Revised Feb-20-2008

Sealed Industrial Ethernet Circular IP67 RJ45 Connector System

Description

The sealed circular RJ45 connector system is designed for use in harsh environments. The connector features bayonet coupling mechanism conforming to IEC 61076-3-106 standard. It provides fast but reliable connections in harsh environment. The Connector can be front or rear mounted into a panel with a thickness of up to 3.2mm. The integrated shielded RJ45 Jack and Plug meet EIA/TIA-568B.2 cat. 5e specifications. The connector system provides IP67 sealing performance when the connector halves are fully mated or covered. The potted version provides IP67 even under the unmated and uncovered conditions.

Two different versions (Industrial to Industrial and Industrial to Standard) of the RJ45 cat. 5e Ethernet patch cords with various lengths for tough and outdoor applications are also offered. The connectors are available in plastic and metallized plastic versions. The products are RoHS compliant.

Applications

- Industrial Machinery, CNC Machines
- Communication Equipment
- Food and Chemical Process Equipment
- Railway Network System
- Oil Exploration
- Industrial Process Control
- Diagnostic Equipment
- Printers, Display
- Factory Automation, Robotics
- Outdoor Telecom System
- Entertainment
- Video Control, Motion Control

Electrical Specifications

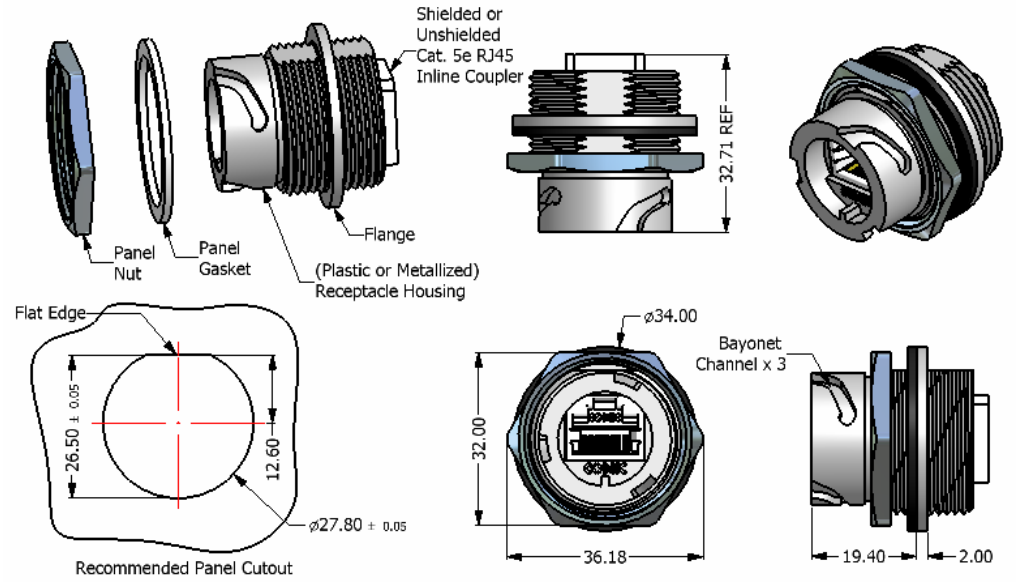
- Meets EIA/TIA-568-B.2 Cat. 5e Specification
- IR: 500MΩ min. @ 100 VDC
- DWV: 1000 V DC/60s Contact to Contact
- DWV: 1500 V DC/60s Contact to Metal Shell
- Contact Resistance: 20mΩ max.
- Current Rating: 1.2A max. at 25°C
- Working Voltage: 100 V
- Operating Temperature: -40°C to +85°C

