



ISOE International Symposium

Tours, 20 – 22 October 2020



Provisional Programme



Supported by





ISOE International Symposium

Tours, 20-22 October 2020

The European Technical Centre of the Information System on Occupational Exposure (ISOE) is pleased to organize, in collaboration with and the support of Electricité de France (EDF), the 2020 ISOE International Symposium on Occupational Exposure Management at Nuclear Facilities.

The Symposium will be held in Tours, France, from the 20th to the 22nd of October 2020. It is co-sponsored by the OECD Nuclear Energy Agency (NEA) and the International Atomic Energy Agency (IAEA).

The Symposium is targeted at all those concerned with radiological protection at nuclear power plants: radiation protection managers and staff members, maintenance and operation planners, contractors, exposed workers, regulatory body representatives and international organisations. It is also opened to research reactors and professionals from other nuclear fuel cycle installations sharing common radiological protection issues.

Dealing with occupational radiation protection at the design, operation and decommissioning stages of installations, as well as accident situations, this new meeting point of radiation protection professionals under the heading of ISOE will be a great opportunity to share, at the international level, experiences and practices favouring a continuous improvement of radiation protection.

Furthermore, the accompanying Technical Exhibition will give participants the opportunity to see the latest developments from industrial and commercial companies active in fields of radiation protection.

Prior to the Symposium, on Monday 19 October 2020, two meetings devoted to specific audiences have been organised:

- A Radiation Protection Managers meeting
- A Regulatory Body Representatives meeting

Finally, a technical visit has been organised to Civaux NPP site on Friday 23 October 2020 that will give you the opportunity to the controlled area and the EDF Nuclear Rapid Response Task Force (FARN).

We are looking forward to welcoming you in Tours,

Caroline SCHIEBER
Head of ISOE-ETC
On behalf of the Programme Committee



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PROGRAMME COMMITTEE MEMBERS

Lucie D'ASCENZO	ISOE ETC, CEPN – France
Laure-Anne BELTRAMI	ISOE ETC, CEPN – France
Borut BREZNIK	Krško NPP – Slovenia
Aude GENIAUX	ASN – France
Monika FÁRNÍKOVÁ	Temelin NPP – Czech Republic
Swen-Gunnar JAHN	ENSI – Switzerland
Timo KONTIO	Loviisa NPP – Finland
Jizeng MA	IAEA
Francesco MANCINI	SOGIN – Italy
Hans MEIJER	Borssele NPP – Netherlands
David MILLER	ISOE NATC, University of Illinois – USA
Guy RENN	Sizewell B NPP – United Kingdom
Caroline SCHIEBER	ISOE ETC, CEPN – France
Thorsten STAHL	GRS – Germany
Torgny SVEDBERG	Ringhals NPP – Sweden
Philippe WEICKERT	EDF UNIE-GPEX – France

CONFERENCE LANGUAGE

The conference language will be English.

SYMPOSIUM VENUE

The Symposium will take place at:

Palais des Congrès de Tours
26 Boulevard Heurteloup
37000 Tours



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DEDICATED MEETINGS – MONDAY 19 OCTOBER 2020

The ISOE Symposium will be preceded by two dedicated meetings devoted to specific audience.

If you wish to participate to one of those meetings, please contact the relevant person as indicated below in order to register to one of these meetings.

The registration to these meetings is free of cost.

Radiation Protection Managers Meeting	
09:00 - 17:00	Location: Palais des Congrès de Tours <i>Contact-person:</i> Philippe WEICKERT , EDF – philippe.weickert@edf.fr

Regulatory Body Representatives Meeting	
09:00 - 17:00	Location: Palais des Congrès de Tours <i>Contact-person:</i> Aude GENIAUX , ASN – aude.geniaux@asn.fr



