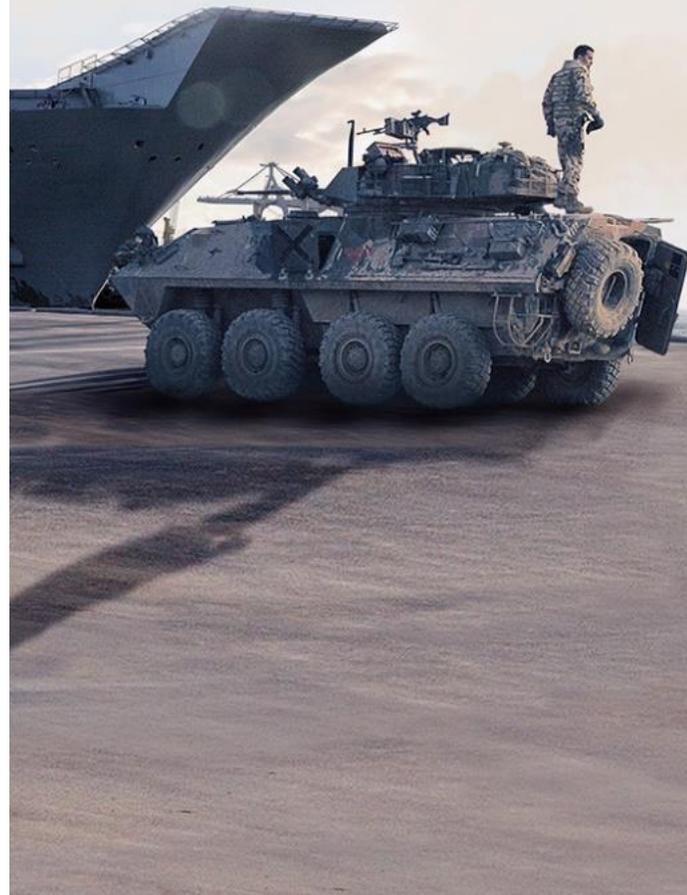


How can profit objectives of business be balanced against maintaining a regionally superior and sovereign industrial capability?

SADILP 2020 CONCEPT PAPER

Adrien Doucet – Neumann Space
James Forrest – Silentium Defence
Rozanne Palma – PMB Defence
David Welling – Naval Group



Executive Summary

This concept paper addresses the question: “How can profit objectives of business be balanced against maintaining a regionally superior and sovereign industrial capability?”

In tackling this topic, the authors identified that regional superiority and sovereignty are both outputs of Australian industrial capability, and therefore framed the question in terms of the challenges that business face in balancing profit with the development of industrial capability.

The authors performed independent research and conducted interviews with several Defence industry participants to identify three main issues preventing ‘balance’, and then defined three related recommendations to address these issues.

*How can **profit** objectives of business be **balanced** against maintaining a regionally superior and **sovereign industrial capability**?*

The issues identified as preventing the balance between profit and capability can be summarised as follows:

- Insufficient detail in Sovereign Industrial Capability Plans to allow business to plan their own capability development
- Unbalanced Defence supply chain that favours foreign-owned prime contractors and does not promote sovereign capability development
- The process for engagement with Primes through RFI questionnaires is burdensome and leads to unnecessarily high operating costs for SMEs

To address the above issues, the authors recommend that the Commonwealth **quantifies** Sovereign Industrial Capability Priorities, fosters **smart capability partnerships** within the Defence industry, and **standardises** the initial engagement process with Primes.

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Overview

In this concept paper, the authors argue that helping businesses balance their profit objectives against Australia's need for a regionally superior sovereign industrial base requires a shift in approach from both the Commonwealth and businesses in Australia's Defence supply chain.

This paper first provides some key definitions to assist the reader. It then describes three barriers that are preventing Australia's Defence industry from achieving balance. Finally, it presents three recommendations that are intended to give some guidance to the Commonwealth and the Australian Defence industry to address the balance.

The contents of this concept paper are the opinions and conclusions of the authors and do not necessarily represent the views of the author's organisations, the contributors, the contributors' organisations, or the Defence Teaming Centre (DTC).

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Key Definitions

Profit Objectives

Profit is defined as the financial benefits realised when revenue generated from a business activity exceeds the expenses, costs, and taxes involved [1]. It is a core businesses objective and ensures the longevity, success, growth, and expansion of a business.

