



# 22nd REFORM Group Meeting

Unlocking the finance potentials of international climate finance

Berthold Breid, 2018



## **Agenda**



- 1 | Paris Agreement and the landscape of international climate finance
- 2 | Challenges to enable international climate finance flows
- 3 | Way ahead: how to unlock the full potential through effectively addressing barriers?





# **Defining climate finance**



#### Definition of climate finance by the Standing Committee on Finance

Climate finance aims at reducing emissions, and enhancing sinks of greenhouse gases and aims at reducing vulnerability of, and maintaining and increasing the resilience of, human and ecological systems to negative climate change impacts.



#### Paris Agreement: milestone of international climate negotiations

- 179 Parties have ratified it as of today (of 197 Parties to the UNFCCC)
- main goal: limiting global temperature rise to well below 2°C (ideally 1.5°C) above pre-industrial levels
- to be reached by implementing the so-called (Intended) Nationally
   Determined Contributions ((I)NDCs) ➤ Significant investment needs!

#### International climate finance needs



### Investment needs according to (I)NDCs of Non-Annex II parties: USD > 4.4 tn

	USD billion	USD billion / year
Total investment needs referred to in conditional INDCs (includes both un- and conditional elements)	4,484 <sup>1</sup>	349 <sup>2</sup>
Total investment needs for mitigation	1,967	
Total investment needs for adaptation	618	
<ul> <li>Unspecified (potentially including cross-cutting or integrated approaches with adaptation and mitigation elements)</li> </ul>	1,899	

Source: Germanwatch, Perspectives, 2016.

#### **Sources**

From national budgets
USD 57 bn (total)<sup>3</sup>

International investment

?

#### **Notes**

- 1 Sum of quantified total investment needs referred to in INDCs with conditional aspects. In most cases, it is not clear how much of this amount will be covered by national budgets. Around 56% of the total amount can be attributed to India. Iran also has a relatively large share with around 19%.
- 2 Annual approx., determined from different periods mentioned (between different INDCs, but also between mitigation and adaptation within one INDC) such as 2015-2030, 2020-2025, 2020-2030, 2015-2035. For INDCs with target year 2030 but no start year, timeframe 2020-2030 is assumed.

3 As stated by 19 countries

#### Relevance of international climate finance I



#### Global climate finance flows put in perspective

Estimated finance volume (developed/developing) in 2013 – 2014: USD 714 bn

...vis-à-vis annual investment needs 2015

- 2030 for a sectoral transformation:

Infrastructure: USD 6 tn

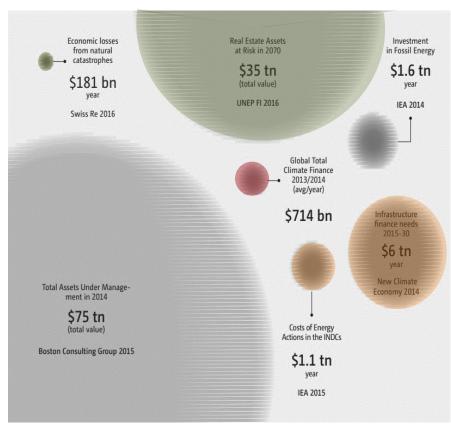
Energy: USD 1.1 tn

...vis-à-vis losses and risks associated with climate change:

- Natural catastrophes (average annual cost 2005 – 2015): USD 181 bn
- Real Estate Assets at risk in 2070:
   USD 35 tn (total value)

...vis-à-vis other annual investment flows:

- Fossil Energy: USD 1.6 tn
- Assets under management in 2014:
   USD 75 tn



Source: UNFCCC SCF, 2016.

