Amphenol Alden

PL-500SM-Z SERIES
Metal Shell Auto-Coupling Connectors
14 pole capacity miniature circular connector

Compact and secure, the *Pulse-Lok®* 500SM-Z Series connectors are Amphenol Alden's ideal solution for hand-held equipment and harsh environmental situations. The *Pulse-Lok®* 500SM-Z durable metal shell will support your harshest of interconnector requirements.

Overview (intuitive, compact, configurable)
- *Pulse-Lok®* auto-latch / mating confirmation
- Miniature 0.520" diameter metal circular shell
- Up to 14 contact positions
- Multiple and proprietary keying options available
- 3 various pad print color options

Order as a full cable assembly (Consult Factory)
- Single or double ended
- Customize your cable bundle
- Overmolded strain relief
- Add components to fulfill design requirements

SPECIFICATIONS

Material
Connector Housing: Zinc Alloy, Nickel Plated
Molded Core Insulator: LCP
Contacts: Brass/Phosphor Bronze
- 30µ" Gold over 50µ" Nickel
Flammability Rating
- Molded Contact Insulator (core): UL94 V-0

Mechanical
Mating Cycles: 5,000
Mating Force:
- Mate: 5 lbs. Max
- Un-mate: 1.5 lbs. Max
- Unintended Extraction: 35 lbs. Min.
- Backshell withdrawal: 4 lbs. Min.***

Environmental
- Operating Temp: -20C to +105C**
- Moisture Resistance: to IP-67 (mated)
- Sterilizable: gamma & EtO**
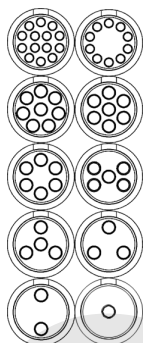- Chem. Resistance: common OR cleaning solvents

**Dependent on overmold material
***Backshell sold separately

TABLE A: STANDARD CONTACT CONFIGURATIONS & SPECIFICATIONS

Up to 14 Contact Positions

Number of Poles	Contact Size Pin Ø (mm)	Max Wire Gauge	Operating Voltage Max	Operating Current Max (A)*	Mated Contact Resistance (mΩ)
14	0.5	26	300 V RMS	2.5	<50
10	0.5	26	300 V RMS	2.5	<50
8	0.7	22	300 V RMS	3.5	<50
7	0.7	22	300 V RMS	3.5	<50
6	0.7	22	300 V RMS	3.5	<50
5	0.7	22	300 V RMS	3.5	<50
4	0.7	22	300 V RMS	3.5	<50
3	0.7	22	300 V RMS	3.5	<50
2	0.7	22	300 V RMS	3.5	<50
1	0.7	22	300 V RMS	3.5	<50
1	1.5	16	300 V RMS	5.0	<50

*30C Heat Rise Limit
Custom contact inserts are available. Consult factory.

STANDARD HOUSING OPTIONS

Cable Mount Receptacle Assembly
0.52Ø
2.05
Shown with optional backshell
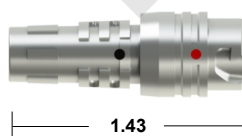
Cable Mount Receptacle Kit
1.43
Select this component from Table B
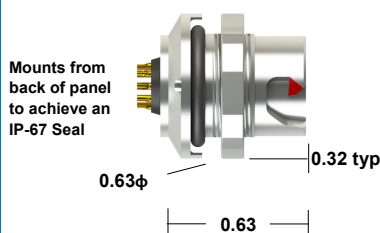
Rear Panel-Mount Receptacle Assembly
Mounts from back of panel to achieve an IP-67 Seal
0.63φ
0.32 typ
0.63
Panel thickness range = 0.063 to 0.125
Select this component from Table B

Cable Mount Plug Assembly
0.52Ø
2.05
Shown with optional backshell
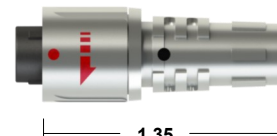
Cable Mount Plug Kit
1.35
Select this component from Table B

*All dimensions shown in inches except where indicated
Standard color is a red pad print. See our online configurator for color options at : **www.amphenolalden.com/configurator**

For additional information about this or any other Amphenol Alden product, please contact an Amphenol Alden specialist today, www.AmphenolAlden.com.

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PL-500SM-Z SERIES
Metal Shell Auto-Coupling Connectors *14 pole* *capacity miniature circular connector*

TABLE B: STANDARD PART NUMBERS

Number of Poles	Cable Mount Receptacle	Rear Panel-Mount Receptacle		Cable Mount Plug
	Solder Cup	Solder Cup	PCB	Solder Cup
14	326087	326027	326147	325027
10	326084	326024	326144	325024
8	326081	326021	326141	325021
7	326078	326018	326138	325018
6	326075	326015	326135	325015
5	326072	326012	326132	325012
4	326069	326009	326129	325009
3	326066	326006	326126	325006
2	326063	326003	326123	325003
1 (22 AWG)	326060	326000	326120	325060
1 (16 AWG)	326187	326181		325000

Note: Part numbers cover black housings in Key 1 configuration. For other color and housing options utilize the Amphenol Alden connector configurator located at **www.amphenolalden.com/configurator**

Options Include:

Indicator Color Options	Red (Std.), White, Black
Mating Key Options	2 Standard Keys, Proprietary Keys Available
Panel-Mount Thickness Options	Up to .125 Standard

Receptacles & Cable Mount Plug CONTACT TERMINATION OPTIONS

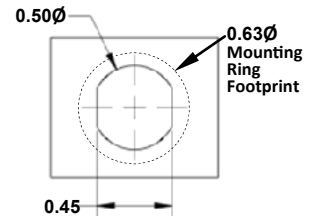### PCB (Panel-Mount Receptacles only)

Request sales drawing for PCB Mounting Templates

Solder Cup (Available for All)

Tiered solder cups provide easy access to center positions. Canted cups facilitate quick and easy wire positioning. Standard on 2-14 pole configurations
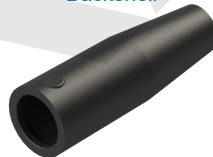
Panel-Mount, Cut-Out Template

0.50Ø
0.63Ø Mounting Ring Footprint
0.45

ACCESSORIES

Receptacle Dust Cover

P/N **107976**

Backshell

P/N **108194-02**
(For 0.20" Cable Diameter)

Plug Soaking Cap

P/N **112058-01**

Note: Black (std.) Gray (optional) & accessories sold separately

ASSEMBLY INSTRUCTIONS

Cable Mount Receptacle Instructions:

AI-PL500SMZ-IR01 (1Pole, 16AWG)

AI-PL500SMZ-IR02 (1-14 Pole, 22/26AWG)

Panel-Mount Receptacle Instructions:

AI-PL500SMZ-PMR01 (1Pole, 16AWG)

AI-PL500SMZ-PMR02 (1-14 Pole, 22/26AWG)

Cable Mount Plug Instructions:

AI-PL500SMZ-P01 (1Pole, 16AWG)

AI-PL500SMZ-P02 (1-14 Pole, 22/26AWG)

Note: recommended tooling included in assembly instructions

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For additional information about this, or any other Amphenol Alden product, please contact an Amphenol Alden specialist today, www.AmphenolAlden.com.

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