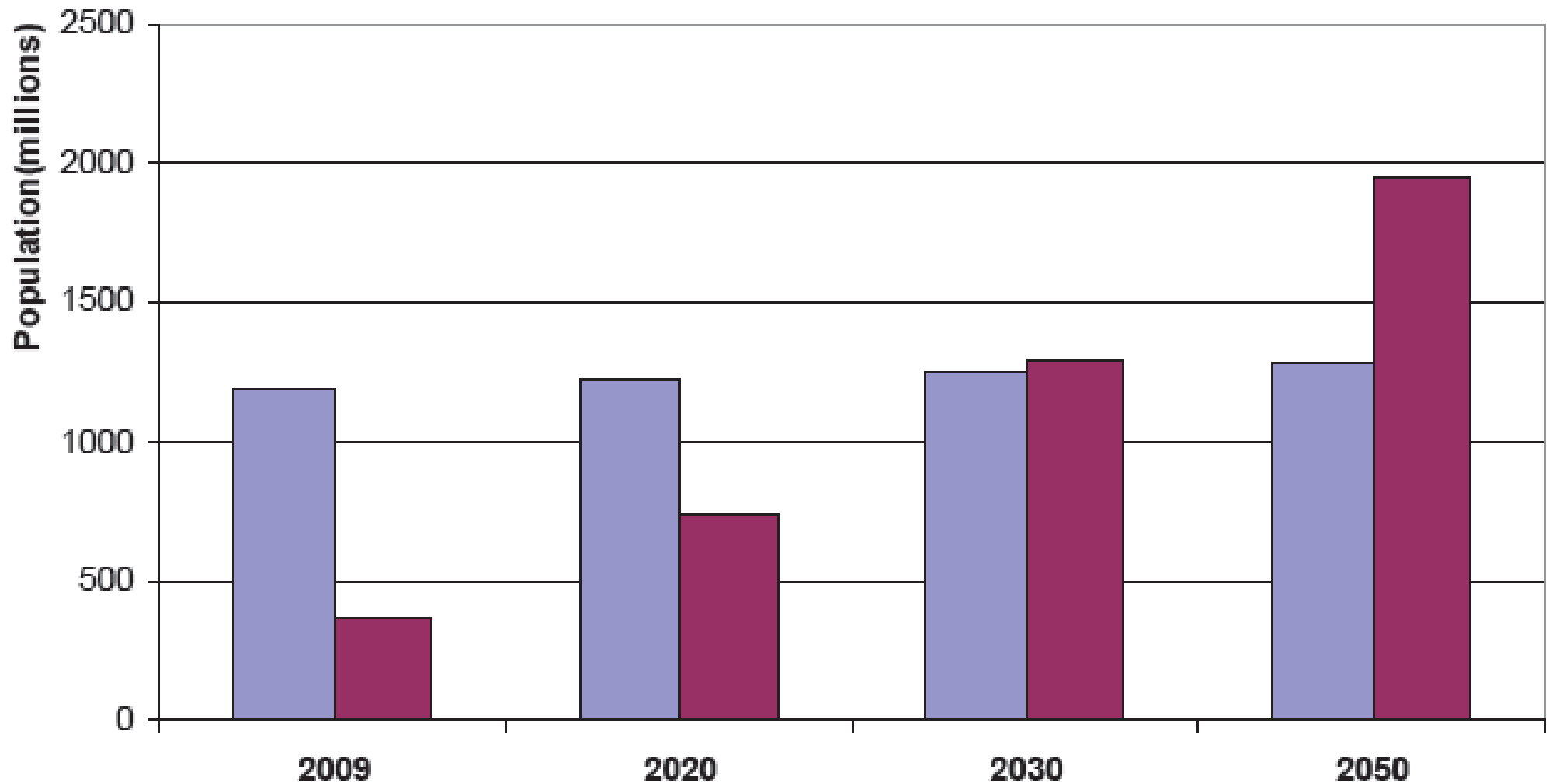


* Based on weighted score of market attractiveness, market saturation and time pressure scores
Source: A.T. Kearney

Potential market demand OECD & EMCs

Size of the Global Middle and Rich (GMR) Class

■ Advanced Economies ■ Developing G20 Economies



Assessing country risk
= Assessing LT opportunities

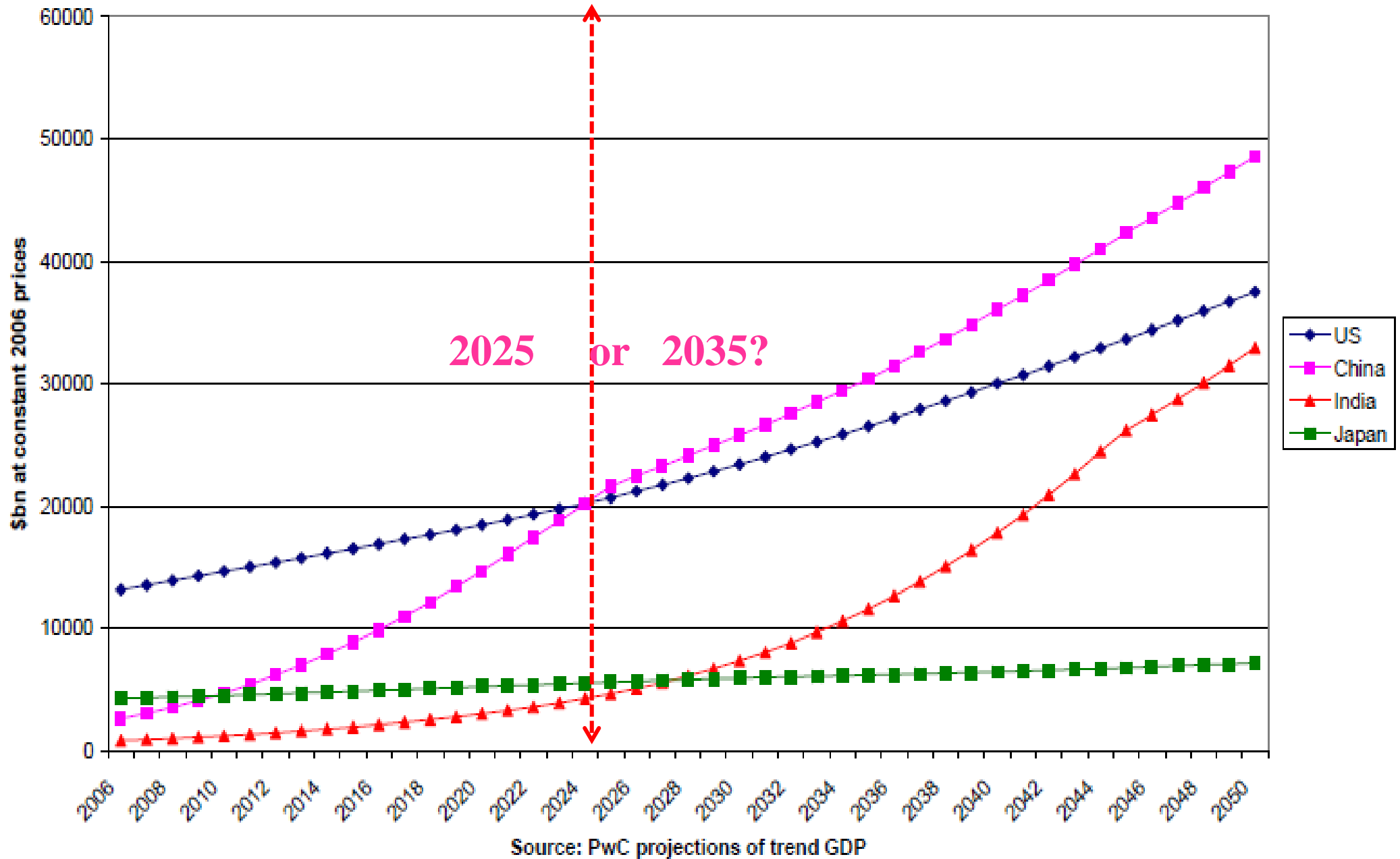
The future global leaders?

