

## **ITER CTA NEWSLETTER**



No. 8, MAY 2002

## INTERNATIONAL ATOMIC ENERGY AGENCY, VIENNA, AUSTRIA ISSN 1683-0555

## THIRD NEGOTIATIONS MEETING ON THE JOINT IMPLEMENTATION OF ITER by Dr. V. Korzhavin, Deputy Head, Department of Atomic Science and Technology, Minatom, Moscow

Delegations from Canada, the European Union, Japan and the Russian Federation met in Moscow on 23-24 April 2002 for the third in a series of negotiations meetings that are expected to lead to an international agreement on the joint implementation of ITER. Members from the International Team also participated in the meeting. Professor V. Smirnov, Director, Institute of Nuclear Synthez, was nominated as Moderator of the meeting, assisted by Dr. V. Vlasenkov as Secretary.

In the participants' opening comments, the delegations informed each other of the latest developments concerning the ITER project in their respective countries. The RF delegation stated that the work related to ITER was considered to be of high priority and was conducted in accordance with the federal programme of 2002-2005 aimed at preparation for the construction of ITER. This work was being conducted in close cooperation with Russian industry. The RF delegation emphasized the importance of promptly selecting a site for ITER.

The JA delegation reported on the present status of discussion by the Council of Science and Technology Policy (CSTP) on JA participation in ITER, including possible hosting. The conclusion of the CSTP was expected in the near future. It was stressed that JA has a strong interest in participation/hosting of ITER and that the discussion was approaching the final stage. The JA delegation also reported that the basic principles of the safety management of ITER and safety regulations were being discussed by Ministry of Education, Culture, Sports, Science and Technology (MEXT) and the Nuclear Safety Commission.



Participants in the Meeting

The EU delegation reported on the presentation by Commissioner Busquin to the European Research Council, on the 11 March, of a proposal to amend the EU negotiations mandate to cover the issues of siting and cost sharing and of a Commission Staff Working Paper on the cost of ITER. The extension of the mandate had been referred to the Committee of Permanent Representatives of the Member States (COREPER) for resolution as soon as possible. The EU delegation reported a decision of the Spanish Government to offer a candidature for European siting of ITER at Vandellos, near Barcelona. With regard to the Cadarache siting proposal, the EU delegation reported that the "dossier d'options de sûreté" (introductory licensing basis) had been submitted to the French licensing authority, marking an important formal step in the license process. The EU delegation said that, as and when the extended mandate was approved, EU site proposal(s) would be officially transmitted to the participants.

The EU delegation also reported that, following a request from Dr. Davies of the US DOE and after consultation with the participants, the Commission had sent a copy of the Explorers' Final Report to the DOE.

The CA delegation reported that the formal review of the scope of the environmental assessment for the Clarington site had been successfully completed by the Canadian Nuclear Safety Commission. At the Regulator meeting of 1 March they ruled that the scope was acceptable, with some minor technical modifications, and most importantly, they confirmed the "screen" level assessment process. At the Energy Forum associated with the G-8 meeting in Detroit, on 1-3 May, Iter Canada was to present a paper on ITER and to have an exhibit on the project alongside the Natural Resources Canada exhibit. The CA delegation announced the incorporation of Iter Canada Host Inc., the entity that would be responsible for delivering most of the Canadian scope with Canada as host, plus the appointment of its new Board of Directors. The CA delegation suggested that, once the Joint Assessment of Specific Site (JASS) process was finalized, the analysis should start immediately on the basis of whatever offers are on the table at the time. The CA delegation reported on discussions with the US Government with respect to possible US entry into the Negotiations.

Dr. Muraviev, Moderator of the second meeting of the Negotiations Standing Sub-Group (NSSG-2, held in Moscow on 12-14 March 2002) introduced the progress report of the NSSG. The delegations commended the NSSG for the significant progress made in developing the second draft of the ITER Joint Implementation Agreement (JIA) and charged the NSSG to elaborate further the JIA and related instruments. A meeting of intellectual property rights specialists should be prepared by the NSSG.

The delegations took note of the actions to finalize the JASS framework and endorsed the approach suggested by the NSSG. The N3 Meeting noted the progress on compilation of indicative data on participant procurement preferences under the three generic scenarios. The delegations took note of the presentation from the International Team Leader, on technical criteria to establish the non-common area of procurement.

The delegations confirmed the NSSG-2 common view for transitional arrangements. The delegations charged the NSSG to develop, in consultation with the IAEA, the appropriate terms of reference.

The delegations confirmed the common view of the NSSG on the management structure and approaches to identifying senior management.

The delegations took note of the report of Academician E. Velikhov, Chairman of the ITER CTA Project Board, which reported on progress and work plan on Co-ordinated Technical Activities. The Negotiators supported the initiative of the International Team to conduct a meeting of the participants' safety representatives after the N4 meeting in Cadarache on June 6-7 2002.

