



EXPLORER PLUS™

Analytical, Precision and High Capacity Balances



Engineered for Accuracy, Designed for Demanding Applications

The new Explorer Plus (EXP Series) offers a premium weighing performance, compliance support and data traceability. The advanced features take the EXP to the next level by optimizing the user experience. This flagship balance is crafted to meet the most demanding requirements of modern scientific research.

Unique Features:

- **Intelligent User Experience**

Seamless setup with motorized leveling, anti-pinch auto-doors, touchless sensors, ionizer and draftshield light. A 7-inch glass touchscreen, chemical protection and 2 customizable status lights.

- **Supports Compliance for Data Traceability**

Ensure compliance with 4-level user system, password protection, and 100k internal system log. The time synchronization NTP function confirms data traceability to meet pharmaceutical regulations.

- **Effortless System Integration**

Advanced communication capabilities with straightforward integration to Laboratory Information Management Systems (LIMS), and hassle-free data transfer with driverless HID for easy data input.

EXPLORER PLUS™ Analytical Balances

Specifications

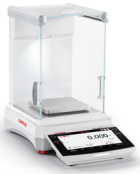


Model	EXP124/AD	EXP224/AD	EXP324/AD
	EXP124N/AD*	EXP224N/AD*	EXP324N/AD*
Capacity	120 g	220 g	320 g
Readability d	0.1 mg	0.1 mg	0.1 mg
Repeatability (sd.), ≤5% of Full Load Typical	0.05 mg	0.05 mg	0.05 mg
Repeatability (sd.), 5% of Full Load to Full Range	0.1 mg	0.1 mg	0.1 mg
Readability d (g) (EXP...N...model)	0.1 mg or 1 mg		
Linearity Deviation Typical	0.06 mg	0.06 mg	0.06 mg
Linearity Deviation	0.2 mg	0.2 mg	0.2 mg
Verification Interval, e (EXP...N.. models only)	1 mg	1 mg	1 mg
Approval Class (EXP...N.. models only)	Class I	Class I	Class I
Span Calibration Points (g)	25g, 50g, 75g, 100g	50g, 100g, 150g, 200g	100g, 150g, 200g, 300g
Weighing Units	g, mg, ct, N, oz, ozt, Grain, dwt, mo, msg, tl H, tl S, tl T, tcl, tola, baht, Custom 1, Custom 2		
Weighing Units (EXP...N.. model only)	g, mg, ct, oz, ozt, Grain, dwt		
Applications	Basic Weighing, Parts Counting, Check Counting, Percent Weighing, Check Weighing, Dynamic Weighing, Totalization, Formulation, Differential, Density Determination, Peak Hold, Pipette Adjustment, SQC, Fill Weight Variation, Flow Rate Control		
Stabilization Time (typical)	2 seconds		
Sensitivity Temperature Drift (ppm/°C)	1.5		
Min-Weight (typical) (K=2, U=1%)	10 mg		
Min-Weight (typical) (USP, K=2, U=0.10%)	100 mg		
Min-Weight (optimal) (USP, K=2, U=0.10%, SRP≤0.41d)	82 mg		
Terminal Display	7-inch TFT 16.7M Color Touch Screen with Glass Overlay, Detachable Terminal		
Display Resolution	800 x 480 Pixels		
Communication	USB Host (Type A) x 2, USB Device (Type B) x 1, USB Device (Type C) x 1 Ethernet (RJ45) x 1, RS232 x 1; Optional Wi-Fi, Bluetooth Dongle		
Leveling System	Motorized Leveling System with Digital Leveling Bubble		
Power Supply	AC Adapter Input: 100-240 VAC 0.5A 50-60 Hz AC Adapter Output: 12 VDC 1.5A		
Weighing Pan Size	Square Pan 90mm x 90mm		
Built-in Ionizer	Standard		
Environmental Sensor (Load Cell)	Temperature Sensor, Relative Humidity Sensor (RH), Air Pressure Sensor		
Touchless Sensor	2 Touchless Sensors on the terminal		
Draftshield with anti-static coating	Standard		
Automatic Draftshield Door Function	Standard, Open Range: 1/2 open and fully open		
Draftshield & Terminal Status Lights	Standard, 7-color Selectable		
Sample Spotlight	Standard, White		
Terminal Housing Dimensions (W x D x H)	205mm x 126mm x 66mm		
Base Housing Dimensions (W x D x H)	229mm x 275mm x 78mm		
Assembled Dimensions (W x D x H)	229mm x 408mm x 372mm		
Shipping Dimensions (W x D x H)	415mm x 630mm x 561mm		
Net Weight	7.8 kg		
Shipping Weight	12.0 kg		

*NTEP Legal for Trade models coming soon!