☞ The **BRICs**: « **Toward 2050** » : Goldman Sachs
Brazil, Russia, China & India's GDP > G7 in US\$

Challenge: how to forecast the « Top 10 » in 2050?



Projected size of global economies 2010-2050 (GDP at market exchange rates)



Approaches to country risk assessment

1. **Qualitative approach:** financial, macroeconomic, legal, regulatory and political parameters
2. **External debt analysis:** liquidity and solvency
3. **Quantitative approach :** rating and scoring
4. **Econometric approach** and modelization



External Debt Analysis

Key Objectives:

- Examining the robustness of the **growth engine** and the sources of **financial vulnerability**
- Assessing debt servicing **sustainability**
- Analyzing **liquidity & solvency** prospects:
- **How much is too much?** (debt sources, maturity, mismatch...)



Is there a **Debt/GDP** threshold that triggers a debt crisis and lower growth?

- **The Rogoff-Reinhart 2010 thesis:** Economic growth severely suffers when a country's public debt level reaches 90% of GDP (1946-2009)
- **The 2013 challengers:** the average real GDP growth rate for countries carrying a public debt-to-GDP ratio $>90\%$ is actually **2.2 percent**, not **-0.1 percent** as published by Reinhart and Rogoff (Herndon, Ash & Pollin)
- Further challenge regarding the **causality**: Countries might have high debt-to-GDP ratios because they have slow growth, rather than the other way around!



External Finance Analysis: The dual face of Country Risk

Liquidity Risk

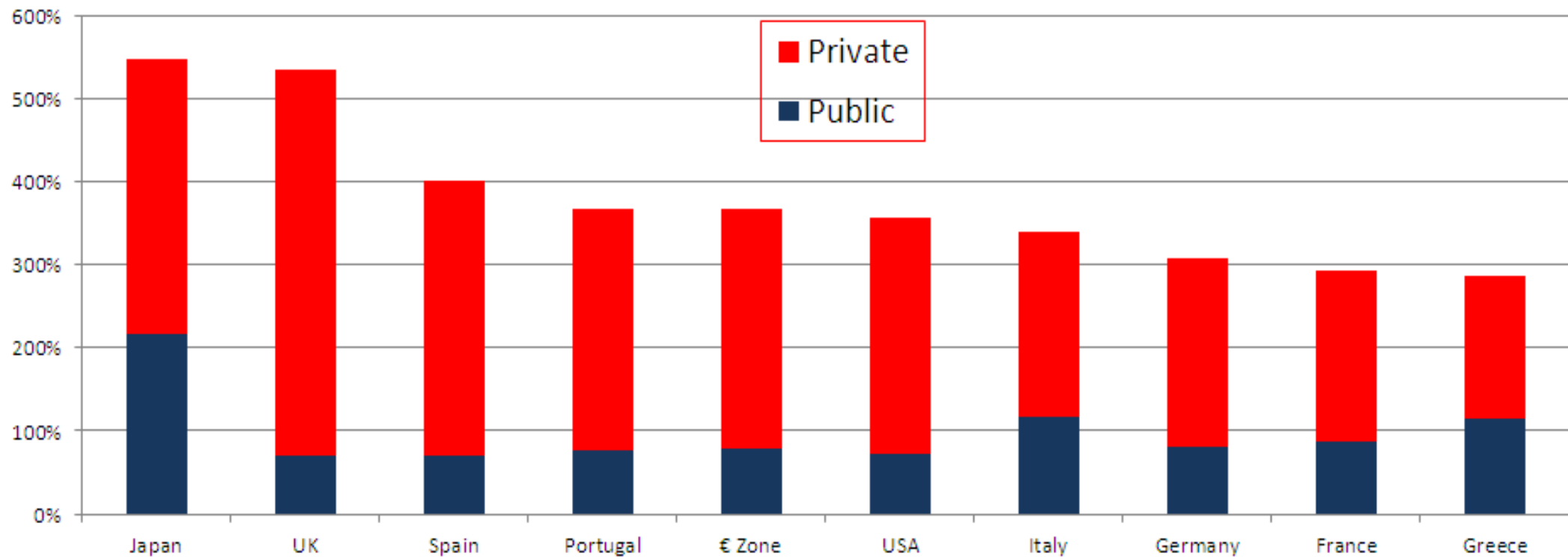
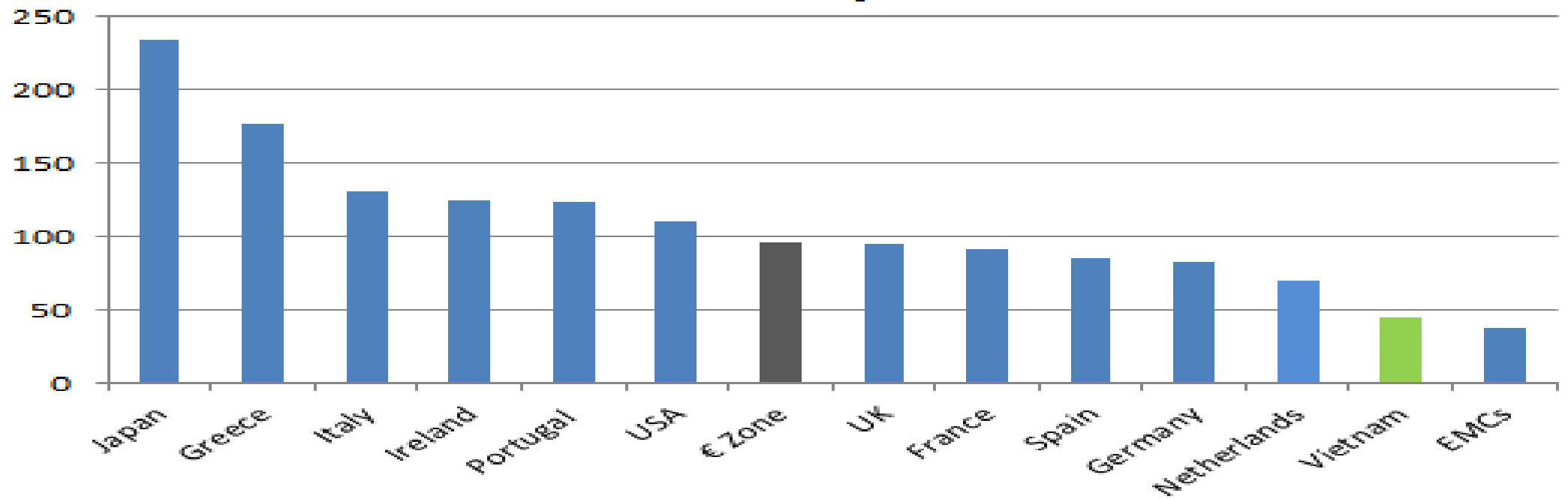
- Debt Service Ratio:
($P+I/X$)
- Interest Ratio (I/X)
- Current account/GDP
- Reserve/Import ratio
- Elasticity of exports
- Growth rate of exports/
Average external interest
rate

