

HTXL-Y Transmission Line Different Frequency Parameters Test System



I. Introduction

HTXL-Y integrated different frequency test power, measuring instruments, the mathematical model in one, eliminating strong interference effects and ensure the safety of equipment, extremely easy, quickly and accurately measure the frequency parameters of power transmission line.

II. Features

1. Fast and accurate measure the positive sequence capacitance, positive sequence impedance, zero sequence capacitance, zero sequence impedance. Can also measure the mutual inductance and coupling capacitors between the lines (line DC resistance used dedicated YTLRT to test)
2. Strong anti-interference ability, accurate measurement under the condition of different frequency and frequency interference signal in ratio of 1:10.
3. External wiring is simple, only one access to the lead line of the tested line can complete all the line parameters measurement
4. Instrument takes DSP digital signal processor as the core, integrated the test power, meter, calculation model integration into one instrument. Big screen, rotation mouse operation mode, micro printer printing results, the operation is very convenient
5. Test process is quick, automatically test mode control, voltage step-up & step-down control and data measurement and calculation, and print the measuring results, a sequence parameter measurement completes in one and a half minutes, test time is reduced, can greatly reduce the workload, 5 minutes can complete the work that traditional method used two hours .
6. High precision measurement, instrument itself provide different frequency AC power supply (52.5Hz 47.5Hz) which close to power frequency, easy separation power and other interference and effectively realize high precision measurement of small signal.
7. To solve the test wiring switching are tedious, anti-jamming, stability, accuracy and other problems of the existing test methods.
8. Can save 2048 sets of test data, and do data management and report generation through the USB interface to the host computer.

III. Parameters

Power supply	3 phase, AC380V±10%, 10A, 50Hz (effective value)	
Characteristics of the different frequency power supply inside the instrument	Max output voltage	3 phase, 0~200V(effective value < ±1%)
	Max output current	6.5A
	Output frequency	47.5Hz, 52.5Hz
Measurement range	Capacitance	0.1~30μF
	Impedance	0.1~400Ω
	Impedance angle	0 ~360°
	Length of line: 0.3km-400km	
Measurement resolution	Capacitance	0.01μF
	Impedance	0.01Ω
	Impedance angle	0.01°
Measurement accuracy	Capacitance	≥1μF, ±1%RD±0.01μF
		<1μF时, ±3%RD±0.01μF
	Impedance	≥1Ω时, ±1%RD±0.01Ω
		<1Ω时, ±3%RD±0.01Ω
Impedance angle	Test condition: current > 0.1A ±0.3°(voltage > 1.0V), ±0.5°(voltage: 0.2V ~ 1.0V)	
Anti interference: Z0: Total zero sequence impedance of a line 1 phase		
No interference suppression devices, test equipment itself has the ability to resist interference, anti interference index	Electromagnetic induction voltage: <500V	
	Interference current: <5+(120/Z0); unit: A	
	Electrostatic induction voltage: <30kV	
With interference suppression devices, total test equipment resist interference ability, anti interference index	Electromagnetic induction voltage: <3000V	
	Interference current: resistors in series <4+(900/Z0); unit: A resistors in parallel <6.5+(487.5/Z0); unit: A	
	Electrostatic induction voltage: <30kV	
Protection function	Over-current, over-voltage, grounding protection.	
THD	Sine wave, <2%.	
Service condition	Temperate: -15°C~40°C; humidity ≤90%	
Dimension	595*500*530mm	
Weight	75KG	