# International climate finance provision



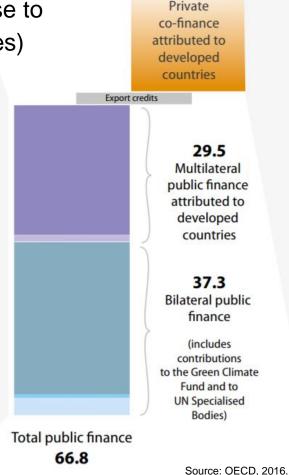
#### UN target for int. climate finance: USD 100 bn per year by 2020

By **2020**, public climate finance is forecast to increase to USD 67 billion by 2020 (OECD using existing pledges)

target only achievable with private sector

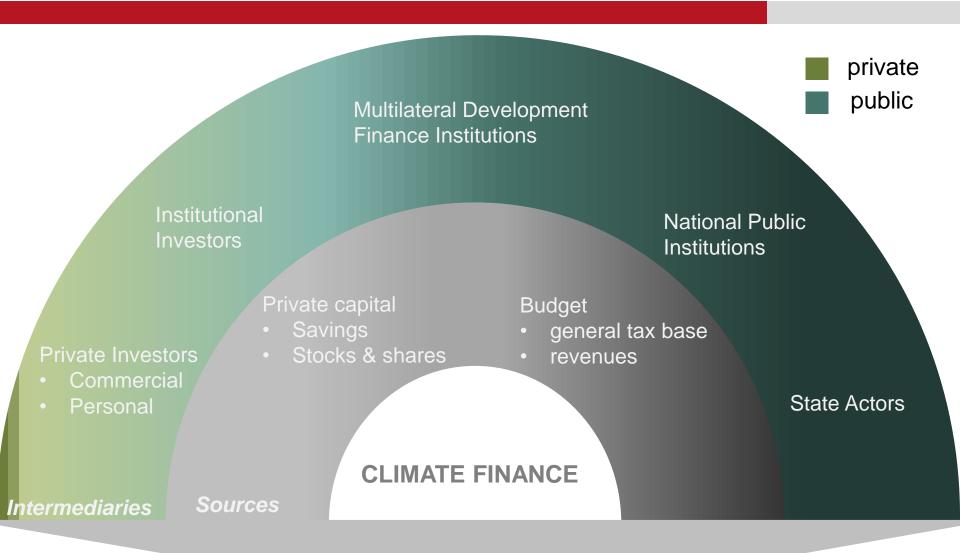
Private finance mobilisation potential depending on:

- share of projects with a direct private finance mobilisation potential in the portfolios of bi-/multilateral actors
- ratio between (attributed) private finance mobilised and public finance
- 2020 2025: continue existing target
- By **2025**, a new climate finance target is to be set
  - Starting with a floor of USD 100 bn



# 1 | Sources, intermediaries and recipients



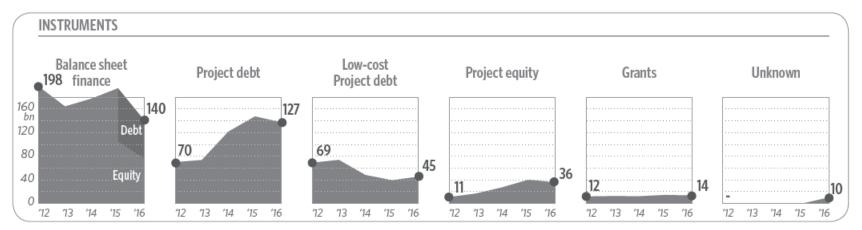


Recipients: governmental, private and non-governmental entities in developing countries

#### | Financial instruments



#### Breakdown of total climate finance by instrument (2012-2016, USD bn)



Source: CPI, 2015.

# Balance sheet financing

= finance delivered to a direct debt or equity investment by a company or FI

# Debt financing

= sub-commercial rate loans by public FIs

 commercial rate loans by private commercial banks

# Project level equity

= investor as a part owner of a project with a higher risk and higher profit assumed

#### Guarantees

de-risking
 instrument where a
 guarantor provides
 a guarantee in
 exchange for a fee

#### Grants

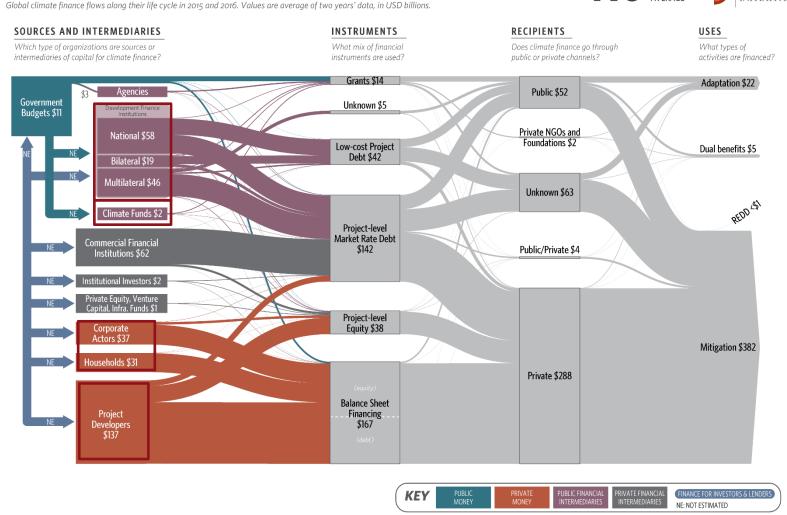
= commonly used for non-revenue generating activites and provided by bilateral and international FIs



