techUK
FOR WHAT COMES NEXT

techUK Defence Board

DefTech Manifesto

July 2025

"The keyboard is now a weapon of war and we are responding to that..."[1]

Rt Hon John Healey MP, Secretary of State for Defence

"...for centuries British technology and innovation have been the bedrock of our economy and our national security.

And with technology and innovation on an exponential curve of growing importance to success on the battlefield..."[2]

Rt Hon Maria Eagle MP, Minister of Defence Procurement and Industry

Introduction

Definition

"DefTech can be defined as any app, software, or technology that allows a constituent of the Defence enterprise to digitally access, manage, gain insight into and/or efficiently and securely prosecute military operations, the maintenance of capability and/or the acquisition and deployment of new capability".[3]

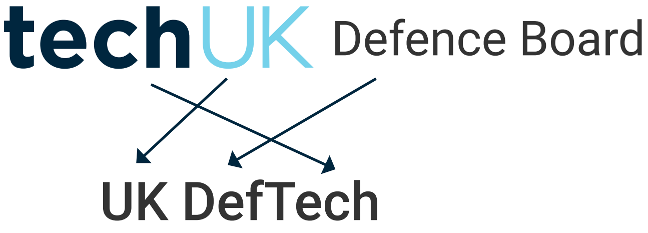
DefTech: Technology Transforming Defence, techUK, Nov 2024

From the first time someone picked up a rock and threw it at their enemy, the arms race has become exponentially more dependent on technology. Information is the critical differentiator in any fight and information and communications technology is therefore the critical defence enabler, the only truly ubiquitous technology, and it is not an exaggeration to say that UK Defence simply could not function without it.

As defined here, DefTech provides technology-enabled Defence. It is changing the way the Defence enterprise provides national security and prosperity and underpins all defence capability; this reliance will only increase as our adversaries adopt it vigorously, seeking to create greater asymmetric threat vectors.

Whilst this is well understood, the ability of the UK Defence enterprise (Government and Industry) to grasp the increasing complexity, scale and cadence associated with integrated DefTech capability is demonstrably sub-optimal. In fact, this situation is worsening, not improving. Dynamic geo-political events are highlighting the need to rapidly improve all aspects of the UK's DefTech environment to ensure we have the sovereign ability to protect and defend the UK; the first duty of Government. The Mission!

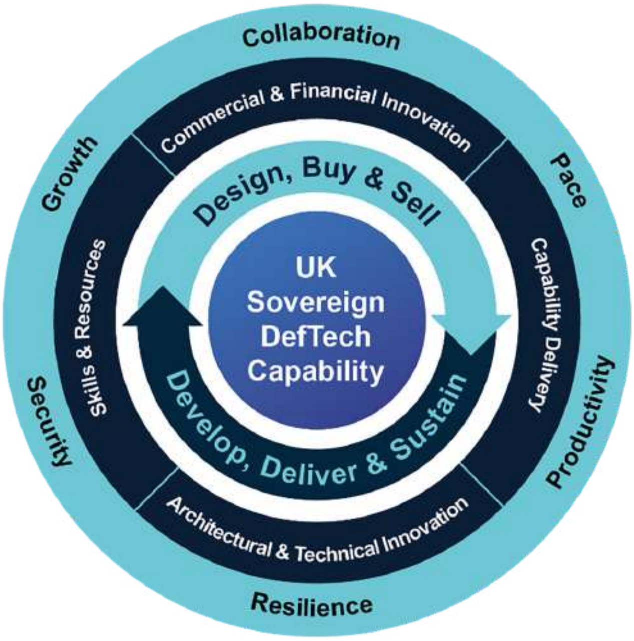
The techUK Defence Board is the leading Industry body aligned to this goal. The clue is in the name!



As Defence Reform, the Strategic Defence Review (SDR) and the associated Industrial Strategy and supply chain initiatives are implemented, the increased importance in tackling this challenge has already been recognised. However, this is just the beginning. Now we must act on multiple fronts, maintaining alignment of all the diverse stakeholders, working in partnership across a range of inter-related initiatives to achieve the mission.

