



Building Awareness about Cyber Threats And Increasing Reliability Against Cyberattacks In The Company

Amb. Krzysztof Paturej
ICCPS President



Cybersecurity by ICCSS

Cybersecurity-Resilience against cyber attacks and Reliability

- Raising awareness of cyber threats:
 - Gaining knowledge concerning various types of attacks is the first step to secure the enterprise
- Developing cybersecurity culture and promoting best practices to reduce vulnerability on cyber threats
- Developing and implementing of training programs
- Developing professional competences in the topic of Cybersecurity and Operational technologies (OT)
- Implementing intelligent technical solutions by using **digital data system instead of paper**

www.cybersecurity.iccss.eu

International leader in the development of of chemical and ecological safety and security

- International leader of promoting integrated and harmonized approach to safety and security
- ICCSS is the founder of the Global Summit on Chemical Safety and Security: CHEMSS2016 Kielce, Poland, 2016, www.chemss2016.org; Szanghai, China, 2017: www.chemss2017.org
- Coordinator of international programs of chemical security in the Eastern Europe funded by European Union and Middle East and US
- Partner with US Homeland Security Department:
 - Participating in the US programs, including cybersecurity
 - Leading speakers our conferences
 - ICCSS – leading partner during the annual peaks, internal meetings, and international gathering in the topic of chemical security
- The leader in the development of **Cybersecurity-Resilience against cyber attacks and Reliability**

Cybersecurity by ICCSS

Cybersecurity-Resilience against cyber attacks and Reliability

- Raising awareness of cyber threats:
 - Gaining knowledge concerning various types of attacks is the first step to secure the enterprise
- Developing cybersecurity culture and promoting best practices to reduce vulnerability on cyber threats
- Developing and implementing of training programs
- Developing professional competences in the topic of Cybersecurity and Operational technologies (OT)
- Implementing intelligent technical solutions by using **digital data system instead of paper**

www.cybersecurity.iccss.eu



ICCSS - Benefiting from US partners on standards and best practices

- Cooperation with US Department of Homeland Security
- Use of US security solutions for the chemical infrastructure in US
 - CSET 7.0 – vulnerability assessment
 - CSAT 2.0 – Security analysis for the chemical industry
 - Database for procedures and the best policy practices
- Supporting enterprises in cyber-danger immunity
- Development and conduct of unique training program on increasing resilience against cyber threats and cybersecurity culture
- Digital integration of systems which provides safety, security, reliability, and risk-based management

Digital integrity of systems which provides safety, security, reliability, integrated Risk Based Management

- ICCSS – Creating a roadmap of cybersecurity and integrated solutions in the chemical industry and energy transmissions
- TARGET - Spreading information concerning cybersecurity of operational technologies against cyber-attacks and promoting reliability in the Polish industry
 - Gaining and sharing current trends in the development and implementation of the best cybersecurity policy practices
 - Establishing a cybersecurity platform as a part of the roadmap for the industry cooperation, development, and implementation of security programs
 - Small and medium sized enterprises will receive an access to free cybersecurity programs and reliabilityimprovement - **tailored approach to cybersecurity**

ICCSS and industry cybersecurity

- Cybersecurity of operational technology is the major topic of CHEMSS2016, CHEMSS2017 and programs concerning chemical safety and security
- the pioneer of developing Cybersecurity culture, white book, and roadmap in the chemical industry and energy transmissions
- the pioneer of compiling a cybersecurity workbook to share good policy practices in the operational technology, reliability, and immunity to cyber-attacks
- the organizer and sponsor of annual conference of **Reliability and cybersecurity in Industry 4.0** (in cooperation with Warsaw University of Technology)
- the initiator of integrated security audits in Information Technology and Operational Technology
- the initiator of developing professional competences in the cybersecurity of operational technology
- the author of training program for developing immunity to cyber danger and security of cybersecurity in the industry
- The author of training program concerning development immunity against cyber-danger and cybersecurity culture in the industry
- Supervisor/ Furtherer (in cooperation with Lotos Group and Vistula University) in the organization for International Centre for Chemical Safety and Security G7, developing the roadmap and integrated approach in the cybersecurity in the chemical industry and energy transmissions

Digital integrity of systems which provides safety, security, reliability, integrated Risk Based Management

- ICCSS – Creating a roadmap of cybersecurity and integrated solutions in the chemical industry and energy transmissions
- TARGET - Spreading information concerning cybersecurity of operational technologies against cyber-attacks and promoting reliability in the Polish industry
 - Gaining and sharing current trends in the development and implementation of the best cybersecurity policy practices
 - Establishing a cybersecurity platform as a part of the roadmap for the industry cooperation, development, and implementation of security programs
 - Small and medium sized enterprises will receive an access to free cybersecurity programs and reliability improvement - **tailored approach to cybersecurity**

ICCSS and industry cybersecurity

- Cybersecurity of operational technology is the major topic of CHEMSS2016, CHEMSS2017 and programs concerning chemical safety and security
- the pioneer of developing Cybersecurity culture, white book, and roadmap in the chemical industry and energy transmissions
- the pioneer of compiling a cybersecurity workbook to share good policy practices in the operational technology, reliability, and immunity to cyber-attacks
- the organizer and sponsor of annual conference of **Reliability and cybersecurity in Industry 4.0** (in cooperation with Warsaw University of Technology)
- the initiator of integrated security audits in Information Technology and Operational Technology
- the initiator of developing professional competences in the cybersecurity of operational technology
- the author of training program for developing immunity to cyber danger and security of cybersecurity in the industry
- The author of training program concerning development immunity against cyber-danger and cybersecurity culture in the industry
- Supervisor/ Furtherer (in cooperation with Lotos Group and Vistula University) in the organization for International Centre for Chemical Safety and Security G7, developing the roadmap and integrated approach in the cybersecurity in the chemical industry and energy transmissions

Security, immunity and reliability in the Industry 4.0

From paper to the digital technology

TECHNIQUES & TECHNOLOGY



Digital Data Management in the Industry 4.0

Equipment health data capture, analytics and management

+

smarts

+

more smarts

+

technology

+

smart technology

data

information

knowledge

intelligence

AI

Managing reliability – element of cybersecurity and improving immunity to the cyber-attacks

- Digital data
- Upgrading of processes and business procedures
- Conducting inspections on the basis of Risk Based Inspection model
- Cooperation with supervisory authorities
- Extending asset equipment life cycle
- Reducing cost
- **Improving safety and security**

Towards digitalization of chemical security

- ISO TechSpecification 18101-1 on automation system and integration – for oils and gas interoperability;
- ISO 19600 Compliance management systems and these are valid for other asset-intensive process industries to adopt and adapt digital capabilities for many core business functions.

Working together to enhance chemical safety and security

Contact

Amb. Krzysztof Paturej,
ICCSSL President
Chair

Working Group on Cybersecurity for Industry 4.0

E-mail: k.paturej@iccssl.eu