Materials and Finish

- Receptacle Housing: PBT (Black) or metallized ABS (Nickel plated); UL94 V-0
- Panel Nut: Brass, Finish: Nickel Plated
- Panel Gasket: Silicone, Color: White
- RJ45 Jack Metal Shell: Copper Alloy, Finish: Nickel Plated
- RJ45 Jack Housing: PBT (Black), UL94 V-0
- RJ45 Jack Contact: Phosphor Bronze, Finish: 50u" Gold min. over Nickel
- Plug Coupling Ring: PBT (Black) or metallized ABS, UL94 V-0 or Zinc Die-Cast (Nickel plated)
- Plug Housing: PBT (Black) or metallized ABS (Nickel plated); UL94 V-0,
- Cable Gland Body: PA (Black) UL94 V-0 or Brass, Nickel Plated
- Cable Gland Seal: NBR, Color: Black
- Cable Gland Insert (Metal Version): Nylon, Color: White
- Interfacial Seal: Silicone, Color: White
- Cover Gasket: Silicone, Color: Red
- RJ45 Plug Metal Shell: Copper Alloy, Finish: Nickel Plated
- RJ45 Plug Housing: Clear Polycarbonate, UL94 V-0
- RJ45 Plug Contact: Phosphor Bronze, Finish: 50u" Gold min. over Nickel
- Protective Cover: PBT (Black) or metallized ABS (Nickel Plated); UL94 V-0
- Tether: PE, Color: Black
- Patch Cord Cable: UTP or STP Cat. 5e, AWG24 Solid; Color: Black
- RJ45 Modular Boot: PVC, Color: Black

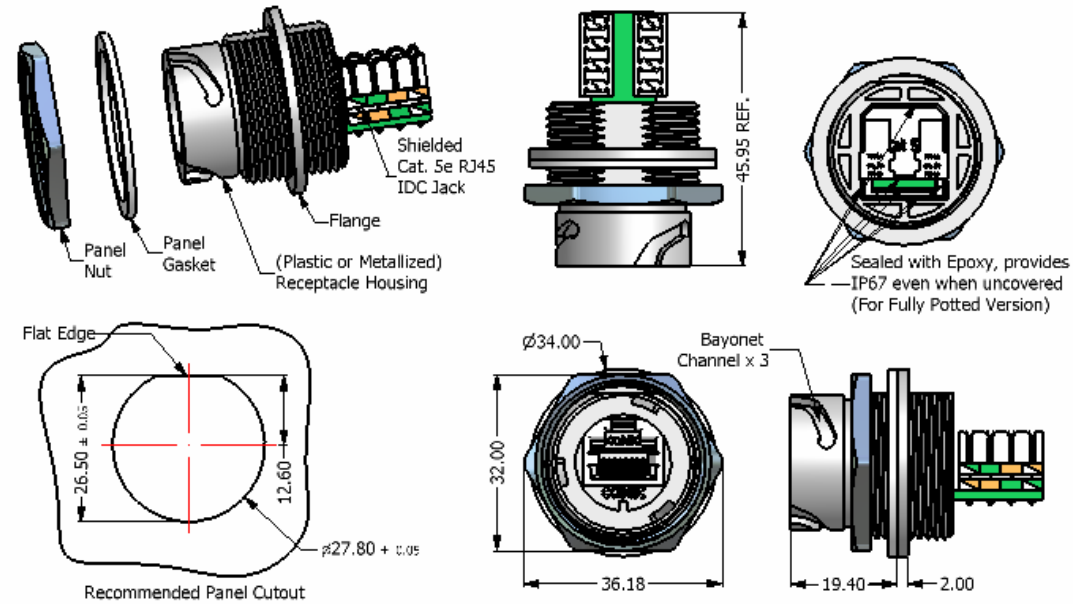
Product Overview and Dimensions (in mm)

1: Cat. 5e RJ45 Inline Coupler Receptacle Assembly Kit (P/N: see below)



