

# TI2005-241

## Cobra™ DC Aviation Plug with On/Off Switch

The Tesla™ Cobra DC Aviation Plug is constructed from a rugged combination of advanced composite materials and corrosion-resistant alloys. Identical to the TI2005-238, this Cobra™ DC Aviation Plug has an On/Off switch added for easy access to turn on and off power. This gives you extra control when directing power to the connected aircraft.



Power Anytime, Anywhere

### Features:

- Rated to 3000 peak amps
- Clamped cable connections
- UV, fuel, fungus, and oil resistant
- Easy component replacement
- Manufactured in-house
- Exceeds MIL-STD-810
- Tested to withstand 50 G of force



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# Features and Benefits

## Weatherproof Construction

Through a series of strategically placed seals and bushings, the Cobra™ DC Aviation Plug is hermetically sealed to lock out rain, snow, sand and other harmful debris.



## Internal Cable Connections

Unlike plugs with cables that are molded directly to the housing, easily accessible lugs allow for direct termination inside of the plug. Additionally, compression grommets and bushings provide strain relief. This unique combination of protection eliminates dangerous shocks from exposed wiring due to cable stretching and splicing.

## Rugged, Durable, Reliable

Made from virtually indestructible composite materials, the plug housing won't crack, melt, blister, dry-rot or disintegrate. This, in conjunction with corrosion resistant conductors, insures that the Cobra™ DC Aviation Plug will still be in the field long after other plugs have failed.

## Replaceable Contacts

*Manufactured from highly conductive alloys, the negative contact is specially tapered and has memory to maximize contact surface area and to minimize deformity over time. Once installed, contacts are hermetically sealed within the plug.*

## Insertion/Extraction Tools

Contacts and replaceable nose can be easily replaced “in-the-field” without discarding the entire plug using the Insertion/Extraction Tools. The tools and contact replacements can be ordered through Tesla™ Customer Service at (302) 324-8910.



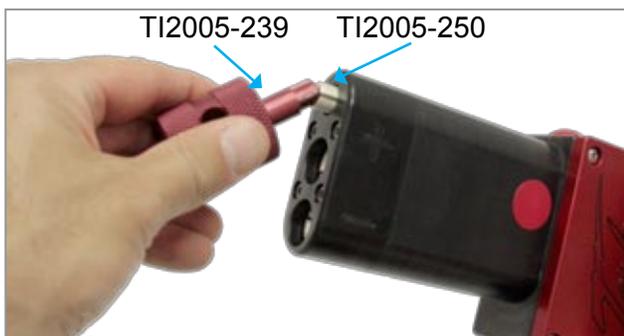
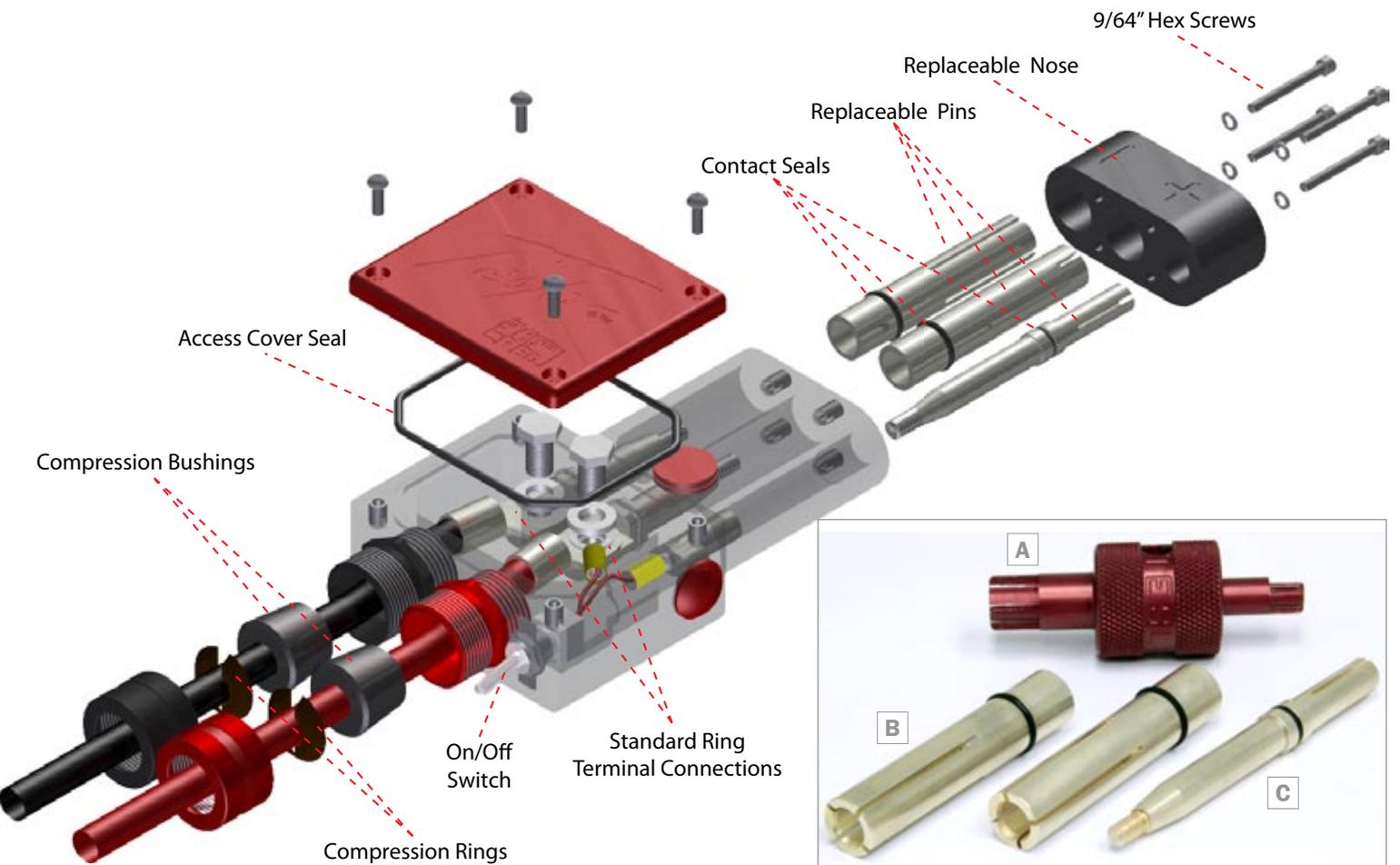
Replaceable Nose: TI2004-341