EXPLORER PLUS™ Precision Balances

Specifications



Model	EXP223/AD	EXP423/AD	EXP623/AD	EXP1203/AD
	EXP223N/AD*	EXP423N/AD*	EXP623N/AD*	EXP1203N/AD*
Capacity	220 g	420 g	620 g	1200 g
Readability d	1mg	1mg	1mg	1mg
Repeatability (sd.), ≤5% of Full Load Typical	0.7 mg	0.7 mg	0.7 mg	0.7 mg
Repeatability (sd.), 5% of Full Load to Full Range	1 mg	1 mg	1 mg	1 mg
Readability d (g) (EXP...N...model)	1 mg or 10 mg			
Linearity Deviation Typical	0.6 mg	0.6 mg	0.6 mg	0.6 mg
Linearity Deviation	2 mg	2 mg	2 mg	2 mg
Verification Interval, e (EXP...N.. models only)	10 mg	10 mg	10 mg	10 mg
Approval Class (EXP...N.. models only)	Class II	Class II	Class II	Class I
Span Calibration Points (g)	50g, 100g, 150g, 200g	100g, 200g, 300g, 400g	300g, 400g, 500g, 600g	400g, 600g, 800g, 1000g
Weighing Units	g, mg, ct, N, oz, ozt, Grain, dwt, mo, msg, tl H, tl S, tl T, tcl, tola, baht, Custom 1, Custom 2, lb (models with capacity ≥ 620 g), kg (models with capacity ≥ 1200 g)			
Weighing Units (EXP...N.. model only)	g, mg, ct, oz, ozt, Grain, dwt, lb (models with capacity ≥ 620 g), kg (models with capacity ≥ 1200 g)			
Applications	Basic Weighing, Parts Counting, Check Counting, Percent Weighing, Check Weighing, Dynamic Weighing, Totalization, Formulation, Differential, Density Determination, Peak Hold, Pipette Adjustment, SQC, Fill Weight Variation, Flow Rate Control			
Stabilization Time (typical)	≤ 1.5 seconds			
Sensitivity Temperature Drift (ppm/°C)	3			
Min-Weight (typical) (K=2, U=1%)	0.14 g			
Min-Weight (typical) (USP, K=2, U=0.10%)	1.4 g			
Min-Weight (optimal) (USP, K=2, U=0.10%, SRP≤0.41d)	0.82 g			
Terminal Display	7-inch TFT 16.7M Color Touch Screen with Glass Overlay, Detachable Terminal			
Display Resolution	800 x 480 Pixels			
Communication	USB Host (Type A) x 2, USB Device (Type B) x 1, USB Device (Type C) x 1 Ethernet (RJ45) x 1, RS232 x 1; Optional Wi-Fi, Bluetooth Dongle			
Leveling System	Motorized Leveling System with Digital Leveling Bubble			
Power Supply	AC Adapter Input: 100-240 VAC 0.5A 50-60 Hz AC Adapter Output: 12 VDC 1.5A			
Weighing Pan Size	Square Pan 130mm x 130mm			
Built-in Ionizer	Standard			
Environmental Sensor (Load Cell)	Temperature Sensor, Relative Humidity Sensor (RH), Air Pressure Sensor			
Touchless Sensor	2 Touchless Sensors on the terminal			
Draftshield with anti-static coating	Standard			
Automatic Draftshield Door Function	Standard, Open Range: 1/2 open and fully open			
Draftshield & Terminal Status Lights	Standard, 7-color Selectable			
Terminal Housing Dimensions (W x D x H)	205mm x 126mm x 66mm			
Base Housing Dimensions (W x D x H)	229mm x 275mm x 78mm			
Assembled Dimensions (W x D x H)	229mm x 408mm x 372mm			
Shipping Dimensions (W x D x H)	415mm x 630mm x 561mm			
Net Weight	7.8 kg			
Shipping Weight	12.0 kg			

*NTEP Legal for Trade models coming soon!