Solvency Risk

- Debt/Export ratio
- Debt/GDP ratio
- Debt/Reserves
- ST Debt/Reserves



Public debt/GDP % 2013



Flight to quality? No correlation between solvency ratios and yields





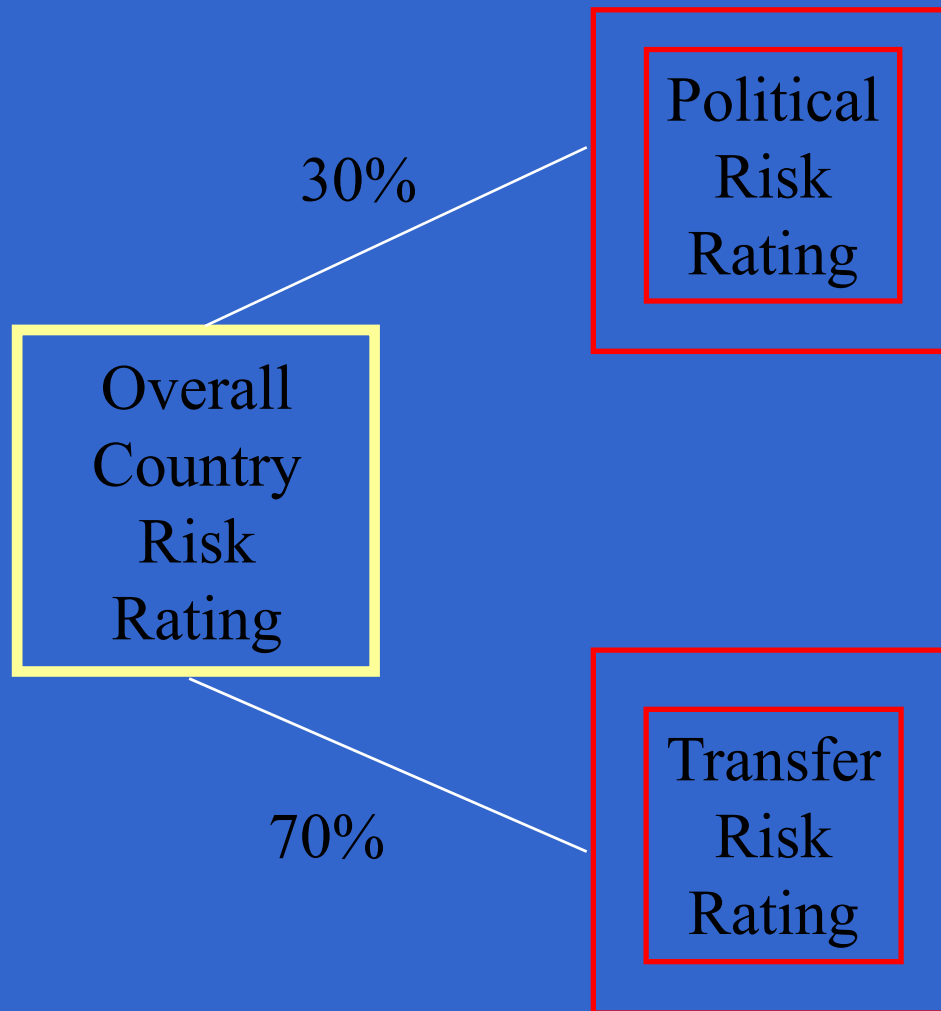
Country Risk Analysis
SOVEREIGN RISK RATING

Quantitative approach: Rating

- Means: Transforming a number of observations (Delphi method, surveys) or quantitative indicators into **one** single number.
- The various indicators can be weighted regarding their impact on creditworthiness and risk.
- **End-product:** one single grade to assess past and current country risk situation with possible cross-country comparisons across time