Regionally Superior or Sovereign

A regionally superior Defence capability is the ability to manufacture or deliver a service better within Australia than other countries around the world are able.

Industrial Capability

A skill, facility, process or technology needed to design, develop, produce, repair or maintain products.

Sovereign Capability

The ability to design, maintain, sustain, enhance and develop defence assets and capabilities in Australia [2].

Small Medium Sized Enterprises

The Australian Bureau of Statistics classifies a Small and Medium Sized Enterprise (SME) as a business that employs between 5 – 199 employees.

Prime Contractors

Primes contract directly with the Commonwealth of Australia and generally employ more than 200 people working essentially full time on Defence projects [3].

Introductory Framework

In addressing the concept paper question the authors performed independent research and conducted interviews with several Defence industry participants to gain an understanding of the challenges facing industry in balancing profit with capability.

It became clear that, from an Australian Defence Industry perspective, profit is the result of the available revenue through Defence Industry Investment Program (DIIP) funding, less the explicit costs of building and maintaining Industrial capability. Furthermore, that regional superiority and sovereignty are both outputs of Australian industrial capability. Therefore, the question has been framed in terms of the challenges that business face in balancing profit with the development of industrial capability.

The authors found that the 'Golden Circle' concept, popularised by Simon Sinek [4], was a useful framework in which to consider the question. In this context the Sovereign Industrial Capability Priorities provide industry with the 'why', while the products, platforms and systems required to satisfy the capability needs are the 'what'. The gap, which is the focus of this concept paper, is the 'how'.

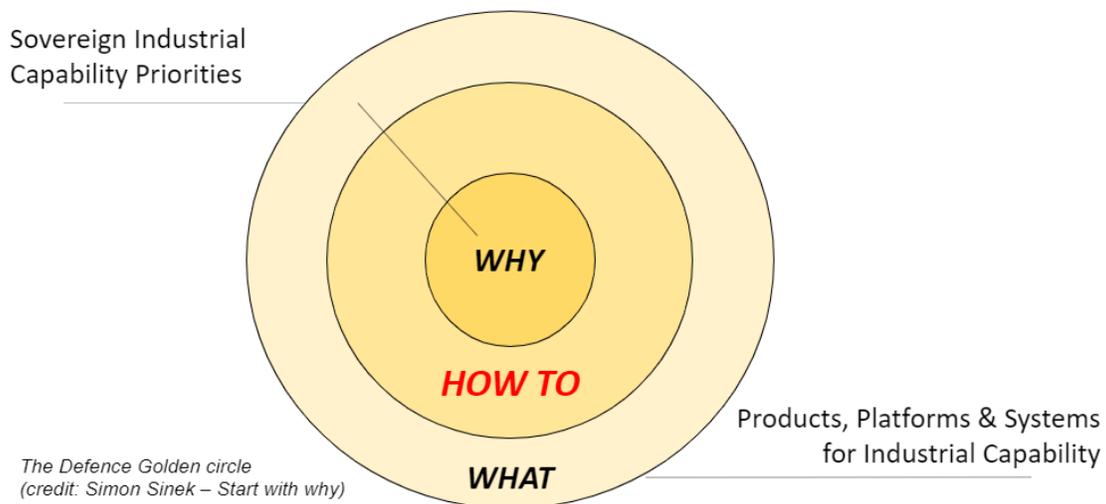


Figure 1 - The Defence capability 'Golden Circle'

Navigating Australian Sovereign Industrial Capability Plans

Superior sovereign capability needs, at a minimum, the alignment of three fundamental building blocks: people, processes and tools. All other industrial definitions can usually be linked back to one of the three fundamentals. What industry needs is to understand exactly what, how much, when, and how these three add up to create a capability.

While in the Defence context 'capabilities' are often thought of as the tools that end up in the hands of our warfighters, it is important to remember that the ability to produce these products is also a valid definition of capability. To produce superior technology without reliance on other nations or entities is a key enabler for Sovereign Industrial Capability.

Unfortunately, it is difficult in today's Defence landscape for Industry to navigate what is really required. With limited resources, how do small businesses assess the many documents, tenders, white papers, strategic guidance and industry bodies? How do the myriad strategic documents give industry what it needs to play its part in creating industrial capability? For industry it all comes back to people, processes, and tools.

