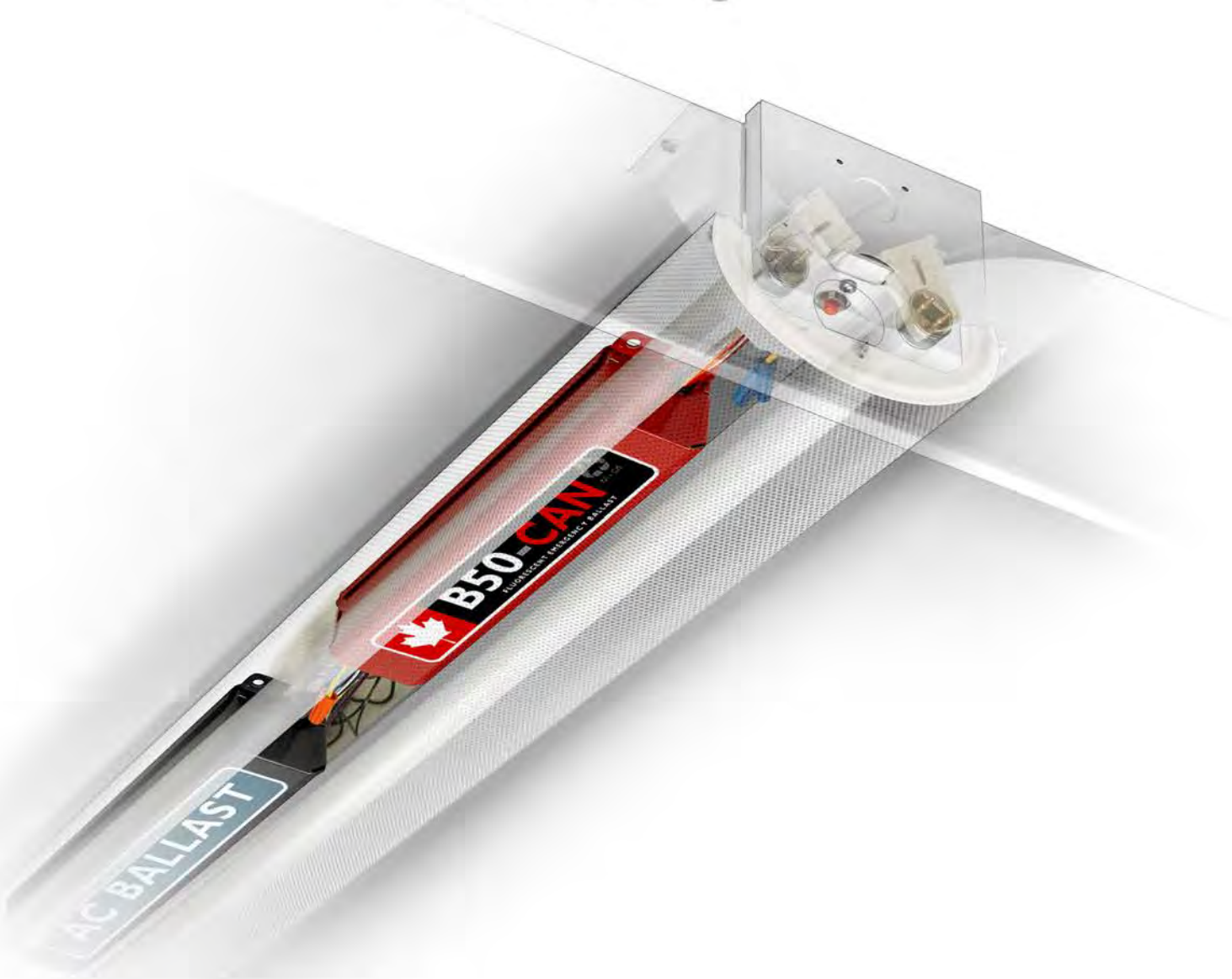




# Canadian

Product Catalog





Philips Bodine is the brand you can count on when life safety counts.



Philips Emergency Lighting, the leader in emergency lighting technology, offers half a century of design and manufacturing excellence to the Canadian market. Our innovative CSA Certified and cUL Philips Bodine emergency and specialty lighting products have a proven track record of quality and dependability. Philips Bodine is the brand you can count on when life safety counts.

