

WWF recommendations for the EIB Climate Policy review

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KEY RECOMMENDATIONS

1. OVERARCHING CLIMATE POLICY PRINCIPLES

- The EIB Climate Policy principles should not be merely limited to a "do no harm" approach minimizing negative impacts but should strongly prioritize support for low carbon projects and gradually reduce support for high carbon projects.
- The higher priority given to energy efficiency in the Energy Union Package should be transposed as a clear 'efficiency first' principle in the EIB policy.
- Such principles should explicitly apply to all operations of the Bank.

2. CLIMATE MAINSTREAMING IN THE PROJECT APPRAISAL PROCESS

- The EIB should improve its Value added assessment of projects by increasing the weighting of low carbon / energy efficiency elements in the following criteria: Economic interest; Employment; Higher Priority Area; Exceptional contribution.
- The EIB should strengthen its climate adaptation and resilience requirements.
- The EIB should improve its carbon footprinting methodology by accounting for Scope 3 emissions in relevant sectors, including emissions from the construction phase of projects and establishing the baseline as the most environmentally, economically and socially sustainable option.

3. CARBON-INTENSIVE SECTORS

Energy sector

- Power production: The EIB should review its Emission Performance Standard to set it at a level of 350 g CO₂/kWh in order to only support the most efficient fossil fuel-fired power plants, that are already largely mainstreamed.
- Energy network: The EIB should refocus essentially on electricity infrastructures that depend much more on public financial support than gas infrastructures. It should limit gas support to the careful development of local/regional renewable biogas and reverse flows as a means of extending the lifespan of existing assets. It should end support for long distance pipelines and LNG plants that risk becoming carbon stranded assets.
- The EIB should end support for hydrocarbon extraction and petroleum refining.
- More globally, the EIB should become the first bank to phase out fossil fuel support by 2020 at the latest.

Transport sector

Mirroring the EU agreement in the European Regional Development Fund's regulation, the EIB should end its support for airport infrastructures, unless related to environmental protection or accompanied by investment necessary to mitigate or

- reduce its negative environmental impact.
- The EIB should strengthen its climate and biodiversity criteria in order to become more selective and gradually reduce support to motorways and roads.

Build the missing tools to select energy and transport infrastructures

- The EIB should develop a clear hierarchy to prioritise infrastructure projects: in the case of the energy sector, such a hierarchy should prioritise long-term electricity demand reduction and greater system flexibility through support for electricity demand side energy efficiency, electricity storage and greater regional grid interconnections. EIB support to fossil fuel projects should be a last resort option where absolutely necessary, after all other flexibility options have been maximized;
- As the EU policy-driven Bank involved in all EU major funding initatives for
 infrastructures, the EIB has a unique transformational role to play in the setting up of
 the missing tools: national decarbonisation roadmaps for energy and transport
 infrastructures, related to national long term investment plans and project pipelines (as
 recommended by the Special Task Force set up for the European Fund for Strategic
 Investments of which the EIB was a member). Such investment plans and project
 pipelines should be aggregated at EU level to maximise EU outcomes.

4. CLIMATE ACTION PORTFOLIO

- The EIB should increase its Climate Action target by 5 percentage points in each new three-year Corporate Operational Plan, in order to reach at least 50% by 2030.
- The EIB should strengthen its Climate Action eligibility criteria in four ways: setting
 energy efficiency sectorial performance requirements based on best available
 technology globally; refocusing car manufacturing projects on zero emission vehicles
 only; requiring full information on the climate outcomes of projects through financial
 intermediaries; developing sustainability criteria for biofuels, biomass and small
 hydropower.

5. ENGAGING PRIVATE SECTOR INVESTORS AND OTHER STAKEHOLDERS

- **Financial intermediaries**: The EIB should significantly strengthen the transparency requirements to financial intermediaries. Claimed climate benefits through financial intermediaries should be systematically substantiated with relevant data and qualitative information.
- **Technical assistance**: The EIB should significantly scale up its technical assistance capacity with a priority for "no regrets" sectors delivering multiple benefits (energy and resource efficiency), in cooperation with the Commission where relevant.
- **Green bonds and aggregation of small assets**: The EIB should support the development of a robust, credible and fully developed and generally-accepted industry standard for green bonds, sector by sector. It should deliver advice on how to issue green bonds to other private or public issuers in several ways. It should also improve its

- support for green asset-backed securitization, enabling aggregation of smaller assets (notably through the REPIN platform).
- The Project Bond Initiative so far is counter-productive for EU climate targets. The Commission and the EIB should urgently refocus it on low-carbon projects by ending support to high carbon projects and by expanding its scope to renewable energy production and energy efficiency projects.
- **Juncker investment plan:** The EIB should contribute to clarify in the regulation of the European Fund for Strategic Investments (EFSI) that all EIB procedures, standards and policies will apply to any EFSI project. It should focus the EFSI on low carbon projects that simultaneously drive short term economic benefits and long term sustainability (especially energy efficiency investments). Given the indicative Project List from Member States, there is no rationale for the EFSI to invest in high carbon energy and transport projects that expose the EU to high risk of carbon stranded assets.
- **National Promotional Banks:** The EIB should strengthen its cooperation with National Promotional Banks to help develop a more strategic EU-wide approach on the decarbonisation of the EU energy and transport systems.
- **Multilateral Development Banks and International Development Finance Club (IDFC):** The EIB should ensure transparency of the coordination process with other Multilateral Development Banks and the IDFC; they should release a joint statement with ambitious climate commitments at the COP21 to send a strong global signal.

INTRODUCTION

1. Improving the consultation process

WWF welcomes the Climate Policy review of the European Investment Bank (EIB)¹, a crucial opportunity for the EIB to send a strong signal before the COP21 in December 2015.

However we are concerned that in the proposed review timeline, the process will not allow for a second proper consultation – as the $\dot{\text{EIB}}$ did with the energy lending policy review - due to a too short period of time before the publication of the final draft policy and its approval by the EIB Board.

WWF recommendation

The EIB should commit to at least one month period for the consultation between the moment the final draft policy is published and the adoption by the EIB Board.

2. Ensuring a strategic approach for the EIB Climate Policy

WWF expects that the EIB Climate Policy will not only put together all the currently scattered climate-related bits and pieces of relevant EIB policies, but also be structured in a comprehensive and strategic way to explain how the Bank will strongly contribute to EU climate targets as the EU policy-driven Bank.

In this report WWF makes the following proposal for the EIB Climate Policy structure:

- 1. Overarching climate principles for all EIB operations
- 2. Climate mainstreaming in the project appraisal process
- 3. Carbon-intensive sectors
- 4. Climate action portfolio
- 5. Engaging private investors and other stakeholders.

Given the relatively important number of climate-relevant EIB policies and documents, it is important that they are all clearly referenced in the Climate Policy (e.g. the EIB Corporate Operational Plan that sets the climate action target of the Bank).

3. Making the EIB Climate Policy accessible to non-experts

In certain areas the EIB developed relatively sophisticated tools. This is for example the case with the Bank's Guide to Economic Appraisal of Investment Projects (221 pages) that is unlikely to be read by non-specialists, although it provides crucial elements on the Bank's concrete approach on climate change at project level. The Climate Policy of the Bank should therefore include an Annex summarising the key climate-related elements of the Guide (2-3 pages) to make it more accessible, and notably clarify why, where and when the EIB uses its three different prices of carbon.

The same would be appropriate with the detailed carbon footprinting methodology and the Climate Action eligibility criteria of the Bank.

¹ EIB (2015), Consultation Paper: EIB approach to supporting climate action – Call for public views

1. OVERARCHING CLIMATE POLICY PRINCIPLES

1. The EU policy framework to fight climate change

The EU is committed to reducing greenhouse gas emissions to 80-95% below 1990 levels by 2050². According to the European Commission's estimates, the most technologically and economically feasible means of achieving this means notably a total decarbonisation of the energy sector by 2050³. The 2020 climate and energy targets are having an impact, and the EU just finalised 2030 targets. But **for any long term project whose lifetime goes beyond 2030**, the 2050 EU target has to be the reference.

To have a reasonable chance of staying within a 2°C rise for the global climate, the IEA has stated that **only zero-carbon utilities and infrastructure should be developed beyond 2017 since 80% of cumulative emissions allowable between 2010 and 2035 are already locked** into existing power plants, factories, buildings and services⁴ - unless existing infrastructure is scrapped before the end of its economic lifespan.

In addition, the recent Commission's Energy Union Package⁵ puts energy efficiency as one of the core principles of the forthcoming Energy Union: "It is in this context necessary to fundamentally rethink energy efficiency and treat it as an energy source in its own right, representing the value of energy saved. As part of the market design review, the Commission will ensure that energy efficiency and demand side response can compete on equal terms with generation capacity." Energy efficiency is indeed the key enabler for decarbonising energy systems, very cost-effective, tapping into a huge potential that can be mobilised relatively quickly, with a high content of domestic jobs and strong economic and social benefits – in other words the ideal "no regrets" solution.

The recent authoritative report from the **European Environment Agency**⁷ concludes that "the level of ambition of existing environmental policy may be inadequate to achieve Europe's long-term environmental goals. For example, **projected greenhouse gas** emissions reductions are currently insufficient to bring the EU onto a pathway towards its 2050 target of reducing emissions by 80–95%."

Short term / long term false dichotomy

The New Climate Economy report⁸ from the high level Global Commission on the Economy and Climate, co-chaired by former President of Mexico Felipe Calderón and economist

² European Council, http://register.consilium.europa.eu/pdf/en/09/st15/st15265-re01.en09.pdf, October 2009

³ European Commission, A Roadmap for moving to a competitive low carbon economy in 2050, March 2011

⁴ IEA, World Energy Outlook 2011

⁵ European Commission (2015), Energy Union Package: A Framework Strategy for a Resilient Energy Union with a Forward-Looking Climate Change Policy, COM(2015) 80 final

⁷ European Environmental Agency (March 2015), The European environment — state and outlook 2015, http://www.eea.europa.eu/soer-2015/synthesis/report/0c-executivesummary http://newclimateeconomy.report/

Nicholas Stern, made clear that a rapid transition towards a low carbon economy is a net win not a loss for our economy, as multiple benefits largely outweigh negative impacts. Other authoritative studies from the OECD, UNEP, World Bank and others come to the same conclusion. This means that trade offs between short-term economic and jobs benefits and long term sustainability should be rejected as a flawed dichotomy: the EIB needs to refocus on projects that bring both types of benefits.

