

INTERNATIONAL MEETING DEMANDS GLOBAL AGREEMENT ON CLIMATE CHANGE

By Philip Schabacoff (NY Times)

BONN, GERMANY -Government officials, scientists, environmentalists and religious leaders from 48 countries demanded an immediate international agreement to halt the degradation of the Earth's atmosphere and set formal targets for global reductions in the concentrations of GHGs from the burning of fossil fuels.

Delegates to the conference on the "changing atmosphere" urged strong, legally imposed global control measures to slow and then roll back greenhouse gas emissions that, they agreed, are the cause of an unprecedented warming of the Earth's surface that is and will continue to produce profound climatic change.

The statement was made only weeks after the near total destruction of the island of Vanuatu when Cyclone Pam hit the Pacific Ocean nation in March 2015.

Vanuatu is a low-lying collection of islands and has long been at risk for major storms. The country's president has already pointed to climate change and the associated rising seas as a contributing factor. The waters surged as high as 26 feet as the category five storm reached capital of Port Vila. The scene there is being described as total devastation. An estimated 90 percent of the buildings are damaged.

At the Paris summit in December 2015, 196 countries will meet to sign a new climate change agreement. But how likely is it that it will be meaningful and make a difference to climate action on the ground?

Not only is a deal possible but, with the right political leadership, it can lead to ambitious outcomes that will have a real impact on tackling climate change. Countries like the US and China, the two biggest polluters, are working to ensure an outcome is likely in 2015. and the years since the 2009 Copenhagen negotiations have seen some significant breakthroughs.

The 2009 negotiations were fraught and chaotic, with a last minute agreement emerging after frantic scenes on the conference floor. Yet international negotiations remain vital for countries to build on national approaches, providing reassurance that they are not acting alone, and making it easier for nations to work together towards a low carbon future.

This is why the 2015 Paris summit is important. To ensure meaningful action on climate change, the deal must contain the following elements:

- Ambitious action before and after 2020;
- A strong legal framework and clear rules;
- A clear role for equity;
- A long term approach;
- Public finance for adaptation and low carbon transition;
- A outline for action on deforestation and land use;
- Clear links to the Sustainable Development goal;

A strong deal will make a significant difference to the ability of individual countries to tackle climate change. It will provide a clear signal to business, to guide investment toward low carbon outcomes. It will reduce the competitiveness impacts of national policies, and create a simpler, more predictable framework for companies operating in different countries.

Vitally, a strong climate deal will help to meet international development aims, which are at increasing risk from rising global temperatures. Eliminating poverty, improving health and building security are all outcomes linked to tackling climate change.

And it will also bring huge benefits to the natural environment by helping to avoid biodiversity loss and the degradation of ecosystems upon which we all depend.

And so the question now is whether or not we will have the courage to act before it is too late. How we answer will have a profound impact on the world that we leave behind.

REVIEW QUESTIONS:

1. What has triggered the global demand for an agreement on climate change at a meeting in December 2015?
2. According to the conference statement, what are the causes of the climate problem?
3. Why after so many years of chaos, have these countries now acted so strongly in their desire to deal with the problem?
4. Where did the event mentioned in #3 occur and what were the effects of the event?
5. How likely is it that a deal can be reached and will have lasting effects?
6. Which countries are taking the leadership role? Why should they have this responsibility?
7. Despite all the arguments and frustration of the last climate conference, why is it vital to have international negotiations?
8. Which three elements under consideration do you consider the most important and why?
9. Aside from slowing climate change, what are some other benefits of a climate agreement?
10. Ultimately, what will determine the success of the climate conference?

FUTURE GENERATIONS

Members of this group feel that humankind's disruption of the global ecosystem by increasing the average global temperature has broad ethical consequences and raises serious questions about the correctness of our actions. Because of their technological development the wealthy nations feel that they have the power to act as they see fit. However, what they do affects the entire world and will affect the future forever. At the same time, these countries also have the ability to foresee long-term consequences of their actions, as well as the freedom to make choices and control the advance of technology. What right do developed countries have to impose detrimental environmental conditions on future generations while altering the world for our own benefit? They have no right to ignore the rights and needs of the people and living things not yet represented and have no voice in decisions that will affect their lives. We have the ability, the knowledge and the capacity to make choices concerning the lives of future generations and the obligation not to act in a way that will harm them. Some of the questions that they are asking are:

- What price do you put on the loss of wildlife?
- How much do you value an African child?
- Do our great great grandchildren matter?

So when you hear people arguing about the economic costs of doing so you might want to remind them that what they are really arguing about is how much we value wildlife, the lives of African children and the lives of our own descendants. Those who argue we can't afford to stop dangerous climate change are, in short, arguing that these things are worthless or of low value.

