

# Temperature-Hardened D3.0/3.1 Cable Modems

## HDCM-Dx Series

**LINDSAY**  
**BROADBAND**  
a division of technetix group

These temperature-hardened IP54 DOCSIS® 3.0/3.1 cable modems from Lindsay Broadband are specifically engineered for harsh, outdoor deployments requiring gigabit+ data communications. These cable modems are an ideal solution for installations where temperature fluctuations are prevalent. Many applications to empower your HFC network for profitable IP services can be realized with these hardened cable modems. Communication links, security and traffic cameras, digital signage, access points, and information kiosks are just a few examples of successful deployments.

These modems utilize multiple provisioning methods (SNMP, configuration file, remote Web GUI access) to allow for a custom-designed set up. These feature-rich cable modems allow operators to access critical information via spectrum analysis, monitoring, and diagnostics.



HDCM-D3.1-CM8200  
(front angled view)



HDCM-D3.0-SB6183  
(front angled view)

## FEATURES

- IP54 rated enclosure
- 2x2 OFDM/OFDMA DOCSIS 3.1 channels &/or 32x8 SCQAM DOCSIS 3.0
- Full-capture bandwidth tuner
- Multiprocessor technology with ARM-based application processor
- 2 gigabit Ethernet ports
- US & DS spectrum analyzer
- Compact & economical
- Well defined LED network status display
- Wall-mountable
- Operating Temperature: -40°C to +60°C (-40°F to +140°F) hardened
- Features dependent on cable modem selected

## SPECIFICATIONS

Parameter		Specification	
		DOCSIS® 3.0	DOCSIS 3.1
Interfaces			
RF Interface		1 external F-type connector	1 external F-type connector
Data Interfaces		1x 10/100/1000 Base-T Ethernet (RJ45 connector)	Bridged 2x 10/100/1000 Base-T Ethernet (RJ45 connector)
Input Voltage	Nominal	+12 VDC	+12 VDC
Cable Modem <sup>(1)</sup>			
Certifications		DOCSIS 3.0 (2.0 & 1.x compatible)	DOCSIS 3.0/3.1 CableLabs® certified
Band Plans		DOCSIS (Annex A & Annex B options)	DOCSIS 3.1
Network Configuration & Management		TFTP, SNMP (V2c, V3), Telnet, HTTP	TFTP, SNMP (V1, V2c, V3), Telnet, HTTP
Input Impedance		75 Ω	75 Ω
Privacy		BPI+, EAE, SSD	BPI+
Downstream Modulation		64 or 256 QAM	Up to 32 SCQAM or 2 OFDM
RF Input Sensitivity	Modem F-port	+15 to -15 dBmV for ATDMA QAM 64 (-10 dBmV for 256 QAM) <sup>(2)</sup>	+15 to -15 dBmV <sup>(2)</sup>
Upstream Modulation		QPSK & 8, 16, 32, 64, 128 QAM	Up to 8 SCQAM or 2 OFDMA
Upstream Data Rate (Max.)		131.072 Mbps (4 channels) / 32.768 Mbps (single channel): @ 128 QAM at 6.4 MHz	Over 1 Gbps
Transmit Power (Max.)	Modem F-port	+54 dBmV (47-50 dBmV recommended) <sup>(2)</sup>	+65 dBmV for OFDMA +57 dBmV for 16 QAM, 4-8 upstreams
Environmental & Physical			
Operating Humidity		5-85%, non-condensing	
Operating Temperature		-40°C to +60°C (-40°F to +140°F)	



### SPECIFICATIONS CONT'D.

Parameter	Specification	
	DOCSIS 3.0	DOCSIS 3.1
<b>Environmental &amp; Physical Cont'd.</b>		
Storage Temperature	-40°C to +70°C (-40°F to +158°F)	
Diagnostic LEDs	Front	Power, US/DS, online
	Rear	Ethernet link/speed
Housing	IP54 rated	
Dimensions (H x W x D)	2.0"H x 6.5"W x 8.0"D (5.1H x 16.5W x 20.3D cm)	
Weight	1.5 lb (0.7 kg)	

#### NOTES:

- (1) Typical. Specification will vary depending on which model of modem is ordered
- (2) Levels reported by modem management interfaces reference the modem F-port

### ORDERING INFORMATION

Part #	Description
HDCM-D3.1-CM8200	Temperature-hardened DOCSIS 3.1 8200 modem
HDCM-D3.0-SB6183	Temperature-hardened DOCSIS 3.0 6183 modem



HDCM-D3.1-CM8200  
(front view)



HDCM-D3.1-CM8200  
(rear view)



HDCM-D3.0-SB6183  
(front view)



HDCM-D3.0-SB6183  
(rear view)