

ARRIS HLN 3144

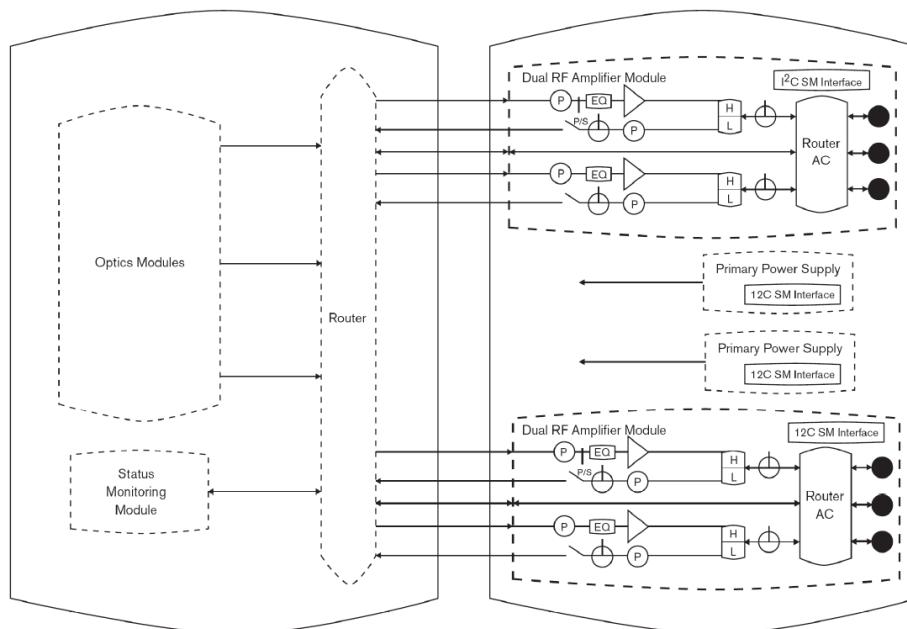
PWRBLAZER SCALEABLE OPTICAL NODE



The PWRBlazer Scaleable Optical Node addresses the need for a flexible network which can economically deliver today's broadcast services while supporting additional future advanced services. This easy-to-configure node consists of a housing (NRH 3867A), fiber tray (NFT 3000), and various combinations of power supplies (NPS 3810 or NPS 3815), optical receiver modules (NRM 3111A), return transmitter modules (NTM 3244, NTM 3245, NTM 3247, NTM 3248L, NTM 3248, NTM 3249, NDT 3049A and NDT 314x), output modules (NOM 3121) and an optional status monitoring transponder module (NMT 5244). By varying the arrangement and interconnection of these modules, the node can be configured in many possible configurations. At any time in the future, the node can be easily reconfigured to support changing broadcast needs, or to add narrowcast services, by simply installing and/or removing modules. The node can support one to four RF output ports. Operators can also configure the PWRBlazer Scaleable Node to support redundant fiber-routes as well as redundant powering. The optional status monitoring transponder interfaces with Aurora's NETWatch™ Element Management System and many other third party NMS's.

- Full segmentation allows each output to be fed by an optical receiver and/or return transmitter, providing dedicated bandwidth
- Full output scalability and flexible node configuration permits customizing the node specifically for the RF plant, this tailoring results in lower-cost installation
- Two ports, usable for either direct input or direct powering, provide even greater flexibility in network design
- Supports highly reliable networks with redundant fiber routes and power

STANDARD CONFIGURATION



HOUSING (MODEL NRH 386X)

- NRH 3867A
- Dimensions (WxHxD): 51 x 23 x 28 cm
- Weight: 16 kg

POWER SUPPLIES (MODEL NPS 38XX)

NPS 3815: 150 W

OUTPUT MODULES (MODEL NOM 31XX-YY)

NOM 3121A-30	Dual amplified Output, 50 - 30 MHz Return, 46 - 1003 MHz Forward
NOM 3121A-42	Dual amplified Output, 5 - 42 MHz Return, 52 - 1003 MHz Forward
NOM 3121A-65	Dual amplified Output, 5 - 65 MHz Return, 85 - 1003 MHz Forward

