



Fingrid – Critical energy ecosystem facing cyber attacks

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FINGRID

Finland operates on electricity.

Fingrid's main task is to ensure that Finland receives power without disruption every moment.

An aerial night photograph of a city, likely Helsinki, Finland, covered in snow. The city is illuminated by warm yellow and orange lights from buildings and streets. Plumes of white steam or smoke rise from various industrial or residential areas. The sky is a deep purple and blue. The image is split by a diagonal line, with the left side being a lighter, more faded version of the same scene.

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Distributed System

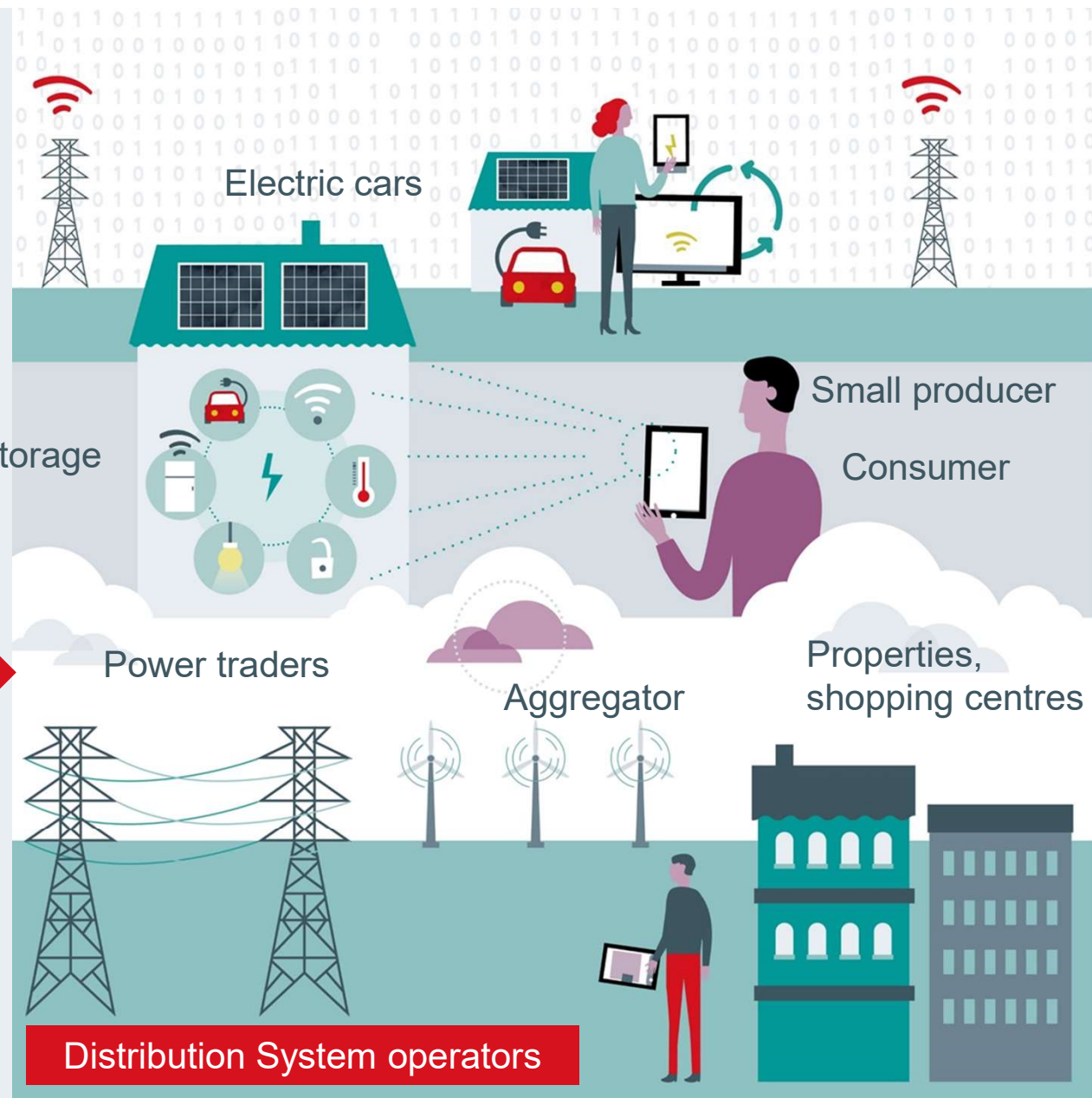
- connected to ecosystem

Megatrends:

- change in power system
- dependency on electricity
- digitalization



Transmission System
Operators



Threats are increasing



Suomen pahimmat riskit listattiin: Suur sähköhäiriö on todennäköisin – sota tai ”musta joutsen” voisi olla tuhoisin



How Ukraine became a test bed for cyberweaponry

2/14/19, 11:30 AM CET

As Russian hackers face d
Western spies, the cou
become a live-fire s

Hackers Target European Energy Firm: Researchers

Report Says Group Tied to Iran Could Be Involved

Scott Ferguson (@Ferguson_Writes) • January 24, 2020

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Hackers who may have ties to Iran have recently turned their attention to the European energy sector, using open source tools to target one firm's network as part of an cyberespionage operation, according to the security firm Recorded Future.

