Key points

The Naval Shipbuilding Program is the largest major capital acquisition program
that has ever been undertaken in Australia. The program is very ambitious and
carries significant risks – particularly for cost and schedule. Defence considers
workforce development to be the single largest risk to the success of the Naval
Shipbuilding Program.

Background

The four Australian built naval vessel programs comprise the core of the Naval Shipbuilding Program (12 *Attack* class submarines, nine *Hunter* class ASW frigates, 12 *Arafura* class offshore patrol vessels and 21 *Guardian* class patrol boats):

- The Guardian class Pacific Patrol Boat is in production by Austal Shipbuilding in WA with two vessels delivered.
- The Arafura class Off-Shore Patrol Vessel started production on schedule and is in production by Luerssen at the Osborne South Shipyard in South Australia with the first vessel in construction and the second due to commence in June 2019 ahead of schedule.
- The Attack class Submarine is a new design to meet unique Australian requirements. The program has completed Concept Design and moved into Definition Design which is primarily conducted in Cherbourg, France and supported by government staff in Cherbourg and Adelaide. Production design will transition to Australia in 22/23 with hull construction beginning late in 2023. All 12 submarines will be built in South Australia.
- The Hunter Class Anti-Submarine Warfare Frigate is early in design. The BAE
 Type 26, from which the Hunter class is derived, is in production in Glasgow.
 Hunter class staff located in Glasgow and Canberra are working with BAE
 design teams planning the changes which will invoke unique Australian frigate

Overview

requirements including the CEA Phased Array Radar and Aegis Weapons System. Production design will transition to Australia in 2022. All nine frigates will be built in Osborne, South Australia.

The Navy's new Auxiliary Oil Replenishment Ships are being constructed by Navantia in Spain. The lead ship is in the water and being fitted out with the second ship in construction. This program is within budget and on schedule.

Two shippards located at the Osborne Naval Precinct near Adelaide have been designed and are under construction. The destroyers and frigates will be built at Osborne South and the *Attack* class submarine at Osborne North.

The *Hunter* class frigates and the *Attack* class submarines are two of the most complex programs world-wide. The near simultaneous start of construction adds risk in workforce and program management.

Defence considers workforce development to be the single largest risk to the success of the Naval Shipbuilding Program.



The Product Life Management tools used in naval construction (Siemens for ships and Global 3D for submarines) bring the most advanced manufacturing and life cycle management capabilities to Australian heavy industry. Skills learned in shipbuilding – whether CAD/CAM design, cost effective manufacturing schedules or operating the most sophisticated welding and pipe-bending computer controlled machines – will naturally migrate to other manufacturing trades within Australia. These advantages also bring risks:

Overview

_	the near simultaneous development of two different digital shipyards (Siemens
	for Ships and Global 3D for submarines) will require careful coordination
	across programs and within two different companies. s33(a)(ii), s47C
s33	3(a)(ii)
33(a)(ii)	, s33(a)(iii), s34, s47C

Overview

s33(a)(ii), s33(a)(iii), s34, s47C

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s22

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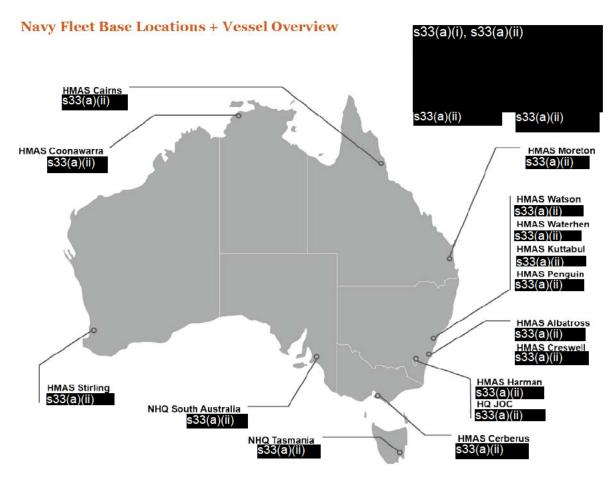
Key points

- Navy's top three priorities are:
 - providing ships and supporting capabilities to sustain Australia's increasing regional engagement, domestic operations, and be prepared for warfighting operations;
 - workforce retention and growth to provide the right people, at the right place,
 at the right time, with the right training, capable of sustainably operating our
 future force; and
 - capability assurance of our acquisition and sustainment programs to provide
 Australia the necessary maritime power in support of its strategic interests.