Quantifying Country Risk



<u>Political Factors</u>	<u>Weights</u>
Political factor A	30%
Political factor B	50
Political factor C	20

<u>Financial Factors</u>	<u>Weights</u>
Financial factor A	30%
Financial factor B	40
Financial factor C	30



Country Risk Rating

Advantages/ Pros

- simple
- shrinks a large number of variables into one single grade
- cross-country comparison
- comparison across time
- reliable for smooth risk evolution

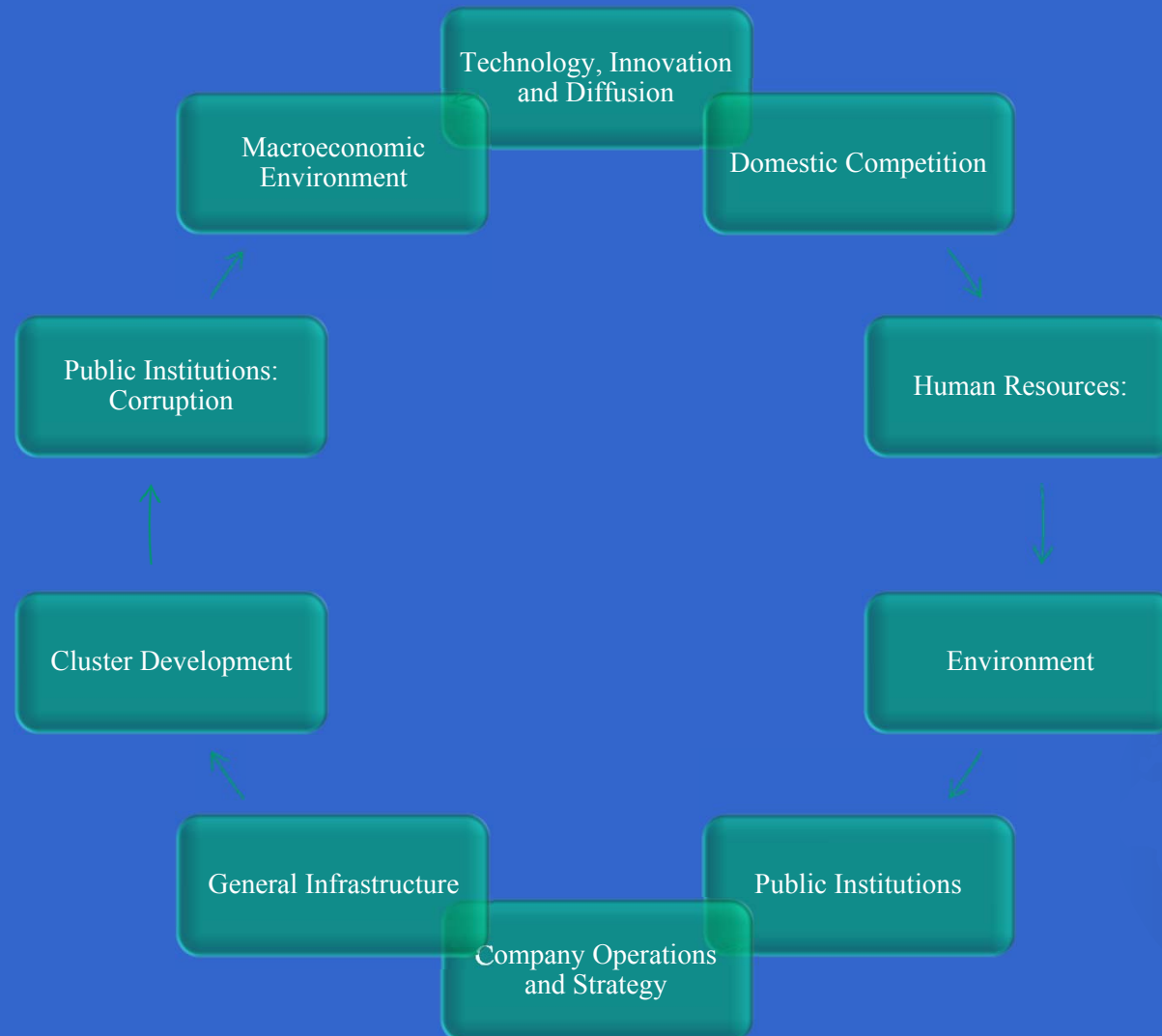
Shortcomings/Cons

- “reductionist”
- over-simplistic
- risk of self-fulfilling prophecy
- little predictive value
- weighted average tends to bury salient trends
- gives “market consensus” often made of herd instinct



WEF Competitiveness index Components:

Expert opinions of over 11,000 business leaders and entrepreneurs on:



Competitiveness index 2013

Davos-World Economic Forum

1	Switzerland
2	Singapore
3	Finland
4	Sweden
5	Netherlands
6	Germany
7	United States
8	United Kingdom
9	Hong Kong SAR
10	Japan
11	Qatar
12	Denmark
13	Taiwan, China
14	Canada
15	Norway

130	Madagascar
131	Côte d'Ivoire
132	Zimbabwe
133	Burkina Faso
134	Mauritania
135	Swaziland
136	Timor-Leste
137	Lesotho
138	Mozambique
139	Chad
140	Yemen
141	Guinea
142	Haiti
143	Sierra Leone
144	Burundi

