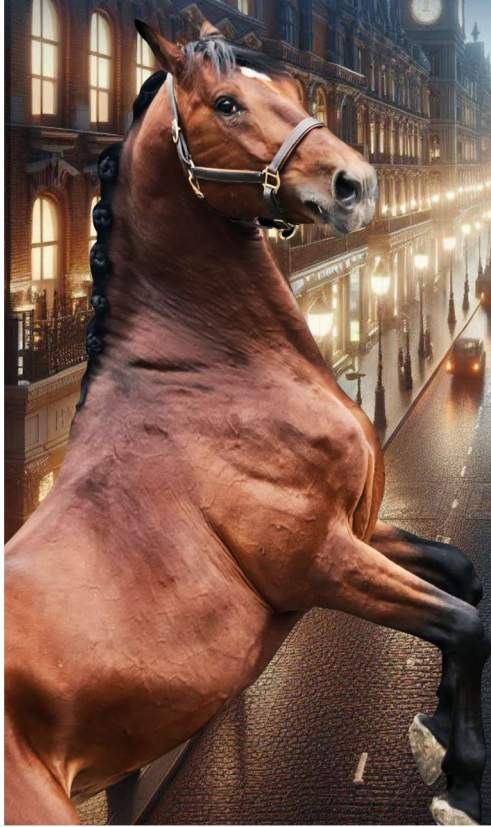


FULHAM PRESENTS THE 2025

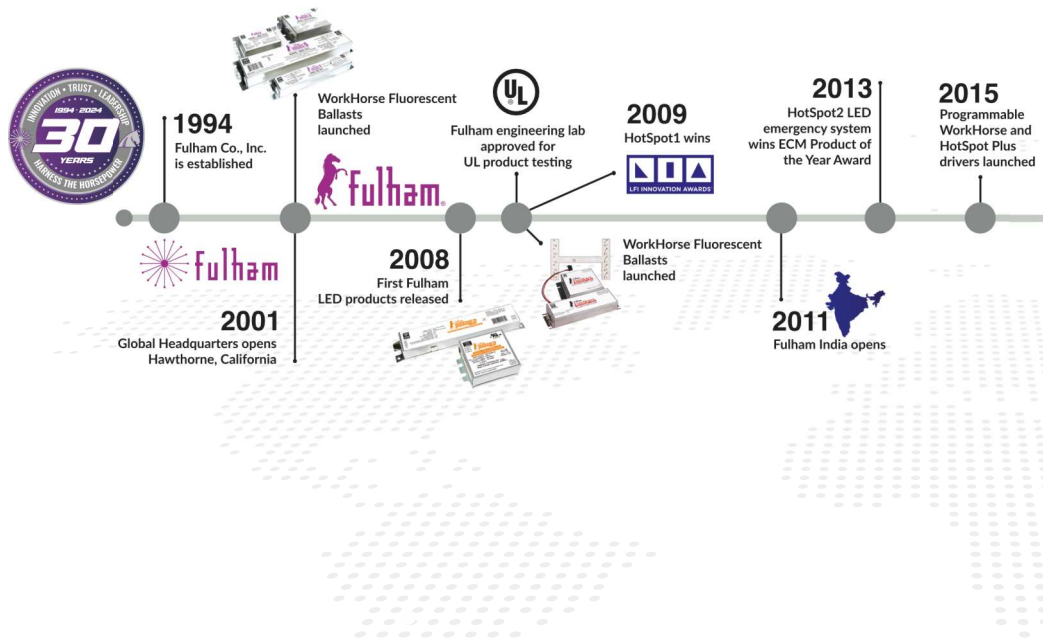
EUROPEAN CATALOGUE

A RESOURCE FOR PAST & PRESENT LIGHTING INNOVATIONS & SOLUTIONS



FULHAM
Harness the Horsepower

Celebrating 30+ Years of working with our customers to deliver innovative lighting solutions. Thank You for your support!