## REPLACING NOSE:

1. Remove screws using 9/64" hex key turning counterclockwise.
2. Put aside the screws and lock washers.
3. Line up and insert new Replaceable Nose ([TI2004-341](#)). Make sure the flat side is against the plug, curved side facing out.
4. Screw in the four screws clockwise.

# Components - Exploded View



## REPLACING CONTROL PIN:

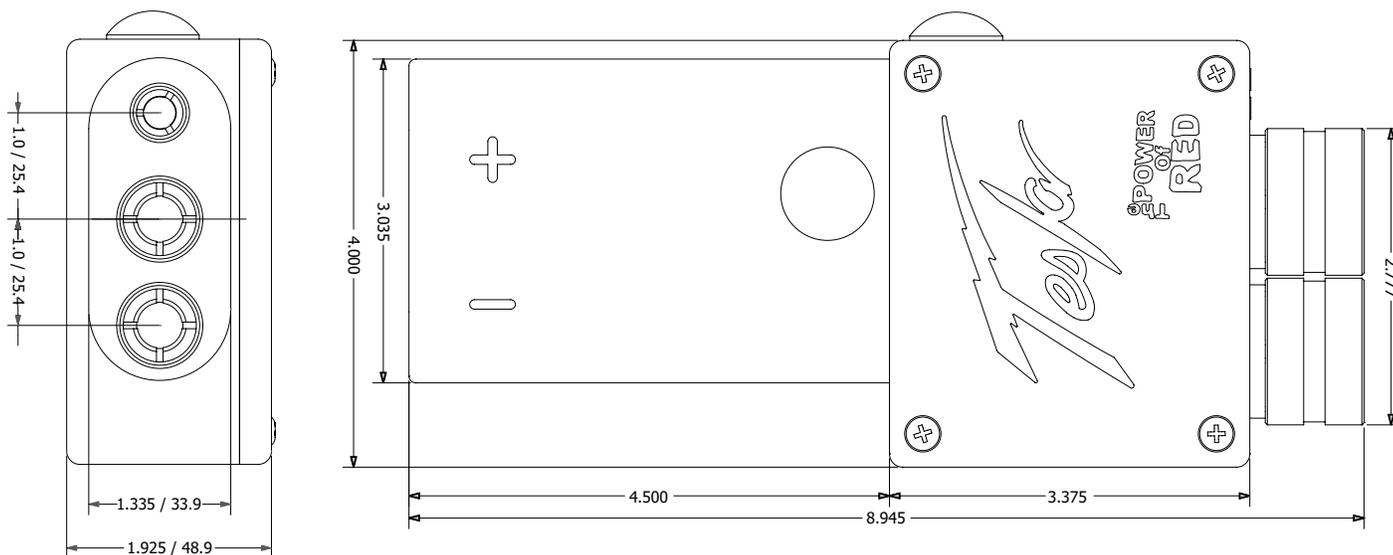
1. Use Insertion/Extraction Tool (TI2005-239) using the smaller end to remove the pin by inserting and turning counterclockwise.
2. Apply the Silicone Compound (TI6000-367) to the male threads of the replacement pin.
3. Install new pin (TI2005-250) using same tool and screw in the clockwise.



## REPLACING POWER PIN:

1. Use Insertion/Extraction Tool (TI2005-239) using the larger end to remove the pin by inserting and turning counterclockwise.
2. Apply the Silicone Compound (TI6000-367) to the male threads of the replacement pin.
3. Install new pin (TI2005-251) using same tool and screw in the clockwise.

# Dimensions and Technical Specifications



\* All dimensions are in inches [millimeters]

## Technical Specifications:

Number of Contacts	3
Terminal Lugs	3/8-24 (power pins)
Peak Current	3000 A (power pins)
Storage Temperature	-65°C - 125°C (-85°F - 257°F)
Operating Temperature	-40°C - 110°C (-40°F - 230°F)
Air Gap-leakage Path	0.630" (16 mm)
Protection Class	IP28C (tested to 20 m)
Rated Current	1500 A
Rated Voltage	18 - 32 VDC
Inrush Current (@ 28 VDC)	3000 A
Dielectric Strength	> 6000 VDC for 1 min. across contacts
Insulation Resistance	4 GΩ w/1 kV across contacts
Contact Resistance	< 60 μΩ @ 25°C
Shock	50 G
Vibration	MIL-STD-810
Engagement Torque	25 lbs (11.33 kg)
Weight	2.72 lbs (1.24 kg)
Warranty	2 years (3 years optional)

\*Acceptance of these gauges is dependant on insulation and stranding