The diagram opposite seeks to encapsulate all essential activities to improve the UK Sovereign DefTech position, and each of the four focus areas are expanded below. The final page of this manifesto then lays out our call to action.

Building on our paper “DefTech: Technology Transforming Defence”, published in November 2024, as the UK DefTech Industry body, we look forward to working in partnership with our public sector colleagues to make rapid and sustainable progress in ensuring that DefTech is the enabler it must be to help deliver UK Defence.


Collaboration
Pace
Productivity
Resilience
Security
Growth
Commercial & Financial Innovation
Capability Delivery
Architectural & Technical Innovation
Skills & Resources
Design, Buy & Sell
Develop, Deliver & Sustain
UK Sovereign DefTech Capability

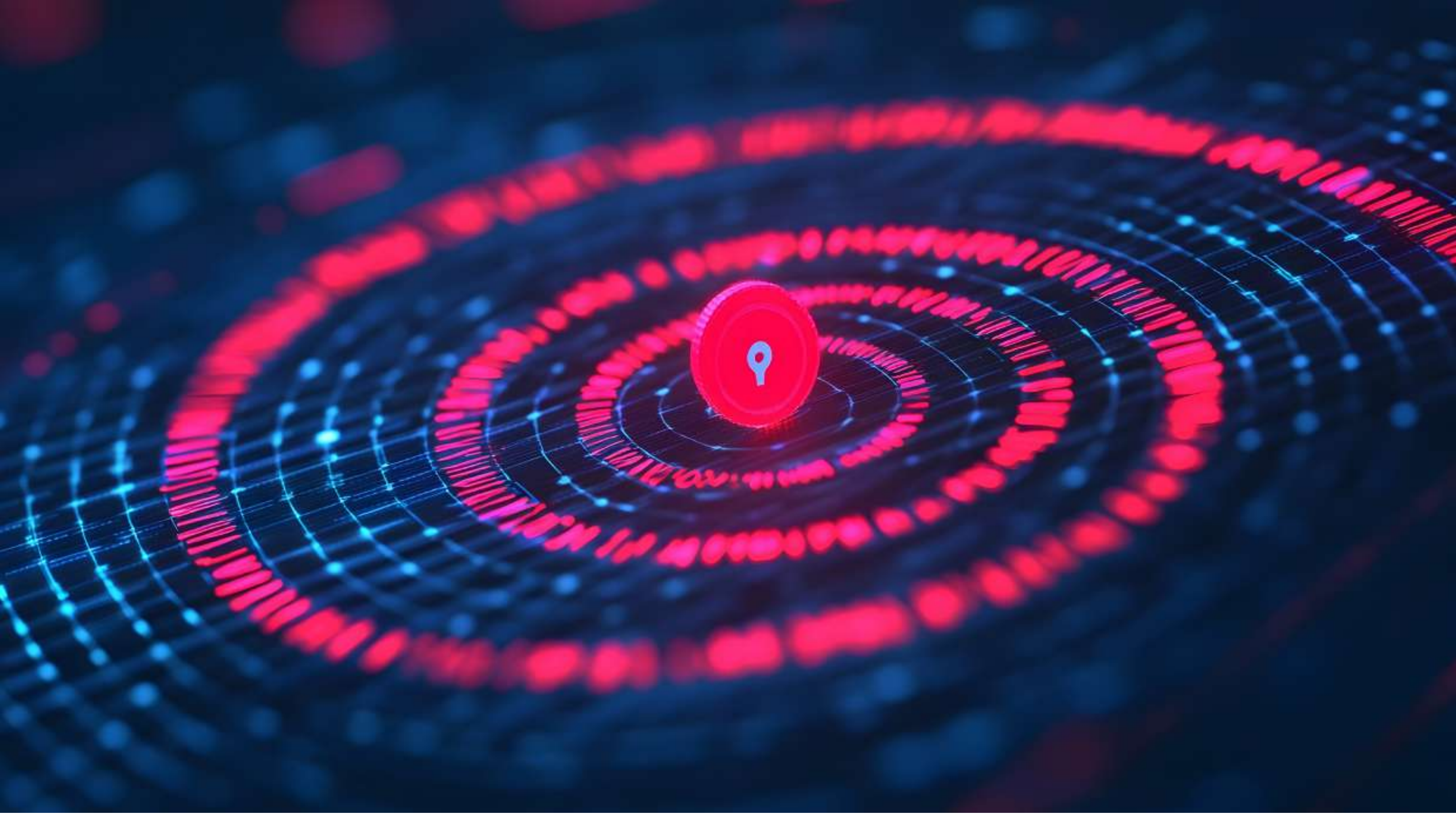
Focus Area 1: Architectural and Technical Innovation