#### LANDSCAPE OF CLIMATE FINANCE IN 2015/2016

410 BN USD ANNUAL AVERAGE

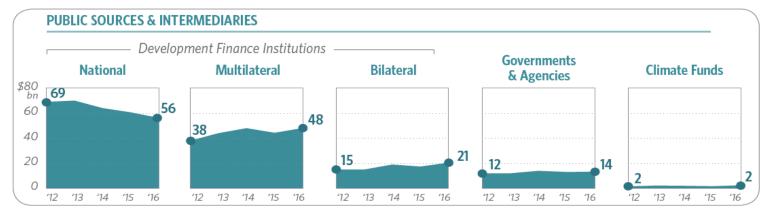




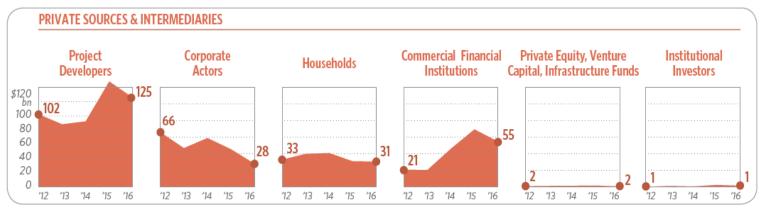
Source: CPI, 2017.



#### Public and private investors at a glance (2012-2016, USD bn)



Source: OECD 2017; ODI 2017; CPI analysis

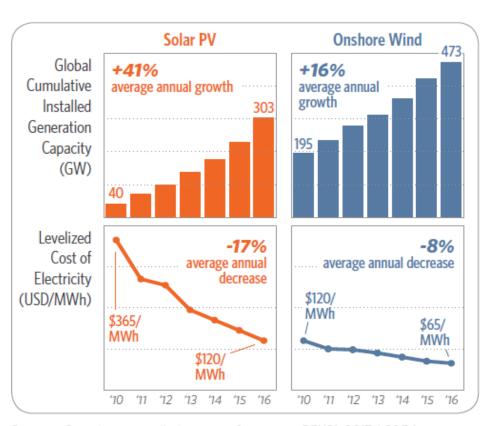


Source: BNEF 2017a; CPI analysis



#### **Sector focus: Energy**

- Mitigation activities accounted for an average of 93% of climate finance between 2015 and 2016.
   Of that investment, 74% was for renewable energy generation.
- In 2015, total renewable energy investment increased by 25% from its 2014 level, driven by an increase in capacity additions (China, U.S., Japan).
- Interestingly, for both 2015 and 2016, private investment in renewable electricity generation exceeded new fossil-fuel power generation investment by over 100%.



Sources: Cumulative installed capacity figures see REN21, 2017. LCOE figures see IRENA, 2015; IRENA, 2013; World Energy Council, 2016a; World Energy Council, 2016b; REN 21, 2017. Levelized cost figures are used for onshore wind only as the majority of installed wind capacity globally is composed of onshore installation.



#### Was there a 'Paris effect' in mobilizing climate finance?

 Increase in overall finance in 2015: Not due to a major scale up of public finance, (despite a small increase in grants provided as official development assistance), but rather due to an increase in private finance.



- But momentum in 2015 may result in a larger difference in future:
  - private finance data noted increases in direct investment by institutional investors and increased lending by commercial banks
  - 43 governments committed \$10.3 billion to the Green Climate Fund, replacing much needed low-cost or risk-taking capital



Source: UNFCCC, 2015..



