

Approved Signalling Items for the ARTC Network

ESA-00-01

Applicability

ARTC Network Wide

Publication Requirement

Internal / External

Primary Source

Existing ARTC Type Approvals

Document Status

Version #	Date Reviewed	Prepared by	Endorsed	Approved
1.10	12 Oct 25	Engineering Services	Principal Signalling Engineer	Manager Engineering Services 14/10/2025

Amendment Record

Amendment Version #	Date Reviewed	Clause	Description of Amendment
1.0	23 Mar 20		First issue of catalogue that lists signalling items and communication items related to signalling systems approved for use on the ARTC network.
1.1	26 Jun 20		New approved items added based on type approval and compliance to ARTC specification
1.2	24 Nov 20		New approved items added based on type approval and compliance to ARTC specification
1.3	03 May 21	2.2, 2.7, 2.9, 2.11	Included Victron solar products, Mors Smitt relays, ATMS antenna and router

© Australian Rail Track Corporation Limited (ARTC)

Disclaimer

This document has been prepared by ARTC for internal use and may not be relied on by any other party without ARTC's prior written consent. Use of this document shall be subject to the terms of the relevant contract with ARTC.

ARTC and its employees shall have no liability to unauthorised users of the information for any loss, damage, cost or expense incurred or arising by reason of an unauthorised user using or relying upon the information in this document, whether caused by error, negligence, omission or misrepresentation in this document.

This document is uncontrolled when printed.

Authorised users of this document should visit ARTC's extranet (www.artc.com.au) to access the latest version of this document.

Table of Contents

1.4	05 Oct 21	2.2, 2.4, 2.5, 2.9, 2.11, 2.15	Included approval for TufDuct, Elsema, Westermo RT320 and other minor changes.
1.5	27 Jul 22	2.3, 2.4, 2.7, 2.8, 2.9, 2.10, 2.11	Included approval for TPWS, Micronome relay, various solar products, and other items since last update of this document.
1.6	24 Apr 23	2.1, 2.2, 2.3, 2.4, 2.5, 2.7, 2.9, 2.11, 2.12, 2.15	Included the approval for IPITC, various solar products, and other items since the last update of this document.
1.7	04 Feb 24	2.1, 2.2, 2.8, 2.9, 2.10, 2.11	Included the approval for Aldridge signal modules, Schaefer Power supply, Kingfisher Telemetry, TMACS and other items since the last update of this document
1.8	July 24	2.2, 2.4, 2.5, 2.9, 2.12, 2.13	Included the approval of 4G Antenna , Aldridge Axle Counter Reset Box, Weidmuller Terminals and other items since the last update of this document
1.9	19 Dec 24	2.1, 2.2, 2.3, 2.9, 2.10	Updated TMACS approval for 4Track, UGL Signals and other items since the last update.
1.10	Oct 25	2.1, 2.4, 2.8, 2.9, 2.10	Updated Frauscher, Aldridge signal moule, battery charger and other items since the last update.

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

Table of Contents

Table of Contents	3
1 Introduction.....	4
1.1 Purpose	4
1.2 Scope	4
1.3 Document Owner	4
1.4 Reference Documents	4
2 Categories	5
2.1 Signals.....	5
2.2 Communication items related to signalling system	18
2.3 Points	27
2.4 Train Detection	43
2.5 Level Crossing Equipment	53
2.6 Interlocking	57
2.7 Relays	59
2.8 Surge Protection Equipment	70
2.9 Power Supply Equipment.....	79
2.10 Batteries	100
2.11 Train Authority Systems and Train Order Systems.....	112
2.12 Cables	116
2.13 Trackside Equipment	118
2.14 Rail Connection	134
2.15 Cable Route	139
2.16 Enclosures.....	153

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

1 Introduction

1.1 Purpose

The purpose of this document is to provide a list of signalling items which are approved to be used on the ARTC network.

1.2 Scope

This document provides a list of signalling and communication items related to signalling systems which can be used on the ARTC network.

The Business Unit / Corridor Signal Engineer / ARTC Project Signalling Representative shall agree prior to the use of any products from this list to ensure consistency across their corridor/network for maintenance, training and spares etc.

1.3 Document Owner

The Manager Engineering Services is the Document Owner. Queries relating to this document should be directed to standards@artc.com.au in the first instance.

1.4 Reference Documents

ARTC Type Approval Certificates

ARTC Signalling Specifications

ARTC Signalling Standards

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

2 Categories

Supplier	Part No	Product/Description	Condition/Remarks
2.1 Signals			
'Westinghouse Signals Australia' RM4 range of LED signal light units *			
Siemens	RCFB85	200mm Red – L ED lamp unit - Extended Range Mainline	
Siemens	YCFB85	200mm Yellow - LED lamp unit - Extended Range Mainline	
Siemens	GCFB85	200mm Green - LED lamp unit - Extended Range Mainline	
Siemens	RCFB75	200mm Red - LED lamp unit Long Range Mainline	
Siemens	YCFB75	200mm Yellow - LED lamp unit Long Range Mainline	
Siemens	GCFB75	200mm Green - LED lamp unit Long Range Mainline	
Siemens	WCFB75	200mm White - LED lamp unit Long Range Mainline	
Siemens	WCFB85	200mm White - LED lamp unit Long Range Mainline	
Siemens	RCFB25	200mm Red- LED lamp unit Standard Range Mainline	
Siemens	YCFB43	200mm Yellow - LED lamp unit Standard Range Mainline	
Siemens	GCFB25	200mm Green - LED lamp unit Standard Range Mainline	
Siemens	WCFB25	200mm White - LED lamp unit Standard Range Mainline	
Westinghouse Rail Systems Australia' LED Banner Repeater Signal Units *			
Siemens	1200103201	LED Banner Repeater Signal Unit (3 aspect H, UQ, V, White band)	
'Invensys Rail' RM4 Type 92 LED Signal *			
Siemens	TR3-YCFB-501B-92 *[5517/12YMR92]	LED module yellow 140 mm	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	RM4-GCFB-75B-92G *[5518/12GIR92]	LED module green 212 mm	
Siemens	RM4-YCFB-85B-92G *[5518/12YLR92]	LED module yellow 212 mm	
Siemens	RM4-RCFB-75B-92G *[5518/12RIR92]	LED module red 212 mm	
Siemens	RM4-WCFB-75B-92G *[To be provided]	LED module white V and S stencilled 212 mm	
Siemens	RM4-GCFB-25B-92G *[5518/12GMR92]	LED module green 212 mm	
Siemens	RM4-YCFB-43B-92G *[5518/12YMR92]	LED module yellow 212 mm	
Siemens	RM4-RCFB-25B-92G *[5518/12RMR92]	LED module red 212 mm	
Siemens	RM4-WCFB-25B-92G *[5518/12WMR92]	LED module white 212 mm	
Siemens	3210116501 DTF	LED module white '65'	
'Aldridge' LED Signal Lamp Case *			
Aldridge	RL671-B	1 Aspect 200mm Mainline sheet metal body assembly	
Aldridge	RL672-B	2 Aspect 200mm Mainline sheet metal body assembly	
Aldridge	RL673-B	3 Aspect 200mm Mainline sheet metal body assembly	
Aldridge	RL674-B	4 Aspect 200mm Mainline sheet metal body assembly	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Aldridge	RL650-B	1 Aspect 125mm Subsidiary sheet metal body assembly	
Aldridge	RL551-B	2 Aspect Vertical SRI sheet metal body assembly	
Aldridge	RL552-B	2 Aspect Horizontal SRI sheet metal body assembly	
Aldridge	RL6413-B	3 Aspect Vertical Shunt sheet metal body assembly	
Aldridge	RL6414-B	4 Aspect Vertical Shunt sheet metal body assembly	
Aldridge	RL6643-B	3 Aspect GPLS sheet metal body assembly	
Aldridge	RL413-BW	3 Aspect Vertical Shunt - gravity die cast casings	
Aldridge	RL414-BW	4 Aspect Vertical Shunt - gravity die cast casings	
Aldridge	RL443-BW	3 Aspect GPLS - gravity die cast casings	
Aldridge	RL444-BW	2 Aspect Repeater - gravity die cast casings	
Aldridge	RL451-BW	2 Aspect SRI Vertical - gravity die cast casings	
Aldridge	RL452-BW	2 Aspect SRI Horizontal - gravity die cast casings	
Aldridge	RL466-BW	LH Running Turnout - gravity die cast casings	
Aldridge	RL467-BW	RH Running Turnout - gravity die cast casings	
Aldridge	RL468-BW	R + L H Running Turnout - gravity die cast casings	
Aldridge	VN611R	1 Aspect Main	
Aldridge	VN512	2 Aspect Main	
Aldridge	VN513	3 Aspect Main	
Aldridge	VN514	4 Aspect Main	
Aldridge	VN510	Shunt background	
Aldridge	RV245	Main Hood Standard 300mm	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Aldridge	RV283	Main Hood 600 mm	
Aldridge	RV248	Shunt Hood 200 mm	
Aldridge	RV248-300	Shunt Hood 300 mm	
Aldridge	RV247	2 Aspect Gantry Hood	
Aldridge	RV246	3 Aspect Gantry Hood	
Aldridge	RV249	4 Aspect Gantry Hood	
Aldridge	VK504	Ground Mount	
Aldridge	VK500	Gantry Mount	
Aldridge	VK501	Main T.O.P.	
Aldridge	VK503	Shunt/Single Case Mount Bracket	
Aldridge	VK506	SRI F.O.P.	
Aldridge	VK509	Shunt/Single Case F.O.P Extension	
Aldridge	VK510	Main F.O.P. Extension	
'Invensys' 5518/12XRR92 LED Signal *			
Siemens	5518/12GLR92	LED module green 200 mm	
Siemens	5518/12YLR92	LED module yellow 200 mm	
Siemens	5518/12RLR92	LED module red 200 mm	
Siemens	5518/12WLR92	LED module white 200 mm	
Siemens	5518/12GMR92	LED module green 200 mm	
Siemens	5518/12YMR92	LED module yellow 200 mm	
Siemens	5518/12RMR92	LED module red 200 mm	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	5518/12WMR92	LED module white 200 mm	
Siemens	5518/12GIR92	LED module green 200 mm	
Siemens	5518/12YIR92	LED module yellow 200 mm	
Siemens	5518/12RIR92	LED module red 200 mm	
Siemens	5518/12WIR92	LED module white 200mm	
Siemens' 140mm Subsidiary LED *			
Siemens	4210215910	Green - LED lamp unit	
Siemens	4210215916	Yellow - LED lamp unit	
Siemens	4210215912	Red - LED lamp unit	
Siemens	4210215914	White - LED lamp unit	
Siemens	4210215901	Green - LED lamp unit	
Siemens' 140mm Subsidiary LED *			
Siemens	4210215907	Yellow - LED lamp unit	
Siemens	4210215903	Red - LED lamp unit	
Siemens	4210215905	White - LED lamp unit	
Siemens	4210215911	Green - LED lamp unit	
Siemens	4210215917	Yellow - LED lamp unit	
Siemens	4210215913	Red - LED lamp unit	
Siemens	4210215915	White - LED Stencilled	
Siemens	4210215902	Green - LED lamp unit	
Siemens	4210215908	Yellow - LED lamp unit	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	4210215904	Red - LED lamp unit	
Siemens	4210215906	White - LED Stencilled	
Siemens	3210215101	Green - LED lamp unit	
Siemens	3210215103	Yellow - LED lamp unit	
Siemens	3210215102	Red - LED lamp unit	
Siemens	3210215104	White - LED Stencilled	
UGL Limited' LED Signals (12V DC & 120V AC) *			
UGL	1000010076 (R999-X0919)	MK2 127mm Red 120Vac LED Signal	
UGL	1000010081 (R999-X0924)	MK2 127mm Red 12Vdc LED Signal	
UGL	1000010244 (containing 1000010081) R999-X1192 (containing R999-X0924)	Red 12Vdc LED retrofit kit	
UGL Limited LED Signal Light Units *			
UGL	1000010755	LED MODULE (White) - AL8 12VDC 212MM *1	
UGL	1000010756	LED MODULE (Red) - AL8 12VDC 212MM *1	
UGL	1000010162	LED MODULE (Yellow) AL8 12VDC 212MM *1 & *2	
UGL	1000010161	LED MODULE (Green) - AL8 12VDC 212MM *1 & *2	
UGL	1000010559	SIGNAL TRI-COLOUR LED (MEDIUM) RYG FOP-PTC	
UGL	1000009963	SIGNAL TRI-COLOURED LED (MEDIUM) RYG MODULE	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
UGL	1000010073	LED MODULE (Red) - MK2 120VAC 212MM	
UGL	1000010074	LED MODULE (Yellow) MK2 120VAC 212MM	
UGL	1000010075	LED MODULE (Green) MK2 120VAC 212MM	
UGL	1000429704	LED MODULE (Green) MK2 12VDC 212MM MICROLOK	
UGL	1000429705	LED MODULE (Yellow) MK2 12VDC 212MM MICROLOK	
UGL	1000429706	LED MODULE (Red) MK2 12VDC 212MM MICROLOK	
UGL	1000429703	LED MODULE (White) MK2 12VDC 212MM MICROLOK	
UGL	1000010847	LED MODULE (White) MK2 12VDC 212MM MICROLOK	
UGL	1000010174	LED RETRO KIT (Green) 212MM 12VDC MLK UGL	
UGL	1000010175	LED RETROKIT (Yellow) 212MM 12VDC MLK UGL	
UGL	1000010176	LED RETROKIT (Red) - 212MM 12VDC MLK UGL	
UGL	1000010076	LED MODULE (Red) - MK2 120VAC 127MM	
UGL	1000010077	LED MODULE (Yellow) MK2 120VAC 127MM	
UGL	1000010078	LED MODULE (Green) MK2 120VAC 127MM	
UGL	10000100931	LED MODULE (L/White) - MK2 120VAC 127MM	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
UGL	1000010843	LED MODULE (Green) MK2 12VDC 127MM MICROLOK	
UGL	1000010844	LED MODULE (Yellow) MK2 12VDC 127MM MICROLOK	
UGL	1000010845	LED MODULE(Red) MK2 12VDC 127MM MICROLOK	
UGL	1000010846	LED MODULE (White) MK2 12VDC 127MM MICROLOK	
UGL	1000455875	LED MODULE (Light Blue) MK2 12VDC 127MM MICKL	
UGL	1000010242	LED RETROKIT (Green) - 127MM 12VDC MLK UGL	
UGL	1000010243	LED RETROKIT (Yellow) - 127MM 12VDC MLK UGL	
UGL	1000010244	LED RETROKIT (Red) - 127MM 12VDC MLK UGL	
UGL	1000010245	LED RETROKIT (White) - 127MM 12VDC MLK UGL	
UGL	1000010434	LED RETRO KIT (Red) 127MM 12V ALDRIDG MICROLC	
UGL	1000389911	LED RETRO KIT (Yellow) 127MM 12V ALDRIDG.MICROLC	
UGL	1000455954	LED RETRO KIT (Light Blue) 127MM 12V MIC ALDR	
UGL	1000475322	LED RETRO KIT (White Arrow) 127MM 12VDC MICKL UGL	
UGL Limited – FL-03 LED Signal *			
UGL	1000451826	FL-03 (RED) LED Signal (Low Current Version)	
UGL	1000010307	FL-03 (RED) LED Signal (High Current Version)	
Metwest Tilting Signal *			
Metwest Engineering Pty Ltd	2234	Tilting Signal Mast - <3.5m height	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Metwest Engineering Pty Ltd	2235	Tilting Signal Mast - <4.5m height	
Metwest Engineering Pty Ltd	2236	Tilting Signal Mast - <5.5m height	
Metwest Engineering Pty Ltd	2253	Base suitable up to 3.5m height Tilting Signal Mast	
Metwest Engineering Pty Ltd	2254	Base suitable up to 4.5m height Tilting Signal Mast	
Metwest Engineering Pty Ltd	2286	Base suitable up to 5.5m height Tilting Signal Mast	
'Aldridge' RL400A-x 125mm Subsidiary LED Short range (nominal 200m) -120v AC*			
Aldridge Railway	RL400A-1	RED	Not suitable for Microlok
Aldridge Railway	RL400A-2	YELLOW	
Aldridge Railway	RL400A-3	GREEN	
Aldridge Railway	RL400A-4	WHITE	
Aldridge Railway	RL400A-5	BLUE	
'Aldridge' RL400S-x 125mm Subsidiary LED Short range (nominal 150m) – 120v AC*			
Aldridge Railway	RL400S-1	RED	Not suitable for Microlok
Aldridge Railway	RL400S-2	YELLOW	
Aldridge Railway	RL400S-3	GREEN	
Aldridge Railway	RL400S-4	WHITE	
Aldridge Railway	RL400S-5	BLUE	
Aldridge Railway	RL400S-6	BLUE/WHITE	
'Aldridge' RL570-X 200mm Medium Range Mainline Microlok LED (nominal 600m) 12V DC*			
Aldridge Railway	RL570-1	RED	Suitable for Microlok
Aldridge Railway	RL570-2	YELLOW	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Aldridge Railway	RL570-3	GREEN	
Aldridge Railway	RL570-4	WHITE	
'Aldridge' RL570S-x 200mm Short range Microlok (nominal 150m) 12V DC*			
Aldridge Railway	RL570S-1	RED	Suitable for Microlok
Aldridge Railway	RL570S-2	YELLOW	
Aldridge Railway	RL570S-3	GREEN	
Aldridge Railway	RL570S-4	WHITE	
'Aldridge' RL550-x 125mm Subsidiary LED (nominal 200m) 12V DC*			
Aldridge Railway	RL550-1	RED	Suitable for Microlok
Aldridge Railway	RL550-2	YELLOW	
Aldridge Railway	RL550-3	GREEN	
Aldridge Railway	RL550-4	WHITE	
'Aldridge' RL55xV/Hx Stencil Route Indicator SRI 2 Aspect short range (nominal 50m) 120V AC*			
Aldridge Railway	RL551Vx	WHITE	Vertical
Aldridge Railway	RL552H	WHITE	Horizontal
'Aldridge' RL55xMV/Hx Stencil Route Indicator SRI Microlok 2 Aspect short range (nominal 50m) 12V DC*			
Aldridge Railway	RL551MVx	WHITE	Vertical
Aldridge Railway	RL552MH	WHITE	Horizontal
'Aldridge' RL403-x 200mm Main Line LED Signal Medium range (nominal 500m) 12VAC/12VDC *			
Aldridge Railway	RL403-1 V1	RED	Not suitable for Microlok
Aldridge Railway	RL403-2 V1	YELLOW	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Aldridge Railway	RL403-3 V1	GREEN	
Aldridge Railway	RL403-4 V1	WHITE	
'Aldridge' RL403L-x 200mm Mainline LED Long Range (nominal 1500m) 120v AC*			
Aldridge Railway	RL403L-1	RED	Not suitable for Microlok
Aldridge Railway	RL403L-2	YELLOW	
Aldridge Railway	RL403L-3	GREEN	
Aldridge Railway	RL403L-4	WHITE	
'Aldridge' RL495 Repeater Signal (4 White Lights) (nominal 600m) 120V AC*			
Aldridge Railway	RL495	WHITE	Not suitable for Microlok
'Aldridge' RL495M Repeater Signal (4 White Lights) Microlok (nominal 600m) 12V DC*			
Aldridge Railway	RL495M	WHITE	Suitable for Microlok
"Aldridge' RL400-X 125mm Subsidiary LED signal short range (nominal 200m) 12VAC/12VDC*			
Aldridge Railway	RL400-1 V1	RED	Not suitable for Microlok
Aldridge Railway	RL400-2 V1	YELLOW	
Aldridge Railway	RL400-3 V1	GREEN	
Aldridge Railway	RL400-4 V1	WHITE	
Aldridge Railway	RL400-5 V1	BLUE	
Aldridge Railway	RL400-6 V1	BLUE/WHITE	
'Aldridge' RL500s-x125mm Subsidiary LED short range (nominal 150m) 12VDC and 24VDC *			
Aldridge Railway	RL500S-1	RED	Not suitable for Microlok
Aldridge Railway	RL500S-2	YELLOW	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Aldridge Railway	RL500S-3	GREEN	
Aldridge Railway	RL500S-4	WHITE	
Aldridge Railway	RL500S-4LA	WHITE (LEFT ARROW MASK) – Nominal range 20m	Not suitable for Microlok
Aldridge Railway	RL500S-4RA	WHITE (RIGHT ARROW MASK) – Nominal range 20m	
Aldridge Railway	RL500S-5	BLUE	Not suitable for Microlok
Aldridge Railway	RL500S-6	BLUE/WHITE	
'Aldridge' RL500M-x 125mm Subsidiary LED Medium range (nominal 500m) 12VDC and 24VDC*			
Aldridge Railway	RL500M-1	RED	Not suitable for Microlok
Aldridge Railway	RL500M-2	YELLOW	
Aldridge Railway	RL500M-3	GREEN	
Aldridge Railway	RL500M-4	WHITE	
Aldridge Railway	RL500M-5	BLUE	
Aldridge Railway	RL500M-6	BLUE/WHITE	
'Aldridge' RL503M-x 200mm Mainline LED MEDIUM range (nominal 500m) 12VDC and 24VDC*			
Aldridge Railway	RL503M-1	RED	Not suitable for Microlok
Aldridge Railway	RL503M-2	YELLOW	
Aldridge Railway	RL503M-3	GREEN	
Aldridge Railway	RL503M-4	WHITE	
'Aldridge' RL503I-x 200mm Mainline LED INTERMEDIATE range (nominal 1000m) 12VDC and 24VDC*			
Aldridge Railway	RL503I-1	RED	Suitable for Microlok
Aldridge Railway	RL503I-2	YELLOW	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Aldridge Railway	RL503I-3	GREEN	
Aldridge Railway	RL503I-4	WHITE	
'Aldridge' RL503L-x 200mm Mainline LED LONG range (nominal 1500m) 12VDC and 24VDC*			
Aldridge Railway	RL503L-1	RED	Suitable for Microlok
Aldridge Railway	RL503L-2	YELLOW	
Aldridge Railway	RL503L-3	GREEN	
Aldridge Railway	RL503L-4	WHITE	
'Aldridge' RL526M-xx Mini Multilight Route Indicator Microlok Short Range (nominal 50m) 12V DC*			
Aldridge Railway	RL526M-XX	WHITE	xx' represents the required characters
'Aldridge' RL526-xx Mini Multilight Route Indicator Short Range (nominal 50m) 120V AC*			
Aldridge Railway	RL526-XX	WHITE	xx' represents the required characters
'Aldridge' RL620-x Short Range Theatre Route Indicator (TRI) (nominal 250m) 120V AC*			
Aldridge Railway	RL620-x	WHITE	'x' represents the required characters
'Aldridge' RL620M-x Short Range Theatre Route Indicator (TRI) Microlok (nominal 250m) 12V DC*			
Aldridge Railway	RL620M-x	WHITE	'x' represents the required characters
'Aldridge' R999-X105x Medium Range Turnout Repeater TOR (nominal 600m) 120V AC*			
Aldridge Railway	R999-X1053	WHITE – LH	
Aldridge Railway	R999-X1054	WHITE – RH	
Aldridge Railway	R999-X1055	WHITE – LH + RH	
'Aldridge' R999-X105xM Medium Range Turnout Repeater TOR Microlok (nominal 600m) 12V DC*			
Aldridge Railway	R999-X1053M	WHITE – LH	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Aldridge Railway	R999-X1054M	WHITE – RH	
Aldridge Railway	R999-X1055M	WHITE – LH + RH	
'Aldridge' RL608 Points Position Indicator (PPI) (nominal 120mm) 110V AC*			
Aldridge Railway	RL608	White – Left, Right and Straight Bar & Red horizontal Bar	To be used for the Port of Melbourne Swanson Doc siding works only.
For 120V AC Signals			
Aldridge Railway	PS0180	Power Supply LED – 12VAC/12VDC Input	
Aldridge Railway	PT0610	Transformer 120VAC Input /12VAC Output 30VA	
'ART' Lamp Proving Modules (LPM) *			
Australian Rail Technology	4212-1000	24v DC Lamp Proving Module	
Australian Rail Technology	XP3510-1000	50v DC Lamp Proving Module	
2.2 Communication items related to signalling system			
Kingfisher Telemetry Equipment *			
Maximation Pty Ltd	BA-4 / BA-4-PLUS	4 Slot backplane	
Maximation Pty Ltd	BA-40 / BA-40-PLUS	4 Slot backplane	
Maximation Pty Ltd	BA-6 / BA-6-PLUS	6 Slot backplane	
Maximation Pty Ltd	BA-12 / BA-12-PLUS	12 Slot backplane	
Maximation Pty Ltd	PS-12-0 / PS-12-C	AC Power Supply Module	PS-12 supersedes PS-11.
Maximation Pty Ltd	PS-22-0 / PS-22-C	DC Power Supply Module	PS-22 supersedes PS-21.

