What the COP21 Paris Agreement means for your business

Post COP21 Update

The Agreement reached at COP21 in Paris, the successful culmination of six years of international negotiations, is stronger than expected. It will add significant momentum to initiatives to reduce emissions and adapt to climate change and will have profound implications for business. What actions should companies take today to prepare for the significant changes to come?

Summary

The Paris Agreement raises the level of ambition. It:

- Sets the goal of holding the increase in global temperature to 'well below' 2°C, with effort towards achieving 1.5ºC;
- Stresses the need to increase countries' ability to adapt to the adverse impacts of climate change; and
- Aims to mobilize the massive flows of finance that will be needed to set the world on a pathway to low greenhouse gas (GHG) emissions and climate-resilient development.

For the first time at global level, it provides:

- A long-term goal for GHG emissions which should peak 'as soon as possible' and reduce rapidly to net zero 'in the second half of this century'; and
- A framework which includes transparent accounting and 5-yearly 'stock-taking' reviews of progress, to drive forward the national climate action plans which have been submitted by 187 countries, including all of the world's major economies.

The Agreement recognizes the importance of finance and the role of markets. Specifically:

- Climate finance of at least $100bn per annum by 2020 will flow from developed to developing countries, with a further increase to be agreed in 2025; and
- Co-operative approaches between countries and a new crediting mechanism are allowed for, raising the prospect of future linkages between national carbon markets to achieve GHG reductions at least cost.

Background

In advance of the COP21 negotiations, all parties to the United Nations Framework Convention on Climate Change (UNFCCC) were asked to submit their national plans for limiting GHG emissions and adapting to the effects of climate change.

These plans, known as Intended Nationally Determined Contributions (INDCs), set out national GHG emissions targets and summarize the policy measures that are planned to deliver those targets. 187 countries, comprising more than 98 percent of global GHG emissions, have submitted their INDCs.

The INDCs show that all of the world's big economies, including China and India, are planning to significantly transition away from 'business as usual' (BAU) emissions between now and 2030. The major developed economies are planning to reduce emissions by at least 25 percent over the period from 2005 to 2030. This will be achieved through a combination of policy and regulatory measures and market-based mechanisms that will impact significantly on business practices and investment into the future. The Paris Agreement will raise the bar further through the 5-yearly reviews of progress.

This raises some important questions for you:

- What will COP21 mean for your company?
- How are you planning to manage the business risks and opportunities that will result from the transition to a global economy with substantially lower GHG emissions?
- Will you be able to respond effectively to the myriad of carbon-related regulations, costs and incentives that are being introduced in each of the countries where you operate?

Bottom-up approach will make a difference

COP21 negotiators did not debate the content of commitments submitted by each nation. Each national contribution was taken as given because the COP21 'pledge and review' process involved each nation volunteering the level of effort on climate change it can commit to under national circumstances.

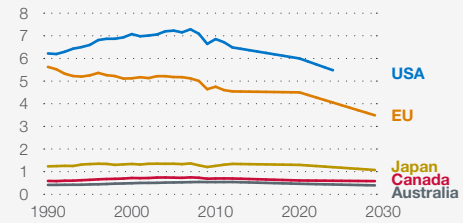
ERM believes this will bolster the likelihood of proposed actions being implemented on the ground. Each nation has chosen what it would do voluntarily instead of being pressured to act by an externally imposed United Nations mandate. In light of the strength of the Paris agreement, it is understood some countries will be reviewing their INDCs ahead of the formal ratification of the Paris Agreement in 2016.

For the majority of businesses operating internationally, it is the voluntary emissions reduction contributions that countries are proposing that shine a light on how policy and regulation will change between now and 2030.

Both absolute and intensity-based GHG pledges are likely to make businesses bear much of the responsibility for fulfilling national pledges in their operations and across their value chains.

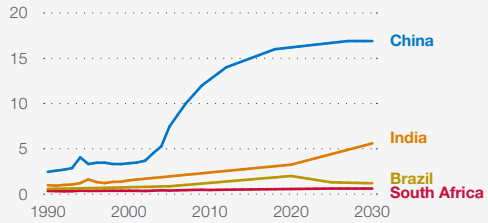
Emissions and INDC commitments from developed and developing countries

Emission levels, select developed countries
gigatons CO_2e per annum



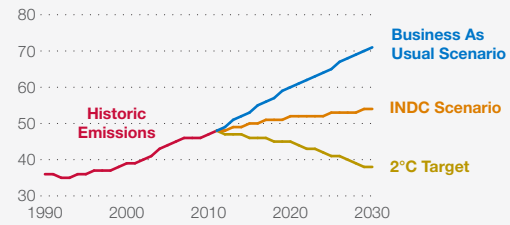
Emissions from developed countries will fall significantly as a result of INDC commitments. The EU's emissions have been on a downward trajectory since the early nineties as a result of policies implemented in light of the Kyoto Protocol. US emissions started their downward trend during the recession and have continued to reduce due to the switch from coal to gas and are projected to decrease even further due to the Clean Power Plan.

