# Greater Power to Smaller Plattforms
## The small footprint solutions

# Naval Warfare

The ability to project power at sea and from the sea
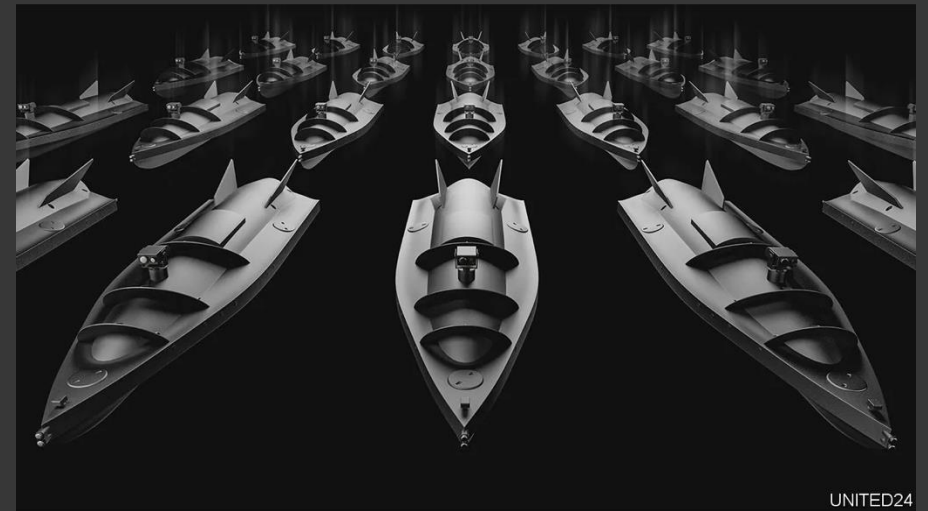to influence the behavior of people or the course of events

"Whosoever can hold the sea has command of everything"

– Themistocles (524-460 B.C)

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# A new reality – A new challange

- The uncrewed threat affects the entire battlefield

- Situational awareness (SA) is challenged

- There is a need to retake the ability to obtain SA both in the air and on the surface.



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# Capabilites

**Simultaneously**

- Air and Surface Surveillance
- Drone Tracking
- Sense & warn and weapon locating functionality
- Target classification

**High accuracy 3D information for all air targets**

- Target indication to weapon systems
- Excellent small-target detection
- Fast reaction time

**Extensive Electronic Counter-Counter Measures (ECCM)**

**Small footprint - physically and weight**

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# SG1X

- Small
- Lightweight
- Energy efficient
- High performing

- >100 km range
- Air and Surface 3D surveillance
- High level of automation
- Minimal maintenance needs

| | |
|---|---|
| Radar type: | Stacked beam 3D radar |
| Antenna type: | AESA, digital beam forming |
| Frequency: | X (I) band |
| Elevation coverage: | 70° |
| Rotation rate: | 60 RPM |
| Search volume: | 360° |
| Range: | >100 km |
| Tracking capacity: | 600 Air/Surface tracks |
| Climate zones: | All climate zones |
| Sensor weight: | 100 kg |
| Stabilisation: | Electronic |
| Power consumption: | 2,3 kW peak |

