



Creating Markets for Climate Business



Climate change presents us with perhaps our biggest challenge in recent years

- A dangerously warming planet is not just an environmental challenge—it is a fundamental threat to our way of life and threatens to put prosperity out of the reach of millions of people.
- One of the key environmental challenges is to replace coal with a less carbon intensive option. Both renewables and natural gas will play a key role.
- One challenge for IFC is to identify ways to help these financial institutions and others to deploy capital at attractive rates that will incentivize project developers and expand the universe of viable projects for IFC and others
- Climate-smart agricultural practices are gaining ground as businesses seek to address the combined challenges of food security and climate change
- Rapid urbanization in emerging markets presents transport challenges and opportunities. By 2050, an additional 2.5 billion people are expected to live to in urban areas
- As the world's cities expand, a key challenge is to ensure that are built under cutting-edge and sustainable guidelines.
- Waste management is a large and growing global business opportunity. Between 2011 and 2025, levels of waste generation in cities are expected to increase from 1.3 billion metric tons to 2.2 billion metric tons per year

Climate Investment Opportunities Total \$23 Trillion in Emerging Markets by 2030

- IFC studied the national commitments submitted by 21 emerging market countries as part of the Paris Agreement, and found \$23 trillion in investment opportunity if they achieve their targets by 2030.
- Climate change is a business opportunity and markets are growing. The climate challenge is an opportunity—one in which the private sector is ready to invest. Businesses are increasingly finding innovative solutions to reduce greenhouse-gas emissions at a profit in sectors like renewable energy, climate-smart agriculture (CSA), green buildings, and sustainable transport.
- The Business and Sustainable Development Commission estimates that energy efficient buildings, clean vehicles, urban public transport and resilience-building in cities represents an opportunity of over \$1.1 trillion globally by 2030.
- IFC and the rest of the World Bank Group recognize climate change as an acute threat to global development that increases instability and contributes to poverty, fragility, and migration.



Countries are making progress in creating markets for climate business



COSTA RICA

Supportive policies for EVs and renewables will help Costa Rica become **carbon neutral by 2021**

COLOMBIA

Colombia's **10-year National Climate Policy** prioritizes sectors for investment; the **Sostenible Fund** will raise capital

CHILE

Chile's new **National Climate Action Plan** will accelerate private investment in renewable energy

SWEDEN

Sweden recently raised ambition to be **climate neutral by 2045**

FRANCE

Plan Climat raises France's climate ambition with strong targets for EV, renewables and carbon pricing

MOROCCO

Already a clean energy leader, Morocco is using **public-private initiatives** to achieve its NDC

CÔTE D'IVOIRE

Cote d'Ivoire aims to generate **42 percent of power from renewables** by working with IFC to attract private investment

ZAMBIA

Scaling Solar is helping Zambia to attract low-cost solar investment and deliver energy access

INDIA

India is already on track to **exceed its NDC targets for solar and wind energy** due to strong policies and incentives

Focusing on five key sectors has helped get us where we are and will continue to guide efforts in the short and medium term

