



## Touchstone® DOCSIS® 3.0 Dual Band Concurrent Wireless Telephony Gateway with MoCA® TG1672G

### Specifications

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#### Physical

Operating Temperature °F (°C)	32 to 104 (0 to 40)
Operating Relative Humidity (Min-Max)	5-85% (Non condensing)
Storage Temperature °F (°C)	-40 to 158 (-40 to 70)
Color	Black
Dimensions (H x W x D) in.	10.8 x 8.2 x 2.3 - excluding F-connector
Backup Capacity	4 cell 2.2AH Lithium-ion for 8 hours operation. (#718005 Battery Pack)
Battery Dimensions in.	1.2 x 1.95 x 5.5
Weight lbs	2.5 (With Battery included)
Battery Storage Temperature °F (°C)	-4 to 140 (-20 to 60) Note: Storage above 77°F (25°C) will significantly reduce life of the battery and is not recommended.
Telemetry	AC Fail, Battery Low, Battery Missing, Replace Battery
Diagnostic LEDs	Power, US/DS, Online, 2.4GHz, 5GHz, Tel1, Tel2, Battery, MoCA

#### Interfaces

RF Interface	External 'F' type connector
Data Interfaces (bridged)	4 x 10/100/1000 Base-T Ethernet (RJ-45 connector)
Analog Telephony Interface	2 lines; RJ-14 ( "Line 1/2"), RJ-11 ( "Line 2" )
USB Interface	USB 2.0 Powered Host Port
MoCA	MoCA Version 1.1 coax support
Input Voltage (nominal)	115VAC-240VAC, 50/60 Hz

#### Telephony

Supervisory Voltage	48 Vdc nominal
Maximum Loop Length to CPE	1000 ft (457M) of 26 AWG (0.4 mm) wire
Ringling Load Capacity	10 REN total; 5 per line
Provisionable High Loop Current Mode	Yes (40mA constant current source)
Programmable Interface for Worldwide Applications	Yes (supports multiple country templates)

#### RF Downstream

Bonded Channels	Up to 16
Tuner Configuration	Full capture tuning range
Frequency Range (MHz)	108-1002 DOCSIS
Carrier Bandwidth (MHz)	6 (DOCSIS)
Modulation (QAM)	64 or 256
Data Rate (Mbps Max.)	Up to 640 DOCSIS (960 with 24 downstream upgrade)
RF Input Sensitivity Level (dBmV)	-15 to +15 (DOCSIS)

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# Technical Specification

# ARRIS Technical Specification

## Specifications Continued

### RF Upstream

Bonded Channels	Up to 4
Frequency Range (MHz)	5 to 42 (DOCSIS)
Modulation	QPSK, 8 QAM, 16 QAM, 32 QAM, 64 QAM & 128 QAM (S-CDMA only)
Data Rate (Mbps Max.)	up to 160
RF Output Level (dBmV)	ATDMA: +8 to 57 dBmV (32 QAM, 64 QAM) +8 to 58dBmV (8 QAM, 16 QAM) +8 to 61 dBmV (QPSK) S-CDMA: +8 to +56 dBmV (all modulations)
Automatic Level Adjust	Yes
Output Impedance (Ohms)	75

### Wireless

Frequency Range	Simultaneous 2.5GHz and 5GHZ operation
Transmit Power (from any antenna)	2.4GHz – 24.3 dBm +2/-2 dBm 802.11n MCS0 ; 24.3dBm +2/-2dBm 802.11n (MCS7). 5.0GHz – 26.3 dBm +2/-2 dBm 802.11n MCS0 ; 26.3 dBm +2/-2dBm 802.11n (MCS7). Includes MiMo additive power gains . Total system power is adaptable to maintain regulatory limits in the specific band of operation where necessary.
Spatial Streams	3
Receive Levels	2.4GHz - <-86dBm 802.11n (MCS0) , <-74dBm 802.11n (MCS7) 5.0GHz - <-84dBm 802.11n (MCS0) , <-72dBm 802.11n (MCS7)
Antennas	3 transmit, and 3 receive (per band)

### MoCA

Frequency Range (MHz)	1150 – 1500
Network Channel Bandwidth (MHz)	50
Max Transmit Power (dBm)	+ 9 max (adjustable)
Max Phy Rate (Mbps)	270
Application Data Rate (Mbps)	175 bidirectional combined
Link Delay	9ms max

### Standards

DOCSIS 3.0	IEEE 802.3, IEEE 802.3ab, IEEE 802.3x
PacketCable™ 1.0 & 1.5	IEEE 802.1p, IEEE 802.1Q
Codecs: G.711, 64 kbps, $\mu$ and A-law encoded speech,	IEEE Std. 802.11b, 1999 Edition
Enhanced G.722 HD codec	IEEE Std. 802.11g, 2002 Edition
T.38 Fax Relay	IEEE Std. 802.11n
MoCA 1.1	Wi-Fi® Alliance Certified
UL® 60950	FCC Part 15 Class B

Note: Battery back-up times are typical and can be influenced by the age of the battery, the charging state, storage conditions and operating temperature as well as factors such as data activity and length of active telephone calls. The capabilities, system requirements and/or compatibility with third-party products described herein are subject to change without notice . Actual operating range may vary according to environmental conditions at the time of use.

### Ordering Information

Part Number	Description
<b>DOCSIS 3.0 Models</b>	Touchstone; TG1672G Wireless eMTA DOCSIS 3.0 16x4, Dual Band Concurrent 3x3:3 802.11n radios, 4 Gigabit Ethernet, MoCA 1.1, 115-240VAC, 50/60 Hz, North America Power Cord, Ethernet Cable
800947	Touchstone TG1672G/NA-0, battery capable, no battery included
800937	Touchstone TG1672G/NA-8 , 4 cell (#718005) 2.2AH Li-Ion Battery Pack for up to 8 hours of battery back-up
782204	8 downstream license upgrade
<b>Accessories</b>	Please contact ARRIS for Specific Ordering Information and Options Battery Packs, Power Cords, Wall Mounting Brackets

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