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Maximation Pty Ltd	CP-12	Processor	CP-12 supersedes CP-11. CP-12 must use firmware v1.48d or later
Maximation Pty Ltd	MC-12	Communications Module	MC-12 supersedes MC-11. MC-12 must use firmware 113 or later
Maximation Pty Ltd	PC-1	Power & Processor Module	The PC-1 can only be installed on 4-slot backplane (BA-4 / BA-4-PLUS).
Maximation Pty Ltd	A4	Ethernet SFP Fibre Optic Interface	A4 supersedes A3
Maximation Pty Ltd	D	Dial-up Modem (PSTN) V34 33.6 kbps	
Maximation Pty Ltd	F	Fiber Optic Interface	
Maximation Pty Ltd	I	Isolated Serial	
Maximation Pty Ltd	L	Private Line or Analogue Radio Interface	
Maximation Pty Ltd	T4	Ethernet RJ45 Copper – 10/100 Mbps	
Maximation Pty Ltd	DI-5	Digital DC Input Module, 16 Channel	
Maximation Pty Ltd	DI-10	Digital AC or DC Input Module, 16 Channel	
Maximation Pty Ltd	DO-1	Digital Relay Output Module, NO/NC, 8 Channel	
Maximation Pty Ltd	DO-2	Digital Relay Output, NO, 16 Channel	
Maximation Pty Ltd	DO-6	Digital Relay Driver Output	
Maximation Pty Ltd	TEL-REL-002	Relay Output Board for DO-6	
Maximation Pty Ltd	Genisys Slave Driver	CP-12 Firmware Driver	Version 7

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Maximation Pty Ltd	Genisys Master Driver	CP-12 Firmware Driver	Version 2
Maximation Pty Ltd	Toolbox32	Configuration software	Version 2.4
Maximation Pty Ltd	Kingfisher Plus Hardware Manual	Documentation	V7.23 or later - Device Specifications
'Optical Systems Design' OSD 1250 Fibre Optic Modem *			
Optical systems Design Pty Ltd	OSD1250	850nm multimode	
	OSD1250L	1310nm multimode or single mode	
RuggedCom RS400 Server – Ethernet Switch *			
Siemens	Ruggedcom RS400	Server- Ethernet Switch	
'Tranzeo' TR-902 Radio for Vital Signalling *			
Comnet Solutions Pty Ltd	TR-902-11w	900 MHz radio modem DSSS with 11dB panel antenna	
Comnet Solutions Pty Ltd	TR-902-Nw	900MHZ radio modem DSSS with external N-female antenna connector	
Comnet Solutions Pty Ltd	TR-902-iw	900 MHZ radio modem DSSS for internal use featuring a N-female connector	
Comnet Solutions Pty Ltd	EDW-100	Serial to Ethernet converter	
Comnet Solutions Pty Ltd	TR-SUR-001	Power Over Ethernet adaptor	
'Westermo' TD36 (485) LV Modem *			

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Madison Technologies Pty Ltd	3618-0010	Industrial Backup PSTN and Leased line modem	
'RuggedCom' RX1500 Switch and Router *			
Siemens	RX1500	Ruggedcom Switch and Router	
IMAC Telemetry System *			
AMP Control Pty Ltd	120964	IMAC Controller	
AMP Control Pty Ltd	171571	IMAC2 Controller	
AMP Control Pty Ltd	121905	End of Line (EOL) Module	
AMP Control Pty Ltd	101495	DI8 Input Module	
AMP Control Pty Ltd	101498	RO4 Output Module	
RuggedCom RS900G – Ethernet Switch *			
Siemens	6GK6090-0GS21-0BA0-Z A05	RS900G switch 24V DC Power supply, Din rail mount, Dual 1000LX Single mode SC 1310nm 10km	
Siemens	6GK6090-0GS21-0BA0-Z A06	RS900G switch 24V DC Power supply, Din rail mount, Dual 1000LX Single mode SC 1310nm 25km	
Siemens	Firmware 4.3.5	Ruggedcom Operating software (ROS)	Firmware Versions prior to ROS v4.3.5 are NOT to be used.
Siemens	Bootware 4.0.0	Bootware	Bootware version compatible with Firmware version 4.3.5 shall be used.
Westermo Industrial switch range *			

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Westermo	Lynx L210-F2G-12VDC	Managed Ethernet Switch – 12v	
Westermo	Lynx L210-F2G	Managed Ethernet Switch – 24v	
Westermo	Lynx L208-F2G-S2	Managed Device Server Switch	
Westermo	RFI-219-F4G-T7G	Industrial Routing Switch	
Westermo	RedFox-5528-E-F16G-T12G-LV	19" Managed Ethernet Switch	
Westermo	RedFox-5528-E-F14G-T24G-LV	19" Managed Ethernet Switch	
Westermo	RedFox-5528-E-T28G-LV	19" Managed Ethernet Switch	
Westermo	RedFox-5528-E-F16G-T12G-HV	19" Managed Ethernet Switch	
Westermo	RedFox-5528-E-F4G-T24G-HV	19" Managed Ethernet Switch	
Westermo	1100-0531	Transceiver MLC2-DDM – 100Mbits – Multi mode	
Westermo	1100-0532	Transceiver SLC20-DDM, 100Mbits - Single mode up to 20km	
Westermo	1100-0534	Transceiver SLC80-DDM, 100Mbits - Single mode >20km, maximum 80km	
'Telstra' Iterra IP Satellite Modem *			

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Telstra	IMO29603xx	Agilis ASM1200 Series Outdoor Satellite Modem	
Telstra	1132 Series	1.2m Satellite Dish Antenna	
Telstra	E0001100-0001	Block Uplink Converter BUC – Ku band 3W	
Telstra	E0001110-0001	Frequency Converter - PLL LNB – Ku band	
Telstra	APSVAC24-185	AC-DC Outdoor Power Module- 90-264VAC 187W	
Telstra	E0002036-0001	DC-DC Outdoor Power Module 36-76VDC 65W	
Telstra	E0002035-0001	DC-DC Outdoor Power Module 12-36VDC 65W	
Westermo MRD-455-AU Industrial Cellular Router and ODW-700 series Fibre Optic Cable*			
Westermo	ODW-720-F1	Point to Point Fibre Converter RS-232	
Westermo	ODW-720-F2	Ring/Multidrop Fibre Converter RS-232	
Westermo	ODW-730-F1	Point to Point Fibre Converter RS-422/485	
Westermo	ODW-730-F2	Ring/Multidrop Fibre Converter RS422/485	
Westermo	MRD-455-AU	Industrial Cellular Router	
Network Switches/Routers/Modems			
Westermo	3616-0010	EDW-120	
Westermo	3621-0110	DDW-120	
Westermo	3642-0240	DDW-226	
Madison Technologies	C Model 2155X	Cybertec Modem 2155X	3G Compatible
Madison Technologies	C Model 2255X	Cybertec Modem 2255X	3G compatible.

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Madison Technologies	C Model 2455X	Cybertec Modem 2455X	4G Compatible, Preferred
RAD	ASMi52	ASMi52 SHDSL modem	
RAD	ASMi54	ASMi54 SHDSL modem	
MOXA	Nport 5150	Nport 5150	
MOXA	Nport 5250	Nport 5250	
MOXA	Nport 5650	Nport 5650	
MOXA ^{\$}	ioLogik E2200	ioLogik E2200 Series	
Westermo	SDW-550	Unmanaged Ethernet Switch	Only to be used on limited Non-vital telemetry
Westermo #	RedFox-5528-T28G-LV	19" Rackmount Managed Ethernet Switch	
Westermo #	RedFox-5528-T28G-MV	19" Rackmount Managed Ethernet Switch	
Westermo #	RedFox-5528-E-T28G-MVa	19" Rackmount Managed Ethernet Switch	Selective sales approval, contact Westermo before ordering
Westermo #	RedFox-5528-F4G-T24G-LV	19" Rackmount Managed Ethernet Switch	
Westermo #	RedFox-5528-E-F4G-T24G-MVa	RedFox-5528-E-F4G-T24G-MVa	Selective sales approval, contact Westermo before ordering
Westermo #	RedFox-5528-F16G-T12G-LV	19" Rackmount Managed Ethernet Switch	
Westermo #	RedFox-5528-E-F16G-T12G-MVa	19" Rackmount Managed Ethernet Switch	Selective sales approval, contact Westermo before ordering
Westermo #	RFI-219-T3G	Industrial Routing Switch	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Westermo #	RFI-211-T3G	Industrial Routing Switch	
Westermo #	RFI-215-F4G-T3G	Industrial Routing Switch	
Westermo #	RFI-207-F4G-T3G	Industrial Routing Switch	
Westermo #	RFI-119-F4G-T7G	Managed Ethernet Switch	
Westermo #	RFI-211-F4G-T7G	Industrial Routing Switch	
Westermo #	RFI-111-F4G-T7G	Managed Ethernet Switch	
Westermo #	RFI-219-F4G-T7G-F8	Industrial Routing Switch	
Westermo #	L108-F2G-S2	Managed Device Server Switch	
Westermo #	L210-F2G	Managed Ethernet Switch with Routing Functionality	
Netmodule Railway Router #			
Avvero Solutions (Supplier - NSW) Netmodule (Manufacturer)	NB3701-L-G	Netmodule NB3701 railway router	Approved for 12 months trial for ATMS
Avvero Solutions (Supplier - NSW) Netmodule (Manufacturer)	NB1601	Netmodule NB1601 Industrial Router	
Westermo RT-320 *			
Westermo	lbex-RT-320-LV	Wireless LAN Node	24Vdc
Westermo	lbex-RT-320-HV	Wireless LAN Node	72Vdc – 110Vdc
'Peak Fibre' Wall Mount Fibre Enclosure*			

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Peak Fibre	FB-1-2P	Wall Mount Fibre Enclosure – 2 Panel	
Peak Fibre	FB-2-4P	Wall Mount Fibre Enclosure – 4 Panel	
RFI Technology Solutions - 4G Antenna@			
RFI Technology Solution	CD8295	5G LTE 6.5dBi Collinear Antenna (698-3800 MHz)	Standard Installation Normal Signal (RSRP > -110dB)
RFI Technology Solution	COL8195	5G LTE 6.5dBi Collinear Antenna (698-3800 MHz)	Standard Installation Normal Signal (RSRP > -110dB)
RFI Technology Solution	LPDA7038-11-10SMA	5G LTE 11dBi LPDA Directional Antenna (700-3800 MHz); 10m SMA(M)	Low Signal Area (RSRP <= -110dB) OR (RSRQ <= -15dB)
RFI Technology Solution	CSM550-5M-SMA	5GRN3.6dBi Ultra Compact Antenna (617-5925 MHz); 5m LL100 SMA(M)	For specific site conditions such as: -Restricted space -Vandal resistance needed
RFI Technology Solution	LTE-MLP-1.5M-SMA	LTE MIMO Low Profile Antenna (698-2700 MHz); 2 X 1.5m SMA(M)	For specific site conditions such as: -Restricted space -Vandal resistance needed
RFI Technology Solution	LTE-XPOL-002-5G	5G LTE 2x2 MIMO Directional Panel Antenna (698-3800 MHz); 10m Twin HFT195 SMA(M)	Solutions4Replacement of existing LTE-XPOL-002-5G antenna An alternative antenna from this list may be selected based on the site conditions
UHS Systems Pty Ltd #			

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
UHS System Pty Ltd	UC-400	Ultralink Communicators	Applicable only for Telstra Remote Telemetry use
UHS System Pty Ltd	UC-440	Ultralink Communicators	
Supplier contact	Part No	Product/Description	Condition/Remarks
2.3 Points			
Westinghouse Signals Australia Points Machine 84M *			
Siemens	1335101301	110/120v AC 84M Mk111	
Siemens	1335101302	110v DC 84M Mk111	
Siemens	1335101401	110/120v AC D84M MK111 Dual-Control	
Siemens	1335101402	110/120v AC D84M Mk111 Dual-Control	
Siemens	1335101408	110v DC D84M Mk111 Dual-Control	
Siemens	1335101406	24v DC D84M Mk111 Dual-Control	
Siemens	1335101407	24v DC D84M Mk111 Dual-Control	
Siemens	1335101404	24v DC D84M Mk111 Dual-Control	
Siemens	1335101409	24v DC D84M Mk111 Dual-Control, Shorting Detection	
Siemens	1335101501	110/120v AC T84M Mk111 Trailable	
Siemens	1335101601	110/120v AC TD84M Mk111 Trailable, Dual-Control	
Siemens	1335101603	24v DC TD84M Mk111 Trailable, I1291 Dual-Control	
	1335101602	24v DC TD84M Mk111 Trailable, Dual-Control	
'Westinghouse Signals Australia' Points Machine M3A *			

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	M31376	110v AC M3A No internal contactor.	
Siemens	M31377	110v AC M3A Single Detection.	
Siemens	M31504	110v AC M3A	
Siemens	M28866	110v DC M3A	
Siemens	M29373	110v DC M3A	
Siemens	M29374	110v DC M3A	
Siemens	M29375	110v DC M3A	
Siemens	M29376	110v DC M3A	
Siemens	M29377	110v DC M3A	
Siemens	M30830	120v AC M3A	
Siemens	M30830Ax	120v AC M3A	
'Westinghouse Rail Systems Australia' ClawLock Points Mechanism *			
Siemens	4070S5	ClawLock Housing	
Siemens	4330332402	Housing Mounting Bolt (M20 x 80 thin head).	
Siemens	3330393901	Locking Claw	
Siemens	3330204601	Pin Assembly for locking claw	
Siemens	801S5	Mechanism Cover	
Siemens	2330333501	Switchblade Bracket	
Siemens	4330332401	Bracket Mounting Bolt (M20 x 90 thin head).	
Siemens	4330333601	Adaptor for switchblade bracket	
Siemens	4330337001	Packing Set	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	1330204807	Operating Bar (Complete assembly)	
Siemens	684S5	ClawLock Housing	
Siemens	4330332402	Housing Mounting Bolt (M20 x 80 thin head).	
Siemens	3330393901	Locking Claw	
Siemens	3330204601	Pin Assembly for locking claw	
Siemens	801S5	Mechanism Cover	
Siemens	2330204706	Switchblade Bracket	
Siemens	2330204702		
Siemens	4330332401	Bracket Mounting Bolt (M20 x 90 thin head).	
Siemens	3330322203	Adaptor for switchblade bracket	
Siemens	4330322501	Packing Set	
Siemens	1330204807	Operating Bar (Complete assembly)	
Siemens	1330204801		
Siemens	684S5	ClawLock Housing	
Siemens	4330332402	Housing Mounting Bolt (M20 x 80 thin head).	
Siemens	3330393901	Locking Claw	
Siemens	3330204601	Pin Assembly for locking claw	
Siemens	801S5	Mechanism Cover	
Siemens	2330204702	Switchblade Bracket	
Siemens	4330332401	Bracket Mounting Bolt (M20 x 90 thin head).	
Siemens	3330322203	Adaptor for switchblade bracket	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	4330322501	Packing Set	
Siemens	1330204802	Operating Bar (Complete assembly)	
Siemens	Zu60kg asymmetric rail switches		
Siemens	684S5	ClawLock Housing	
Siemens	5278/20-80	Housing Mounting Screw (M20 x 80 c'sink socket).	
Siemens	5278/20-90	Housing Mounting Screw (M20 x 90 c'sink socket).	
Siemens	951S5-LH	Locking Claw	
Siemens	951S5-RH		
Siemens	3330406201	Locking claw pin	
Siemens	4330324501	Locking claw pin tab	
Siemens	801S5	Mechanism Cover	
Siemens	2330328001	Switchblade Bracket	
Siemens	4330325101	Bracket Mounting Bolt	
Siemens	4330327901	Shim Set	
Siemens	1330204801	Operating Bar (Complete assembly)	
Siemens	1330204803	Operating Bar (Complete assembly)	
Siemens	684S5	ClawLock Housing	
Siemens	5278/20-80	Housing Mounting Screw (M20 x 80 c'sink socket).	
Siemens	951S5-LH	Locking Claw	
Siemens	951S5-RH		
Siemens	3330406201	Locking claw pin	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	4330324501	Locking claw pin tab	
Siemens	801S5	Mechanism Cover	
Siemens	2330328001	Switchblade Bracket	
Siemens	4330325101	Bracket Mounting Bolt	
Siemens	4330327901	Shim	
Siemens	1330204802	Operating Bar (Complete assembly)	
Siemens	684S5	ClawLock Housing	
Siemens	5278/20-80	Housing Mounting Screw (M20 x 80 c'sink socket).	
Siemens	951S5-LH	Locking Claws left and right hand.	
Siemens	951S5-RH		
Siemens	3330406201	Locking claw pin	
Siemens	4330324501	Locking claw pin tab	
Siemens	801S5	Mechanism Cover	
Siemens	2330324801	Switchblade Bracket	
Siemens	4330325101	Bracket Mounting Bolt	
Siemens	4330327901	Shim	
Siemens	1330204809	Operating Bar (Complete assembly)	
'Fortress' Lever lock & Release Switch *			
Ansaldo STS	CL A1	Basic interlocks and Keys	
Ansaldo STS	CL B2	Solenoid Controlled Interlock Unit	
Siemens Points Machine S700K *			

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	C25106-A141-XX	110v DC 180mm throw, 110mm to 135mm blade movement.	
Siemens	C25106- A141-XX	110v DC 150mm throw, 79mm to 90mm blade movement.	
Siemens	C25106-A202-XX #	110v DC 180mm throw, 110mm to 135mm blade movement.	
Siemens	C25106-A202-XX #	24v DC 180mm throw, 110mm to 135mm blade movement.	
'Siemens' Point Blades Detector (ELP-319) *			
Siemens	C25106-A202-A100	End position Detector, 4 switches	
Siemens' S700V In Bearer Point Machine *			
Siemens	A0-G1748-117	Point RH T/O Size 1 in 15	
Siemens	A0-G1748-199	Point RH T/O Size 6100	
Siemens	A0-G1748-217	Point RH T/O Size R800	
Siemens	A0-G1748-233	Catchpoint RH T/O Size 6100	
Siemens	A0-G1748-238	Catchpoint RH T/O Size 6100	
Siemens	A0-G1748-260	SNX RH/LH T/O Size R800	
Siemens	A0-G1748-299	Point RH T/O Size R800	
Siemens	A0-G1748-309	Point LH T/O Size R800	
Siemens	A0-G1748-336	Point RH T/O Size 1 in 15	
Siemens	A0-G1748-362	Point RH T/O Size R1200	
Siemens	A0-G1748-367	Point LH T/O Size R1200	
Siemens	A0-G1748-368	Point RH T/O Size 6100	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	A0-G1748-369	Point LH T/O Size 6100	
Siemens	A0-G1748-376	Point RH T/O Size R300	
Siemens	A0-G1748-377	Point LH T/O Size R300	
Siemens	A0-G1748-392	SNX RH/LH T/O Size R300	
Siemens	A0-G1748-394	Point RH T/O Size R800	
Siemens	A0-G1748-435	Point RH T/O Size R190	
Siemens	A0-G1748-438	Point RH T/O Size R500	
Siemens	A0-G1748-448	SNX RH/LH T/O Size R800	
Voestalpine SpheroLock Points Mechanism *			
VAE	Refer type approval certificate on ARTC extranet		
VAE	Zu60kg asymmetric rail switches		
VAE	J2800064	Drive & Lock unit	
VAE		Central Unit 120/180 (J2800092)	
VAE		Pressure head & bracket	
VAE		Switch blade bracket	
VAE		Stock rail attachment	
VAE			WRSA M84 machine
VAE	#	Operating Rod & Connector	WRSA p/n 330431201
VAE		1 x 55mm shoulder rod,	WRSA p/n 4330423803

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
VAE		2 x (Nyloc nut & washer) all M10	
VAE		Drop Lug	WRSA p/n 330422801
VAE		Spherical Washers M30 2 x convex, 2 x concave	WRSA p/n 4330371001 & 4330371002
VAE		& 4 x M30 hex nut (thin)	
VAE		Support Bracket	RH or LH WRSA p/n 2330215001
VAE	Zu60kg asymmetric rail switches		
VAE		Drive & Lock unit	
VAE		Central Unit 65/110 (J2800094)	
VAE	J2800066	Pressure head & bracket	
VAE		Switch blade bracket	
VAE		Stock rail attachment	
VAE		Drive rod assembly	
VAE	#	Operating Rod & Connector	WRSA p/n 330431201
VAE		1 x 55mm shoulder rod,	WRSA p/n 4330423803
VAE		2 x (Nyloc nut & washer) all M10	
VAE		Drop Lug	
VAE		Spherical Washers M30 2 x convex, 2 x concave	WRSA p/n 4330371001 & 4330371002
VAE		& 4 x M30 hex nut (thin)	
VAE		Support Bracket	RH or LH WRSA p/n 2330215001
VAE	Zu60kg wing rail, AS60 swing nose rail 1 in 12 to 1 in 18.5 crossing.		
VAE	J2800067	180mm stroke, 110mm opening	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens Points Machine M23A *			
Siemens	Refer TA certificate for full list of approved items	'Siemens' M23A MKIII Point Machine	Refer TA Certificate NESAS-026 on ARTC extranet
Siemens' Switchguard HLM MkII Point Lock and Detector Variants and HM MkII Point Detector Variants *			
Siemens	1570101408	HLM2	
Siemens	1570101409	HLM1	
Siemens	1570101410	HLM	
Siemens	1570101303	HLMX	
Siemens	1570101411	HLM 2 Position Lock	
Siemens	1570101310	HLMX	
Siemens	1570101416	HLM2	
Siemens	1570101417	HLM1	
Siemens	1570101418	HLM	
Siemens	1570100901	HMX1	
Siemens	1570100902	HMX2	
Siemens	1570100903	HMX2 Special Detection Bars	
Siemens	1570100904	HMX2	
Siemens	1570100905	HMX2	
Siemens	1570100906	HMX2	
Siemens	1570100907	HMX2	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	1570100908	HMX2	
Siemens	1570100909	HMX2	
Siemens	1570100910	HMX	
Siemens	1570100301	HM1	
Siemens	1570100302	HM2	
Siemens	1570100303	HM3	
Siemens	1570100304	HM4	
Siemens	1570100305	HM4 Special Detection Bar	
Siemens	HLM MkII Retrofit Lock bar - Part list		
Siemens	3570203403	TWO POSITION LOCK	
Siemens	3570203402	SPECIAL DROP LUG - 28 mm Below Mounting face	
Siemens	3570203401	SPECIAL DROP LUG - 46 mm Below Mounting face	
Vossloh Cogifer' Point Motor - MCEM91-27 *			
Vossloh	878010208	MCEM91-27 EQUIPPED CASE	
Vossloh	878010022	MCEM91 CRANK GEARBOX	
Vossloh	878010014	MAGNETIC TORQUE LIMITER	
Vossloh	878010202	MCEM91-24 ELECTRICAL MOTOR 110V AC MONO	
Vossloh	878010209	CHANGEOVER SWITCH MCEM91-27	
Vossloh	878010195	MCEM91-27 11 PINS CABLE WITH CONNECTOR	
Vossloh	878010272	MCEM91-27 EQUIPPED HOOD RAL7046	
Vossloh	878010205	EQUIPPED DRIVING ARM MCEM91-27	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Vossloh	878010174	MCEM91-24 EQUIPPED FLANGE	
Vossloh	392050034	IDENTIFICATION PLATE MCEM91	
Vossloh	878010191	MCEM91 OPERATING COUNTER ASSEMBLY	
Vossloh	455540002	CRANK ASSEMBLY MCEM91-27	
Vossloh	393060040	MCME91-27 CHANGEOVER SWITCH COVER	
Siemens M23A MkIII points machine *			
Siemens	101072	M23A MK3 Point machine Brass Rotor Motor 110VAC 189:1 Double Cut wiring – Base machine without detection and lock bars	
Siemens	110416881	M23A MK3 PM 110VAC 189:1 Complete with Detection and Lock Bars and Fortress Lock Mount	
Siemens	113570090	M23A MK3 PM 110VDC 189:1 Complete with Detection and Lock Bars and Fortress Lock Mount	
Siemens	113570100	M23A MK3 Point machine Permanent magnet 110V DC 189:1 double cut wiring – Base machine without detection and lock bars	
Siemens	102552	M23A MK3 Split field motor 24v DC 360:1 Standard detection - Base machine without detection and lock bars	
Siemens	113665997	M23A MK3 SF 110VDC 189:1 Complete with Detection and Lock Bars and Fortress Lock Mount	
Siemens	113665999	M23A MK3 Point machine SF 110V DC 189:1 double cut wiring – Base machine without detection and lock bars	
Siemens	101746	M23A MK3 PM motor 24v DC 360:1 Standard detection - Base machine without detection and lock bars	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Lock Bar and Detection Rods			
Siemens	M29067	Lock bar 76mm to 152mm (SWITCH)	
Siemens	M31065	Lock bar 25mm to 101mm (SNX)	
Siemens	100648	Detection Rod 76mm to 152mm 3/4" BSW (SWITCH)	
Siemens	100858	Detection Rod 76mm to 152mm SS M18 (SWITCH)	
Siemens	100652	Detection Rod 25mm to 101mm 3/4" BSW (SNX)	
Siemens	100856	Detection Rod 25mm to 101mm SS M18 (SNX)	
Major Assembly			
Siemens	100495	Circuit Controller Assembly Double Cut	
Siemens	335217501	Motor Isolation Switch Assembly	
Siemens	520101202	Motor Assembly 110Vac Brass Rotor	
Siemens	335217601	Motor Clutch Assembly	
Siemens	335217002	Transmission Gear Assembly 189:1	
Siemens	335217001	Transmission Gear Assembly 360:1	
Siemens	102553	Motor 24v DC Split Field	
Siemens	8090693	Motor 110v DC Permanent Magnet	
Siemens	809696	Motor 24v DC Permanent Motor	
Siemens	113666001	Motor 110v DC Split Field	
Unistar HR in-bearer points machine *			
Voestalpine	C-607287	Locking unit compl.	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Voestalpine	C-607286	Locking unit compl.	
Voestalpine	C-607349	Locking unit cpl.*HR*NT*Frog*SH*ARTC	
Voestalpine	C-607340	Hydraulic unit*HR*ARTC	
	C-610153	Hydraulic unit*HR*120V DC*ARTC	
Voestalpine	C-607338	Wiring diagram 3. SE*ARTC	
Voestalpine	C-607337	Wiring diagram 2. SL*ARTC	
Voestalpine	C-609903	Wiring diagram 4. SE*ARTC 18.5	
Voestalpine	C-609904	Wiring diagram 2. SE*ARTC 10.5	
Voestalpine	C-99646	Hydraulic fluid*Plantolube*Polar 15 S	
Voestalpine	C-608983	Hydraulic unit 24VDC	
Siemens' D150 Derailer & C150 Crowder Mkl *			
Siemens	1330100201	D150-Derailer	Right hand throw off
Siemens	2330100301	C150-Crowder	
Siemens	1330100202	D150-Derailer	Left hand throw off
Siemens	1330100401	C150-Crowder	
Siemens	3330301211	Coupling Rod Complete	For standard gauge
Siemens	4330000201	D150 - 16mm plate	For spike or screw fastened rail
Siemens	4330000202	C150 - 16mm plate	
Siemens	4330000204	D150 - 20mm plate	For clip fastened rail
Siemens	4330000205	C150 - 20mm plate	
Siemens	4330000207	D150 - 32mm plate	For spike or screw fastened rail

