RDVLF-50 Very Low Frequency HV Test Set

Nowdays mechanical methods are adopted at home and abroad for modulation and demodulation to generate ultra-low frequency signals. Therefore, the sine wave waveform is not standard, the measurement error is large the high-voltage part has spark discharge, and the equipment is bulky. Moreover, the second and fourth





quadrants of sine wave also need high-power high-voltage resistors for discharge shaping, so the overall power consumption of the equipment is large.

This product overcomes these shortcomings, combines the advanced technology of modern digital frequency conversion and adopts microcomputer control to realize the complete automation of step-up, step-down, measurement and protection.

Because it is fully electronic, it has small volume, light weight, large screen liquid crystal display, clear and intuitive, and can display the output waveform and print the test report.

Product features

- 1. Data of current, voltage, wave form can be directly sampled at high voltage side, so the data is real and accurate.
- 2. Over-voltage protection: If the output exceeds the set limit of voltage, the instrument will shut-down to protect itself, the actuation time is less than 20ms.
- 3. Over-current protection: it is high-low voltage dual protection in the design, the accurate shut-down protection can be made according to the set value at high voltage side; If the current on low voltage side exceeds the rated current, the instrument will take shut-down protection, the actuation time are both less than 20ms.
- 4. High-pressure output resistance design in the booster, so don't need another outside protective resistance.

5. The adoption of high and low pressure closed loop feedback control circuit, so the output is no let up effect.

Product specifications and technical parameters

- 1. Output voltage ratings: 50 kV
- 2. Output frequency: 0.1Hz, 0.05Hz, 0.02Hz
- 3. Load capacity: 0.1Hz maximum 1.1µF

0.05Hz maximum 2.2μF

0.02Hz maximum 5.5μF

- 4. Measurement accuracy: 3%
- 5. Positive and negative voltage peak errors: $\leq 3\%$
- 6. Voltage wave form distortion: $\leq 5\%$
- 7. Use condition: temperature: $-10^{\circ}\text{C} \sim +40^{\circ}\text{C}$; Humidity: $\leq 85\% \text{RH}$
- 8. Power supply fuse tube: 10A
- 9. Power: AC 50Hz, $220V \pm 5\%$