2. The consequences for EIB operations

The EIB is the EU policy-driven Bank: it should be a proactive leader, not a follower. The Climate Policy principles should not be merely limited to a "do no harm" approach minimizing negative impacts but should strongly prioritize support for low carbon projects and **gradually reduce support for high carbon projects** — **by ultimately ruling out all high carbon projects**. In practice, the default position of the EIB should be that when assessing that a given investment will risk to lead to a lock into a high carbon trajectory in a given Member State or accession country, the investment should be ruled out. At an aggregated portfolio level the EIB should strongly outperform EU binding climate targets.

The higher priority given to energy efficiency in the forthcoming Energy Union should be an explicit part of the EIB Climate Policy principles, in order to significantly strengthen its energy efficiency requirements across all operations.

In addition, it should be clarified that these Climate Policy principles **apply to all operations of the Bank**, including direct project lending, investment and equity funds, financial intermediaries for SME support, innovative financial instruments, blending facilities, etc.

The EIB Climate Policy should logically start by clarifying these principles. If it is assumed that the Statement on Climate Action¹⁰ of the Bank is the overarching statement of the EIB approach on climate change, then it strongly needs to be reviewed: worryingly, it does not mention any EU target (be it 2020, 2030 or 2050), remains very vague and doesn't reflect the high priority of energy efficiency.

WWF recommendations

- The EIB Climate Policy principles should not be merely limited to a "do no harm"
 approach minimizing negative impacts but should strongly prioritize support for low
 carbon projects and gradually reduce support for high carbon projects. In practice the
 EIB should focus on projects that combine multiple benefits of short-term economic
 and job outcomes and long term sustainability.
- The higher priority given to energy efficiency in the forthcoming Energy Union should be transposed as a clear 'efficiency first' principle in the EIB policy.
- Such principles should explicitly apply to all operations of the Bank.

⁹ For more references see WWF (March 2015), From crisis to opportunity: Five steps to sustainable European economies ¹⁰ http://www.eib.org/infocentre/publications/all/statement-on-climate-action.htm

2. CLIMATE MAINSTREAMING IN THE PROJECT APPRAISAL PROCESS

1. Environmental and social due diligence of EIB operations

The due diligence of the EIB on climate issues should clearly take the 2050 EU climate target as the reference for all long-term projects, particularly infrastructures.

The higher priority given to energy efficiency in the forthcoming Energy Union should also be integrated in a strong way in the due diligence of the EIB.

2. Value added assessment

The EIB introduced in 2005 a Three Pillars Assessment to evaluate the added value of EIB-supported projects for the EU. The three pillars are:

- Pillar One: Quality and Contribution of the project to Sustainable Growth and Employment (four sub-issues: Economic interest and growth; Promoter capability; Environmental and social sustainability; Employment, technology)
- Pillar Two: Contribution of the project to EU/EIB policy (three sub-issues: EIB eligibility; Higher Priority Areas; Exceptional contribution)
- Pillar Three: Contribution of the EIB to the project (three sub-issues: Technical contribution; Financial facilitation, Financial contribution).

Improve Pillar One criteria

The EIB should update the Pillar One in two areas:

- **Economic interest**: for long-term projects, a more stringent analysis is required to ensure that the project will be cost-effective in its entire lifetime, not only in the first decades. This is becoming a high concern with potential carbon-stranded assets facing rising carbon costs making them less competitive or facing lack of demand (e.g. a gas pipeline or a fossil fuel-fired power plant). In addition for many large highcarbon transport infrastructures, project promoters presented flawed traffic forecasts that helped to justify their economic rationale, while after a few years of operations the given infrastructure operates at a loss (airport, motorway). Such disastrous projects do not only lock the economy in a high carbon path for decades but are even flawed on an economic perspective (see Chapter 3 on energy and transport sectors).
- **Employment:** data make increasingly clear that across many economic sectors, sustainable projects outperform business as usual ones in term of job **creation per euro invested.** This is notably the case for the following sectors:
 - Energy refurbishment of buildings is far more labour-intensive that energy supply investments (3 to 4 times more jobs compared to fossil fuel-fired or nuclear power plants per million euro invested)11;
 - Construction of trains or tramways is more labour-intensive that the car industry (4,7 vs 2,7 jobs per million euro invested)¹²;

¹¹ European Commission (2005), Doing more with less, Green paper on energy efficiency, COM(2005)265final

- Construction of electricity networks has a high labour intensity of 7.7 jobs per million euro invested and such jobs cannot be off-shored¹³;
- Most renewables have a very high labour intensity, ranging from 7.9 for biofuels to 12.1 for biogas per million euro of turnover, much higher than fossil fuels and nuclear¹⁴;
- Every percentage point reduction of resource use leads to the creation of 100,000 to 200,000 jobs¹⁵.

Across Europe, low-carbon sector jobs have grown significantly even in those countries experiencing severe recessions like Spain¹⁶. The Commission identified the green economy as one of the three most promising sectors for job creation, alongside ICT and health and social care¹⁷. Jobs created by green technologies are non-tradable to a certain extent and encompass all types of activities: from technology design to production, to installation and maintenance. As a result the job benefit of high carbon projects pales into insignificance beside competing sustainable projects: this should be adequately integrated in the EIB Pillar One assessment.

Improve Pillar Two criteria

The EIB should update the Pillar Two in two areas:

- Higher Priority Area: strengthen the weighting of low carbon and energy efficiency elements/requirements. The recent 2030 EU climate and energy targets and the Energy Union Package should result in the strengthening of the climate and energy efficiency criteria.
- The higher priority given to energy efficiency in the forthcoming Energy Union should be integrated in the Exceptional Contribution criteria of the Bank. Energy efficiency indeed contributes to all the six priority areas of the Bank: SME support, regional development, environmental sustainability, innovation and research, competitive and secure energy supply, and it partly reduces the need for complex trans-european infrastructures in a very cost-effective way. It is also a huge job provider as seen above.
- In addition, the EIB should launch a process about the way to integrate the carbon footprinting of projects in the value added assessment (*see also Point 5. Carbon footprinting of projects*).

WWF recommendations

- The EIB should update the Pillar One of its Value added assement in two areas:
 - Economic interest, where a more stringent analysis is required for long term projects to ensure that the project will be cost-effective in its entire lifetime and avoid the risk of carbon-stranded assets;
 - Employment, where the EIB should integrate data showing that the job benefit of high carbon projects pales into insignificance beside competing sustainable projects;
- The EIB should update the Pillar Two of its Value added assement in two areas:

¹⁵ Cambridge Econometrics et al. (2014), Modelling the Economic and Environmental Impact of Change in Raw Material Consumption.

¹³ OFCE, ECLM, IMK (2015), Independent Annual Growth Survey - Third Report

¹⁴ Ibid

ILO (2012), Green jobs for sustainable development: A case study of Spain
 European Commission (2012), Towards a job-rich recovery, COM(2012)173final

- Higher Priority Area: strengthen the weighting of low carbon and energy efficiency elements/requirements;
- The higher priority given to energy efficiency in the forthcoming Energy Union should be integrated in the Exceptional Contribution criteria of the Bank: energy efficiency indeed can contribute to all the six priority areas of the Bank.

3. Integration of climate cost into the economic assessment of projects

The EIB Call for public views shows that the Bank uses three economic prices of carbon. This comes from the Bank's Guide to Economic Appraisal of Investment Projects. The risk of carbon stranded assets should be avoided by the Bank: for that purpose, there is as trong case to use the high carbon price scenario at least for all long-term projects. This makes a big difference for the Cost Benefit Analysis of the projects.

The new 2030 EU climate target should also lead to a review of the carbon price scenarios used by the Bank.

WWF recommendations

• To avoid the risk of carbon stranded assets, the EIB should use its high carbon price scenario when assessing all long-term projects.

4. Climate adaptation and resilience

In June 2013, the European Council adopted the EU Strategy for Adaptation. Growing evidence makes clear that climate change has already huge damage costs in Europe: a report commissioned by the Commission finds that EU damage from flooding cost at least 150 billion euro in the period 2002-2013¹⁸. Climate damages will unavoidably rise and climate adaptation measures should be mainstreamed and amplified.

There is therefore a growing economic rationale to strengthen climate adaptation and resilience requirements in the EIB project appraisal process, to avoid higher costs in the operation phase of the project or even the potential project failure. This is particularly the case with long term infrastructures, where specific stringent climate adaptation criteria should be required by the EIB on a systematic basis.

WWF recommendations

• The EIB should strengthen the climate adaptation and resilience requirements in its project appraisal process, particularly for long term infrastructures.

¹⁸ RPA and al. (2014), Study on economic and social benefits of environemental protection and resource efficiency.

5. Carbon footprinting of projects

The EIB developed a methodology to assess the greenhouse gas emissions of the Banksupported projects. Positively, it assesses both relative and absolute emissions of projects. Worryingly, the methodology suffers several flaws:

The need to account for emissions of the whole project

It is unclear whether the EIB accounts the whole project's emissions when it finances only a part of the project. Given the very specific public nature of the EIB as the AAA-rated public European policy Bank, its involvement in a project often determines whether the project will be pursed at all or abandoned. The Bank should therefore account emissions of the whole project.

The need to account for Scope 3 emissions

The EIB carbon footpriting methodology uses the WRI GHG Protocol concept of "scope" when defining the boundary of a project. Scope 1 is related to direct GHG emissions (e.g. emissions produced by the combustion of fossil fuels); scope 2 is related to indirect emissions (emissions from the generation of electricity that is then purchased by the project and/or heating/cooling consumed by the project). Scope 3 is related to other indirect GHG emissions (consequences of the activities of the project but that derive from sources not operated by the project developer, upstream or downstream).

