

## GENERAL DESCRIPTION

The Excel Series combines an appealing design, the latest in die-forming technology and high performance electronics to ensure reliability.

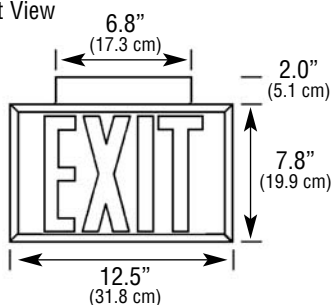
All components are located within the exit housing for low profile mounting requirements. A matching die-formed steel canopy is available for end or ceiling mounting applications.

## ILLUMINATION

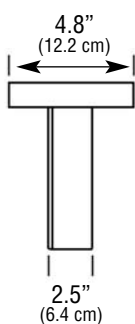
Illumination of the exit stencil face is accomplished with either red or green high output Light Emitting Diodes (LEDs). Hot spots and striations are eliminated by a combination of indirect and direct aiming points covering the exit stencil face.

## DIMENSIONS

Front View



Side View



Dimensions are approximate and subject to change.

# Excel Series

## Heavy Duty Steel LED Exits

### AC Only and Self-Powered LED Illumination



SHOWN: XLN1RW

## HOUSING

Constructed of three-piece, 20 gauge, cold rolled steel. White powder coat finish is standard; Black is optional. NFPA-type field selectable chevrons.

UL damp location listing is available on the AC Only version.

Universal knockouts located on the backplate allow for wall mounting directly to standard junction boxes. A mounting canopy is provided for top and end mount applications.

## ELECTRONICS

**AC Only** - 120/277 VAC dual voltage input with surge protection.

**Self-Powered** - 120/277 VAC dual voltage input with surge-protected, solid-state circuitry provides for a reliable charging system.

Charging system is complete with low voltage disconnect, AC lockout, brownout protection, AC indicator lamp and test switch.

The ACCU-TEST option includes a fault indicator LED and microprocessor circuitry that automatically indicates battery and charger status. An automatic monthly test assists user in meeting requirements of NFPA Section 31-1.

## BATTERY

Maintenance free, sealed nickel cadmium battery

Supplies 90 minutes of emergency power

Estimated service life of 10 years

Operating temperature range of 20°F (-7°C) to 95°F (35°C)

## CODE COMPLIANCE

UL 924 listed

UL damp location listings available on AC Only versions 50°F (10°C) to 104°F (40°C)

NFPA 101, NEC, BOCA, OSHA and IBC illumination standards

## ELECTRICAL SPECIFICATIONS

### AC Only

Red = 0.046A (120 VAC), 0.020A (277 VAC)

Green = 0.033A (120 VAC), 0.014A (277 VAC)

### Self-Powered

Red = 0.090A (120 VAC), 0.039A (277 VAC)

Green = 0.090A (120 VAC), 0.039A (277 VAC)

## WARRANTY

Three year full electronics warranty

Five year full plus five year prorated battery warranty

## ORDERING INFORMATION (EXAMPLE: XLN1RW)

X	L						
SERIES	LAMP TYPE	BATTERY	STENCIL FACES	LETTER COLOR	HOUSING/STENCIL FACE COLOR	FACTORY INSTALLED OPTIONS <sup>1</sup>	
X = Excel Series Die-Formed Steel Exit	L = LED	N = Nickel Cd = Cadmium A = AC Only	1 = Single 2 = Double	R = Red G = Green	W = White Housing w/ White Stencil Face B = Black Housing w/ Black Stencil Face	2CKT1 = 120 VAC, Two Circuit <sup>2</sup> 2CKT2 = 277 VAC, Two Circuit <sup>2</sup> AD = ACCU-TEST Self Diagnostics BF = Buzzer/Flasher (Emergency Operation Units Only) <sup>2</sup> BZ = Buzzer (Emergency Operation Units Only) <sup>2</sup> EX = Special Input Transformer (Specify voltage and frequency) FA = 24 VDC Fire Alarm Interface <sup>2</sup> FL = Emergency Flasher <sup>2</sup> SW = Special Wording (Consult Factory) Z = UL Damp Location Listing (AC Only)	

**ACCESSORIES (order as a separate line item)**  
 XCKITW = Canopy Kit, White  
 XDCKIT6 = DC Conversion Kit, 6VDC/ 5.4 watt lamps  
 XDCKIT12 = DC Conversion Kit, 12VDC/5.5 watt lamps  
 XPKITW = Excel Series Exit Pendant Kit, 12", White finish (4)  
 WG = Wire Guard for Combination LED Exit/Emergency  
 WG4 = Wire Guard for Exit Wall Mounting  
 WG10 = Wire Guard for Exit End Mounting

**NOTES:**  
 1) Some option combinations may impact UL listing. Consult factory for specifics.  
 2) Not available with AD option.

# Specification Data for Excel Series Heavy Duty Steel LED Exit

## HOUSING

Three-piece construction of 20 gauge, cold-rolled steel stock.

