Trip Report

United Nations Framework Convention on Climate Change

Bonn Climate Talks - SB32 Meeting

Bonn-Germany

May 31- June 11, 2010

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Chair – World Federation of Engineering Organizations

Committee on Engineering and the Environment

1. Introduction

Chair Darrel Danyluk attended this meeting representing World Federation of Engineering Organizations. D. Lapp attended for the second week. On June 11 they jointly delivered a 90 minute side event (workshop) on the principles and applications of infrastructure climate risk assessment.

This report is structured into four sections of which this introduction forms the first. Section 2 consists of notes of organizations met and events attended that would be of interest to CEE members and others within the World Federation of Engineering Organizations. Section 3 provides some general observations and information while the final section provides some conclusions and recommendations.

2. Organizations Met and Events Attended

2.1 ICLEI - Local Governments for Sustainability

ICLEI is an international association of local governments as well as national and regional local government organizations who have made a commitment to sustainable development. ICLEI provides technical consulting, training, and information services to build capacity, share knowledge, and support local government in the implementation of sustainable development at the local level. Our basic premise is that locally designed initiatives can provide an effective and cost-efficient way to achieve local, national, and global sustainability objectives.

The current president of ICLEI is Mr. David Cadman from Vancouver, who expressed interest in working with the engineering community on sustainability. Vancouver is a user of the PIEVC Engineering Protocol for infrastructure climate risk assessment, having undertaken two case studies, and providing the Chair of one of the four expert working groups supporting the development and implementation of the protocol.

ICLEI is planning on holding a conference prior to COP-16 in December. There is an opportunity to hold a infrastructure climate risk assessment workshop in conjunction with ICLEI, linking with the UPADI, Costa Rica project, and the CCCCC.

ICLEI website: www.iclei.org for the 10 point Mayor's declaration.

Contacts: david.cadman@vancouver.ca;

worldmayorscouncil@iclei.org Attention: Mr. Yunus Arikam (He is the new ICLEI Executive Director, an engineer from Turkey and aware of WFEO)

2.2 Making Cities Resilient - ICLEI Side Event May 31, 2010

This side event came out of the Mayor's Adaptation Forum held just before the UNFCCC meetings. Don Lemmen from Natural Resources Canada (Nairobi Work Program Co-Chair) introduced David Cadman, Deputy Mayor of Vancouver and the current president of ICLEI. The main question that they were trying to answer was "How do we deal with the consequences of climate change?" ICLEI would like to see their meeting become an annual event and would also like to see WFEO representation at their meetings.

The Nairobi Work Program was discussed and its focus is to help people understand the impact of environmental change and to help all parties to make informed decisions on practical adaptation to climate change.

The French representative took a social view that all people had to take moral responsibility for helping those who were isolated or alone in their communities.

The Mexico City Environment Minister read out the 10 points that had been decided on by the ICLEI group.

The UN Disaster and Climate Adaptation representative said that national governments had to provide the financial support to make cities safer.

The Mexico Environment Minister said that if national governments could not agree in Copenhagen the cities still could, so they want to move on.

The mayor of Copenhagen said we needed practical adaptation to the challenge of climate change. It would be an economic challenge, but strategies had to be developed to prevent disasters. International standards have to be decided but it is the goal of Copenhagen to lead the world and become a CARBON NEUTRAL CITY by 2025. Green roofs are part of their plan.

Marty Chavez – United States representative from Albuquerque, New Mexico, said that progress is being made to reduce carbon emissions and would like to see the scientific community more involved with the policy makers. He also stated that it was important to be realistic with expectations of efforts to reduce emissions. For adaptation we need to look at:

- 1. Cost of not adapting
- 2. Look at global financing banks would like to finance big picture strategies as well as individual projects.
- 3. There is a need to know where developing cities should start.

Suggestions to answer these points included: 1) making connections between cities who have done with the developing cities are trying to do; 2) developed areas need to consolidate their information and make it available to developing areas; 3) global yardsticks have to be established so people can measure how well they are doing.

2.3 Africa

At the meetings, considerable reference was made to the needs of Africa and the impacts of the changing climate on this continent's population. Of interest is the UN Development Program Africa Adaptation Programme (AAP) which provides an insight into AAP and Country Project Profiles. An idea for the CEE as it considers the next four year phase/strategic plan would be to have our Kuwait Society

of Engineers (KSE) CEE member, together with the recent volunteers from the KSE, investigate this programme and develop a task/theme for CEE.

