RAETORIAN

This project has received funding from the European Union's Horizon 2020 Research and Innovation programme under Grant Agreement No 101021274

PRAETORIAN

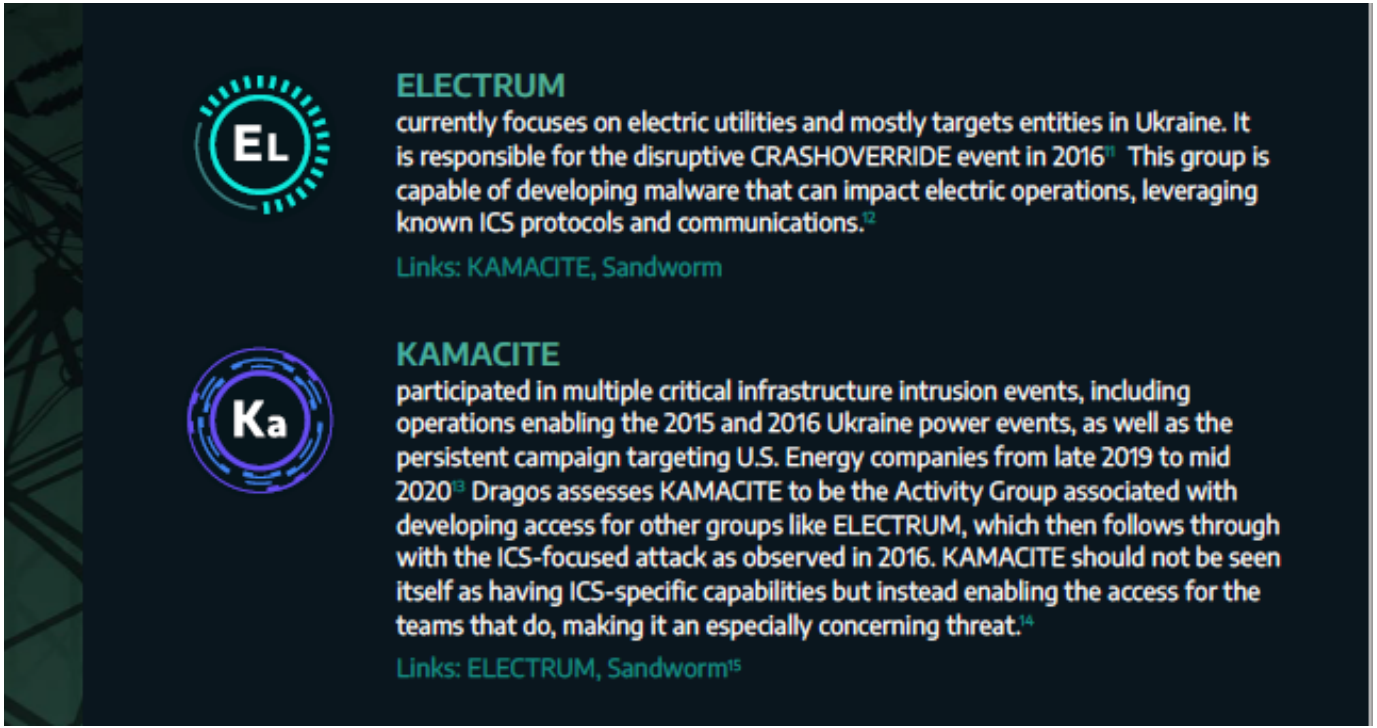
Protection of Critical Infrastructures from advanced combined cyber and physical threats

PRAETORIAN project

Eva María Muñoz Navarro (ETRA Investigación y Desarrollo S.A., Spain)

Frederic Guyomard (EDF, France)

This project has received funding from the European Union's Horizon 2020 Research and Innovation programme under Grant Agreement No 101021274


EL
ELECTRUM
currently focuses on electric utilities and mostly targets entities in Ukraine. It is responsible for the disruptive CRASHOVERRIDE event in 2016[11] This group is capable of developing malware that can impact electric operations, leveraging known ICS protocols and communications.[12]
Links: KAMACITE, Sandworm
Ka
KAMACITE
participated in multiple critical infrastructure intrusion events, including operations enabling the 2015 and 2016 Ukraine power events, as well as the persistent campaign targeting U.S. Energy companies from late 2019 to mid 2020[13] Dragos assesses KAMACITE to be the Activity Group associated with developing access for other groups like ELECTRUM, which then follows through with the ICS-focused attack as observed in 2016. KAMACITE should not be seen itself as having ICS-specific capabilities but instead enabling the access for the teams that do, making it an especially concerning threat.[14]
Links: ELECTRUM, Sandworm[15]

“

PRAETORIAN strategic goal is to increase the security and resilience of European CIs, facilitating the coordinated protection of interrelated CI against combined physical and cyber threats.

