

APPA 60 & 90 SERIES MULTIMETER

FEATURES:	APPA 63N	APPA 67	APPA 69	APPA 91	APPA 93N	APPA 97/97R
Digital display	3200 count	3200 count	3200 count	2000 count	2000 count	3200 count
Analog bar graph	65 segments	65 segments	65 segments			65 segments
Range selection	Auto/Manual	Auto/Manual	Auto/Manual	Manual	Manual	Auto/Manual
Frequency counter						
Capacitance measurement						
Audible continuity and Diode test	•	•	•	•	•	•
Data hold	•	•	•	•	•	•
Delay hold						
True RMS measuring						APPA 97R
Beep guard						
Automatic power shut off	•	•	•	•	•	•
Shock proof from 4 feet drops	•	•	•	5 feet	5 feet	5 feet
Standard full-sleeve safety test leads	•	•	•	•	•	•
Protective holster	•	•	•	•	•	•
Water resistant and dust proof case						

SPECIFICATIONS: (All at 23°C ± 5°C, 80% R.H.)

DCV:	Ranges	300.0mV-600V	300.0mV-600V	300.0mV-600V	200.0mV-1000V	200.0mV-600V	300.0mV-1000V
Resolution		0.1mV	0.1mV	0.1mV	0.1mV	0.1mV	0.1mV
Accuracy		±(0.5%+2d)	±(0.7%+2d)	±(0.5%+2d)	±(0.5%+1d)	±(0.5%+1d)	±(0.5%+2d)/ 97R ±(0.3%+2d)
Input Impedance:10M		•	•	•	•	•	•
Overload Protection: 600V DC or AC rms		•	•	•	1200V DC or 850V AC	•	1000V rms
ACV:	Ranges	3.000V-600V	3.000V-600V	3.000V-600V	200.0mV-750V	200.0mV-600V	3.000V-750V
Resolution		1mV	1mV	1mV	0.1mV	0.1mV	1mV
Accuracy: ±(1.5%+5d) at 40Hz-500Hz		•	±(1.7%+5d)	•	•	•	•
at 40Hz-500Hz		•	•	•	±(1.25%+4d)	±(1.3%+4d)	±(1.3%+5d)/ 97R ±(1.3%+3d)
Input Impedance:10M //<100pF		•	•	•	•	•	•
Overload Protection: 600V DC or AC rms		•	•	•	1200V DC or 850V AC	•	•
1000V DC or AC peak		•	•	•	•	•	•
Conversion Type: Average sensing RMS indicating		•	•	•	•	•	•
DCA:	Ranges: ( 20A for 30 seconds )	300.0µA	300.0µA-20.00A	300.0µA-20.00A	200.0µA-20.00A	200.0µA-20.00A	300.0µA-20.00A
Resolution		0.1µA	0.1µA	0.1µA	0.1µA	0.1µA	0.1µA
Accuracy: ±(1.2%+2d) basic, ±(2.5%+5d) at >300mA		±(1.0%+2d)	•	•	•	•	•
±( 0.9%+2d) basic, ±(2.5%+5d) at >300mA		•	•	•	•	•	•
±(2%+3d) at >2A		•	•	•	±(1%+1d) basic	±(1%+1d) basic	±(1%+2d) basic
Input Protection: 1A, 240V fuse for µA/mA input		•	•	•	•	•	•
13A, 240V fuse for A/10A input		•	•	•	•	•	•
600V rms		•	•	•	•	•	•
1A/500V and 16A/500V fast blow fuses		•	•	•	•	•	•
ACA:	Ranges: ( 20A for 30 seconds )	300.0µA-20.00A	300.0µA-20.00A	300.0µA-20.00A	200.0µA-20.00A	200.0µA-20.00A	300.0µA-20.00A
Resolution		0.1µA	0.1µA	0.1µA	0.1µA	0.1µA	0.1µA
Accuracy: ±(1.7%+4d) basic, ±(2.9%+7d) >300mA		•	•	•	•	•	•
±(1.5%+4d) basic, ±(2.9%+5d) >300mA		•	•	•	•	•	•
±(1.5%+3d) basic		•	•	•	±(2.5%+3d) at >2A	±(2.5%+3d) at >2A	±(2.5%+5d) at >2A
all at 40Hz ~ 500Hz		•	•	•	•	•	•
Input Protection: Same as DCA		•	•	•	•	•	•
OHM:	Ranges	300.0 -30.00M	300.0 -30.00M	300.0 -30.00M	200.0 -20.00M	200.0 -20.00M	300.0 -30.00M
Resolution		0.1	0.1	0.1	0.1	0.1	0.1
Accuracy: 300 / 200		±(1.0%+4d)	±(1.2%+4d)	±(1.0%+4d)	±(0.75%+4d)	±(0.8%+4d)	±(1.0%+4d)/ 97R ±(0.7%+4d)
3K / 2K		±(0.8%+2d)	±(0.9%+2d)	±(0.8%+2d)	±(0.75%+1d)	±(0.8%+1d)	±(0.8%+2d)/ 97R ±(0.5%+2d)
30K / 20K		±(0.8%+2d)	±(0.9%+2d)	±(0.8%+2d)	±(0.75%+1d)	±(0.8%+1d)	±(0.8%+2d)/ 97R ±(0.5%+2d)
300K / 200K		±(0.8%+2d)	±(0.9%+2d)	±(0.8%+2d)	±(0.75%+1d)	±(0.8%+1d)	±(0.8%+2d)/ 97R ±(0.5%+2d)
3M / 2M		±(0.8%+2d)	±(1.2%+3d)	±(1.0%+3d)	±(0.75%+1d)	±(0.8%+1d)	±(1.2%+3d)/ 97R ±(1.0%+3d)
30M / 20M		±(2.0%+5d)	±(2.5%+5d)	±(2.0%+5d)	±(1.5%+5d)	±(1.5%+5d)	±(2.5%+5d)/ 97R ±(2.0%+5d)
Overload Protection		600V rms	600V rms	600V rms	500V rms	600V rms	600V rms
Continuity Beeper: <50 , 2KHz tone buzzer		•	•	•	•	•	•
Diode Test: Open circuit voltage: 3.3V max		•	•	•	•	•	•
Frequency Counter: Ranges					2KHz-200KHz		
Resolution					1Hz		
Accuracy: ±(1%+3d) at 5V rms max					•		
Overload Protection					600Vrms		
Capacitance:	Ranges			3.000µF-3000µF	2.000nF-200.0µF		
Resolution				1nF	1pF		
Accuracy: ±(1.9%+5d) basic				•	2%+4d		