OPTICAL RECEIVERS (MODEL NRM 3111A)

NRM 3111A	1003 MHz
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RETURN TRANSMITTERS (MODEL NTM 32XX AND NDT 30XX)

NTM 3244	Isolated 1310 nm, Fabry-Perot Laser, 0 dBm
NTM 3245	Isolated 1310 nm, uncooled DFB Laser, + 3 dBm
NTM 3247	Isolated 1310 nm, cooled DFB Laser, + 3 dBm
NTM 3248	Isolated 1550 nm, uncooled DFB Laser, + 3 dBm
NTM 3248L	Isolated 1550 nm uncooled DFB Laser, 0 dBm
NTM 3249	Isolated 1550 nm DWDM ITU 16 Wavelengths, cooled DFB, + 8 dBm
NDT 3049A	Digital DWDM uncooled DFB Laser, + 3 dBm
NDT 314x	Digital CWDM uncooled DFB Laser, + 3 dBm
NOA 7014-GF	NODEedfa, Gain flattened optical Amplifier, + 14 dBm

FIBER TRAYS

NFT 3000	
NFT 5000L	

CONFIGURATION MODULES (MODEL NCM 3XXX)

Forward	
NCM 3800	Jumper
NCM 3801	1x2 Splitter
NCM 3802	A/B Switch
NCM 3803	A/B Switch with Splitter
NCM 3804	Diplex Filter 45 - 550 MHz/600 - 1003 MHz
NCM 3805	Diplex Filter/Splitter 50 - 550 MHz/600 - 1003 MHz
NCM 3806	Narrowcast Highpass Filter Combiner 550 - 1003 MHz
NCM 3807	Narrowcast Highpass Filter Combiner/Splitter 550 - 1003 MHz
NCM 3808	Narrowcast Highpass Filter Combiner 650 - 1003 MHz
NCM 3809	Narrowcast Highpass Filter Combiner/Splitter 650 - 1003 MHz
NCM 3810/3811	Forward Splitter for Top-bottom Segmentation Return
NCM 3813	Narrowcast Highpass Filter Combiner 600 - 1003 MHz
NCM 3814	De-segmentation Module
NCM 3815	Combiner
NCM 3816	Combiner/Splitter
Return	
NCM 3200	Jumper
NCM 3201	2x1 Splitter
NCM 3202	2x2 Combiner/Splitter
NCM 3203	Directional Coupler
NCM 3204	Combiner/Splitter

PWRBLAZER SCALEABLE NODE POWER SUPPLY



The PWRBlazer Scaleable Optical Node supports two switching power supplies (models NPS 3810 and NPS 3815) optimized for cable television systems. The NPS 3810 can support up to two node output modules (NOM) and four optical modules. The NPS 3815 can support a fully-loaded node with two node output modules (NOM) and eight optical modules. However, if two power supplies are installed, the second power supply operates in a load-sharing, redundant mode. Four external voltage test points are provided to aid in troubleshooting network-powering problems.

SPECIFICATIONS

POWER OUTPUT	
NPS 3810	80 W
NPS 3815	145 W
DC Output voltage	24, 12, 5 V
DC Current	
NPS 3810 24 VDC 12 VDC 5 VDC	3,2 A 1,65 A 0,5 A
NPS 3815 24 VDC 12 VDC 5 VDC	4,4 A 3,8 A 0,2 A
POWER INPUT	
AC Input voltage	
NPS 3810 40-90	VAC quasi-square wave
NPS 3815 44-95	VAC quasi-square wave
USER INTERFACE	
Local monitor points: 24, 12, 5 VDC & AC supply voltages	
NETWATCH ELEMENT MONITORING SYSTEM	
AC input voltage - monitor	
5 VDC – monitor	
12 VDC – monitor	
24 VDC - monitor	
PHYSICAL	
Dimensions (WxHxD)	17,7 x 8,4 x 7,6 cm
Weight	0,85 kg
Mounting	Within the PWRBlazer Scaleable Node HLN 3142/3144