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	4330000208	C150 - 32mm plate	
Siemens	4330000210	D150 - 36mm plate	For clip fastened rail
Siemens	4330000211	C150 - 36mm plate	
Siemens' D150 Derailer & C150 Crowder MkII *			
Siemens	1330100201	Derail D150 RH includes derailer mechanism	
Siemens	1330100202	Derail D150 LH includes derailer mechanism	
Siemens	2330100201	Crowder C150 LH includes crowder mechanism	
Siemens	2330100202	Crowder C150 RH includes crowder mechanism	
Siemens	3330100501	D150 and C150 1600 Gauge RH Derail includes both mechanism	
Siemens	3330100502	D150 and C150 1600 Gauge LH Derail includes both mechanism	
Siemens	3330100503	D150 and C150 1435 Gauge RH Derail includes both mechanism	
Siemens	3330100504	D150 and C150 1435Gauge LH Derail includes both mechanism	
Siemens	3330100501	D150 and C150 1600 Gauge RH Derail includes both mechanism	
Siemens	3330100502	D150 and C150 1600 Gauge LH Derail includes both mechanism	
Siemens	3330100503	D150 and C150 1435 Gauge RH Derail includes both mechanism	
Siemens	3330100504	D150 and C150 1435Gauge LH Derail includes both mechanism	
Siemens	3330301211	1435mm gauge	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	3330301210	1600mm gauge	
Siemens	3330476406	1067mm gauge right side derailer	
Siemens	3330476405	1435mm gauge right side derailer	
Siemens	3330476404	1600mm gauge right side derailer	
Siemens	3330476403	1067mm gauge left side derailer	
Siemens	3330476402	1435mm gauge left side derailer	
Siemens	3330476401	1600mm gauge left side derailer	
McLeod' FFD001 Fixed Train Derailer *			
McLeod Rail	FFD001028-1RH	Derail RH Throw	
McLeod Rail	FFD001028-1LH	Derail LH Throw	
McLeod Rail	FFD001021	Derailer Body	
McLeod Rail	FFD001008	Derail Locking Bar	
McLeod Rail	FFD001019	Flag Arm includes Warning Sign	
McLeod Rail	FFD001028	Derail Frame Body	
'W.C.Hayes' HBR-WCX & HBL-WCX Derail/Crowder *			
Bradken	HB4R	Right hand throw - Size 4	
Bradken	HB5R	Right hand throw - Size 5	
Bradken	HB6R	Right hand throw - Size 6	
Bradken	HB7R	Right hand throw - Size 7	
Bradken	HB8R	Right hand throw - Size 8	
Bradken	HB4L	Left hand throw - Size 4	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Bradken	HB5L	Left hand throw - Size 5	
Bradken	HB6L	Left hand throw - Size 6	
Bradken	HB7L	Left hand throw - Size 7	
Bradken	HB8L	Left hand throw - Size 8	
Bradken	HB4R-WCX4	Right Hand Throw – Size 4 includes Isolating rodding	
Bradken	HB5R-WCX5	Right Hand Throw – Size 5 includes Isolating rodding	
Bradken	HB6R-WCX6	Right Hand Throw – Size 6 includes Isolating rodding	
Bradken	HB7R-WCX7	Right Hand Throw – Size 7 includes Isolating rodding	
Bradken	HB8R-WCX8	Right Hand Throw – Size 8 includes Isolating rodding	
Bradken	HRS-100	Left hand throw or Right hand throw includes Rodding	
ALDON Hinged Derailer - Type 4014-01 and 4014-02 *			
Specialised Force	4014-01-5D	Left Hand Throw – Size 5 includes Derail Sign and Lever	
Specialised Force	4014-01-6D	Left Hand Throw – Size 6 includes Derail Sign and Lever	
Specialised Force	4014-01-7D	Left Hand Throw – Size 7 includes Derail Sign and Lever	
Specialised Force	4014-01-8D	Left Hand Throw – Size 8 includes Derail Sign and Lever	
Specialised Force	4014-02-5D	Right Hand Throw – Size 5 includes Derail Sign and Lever	
Specialised Force	4014-02-6D	Right Hand Throw – Size 6 includes Derail Sign and Lever	
Specialised Force	4014-02-7D	Right Hand Throw – Size 7 includes Derail Sign and Lever	
Specialised Force	4014-02-8D	Right Hand Throw – Size 8 includes Derail Sign and Lever	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
2.4 Train Detection			
Frauscher ACS2000 axle counter system * - Legacy Approval – Shall not be used for any new works on ARTC network. To be used only for like for like replacements.			
Frauscher	10021	Rail Claw SK140	
Frauscher	10023	Clamping Bolt BBK11	
Frauscher	10024	Clamping Bolt BBK17.5	
Frauscher	10025	Clamping Bolt BBK22	
Frauscher	10034	GAK Cable Box SKV20	
Frauscher	11749	Wheel Sensor RSR180/S—250–5m tail cable	
Frauscher	14620	Wheel Sensor RSR180/S—250–10m tail cable	
Frauscher	18607	Wheel Sensor RSR180/S—250–15m tail cable	
Frauscher	16254	Wheel Sensor RSR180/S—250–25m tail cable	
Frauscher	12205	Protection Tube 4.8 m	
Frauscher	14475	Protection Tube 9.8 m	
Frauscher	17443	Protection Tube 14.8 m	
Frauscher	16906	Protection Tube 24.8 m	
Frauscher	13753	Voltage protection BSI004	
Frauscher	21512	Testing / Simulation Plate – PB200	
Frauscher	10108	Board Rack BGT04 84TE	
Frauscher	10265	Board Rack BGT05 42TE	
Frauscher	13516	Backplane ABP002-2 21TE	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Frauscher	13517	Backplane ABP002-3 25TE	
Frauscher	13518	Backplane ABP002-4 29TE	
Frauscher	13519	Backplane ABP002-5 33TE	
Frauscher	13520	Backplane ABP002-6 37TE	
Frauscher	13521	Backplane ABP002-D2 28TE	
Frauscher	13522	Backplane ABP002-D3 32TE	
Frauscher	13523	Backplane ABP002-D4 36TE	
Frauscher	13524	Backplane ABP002-D5 40TE	
Frauscher	13525	Backplane ABP002-D6 44TE	
Frauscher	13482	Axle Counting Board ACB010	
Frauscher	10114	Fuse Board SIB006	
Frauscher	13641	Fuse Board SIC006	
Frauscher	12756	Evaluation Board AMC001	Must not to be used for new works
Frauscher	13881	Evaluation Board IMC006	
Frauscher	16213	Evaluation Board IMC006	
Frauscher	14735	Digital Input/Output Board DIOB104	
Frauscher	20792	Diagnostic System FDS	
Frauscher	15521	Bus Transfer Entity BTE001	
'Bombardier' ML TI21 Digital Transmitter *			
Bombardier	L520014330	Frequency A 1699 Hz	For use with TI21 track circuits Standard frequency for use

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Bombardier	L520014331	Frequency B 2296 Hz	For use with TI21 track circuits Standard frequency for use
Bombardier	L520014332	Frequency C 1996 Hz	For use with TI21 track circuits Standard frequency for use
Bombardier	L520014333	Frequency D 2593 Hz	For use with TI21 track circuits Standard frequency for use
Bombardier	L520014334	Frequency E 1549 Hz	For use with TI21 track circuits Optional frequency for use when design requires
Bombardier	L520014335	Frequency F 2146 Hz	For use with TI21 track circuits Optional frequency for use when design requires
Bombardier	L520014336	Frequency G 1848 Hz	For use with TI21 track circuits Optional frequency for use when design requires
Bombardier	L520014337	Frequency H 2445 Hz	For use with TI21 track circuits Optional frequency for use when design requires
'Invensys' PSO 4000 AF Overlay Track Circuit *			
Siemens	7000-7A471	Transmitter	
Siemens	7000-7A473	Receiver	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	7000-7A475	Transceiver	
Siemens	7000-7A474	Crossing Assembly	
Siemens	7000-8A065A	Battery Choke	
Siemens	7000-7A418	Power Line Filter	
Siemens	7000-7A403	Line Overlay Coupler	
Siemens	7000-7A345	Line Terminator	
Siemens	7000-7A388	Line to Receiver Coupler	
Siemens	7000-7A355A-f	Tuned Receiver Coupler	
Siemens	7000-7A366-f		
Siemens	7000-7A377-1-f	Rx end Line/ Rail Coupler	
Siemens	7000-7A399-f	Tx end Line/ Rail Coupler	
Siemens	7000-7A422-f	IRJ Bypass coupler	
'Bombardier' ML T121 Digital Receiver *			
Bombardier	L520002390 (50V Relay Drive)	T121 Digital Receiver Unit Mod strike 1	For use with T121 track circuits
Bombardier	L520002500	Set up key	
Bombardier	L520002329	Standard Mounting Plate for T121 Digital Receiver	
Bombardier	L520008862	Rear Connection Mounting Plate for T121 Digital Receiver	
Bombardier	L520002422	Frequency A Key	
Bombardier	L520002423	Frequency B Key	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Bombardier	L520002424	Frequency C Key	
Bombardier	L520002425	Frequency D Key	
Bombardier	L520002426	Frequency E Key	
Bombardier	L520002427	Frequency F Key	
Bombardier	L520002428	Frequency G Key	
Bombardier	L520002429	Frequency H Key	
Bombardier	520001222	Female Straight	
Bombardier	520001224	Female right-angle	
Frauscher FADC Axle Counter System R1 * - Legacy Approval – Shall not be used for any new works on ARTC network. To be used only for like for like replacements.			
Frauscher	10021	Rail Claw SK140	
Frauscher	10025	Clamping Bolt BBK22	
Frauscher	10023	Clamping Bolt BBK11	
Frauscher	10034	GAK – Cable Termination Box SKV20	
Frauscher	11749	Wheel Sensor RSR180/S-250 – 5M tail cable	
Frauscher	14620	Wheel Sensor RSR180/S-250 – 10M tail cable	
Frauscher	18607	Wheel Sensor RSR180/S-250 – 15M tail cable	
Frauscher	16254	Wheel Sensor RSR180/S-250 – 25M tail cable	
Frauscher	12205	Protection Tube 4.8m	
Frauscher	14475	Protection Tube 9.8m	
Frauscher	17443	Protection Tube 14.8m	
Frauscher	16906	Protection Tube 24.8m	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Frauscher	13753	Voltage protection BSI004	
Frauscher	17390	Board Rack BGT07 84TE	
Frauscher	16878	Evaluation Board AEB001-1	
Frauscher	17028	Backplane BP-EXB001-1 10TE	
Frauscher	17061	Backplane BP-EXB001-2 16TE	
Frauscher	17516	Backplane BP-PWR001-0 8TE	
Frauscher	17520	Backplane BP-PWR001-4 24TE	
Frauscher	17524	Backplane BP-PWR001-8 40TE	
Frauscher	17535	Backplane BP-PWR001-19 84TE	
Frauscher	17437	Supply Board PSC001	
Frauscher	17438	Communication Board COM-AdC001	
Frauscher	20247	Communication Board COM-AdC001	
Frauscher	17439	In/Output Board IO-EXB001	
Frauscher	18159	Backplane Connector BP-EXB - Solder Version	
Frauscher	20042	Diag. System – FDS001 for FAdC	
Frauscher	18012	Service Display Cable ASD001	
Frauscher	20064	Service Display Cable ASD001	
Frauscher	18058	Patch cable S/FTP cat.6: 0.5m	
Frauscher	17825	Testing/Simulation Plate – PB200	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Sagem Cautor Mechanical Treadle *			
Unipart Rail	0086/046300	Treadle, Cautor, single arm, non-directional, fitted with 2 C/O contacts and terminals	
Unipart Rail	0039/029397	Setting Gauge, Complete With 2 Plumb Weights	
Unipart Rail	0086/046316	Mounting Bracket (Treadle Rail Mounting Base, FB Rail, Complete With Fixing Bolts)	
Unipart Rail	0027/025112	Treadle Oil (HVI 13 Hydraulic Oil)	
Frauscher FAdC R2 Axle Counter *			
Frauscher	19952	Backplane BP-PWR101-0 8 TE GS01	
Frauscher	19953	Backplane BP-PWR101-4 24 TE GS01	
Frauscher	19954	Backplane BP-PWR101-8 40 TE GS01	
Frauscher	19956	Backplane BP-PWR101-1 10 TE GS01	
Frauscher	19957	Backplane BP-PWR101-2 16 TE GS01	
Frauscher	19958	Backplane BP-PWR101-4 28 TE GS01	
Frauscher	19959	Backplane BP-PWR101-8 52 TE GS01	
Frauscher	21441	Backplane connection BP-EXB (Crimp)	
Frauscher	18159	Backplane connection BP-EXB (Solder)	
Frauscher	17390	Board Rack BGT07 84TE	
Frauscher	17391	Board Rack BGT08 42TE	
Frauscher	24050	Evaluation Board AEB101 GS04	
Frauscher	24051	Evaluation Board AEB101 GS05	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Frauscher	26534	Evaluation Board AEB101 GS07	
Frauscher	110302	Evaluation Board AEB101 GS09	
Frauscher	19949	Supply Board PSC101 GS01	
Frauscher	19950	Communication Board COM-AdC101 GS01	
Frauscher	23152	Communication Board COM-AdC101 GS02	
Frauscher	22867	Communication Board COM-FSE101 GS02	
Frauscher	23904	Communication Board COM-FSE101 GS03	
Frauscher	110206	Communication Board COM-FSE101 GS04	
Frauscher	22503	Communication Board COM-WNC101 GS01	
Frauscher	22443	Communication Board COM-FSFB101 GS02	
Frauscher	25861	Communication Board COM-FSFB101 GS03	
Frauscher	110279	Communication Board COM-FSFB101 GS04	
Frauscher	21626	Communication Board COM-RP101 GS01	
Frauscher	24436	Communication Board COM-RP101 GS02	
Frauscher	110338	Communication Board COM-RP101 GS03	
Frauscher	110323	In/Output board IO-EXB101 GS02	
Frauscher	21117	Diagnostic System FDS 101 GS01 for FAdC	
Frauscher	21058	Patch cable S/STP Cat. 6 Crossover 0.5m grey for hotlink	
Frauscher	21059	Patch Cable S/STP Cat.6 Crossover 1.0m grey for hotlink	
Frauscher	21060	Patch Cable S/STP Cat.6 Crossover 2.0m grey for hotlink	
Frauscher	18058	Patch cable S/FTP cat.6 0.5m green	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Frauscher	18059	Patch cable S/FTP cat.6 1.0m green	
Frauscher	18060	Patch Cable S/FTP Cat.6 2.0m green	
Frauscher	20865	Advanced Service Display ASD101 GS01 (R2)	
Frauscher	110236	Advanced Service Display ASD102 GS01 (R2)	
Frauscher	17707	Tool Set for mounting and maintenance	
Frauscher	21512	Testing plate (Dummy wheel) PB200 GS03	
Frauscher	10021	Rail Claw SK140	
Frauscher	22288	Rail Claw SK150 GS04	
Frauscher	10022	Clamping Bolt BBK5	
Frauscher	10023	Clamping Bolt BBK11	
Frauscher	10024	Clamping Bolt BBK17.5	
Frauscher	10025	Clamping Bolt BBK22	
Frauscher	10034	GAK Cable Box SKV20	
Frauscher	110645	Torque Wrench Set (60..300Nm)	
Frauscher	25186	TCB001 - Trackside Connection Box - 1 Wheel Sensor	
Frauscher	26403	TCB001 - Trackside Connection Box - 2 Wheel Sensor	
Frauscher	25187	TCB001 - Trackside Connection Box - 3 Wheel Sensor	
Frauscher	23320	Wheel Sensor RSR180-001 GS05 (5M Tail Cable)	
Frauscher	23529	Wheel Sensor RSR180-001 GS05 (10M Tail Cable)	
Frauscher	23531	Wheel Sensor RSR180-001 GS05 (15M Tail Cable)	
Frauscher	26786	Wheel Sensor RSR180-001 GS05 (25M Tail Cable)	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Frauscher	12205	Protection Tube 4.8 m	
Frauscher	14475	Protection Tube 9.8 m	
Frauscher	17443	Protection Tube 14.8 m	
Frauscher	16906	Protection Tube 24.8 m	
Frauscher	13753	Voltage protection BSI004	
Frauscher	26547	Protection Tube 29.6m	
'Frauscher' Wheel Sensor RSR123 with associated Rail Claw* - Approved to be used between Mile End and Salisbury, South Australia Only			
Frauscher	22276	Wheel Sensor RSR123 003 GS05	
Frauscher	13655	Connection cable pluggable 5 m with protection tube (For RSR123)	
Frauscher	14397	Connection cable pluggable 10 m with protection tube (For RSR123)	
Frauscher	14398	Connection cable pluggable 25 m with protection tube (For RSR123)	
Frauscher	22288	Rail Claw SK150 GS04	
Frauscher	16946	Rail Claw SK150-002 GS02	
'MW Engineers' Axle Counter Reset Box			
MW Engineers	CA10B-AU001817	Reset Switch Kraus and Naimer	
MW Engineers	431-7548	Door Solenoid SAIA – Burgress	
MW Engineers	515-785	Door Lock Microswitch Honeywell V15H22	
MW Engineers	331-7569	Escutcheon Panel Door Sensor ASSEMtech PTA230/30	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
MW Engineers	Z0232	Green LED Chrome Bexel Altronics	
MW Engineers	Z0230	Red LED Chrome Bexel Altronics	
MW Engineers	159-461	330 ohm resistor	
MW Engineers	159-449	150 ohm resistor	
'Aldridge' Axle Counter Reset Box			
Aldridge Railway Signals Pty Ltd	PF1356	Enclosure 400x400x200 S/S	
Aldridge Railway Signals Pty Ltd	PP0107	Lock Cover Bush Brass	
Aldridge Railway Signals Pty Ltd	PL0542	Lock Operator Key OP3 with cam	
Aldridge Railway Signals Pty Ltd	R2300	Solenoid Cover	
2.5 Level Crossing Equipment			
Fastron P971211 Current Sensor *			
Fastron Technologies Pty. Ltd	DC Current Transducer P971211	DC Current Transducer P971211	For use with Cerberus and Citect/Broderson Level crossing Monitors in accordance with Design Guidelines.
APCS Current Transducer@			
APCS	DC Current Transducer	DC Current Transducer DCT247	
Safetran Electronic Highway Crossing Bell *			
Siemens	NO. 80301-0002 (Loud) - Preferred No. 80301-0004 (Soft)	Electronic Highway Crossing Bell	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
SAFETRAN' updated GCP4000 development system software (DT) *			
Siemens	Refer TA certificate for full list of approved items	Safetran updated GCP4000 development system software	Refer TA Certificate 08-08-10-091 on ARTC extranet
'Siemens' Grade Crossing Predictor (GCP) 4000 *			
Siemens	Refer TA certificate for full list of approved items	'Siemens' Grade Crossing Predictor (GCP) 4000	Refer TA Certificate NESA-S099 on ARTC extranet
Western Cullen Hayes 3590-131-MI and 3593-131-MI Level Crossing Equipment *			
Bradken	Refer TA certificate for full list of approved items	Western Cullen Hayes 3590-131-MI and 3593-131-MI	Refer TA Certificate S-02-1214-163 on ARTC extranet
Potter & Brumfield – KUMP Series Panel Plug-In Relay *			
Aldridge	KUMP-11D18-12	12VDC (CO) Relay with 15A Contactors	
Aldridge	KUMP-7D18-12	12VDC (NO) Relay with 15A Contactors	
Aldridge	KUMP-7D18-24	24VDC (NO) Relay with 15A Contactors	
Aldridge	KUMP-7D18-48	48VDC (NO) Relay with 15A Contactors	
Aldridge	KUMP-8D18-12	12VDC (NC) Relay with 15A Contactors	
Aldridge	KUMP-8D18-24	24VDC (NC) Relay with 15A Contactors	
Aldridge	KUMP-8D18-48	48VDC (NC) Relay with 15A Contactors	
Aldridge	KUMP-7A18-120	120VAC (NO) Relay with 15A Contactors	
Aldridge	KUMP-8A18-120	120VAC (NC) Relay with 15A Contactors	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Aldridge	2.70E+122	Base	
Australian Rail Technology (ART) – Battery Voltage Monitor (BVM) *			
Australian Rail Technology	XP3508-1000	Battery Voltage Monitor	
Australian Rail Technology	XP3508-1015	Battery Voltage Monitor	
Aldridge RK503FL-1 Level Crossing LED *			
Aldridge	RK503FL-1	200mm Red Level Crossing LED	
Aldridge	RL503FL	Complete housing with hood and background etc. Includes RK503FL-1 module	
Securitron SAMB Shear Aligning Magnalock & Surface Mount Strike Housing SMSS *			
Magnetic Automation	MRGE 1A-101	Magnetically latched gate assembly for emergency exit pedestrian crossing - Left hand opening	
	MRGE 1B-101	Magnetically latched gate assembly for emergency exit pedestrian crossing - Right hand opening	
'ElectroLogiXS XP4 Level Crossing Predictor Upgrade *			
Alstom	Refer TA certificate for full list of approved items	Eletrologixs XP4 level crossing predictor	Refer TA Certificate S-01-1802-AL227 on ARTC extranet
Siemens' LX Flashing Warning Light LED Housing – HC200 *			
Siemens	250101401	HC200 level crossing warning light complete assembly (Includes medium range 12v Red Led module (5519/12RMR))	
Siemens	250101403	HC200 level crossing warning light complete assembly (Includes intermediate range 12v Red Led module (5519/12RIR))	
Siemens	5519/12RMR	LED Module 12V Red - Medium	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	5519/12RIR	LED Module 12V Red - Intermediate	
Siemens	250305901	Hood HC200 Flashing Light	
Siemens	250305801	Background HC200 Flashing Light	
Siemens	3650118202	Side Light White LED	
Siemens	250306001	Lens Side Light HC200 Flashing Light	
Siemens	M20864	Hood HC101L Flashing Light/HC100 Hood (Hood 260 LG)	
Siemens	M20863	Background HC101L Flashing Light/HC100 Background 0508	
Elf Electronics' Cerberus Level Crossing Monitor – V4 *			
-	Cerberus Level Crossing Monitor – V4		Limited approval. Only approved for 26 sites on the Portland Line, Victoria
Elsema' Remote Activation of Level Crossing by Radio Control *			
Pure Electronics Pty Ltd	MCT91502	Transmitter – Handheld Remote	Only approved to be used in Telarah to Acacia Ridge (Interstate Network)
Pure Electronics Pty Ltd	MCR91501P(T)	2 Channel, 915 MHz Receiver with Frequency Hopping	
'Brodersen RTU32N and RTU32M – Limited(Trial Only) *			
Brodersen	--	Brodersen RTU32N	Part numbers can be configured as per project requirements in consultation with Brodersen
Brodersen	MP32A	CPU – Controller Module	Modules for RTU32M
Brodersen	SP04A	4 Serial Ports (3x232, 1x 232/485)	
Brodersen	SP04B	RS232/RS485 Serial Communications Module	
Brodersen	PS24A	Power Supply (10-30V)	
Brodersen	PS48A	Power Supply (30-60V)	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Brodersen	AI08A	8ch Analog Inputs	
Brodersen	AO02A	2ch Analog Outputs (Current and Voltage)	
Brodersen	AO02B	2ch Analog Output Module (Current)	
Brodersen	DI20A, DI20B	20ch Digital Inputs (12-24V, 30-60V)	
Brodersen	DI20C	20ch Digital/Counter Inputs (24V)	
Brodersen	DI12H	12ch Digital Inputs (90-140V)	
Brodersen	DI12B)	12ch Digital Inputs (30-60V)	
Brodersen	DO08R	8ch Relay Outputs (NC/C/NO)	
Brodersen	DO12R	12ch Relay Outputs (NO)	
Brodersen	DO20A	20ch Digital Outputs	
Brodersen	DM20A	Comb. 10ch DI + 10ch DO	
Brodersen	DM20C	Comb. 8ch DI + 2ch Ctr + 10ch DO	
Brodersen	I/O14A / I/O14B	Comb. 3 AI + 1 AO + 8 DI + 2 DO	
2.6 Interlocking			
'Hitachi Rail Microlok II Interlocking System *			
Hitachi Rail STS	Refer TA certificate for full list of approved items	'Hitachi Rail' Microlok II Interlocking System	Refer TA Certificate NESAS-S048 on ARTC extranet
Westrace MkII Computer Based Interlocking *			

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	Refer TA certificate for full list of approved items	Westrace MKII - Computer Based Interlocking System	Refer TA Certificate S-01-1204-130B on ARTC extranet
Westlock Computer Based Interlocking *			
Siemens	Refer TA certificate for full list of approved items	Westlock Computer Based Interlocking	Refer TA Certificate S-01-1405-165 on ARTC extranet
Microlock Dual Seamless Changeover *			
Hitachi Rail STS	Refer TA certificate for full list of approved items	Microlock Dual Seamless Changeover	Refer TA Certificate S-01-1511-198A on ARTC extranet
Alstom VPI II Interlocking System *			
Alstom	Refer TA certificate for full list of approved items	Alstom VP II Interlocking System	Refer TA Certificate 08-08-10-035 on ARTC extranet
SIEMENS' SIMATIC (SICAS S7) Interlocking System *			
Siemens	Refer TA certificate for full list of approved items	Siemens SIMATIC (SICAS S7) Interlocking System	Refer TA Certificate 08-08-10-059 on ARTC extranet
'SAFETRAN' Geographic Signalling System (GEO) *			
Siemens	Refer TA certificate for full list of approved items	'SAFETRAN' Geographic Signalling System (GEO)	Refer TA Certificate 08-08-010-058 on ARTC extranet
Westrace- Computer Based Interlocking System *			
Siemens	Refer TA certificate for full list of approved items	Westrace-Computer Based Interlocking System	Refer TA Certificate S-01-10-096 on ARTC extranet
Westrace Protocol Converter *			

