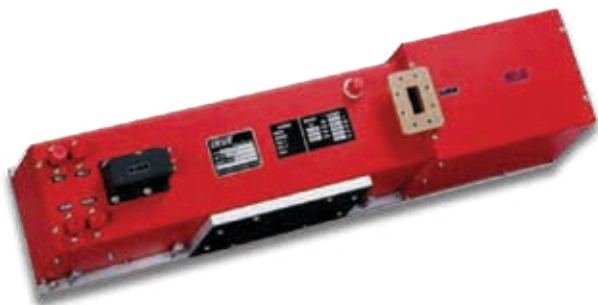


## Communications & Power Industries Helix Traveling Wave Tube



Custom configurations are also available. These variations in the performance and configuration include:

- mechanical configurations
- electrical and RF connections
- dual-stage depressed collector

|            | Frequency (GHz) | Power output (min) |
|------------|-----------------|--------------------|
| VTC-6369D3 | 5.85 - 6.65     | 2.25 kW            |
| VTC-6369D4 | 5.85 - 6.65     | 2.25 kW            |
| VTC-6369D5 | 5.850 - 6.725   | 2.25 kW            |

### FEATURES:

- 2.25 kW CW
- 5.850 - 6.725 GHz
- PPM focusing
- Coaxial input
- Waveguide output
- Any mounting position
- Weight: 25 lbs. max
- Forced-air cooled

### BENEFITS:

- High efficiency
  - Less prime power required (due to multiple stage collectors)
- PPM focusing

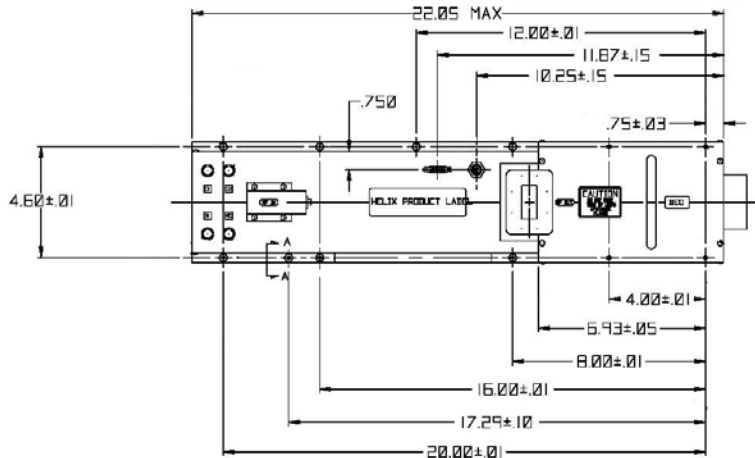
### APPLICATIONS:

- Satellite uplinks
- Communications
- Instrumentation
- DBS (Direct Broadcast System)

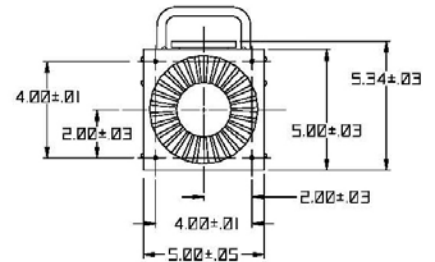
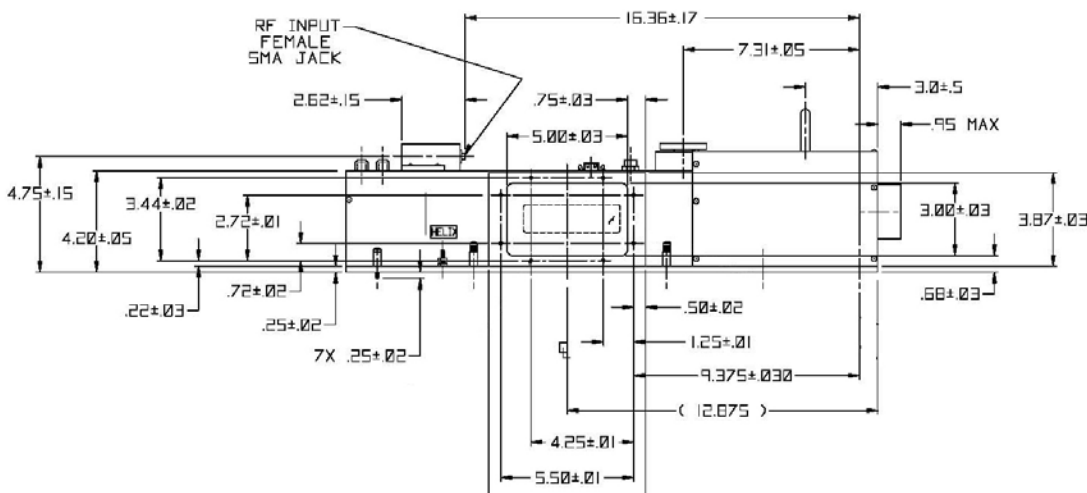
### Typical Operating Parameters

|                      | Minimum   | Maximum   | Typical | Units   |
|----------------------|-----------|-----------|---------|---------|
| Heater voltage       | 6.0       | 6.6       | ---     | Vdc     |
| Heater surge current | ---       | 5.0       | ---     | A       |
| Helix voltage        | 14.4      | 15.5      | ---     | kVdc    |
| Helix current        | ---       | 25.0      | ---     | mAdc    |
| Collector voltage 1  | 63% of Ew | 67% of Ew | ---     | kVdc    |
| Collector current 1  | ---       | 990       | ---     | mAdc    |
| Collector voltage 2  | 33% of Ew | 37% of Ew | ---     | kVdc    |
| Collector current 2  | ---       | 650       | ---     | mAdc    |
| Cathode warm-up time | 3.0       | ---       | ---     | minutes |
| Collector temp       | ---       | 150       | ---     | °C      |
| Prime power          | ---       | 6750      | ---     | W       |
| Load VSWR            | ---       | 1.3:1     | ---     | VSWR    |
| Air flow             | ---       | 828       | ---     | lb/hr   |

# CPI CW Helix Traveling Wave Tube: VTC-6369D3, D4, D5



Outline:  
VTC-6369D3, D4, D5



With a history of producing high quality products, we can help you with your Helix TWT.  
**Contact us at [MPPMarketing@cpii.com](mailto:MPPMarketing@cpii.com) or call us at +1 650-846-2800.**

The data should be used for basic information only. Formal, controlled specifications may be obtained from CPI for use in equipment design.



**Microwave Power  
Products Division**  
811 Hansen Way  
Palo Alto, California  
USA 94304

tel +1 650-846-2800  
email [MPPMarketing@cpii.com](mailto:MPPMarketing@cpii.com)  
web [www.cpii.com/MPP](http://www.cpii.com/MPP)

For more detailed information, please refer to the corresponding CPI technical description if one has been published, or contact CPI. Specifications may change without notice as a result of additional data or product refinement. Please contact CPI before using this information for system design.

©2020 Communications & Power Industries LLC. Company proprietary; use and reproduction is strictly prohibited without written authorization from CPI.