

# SELECTING AN ETHERNET SWITCH FOR YOUR NEXT PROJECT

Use the selection tables on p2 to quickly narrow your search for an Ethernet Switch that best suits your next project. Below are a few helpful questions to ask at the beginning of the project:



- **Does the application require Managed or Unmanaged Ethernet Switches?**
  - Choose Unmanaged for simple plug and play connectivity.
  - Choose Managed for applications requiring network traffic monitoring or segmentation.
- **What data speeds are required?**
  - 10/100Mbps
  - Gigabit (1000Mbps)
- **Does the application require PoE functionality?**
  - PoE (802.3af) 15.4W
  - PoE+ (802.3at) 30W
- **Is there a need for Fiber Ports, either for distance or noise immunity purposes?**
  - First, choose between Multi-mode or Single-mode fiber types.
  - Then choose your fiber connectors, some common ones are SC, ST, LC.
  - SFP's are not exclusive to fiber but do offer a lot of flexibility.
- **How many Ethernet Ports does the application require?**
  - Does it make sense to select a switch with a few additional ports for future expansion?
  - Does it make sense to select a switch that supports Gigabit speeds for future bandwidth requirements?
- **Review your Mounting, Temperature or Power requirements.**
  - Does the application require a compact switch or a particular mounting format?
  - What are the temperature requirements for the application?
  - Where power sources are available to power not only the switch but other devices, as well?
- **Are there other Specification considerations? For instance, an Oil & Gas application may require Class 1/Division 2 certification.**
- **Once you have a switch selected, you should start asking a few more questions.**
  - Do you have all the accessories needed to make all the connections?
  - Patch Cords, Power Supplies, Cabinets, Surge Protection, Optional Mounting Hardware and Wiring all make the top of the list.
  - When do you need product samples for proof of concept and full production?

KEY DIFFERENTIATORS	Managed Switches	Unmanaged Switches
Configuration	Requires setup	Plug & Play
Cost	High cost	Low cost
Monitoring Protocols	Yes	No
Spanning Tree / Ring Technology	Yes	No

## COMMON FEATURES

for Managed & Unmanaged Switches

- LEDs for local monitoring
- Size will vary depending on port count and features
- Operating temperatures can support extreme conditions
- Various power input options exist
- Both are flexible with mounting options

### Assistance

If you need additional product selection help, contact B+B SmartWorx technical support online chat at [www.bb-elec.com](http://www.bb-elec.com).

# ETHERNET SWITCH

## PRODUCT SELECTION GUIDE (continued)



### Unmanaged Ethernet Switches

### Managed Ethernet Switches

Switch Series:	ESW100	ESW200	EIR300	EIR400	EIRP300	EIRP400	ESW600 & ESWG600	ESW500	EIR500	EIR600	EIRM-EXTEND-8	EIRP600	ESW700 & ESWG700	
<b>FUNCTION</b>	<i>Unmanaged</i>							<i>Managed</i>						
10/100 Base	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	
Gigabit				✓		✓	ESWG600			✓		✓	ESWG700	
PoE					✓	✓						✓		
<b>PORTS</b>														
Total Port Count	5,8	5,8	5,6,8	5,8,10,18	5	10	26	8,16	8	8,10,18	8	10	26	
Built-in Fiber Option	✓	✓	✓				ESWG600	✓						
SFP Fiber Option				✓		✓	ESWG600			✓		✓	ESWG700	
Extender Ports											2			
<b>SPECIFICATIONS</b>														
Temperature	-10 to 60°C	-10 to 60°C					-10 to 60°C	-10 to 60°C		-10 to 60°C			-10 to 60°C	
Wide Temp. Option		-40 to 75°C	-34 to 74°C	-40 to 75°C	-40 to 75°C	-40 to 75°C	-40 to 75°C	-40 to 75°C	-40 to 75°C	-40 to 75°C	-40 to 75°C	-40 to 75°C	-40 to 75°C	
Power DC	12 to 36VDC	12 to 36VDC		12 to 48VDC	48VDC (24VDC)	48VDC	18 to 36VDC	12 to 36VDC	12 to 48VDC	12 to 48VDC	12 to 48VDC	48VDC	18 to 36VDC	
Power AC	10 to 24VAC	10 to 24VAC						10 to 24VAC						
Dual Power Inputs	✓	✓	✓	✓	✓	✓		✓	✓	✓	✓	✓		
Relay Outputs			✓	✓	✓	✓		✓	✓	✓	✓	✓		
DIN/Panel Mount	✓	✓	✓	✓	✓	✓		✓	✓	✓	✓	✓		
19-inch Rack							✓						✓	
<b>MODEL/SKU#</b>														
	ESW105	ESW205 (-T)*	EIR305-1SC	EIR405-SFP-T	EIRP305-24V-T	EIRP410-2SFP-T	ESW626	ESW508	EIR508-T	EIR608-2SFP	EIRM-EXTEND-8	EIRP610-2SFP-T	ESW726	
	ESW105-ML	ESW205-MC (-T)*	EIR305-1ST	EIR405-T	EIRP305-T		ESW626-T	ESW508-2MC-T		EIR608-4SFP			ESW726-T	
	ESW105-SL	ESW205-MT (-T)*	EIR306	EIR408-T	EIRHP-305-T		ESWG626-2SFP	ESW508-2SC-T		EIR610-3SFP-T			ESWG726-2SFP	
	ESW108	ESW205-SC (-T)*	EIR308	EIR410-2SFP-T			ESWG626-2SFP-T	ESW508-T		EIR618-2SFP-T			ESWG726-2SFP-T	
	ESW108-ML	ESW205-ST (-T)*	EIR308-2SC	EIR418-2SFP-T			ESWG626-4MC-2SFP-T	ESW516						
	ESW108-SL	ESW208 (-T)*	EIR308-2SC-SM					ESW516-T						
		ESW208-2MC (-T)*	EIR308-2ST											
		ESW208-2MT (-T)*												
		ESW208-2SC (-T)*												
		ESW208-2ST (-T)*												
		ESW208-4MC-T												
		ESW208-4MT-T												
		ESW208-4SC-T												

\* Add "-T" suffix for wide temperature option.