

TRANSCRIPT

AusSMC Briefing on carbon emissions trading

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Alright, well thanks for coming. There was an interesting paper that came out in Proceedings of the National Academy of Sciences last week and what it showed was that right now we're doing worse than the worst case scenario in terms of emissions back a decade ago or so. The IPCC made certain projections based on various scenarios about how badly polluting we might be or how we might start to mitigate these pollutions and the Kyoto Protocol was intended to get badly polluting nations to reduce their emissions below a certain amount, below 1990 levels except for the exception of Australia which was actually above 1990 levels.

Well, two lines of evidence – one by looking at a detailed accounting of emissions. Another one just by looking at the changes in well mixed greenhouse gases in the atmosphere shows that we're going along at an accelerating rate of emissions. An accelerating rate of emissions means we're going to have an accelerating rate of climate change and we're heading for a territory of dangerous climate change where we have some unforeseen, many foreseen, mostly dramatic consequences for society and for natural systems.

So what are we going to do about that? We have to have some scheme that would actually work to reverse that trend of increasing emissions. Now the only way we'll do that is to have a co-ordinated scheme. A co-ordinated scheme such as emissions trading. Now emissions trading, it was sort of implicitly part of the Kyoto Protocol and in brief what it means is that a regulatory agency puts a cap on total emissions.

And in some industries this has been something that has gone on for a long while. If you think about fisheries, a cap is placed on the amount of fisheries stock that can be taken out of a particular part of the ocean. Because if you don't do that, you inevitably get over-exploitation of the stock and a collapse of the stock. So a cap is placed by a regulatory agency which allows boats to take a certain amount of a quota and once they meet that quota, they can't take anymore.

Well a cap on carbon emissions essentially means that there is a quota placed by different polluters on carbon emissions such that they're essentially paying for the cost of their pollution. And they can't exceed that cap. If they exceed that cap there are heavy penalties for it. It could be financial penalties, it could be legal penalties, probably a combination of both. So you'll have businesses, industries that are heavy polluters and those that are light polluters, those that can adapt rapidly to reduce their carbon emissions and those that will take more time to do it.

That introduces the idea in combination with this cap of a trade whereby you have carbon credits which can be traded among those in which it was allocated such that those that can reduce their emissions more easily sell their carbon credits to those who can't. Now over time, the only way this works in reducing emissions is incrementally reduce the cap. We start off with the cap that might require some reduction in emissions and over time the regulatory agency reduces that cap such that we get a net reduction in emissions. Ideally, at some point a threshold is cost but it's not worth, it's not economically feasible to continue to pollute this carbon anyway and we have a major shift to non-polluting sources of energy.

So that's the idea of this emissions trading scheme. The alternative is the carbon tax where essentially you're paying directly for the pollution you're throwing out into the atmosphere and that tax may be increased over time. When we're talking about an emissions trading policy, the

difficulties arise in a number of areas – how you set the initial target, the speed at which you reduce that cap and also the way you enforce it and the way you monitor it. None of that detail is yet apparent to us because we haven't had the report released to the Prime Minister. But it's going to involve a decision by the Federal Government to engage in an emissions trading policy, a decision on what the initial cap will be, a decision on how you will gradually reduce that cap, a decision on how equitable, how you may distribute the carbon credits. Therefore, it's essentially a long term plan, locked in with legislation such that it's enforceable to gradually reduce emissions over time.

Now the EU is doing something similar. It has done something similar. It stumbled in that it gave out too many carbon credits initially such that they became essentially worthless. For instance, the Eastern Block for reasons independent of trying to reduce carbon emissions actually had great success in reducing carbon emissions because their economy's collapsed post-Communism. And so their emissions dropped dramatically.

Nations such as Britain reduced their emissions effectively by switching largely from coal to gas power. But overall the EU experiment was a bit of a failure because it quickly led to a flooring out of the price of carbon because there were too many credits in the market to begin with. That's a lesson Australia can learn from.

Ultimately what they should be building towards is a global system because that's the only way you're going to reduce greenhouse gas emissions globally. And of course the atmosphere doesn't care where the greenhouse gas emissions come from. You pollute in Australia, you pollute in Europe – these gases are well mixed fairly quickly in the atmosphere. That's why you can have a monitoring station up on Mauna Loa in the middle of the Pacific Ocean which can measure atmospheric concentrations of greenhouse gases on a year to year basis and do so very reliably, as effectively a global concentration because they mix very rapidly.

So in the end you don't have to have a global system but if Australia has a local system implemented beforehand, then businesses are prepared for a more global system that's been ratified by all the nations and it provides certainty to business as well because they know what they're going to have to pay essentially for their carbon pollution. They know the maximum that they're going to be able to pollute. They are able to make business plans to allow for that.

Maybe at this point it's probably worth opening it up to questions so that you can ask any other particularly specifics before we move on to Stephen but that's the basic fundamentals of what the trading scheme is likely to involve.

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