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	CNA1000	Communication Network Adaptor - Westrace to Genisys Protocol Converter	Firmware version 2.02
Protocol Converter CNA2000 *			
Siemens	CAN2000	Communication Network Adaptor - Protocol Converter	Firmware version CNA1505v1.0.1
Siemens' Control System Gateway *			
Siemens	Refer TA certificate for full list of approved items	Siemens Control System Gateway	Refer TA Certificate S-03-1422-158 on ARTC extranet
GETS EC5 Computer Based Interlocking *			
Alstom	Refer TA certificate for full list of approved items	GETS EC5 Computer Based Interlocking	Refer TA Certificate S-01-0912-100 on ARTC extranet
HIMA' HIMatrix Computer Based Interlocking *			
HIMA Australia Pty Ltd	Refer TA certificate for full list of approved items	HIMA Computer Based Interlocking	Refer TA Certificate NESAS-S053 on ARTC extranet
2.7 Relays			
'Crompton Greaves' Miniature Plug-in Relays (Q Type) *			
Selectrix	QBA1-4842137	QBA1 – 12F/4B (50v DC)	
Selectrix	QBA1-4842149	QBA1 – 8F/8B (50v DC)	
Selectrix	QBA1-4842137	QBA1 – 8F/4B (50v DC)	(Use 12F/4B for new works).
Selectrix	QBA1-4842149	QBA1 – 6F/6B (50v DC)	Use 8F/8B for new works).
Selectrix	QBA1-4842149	QBA1 – 4F/4B (50v DC)	(Use 8F/8B for new works).
Selectrix	QBBA1-4842164	QBBA1 – 2x6F/2B (50v DC)	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Selectrix	QBBA1-4842176	QBBA1 - 2x4F/4B (50v DC)	
Selectrix	QBCA1-4842033	QBCA1 – 2HF/4B (50v DC)	
Selectrix	QBCA1-4842045	QBCA1 – 2HF/4F/4B (50v DC)	
Selectrix	QL1- 4841735	QL1 – 11F/4B (50v DC)	
Selectrix	QL1- 4841747	QL1 – 8F/6B (50v DC)	
Selectrix	QN1- 4841153	QN1 – 12F/4B (50v DC)	
Selectrix	QN1- 4841165	QN1 – 8F/8B (50v DC)	
Selectrix	QNA1-4841233	QNA1 – 12F/4B (50v DC)	
Selectrix	QNA1-4841245	QNA1 – 8F/8B (50v DC)	
Selectrix	QNA1-4841233	QNA1 – 8F/4B (50v DC)	(Use 12F/4B for new works).
Selectrix	QNHX1-4842363	QNHX1 – 8F/4B (110v AC)	Not immune to DC current.
Selectrix	QNHXC1-4842387	QNHXC1 – 2HF/4F/4B (110v AC)	Not immune to DC current.
Selectrix	QNN1-4842547	QNN1 – 2x6F/2B (50v DC)	
Selectrix	QNN1-4842535	QNN1 - 2x4F/4B (50v DC)	
Selectrix	QNN1-4842523	QNN1 – 2x6F/2B (24v DC)	
Selectrix	QNN1-4842511	QNN1 - 2x4F/4B (24v DC)	
Selectrix	QNNA1-4842574	QNNA1 – 2x6F/2B (50v DC)	
Selectrix	QNNA1-4842598	QNNA1 – 2x4F/4B (50v DC)	
Selectrix	QSPA1-4841429	QSPA1 – 8F/4B (50v DC)	
Selectrix	QSRA1-4841468	QSRA1 – 8F/4B (50v DC)	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Selectrix	QT2- 4841349	QT2 – 8F/8B (250Ω)	For use with CSEE track circuit equipment only.
Selectrix	QTA2-4841524	QTA2 -2F (9Ω)	(Use 2F/2B for new works).
Selectrix	QTA2-4841512	QTA2 -2F/1B (9Ω)	(Use 2F/2B for new works).
Selectrix	QTA2-4841536	QTA2 -2F/2B (9Ω)	
Selectrix	QUCX1-4842324	QUCX1 – 2F/2B (1.4A)	
Selectrix	QN1-4841141	QN1 – 12F/4B 12v DC (100 Ω)	BR Spec 930A
Selectrix	QN1-4841138	QN1 – 8F/8B 12v DC (100 Ω)	BR Spec 930A
Selectrix	QNN1-4842603	QNN1 – 2x6F/2B 12v DC	BR Spec 960
Selectrix	QNN1- 4842559	QNN1 – 2x4F/4B 12v DC	BR Spec 960
Selectrix	QBA1- 4842249	QN1 – 12F/4B 12v DC	BR Spec 932A
Selectrix	QS2- 4841667	QS2 – 6F/6B 12v DC	BR Spec 930A
'Idec-Izumi' Non-vital Plug-in 'octal' Relays *			
IDEC Australia	RR2P-U	DC48V 2 pole c/o 8 pin plug.	
IDEC Australia	RR3P-U	DC12V 3 pole c/o 11 pin plug.	
IDEC Australia	RR3P-U	DC24V 3 pole c/o 11 pin plug.	
IDEC Australia	RR3P-U	DC48V 3 pole c/o 11 pin plug.	
IDEC Australia	RR3P-U	DC110V 3 pole c/o 11 pin plug.	
IDEC Australia	RR3P-U	AC24V 3 pole c/o 11 pin plug.	
IDEC Australia	RR3P-U	AC48V 3 pole c/o 11 pin plug.	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
IDEC Australia	RR3P-U	AC120V 3 pole c/o 11 pin plug.	
IDEC Australia	RR3P-U	AC240V 3 pole c/o 11 pin plug.	
IDEC Australia	SR2P-05C	8 pin base.	DIN rail mounting.
IDEC Australia	SR3P-05C	11 pin base.	
IDEC Australia	SR2P-51	8 pin base.	Panel mounting.
IDEC Australia	SR3P-51	11 pin base.	
IDEC Australia	SR2B-02F1	Retaining clip.	For SR2P-05C base.
IDEC Australia	SR3B-01F1	Retaining clip.	For SR2P-51 or SR3P-51 base.
IDEC Australia	SR3B-02F1	Retaining clip.	For SR3P-05C base.
Omron' Non-vital Plug-in 'octal' Relays *			
Omron Electronics Pty. Ltd	MK2P-I	DC48V 2 pole c/o 8 pin plug.	
Omron Electronics Pty. Ltd	MK3P-I	DC12V 3 pole c/o 1 pin plug.	
Omron Electronics Pty. Ltd	MK3P-I	DC24V 3 pole c/o 11 pin plug.	
Omron Electronics Pty. Ltd	MK3P-I	DC48V 3 pole c/o 11 pin plug.	
Omron Electronics Pty. Ltd	MK3P-I	DC110V 3 pole c/o 11 pin plug.	
Omron Electronics Pty. Ltd	MK3P-I	AC24V 3 pole c/o 11 pin plug.	
Omron Electronics Pty. Ltd	MK3P-I	AC120V 3 pole c/o 11 pin plug.	
Omron Electronics Pty. Ltd	MK3P-I	AC240V 3 pole c/o 11 pin plug.	
Omron Electronics Pty. Ltd	Bases & Clips		
Omron Electronics Pty. Ltd	PF083A-E	8 pin base.	DIN rail or panel mounting.
Omron Electronics Pty. Ltd	PF113A-E	11 pin base.	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Omron Electronics Pty. Ltd	PFC-A1	Retaining clip.	
Fuji' Non-vital Plug-in 'octal' Relays *			
K.D.Fisher & Co.	RC2CPWT-DF	HH22PW-T DC48V 2 pole c/o 8 pin plug.	
K.D.Fisher & Co.	RC3CPWT-DE	HH23PW-T DC24V 3 pole c/o 11 pin plug.	
K.D.Fisher & Co.	RC3CPWT-DF	HH23PW-T DC48V 3 pole c/o 11 pin plug.	
K.D.Fisher & Co.	RC3CPWT-DH	HH23PW-T DC110V 3 pole c/o 11 pin plug.	
K.D.Fisher & Co.	RC3CPWT-AE	HH23PW-T AC24V 3 pole c/o 11 pin plug.	
K.D.Fisher & Co.	RC3CPWT-AF	HH23PW-T AC48V 3 pole c/o 11 pin plug.	
K.D.Fisher & Co.	RX38X0	TP38X 8 pin base.	DIN rail mounting.
K.D.Fisher & Co.	RX31X0	TP311X 11 pin base.	
K.D.Fisher & Co.	RX38S0	TP38S 8 pin base.	Panel mounting.
K.D.Fisher & Co.	RX31S0	TP311S 11 pin base.	
K.D.Fisher & Co.	RZ1B	FX1B Hold-down Spring	
'Crompton Greaves' QBCA1 12v Miniature Plug-In Relays *			
Selectrix	QBCA1 - 4842072	QBCA1 - 2HF/4F/4B 12v DC	
'Invensys Rail' Lamp Proving Relay QECX20 *			
Siemens	B18513/27	Lamp proving relay QECX20	For use with RM4 LED signals
	M31538	Plugboard For QECX20	
'Siemens' (Q Type) Vital Relays *			
Siemens	B18548/2	QBCA1 – 2HF/4B (24V DC)	
Siemens	B18548/9	QBCA1 – 2HF/2F/4B (24V DC)	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	M25049	QEC1 – 4F/2B (12v DC)	16W LEDs = 100ms (slow to drop) 24W LEDs = 200ms (slow to drop)
Siemens	M25455	QEC1	
Siemens	M25051	QBA1 – 12F/4B (50v DC)	
Siemens	M25052	QBA1 – 8F/8B (50v DC)	
Siemens	M25032	QBT1 – 2F/2B (4W)	
Siemens	M25101	QBBA1 – 2x6F/2B (50v DC)	
Siemens	M25102	QBBA1 – 2x4F/4B (50v DC)	
Siemens	M25132	QBBA1 – 2x4F/4B (12v DC)	
Siemens	M25066	QBCA1 – 2HF/4B (50v DC)	
Siemens	M25068	QBCA1 – 2HF/4F/4B (50v DC)	
Siemens	M25070	QBCA1 – 2HF/4F/4B (12v DC)	
Siemens	M25170	QCJ1 – 1F/3B 10s (50v DC)	
Siemens	M25178	QCJ1 – 1F/3B 14s (50v DC)	
Siemens	M30852	QECX1 – 4F/2B (180mA)	
Siemens	M25021	QL1 – 11F/4B (50v DC)	
Siemens	M25023	QL1 – 8F/6B (50v DC)	
Siemens	M25024	QL1 – 11F/4B (12v DC)	
Siemens	M25001	QN1 – 12F/4B (50v DC)	
Siemens	M25002	QN1 – 8F/8B (50v DC)	
Siemens	M25012	QN1 – 8F/8B (12v DC)	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	M25039	QN1 – 8F/8B (24v DC)	
Siemens	M25007	QN1 – 8F/8B (24v DC)	
Siemens	M25071	QNA1 – 12F/4B (50v DC)	
Siemens	M25072	QNA1 – 8F/8B (50v DC)	
Siemens	M25029	QNHX1 – 8F/4B (110v AC)	Not immune to DC current
Siemens	M30861	QNHXC1 – 2HF/4F/4B (110v AC)	Not immune to DC current
Siemens	M25107	QNN1 – 2x6F/2B (50v DC)	
Siemens	M25108	QNN1 – 2x4F/4B (50v DC)	
Siemens	M25110	QNN1 – 2x6F2B (24v DC)	
Siemens	M25113	QNNA1 – 2x6F/2B (50v DC)	
Siemens	M25188	QR5 – 4/7s slug	Use with 50v DC BR930 relay (QN1)
Siemens	M25189	QR5 – Capacitor Unit	Use in flashing circuit
Siemens	M25192	QR9 – Diode Unit	
Siemens	M25028	QS2 – 6F/6B (12v DC)	
Siemens	M25081	QSPA1 – 8F/4B (50v DC)	
Siemens	M25041	QSR3 – 4F/2B (105mA)	
Siemens	M25086	QSRA1 – 8F/4B (50v DC)	
Siemens	M25031	QT2 – 2F/2B (4W)	
Siemens	M25092	QTA2 – 2F/2B (9W)	
Siemens	M25159	QTD4 – 3 to 300s (0.5A)	
Siemens	M25161	QTD5 – 5F/2B (50v DC)	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	M25162	QTD5 – 4F/3B (50v DC)	
Siemens	M25165	QTD5 – 5F/2B (12v DC)	
Siemens	M25385	QTM1 – 4F/2MB (4W)	
Siemens	M25199	QXR1 – T/J (110v AC/50v DC)	
Siemens	Bases		
Siemens	M19051	QBA1	
Siemens	M19170	QBA1	
Siemens	M25471	QBT1	
Siemens	M23650	QBBA1	
Siemens	M23451	QBBA1	
Siemens	M25484	QBBA1	
Siemens	M23430	QBCA1	
Siemens	M25451	QBCA1	
Siemens	M25479	QBCA1	
Siemens	M24875	QCJ1	
Siemens	M25499	QCJ1	
Siemens	M31000	QECX1	
Siemens	M19295	QL1	
Siemens	M20518	QL1	
Siemens	M25474	QL1	
Siemens	M19294	QN1	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	M20202	QN1	
Siemens	M23107	QN1	
Siemens	M20038	QN1	
Siemens	M23280	QN1	
Siemens	M23080	QNA1	
Siemens	M23976	QNA1	
Siemens	M25490	QNHX1	
Siemens	M31189	QNHXC1	
Siemens	M23646	QNN1	
Siemens	M23647	QNN1	
Siemens	M24169	QNNA1	
Siemens	M24044	QR5	Use for 4/7s slug.
Siemens	M24233	QR5	Use for flashing circuit.
Siemens	M24089	QR9	
Siemens	M23059	QS2	
Siemens	M20265	QSPA1	
Siemens	M19039	QSR3	May be used for AC lamp circuits.
Siemens	M25470	QSR3	
Siemens	M18993	QSRA1	
Siemens	M20989	QT2	
Siemens	M23444	QTA2	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	M22312	QTD4	
Siemens	M23398	QTD5	
Siemens	M23465	QTD5	
Siemens	M23438	QTD5	
Siemens	M25493	QTM1	
Siemens	M23820	QXR1	
Mors Smitt - SEC1 (QEC1) Vital Relay *			
Wabtec Control Systems Pty Ltd	TY133/GRP02	SEC1 (QEC1)	16W LEDs = 100ms (slow to drop) 24W LEDs = 200ms (slow to drop)
Mors Smitt – BR930 Spec 'Q' Relays *			
Wabtec Control Systems Pty Ltd	TY084/GRP06	QBA1 - 12F/4B (50v DC)	
Wabtec Control Systems Pty Ltd	TY084/GRP08	QBA1 - 8F/8B (50v DC)	
Wabtec Control Systems Pty Ltd	TY084/GRP02	QBA1 - 8F/4B (24v DC)	
Wabtec Control Systems Pty Ltd	TY157/GRP01	QBBA1 - 2x6F/2B (50v DC)	
Wabtec Control Systems Pty Ltd	TY157/GRP02	QBBA1 - 2x4F/4B (50v DC)	
Wabtec Control Systems Pty Ltd	TY157/GRP09	QBBA1 - 2x4F/4B (12v DC)	
Wabtec Control Systems Pty Ltd	TY154/GRP03	QBCA1 - 2HF/4B (50v DC)	
Wabtec Control Systems Pty Ltd	TY154/GRP06	QBCA1 - 2HF/4F/4B (50v DC)	
Wabtec Control Systems Pty Ltd	TY154/GRP09	QBCA1 - 2HF/4F/4B (12v DC)	
Wabtec Control Systems Pty Ltd	TY133/GRP02	QEC1 4F/2B (12v DC)	16W LEDs = 100ms (slow to drop) 24W LEDs = 200ms (slow to drop)

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Wabtec Control Systems Pty Ltd	TY132/GRP16	QECX1 4F/2B (180mA)	
Wabtec Control Systems Pty Ltd	TY087/GRP02	QL1 - 11F/4B (50v DC)	
Wabtec Control Systems Pty Ltd	TY087/GRP04	QL1 - 8F/6B (50v DC)	
Wabtec Control Systems Pty Ltd	TY082/GRP11	QN1 - 12F/4B (50v DC)	
Wabtec Control Systems Pty Ltd	TY082/GRP15	QN1 - 8F/8B (50v DC)	
Wabtec Control Systems Pty Ltd	TY082/GRP30	QN1 - 8F/8B (12v DC)	
Wabtec Control Systems Pty Ltd	TY182/GRP26	QN1 - 12F/4B (12v DC)	
Wabtec Control Systems Pty Ltd	TY083/GRP06	QNA1 - 12F/4B (50v DC)	
Wabtec Control Systems Pty Ltd	TY083/GRP08	QNA1 - 8F/8B (50v DC)	
Wabtec Control Systems Pty Ltd	TY192/GRP01	QNHX1 - 8F/4B (110v AC)	Not immune to DC current
Wabtec Control Systems Pty Ltd	TY156/GRP01	QNN1 - 2*6F/2B (50v DC)	
Wabtec Control Systems Pty Ltd	TY156/GRP02	QNN1 - 2*4F/4B (50v DC)	
Wabtec Control Systems Pty Ltd	TY156/GRP04	QNN1 - 6F/2B (24v DC)	
Wabtec Control Systems Pty Ltd	TY156/GRP05	QNN1 - 4F/4B (24v DC)	
Wabtec Control Systems Pty Ltd	TY156/GRP15	QNN1 - 6F/2B (12v DC)	
Wabtec Control Systems Pty Ltd	TY160/GRP01	QNNA1 - 2*6F/2B (50v DC)	
Wabtec Control Systems Pty Ltd	TY160/GRP02	QNNA1 - 4F/4B (50v DC)	
Wabtec Control Systems Pty Ltd	TY370/GRP21	QR5 - Capacitor Unit	Use in flashing circuit
Wabtec Control Systems Pty Ltd	TY085/GRP02	QSPA1 - 8F/4B (50v DC)	
Wabtec Control Systems Pty Ltd	TY086/GRP02	QSRA1 - 8F/4B (24v DC)	
Wabtec Control Systems Pty Ltd	TY086/GRP02	QSRA1 - 8F/4B (50v DC)	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Wabtec Control Systems Pty Ltd	TY153/GRP05	QTA2 - 2F/2B (9 ohm)	
Wabtec Control Systems Pty Ltd	TY303/GRP01	QXR1 - T/J (110v AC/50v DC)	
Wabtec Control Systems Pty Ltd	TY155/GRP01	QCJ1 – 1F/3B – 24v DC	
Wabtec Control Systems Pty Ltd	TY155/GRP02	QCJ1 – 1F/3B – 50v DC	
Wabtec Control Systems Pty Ltd	TY163/GRP01	QRJ1 – 1F 1B – 22-30v DC	3 sec time delay
Wabtec Control Systems Pty Ltd	TY163/GRP02	QRJ1 – 1F 1B – 22-30v DC	5 sec time delay
Wabtec Control Systems Pty Ltd	TY163/GRP03	QRJ1 – 1F 1B – 22-30v DC	6 sec time delay
Wabtec Control Systems Pty Ltd	TY163/GRP04	QRJ1 – 1F 1B – 22-30v DC	7.5 sec time delay
Wabtec Control Systems Pty Ltd	TY163/GRP05	QRJ1 – 1F 1B – 22-30v DC	10 sec time delay
Wabtec Control Systems Pty Ltd	TY163/GRP06	QRJ1 – 3F 1B – 50v DC	10 sec time delay
Wabtec Control Systems Pty Ltd	TY081-S-xxxx-C		XXXXX is the relay pin code. For example, TY 081-S-004-C is the plugboard for the TY 082/GRP15 relay (QN1 – 8F/8B 50v DC).
Alstom Micronome Slow to Operate Timer Relays			
Alstom	L520008826	Micronome ET-R3 High Integrity Programmable Electronic Timer – 24V DC slow to operate 3-381 seconds with Q relay pin code 190	
Alstom	085/001461	MICRONOME ET-R1 High Integrity Programmable Electronic Timer – 50V DC slow to operate 2-254 seconds with Q relay pin code 189	
2.8 Surge Protection Equipment			
'Weidmüller' DKU 48Vuc Overvoltage Protection Unit *			

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Weidmuller Pty. Ltd.	8019280000	DKU 32 48VUC 0.3A	
Weidmuller Pty. Ltd.	8019290000	DKU 35 48VUC 0.3A	
'U.S.&S.' Lightning Arresters (E-Zvue) *			
Hitachi Rail STS	N451552-0101	Low Voltage	
Hitachi Rail STS	N451552-0201	High Voltage	
Hitachi Rail STS	N451552-0401	AC Line	
'Elsafe' Transient Protection Equipment *			
Elsafe Australia Pty Ltd	216630	DC line/tail input circuit ripple filter and over-voltage clamp	
Elsafe Australia Pty Ltd	216640	DC line/tail input circuit ripple filter and over-voltage clamp	
Elsafe Australia Pty Ltd	216655	DC line/tail output circuit surge diverter	
Elsafe Australia Pty Ltd	216660	AC line/tail output circuit surge diverter	
Elsafe Australia Pty Ltd	216680	DC line/tail circuit surge diverter	
Elsafe Australia Pty Ltd	216690	DC line/tail circuit surge diverter	
Elsafe Australia Pty Ltd	555720	DC line/tail circuit over-voltage clamp	
Elsafe Australia Pty Ltd	216670	VF data line Modem/Fax over-voltage arrestor	
Elsafe Australia Pty Ltd	555175	Spark gap/MOV track arrestor	
Elsafe Australia Pty Ltd	555715	Spark gap/MOV track arrestor	
Elsafe Australia Pty Ltd	555716	Spark gap/MOV track arrestor	
Elsafe Australia Pty Ltd	555128	Balanced power supply over-voltage arrestor	
Elsafe Australia Pty Ltd	555670	Line to Line or Line to Earth surge arrestor/diverter	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Elsafe Australia Pty Ltd	555680		
Elsafe Australia Pty Ltd	555690		
Elsafe Australia Pty Ltd	216621	Safety Isolation Cassette	
Elsafe Australia Pty Ltd	216620	Dual Through Link cassette	
Elsafe Australia Pty Ltd	216600A	Termination Module	
Elsafe Australia Pty Ltd	216605A		
'Exelectronics' Surge Protection Panel (ISGP) *			
Exelectronics Pty Ltd	E14001 (50A 120V)		
Exelectronics Pty Ltd	E14002 (100A 120V)		
Exelectronics Pty Ltd	E14003 (150A 120V)		
Exelectronics Pty Ltd	E14004 (200A 120V)		
Exelectronics Pty Ltd	E14250 (250A 120V)		
Exelectronics Pty Ltd	E14350 (350A 120V)		
Exelectronics Pty Ltd	E14005 (50A 240V)		
Exelectronics Pty Ltd	E14084 (100A 240V)		
Exelectronics Pty Ltd	E14273 (150A 240V)		
Exelectronics Pty Ltd	E14236 (200A 240V)		
Exelectronics Pty Ltd	E14274 (250A 240V)		
Exelectronics Pty Ltd	E14351 (350A 240V)		
Exelectronics Pty Ltd	E14007 (50A 415V)		

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Exelectronics Pty Ltd	E14008 (100A 415V)		
Exelectronics Pty Ltd	E14273 (150A 415V)		
Exelectronics Pty Ltd	E14010 (200A 415V)		
Exelectronics Pty Ltd	E14011 (250A 415V)		
Exelectronics Pty Ltd	E14352 (350A 415V)		
Exelectronics Pty Ltd	E14006 (50A 440V)		
Exelectronics Pty Ltd	E14275 (100A 440V)		
DEHN' SDS 1 Voltage Limiting Device *			
DEHN + SÖHNE GmbH+Co.KG	923 110	Voltage Limiting Device	
	723 199	Mast Adapter for SDS-1	
'Safetrack Australasia' Transient Protection Equipment *			
Safetrack Australasia	STC-18S/S4	18V peak - maximum voltage	
Safetrack Australasia	STC-32S/S4	32V peak - maximum voltage	
Safetrack Australasia	STC-60S/S4	60V peak - maximum voltage	
Safetrack Australasia	STC-18S/S4	18V peak - maximum voltage	
Safetrack Australasia	STC-32S/S4	32V peak - maximum voltage	
Safetrack Australasia	STC-60S/S4	60V peak - maximum voltage	
Safetrack Australasia	STC-90S/S4	90V peak - maximum voltage	
Safetrack Australasia	STC-150S/S4	150V peak - maximum voltage	
Safetrack Australasia	STC-18S/NEQ	18V peak - maximum voltage	
Safetrack Australasia	STC-10A 24	30V rms - maximum voltage	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Safetrack Australasia	STC-10A 120	150V rms - maximum voltage	
Safetrack Australasia	STC-10A 240	275V rms - maximum voltage	
Safetrack Australasia	STC-120/80	150V rms - maximum voltage	
Safetrack Australasia	STC-240/80	275V rms - maximum voltage	
Safetrack Australasia	STC-440/80	476V rms - maximum voltage	
Safetrack Australasia	STC-150/820WE	200V rms - maximum voltage	
Safetrack Australasia	STC-150/80ST	150V rms - maximum voltage	
Critec' Rail Transient Current Barrier Products *			
Erico Products Australia	UTB-9	Transient Barrier 9v Clamp	
Erico Products Australia	UTB-18	Transient Barrier 18v Clamp	
Erico Products Australia	UTB-S	Transient Barrier for telephone circuits	
Erico Products Australia	SLP10-K3F	Subscriber Line Protector.	
Erico Products Australia	UTB-36-R2	Transient Barrier 36-R2, 36v Clamp	
Erico Products Australia	RTB-12-S2	Transient Barrier 12v DC, 20kA	
Erico Products Australia	RTB-30-S3	Transient Barrier 30v DC, 20kA	
Erico Products Australia	RTB-50-S2	Transient Barrier 50v DC, 20kA	
Erico Products Australia	RTB-30-S3M	Replaceable protection modules for RTB-30-S3	
Erico Products Australia	RTB-50-S2M	Replaceable protection modules for RTB-50-S2	
Erico Products Australia	TSG1130-2S-NE	Triggered Spark-gap, 130kA, N/E	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Erico Products Australia	DSF-6A-150v	1ph, 150v AC, 6A, 16+16+16kA, 3 mode Surge Filter	
Erico Products Australia	DSF-6A-30v	1ph, 30v AC/DC, 6A, 4+4+4kA, 3 mode, Surge Filter	
Erico Products Australia	DSD1160-8S	240v Line-Neutral Surge Diverter	
Erico Products Australia	TDS-MT-277	240v Line-Neutral Surge Diverter	
Erico Products Australia	PRF-50A-120 V2	Primary Rail Filter, 50A, 120v	
Erico Products Australia	PRF-100A-120	Primary Rail Filter, 50A, 120v	
Erico Products Australia	TDS50-120	TDS 50v 40kA Surge Suppressor	
Erico Products Australia	TDS140-2S-120	TDS 120v 40kA Surge Suppressor	
Erico Products Australia	RDP-120V	Rail Diverter Panel, 120v	
Erico Products Australia	TSG1130-2S-120	Triggered Spark Gap 130kA, 120v	
Erico Products Australia	DSD140-1S-150	120v Line-Line Surge diverter	
Erico Products Australia	DSD140-2B-R24/48	24VDC Surge Diverter	
Erico Products Australia	TEC-100C	Transient Earth Clamp	
Erico Products Australia	DEP RS232/25/9	RS232 DB25, 9 wire protector, 15v working	
Erico Products Australia	DEP RS232/25/25	RS232 DB25, 25 wire protector, 15v working	
Erico Products Australia	DEP RS232/9/9	RS232 DB9, 9 wire protector, 15v working	
Erico Products Australia	DEP RS422/9/9	RS422/485 DB9, 9 wire protector, 9v working	
Novaris SL68/Surge Arrestor *			
Control Logic	SL68/G	Novaris SL Signal Line Surge Protection	
'GE' Motion Detector Surge Arrestor			
GE Transportation	MDSA-1	HXP-3	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
GE Transportation	MDSA-2	HXP-3	
GE Transportation	MDSA-1XS	XP4	
GE Transportation	MDSA-2XS	XP4	
Pivot Electronics – Dual Redundancy Surge Reduction Filter *			
Pivot Electronics Pty Ltd	1451 SRF 018 5050		
Pivot Electronics Pty Ltd	1451 SRF 019 5050		
Pivot Electronics Pty Ltd	1451 SRF 020 5050		
Pivot Electronics Pty Ltd	1451 SRF 021 5050		
Pivot Electronics Pty Ltd	1451 SRF 001 5050		
Pivot Electronics Pty Ltd	1451 SRF 002 5050		
Pivot Electronics Pty Ltd	1451 SRF 003 5050		
Pivot Electronics Pty Ltd	1451 SRF 004 5050		
Pivot Electronics Pty Ltd	1451 SRF 005 5050		
Pivot Electronics Pty Ltd	1451 SRF 006 5050		
Pivot Electronics Pty Ltd	1451 SRF 007 5050		
Pivot Electronics Pty Ltd	1451 SRF 009 5050		
Pivot Electronics Pty Ltd	1451 SRF 009 9550		
Pivot Electronics Pty Ltd	1451 SRF 010 5050		
Pivot Electronics Pty Ltd	1451 SRF 010 9550		
Pivot Electronics Pty Ltd	1451 SRF 008 5050		