The Challenge

Defence acquisition over the past decade has remained platform centric, with software regarded as an afterthought rather than a fundamental. This platform-centric approach has meant that the Ministry of Defence (MOD) has not prioritised investment in battlefield data management systems, communications, software, and other digital technologies, all of which are fundamental to success in conflict. We have supported this shift in other vertical markets, and are keen to help the MOD shift from a platform-centric to a data-centric approach when prioritising future capabilities. This requires *"Integration by Design"*.[4] Getting this right will bring incremental value, capability that is more than the sum of the parts and will help achieve competitive advantage for UK forces.

The SDR says that *"Defence's digital transformation has been hindered by … lack of defined and consistently applied standards and architecture"*.[5] We advocate that the Integrated Force capabilities must be designed with data requirements as a prerequisite for the delivery of effects, kinetic or otherwise. Sovereign DefTech must be designed-in to service these data requirements, and all sensors and effector systems must be dynamically integrated with the information architecture. This will allow rapid technology insertion and innovation adoption, including safe and secure software upgrades on a cadence of a few months rather than years. This will also provide the opportunity to move rapidly across the "valley of death" for applied research and novel innovative technologies that need to be brought into operational use and scaled up much faster than we have historically achieved.

techUK is keen to support a CTO-led review of MOD's architecture to enable a better understanding of its dependencies and legacy systems risks and to identify where unauthorised/non-compliant "shadow" technology is being used. Once this rapid review has concluded, its recommended action must be to use the mandated architecture for future procurement and acquisition activities. Whilst embracing Secure by Design, this architecture should, where appropriate, include "open as possible, secure as necessary" cloud-native DefTech to allow rapid technology insertion that is fit for the cloud (and therefore AI) age. However, a cloud-native approach should not come at the expense of maintaining necessary physical infrastructure in the deployed environment. Furthermore, this architecture should be applied across a common Defence enterprise spanning all of MOD's delivery and end-user organisations to support the SDR's ambition for a segmented approach to Defence procurement and acquisition.



techUK commits to the following actions:

1. To support the National Armaments Director Group (NADG) in the enhancement of the MOD CTO's Digital Technology Reference Model helping enable the Integrated Force and allowing for rapid, coherent digital technology insertion, providing a foundation for the journey to data-centric security and zero trust networks and services and their integration into platforms and systems across Defence.

2. To partner with UK Defence Innovation (UKDI) to implement the architecture and standards required to enable innovative digital technologies to be rapidly pulled through into the segmented procurement approach, speeding up the acquisition lifecycle to deliver digital capability at the required pace.

3. To participate in pilot projects with the Defence AI Centre (DAIC) to demonstrate how AI can be deployed based on sufficient standards and architectural principles to be safe and secure whilst bringing the massive potential value of AI to users effectively and efficiently.

Focus Area 2: Commercial and Financial Innovation

The Challenge

The UK-based providers of DefTech have opportunities to leverage private investment and R&D funding to provide new technologies that have applicability in the Defence sector. However, the MOD does not provide sufficient transparency of the opportunity pipeline or perceived problem space to help these companies (of all sizes) to have the certainty to maximise investment opportunities. Early market engagement and consistent and frequent sharing of the Defence Investment Plan and the status of its programmes will enable UK DefTech companies to focus their investments on the customer's highest priorities, to obvious mutual benefit.