A study estimated that in all 491 economic sectors in the United States scope 3 emissions comprise at least 75% of total emissions from two-thirds of sectors providing goods and services¹⁹. Such importance of the scope 3 means that it cannot be ignored in a meaningful greenhouse gas accounting methodology. For example in the life cycle analysis of a car, fuel typically accounts for 75-85% of the total carbon footprint of the car²⁰; scope 1 and 2 emissions of a car manufacturer (15-25% of total car emissions) are therefore of relatively less importance to reduce emissions from the car transport - the key issue is the emissions when driving which largely depend from the motorisation designed by the car manufacturer.

Problematically the EIB focuses solely on scopes 1 and 2 on a regular basis. The EIB justifies its decision to not account for Scope 3 emissions in the majority of cases because their quantification is not technically feasible or because this leads to double counting of emissions. Such arguments are flawed:

- It is increasingly feasible to assess Scope 3 emissions in relevant sectors. In fact the GHG Protocol released a comprehensive Scope 3 Accounting and Reporting Standard at the end of 2011, which provides guidance on identifying the scope 3 emissions that should be accounted for to ensure that major emissions are included while making the exercise manageable and not too cumbersome.
- Double counting is not an issue for a financial institution: indeed the whole carbon footprinting exercise of the EIB is to have additional indication of the climate impact of a given project, not to calculate the total emissions supported by the Bank.

The EIB methodology has now included Scope 3 emissions in very specific cases, e.g. emissions from vehicles using a road are now accounted for the road project. But it falls

¹⁹ Matthews, H. S., C. T. Hendrickson and C. L. Weber (2008) The importance of carbon footprint boundaries, Environmental Science and Technology, 42, 5839-5842

See http://www.carbontrust.co.uk/policy-legislation/international-carbon-flows/automotive/Pages/10.aspx

short from ensuring a coherent approach with all networks projects: a gas pipeline should clearly include emissions from the gas expected to be transported by the pipeline (both when the gas is extracted upstream and when it is burnt downstream), in coherence with the economic assessment of the project. Otherwise the mean relative emissions per project provided by the Bank²¹ are flawed²².

The need to include emissions from the construction period

Emissions from the construction period of a project are also discarded by the Bank, although they can be very significant. Problematically, such a limited approach is implicitely improving the carbon footprinting results of large infrastructures (that usually have important emissions in the construction phase) compared to competing energy and resource efficiency projects, sending the wrong signal.

According to a CE Delft study commissioned by Transport and Environment, the greenhouse gas impacts of new, extended or upgraded transport infrastructure are possible to evaluate, and many of the data inputs required should already be available and used for the economic assessment (including traffic forecasts) and environmental impact assessment²³.

The need to update the baselines

Many projects result in emission reductions or increases when compared to what would have happened in the absence of the project, referred to as the "baseline". The baseline should be established as the most environmentally, economically and socially sustainable option (including energy savings) rather than the most likely one in the absence of the project which currently means e.g. a very conservative fossil fuel baseline for certain categories of energy projects.

WWF recommendations

The EIB should improve its carbon footprinting methodology in the following ways:

- Account for emissions of the whole project;
- Account for Scope 3 emissions in all sectors where they represent a significant part of emissions (e.g. a gas pipeline should include upstream and downstream emissions from the gas expected to be transported by the pipeline);
- Include emissions from the construction period of a project;
- Update the baseline: the baseline should be the most environmentally, economically and socially sustainable option (including energy savings) rather than the most likely option in the absence of the project.

²¹ E.g. EIB Call for public views. Figure 12 p34

²² In the EIB Call for public views, it is also dubious to compare mean emissions per project in different sectors without mentioning the mean financial volume per project in each sector (showing the size of projets in a given sector): this should be complemented by the emissions per euro invested, both in absolute and relative terms (showing the cost effectiveness of mitigation efforts across different sectors)

http://www.transportenvironment.org/publications/climate-rating-transportinfrastructure-projects

3. CARBON-INTENSIVE SECTORS

Some specific sectors are both very carbon-intensive with very long term projects: as a result, they can have a dramatic impact on decarbonising the overall EU economy – or on locking it in a high carbon trajectory at odds with EU climate targets.

This is typically the case for the energy and the transport sectors. They require additional climate mitigation and adaptation efforts by the EIB.

1. Energy sector

1.1. Power production: the need to review the EIB Emission Performance Standard to ensure consistency with the EU 2050 climate target

Although the EIB Emission Performance Standard review is not formally part of the EIB Climate Policy review, there is a clear link given the huge climate impact of fossil fuel-fired power plants for decades.

The Annex provides analysis on where the EIB stands. Here are the key points:

- The EIB adopted its new Energy policy in July 2013²⁴, including an Emissions Performance Standard (EPS) set at a level of 550 g CO₂/kWh. The EIB committed to review this level in 2014 but failed to do so.
- The level of the EIB EPS is not consistent with the EU 2050 climate target which would requires an initial EPS of maximum 450 g CO₂/kWh, and lags behind those EPS introduced by the UK, US and Canada.
- WWF recommends that the EIB sets the EPS level at 350 g CO₂/kWh in order to only support the most efficient fossil fuel-fired power plants, given its commitments to only support best available technologies. This would send a strong signal to both industry and investors.
- This level of 350 g CO₂/kWh largely corresponds to the fossil fuel-fired power plants financed by the EIB in the last years: the EIB is already reaching that level in practice and should clarify it.
- The fossil fuel-fired power plant technology reaching 350 g CO₂/kWh is already mainstreamed: there is no rationale to procrastinate with more polluting technologies.
- It should be noted that the two exemptions to the EIB EPS (isolated energy systems; poorest countries) remain unchanged in the EIB energy policy, allowing flexibility in exceptional cases.

²⁴ EIB and Energy: Delivering Growth, Security and Sustainability - EIB's Screening and Assessment Criteria for Energy Projects, July 2013

WWF recommendations

The EIB should review its EPS to set it at a level of 350 g CO₂/kWh in order to only support the most efficient fossil fuel-fired power plants, sending a strong signal to both industry and investors.

1.2. Energy networks: refocus on electricity not gas

The need to scale up investments in electricity grids

Large electricity network investments are foreseen across Europe in coming years. Electricity transmission system operators (TSOs) are currently planning to increase their rate of investment by 70% by 2020²⁵. 'Smart grid' investments at the distribution level are particularly important for enabling decentralised generation. 'Offshore grids' are also needed both to connect offshore wind farms to shore and to help to manage variability through interconnecting power markets around the North and Baltic Seas region. The deployment of smart grids could save €52 billion per year in the EU by reducing losses from electricity distribution and enabling greater energy efficiency.²⁶

Needed investments by sector 2010-2020 for energy infrastructures

Sector (investment 2010-2020, bn€)	Business-as- usual delivery	Commercially viable delivery	Total need
Electricity	45	90	142
Gas	57	63	71
CO2 transport	0	0	2.5
TOTAL	102	153	215.5
Investment gap	113.5	62.5	0
Total (%)	47%	71%	100%

Table 2: Business-as-usual, commercially viable and needed investment by sector 2011-2020

Source: European Commission, Impact Assessment - Energy infrastructure priorities for 2020 and beyond - A Blueprint for an integrated European energy network (COM(2010) 677 final), p34

The Commission's Impact Assessment on Energy Infrastructure Priorities for 2020 and beyond²⁷ estimates in the table above the needs of a huge €142 bn investment by 2020 for transmission, offshore grid and smart grid infrastructures - of which €45 bn (32% only) is estimated to be business as usual delivery while €90 bn (63%) is commercially **viable.** There is therefore a huge case for the EIB to significantly support electricity infrastructure projects.

In addition, the Energy Union Package²⁸ puts forward a target of 10% interconnection of electricity grids across Member States borders. Such a target, already decided in 2002, has remained elusive because of entrenched national interests and has already been facing one decade of failure, with twelve EU countries mainly located on the EU's periphery that remain below 10% interconnection according to the Commission. The

²⁵ Roland Berger 2010.

²⁶ Oracle (2011), The Future of Energy – an independent report for Oracle Utilities.

²⁷ SEC(2010) 1395 final

²⁸ European Commission (2015), Energy Union Package: A Framework Strategy for a Resilient Energy Union with a Forward-Looking Climate Change Policy, COM(2015) 80 final

Commission made clear that "the European Union needs to bring its electricity interconnection level to 10% by 2020 if it wants to create a resilient Energy Union with a forward looking climate policy", adding that Europe needs to "redouble its efforts" on that front.

Interconnection of electricity grids is a prerequisite for the uptake of renewable energy. Even the 10% target is an objective the Commission itself admits is insufficient in the mid-long run. Europe's energy target of at least 27% share of renewable energy by 2030 "requires more than 10% interconnection capacity," the Commission notes in its communication, saying "all efforts by the EU and member states must be guided by the need to reach at least 15% by 2030".

Electricity storage is also increasingly important to balance the growing renewable output. Financial support should concentrate on near-commercialised projects, which have significant short to medium term potential to alter energy infrastructure investments and achieve policy objectives.

The risk of EU over-investments in gas infrastructures

The Ukraine-Russia crisis has focused the EU on energy security far more than before with a potential strengthened support for gas. In this context, it is critical to remind that:

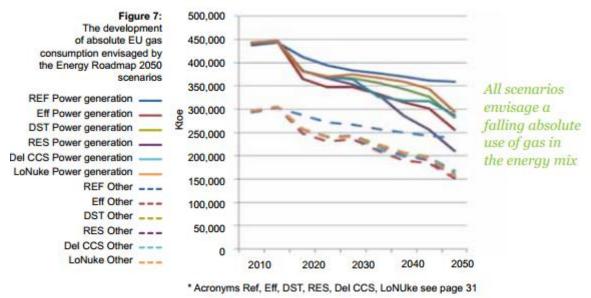
- 1. All the European Commission 2050 Energy Roadmap scenarios²⁹ estimate that gas consumption in the EU will decline in absolute terms (see graph below ³⁰);
- 2. Eurostat data show that EU gas consumption has peaked in 2005-2010 and has been sharply decreasing since 2010 confirming the consumption trend of the 2050 Energy Roadmap (see graph below);
- 3. EU energy efficiency policies are starting to get results and the new emphasis put on energy efficiency in the Energy Union Package ³¹ will very likely strengthen this trend.

