The Modernisation of the RNZN ANZAC Frigate

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New Zealand

- 4.4 Million
- 15,000 km coastline
- 267,000 km² land area
- 4.4 million km² EEZ (5th largest at 15 x land area)
- 85% of exports by value go by sea
- $4 billion Fisheries Quota Value
The RNZN ANZAC Ship

- Why
- How
- What
History

• Joint Australian/NZ programme
  • MEKO 200 variant

• 10 ships procured, 8 Aus, 2 NZ
  • Design freeze 1992
  • TE KAHA commissioned Jul 97
  • TE MANA commissioned Dec 99

• Now mid-life
Minor Capital Upgrades

- CIWS – Leanders to ANZACs
- C4I Upgrades
  - National Network Infrastructure
  - Allied and Coalition Interoperability
  - Reachback Satcom
- Optronics
- Force Protection
CIWS 1B Upgrade

- 10 year Refurbishment
- 1A ASMD Upgrade
- 1B to enhance Force Protection
- Staged roll out.
Platform Systems Upgrade

- PDE’s due major overhaul
- HVAC system unable to cope with severe tropical conditions
- Reserve damage stability margin low
- Usage profile costly in GT hours
- Control and Monitoring system obsolete
- Personnel levels and training unsustainable.
PSU Solution

- Upgrade MTU 1163 TB 83 to TE 93 spec – 3.5 – 4.2 MW
- Replace AC plants and move combat system fully to chilled water
- Change Arrangement aft providing additional stability
- Replace C&M with IPMS and IBS.
ANZAC Frigate System Upgrade – Why?

- Obsolescence
- Change in Operating Environment
- Large training overhead
- Complex electromagnetic environment
- Complex support issues
- Threat emergence
- Deficiencies with original system
Conceptual Design
Replacement Naval Helicopter
QUESTIONS?