



Ministry of Defence

Setting the Scene:

The Defence Innovation Priorities and the Defence Technology Framework

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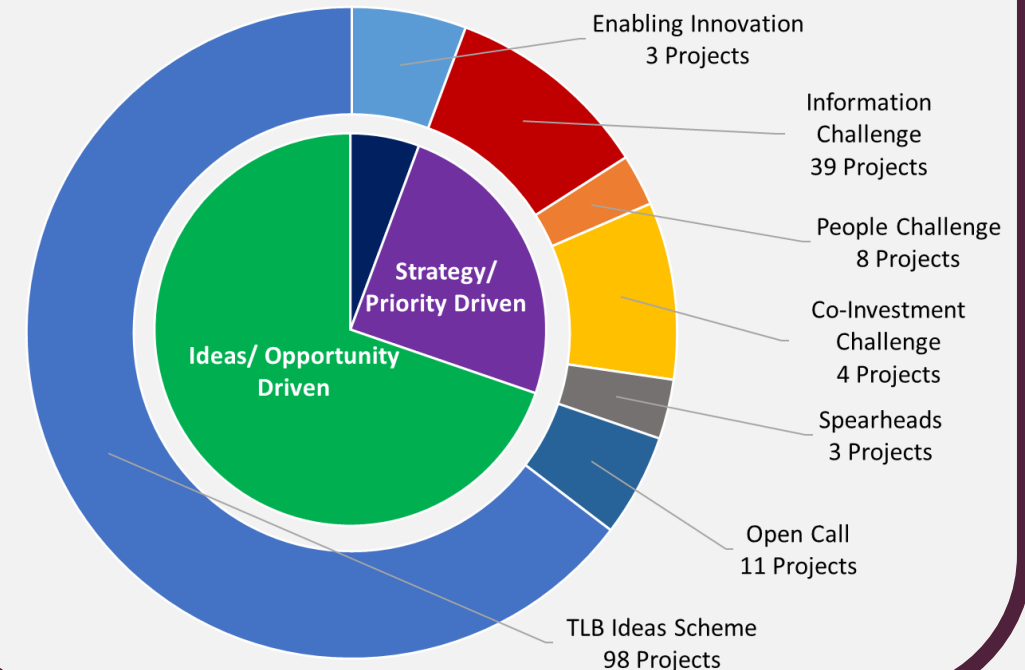
The Defence Innovation Initiative

VISION: A Defence enterprise, that is innovative by instinct, where ideas are readily generated and exploited to deliver innovative solutions to Defence's challenges.

Since 2016:

- Launched the Defence Innovation Fund (DIF) - around £800m over the next ten years
- Attracted nearly £6m investment from industry and nearly £12m from Top Level Budget areas in Defence
- Set up the external Defence Innovation Advisory Panel
- Built the Defence and Security Accelerator (DASA) to deliver services to defence and security customers
- Created the Defence Innovation Unit (DIU) to lead on innovation policy, strategy and coordination
- Launched the Spearheads portfolio
- Created innovation hubs in each of the Front Line Commands (FLCs) investing in innovation

The Defence Innovation Fund (DIF) has spent £25 million to March 2019, funding over 160 innovation projects.



Defence Innovation Outcomes

1

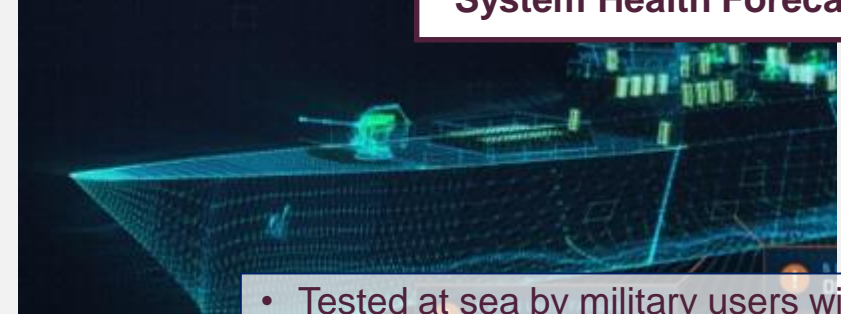
Bridge Innovation



- First truly portable, long-span rescue/assault bridge.
- 20x cheaper, 85% lighter and 80% more compact than standard infantry assault bridges

2

AI-enabled Platform System Health Forecasting



- Tested at sea by military users with the Navy's Innovation team (DARE).
- Potential save MOD £millions in reduced maintenance and improved scheduling

Telemedicine for Operations

5

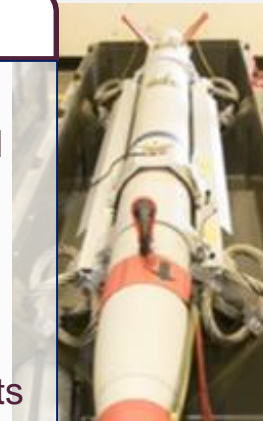


- Our first data Telemedicine capability.
- Enhances: combat casualty care, medical evacuation triage and clinical preparedness of deployed medical teams.