Emission levels, select developing countries
gigatons CO_2e per annum



Major developing economies will also contribute, albeit within the context of development. China and India have committed to significant reductions in the GHG intensity per unit of GDP, which will see emissions grow at a much slower rate than business as usual. China will see emissions plateau and begin to decline from 2030 onwards. Brazil will reduce emissions through strong policies to address deforestation.

Global emissions profile
gigatons CO_2e



The INDCs set the world on course for a warming of 2.7°C. Substantial, additional, tightening of national plans will be needed in the first 5-yearly review to achieve the 2°C goal, reducing global emissions by a further 15 gigatonnes of CO_2e in 2030.

Source: ERM analysis of data from UNFCCC INDC Portal and other sources

What will make countries deliver on their national plans and successively strengthen them?

Based on analysis by the United Nations, the total sum of pledges made in the national 'INDC' plans will not be sufficient to reverse the upward trend of global emissions by 2030 nor limit global warming to a 2°C goal, which has been reiterated and strengthened in Paris.

This is addressed in the Paris Agreement in two ways. Firstly, it introduces robust and transparent accounting procedures which will show whether each nation delivers its promised outcomes. Secondly, it introduces a 5-yearly 'stock taking' of progress. This stock-taking will require countries to provide updated, more progressively ambitious, plans in either 2020 or 2025 and every 5 years thereafter, 'reflecting their highest possible ambition'.

A special international dialogue in 2018, to be informed by the Intergovernmental Panel on Climate Change, will consider the prospects for peaking GHG emissions earlier. Whilst there will be no obligation on countries to strengthen their national plans as a result, there is likely to be political and other stakeholder pressure to do so.

What it means for you

National pledges are creating an international patchwork of regulations

A mix of differing approaches has emerged in each of the major economies, which shifts the status quo towards a lower-carbon future.

ERM already sees implications for business:

- **Multinational firms must comply with widely varying approaches** to GHG mitigation and climate adaptation put forth in national proposals. Differences across countries in areas of emphasis, as well as approaches to achieve GHG goals, will require business to tailor actions to meet each nation's specific requirements.
- **Firms that produce, transform and deliver energy or raw materials** to end users will feel increased pressure to reduce the carbon intensity of the fuels, power, commodities and feedstocks they deliver and to provide higher levels of carbon-free or lower-carbon energy and power or carbon-neutral feedstocks and commodities (or lose market share to those who can).
- **Firms that consume energy, power, commodities and feedstocks** to produce and deliver materials, goods and services to end users will feel increased pressure to reduce the carbon intensity in their own operations and in their value chains, from the carbon footprint of upstream suppliers or downstream customers (or lose market share to those who can).
- **Service firms** (e.g., transport, wholesale/retail, information/communications technology, finance, leisure and other service provider sectors) will feel increased pressure to reduce the carbon content and the carbon intensity of activities (or lose market share to those who can).

ERM anticipates business pressures being real and imminent because of the national pledges and the momentum generated by the Paris Agreement. As well as risks, opportunities to deliver new 'low carbon' offerings will be driven by raised ambition.

A global transition to a low-carbon world has begun. The Agreement in Paris makes the speed and spread of the transition clearer.

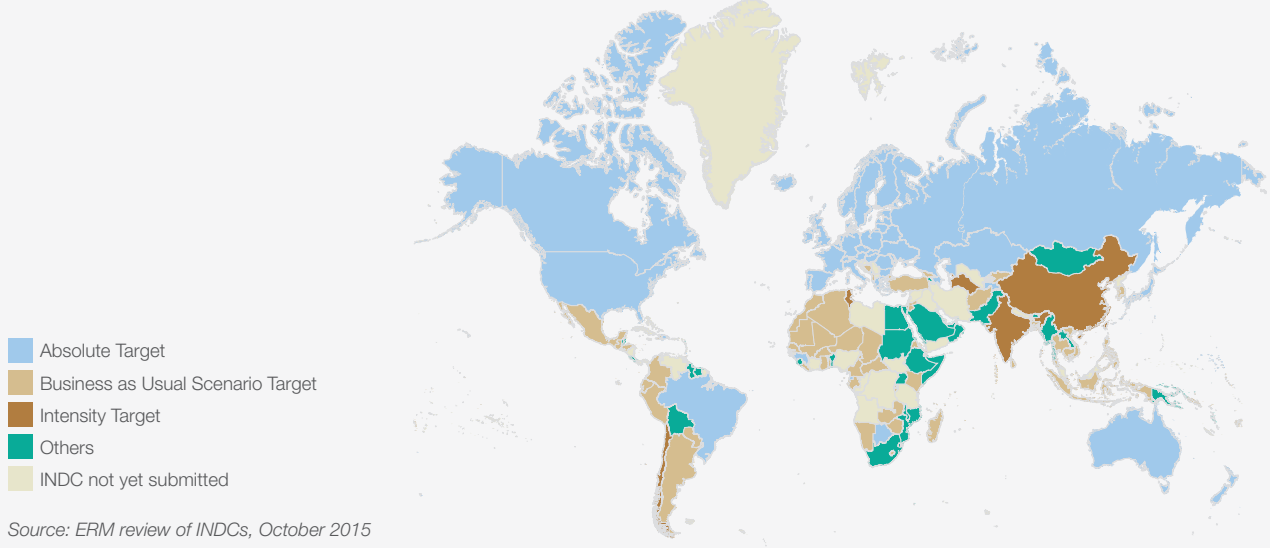
We anticipate a decade of transition in the 2020s, and a heightened level of activity in the remainder of this decade.