Background

Regional engagement focus







Navy workforce retention and growth

In a relatively calm and stable maritime environment, Navy's funded strength reduced by 30 per cent over the two decades from 1982 to 2002. Since that time, Navy's workforce has grown only modestly. \$\frac{533(a)(ii)}{2}\$

s33(a)(ii)

Service at sea in a ship or a submarine is fundamentally different to most professions. It requires technically competent, highly trained, fit and motivated people who are ready to go to sea and operate remotely – often without connectivity with loved ones for extended periods. \$\frac{\$\\$33(a)(ii)}{\$\}\$

s33(a)(ii), s47C

Submarine future proofing

Submarines in particular are an essential part of Australia's naval capability, providing a strategic advantage in terms of surveillance and protection of our maritime zones and approaches achieved through their unique properties of stealth, range, endurance and lethality.

Australia's current submarine capability is provided by the Collins class fleet managed through an enterprise approach (together with Navy, Capability, Acquisition and Sustainment Group, and industry) of their upkeep, upgrade and update programs. A Collins Class Life of Type extension program will ensure that no capability gap exists as we transition to the Attack class submarine. The Attack

class submarine design and delivery schedule is aligned to Australia's strategic requirement for a regionally superior submarine capability, and supports a coherent transition from the existing Collins class capability. s34, s47C

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IN CONFIDENCE: Sensitive Cabinet

Economic Boost for WA Economy with new naval commitment

Proposal

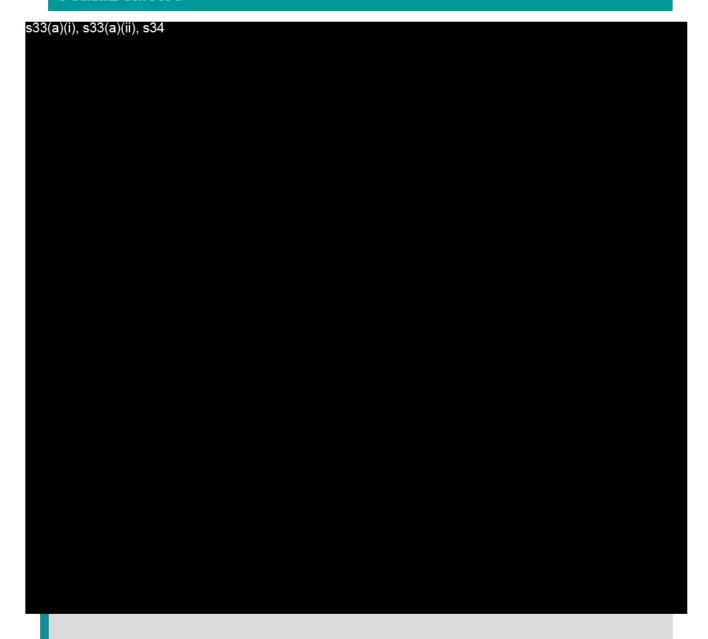
A re-elected Government will invest up to \$1 billion to increase defence capabilities by building three naval vessels in Henderson, Western Australia – two mine warfare support vessels to replace the Huon-class mine hunter vessels, and a hydrographic military survey vessel. This proposal will retain and provide certainty to around 1,000 WA-based shipbuilding jobs.

Source: Coalition Media Release, *Boost for WA economy and jobs with naval* commitment, of 29 April 2019 (re-announcements from previous decisions)



IN CONFIDENCE: Sensitive Cabinet

Economic Boost for WA Economy with new naval commitment



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