Land Systems Division (LSD) acquires and sustains land materiel for the Australian Defence Force.
Location:
A total of ~1100 APS and ADF based in Melbourne (Victoria Barracks, Defence Plaza, Laverton North and Monegeetta)

FY2016/17 Acquisition Budget:
22 Acquisition Projects with a total FY16/17 budget of $1.390 billion

Unapproved Projects – Estimated Total Acquisition Value:
12 Unapproved Projects with a total value exceeding $20 billion

FY2016/17 Sustainment Budget:
28 Sustainment Products with a total FY16/17 budget of $719 million (including Operations funding of $41 million)
Land Systems Division - Goals

1. Acquire and sustain land materiel for the Army, Navy and Air Force
2. Implement First Principles Review recommendations
3. Enhance our relationships with Government and key stakeholders
4. Focus our partnerships with Industry to maximise delivery of land capability
5. Be accountable and transparent. LSD provides complete advice to fully inform our key stakeholders
6. Develop a Culture where a professional, diverse and highly capable workforce thrives
7. Deliver a safe and healthy work environment
CASG Reforms Underway

Restructure of CASG into a **Balanced Matrix**

- Delivery teams focus on meeting Capability Manager’s expectations
- Functions ensure that the right people with the right skills are provided at the right time
- Delivery team (what/when) – within Systems Divisions
- Function (who/how) – members of Centres of Expertise
- Referred to as ‘balanced matrix’ because both have an equal role
The **Smart Buyer** reform includes a decision-making framework that provides more flexibility in how Defence acquires equipment and services and improves the relationship between Defence and Industry.

- it supports project managers in developing tailored approvals, project management, acquisition and sustainment strategies based on a thorough analysis of a project’s risks.

- will have the agility to refine strategies as new information becomes available and use industry best practice to strike the optimum balance between performance, time and cost.
INTEGRATED SOLDIER SYSTEMS
Integrated Soldier Systems Branch (ISSB) comprises five SPOs responsible for:

- **Armaments** – Small Arms and Direct Fire Support Weapons
- **ADF clothing** – Combat and Non-Combat
- **Soldier Modernisation** – Body Armour, Load Carriage, Field Equipment, Chemical Biological Radiological and Nuclear Defence, Aerial Delivery Equipment
- **Health Systems** – Pharmaceuticals, Medical and Dental Equipment, Combat Rations
- **Diggerworks** – Future Soldier Systems Development, Configuration and Integration

**Key Projects**

- Land 40 Phase 2 Direct Fire Support Weapons ($150-200m)
- Land 53 Phase 1BR NINOX Night Fighting Equipment - Technology Refresh ($300-500m)
- Land 125 Phase 3C Soldier Systems Integration – Lethality ($400-500m)
- Land 125 Phase 3B Soldier Enhancement – Survivability ($150-200m)
- Land 125 Phase 4 Soldier Systems Integration – version 3 ($500-1000m)
- Land 2110 Phase 1B Chemical, Biological, Radiological and Nuclear Defence ($200-300m)
- Land 3025 Phase 1 Deployable Incident Response Regiment Capability ($25-50m)
- Land 3025 Phase 2 Deployable Incident Response Regiment Capability
- JP 2060 Phase 3 Deployable Health ($250-400m)
Initiatives

- Defence Industry Forums
- Prime Vendors
  - Non Combat Clothing
  - Health Pharmaceuticals
  - Health Medical / Dental Consumables
  - Ration Packs
  - Armaments
  - Future – Soldier Combat Ensemble / CBRN / Deployable Health
- Adaptive Acquisition

Challenges

- Large Number of Small to Medium Enterprises
- Industry Capacity and Capability
- Number of Industry Supply Agents representing Overseas OEM

Key Messages

- Early Engagement of Industry
- Transparency in the way we work
- Educate and then work with Industry
- Performance Based Contracting
  - Guarantee Cash flow
  - Enduring contracts extension
- Significant Media / Ministerial Scrutiny
Land Vehicle Systems Branch is responsible for sustaining Defence’s general service vehicles (green fleet) and commercial vehicles (white fleet) and acquiring and delivering the next generation of field vehicles, modules and trailers to the ADF under the multi-phased program LAND 121 (Overlander).