³⁰ WWF, Cutting energy related emissions the right way, 2012

²⁹ European Commission, Energy Roadmap 2050

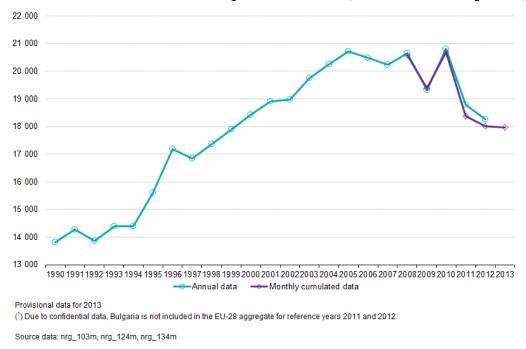
³¹ European Commission (2015), Energy Union Package: A Framework Strategy for a Resilient Energy Union with a Forward-Looking Climate Change Policy, COM(2015) 80 final

2050 Energy Roadmap scenarios for EU gas consumption



Source: European Commission, Energy Roadmap 2050, graph designed by WWF





Source: Eurostat, Natural gas consumption statistics, May 2014

There is a huge pipeline of gas infrastructure projects in Europe – including upgrades to existing connections, new long-distance pipelines, intra-EU connections, LNG plants and domestic hubs for LNG. But the decreasing consumption of gas in the EU and the growing cost-effective energy efficiency investments raise strong doubts on the actual need and the commercial viability of many of these gas infrastructure projects.

As an example, there is a huge number of LNG projects in Europe (up to a hundred) but the existing ones are already largely idle: according to Thierry Bros, senior gas and LNG analyst at Societe Generale, European LNG deliveries dropped by 24% in

2013, in addition to a 30% fall in 2012³². Adding to the economic trouble is that many import terminals in continental Europe are under take-or-pay contracts that force them to accept LNG deliveries even when demand is not there or pay stiff fines. This is strongly questioning the economic rationale of any new LNG investment in Europe.

Similarly, concerns are raised by the European Federation of Energy Traders whose gas committee chairman Doug Wood said: "While European gas usage has waned, governments across Europe are still building pipelines whether the market needs them or not"33. It analysis the case of Russia delivering 50% more gas to Europe via the Nord Stream pipeline under the Baltic Sea directly to Germany in 2014 from the previous year, while cutting transit to Europe through Ukraine by 40%, according to OAO Gazprom and pipeline operator UkrTransGaz. In short, the Nord Stream pipeline being used more resulted in the Slovakia's Eustream pipelines being used less and its revenue falling by 11%, raising economic concerns.

More generally a proliferation of new transmission pipelines, LNG terminals and intra-EU connections risk stranding assets and raising energy prices, since they are at risk of being over-built compared to market demand.

In addition the above-mentioned Commission's Impact Assessment on Energy Infrastructure Priorities for 2020 and beyond³⁴ estimates that gas infrastructures need €71 bn investment by 2020 (twice less than for electricity infrastructures) – of which €57 bn (80%) is estimated to be business as usual delivery, that does not need EIB support. The financial case for EIB investment in gas infrastructure is thus far lower than for grid infrastructure.

The need for EIB investments in gas infrastructures should therefore be scrutinised extremely carefully to avoid over-investment that would:

- Not be additional compared to business as usual delivery;
- Be sub-optimal economically;
- Lock-in future carbon emissions;
- Impede the development of low carbon energy efficiency and renewable alternatives.

Therefore, clear criteria are required to ensure that any potential EIB investment in gas infrastructure is both fully justified on a long term economic perspective³⁵ and fully consistent with the 2050 EU climate goal. The scope of EIB support for gas infrastructures should be largely reduced. Notably, WWF considers that the EU does not need additional long distance pipelines and LNG plants³⁶.

WWF recommendations

- The EIB should refocus essentially on electricity infrastructures that depend much more on public financial support than gas infrastructures.
- The EIB should limit gas support to the careful development of local or regional renewable biogas and reverse flows, as a means of extending the lifespan of existing

³⁵ Economic assessments should include the growing displacement of gas-fired electricity by renewable electricity in the next decades – reducing the need for baseload gas-fired electricity in favour of peaking production, that is more expensive per kWh produced
³⁶ Specific exampliance for LNC plants and the addition of the production of the product

³² Reuters 20 September 2013, Many European LNG terminals face idling, seek new activities, http://www.reuters.com/article/2013/09/20/energy-lng-europe-idUSI 5N0HF3KD20130920

http://www.reuters.com/article/2013/09/20/energy-lng-europe-idUSL5N0HF3KD20130920

33 Bloomberg, EU risks stranding gas investments as block builds pipelines, 13 January 2015

³⁴ SEC(2010) 1395 final

³⁶ Specific exemptions for LNG plants could be added for countries fully dependent on Russian gas, but they should include requirements ensuring diversification of gas supply not more gas

assets.

• The EIB should end support for long distance pipelines (e.g. Southern Gas Corridor) and LNG plants³⁷ that risk to lock-in high carbon assets over a longer timeframe than what is required for EU decarbonisation targets.

1.3. Hydrocarbon extraction and petroleum refining: rule out

The IEA sent a strong warning to the global community stating that the world needs to leave at least two thirds of the presently existing commercially viable reserves in the ground in order to stay below the 2 degree limit³⁸.

Those "reserves" still exclude to a large extent those "unconventional" shale gas and shale oil "resources", that should also stay in the ground. WWF opposes the extraction of shale gas in the EU³⁹ because it expands the fossil reserve base. In addition, shale gas is most likely a "substitute not for coal but for renewables" ⁴⁰, thus stifling the growing renewable sector. As pointed out by the IEA (World Energy Outlook 2011), unconventional gas investments would, in turn, distract public and private investors and operators from the real opportunities to invest in energy efficiency and renewable energy – both guaranteeing long-term supply.

Only one fossil fuel extraction project has been supported by the EIB since **2007.** The EIB is a minor player in this sector. It can therefore relatively easily end its support for the sector and send a proper signal to Member States, industry and investors.

WWF recommendations

• The EIB should end support for hydrocarbon extraction and petroleum refining in the EU, which is a structurally unsustainable and sunset industry.

1.4. Prepare the end of EIB support to fossil fuels

The mid-term aim of the EIB should be to end support for fossil fuels given their huge impact on climate change. This is what the European Parliament requested in its resolution of 11 March 2014:

"The European Parliament: (...) 35. (...) recalls, nevertheless, the need to present a comprehensive phase-out plan for lending for non-renewable energy"41.

The Parliament already made this recommendation in a 2007 resolution⁴². This is consistent with the 2050 Low Carbon Roadmap of the Commission, which estimates that the most

³⁷ See footnote 36

³⁸ IEA, World Energy Outlook 2012

³⁹ WWF position on shale gas in the European Union – Keep Pandora's box firmly shut, May 2013

⁴⁰ Stevens, P. (2012), The 'Shale Gas Revolution': Developments and Changes, Chatham House, http://www.chathamhouse.org/publications/papers/view/185311%20

⁴¹ European Parliament resolution of 11 March 2014 on the European Investment Bank (EIB) – Annual Report 2012 (2013/2131(INI))

⁴² European Parliament resolution of 29 November 2007 on trade and climate change (2007/2003(INI)), paragraph 29, http://www.europarl.europa.eu/sides/getDoc.do?Type=TA&Reference=P6-TA-2007-0576&language=EN:

technologically and economically feasible means of achieving the EU 2050 climate target includes notably a total decarbonisation of the energy sector by 2050⁴³.

WWF recommendations

• In addition to the short-term recommendations above on specific fossil fuels subsectors, the EIB should become the first public bank globally to phase out fossil fuel support by 2020 at the latest.

2. Transport sector

The EIB approach on transport infrastructures should take account on the Commission's Transport White Paper⁴⁴, which calls for an emissions reduction from the transport sector of 60% by 2050 compared to 1990 levels.

Curently 94% of Europe's transport relies on oil products, of which 90% is imported⁴⁵. The EIB lending should not exacerbate this EU enormous dependence on imported fossil fuels, which is the consequence of investment in high carbon transport infrastructure such as airports and motorways.

Transport is responsible for 24.3% of EU greenhouse gas emissions, making it the second biggest greenhouse gas emitting sector after energy. Road transport alone contributes about one-fifth of the EU total emissions of CO2. In 2012 EU transport emissions were 20.5 % above 1990 levels⁴⁶, completely off track with the Transport White Paper.

2.1. End investments in airport infrastructures

Aviation is the most carbon intensive mode of transport. Its quick development raises high concerns on its adequacy with the EU long term climate targets. Additional investments in airport infrastructures bear the risk of becoming carbon stranded assets in one or two decades.

In addition, the potential added value of EU public investments in airport infrastructures is strongly put into question. A report recently published by the European Court of Auditors (ECA)⁴⁷ found that EU-funded investments in airports have not generated the expected results and have produced poor value for money. Due to a lack of adequate planning and forecasting, say EU auditors, some of the funded airports were situated too close to one another, while some of the construction projects were too big for the numbers of planes and passengers involved.

