



## ELECTRONIC FLUORESCENT

### PRODUCT OVERVIEW :

Advance announces the introduction of a new option within its popular line of Centium® electronic ballasts for 4-lamp T5/HO lamp applications. Previously only available in a 22-inch housing, Advance's 4-Lamp T5/HO ballast is now also offered in a new, more compact 16.7-inch version that has been additionally outfitted with integral leads. Both of these enhancements will offer end users added convenience and heightened design flexibility.

A versatile and efficient product, Advance's Centium electronic ballast for 4-lamp T5/HO operation is ideal in such applications as high bay fixtures. As with the previous model, the new ballast features Advance's exclusive IntelliVolt® multiple-voltage technology, enabling its operation at any input voltage from 120 to 277 volts, 50/60Hz, as well as programmed start ignition, which insures optimum lamp life in frequent switching applications. The ballast also features a 90°C case temperature rating, total harmonic distortion less than 10%, and a hi-low switching option to drive increased energy savings.

# Centium®

for T5/HO Lamps



*Programmed Start Ballasts with Leads and Hi-Low Switching Option, plus IntelliVolt®*

### DESIGN HIGHLIGHTS:

- IntelliVolt® technology (120-277V, 50/60Hz)
  - Ensures shipment of correct voltage ballast or fixture for each application
  - Reduces SKU's required in inventory
- Programmed Start lamp ignition
  - Provides extended lamp life in frequent switching applications
- 0°F starting capability
  - Suitable for cold temperature applications
- <10% THD (>0.99 PF)
  - Meets most demanding power quality requirements
  - Perfect for applications where harmonics are a concern
- Low profile housing
  - Only 1.18" high ballast provides flexibility in fixture designs
- Auto-restrike capability
  - Eliminates the need to reset power mains after failed lamps are replaced
- Lamp EOL protection circuit
  - Safely removes power from the lamp at end-of-life
- Semi-independent lamp operation
  - Ensures that partial light from a fixture remains when a lamp burns out
- UL Type CC rated
  - Anti-arcing circuitry
- 20ft. remote mounting / tandem wiring capability
  - Provides maximum application flexibility
- Microprocessor technology
  - Provides optimal operation of lamps

### APPLICATIONS:

- General Lighting**
- Cove Lighting**
- Decorative Lighting**
- Indirect Lighting**

### Section I - Physical Characteristics

- 1.1 The electronic ballast shall be physically interchangeable with standard electromagnetic and standard electronic ballasts.
- 1.2 The electronic ballast shall have a maximum height of 1.18 in. and maximum weight of 1.8 lbs.
- 1.3 The electronic ballast shall be furnished with integral leads, color-coded to ANSI C82.11.

### Section II - Performance Requirements

- 2.1 Ballast shall be Programmed Start.
- 2.2 Ballast shall contain auto restart circuitry in order to restart lamps without resetting power.
- 2.3 Ballast shall operate from 50/60 Hz input source of 120 through 277V with sustained variations of +/- 10% (voltage and frequency with no damage to the ballast).
- 2.4 Ballast shall be high frequency electronic type and operate at a frequency above 42 kHz to minimize interference with infrared control systems and eliminate visible flicker.
- 2.5 Ballast shall have a Power Factor greater than 0.98 for primary lamp.
- 2.6 Ballast shall have a minimum ballast factor 1.00 for primary lamp.
- 2.7 Ballast shall provide for a Lamp Current Crest Factor of 1.7 or less in accordance with lamp manufacturer recommendations.
- 2.8 Ballast input current shall have Total Harmonic Distortion (THD) of less than 10% when operated at nominal line voltage with primary lamp.
- 2.9 Ballast shall have a Class A sound rating.
- 2.10 Ballast shall have a minimum starting temperature of -18°C (0°F) for primary lamp.
- 2.11 Ballast shall provide Lamp EOL Protection Circuit.
- 2.12 Ballast shall tolerate sustained open circuit and short circuit output conditions without damage.
- 2.13 Ballast shall have a hi-low switching option when operating (4) F54T5/HO lamps to allow switching from 4-2 lamps, 3-2 lamps, or 3-1 lamp.

