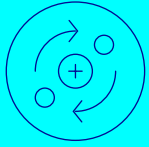

RBBP Wavelength



RBBP Managed Wavelength services are dedicated transmission services ideally suited for carriers developing their own overlay transmission infrastructure.

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VOCUS

Our solution for you

RBBP Wavelength Ethernet

Wavelength Ethernet provides point to point Ethernet carriage at 1Gbit/s, 10Gbit/s, 100Gbit/s and 400Gbit/s with maximum layer-2 protocol transparency.

Wavelength OTN

Wavelength OTN provides ODU2, ODU2e and ODU4 rates will full overhead byte transparency to allow maximum visibility and control of the ODU payload.

DWDM Network

Wavelength services are carried over our state-of-the-art DWDM networks, either as a dedicated optical signal, or time-division multiplexed within dedicated optical signals.

24x7 Network Monitoring

Service Management Centre provides ongoing end-to-end monitoring around the clock for RBBP networks. All DWDM elements are actively monitored and our in-line fibre monitoring system can pinpoint fibre faults to within a couple of meters across the country. Our technicians are on call to fix the faults any time of the day or night.

Site classifications and pricing zones

Prices are dependent on the type of delivery location and the particular RBBP Route.

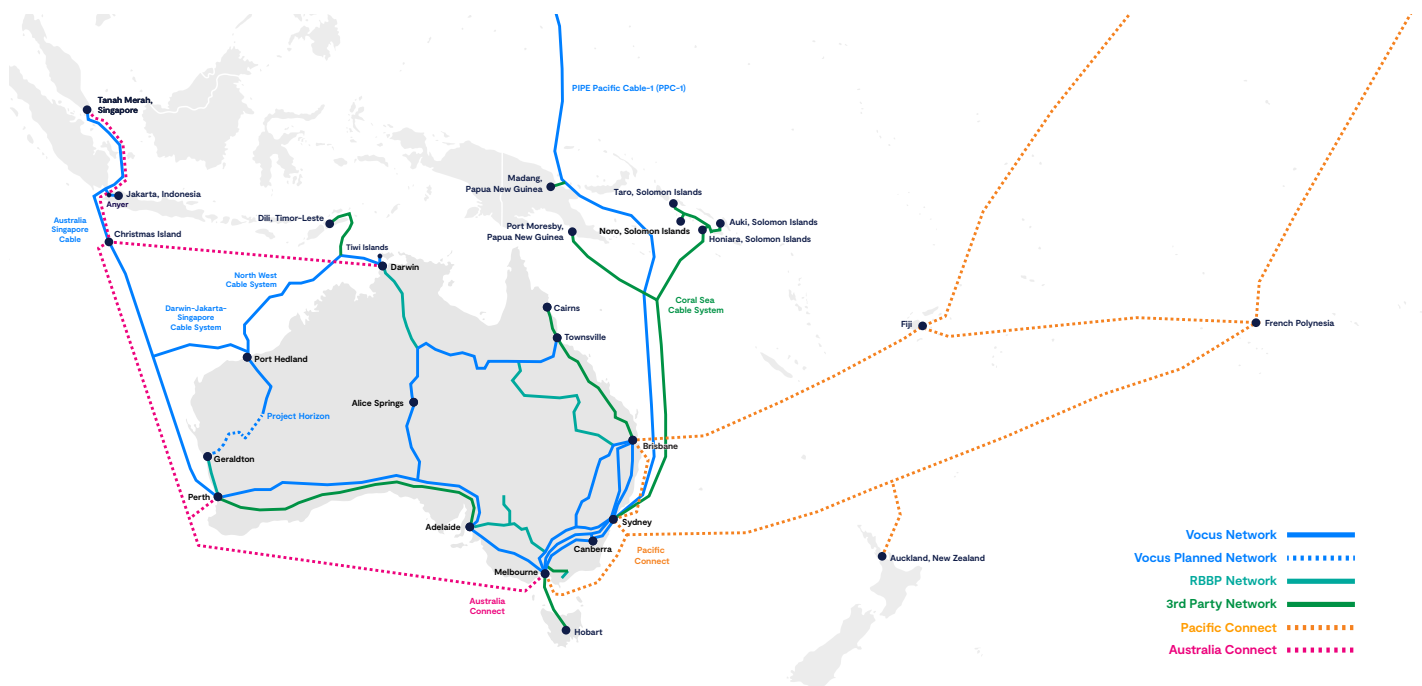
Site types are:

- Carrier Point of Interconnect (CPoI)
- Backbone Point of Interconnect (BPoI)
- Nearest Capital City (selected Data Centres)
- Sydney (selected Data Centres)

Wholesale Only

Nextgen Group's RBBP Services are offered only to the wholesale market comprising:

- Licensed Carriers
- Carriage Service Providers
- Internet Service Providers
- Broadcast Transmission Providers
- Systems Integrators



Product specifications

Product	RBBP Wavelength SDH	RBBP Wavelength Ethernet	RBBP Wavelength OTN
Service Rates (Line Rate only)	STM-16 : 2.488Gbit/s STM-4 : 0.622Gbit/s	1000Mbit/s, 10Gbit/s, 100Gbit/s, 400Gbit/s	ODU2 : 10.7Gbit/s ODU2e : 11.09Gbit/s ODU4 : 112Gbit/s
Interface Rates	STM-16: L16.1, L16.2 STM-64: I-64.1, S-64.2b	1000Mbit/s: 1000BASE-LX10, 1000BASE-ZX 10Gbit/s: 10GBASE-LR, 10GBASE-ER 100Gbit/s: 100GBASE-LR4, 100GBASE-ER4f 400Gbit/s : 400GBASE-LR4	ODU2 : P1I1-2D1 (2km), P1S1-2D2b (40km) ODU2e : P1I1-2D1 (2km), P1S1-2D2b (40km) ODU4 : 4L1-9D1F (10km), 4L1-9D1F (40km)
Frame structures	ITU-T G.707	Ethernet (IEEE 802.3-2005)	ITU-T G.872
Transparency	Section Overhead(SOH) Regenerator Section Overhead (RSOH) Multiplex Section Overhead (MSOH) Path Overhead (POH)	All Frames up to 9600 Bytes (DA- FCS) Interface. Configuration and Negotiation All IEEE reserved addresses tunneled	Optical Data Unit (ODU)
Physical Media	Single Mode Optical Fibre	Single Mode Optical Fibre	Single Mode Optical Fibre
Physical Interface	SC Flat (presented as female)	SC Flat (presented as female)	SC Flat (presented as female)
Core Protection	Unprotected	Unprotected	Unprotected
Access Protection	Unprotected	Unprotected	Unprotected
Latency	Optical delay plus small mapping delay	Optical delay plus small mapping delay	Optical delay plus small mapping delay
Bit Error Rate (End to End)	< 10 ⁻¹⁰	< 10 ⁻¹⁰	< 10 ⁻¹⁰
Target Availability	Not Specified	Not Specified	Not Specified
Target Restore Time	8 hours	8 hours	8 hours
Dual Unprotected	Where requested, Vocus will endeavor to route a second unprotected service with as much geographical diversity from the primary unprotected service as is supported on the Vocus network. No additional Service Level Agreement is available with this option. Network protection switching is the responsibility of the customer.		
Commissioning standard	ITU-T M.2101 IETF RFC 2544 ITU-T M.2110		
Customer to Provide	Rack space, 240V AC 50Hz power and cross-connects at customer sites where required.		

RBBP Service Delivery Points

Services on RBBP networks can be purchased:

- between locations on a particular RBBP Network Segment
- to selected data centres in the nearest capital city
- to selected data centres in Sydney

RBBP Network Segment – Nearest Capital City

Gerraldton – Perth
 Darwin – Brisbane or Adelaide
 Broken Hill – Adelaide or Melbourne
 Victor Harbor – Adelaide
 South West Gippsland – Melbourne