[&]quot;29. Calls for the discontinuation of public support, via export credit agencies and public investment banks, for fossil fuel projects and for the redoubling of efforts to increase the transfer of renewable energy and energy efficient technologies"

43 European Commission, A Roadmap for moving to a competitive low carbon economy in 2050, March 2011

⁴⁴ European Commission (2011), White Paper: Roadmap to a Single European Transport Area – Towards a competitive and resource efficient transport system, COM(2011)144final

⁴⁵ OFCE, ECLM; IML (2015), Indepednent Annual Growth Survey – Third Report

⁴⁶ http://ec.europa.eu/clima/policies/transport/index_en.htm

⁴⁷ European Court of Auditors, EU-funded investments in airports provide poor value for money, 16 December 2014, http://www.eca.europa.eu/Lists/ECADocuments/INSR14_21/INSR14_21_EN.pdf

The ECA examined investment projects at 20 airports – in Estonia, Greece, Italy, Poland and Spain – which received more than €600 million of EU money from 2000 to 2013. The main findings were:

- Half of these airports could not show the need for EU-funded investment and that funded infrastructure was often underused, with some €38 million worth not being used at all;
- For more than half of these airports, air traffic forecasts significantly overestimated increases. In Cordoba, for example, fewer than 7 000 passengers travelled in 2013, against the 179 000 forecast – a 98% error rate;
- For most airports there was little evidence of an improvement in customer service or of regional socio-economic benefits, such as the creation of additional jobs;
- Seven of the airports are not financially self-sustainable and will struggle to remain in operation without more public money. In Greece, for example, Kastoria's revenue of €176 000 for 2005-2012 was dwarfed by the €7.7 million it cost to keep the airport open over the same period;
- For most of the audited airports, the auditors found delays in construction and in the delivery of infrastructure, with an average delay of almost two years. Almost half of the airports experienced cost overruns, which meant that the Member States had to spend almost €100 million more from their national budgets than initially envisaged.

WWF recommendations

Mirroring the EU agreement in the European Regional Development Fund's regulation⁴⁸, the EIB should end its support for airport infrastructures, unless related to environmental protection or accompanied by investment necessary to mitigate or reduce its negative environmental impact.

2.2. Reduce investments in motorways and roads

Road transport alone represents 72% of total EU transport emissions. Building new road infrastructures make it easier and more attractive to use cars instead of lower carbon transport alternatives like railway.

In addition network infrastructures like roads have severe impacts on biodiversity and ecosystem fragmentation. This is for example the case with the **controversial project of** the S-7 expressway in Poland⁴⁹, in which the EIB is involved. The most controversial from the biodiversity point of view is the section from Skarzysko Kamienna to Voivod Border (section 4 in the Eib Environmental and Social Data Sheet). The EIB is involved in the project⁵⁰ with a loan of 731 million euro signed in December 2013 – although in December 2014 it was still not disbursed (at least for this controversial section).

The most fundamental flaws of the Environemntal Impact Report include the following:

Lack of relevant evaluation of the project impact on the Natura 2000 network integrity and on functionality of an ecological corridor of European importance for migration of species, including wolf;

⁴⁸ Regulation of the European Regional Development Fund, Article 3.3.e, Regulation (EU) No 1301/2013 of 17 December 2013

http://bankwatch.org/sites/default/files/briefing-s7-15Sep2014.pdf http://www.eib.org/projects/pipeline/2012/20120672.htm

- Lack of coherent and comprehensive comparative analysis of various alternatives for the route (course) of the planned road (including the location of its separate elements, among others, the Skarżysko - Północ junction) with regard to their impact on the natural resources;
- Lack of environment characteristics regarding species of flora and fauna living in the wild.

Following the judgment of the Supreme Administrative Court of 1 February 2013, the Regional Administrative Court (WSA) cancelled the faulty environmental decision regarding the S-7 Skarzyski road section on 12 June 2013.

On 20 January 2014, the Regional Directory for Environmental Protection in Kielce issued another "corrective" environmental decision for this project, but this decision repeated all the errors and faults of the previous one. Despite full awareness of the doubtful legal grounds for the chosen option, the General Directorate for National Roads and Motorways in Kielce still continues the investment process, ignoring the high risk related to the possibility of withdrawal of the necessary decisions for project implementation.

WWF recommendations

• The EIB should strengthen its climate and biodiversity criteria in order to become more selective and gradually reduce support to motorways and roads.

3. Build the missing tools to select energy and transport infrastructures

The former parts of this chapter make clear that the EIB needs to become more selective when it supports energy and transport infrastructures, to ensure that the supported infrastructures are:

- fully compliant with EU 2020, 2030 and 2050 climate targets and climate resilient;
- the most cost-effective, ruling out sub-economic projects;
- the projects most needed by the market, that cannot be replaced by better alternatives (notably demand-side energy efficiency).

This task is obviously complex: Still, there are many elements already available to start connecting the dots and ensure EU-wide strategic planning, forecasting and funding.

3.1. Develop a hierarchy to prioritise infrastructure projects⁵¹

A clear hierarchy should be the first step to select energy and transport infrastructure projects. In the case of the energy sector, such a hierarchy should **prioritise long-term electricity demand reduction and greater system flexibility through support for electricity demand side energy efficiency, electricity storage and greater regional grid interconnections.** Any EIB support to fossil fuel projects in order to retain flexible back-up to increasing variable renewable power supply should only be considered where absolutely necessary, only after all other flexibility options have been maximised, and only under strict operational efficiency conditions (such as compliance with a stringent Emissions Performance Standard: see Chapter 3.1.1 and Annex).

⁵¹ Such sectorial hierarchies already usefully exist for the water and the waste sectors

3.2. Ensure a more comprehensive EIB approach on infrastructures

Given the complexity of the issue, a hierarchy to select infrastructure projects is necessary but not sufficient. To avoid random project support, a comprehensive long term approach on EU energy and transport infrastructures is required. The EIB has a unique role to play as the EU policy-driven Bank that is closely associated in all EU major financial initatives for infrastructures⁵². The EIB has developed a unique experience on infrastructure support:

- The many infrastructure projects supported by the Bank in the last decades;
- The TEN-E⁵³ and TEN-T⁵⁴ track record and lessons learnt;
- The approach and list of 248 Projects of Common Interest (PCIs)⁵⁵ in the energy
- The approach developed for the Connecting Europe Facility (CEF) and the European Structural and Investments Funds, both part of the EU budget 2014-2020;
- The Project Bond Initiative and the lessons to be learnt from this initiative (see also *WWF* analysis and recommendations about it in Chapter 5.4);
- The Marguerite Fund for infrastructures⁵⁶;
- The forthcoming Investment Plan for Europe⁵⁷ including the European Fund for Strategic Investments⁵⁸ and the Project Lists from Member States and the Commission⁵⁹ of 2028+ projects (see also WWF analysis and recommendations about it in Chapter 5.5).

The Commission, EU Member States and other relevant stakeholders obviously play a key role in setting up the strategic approach for EU energy and transport infrastructures. The Commission already developed several landmark long-term EU roadmaps that provide precious information on the mid-long term scenarios needed to reach EU 2050 objectives:

- The Low-Carbon Roadmap⁶⁰;
- The Energy Roadmap⁶¹;
- The Transport White Paper⁶²;
- It is relevant to include as well the Resource Efficiency Roadmap⁶³.

In addition the Commission put forward communications and impact assessments on energy infrastructures⁶⁴. Last but not least, the Energy Union Package put forward by the Commission should lead to a more strategic EU approach on energy infrastructures.

3.3. Build the concrete tools missing

National decarbonisation roadmaps (or national carbon budget approaches) should be developed at least for energy and transport infrastructures. They should build on relevant national expertise, such as the reports *Positive Energy: how* renewable electricity can transform the UK by 203065, and Blueprint Germany: A strategy

⁵² The EIB is involved in the innovative financial instruments linked to the EU Budget, the Project Bond Initiative, the Marguerite Fund for infrastructures, the forthcoming European Fund for Strategic Investments, etc

http://europa.eu/legislation_summaries/energy/internal_energy_market/l27066_en.htm

http://ec.europa.eu/transport/themes/infrastructure/index_en.htm

https://ec.europa.eu/energy/en/topics/infrastructure/projects-common-interest

http://www.marguerite.com/

⁵⁷ European Commission, An Investment Plan for Europe, COM(2014)903final

⁵⁸ European Commission, Proposal for a regulation on the European Fund for Strategic Investment, COM(2015)10final

⁵⁹ Special Task Force, Annex – Project list from Member States and the Commission

⁶⁰ European Commission (2011), A Roadmap for moving to a competitive low carbon economy in 2050, COM(2011)112final

⁶¹ European Commission (2011), Energy Roadmap 2050, COM(2011)885/2

⁶² European Commission (2011), White Paper: Roadmap to a Single European Transport Area – Towards a competitive and resource efficient transport system, COM(2011)144final

⁶³ European Commission (2011), Roadmap to a Resource-Efficient Europe, COM(2011)571final

⁶⁴ European Commission, Impact Assessment - Energy infrastructure priorities for 2020 and beyond - A Blueprint for an

integrated European energy network (COM(2010) 677 final) 65 WWF UK, Positive Energy: how renewable electricity can transform the UK by 2030, http://assets.wwf.org.uk/downloads/positive_energy_final_designed.pdf

for a climate safe 205066. Such reports detail how EU Member States could reduce electricity demand and use renewable sources to meet 60% or more of electricity demand by 2030 (UK) and could reduce greenhouse gas emissions by some 95% by 2050 from 1990 levels (Germany).

These national decarbonisation roadmaps should then be related to national long term investment plans and project pipelines, crucial to select the most strategic infrastructures.

Such long term investment plans and project pipelines have been recommended by the Special Task Force set up for the European Fund for Strategic Investments:

"Development of long-term investment plans

a. Emphasize long-term political commitment and project/programme (pipeline) administration capacity among Member States and their institutions. That pipeline of socially and economically viable projects/programmes is best articulated in the context of a strategic long-term investment plan, while avoiding extra administrative burden.

b. The transparency of project/programme pipelines and exchange of best practice between Member States will increase the attractiveness for private investment. One such solution could be a central EU-level web site to provide links to the Member States' project/programme pipelines and include an EU project/programme pipeline (e.g. projects under the Connecting Europe Facility and European Structural and Investment Funds). Strategic long-term investment plans as well as project/programme pipelines could be published by Member States on dedicated websites" 67.