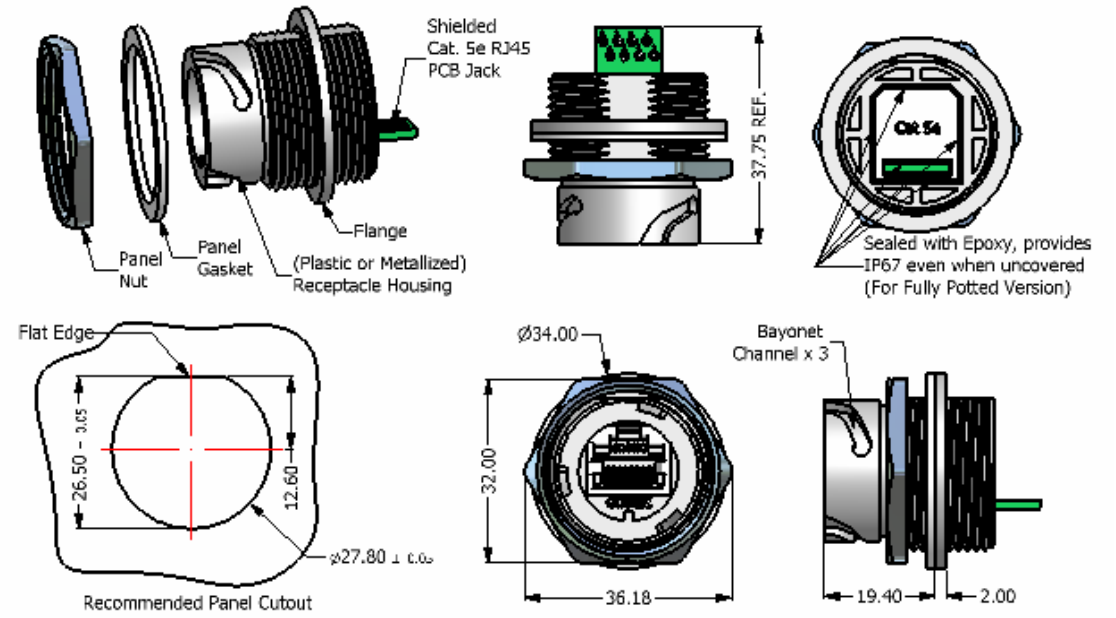
Plastic Version with Shielded Cat. 5e RJ45 Inline Coupler	**P/N: 17-10009**
Plastic Version with Unshielded Cat. 5e RJ45 Inline Coupler	**P/N: 17-10019**
Metallized Plastic Version with Shielded Cat. 5e RJ45 Inline Coupler	**P/N: 17-10012**

2: Cat. 5e RJ45 IDC Jack Receptacle Assembly Kit (P/N: see below)



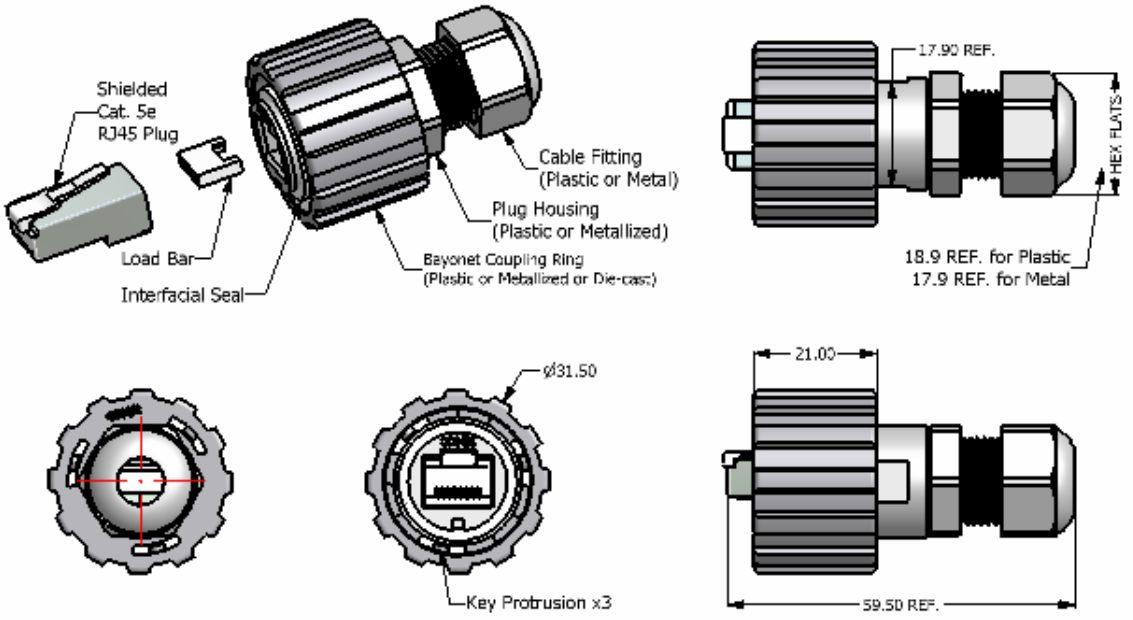
Plastic Version with Shielded Cat. 5e RJ45 IDC Jack	**P/N: 17-10015**
Metallized Plastic Version with Shielded Cat. 5e RJ45 IDC Jack	**P/N: 17-10016**
Potted Plastic Version with Shielded Cat. 5e RJ45 IDC Jack	**P/N: 17-10033**
Potted Metallized Plastic Version with Shielded Cat. 5e RJ45 IDC Jack	**P/N: 17-10034**

