

## Presentation of the work programmes of the Preparatory Action on Defence Research

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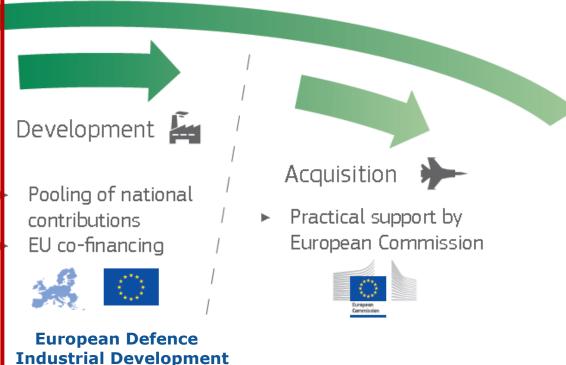


## **European Defence Fund**

**Programme** 



#### **Capability Window**





## **European Defence Fund**

|          |   | UNTIL 2020         | POST - 2020          |
|----------|---|--------------------|----------------------|
| <b>₹</b> | RESEARCH Fully and directly funded from EU budget  PADR!! | €90 million total  | €500 million' / year |
| o<br>O   | <b>DEVELOPMENT</b> Member States budget at least 80%      | €2 billion total   | €4 billion* / year   |
|          | Co-financing from EU budget up to 20%                     | €500 million total | €1 billion* / year   |
|          | * Budget expectations per year                            |                    | €5.5 billion* / year |

- All budgets are proposals!
- Research should be linked to defence capability priorities agreed by the **Member States**







# PREPARATORY ACTION ON DEFENCE RESEARCH





## **PADR Objectives**

- Demonstrate and assess added-value of EU supported defence R&T
- Results should foster further cooperation between Member States and between EU defence industries
- Prepare for a basic act to launch a substantial defence research programme from 2021 onwards

## PADR



## **PADR Scale and Scope**

- Duration: 3 years 2017-2019
- Requested total budget: EUR 90 million, subject to yearly decisions
- 2017 Budget: EUR 25 million APPROVED!!
- 2018 Budget: EUR 40 million APPROVED!!
- 2019 Budget: EUR 25 million **TO BE REQUESTED**
- Bulk of the PADR budget to set-up a small defence R&T programme to prepare and test mechanisms to deliver cooperative defence research activities

## PADR



## PADR Modalities (1/2)

- Horizon 2020 "look & feel" as close as possible but adapted to specificities of the defence sector & Financial Regulations
- Mainly GRANT-based scheme (research actions

   coordination and support actions); procurement
   limited to studies
- Participation: legal entities established in Member States or Norway only
- Evaluation based on excellence organised by EDA assisted by independent experts, validated by national authorities

## PADR



## PADR Modalities (2/2)

- Funding: 100% direct eligible costs + indirect costs (flat rate of 25% of direct eligible costs)
- Personnel costs can be declared as unit costs (if this is the beneficiary's usual accounting practice)
- EU funding can only be used for R&T activities related to defence technologies, products and systems, and not to fund military operations
- IPR: results owned by participants; measures to inform national authorities on the outcome of the projects



# PADR WORK PROGRAMMES





## **PADR Work Programmes**

|   | C4ISR | Effects | Force<br>Protection<br>and soldier<br>systems | Unmanned<br>Platforms |
|---|-------|---------|---|-----------------------|
| Defence Research<br>Demonstrator Project    |       |         |   | 2017                  |
| Critical Defence Technologies               | 2018  | 2018    |   |                       |
| Future and Emerging Disruptive technologies |       |         | 2017  |                       |
| Standardisation and Interoperability        |       |         |   |                       |

Strategic Technology Foresight Modalities



#### **Call –Unmanned platforms**

Technological demonstrator for enhanced situational awareness in a naval environment

#### **OCEAN 2020**

- R&D on maritime surveillance & interdiction at sea
- Integration of drones/unmanned submarines into fleet operations
- Acquisition and combination of data into a Recognised Maritime Picture
- Two demonstrations in connection to navy exercises (SE, IT)
- Consortium: Leonardo SpA (COO), 42 beneficiaries
- Budget: ~35 MEUR





#### **Call – Force Protection and Soldier Systems**

Force protection and advanced soldier systems beyond current programmes

#### **GOSSRA**

- Generic open soldier systems architecture
- Standardisation/interoperability (NATO EDA)
- Consortium: 9 beneficiaries
- Budget: ~1,5 MEUR

#### **VESTLIFE**

- Ultralight body armour for dismounted soldiers
- Consortium: 6 beneficiaries
- Budget: ~2,7 MEUR

#### **ACAMS II**

- Adaptive wide-band camouflage
- Consortium: 7 beneficiaries
- Budget: ~2,6 MEUR



#### **Call – Strategic Technology Foresight**

**The European Defence Research Runway** 

#### **PYTHIA**

- Review of current tech forecasting methodologies
- Design a methodology to collect and analyse large amounts of data (big data analytics in a defence context)
- Study of cognitive factors
- Assessment of the impact of tech trends on defence planning
- Workshops (validation PYTHIA methodology)
- Consortium: Engineering Ingegneria Informatica (COO),
   8 beneficiaries
- Budget: ~0,95 MEUR







## Outline 2018 PADR Work Programme

**FOCUS** 

Critical Defence Technologies

Strategic autonomy

Security of supply

(including no end-user restrictions)

C(2018)1383 available at <a href="https://ec.europa.eu/growth/content/preparatory-action-defence-research-description-2018-topics\_en">https://ec.europa.eu/growth/content/preparatory-action-defence-research-description-2018-topics\_en</a>



## Outline 2018 PADR Work Programme

## Call – Electronic Design Technologies for Defence Applications

European high-performance, trustable (re)configurable systemon-a-chip or system-in-package for defence applications

#### Call - Effects

**Towards a European high power laser effector** 

Call – Strategic Technology Foresight
The European Defence Research Runway – part II

**C(2018)1383** 



## Work Programmes

## All calls available on Participant Portal



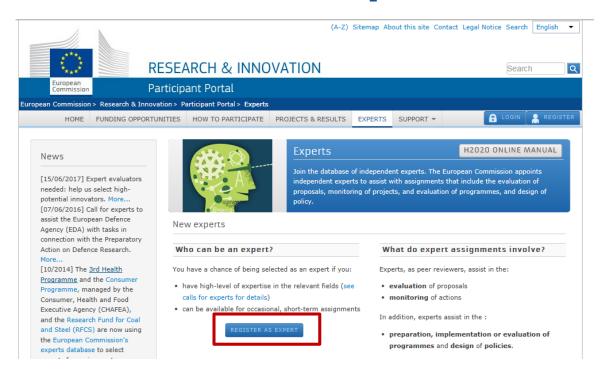


## **CALL FOR EXPERTS**



## Call for Experts

## **Call for Experts**



- > Experts need to be validated by national authorities
- Experts need personal security clearance (CONFIDENTIEL UE/EU CONFIDENTIAL or equivalent)



# THANK YOU FOR YOUR ATTENTION

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