As a member of this Task Force, the EIB should follow up and actively contribute to and support the setting up of project pipelines and long term investments plans. Beyond the European Fund for Strategic Investments, such tools should progressively become a requirement of the Bank before funding any infrastructure project.

Still, such national long term investment plans won't be sufficient:

- They may not necessarily ensure compliance with EU climate targets;
- They will very likely include redundancies between neighbouring countries and as a result be sub-optimal economically at EU level;
- They may fail to address EU-wide opportunities and challenges.

They should therefore be aggregated at EU level to ensure their complementarity, maximise existing infrastructures, eliminate redundant projects, and find the most costeffective path to ensure the rapid decarbonisation of energy and transport infrastructures. Cumulative emissions of EU-wide project pipelines can be estimated to check consistency with EU climate targets.

Everywhere it is the ability to do so, the EIB should play an active transformational role in the setting up of these missing tools by providing its financial experience and lessons learnt, assessing what information is missing to ensure the optimal selection of projects, clarifying what level of granularity is required in roadmaps to be useful for the Bank, etc.

⁶⁶ WWF Germany, Blueprint Germany: A strategy for a climate safe 2050, http://www.wwf.de/fileadmin/fm-wwf/Publikationen-

PDF/WWF Blueprint Germany.pdf 67 Special Task Force (Member States, Commission, EIB) on investment in the EU (2014), Final Task Force Report, Executive Summary

WWF recommendations

- The EIB should develop a clear hierarchy to prioritise infrastructure projects: in the case of the energy sector, such a hierarchy should prioritise long-term electricity demand reduction and greater system flexibility through support for electricity demand side energy efficiency, electricity storage and greater regional grid interconnections. EIB support to fossil fuel projects should be a last resort option where absolutely necessary, after all other flexibility options have been maximized;
- As the EU policy-driven Bank closely associated to all EU major funding initatives for infrastructures the EIB has a unique transformational role to play in the setting up of the missing tools: national decarbonisation roadmaps for energy and transport infrastructures, related to national long term investment plans and project pipelines (as recommended by the Special Task Force set up for the European Fund for Strategic Investments of which the EIB was a member). Such investment plans and project pipelines should be aggregated at EU level to maximise EU outcomes.

4. CLIMATE ACTION PORTFOLIO

1. Raise the EIB Climate Action target

The three-year EIB Corporate Operational Plan (COP) sets a target of at least 25% of total annual lending for 'climate action' projects, unchanged since 2011. As shown in the EIB Call for public views, this target has been achieved or overachieved since 2010, which is positive.

However the new 2030 EU climate and energy targets require a review of the EIB target. The new emphasis on energy efficiency in the Energy Union Package will very likely foster more investments opportunities. Given that the EU mitigation effort has to be doubled by 2030, it is reasonable to assume that the EIB effort should follow the same trend. It should be noted that such a shift is not at the expense of other priority areas of the Bank: as explained above (See Chapter 1. Overarching climate policy principles and Chapter 2. Climate mainstreaming in the project appraisal process), the vast area of energy efficiency for example can combine multiple benefits in all the six priority areas of the Bank: SME support, regional development, environmental sustainability, innovation and research, competitive and secure energy supply, and it partly reduces the need for costly transeuropean infrastructures in a very cost-effective way. It is also a huge job provider.

WWF recommendations

The EIB should increase its climate action target by 5 percentage points in each new Corporate Operational Plan, in order to reach at least 50% by 2030.

2. Strengthen the Climate Action eligibility criteria

The tightening of EIB Climate Action eligibility criteria is necessary to reflect both market changes and EU 2030 and 2050 climate targets. As a general principle, the Climate Action eligibility criteria must be designed to favour most transformative projects with long-term effects, and avoid that incremental projects crowd out transformational ones.

Such improvements are recommended:

Energy efficiency: set up sectorial performance requirements (e.g. for new buildings, building renovations, energy efficiency in industry or energy services) which any project deemed energy efficient will have to meet; the level of performance requirement should be based on best available technology globally and be in line with 2050 requirements for given sectors. In the building sector for example, up to 90% energy saving is now feasible through energy refurbishment with state of the art technologies: as a result saving 20-40% of energy is very sub-optimal. In the building

sector, the Climate Action criteria should increasingly refocus on deep renovation of buildings⁶⁸.

The Climate Bonds Initiative⁶⁹ is currently working with a wide group of institutions (e.g. the International Energy Agency), investors, industry, academics and policy think-tanks (e.g. the Buildings Performance Institute of Europe), to develop such criteria to be related to fixed income investments for buildings. Although developed for Climate Bond certification, the methodology and criteria can be adapted to other financial instruments including lending policies.

- Eligibility criteria for car manufacturing industry projects should refocus on zero
 emission vehicles only (e.g. electric cars). Efforts to reduce emissions of fossil fuel
 based cars have become business as usual given the EU binding requirements and are
 not transformative enough in the mid-long term to ensure sufficient decarbonisation
 of road transport.
- Eligibility criteria for projects through financial intermediaries should require full information on the climate outcomes (*see also Chapter 5.1. on financial intermediaries*).
- For renewables energy projects in the sectors of biofuels, biomass and smallhydropower at least, the EIB should develop sustainability criteria to mitigate potential negative impacts on biodiversity and ecosystems services.

WWF recommendations

The EIB should strengthen its Climate Action eligibility criteria in the following ways:

- Energy efficiency: set up sectorial performance requirements based on best available technology globally;
- Car manufacturer industry: refocus on zero emission vehicles only;
- Projects through financial intermediaries: require full information on the climate outcomes;
- Renewables energy (biofuels, biomass and micro-hydropower): develop sustainability criteria to mitigate potential negative impacts on biodiversity.

⁶⁸ While there is still no common definition for deep renovations at EU level, WWF defines it as a refurbishment that reduces the energy performance of a building to a level comparable to the passive house standard if technically feasible; or a reduction of at least 75% of energy consumption compared to the building's performance before renovation ⁶⁹ http://climatebonds.net/

5. ENGAGING PRIVATE SECTOR INVESTORS AND OTHER STAKEHOLDERS

1. Ensure transparency and accountability of financial intermediaries

Intermediated lending on the rise

The EIB provides loans and investments to banks and investment funds who act as intermediaries. These intermediaries are then required to provide funding, usually with certain conditions attached. There are some uniform conditions such as a ban on certain sectors or the minimum and maximum loan size and there are also loan specific conditions which are negotiated individually (such as allocating the funding to a specific targeted sector).

Intermediated lending now represents over 20% of the EIB total annual lending and this figure is increasing. It is used as a policy tool by the EIB to support key areas such as micro finance or renewables. The justification for this is that through intermediaries smaller loans and investments can be provided than the EIB can provide directly, and more businesses can thus be supported by the EIB than would otherwise be possible.

Lack of transparency and accountability

There are however many concerns with the use of financial intermediaries:

- As shown in two reports⁷⁰, the whole process of how the intermediaries lend or invest the money remains very opaque despite the fact that it is public money that is being handed out. Little or no information is provided to the public by the intermediaries or the EIB on where the money ends up and who actually benefits from it (both inside and outside the EU);
- The EIB does not do any ex ante due diligence on the ultimate projects and very little ex post evaluation. As a consequence it is impossible to evaluate the impact of these loans, for example their climate impact;
- The EIB has very little say in who the final beneficiaries of the loans/investments are. As the intermediaries take on the risk of the final loan or investment, they ultimately control the process of selecting and approving the end project;
- Outside the EU, the financial intermediaries are mostly foreign owned and based entities so their local expertise and commitment to local development needs is questionable;

⁷⁰ CEE Bankwatch (2010), Missing in action - The winners, the losers and the unknowns of the European Investment Bank's anti-crisis SME offensive in central and eastern Europe; see also Counter Balance (2010), Hit and run development

WWF recommendations

The EIB should significantly strengthen the conditions and transparency requirements to financial intermediaries. Claimed climate benefits through financial intermediaries should be systematically substantiated with relevant data and qualitative information.

2. Scale up technical assistance

Technical assistance will become an increasingly important aspect of the EIB added value, as the Bank moves towards:

- A more strategic climate approach to avoid random project support, with project pipelines and long term investments plans (see Chapter 3.3);
- Strenghened low carbon requirements at project level, including for climate resilience;
- Smaller-scale low carbon projects to be bundled together in aggregation plaftorms;
- More complex projects (e.g. smart cities that can integrate multiple aspects of buildings' energy refurbishment, roof-top solar energy, sustainable transport, waste and water efficient management, green infrastructures as well as social issues).

Technical assistance should be prioritized for "no regrets" sectors that are best suited to benefit several priority areas of the Bank - typically energy and **resource efficiency** (see Chapters 1 and 2). Experience shows that many relevant projects don't happen unless technical assistance is provided, resulting in lost opportunities.

EIB technical assistance is relevant for most stakeholders: public and private project promoters, planning authorities (Member States, regions), private financial institutions (financial intermediaries, etc). The EIB should be as proactive as possible. Roadshows of the Bank to present its technical assistance capacity and financial facilities in Member States is recommended to raise awareness of authorities and project promoters.

WWF recommendations

The EIB should significantly scale up its technical assistance capacity and funding with a priority for "no regrets" sectors delivering multiple benefits (energy and resource efficiency) - including in cooperation with the Commission for relevant instruments (JASPERS, JESSICA, ELENA, the European Investment Advisory Hub for the forthcoming European Fund for Strategic Investments).