3: Cat. 5e RJ45 PCB Jack Receptacle Assembly Kit (P/N: see below)



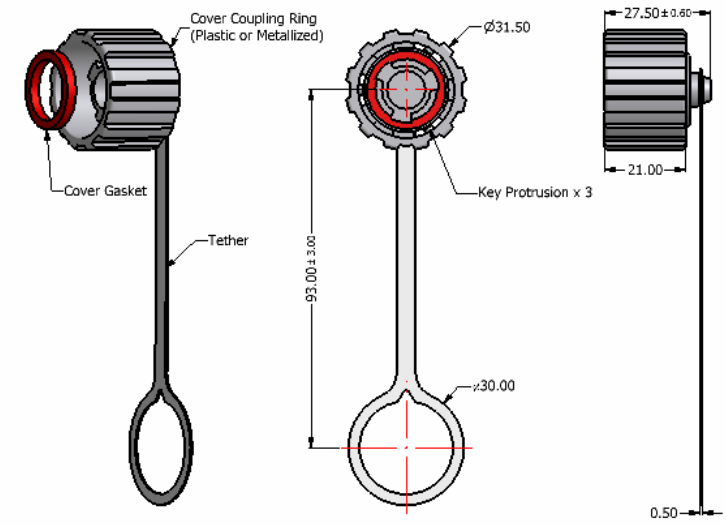
Plastic Version with Shielded Cat. 5e RJ45 PCB Jack	**P/N: 17-10017**
Metallized Plastic Version with Shielded Cat. 5e RJ45 PCB Jack	**P/N: 17-10018**
Potted Plastic Version with Shielded Cat. 5e RJ45 PCB Jack	**P/N: 17-10035**
Potted Metallized Plastic Version with Shielded Cat. 5e RJ45 PCB Jack	**P/N: 17-10036**

4: Cat. 5e RJ45 Plug Kit (P/N: see below)



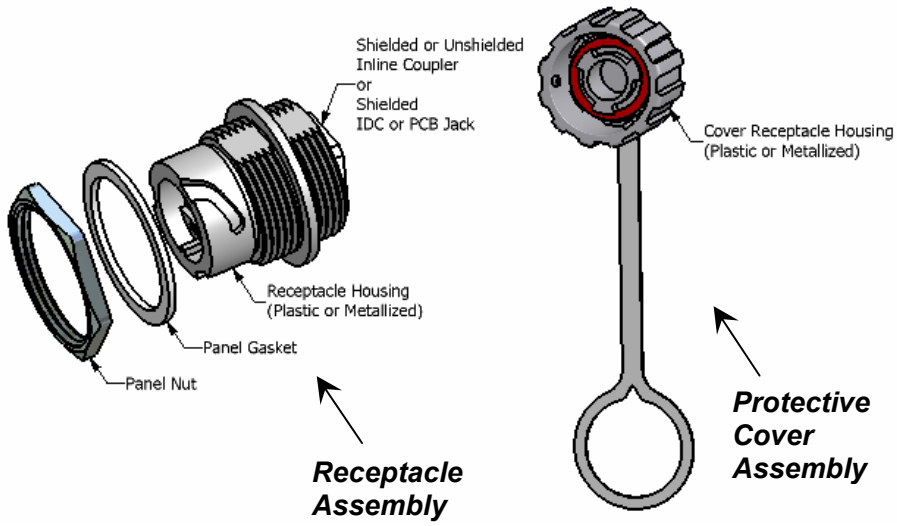
Plastic Version	**P/N: 17-10001**
Metallized Plastic Version	**P/N: 17-10013**
Zinc Die-Cast Version	**P/N: 17-10044**

5: Protective Cover Assembly (P/N: see below)