WORLD ECONOMIC FORUM
Cyber Resilience in the Electricity Ecosystem
Principles and Guidelines for Boards

Agenda

Initiatives

Reports

Events

About

It's not just elections: Russia hacked the US electric grid

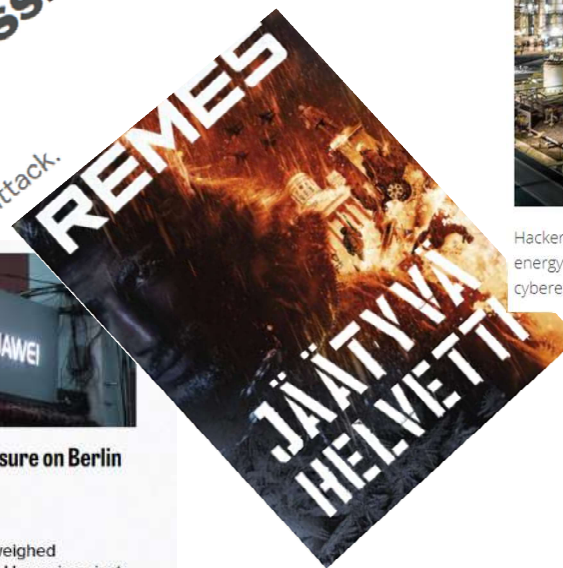
And it may be just the first phase of a bigger attack.



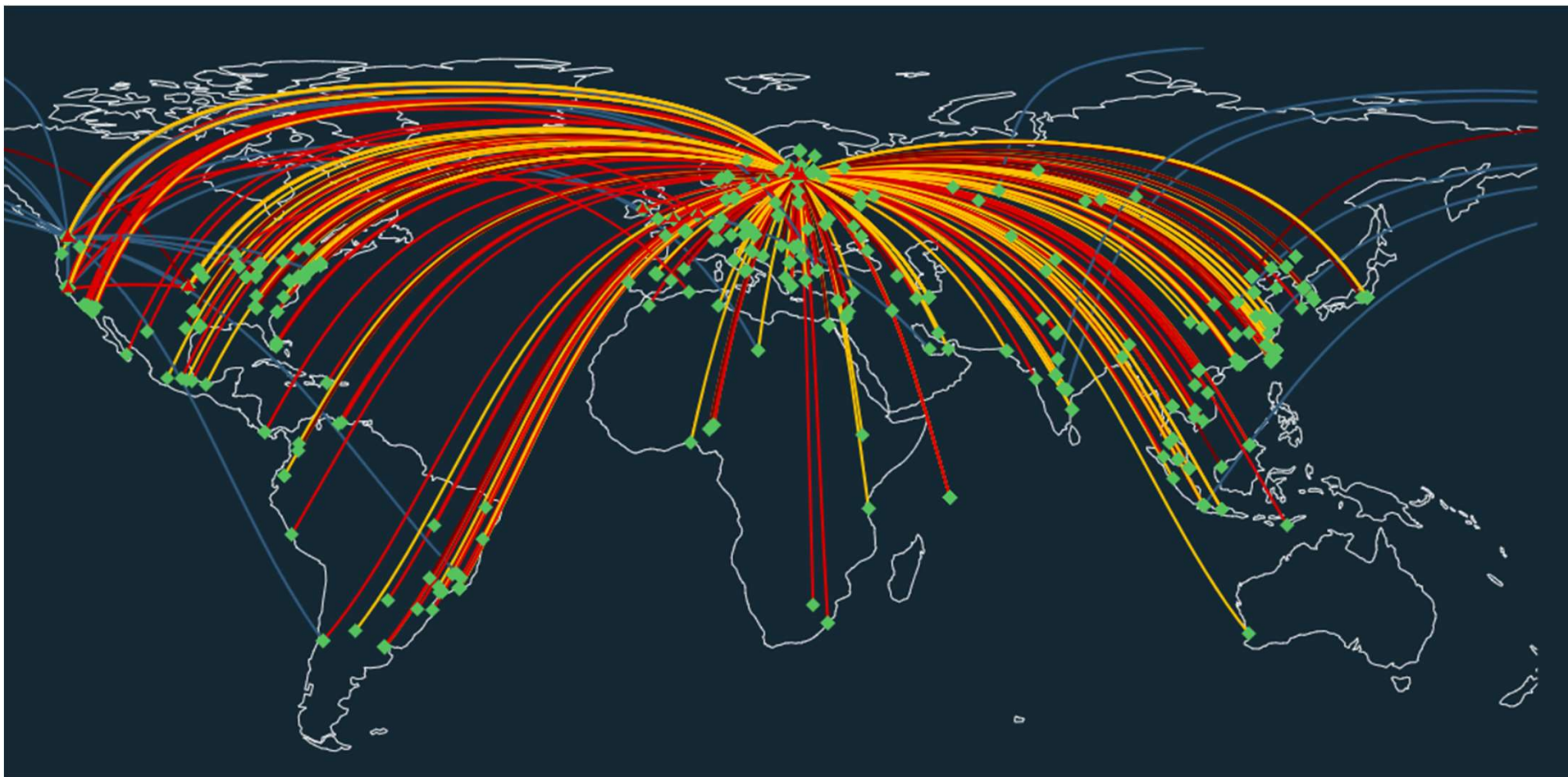
US ramps up pressure on Berlin over Huawei

12/20/18, 7:00 AM CET

German politicians weighed allegations targeting Huawei against past evidence of hacking by the United States.

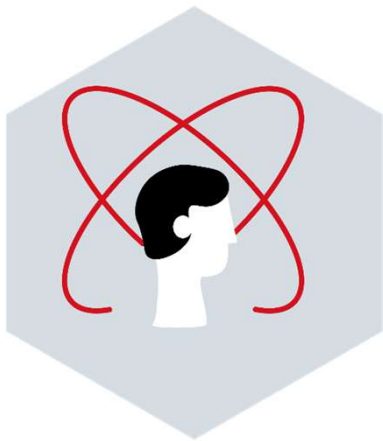


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Where do we expect development?



People

Education and awareness



Practises

SOC



Technology

Cyber weather forecast
IoT



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