We would argue that the MOD must manage suppliers more effectively, employing full time, strategic relationship managers as other government departments do. Through more strategic dialogue, all parties would be incentivised to find savings (and reinvest) across the portfolio. We are confident such positions would quickly pay for themselves if implemented. This optimisation would be enhanced further by using AI for contract and dependency management, reducing duplication and inter-dependency driven delays, and helping achieve greater Value for Money.

To innovate at pace, the MOD must be more willing to take increased commercial risk. This needs to be measured against a list of published criteria for each procurement. Building out from Commercial X, this approach should apply to companies and programmes of all sizes. The MOD and its suppliers should also recognise the value of a learning outcome, even if a solution is ultimately unachievable. This means being prepared to fail quicker, ceasing funding as soon as it is clear the deliverable is not viable.

The SDR says: *"Defence supports 440,000 jobs across the UK and over 24,000 apprenticeships, with significant economic and social benefit. Yet it can go further"*.[6] The current Social Value acquisition initiative (even as re-imagined under PPN 002) and follow-on delivery is "tactical" and misses significant opportunities to meet the strategic intent.

Suppliers, most notably SMEs, are impeded by unnecessary and excessive contracting terms and conditions; for example, IT projects requiring irrelevant declarations on munitions and asbestos, or where subcontractors are expected to carry excessive liabilities. We would like to see MOD commercial officers

empowered (using the greater flexibility afforded under the Procurement Act 2023) to decide which contracting requirements are relevant or whether they hinder the intent. This would help achieve the recommendation laid out in the SDR: *"By April 2026, the MOD should develop a package of support for its industrial partners that removes barriers to collaboration and drives better, more cost-effective results: reducing by at least 50% the burden of Defence Standards and Conditions; working across Government to amend the Single Source Contract Regulations; reforming regulations, Intellectual Property handling, and security clearance requirements; and providing access to intelligence, data, and test and evaluation sites"*.[7]

Innovative financial solutions can help UK DefTech to scale up and deliver rapidly. We welcome the endeavours to increase private investment. In some cases, MOD may benefit from more innovative OPEX/CAPEX (RDEL/CDEL) approaches to DefTech, with a supplier-owned and managed approach – 'as-a-service' or 'commercial subscription' models. This would provide the basis to incentivise constant innovation and improve Value for Money.

techUK commits to the following actions:

1. To work with NADG to provide input on what enhancements to market engagement would help to encourage greater investment and innovation, and to help enable that engagement. This would encourage investment, increase the diversity of the digital supply chain, ensuring resilience and optimal procurement choices.

2. To initiate a project that considers the adoption of AI technology across the MOD "back-office" working jointly with the supply chain to optimise contract obligations, delivery and financial reporting (including that of Social Value), and cross-portfolio working.

3. To collaborate with the MOD to learn from the experience (LFE) to date of bidding and contracting, to include a review of inappropriate or excessive T&Cs; implementation of DEFSTANs; Social Value; and novel funding - to develop an improvement plan that reduces business development costs and maximises return on investment for all parties.

Focus Area 3: Capability Delivery

The Challenge

The SDR says: *"Defence Reform is a Parliament-long programme. More improvements will come over the next 12 months — increasing integration, reducing duplication, and improving delivery. We will also introduce radical reforms to the defence procurement system, which the Public Accounts Committee and Defence Select Committee have both called 'broken'"*.[8] We welcome the intent, and are keen to support the MOD to improve the end-to-end procurement and delivery processes to help realise the segmented approach which will enable fast-track delivery of DefTech capability.

Initiatives that will help include the use in procurement processes of industry-leading project methodologies, such as Development, Security and Operations (DevSecOps) which has seen stochastic adoption across UK Defence thus far. The introduction of Secure by Design has been welcome, and there are many lessons on its early implementation that can be taken forward to assist practitioners and Senior Responsible Owners (SROs) to manage security risk in delivery. This includes the need to secure the deeper supply chain, and to understand the challenges of legacy DefTech regarding security vulnerabilities and upgradeability.