Challenges to enable international climate finance flows



Source: fotolia

### Current support structure for access to finance



#### What kind of support has been made available to potential recipients?

Climate Funds Integrated financing windows for capacity building (e.g. institutional strengthening, accreditation support, strategic advice, project development) **Example:** GCF Readiness and Preparatory Support Programme

Multi- & bilateral TA

Readiness support programs by multi- and bilateral development agencies and other experts offering capacity building (also in cooperation with Funds) **Example:** UNEP / UNDP/ WRI GCF Readiness Programme; RENAC

Global initiatives

Global initatives and think tanks increasing transparency within the international climate finance landscape and supporting cooperation among stakeholders **Example:** NDC Partnership Funding and Initiatives Navigator

#### 2 | International climate finance architecture

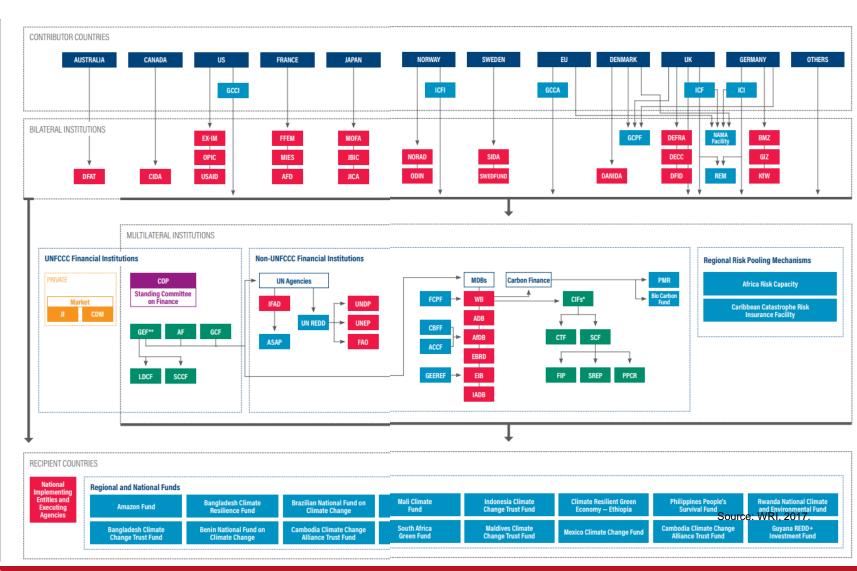


#### LEGEND

- Funds analyzed in this report
- Implementing agencies
- Funds not analyzed in the report
- \* The CIFs are administered by the World Bank
- \*\* GEF serves as secretariat for all the nonmarket UNFCCC funds except the GCF

Note: The schematic is indicative and does not capture all countries, climate funds and initiatives.

Source: Adapted by authors from ODI and HBF 2016.



### **Indentifying relevant climate finance instruments**



#### Taking into account their capacity, recipients may apply the following criteria:

#### Specific and procedural criteria General selection criteria scope of instrument (geographical, relevant funding criteria and technical) requirements funding duration investment priorities eligibility criteria funding volume economic aspects of funding (e.g. Official Development Assistance (ODA) eligibility of country interest rates) call cycle (annually, randomly) application process stakeholder duties stakeholder liabilities









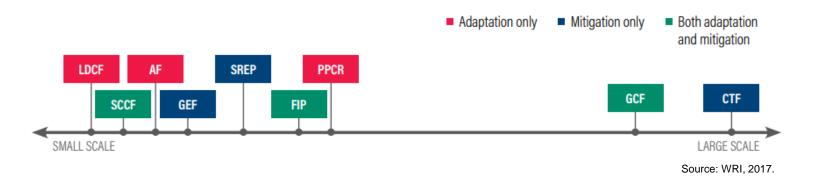


#### "Future of the Funds" by World Resources Institute (WRI) (2017)

There is growing pressure for policymakers to make the architecture of funds more effective and coherent – **Recommendations**:

# Operations

- Improve coordination among funds and between funds and countries
- Harmonize standards, accreditation requirements and proposal approval procedures
- Emphasize programmatic approaches that encourage systemic shifts
- Architecture
  - Short term: clarify specialization of funds
  - Long term: close or consolidate some funds