GENERAL:	APPA 63N	APPA 67	APPA 69	APPA 91	APPA 93N	APPA 97/97R
Sampling Rate: 2times/sec for digital display, 12times/sec for analog bar graph	2times/sec	2times/sec	2times/sec	2.5times/sec	2.5times/sec	•
Overload Indication	"1" or "-1"	"1" or "-1"	"1" or "-1"	"1" or "-1"	"1" or "-1"	"OL" or "-OL"
Low Battery Indication	⊕	⊕	⊕	⊕	⊕	⊕
Auto Power Off: Approx. 30 minutes	•	•	•	•	•	•
Operating Temperature: 0°C-50°C, 80% RH	•	•	•	•	•	•
Storage Temperature: -20°C ~ 60°C	•	•	•	•	•	•
Temperature Coefficient: 0.15(Spec. Acc)/°C, <18°C or >28°C	•	•	•	•	•	•
Safety: IEC 61010 and designed to meet UL3111 specifications	CAT. III 600V	CAT. II 600V	CAT. II 600V	CAT. III 600V	CAT. II 600V	CAT. III 600V
Power Requirement: Single 9V battery (NEDA 1604 or IEC 6F22)	•	•	•	•	•	•
IEC LR03, AM4 or AAA size 1.5V x 2	•	•	•	•	•	•
Battery Life: In hours (Alkaline battery)	1000	900	600	300	150	700/ 97R 350
Size: 80mm(W) x 165mm (L) x 36 mm(H), with holster	•	•	•	•	•	•
85mm(W) x 165mm (L) x 40 mm (H), with holster	•	•	•	•	•	•
84mm(W) x 175mm (L) x 31 mm(H), without holster	•	•	•	•	•	•
95mm(W) x 192mm (L) x 50 mm (H), with holster	•	•	•	•	•	•
Weight: In grams (with holster)	310	360	370	550	550	550
Included with instrument: Test Leads, Protective holster	•	•	•	•	•	•
ZnC battery (installed) and manual	•	•	•	•	•	•

Specifications subject to change without notice.

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# APPA 60 & 90 Series Multimeter

- Analog Bar Graph • True RMS • Auto Power Off • Beep Guard™
- Frequency Counter • Capacitance Ranges • Continuity/Diode Test
- Water Resistant • Drop Proof • Protective Holster



Distributed by:



## APPA TECHNOLOGY CORPORATION

9F, 119-1 Pao-Zong Rd., Shintien, Taipei, 231, TAIWAN

Tel: +886-2-29178820 Fax: +886-2-29170848

E-mail: info@appatech.com · http://www.appatech.com

ISO 9001 CERTIFIED



Advanced Instrument Technology Made Easy

## Pocket-Size Multimeter

One Hand Operation



Built-in Tilt Stand



Hanging Convenience



Test Lead Storage



### APPA 63N

3200 count digital display  
65 segments analog bar graph  
Autoranging and manual selection  
0.5% basic dc volts accuracy  
1.5% basic ac volts accuracy  
1.8% basic ohms accuracy  
1.0% basic dc amps accuracy  
600V protection in every range  
Fast continuity beeper  
Diode test  
Display hold function  
MagiHolster™

### NEW

### APPA 65N

4000 count digital display  
No analog bar graph  
Same features as APPA 63N plus  
Capacitance measurement  
Frequency counter