The Commonwealth currently provides a plethora of roadmaps, broad strategic guidance and public AIC plans via long, complex and often difficult to navigate document sets. These include:

- Public Australian industry capability plans
- Defence industrial capability plans
- Sovereign industrial capability plans
- Sovereign industrial capability priority plans
- Sovereign industrial capability priority implementation plans



Figure 2 - A small subset of Defence industry policy documents

These documents do not include the quantifiable information and data that can guide an SME to make the appropriate business decisions to balance their own profit objectives. Whilst they do lay out the high-level priorities, for industry to really get some benefit they should include the next level of detail. SMEs need to know how these plans and related Sovereign Industrial Capability Priorities (SICPs) relate to people, processes, and tools.

“How do I plan for the future when capability requirements come out so late in the procurement process” – SME representative

Structure and Challenges within Australia's Defence Industry

The Australian Defence industry is growing, with over 4,000 firms now employing around 30,000 staff; half of whom work for Australian-based global prime contractors [5]. However, outside of the primes, very few businesses rely solely on Defence as a customer, with Defence contracts typically too spasmodic to provide the consistent revenue needed to support a viable business [6]. Nevertheless, with Commonwealth Defence expenditure increasing – a planned spend of \$575 Billion over the next decade – and with the strategic focus now firmly on developing sovereign industrial capability, the opportunity for business is undeniable. The challenge for the Commonwealth, and Defence industry, is to find ways to work together to ensure that this investment is spent wisely on Regionally Superior technology that grows Sovereign Industrial Capability.

The Defence supply chain is typically characterised as an hourglass, with a large number of small firms at the bottom, a small number of mid-tier businesses in the middle, and foreign-owned Primes dominating at the top [7]. There are a number of issues with this structure that are preventing Australia's Defence supply chain from realising its profit objectives. Firstly, although foreign-owned Primes offer significant expertise and experience to the Australian Defence Force (ADF), they do not necessarily have Australia's best interests at heart when it comes to building Sovereign Industrial Capability, so engaging with Australia's local supply chain is not a primary driver. Secondly, there has historically been little incentive for Primes to engage directly with the mid-tier businesses, which has contributed to an overall lack of sovereign capability over many years. These issues are beginning to improve with the Commonwealth's shift in focus towards Australian Industry Capability (AIC), but more can be done.

A significant portion of the Australian Defence supply chain offers low-tech products and services that, in isolation, do not represent appreciable capability. These products and services are typically provided on short-term contracts and return low margins.

Where Australian businesses have been successful in developing regionally superior capability, this has typically been through investment in people, processes, equipment, skills and time. By making these investments, innovative businesses realise increased value, develop intellectual property, and open up export markets.

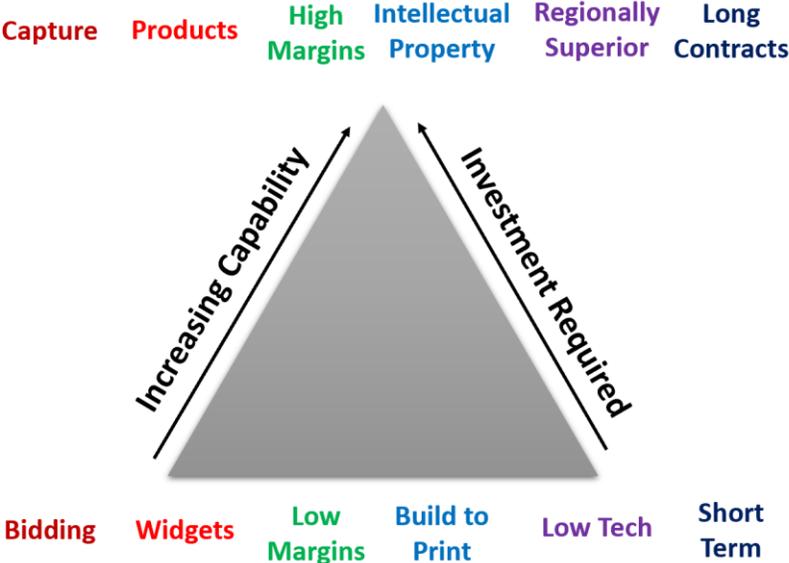


Figure 3 - The 'capability pyramid', showing the capability rewards associated with increased investment

Frustrations with the Request for Information Process

Small Medium Sized Enterprises (SMEs) are the predominant player within the Australian business landscape, with small businesses alone accounting for almost 98% of all Australian businesses and employing 44% of the Australian workforce [8].