The following schedule of forthcoming Negotiators meetings was accepted (dates and locations of N6 and N7 are to be confirmed):

N4	4-6 June	Cadarache, France
N5	17-18 September	Toronto, Canada
N6	29-30 October	Tokyo, Japan
N7	10-11 December	Barcelona, Spain

## CANADIAN OFFICIALS VISIT RF RESEARCH CENTRE "KURCHATOV INSTITUTE"

by Dr. L. Golubchikov, Scientific Advisor, Fusion Centre, RF Research Centre "Kurchatov Institute"

A large delegation from Canada (19 delegates) took part in the third round of Negotiations aimed at the preparation of the ITER Implementation Agreement (N3), held in Moscow in the second part of April 2002. Among these delegates were high level representatives from the area Ontario Province that was proposed by Canada a year ago as a site for ITER construction.

On 19 April, the following members of the delegation visited the Kurchatov Institute (KI):

- · Roger Anderson, Regional Chair, Regional Municipality of Durham
- · Mayor John Mutton, Municipality of Clarington
- Gary Polonsky, President and Vice-Chancellor, University of Ontario, Institute of Technology
- Patrick Olive, Commissioner of Economic Development, Region of Durham
- David Crome, Director of Planning, Municipality of Clarington
- Jacquie McInnes, Reporter, Metroland Publishing (This Week Newspapers)

The members of the group, before touring the premises of the KI, met with its President, Academician Evgenij Velikhov. He briefly described the history of the ITER Project development, starting from the first proposals made by the President of the Soviet Union, M. Gorbachev, to President F. Mitterand of France and President R. Reagan of the USA, up to the conclusion of the ITER Engineering Design Activities, the current Coordinated Technical Activities phase and the Negotiations on the ITER Implementation.

During the exchange of views at the meeting, Acad. Velikhov noted that the development of the prototype of the commercial thermonuclear reactor (Demo) could start immediately after the successful beginning of the operation of ITER. In this way, ITER would become the major experimental information source for the future development of thermonuclear power stations. Further, he said that production of electricity by thermonuclear power stations would be of global importance. Therefore it would be logical to implement ITER through the active participation of industrial enterprises, firstly from the ITER Parties, which would form a kind of international consortium. It would facilitate the development of new high level technologies and sharing of the results achieved.

As a possible example, Acad. Velikhov mentioned that ITER, even as currently designed, could be used for the desalination of seawater. It could be installed on a floating platform, anchored close to the shore of a South-East Asian country, where construction of nuclear power stations is prohibited and would provide desalinated water enough to satisfy the needs of 4 million inhabitants. As he further said, by the year 2030 the problem of desalination of seawater would become for the countries of that part of the world even more important than the shortage of electricity.

Regarding the problem of site selection for ITER, Acad. Velikhov was of the opinion that, from the technical point of view, the Canadian site would be very well prepared. However, in principle, ITER could also be built in Europe, Japan or Russia. In view of the financial situation of the country, he said that Russia could not, at present, propose a site, but that the process of site selection should start only after it was be clear how many site proposals would be on the table. The decision on the site should be made at the highest governmental levels. The Canadians raised the question whether it would be possible to include the issue of site selection into the agenda of the next G-8 Summit (Canada, July 2002). Replying thereto, Acad. Velikhov said that the decision should eventually be taken at this level.

For clarification of the role of energy production by thermonuclear power stations for mankind, Acad. Velikhov proposed to jointly organize a thermonuclear exposition at the World Fair 2005 in Nagoya, Japan.

After the meeting, the Canadians visited the house on the territory of the KI in which Acad. Igor V. Kurchatov, "Father of the Soviet Atomic Bomb", lived and died (7 February 1960). The house is now the museum of the KI, and the curator, Ms. A. Kuznetsova, told the guests about the life of Kurchatov, who was, as a scientist and person, as they say in Russian, as "a giant among men."

The Canadian guests also visited the world's oldest operational nuclear reactor, which is located close to Kurchatov's house. This reactor, the first one on the Eurasian continent, was put into operation on 25 December 1946 and is still in use as a source for the calibration of nuclear measuring instruments. The guests signed the guest book, noting that in this book the signature of V. Putin, President of the Russian Federation, is also to be found.

The visitors also had a chance to see the operational Tokamak-10 installation and a Tokamak-15 complex, now mothballed. The tour of these two installations was guided by Prof. V. Smirnov, Director, Institute of Nuclear Synthez, which is a part of the KI.



Canadian guests in front of the sculpture of Kurchatov at the entrance to the KI (photo by courtesy of Ms. J. McInnes)

Items to be considered for inclusion in the ITER CTA Newsletter should be submitted to B. Kuvshinnikov, ITER Office, IAEA, Wagramer Strasse 5, P.O. Box 100, A-1400 Vienna, Austria, or Facsimile: +43 1 2633832, or e-mail: c.basaldella@iaea.org (phone +43 1 260026392).