### Section III - Regulatory Requirements

- 3.1 Ballast shall not contain any Polychlorinated Biphenyl (PCB).
- 3.2 Ballast shall be Underwriters Laboratories (UL) listed, Class P, and Type 1 Outdoor; and Canadian Standards Association (CSA) certified, where applicable.
- 3.3 Ballast shall comply with ANSI C62.41 Category A for Transient protection.
- 3.4 Ballast shall comply with ANSI C82.11, where applicable.
- 3.5 Ballast shall comply with the requirements of the Federal Communications Commission (FCC) rules and regulations, Title 47 CFR part 18, Non-Consumer (Class A) for EMI/RFI (conducted and radiated).

### Section IV - Other

- 4.1 The electronic ballast shall be produced in a factory certified to ISO 9002 Quality System Standards.
- 4.2 The electronic ballast shall carry a five-year warranty from the date of manufacture against defects in material or workmanship, including replacement for operation at a maximum case temperature of 70°C. Ballasts with a 90°C designation in their catalog number shall also carry a three-year warranty at a maximum case temperature of 90°C.
- 4.3 The manufacturer shall have a fifteen-year history of producing electronic ballasts for the North American market.

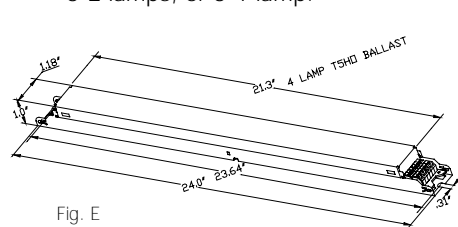


Fig. E

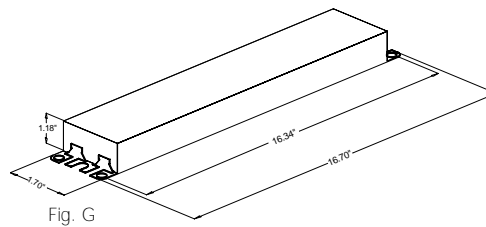
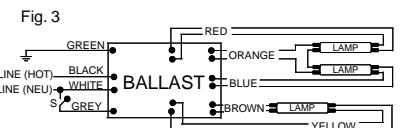
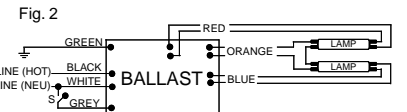
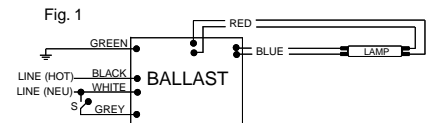
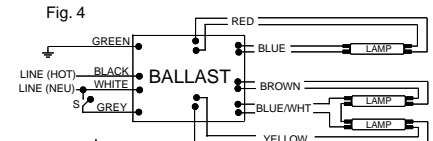


Fig. G

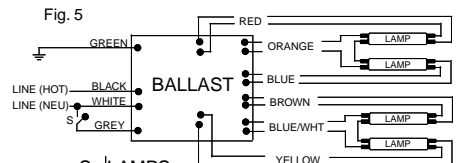
Lamp Data		Min. Start Temp. (F/C)	Input Volts	Catalog Number	Certifications	Line Current (Amps)	Input Power ANSI (Watts)	Ballast Factor	Max. THD %	Power Factor %	Dim.	Wiring Diagram
No.	Watts											
F54T5/HO												
1	54	0/-18	120	ICN-4S54-90C-2LS	UL SF	0.52	62	0.99	15	0.98	E	1
			230	ICN-4S54-90C-2LS-G		0.29						
			277			0.24						
2	54	0/-18	120	ICN-4S54-90C-2LS	UL SF	0.99	118	0.99	10	0.98	E	2
			230	ICN-4S54-90C-2LS-G		0.52						
			277			0.43						
3	54	0/-18	120	ICN-4S54-90C-2LS	UL SF	1.52	182	1.00	10	0.98	E	3 & 4
			230	ICN-4S54-90C-2LS-G		0.79						
			277			0.66						
4	54	0/-18	120	ICN-4S54-90C-2LS	UL SF	2.00	240	1.00	10	0.98	E	5
			230	ICN-4S54-90C-2LS-G		1.03						
			277			0.86						



S | LAMPS  
ON | 3 LAMPS ON  
OFF | 2 LAMPS ON



S | LAMPS  
ON | 3 LAMPS ON  
OFF | 1 LAMPS ON



S | LAMPS  
ON | 4 LAMPS ON  
OFF | 2 LAMPS ON