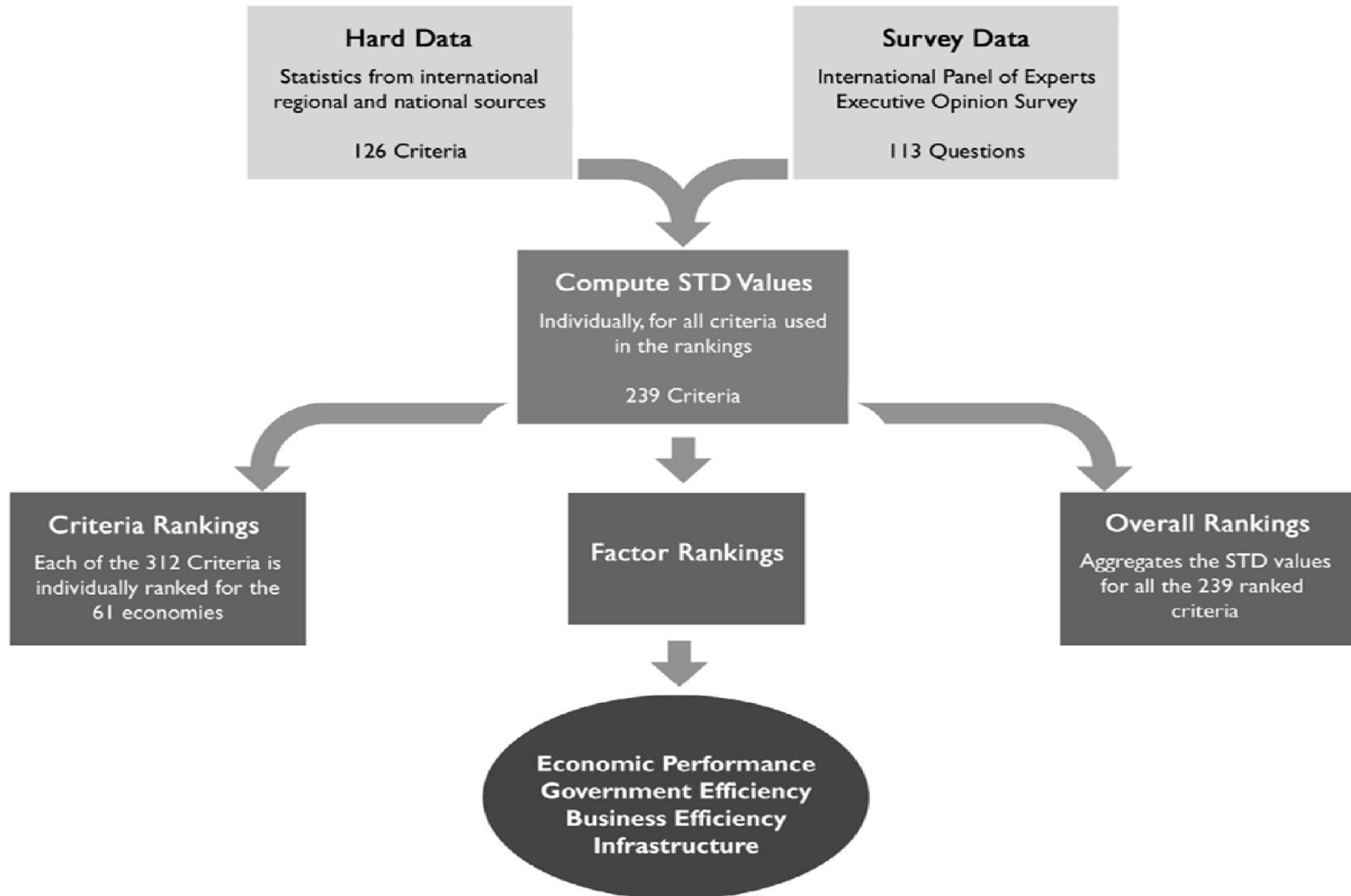
China = 29
Brazil = 48
South Afr = 52
India = 59
Russia = 67

IMD World Competitiveness yearbook

- World Competitiveness Index : ability of nations to provide an environment that sustains the competitiveness of enterprises.
- Extensive coverage of 59 countries chosen because of their impact on the global economy and the availability of comparable international statistics.
- Over 300 competitiveness criteria are selected.



IMD: Computing the Rankings



IMD Competitiveness Scoreboard

100.000	(2) HONG KONG 1
100.000	(3) USA 1
98.557	(1) SINGAPORE 3
94.063	(6) SWEDEN 4
92.588	(4) SWITZERLAND 5
92.011	(8) TAIWAN 6
90.782	(7) CANADA 7
90.219	(15) QATAR 8
89.259	(5) AUSTRALIA 9
87.824	(16) GERMANY 10
86.475	(11) LUXEMBOURG 11
86.418	(13) DENMARK 12
86.313	(9) NORWAY 13
85.707	(12) NETHERLANDS 14
84.380	(19) FINLAND 15
84.120	(10) MALAYSIA 16
81.629	(17) ISRAEL 17
81.619	(14) AUSTRIA 18
81.100	(18) CHINA MAINLAND 19
80.278	(22) UNITED KINGDOM 20
79.799	(20) NEW ZEALAND 21
78.499	(23) KOREA 22
77.599	(25) BELGIUM 23
77.101	(21) IRELAND 24
76.827	(28) CHILE 25
75.214	(27) JAPAN 26
74.886	(26) THAILAND 27
73.188	UAE 28
71.394	(24) FRANCE 29
70.990	(29) CZECH REPUBLIC 30
70.821	(30) ICELAND 31
70.649	(31) INDIA 32