Table 1: Business size measured by employment

Employees	Firm Count	%
0–19 (small)	2,259,098	97.7%
20–199 (medium)	50,338	2.2%
200+ (large)	3,855	0.2%
Total	2,313,291	100%

Source: ABS Counts of Australian Business 8165.0, Table 21 Feb 2019 and ASBFEO calculations (excludes nano businesses with no GST role)

This fact has not been lost on the Australian Government, who as part of its historic \$270 billion commitment to Defence Spending has identified that Small Medium Sized Enterprise's (SMEs) will play a major part in supporting the supply chains of the prime contractors in delivering many of Australia's major Defence projects [9].

Although there are many opportunities within the industry, feedback from SMEs is that the tender process with Primes is exhaustive and time consuming. Each Prime has their own set of questions and requirements for Requests for Information (RFIs), with no standardisation between them. Often, two Primes tendering for one major contract may request an RFI from the same subcontractor. The subcontractor must then go through an extensive process for both Primes, answering similar questions in completely different ways; often with a short timeframe for submission. This process is costly to business as it takes considerable time and effort from senior personnel within the organisation, with no guarantee of success.

Unfortunately, this often leads to RFI responses being answered quickly and lacking the detail required, whilst businesses with revenue streams outside of Defence are simply choosing not to respond at all.

Unfortunately, if companies consider the initial engagement process too

cumbersome and difficult, ultimately there will be less choice for the Australian Defence Force and the potential for higher costs [10].

“The Australian Defence market is one which is large enough to be taken seriously by global Defence primes, but small enough to be ignored if companies form the view that it is all too hard.” – Paul Barrett, ABC Journalist

In the July 2020 review of the Centre for Defence Industry Capability (CDIC) Final Report it is noted that, although CDIC prepares small businesses to work with Primes, the Primes themselves need to be prepared to engage with small business [8]. Accordingly, if the Commonwealth of Australia wants to maximise participation by SMEs and build capability, it needs to work towards mandating a more effective and consistent initial engagement process with Primes. This will, in turn, reduce costs for business meaning that more businesses will be willing to tender and be involved in the process, leading to more competition and choice for the Australian Defence Force.

Recommendations

Recommendation 1

Commonwealth must quantify sovereign industrial capabilities

From the research conducted in developing this concept paper, it is clear that there is significant confusion among businesses regarding Defence's sovereign industrial capability requirements. With smaller businesses generally focused on near-term profit objectives, such as ensuring that they have sufficient cashflow to pay staff, the prospect of accessing Defence contracts many years in the future can seem out of reach. It is little wonder, therefore, that interpreting complex strategic documents is a step too far for the smaller players in Australia's Defence supply chain.

Quantifying the sovereign industrial capability priorities (SICPs) is a way to provide what industry so desperately needs. Clear, quantified guidance on the capabilities that businesses need to develop and invest in to be able to achieve the SICPs is one of the keys to unlocking Defence supply chain opportunities, and thus balancing profit objectives of business.

The following examples indicate the type of clarification and quantification that the authors advocate:

- **People:** how many, what skills they need, where they are located now, where will we need them and when.
- **Capital equipment:** what equipment is needed—what requirements exist around acquiring and commissioning, cost, lead time.
- **Facilities:** size, requirements, security, climatic, power, foundations where, when, cost.
- **Processes & procedures:** intellectual property rights, special qualifications and certifications required, experience levels.
- **Tools:** jigs and fixtures and tooling requirements, ownership, management and through life support and storage of them.

-
- **Technology:** what specialised or emerging technology will or may be required.

Recommendation 2

Commonwealth must foster 'smart capability partnerships' within Defence industry

We define 'smart capability partnerships' as instances where businesses in Australia's Defence supply chain partner to provide capability to the ADF that they would be unable to deliver working alone. In smart capability partnerships the whole is greater than the sum of its parts.