The Philips Bodine Canadian portfolio includes fluorescent emergency ballasts, emergency LED drivers, HID backup ballasts, generator-compatible devices and an emergency lighting micro inverter. Some portfolio products are 120/347 VAC, but most are 120/277 VAC or universal input 120-277 VAC. The Canadian selection includes models designed for field and factory installation as well as for factory installation only.

When normal power fails for any reason, emergency lighting guides building occupants along the path of egress to the nearest exit and helps to deter injuries en route. Reliable and sufficient emergency lighting is an essential, required part of a facility's life safety program. Although a number of considerations and entities are involved in establishing regulations, minimum levels of performance as detailed in the National Model Codes must be met.



# Why Philips Emergency Lighting?

## Philips Bodine Emergency Lighting Provides Instant Backup

Philips Bodine emergency lighting products provide instant backup lighting whenever normal power fails. Philips Bodine fluorescent emergency ballasts, emergency LED drivers and emergency lighting micro inverter deliver 90 minutes of battery-supplied emergency illumination.

## Complements Original Designs

Philips Bodine emergency lighting products complement original lighting designs. Because the emergency units can be installed inconspicuously inside, on top of or remote from the fixture – depending on factors such as fixture type and emergency product – they do not detract from fixture or interior design. Philips Bodine emergency lighting is emergency lighting you'll never see until you need it.

## Looks Like Normal Lighting

Philips Bodine emergency lighting products use the same light source for normal and emergency lighting. As a result, emergency lighting appears similar to lighting under normal conditions.



## Reduces Risk of Tampering

Philips Bodine emergency lighting products may be installed inside, on top of or remote from the fixture – depending on factors such as fixture type and emergency product. This inconspicuous positioning reduces the chance that the emergency unit will be noticed, thereby reducing the risk of tampering and vandalism.

## Saves Time and Reduces Labor Costs

Philips Bodine emergency lighting products are factory or field installed. In field applications, a qualified electrician can typically install our products in less than 30 minutes.

Philips Bodine emergency lighting products provide instant backup lighting whenever normal power fails.

Philips Bodine emergency lighting products may be installed inside, on top of or remote from the fixture – depending on factors such as fixture type and emergency product.

## 2 Definitions and Reference Publications

### 2.1 Definitions

The following definitions shall apply in this Standard:

Unit equipment for emergency lighting — equipment that

- (a) is intended to provide automatically, in response to a failure of the power supply to which it is connected, a specified light output and a specified amount of power for illumination purposes, for a specified period of time, but in any case not less than 30 min;
- (b) comprises, in a unit construction,
  - (i) a storage battery;
  - (ii) a charging means to automatically maintain the battery in a charged condition;
  - (iii) lamps or output terminals to which specifically listed lamps can be connected;
  - (iv) a means to energize the lamps when the normal power supply fails and to de-energize the lamps when the normal power supply is restored; and
  - (v) a means to indicate and test the operating condition of the equipment;
- (c) is designed for use in applications in which the provision of emergency illumination is required by a governmental or other agency having jurisdiction; and
- (d) has a maximum capacity of 1.44 kW.

*CSA Standard, C22.2 No. 141-10, Emergency Lighting Equipment, 2010*



When normal power fails, Philips Bodine emergency lighting products sense the loss and immediately switch into emergency mode.

# Fluorescent Emergency Ballast vs. Wall Mount

Price comparisons are based on Canadian dollars.

	Fluorescent	Wall Mount
Product	Bodine B50-CAN <i>(1350 lumens initial light output)</i>	Two-Headed Emergency Lighting Unit <i>(two 12 W incandescent lamps)</i>
Code Spacing	40-50 feet	20-25 feet
Unit Cost	\$175 per unit	2 units × \$100 = \$200
Installation Cost	\$35	2 × \$35 = \$70
Total Installed Cost	\$210	\$270
Warranty	5 years	1 year typical <i>(excluding lamps)</i>

The conspicuous installation of the wall mount unit may attract vandals. Units may not properly illuminate the egress path because of improperly aligned emergency heads (lamps) or emergency heads that have been tampered with by vandals.



VS.