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# Small size

## Three main units, easy to integrate

**Power Conversion Unit**
28VDC
300W
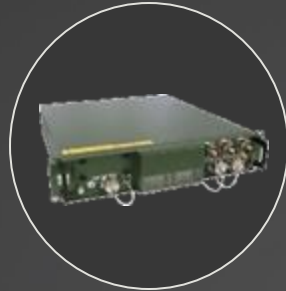


**Signal and Data processing Unit**
28VDC / 230VAC
2000W



SDU + PDU  19' Rackmounted < 40 kg
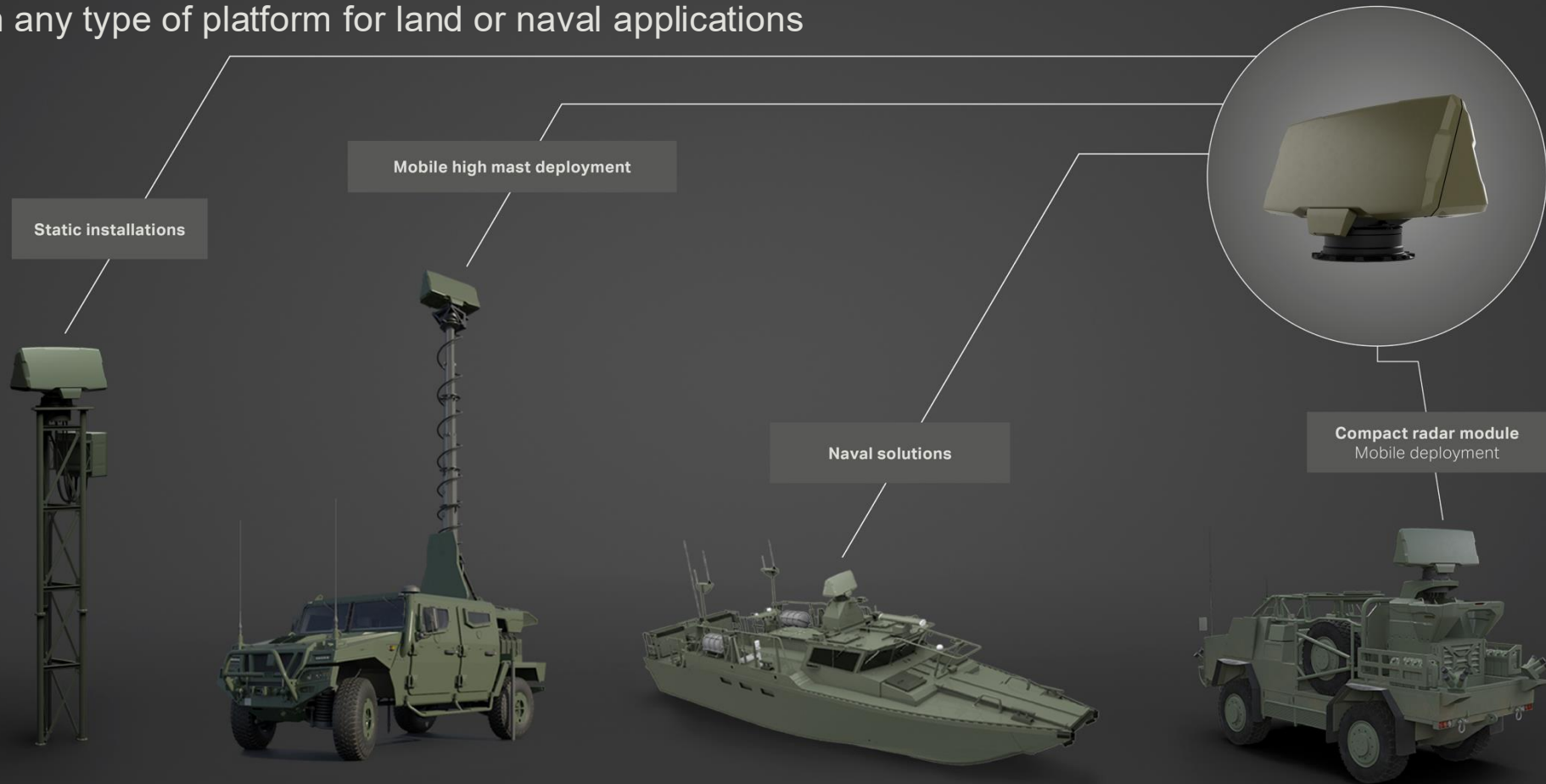
1200mm