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Pivot Electronics Pty Ltd	1451 SRF 014 9595		
Pivot Electronics Pty Ltd	1451 SRF 009 9550		
Pivot Electronics Pty Ltd	1451.SRF.013	SRF Cassette Red 3-Phase 415V 160KA	
Pivot Electronics Pty Ltd	1451.SRF.012	SRF Cassette Black 1-Phase 240V 160KA	
Pivot Electronics Pty Ltd	1451.SRF.025	SRF Cassette Yellow 1-Phase 120V 160KA	
Pivot Electronics Pty Ltd	1451.SRF.014	SRF Cassette Blue 1-Phase 415V 160KA	
Pivot Electronics 'RTU Barrier Unit' *			
Pivot Electronics Pty Ltd	10100	RTU Barrier unit	
Pivot Electronics Pty Ltd	MOV20D820K	Replacement Varistor 20mm, 82V	
DEHN' Surge Protection Equipment *			
IPD Industrial Products	961145		
IPD Industrial Products	951115	DEHNbloc DBM 1 440 FM	
IPD Industrial Products	951119	DEHNventil DV M TT 2P 255 FM	
IPD Industrial Products	951100	DEHNventil DV M 2W 135 FM	
IPD Industrial Products	951002	Replacement Module DV MOD 255	
IPD Industrial Products	951050	Replacement Module DV MOD 135	
IPD Industrial Products	952071	Replacement Module DV MOD NPE 50	
IPD Industrial Products	952091	DEHNguard DG S 75	
IPD Industrial Products	952011	Replacement Module DG MOD 75	
IPD Industrial Products	920 326	DEHN BLITZDUCTOR BXT ML4 BE 60	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
IPD Industrial Products	926 304	DEHN BLITZDUCTOR BSP BAS 4 BASE	
IPD Industrial Products	910508	PA BXT Test Adapter	
IPD Industrial Products	910511	PM 20	
IPD Industrial Products	910653	DRC LC M3+	
IPD Industrial Products	910655	DRC LC M1+	
IPD Industrial Products	920309	BXT M4 T	
IPD Industrial Products	910652	LCS DRC BXT	
Elsafe 555716 Transient Protection Cassette *			
Elsafe Australia Pty Ltd	216630	DC line/tail input circuit ripple filter and over-voltage clamp	
Elsafe Australia Pty Ltd	216640	DC line/tail input circuit ripple filter and over-voltage clamp	
Elsafe Australia Pty Ltd	216655	DC line/tail output circuit surge diverter	
Elsafe Australia Pty Ltd	216660	AC line/tail output circuit surge diverter	
Elsafe Australia Pty Ltd	216680	AC line/tail circuit surge diverter	
Elsafe Australia Pty Ltd	555720	DC line/tail circuit over-voltage clamp	
Elsafe Australia Pty Ltd	216670	VF data line Modem/Fax over-voltage arrestor	
Elsafe Australia Pty Ltd	555715	Spark gap/MOV track arrestor	
Elsafe Australia Pty Ltd	555716	Spark gap/MOV track arrestor	
Elsafe Australia Pty Ltd	555128	Balanced power supply over-voltage arrestor	
Elsafe Australia Pty Ltd	555670	Line to Line or Line to Earth surge arrestor/diverter	
Elsafe Australia Pty Ltd	555680	Line to Line or Line to Earth surge arrestor/diverter	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Elsafe Australia Pty Ltd	555690	Line to Line or Line to Earth surge arrestor/diverter	
Elsafe Australia Pty Ltd	216621	Safety Isolation Cassette	
Elsafe Australia Pty Ltd	216620	Dual Through Link cassette	
Elsafe Australia Pty Ltd	216600	Termination Module	
Elsafe Australia Pty Ltd	216600A	(Obsolete)	
Elsafe Australia Pty Ltd	216605A	Termination Module	
Elsafe Australia Pty Ltd	216610	(CAGE CLAMP Technology)	
Erico - Digital Surge Counter DSCL2 *			
Erico Products Australia	DSCL2	Digital Surge Counter	
Transient Controls Australia' TC-RC Surge Arrestor *			
Transient Controls Australia	TC-RC	Surge Arrestor	
Exelectronics[§]			
Exelectronics	3Y20-700GT	Lightning Arrestor	
2.9 Power Supply Equipment			
Exelectronics' Emergency Changeover Contactor Panel (ECO) *			

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Exelectronics Pty Ltd	ECO 50A High Speed, ECO 100A High Speed, ECO 150A High Speed, ECO 200A High Speed, ECO 250A High Speed, ECO 500A High Speed ECO 1000A High Speed.	Emergency Changeover Contactor Panels 120V.	
'Exmode' - DC Track Circuit battery charger. *			
Exelectronics Pty Ltd	Part no. 3V10A (Store 170)	'Exmode' - DC Track Circuit battery charger.	
CCI Battery Charger *			
CCI Pty Ltd	SLX-678	CCI Battery Charger	
Exelectronics Store 170 track feed *			
Exelectronics Pty Ltd	Store 170	Exelectronics Store 170 track feed	
ADC5000 DC Power Supply *			
M-Power	ADC5021	PSU-12V 10A	Derated power = 90W
M-Power	ADC5081	BATTERY CHARGER - 12V 10A, NO DIODE	Derated power = 102.75W
M-Power	ADC5083	BATTERY CHARGER/PSU - 12V 10A	Derated power = 102.75W
M-Power	ADC5121	PSU - 24V 5A PSU	Derated power = 90W
M-Power	ADC5183	BATTERY CHARGER/PSU - 24V 5A	Derated power = 102.75W

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
M-Power	ADC5283	BATTERY CHARGER/PSU - 48V 2.5A	Derated power = 102.75W
M-Power	ADC5381	BATTERY CHARGER/PSU - 12V 18A, NO DIODE	Derated power = 137W
M-Power	ADC5383	BATTERY CHARGER/PSU - 12V 18A	Derated power = 137W
M-Power	ADC5323	PSU - 12V 18A PSU	Derated power = 120W
M-Power	ADC5483	BATTERY CHARGER/PSU - 24V 10A	Derated power = 205.5W
M-Power	ADC5521	PSU - 48V 5A PSU	Derated power = 180W
M-Power	ADC5583	BATTERY CHARGER/PSU - 48V 5A	Derated power = 205.5W
M-Power	ADC5621	PSU - 12V 5A PSU	Derated power = 45W
M-Power	ADC5683	BATTERY CHARGER/PSU - 12V 4.4A	Derated power = 45W
M-Power	ADC5783	BATTERY CHARGER/PSU - 24V 2.2A	Derated power = 45W
M-Power	ADC5823	PSU - 48V 1.25A PSU	Derated power = 45W
M-Power	ADC5883	BATTERY CHARGER/PSU - 48V 1.1A	Derated power = 45W
M-Power	ADC5983	BATTERY CHARGER/PSU - 36V 1.5A	Derated power = 45W
PRO M Switch-Mode DC Power Supply *			
Weidmüller	8951330010 (metal clip) - Product name - CP M SNT 70W 24V 3A	PSU (Switch mode) - 24V 3A	Non-vital application

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Weidmüller	8951340010 (metal clip) - Product name - CP M SNT 120W 24V 5A	PSU (Switch mode) - 24V 5A	
Weidmüller	8951350010 (metal clip) - Product name - CP M SNT 180W 24V 7.5A	PSU (Switch mode) - 24V 7.5A	
Weidmüller	8951360010 (metal clip) - Product name - CP M SNT 250W 24V 10A	PSU (Switch mode) - 24V 10A	
Weidmüller	8951370010 (metal clip) - Product name - CP M SNT 500W 24V 20A	PSU (Switch mode) - 24V 20A	
Weidmüller	8951380010 (metal clip) - Product name - CP M SNT 1000W 24V 40A	PSU (Switch mode) - 24V 40A	
Weidmüller	1222210010 - Product name - CP M DM20	Diode module rated 20A	To be used with Weidmuller Pro M PSUs
Weidmüller	1222220010 - Product name - CP M DM40	Diode module rated 40A	
Weidmüller	1222230000 - Product name - CP M RM24	Relay module - PSU failure indication	
Enatel RW300-RW700 series wall mount Rectifier Power supply and Battery charger * - Legacy Approval – Shall not be used for any new works on ARTC network. To be used only for like for like replacements.			
Exelectronics	RW312U-20	12V, 20A	Maximum voltage 15V
Exelectronics	RW348-U-20	50V, 6A	Maximum voltage 60V

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Exelectronics	RW512-U-20	12V, 35A	Maximum voltage 15V
Exelectronics	RW624U-20	24V, 22A	Maximum voltage 30V (1.5v per cell, 20 cell NiCad battery)
Exelectronics	SM11	Supervisory monitor panel	An individual panel may only monitor rectifiers feeding a single battery for a busbar
Exelectronics	ACA-TC2U	Temperature Compensation cable 2m	
Exelectronics	ACA-TC7U	Temperature Compensation cable 7m	
Exelectronics	ACS-S150	Current sensor shunt assembly	
Exmode DC/DC Converter *			
Exelectronics	E05001	30W model	22.5W de-rating
Exelectronics	E05046	30W model	
Exelectronics	E05047	30W model	
Exelectronics	E05048	30W model	
Exelectronics	E05049	30W model	
Exelectronics	E05050	30W model	
Exelectronics	E05051	30W model	
Exelectronics	E05052	30W model	
Exelectronics	E05053	30W model	
Exelectronics	E05054	30W model	
Exelectronics	E05055	30W model	
Exelectronics	E05056	30W model	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Exelectronics	E05002	60W model	45W de-rating
Exelectronics	E05057	60W model	
Exelectronics	E05058	60W model	
Exelectronics	E05059	60W model	
Exelectronics	E05060	60W model	
Exelectronics	E05061	60W model	
Exelectronics	E05061	60W model	
Exelectronics	E05062	60W model	
Exelectronics	E05063	60W model	
Exelectronics	E05064	60W model	
Exelectronics	E05065	60W model	
Exelectronics	E05066	60W model	
Exelectronics	E05067	60W model	
Exelectronics	E05003	120W model	90W de-rating
Exelectronics	E05068	120W model	
Exelectronics	E05069	120W model	
Exelectronics	E05070	120W model	
Exelectronics	E05071	120W model	
Exelectronics	E05072	120W model	
Exelectronics	E05073	120W model	
Exelectronics	E05074	120W model	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Exelectronics	E05075	120W model	
Exelectronics	E05076	120W model	
Exelectronics	E05077	120W model	
Exelectronics	E05078	120W model	
Exelectronics	E05079	120W model	
Exelectronics	E05080	120W model	
Exelectronics	E05081	120W model	
Exelectronics	E05082	120W model	
Exelectronics	E05083	120W model	
Exelectronics	E05084	100W model	
Exelectronics	E05085	100W model	
Exelectronics	E05004	180W model	135W de-rating
Exelectronics	E05086	180W model	
Exelectronics	E05087	180W model	
Exelectronics	E05088	180W model	
Exelectronics	E05089	180W model	
Exelectronics	E05090	180W model	
Exelectronics	E05091	180W model	
Exelectronics	E05092	180W model	
Exelectronics	E05093	180W model	
Exelectronics	E05094	180W model	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Exelectronics	E05095	180W model	
Exelectronics	E05096	180W model	
Exelectronics	E05097	180W model	
Exelectronics	E05098	180W model	
Exelectronics	E05109	180W model	
Exelectronics	E05100	180W model	
Exelectronics	E05101	150W model	112.5W de-rating
Exelectronics	E05102	150W model	
Exelectronics	E05005	300W model	225W de-rating
Exelectronics	E05103	300W model	
Exelectronics	E05104	300W model	
Exelectronics	E05105	300W model	
Exelectronics	E05106	300W model	
Exelectronics	E05107	300W model	
Exelectronics	E05108	300W model	
Exelectronics	E05109	300W model	
Exelectronics	E05110	300W model	
Exelectronics	E05111	300W model	
Exelectronics	E05112	300W model	225W de-rating
Exelectronics	E05113	300W model	
Exelectronics	E05114	300W model	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
TeSys D Contactors (110V AC & 240V AC) *			
Schneider Electric	LC1D258F7	TeSYs D Contactor 110V AC	For application requiring less than 40A(<60c) at <440VAC
Schneider Electric	LC1D258U7	TeSYs D Contactor 240V AC	
Railway Equipment Co – Cragg Railcharger * - Legacy Approval – Shall not be used for any new works on ARTC network. To be used only for like for like replacements.			
Aldridge Railway	BC000 - Aldridge ordering number 10DTC-R-12V - Model number 520915A - Model Part number	Cragg Rail Charger	Preferred DTC-G Charger.
Aldridge Railway	BC001 - Aldridge ordering number 20DTC-R-12V - Model number 520925A - Model Part number		
Aldridge Railway	BC002 - Aldridge ordering number 40DTC-R-12V - Model number 520945A - Model Part number		
Aldridge Railway	BC003 - Aldridge ordering number 60DTC-R-12V - Model number		

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
	520965A - Model Part number		
Aldridge Railway	BC004 - Aldridge ordering number 30DTC-R-24V - Model number 520935A - Model Part number		
Aldridge Railway	BM001 - Aldridge ordering number ICM-CP-LV - Model number 9807-0001-2V - Model Part number		
Powerbox PBIH DC/DC Converters *			
Powerbox Australia Pty. Ltd.	PBIH-1205G		
Powerbox Australia Pty. Ltd.	PBIH-1205J		
Powerbox Australia Pty. Ltd.	PBIH-1205M		
Powerbox Australia Pty. Ltd.	PBIH-1205R		
Powerbox Australia Pty. Ltd.	PBIH-1212J		
Powerbox Australia Pty. Ltd.	PBIH-1212M		
Powerbox Australia Pty. Ltd.	PBIH-1212R		
Powerbox Australia Pty. Ltd.	PBIH-1215J		
Powerbox Australia Pty. Ltd.	PBIH-1215M		

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Powerbox Australia Pty. Ltd.	PBIH-1215R		
Powerbox Australia Pty. Ltd.	PBIH-1224J		
Powerbox Australia Pty. Ltd.	PBIH-1224M		
Powerbox Australia Pty. Ltd.	PBIH-1224R		
Powerbox Australia Pty. Ltd.	PBIH-1248M		
Powerbox Australia Pty. Ltd.	PBIH-1248R		
Powerbox Australia Pty. Ltd.	PBIH-2412J		
Powerbox Australia Pty. Ltd.	PBIH-2412M		
Powerbox Australia Pty. Ltd.	PBIH-2412R		
Powerbox Australia Pty. Ltd.	PBIH-2415J		
Powerbox Australia Pty. Ltd.	PBIH-2415M		
Powerbox Australia Pty. Ltd.	PBIH-2415R		
Powerbox Australia Pty. Ltd.	PBIH-2424J		
Powerbox Australia Pty. Ltd.	PBIH-2424M		
Powerbox Australia Pty. Ltd.	PBIH-2424R		
Powerbox Australia Pty. Ltd.	PBIH-2448M		
Powerbox Australia Pty. Ltd.	PBIH-2448R		
Powerbox Australia Pty. Ltd.	PBIH-4812J		
Powerbox Australia Pty. Ltd.	PBIH-4812M		
Powerbox Australia Pty. Ltd.	PBIH-4812R		
Powerbox Australia Pty. Ltd.	PBIH-4815J		

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Powerbox Australia Pty. Ltd.	PBIH-4815M		
Powerbox Australia Pty. Ltd.	PBIH-4815R		
Powerbox Australia Pty. Ltd.	PBIH-4824J		
Powerbox Australia Pty. Ltd.	PBIH-4824M		
Powerbox Australia Pty. Ltd.	PBIH-4824R		
Powerbox Australia Pty. Ltd.	PBIH-4848M		
Powerbox Australia Pty. Ltd.	PBIH-4848R		
'Phoenix Contact' Quint UPS / 1AC / 1AC / 500VA with Lithium Ion Batteries *			
Phoenix Contact	2320270	Quint-UPS/1AC/1AC/500VA	
Phoenix Contact	2320351	UPS-BAT LI-ION/24DC/120WH Battery Type - NEC ALM 12V7s	
Phoenix Contact	2320490	IFS-RS232-Datacable	
Phoenix Contact	2320500	IFS-USB-Datacable	
Phoenix Contact	2901103	IFS-Confistick-L	
Phoenix Contact	2313452	FL Comserver Uni 232/422/485	
'Off-Grid Energy Australia' Solar Power System *			
Off-Grid Energy Australia	Victron Multiplus 48/3000		
Off-Grid Energy Australia	Victron Smart Solar MPPT 150/35		
Off-Grid Energy Australia	Victron Colour Control		
Off-Grid Energy Australia	BAE PVV350		

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks	
Off-Grid Energy Australia	REC 295W solar modules			
Eltek – UPS with Rectifier*		6 month trial		
Eltek	A112396.000	SysUPS, 3kVA Eltek 600W*600D*2100H 120VIN/OUT with SP2 Controller	UPS system for use in equipment housing classified in range A1 to B1 only	
Eltek		SysUPS, 6kVA Eltek 600W*600D*2100H 120VIN/OUT with SP2 Controller		
Eltek	A112458.000	SysUPS, 9kVA Eltek 600W*600D*2100H 120VIN/OUT with SP2 Controller		
Eltek		SysUPS, 12kVA Eltek 600W*600D*2100H 120VIN/OUT with SP2 Controller		
Eltek	A112459.000	SysUPS, 3kVA Eltek 600W*600D*2100H 240VIN/OUT with SP2 Controller		
Eltek		SysUPS, 6kVA Eltek 600W*600D*2100H 240VIN/OUT with SP2 Controller		
Eltek		SysUPS, 9kVA Eltek 600W*600D*2100H 240VIN/OUT with SP2 Controller		
Eltek		SysUPS, 12kVA Eltek 600W*600D*2100H 240VIN/OUT with SP2 Controller		
Eltek	241123.100	Rectifier 230/1500 48/1200		For use with NiCad or Lead Acid Batteries only
Eltek	242100.500	SmartPack2 (SP2) Master		For use in equipment housing classified in range A1 to B1 only.
Eltek	242100.601	SmartPack2 (SP2) Industrial Basic		
Eltek	242100.510	SmartPack2 Touch		

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
'Aldridge' Cragg DTC-G Rail charger *			
Aldridge Railway	BC006 - Aldridge ordering number	10DTC-G-12V - Model Part number - 520918A	
Aldridge Railway	BC007 - Aldridge ordering number	20DTC-G-12V - Model Part number - 520928A	
Aldridge Railway	BC008 - Aldridge ordering number	30DTC-G-24V - Model Part number - 520938A	
Aldridge Railway	BC005 - Aldridge ordering number	40DTC-G-12V - Model Part number - 520948A	
Aldridge Railway	BC009 - Aldridge ordering number	60DTC-G-12V - Model Part number - 520968A	
'Phoenix Contact' Quint 4 - Power Supplies (AC Input to DC Output) *			
Phoenix Contact	2904605 - Quint4-PS/1AC/12DC/2.5/PT		PT = Push Terminal SC - Screw Terminal
Phoenix Contact	2904607 - Quint4-PS/1AC/12DC/7.5/PT		
Phoenix Contact	2904608 - Quint4-PS/1AC/12DC/15		
Phoenix Contact	2909575 - Quint4-PS/1AC/24DC/1.3/PT OR 2904597 - Quint4-PS/1AC/24DC/1.3/SC		
Phoenix Contact	2909576 - Quint4-PS/1AC/24DC/2.5/PT OR		

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
	2904598 - Quint4-PS/1AC/24DC/2.5/SC		
Phoenix Contact	2909577 - Quint4-PS/1AC/24DC/3.8/PT OR 2904599 - Quint4-PS/1AC/24DC/3.8/SC		
Phoenix Contact	2904600 - Quint4-PS/1AC/24DC/5		
Phoenix Contact	2904601 - Quint4-PS/1AC/24DC/10		
Phoenix Contact	2904602 - Quint4-PS/1AC/24DC/20		
Phoenix Contact	2904610 - Quint4-PS/1AC/48DC/5		
Phoenix Contact	2904611 - Quint4-PS/1AC/48DC/10		
Phoenix Contact	2904612 - QUINT4-PS/1AC/48DC/20		
Phoenix Contact	2909681 - TWN4 MIFARE		
FG Wilson 7.5KVA Generator *			
Genpower Australia	FGW 7.5 KVA	Standby Open 1 phase 240V	
Genpower Australia	CTI63 ATS	63A 1PH transfer switch	
Deep Sea Generator Controller #			
Deep Sea	DSE7420/DSE7420 MKII	Deep Sea Generator Controller	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
'Phoenix Contact' Low Voltage DC Power Supplies *			
Phoenix Contact	2938811	QUINT-PS-100-240AC/12DC/10 (model no. 2938811)	
Phoenix Contact	2938581	QUINT-PS-100-240AC/24DC/5 (model no. 2938581)	
Phoenix Contact	2938604	QUINT-PS-100-240AC/24DC/10 (model no. 2938604)	
Phoenix Contact	2938248	QUINT-PS-100-240AC/48DC/5 (model no. 2938248)	
Phoenix Contact	2866776	QUINT (PS)/1AC/24DC/20 (model no. 2866776)	
Phoenix Contact	2866763	QUINT (PS)/1AC/24DC/10 (model no. 2866763)	
Phoenix Contact	2866750	QUINT (PS)/1AC/24DC/5 (model no. 2866750)	
Phoenix Contact	2938963	QUINT DIODE/40 (model no. 2938963)	
'Phoenix Contact' Trio 24v DC UPS *			
Phoenix Contact	2907161	Trio UPS 2G/1AC/24DC/10	
CE&T Power Flexa Modular AC UPS System *			
CE+T Power	S72A33E0104SC100J001	Flexa UPS 48V-120VAC -2.75kVA Single Phase 1 Module	
CE+T Power	S72A33E0204SC100J001	Flexa UPS 48V-120VAC -5.5kVA Single Phase 2 Modules	
CE+T Power	S72A33E0304SC100J001	Flexa UPS 48V-120VAC -8.25kVA Single Phase 3 Modules	
CE+T Power	S72A33E0404SC100J001	Flexa UPS 48V-120VAC -11kVA Single Phase 4 Modules	
CE+T Power	S72A73E0104S100J001	Flexa UPS 48V-240VAC -3kVA Single Phase 1 Module	
CE+T Power	S72A73E0204S100J001	Flexa UPS 48V-240VAC -6kVA Single Phase 2 Modules	
CE+T Power	S72A73E0304S100J001	Flexa UPS 48V-240VAC -9kVA Single Phase 3 Modules	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
CE+T Power	S72A73E0404S100J001	Flexa UPS 48V-240VAC -12kVA Single Phase 4 Modules	
CE+T Power	T721730211	Flexa module 25 – 230-230	
CE+T Power	T302004100	Inview S	
CE+T Power	T602004110	Inview S Slot	
CE+T Power	T602004100+T602006000	Inview S + MBB	
CE+T Power	T602004110+T602006000	Inview S Slot + MBB	
CE+T Power	T60206000	Measure Box Battery	
Atlas Modular Switch Mode Battery Charger/Power supply#			
Pivot Electronic Pty Ltd	10180	Backplane prewired with Volt and Ammeter (no charger fitted)	
Pivot Electronic Pty Ltd	10165	Battery charger Atlas, 2 x 12V, 20A modules.	
Victron Energy SmartSolar Charge Controller			
Victron Energy	150/100VE.Can	Victron Energy SmartSolar Charge Controller 150/100VE.Can	
Victron Energy	150/45	Victron Energy SmartSolar Charge Controller 150/45	
Victron Energy	150/60	Victron Energy SmartSolar Charge Controller 150/60	
Victron Energy	150/70	Victron Energy SmartSolar Charge Controller 150/70	
Victron Energy	150/85	Victron Energy SmartSolar Charge Controller 150/85	
Victron Energy	150/100	Victron Energy SmartSolar Charge Controller 150/100	
Victron Energy	IP 22	Victron Blue Smart IP22 Charger	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
'Schaefer CI Series 1606 DC/AC Inverter'			
Schaefer	CI1606.7-61	Schaefer CI series 1606 DC/AC Inverter	Inclusive of required components to compliment unit such as control card, rack.
Schaefer	C3700D Series	DC-DC Converter	
Schaefer	C3600D Series	DC-DC Converter	
Schaefer	C3800D Series	DC-DC Converter	
Schaefer	C1500A Series	AC-DC Power Supply	
Schaefer	C2500A Series	AC-DC Power Supply	
Schaefer	C2600A Series	AC-DC Power Supply	
Schaefer	C3500A Series	AC-DC Power Supply	
Schaefer	B1500 Series	Battery Charger	
Schaefer	B2500 Series	Battery Charger	
Schaefer	B2600 Series	Battery Charger	
Schaefer	B3500 Series	Battery Charger	
LG Neon 2 Solar Panel			
Effective Electrical	350/355/360N1C-N5	LG Neon 2 Solar Panel 350/355/360N1C-N5	
'SunPower' Solar Panels*			
SunPower	-	Performance 3 COM range	
SunPower	-	Performance 3 UPP range	
SunPower	-	Performance 6 range	
SunPower	-	Maxeon 3 range	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
'Eltek' Solar Power Supply Equipment*			
Eltek	241115.65	Eltek FP2 HE 1500W 48V Solar Regulator	
Eltek	241119.650	Flatpack2 48/3200 HE Solar Charger Module	
Eltek	241115.600	Flatpack2 DC/DC Converter 1350W 18-75VDC/24VDC	
Eltek	CTOS0201.001	FlatpackS 1U Integrated DC Power supply system	
Eltek	241115.105	Flatpack2 48V/2000W HE Rectifiers	
Eltek	241119.105	Flatpack2 48V/3000W HE Rectifiers	
Eltek	241123.100	Rectiverter 230/1500 48/1200	
Eltek	241123.130	Rectiverter 110v-1200W	
Eltek	242100.300	Battery Monitor	
Eltek	242100.306	Eltek I/O Monitor Type 3	
Eltek	242100.510	Smartpack2 Touch	
Eltek	242100.603	CAN Nodes – Controller + I/O	
Eltek	242100.604	CAN Nodes – Relay x4 Extn Board	
Eltek	242100.605	CAN Nodes – Relay x8 Extn Board	
Eltek	CTO20405.1230	Flatpack2 5U Integrated DC Power supply system	
Eltek	CTO20407S.4019	FP2 8KW+6KW Powercore w/SPD complete w/4PV Solar slots shelf PN 3790E305815 SPD	
Eltek	CTO21207.4048	Flatpack2 7U Integrated DC Power supply system	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Alpha Power Systems - CFRTU61XX UPS *			
Alpha Power Systems	CFRTU6101-R48-110	CFRTUS6101, 1KVA full online RM48VDC 110VAC with isolation transformer + SNMP	
Alpha Power Systems	CFRTU6102-R48-110	CFRTUS6102, 2KVA full online RM48VDC 110VAC with isolation transformer + SNMP	
Alpha Power Systems	CFRTU6103-R48-110	CFRTUS6103, 3KVA full online RM48VDC 110VAC with isolation transformer + SNMP	
Alpha Power Systems	CFRTU6105-R48-110	CFRTUS6105, 5KVA full online RM48VDC 110VAC with isolation transformer + SNMP	
Alpha Power Systems	CFRTU6101-R96-110	CFRTUS6101, 1KVA full online RM96VDC 110VAC with isolation transformer + SNMP	
Alpha Power Systems	CFRTU6102-R96-110	CFRTUS6102, 2KVA full online RM96VDC 110VAC with isolation transformer + SNMP	
Alpha Power Systems	CFRTU6103-R96-110	CFRTUS6103, 3KVA full online RM96VDC 110VAC with isolation transformer + SNMP	
Alpha Power Systems	CFRTU6105-R96-110	CFRTUS6105, 5KVA full online RM96VDC 110VAC with isolation transformer + SNMP	
Alpha Power Systems	CFRTU6101-R48-120	CFRTUS6101, 1KVA full online RM48VDC 120VAC with isolation transformer + SNMP	
Alpha Power Systems	CFRTU6102-R48-120	CFRTUS6102, 2KVA full online RM48VDC 120VAC with isolation transformer + SNMP	
Alpha Power Systems	CFRTU6103-R48-120	CFRTUS6103, 3KVA full online RM48VDC 120VAC with isolation transformer + SNMP	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Alpha Power Systems	CFRTU6105-R48-120	CFRTUS6105, 5KVA full online RM48VDC 120VAC with isolation transformer + SNMP	
Alpha Power Systems	CFRTU6101-R96-120	CFRTUS6101, 1KVA full online RM96VDC 120VAC with isolation transformer + SNMP	
Alpha Power Systems	CFRTU6102-R96-120	CFRTUS6102, 2KVA full online RM96VDC 120VAC with isolation transformer + SNMP	
Alpha Power Systems	CFRTU6103-R96-120	CFRTUS6103, 3KVA full online RM96VDC 120VAC with isolation transformer + SNMP	
Alpha Power Systems	CFRTU6105-R96-120	CFRTUS6105, 5KVA full online RM96VDC 120VAC with isolation transformer + SNMP	
Alpha Power Systems	HTU 1K	1kva full offline UPS	
Alpha Power Systems	HTU 1.5K	1.5kva full offline UPS	
Alpha Power Systems	HTU 2K	2kva full offline UPS	
Alpha Power Systems	HTU 3K	3kva full offline UPS	
Alpha Power Systems	HTU 4K	4kva full offline UPS	
Alpha Power Systems	HTU 5K	5kva full offline UPS	
Alpha Power Systems	HTU 6K	6kva full offline UPS	
Eaton UPS 9SX Series *			
Eaton Industries Pty Ltd	9SX Series UPS	'Eaton' UPS 9SX Series	Full type approval has been given for the use of Eaton's 9SX UPS under the assumption that they would be used in locations defined in SPS 02 as type A1 and