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PROVISIONAL PROGRAMME

TUESDAY 20 OCTOBER 2020

08:30 - 09:15	Registration
09:15 - 09:45	Opening Ceremony
Session 1.	RP at the Design Stage
Chairpersons	C. Schieber (ISOE ETC – CEPN, France), B. Lance (Tihange NPP, Belgium)
09:45 - 10:05	RP Assessments and Planning: Competences, Strategy, Processes, Tools S.G. Jahn (ENSI), Switzerland
10:05 - 10:25	Corium stabilization case - Sizing of biological protection A. Audineau, Y. Tamagnan (EDF DIPDE), C. Carotta (Tricastin NPP), D. Bouquet, L. Genin (ONET Technologies), France
10:25 - 10:45	HPR1000 Model <i>to be determined</i>
10:45 - 11:30	Coffee-break, Visit of Exhibition, Posters
Session 2.	RP Indicators
Chairpersons	D. Miller (ISOE NATC, University of Illinois, USA), T. Labarta (CSN, Spain)
11:30 - 11:50	Updating the “alpha value” used at EDF - Presentation of the work performed by a dedicated working group T. Jobert (EDF DIPNN DT); X. Descamps (EDF DPN EM); S. Andresz, C. Schieber (CEPN), G. Ranchoux (EDF DP2D); B. Boussetta (EDF DIPDE); J. Bonnefon, P. Ridoux (EDF DIPDE); S. Pומרouly (EDF Lab Paris-Saclay); M.V. Di Giandomenico, M. Hébert (EDF UTO-DLOG); C. Marcillet (EDF UTO-DET); G. Carry, J. Jaubert (EDF UNIE-GPEX), France
11:50 - 12:10	Improving occupational radiation exposure using ALARA tools: performance indicators A. Nedelcu, L. Samson (Cernavoda NPP), Romania
12:10 - 12:30	Dose per RCA-hour; a useful radiological protection indicator? G. Renn (Sizewell B NPP), United Kingdom
12:30 - 14:00	Lunch Break



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Session 3. RP Aspects of Post-Accident Situations Chairpersons <i>A. Geniaux (ASN, France), T. Kontio (Loviisa NPP, Finland)</i>	
14:00 - 14:30	Health Effects from the Chernobyl Accident D. Laurier (IRSN), France
14:30 - 15:00	Radiation protection status in the NPP of Fukushima T. Suzuki (Chiyoda Technol Corp.), Japan
15:00 - 15:30	The role of the radiological protection expert in stakeholder involvement in the recovery phase of post-nuclear accident situations: Some lessons from the Fukushima-Daiichi NPP Accident T. Schneider, M. Maitre (CEPN), France

15:30 - 16:15	<i>Coffee-break, Visit of Exhibition, Posters</i>
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Session 4. Emergency Preparedness at NPPs Chairpersons <i>P. Weickert (EDF UNIE-GPEX, France), T. Stahl (GRS, Germany)</i>	
16:15 - 16:35	Improvement of emergency radiation protection arrangements at the Tihange NPP B. Lance (Tihange NPP, Belgium)
16:35 - 16:55	Application of Reference Dose Levels for Radiological Emergencies at Forsmark NPP S. Ahlgren (Forsmark NPP), Sweden
16:55 - 17:15	Functional exercise Radiology - to accomplish an action in a controlled area during simulated accident conditions A. Ljungberg (Ringhals NPP, Sweden)

17:15 - 17:45	Round Table discussion: ISOE Strategic plan
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WEDNESDAY 21 OCTOBER 2020

