

Auckland Electric Trains

7th November 2013

T A Salt. EMU Project Director



An Auckland Council Organisation

www.aucklandtransport.govt.nz

Introduction

- EMU Project
 - Overview of the Project
 - Project Delivery
 - Enablers
 - Risk and Risk Management





The Train







Project Overview

- Construcionnes Y Auxiliar Ferrocarriles (CAF) are contracted to:
 - Design, Manufacture and Supply 57 three car Electric Trains
 - Maintain those trains for 12 years
 - Supply 2 Driver Training Simulators
- Contract, signed 4 October 2011, value US\$300m (NZD417m)
- First train due end August 2013, last train due July 2015
- First service operation April 2014, complete service July 2015





Project History

- In Nov 2009, the Minister of Transport invited KiwiRail to procure electric trains for Auckland, working jointly with ARTA and NZTA
- Cabinet approved an appropriation of NZ\$500m for the Electric Trains and a new Depot
- KiwiRail established a procurement team which was jointly governed by KiwiRail and ARTA. The team commenced work in January 2010
- Contract Documentation and Specifications were produced and the RFT for the Electric Trains was issued in September 2010
- Bids were received in January 2011, a shortlist agreed in May 2011 and preferred tenderer identified in August 2011





Project History

 Auckland Transport assumed the management and governance of the EMU Procurement and Depot Construction from KiwiRail, prior to signing of the contract with CAF (4 October 2011)





Project Timeline

- Kiwirail invited to procure the trains
 Octob
- Project Team formed
- Expressions of Interest
- RFT Issued
- Tenders Received
- Request for BAFO
- BAFO Received
- Contract Award

October 2010 December 2010 May 2010 September 2010 January 2011 June 2011

July 2011

October 2011





Project Phases

Contract Award 4/10/11 4/10/11 - 4/10/12 12 months to complete design 9 months to build and test 1/9/12 - 30/6/13 2 months to ship 1/7/13 to 1/9/13 3 months to commission and test 1/9/13 to 30/12/13 1st train handed to AT 14/01/14 57th train handed to AT 30/07/15 Supply Contract Completion 30/07/15





Project Delivery

Challenges

- Timescale
- Fixed Budget
- Expectations
- Skills shortage
- Stakeholders
- Step 1: Understand what is most important; time, cost or quality
- Step 2: Set appropriate budget
- Step 3: Engage, be realistic, be firm
- Step 4: Pay
- Step 5: Engage





Key Enablers

- Small focussed experienced core team
- Empowerment and Support
- Clarity of what, when and how
- Definition of and Engagement with Stakeholders
- Relationships and way of working
- Understand motivations
- Have common goals





Risk Identification

- Risk is:
 - o Necessary
 - o Inevitable
 - o Manageable
- Differentiate between Project Risk and Technical Risk
- Spend the time and effort up front to identify the key risks
- Bring knowledge and experience into risk identification process
- Involve all parties
- Achieve mitigations inherently through process
- Ensure the responsibility for managing risk lies with those most able to do so.





Key Risk Mitigations for This Project

- Started with a robust contract
- Performance Specification
- Use of international standards and processes
- Use of standard proven technology
- Use of established supplier and sub suppliers
- Highly experienced Project Team
- AT presence in Spain
- Independent Verification and Validation contract (IV&V)





Mindset and Approach

- Recognise that the contract is a partnership
- Establish relationships
- Agree common goals
- Be prepared to flex requirements
 - Understand what mattered and what didn't
- Be decisive
- Proactively identify and help to solve contractors problems
- Always be alert to changes in risk profile





What did we achieve

- Placed order 4th October 2011
- First train delivered on the 28th August 2013
- Achieved full speed running on the mainline on the 6th October
- No battles, no dramas, no claims.





THANK YOU