2.4 REDD+ Partnership Side Event - June 1, 2010

This organization aims at reducing emissions from deforestation and forest degradation in developing countries and "could play a crucial role in pursuing the objective of the UNFCCC and in holding the increase in global temperature rise below 2 degrees Celsius above pre-industrial levels". This initiative came out of Copenhagen through the leadership of France and Norway and operates in parallel to the UNFCCC process. This has drawn criticism that it negatively impacts the negotiations at COP.

This side event was sponsored by CIFOR and focused on forests and forest change. There were three people on the panel who spoke about forest degradation (i.e. a reduction of the capacity of a forest to provide goods and services), which includes reduced its capacity to sequester carbon as well as a reduction in biodiversity.

Common causes of forest degradation include:

- 1. Intensive livelihood pursuits
- 2. Logging
- 3. Using forests for fuel and charcoal making
- 4. Various uses of the soil over time even crop rotation depletes the soil
- 5. Differing perceptions.

Key issues:

- 1. Intensive livelihood pursuits are location specific.
- 2. Logging is scale dependent, both spatial and temporal
- 3. Need for flexibility

Total Change = Carbon levels at the second time of testing – carbon levels at the first time of testing. The best direct source of data is satellite information. Secondary sources are indirect data based on human activity like roads, agriculture and factories.

The third speaker, Mr. Tim Christophersen addressed degradation as an opportunity to restore forests with local collaboration so that the ecological, social and economic needs all could be met. Involving the people who had local knowledge and interest is key to the success of reforestation efforts. The potential is immense. No one solution fits all areas. Possibilities include broad scale replanting or mosaics of agroforestry, irrigated or rain fed initiatives, etc.

2.5 REDD+ Partnership Side Event - June 2, 2010

Japan hosted another event through REDD +, which was certainly a main focus of attention in the first week of UNFCCC Climate Talks. The presentation covered the rationale for REDD"s formation, what its policy was, and what actions it hoped to achieve, and how it was being financed.

It appears that follow up to the Copenhagen Accord was required REDD+ was formed as a way to disperse the funds that had been pledged to reduce carbon emissions. A lawyer (International Law –

Britain) wondered if there was protocol for terminating REDD +. Answer – no. They say they will not work in competition with the UNFCCC but will work with it.

2.5 Scientific Body for Scientific and Technological Advice (SBSTA) Meeting – June 3, 2010

The meeting included a presentation on what developments the scientific community have made in research activities to find and understand what is happening in the natural carbon dioxide sinks (like oceans and forests) in an effort to limit temperature trend increase to 2C or less.

There are better graphs, mapping and information on world rainfall. The seal level is rising and there is an increase in the number of and intensity of extreme climate events.

Sybil Seitzinger from the UF spoke about ocean acidification. CO2 in the atmosphere is absorbed into the sea water. The result is a decrease in the ph level which means increased acidity. This has a negative impact on the climate and ecosystems. It also has a very negative effect on fisheries especially the shellfish. Molluscs use calcium in shell formation and increase in ph means less calcium in the water. A decrease in the number of organisms in the water means fewer organisms to remove CO2 from the water.

There seems always to be a need to review IPCC policy, principles, procedures and management structure. People need "Honest Brokerage" – what is the impact and mitigation cost for policy relevancy.

The IPCC goal is to provide information for policy makers to make informed choices.

There are many risk issues. Things to assess and consider include energy systems, transportation systems, buildings, infrastructure, etc.

It's important to communicate to the common man what is happening and what he/she can do to help.

Belize asks: "Where do we start?"

According to the academic community the first step is to provide and train more researchers. Later this answer was qualified by the panel saying the job of the scientific community was to provide information for the regions so that they could make their own decisions about what the priorities are in their own regions.

START Secretariat – Jon Padgham said we need to communicate to the public and policy makers. We need "Dialogues" for regional knowledge assessments on food and water security. All documents should be made available to the policy makers. Through these dialogues we need to engage the policy makers more on relevant themes, facilitate round table discussions, educate people and fill in the knowledge gaps by training more international scientists, training the media and using innovative communication like finding a local champion to spread interest.

Information should include impact – response – damage – socioeconomic data.

2.6 Committee on Disaster Risk Management

The draft report on Disaster Risk Mitigation (Dec 2009) prepared by the CEE Task group (now WFEO standing committee) was distributed at the meetings and proved to be of great interest to many. All copies were taken and follow up requests were requested by several Parties. The UN-ISDR

((International Strategy for Disaster Reduction) were well represented and requested follow up with WFEO.

The main contacts are: Justin GINNETTI, Associate Programme Officer, ginnetti@un.org, Stefanie Dannermann – Di Palma, Programme Officer, dannermann@un.org.