*B50-CAN Fluorescent Emergency Ballast*



*Two-Headed Wall Mount*

## B50 FEB vs. Wall Mount

While both the B50-CAN fluorescent emergency ballast and the two-headed wall mount may fulfill emergency lighting requirements, the emergency ballast has clear advantages. Emergency lighting provided by the fluorescent emergency ballast, as illustrated in the image on the left, looks more like normal lighting than that provided by wall mount units. In addition, because the emergency ballast is installed inconspicuously, it does not detract

from interior design and is less likely to be noticed by would-be vandals. Egress path illumination is more reliable with the emergency ballast, in contrast to the wall mount with lamp heads that may be intentionally or accidentally altered, resulting in improperly lit pathways. Issues of costs and warranty also favor the fluorescent emergency ballast. It's no contest: the Philips Bodine B50-CAN is the best choice for emergency lighting applications.



# Philips Bodine Canadian Portfolio

## 120/347V CAN Models

Philips Emergency Lighting offers five fluorescent emergency ballasts rated for 120/347V applications. These products have been tested to meet the standards set forth by the Canadian Standards Association, specifically C.22.2 No. 141-10 Emergency Lighting Equipment.

Please see the chart on page 14 or individual product specification sheets for more product details.

Model	Lamps Operated	VAC	Lumens	Listings
<b>B50-CAN</b>	1 or 2; 17-215 W T8s-T12s	120/347 dual	Up to 1400	cUL Listed, CSA Certified
<b>B70A-CAN*</b>	1; 17-215 W T8s, T10s or T12s, (4-pin) compacts	120/347 dual	Up to 700	cUL Listed, CSA Certified
<b>B90-CAN</b>	1; 17-40 W T8s, T10s or T12s, (4-pin) compacts	120/347 dual	Up to 600	cUL Listed, CSA Certified
<b>B100-CAN</b>	1; 17-40 W T8s, T10s or T12s, (4-pin) compacts	120/347 dual	Up to 450	CSA Certified
<b>BHD650-CAN**</b>	1 or 2; 17-215 W T8s, T10s or T12s, (4-pin) compacts	120/347 dual	Up to 700	CSA Certified

\* 2-hour runtime with one 17-32W T8 or 20-40W T10 or T12

\*\* Hazardous location

## Other Models for Canadian Installation

Philips Bodine fluorescent emergency ballasts are compatible with electronic, standard, energy-saving and dimming AC ballasts and operate most single and bi-pin fluorescent lamps, including U-shaped, HO, VHO, circline and energy-saving, as well as most 4-pin long compacts. Our fluorescent emergency ballast (FEB) family includes a range of solutions for every emergency lighting need.



## Self-Test

Self-testing FEBs in the ST line automatically conduct tests of emergency operation for 30 seconds every 30 days and once a year for 90 minutes. Self-test models will alert maintenance personnel to fault conditions.



Model	Lamps Operated	VAC	Lumens	Listings
B30ST	1 or 2; 17-215 W (2'-8") T8s-T12s, (4-pin) long compacts, 21-54 W (2'-4") standard or high output T5s	120/277	Up to 3500	UL Listed, CSA Certified
B50ST	1 or 2; 17-215 W (2'-8") T8s-T12s, (4-pin) long compacts	120/277	Up to 1400	UL Listed for U.S. & Canada
LP600STU	1; Standard and HO T5s and T8s	120/277	Up to 1325	UL Listed, cUL Certified

## Remote-Test

Remote-testing FEBs in the RCT line enable maintenance personnel to test emergency operation at any time by simply pointing the WHRCT handheld remote control transmitter at the emergency ballast. RCT models test from up to 30 feet away.



Model	Lamps Operated	VAC	Lumens	Listings
B30RCT	1 or 2; 17-215 W (2'-8") T8s-T12s, (4-pin) long compacts, 21-54 W (2'-4") standard or high output T5s	120/277	Up to 3500	UL Listed, CSA Certified



## Extended-Temperature

Extended-temperature FEBs in the Cold-Pak line provide code-compliant emergency lighting under challenging conditions. Cold-Pak units are designed to withstand temperatures ranging from -20C to +55C (-4F to +131F).



Model	Lamps Operated	VAC	Lumens	Listings
<b>B50 Cold-Pak</b>	1 or 2; (2'-8") T8s, T9s, T10s or T12s	120/277	Up to 1200	UL Listed, CSA Certified
<b>B4CF1 Cold-Pak</b>	1; (4-pin) twins, quads or triple twin-tubes, T5 circlines, long compacts	120/277	Up to 1250	UL Listed, CSA Certified
<b>B4CF2 Cold-Pak</b>	1; (4-pin) twins, quads or triple twin-tubes, T5 circlines, long compacts	120/277	Up to 1250	UL Listed, CSA Certified
<b>B4CF3 Cold-Pak</b>	1; (4-pin) twins, quads or triple twin-tubes, T5 circlines, long compacts	120/277	Up to 1250	UL Listed, CSA Certified

## Low-Profile

Low-profile FEBs in the LP line permit ballast channel installation into space-limited fixtures.