Session 5.	Contamination Control
Chairpersons	<i>T. Svedberg (Ringhals NPP, Sweden), B. Boyer (Watts Bar NPP, USA)</i>
09:00 - 09:30	Management of radiological contamination – Feedback experience from several ISOE Utilities E. Lafranque, L.-A. Beltrami, L. Vaillant (CEPN); E. Arial; C. Dabat-Blondeau (EDF UNIE-GPEX), France
09:30 - 09:50	Impact of Radon on Personal Contamination Monitors at the exit of the RCA in EDF NPPs M. Karst (EDF UNIE-GPEX), C. Cerna, T. Le Noblet, J. Jouve (CNRS IN2P3 CENBG), France
09:50 - 10:10	Gamma-Cameras: Feedback on the Experiments carried out at EDF and Perspectives J. Jaubert, M. Lestang (EDF UNIE-GPEX), France
10:10 - 10:30	Conclusions from the Radiation Protection Managers and the Regulatory Body Meetings
10:30 - 11:15	<i>Coffee-break, Visit of Exhibition, Posters</i>
Session 6.	Job Experiences (Part I)
Chairpersons	<i>G. Renn (Sizewell B NPP, UK), M. Fárníková (Temelin NPP, Czech Republic)</i>
11:15 - 11:35	Information and Training in Radiation Protection: Regulatory Requirements and Practices S. Andresz (CEPN), P. Weickert (EDF UNIE-GPEX), C. Schieber (CEPN), France
11:35 - 11:55	Major Component Replacement & Virtual Reality Training Initiative C. Pritchard (Bruce Power), Canada
11:55 - 12:15	Blayais NPP (France) Drain Pipe Event J. Bonnefon, L. Bertrand, P. Morvan, L. Lacarelle, B. Sueur (EDF DIPDE); H. Caullier (Blayais NPP); T. Inoue, Y. Yamashita (MHI); L. Bottero, C. Ringenbach, G. Delcros (ENDEL), France
12:15 - 12:35	The Practices and Researches of HYH Plant Optimized Radiation Protection G. Song Guohua, W. Xie (Hongyanhe NPP), China <i>Distinguished paper at 2019 Beijing ISOE Symposium</i>
12:30 - 14:00	<i>Lunch Break</i>



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Session 7.	Job Experiences (Part II)
Chairpersons	<i>X. Descamps (EDF DPN-EM, France), S.-G. Jahn (ENSI, Switzerland)</i>
14:00 - 14:20	Practical Implications of the New Dose Limit to the Lens of the Eye at Forsmark NPP A.-K. Eriksson, A.-S. Gustafsson (Forsmark NPP, Sweden)
14:20 - 14:40	ALARA in Repair of Reactor Vessel Flange Surface at Krško NPP B. Breznik (Krško NPP), Slovenia
14:40 - 15:00	Radiological Safety Aspects of Boral Plate Analysis on Watts Bar Spent Fuel Rack Coupons B. Boyer (Watts Bar NPP), USA
15:00 - 15:20	Improvements in radiological controls for Cavity Decontamination at Sizewell B R. Parlone (Sizewell B NPP), United Kingdom
15:20 - 15:40	Case Report of Incident with High Exposure of Radiation J. Isokivelä (Forsmark NPP), Sweden
15:40 - 16:25 <i>Coffee-break, Visit of Exhibition, Posters</i>	

Session 8.	New RP Technologies
Chairpersons	<i>G. Song (Hongyanhe NPP, China), C. Pritchard (Bruce Power, Canada)</i>
16:25 - 16:45	NextGen RP: Applying Remote and Automated Technologies to Enhance and Optimize Nuclear Power Plant Radiation Protection Operations K. Kim, P. Tran, D. Cool (EPRI), USA
16:45 - 17:05	Radiochromic films for dosimetry S. Pomerouly, C. Monier (EDF Lab Paris-Saclay); M. Ben Hassine (EDF Lab Renardières Ecuelles); D. Grande, T.T.T. Nguyen (UPEC - Institut de Chimie et des Matériaux Paris-Est), France
17:05 - 17:25	Remote Radiation Protection Monitoring System (RPMS) Y. Yao, L. Su, Z. Zhang, X. Wan (Daya Bay NPP), China

19:30	<p>Symposium Dinner at City Hall</p> <p>Address: 104 Boulevard Heurteloup 37000 Tours</p>	
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THURSDAY 22 OCTOBER 2020