3. Develop green bonds and aggregation of small assets

The EIB is a world leader in term of green bonds issuance, which is quite positive. On this basis, WWF identifies several opportunities for the Bank:

- The EIB should carefully ensure that its own green bonds focus on the best available technologies globally. On this basis the EIB should engage in multistakeholder dialogues⁷¹ to **ensure that a robust, credible and fully developed and generally-accepted industry standard for green bonds, sector by sector, is developed**. Such standardization will ensure that deployment of funds into this market contributes significantly toward a sustainable economy, providing a credible framework for the orderly development of this market, avoiding reputational risks and ensuring investor confidence;
- In addition to continuing its own issuance of green bonds, the EIB should **support** the use of green bonds by other private or public issuers in several ways, enabling them to leverage the private capital markets for green investments;
- **Technical support**: The EIB should integrate advice on how to issue green bonds in their technical assistance initiatives. For example, JESSICA and ELENA can advise relevant cities and other local municipalities, and affiliated entities, on how to issue green municipal bonds (*see also Part 2 before on technical assistance*);
- The EIB should improve its support for green asset-backed securitisation. Securitisation of green assets has two main benefits: it enables refinancing of assets. and aggregation of smaller assets. Many individual investments in renewable energy and emission reduction areas are too small for a typical bond issuance (€200 million-1 billion). Aggregators are critical in the market to pool investments into offerings suitable for the scaled up appetite of institutional investors. These provide exit strategies for risk taking developers, helping them churn their higher risk equity at a faster rate and thus develop more projects. The proposed initiative for green securitisation "Renewable Energy Platform for Institutional Investors (REPIN)" is one option that should be included in the EIB's Climate Action approach. As many green assets are small scale, aggregation is required to access the scale required by institutional investors. The REPIN platform is relevant for securitisation of green projects both within and outside the EU. Picking up the green securitisation agenda within the EIB is timely, as there is currently strong policy momentum in place to revive the European securitisation market more broadly and to establish a capital markets union.

WWF recommendations

- The EIB should support the development of a robust, credible and fully developed and generally-accepted industry standard for green bonds, sector by sector.
- The EIB should deliver advice on how to issue green bonds to other private or public issuers in several ways, including through technical assistance.
- The EIB should improve its support for green asset-backed securitization, enabling aggregation of smaller assets. Notably, the REPIN (Renewable Energy Platform for Institutional Investors)" platform is relevant for securitisation of green projects.

⁷¹ Notably with the Climate Bond Initiative, http://www.climatebonds.net/

4. Refocus the Project Bond Initiative

A controversial initiative focused on high carbon projects

The Project Bond Initiative was designed by the Commission and the EIB to stimulate investment in key strategic EU infrastructure in transport, energy and broadband and attract institutional investors to the capital market financing of projects, through the financial mechanism of credit enhancement⁷².

The EIB Call for public views provides misleading information about the Project Bond Initiative⁷³: it only mentions the single Project Bond that benefited a low carbon project (offshore wind transmission line).

The EIB omits to mention that most Project Bonds (up to 75%) are benefitting high carbon projects, essentially motorways74. As a result the Project Bond Initiative as a whole contradicts EU climate targets.

High carbon Project Bonds (three to six)	Low carbon Project Bond (one)	Other Project Bonds (one)
Gas storage Spain (failure)	Wind offshore transmission	Superfast broadband
	link UK	France
Motorway Germany		
Motorway Belgium		
Motorway Italy (option)		
Motorway Ireland (option)		
Motorway France (option)		

Among the supported projects, the high carbon 'Castor' gas storage project in Spain completely failed and will cost Spanish citizens at least 1.4 billion euro⁷⁵, ending up exacerbating Spanish troubled finances. The Spanish government was forced to halt work at the Castor plant after 220 mini earthquakes in the area had been detected in less than a month. Under the terms of the project contract, the Spanish government will be obliged to reimburse the private operator Escal UGS: Spain's Industry Minister lost the case at the Spanish Supreme Court.

It should also be noted that all the motorways supported by the Project Bond Initiative are located in western European countries that are not struggling to access private capital markets: it is therefore dubious whether these Project Bonds have any additionality.

The urgent need to refocus on low carbon projects

Project Bonds should help unlock the low carbon potential of the EU by supporting strategic low carbon infrastructures. This is what the European Parliament requested: "The European Parliament: (...) 32. (...) calls on the EIB to ensure that the Project Bond Initiative is consistent with the EU long-term climate target, i.e. that it focuses on lowcarbon infrastructures" 76.

⁷² http://ec.europa.eu/economy_finance/financial_operations/investment/europe_2020/index_en.htm

⁷⁴ In addition to the five active Project Bonds, three Project Bonds 'options' have been approved by the EIB Board of Directors and will translate into active Project Bonds with the signature of a finance contract: these three Project Bonds options are all

http://www.counter-balance.org/first-eu-project-bonds-fail-and-will-cost-spain-eur-14-billion/

The European Parliament resolution of 11 March 2014 on the European Investment Bank (EIB) – Annual Report 2012 (2013/2131(INI))

WWF recommendations

So far the Project Bond Initiative is counter-productive for EU climate targets. The Commission and the EIB should urgently refocus it on low-carbon projects by ending support to high carbon projects and by expanding its scope to renewable energy production and energy efficiency projects.

5. Clarify and focus the Juncker investment plan

The Commission President Juncker's "Investment plan for growth and jobs" is aiming at mobilizing 315 billion euro of additional investments by 2018 with the EIB being the central institution to implement it. A proposed regulation setting up the framework of the European Fund for Strategic investment (EFSI) is currently negotiated by the European Parliament and the Council and its adoption is envisaged for June 2015.

The draft regulation worryingly lacks focus and clarity. The EIB should contribute to improving it on the following key issues:

- The regulation should clarify that all EIB procedures, standards and sectoral and horizontal policies will apply to any project supported by the EFSI instead of ad hoc fast track procedures. In every project full alignment with EU legislation should be ensured.
- In order to avoid random project support, key project selection and performance criteria should be applied that guarantee projects' full consistency with EU 2050 climate, resource efficiency and biodiversity goals⁷⁸. Analysis of the Project List shows that Member States have proposed more than a trillion Euros' worth of low-carbon and socially useful investments⁷⁹, that simultaneously drive short term economic benefits and long term sustainability - a double win that high-carbon projects fail to deliver. Trade offs between short-term economic wins and long term sustainability should therefore be avoided. As a top priority, the Fund should focus on energy and resource efficiency investments (notably buildings energy refurbishments). This should also include renewable energy generation, smart grids, electricity storage, railway transport and sustainable urban mobility, infrastructures for electric vehicles, green infrastructures.
- Given the indicative Project List from Member States, there is no rationale for the EFSI to invest in high carbon energy and transport projects that expose the EU to high risk of carbon stranded assets. Money should not be spent in projects contradicting EU climate targets, that may be stranded in 20 years, aggravate the depletion of the European natural capital or are not climate resilient. This primarily concerns any type of airport infrastructure⁸⁰, new motorways and large roads, and any coal, oil and nuclear infrastructure. Given the falling gas demand and risk of overinvestment, the scope of support for gas infrastructures should be very focused: long distance pipelines and LNG plants should be avoided and the EFSI

⁷⁸ 80-95% greenhouse gas emissions reduction by 2050 (compared to 1990 levels) and full restoration of EU biodiversity and ecosystem services (European Council of 25-26 March 2010)
⁷⁹ E3G, Europe's choice: low carbon growth or high carbon risk? Analysis of Member States proposals for the EFSI, January

<sup>2015
80</sup> Including dedicated rail connections between important airports and urban centres that lead to increased greenhouse gas

should carefully focus on regional investments fostering the use of biogas and reverse flows (see also Chapter 3 Carbon intensive sectors).

The regulation should clarify that the EFSI is subject to the highest standards and new EU regulations related to anti-money laundering, fraud, corruption and fight against tax dodging and evasion.

WWF recommendations

The EIB should contribute to clarify and focus the EFSI regulation, notably:

- Clarify that all EIB procedures, standards and policies will apply to any EFSI project;
- The EFSI should focus on low carbon projects that simultaneously drive short term economic benefits and long term sustainability. The top priority should be energy and resource efficiency investments.
- Given the indicative Project List from Member States, there is no rationale for the EFSI to invest in high carbon energy and transport projects that expose the EU to high risk of carbon stranded assets.

6. Strengthen coordination with National Promotional Banks

The EIB has already been working with several National Promotional Banks (e.g. in the Marguerite Fund for infrastructures with German KfW, French Caisse des Dépôts et Consignations and Italian Cassa Depositi e Prestiti, and with the forthcoming European Fund for Strategic Investments).

Chapter 3 above shows the need for a more strategic approach on the critical energy and transport sectors. Strengthened cooperation and partnerships between the EIB and National Promotional Banks on such sectors⁸¹ would help develop a more strategic national and EUwide approach to rapidly decarbonize the EU energy and transport systems. It would indeed help improve coherence, avoid redundancies, pool expertise, better focus on most needed and cost-effective projects and as a result maximize European outcomes.

WWF recommendations

The EIB should strengthen its cooperation with National Promotional Banks to help develop a more strategic EU-wide approach on the decarbonisation of the EU energy and transport systems.

⁸¹ This could be expanded to other key sectors like industry

7. Coordinate transparently with Multilateral Development **Banks and IDFC**

1. Lack of transparency of coordination processes

Since 2010, the EIB has been working together with other Multilateral Development Banks to coordinate and potentially harmonise their approaches in several ways.

Altough this is positive, it is quite worrying that this process happens behind close doors. It is hard to know what is discussed, for what purpose, by whom and when, making the process unaccountable to citizens and civil society organisations, with no opportunity to provide inputs. This should be modified by ensuring adequate transparency.

The coordination with the International Development Finance Club (IDFC, including German KfW or French AFD) suffers similar opacity.

2. The COP21 opportunity for a joint climate statement

The United Nations' COP21 conference in December 2015 is a huge opportunity for the EIB and other Multilateral Development Banks to release a joint statement with ambitious climate commitments, in order to send a strong global signal to world governments, industry and investors. IDFC members could also join such a statement.

The EIB should take advantage of its forthcoming Climate Policy to encourage other Multilateral Banks and IDFC members to follow suit and take commitments.

