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POWERLINK QUEENSLAND REVENUE PROPOSAL

Supporting Document – PUBLIC

Value Driven Maintenance - Procedure

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Value Driven Maintenance – Procedure

Policy stream	Asset Management	
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Version history

Version	Date	Section(s)	Summary of amendment
1.0	16/10/2020	All	Original Powerlink version.



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1. Introduction

1.1 Purpose

The purpose of this Procedure is to create context and overview of Powerlink's use of Value Driven Maintenance (VDM) to optimise maintenance costs while taking into account health, safety and environmental requirements balancing against the risk in line with Powerlink's Asset Management Strategy.

1.2 Scope

The scope of this procedure is focused on Stage 2 of the Asset Management Strategy – Operation, Maintenance and Refurbishment, particularly the maintenance aspects.

In a de-centralised Asset Management model, the VDM methodology reaches across a number of areas of the business including Strategy and Business Development (SBD), People and Corporate Services (PCS) and Operations and Service Delivery (OSD).

The Value Driven Maintenance process is in Appendix E.

1.3 References

Document code	Document title
A9829262	Asset Management Policy
A969433	Asset Management Strategy
A537590	Transmission Line Asset Methodology Framework
A542372	Substation Asset Methodology Framework
A968358	Land Asset Methodology Framework
A968388	HV Underground Cable Plant Methodology Framework
A2287198	Digital Asset Management Framework
A2338088	Joint Planning Framework
A588431	Asset End of Life
A1055515	Asset Maintenance
A515409	Asset Refurbishment
A2417558	Asset Risk Management Framework
A2720172	Health, Safety and Environment Policy

1.4 Defined terms

Terms	Definition
VDM – Value Driven Maintenance	The optimisation of maintenance costs while taking into account health, safety and environmental requirements balancing against risk.

1.5 Roles and responsibilities

Who	What
Manager Asset Strategies	Responsibility for initial assessment of VDM opportunities.
General Manager Asset Strategy and Planning	Responsibility for maintaining currency of Procedure. Responsibility for validating VDM opportunity for further investigation and consultation.
Manager Technical Services	Responsibility for assessing Asset risk to proposed changes.
Manager Network Performance	Responsibility for assessing Network risk to proposed changes.
Manager Employee Relations	Responsibility for Union engagement and advice to consultation approach.
General Manager Service and Supply Partners	Responsibility for deploying agreed strategy changes with service delivery stakeholders and financial impact. Approve Implementation Plan.
General Manager Health Safety and Environment	Responsibility for assessing Health Safety Environment risk to proposed changes.

1.6 Monitoring and compliance

- Quarterly Review of the VDM Progress through reporting and meetings on the target and KPIs.
- Annual reporting to publish VDM outcomes.

1.7 Risk management

There is an inherent risk to VDM process if steps are not undertaken as per guidelines. This risk is mitigated by implementing quarterly monitoring.

1.8 Deliverables

- Value Driven Maintenance Change Recommendation.
- Risk assessment.
- Resource impact investigation.
- Financial impact assessment.
- Maintenance plan and scheduling assessment.
- Implementation plan.

2. Procedure

2.1 Identify VDM Opportunities

With the aim of ensuring maintenance activities across Powerlink's Transmission Network are undertaken efficiently, teams or individuals across the business can make suggestions on improvements to maintenance strategies at any time. Efficiency suggestions should be sent to the Asset Strategy team for consideration. Suggestions are made in addition to the ongoing review and continuous improvement the Asset Strategy team considers for Powerlink's overall maintenance strategy.

Asset Strategies will maintain Powerlink's Value Profile Matrix with the inclusion of suggestions made from across the business (Appendix A).

Key artefacts: Organisation wide Value Profile Matrix

2.2 Preliminary Assessment of VDM Opportunity Identified

On identification of an improvement opportunity, the appropriate Asset Strategy Team Leader will undertake a Maintenance Strategy Optimisation Assessment of the proposed change to confirm there is merit to explore further and in more detail as it progresses through the following phases.

Key artefacts: VDM Assessment Form commenced with before and after high level assessment (Appendix B).

2.3 Detailed Assessment to validate Efficiency

The first phase of this validation step includes obtaining preliminary feedback from key stakeholders on the proposed change to gauge their high level feedback prior to progressing to a detailed assessment and broader consultation.

Asset Strategies to initiate a detailed assessment giving consideration to network risk, resources and financial impacts. The following inputs are to be gathered during the assessment:

Responsible Person to provide input to Assessment	Tasks
Field Delivery (Works Delivery Manager)	Assess the resource impact from Powerlink's field delivery perspective over the next 10 years (how many more, fewer resources will be needed? Do we need to have different skills, training etc.?)
Service and Supply Partners (Maintenance Services Manager)	Assess the resource impact from a Service Provider perspective over the next 10 years (how many more, fewer resources will be needed? Do we need to have different skills, training etc.?)
Financial Analyst	Assess the financial impact for the next 10 years (how much increase, decrease in WU's and actual cost for each region)
Technical Services	Assess the impact of the change from a maintenance plan and scheduling (alignment with other works) point of view. Assess and quantify what the level of asset risk is as result of proposed change.