Key Projects

- LAND 121 Phase 3A  Lightweight and Light Vehicles and Trailers ($1.0bn)
- LAND 121 Phase 3B  Medium and Heavy Vehicles and Trailers  ($3.4bn)
- LAND 121 Phase 4  Protected Mobility Vehicles – Light ($2.0bn)
- LAND 121 Phase 5B  Medium and Heavy Vehicles and Trailers ($1.0bn - $2.0bn)
- JP157 Phase 1  National Support Base Aviation Refuelling Vehicles ($67m)
**Initiatives**

- Increased use of OEMs for key equipment support through strategic agreements
- Vehicle/Inventory Rationalisation
- Use of Whole of Australian Government (WoAG) agreements for ‘Smart Buying’ of commercial vehicles.

**Challenges**

- Ageing fleets need to be sustained until new capability arrives
- Various integrated logistics support models need to be standardised
- Smart Sustainment initiatives continue to be implemented

**Key Messages**

- WoAG procurement saves time and money – but tolerance for risk required.
- Industry best-practice innovations are to be thoroughly explored – eg: Business to Business synergy
- Industry should be involved early in project and contract management
Land Manoeuvre Systems Branch (LMSB) comprises four SPOs responsible for:

- Mounted Combat (tank, M113, ASLAV and Bushmaster)
- Combat Support Vehicles (Plant eqpt, bulk fuel, fire fighting, special ops vehicles)
- Combat Support (artillery, air defence systems, radars, simulation)
- General Support (tents, generators, shelter, general commodities)

**Key Projects**

- LAND 19 Phase 7A  C-RAM ($150–300m)
- LAND 116 Phase 3  Bushranger ($1000–1500m)
- LAND 17 Phase 1C1  Additional Lightweight Towed Howitzers ($150–300m)
- LAND 136 Phase 1  Land Force Mortar Replacement ($50–100m)
- LAND 907 Phase 1  Main Battle Tank Replacement ($750m-$1b)
- LAND 998 Phase 1  Replacement Aviation Fire Trucks ($50-100m)
- LAND 155 Phase 1  Enhanced Gap Crossing Capability ($150-300m)
- JP 2097 Phase 1B  Enhancements to Special Operations ($300-500m)
Emerging Projects

- LAND 19 Phase 7B: Short Range Ground Based Air and Missile Defence Enhancements or Replacement ($1.5n-$2b)
- LAND 907 Phase 2: Maine Battle Tank Upgrade ($750m-$1b)
- LAND 8120 Phase 1: Engineer Support Platforms ($200-$300m)
- LAND 8140 Phase 1-3: Deployable Force Infrastructure ($300-$400m)
- LAND 17 Phase 2: Digital Terminal Control System – CAP ($100-$300m)
- LAND 8160 Phase 1: Enhanced Gap Crossing Capability Program (Assault Crossing and Breaching) ($1b-$2b)
**Initiatives**

- PMV Modernisation/Baseline:
  - Vehicle kits
  - Armour
  - APU
  - RWS
- Commodity Reform Program
- Managing Contractor – LAND 155
- Performance Based Contract – PMV
- Life of Type Management Planning for A Vehicles

**Challenges**

- Breadth of materiel:
  - Platforms/systems/commodities
- Ageing Fleets
- First Principles Review Transformation
- Digitisation for Indirect Fires and Platform integration

**Key Messages**

- Close collaboration with key industry partners
- Listen to Industry and incorporate their feedback.
- Performance Based Contracting:
  - Guarantee cash flow
  - Value enduring contracts extension
COMBINED
ARMS FIGHTING SYSTEM
Combined Arms Fighting System (CAFS) manages LAND 400

- LAND 400 will acquire the armoured fighting vehicles systems to deliver the mounted close combat capability to the Land Force.

