UT513B/UT513C

5kV Insulation Resistance Testers

UT513B/UT513C are digital high-voltage insulation resistance testers with high-voltage output ranges of 250V, 500V, 1000V, 2500V, and 5000V. They are commonly used and essential instruments for power, telecommunications, meteorology, computer rooms, oil fields, electromechanical installation and maintenance, and power supply departments of industrial and mining enterprises.

Main features:

- Output voltage: Up to 5kV
- PI & DAR measurement
- Automatic leakage current display
- Stepping voltage: 10% of the range
- Comparison function
- Timer measurement
- Data storage: 999 sets
- PC software analysis: via USB cable
- Automatic discharge
- High voltage output alarm function
- Rechargeable lithium battery 14.8V, 5200mAh
- Overvoltage category: CAT IV 600V



UT513B



UT513C



Output voltage (up to 5KV)

Bluetooth APP (UT513C)

Comparison function

Lithium battery (5200mAh)

Anti-Misplug

Technical Specifications

Rated voltage	UT513B	UT513C
250V	<0.25MΩ: reference only	<0.25MΩ: reference only
	0.25MΩ~2.49GΩ: ±(5%+5)	0.25MΩ~4.99GΩ: ±(5%+5)
	2.50GΩ~24.9GΩ: ±(10%+10)	5.00GΩ~49.9GΩ: ±(10%+10)
	25.0GΩ~100GΩ: reference only	50.0GΩ~250GΩ: reference only
500V	<0.50MΩ: reference only	<0.50MΩ: reference only
	0.50MΩ~4.99GΩ: ±(5%+5)	0.50MΩ~4.99GΩ: ±(5%+5)
	5.00GΩ~49.9GΩ: ±(10%+10)	5.00GΩ~99.9GΩ: ±(10%+10)
	50.0GΩ~200GΩ: reference only	100GΩ~500GΩ: reference only
1000V	<1.00MΩ: reference only	<1.00MΩ: reference only
	1.00MΩ~9.99GΩ: ±(5%+5)	1.00MΩ~9.99GΩ: ±(5%+5)
	10.0GΩ~99.9GΩ: ±(10%+10)	10.0GΩ~199GΩ: ±(10%+10)
	100GΩ~400GΩ: reference only	200GΩ~1.00TΩ: reference only
2500V	<2.50MΩ: reference only	<2.50MΩ: reference only
	2.50MΩ~24.9GΩ: ±(5%+5)	2.50MΩ~24.9GΩ: ±(5%+5)
	25.0GΩ~249GΩ: ±(15%+10)	25.0GΩ~499GΩ: ±(15%+10)
	250GΩ~1.00TΩ: reference only	500GΩ~2.50TΩ: reference only
5000V	<5.00MΩ: reference only	<5.00MΩ: reference only
	5.00MΩ~49.9GΩ: ±(5%+5)	5.00MΩ~49.9GΩ: ±(5%+5)
	50.0GΩ~499GΩ: ±(15%+20)	50.0GΩ~999GΩ: ±(15%+20)
	500GΩ~2.00TΩ: reference only	1.00TΩ~5.00TΩ: reference only
Capacitance test	NA	0.01uF~15.0uF
Output voltage	stepping voltage range	Step by 10% of each range each time, and adjust the voltage range to 50%~120% of each range UT513B + UT513C: Display accuracy: ±(10% read+10V) Output accuracy: +(0%~20%)
250V	250V, 275V, 300V	
500V	250V, 300V, 350V, 400V, 450V, 500V, 550V, 600V	
1000V	500V, 600V, 700V, 800V, 900V, 1000V, 1100V, 1200V	
2500V	1250V, 1500V, 1750V, 2000V, 2250V, 2500V, 2750V, 3000V	
5000V	2500V, 3000V, 3500V, 4000V, 4500V, 5000V	
DC voltage	30~1000VDC: ±(3%+5)	
AC voltage	30~750VAC(50Hz/60Hz): ±(3%+5)	
Current	0.01nA~3.5mA	0.01nA~5.0mA
Short-circuit current	about 3.5mA	about 5.0mA
Main features		
PI test	√	
DAR test	√	
Timing measurement	√	
Resistance Comparison	√	
Voltage step	√	
Monitoring function	Monitor the voltage of measured object and the discharge state after testing. If voltage is higher than 36V, it is forbidden to test for protecting the tester and the operator	
Timer testing	Record testing time automatically. Timing range: 0s~99m and 59s	
Data storage	999 set	
USB interface (data transmission)	√	
Bluetooth APP	N/A	
Low Battery indication	√	
Auto power off	Around 15 minutes	
Overvoltage category	CAT IV 600V	
General Characteristics		
Power supply	14.8V, 5200mAh lithium battery	
Product color	Black+Red	
Product weight	About 1800g (including battery)	
Product dimension	238 x 166 x 90.5mm (L x W x D)	
Package quantity	1pcs	
Package size	415 x 155 x 370mm (L x W x D)	
Accessories	User manual 1pcs; Test lead (red, black, green, 1 for each) 3pcs; USB cable 1pcs; Lithium battery charger 1pcs; Lithium battery pack 1pcs; Adapting charging stand(optional); Carrying strap 1pcs;	