

SWITCHBOARD INSTRUMENTS

AB/DB17 Switchboard Meters



These internally illuminated meters are used primarily in railway locomotive applications for load and speed indication. They are suited to all applications where scale lighting and high accuracy is required. The wide radius pivot and jewel movement ensures accuracy and stability in the toughest environments. Standard lamps are two LEDs, either red or white

GENERAL SPECIFICATIONS

BASIC SPECIFICATION

In accordance with American National Standards Institute Specifications C39.1

SCALE LENGTH AND ARC

6.9" 250°

Scale Type:

White numerals, black platform scale is standard

NET WEIGHT

Approximately 990 gr. (2.2 lbs)

OVERSHOOT

Approximately 10%

ACCURACY

± 1% of full scale D.C. Meters

RESPONSE TIME

2.5 Seconds Maximum

METER MECHANISM

Moving coil type pivot and sapphire jewel

DIELECTRIC LEVEL

4000 Volts A.C. for 1 minute (case to input terminals)

Outline Dimensions

See page 24

AB/DB17 MODELS AVAILABLE

Description	Rating and scale	Model type
DC Milliammeter	0-1mA	102117FAZY
DC Millivolts	0-50mV	102121EDZY

Note: *Specify full scale rating, scale color, type, legend, etc.

† Contact factory for minimum / maximum ratings.



POWER FACTOR SCALE FOR BALANCED SYSTEM

Power-Factor Meters

Rating (Amperes)	Rating (L-L Volts)	Scale	AB-40 Cat. No.	AB-16 Cat. No.
Single-Phase/2-Wire, 50/60Hz				
5	120	.5-1-.5	103 412 FCAD	121 412 FCAD
3-Phase 3- & 4-Wire, 50/60Hz Balanced System Only				
5	120	.5-1-.5	103 402 FCAD	121 402 FCAD
5	208	.5-1-.5	103 402 FDAD	—
5	240	.5-1-.5	103 402 FEAD	121 402 FEAD
5	480	.5-1-.5	103 402 FFAD	—
5	600	.5-1-.5	103 402 FGAD	—
3-Phase 3-Wire, 60Hz Unbalanced Systems				
5	120	.5-1-.5	103 462 FCAD	—
5	240	.5-1-.5	103 462 FEAD	—
3-Phase 4-Wire, 60Hz Unbalanced Systems				
5	120	.5-1-.5	103 472 FCAD	—
5	208	.5-1-.5	103 472 FDAD	—
5	416*	.5-1-.5	103 472 FEAD	—
Instruction Book: 4555K35P0701 (For Unbalanced), Outline Dimensions: See page 30				
Instruction Book: 4555K25P0001 (For Balanced), Outline Dimensions: See page 30				

*240 V L-N



Frequency Meters, 120V

Scale (Hz)	Center Frequency (Hz)	Accuracy (Hz)	AB-40 Cat. No.	AB-16 Cat. No.
45-55	50	±0.15	103 372 AGAG	121 372 AGAG
45-65	55	±0.25	103 372 AJAJ	121 372 AJAJ
48-52	50	±0.093	103 372 AKAK	121 372 AKAK
50-70	60	±0.25	103 372 ALAL	121 372 ALAL
55-65	60	±0.15	103 372 ANAN	121 372 ANAN
58-62	60	±0.093	103 372 ATAT	121 372 ATAT
59-61	60	±0.047	103 372 ASAS	121 372 ASAS
350-450	400	±1.3	103 372 BHBH	121 372 BHBH
390-410	400	±0.492	103 372 BLBL	121 372 BLBL
Instruction Book: 4555K24P0001, Outline Dimensions: See page 30				



Synchrosopes — Pivot & Jewel

Scale	Voltage	Normal Frequency	AB-40 Cat. No.	AB-16 Cat. No.
"Slow-Fast"	120	50/60	106 452 ADAA	120 452 ADAA
"Slow-Fast"	120	400	106 452 ACAA	120 452 ACAA
"Slow-Fast"	240	50/60	106 452 DDAA	120 452 DDAA
"Slow-Fast"	240	400	106 452 DCAA	120 452 DCAA
Instruction Book: IM106452-50-60, Outline Dimensions: See page 30				



Temperature Indicators (Lead Resistance = 0.3 ohms)

Rating (Volts)	Scale	DB-40 Cat. No.	DB-16 Cat. No.
1-Percent of Span for 10-ohm copper RTDs (Resistance Temperature Detectors) 50-600 Hz			
120	20 -140°C	103 502 CAAB†	121 502 CAAB†
120	0-180°F	103 502 CDAD†	121 502 CDAD†
Instruction Book: 4555K12P0001, Outline Dimensions: See page 30			

† Catalog number includes calibrated test resistor