WBG Goal

 **28% share of lending in climate by 2020**

 **Mobilize \$13bn in external capital**

WBG Action Plan Priority

Supporting Transformative policies and Institutions

Leveraging Resources

Scaling up Climate Action

Aligning Internal Processes and Work with Others

IFC Core Markets

 **Clean energy**

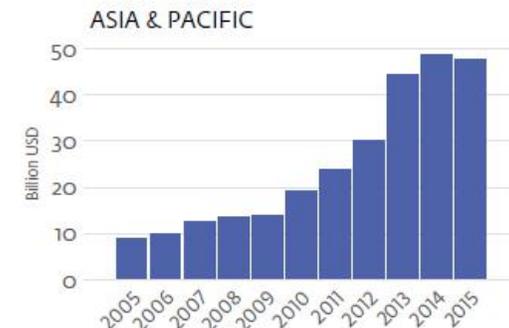
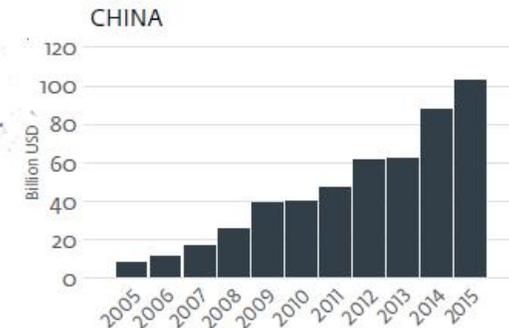
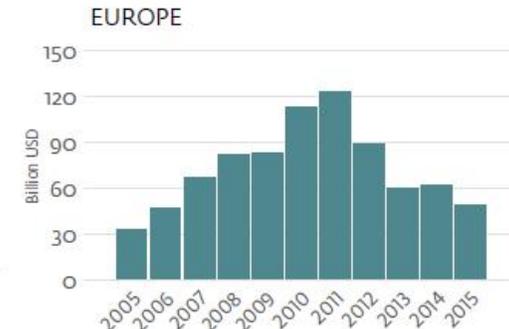
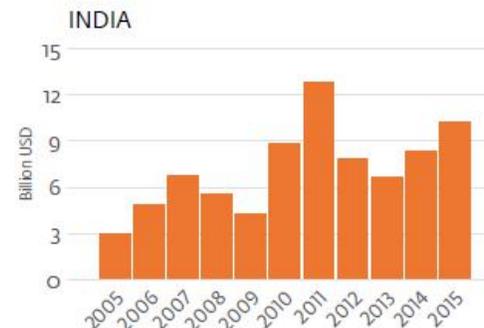
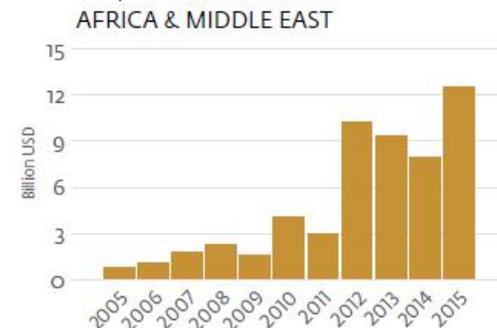
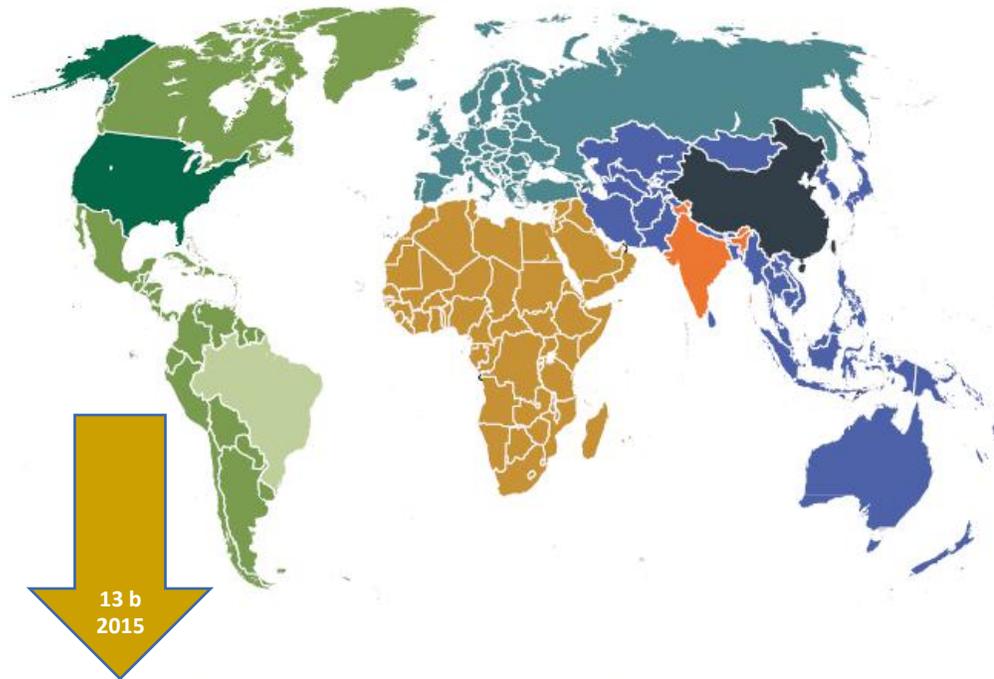
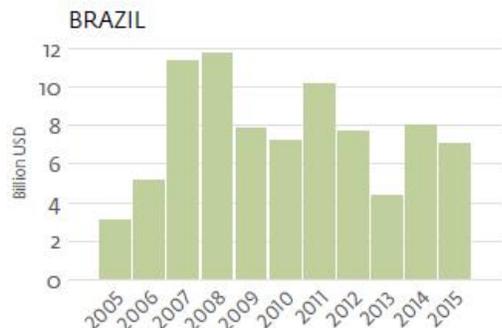
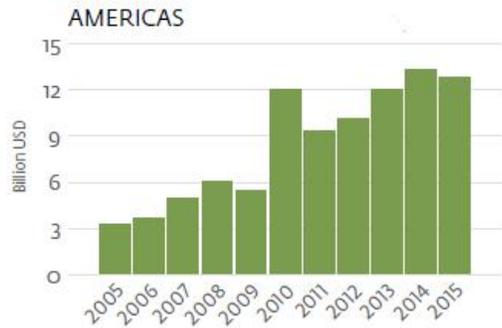
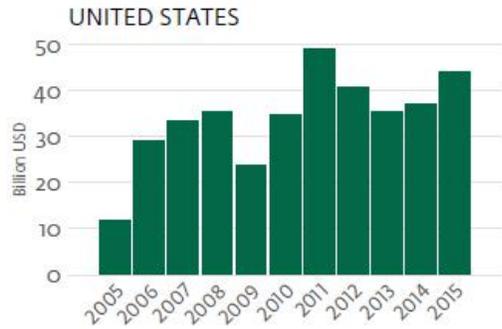
 **Climate-smart cities**

