





NEC Compliance Management

Innovation – Use of NEC Contracts and Supporting

Systems for MAP Projects

Introductions



James Woods

James is the NEC procurement specialist for Meridian Energy and head the MaP procurement
 and contractor relations – he led the team in the implementation of Conject to Support NEC

Jon Marshall

 Jon is the regional general manager for Conject Pacific. The company is a subsidiary of UK based Conject which is one of the largest supplier of compliance management software to construction projects in the world

Conject

- Conject Project Compliance (c-PC) full suite of compliance modules contract/cost are key
- Conject Facilities Management (c-FM) complete management of FM supply chain
- Conject Project Management (c-PM) pure document collaboration

Overview – NEC and Meridian



Overview

- Meridian has been using the NEC suite of contracts to deliver major refurbishment projects since the early 2000s.
- Markets and Production (MaP) is the business unit of Meridian responsible for electricity generation, plant maintenance and wholesale electricity market sales.
- Meridian is also using NEC contracts for the construction of both the Mt Mercer
 (AU\$200M+ Victoria) and Mill Creek (NZ\$169M Wellington) wind farms.



Mt. Mercer wind farm (currently under construction)

AU\$200M+ (2 NEC contracts)



Why Meridian choose NEC3?

- Suite of aligned contracts we use the entire suite for integrated project delivery
- Collaborative contract both parties working together for defined project outcomes
- Pro-active risk management early warning of potential issues
- Effective process for dealing with change structured process to follow with clear responsibilities and timeframes



Promotes good practice management

Manapouri powerhouse ventilation upgrade

(currently underway) NZ\$10M+

(3 NEC contracts)

Pre System the Before



Contract Management before a system

- Number of spreadsheets to manage communications
- Contractual communications created in MS Word and e-mailed to contractors
- Inconsistent approach to contractual management
- Challenge to monitor timeframes
- Lack of document tracking and association

Waitaki Refurbishment (currently underway)
(NZ\$45M – 40+ separate NEC contracts)

Overview – Compliance Functions



Contract Control

- Managing all contractual communications across the supply chain
- Managing NEC SC, PSC, ECC, ECS
- Application of formal Communications Process
- Reporting
- Document Compliance design approval process and construction drawings

Compliance Key Principles

- Manage the large amounts of data created during the project avoid dependence on PDF and email
- Drive Accountability/Prioritisation all project members know their next step and when they have to take it
- Drive visibility ensure client/consultants/contractors have visibility across the supply chain of what
 is or what is not happening
- Drive Auditability ensure drill down though the change decision process and provide a complete
 "as-built" of project change communications in a central repository
- Drive Reporting data forms allow a lot of in project and cross project programme level reports to be created

Post System the After



- Management System:
 - Reduced the time spent manually managing document control
 - One place for contract documentation
 - Tracks workflow and timeframes and displays this on dashboard
 - Visibility and association of documents through the NEC3 process
 - Varying rights of access depending on role and company

(JM) Lessons



Lessons for systemising NEC compliance

- Understand the contract environment
- Document the scope ensure all parties understand the process for design and approval during the document design phase
- IT get all IT parties involved early at both Meridian and Consultants as IT firewalls have created performance issues (SaaS versus Local installs)
- Partners we didn't do a good job of engaging partners or explaining what we wanted to achieve
- Train up Super users investment for the future
- Client investment in training its Supply Chain Partners

Expected Benefits



Reduce Cost

- Reduce disputes and analysis of change on the project
- Reduce inaccuracy of drawings and contractual communications through visibility
 and auditability
- Reduce misunderstood, lost communications through accountability
- Reduce delay through prioritisation and early notice of potential change/risk

Improve Outcomes and Analysis

- Eliminate attaching documents to email so ensuring all change communications are accessible and reportable
- Ensure cost data is readily available and monitored including expected and agreed cost changes
- Reduce or eliminate disputes

Questions



