

# ATM Series™ Connectors



**ATM Series™ connectors** are a high-performance, cost-effective solution specifically designed for smaller AWG applications, while still maintaining the strengths of the [AT Series™ product line](#).

The connector design incorporates an integral latching system that ensures a definitive electrical and mechanical connection. Connector housings are manufactured with a thermoplastic material that is not only durable, but has excellent UV resistance, dielectric/mechanical properties and environmentally RoHS compliant. The sealing system is comprised of an internal and rear silicone, multi-sealing perimeter against environmental ingress. Contacts are derived from quality copper alloy to ensure an electrically-reliable connection.

ATM Series™ connectors are compatible with other existing standard products industry-wide.

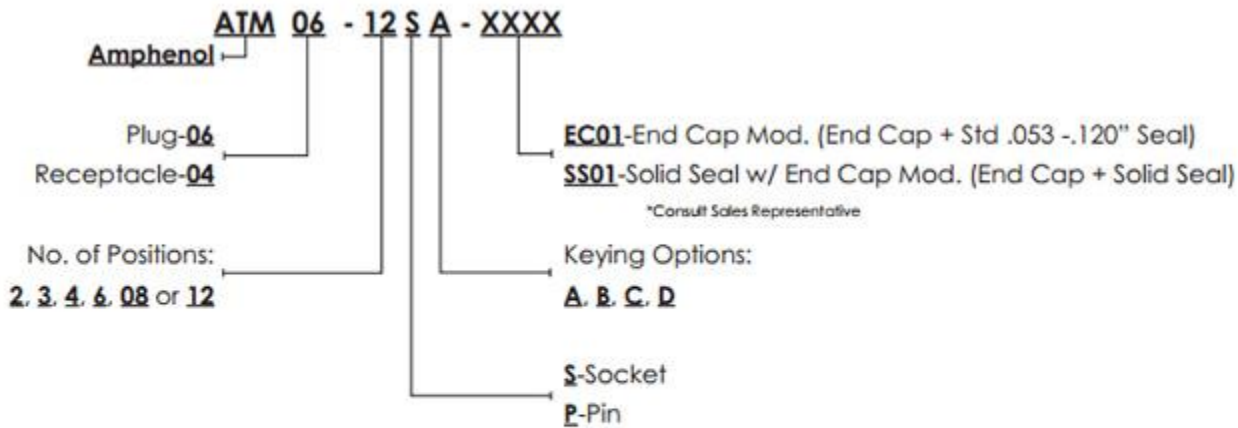
## FEATURES & BENEFITS:

- **Current Capacity:** Size 20, 7.5A (max)
- **Wire Range:** Size 20 contacts will accept wire ranges of 16 thru 22AWG
- **Temperature:** Operating temperature range: -55°C to +125°C at rated current
- **Dielectric Value:** Meets or exceeds 1500 volts minimum
- **Drop Test:** Shall not become detached or loosened when placed at 750mm and dropped to concrete eight times
- **Shock:** No latch disengagement or discontinuity shall be the result when subjected to 50 g's in each of three axis (X, Y & Z)
- **Vibration:** Continued continuity without degradation to mechanical or physical attributes following vibration. (max acceleration 20 g's at Sine sweep of 10-2000Hz)
- **Connector Terminal Retention:** When subjected to a direct pull, contacts achieve a minimum pull-out force of 89 lbs

- **Connector Retention:** A mated connector subjected to a pulling force by the exiting wire bundle at 89 lbs. times the number of contacts to a maximum of 356 lbs. applying load for 30 seconds
- **Thermal Shock:** Subjected to 10 cycles at -55°C to +125°C with no cracking, chipping or other damage detrimental to the normal operation of the connector
- **Insulation Resistance:** Insulation resistance at 25°C shall be greater than 20 megohms when 1000 VDC are applied
- **Mating Cycle Durability:** Following 100 cycles of connection engagement and disengagement, degradation either mechanical or electrical is not evident
- **Contact Millivolt Drop:** Size 20 (stamped & formed) contacts with 20AWG conductor - 60 (solid contact) millivolt drop max; 100 (stamped & formed contact) millivolt drop max at 7.5A test current
- **Water Immersion:** A mated connection, properly wired, placed in an oven at +125°C for 1 hour, then placed immediately in a depth of water of 1 meter for 4 hours without loss of electronic performance


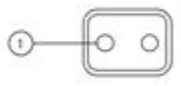

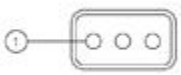

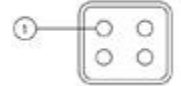

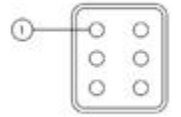

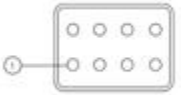


## PRODUCT MATERIAL:

- **Housings:** Thermoplastic
- **Seals:** Silicone Elastomer
- **Secondary Locks:** Thermoplastic
- **Contacts:** Copper Alloy, Nickel Plated, Gold optional
- **ATM SERIES™ PART NUMBERING SEQUENCE:**




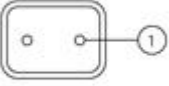


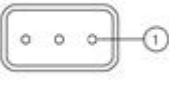


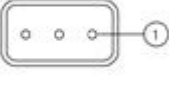


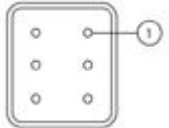


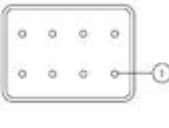


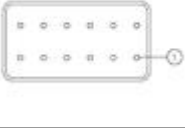

**NOTE:** The above modifications (-XXXX) are only a sampling of the options available to our customers. For more information, please contact your Sales Representative.

## Plugs & Wedgelocks - 2, 3, 4, 6, 8 and 12 positions

Plug	Face View	Part Number
		ATM06-2S
		ATM06-3S
		ATM06-4S
		ATM06-6S
		ATM06-08SA
		ATM06-12SA

Wedgelock	Part Number
	AWM-2S
	AWM-3S
	AWM-4S
	AWM-6S
	AWM-8S
	AWM-12S

## Receptacles & Wedgelocks - 2, 3, 4, 6, 8 and 12 positions

Plug	Face View	Part Number	Wedgelock	Part Number
		ATM04-2P		AWM-2P
		ATM04-3P		AWM-3P
		ATM04-4P		AWM-4P
		ATM04-6P		AWM-6P
		ATM04-08PA		AWM-8P
		ATM04-12PA		AWM-12P
<p><b>NOTE:</b> B, C, and D keying positions are available for all 8 and 12 positions receptacles. For more information, please contact your Sales Representative.</p>			<p><b>NOTE:</b> Wedgelocks are required for all receptacles.</p>	