International efforts in greening the financial system – The work of the Network for Greening the Financial System

29. April 2021
Dr. David Döhrmann, Directorate General Markets, Deutsche Bundesbank
A picture is worth a thousand words

Global mean temperatures

Source: Institute for Environmental Analytics, https://showyourstripes.info/
Despite the overwhelming evidence that climate change is already inflicting staggering damages on our societies, the longer-term horizon of more devastating impacts may discourage policymakers from taking more determined action today.
Physical and transition risk in Europe

Physical and transition risk for euro area firms

Physical risk intensity

Source: Four Twenty Seven and ECB Calculations

GHG emissions by country-sector

Source: Urgentem and ECB Calculations
Climate risks are a source of financial risks
Mapping of climate risk categories to traditional financial risk categories

<table>
<thead>
<tr>
<th>Physical risk</th>
<th>Business</th>
<th>Credit</th>
<th>Market</th>
<th>Legal</th>
</tr>
</thead>
<tbody>
<tr>
<td>Political and social risks in the aftermath of natural catastrophes</td>
<td>Extreme weather events might impact the solvency of credit users</td>
<td>Market risks on the asset side of the balance sheet of insurance/financial companies</td>
<td>Uninsurability of risks due to an increase of extreme weather events</td>
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<td>Transition risk</td>
<td>Reputation risks: Who is financing “dirty” businesses?</td>
<td>Risks resulting from the exposure to concerned economic sectors</td>
<td>Unexpected write downs on stranded assets</td>
<td>Liability: Financial claims as a result of an insufficient disclosure of carbon risks</td>
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</tbody>
</table>
Network for Greening the Financial System
A coalition of the willing

Paris December 2017 One Planet Summit: 8 Central banks and Supervisors established the NGFS

Today: 90 members and 13 observers. Covering 5 continents.

Coalition of the willing. Not a Standard Setting Body.

NGFS members’ jurisdictions cover:
- Supervision of 100% of the global systemically important banks and over 2/3 of the global systemically important insurers;
- Over 75% of global greenhouse gas emissions.
Climate change source of structural change in the economy/financial system with a number of specificities:

- Far-reaching impact in breadth and magnitude;
- Foreseeable nature;
- Irreversibility;
- Dependency on short-term actions for medium/long-term impacts;
- Non linearity and tipping points.

Climate-related risks are a source of financial risk (in particular physical risks and transition risks). It is therefore within the mandates of central banks and supervisors to ensure the financial system is resilient to these risks.
Network for Greening the Financial System
The first NGFS comprehensive report sets out 6 recommendations

Central banks and supervisors
1. Integrating climate-related risks into financial stability monitoring and micro-supervision.
2. Integrating sustainability factors into own-portfolio management.
3. Bridging the data gaps.
4. Building awareness and Intellectual capacity and encouraging technical assistance and knowledge sharing.

Policy makers
5. Achieving robust and internationally consistent climate- and environment-related disclosure.
6. Supporting the development of a taxonomy of economic activities.

A call for action
Climate change as a source of financial risk
April 2019
## Network for Greening the Financial System

### Governance structure

### Steering Committee
- **Chair:** Frank Elderson (European Central Bank)

<table>
<thead>
<tr>
<th>WS1</th>
<th>Microprudential/Supervision</th>
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<td>Chair:</td>
<td>Gek Choo Goh (Monetary Authority of Singapore)</td>
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<th>WS2</th>
<th>Macrofinancial</th>
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<td>Chair:</td>
<td>Sarah Breeden (Bank of England)</td>
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<th>WS3</th>
<th>Scaling up Green Finance</th>
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<td>Chair:</td>
<td>Sabine Mauderer (Deutsche Bundesbank)</td>
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### Bridging the Data Gaps
- **Co-Chairs:** Patrick Amis (SSM/ECB) & Fabio Natalucci (IMF)

### Research
- **Chair:** Ma Jun (People’s Bank of China)

### NGFS Plenary
Network for Greening the Financial System
Work programme and deliverables

WS1
Microprudential/ Supervision
Chair: Gek Choo Goh (MAS)

Ongoing:
- Overview of environmental risk analysis methodologies
- Risk differentials between green, non-green and brown financial assets
- Guide on integrating climate-related risks into prudential supervision

Past:
- Identified indicators of climate-related financial stability risks
- NGFS research priorities (with WS3)
- Development of NGFS reference scenarios

Ongoing and future:
- Refine and expand the scope of the scenarios

WS2
Macrofinancial
Chair: Sarah Breeden (BoE)

Past:
- Sustainable portfolio management practices

Ongoing and future:
- Climate change impacts on monetary policy
- Central banks’ disclosure of climate-related risk
- Market transparency

WS3
Scaling up Green Finance
Chair: Sabine Mauderer (BBk)

Past:
- Identified indicators of climate-related financial stability risks
- NGFS research priorities (with WS3)
- Development of NGFS reference scenarios

Past:
- Sustainable portfolio management practices

Ongoing and future:
- Climate change impacts on monetary policy
- Central banks’ disclosure of climate-related risk
- Market transparency
Key takeaways

There is a need for …

- **financial authorities** to support: (i) global disclosure frameworks and efforts to establish a comprehensive corporate disclosure standard aligned with the TCFD recommendations; and (ii) the development of a global set of sustainability reporting standards.

- **multinational financial institutions** to adopt and promote global voluntary sustainability standards and disclosure frameworks in the different jurisdictions in which they operate.

- **credit as well as ESG rating providers** to enhance transparency surrounding their methodologies.

- **regulators** to require financial institutions to consider material climate and sustainability factors as financial factors. Financially material climate and sustainability factors should be part of the fiduciary duty of asset managers.

- **national and multilateral development banks** to strengthen their support to mobilize capital towards green investment projects, particularly in developing and emerging markets.
Network for Greening the Financial System
Sustainable finance market dynamics

Companies and other organisations committed to supporting TCFD

<table>
<thead>
<tr>
<th>Year</th>
<th>Financials</th>
<th>Non-financials</th>
<th>Government/other</th>
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<tr>
<td>2017</td>
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Source: TCFD, Network for Greening the Financial System

Responsible investment-related policy instruments

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<tr>
<th>Year</th>
<th>Global</th>
<th>Australia</th>
<th>South America</th>
<th>North America</th>
<th>Europe</th>
<th>Asia</th>
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Source: PRI, Network for Greening the Financial System
### Volumes of green bonds issued and maturing: Total*

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<th>Year</th>
<th>Africa</th>
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*Includes non-financial corporations other than utilities and power generation.

**Source:** Bloomberg

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**Sabine Mauderer, Deutsche Bundesbank:**

"Given the unprecedented challenges posed by climate change, it is not a matter of if we need to scale up green finance, but a matter of how we go about it.“
For more details go to
  www.ngfs.net/en
  www.bundesbank.de/en/bundesbank/green-finance
  
or to the NGFS Twitter account
  @NGFS_