

# **60W Single Channel Constant Voltage Output**

## **LEA105**





- Designed for LED lighting applications
- Universal AC input (100~277Vac)
- Built-in active PFC provide PF>0.90 over entire input range
- Turn on time < 1 second with soft start</p>
- Aluminum case cooled by air convection
- Protections: Short circuit, Over voltage, Over Current, Over temperature
- IP67 / IP65 design for indoor or outdoor environment
- Suitable for dry, damp, wet location
- Compliance with worldwide safety regulations for lighting
- Dimmable output with flexible architecture
  - Standard DC0/1-10V control interface (2 wire dimming input, External dimming control signal to control the PWM dimming range from 0%-100%)
  - ♦ PWM Dimming (2-wire dimming input)
  - Supports majority of available dimming solutions
- 5year warranty



#### **Orderable Part Numbers**

### Article Number: 652105

Part Numbers	Constant Voltage output(DC,V)	Max. Output Current(A)	Load Reg.*	Max. Effic.	Max. Output Power(W)
LEA105A	12	5.0	±5%	>88%	60.8
LEA105B	24	2.5	±5%	>90%	60.3

#### **Technical Data**

Series	LEA105			
	DC Voltage Range	12 ~ 24Vdc (see orderable parts table for details)		
	Rated Current Range	2.5A ~ 5.0A (see orderable parts table for details)		
Output	Rated Power	up to 60.8W		
	Load Regulation*	±5%		
	Turn On Time	< 1s at full load		
	Voltage Range	90 ~ 305Vac		
	Frequency Range	47 ~ 63Hz		
	Power Factor (Typ.@277VAC)	PF≧ 90% at full load		
Innet	Efficiency (Typ. @277VAC)	≥ 88% at full load(see orderable parts table for details)		
Input	AC Current	0.65A @ 115Vac and 0.36A @ 230Vac		
	Inrush Current (Typ.)	≤ 65A @ 230Vac cold start with full load		
	LEAkage Current	≤ 0.75mA @ 277Vac		
	THD (Total Harmonic Dist.)	< 25%		
	Modes	Standard DC0/1-10V control interface, Sink or Source<1mA		
Dimming		PWM Dimming Control		
		Wide dimming range from 0% up to 100%  Dimming over entire input voltage range		
	Short Circuit	Hiccup mode protection. Recovers automatically after fault condition is		
Protection	Short Shoult	removed		
	Over Voltage	< 30% above the maximum output voltage listed for the specific part number		
		Latch mode – unit needs to be power cycled to recover		
	Over Current	< 10% above the maximum output current listed for the specific part number the unit limits the current. Unit auto recovers after fault is removed		
	Over Temperature	Unit turns off when Tc > 90°C. Shuts down – unit needs to be power cycled to recover		

# **LEA Series** Dimming LED Power Supply



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Environment	Working Temperature	-30°C ~ + 70°C at Full Load			
	Working Humidity	20% ~ 90% RH non-condensing			
	Storage Temperature	-40°C ~ + 80°C			
	Storage Humidity	10% ~ 90% RH non-condensing			
	Vibration	10 ~ 500Hz, 2G 10min/1 cycle period for 60 minutes along each axis (X, Y,			
		Z)			
	Safety Standards	UL8750, UL1310,UL1012,UL879,UL60950-1,CSA C22.2 No. 250.0-08			
		(except for 15V-54V, ), EN61347-1, EN61347-2-13 independent, IP67			
		approved; TUV EN60950-1 Compliant			
Safety & EMC	EMI Conduction & Radiation	Compliance to EN55015 Class A, FCC 47CFR Part 15 Class			
	Harmonic Current	Compliance to EN61000-3-2 Class C			
	EMS Immunity	Compliance to EN61000-4-2,3,4,5,6,8,11; EN61547, Light Industry Level			
		(surge 4KV), criteria A			
Lifetime	> 50,000 hours				
	All parameters NOT specially mentioned are measured at 230VAC input, rated load and 25 of ambient				
	temperature.				
	2. Ripple & noise are measured at 20MHz of bandwidth by using a 12" twisted pair-wire terminated with a 0.1uf				
	& 47uf parallel capacitor.				
	3. Tolerance : includes set up tolerance, line regulation and load regulation.				
	4. Constant current operation region is within 50% ~100% rated output voltage. This is the suitable operation				
	region for LED related applications, but pLEAse reconfirm special electrical requirements for some specific				
Note	system design.  5. Derating may be needed under low input voltages. PLEAse check the for more details.				
	Safety and EMC design refer to EN60598-1, subject CNS15233, GB7000.1, FCC part18.				
	7. LEAgth of set up time is measured at cold first start. Turning ON/OFF the power supply may LEAd to increase				
	of the set up time.				
	The power supply is considered as a component that will be operated in combination with final equipment.				
	Since EMC performance will be affected by the complete installation, the final equipment manufacturers must				
	re-qualify EMC Directive on the complete installation again. static characteristics				
	Refer to warranty statement.				

Dimensions Unit:mm