The MOD also needs to scale up its capacity to implement AI. Despite the welcome existence of the DAIC, there is not a single, recognised authority for providing AI assurance across UK Defence. We recommend that DAIC assumes this responsibility, with a clear process for assurance and approval of AI technologies once acquired. The MOD should adopt work already undertaken elsewhere in HMG, and this process should align with the existing frameworks led by the Responsible Technology Adoption Unit within the Department for Science, Innovation & Technology (DSIT), ensuring compliance with the EU AI Act, the US NIST Risk Management Framework and ISO/IEC 42001.

We believe that delivery performance will be enhanced if a range of impediments and constraints on suppliers including, but not exclusively SMEs, are tackled. First, the vetting of workforces has improved in the last year, but there is still difficulty in receiving sponsorship for the higher levels of clearance. The MOD could also help UK-based DefTech suppliers by supporting work visas, and by providing the ability for companies to share sensitive information across (friendly) countries. This can also be enabled by the provision of, and user-access to, a modern Collaborative Working Environment (CWE). The MOD's Project PANDORA is a welcome example, but this needs greater implementation effort alongside other potential solutions.

It is clear from the SDR that Government will support UK-based suppliers working with the UK MOD and with allied nations. This support includes exports and partnership opportunities such as NATO and EU procurements, AUKUS, and GCAP. We would like to see the MOD use AUKUS Pillar II as an opportunity to embed interoperable digital technologies into the core of future operating systems. We would also like to see NATO learn from the AUKUS experience of bringing together trade bodies and industry through the AUKUS Advanced Capabilities Industry Forum (ACIF) to help build relationships and foster DefTech collaboration.

techUK commits to the following actions:

1. To support the implementation of more appropriate processes, methods and models into a modernised end-to-end procurement and delivery approach for DefTech. This will drive efficiency throughout the lifecycle with all the consequent benefits for all parties.

2. To advise the MOD of opportunities to remove impediments and constraints to the success of UK-based DefTech suppliers, enabling us to jointly deliver better outcomes more effectively.

3. To work with the MOD to enhance opportunities for exports and international partnerships (such as NATO, AUKUS, and GCAP) in the digital arena, alongside the successful equivalent activity associated with platforms. This will help share the costs of capability development, provide export levies to be recycled into enhanced digital capabilities, and ensure better interoperability for our integrated forces.

Focus Area 4: Skills and Resources

The Challenge

We agree with the SDR that there is "... *a persistent shortage of key digital skills within the Armed Forces and Civil Service"*.[9] This applies to non-specialists seeking to exploit the technologies made available to them, and the technical and commercial specialists who are charged with delivery and operation of DefTech. Additionally, within industry there are also limitations, and suppliers of DefTech need to compete with other sectors for high-demand digital talent. There is also a long way to go in improving the diversity, equity and inclusion of the digital workforce supporting UK Defence, as evidenced by organisations such as Women in Defence whose annual data capture across MOD and Industry shows the missed opportunities to increase the talent pool. This is a Whole Force challenge that requires a much closer partnership between MOD and Industry.

UK industry has considerable expertise in several relevant areas, including:

