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Where Next on Climate Change?

The Framework Convention on Climate Change (FCCC) was agreed nearly 20 years ago, at a UN conference on development and the environment in Rio de Janeiro, Brazil. It established regular meetings of the Conference of the Parties (COP). One of these agreed in 1997 on the Kyoto Protocol to the FCCC, which set binding targets on emissions of six greenhouse gases for the relatively rich countries, including Russia and Ukraine, keyed to a base year of 1990, puzzlingly seven years before the Kyoto conference. The targets were to be achieved on average during the years 2008-2012, 13 years after the Kyoto Protocol and 20 years after the base year. This period will soon end. The 17th COP met in December in Durban, South Africa, to attempt for the third time to agree on a sequel to the Kyoto Protocol, the attempts at Copenhagen in 2009 and in Cancun in 2010 having failed to reach agreement.

Against this background, COP-17 was a partial success. It did not actually reach an agreement on a sequel to Kyoto, but it agreed on a path and some important parameters for the sequel. Concretely, the European Union agreed to extend the Kyoto Protocol, with new, stiffer targets; it will perhaps be joined by Australia and New Zealand. Canada, Japan, and Russia declined to agree to an extension; the United States never ratified the Kyoto Protocol and was thus not bound by it. The European Union will probably meet its Kyoto targets, partly through emission-reducing policies adopted by the EU, partly because of weak economic growth since the recession of 2008. Russia could meet them by doing nothing, because of its generous target based on the heavy industry Soviet days of 1990. Canada was way above its target. Japan's carbon dioxide emissions also exceeded those of 1990, but Japan might meet its target through purchase of Certified Emission Rights from developing countries.

In exchange for the EU's extension, developing countries, including China, agreed that any future agreement on targets should also cover them. This is essential, since developing countries now emit more than developed countries. Indeed, on plausible projections to 2020 developing countries would have emissions that exceed *global* emissions in 1990, and rising rapidly. In others words, the developed countries could eliminate their GHG emissions completely by 2020 (which will certainly not happen), and the world would be where it was in 1990, which was considered unsatisfactory at the time. In short, without participation by at least the large emitters among developing countries no effective international agreement to limit climate change is possible. China, in particular, sensibly modified its position in Durban and agreed in principle to be covered by a binding agreement.

Concretely, COP-17 agreed to reach a successor agreement to Kyoto by 2015, which would bring all countries into the same legal framework by 2020. This is a positive step, but of course it leaves all of the hard negotiations on the magnitude and timing of the targets completely open. Indeed, it is likely that no effective agreement can be reached. The qualifier "effective" is necessary since it is possible to reach agreements among countries that have no operative effect. Here, the targets might be so generous – as they were in the cases of Russia and Ukraine at Kyoto – that they would not limit behavior in the emitting countries and thus would not slow the pace of climate change.

The reason for pessimism in reaching an effective target-based international agreement is that developing countries will understandably eschew any agreement that might threaten their rate of economic growth, which they associate with economic development. Since China has shown (as did Japan and South Korea in earlier decades) that high sustained rates of growth are possible for many years, developing countries around the world will aspire to such rates, even though most will in fact not achieve them. The aspirations, however, is what will shape their negotiating positions.

Given the rapid pace of technological change, including in the areas of potential energy conservation, it may in fact be possible to combine continuing rapid development with strict limitations on greenhouse gas emissions. But countries will not be willing to commit to binding targets unless they see clearly that the technologies are not only available somewhere in the world (which is not yet clear), but also are effectively available to them.

Given this understandable position, an agreement based on effective targets will be elusive. The feasible choices will therefore be between no agreement at all and an agreement based on actions rather than targets. Now that there is agreement that all countries should be included in an international agreement, it should be possible for the significant emitters to agree on actions that each will take to reduce emissions, and on a scheme for monitoring whether those commitments have been honored. The commitments on actions need not be uniform, but they should be comparable, not least in their impact on the production of tradable goods. This is necessary to avoid distortions to international competition, which would surely lead to countervailing duties on goods that were seen to be "subsidized" if their production was seen to be spared the costs of reducing greenhouse gas emissions.

One satisfactory common action would be for all countries to impose an internationally agreed levy on greenhouse gas emissions. Such a levy would discourage the offending emissions, raise some much needed revenue, and neutralize the impact on international competitiveness of the emission-reducing actions. Ministers of finance everywhere should welcome an internationally-sanctioned source of additional revenue. The revenue in turn could be used to increase worthy expenditures, especially on research relevant to mitigating or adapting to climate change, reduce distortionary taxes, help vulnerable countries adapt to climate change, and/or reduce budget deficits. Such choices could properly be left to each country collecting the levy.

A harmonized GHG levy, or "carbon charge," is only one approach to actions directed at mitigating climate change, albeit one especially easy to understand and to implement. Other, more complex and more differentiated approaches are imaginable. The challenge before the international community is to shift the focus of negotiations from a target-based approach, which is virtually certain to fail for the reasons given above, to an approach based on agreed actions that at least has some prospect of succeeding.

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