

Insuring the Climate Transition

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October 6th, 2022

UN
environment
programme



finance
initiative

Principles for
Sustainable Insurance

About UNEP-FI Principles for Sustainable Insurance (PSI)

- 1 Launched at the 2012 UN Conference on Sustainable Development,
- 2 Global framework for the insurance industry to address environmental, social and governance risks and opportunities
- 3 Some recent initiative: NZIA, work on the V20 Insurance Sustainability, development of ESG guides for insurers, the TCFD program
- 4 TCFD program actively underway at PSI since 2019

Objectives of PSI TCFD program

- 1** **Develop methodologies** for assessing and disclosing climate-related underwriting risks and opportunities according to TCFD recommendations
- 2** Contribute to the creation of an **harmonized approach to TCFD disclosures**
- 3** **Signal support** for the FSB work on climate risk transparency through the TCFD recommendations

Recent initiatives: Increasing focus on regions

- 1 Global pilot project**, to drive technical implementation of TCFD recommendations
- 2 Working on climate issue paper** in context of **Life & Health insurance**
- 3 Regional engagements** for the implementation of disclosure frameworks

TCFD Pilot of Recommendations



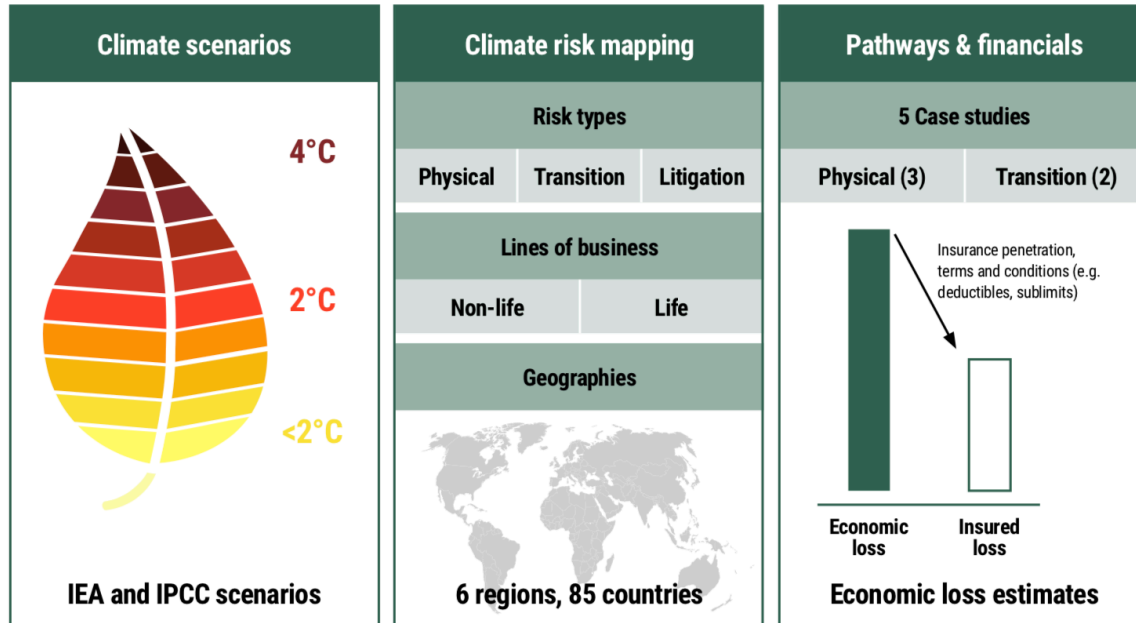
Advice & Review



COLUMBIA LAW SCHOOL
SABIN CENTER FOR CLIMATE CHANGE LAW

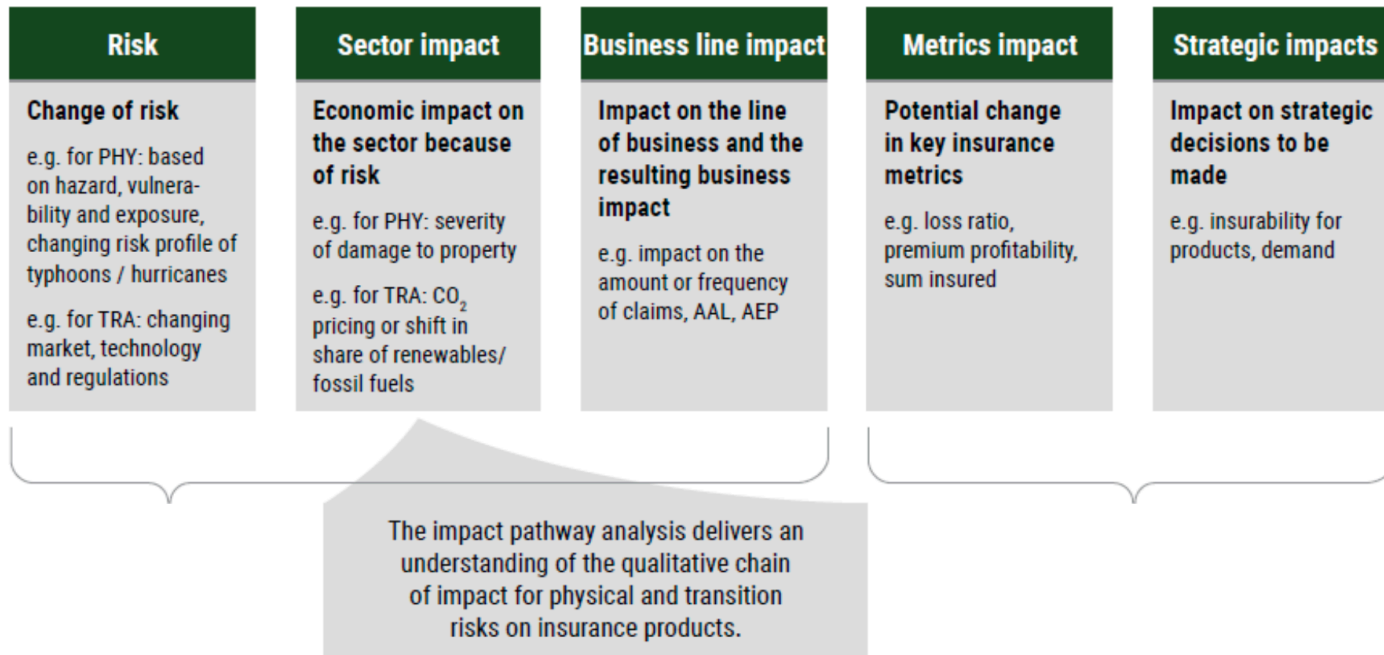
Analytical framework

Combining the various risk sources in an **integrated** approach



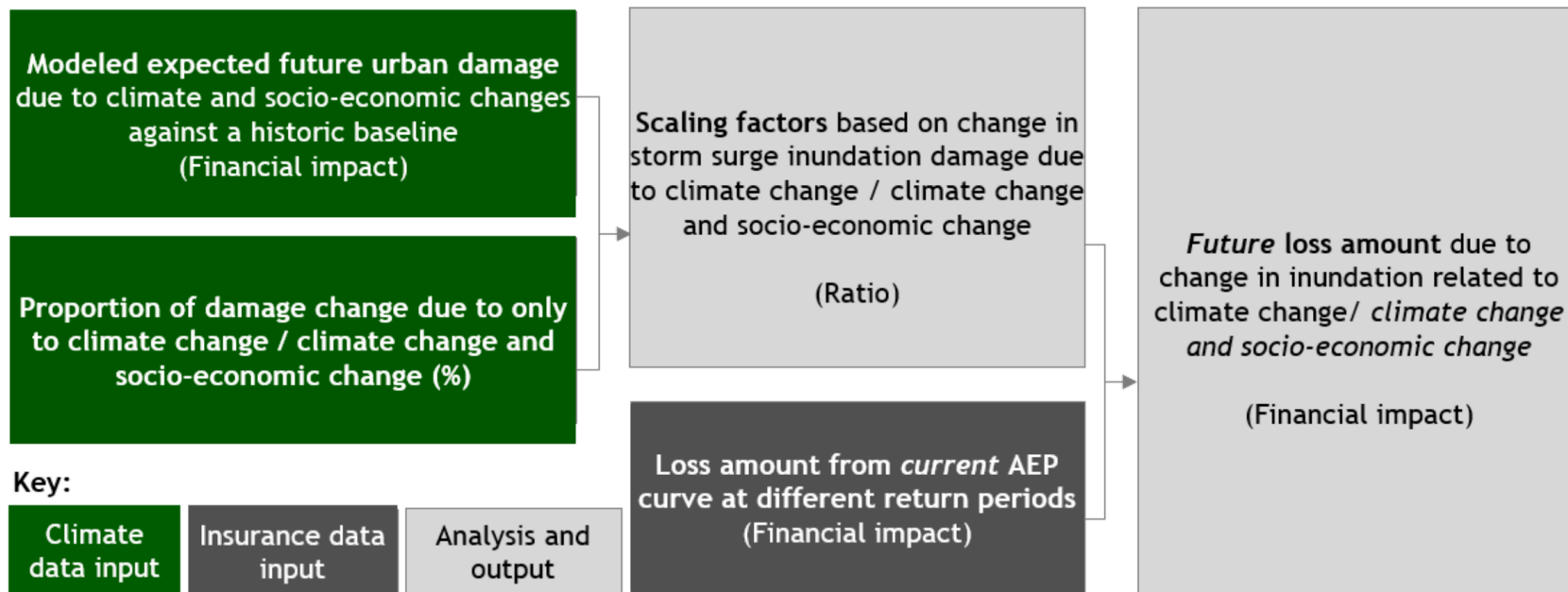
- Multi-risk approach
- Litigation risk methodology
- Economic impact models
- Global multi-line coverage

Impact pathways analyses



Valuing future loss amounts

Urban flood exemple



Case studies

Multiple perils in various jurisdictions with different products and exposures



Select option from dropdown menu

Nova Scotia - Coastal	Socio-economic add-on?	No
The socio-economic add-on enables users to select whether the impact of socio-economic change should be included in the scaling factors and future loss amounts. Socio-economic changes modelled in the WRI dataset are aligned with Shared Socio-economic Pathway 2 (SSP2).		