- Carbon pricing regimes will spread across the world.
- The cost of carbon emissions will become increasingly material through the 2020s.
- The focus on energy efficiency will be reinforced, through mandates and taxes, as a critical enabler of the transition towards a lower-emission economy – helping to make the transition both economically affordable and politically achievable.

Change will center on the energy sector.

- **Renewables** will become a growing source of power, backed by quotas and targets, driven by record levels of investment, and benefitting from increased economies of scale.
- **Investment in smart grids and storage** will ramp up in an effort to integrate fluctuating supplies of renewable power and deliver efficiencies.
- **Coal power** will become increasingly marginalized in the 34 member nations of the Organization for Economic Co-operation and Development (OECD), with new unabated coal power banned by regulations.
- **Gas** will become the default source of power, but with policy forcing greater controls on upstream methane leakage.
- **Government funding** will be needed for early carbon dioxide capture and storage (CCS) demonstrators in some countries and regions, particularly those with fossil fuel reserves. The speed of roll-out will depend on the extent to which these demonstrations deliver cost reductions and economies of scale.

National pledges ahead of COP21 suggest business will face pressure to act



Source: ERM review of INDCs, October 2015

What it means for you

Businesses across the economic spectrum will feel the impact:

- GHG accounting and reporting will become mandatory for all major industries, in all major economies. Companies that are perceived to be exposed to risks related to climate change will increasingly be expected to report openly on the materiality of these risks and the management actions being taken to address them.
- Pricing on carbon emissions will drive up the profitability and value of low-carbon, efficient assets and negatively impact high-carbon, less efficient assets.
- Grid electricity will decarbonize in many regions of the world, at different rates in different countries, helping electricity users to lower their emissions, albeit at a cost.
- The transport sector will come under increasing focus, driving efficiency improvements and the prospect of major technological shifts. Whilst the Paris Agreement does not explicitly cover international aviation and shipping, commitments for these sectors are likely to be agreed in 2016 by international industry bodies ICAO and IMO.
- The cost of carbon in value chains will become increasingly material, creating opportunities for low-carbon innovation across product and service chains in many sectors of the economy.
- The market for innovative, energy-efficient products and services will be stimulated.
- As carbon pricing and other forms of climate change regulation take hold, the financial sector increasingly will need to manage the carbon risk and opportunity associated with the companies and projects in which it invests and to which it lends.
- Forestry and land use will be in the spotlight to halt deforestation – a major source of GHG emissions – as will emissions from agriculture.

Political and regulatory risks will abound:

- The transition to a low-carbon economy is unlikely to be smooth and predictable.
- Policies will be introduced, amended, reversed, reintroduced, weakened and tightened along the way.

ERM can help you manage your business in a carbon-constrained environment

As a leader in sustainability consulting, ERM is committed to playing an active role in the response to climate change. We have the scientific, technical and regulatory expertise to help clients tackle the risks and opportunities presented by a low-carbon business environment. We have an extensive set of analytical and management tools, developed over decades with our clients, which can support effective decision-making. Among our services, we can assist you to:

- Translate the 'post-Paris' landscape of national policy commitments into an assessment of risk and opportunity across the value chain for your business.
- Develop, measure and support the implementation of practical GHG emissions reduction plans and actions, across facilities, supply chains and product lines.
- Help you to cost-effectively manage compliance with climate change regulation and policy measures.
- Support your engagement with stakeholders on climate change and sustainability, including public reporting on your policies, programs, targets and performance.
- Understand and manage physical risks from extreme weather and climate change and develop adaptation strategies and plans.

Many of the management tools already exist for business to manage the low-carbon transition. The key to success will be gauging the scope of carbon risk and opportunity, wherever in the world you do business, and developing a systematic means to factor that into business planning and management processes.

For more information on how ERM can help, please visit our website or your regular ERM contact.

About ERM

ERM is a leading global provider of environmental, health, safety, risk, social and sustainability consulting services. ERM has more than 5,000 people in over 40 countries and territories working out of more than 160 offices. Over the past three years ERM has worked for more than 50 percent of the Global Fortune 500 delivering innovative solutions for business and selected government clients to help them understand and manage the sustainability challenges that the world is increasingly facing.