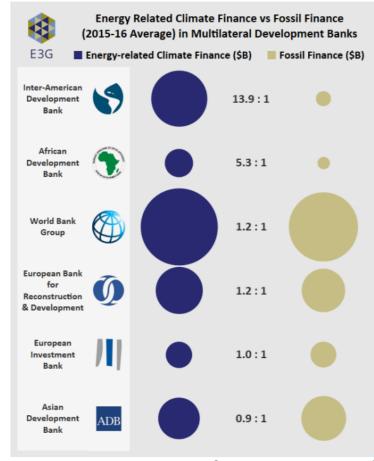


## 2 | Focus on: Multilateral Development Banks (MDBs)



# "Banking on Reform – Aligning Development Banks with the Paris Climate Agreement" by E3G (2018)

- Unique role of MDBs: complementing governments limited resources and leveraging multiple times their investments from private capital
- Insights from E3G Report:
  - IDB is leading the way
  - banks must do more to integrate climate change across their operations
  - revision of sectoral strategies over the next two years offers a key opportunity
  - MDBs begin tracking and self-reporting on their alignment with the Paris Agreement
  - MDBs should aim higher and offer technical assistance on long-term pathways that align with the goal of achieving net zero GHG emissions



**Source:** E3G analysis of OECD Climate Finance data<sup>7</sup> and Oil Change International database<sup>8</sup> Ratio covers investment in developing countries only. IFC only includes data for 2015<sup>9</sup>

#### 2 | Structure of international climate finance II



### Accessing international climate finance: Example GCF



#### **Multilateral access**

#### **Direct access**

Accredited Entities (AE)

- Entity Type: international
- Examples:







- Entity Type: regional, national
- Examples:







- Executing entity (EE): regional, national
- Example: Scaling Up of Modernized
   Climate Information and Early Warning
   Systems (Malawi)
  - ✓ AE: UNDP
  - ✓ EE: Department of Disaster
     Management Authority (DoDMA)

- Executing entity (EE): regional, national
- Example: Development of Argan orchards in Degraded Environment (Morocco)
  - ✓ AE: ADA
  - ✓ EE: National Agency for the Dev. of Oases and Argan Zones

#### 2 | Climate finance at COP23



# Bonn, Dez 2017: Climate finance as a highly debated prerequisite for the implementation of the Paris Agreement – Results:

- Multilateral climate funds: transferring the Adaptation Fund from the Kyoto Protocol to the Paris Agreement
- Loss and damage: working group to explore the financial aspects of dealing with loss and damage
- Transparency: modalities, procedures and guidelines on reporting of climate finance provided and received still under debate
- USD 100 bn goal:
  - developed countries are called upon to focus their next iteration of a regular report on ex-ante information about future climate finance
  - 100-billion goal will be extended until
     2025 and that a new target will be set
     no later than 2024



Source: UNFCCC, 2017



#### Are potential recipients "ready" to access international climate finance?

Climate Finance Readiness (UNDP): capacities of countries to plan for, access, deliver, and monitor and report on climate finance, both international and domestic, in ways that are catalytic and fully integrated with national development priorities and achievement of the [SDGs]

#### **Financial Planning**

- Assess needs and priorities, and identify barriers to investment
- Identify policy-mix and sources of financing

#### **Accessing Finance**

- Directly access finance
- Blend and combine finance
- Formulate project, progamme, sector-wide approaches to access finance

#### **Delivering Finance**

- Implement and execute project, programme, sector-wide approaches
- Build local supply of expertise and skills
- Coordinate implementation

#### Monitor, Report & Verify

- Monitor, report, and verify flows
- Performance-based payments

Source: UNDP, 2012.

An approach needs to be relative, responsive and reasonable.





#### 3

#### Donor response to unlock climate finance potential



In consultations with developing countries, the developed country parties to the UNFCCC have created a **roadmap**, which was published in October 2016 just before COP 22 in Marrakech.





# Successful and more efficient access to international climate finance through a different approach to capacity-building:

- focused on strengthening institutional capacities in a more sustainable way
- improving cross-sectoral coordination efforts for climate change interventions and related budgeting processes
- translation of actions into bankable projects (esp. in NDC context)
- broadening the target audience for capacity building efforts (esp. in relation to the private sector)
- encouraging South-South cooperation and the visibility of champions
- creating/improving policy and legislative frameworks for climate change actions



Source: GCF Readiness Programme, 2017.