Climate indicators

Historical climate indicators

Temperature - Annual absolute (°C)	Precipitation - Annual absolute (mm)
6.1	1373

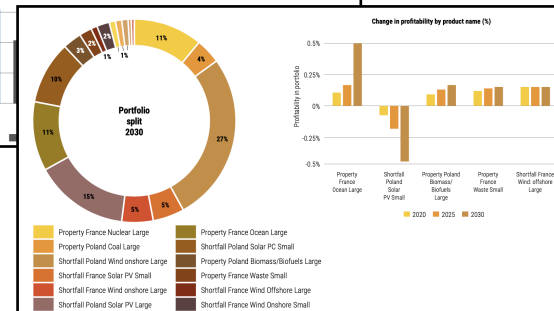
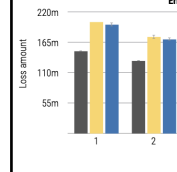
Financial indicators

Exceedance probability curve with current loss amounts taken from current EP curve

Return period (years)	Aggregate exceedance probability	Current loss amount (CAD)
1000	0.001	150.00m
500	0.002	132.25m
250	0.004	115.00m
100	0.01	100.00m
50	0.02	75.00m
25	0.04	56.25m
10	0.1	28.13m
5	0.2	14.06m

SAMPLE OUTPUTS

Comparison of the median loss amounts in CAD between the RCP8.5 2050 scenario and the RCP4.5 2050 scenario for Nova Scotia - Coastal flooding
Error bars indicate the upper and lower loss amounts



Climate change litigation by jurisdiction

Country	Number of Cases
United States	1188
Australia	96
United Kingdom	60
European Union	57
Canada	21
New Zealand	18
Spain	13
France	10
India	10
Brazil	6
Germany	5
Other	67
Total	1551