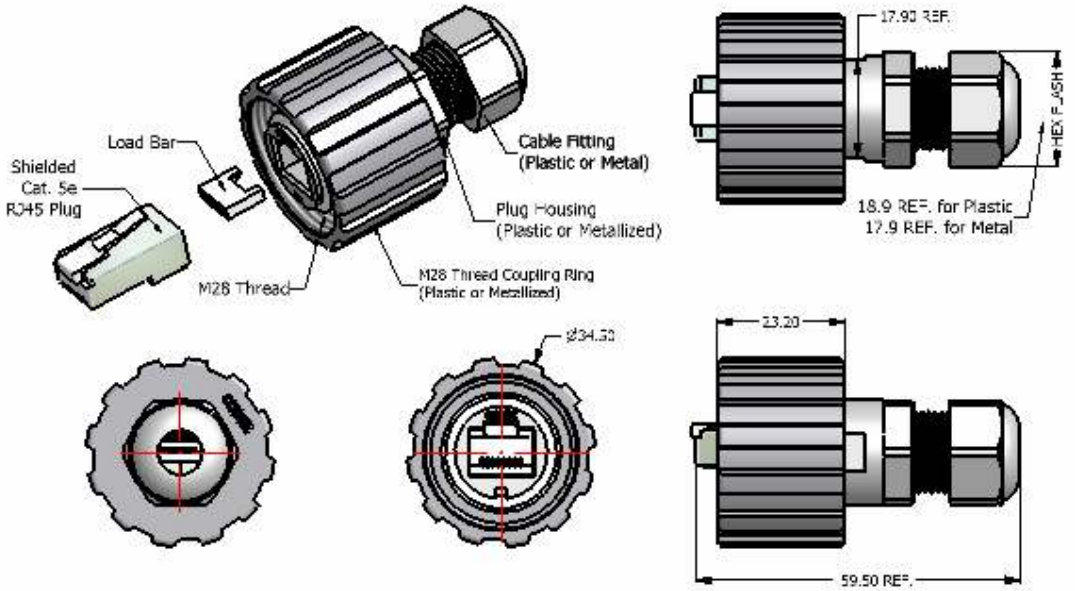
Plastic Version	**P/N: 17-10002**
Metallized Plastic Version	**P/N: 17-10014**

6. The Receptacle + Protective Cover Assembly Kit (P/N: see below)



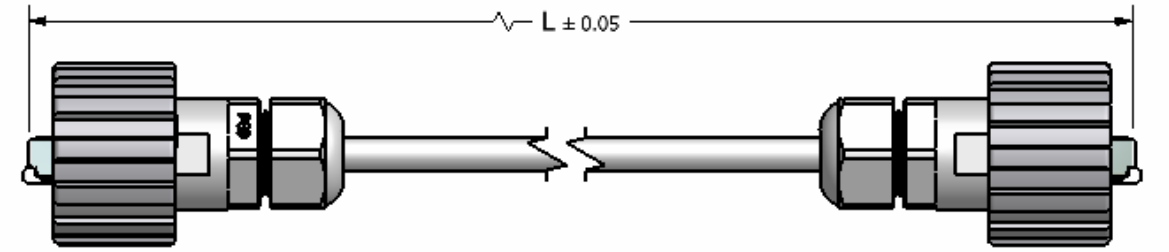
Plastic Version with Shielded Inline Coupler **+** Protective Cover	**P/N: 17-10000**
Plastic Version with Unshielded Inline Coupler **+** Protective Cover	**P/N: 17-10020**
Metallized Plastic Version with Shielded Inline Coupler **+** Protective Cover	**P/N: 17-10011**
Plastic Version with Shielded IDC Jack **+** Protective Cover	**P/N: 17-10021**
Metallized Plastic Version with Shielded IDC Jack **+** Protective Cover	**P/N: 17-10022**
Plastic Version with Shielded PCB Jack **+** Protective Cover	**P/N: 17-10023**
Metallized Plastic Version with Shielded PCB Jack **+** Protective Cover	**P/N: 17-10024**
Potted Plastic Version with Shielded IDC Jack **+** Protective Cover	**P/N: 17-10037**
Potted Metallized Plastic Version with Shielded IDC Jack **+** Protective Cover	**P/N: 17-10038**
Potted Plastic Version with Shielded PCB Jack **+** Protective Cover	**P/N: 17-10039**
Potted Metallized Plastic Version with Shielded PCB Jack **+** Protective Cover	**P/N: 17-10040**

7: Cat. 5e RJ45 Cable Strain Relief Kit (P/N: see below)