WWF recommendations

- The EIB should ensure transparency of the coordination processes with other Multilateral Development Banks and the International Development Finance Club;
- The EIB and other Multilateral Development Banks and potentially IDFC members should release a joint statement with ambitious climate commitments at the COP21 to send a strong global signal.

ANNEX. REVIEW OF THE EIB EMISSIONS PERFORMANCE STANDARD

The need to ensure consistency with the EU 2050 climate target

Key points

The EIB adopted its new Energy policy in July 2013⁸², including an Emissions Performance Standard (EPS) set at a level of 550 g CO₂/kWh. The EIB committed to review this level in 2014 but failed to do so.

The level of the EIB EPS is not consistent with the EU 2050 climate target which would requires an initial EPS of maximum 450g CO₂/kWh, and lags behind those EPS introduced by the UK, US and Canada.

WWF recommends that the EIB sets the EPS level at 350 g CO₂/kWh in order to only support the most efficient fossil fuel-fired power plants, given its commitments to only support best available technologies. This would send a strong signal to both industry and investors.

This level of 350 g CO₂/kWh largely corresponds to the fossil fuelfired power plants financed by the EIB in the last years: the EIB is already reaching that level in practice and should clarify it.

The fossil fuel-fired power plant technology reaching 350 g CO₂/kWh is already mainstreamed: there is no rationale to procrastinate with more polluting technologies.

It should be noted that the two exemptions to the EIB EPS (isolated energy systems; poorest countries) remain unchanged in the EIB energy policy, allowing flexibility in exceptional cases.

⁸² EIB and Energy: Delivering Growth, Security and Sustainability - EIB's Screening and Assessment Criteria for Energy Projects, July 2013

1. Reference levels for the EPS

Below are reference levels of emissions intensity for different sources of power production.

	Emissions factor (g CO2 / kWh)	Technology deployment
	25	Wind, hydropower
Low carbon	40-70	Gas-fired plants with CCS
	85	Solar photovoltaic
< 200	45-180	Various coal-fired plants with CCS (assumption: carbon capture efficiency of 95% - 75%)
> 200	300	New (most efficient) gas-fired plants fitted with CHP (Combined Heat and Power)
	320-380	New (most efficient) gas-fired plants
	350-550	Existing gas-fired plants
	550	New (most efficient) oil-fired plants
High carbon	620-670	Existing oil-fired plants
	730	New (most efficient) hard coal-fired plants with powder coal injection
	760	New (most efficient) hard coal-fired plants with gasification
	800	New (most efficient) lignite-fired plants with gasification
	850	Existing hard coal-fired plants
	1000	Existing lignite-fired plants

Note: All numbers are average for technology globally

Sources: CO2 emissions from fossil fuels, IEA (2013); International comparison of fossil power efficiency and CO2 intensity, ECOFYS (2011); Carbon dioxide capture and storage SPM, IPCC Special Report (2008).

2. What does 550 g CO2/kWh mean?

- Importantly, the EPS level of 550 g adopted by the EIB is not consistent with the EU target of 80-95% GHG emission reduction by 2050, which would require an EPS of maximum 450g CO2/kWh or less;
- It should be noted that the level of 550 g itself doesn't correspond to any specific relevant level: this is the emissions intensity for new oil-fired plants, but new oil plants are hardly built anymore in Europe;
- In addition, the EIB energy policy introduced two exemptions to the EPS:
 - In Europe, "where it contributes to security of supply on isolated energy systems such as small islands with no feasible mainland energy connection and only where there is no economically viable alternative";
 - Outside Europe, "in the poorest countries where it can be demonstrated that projects with carbon emissions above the threshold will have a significant and material positive impact on poverty alleviation and economic development" 83.

There is no real justification to keep the EPS level as high as 550 g AND maintain simultaneous exemptions: this leaves room for reducing the EPS level. The first exemption of isolated energy systems can even be challenged, with e.g. the smallest of Spain's Canary Islands, El Hierro, that recently made a big splash by becoming the first island in the world fully energy self-sufficient through combined water and wind power⁸⁴, now followed by other small islands in Denmark, Scotland and potentially France⁸⁵.

- On the basis on the table above, the level of 350 g CO₂/kWh would be far more relevant, as it is the level of the current most efficient fossil fuel power plants (without CHP).
- The reference levels in the table above show that no fossil fuel plant can be considered as a low carbon technology, except if it is equipped with operational efficient Carbon Capture and Storage (CCS). Incentivizing efficient CCS would require to set an EPS of less than 200 g CO2/kWh: any level above in an invitation to keep building unabated fossil fuel plants, which will become increasingly incompatible with EU climate targets⁸⁶.

⁸³ EIB energy lending policy, paragraphs 115 and 116

⁸⁴ http://www.theclimategroup.org/what-we-do/news-and-blogs/spanish-island-to-be-fully-powered-by-wind-water/

⁸⁵ http://www.letelegramme.fr/finistere/douarnenez/energie-l-ile-de-sein-en-debat-vendredi-10-12-2014-10456453.php

⁸⁶ WWF does not support the use of CCS in the energy sector given the better and safer alternatives of energy savings and renewable energies, and the high risk of CCS not delivering decarbonisation of the energy sector in a cost-effective and rapid manner

3. How does the EIB EPS compare with others?

- The US policy for Multilateral Developments Banks⁸⁷ and for the US Export Credit Agency (US Ex-Im)⁸⁸ sets an EPS of **500 g CO2/kWh**;
- In the US, the Environmental Protection Agency (EPA) introfuced the following EPS for new power plants in September 2013⁸⁹:
 - Standard for new coal fired plants: 1100 lbs/mWh which corresponds to about 500 g CO2/kWh;
 - Standard for new gas fired plants: 1000 lbs/MWh which corresponds to 454 g CO2/kWh.

It follows the successful introduction of such an EPS in the states of California (in 2007), Washington and Oregon. On the 2nd of June 2014, the US introduced complementory measures for existing fossil fuel plants, making it the first country globally that has a standard on fossil power development, both old and new: this is a game changer.

- The UK introduced an EPS at **450 g CO2/kWh**⁹⁰;
- In August 2012, the Canadian federal government introduced an EPS of **420 g CO2/kWh** for all new power plants built after 2015⁹¹.
- → The EIB EPS currently lags behind those introduced by the UK, US and Canada⁹².

⁸⁷ US government's policy on Multilateral Development Banks and coal-fired power generation, October 2013, http://www.treasury.gov/resource-center/international/development-banks/Documents/CoalGuidance_2013.pdf

⁸⁸ US Ex-Im supplemental guidelines for high carbon intensity projects, Annex A-2, approved 12/12/13 http://www2.epa.gov/sites/production/files/2013-09/documents/20130920factsheet.pdf

⁹⁰ UK Energy Bill 2012-13, https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/48367/5315-aidememoire-on-emissions-performance-standard.pdf

http://www.gazette.gc.ca/rp-pr/p2/2012/2012-09-12/html/sor-dors167-eng.html

⁹² For more information on this issue see also Centre for European Reform (Stephen Tindale), October 2013, Europe should regulate to promote carbon capture and storage

4. What gas and oil-fired power plants did the EIB support in the last years?

EIB financing for fossil fuel-fired power plants in the last two years:

Region	2012 93	2013 94
EU 15	130 M€	o M€
New MS	267,87 M€	o M€
Outside EU	100 M€	91,27 M€
Total	497,87 M€	91,27 M€

Gas-fired power plants projects 2012:

- **Greece**: Construction of max. 832 MWe combined-cycle gas turbine power plant in Megalopolis, central Peloponnese;
- **Cyprus:** Extension of Vassilikos power station through installation of a combined cycle gas turbine plant;
- **Poland:** Construction of combined cycle gas turbine power plant on existing Stalowa
- **Israel**: Construction of combined cycle gas turbine combined heat and power plant near Sdom (southern part of Dead Sea).

Gas-fired power plants projects 2013:

Russia: Construction of combined heat and power plant (CHP) in Vladivostok (3 gas turbines of around 50 MW each with heat recovery steam boilers). Efficiency is estimated at 83% in project documents.

No oil plant support was found on the EIB project database.

→ In practice, in the last two years the EIB supported fossil fuel-fired power plants that don't go above the level of 350 g CO2/kWh.

⁹³ Source: CEE Bankwatch based on EIB data

⁹⁴ Source: WWF based on EIB data

5. Fossil fuel technology reaching an EPS of 350 g CO2/kWh is already mainstreamed

Combined cycle gas turbines (CCGT) reach the level of 350 g CO₂/kWh – even without Combined Heat and Power (CHP) technology. It is important to note that this technology is now mainstreamed⁹⁵. For instance, since 2010 German giant utility RWE has always chosen CCGT technology when they built a gas-fired power plant⁹⁶.

The EIB commits to only support best available technologies: this should be the case in the fossil fuel-fired power sector in regard to the climate impacts, with a clear focus on the least carbon intensive technologies – before the EIB ultimately ends support for fossil fuel.

- → It is both logical and necessary for the EIB to set up a new EPS at the level of the most efficient fossil fuel-fired power production: 350 g CO₂/kWH. It should be noted that:
 - gas-fired power plants fitted with Combined Heat and Power (CHP) go below this level, reaching 300 g CO₂/kWh;
 - The two exemptions to the EPS remain unchanged in the EIB energy policy.

WWF ask

The EIB should set the EPS level at 350 g CO₂/kWh in order to only support the most efficient fossil fuel-fired power plants - sending a strong signal to both industry and investors.

^{95 3.} Combined cycle gas turbines (CCGTs) flood the market, December 2009, http://www.arizonaenergy.org/News_09/News_Dec09/Combined%20cycle%20gas%20turbines%20(CCGTs)%20flood%20the 20market.htm

⁹⁶ RWE Annual Report 2012, http://www.rwe.com/web/cms/mediablob/en/1838516/data/110822/11/rwe/investor- relations/reports/RWE-Annual-Report-2012.pdf

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