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
			A2. Thus, they shall be based at a location that is air-conditioned.
Alpha Power Systems - Manual/Automatic Transfer Switch MATS002R *			
Alpha Power Systems	MATS002R	Manual/Auto transfer switch - Rack Mount 110/230VAC, 65A	
Grau Battery Charger			
Siemens Mobility Pty Ltd	250 LGB 230 M12 W01	GRAU Battery Charger – 12 Volt	
Siemens Mobility Pty Ltd	250 LGB 230 M24 W01	GRAU Battery Charger – 24 Volt	
Siemens Mobility Pty Ltd	250 LGB 230 M48 W01	GRAU Battery Charger – 48 Volt	
Helios Inverter			
Siemens Mobility Pty Ltd	RSI 200-2A50F3P- HS1114-S8347	Helios Inverter	
Trisan Converter ^{\$}			
Trisan ^{\$}	TRI 30 OLC	Converter/Charger	
Exelectronics^{\$}			
Exelectronics	E17008	Solar Track Circuit Feed	
2.10 Batteries			
CEGASA Air depolarised Alkanline primary cells for block *			
Mechtric Pty Ltd	AS8 and ALR 40/200	Air depolarised Alkaline primary cells for block	
'SAFT' 7.5-1660 Ni-Cad SBLE Battery range *			

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
SAFT	SBLE 7.5		Not to be used with solar charging.
SAFT	SBLE 15		
SAFT	SBLE 22		
SAFT	SBLE 30		
SAFT	SBLE 30		
SAFT	SBLE 40		
SAFT	SBLE 47		
SAFT	SBLE 62		
SAFT	SBLE 75		
SAFT	SBLE 95		
SAFT	SBLE 110		
SAFT	SBLE 140		
SAFT	SBLE 185		
SAFT	SBLE 230		
SAFT	SBLE 275		Preferred battery for level crossing installation. Not to be used with solar charging
SAFT	SBLE 325		Not to be used with solar charging.
SAFT	SBLE 375		Not to be used with solar charging
SAFT	SBLE 415		
SAFT	SBLE 460		

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
SAFT	SBLE 510		
SAFT	SBLE 550		
SAFT	SBLE 600		
SAFT	SBLE 650		
SAFT	SBLE 700		
SAFT	SBLE 750		
SAFT	SBLE 830		
SAFT	SBLE 925		
SAFT	SBLE 1020		
SAFT	SBLE 1100		
SAFT	SBLE 1200		
SAFT	SBLE 1300		
SAFT	SBLE 1400		
SAFT	SBLE 1500		
SAFT	SBLE 1600		
SAFT	SBLE 1660		
SAFT 45AH-1110AH NI-CAD Sunica Battery Range *			
SAFT	SUN+ 45	Sunica. Plus NI-CAD Battery Range 45AH-1110AH	Only to be used with solar charging.
SAFT	SUN+ 90		
SAFT	SUN+ 105		

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
SAFT	SUN+ 140		
SAFT	SUN+ 185		
SAFT	SUN+ 230		
SAFT	SUN+ 275		
SAFT	SUN+ 320		
SAFT	SUN+ 370		
SAFT	SUN+ 415		
SAFT	SUN+ 460		
SAFT	SUN+ 505		
SAFT	SUN+ 555		
SAFT	SUN+ 645		
SAFT	SUN+ 735		
SAFT	SUN+ 830		
SAFT	SUN+ 920		
SAFT	SUN+ 1110		
Sonnenschien A400 Batteries *			
Battery Specialist Aust	NGA41205D5HSORA	A412/5.5SR	Not to be used with solar charging.
Battery Specialist Aust	NGA41208D5HSORA	A412/8.5SR	
Battery Specialist Aust	NGA4120012HSORA	A412/12SR	
Battery Specialist Aust	NGA4120020HSOBA	A412/20 G5	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Battery Specialist Aust	NGA4120032HSOBA	A412/32 G6	
Battery Specialist Aust	NGA4120032HSOFA	A412/32F10	
Battery Specialist Aust	NGA4120050HSOCA	A412/50A	
Battery Specialist Aust	NGA4120050HSOFA	A412/50 F10	
Battery Specialist Aust	NGA4120050HSOBA	A412/50 G6	
Battery Specialist Aust	NGA4120065HSOFA	A412/65 F10	
Battery Specialist Aust	NGA4120065HSOBA	A412/65 G6	
Battery Specialist Aust	NGA4120085HSOFB	A412/85 F10	
Battery Specialist Aust	NGA4120090HSOCA	A412/90A	
Battery Specialist Aust	NGA4120090HSOFA	A412/90 F10	
Battery Specialist Aust	NGA4120100HSOCA	A412/100A	
Battery Specialist Aust	NGA4120100HSOFA	A412/100 F10	
Battery Specialist Aust	NGA4120120HSOCA	A412/120A	
Battery Specialist Aust	NGA4120120HSOFA	A412/120 F10	
Battery Specialist Aust	NGA4120180HSOCA	A412/180A	
Battery Specialist Aust	NGA4120180HSOFA	A412//180 F10	
Battery Energy – SunGEL, EnerGEL and PowerLYTE range of batteries *			
Battery Energy Power Solution Pty Ltd	6EG100	EnerGEL Range	Not for use with Solar chargers
Battery Energy Power Solution Pty Ltd	6EG130		

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Battery Energy Power Solution Pty Ltd	6EG160		
Battery Energy Power Solution Pty Ltd	2EG200		Not for use with Solar chargers
Battery Energy Power Solution Pty Ltd	2EG225		
Battery Energy Power Solution Pty Ltd	2EG290		
Battery Energy Power Solution Pty Ltd	2EG300		
Battery Energy Power Solution Pty Ltd	2EG350		
Battery Energy Power Solution Pty Ltd	2EG360		
Battery Energy Power Solution Pty Ltd	2EG400		
Battery Energy Power Solution Pty Ltd	2EG495		
Battery Energy Power Solution Pty Ltd	2EG500		
Battery Energy Power Solution Pty Ltd	2EG550		
Battery Energy Power Solution Pty Ltd	2EG700		

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Battery Energy Power Solution Pty Ltd	2EG800		
Battery Energy Power Solution Pty Ltd	2EG900		
Battery Energy Power Solution Pty Ltd	2EG1100		
Battery Energy Power Solution Pty Ltd	2EG1300		
Battery Energy Power Solution Pty Ltd	2EG1600		
Battery Energy Power Solution Pty Ltd	12EG105FTG		
Battery Energy Power Solution Pty Ltd	12EG160FTG		
Battery Energy Power Solution Pty Ltd	6SG200	SunGEL Range	For Solar Charge applications only.
Battery Energy Power Solution Pty Ltd	2SG250/N		
Battery Energy Power Solution Pty Ltd	2SG450		
Battery Energy Power Solution Pty Ltd	2SG470		
Battery Energy Power Solution Pty Ltd	2SG595		

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Battery Energy Power Solution Pty Ltd	2SG650		
Battery Energy Power Solution Pty Ltd	2SG710		
Battery Energy Power Solution Pty Ltd	2SG820		
Battery Energy Power Solution Pty Ltd	2SG875		
Battery Energy Power Solution Pty Ltd	2SG1000		
Battery Energy Power Solution Pty Ltd	2SG1200		
Battery Energy Power Solution Pty Ltd	12SG133FTG		
Battery Energy Power Solution Pty Ltd	12SG200FTG		
Battery Energy Power Solution Pty Ltd	PXL2V200	PowerLYTE Range	Not for use with Solar Chargers.
Battery Energy Power Solution Pty Ltd	PXL2V300		
Battery Energy Power Solution Pty Ltd	PXL2V400		
Battery Energy Power Solution Pty Ltd	PXL2V500		

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Battery Energy Power Solution Pty Ltd	PXL2V600		
Battery Energy Power Solution Pty Ltd	PXL2V800		
Battery Energy Power Solution Pty Ltd	PXL2V1000		
Battery Energy Power Solution Pty Ltd	PXL2V2000		
Battery Energy Power Solution Pty Ltd	PXL2V3000		
Battery Energy Power Solution Pty Ltd	PL2V850T		
Battery Energy Power Solution Pty Ltd	PL2V1000T		
Battery Energy Power Solution Pty Ltd	PLFT12-55		
Battery Energy Power Solution Pty Ltd	PLFT12-80		
Battery Energy Power Solution Pty Ltd	PLFT12-100		
Battery Energy Power Solution Pty Ltd	PLFT12-110T		
Battery Energy Power Solution Pty Ltd	PLFT12-125		

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Battery Energy Power Solution Pty Ltd	PLFT12-160		
Battery Energy Power Solution Pty Ltd	PLFT12-175		
Battery Energy Power Solution Pty Ltd	PLFT12-200C		
Battery Energy Power Solution Pty Ltd	PL12-16		
Battery Energy Power Solution Pty Ltd	PL12-40		
Battery Energy Power Solution Pty Ltd	PL12-60		
Battery Energy Power Solution Pty Ltd	PL12-230		
Battery Energy Power Solution Pty Ltd	PL12-240		
'Energys' – SuperSafe SBS EON, Genesis and Odyssey Battery Ranges *			
Energys Australia Pty Ltd	SBS B14	PowerSafe SBS EON battery range	Adapter kit required to covert to Front terminal batteries.
Energys Australia Pty Ltd	SBS B14F		
Energys Australia Pty Ltd	SBS C11		
Energys Australia Pty Ltd	SBS C11F		Front terminal batteries.
Energys Australia Pty Ltd	SBS 100		
Energys Australia Pty Ltd	SBS 100F		
Energys Australia Pty Ltd	SBS 170F		

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Enersys Australia Pty Ltd	SBS 190F		Top terminal batteries.
Enersys Australia Pty Ltd	SBS 410		
Enersys Australia Pty Ltd	SBS 320		
Enersys Australia Pty Ltd	SBS 400		
Enersys Australia Pty Ltd	SBS 480		
Enersys Australia Pty Ltd	SBS 580		
Enersys Australia Pty Ltd	SBS 680		
Enersys Australia Pty Ltd	SBS 780		
Enersys Australia Pty Ltd	SBS 900		
Enersys Australia Pty Ltd	G16EP	Genesis EP Range	Top terminal batteries. Solar application or Microlok backup.
Enersys Australia Pty Ltd	G26EP		
Enersys Australia Pty Ltd	G42EP		
Enersys Australia Pty Ltd	G70EP		
Enersys Australia Pty Ltd	NP7-12	Genesis NP Range	Top terminal batteries. Solar application or Microlok backup.
Enersys Australia Pty Ltd	NP12-12		
Enersys Australia Pty Ltd	NP24-12		
Enersys Australia Pty Ltd	NP65-12		
Enersys Australia Pty Ltd	NP75-12		
Enersys Australia Pty Ltd	NO100-12		
Enersys Australia Pty Ltd	NP120-12		
Enersys Australia Pty Ltd	NP150-12		

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Enersys Australia Pty Ltd	NP200-12		
Enersys Australia Pty Ltd	PC1200MJT	Odyssey TPPL Range	Top terminal batteries. For use with generators.
Enersys Australia Pty Ltd	PC2150MJ		
Enersys Australia Pty Ltd	PC2250		
Enersys Australia Pty Ltd	PC1300		
Enersys Australia Pty Ltd	PC1500		
Eaton 12V 540W battery *			
Eaton Electric Systems	PWHR12540W4FR	Eaton 12V 540W battery	
Lifeline Batteries *			
Federal Batteries	GPL-31T	Lifeline Batteries	
A600 Sonnenschein Battery range *			
Aeson Power	A602/225	A600 Sonnenschein Battery range	
Aeson Power	A602/280		
Aeson Power	A602/295		
Aeson Power	A602/370		
Aeson Power	A602/440		
Aeson Power	A602/520		
Aeson Power	A602/625		
Aeson Power	A602/750		
Aeson Power	A602/850		
Aeson Power	A602/1130		

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Aeson Power@	A602/1415		
'GenZ' Lithium Ion Battery System*			
GenZ Energy	GC48V-040LFP-2RU-M	Lithium Ferro Phosphate (LFP) – 40Ah	
GenZ Energy	GC48V-060LFP-2RU-M	Lithium Ferro Phosphate (LFP) – 60Ah	
Sonnenschien A400 Batteries \$			
Aeson Power	NGSB060200HS0CA	SB6/200A Solarblock	
2.11 Train Authority Systems and Train Order Systems			
Ansaldo STS - Phoenix Train Order System *			
Hitachi Rail STS	-	System Release SYS_REL_1_0_5	
Hitachi Rail STS	-	TCS Subsystem Release TCS_REL_1_0_9	
Hitachi Rail STS	-	TOM Subsystem Release TOM_REL_1_1_6	
Hitachi Rail STS	-	FD Subsystem Release FD_REL_1_0_3	
Hitachi Rail STS	-	XSD XSD_REL_1_0_0	
Hitachi Rail STS	-	TOM Database Release TOM_DB_REL_BMD_1_0_0	
Hitachi Rail STS	-	TCS Application Data TCS_DATA_BMD_REL_0_13_0	
Hitachi Rail STS	-	Mile End Application Data 0.2	
Hitachi Rail STS	-	TOM App Data (Broadmeadow) TOM_APP_ROUTEPARTS_BMD_REL_0_13_0	
Hitachi Rail STS	-	FD Data Release FD_DATA_REL_1_0_2	
Hitachi Rail STS	-	MS.NET Framework 3.5	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Hitachi Rail STS	-	MS SQL Server 2005 SP2 64 bit standard	
Hitachi Rail STS	-	IIS 7	
Hitachi Rail STS	-	Visual C Runtime Libraries 9.0.30729.17	
Hitachi Rail STS	-	MS SQL 2005 SP2 64 bit standard	
Hitachi Rail STS	-	Nunit Version 2.5.2.9222	
Hitachi Rail STS	-	Reshaper Version 4.5	
'KABA' Questor Electronic Safe Lock for Master Key Release *			
Supplier Smartlock Digital Pty Ltd	14/08/2146	KABA Questor Electronic Safe Lock	Fitted to Eagle fireproof safe inside location case
Supplier Smartlock Digital Pty Ltd	AS270	Activation Software Windows based	Configures Questor Lock into ICS Mode
Supplier Smartlock Digital Pty Ltd	AS271	Programming Software Windows based	Configures basic settings for the lock
Supplier Smartlock Digital Pty Ltd	AS273	Management Software Windows based	Configures NCCS to manage system
Supplier Smartlock Digital Pty Ltd	Dongle	Security Device	Required for programming and managing the system
ATMS – IS1.1 * - Please refer type approval certificate for full details.			
Hitachi Rail Australia Pty Ltd – Phoenix Train Order System *			
Hitachi Rail	-	System Release NSW_SYS_TOS_3_2_4	
Hitachi Rail	-	TCS Subsystem Release NSW_BIN_TCS_1_4_9	
Hitachi Rail	-	TOM Subsystem Release NSW_BIN_TOM_1_4_6	
Hitachi Rail	-	FD Subsystem Release NSW_BIN_FD_1_4_1	
Hitachi Rail	-	XSD NSW_XSD_TOM_1_4_5	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Hitachi Rail	-	TOM Database Release NSW_DB_TOM_1_4_6	
Hitachi Rail	-	TCS Application Data Broadmeadow Application Data NSW_APP_BMD_0_2_2	
Hitachi Rail	-	FD Data Release NSW_DAT_FD_1_4_0	
Hitachi Rail	-	MS.NET Framework 3.5	
Hitachi Rail	-	MS SQL Server 2005 SP2 64 bit standard	
Hitachi Rail	-	IIS 7.0	
Hitachi Rail	-	Borland Silk Central Test Manager 2008 Version 8.8	
Hitachi Rail	-	Borland StarTeam Client 2008 Version 10.0	
SENCITY Rail MIMO Antenna with Dual band GNSS/LNA			
Mouser Electronics	1399.99.0152	SENCITY Rail MIMO Antenna with Dual band GNSS/LNA	Approved for 12 months trial for ATMS
"Thales' Train Protection and Warning System (TPWS)			
Thales Australia	Refer TA certificate for full list of approved items	Train Protection and Warning System	Refer TA Certificate NESA-S083 on ARTC extranet
Siemens' Intelligent Processor Island Track Circuit (IPITC)			
Siemens	106257202	Track Circuit, Intelligent Processor Island complete unit, Model IPITC, Programmable Frequencies 2.14KHz – 20.2KHz	Please refer the TA Certificate for firmware version.
Siemens	106257150	Track Circuit, Intelligent Processor Island – Board only	
Siemens	106257299	Surge Protection Panel Track Rack Mount 4 way	
Siemens	106257296	Surge Panel Surge Protection Panel, Battery & Single Track (Tx & Rx) Rack Mount 3 way	
Siemens	106257298	Surge Panel Surge Protection Panel Track – single unit Single track connection 6 wire	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Siemens	106255553	Surge Protector Lightning Arrestor, Heavy Duty	
Siemens	106255556	Equalizer, Heavy Duty	
Train Management and Control System (TMACS)			
4tel/TFNSW	TMCS	TMACS version 5.4.0	<p>1. Operations of the systems shall be in accordance with NSW Network Rules and ANSY-502 Train Order Working.</p> <p>2. Electronic Authorities (including proximity alarms) are to be disabled.</p> <p>3. Any update to the system requires the version number changes of TMCS, GPS Watchdog, 4Trak and Authority Server are to be endorsed by the TMACS CCB and approval by S&T CAB.</p> <p>4. 4Tel shall send a report to ARTC Operational Technology team at the end of each calendar year summarizing any and all; 4.1 Upgrades undertaken in the previous 12 months. 4.2 Alleged or actual wrong side system failures – including any false proceed orders generated. 4.3 System errors that affected the operational status of the system. 4.4 Any recommended upgrades or improvements to improve system reliability or operational flexibility.</p> <p>5. ARTC Operational Technology team to provide the documentation to TfNSW submitted by 4Tel at the end of each calendar year.</p>
	GPS Watchdog	GPS watchdog version 10.1.0	
	4Trak	Version 4.14.0	
	Authority Server	Version 1.5.0	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
			6. Train Operators complete training of all train drivers and associated staff in the applicable operational rules before TMACS becomes operational for a specific section of the rail network.
2.12 Cables			
Manufacture to provide the compliance report to ESA-11-01 for the cables and project team to check the compliance.		2 CORE 7/0.85mm U/G POWER CABLE	ARTC Spec ESA-11-01
		2 CORE 7/1.04mm U/G POWER CABLE	ARTC Spec ESA-11-01
		2 CORE 7/1.35mm U/G POWER CABLE	ARTC Spec ESA-11-01
		2 CORE 7/1.70mm U/G POWER CABLE	ARTC Spec ESA-11-01
		2 CORE 19/1.35mm U/G POWER CABLE	ARTC Spec ESA-11-01
		3 CORE 7/0.85mm U/G POWER CABLE	ARTC Spec ESA-11-01
		4 CORE 7/0.85mm U/G POWER CABLE	ARTC Spec ESA-11-01
		4 CORE 7/1.35mm U/G POWER CABLE	ARTC Spec ESA-11-01
		5 CORE 7/1.04mm U/G POWER CABLE	ARTC Spec ESA-11-01
		5 CORE 7/1.70mm U/G POWER CABLE	ARTC Spec ESA-11-01
		4 CORE 7/0.50mm U/G SIGNAL CABLE	ARTC Spec ESA-11-01
		6 CORE 7/0.50mm U/G SIGNAL CABLE	ARTC Spec ESA-11-01
		10 CORE 7/0.50mm U/G SIGNAL CABLE	ARTC Spec ESA-11-01
		15 CORE 7/0.50mm U/G SIGNAL CABLE	ARTC Spec ESA-11-01
		25 CORE 7/0.50mm U/G SIGNAL CABLE	ARTC Spec ESA-11-01
	50 CORE 7/0.50mm U/G SIGNAL CABLE	ARTC Spec ESA-11-01	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
		10 CORE 7/0.67mm U/G SIGNAL CABLE	ARTC Spec ESA-11-01
		20 CORE 7/0.67mm U/G SIGNAL CABLE	ARTC Spec ESA-11-01
		30 CORE 7/0.67mm U/G SIGNAL CABLE	ARTC Spec ESA-11-01
		4 CORE 7/0.85mm U/G SIGNAL CABLE	ARTC Spec ESA-11-01
		8 CORE 7/0.85mm U/G SIGNAL CABLE	ARTC Spec ESA-11-01
		SINGLE CORE 7/0.85mm U/G POWER CABLE	ARTC Spec ESA-11-01
		SINGLE CORE 7/1.04mm U/G POWER CABLE	ARTC Spec ESA-11-01
		SINGLE CORE 7/1.35mm U/G POWER CABLE	ARTC Spec ESA-11-01
		SINGLE CORE 7/1.70mm U/G POWER CABLE	ARTC Spec ESA-11-01
		SINGLE CORE 19/1.35mm U/G POWER CABLE	ARTC Spec ESA-11-01
		SINGLE CORE 19/1.78mm U/G POWER CABLE	ARTC Spec ESA-11-01
		SINGLE CORE 37/1.78mm U/G POWER CABLE	ARTC Spec ESA-11-01
		1 PAIR 1.27mm ² U/G SSI DATA CABL	ARTC Spec ESA-11-01
		SINGLE CORE 24/0.20mm FLEXIBLE SIGNAL CABLE	ARTC Spec ESA-11-01
		SINGLE CORE 7/0.40mm FLEXIBLE SIGNAL CABL	ARTC Spec ESA-11-01
		SINGLE CORE 56/0.30mm FLEXIBLE SIGNAL CABLE	ARTC Spec ESA-11-01
		SINGLE CORE 84/0.30mm FLEXIBLE SIGNAL CABLE	ARTC Spec ESA-11-01
		SINGLE CORE 126/0.40mm FLEXIBLE SIGNAL CABLE	ARTC Spec ESA-11-01
		4 PAIR 7/0.50mm U/G SIGNAL CABLE	ARTC Spec ESA-11-01
		8 PAIR 7/0.50mm U/G SIGNAL CABLE	ARTC Spec ESA-11-01
		12 PAIR 7/0.50mm U/G SIGNAL CABL	ARTC Spec ESA-11-01

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
		24 PAIR 7/0.50mm U/G SIGNAL CABLE	ARTC Spec ESA-11-01
		1 PAIR 7/0.85mm U/G SIGNAL CABL	ARTC Spec ESA-11-01
		4 PAIR 7/0.85mm U/G SIGNAL CABLE	ARTC Spec ESA-11-01
		8 PAIR 7/0.85mm U/G SIGNAL CABLE	ARTC Spec ESA-11-01
		HF SCREENED TRACK CIRCUIT CABLES	ARTC Spec ESA-11-01
		4 Core Star Quad Cable	ARTC Spec ESA-11-01
		12 core Single Mode Fibre Optic	ARTC Spec ESA-11-01
		24 core Single Mode Fibre Opti	ARTC Spec ESA-11-01

2.13 Trackside Equipment

Weidmüller' Wiring Terminals and Fuse Holders *

Weidmuller Pty. Ltd	0294360000	TS15 AKZ 4	Not to be used for terminating external cable.
Weidmuller Pty. Ltd	0279660000	TS32 SAK 2.5	Not to be used for terminating external cable.
Weidmuller Pty. Ltd	0128360000	TS32 SAK 4	
Weidmuller Pty. Ltd	0193260000	TS32 SAK 6N	
Weidmuller Pty. Ltd	0110060000	TS32 SAK 10	
Weidmuller Pty. Ltd	0550660000	TS32 SAK 35N	
Weidmuller Pty. Ltd	0303560000	TS32 SAK 35	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Weidmuller Pty. Ltd	1596240000	TS 32 SAKH 35 EP/SW	
Weidmuller Pty. Ltd	170320000	TS32 SAKG 28 II	
Weidmuller Pty. Ltd	380460000	TS35 SAK 2.5/35	Not to be used for terminating external cable.
Weidmuller Pty. Ltd	443660000	TS35 SAK 4/35	
Weidmuller Pty. Ltd	380560000	TS35 SAK 6/35	
Weidmuller Pty. Ltd	443760000	TS35 SAK 10/35	
Weidmuller Pty. Ltd	608260000	TS35 SAK 35N/35	
Weidmuller Pty. Ltd	637320000	TS35 SAKG 32/35 II	
Weidmuller Pty. Ltd	03711.6 # ¶	TS35 DK 4	Not to be used for terminating external cable.
Weidmuller Pty. Ltd	590260000	TS35 DK 4 QV*	Not to be used for terminating external cable. (Replaces DK 4 Cat. No. 03711.6)
Weidmuller Pty. Ltd	1608510000	TS35 ZDU 2.5	For non-vital internal circuits only.
Weidmuller Pty. Ltd	1674300000	TS35 ZDK 2.5/1.5	For non-vital internal circuits in local control panels only.
Weidmuller Pty. Ltd	1689990000	TS35 ZDK 2.5/1.5V	For non-vital internal circuits in local control panels only.
Weidmuller Pty. Ltd	9512190000	WDU70N TS35	Minimum conductor size: 16mm ² solid, 25mm ² stranded
Weidmuller Pty. Ltd	170420000	TS32 SAKG 32 II	
Weidmuller Pty. Ltd	170620000	TS32 SAKG 46 II	
Weidmuller Pty. Ltd	324020000	TS32 SAKC 10 STB/RE	Without test sockets.

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Weidmuller Pty. Ltd	324120000	TS32 SAKC 10 2STB	Non-preferred configuration.
Weidmuller Pty. Ltd	2710090000	TS32 WTTB 6	With 2 test sockets.
Weidmuller Pty. Ltd	1608680000	TS35 ZTR 2.5	Preferred configuration.
Weidmuller Pty. Ltd	1878560000	Best/D	Limited application. Vital circuits require case by case design approval.
Weidmuller Pty. Ltd	1878560000	Best/D	For non-vital internal circuits only.
Weidmuller Pty. Ltd	191120000	TS32 SAKS 1/G25	For non-vital internal circuits only, Reverse Diode circuit.
Weidmuller Pty. Ltd	211120000	TS32 SAKS 3	
Weidmuller Pty. Ltd	248920000	TS32 SAKS 3 GZ/6.3X32	
Weidmuller Pty. Ltd	359420000	TS32 SAKS 5 380AC	With RED fuse cap.
Weidmuller Pty. Ltd	501520000	TS35 SAKS 1/35 /G25	Max. 10 amp.
Weidmuller Pty. Ltd	667420000	TS35 SAKS 3	
Weidmuller Pty. Ltd	667520000	TS35 SAKS 3/35 GZ/6.3X32	
Weidmuller Pty. Ltd	502120000	TS35 SAKS 5/35	With RED fuse cap.
Weidmuller Pty. Ltd	323100000	TS32 EK 2	
Weidmuller Pty. Ltd	0354760000	TS32 EK35	
'Wago' Wiring Terminals and Fuse Holders *			
NHP Electrical Engineering Products Pty. Ltd.	279-101, 279-104	DIN 35 Grey Blue	Non-vital only.