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AUTOMOBILE MANUFACTURERS





The people you speak for are concerned about profits for owners and investors and jobs for workers. People who buy new cars seem mostly concerned about safety, comfort, engine power and cost. So, these are the guidelines that you follow to design them. In the past few years, many governments have imposed more effective pollution control equipment on cars and on the factories that produce them- all of which adds to the price of the car and makes people think twice about buying a new one. Now because of the enhanced greenhouse effect, you are being asked to help reduce the amount of carbon dioxide by producing cars that are smaller, and car owners are being encouraged to use them only when necessary. You are worried about decreasing profits. If this happens, investors will stop putting their money into automobile companies and factories will have to be closed down. That would put thousands of people out of work.

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ISLAND NATIONS



There is great concern among the people you represent about rising sea levels, which are already spoiling fresh water supplies and food production on many islands. They are also very worried about the possible increase in devastating storms and the destruction of the coral reefs that your people depend on for fishing. The island of Vanuatu has already suffered the effects of severe storms and has lost all the development that had taken place. There is widespread destruction and concern about the possibility of remaining on the islands. There is a very high level of frustration because in order to solve your problem, people in developed countries will have to decide to produce less carbon dioxide and other GHGs. It appears that most people in these other countries could care less about the island nations and do not seem very interested in helping you, possibly because you represent less than 1% of the world's people. You are hopeful that people in large industrialized countries like the US and China will realize that low coastal areas in their countries will also be seriously affected by rising sea levels.

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FARMERS AND RANCHERS



Climate change is projected to have significant impacts on agricultural conditions, food supply, and food security. You represent people who are troubled by major changes in Earth's climate that will affect the crops that can be grown and the animals that can be raised. Some farmers will be helped by climate change and others will be devastated, depending on their willingness to change their methods.

Overall, climate change could result in a variety of impacts on agriculture. Some of these effects are biophysical, some are ecological, and some are economic, including:

- A shift in climate and agricultural zones towards the poles;
- Changes in production patterns due to higher temperatures;
- A boost in agricultural production due to increased carbon dioxide in the atmosphere;
- Changing precipitation patterns;
- Increased vulnerability of the landless and the poor;

In general, global agriculture, farmers, ranchers and crop scientists have concluded that it's too late to fight climate change. They are trying to adapt to it with new generations of hardier animals and plants specially engineered to survive, and even thrive, in intense heat, with little rain. Some people hesitate to involve too much biotechnology because of the possible health issues involved, especially with genetically modified organisms (GMOs). A **GMO** is the result of a laboratory process where genes from the DNA of one species are extracted and artificially forced into the genes of an unrelated plant or animal. The foreign genes may come from bacteria, viruses, insects, animals or even humans.

The single largest problem right now for agriculture worldwide is drought. Cattle are being bred with genes from their African and Indian cousins accustomed to hot weather. New corn varieties are emerging with larger roots for gathering water in a drought. Someday, the plants may even be able to "resurrect" themselves after a long dry spell, recovering quickly when rain returns.

The world's farmers and ranchers can also combat climate change by changing farming methods that currently generate greenhouse gases. They can also plant trees and other plants that take carbon dioxide out of the air and store it as carbon in roots or plant materials. As the examples above show, addressing global warming by changing agricultural practices can provide many other benefits. Wildlife habitat can be improved and expanded; water quality can be protected; soil erosion can be reversed and soil quality improved. Farmers and ranchers can reduce their costs and improve their productivity.

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ENVIRONMENTALISTS/CONSERVATIONISTS

It is a fact that increased GHG concentrations are producing global warming and climate change. The expected rise in global temperature of 3-5 °C over the next 20-30 years will cause unimaginable hardships. It will destroy habitats and force others away from the equator toward colder regions. This, along with changes in rainfall patterns will affect food supplies. The drought of 1998 in the Midwest of the US is the type of weather we can expect to see increase in frequency. There are also predictions of a return of the Dust Bowl conditions of the 1930s. Sea level rise from the melting of the polar ice caps will flood and destroy existing wetlands upon which a large part of the marine food chain is based. Salt water will flood fresh water aquifers, creating huge water shortages as well as decreasing the quality of the water that is available.



Ecosystem changes will signal the end of hundreds of unique plants and animals unable to adapt. The destruction of forests, especially rainforests, has already resulted in the extinction of 300-400 species of plants and animals each year. As deforestation continues out of control, an “extinction crisis” is likely to increase with global warming. Scientists are already discussing a “sixth extinction” as the Earth system is stressed to extremes by irresponsible human activity.

The people you represent would like to find ways to convince people that individual actions play a great part in this problem and that things need to change. They feel that things like driving cars, using plastic and paper packaging, using too much electricity produced by burning fossil fuels have a very detrimental effect on the environment. They want governments and people to realize that not only does it make good sense good, but that it is imperative, to conserve our natural resources and use them wisely, whether or not the predictions about global warming come true.