Since 2016 we invested over £100m in Innovation Projects – 5 examples

4

BOZAL



- Remotely monitor the location and environmental conditions of high value assets
- Potential to provide workplace efficiencies and prevent loss of costly assets

3

MOD-DGP Capability Proving Challenge

Aim

- Test a new kind of relationship between MOD and its Industry Partners.
- Outcomes that support MOD and open markets overseas and adjacent sectors by design

Defence Innovation Priorities

Integrate Information and Physical Activity Across Domains

- How can we integrate information and physical activity across domains (particularly Space and Cyber), and synchronise with wider Government to increase understanding and operational tempo?

Delivering Agile Command and Control

- How can we deliver agile Command and Control, to offer decisive advantage in complex operations?

Operate and Deliver Effects in Contested Domains

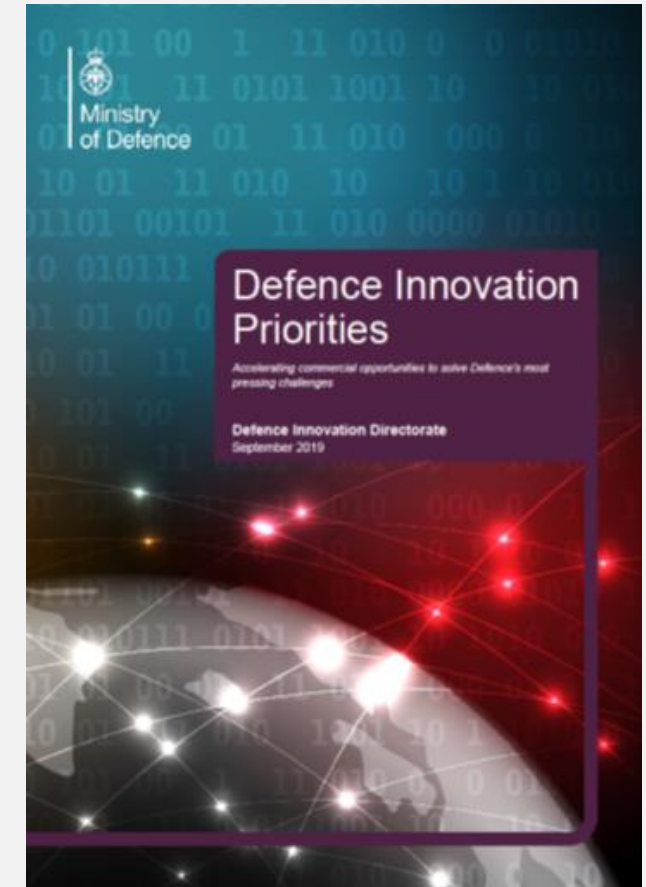
- How can we operate and deliver military outcomes in denied and contested domains?

Defence People – Skills, Knowledge and Experience

- How can we access people with the right skills, knowledge and experience?

Reflecting Future Battlespace Complexity

- How do we reflect future battlespace complexity and higher levels of integration in training, wargaming and experimentation?



How should you respond?

We think that other organisations are facing similar or related problems

- If you do face these problems and are willing to work with us, then we believe there is the potential for us to both gain:
 - Through sharing of our respective experiences, and implementing that learning; or
 - Through working jointly to find or create solutions that help us both.
 - So please talk to us, and we will explore this with you.
- If you already supply effective solutions to similar problems in the non-defence sector, please engage with us through DASA.
 - DASA will provide information about innovation challenges as we launch them.



Talk to us!



Visit:
The Innovation Hub

Search:
“Defence Innovation
Priorities” or “DASA” on
gov.uk

Email:
info@innovation.mod.gov.uk

The Defence Technology Framework



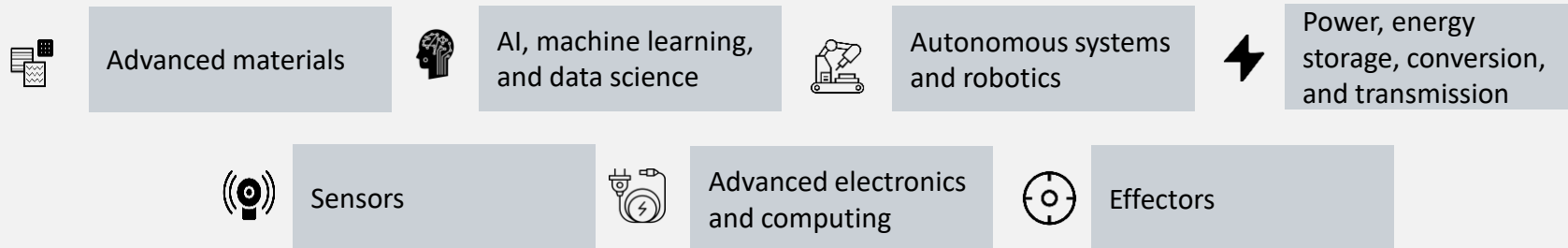
The Technology Challenge...