Model	Lamps Operated	VAC	Lumens	Listings
<b>LP600</b>	1; Standard and HO T5s & T8s	120/277	Up to 1325	UL Listed, CSA Certified
<b>LP600STU</b>	1; Standard and HO T5s & T8s	120/277	Up to 1325	UL Listed, cUL Certified

## Universal Input

Universal input models accommodate 120-277V, 50 or 60 Hz. They offer a number of advantages. Universal input FEBs minimize inventories, simplify wiring and tolerate harsh line conditions.



Model	Lamps Operated	VAC	Lumens	Listings
B50	1 or 2; 17-215 W (2'-8") T8s-T12s, (4-pin) long compacts	120-277	Up to 1400	UL Listed for U.S. & Canada
B50ST	1 or 2; 17-215 W (2'-8") T8s-T12s, (4-pin) long compacts	120-277	Up to 1400	UL Listed for U.S. & Canada
LP600STU	1; Standard and HO T5s and T8s	120-277	Up to 1325	UL Listed, cUL Certified
B94GU	1; 13-42 W (4-pin) compacts	120-277	Up to 750	UL Listed for U.S. & Canada
B94CGU	1; 13-42 W (4-pin) compacts	120-277	Up to 750	UL Listed for U.S. & Canada

## High-Lumen Output

A number of Philips Bodine products could be described as high lumen. One of the most notable is the B30 FEB. The B30 provides up to 3500 lumens initial emergency lighting output.



Model	Lamps Operated	VAC	Lumens	Listings
B30	1 or 2; 17-215 W T8s-T12s, (4-pin) long compacts, 21-54 W (2'-4") standard or high output T5s	120/277	Up to 3500	UL Listed, CSA Certified



## Emergency LED Drivers

The Philips Bodine emergency LED driver line allows LED fixtures to serve as code-compliant emergency lighting sources. The expanding line includes drivers designed for a variety of applications: indoor, outdoor, damp, cold temperatures, steplights, downlights, security lighting, Class 1 and Class 2 installations, arrays, light engines and LED strips.



Model	VAC	Output (VDC)	Typical LEDs in an Array	Output (mA)	Max. Output Power (W)**	Listings
<b>BSL17</b> (no conduit) <b>BSL17C</b> (conduit)	120/277	30 - 80	10 to 22	100 to 200	7	UL Recognized, CSA Certified for factory installation only
<b>BSL17-C2</b> (no conduit) <b>BSL17C-C2</b> (conduit)	120/277	30 - 50	10 to 16	100 to 270	7	UL Recognized, CSA Certified for factory installation only
<b>BSL26</b> (no conduit) <b>BSL26C</b> (conduit)	120/277	3 - 30	7 to 11	120 to 265	5.1	UL Recognized, CSA Certified for factory installation only
<b>BSL722</b> (no conduit) <b>BSL722 Cold</b> (no conduit)	120/277	28 - 33	8 to 10	700	23.1	UL Recognized, CSA Certified for factory installation only
<b>BSL310-CAN</b> (polycarbonate case) <b>BSL310M-CAN</b> (metal case, no conduit) <b>BSL310C-CAN</b> (metal case, conduit)	120/277	10 - 50	8 to 11	300 to 400	10	UL Recognized for the U.S. & Canada (factory installation only)

## HID Backup Ballasts

The Philips Bodine ARC Keeper family allows metal halide fixtures to serve as emergency lighting. Additionally, they prevent the nuisance downtime that often accompanies HID lighting because of its sensitivity to AC utility power interruptions. An interruption of four milliseconds or more can extinguish the lamp arc and create a need for restrike. ARC Keeper HID Backup Ballasts for metal halide lamps and the e-ARC Keeper for 20-39W electronic HID ballasts detect the interruption before it can threaten the arc and immediately begin providing supplemental power. They support the arc long enough for a minor disturbance to pass or for an auxiliary generator system to engage.