Smart capability partnerships can be encouraged through a top-down approach, where mechanisms are put in place to force prime contractors to package work in such a way that mid-tier businesses are able to act as lower level system integrators, developing sovereign products. Therefore, we recommend that the Commonwealth mandates through its procurement contracts work to be packaged into strategic 'blocks' that can be handed down to the mid-tier.

From the bottom up, the low-tier businesses that are currently producing standalone components should act proactively by partnering with similar companies to develop systems rather than widgets. These systems, which will involve the development of sovereign intellectual property, will then support the efforts of the mid-tier further up the supply chain.

Both the top-down and bottom-up approach will help to spread profits from Primes to the lower levels. Given the high number of foreign-owned Primes in Australia, this spreading of profit will ensure that more capital is kept in-country; capital that is then available for re-investment in sovereign capability. This will encourage a self-reinforcing feedback loop of growth and capability development within Australia.

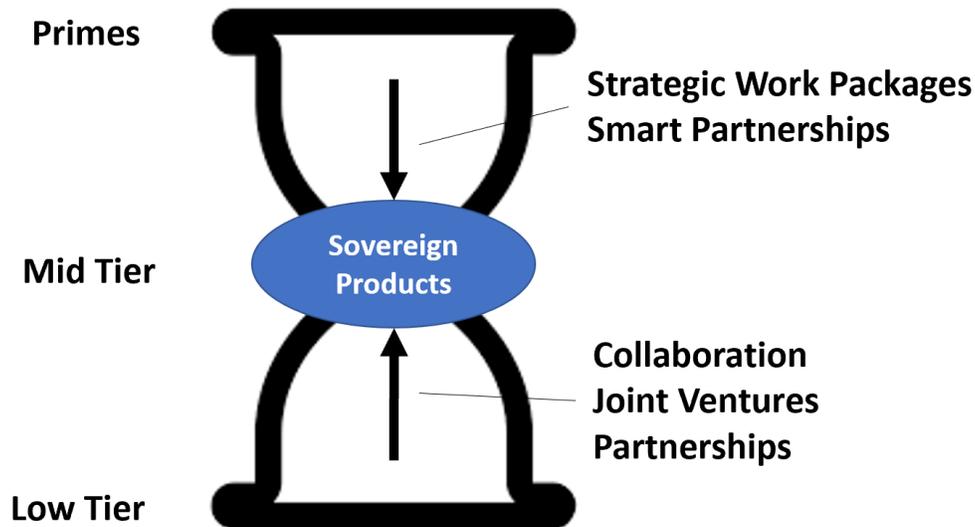


Figure 4 - Australia's 'hourglass' Defence supply chain, and the need to grow the mid-tier

Recommendation 3

Standardize the initial engagement process with Primes

To maximise participation in the Defence industry by Australian SMEs, our recommendation is for the Commonwealth to work collectively with the Primes and their procurement departments to standardise a list of questions to be used for all RFIs. This list would include each of the standard questions expected (e.g. turnover, headcount, capabilities, quality standards, processes, intellectual property etc.), but be in one consistent format. Primes would be engaged and consulted in the formulation process, and would have the option to exclude questions from their own requests template, but importantly would not be able to add questions that are not already on an approved list.

It is also recommended that the Commonwealth and Primes formulate a 'Gold Standard' template to give industry an understanding and appreciation of what level of detail is required when responding to an RFI. The development of a rating system could highlight those business that are best practice and those that might need more assistance from the Centre for Defence Industry Capability (CDIC).

Conclusion

This concept paper presents three recommendations to address the question of balancing profit of businesses against capability in a Defence Industry landscape:

- Firstly, there is a need for a quantifiable assessment of sovereign industrial capability so that Australian businesses can better understand how to develop capabilities that support Defence's needs.
- Secondly, smart partnerships within the Australian supply chain must be encouraged as a driving force to position mid-tier Australian businesses as systems integrators developing sovereign products – giving these businesses an opportunity to commercially export their products.
- Finally, the Commonwealth of Australia shall mandate a consistent, streamlined, and simple process for Defence prime contractors to collate RFI information from potential Australian suppliers.

The authors' recommendations tackle some barriers to entry, and benefit Australian businesses in reducing their operating costs, improving revenue streams, and effectively increasing profit.

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