

## **TACHOMETER TESTER**

## **Model 1921**

The Model 1921 Tachometer Tester is used for the testing and calibration of electrical and mechanical tachometer generators and indicators, specifically handheld models. Two variable speed brushless motors eliminate the need for gears while providing for a testing range of 10 to 50,000 RPM. Each motor/shaft is controlled by closed loop system utilizing hall/encoder feedback and a digital motion control card. The result is a very reliable system with a speed accuracy of 0.005%.

The control panel consists of a LCD backlit display with keypad entry, illuminated power switch, emergency stop button and a shaft rotating indicator.



- 10-50,000 RPM Actual Drive Speed
- High accuracy
- 0.01 Display Resolution
- Direct Drive
- Bi-directional
- Keypad entry with LCD display
- Optional Calibration Kit Available

## **SPECIFICATIONS**

| Model 1921              |  |  |
|-------------------------|--|--|
| Drive Type:             | Direct Drive Brushless Servo                         |  |
| Number of Drives:       | 2  |  |
| Drive Outlet:           | Ø0.25 inch.  |  |
|                         | Total Range: 10-50,000 RPM Bi-directional            |  |
| Shaft Speed Range:      | Shaft A range: 10-5,000                              |  |
|                         | Shaft B range: 5,000.01-50,000                       |  |
| Dimensions:             | 15.7W x 14.7D x 7 H in.                              |  |
| Approximate Weight:     | 35 lbs. (16Kg)                                       |  |
| Digital Display:        | RS-232   |  |
| Accuracy                | 0.1% (10-199.99 RPM) 0.005% (200-50,000 RPM)         |  |
| Units                   | RPM, Inches/Min, Feet/Min, Yards/Min, Meters/Min     |  |
| Resolution              | 0.01 for all displayed units                         |  |
| Shaft Speed Stability   | 0.1% (10-199.99 RPM) 0.005% (200-50,000 RPM)         |  |
| Power Requirements:     | 115VAC, 50-60 Hz, 6.25A; 230VAC Optional             |  |
| Operating Environment:  |  |  |
| Temperature             | 67° to 79°F (19° to 26°C)                            |  |
| Relative Humidity       | 20% to 50%   |  |
| Storage Environment:    |  |  |
| Temperature             | -40° to 160°F (-40° to 71°C)                         |  |
| Relative Humidity       | 0% to 100% non-condensing                            |  |
| Shipping Environment:   |  |  |
| Temperature             | -40° to 160°F (-40°to 71°C)                          |  |
| Relative Humidity       | 0% to 100% non-condensing                            |  |
| Altitude Maximum        | 15,000 ft (4,572 m)                                  |  |
| Protective Shield       | Polycarbonate shield mounted above motor shafts      |  |
| Front Panel Controls    | Illuminated Power Switch, Keypad/Display, Emergency  |  |
|                         | Stop, and Shaft Rotating Indicator                   |  |
| Adapter Wheels          | 60° Cone Wheel, 90° Cone Wheel, 60° Countersunk, 90° |  |
|                         | Countersunk, Linear Speed, Photoelectric             |  |
| Recommended Calibration | 1 Year   |  |
| Interval                |  |  |

## **Buyers Guide**

| Model Number    | Part Number | Description                    |
|-----------------|-------------|--------------------------------|
| Model 1921      | 230440-2    | 115Vac, 50/60 Hz               |
| Model 1921      | 230440-3    | 230Vac, 50/60 Hz               |
| Model 1921      | 230440-909  | Calibration Kit for Model 1921 |
| Calibration Kit |             |                                |

For special requirements or custom specifications, contact Ideal Aerosmith, Inc. Prices and specifications are subject to change without notice Please state your Power Requirement when ordering Price is in U.S. Dollars Rev E3