A change manager is required to support the development of a stakeholder complexity assessment, a consultation and communication plan to drive engagement with respective stakeholders on the benefits of the change and identify potential risks and any proposed people impacts.



Asset Strategies to appoint a convenor, or Project Manager where multiple opportunities are running in parallel, to oversee the benefit assessment including resources and financial, risk review, stakeholder engagement and facilitating the decision point whether to progress.

Key artefacts:

VDM Assessment Form completed including before and after high level assessment, scope, assumptions, stakeholder assessment, consultation and communication plan, efficiency forecast and high level approach to implementation.

When progressing with a change, a recommendation paper (Appendix C) is forwarded to the General Manager Asset Strategies and Planning to approve the strategy amendment.

2.4 Update Strategy to Reflect Changes

Based on approval from the General Manager Asset Strategies and Planning in step 3 (above) progress with updating the respective Asset Management strategy.

Key artefacts:

VDM Assessment Form updated with the final before and after position ready for inclusion to update respective strategy.

Updated asset strategy reflective of changes explored and justified through step 3.

2.5 Implementation of Strategy Changes

On receipt of updated asset strategy, Operations and Service Delivery to update respective Maintenance Plans and associated schedules and develop an Implementation Plan to roll out and embed the changes throughout the delivery areas of the business impacted by the change.

Update controlled documents as required to reflect Asset Strategy changes within procedures, processes and work instructions.

Operations and Service Delivery will monitor the effectiveness of the change

Key Artefacts:

VDM Implementation Plan per asset task being changed; consolidated plan where multiple actions are released in close proximity (Appendix D).

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3. Distribution list

Divisional Distribution	Contact details
Chief Executive	N/A
Delivery and Technical Solutions	N/A
Finance and Governance	Finance Strategy and Services
Operations and Service Delivery	Service Supply Partners Technical and Network Solutions Network Operations Field Delivery
People and Corporate Services	Health Safety & Environment
Strategy & Business Development	Asset Strategies and Planning
Group/Team Distribution	Contact details
Service & Supply Partners	General Manager Service Supply Partners
Technical and Network Solutions	General Manager Technical and Network Solutions
Network Operations	General Manager Network Operations
Field Delivery	General Manager Field Delivery
Health Safety and Environment	General Manager Health Safety & Environment
Asset Strategies and Planning	General Manager Asset Strategy and Planning
Finance Strategy and Services	General Manager Finance Controller
External Distribution	Contact details
N/A	N/A





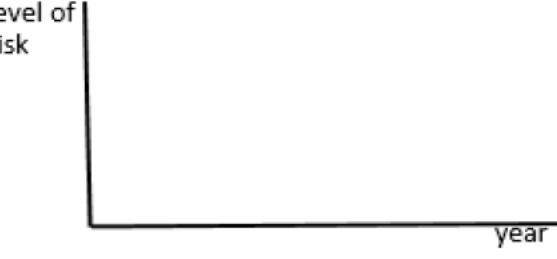
Appendix A. Value Profile Matrix

Proposed Change (What is the current strategy / task/ action and what is the proposed change?)	Value (What benefits the proposed change will provide?)	Risk (Level of qualitative risk based on proposed change – please use corporate risk matrix)



Appendix B. Value Driven Maintenance Assessment Form

Please use “TNS Change Template” (example is done for “Civil Maintenance Plan Frequency Change”)

Required information as result of changed strategy	Format
Resource impact	 <p>A graph with a vertical axis labeled "# of FTE" and a horizontal axis labeled "year". The vertical axis has a tick mark at the top, and the horizontal axis has a tick mark at the right. A vertical line descends from the top tick mark, and a horizontal line extends from the bottom of that vertical line to the right tick mark, forming an L-shape.</p>
Financial impact	 <p>A graph with a vertical axis labeled "Work Unit" and a horizontal axis labeled "year". The vertical axis has a tick mark at the top, and the horizontal axis has a tick mark at the right. A vertical line descends from the top tick mark, and a horizontal line extends from the bottom of that vertical line to the right tick mark, forming an L-shape.</p>
Risk Impact	 <p>A graph with a vertical axis labeled "Level of Risk" and a horizontal axis labeled "year". The vertical axis has a tick mark at the top, and the horizontal axis has a tick mark at the right. A vertical line descends from the top tick mark, and a horizontal line extends from the bottom of that vertical line to the right tick mark, forming an L-shape.</p>

Appendix C. Value Driven Maintenance Change Recommendation Template

TITLE	Change Recommendation for xxxxxxx
1- Executive Summary	High level summary of the proposed change by explaining the current state and the outcome of the recommended change.
2- Background	The reasons for the change and any internal and/or external works done related to the change.
3- Assessment of the change	How this proposed change has been assessed, any referencing documents, what does it mean for the organisation and why the proposed change should be implemented.
4- Description of the change	Explain in detail what the change is and how it will be implemented with expected benefits.
5- Conclusion	Summarise all findings and assessment results with recommendations on the how to proceed.



Appendix D. Value Driven Maintenance Implementation Plan

Please refer to Powerlink Change Management Framework.

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Appendix E. Value Driven Maintenance Process