700mm

Antenna + Turntable =100 kg
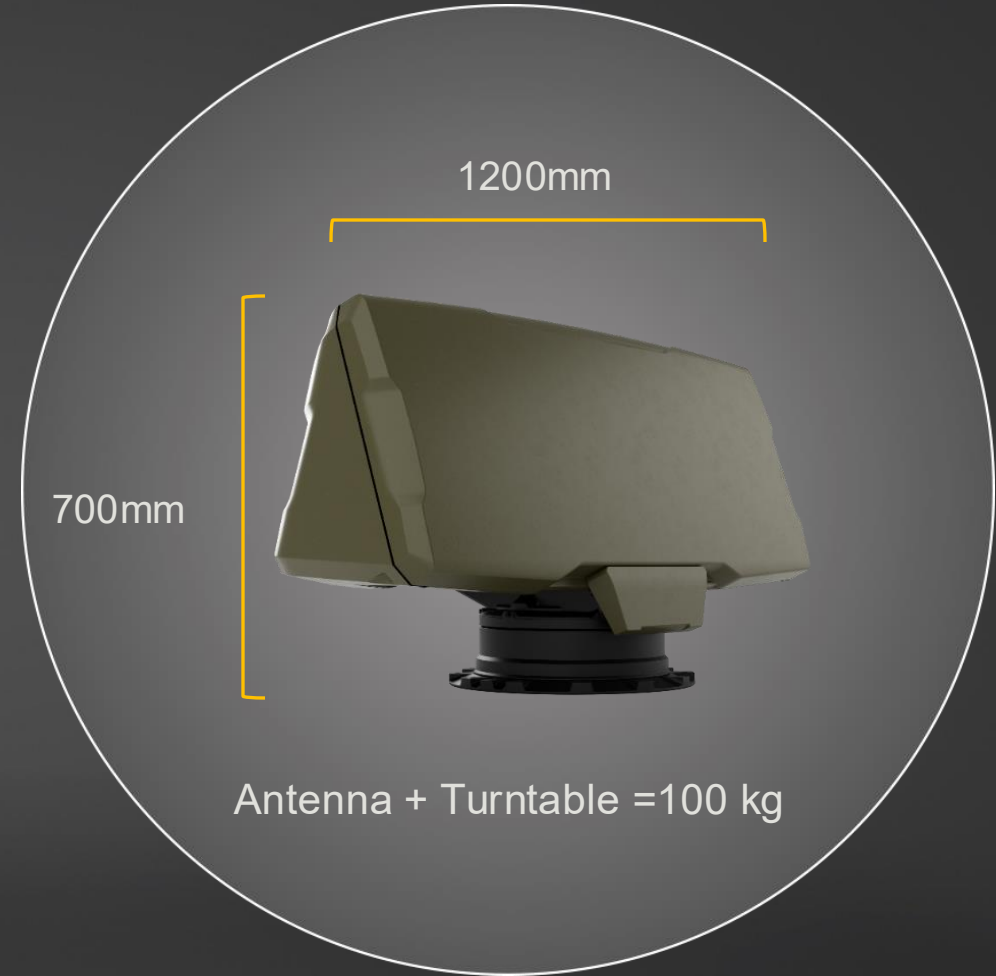


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# Configurations

G1X can be delivered with various standard or customized
solutions on any type of platform for land or naval applications