Action: Standing Committee on DRM to follow up.

2.7 UN Development Program (UNDP)

DarrelDanyluk was contacted by Cassie Flynn cassie.flynn@undp.org, and Pradeep Kurukulasiriya from the UNDP Climate Change team about a follow up regarding a training session/workshop in El Salvador, and next steps are being developed. Discussions are planned for the last week in June.

2.8 Nairobi Work Program (NWP) Forum

This was held June 4 from 6 pm to 9 pm. It was an opportunity for NWP focal points to update others on progress on action pledges. Don Lemmen of Canada is a co-chair. Darrel Danyluk remarks addressed-WFEO, CEE, our pledge, the PIEVC Protocol, the Costa Rica case study, the Recife workshop with 14 countries representatives, potential to work with ICLEI on a workshop in December, and with the African Engineers for a workshop in Africa. The CEE-DRM draft report was noted as a relevant document to the Climate Change agenda.

2.9 Adaptation Knowledge Day

This five hour event was held on June 8, 2010 and was the first of its kind organized by the World Bank in partnership with the UNEP and UNFCCC. It was very well attended (over 50 people) and very good participation.

The overall goal of this event was to strengthen the sharing of knowledge on adaptation through the promotion and showcasing of innovative adaptation research, policies and actions.

The draft AWG-LCA text calls for enhanced action and enhanced international cooperation on adaptation. Access to relevant and usable knowledge is an important prerequisite for successful and cost-effective adaptation actions. Mobilization and sharing of knowledge and experiences is critical to informing adaptation decision-making, planning and practice. While much knowledge exists for successful action on adaptation, it is often fragmented and not always accessible to various stakeholders.

The agenda for the session was organized as follows:

Opening: The Importance of Knowledge for Adaptation Action

Welcome and introduction to Adaptation Knowledge Day

Mama Konaté, SBSTA Chair – Knowledge-sharing in the context of the UNFCCC: Present and Future

William Kojo Agyemang-Bonsu, Government of Ghana - Knowledge needs for adaptation

Session 1: Providing Adaptation Science for Development Policy and Planning UNEP, with Meteorological Research Institute - Japan

Session 2: Ecosystem-Based Adaptation - Knowledge to Action

World Bank, with National Institute of Ecology (INE, Mexico), Institute of Hydrology, Meteorology, and Environmental Studies (IDEAM, Colombia), Community of Andean Nations (CAN, Peru), Government of Mali, and WWF/SEI

Session 3: Nairobi Work Program - the Way Forward

UNFCCC, with representatives from Annex I and Non Annex I countries, non-governmental and intergovernmental organizations

Further information on this event is available through: Anna Kontorov (anna.kontorov@unep.org)

Each of the three sessions consisted of a panel of four to five presenters. A few key points that arose from the presentations were:

- Knowledge needs for adaptation action include:
 - Planning know the history first
 - Assessment the impacts need to be understood not only climate but also by sector
 - o Policy- different levels, high level first, approximate costs needed
 - o Needs -
- There is a need for national science policy dialogues
- Session 1 was led by UNEP and included a demonstration of the latest Japanese Climate model was shown and "justification" for Climate Scientists to lead mainstreaming adaptation into development policy;
- Session 2 was led by the World Bank where examples of ecosystem adaptation were presented;
- Session 3 was led by the Nairobi Work Programme where a panel of civil society representatives input on the role for the NWP towards the future and priorities, needs and gaps for knowledge development, dissemination and application in support of adaptation in the future.
- Bangladesh is implementing a \$US 50M Adaptation Strategy and Action Plan;
- Peru estimated that the costs of doing nothing to adapt were much greater than the investment costs for adaptation (about 5x) for their eco-system based adaptation project.

We have requested pdf copies of the presentations and the availability of a summary report and hope to receive a positive response to our request.

2.10 WFEO -CEE Side Event

The event was held on June 11 at 1:00 pm. This was the worst possible time slot in the whole two week meeting. Our event was competing with the opening of the World Cup of soccer as well as a side event on the newly created Adaptation Fund held at the same time. Several individuals indicated their interest to attend our event but could not because of the conflict with the adaptation fund event which had their priority. This was the last day of the two week meeting and many delegates had already left the previous day.

Our concern was forwarded to the UNFCCC Secretariat with a request for a better time slot the next time World Federation of Engineering Organizations applies to hold a side event.

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The total number of attendees besides presenters was 8. It was well-received but afforded limited discussion and debate

We recommend offering this workshop again at upcoming side event opportunities at COP-16 as well as the Bonn Climate Talks in 2011.

