Communications - AC 800M Communication interfaces
ABB Ability™ System 800xA® hardware selector

The AC 800M controller family includes a selection of communications modules that make it possible to access a wide range of field devices and third-party systems. The interfaces include:

• Ethernet-based interfaces/protocols
• Serial communications
• Interfaces to ABB equipment
• Communication interfaces to heritage systems

The AC 800M family does also include IEC 61508-SIL3 certified controllers PM857, PM863 and PM867, (with SM812) which supports controller configurations for:
• Safety application
• Combined Process Automation and Safety application

For updated information regarding System 800xA please visit our 800xA Hardware Selector. In the HW-selector, you can compare different communication modules, AC 800M controllers, S800 I/O modules, and S900 I/O modules, Select I/O modules, I/O module termination units, networks equipment, panels, power supplies & voters, and also print your PDF files or save an outline of all modules in the product area.

Below is an outline of the range of different AC 800M communication interfaces available.

Specific feature [1]	CI853	CI854B	CI855	CI856
General info				
Article number	3BSE018103R1 (CI853K01)	3BSE069449R1 (CI854BK01)	3BSE018106R1	3BSE026055R1
Communication protocol	COMLI and MODBUS RTU	PROFIBUS DP-V1	ABB's MasterBus 300	ABB's S100 I/O
Master or slave	Master/Slave	Master		
Number of channels	2			
Transmission speed	75 - 19 200 b/s	9.6 - 12 000 kbit/s	10 Mbit/s, 200 Datasets/s	-
Line redundancy	No	Yes		No
Module redundancy	No	Yes	No	
Hot Swap	Yes			
Used together with HI Controller	Yes			
Dimensions				
Width	59 mm (2.3 in.)			
Height	185 mm (7.3 in.)			
Depth	127.5 mm (5.0 in.)			
Weight (including base)	700 g (1.5 lbs)			
Environment and certification				
RoHS compliance	DIRECTIVE/2011/65/EU (EN 50581:2012)			
WEEE compliance	DIRECTIVE/2012/19/EU			

[1] For detailed information on each module, please visit: **800xahardwareselector.automation.abb.com**

Specific feature [1]	CI857	CI858	CI860	CI862 Classic
General info				
Article number	3BSE018144R1	3BSE018135R1	3BSE032444R1	3BUA000037R1
Communication protocol	ABB's INSUM	ABB's DriveBus	FOUNDATION Fieldbus HSE	ABB's TRIO/Genius I/O
Master or slave	Master		Master/Slave	Master
Transmission speed	10 Mbit/s	8 Mbit/s	10/100 Mbit/s	-
Line redundancy	No			
Module redundancy	No		Yes	
Hot Swap	Yes			
Used together with HI Controller	Yes	No		
Life cycle status				Classic
Dimensions				
Width	59 mm (2.3 in.)			
Height	185 mm (7.3 in.)			
Depth	127.5 mm (5.0 in.)			
Weight (including base)	700 g (1.5 lbs)			
Environment and certification				
RoHS compliance	DIRECTIVE/2011/65/EU (EN 50581:2012)			-
WEEE compliance	DIRECTIVE/2012/19/EU			

[1] For detailed information on each module, please visit: **800xahardwareselector.automation.abb.com**

Specific feature [1]	CI865	CI867A	CI868A	CI869
General info				
Article number	3BSE040795R1	3BSE092689R1	3BSE092691R1	3BSE049110R1
Communication protocol	ABB's Satt I/O	MODBUS TCP	IEC 61850	ABB's Advant Fieldbus 100
Master or slave	Master	Master/Slave		Slave
Number of channels		1 channel		
Transmission speed	-	10/100 Mbit/s (Ch1)	10/100 Mbit/s	1.5 Mbit/s
Line redundancy	No			Yes
Module redundancy	No	Yes	No	Yes
Hot Swap	Yes			
Used together with HI Controller	No	Yes		
Client or server			MMS (Client), Goose (Publisher & Subscriber)	
Network redundancy			No	
Dimensions				
Width	59 mm (2.3 in.)			
Height	185 mm (7.3 in.)			
Depth	127.5 mm (5.0 in.)			
Weight (including base)	700 g (1.5 lbs)			
Environment and certification				
RoHS compliance	DIRECTIVE/2011/65/EU (EN 50581:2012)			-
WEEE compliance	DIRECTIVE/2012/19/EU			

[1] For detailed information on each module, please visit: **800xahardwareselector.automation.abb.com**

Specific feature [1]	CI871A	CI873A	CI874
General info			
Article number	3BSE092693R1	3BSE092695R1	3BSE090784R1
Communication protocol	PROFINET IO	EtherNet IP / DeviceNet	OPC UA Client
Master or slave	Master		
Transmission speed	10/100 Mbit/s		
Line redundancy	No		
Module redundancy	Yes		
Hot Swap	Yes		
Used together with HI Controller	Yes		No
Client or server			Client
Dimensions			
Width	59 mm (2.3 in.)		
Height	185 mm (7.3 in.)		
Depth	127.5 mm (5.0 in.)		
Weight (including base)	700 g (1.5 lbs)		
Environment and certification			
RoHS compliance	DIRECTIVE/2011/65/EU (EN 50581:2012)		
WEEE compliance	DIRECTIVE/2012/19/EU		

[1] For detailed information on each module, please visit: **800xahardwareselector.automation.abb.com**

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