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
NHP Electrical Engineering Products Pty. Ltd.	280-101, 280-104	DIN 35 Grey Blue	May not be used to terminate external cables.
NHP Electrical Engineering Products Pty. Ltd.	281-101, 281-104	DIN 35 Grey Blue	
NHP Electrical Engineering Products Pty. Ltd.	282-101, 282-104 ¶	DIN 35 Grey Blue	
NHP Electrical Engineering Products Pty. Ltd.	283-101, 283-104	DIN 35 Grey Blue	
NHP Electrical Engineering Products Pty. Ltd.	284-101, 284-104 ¶	DIN 35 Grey Blue	
NHP Electrical Engineering Products Pty. Ltd.	280-646, 280-656	DIN 35 Grey Blue	May not be used to terminate external cables.
NHP Electrical Engineering Products Pty. Ltd.	280-641, 280-651	DIN 35 Grey Blue	May not be used to terminate external cables.
NHP Electrical Engineering Products Pty. Ltd.	281-631, 281-651	DIN 35 Grey Blue	
NHP Electrical Engineering Products Pty. Ltd.	264-711	DIN 35 Grey	For use in field equipment (signal head, trainstop, point machine etc.) only.
NHP Electrical Engineering Products Pty. Ltd.	264-731	DIN 35 Grey	For use in field equipment (signal head, trainstop, point machine etc.) only.
NHP Electrical Engineering Products Pty. Ltd.	282-126	DIN 35 Grey	Maximum 10 amp.
NHP Electrical Engineering Products Pty. Ltd.	282-128	DIN 35 Grey	Maximum 10 amp.

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
NHP Electrical Engineering Products Pty. Ltd.	282-107	DIN 35 Yellow/Green	Maximum 7/0.85.
NHP Electrical Engineering Products Pty. Ltd.	283-107	DIN 35 Yellow/Green	Maximum 7/1.7.
NHP Electrical Engineering Products Pty. Ltd.	284-107	DIN 35 Yellow/Green	
Phoenix ' Wiring Terminals and Fuse Holders *			
Phoenix Contact Pty. Ltd.	13 02 01 1	DIN 32 K4	
Phoenix Contact Pty. Ltd.	13 02 07 9	DIN 32 K4/E	Only to be used individually.
Phoenix Contact Pty. Ltd.	13 03 01 0	DIN 32 K10	
Phoenix Contact Pty. Ltd.	13 03 07 8	DIN 32 K10/E	Only to be used individually.
Phoenix Contact Pty. Ltd.	13 04 01 9	DIN 32 K16	
Phoenix Contact Pty. Ltd.	13 04 07 7	DIN 32 K16/E	Only to be used individually.
Phoenix Contact Pty. Ltd.	30 01 01 9	DIN 32/35 UK 2.5	May not be used to terminate external cables.
Phoenix Contact Pty. Ltd.	30 03 01 7	DIN 32/35 UK 4	
Phoenix Contact Pty. Ltd.	30 04 36 2	DIN 32/35 UK 5 N	
Phoenix Contact Pty. Ltd.	30 05 01 5	DIN 32/35 UK 10	
Phoenix Contact Pty. Ltd.	30 05 07 3	DIN 32/35 UK 10 N	
Phoenix Contact Pty. Ltd.	30 06 01 4	DIN 32/35 UK 16	
Phoenix Contact Pty. Ltd.	30 06 04 3	DIN 32/35 UK 16 N	
Phoenix Contact Pty. Ltd.	30 07 01 3	DIN 32/35 UK 25	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Phoenix Contact Pty. Ltd.	30 08 01 2	DIN 32/35 UK 35	
Phoenix Contact Pty. Ltd.	30 10 01 3	DIN 32/35 UKH 95	Minimum Conductor 25mm ² .
Phoenix Contact Pty. Ltd.	30 10 11 0	DIN 32/35 UKH 150	Minimum Conductor 35mm ² .
Phoenix Contact Pty. Ltd.	30 10 21 7	DIN 32/35 UKH 240	Minimum Conductor 95mm ² .
Phoenix Contact Pty. Ltd.	21 30 20 8	DIN 32/35 UHV 25 M8/M8	
Phoenix Contact Pty. Ltd.	21 30 21 1	DIN 32/35 UHV 50 M10/M10	
Phoenix Contact Pty. Ltd.	21 30 22 4	DIN 32/35 UHV 95 M12/M12	
Phoenix Contact Pty. Ltd.	21 30 23 7	DIN 32/35 UHV 150 M12/M12	
Weidmüller' Wiring Conductor and Cable Markers *			
Weidmuller Pty. Ltd.	'Partex' Type PA1 & PA2	'Partex' Type PA1 & PA2	
'Critchley' Wiring Conductor and Cable Markers *			
Tyco Electronics Pty Ltd	ZS09	Z-Type marker	Closed slip-on characters.
Tyco Electronics Pty Ltd	ZS13	Z-Type marker	Closed slip-on characters.
Tyco Electronics Pty Ltd	ZS18	Z-Type marker	Closed slip-on characters.
Tyco Electronics Pty Ltd	ZS23	Z-Type marker	Closed slip-on characters.
Tyco Electronics Pty Ltd	ZS35	Z-Type marker	Closed slip-on characters.
Tyco Electronics Pty Ltd	HS032WE50	HSI system	For use on SSI plugs
Tyco Electronics Pty Ltd	HS032YW50	HSI system	For use on SSI plugs
Tyco Electronics Pty Ltd	8259903	HSI system	Markers
Tyco Electronics Pty Ltd	8259904	HSI system	Markers

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Tyco Electronics Pty Ltd	820532	HSI system	Carriers
Tyco Electronics Pty Ltd	825032	HSI system	Carriers
Tyco Electronics Pty Ltd	825232	HSI system	Carriers
Tyco Electronics Pty Ltd	825432	HSI system	Carriers
Tyco Electronics Pty Ltd	825532	HSI system	Carriers
Tyco Electronics Pty Ltd	825632	HSI system	Carriers
Tyco Electronics Pty Ltd	KS65	K-type system	cable markers if used without carrier strip
Tyco Electronics Pty Ltd	1130	K-type system	Carrier strip for KS65; must be strapped to cable at both ends (flag type not permitted).
Tyco Electronics Pty Ltd	1131	K-type system	
Tyco Electronics Pty Ltd	1132	K-type system	
Tyco Electronics Pty Ltd	PM09512	Permark System	To utilise Saddle Fixing only. Only for use external to equipment housings.
Tyco Electronics Pty Ltd	PM07507	Permark System	Only for use external to equipment housings.
'MRD Rail Technologies' Earth Leakage Detector *			
MRD Rail Technologies Pty Ltd	ELD-AC	110/120 V AC 50 Hz AC only busbar monitoring.	Not to be purchased new.
MRD Rail Technologies Pty Ltd	ELD-AC/DC	110/120 V AC 50 Hz AC or DC busbar monitoring.	Not to be purchased new.
MRD Rail Technologies Pty Ltd	ELD-AC/DC-12	9-18 V DC AC or DC busbar monitoring.	Not to be purchased new.
MRD Rail Technologies Pty Ltd	ELDAC/DC-AUTO-110	110/120 V AC 50 Hz AC or DC busbar monitoring.	
MRD Rail Technologies Pty Ltd	ELDAC/DC-AUTO-12	9-18 V DC AC or DC busbar monitoring.	
MRD Rail Technologies Pty Ltd	ELDAC/DC-PMB	Panel Mounting Bracket	
'Fortress Interlocks' Duplex Lock *			

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Fortress Interlocks Pty Ltd	H31	Key	
Fortress Interlocks Pty Ltd	H31	Lock	
Fortress Interlocks Pty Ltd	CL	Key	
Fortress Interlocks Pty Ltd	CL	90° RH Lock	
Fortress Interlocks Pty Ltd	CA10	Switch, Rotary switch	
Fortress Interlocks Pty Ltd		cCase	
'MRD' RelayPro Automated Relay Tester *			
MRD	RPTB-Q	RelayPro (Firmware V1.0) Software Version 8.0.4	
MRD	RP-CK	RelayPro Calibration Kit	
MRD	-	RelayPro Installer (Front End Software) V8.1.4	
MRD	RPA104	Zero Reference	
MRD	RPA102	1R Precision Reference	
MRD	RPA105	Test Base	
MRD	-	Carry Case	
NOSPARC Arc Suppressor *			
Electronic Components Pty Ltd	MHXAC1F480	AC 480 Rev MHX	
Electronic Components Pty Ltd	MHXAC1F240	AC 240 Rev MHX	
Electronic Components Pty Ltd	MHXAC1F120	AC 120 Rev MHX	
Electronic Components Pty Ltd	MGXDC1F48	DC 48 Rev MGX	
Electronic Components Pty Ltd	MGXDC1F24	DC 24 Rev MGX	
Precision Timer Co' Series 606 & 646 Recycle Timers *			

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Precision Timer Co. Inc.	606-PP1CC/0.64S/0.2S	Series 606 1A 12v DC recycle timer configured for Pulsating aspect (Single LED)	
Precision Timer Co. Inc.	606-PP1CC/0.4S/0.4S	Series 606 1A 12v DC recycle timer configured for Flashing aspect (Single LED)	
Precision Timer Co. Inc.	606-PP5CC/0.64S/0.2S	Series 606 1A 120v AC recycle timer configured for Pulsating aspect (Single LED)	
Precision Timer Co. Inc.	606-PP5CC/0.4S/0.4S	Series 606 1A 120v AC recycle timer configured for Flashing aspect (Single LED)	
Precision Timer Co. Inc.	646A-PP5CC/0.64S/0.2S	Series 646 5A 120v AC recycle timer configured for Pulsating aspect (Single LED)	
Precision Timer Co. Inc.	646A-PP5CC/0.4S/0.4S	Series 646 5A 120v AC recycle timer configured for Flashing aspect (Single LED)	
'Pivot Electronics' DATT Fliptop Disconnect and Test Terminal *			
Pivot Electronics	002 0001	DATT Disconnect and Test Terminal c/w Black Disconnect Link	32A maximum load
Pivot Electronics	002 0002	DATT Disconnect and Test Terminal c/w Yellow Disconnect Link	To be used on every 10 th terminal. 32A maximum load
Pivot Electronics	100	Flatt Fuse Link Holder 20 x 5mm	32A maximum load
Pivot Electronics	101	Flatt Fuse Link Holder 32 x 6mm	
Pivot Electronics	201	Power Jumper	
Pivot Electronics	202	DATT Bussing Comb 2 – way	
Pivot Electronics	203	DATT Bussing Comb 3 – way	
Pivot Electronics	204	DATT Bussing Comb 4 - way	
Pivot Electronics	205	DATT Bussing Comb 5 - way	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Pivot Electronics	206	DATT Bussing Comb 6 – way	
Pivot Electronics	207	DATT Bussing Comb 7 – way	
Pivot Electronics	208	DATT Bussing Comb 8 – way	
Pivot Electronics	209	DATT Bussing Comb 9 – way	
Pivot Electronics	210	DATT Bussing Comb 10 – way	
Pivot Electronics	995	Dummy Plug assembly, Orange	To be used during staged works and commissioning only
Pivot Electronics	996	Dummy Plug assembly, Red	
Pivot Electronics	997	Dummy Plug assembly, Blue	
Pivot Electronics	251	Terminal MARKING SYSTEM [1,10], 5 OFF PER PACK (100 numbers) per card	
Pivot Electronics	252	Terminal MARKING SYSTEM [11,20] 5 OFF PER PACK (100 numbers) per card	
Pivot Electronics	253	Terminal MARKING SYSTEM [21,30], 5 OFF PER PACK (100 numbers) per card	
Pivot Electronics	254	Terminal MARKING SYSTEM [31,40], 5 OFF PER PACK (100 numbers) per card	
Pivot Electronics	255	Terminal MARKING SYSTEM [41,50], 5 OFF PER PACK (100 numbers) per card	
Pivot Electronics	256	Terminal MARKING SYSTEM [51,60], 5 OFF PER PACK (100 numbers) per card	
Pivot Electronics	257	Terminal MARKING SYSTEM [61,70], 5 OFF PER PACK (100 numbers) per card	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Pivot Electronics	258	Terminal MARKING SYSTEM [71,80], 5 OFF PER PACK (100 numbers) per card	
Pivot Electronics	259	Terminal MARKING SYSTEM [81,90], 5 OFF PER PACK (100 numbers) per card	
Pivot Electronics	260	Terminal MARKING SYSTEM [91,100], 5 OFF PER PACK (100 numbers) per card	
TMAC – Rail Bonding Clamps *			
TMAC (Thew and McCann Group)	TM00032	MTOS1E2***TM (PED T-Handle Single, 2m*95mm2, 2*CLE600 Clamps)	PED maximum fault current rating 18kA/0.5 seconds. When two sets or more are used in parallel, the total rating is reduced by 10%
TMAC (Thew and McCann Group)	TM00033	MTOS1E2***TM (PED T-Handle Single, 6m*95mm2, 2*CLE600 Clamps)	PED maximum fault current rating 18kA/0.5 seconds. When two sets or more are used in parallel, the total rating is reduced by 10%
TMAC (Thew and McCann Group)	TM00637	MTOS1E2***TM (PED T-Handle Single, 16m*95mm2, 2*CLE600 Clamps)	PED maximum fault current rating 18kA/0.5 seconds. When two sets or more are used in parallel, the total rating is reduced by 10%
Lock Focus Type EOL *			
Lock Focus	Style H31	EOL Lock manufactured by Lock Focus.	
Lock Focus	-	EOL Key	
Lock Focus	Style CA10	Rotary switch manufactured by Kraus & Naimer	
Lock Focus	-	Master Series padlock with collar and chain,	
Lock Focus	-	Lock Focus lock barrel fitted to padlock	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
MRD Rail Technologies – EarthLogger *			
MRD Rail Technologies Pty Ltd	ESL-A	EarthSense, 1 Channel Insulation Monitor & Logger LAN + RS485	
	ESL-B	EarthSense, 1 Channel Insulation Monitor & Logger LAN + RS485	
	ESL4-A	EarthSense, 4 Channel Insulation Monitor & Logger LAN + RS485 Universal Supply 85-265 V AC, 100-200 V DC	
	ESL4-B	EarthSense, 4 Channel Insulation Monitor & Logger LAN + RS485 LV Supply 9-36V DC	
	ESL4-AM	EarthSense, 4 Channel Insulation Monitor & Logger LAN + RS485 Universal Supply 85-265 V AC, 100-200 V DC	
	ESL4-BM	EarthSense, 4 Channel Insulation Monitor & Logger LAN + RS485 LV Supply 9-36V DC	
Exelectronics - Schottky Diode Block *			
Exelectronics	E11008-3	Schottky Diode Block 1-10A	
Exelectronics	E11031-1	Schottky Diode Block 10-30A	
MRD RelayDoc *			
MRD Rail Technologies Pty Ltd.	RelayDoc-HV	RelayDoc Automated BR930 Relay Tester (includes software, BR930 Test Base with automatic pin code detection) – 130V (to be used for AC and DC relay testing)	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
	RD-CK	RelayDoc Calibration Kit	
	RD-CASE	Shock-resistant carry case	
Phoenix Contact' Terminal Range *			
Phoenix Contact Pty. Ltd.	1076793	PT 10-MTL (Knife disconnect terminal)	
Phoenix Contact Pty. Ltd.	1080201	PT 10-TG (Fuse terminal)	
Phoenix Contact Pty. Ltd.	3005947	FBS 2-10 (PT 10-MTL & PT 10TG Jumper 2 position)	
Phoenix Contact Pty. Ltd.	3005948	FBS 5-10 (PT 10-MTL, PT 10TG Jumper 5 position)	
Phoenix Contact Pty. Ltd.	3247954	Switch Lock (White) (PT 4MT & PT 10MTL compatible)	
Phoenix Contact Pty. Ltd.	3046498	P-FU (Fuse Plug)	
Phoenix Contact Pty. Ltd.	1104018	Marking Top (PT 10-MTL& PT 10-TG) - Terminal labels (Number 1-50)	
Phoenix Contact Pty. Ltd.	1104019	Marking Top (PT 10-MTL& PT 10-TG) - Terminal labels (Number 51-100)	
Phoenix Contact Pty. Ltd.	1053027:0001	Marking Top (PT 10-MTL& PT 10-TG) - Terminal labels (Number 1-10)	
Phoenix Contact Pty. Ltd.	1053027:0011	Marking Top (PT 10-MTL& PT 10-TG) - Terminal labels (Number 11-20)	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Phoenix Contact Pty. Ltd.	1053027:0021	Marking Top (PT 10-MTL& PT 10-TG) - Terminal labels (Number 21-30)	
Phoenix Contact Pty. Ltd.	1053027:0031	Marking Top (PT 10-MTL& PT 10-TG) - Terminal labels (Number 31-40)	
Phoenix Contact Pty. Ltd.	1053027:0041	Marking Top (PT 10-MTL& PT 10-TG) - Terminal labels (Number 41-50)	
Phoenix Contact Pty. Ltd.	1053027:0051	Marking Top (PT 10-MTL& PT 10-TG) - Terminal labels (Number 51-60)	
Phoenix Contact Pty. Ltd.	1053027:0061	Marking Top (PT 10-MTL& PT 10-TG) - Terminal labels (Number 61-70)	
Phoenix Contact Pty. Ltd.	1053027:0071	Marking Top (PT 10-MTL& PT 10-TG) - Terminal labels (Number 71-80)	
Phoenix Contact Pty. Ltd.	1053027:0081	Marking Top (PT 10-MTL& PT 10-TG) - Terminal labels (Number 81-90)	
Phoenix Contact Pty. Ltd.	1053027:0091	Marking Top (PT 10-MTL& PT 10-TG) - Terminal labels (Number 91-100)	
Phoenix Contact Pty. Ltd.	1104048	Marking Side (PT 10-MTL& PT 10-TG) - Terminal labels (Number 1-50)	
Phoenix Contact Pty. Ltd.	1104020	Marking Side (PT 10-MTL& PT 10-TG) - Terminal labels (Number 51-100)	
Phoenix Contact Pty. Ltd.	810025:0001	Marking Side (PT 10-MTL& PT 10-TG) - Terminal labels (Number 1-10)	
Phoenix Contact Pty. Ltd.	810025:0011	Marking Side (PT 10-MTL& PT 10-TG) - Terminal labels (Number 11-20)	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Phoenix Contact Pty. Ltd.	810025:0021	Marking Side (PT 10-MTL& PT 10-TG) - Terminal labels (Number 21-30)	
Phoenix Contact Pty. Ltd.	810025:0031	Marking Side (PT 10-MTL& PT 10-TG) - Terminal labels (Number 31-40)	
Phoenix Contact Pty. Ltd.	810025:0041	Marking Side (PT 10-MTL& PT 10-TG) - Terminal labels (Number 41-50)	
Phoenix Contact Pty. Ltd.	810025:0051	Marking Side (PT 10-MTL& PT 10-TG) - Terminal labels (Number 51-60)	
Phoenix Contact Pty. Ltd.	810025:0061	Marking Side (PT 10-MTL& PT 10-TG) - Terminal labels (Number 61-70)	
Phoenix Contact Pty. Ltd.	810025:0071	Marking Side (PT 10-MTL& PT 10-TG) - Terminal labels (Number 71-80)	
Phoenix Contact Pty. Ltd.	810025:0081	Marking Side (PT 10-MTL& PT 10-TG) - Terminal labels (Number 81-90)	
Phoenix Contact Pty. Ltd.	810025:0091	Marking Side (PT 10-MTL& PT 10-TG) - Terminal labels (Number 91-100)	
Phoenix Contact Pty. Ltd.	1104010	Marking Top (P-FU) - Terminal labels (Number 1-50)	
Phoenix Contact Pty. Ltd.	1104011	Marking Top (P-FU) - Terminal labels (Number 51-100)	
Phoenix Contact Pty. Ltd.	1052028:0001	Marking Top (P-FU) - Terminal labels (Number 1-10)	
Phoenix Contact Pty. Ltd.	1052028:0011	Marking Top (P-FU) - Terminal labels (Number 11-20)	
Phoenix Contact Pty. Ltd.	1052028:0021	Marking Top (P-FU) - Terminal labels (Number 21-30)	
Phoenix Contact Pty. Ltd.	1052028:0031	Marking Top (P-FU) - Terminal labels (Number 31-40)	
Phoenix Contact Pty. Ltd.	1052028:0041	Marking Top (P-FU) - Terminal labels (Number 41-50)	
Phoenix Contact Pty. Ltd.	1052028:0051	Marking Top (P-FU) - Terminal labels (Number 51-60)	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Phoenix Contact Pty. Ltd.	1052028:0061	Marking Top (P-FU) - Terminal labels (Number 61-70)	
Phoenix Contact Pty. Ltd.	1052028:0071	Marking Top (P-FU) - Terminal labels (Number 71-80)	
Phoenix Contact Pty. Ltd.	1052028:0081	Marking Top (P-FU) - Terminal labels (Number 81-90)	
Phoenix Contact Pty. Ltd.	1052028:0091	Marking Top (P-FU) - Terminal labels (Number 91-100)	
Phoenix Contact Pty. Ltd.	3211933	PT 4-MT (Through terminal)	
Phoenix Contact Pty. Ltd.	3030420	D-ST 4 (End cover)	
Phoenix Contact Pty. Ltd.	3030336	FBS 2-6 (PT 4-MT Jumper 2 position)	
Phoenix Contact Pty. Ltd.	3030242	FBS 3-6 (PT 4-MT Jumper 3 position)	
Phoenix Contact Pty. Ltd.	3030255	FBS 4-6 (PT 4-MT Jumper 4 position)	
Phoenix Contact Pty. Ltd.	3030349	FBS 5-6 (PT 4-MT Jumper 5 position)	
Phoenix Contact Pty. Ltd.	1008238	FBS 6-6 (PT 4-MT Jumper 6 position)	
Phoenix Contact Pty. Ltd.	3030271	FBS 10-6 (PT 4-MT Jumper 10 position)	
Phoenix Contact Pty. Ltd.	3030365	FBS 20-6 (PT 4-MT Jumper 20 position)	
Phoenix Contact Pty. Ltd.	1104016	Marking Side (PT 4-MT) - Terminal labels (Number 1-50)	
Phoenix Contact Pty. Ltd.	1104017	Marking Side (PT 4-MT) - Terminal labels (Number 51-100)	
Phoenix Contact Pty. Ltd.	0808765:0001	Marking Side (PT 4-MT) - Terminal labels (Number 1-10)	
Phoenix Contact Pty. Ltd.	0808765:0011	Marking Side (PT 4-MT) - Terminal labels (Number 11-20)	
Phoenix Contact Pty. Ltd.	0808765:0021	Marking Side (PT 4-MT) - Terminal labels (Number 21-30)	
Phoenix Contact Pty. Ltd.	0808765:0031	Marking Side (PT 4-MT) - Terminal labels (Number 31-40)	
Phoenix Contact Pty. Ltd.	0808765:0041	Marking Side (PT 4-MT) - Terminal labels (Number 41-50)	
Phoenix Contact Pty. Ltd.	0808765:0051	Marking Side (PT 4-MT) - Terminal labels (Number 51-60)	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Phoenix Contact Pty. Ltd.	0808765:0061	Marking Side (PT 4-MT) - Terminal labels (Number 61-70)	
Phoenix Contact Pty. Ltd.	0808765:0071	Marking Side (PT 4-MT) - Terminal labels (Number 71-80)	
Phoenix Contact Pty. Ltd.	0808765:0081	Marking Side (PT 4-MT) - Terminal labels (Number 81-90)	
Phoenix Contact Pty. Ltd.	0808765:0091	Marking Side (PT 4-MT) - Terminal labels (Number 91-100)	
Phoenix Contact Pty. Ltd.	3212064	PT POWER 35	
Phoenix Contact Pty. Ltd.	3212066	PT POWER 35 PE (Earth terminal)	
Phoenix Contact Pty. Ltd.	1104021	Marking (PT POWER 35 & PT POWER 35 PE)	
Phoenix Contact Pty. Ltd.	3260100	PT POWER 95	
Phoenix Contact Pty. Ltd.	3260106	PT POWER 95 PE (Earth terminal)	
Phoenix Contact Pty. Ltd.	1104021	Marking (PT POWER 95 & PT POWER 95 PE)	
Phoenix Contact Pty. Ltd.	800307	UBE/D (Name Tag)	
Phoenix Contact Pty. Ltd.	0808095	ESL (Name tag stickers)	
Phoenix Contact Pty. Ltd.	0800886	E/NS 35N (End clamp)	
2.14 Rail Connection			
'Weidmüller' Wiring Conductor Crimping Tool*			
Weidmuller Pty. Ltd.	9006120000	Crimping Tool CT1 6	
'Siemens' PEGA 1211 Test Set. *			
Siemens	PEGA 1211	FTGS/GLS/AZS Test Set	
ERICO' Track Bonding Components *			
ERICO Products Australia	A1215	Channel Pin	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
ERICO Products Australia	A1197	6mm S/S tapered bolt, M6 S/S 'Nylock' nut & 2 x S/S star washers	
ERICO Products Australia	A1234	12 mm S/S tapered bolt, copper bush, flat washer, spring washer, standard nut & ½ Locknut	
ERICO Products Australia	715070	SK 19/14 (12mm bolt single rail-web contact)	
ERICO Products Australia	715070	SK 122/20 (12mm bolt single rail-web contact)	
ERICO Products Australia	KIT6	6mm stud weld kit	
ERICO Products Australia		6mm S/S stud, S/S flat washer, S/S spring washer, S/S hex locknut & 2 x S/S star washers	
ERICO Products Australia	SB32	Weld-metal cartridge	
ERICO Products Australia	PBHVT20P120AIM	Rail web mould	
ERICO Products Australia	T320	Flint ignitor	
ERICO Products Australia	B136B	Mould cleaning tool	
ERICO Products Australia	T317	Duxseal compound	
ERICO Products Australia	KIT6PLUS	6mm stud weld kit. As KIT6 with electrically ignited cartridge	
ERICO Products Australia	PB32PLUSF80	Electrical ignited weld-metal cartridge	
ERICO Products Australia	KIT12	12mm stud weld kit	
ERICO Products Australia		12mm S/S stud, S/S flat washer, S/S spring washer, S/S hex nut & S/S hex locknut	
ERICO Products Australia	PB90	Weld-metal cartridge	
ERICO Products Australia	PBHVT20P120AIMHV M12	Rail web mould	
ERICO Products Australia	T320	Flint ignitor	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
ERICO Products Australia	B136B	Mould cleaning tool	
ERICO Products Australia	T317	Duxseal compound	
ERICO Products Australia	FS0016	12mm stud weld kit. As KIT12 without PB90 cartridge	
ERICO Products Australia	KIT12PLUS	12mm stud weld kit. As KIT12 with electrically ignited cartridge	
ERICO Products Australia	PB90PLUSF80	Electrical ignited weld-metal cartridge	
ERICO Products Australia	SBA252S0	Clip for 19mm o/d cable	
ERICO Products Australia	SBA252S1	Clip for 25mm o/d cable	
ERICO Products Australia	SBA2522	Clip for 31mm o/d cable	
ERICO Products Australia	SBA251	Clip for 3/8' cable	
ERICO Products Australia	SBA248B	Clip for 3/8' cable	
ERICO Products Australia	GCHSC89	4 x Clips for 3/8' cable	
ERICO Products Australia	GCHSC1924	3 x Clips for 19-24mm o/d cable	
ERICO Products Australia	GCHSC2530	2 c Clips for 25-30mm o/d cable	
ERICO Products Australia	N/A	Flexible Glue	
'ERICO' Rail Drilling and Bonding Tools *			
ERICO Products Australia	SBC105C	T-21 Rail mould clamp connector frame	
ERICO Products Australia	MFU11032	Magnetic handle clamp	
ERICO Products Australia	SBT320	Flint ignitor	
ERICO Products Australia	SBB32130	Fling ignitor with extension handle	
ERICO Products Australia	PLUSCU	Ignition Control Unit	
ERICO Products Australia	PLSCULD	Replacement cable 4.6mm	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
ERICO Products Australia	PLSCULD15	Replacement cable 15m	
ERICO Products Australia	715345	HSKE manual Insertion Tool	
ERICO Products Australia	715218	Hydraulic head adaptor	
ERICO Products Australia	715216	Mandrel	
ERICO Products Australia	715215		
ERICO Products Australia	716338	Extraction bush / mandrel	
ERICO Products Australia	716336		
ERICO Products Australia	716540	Test-gauge	
ERICO Products Australia	715645	Test-gauge	
ERICO Products Australia	716542	Test-gauge	
ERICO Products Australia	715685	SBM-VS Rail drilling machine	
ERICO Products Australia	715360	BSK-1 Rail clamp	
ERICO Products Australia	715375	Coolant tank with pump	
ERICO Products Australia	715695	Metal case	
ERICO Products Australia	715395	Tooling set	
ERICO Products Australia	716315	SSB 8 drill	
ERICO Products Australia	716074	ASB 8 mounting adaptor	
ERICO Products Australia	716320	SSB 13 drill	
ERICO Products Australia	716185	SSB 19 drill	
ERICO Products Australia	715520	ZSP cooling adaptor	
ERICO Products Australia	715305	SBHM 22 drill	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
ERICO Products Australia	715660	83mm Cooling pin	
ERICO Products Australia	715075	LR-1 Coolant	
ERICO Products Australia	715365	Rail web neutral axis bonding height template	
ERICO Products Australia	715542		
ERICO Products Australia	715545		
ERICO Products Australia	716534	Axle Counter head mounting inter-hold distance gauge	
ERICO Products Australia	716527		
ERICO Products Australia	715537	Axle Counter head height template	
ERICO Products Australia	715526		
ERICO Products Australia	715527		
Safe track Pin Brazing**			
Transient Control Australia	SAFE 94350	SAFETRACK PIN BRAZING KIT	** - Refer ESC-07-04
	SAFE 10011	SAFETRACK 8MM STANDARD PIN	
	SAFE 2003	SAFETRACK 8MM STANDARD FERRULE	
	SAFE 5007	SAFETRACK M12 T CONNECTOR	
	SAFE 301010	SAFETRACK RAIL BOND Railbond 25mm2 L=1.1 MTR/40degree	
	SAFE 30570100	SAFETRACK EXTENSION CABLE 200MM/25MM2 M6 NUT & BOLT	
	SAFE 3275	SAFETRACK RAILBOND L = 410MM 25MM2 COPPER 2X 8MM BONDS	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
	SAFE 3050	SAFETRACK RAILBOND 25mm ² COPPER L=200mm 2 X 8MM BONDS	
2.15 Cable Route			
Linpac cable route pits and troughing *			
Linpac Rotational Mouldings	VP0152	P2 Injection Pit	
Linpac Rotational Mouldings	VP0153	P3 Injection Pit	
Linpac Rotational Mouldings	VP0155	P5 Injection Pit	
Linpac Rotational Mouldings	UG2005	LP5 Pit	
Linpac Rotational Mouldings	UG2010	LP5 Collar	
Linpac Rotational Mouldings	UG2300	LP5 Lid	
Linpac Rotational Mouldings	UG2006	LP6 Lid	
Linpac Rotational Mouldings	UG2011	LP6 Collar	
Linpac Rotational Mouldings	UG2400	LP6 Lid	
Linpac Rotational Mouldings	UG2007	LP7 Pit	
Linpac Rotational Mouldings	UG2017	LP7 Collar	
Linpac Rotational Mouldings	UG2008	LP8 Pit	
Linpac Rotational Mouldings	UG2009	LP9 Pit	
Linpac Rotational Mouldings	UG2033	G3 Pit	
Linpac Rotational Mouldings	UG2030	G3 Collar	
Linpac Rotational Mouldings	UG2055	G3 Lid	
Linpac Rotational Mouldings	UG2090	Platform Pit	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Linpac Rotational Mouldings	UG2075	Round Pit	
Linpac Rotational Mouldings	UG2072	Cable Tray	
Linpac Rotational Mouldings	UG2071	Cable Tray Lid	
Linpac Rotational Mouldings	CM0029	Cable Guard	
Metwest Engineering - Pre-Cast Concrete Pits and GLT *			
Metwest Engineering	1540	Concrete Pit 1/8 Abbott	
Metwest Engineering	1729	Concrete Pit 1/4 Abbott Short	
Metwest Engineering	763	Concrete Pit 1/2 Abbott Short	
Metwest Engineering	693	Concrete Pit 1/2 Abbott Long	
Metwest Engineering	1541	Concrete Pit 3/4 Abbott	
Metwest Engineering	1098	Concrete Pit Full Abbott c/w knockouts	
Metwest Engineering	738	Concrete Pit Zeppo c/w knockouts	
Metwest Engineering	863	Concrete Pits Costello Lite	
Metwest Engineering	1103	Concrete Riser 1/2 Abbott 300mm	
Metwest Engineering	1102	Concrete Riser 3/4 Abbott 300mm	
Metwest Engineering	1590	Concrete Riser Full Abbott 150mm	
Metwest Engineering	1149	Concrete Riser Full Abbott 300mm	
Metwest Engineering	1101	Concrete Riser Full Abbott 600mm	
Metwest Engineering	1148	Concrete Riser Full Abbott 1200mm	
Metwest Engineering	600	Concrete Riser Zeppo 150	
Metwest Engineering	574	Concrete Riser Zeppo 300	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Metwest Engineering	611	Concrete Riser Zeppo 600	
Metwest Engineering	870	Concrete Riser Zeppo 900	
Metwest Engineering	772	Concrete Lid 1/2 Abbott Class D 6*9	
Metwest Engineering	1550	Concrete Lid 1/4 Abbott Class D 6*6	
Metwest Engineering	1595	Concrete Lid 3/4 Abbott Class D	
Metwest Engineering	662	Concrete Lid 3/4 Abbott Full Class D	
Metwest Engineering	879	Concrete Zeppo Class D	
Metwest Engineering	1542	Pit Lid 1/4 Abbott Hinged	
Metwest Engineering	1543	Pit Lid 1/8 Abbott Hinged	
Metwest Engineering	1544	Pit Lid 3/4 Abbott 2 Piece	
Metwest Engineering	1555	Pit Lid Full Abbott Alum. Class A	
Metwest Engineering	4	Pit Lid 2 Piece Zeppo & Costello	
Metwest Engineering	692	Pit Lid 1/2 Abbott Long and Short	
Metwest Engineering	511	Single Compartment GLT	
Metwest Engineering	500	Double Compartment GLT	
Metwest Engineering	499	Single Compartment GLT Lid	
Metwest Engineering	498	Double Compartment GLT Lid	
Metwest Engineering - Pre-Cast Concrete Pits and GLT			
Metwest Engineering		Precast Concrete Bases	Approved based on its existing historical application on the ARTC network
'Cubis Systems' STAKKAbOX™ Fortress Pits - Class B Load rated *			