3. General Observations

- IPCC is led by Climate Scientists and in response to recent criticism of climate change science
 and the IPCC, the following comment portrays a prevailing attitude of exclusivity "only climate
 scientists are the experts, other scientists cannot be considered experts". This view was
 expressed during the Research Needs session.
- Copenhagen Accord- In Dec 2009, the Copenhagen conference resulted in an accord wherein, industrialized submitted greenhouse gas emission reduction targets for 2020, and developing countries submitted actions for reducing greenhouse gas emissions. The Netherlands Environmental Assessment Agency has calculated that the combined effect of the Copenhagen pledges makes up sixty to seventy percent of the emission reductions to achieve the "under 2 degree C" target.
- A comment from an attendee (Party) at our side event "there is too much focus on better resolution of climate models without including other key variables such as clouds". The engineering community needs to ask the questions.
- The "question on population growth ignored" is important in context of the validity of climate science and impacts.
- "protesters and media largely absent". There was only one organization that had set up a booth outside the venue – the vegans
- Comments: "Hot air has left the balloon". The level of energy among delegates was very low a
 hangover from the intensity and disappointment with the outcome of Copenhagen. It seemed
 like it took this meeting to get people back on track and it was our impression that people left
 the meeting ready to re-engage at meetings scheduled for August 2010.
- Historic attendances at the annual Committee of Parties (COP) meetings were posted reflecting growing interest in the UNFCCC process. Statistics as follows:

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COP 1 - 145 organizations (orgs), - 1056 observers (obs)
COP 2 – 178 orgs – 614 obs
COP 3 - 267 orgs - 3865 obs
COP 4 - 333 orgs - 2628 obs
COP 5 - 369 orgs - 2001 obs
COP 6 - 453 orgs - 3815 obs
COP6A- 475 orgs - 1723 obs
COP 7 - 494 orgs - 1569 obs
COP 8 - 528 orgs - 2089 obs
COP 9 – 588 orgs – 2698 obs
COP 10- 636 orgs - 3142 obs
COP 11- 739 orgs - 5845 obs
COP 12 -768 orgs - 2933 obs
COP 13 - 846 orgs - 5815 obs
COP 14 - 952 orgs - 4489 obs
COP 15 -1297 orgs - 13452 obs 27294 Parties Total 40,746
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- Philippines- request/suggestion that WFEO provides a judge to City Sustainability project. From the
 Office of the President of the Philippines, Climate Change Commission the project "Design Against
 the Elements-Global challenge' A global Campaign for Safer Urban Communities in developing
 Countries, see http://www.designagainsttheelements.org
- France- Nicolas Beriot Secretary General, Ministry of Ecology, Energy, Sustainable Development and the Sea, would like to connect to the French National member of WFEO. Email: nicolas.beriot@developpement-durable@gouv.fr
- Registered WFEO delegates included Darrel Danyluk, Bonnie Danyluk, David Lapp, Marlene Kanga Australia (did not attend due to lack of funding)Requests for registration were received from Kuwait Society of Engineers, and the WFEO President after the registration deadline has passed.
- Developments in climate change research activities Research Needs and Priorities; Panel
 presentations on directions of research needs. (Defensive to criticism) the main objective of this
 event is to enhance communication between Parties and the climate change research needs and
 priorities of the Convention.

4. Conclusions and Recommendations

The UNFCCC is dominated by the Climate Scientists and Policy-Makers. Engineers are viewed as one of the causes of climate changes from their activities. WFEO presence and activity is changing this image of engineers at the level of individual delegates but not at the institutional level with the exception of the Nairobi Work Program.

The World Federation of Engineering Organizations should pursue and secure alliances with other higher profile NGOs, with ICLEI as the first target organization.

Alliances and/or increasing our profile with the World Bank and UNEP and UNDP both within and outside the context of UNFCCC will raise the profile and enable us to make meaningful contributions to the policy and implementation discussions.

CEE should continue to offer side events twice yearly - at the COP meetings and the mid-year Climate Talks. Pro-active promotion of these events both before and during these meetings will further raise awareness of the role and contributions of engineers and the value of infrastructure climate risk assessment, even if attendance at the actual event is modest.

WFEO – CEE should pursue more active participation at future Adaptation Knowledge Days being organized by UNFCCC, World Bank and UNEP by offering to give presentations or organize a panel session.

There is a need to increase the number of World Federation of Engineering Organizations delegates at future meetings to increase our profile, enable a wider monitoring and participation in events and discussions.

Prepared: June 30, 2010

Note: Additional Notes and Observations from B. Danyluk and D. Lapp were included in edited form as part of this report