

Comparison of PeerComm™ and MIRRORED BITS™

SA165-001-1

PeerComm and MIRRORED BITS are both peer-to-peer communication protocols used by relays and recloser controls to share information with other, similar devices.

Feature	PeerComm	MIRRORED BITS
Min / Max number of Devices which can communicate directly without requiring any additional hardware	2 / 32	2 / 2
Additional hardware required for networks larger than 2 devices	NO	YES
Single point of failure possible for networks larger than 2 devices due to the need for additional hardware	NO	YES
Ability for user to select what mix of data (binaries, counters, floating points) to share between devices on network	YES	NO
Standard number of data sets provided with protocol	3	1
For standard available data sets:		
<ul style="list-style-type: none"> ▪ Min/Max number of Binary points which can be shared by each device 	15 / 63	8 / 8
<ul style="list-style-type: none"> ▪ Min/Max number of Counters which can be shared by each device 	0 / 3	0 / 0
<ul style="list-style-type: none"> ▪ Min/Max number of Analogs which can be shared by each device 	0 / 6	0 / 0
Custom Data Sets Available from Factory	YES	NO
Requires a hardware option to be ordered with device	NO	YES
May be retrofitted to existing devices not originally supplied with the protocol	YES - Use with any Form 6 recloser control or Idea relay	NO
Location of programmed logic for networks with more than 2 devices	Distributed or Single Point	Single Point
Capable of performing store-and-forward functions over compatible radio links to eliminate line of site problems	YES	NO
Only one radio needed per device for networks of 3 or more devices	YES	NO
Allows use of a single relay/control to act as a basic substation RTU	YES	NO
Allows for creation of a substation/system GUI updated via the protocol without requiring any special hardware or other equipment	YES	NO
Programming method	Graphical	Equation based
Programming flexibility	Unlimited	Limited
Error correction method used	16-bit CRC	6-bit CRC

PeerComm is a trademark of Cooper Industries, Inc. MIRRORED BITS is a trademark of Schweitzer Engineering Laboratories, Inc. Information on Mirrored Bits gathered from www.selinc.com in February 2003.