1. Delivering business advisory services across the whole acquisition lifecycle and lines of development

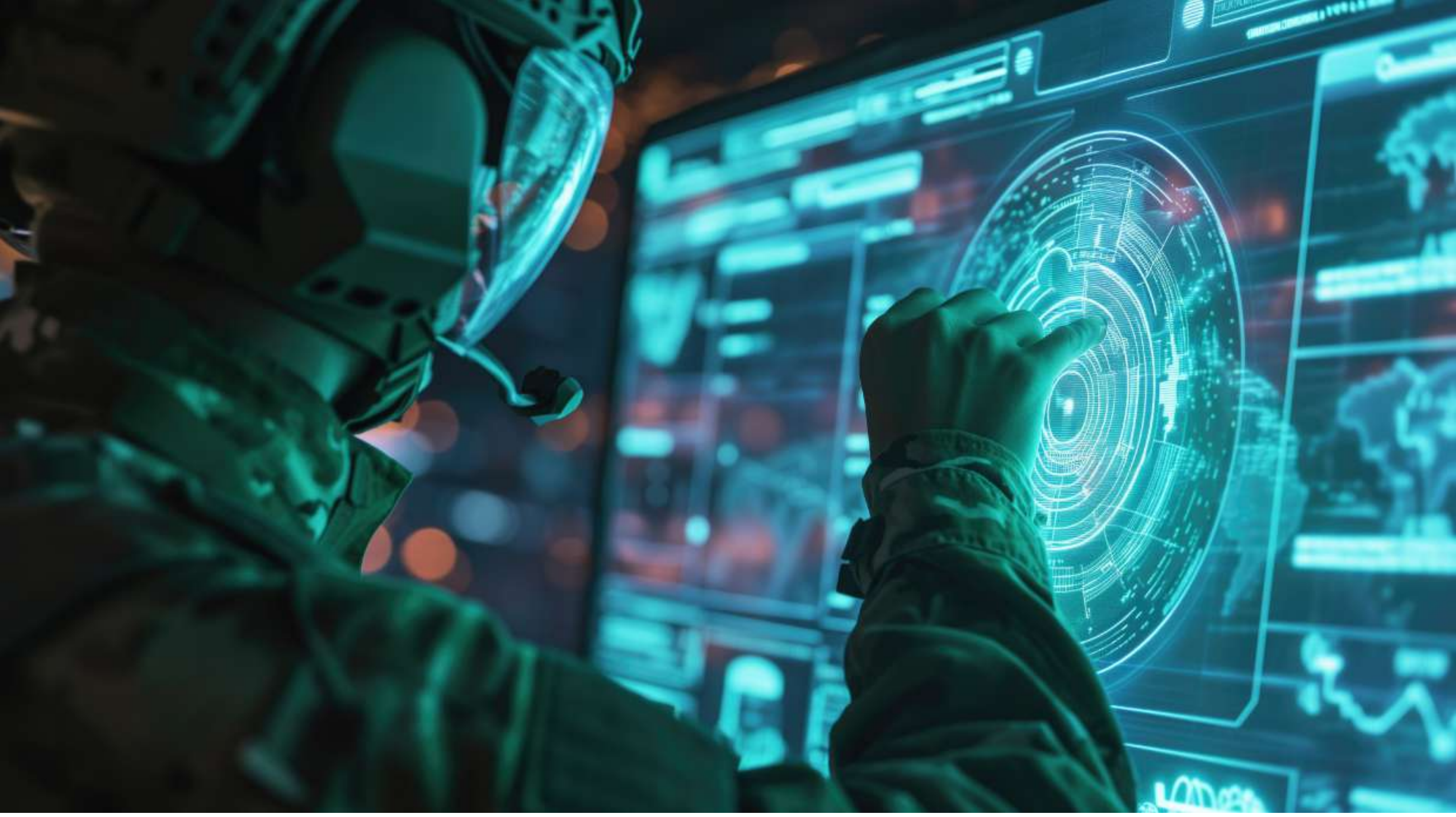
2. Providing suitably Qualified & Experienced Personnel (SQEP) to deliver development projects at scale and integration of new technologies (such as AI) into complex systems

3. Facilitating the cross-pollination of skills from the wider digital technologies sector into DefTech

4. Supporting STEM initiatives for students of all ages and providing apprenticeship opportunities in the DefTech Industry.

The SDR recommends that *"MOD Civil Service costs should be reduced by at least 10% by 2030, and its Active Reserves should be increased by 20% when funding allows"*.[10] This is an opportunity for Industry to help the MOD improve its efficiency with the introduction of technology, notably AI. It also requires UK-based DefTech suppliers to provide opportunities for military leavers and provide reservists from their workforces whilst maintaining the ability to deliver DefTech in ever-more rapid acquisition cycles.