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
CUBIS Systems	620660	Stakka Box Fortress 610*D150	
CUBIS Systems	620990	Stakka Box Fortress 915*D150	
CUBIS Systems	620120	Stakka Box Fortress 1220*D150	
CUBIS Systems	620600	600*600 Fortress COV and Frame Set Class B	
CUBIS Systems	620900	900*900 Fortress COV and Frame Set Class B	
CUBIS Systems	620122	1200*1200 Fortress COV and Frame Set Class B	
CUBIS Systems	RC5003	Fortress Access Ladder and Bracket Kit	
'Cubis Systems' Pre-Cast Concrete Pits and Access Covers *			
CUBIS Systems	524110N	1/2 Pit 1000*600*1195	
CUBIS Systems	524112N	1/2 Pit 1000*600*1005	
CUBIS Systems	524121	1/2 Pit extension piece 1000*600*300	
CUBIS Systems	524113N	3/4 Pit 1000*1000*1195	
CUBIS Systems	591065N	3/4 Bell top pit 1100*900*1050	
CUBIS Systems	524118N	Full Pit 1200*1200*1195	
CUBIS Systems	524109	Circular Pit 1200 Dia*1195	
CUBIS Systems	524108	Circular Riser 1200 Dia*300	
Channell HDPE Pits and Accessories #			
Channell	BULK012N07210	BULK0 w Floor & SHIELD Bolt Down Cover - 406mm x 406mm x 324mm	Cover equivalent to Class C loading
Channell	BULK118N07210	BULK1 w Floor & SHIELD Bolt Down Cover - 540mm x 394mm x 457mm	Cover equivalent to Class C loading

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Channell	BULK218N07210	BULK2 w Floor & SHIELD Bolt Down Cover - 700mm x 460mm x 474mm	Cover equivalent to Class C loading
Channell	BULK218N07110	BULK2 w Floor & SHIELD L-Bolt Cover - 700mm x 460mm x 474mm	Cover equivalent to Class C loading
Channell	BULKU132418R09101110	BULK2 w Floor & Rapid Locate SHIELD Cover - 700mm x 460mm x 474mm	Cover equivalent to Class C loading
Channell	77086010	BULK2 w Floor & SUPERBULK-S Drop In Cover - 700mm x 460mm x 474mm	Cover equivalent to Class D loading
Channell	BULK324N07210	BULK3 w Floor & SHIELD Bolt Down Cover - 847mm x 552mm x 608mm	Cover equivalent to Class C loading
Channell	BULK324N07210	BULK3 w Floor & SHIELD L-Bolt Cover - 847mm x 552mm x 608mm	Cover equivalent to Class C loading
Channell	BULK324N07510	BULK3 w Floor & SHIELD Cover (Padlockable) - 847mm x 552mm x 608mm	Cover equivalent to Class C loading
Channell	BULKU173024R09100910	BULK3 w Floor & SHIELD Cover (Rapid Locate) - 847mm x 552mm x 608mm	Cover equivalent to Class C loading
Channell	77086110	BULK3 w Floor & SUPERBULK-S Drop in Cover - 847mm x 552mm x 608mm	Cover equivalent to Class D loading
Channell	BULK1730244N102010	BULK3 w Floor & SUPERBULK Cover - 847mm x 552mm x 608mm	Cover equivalent to Class D loading
Channell	BULK424N07210	BULK4 (24") w Floor & SHIELD Bolt Down Cover - 1026mm x 731mm x 610mm	Cover equivalent to Class C loading
Channell	BULK424N07110	BULK4 (24") w Floor & SHIELD L-Bolt Cover - 1026mm x 731mm x 610mm	Cover equivalent to Class C loading

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Channell	BULK424N07510	BULK4 (24") w Floor & SHIELD Cover (Padlockable) -1026mm x 731mm x 610mm	Cover equivalent to Class C loading
Channell	BULKU243624R09100910	BULK4 (24") w Floor & SHIELD Cover (Rapid Locate) - 1026mm x 731mm x 610mm	Cover equivalent to Class D loading
Channell	77086210	BULK4 (24") w Floor & SUPERBULK-S Drop in Cover - 1026mm x 731mm x 610mm	Cover equivalent to Class D loading
Channell	BULK2436244N102010	BULK4 (24") w Floor & SUPERBULK Cover - 1026mm x 731mm x 610mm	Cover equivalent to Class D loading
Channell	BULK436N07210	BULK4 (36") w Floor & SHIELD Bolt Down Cover - 1026mm x 731mm x 914mm	Cover equivalent to Class C loading
Channell	BULK436N07110	BULK4 (36") w Floor & SHIELD L-Bolt Cover - 1026mm x 731mm x 914mm	Cover equivalent to Class C loading
Channell	BULK436N07510	BULK4 (36") w Floor & SHIELD Cover (Padlockable) - 1026mm x 731mm x 914mm	Cover equivalent to Class C loading
Channell	BULKU243636R09130510	BULK4 (36") w Floor & SHIELD Cover (Rapid Locate) - 1026mm x 731mm x 914mm	Cover equivalent to Class C loading
Channell	77086310	BULK4 (36") w Floor & SUPERBULK-S Drop in Cover - 1026mm x 731mm x 914mm	Cover equivalent to Class D loading
Channell	BULK2436344N102010	BULK4 (36") w Floor & SUPERBULK Cover - 1026mm x 731mm x 914mm	Cover equivalent to Class D loading
Channell	BULK536N07210	BULK5 w Floor & SHIELD Bolt Down Cover - 1314mm x 731mm x 914mm	Cover equivalent to Class C loading
Channell	77030010	BULK5 w Floor & SUPERBULK Cover - 1314mm x 731mm x 914mm	Cover equivalent to Class D loading

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Channell	BULK736N07210	BULK7 w Floor & SHIELD Bolt Down Cover - 1333mm x 883mm x 915mm	Cover equivalent to Class C loading Suitable for Main Cable Route
Channell	BULK736N07110	BULK7 w Floor & SHIELD L-Bolt Cover - 1333mm x 883mm x 915mm	Cover equivalent to Class C loading Suitable for Main Cable Route
Channell	BULK736N07510	BULK7 w Floor & SHIELD Cover (Padlockable) - 1333mm x 883mm x 915mm	Cover equivalent to Class C loading Suitable for Main Cable Route
Channell	BULKU304836R10100910	BULK7 w Floor & SHIELD Cover (Rapid Locate) - 1333mm x 883mm x 915mm	Cover equivalent to Class C loading Suitable for Main Cable Route
Channell	77086410	BULK7 w Floor & SUPERBULK-S Drop in Cover - 1333mm x 883mm x 915mm	Cover equivalent to Class D loading Suitable for Main Cable Route
Channell	BULK736N11210	BULK7 w Floor & SUPERBULK Cover - 1333mm x 883mm x 915mm	Cover equivalent to Class D loading Suitable for Main Cable Route
Channell	BULK836N07210	BULK8 (36") w Floor & SHIELD Bolt Down Cover - 1657mm x 1060mm x 915mm	Cover equivalent to Class C loading Suitable for Main Cable Route
Channell	BULK836N07510	BULK8 (36") w Floor & SHIELD Cover (Padlockable) - 1657mm x 1060mm x 915mm	Cover equivalent to Class C loading Suitable for Main Cable Route
Channell	77087010	BULK8 (36") w Floor & SHIELD Cover (Rapid Locate) - 1657mm x 1060mm x 915mm	Cover equivalent to Class C loading Suitable for Main Cable Route
Channell	77086510	BULK8 (36") w Floor & SUPERBULK-S Drop in Cover - 1657mm x 1060mm x 915mm	Cover equivalent to Class D loading

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
			Suitable for Main Cable Route
Channell	BULK848N07210	BULK8 (48") w Floor & SHIELD Bolt Down Cover - 1657mm x 1060mm x 1219mm	Cover equivalent to Class C loading Suitable for Main Cable Route
Channell	BULK848N07510	BULK8 (48") w Floor & SHIELD Cover (Padlockable) - 1657mm x 1060mm x 1219mm	Cover equivalent to Class C loading Suitable for Main Cable Route
Channell	77087110	BULK8 (48") w Floor & SHIELD Cover (Rapid Locate) - 1657mm x 1060mm x 1219mm	Cover equivalent to Class C loading Suitable for Main Cable Route
Channell	77086610	BULK8 (48") w Floor & SUPERBULK-S Drop in Cover - 1657mm x 1060mm x 1219mm	Cover equivalent to Class D loading Suitable for Main Cable Route
Channell	BULK942N07210	BULK9 w Floor & SHIELD Bolt Down Cover - 2065mm x 1061mm x 1066mm	Cover equivalent to Class C loading Suitable for Main Cable Route
Channell	BULK942N07510	BULK9 w Floor & SHIELD Cover (Padlockable) - 2065mm x 1061mm x 1066mm	Cover equivalent to Class C loading Suitable for Main Cable Route
Channell	BULK942N011210	BULK9 w Floor & SUPERBULK Drop in Cover - 2065mm x 1061mm x 1066mm	Cover equivalent to Class D loading Suitable for Main Cable Route
Channell	770722	GLB1111 Earth Pit - 295mm x 295mm x 406mm	
Channell	770721	GLB912 Earth Pit - 242mm x 318mm x 305mm	
Channell	770720	GLB610 Earth Pit - 158mm x 216mm x 254mm	
Channell – Accessories			

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
Channell	BULKA1212-EXT	BULK0 Extension	Custom sizes available
Channell	BULKA1118-EXT	BULK1 Extension	Custom sizes available
Channell	BULKA1324-EXT	BULK2 Extension	Custom sizes available
Channell	BULKA1730-EXT10	BULK3 Extension	254mm / Custom Sizes also available
Channell	BULKA2436-EXT10	BULK4 Extension	254mm / Custom Sizes also available
Channell	BULKA2448-EXT14	BULK5 Extension	356mm / Customer Sizes also available
Channell	BULKA3048-EXT14	BULK7 Extension	356mm / Customer Sizes also available
Channell	BULKA3660-EXT	BULK8 Extension	Custom sizes available
Channell	BULKA3676-EXT	BULK9 Extension	Custom sizes available
Channell	BULKARC1730	BULK3 Riser	
Channell	BULKARC2436	BULK4 Riser	
Channell	BULKARM2448	BULK5 Riser	
Channell	BULKARC3048	BULK7 Riser	
Channell	770160	Access Ladder and bracket Kit	Customized to specific pit depth
Channell	ACC03017160	Marker Locator Device	Packet of 12
Channell	ACC03028696G	Cable Hook Bracket	Packet of 12
Channell	ACC03009905	Step Bracket Wedge	Each
Channell	770161	Tri-Lobe High Security Bolts (SHIELD BULK1 to 3)	Packet of 4
Channell	770162	Tri-Lobe High Security Bolts (SHIELD BULK4+)	Packet of 4
Channell	HK02240	Hook/Wrench w/Tri-Lobe Socket Combination Tool	Each

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
'TufDuct' - Cable Route Management System*			
TufDuct	TB-1000	TufDuct Brush - 1m	Miscellaneous
TufDuct	TP-1200-S	TufDuct PrismA Standard - 1.2m	
TufDuct	TP-1200-L	TufDuct PrismA Large - 1.2m	
TufDuct	TDA-Feet	TufDuct Feet	
TufDuct	TDA-UL-090	TufDuct U Locator 090 Series	
TufDuct	TDA-LL	TufDuct L Locator	
TufDuct	TD090S	TufDuct Straight - 090	090 Series Duct
TufDuct	TD090B	TufDuct Bend - 090	
TufDuct	TD090T	TufDuct Tee - 090	
TufDuct	TD090G-D	TufDuct Gradient Down - 090	
TufDuct	TD090G-U	TufDuct Gradient Up - 090	
TufDuct	TD090EP-F	TufDuct End Plate Female - 090	
TufDuct	TD090EP-M	TufDuct End Plate Male	
TufDuct	TD135S	TufDuct Straight - 135	135 Series Duct
TufDuct	TD135B	TufDuct Bend - 135	
TufDuct	TD135T	TufDuct Tee - 135	
TufDuct	TD135G-D	TufDuct Gradient Down - 135	
TufDuct	TD135G-U	TufDuct Gradient Up - 135	
TufDuct	TD135EP-F	TufDuct End Plate Female - 135	
TufDuct	TD135EP-M	TufDuct End Plate Male - 135	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
TufDuct	TD150S	TufDuct Straight - 150	150 Series Duct
TufDuct	TD150B	TufDuct Bend - 150	
TufDuct	TD150T	TufDuct Tee - 150	
TufDuct	TD150G-D	TufDuct Gradient Down - 150	
TufDuct	TD150G-U	TufDuct Gradient Up - 150	
TufDuct	TD150EP-F	TufDuct End Plate Female - 150	
TufDuct	TD150EP-M	TufDuct End Plate Male - 150	
TufDuct	TD200S	TufDuct Straight - 200	200 Series Duct
TufDuct	TD200B	TufDuct Bend - 200	
TufDuct	TD200T	TufDuct Tee - 200	
TufDuct	TD200G-D	TufDuct Gradient Down - 200	
TufDuct	TD200G-U	TufDuct Gradient Up - 200	
TufDuct	TD200EP-F	TufDuct End Plate Female - 200	
TufDuct	TD200EP-M	TufDuct End Plate Male - 200	
TufDuct	TD300S	TufDuct Straight - 300	300 Series Duct
TufDuct	TD300B	TufDuct Bend - 300	
TufDuct	TD300T	TufDuct Tee - 300	
TufDuct	TD300G-D	TufDuct Gradient Down - 300	
TufDuct	TD300G-U	TufDuct Gradient Up - 300	
TufDuct	TD300EP-F	TufDuct End Plate Female - 300	
TufDuct	TD300EP-M	TufDuct End Plate Male - 300	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
TufDuct	TD300W	TufDuct Walkway - 300 Per 1m single unit	300 Series Walkway
TufDuct	TD300W-B IN	TufDuct Walkway Bend- 300 Internal	
TufDuct	TD300W-B EX	TufDuct Walkway Bend- 300 External	
TufDuct	TD300W-T	TufDuct Walkway Tee - 300	
TufDuct	TD430S	TufDuct Straight - 430	430 Series Duct
TufDuct	TD430B	TufDuct Bend - 430	
TufDuct	TD430T	TufDuct Tee - 430	
TufDuct	TD430G-D	TufDuct Gradient Down - 430	
TufDuct	TD430G-U	TufDuct Gradient Up - 430	
TufDuct	TD430EP-F	TufDuct End Plate Female - 430	
TufDuct	TD430EP-M	TufDuct End Plate Male - 430	
TufDuct	TFR-030	TufDuct Flexible Round 30mm	Flexible Round Conduit Coils
TufDuct	TFR-040	TufDuct Flexible Round 40mm	
TufDuct	TFR-050	TufDuct Flexible Round 50mm	
TufDuct	TFR-065	TufDuct Flexible Round 65mm	
TufDuct	TFR-080	TufDuct Flexible Round 80mm	
TufDuct	TFR-100	TufDuct Flexible Round 100mm	
TufDuct	TFR-150	TufDuct Flexible Round 150mm	
TufDuct	TFR-200	TufDuct Flexible Round 200mm	Flexible Round Bellmouths
TufDuct	TFR-BM-030	TufDuct Bell Mouth - 30mm	
TufDuct	TFR-BM-040	TufDuct Bell Mouth - 40mm	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
TufDuct	TFR-BM-050	TufDuct Bell Mouth - 50mm	
TufDuct	TFR-BM-065	TufDuct Bell Mouth - 65mm	
TufDuct	TFR-BM-080	TufDuct Bell Mouth - 80mm	
TufDuct	TFR-BM-100	TufDuct Bell Mouth - 100mm	
TufDuct	TFR-BM-125	TufDuct Bell Mouth - 125mm	
TufDuct	TFR-BM-150	TufDuct Bell Mouth - 150mm	
TufDuct	TFR-BM-200	TufDuct Bell Mouth - 200mm	
TufDuct	TFR-CF-025	Conduit/Flexible Joiner - 25mm	Flexible Round Conduit to Flexible Joiner
TufDuct	TFR-CF-030	Conduit/Flexible Joiner - 30mm	
TufDuct	TFR-CF-040	Conduit/Flexible Joiner- 40mm	
TufDuct	TFR-CF-050	Conduit/Flexible Joiner- 50mm	
TufDuct	TFR-CF-080	Conduit/Flexible Joiner- 80mm	
TufDuct	TFR-CF-100	Conduit/Flexible Joiner- 100mm	
TufDuct	TFR-EC-030	TufDuct Flexible End Cap - 30	Flexible Round End Caps
TufDuct	TFR-EC-040	TufDuct Flexible End Cap - 40	
TufDuct	TFR-EC-050	TufDuct Flexible End Cap - 50	
TufDuct	TFR-EC-065	TufDuct Flexible End Cap - 65	
TufDuct	TFR-EC-080	TufDuct Flexible End Cap - 80	
TufDuct	TFR-EC-100	TufDuct Flexible End Cap - 100	
TufDuct	TFR-EC-125	TufDuct Flexible End Cap - 125	
TufDuct	TFR-EC-150	TufDuct Flexible End Cap - 150	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
TufDuct	TFR-EC-200	TufDuct Flexible End Cap - 200	
TufDuct	TFR-SJ-030	TufDuct Straight Joiner - 030	Flexible Round Straight Joiner
TufDuct	TFR-SJ-040	TufDuct Straight Joiner - 040	
TufDuct	TFR-SJ-050	TufDuct Straight Joiner - 050	
TufDuct	TFR-SJ-065	TufDuct Straight Joiner - 065	
TufDuct	TFR-SJ-080	TufDuct Straight Joiner - 080	
TufDuct	TFR-SJ-100	TufDuct Straight Joiner - 100	
TufDuct	TFR-SJ-125	TufDuct Straight Joiner - 125	
TufDuct	TFR-SJ-150	TufDuct Straight Joiner - 150	
TufDuct	TFR-SJ-200	TufDuct Straight Joiner - 200	
TufDuct	TFR-UC-030	TufDuct Uni Connector - 030	
TufDuct	TFR-UC-040	TufDuct Uni Connector - 040	
TufDuct	TFR-UC-050	TufDuct Uni Connector - 050	
TufDuct	TFR-UC-065	TufDuct Uni Connector - 065	
TufDuct	TFR-UC-080	TufDuct Uni Connector - 080	
TufDuct	TFR-UC-100	TufDuct Uni Connector - 100	
TufDuct	TFR-UC-125	TufDuct Uni Connector - 125	
TufDuct	TFR-UC-150	TufDuct Uni Connector - 150	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network

Supplier	Part No	Product/Description	Condition/Remarks
2.16 Enclosures			
'Garard Moulded Pre-cast' Pre-cast Concrete Equipment Housing *			
Garard Moulded Pre-Cast	ARTC 1	Pre-cast concrete Equipment Housing	
'AFL Australia' Fiber Patch Panel Enclosure Kit *			
AFL Australia	AFL1RU-F-16STSM	Fiber Patch Panel Enclosure Kit	

*-See Type approval certificate on ARTC Extranet for more detail and conditions.

@ - Based on the review and acceptance from OT or BU Engineering team.

- Product compliant to ARTC specification

\$ - Included based on the existing use on the ARTC network