EXPLORER PLUS™ Precision Balances

Specifications



Model	EXP2202	EXP4202	EXP6202	EXP8202	EXP12202
	EXP2202N*	EXP4202N*	EXP6202N*	EXP8202N*	EXP12202N*
Capacity (g)	2200 g	4200 g	6200 g	8200 g	12200 g
Readability d, Full Range (g)	0.01 g	0.01 g	0.01 g	0.01 g	0.01 g
Repeatability (sd.), ≤5% of Full Load Typical	0.007 g	0.007 g	0.007 g	0.007 g	0.007 g
Repeatability (sd.), 5% of full Load to Full Range	0.01 g	0.01 g	0.01 g	0.01 g	0.01 g
Readability d (g) (EXP...N...model)	0.01 g or 0.1 g				
Linearity Deviation Typical	0.006 g	0.006 g	0.006 g	0.006 g	0.006 g
Linearity Deviation	0.02 g	0.02 g	0.02 g	0.02 g	0.02 g
Verification Interval, e (EXP...N.. models only)	0.1 g	0.1 g	0.1 g	0.1 g	0.1 g
Approval Class (EXP...N.. models only)	Class II	Class II	Class II	Class II	Class I
Span Calibration Points (g)	500g,1000g,1500g, 2000g	1000g, 2000g, 3000g, 4000g	2000g, 3000g, 4000g, 6000g	2000g, 4000g, 6000g, 8000g	6000g, 8000g, 10000g, 12000g
Weighing Units	g, ct, N, oz, ozt, Grain, dwt, mo, msg, tl H, tl S, tl T, tcl, tola, baht, lb, kg Custom 1, Custom 2				
Weighing Units (EXP...N.. model only)	g, ct, oz, ozt, Grain, dwt, lb, kg				
Applications	Basic Weighing, Parts Counting, Check Counting, Percent Weighing, Check Weighing, Dynamic Weighing, Totalization, Formulation, Differential, Density Determination, Peak Hold, Pipette Adjustment, SQC, Fill Weight Variation, Flow Rate Control				
Stabilization Time (typical)	≤ 1 second				
Sensitivity Temperature Drift (ppm/°C)	3				
Min-Weight (typical) (K=2, U=1%)	1.4 g				
Min-Weight (typical) (USP, K=2, U=0.10%)	14 g				
Min-Weight (optimal) (USP, K=2, U=0.10%, SRP≤0.41d)	8.2 g				
Terminal Display	7-inch TFT 16.7M Color Touch Screen with Glass Overlay, Detachable Terminal				
Display Resolution	800 x 480 Pixels				
Communication	USB Host (Type A) x 2, USB Device (Type B) x 1, USB Device (Type C) x 1 Ethernet (RJ45) x 1, RS232 x 1; Optional Wi-Fi, Bluetooth Dongle				
Leveling System	Motorized Leveling System with Digital Leveling Bubble				
Power Supply	AC Adapter Input: 100-240 VAC 0.5A 50-60 Hz AC Adapter Output: 12 VDC 1.5A				
Weighing Pan Size	Trapezoid Pan 178mm x 201mm				
Environmental Sensor (Load Cell)	Temperature Sensor, Relative Humidity Sensor (RH), Air Pressure Sensor				
Touchless Sensor	2 Touchless Sensors on the terminal				
Terminal Status Lights	Standard, 7-color Selectable				
Terminal Housing Dimensions (W x D x H)	205mm x 126mm x 66mm				
Base Housing Dimensions (W x D x H)	229mm x 275mm x 78mm				
Assembled Dimensions (W x D x H)	229mm x 408mm x 97mm				
Shipping Dimensions (W x D x H)	385mm x 590mm x 311mm				
Net Weight	5.5 kg				
Shipping Weight	7.7 kg				

*NTEP Legal for Trade models coming soon!