The MOD's creation of a Digital Warfighter Group and the Cyber and Electromagnetic Command both create opportunities for a Whole Force design that utilises Industry and reserves as well as regular military and civil servant posts. Also, their operating models are ripe for modernisation and the inclusion of digital technologies to make them more effective and efficient.



techUK commits to the following actions:

1. To create a proposal to help MOD address workforce gaps across the department through responsible introduction of AI, freeing up highly skilled personnel to undertake more productive tasks.

2. To support workforce planning of MOD's Whole Force through the generation of a diverse pool of digital skills across both government and industry thereby increasing the availability of DefTech specialists in the Reserve Forces that can be scaled and deployed at times of national crisis.

3. To work closely with MOD to support diversity, equity, and inclusion initiatives across the Whole Force, opening a far greater pool of digital talent to work in this highly important domain.

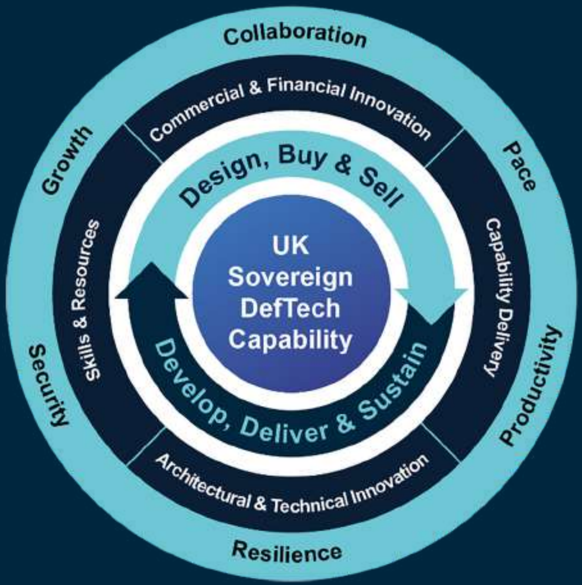
Call to action

So, there is plenty to do! There are several key attributes to how we jointly go about the task ahead:

Collaboration – no single party can achieve the much-needed improvements alone. We need to remember that we are all on the same side. Much of our working relationships are adversarial and tactical. Whilst it is hard to carve out the bandwidth to do the more strategic thinking and implement it, working in partnership will, ultimately, save time, effort, and money for all. Remember, our enemy's enemy is our friend!

Growth – we can all agree that there is insufficient capacity on either side to achieve everything needed in a timely manner. This problem will only increase as we seek to add incremental capability to UK Defence where digital will play an ever-greater role. There will be plenty of work to go around and sector growth can benefit all (most!). We all need to play nicely to achieve a virtuous circle where UK sovereign DefTech capability can help the armed forces, developing DefTech companies along the way and thereby help the Government achieve the wider prosperity & growth agenda.

Security – this is inherent in everything that we do. "Secure by Design" goes well beyond an individual system or entity. It needs to apply to the entire holistic enterprise delivering DefTech capability. It is table stakes; not an inconvenience that slows us down. Through digital cyber services and related products, we hold the tools to do the job, so it is in our own hands to ensure that we protect the department, our businesses, and the UK overall.


Collaboration
Pace
Productivity
Resilience
Security
Growth
Commercial & Financial Innovation
Capability Delivery
Architectural & Technical Innovation
Skills & Resources
Design, Buy & Sell
Develop, Deliver & Sustain
UK Sovereign DefTech Capability

Resilience – we need to ensure the DefTech eco-system is foundationally strong and sustainable into the future. We have all witnessed the boom-and-bust cycles and the technology domain is particularly vulnerable to this. We are all inter-connected and resilience across the environment is ultimately to the benefit of all and needs to be a collective endeavour. Our adversaries will exploit the weakest links and once they're in, they're in!

Pace – we must move faster. Our adversaries and allies are, and we are being left behind. We must seek to remove well-meaning barriers and, whilst maintaining fairness which underpins our values, accelerate to match the pace of the digital arms race. We will lose if we continue to slow ourselves down. This is a cultural shift for all involved in this market and we must make it. We have a duty to catch up!