### APPA 67

3200 count digital display  
65 segments analog bar graph  
Autoranging and manual selection  
0.7% basic dc volts accuracy  
1.7% basic ac volts accuracy  
**1.2% basic dc amperes accuracy**  
**1.7% basic ac amperes accuracy**  
0.9% basic ohms accuracy  
600V protection non-current ranges  
Beep Guard™ warning system  
Fast continuity beeper (0.2 msec)  
Diode test  
Display hold function  
Auto power off  
MagiHolster™



### APPA 69

3200 count digital display  
65 segments analog bar graph  
Autoranging and manual selection  
0.5% basic dc volts accuracy  
1.5% basic ac volts accuracy  
**0.9% basic dc amperes accuracy**  
**1.5% basic ac amperes accuracy**  
0.8% basic ohms accuracy  
**1.9% basic capacitance accuracy**  
600V protection non-current ranges  
Beep Guard™ warning system  
Fast continuity beeper (0.2 msec)  
Diode test  
Display hold function  
Auto power off  
MagiHolster™

## Rugged Industrial Multimeter



### Water Resistant

Models 91, 97 & 97R are designed for harsh environments with water tight gasket at the seams, rotary switch and input terminals to keep out dust, dirt and moisture.

Rating IP 64



### Shockproof

Shock mounting and thick-wall design guarantee that these multimeters will keep on working even after a five foot fall to a concrete floor.



### Beep Guard

Specially designed Beep Guard provides a constant beep warning if the test leads put in the current jacks and select an incorrect function.

Model 91, 97 & 97R

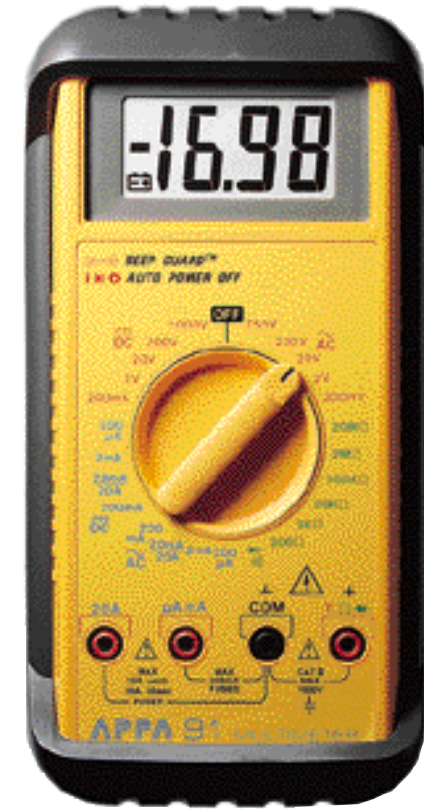


### Multipurpose Holster

Every APPA 90 Series meter is supplied with a protective holster that includes a built-in tilt stand, a nail hook, and convenient test lead storage. This holster provides an extra degree of protection and convenience for your meter.

### Safety

All models are designed to meet Class II IEC 1010 and UL 3111 standards for the safest operation in all applications.



### APPA 91

3 1/2 digit 0.8" large scale LCD  
0.5 % basic DCV accuracy  
1.3 % basic ACV accuracy  
1.0 % basic DCA accuracy  
1.5 % basic ACA accuracy  
0.75% basic OHM accuracy  
CONTINUITY and DIODE Test  
500V dual fuses protection  
Auto Power Shut Off  
Beep Guard™ warning system  
**Water Resistant rating IP 64**  
5 feet drop proof  
Protective Holster with tilt stand  
IEC 1010-1 standard CAT. II

### APPA 93N

3 1/2 digit 0.8" large scale LCD  
0.5 % basic DCV accuracy  
1.3 % basic ACV accuracy  
1.0 % basic DCA accuracy  
1.5 % basic ACA accuracy  
0.75% basic OHM accuracy  
1.0 % FREQUENCY accuracy  
2.0 % CAPACITANCE accuracy  
CONTINUITY and DIODE Test  
600V protection in non-current ranges  
500V dual fuses protection  
Auto Power Shut Off  
5 feet drop proof  
Protective Holster with tilt stand  
IEC 1010-1 standard CAT. II 600V



### APPA 97

### APPA 97R (True RMS reading)

3200 count digital display  
65 segment analog bar graph  
Autoranging and manual selection  
**0.3 % basic DCV accuracy**  
0.5 % basic DCA accuracy  
1.3 % basic ACV accuracy  
1.0 % basic DCA accuracy  
1.5 % basic ACA accuracy  
**0.5 % basic OHM accuracy**  
0.75% basic OHM accuracy  
**TRUE RMS reading in ACV/ACA (97R)**  
CONTINUITY and DIODE Test  
500V dual fuses protection  
Auto Power Shut Off  
Beep Guard™ warning system  
**Water Resistant rating IP 64**  
Fast continuity beeper (0.2 msec)  
Data HOLD key  
Unique DELAY HOLD function  
5 feet drop proof  
Protective Holster with tilt stand  
IEC 1010-1 standard CAT. II



APPA 67 & 69 are designed to safely meet measuring requirements of the field service industry. They are not recommended for use in high energy current measurements.