The rise in GHGs goes hand-in-hand with the rise of industrialization. Moderating factors that are necessary should include: energy conservation, recycling, reforestation, development and implementation of alternative energy systems, and the adoption of a more sustainable lifestyle away from the wasteful lifestyle of the past.

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DEVELOPING NATIONS



These conference members have concerns much like those of the Island Nations group and feel that they are being ignored and disrespected by the developed countries. They believe that they have a right to share in the “good life” that countries like the U.S., China, and some European countries have been enjoying for decades. Their opinion is that they have the right to exploit the natural resources on their own lands, just as others have done, without having to abide by international legislation or interference from outsiders. They contend that they need the same level of economic growth as the industrial nations in order to improve their standard of living. They recognize that industrialization has its environmental costs, but want to know why they should be asked to reduce development to compensate for the destruction that has been caused by the developed countries. It is the industrialized countries that have poisoned the environment.

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FOSSIL FUEL ADVOCATES

Fossil fuels have been an amazingly successful energy source that has done much to create incredible economic growth. They have made people's lives better and society as a whole more productive. To throw away these great economic, environmental and moral benefits, there has to be a very good reason.



Some people say that fossil fuel use is wrecking the planet's climate. Fossil fuel advocates don't think they are. Many members of this group are challenging the need for any changes in the way they do business. They reject the notion of global warming and consider climate change a natural process. They suggest that the temperature records are all forgeries, and the scientific evidence means nothing. They believe that climate change, if it even exists, is irreversible on human timescales, so why should be bother to try to undo it? They think that the only thing that matters is how much we emit, not how fast we do so. If there is a level of emissions that could produce severe and damaging impacts, then all that really should be an issue is whether or not we choose to get there.

The most important issue is meeting demands for fossil fuels and keeping the supply up. If we decide that fossil fuels will dominate in future, then we will simply get there sooner, rather than later. One thing that will not work is the one thing that the environmental movement insists upon: backing wealthy businesses to build low-density, low-output, very expensive, land-hungry renewable energy schemes, while telling the poor to give up the dream of getting richer through fossil fuels.

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INDUSTRIAL DEVELOPMENT

It has only been through the efforts of industry that the standard of living of the world has been improved. The average life expectancy of all human beings has been raised by the production and transportation of goods and services. Production and transport have worked hand in hand with the energy companies to make sure that the demand for goods and services is always available whatever the cost. Who among us would want to have their standard of living changed because of an unfounded idea like climate change? Industry should not be limited. If we are left free to respond to the needs of the public, we will continue to develop those things which will benefit mankind the most. To limit our energy availability will increase the cost of carbon and electricity.

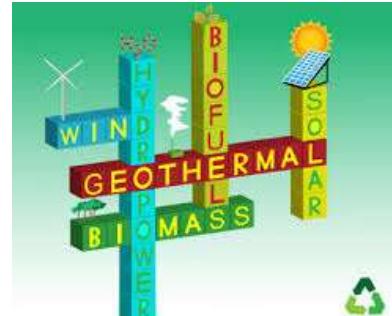
However, this last decade of increasing damage to our balance sheets is beginning to be worrisome. For example, global droughts have dried up the water needed for production, and some of us are beginning to see that the idea of climate change as an economically disruptive force is not so impossible. One of our members in Southeast Asia has been fighting with problems that are disrupting the company's supply of sugar cane and sugar beets, as well as citrus for its fruit juices. When we look at losing our most essential ingredients, we see those events as threats to our future. Another of our companies is worried because of the loss of water in cotton producing areas. Cotton is a main component of their product and to have to find another source means lost time and lost profit.

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ALTERNATIVE ENERGY

Energy is necessary to maintain and improve a decent standard of living. The fossil fuel energy supply must come to an end, not only through exhaustion of its supplies, but because of the damage it does to the environment. Mining and oil extraction scars the Earth and burning changes the climate in addition to producing acid rain. We need a fuel source, which will produce energy without producing greenhouse gases, and we need the energy source now.



Renewable energy will change the energy business. While some large-scale organizations will always be part of the energy industry, we need to see the start of regionalized, distributed generation of energy. Although the conservative wisdom tells us that nuclear energy, solar and wind power, battery technology, and smart grids are far in the future, we are only a breakthrough or two away from a new age of regionalized energy technology. Waiting longer for new non-atmospheric polluting methods of fossil fuel produced electricity only adds to the CO₂ burden the Earth is carrying.

An important advantage of decentralized, distributed generation of energy is that it is less open to catastrophic, large-scale disruption. As our lifestyles require more and more energy, even a few days of disrupted supply can have a considerable negative effect on quality of life. After Hurricane Sandy, many people in the Northeast went out and bought electric generators and gasoline tanks to keep their homes powered during and after storms. An alternative energy system in the home, with an advanced storage battery, would be a more convenient and cleaner way to do the same job. At some point in the future, renewable energy will be able to underprice fossil fuels and they will fade away.

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