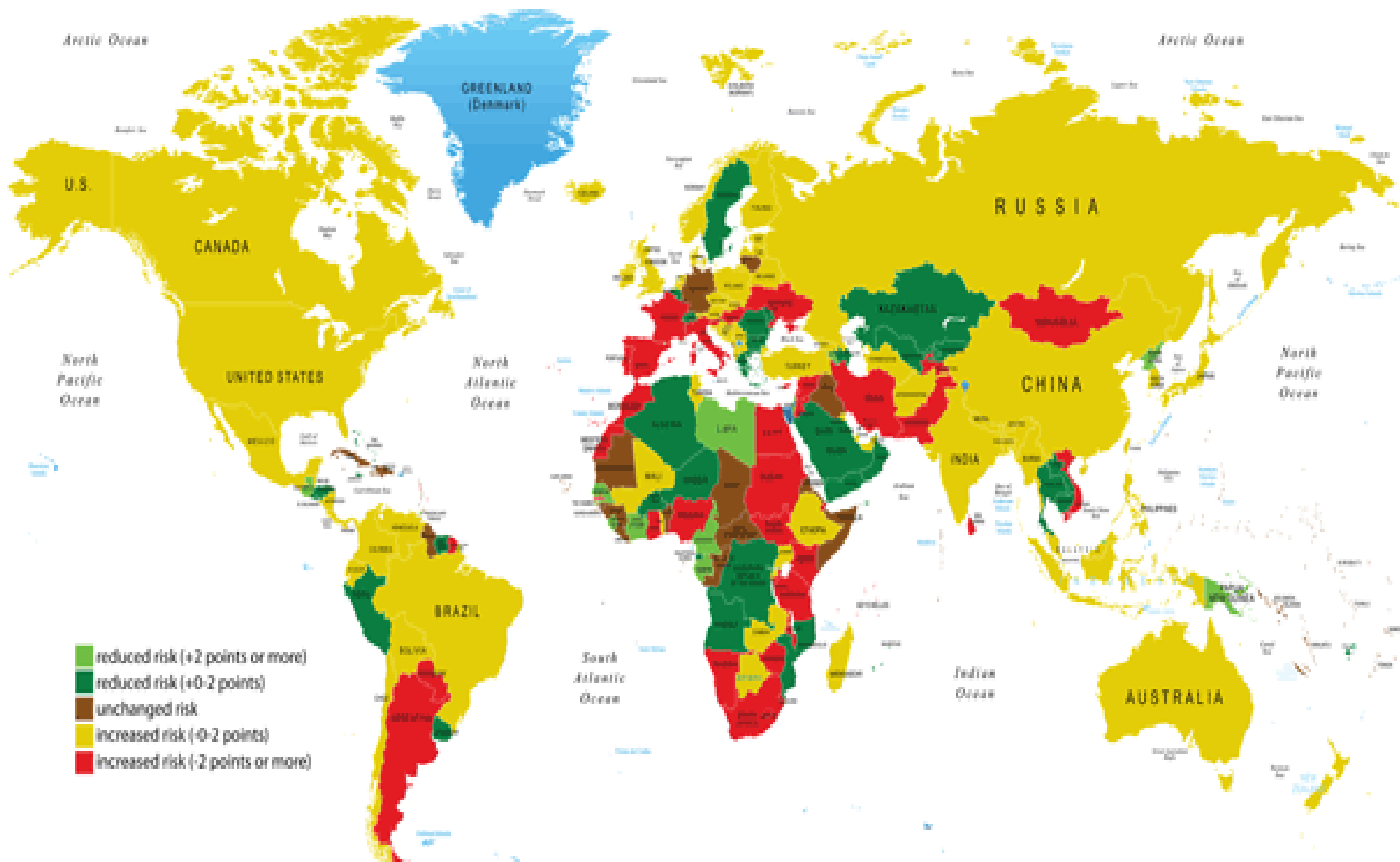


COUNTRY RISK SPECIFIC INDICES

Euromoney
Institutional Investor
COFACE

Country risk: no longer the monopoly of developing countries

Euromoney Country Risk Survey Results, June 2012



COFACE

155 countries

Country risk + Business climate ratings:

➡ **Investment grade**

- ➡ A1= steady economic and political situation
- ➡ A2= weak default probability
- ➡ A3= adverse circumstances may lead to worsening payment record
- ➡ A4= patchy payment record could be worsened by adverse economic/political developments

➡ **Speculative grade:**

- ➡ B= unsteady economic and political environment
- ➡ C= bad payment record
- ➡ D= high risk profile and very bad payment record





Coface Credit Rating (2013)