Easily removed knockouts in the rear of housing allow back/wall mounting to a standard 4" octagonal recessed junction box.

NFPA-type chevrons are field selectable and can be easily removed in the field for customized direct flow indication.

The mounting canopy is constructed of 20 gauge, cold-rolled steel, and is painted with a finish matching the housing. Both housing and canopy are painted with a high gloss powder coat finish.

The Excel Series housing can be wall mounted without the use of a mounting canopy on both AC Only and Self-Powered versions. All end mount, or ceiling mount configurations will require the use of a mounting canopy.

## ELECTRONICS

### AC Only and Self-Powered

Dual voltage 120/277 VAC input with surge protection is standard.

### Self-Powered

All components are located within the exit housing.

An indicator light is located on the bottom of the housing to signify that AC utility is present.

AC lockout prevents battery drain prior to the initial energizing of utility power.

The low voltage disconnect (LVD) feature will disconnect the battery prior to an unacceptable deep discharge, but not before the required 90 minute emergency operation.

The brownout protection circuitry will automatically switch the unit into the emergency mode if the utility voltage sags below 20% of nominal.

Battery charging circuitry is entirely solid-state, and of a constant current design. Battery recharge time after a complete discharge is less than the required UL 924 standard.

Solid-state circuitry causes an instantaneous transfer to battery power if either the loss of AC utility, or a brownout condition is detected. When line voltage is present and stabilized, the transfer circuitry switches back to normal operation and begins recharging the battery. The transfer circuitry can be tested via a momentary test switch located on the bottom of the housing.

## SELF-DIAGNOSTICS

The ACCU-TEST Self-Diagnostics option conducts automatic and manual tests, and indicates real time status of the lamp, battery and charger via LED indicator lamps.

Automatic tests include: Systems analysis every 10 seconds, with actual load tests performed for a 3 minute duration every 30 days. A manual test is available from 1 to 90 minutes.

## BATTERY

A maintenance free, sealed nickel cadmium battery is standard. Construction is of the sintered plate design and the battery assembly is equipped with a quick connect plug assembly for easy installation.

Standard sustained emergency operation is for 90 minutes with the illumination source providing full light output.

The suggested operating temperature range of 20°F (-7°C) to 95°F (35°C) should provide a service life of 10 years.

## ELECTRICAL SPECIFICATIONS

### AC Only

Red = 0.046A (120 VAC), 0.020A (277 VAC)  
Green = 0.033A (120 VAC), 0.014A (277 VAC)

### Self-Powered

Red = 0.090A (120 VAC), 0.039A (277 VAC)  
Green = 0.090A (120 VAC), 0.039A (277 VAC)

## CODE COMPLIANCE

The Excel Series Die-Formed Steel LED Exit meets or exceeds all performance standards as required by UL 924, NFPA 101, NEC, BOCA, OSHA and IBC.

## SUGGESTED SPECIFICATION

Furnish and install Chloride's exit sign model \_\_\_\_\_. The exit shall be constructed to meet Underwriter's Laboratories, Inc. Standard #924 and the National Electrical Code (NEC).

**INSTALLATION AND OPERATION** - Exit shall be easily field connected to a 120 or 277 VAC, 60 hertz, unswitched power source. Installation must comply with the NEC as well as other applicable codes. (Self-Powered Only) - Upon utility power failure or brownout, the unit shall automatically transfer to battery power and maintain the required illumination level for a minimum period of 90 minutes. Upon restoration of utility power, the charger shall restore the battery to full charge within UL 924 requirements following a rated discharge of not more than 90 minutes.

**CHARGER (Self-Powered Only)** - Product shall utilize a constant current charging system which will maintain the battery at full capacity without the need for periodic exercising or equalization. The following features shall be standard: Low voltage disconnect (LVD), brownout protection and AC lockout. Three year warranty provided.

**BATTERY (Self-Powered Only)** - The battery shall be a maintenance free, sealed nickel cadmium battery utilizing sintered plate construction and polypropylene separators for trouble-free operation in ambient temperatures up to 85°F (30°C). Nickel cadmium batteries shall be supplied with a five year full warranty.

**ILLUMINATION** - The Excel Series LED Exit shall incorporate high intensity LEDs. The LEDs shall be designed so that the unlikely failure of one LED will not affect the integrity of the total sign in the emergency mode. AC Only version shall consume no more than 0.046A (red) or 0.033A (green). Self-Powered version shall consume no more than 0.090A (red) or 0.090A (green).

**HOUSING** - The exit sign housing and canopy shall be constructed of 20 gauge die-formed cold rolled steel. The final housing and canopy finish shall be a white powder coat paint application. Stencil face chevrons shall be field selectable, and if left in place will not disturb the visual line of the exit face. Knockout removal for junction box mounting shall not require any special tools, and will allow for back to wall, end and ceiling mounting capability.

ALL SPECIFICATIONS SUBJECT TO CHANGE WITHOUT NOTICE.