PRAETORIAN AT A GLANCE

- 23 partners from 7 EU countries
- 3 pilot sites in 4 EU Member states
- Total budget: 9,04 M€
- Total funding: 7,58 M€
- Start date: 01/06/2021
- End date: 31/05/2023

PRAETORIAN PROJECT OBJECTIVES

1. Technological Objectives

- Evaluate the hazards and minimize their level of risk
- Understanding of any physical or cyber threats
- Resilience and response to an attack
- Information on the risks

PRAETORIAN PROJECT OBJECTIVES

2. Impact and user-oriented objectives

- Validate in real contexts




- Legal, ethical, privacy, and societal principles

- Disseminate results - Relevant communities of users

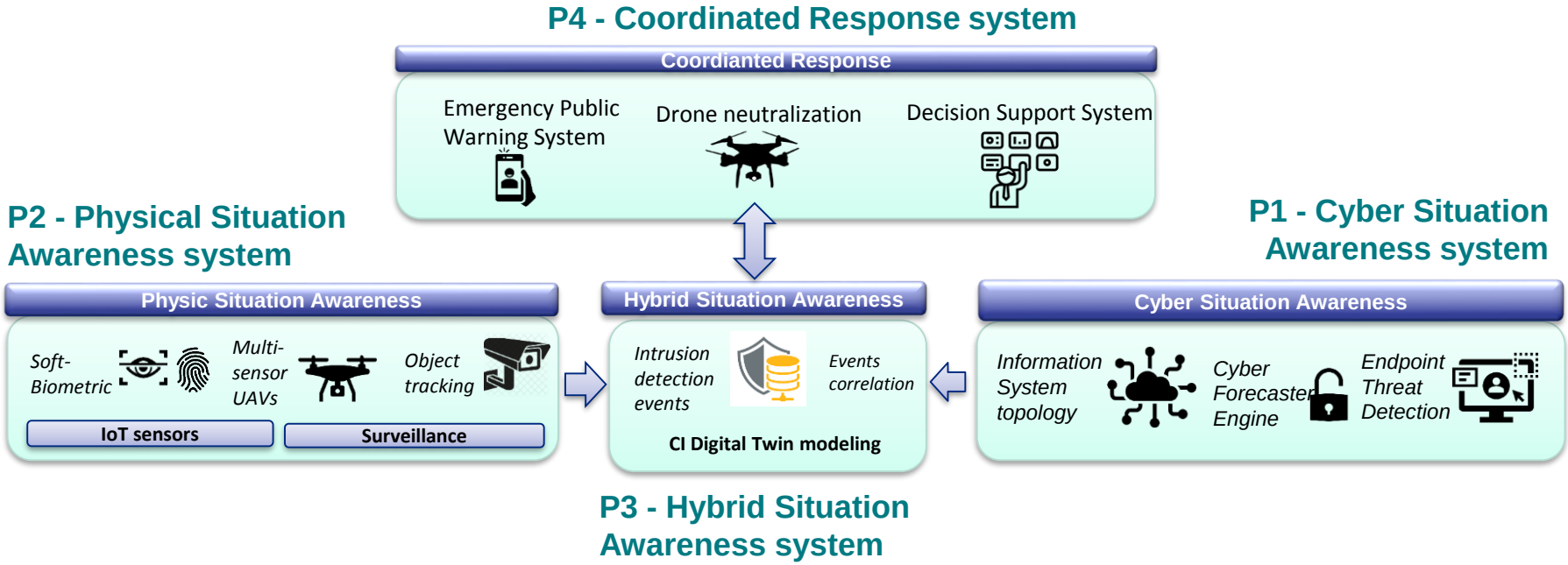
HOW TO REACH PRAETORIAN PROJECT OBJECTIVES

