Transactions of the

Sixth International Information Exchange Forum

"SAFETY ANALYSIS FOR NPPS OF VVER AND RBMK TYPES"

8 - 12 April 2002; Kyiv, Ukraine

FOREWORD

The Sixth International Information Exchange Forum on Safety Analysis for Nuclear Power Plants (Forum-6), was held 8 - 12 April 2002 in Kyiv, Ukraine. It was sponsored by the US Department of Energy (DOE) and was organized and conducted in cooperation with the Taras Shevchenko National University of Kyiv (NUK) in Ukraine, the International Atomic Energy Agency (IAEA), the Nuclear Energy Agency (NEA-OECD) and the Swedish International Project on Nuclear Safety (SIP).

These Forum-6 Transactions comprise a full set of the papers presented during the meeting. The papers are being made available in the form in which they were received; no attempt was made at editing or formatting. This publication is not intended to be a polished one but rather constitutes a working tool for the use of specialists in the field.

Ukraine has a large nuclear energy program: Thirteen operating nuclear units produce currently about 45% of the country's electrical energy use. In the near future, with the addition of two more units, this percentage will increase to over 50%. It is therefore very fitting that Ukraine served as the host country for Forum-6. The government of Ukraine attributed great importance to this event as is illustrated by the high level of its representatives who welcomed the delegates to the meeting. Among these persons were *Victor Skopenko*, Rector of Taras Shechenko National University of Kyiv, *Eugene Grygorenko*, First Deputy Head, Main Office for Economics and Policy of the Administration of the President of Ukraine, *Olexander Zenyuk*, Acting Head, State Office of Nuclear Power of the Ministry for Fuel and Energy of Ukraine. It is truly a great pleasure to acknowledge and thank these persons for their interest and support.

The delegates were welcomed on behalf of the US government by *David Huizenga* of US-DOE, who stressed the importance of international cooperation in the field of nuclear safety. He also pointed to the direct linkage existing between nuclear safety and nuclear security, and urged the participants to ensure both safety and security at nuclear facilities (a copy of Huizenga's welcoming address is included in these transactions).

It has been particularly gratifying to note the increased interest shown by participants from nuclear power plants in Central and East European Countries, in particular from Ukraine and Russia; this is demonstrated by the increased number of their presentations and by their active participation in the panel discussions. It is hoped that this interest will lead to greater technical interaction between persons from nuclear power plants and from research/design institutes, thereby enhancing operational safety.

In total about 80 papers were presented. Because of this relatively large number and in view of the limited time available, part of the papers had to be presented in poster sessions. Also, a number of the papers were presented in two days of parallel sessions conducted by the International RELAP Users Group.

It is a great pleasure to acknowledge the valuable contributions of the organizations listed above; their positive response and enthusiastic support is greatly appreciated. In this connection, a special note of appreciation for their personal involvement is due to *Jozef Misak* and *Alain Cardoso*, Technical Officer and Project Officer for IAEA, respectively. Special thanks are also due to the staff of NUK, in particular to *Ihor Kadenko* and his co-workers. Last but not least, the dedicated effort of the staffs of Argonne National Laboratory, Pacific Northwest National Laboratory and Idaho

Engineering and Environmental Laboratory in preparing and conducting Forum-6 is gratefully acknowledged.

These forums have contributed to an improved exchange of information between organizations and individuals working in the field of nuclear safety. It is only through such personal interaction that a uniform level of nuclear safety can be attained, leading to enhanced operational safety at nuclear power plants worldwide. It is hoped that future forums will be received with the same interest and support and will continue to contribute towards the enhancement of safety in all its aspects.

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