- **AK400PLS, AK400PLS-208V, AK400PLS-240V** (UL Listed, CSA Certified)
- **AK175PLS, AK175PLS-208V, AK175PLS-240V** (UL Listed, CSA Certified)
- **eAK39-120V, eAK39-277V** (UL Listed, CSA Certified)

## Generator-Compatible

The Philips Bodine GTD20A and BLCD-20B work in conjunction with a generator or central inverter system to allow emergency lighting operation regardless of local switch position (on/off). This means emergency lighting is no longer dependent upon expensive night lighting circuitry. Users can switch off normal lighting at the end of the day or whenever it's not needed without jeopardizing emergency lighting operation. These energy-saving devices sense the loss of normal power and, in response, shift the lighting load to a generator- or inverter-fed circuit.



120/277 VAC

120-277 VAC

- **GTD20A Lighting Relay Control Device** (UL Listed for U.S. and Canada)
- **BLCD-20B Emergency Lighting Control Unit** (UL, cUL Listed)

## Micro Inverter

The Philips Bodine ELI-S-20 emergency lighting micro inverter transforms LED and fluorescent fixtures up to 25W into emergency lighting sources. It is ideal for – though not limited to – Edison-base (screw-base) lamps. The ELI-S-20 supports 100% of the AC rated output throughout its 90-minute runtime so that fixtures operate at full brightness in emergency mode. The micro inverter features an LED-friendly sinusoidal (sine) waveform output. Sine waveforms are characterized by low harmonic



120/277 VAC

distortion and by clean power similar to that produced by utility-supplied electricity, making ELI-S-20 well suited for even the most sensitive LED. The ELI-S-20 (20W or 25W backup micro inverter) is UL Listed and CSA Certified for factory or field installation.

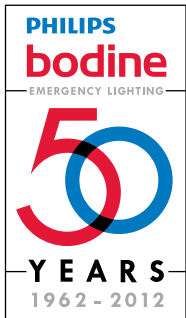
- **ELI-S-20 Emergency Lighting Micro Inverter** (UL Listed, CSA Certified)