PRAETORIAN proposes a toolset that

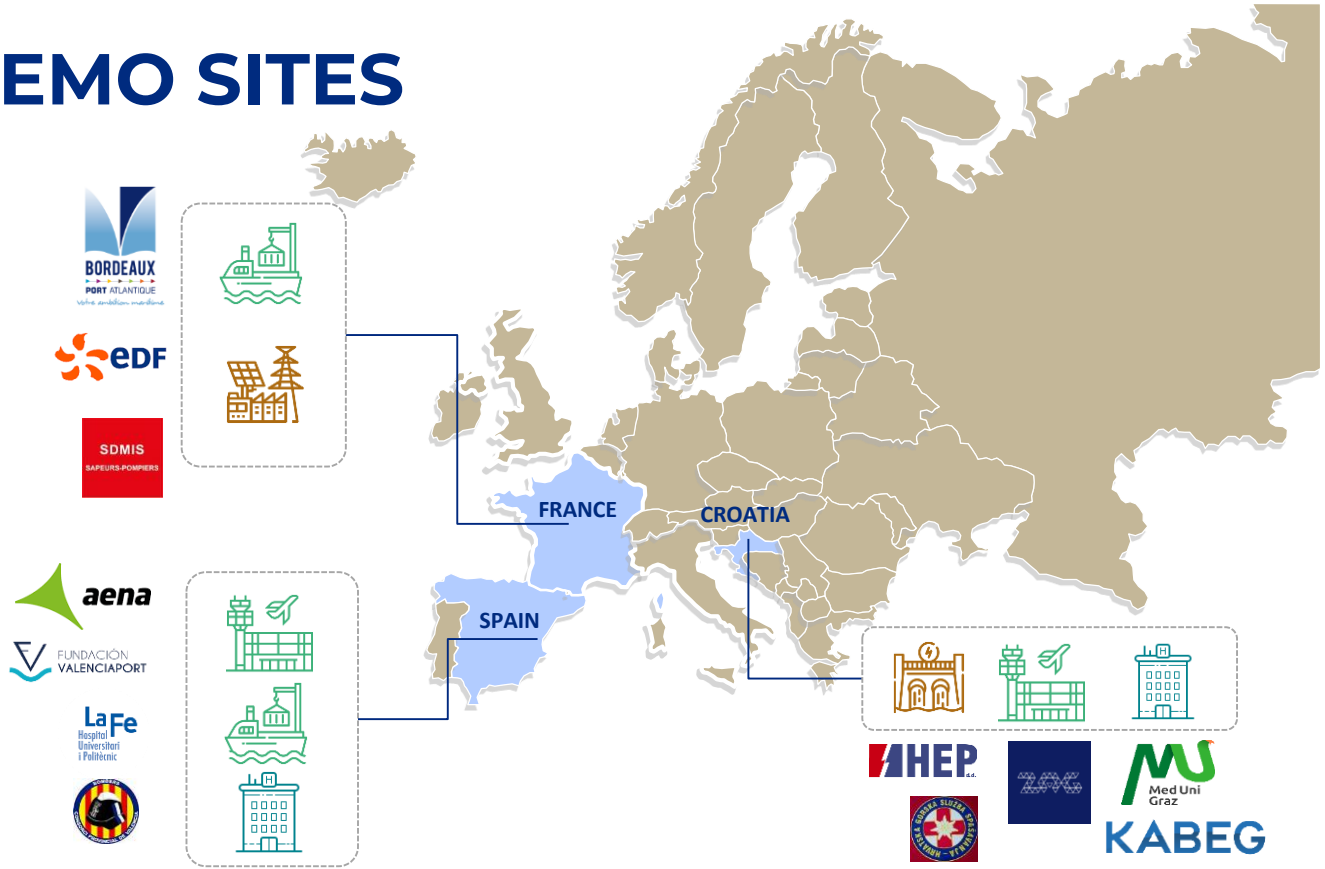
- can make use of the data obtained from the relevant legacy security systems of the CIs
- introduces novel sensors and innovative data analysis
- builds a model of the ecosystem of CIs
- improves the channels and quality of communication among stakeholders
- combines the emergency plans of those CIs

HOW TO REACH PRAETORIAN PROJECT OBJECTIVES

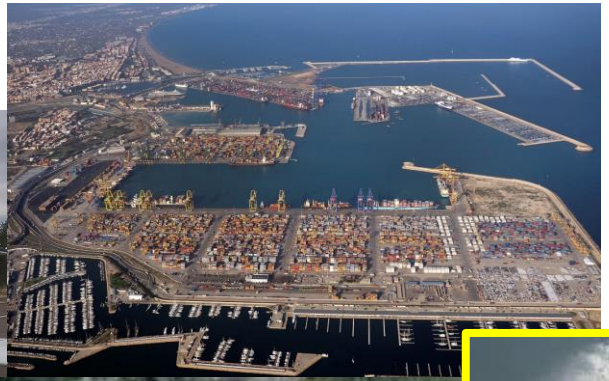
PRAETORIAN will develop **four products** to provide a coordinated and effective action towards security threats and attacks



DEMO SITES


BORDEAUX
PORT ATLANTIQUE
EDF
SDMIS
SAPEURS-POMPIERS
aena
FUNDACIÓN VALENCIAPORT
La Fe
Hospital Universitari i Politècnic
FRANCE
SPAIN
CROATIA
HEP
Med Uni Graz
KABEG

DEMO SITES



PRAETORIAN: KEY ASPECTS (I)

CI-led project	• Led by a prominent CI European operator, EDF • CIs capabilities **to influence, develop and take up** the project results that are useful and usable.
Cost-efficiency and effectiveness	• Building on top of **8 previous successful INFRA-CIP** projects: SAURON, SATIE, SECUREGAS, SAFECARE, INFRASTRESS, DEFENDER, RESISTO, STOP-IT
Maximum impact	• involvement of a large set of CI owners and operators from the most attacked sectors guarantee **the transferability** of results

PRAETORIAN: KEY ASPECTS (II)

Scalability	• different types of users • needs of any possible kind of CI.
360º Engagement of EU society	• project supported by all possible stakeholders and beneficiaries
Comprehensive in situ demonstrations	• three ambitious yet feasible pilots • to cover a large variety of possible scenarios

PRAETORIAN

Any questions or comments

Thank you!

Eva Muñoz / ETRA / PRAETORIAN Project Manager – emunoz.etraid@grupoetra.com
Frederic Guyomard / EDF / PRAETORIAN Project Director - frederic.guyomard@edf.fr

https://praetorian-h2020.eu/

https://twitter.com/PraetorianH2020 @Praetorian2020

https://www.linkedin.com/company/praetorian-h2020 @praetorian-2020

This project has received funding from the European Union's Horizon 2020 Research and Innovation programme under Grant Agreement No 101021274