Plastic Version	**P/N: 17-100464**
Metallized Plastic Version	**P/N: 17-100474**

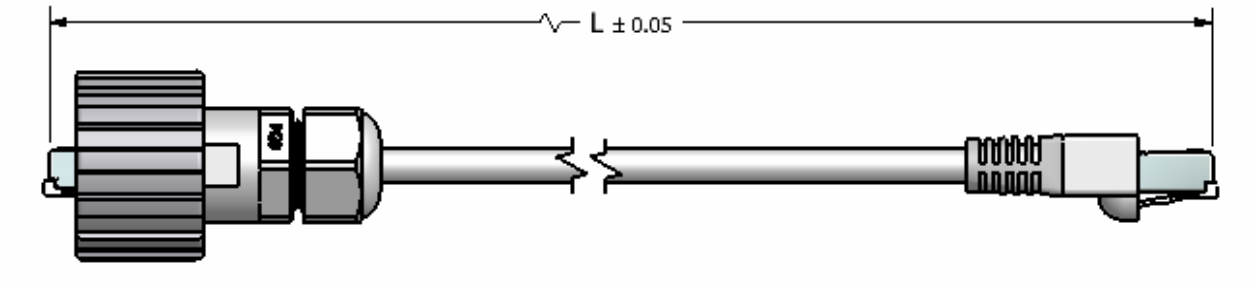
8. The Industrial to Industrial RJ45 Cat. 5e Ethernet Patch Cord (P/N: see below)



L	Part Number		
	Plastic version (Black UTP cable)	Metallized Version (Black STP cable)	Die-cast Version (Black STP cable)
2 M	**17-10003**	**17-10025**	**17-100514**
4 M	**17-10004**	**17-10026**	**17-100524**
5 M	**17-10005**	**17-10027**	**17-100534**

UTP: Unshielded Twisted Pair; STP: Shielded Twisted Pair

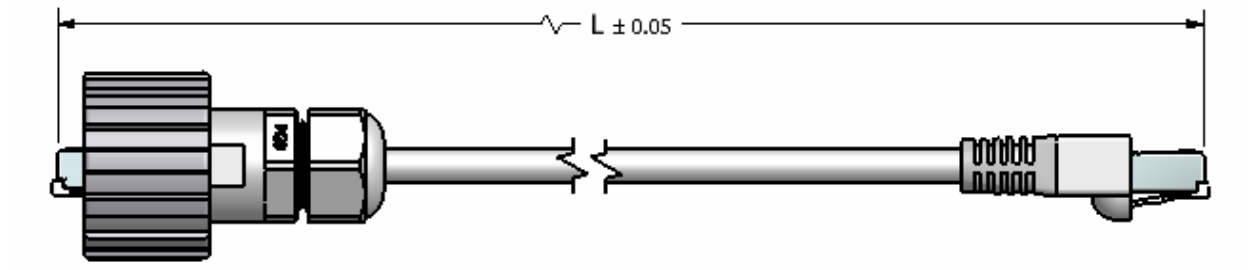
9. The Industrial to Standard RJ45 Cat. 5e Ethernet Patch Cord (P/N: see below)



L	Part Number		
	Plastic version (Black UTP Cable)	Metallized Version (Black STP cable)	Die-cast Version (Black STP cable)
2 M	**17-10006**	**17-10028**	**17-100544**
4 M	**17-10007**	**17-10029**	**17-100554**
5 M	**17-10008**	**17-10030**	**17-100564**

UTP: Unshielded Twisted Pair; STP: Shielded Twisted Pair

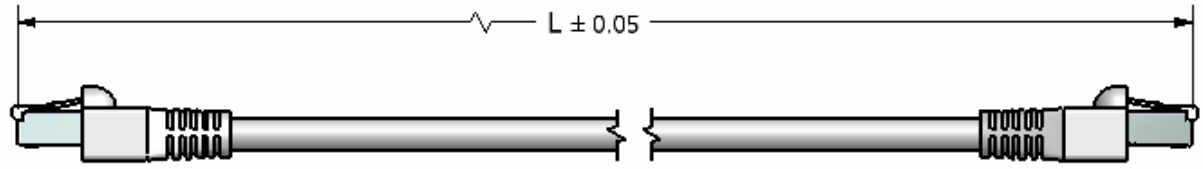
10. The Strain Relief to Standard RJ45 Cat. 5e Ethernet Patch Cord (P/N: see below)



L	Part Number	
	Plastic version (Black UTP cable)	Metallized Version (Black STP cable)
2 M	**17-100574**	**17-100604**
4 M	**17-100584**	**17-100614**
5 M	**17-100594**	**17-100624**