 **Green buildings**

 **Green finance**

 **Climate-smart agribusiness**

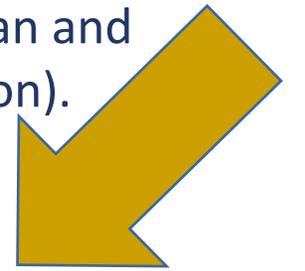
Global investment in renewable power



(Source: Bloomberg New Energy Finance)

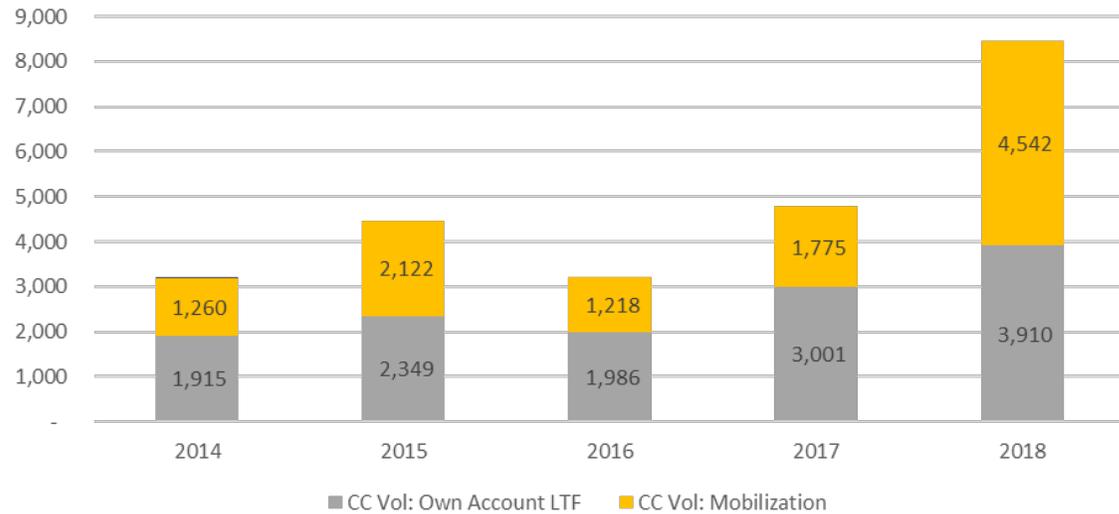
Emerging market green buildings potential

In the Middle East and North Africa, IFC found \$13 billion in opportunity in Egypt, Jordan and Morocco, split between the commercial (\$2 billion) and residential sector (\$11 billion).