LAND 400 – Land Combat Vehicle System

- Phase 1: Project Scoping Study (complete)
- Phase 2: Mounted Combat Reconnaissance Capability (ASLAV replacement) ($4b-5b Acquisition)
- Phase 3: Mounted Close Combat Capability (M113 replacement) ($10b-15b Acquisition)
- Phase 4: Integrated Training System ($400m-500m)
• Phase 2:
  
  • BAES AMV and Rheinmetall Boxer have been selected for evaluation in the Phase 2 Risk Mitigation Activity.

  • Risk Mitigation Activities (2016-2017) comprising:
    • Test and Evaluation Activities
    • Improvement of AIC opportunities
    • Cost/Capability tradeoff analysis

  • Government Second Pass Consideration (2018)

  • Contract Signature (2018) - The 2016 Integrated Investment Program (IIP) identifies the acquisition cost as $4b-5b
• **Phase 3:**
  - RFI evaluation complete (debrief opportunities during Land Forces 2016)
  - Program Timeframe of 2019-2032
  - The 2016 IIP identifies the acquisition cost as $10b-15b

• **Phase 4. The 2016 IIP identifies:**
  - Program Timeframe of 2023-2032
  - Acquisition cost as $400m-500m
  - Architecture / framework being established in 2016
Initiatives

- LAND 400 Industry Portal, regular Industry briefings through a wide range of forums (ASPI, Land Environment Working Group etc).
- Dedicated website for direct communication.
- Engagement with Industry bodies (AIDN, ICN) and State Government Industry bodies.
- Independent review of Phase 2 RMA All activities.
- Deloitte
  - ‘Strong and clear alignment’
  - RMA enhancements
- AIC Roadmap has been delivered by BAES and Rheinmetall.

Challenges

- Optimising Australian Industry involvement.
- Managing expectations in a fluid/changing environment.

Key Messages

- L400-2 RFT progressing – Stage 2 Risk Mitigation Activities (RMA) concludes 18 Aug 17.
- Listening to Industry and incorporating their feedback.
- Fairness and openness with Industry.
- Early engagement - tell Industry what is going on in a timely manner.
- Deloitte Review of RMA All activities publicly released by MDIND on 28 Jul 16.
- In 2016, Defence facilitated highly successful, industry showcase workshops, and 377 Australian and New Zealand companies attended.
LEA’s primary role is to provide engineering resources and capability to support project and sustainment activities within the System Program Offices (SPOs) of Land Systems Division.

LEA does this by providing systems, processes and physical capability to ensure compliance with the Army Technical Regulatory Framework to ensure that equipment is:

- Fit for service
- Safe to operate
- Environmentally compliant
At a glance:

- ‘Outposted’ model – Direct support to Projects & Sustainment in LSD Branches
- 7 Directorates – (~153 core staff & ~340 outposted) - Includes 248 engineers and 245 technical staff
- Providing engineering capabilities
  - Design
  - Testing
  - Prototyping
  - Configuration Management
  - Drafting
  - Specialist Engineering
• DSEI provides wide ranging engineering support to LSD System Program Offices in niche technologies and capabilities that are more efficiently delivered from a centralised model.

• DSEI provides services across LSD in Configuration Management, Drafting and Specialist Engineering including Safety, Integration, Reliability and Maintainability, Survivability, Electronic Warfare and Communications.
Directorate Systems Engineering and Integration (DSEI)

- Optics
- Electrical Power
- Software
- Survivability
- Mobility
- Electronics/Communications/EW
- RAM
- 3D Modelling
- Engineering Analysis/Simulation
- Configuration Management
- Human Factors
Land Engineering Agency Test Capability -
LEA Proving Ground Monegeetta

- The test capability includes vehicle performance and endurance testing, Electromagnetic Interference and Compatibility, Electro-Optics and Thermal Imaging Testing, Climatic Testing, Mechanical testing, Weapons testing, Field Data Acquisition and High Speed Video in support of blast testing.
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