UTP: Unshielded Twisted Pair; STP: Shielded Twisted Pair

11. The Standard to Standard RJ45 Cat. 5e Ethernet Patch Cord (P/N: see below)

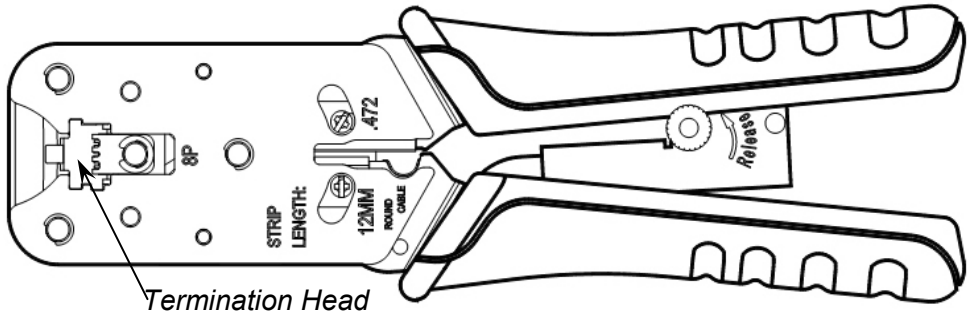


L	Part Number		
	Black UTP cable	Blue UTP cable	Red UTP cable
2 M	**17-100654**	**17-100684**	**17-100714**
4 M	**17-100664**	**17-100694**	**17-100724**
5 M	**17-100674**	**17-100704**	**17-100734**

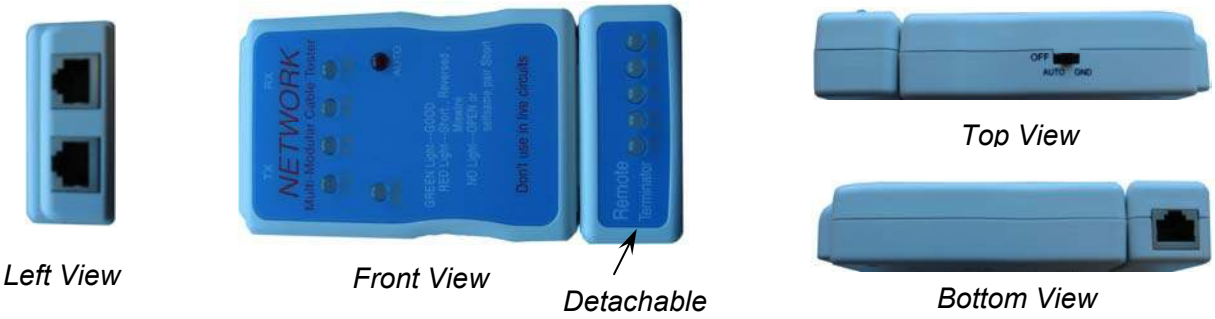
L	Part Number		
	Green UTP cable	Yellow UTP cable	White UTP cable
2 M	**17-100744**	**17-100774**	**17-100804**
4 M	**17-100754**	**17-100784**	**17-100814**
5 M	**17-100764**	**17-100794**	**17-100824**

UTP: Unshielded Twisted Pair

12. The Modular Plug Termination Tool (P/N: 360X30029X)

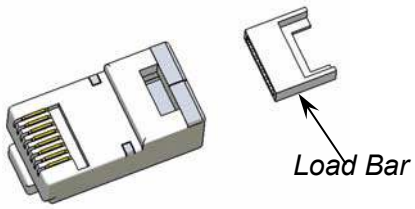


13. The *Network* Multi-Modular Cable Tester (P/N: 360X30039X)

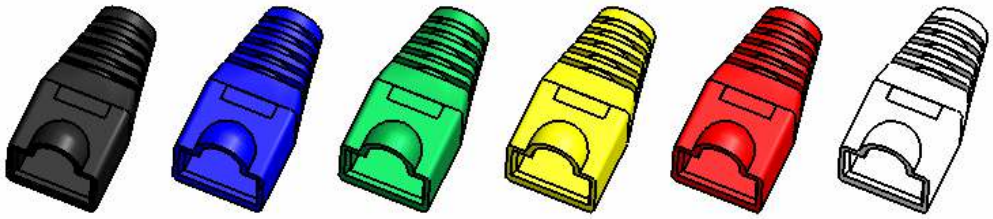


14. The110 Type Punch-Down Tool (P/N: 360X30049X)

15. The Shielded Cat. 5e RJ45 Plug (P/N: 391J00039X)



16. The RJ45 Modular Boot (P/N: see below)



Color	Black	Blue	Green
Part Number	795-601302	795-601303	795-601304

Color	Yellow	Red	White
Part Number	795-601305	795-601306	795-601307