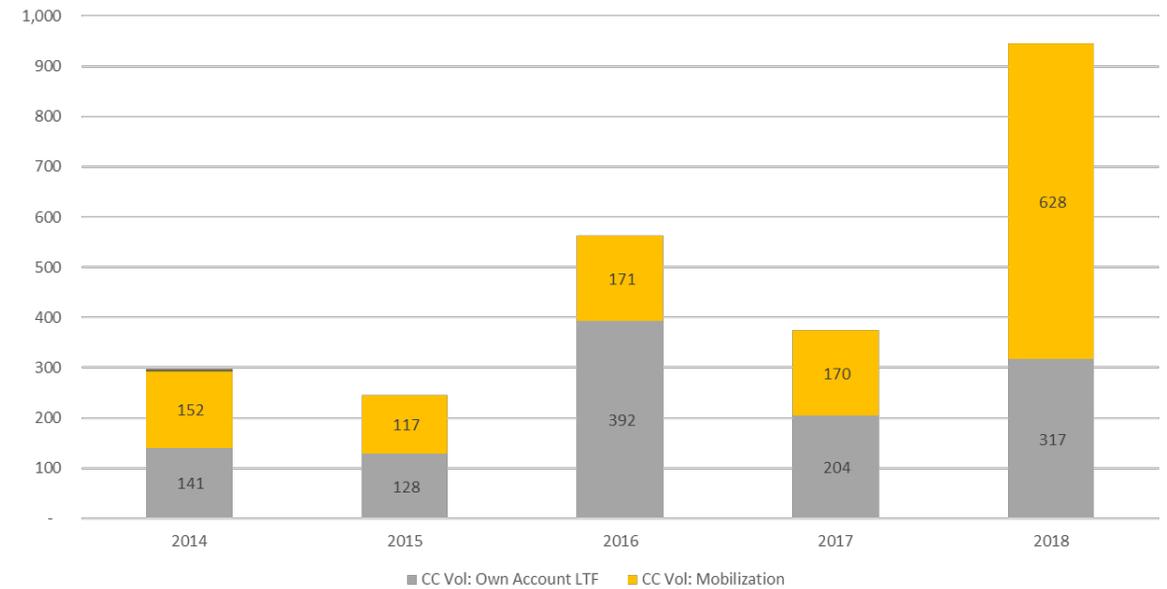


Climate Business Commitments for IFC and MENA region

Climate Business For IFC



Climate Business for MENA



Private sector solutions for water scarcity in Cairo

- With only a third of Egypt's population connected to a sewer system and rapid urbanization straining already overburdened infrastructure
- The government sought World Bank Group support for a cost-effective and safe wastewater treatment facility that would mobilize private sector participation in Cairo and 6th of October faced
- In 2006, the Public-Private Infrastructure Advisory Facility, a multi-donor technical assistance facility focusing on PPPs, assisted the government with preparing the conceptual framework and transaction model for a new wastewater treatment facility for New Cairo.
- With support from IFC's PPP advisory team, the government was able to structure and close its first PPP project in 2009: the New Cairo Waste water Treatment Plant
- The plant mobilized private investments of about \$200 million and serves more than 1 million residents
- Treated wastewater from the plant is being used to irrigate agricultural land and urban green areas, reducing freshwater demand.
- In addition, sludge from the plant serves as fertilizer to increase agricultural productivity and boost economic growth.
- It also opened the market for regional and international investors to work on other PPP projects, including a wastewater treatment plant in the 6th of October
- The Public-Private Infrastructure Advisory Facility provided technical support, helping the government define the mandate and operating environment and advising on policy issues related to project design



Blended financing for As-Samra Wastewater Treatment Plant in Jordan

- Jordan is one of the most water-scarce countries in the world. The As-Samra Wastewater Treatment Plant was built in 2008 to treat wastewater for the 2.3 million inhabitants of Amman, while supplying quality irrigation water to the surrounding region.
- The country's rapid population growth and influx of refugees tested the limit of the plant's capacity (both in terms of the volume of wastewater received and solids processing) sooner than anticipated.
- The government put a blended financial package in place to finance the expansion of the As-Samra Wastewater Treatment Plant.
- The project was undertaken by the Samra Wastewater Treatment Plant Company Limited, a private operator recruited in 2012 to finance, upgrade, and operate the treatment plant. The financial package included public funds provided as "viability gap funding," including contributions from the government (\$20 million) and a grant from the Millennium Challenge Corporation (over \$90 million).
- The viability gap funding helped leverage an additional \$110 million in private financing and reduced the capital costs, while enabling the project to become financially viable.
- The As-Samra Wastewater Treatment Plant expansion project became operational in October 2015, increasing the average daily capacity of the plant from about 260,000 cubic meters per day to more than 360,000 cubic meters per day.