EXPLORER PLUS™ Precision Balances

Specifications



Model	EXP6201	EXP8201	EXP10201
Capacity	6200 g	8200 g	10200 g
Readability d	0.1 g	0.1 g	0.1 g
Repeatability (sd.), ≤5% of Full Load Typical	0.07 g	0.07 g	0.07 g
Repeatability (sd.), 5% of Full Load to Full Range	0.1 g	0.1 g	0.1 g
Linearity Deviation Typical	0.06 g	0.06 g	0.06 g
Linearity Deviation	0.2 g	0.2 g	0.2 g
Span Calibration Points	2000g, 3000g, 4000g, 6000g	2000g, 4000g, 6000g, 8000g	2500g, 5000g, 7500g, 10000g
Weighing Units	g, ct, N, oz, ozt, Grain, dwt, mo, msg, tl H, tl S, tl T, tcl, tola, baht, lb, kg, Custom 1, Custom 2		
Applications	Basic Weighing, Parts Counting, Check Counting, Percent Weighing, Check Weighing, Dynamic Weighing, Totalization, Formulation, Differential, Density Determination, Peak Hold, Pipette Adjustment, SQC, Fill Weight Variation, Flow Rate Control		
Stabilization Time (typical)	≤ 1 second		
Sensitivity Temperature Drift (ppm/°C)	5	3	3
Min-Weight (typical) (K=2, U=1%)	14 g		
Min-Weight (typical) (USP, K=2, U=0.10%)	140 g		
Min-Weight (optimal) (USP, K=2, U=0.10%, SRP≤0.41d)	82 g		
Terminal Display	7-inch TFT 16.7M Color Touch Screen with Glass Overlay, Detachable Terminal		
Display Resolution	800 x 480 Pixels		
Communication	USB Host (Type A) x 2, USB Device (Type B) x 1, USB Device (Type C) x 1 Ethernet (RJ45) x 1, RS232 x 1; Optional Wi-Fi, Bluetooth Dongle		
Leveling System	Motorized Leveling System with Digital Leveling Bubble		
Power Supply	AC Adapter Input: 100-240 VAC 0.5A 50-60 Hz AC Adapter Output: 12 VDC 1.5A		
Weighing Pan Size	Trapezoid Pan 178mm x 201mm		
Environmental Sensor (Load Cell)	Temperature Sensor, Relative Humidity Sensor (RH), Air Pressure Sensor		
Touchless Sensor	2 Touchless Sensors on the terminal		
Terminal Status Lights	Standard, 7-color Selectable		
Terminal Housing Dimensions (W x D x H)	205mm x 126mm x 66mm		
Base Housing Dimensions (W x D x H)	229mm x 275mm x 78mm		
Assembled Dimensions (W x D x H)	229mm x 408mm x 97mm		
Shipping Dimensions (W x D x H)	385mm x 590mm x 311mm		
Net Weight	5.5 kg		
Shipping Weight	7.7 kg		