# **Example: Capacity Building on Green Energy and Climate Finance**



- three-year capacity building programme on renewable energy and energy efficiency finance in the partner countries Thailand, Vietnam, Philippines, India and Indonesia (November 2015 – October 2018)
- extension of programme to Central America, Peru and Columbia
- Target audience: professionals from private (e.g. commercial banks, companies, project developers) and public institutions (e.g. ministries, public institutions)

## Adressing support requirements:

- ✓ strengthening capacities in a sustainable manner
- ✓ improving exchange among public and private sector
- ✓ supporting the development of bankable projects
- ✓ including a broad group of participants
- ✓ encouraging South-South peer learning
- ✓ input for improving policy and legislative frameworks







#### **About RENAC**



- RENAC is a Berlin-based training specialist for renewable energy and energy efficiency
- Until now we trained more than 10,000 participants from over 145 countries
- We offer renewable energy (RE) and energy efficiency (EE):
  - Trainings
  - Academic education
- We support third parties to build up own capacities for EE and RE training (installation of Training Centre/lab, Train-the-Trainer)







#### **RENAC** service expertise



- About 50 Face-to-Face and 70 online trainings.
- National and international expert and trainer pool: around 150 experts
- Founded in 2008, now 38 employees
- Highest quality standards with trainers, education, material and equipment
- Covering technical, financial, legal and project management related issues
- Training for policy makers, finance, engineers, project developers, technicians
- Independent
- Interdisciplinary and intercultural









# **RENAC** activities worldwide





#### **Selection of RENAC's references**



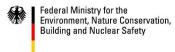












based on a decision of the German Bundestag





































#### **Selection of RENAC's references**













































# Thank you!

#### **Berthold Breid**

Renewables Academy (RENAC)

Schönhauser Allee 10-11 D-10119 Berlin

Tel: +49 30 52 689 58-71

Fax: +49 30 52 689 58-99

info@renac.de



#### References



Bonn Climate Change Conference, 2017. In-session workshop on long-term climate finance in 2017.URL: <a href="http://unfccc.int/cooperation\_support/financial\_mechanism/long-term\_finance/items/10290.php">http://unfccc.int/cooperation\_support/financial\_mechanism/long-term\_finance/items/10290.php</a>

Climate Action, 2017. Green finance & climate resilience among Fiji's top priorities for COP23. URL: <a href="http://www.climateactionprogramme.org/news/green-finance-climate-resilience-among-fijis-top-priorities-for-cop23">http://www.climateactionprogramme.org/news/green-finance-climate-resilience-among-fijis-top-priorities-for-cop23</a>

Climate Funds Update, 2016. The Global Climate Finance Architecture. URL: <a href="https://www.odi.org/sites/odi.org.uk/files/resource-documents/11021.pdf">https://www.odi.org/sites/odi.org.uk/files/resource-documents/11021.pdf</a>

Climate Policy Initiative (CPI), 2016. Global Climate Finance: An Updated View on 2013 and 2014 Flows, URL: <a href="https://climatepolicyinitiative.org/publication/global-climate-finance-updated-view-2013-2014-flows/">https://climatepolicyinitiative.org/publication/global-climate-finance-updated-view-2013-2014-flows/</a>

Climate Policy Initiative (CPI), 2015. Global Landscape of Climate Finance 2015. URL: <a href="https://climatepolicyinitiative.org/wp-content/uploads/2015/11/Global-Landscape-of-Climate-Finance-2015.pdf">https://climatepolicyinitiative.org/wp-content/uploads/2015/11/Global-Landscape-of-Climate-Finance-2015.pdf</a>

Climate Finance Advisory Service (CFAS), 2016. CFAS Climate Finance Guide: COP 22 Marrakech. URL: http://www.cfas.info/sites/default/files/anhang/2016%20CFAS%20Climate%20Finance%20Guide\_final.pdf

Green Climate Fund (GCF), 2017. Website. URL: <a href="http://www.greenclimate.fund/home">http://www.greenclimate.fund/home</a>

Germanwatch, Perspectives, 2017. Investing in ambition. URL. <a href="https://germanwatch.org/de/download/15226.pdf">https://germanwatch.org/de/download/15226.pdf</a>