## Canadian Product Summary

Model	Type of Lamps Operated	VAC	Max Lumens	Listing/Feature
B100-CAN	One 17-40W (2'-4') T8, T10 or T12; or (4-pin) compact	120/347	Up to 450	CSA Certified Convenient code compliance
B90-CAN	One 17-40W (2'-4') T8, T10 or T12; or (4-pin) compact	120/347	Up to 600	cUL Listed, CSA Certified One-lamp emergency illumination
B70A-CAN	One 17-215W (2'-8') T8, T10 or T12; or (4-pin) compact	120/347	Up to 700	cUL Listed, CSA Certified Two-hour emergency illumination with one 17-32 W T8 or one 20-40W T10 or T12
B50-CAN	One 17-215W (2'-8') or two 17-40 W (2'-4') T8, T10 or T12 lamps	120/347	Up to 1400	cUL Listed, CSA Certified Specification grade
BHD650-CAN	One 17-215W (2'-8') or two 17-40W (2'-4') T8, T10 or T12 lamps; (4-pin) compacts	120/347	Up to 700	CSA Certified For hazardous location fixtures
B30	One 17-215 W (2'-8') or two 17-40 W (2'-4') T8, T9, T10 or T12 lamps; one 18-55 W or two 18-39 W (4-pin) long compacts; one 21-54 W (2'-4') standard or high output T5; or one or two 18-42 W (4-pin) twin, quad or triple twin-tube compact lamps	120/277	Up to 3500	UL Listed, CSA Certified Full lumen output
B30RCT	One 17-215 W (2'-8') or two 17-40 W (2'-4') T8, T9, T10 or T12 lamps; one 18-55 W or two 18-39 W (4-pin) long compacts; one 21-54 W (2'-4') standard or high output T5; or one or two 18-42 W (4-pin) twin, quad or triple twin-tube compact lamps	120/277	Up to 3500	UL Listed, CSA Certified Remote control testing
B30ST	One 17-215 W (2'-8') or two 17-40 W (2'-4') T8, T9, T10 or T12 lamps; one 18-55 W or two 18-39 W (4-pin) long compacts; one 21-54 W (2'-4') standard or high output T5; or one or two 18-42 W (4-pin) twin, quad or triple twin-tube compact lamps	120/277	Up to 3500	UL Listed, CSA Certified Automatic self-testing
B50	One 17-215 W (2'-8') or two 17-40 W (2'-4') T8, T9, T10 or T12 lamps; or one 18-55 W or two 18-39 W (4-pin) long compacts	120/277	Up to 1400	UL Listed for U.S. & Canada Universal input
B50Cold-Pak	One 17-215 W (2'-8') or two 17-40 W (2'-4') T8, T9, T10 or T12 lamps; or one 18-55 W or two 18-39 W (4-pin) long compacts	120/277	Up to 1200	UL Listed, CSA Certified Extreme temperatures
B50ST	One 17-215 W (2'-8') or two 17-40 W (2'-4') T8, T9, T10 or T12 lamps; or one 18-55 W or two 18-39 W (4-pin) long compacts	120/277	Up to 1400	UL Listed for U.S. & Canada Automatic self-testing
B4CF1 Cold-Pak	One 13-42 W (4-pin) twin, quad or triple twin-tube; one 22-40 W T5 circline; or one 18-39 W long compact	120/277	Up to 1250	UL Listed, CSA Certified Extreme temperatures; No conduit
B4CF2 Cold-Pak	One 13-42 W (4-pin) twin, quad or triple twin-tube; one 22-40 W T5 circline; or one 18-39 W long compact	120/277	Up to 1250	UL Listed, CSA Certified Extreme temperatures; Conduit
B4CF3 Cold-Pak	One 13-42 W (4-pin) twin, quad or triple twin-tube; one 22-40 W T5 circline; or one 18-39 W long compact	120/277	Up to 1250	UL Listed, CSA Certified Extreme temps; Alternate case size
LP600STU	One 14-54 W (2'-4') standard or high output T5; 17-55 W (2'-5') T8; 36-55 W (4-pin) long compact; or 22-55 W T5 circline	120/277	Up to 1325	UL Listed, cUL Certified Automatic self-test; Universal input; Low-profile
LP600	One 14-54 W (2'-4') standard or high output T5; 17-55 W (2'-5') T8; 36-55 W (4-pin) long compact; or 22-55 W T5 circline	120/277	Up to 1325	UL Listed, CSA Certified Damp locations; Low-profile
B4CFG	One 13-42 W (4-pin) twin, quad or triple twin-tube; one 22-40 W T5 circline; or one 18-39 W long compact	120/277	Up to 1250	UL Listed, CSA Certified Low-mercury (green) lamps
B94GU	One 13-42 W (4-pin) twin, quad or triple twin-tube	120/277	Up to 750	UL Listed for U.S. & Canada Low-mercury (green) lamps; Universal input
B94CGU	One 13-42 W (4-pin) twin, quad or triple twin-tube	120/277	Up to 750	UL Listed for U.S. & Canada Low-mercury (green) lamps; Universal input





## Philips Emergency Lighting Celebrates 50 Years (1962 - 2012)

Philips Emergency Lighting turned 50 in 2012. What began in 1962 as a small family-owned company in western Tennessee is now a global leader in emergency lighting solutions for commercial, industrial and institutional applications. The company provides Philips Bodine brand products to the market and specializes in a broad range of fluorescent, LED, HID, inverter, incandescent and generator-compatible emergency lighting technologies. For more information on award-winning Philips Bodine product lines, please visit [www.bodine.com/Canada](http://www.bodine.com/Canada) or call toll free 800-223-5728. We at Philips Emergency Lighting thank you for your support during the last half-century, and we look forward to the next 50 years.

*Philips Emergency Lighting is a division of Philips Electronics North America Corporation.*

## Disclaimer

The Canadian product catalog is a summary publication designed to provide a brief overview of emergency lighting and the Philips Bodine Canadian product line. It does not contain the detailed information you need for product purchase or specification. It is necessary for you to consult product specification and instruction sheets or call the factory before buying or specifying. The Canadian product catalog is current as of the publication date (November 2012), and Philips Emergency Lighting has taken reasonable steps to ensure accuracy. However, changes to products and technology are expected and ongoing and may affect the accuracy of catalog content. In addition, content is not comprehensive and inadvertent errors may occur. Philips Emergency Lighting is not liable for any loss or damage arising from use of the Canadian product catalog. Please consult the Philips Emergency Lighting Sales or Technical Support departments if you have questions about Philips Bodine products, product applications or catalog content.



© 2012 Philips Emergency Lighting  
All rights reserved.

Document order number: L5000016 12.12