EXPLORER PLUS™ High Capacity Balances

Specifications

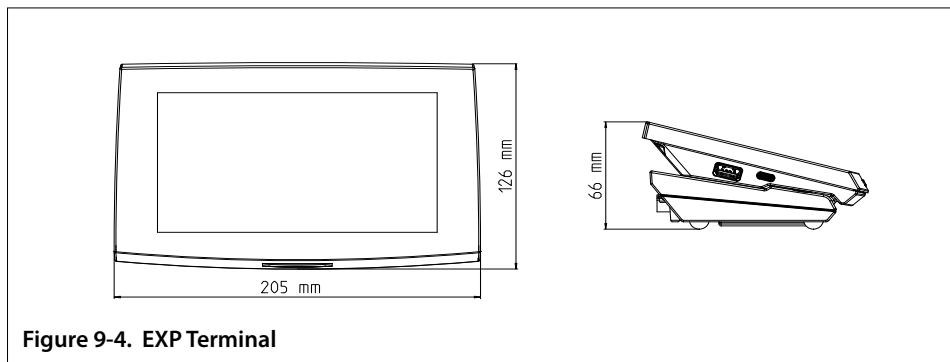
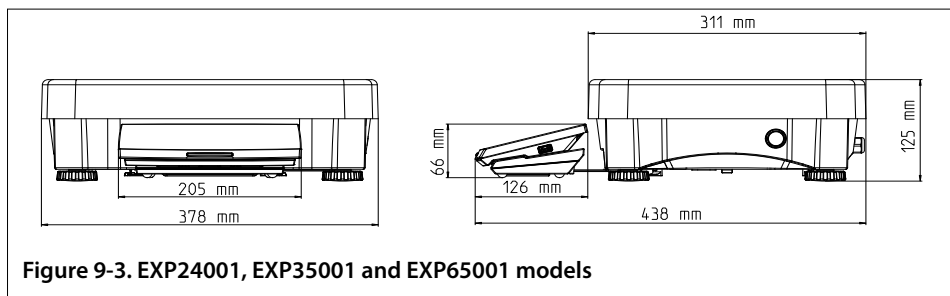
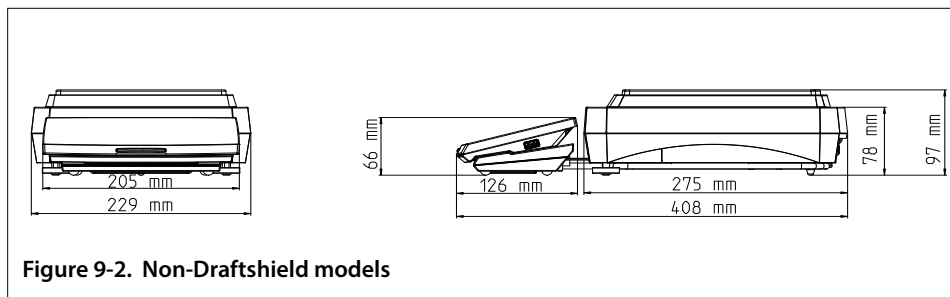
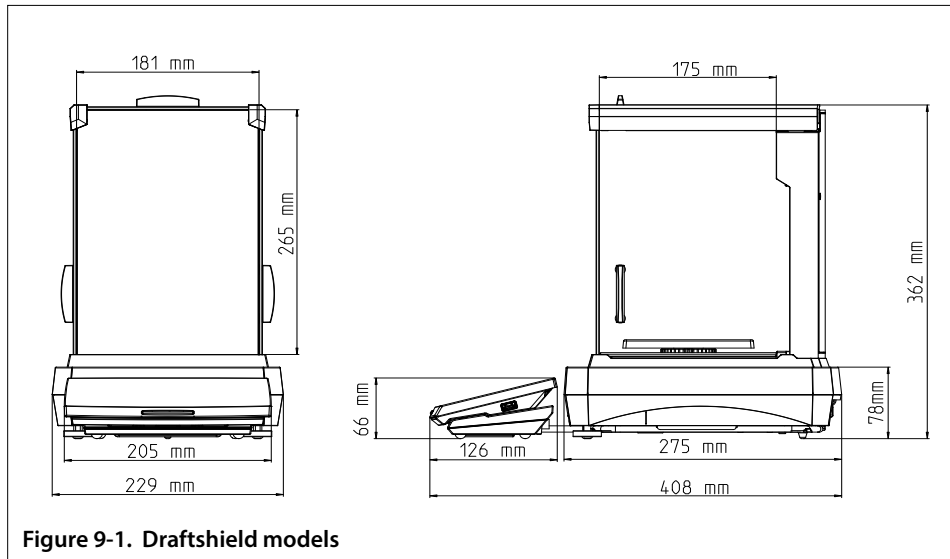