- This is a time of extraordinary and destabilising technological change
- The private sector is driving new and unexpected developments
- Adversaries are transforming their capabilities and warfighting
- Nations able to anticipate and exploit opportunities will stay ahead
- We must work together : government, industry, academia
- And we must do so coherently, affordably, and at pace

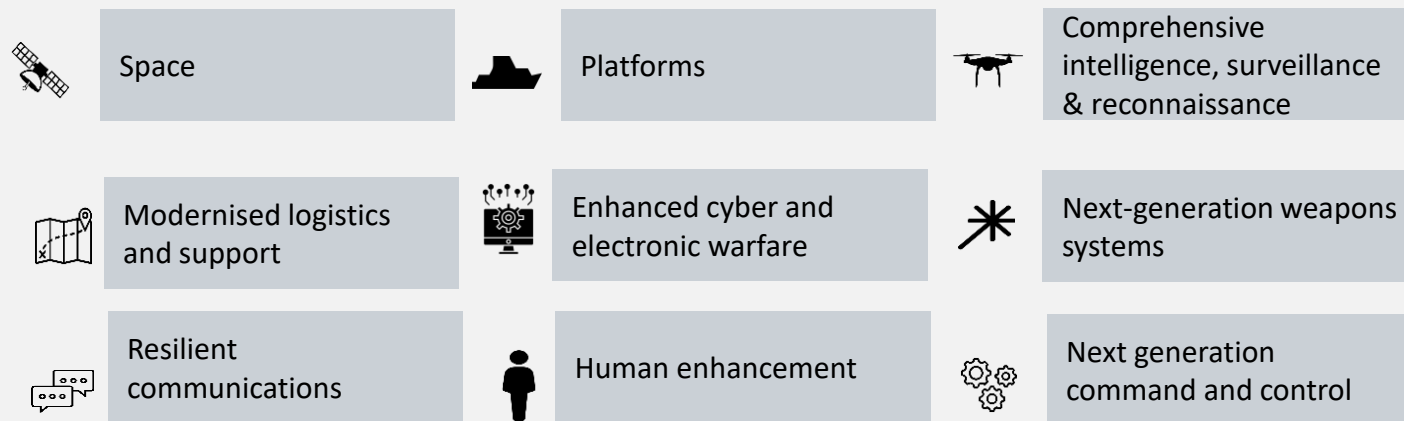


The Defence Technology Framework

Technology Families



Application Areas



The Framework in practice...

- Understanding the art-of-the-possible making it a reality
- Developing policies, doctrine, and procurement strategy
- Informing capability development
- Reshaping of our Core Research Programme
- Shaping our approach to prosperity



Defence can't do this alone...

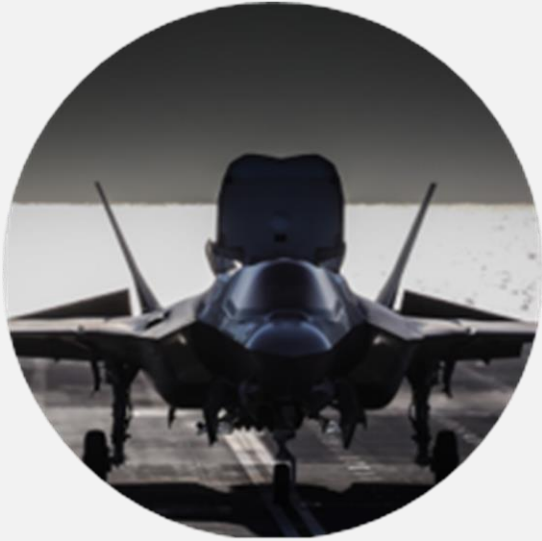
- We must work together to exploit the next step-change in capability
- to balance our in-house, external, and international approach
- to rapidly develop, industrialise, and support technologies and capabilities
- to protect technologies that underpin UK advantage

So...

- we want to deepen our engagement with you...
- and give you the confidence to invest...
- ...so that we can all take advantage of the pace of change



Talk to us!



Visit:

The Innovation Hub and Dstl
Stand



Search:

DST gov.uk or “Defence
Technology Framework”



Email:

DST-secretariat@mod.gov.uk