Session 9.	RP and Decommissioning
Chairpersons	<i>F. Mancini (SOGIN, Italy), K. Honjo (ISOE-ATC – NSRA, Japan)</i>
09:00 - 09:20	Key lessons learned from the ISOE WGDECOM Lyon meeting L.A. Beltrami (ISOE-ETC – CEPN), G. Ranchoux (EDF DP2D), France
09:20 - 09:40	Decommissioning project, management and planning aspects for the decommissioning of Research Reactor Ispra1 E. Amoroso, F. Mancini, D. Manes, A. Paratore, E. Grossi, S. Ravera (SOGIN), Italy
09:40 - 10:00	Sand Filter Tank Dismantling at Bugey 1 G. Ranchoux, P.-L. Drevet, C. Genty (EDF DP2D), France
10:00 - 10:20	Radiological investigations in hard-to-access zones during D&D operations by remote OSL/FO dosimetry S. Magne, M. Horpin (CEA LIST - Laboratoire Capteurs Fibres Optiques), W. Husson (CEA LIST - Laboratoire Capteurs Architectures Electroniques); S. Dogny (ORANO); P.G. Allinei, O. Guéton, M. Ledieu (CEA DEN - DTN-SMTA-LMN), B. Leibovici (SDS Group), France
10:20 - 11:05	<i>Coffee-break, Visit of Exhibition, Posters</i>
Session 10.	Source-Term Management
Chairpersons	<i>B. Breznik (Krško NPP, Slovenia), G. Ranchoux (EDF DP2D, France)</i>
11:05 - 11:25	Chemical Engineering Perspective on PWR/BWR Colloid Removal to Reduce CRE and Mitigation of No. 1 Seal Failure for PWR Reactor Coolant Pumps P. Robinson ((n,p) Energy, Inc.), D. Hultquist (DC Cook NPP), R. Penney (Prairie Island NPP), R. Gerdus (Vermont Yankee NPP), USA
11:25 - 11:45	ALARA tools: Source Term Control at CNE Cernavoda C. Chitu, A. Nedelcu (Cernavoda NPP), Romania
11:45 - 12:05	Impacts of Ag-110m on Radiation Field Generation: Review of an innovative experiment E. Moleiro, A. Rocher (EDF UNIE-GPEX); T. Tribollet (Civaux NPP), France
12:05 - 12:25	Feedback Experiences on Large Scale & Radiation Protection Management R.I. Ahmad (Chasma NPP), Pakistan
12:25	Distinguished Papers and Closure of the Symposium



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FRIDAY 23 OCTOBER 2020

Technical Visit (optional)

A technical visit is organised (full day) to the **Civaux NPP** with:

- Visit of Civaux unit 1 or 2 controlled area
- EDF Nuclear Rapid Response Task Force (FARN)

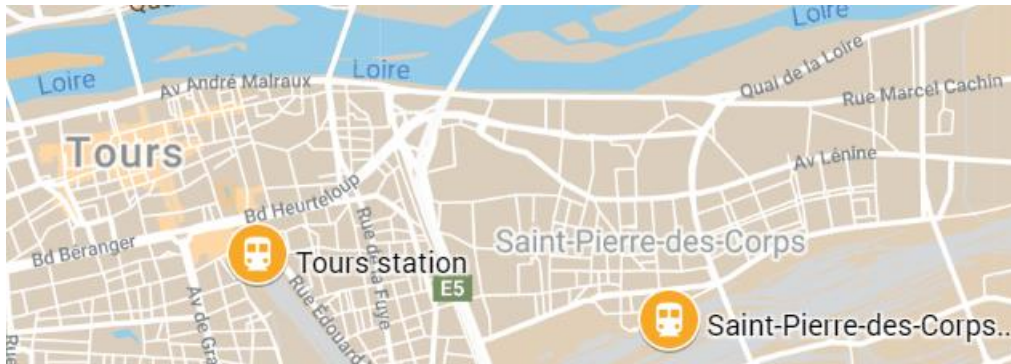
The bus departures and arrivals will be announced later on the ISOE Network website and to the registered participants. The participation is subject to availability as the visit is restricted to a limited number of persons.

HOW TO GET TO TOURS?

Tours is located at about 250 km from Paris.

The high-speed train TGV is the fastest way to get to Tours.

There are 2 Railway Stations: Tours Centre and Saint-Pierre-des-Corps



Journey time:

- From Paris to Tours Centre: 1h10
- From Paris Charles de Gaulle Airport to Saint-Pierre-des-Corps: 1h45

REGISTRATION TO THE SYMPOSIUM

	Registration Fees	Online Registration
Participant	500 € VAT included	Registration form
Commercial Booth	2000 € VAT included	Booth Registration form

Payment of the fees must be done after online registration and receipt of the invoice

Information can also be found on ISOE website: www.isoe-network.net