Model	EXP24001	EXP35001	EXP65001
	EXP24001N*	EXP35001N*	EXP65001N*
Capacity	24000 g	35000 g	65000 g
Readability d	0.1 g	0.1 g	0.1 g
Repeatability (sd.), ≤5% of Full Load Typical	0.08 g	0.08 g	0.08 g
Repeatability (sd.), 5% of Full Load to Full Range	0.1 g	0.1 g	0.1 g
Readability d (g) (EXP...N...model)	0.1 g or 1 g		
Linearity Deviation Typical	0.07 g	0.07 g	0.07 g
Linearity Deviation	0.2 g	0.2 g	0.2 g
Verification Interval, e (EXP...N.. models only)	1 g	1 g	1 g
Approval Class (EXP...N.. models only)	Class II	Class II	Class II
Span Calibration Points (g)	10000g, 15000g, 20000g, 24000g	10000g, 20000g, 30000g, 35000g	20000g, 40000g, 60000g, 65000g
Weighing Units	g, ct, N, oz, ozt, Grain, dwt, mo, msg, tl H, tl S, tl T, tcl, tola, baht, lb, kg, Custom 1, Custom 2		
Weighing Units (EXP...N.. model only)	g, ct, oz, ozt, Grain, dwt, lb, kg		
Applications	Basic Weighing, Parts Counting, Check Counting, Percent Weighing, Check Weighing, Dynamic Weighing, Totalization, Formulation, Differential, Density Determination, Peak Hold, SQC, Fill Weight Variation, Flow Rate Control		
Stabilization Time (typical)	≤ 1 second		
Sensitivity Temperature Drift (ppm/°C)	5		
Min-Weight (typical) (K=2, U=1%)	16 g		
Min-Weight (typical) (USP, K=2, U=0.10%)	160 g		
Min-Weight (optimal) (USP, K=2, U=0.10%, SRP≤0.41d)	82 g		
Terminal Display	7-inch TFT 16.7M Color Touch Screen with Glass Overlay, Detachable Terminal		
Display Resolution	800 x 480 Pixels		
Communication	USB Host (Type A) x 2, USB Device (Type B) x 1, USB Device (Type C) x 1 Ethernet (RJ45) x 1, RS232 x 1; Optional Wi-Fi, Bluetooth Dongle		
Leveling System	4 leveling feet with Digital Leveling Bubble		
Power Supply	AC Input: 100-240 VAC 0.5A 50-60 Hz		
Weighing Pan Size	Trapezoid Pan 377mm x 311mm		
Environmental Sensor (Load Cell)	Temperature Sensor, Relative Humidity Sensor (RH), Air Pressure Sensor		
Touchless Sensor	2 Touchless Sensors on the terminal		
Terminal Status Lights	Standard, 7-color Selectable		
Terminal Housing Dimensions (W x D x H)	205mm x 126mm x 66mm		
Base Housing Dimensions (W x D x H)	378mm x 311mm x 125mm		
Assembled Dimensions (W x D x H)	378mm x 438mm x 125mm		
Shipping Dimensions (W x D x H)	525mm x 665mm x 330mm		
Rechargeable Battery	Li-ion, ICR18650, 14.4V, 2600 mAh (optional)		
Battery Life	Up to 8 hours with brightness ≤50% Up to 5 hours with brightness ≤90% Full charging time: 6 hours		
IP Rating	IP54 (Base only)		
Net Weight	11.0 kg		
Shipping Weight	13.8 kg		

*NTEP Legal for Trade models coming soon!

EXPLORER PLUS™

Outline Dimensions
















Approvals

- **Metrology:** NIST Handbook 44, Measurement Canada Weights and Measures Regulations
- **Product Safety:** IEC/EN 61010-1; CAN/CSA C22.2 61010-1; UL 61010-1
- **Electromagnetic Compatibility:** IEC/EN 61326-1 Class B, Basic Environments; FCC Part 15 Class A; Canada ICES-003 Class A

EXPLORER PLUS™

Accessories

	Item No.	30944360
	Accessory Name	Bluetooth Printer, Impact, SF40A/BT
	Item No.	30064203
	Accessory Name	Printer, Impact, SF40A
	Item No.	31059238
	Accessory Name	Fingerprint scanner FIN-100A
	Item No.	31059239
	Accessory Name	BT dongle and Wi-Fi dongle LM842
	Item No.	30130302
	Accessory Name	Static Ionizer, ION-100A
	Item No.	31059237
	Accessory Name	Weighing Kit
	Item No.	80253384
	Accessory Name	Density Kit, Solids
	Item No.	83034024
	Accessory Name	Sinker, Glass, Liquid, Density Kit
	Item No.	30252145
	Accessory Name	Pipette Evaporation Trap
	Item No.	30808539
	Accessory Name	Tower Kit for EXP High-Capacity Model
	Item No.	31052750
	Accessory Name	Rechargeable Battery for EXP High-Capacity Model
	Item No.	30078078
	Accessory Name	Terminal Extension Cable, RS422, 9 m
	Item No.	12120799
	Accessory Name	SF40A Paper roll (57,5mm 2pcs)
	Item No.	30529322
	Accessory Name	SF40A Ink Ribbon Cassette



MRM Metrology Inc.
 905 595 1000
 sales@MRMmetrology.com
 www.MRMmetrology.com