☞ Canada= A1

☞ Australia = A1

☞ Japan= A1

☞ USA= A2

☞ Korea= A2

☞ Chile = A2

☞ China= A3

☞ Brazil = A3

☞ India= A3

☞ Mexico= A4

☞ Tunisia= B

☞ Russia= B

☞ Algeria= B

☞ Egypt= C

☞ Vietnam= C

☞ Ukraine = C

☞ Venezuela = C

☞ Argentina = C

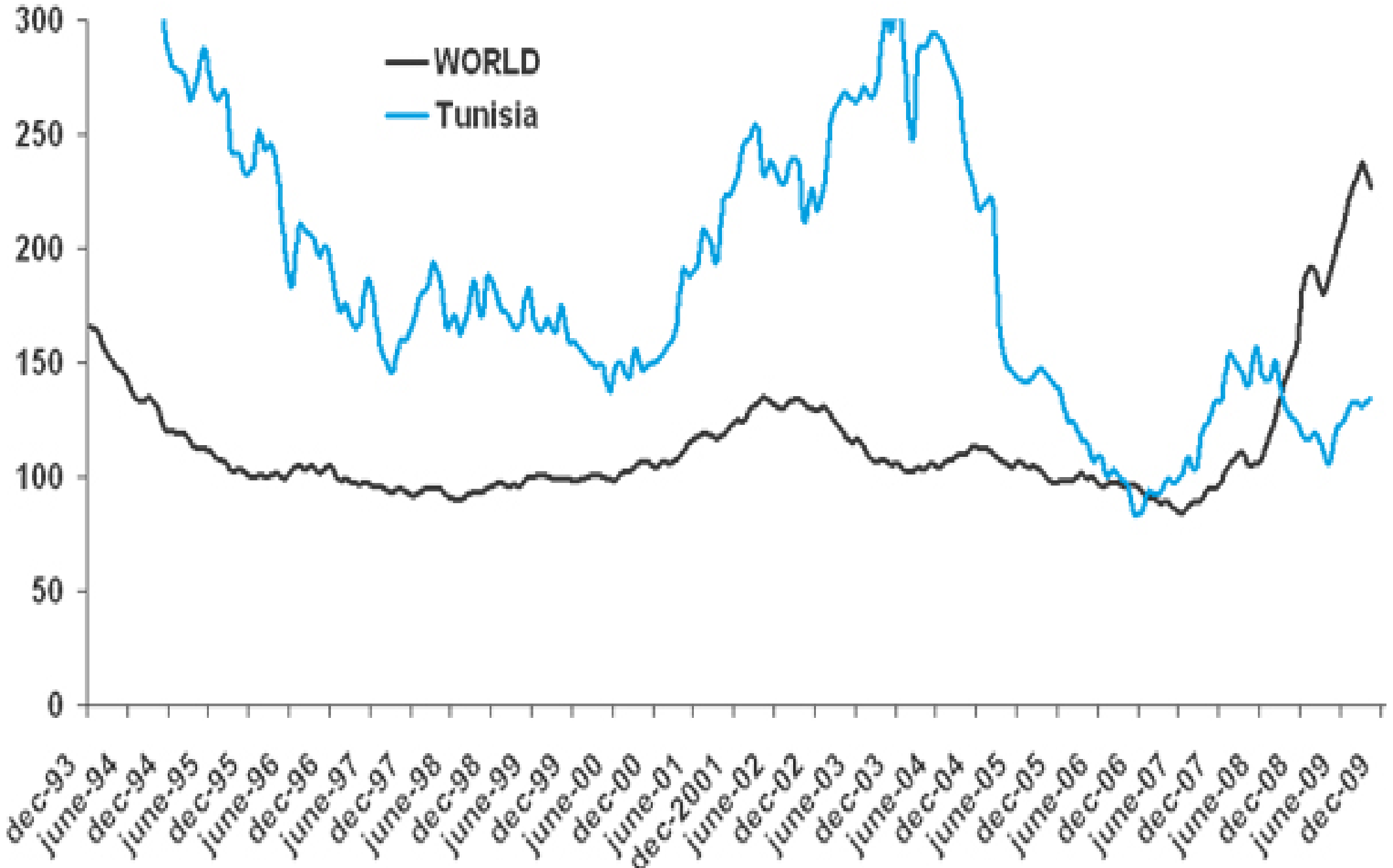
☞ Cuba = D

☞ RCI = D

☞ Nigeria = D



Coface rating of corporate payment arrears



Country risk: **Governance** matters!

- ☞ Corruption
- ☞ Regulatory framework
- ☞ Business conditions
- ☞ Transparency
- ☞ Corporate and sovereign governance



World Bank: « Doing Business » in 2013

1835 Countries

10 Parameters

Ranking does not take into
consideration the macroeconomic
framework nor organized crime

Singapore	1
Hong Kong	2
New Zealand	3
United States	4
Denmark	5
Norway	6
United Kingdom	7
Korea, Rep.	8
Georgia	9
Australia	10
Finland	11
Malaysia	12
Sweden	13
Iceland	14
Ireland	15
Taiwan	16
Canada	17
Thailand	18
Mauritius	19
Germany	20



China= 91
Russia= 112
Brazil= 130
India= 132

Doing Business in China?

REGION	East Asia & Pacific	DOING BUSINESS 2013 RANK	DOING BUSINESS 2012 RANK	CHANGE IN RANK
INCOME CATEGORY	Upper middle income	91	91	0
POPULATION	1,344,130,000	DOING BUSINESS 2013 DTF** (% POINTS)	DOING BUSINESS 2012 DTF** (% POINTS)	IMPROVEMENT IN DTF** (% POINTS)
GNI PER CAPITA (US\$)	4,930	60.6	59.5	↑ 1.1

TOPIC RANKINGS	DB 2013 Rank	DB 2012 Rank	Change in Rank
Starting a Business	151	153	↑ 2
Dealing with Construction Permits	181	181	No change
Getting Electricity	114	113	↓ -1
Registering Property	44	41	↓ -3
Getting Credit	70	67	↓ -3
Protecting Investors	100	98	↓ -2
Paying Taxes	122	118	↓ -4
Trading Across Borders	68	60	↓ -8
Enforcing Contracts	19	20	↑ 1
Resolving Insolvency	82	78	↓ -4

Heritage Foundation's Index of Economic Freedom

- ➡ 1. HongKong
- ➡ 2. Singapore
- ➡ 3. Luxemburg, New Zealand
- ➡ 5. Ireland
- ➡ 6. Denmark, Estonia, USA
- ➡ 9. Australia, UK
- ➡ 11. Finland, Iceland, Netherlands, Sweden
- ➡ 15. Switzerland
- ➡ 16. Chile
- ➡ 18. Canada
- ➡ 19. Austria, Belgium, Germany
- ➡ 40. France

➡ Trade + Fiscal Burden, + Government Intervention, + Monetary Policy, + FDI + Inflation + External Competitiveness + Banking sector

WORST:
Argentina, Colombia, Venezuela, China, Russia, Vietnam, Romania, Ukraine, Nigeria, Iran, Syria, Cuba...



Freedom House:

Freedom in the World

Free countries (89)

- ➔ Australia
- ➔ Finland
- ➔ Malta
- ➔ Slovenia
- ➔ Uruguay
- ➔ Bulgaria
- ➔ Chile
- ➔ Costa Rica
- ➔ Mauritius
- ➔ Poland

Not Free countries (47)

- ➔ Cameroon
- ➔ Congo
- ➔ Haiti
- ➔ Iran
- ➔ China
- ➔ Vietnam
- ➔ Burma
- ➔ Cuba
- ➔ Saudi Arabia
- ➔ Syria
- ➔ Turkmenistan



World Bank & Governance Assessment=

traditions and institutions by which authority is exercised

= overall quality of public and private management process

CHINA



Country's Percentile Rank (0-100) ?

EMCs & Shadow Economy

Country ↓	% GNP Informal Economy
Georgia	67.3
Bolivia	67.1
Panama	64.1
Azerbaijan	60.6
Peru	59.9
Zimbabwe	59.4
Tanzania	58.3
Nigeria	57.9
Thailand	52.6
Ukraine	52.2
Guatemala	51.5
Uruguay	51.1
Honduras	49.6
Zambia	48.9
Belarus	48.1
Armenia	46.3
Russia	46.1
Benin	45.2
Nicaragua	45.2
Moldova	45