Productivity – the ways of working embedded in today's DefTech eco-system and procurement environment are highly inefficient. This leads to delays, cost increases, increased enterprise risk and ultimately less capability. We are perhaps uniquely placed in that IT, and specifically areas such as AI and high-powered computing, are the tools we have in our hands, and we can use them on ourselves to improve the productivity of the overall delivery of the digital end capabilities we offer.

Achieving all the above seems daunting. However, there are a lot of us and every step forward on these fronts will be beneficial to all. The path will change as we go, and we will need to be agile and adapt quickly to meet the latest challenges.

We must grasp the urgency here. In the digital domain cyber-attacks happen every minute of every day. Digital threats are just part of our everyday existence, and our enemies are investing massively in their DefTech. Lifecycles of DefTech solutions can be measured in months, not years. Improved UK Sovereign DefTech capability is the necessary response to this existential threat, and we need to get on a war footing to deliver it.

This is the mission and we, as the UK DefTech Industry, stand ready to do our part in achieving it.

"…with defence budgets growing across the world, UK Defence spending represents the tip of a very large iceberg of opportunity for everyone working in defence technologies.

And it's our mission to work with those of you at the cutting edge of technology to make Britain's Defence industrial sector a hive of innovation, a hallmark of excellence, a gateway of opportunity, a pipeline of high skilled jobs and an engine for growth across every nation and region of the UK.

To make Defence a sector that strengthens both our military capabilities and Britain itself, making us more secure and prosperous at home and stronger abroad. Please do join us on that mission."[11]

Rt Hon Maria Eagle MP, Minister of Defence Procurement and Industry

References

1. https://news.sky.com/story/russian-linked-hackers-posing-as-journalists-targeted-ministry-of-defence-government-says-13376229

2. MinDPI Keynote Speech at techUK Defence Spring Dinner (May 2025)

3. https://www.techuk.org/resource/deftech-technology-transforming-defence-techuk-report-published.html

4. https://www.gov.uk/guidance/multi-domain-integration#:~:text=it%20is%20capability.-,How%20are%20we%20Driving%20Integration?,requirements%20to%20deliver%20integrated%20effects.

5. Strategic Defence Review 2025, Chapter 4, Transforming UK Warfighting, Page 47

6. Strategic Defence Review 2025, Chapter 4, Transforming UK Warfighting, Page 51

7. Strategic Defence Review 2025, Chapter 4, Transforming UK Warfighting, Page 62

8. Strategic Defence Review 2025, Foreword from the Secretary of State, Page 05

9. Strategic Defence Review 2025, Chapter 4, Transforming UK Warfighting, Page 47

10. Strategic Defence Review 2025, Chapter 4, Transforming UK Warfighting, Page 70

11. MinDPI Keynote Speech at techUK Defence Spring Dinner (May 2025)

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Leidos	Leonardo	Nexor
Northrop Grumman UK	Oracle	Palantir Technologies UK
Palo Alto Networks	Plexal	Prolinx
QinetiQ	Raytheon UK	Roke Manor Research
SAS Software	Sopra Steria	SVGC
Thales UK	VinDo Technology	

techUK's Defence Programme

The Defence programme works to help the UK's defence technology sector align itself with the MOD.

The Programme aims to help the sector remain at the forefront of technology exploitation. Through our Defence Board and our Forums covering Information Superiority, Research & Technology, Commercial Business and SMEs, the Programme delivers a broad range of activities which support the MOD as it procures new digital technologies.

Our focus, activities and projects to be undertaken in 2025:

- Delivering an enhanced programme of early market engagement events with MOD's delivery organisations and Front Line Commands (FLCs) (National Armaments Director Group, DE&S, Defence Digital, Cyber & Special Operations Command (CSOC), British Army, Royal Navy, RAF), Cyber and EM Command and Space Command
- Facilitating strategic briefings for members with senior decision makers across the MOD and FLCs through our Programme Forums
- Championing the importance of 'DefTech' in maintaining the UK's national security through a comprehensive programme of strategic policy engagement

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FOR WHAT COMES NEXT

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