G20, 2017. Declaration. URL: <a href="https://www.g20.org/Content/EN/">https://www.g20.org/Content/EN/</a> Anlagen/G20/G20-leaders-declaration.pdf? <a href="blob=publicationFile&v=1">blob=publicationFile&v=1</a> 1

G20, 2017. G20 Hamburg Climate and Energy Action Plan for Growth. URL: <a href="https://www.g20.org/Content/DE/">https://www.g20.org/Content/DE/</a> Anlagen/G7 G20/2017-g20-climate-and-energy-en.pdf? blob=publicationFile&v=6

#### References



G20 Climate Finance Study Group, 2016. Promoting efficient and transparent provision and mobilization of climate finance to enhance ambition of mitigation and adaptation actions. URL: <a href="http://www.g20.utoronto.ca/2016/2016-promoting-efficient-transparent-provision.pdf">http://www.g20.utoronto.ca/2016/2016-promoting-efficient-transparent-provision.pdf</a>

Heinrich Böll Stiftung, 2016. Green finance and climate finance. URL: https://www.boell.de/sites/default/files/uploads/2016/11/themes7\_eng.pdf

OECD, 2016. 2020 projections of Climate Finance towards the USD 100 billion goal: Technical Note, OECD Publishing. <a href="https://www.oecd.org/environment/cc/Projecting%20Climate%20Change%202020%20WEB.pdf">https://www.oecd.org/environment/cc/Projecting%20Climate%20Change%202020%20WEB.pdf</a>

Overseas Development Institute (ODI), 2012. Climate Finance. Readiness and Strengthening Institutions. URL: <a href="https://www.odi.org/sites/odi.org.uk/files/odi-assets/events-documents/4947.pdf">https://www.odi.org/sites/odi.org.uk/files/odi-assets/events-documents/4947.pdf</a>

Overseas Development Institute (ODI), UNDP, 2011, Direct Access to Climate Finance: experiences and lessons learned. URL: <a href="https://www.odi.org/sites/odi.org.uk/files/odi-assets/publications-opinion-files/7479.pdf">https://www.odi.org/sites/odi.org.uk/files/odi-assets/publications-opinion-files/7479.pdf</a>

RENAC, 2016. Online Course Climate Finance. RENAC: Berlin.

UNDP, 2012. Readiness for Climate Finance. URL: <a href="http://www.undp.org/content/undp/en/home/librarypage/environment-energy/low\_emission\_climateresilientdevelopment/-readiness-for-climate-finance.html">http://www.undp.org/content/undp/en/home/librarypage/environment-energy/low\_emission\_climateresilientdevelopment/-readiness-for-climate-finance.html</a>

UNFCCC, 2017. Speech by Fiji President "We Need a Strong Global Movement for Climate Action". URL: <a href="http://newsroom.unfccc.int/cop-23-bonn/fijian-pms-latest-speech-at-the-4th-australasian-emissions-reduction-summit-in-melbourne/">http://newsroom.unfccc.int/cop-23-bonn/fijian-pms-latest-speech-at-the-4th-australasian-emissions-reduction-summit-in-melbourne/</a>

UNFCCC, 2017. Website: <a href="http://unfccc.int/focus/climate\_finance/items/7001.php#intro">http://unfccc.int/focus/climate\_finance/items/7001.php#intro</a>

#### References



UNFCCC, 2016. 2016 Biennial Assessment and Overview of Climate Finance Flows. URL: <a href="http://unfccc.int/files/cooperation\_and\_support/financial\_mechanism/standing\_committee/application/pdf/2016\_ba\_summ\_ary\_and\_recommendations.pdf">http://unfccc.int/files/cooperation\_and\_support/financial\_mechanism/standing\_committee/application/pdf/2016\_ba\_summ\_ary\_and\_recommendations.pdf</a>

WRI, 2017. What is an INDC. URL: <a href="http://www.wri.org/indc-definition">http://www.wri.org/indc-definition</a>

Wuppertal Institut, 2015. Governance and Action: Design Criteria for Transformational Climate Finance, <a href="https://wupperinst.org/uploads/tx\_wupperinst/Governance\_Action.pdf">https://wupperinst.org/uploads/tx\_wupperinst/Governance\_Action.pdf</a>