All climate change litigation, not specific to insurance

Two proposed methods

- 1 Risk management based approach
(developed by project group)
- 2 Stress test scenarios based approach
(developed by the Bank of England)

Based on Sabin Center Climate [Litigation Databases](#)

Risk management based approach

Three key factors relevant to assessing litigation risk

Likelihood that a
litigation will be
brought

Chance that a
litigation will rule in
favor of plaintiff

Cost of remedy
sought



Litigation due to fossil fuel production,
promotion and GHG emissions

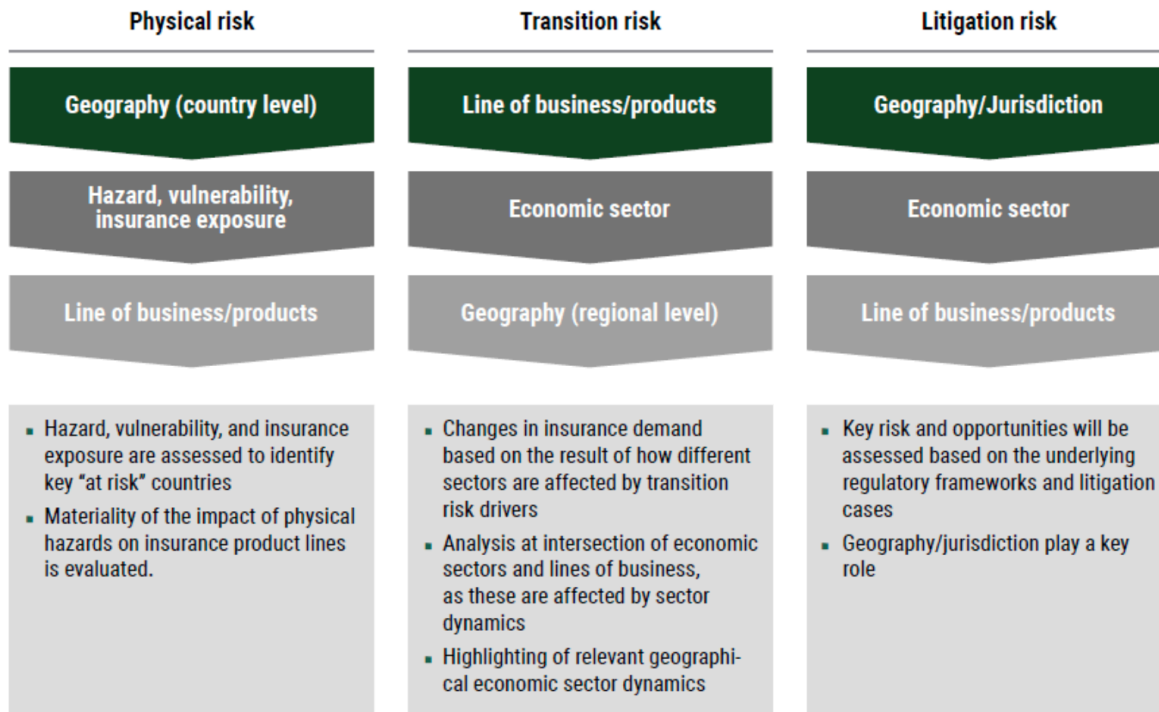


Litigation pertaining to physical implications
of climate change



Litigation pertaining to breaches of regulatory
frameworks

Summary: From risk pillars towards risk integration



Opportunities

Across your insurance portfolio	<ul style="list-style-type: none">• Other lines by risk class• Life & Health analysis• Multi-risk correlation analysis• Portfolio level analysis	<ul style="list-style-type: none">• Terms and conditions• Litigation analysis• Litigation stress tests• Exposure, vulnerability futures
Across scenario types	<ul style="list-style-type: none">• NGFS scenarios• Increased resolution	<ul style="list-style-type: none">• Multi-risk scenarios
Across your organisation	<ul style="list-style-type: none">• Combine underwriting & investment• Cross-portfolio level analysis	
Across climate	<ul style="list-style-type: none">• Net-zero underwriting & investment• Further focus on opportunity side	

Thank you!

Contact

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Reports

