

Civil Security & Crisis Response from Space



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Enhancing European and Canadian capability to address civil security challenges and support rapid response to disasters

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There is urgency to act....

... for the protection of Citizens, Natural Resources and Critical Infrastructures

Devastating events are escalating with higher impact

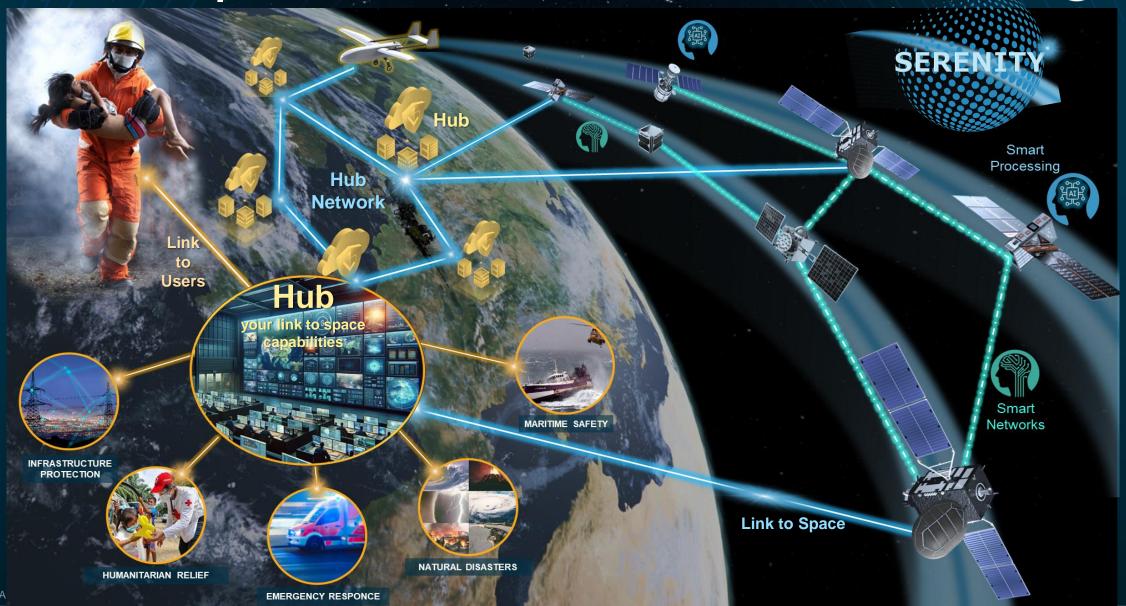
Europe needs to be better equipped to monitor, mitigate and respond to events affecting society and state





SERENITY – Space enabled for full situation awareness





SERENITY – Strength in Unity



SERENITY is a virtual federated system, enabling the European wide collaboration of commercial and institutional EO, Satcom & **GNSS** space and ground solutions, to deliver the necessary tools to civil security actors anywhere, anytime, swiftly and reliably.



A Collaborative Framework

Delivering SERENITY for connecting civil security

actors to space capabilities

Solution providers

Technology, Systems, Services

Service **Providers**

System operators, Civil Security Service providers, system

End Users

Service Beneficiaries, - First Responders, Civil Security Actors, Law enforcement etc

Collaborating missions

Member States, Institutional Solutions, Commercial Partners

International Partners











European Commission











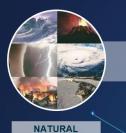
Future EO **GNSS** InCubed Phi lab ARTES 4S

SERENITY – System Pilot

- Hub network developments and deployments
 - Customised to user/operator needs
 - ✓ Supporting multiple end user portals
- Integration of virtual federated system
 - ✓ EO+Satcom+GNSS+IoT+ terrestrial + HAPS
 - ✓ Orchestrator developments pooling & sharing capabilities
- ☐ Applications & services addressing multiple usecases
- Demonstrations across multiple regions

Hub elements









Pilot





NATURAL DISASTERS HUMANITARIAN RELIEF

EMERGENCY RESPONCE INFRASTRUCTURE PROTECTION

MARITIME SAFETY

We need to



Strategic



- ✓ Ensure Europe is equipped to monitor, mitigate & respond events affecting society & state
- ✓ Ensure autonomy in actions to civil protection and crisis

Boost



- ✓ new innovations to enrich capabilities
- ✓ interoperable space solutions EO, Satcom, GNSS, Ground, Aero ...
 - ... Commercial / Institutional
 - ... New space / SMEs ...

Catalise



- ✓ commercial opportunities by engaging institutional users
- ✓ international cooperation and boost export opportunities

Support



- ✓ EU Green Deal 2050 Adaptation to Natural Disasters
- ✓ EC Critical Communication System by 2030 For civil protection & safety



Civil Security from Space