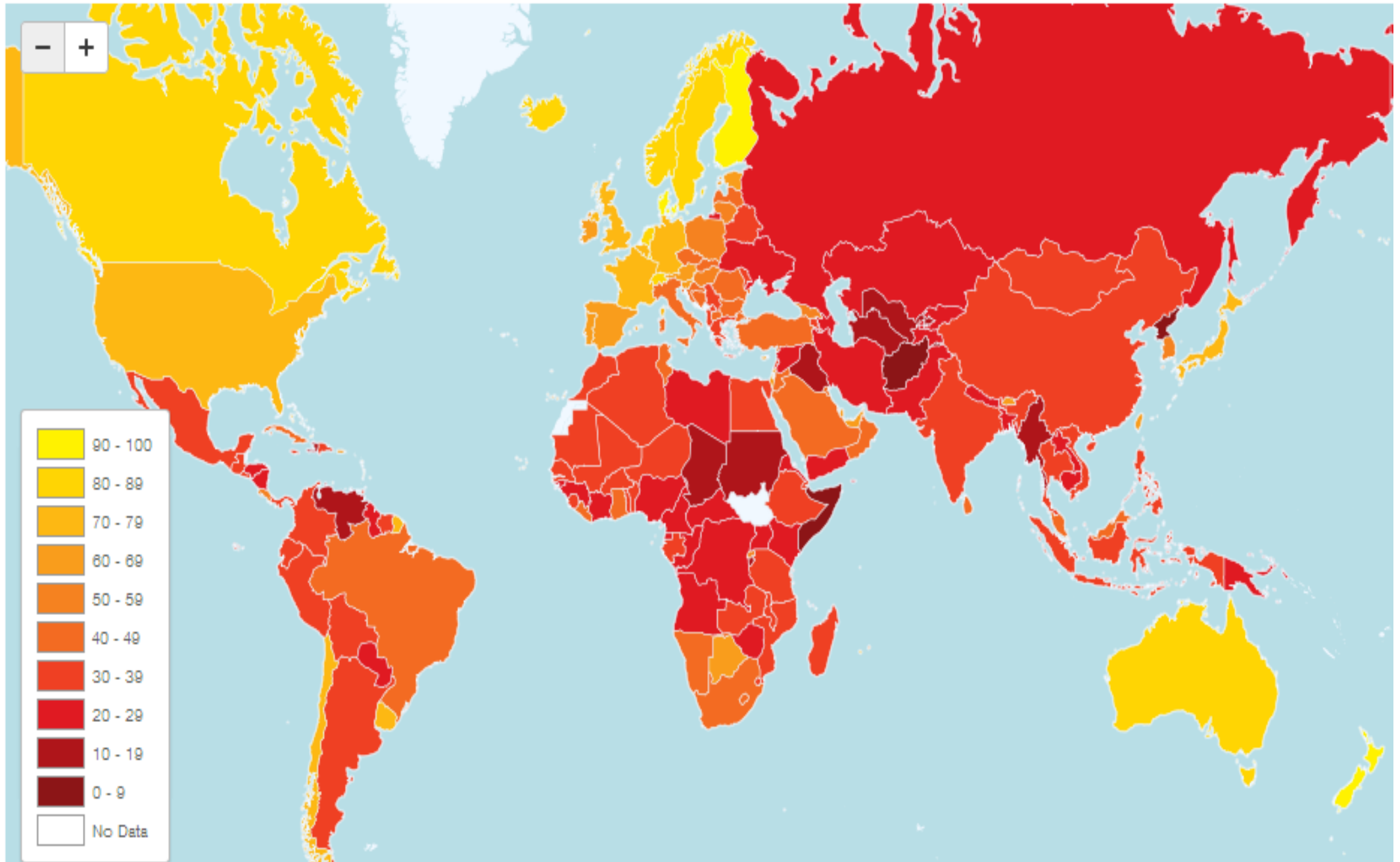
Sources: World Bank, July 2010

Hernando de Soto

Michel H. Bouchet/SKEMA (c

Assessing corruption?

CPI + Annual Bribe index 174 countries



Measuring Corruption?

CPI-2012/13

1	Denmark
1	Finland
1	New Zealand
4	Sweden
5	Singapore
6	Switzerland
7	Australia
7	Norway
9	Canada
9	Netherlands
11	Iceland
12	Luxembourg
13	Germany
14	Hong Kong
15	Barbados
16	Belgium
17	Japan
17	United Kingdom
19	United States
20	Chile

Brazil= 69
 China= 80
 India= 94
 Russia= 133



150	Paraguay
154	Guinea
154	Kyrgyzstan
156	Yemen
157	Angola
157	Cambodia
157	Tajikistan
160	Dem. Rep. Congo
160	Laos
160	Libya
163	Equatorial Guinea
163	Zimbabwe
165	Burundi
165	Chad
165	Haiti
165	Venezuela
169	Iraq
170	Turkmenistan
170	Uzbekistan
172	Myanmar
173	Sudan
174	Afghanistan
174	Korea (North)
174	Somalia

UNDP Human Development Index

☞ What is development?

☞ **Economic growth** + those conditions that make growth **sustainable** over the long-term =

☞ Σ life expectancy, education, health, infrastructure, institutions, governance...



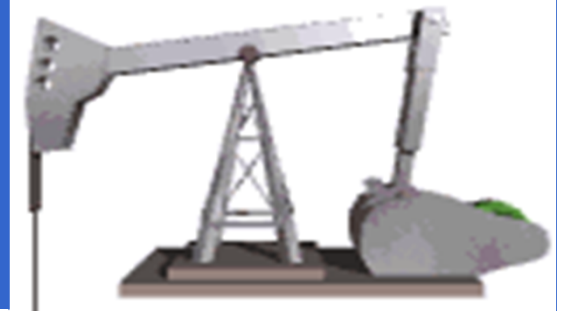
1. Norway
2. Australia
3. United States
4. Netherlands
5. Germany
6. New Zealand
7. Ireland
8. Sweden
9. Switzerland
10. Japan
11. Canada
12. Korea
13. Hong Kong
14. Iceland
15. Denmark
16. Israel
17. Belgium
18. Austria
19. Singapore
20. France



144. Côte d'Ivoire
145. Comoros
146. Malawi
147. Sudan
148. Zimbabwe
149. Ethiopia
150. Liberia
151. Afghanistan
152. Guinea-Bissau
153. Sierra Leone
154. Burundi
155. Guinea
156. Central Af. Rep
157. Eritrea
158. Mali
159. Burkina Faso
160. Chad
161. Mozambique
162. Congo (DR)
163. Niger

Development = Economic Growth + key conditions that make it sustainable!

	CHILE	COSTA RICA	RUSSIA	GABON
GDP/per capita	\$15,000	\$11,000	\$15,000	\$14,000
Life Expectancy	79	80	67	61
HDI Rank	40	62	55	106



	ARMENIA	SRI LANKA	CONGO	ANGOLA
GDP per capita	\$5000	\$5000	\$5000	\$5000
Life expectancy	74	75	57	51
HDI Rank	87	97	142	148

Conclusion

Assessing country risk? Economic Intelligence!

1. Macroeconomic analysis
2. Balance of payments analysis: liquidity & solvency
3. Socio-political analysis
4. Market consensus: rating agencies
5. Business environment: corruption, bureaucracy, institutions, transparency
6. Interplay country-global system

