



# **PSCE** Conference

Brokerage Event
Oxford – December 8, 2015

The security impact of digitalization on Nuclear Power Proposal idea

Topic: CIP-01-2016-2017: Prevention, detection, response and mitigation of the combination of physical and cyber threats to the critical infrastructure of Europe.

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## Motivation:

Nuclear Power is one of the most security and safety critical fields.

Fast digitalization creates new and important short time, medium time and long time risks for Nuclear Industry.

Many digital technologies used in other fields (cloud computing, rapidly changing technology platforms, agile development etc.) are cost-effective, but they may not have usability in a field like Nuclear Industry.

The cost impact of those technologies is tempting, but their usability should be evaluated especially from the point of risks they provide to the infrastructure.









# **Expected Results**

#### Short term:

- Creating better comprehensive tools for nuclear power plant construction phase physical and cyber security
- Lessons from the very delayed Olkiluoto 3 project

Medium term

Long term









### What we have:

- Excellent understanding of both the nuclear industry and digitalization from the security and safety perspective
- Expertise from complex environments like power plants and shipyards
- Collaboration with Finnish nuclear power operators
- Our university's owner City of Turku's energy company is 3 % shareholder in new nuclear power plant project in Finland

# Our experience:

Completed projects in the area of securing core assets of security. Wide experience covering security and safety management, digitalization, nuclear safety, regulation

What we are looking for: Partners to the consortium we plan to coordinate