Static installations

Mobile high mast deployment

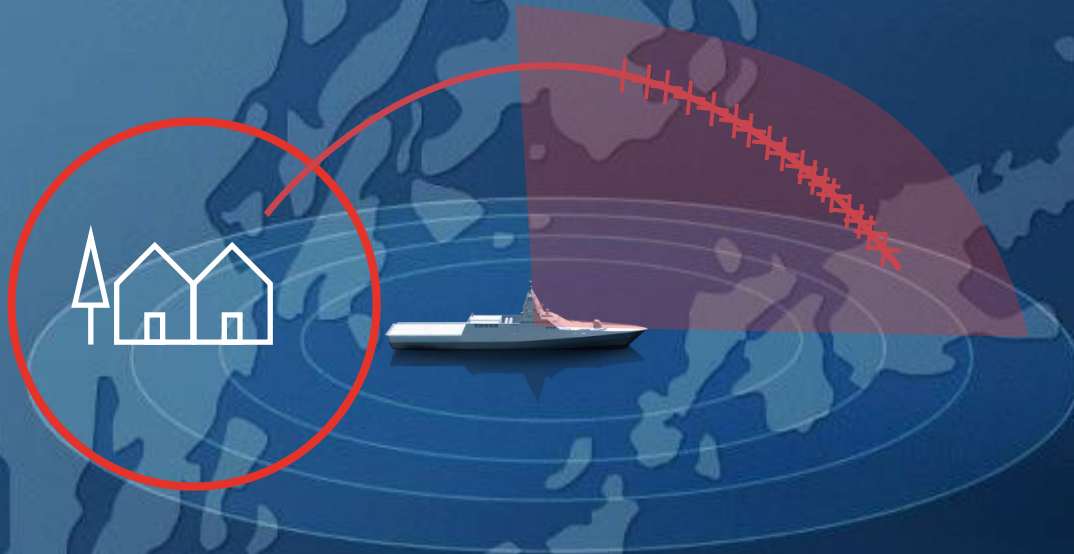Naval solutions

Compact radar module
Mobile deployment

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# Drone Tracker

- Challenge: Separate birds from drones
- Detects small UAVs at a significant distance
- UAV classification algorithms
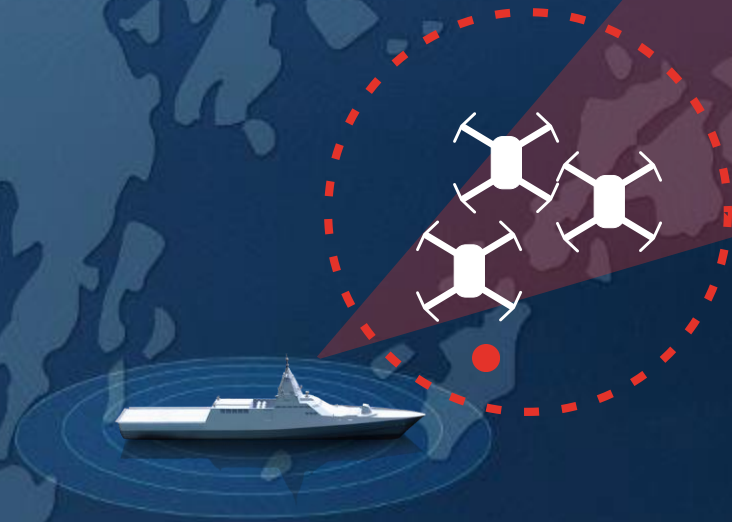
# Sense & Warn and weapon location

- Detects, tracks and classifies ballistic objects

- Provides Firing position, Impact position & Time to impact

- Increases own ship survivability close to land

- Useful for site- and force protection

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# The power of software defined capabilities

Software upgrades

Through-life functional growth

Hardware upgrades
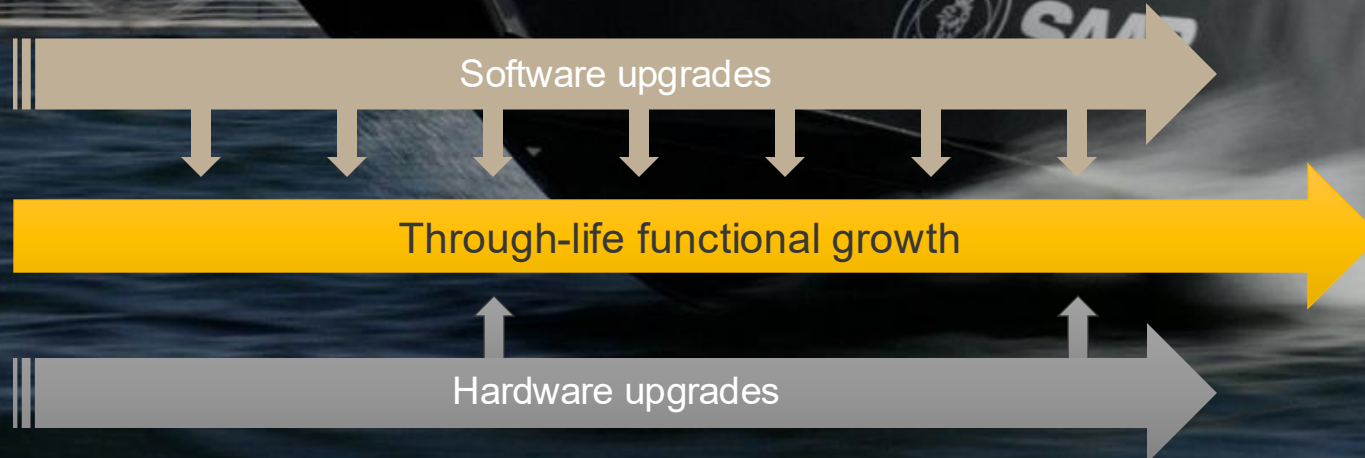
- Continuous deployment of new functionalities

- Short lead times to operational implementation through spiral development

- Enabling multi-function, multi-domain

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