LED DRIVERS

Lumo Series LED Drivers	4-5
WorkHorse DALI-2 NFC LED Drivers	6-7
WorkHorse DALI-2 DIP Switch LED Drivers	8
WorkHorse DALI-2 Constant Voltage LED Drivers	9
WorkHorse DALI-2 Outdoor IP67 CC, CV LED Drivers	10
WorkHorse 48V In-Track DC-DC	10,11
SugarCube Indoor Triac / Phase-cut Dimmable LED Drivers	12
WorkHorse In-Track LED Driver Adaptor	12
PONY Indoor 48V Magnetic Track Constant Voltage LED Driver Adaptor	13
PONY Indoor Linear Constant Voltage LED Drivers	13
WorkHorse LED Programmable LED Drivers	14

LIGHT SOURCES

Vizion Linear Low Profile High Output DC LED Modules	15-16
Vizion Linear ECO Series DC LED Modules	17
Signage LED Modules	18
Flexible LED Modules	19

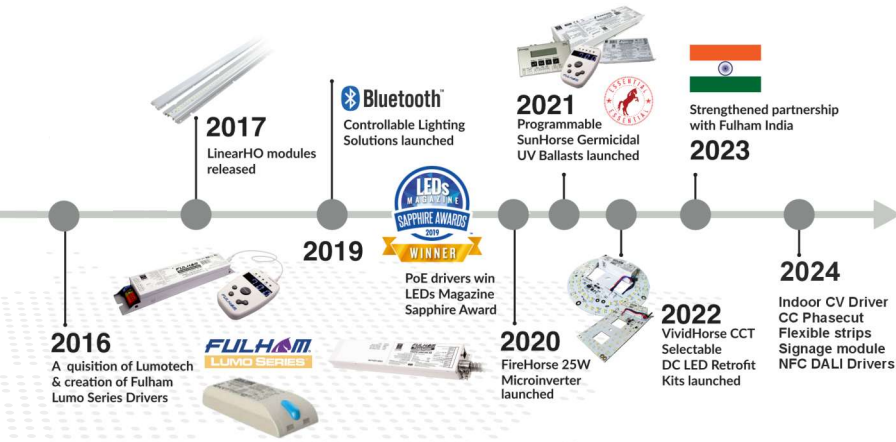


Table of Contents

CONTROLS

EliteControl SIG Qualifies	20	Warranty Information	27
Bluetooth® Mesh Lighting Control System	21	Contact Information	Back Cover

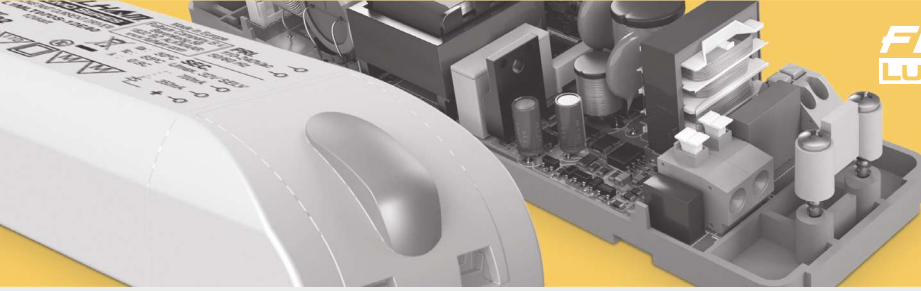
EMERGENCY

HotSpot Plus LED Driver & Emergency System	22	Note:	
HotSpot Constant Power Programable LED Emergency Driver	23	Bluetooth, the Apple logo, EnOcean, IES, EC&M and all other third-party mentions and marks are the property of their respective owners.	
HotSpot2 LED Emergency System	24		

UV BALLASTS

SunHorse UV Ballast	25		
---------------------	----	--	--

Visit www.fulham.com for additional products not shown here, including fluorescent ballasts for UV and general lighting, DC LED light engines, and products for international markets.



Reaching New Heights in Engineering Excellence

Fulham Lumo Series drivers are built on core engineering design principles for exceptional standards of performance and reliability in LED systems. Highest grade critical components together with design features for thermal management ensure excellent reliability. Low ripple designs create flicker-free lighting and perfectly smooth dimming. Simplicity of specification and installation is a key characteristic of all Fulham Lumo Series drivers, hence the wide voltage and current ranges and industry leading low inrush current.

Engineered for Performance

- Industry leading efficiency
- Multiple dimming options and output currents
- Very high power factor

Engineered for Reliability

- Low inrush current
- Thermal, overload, short circuit and overvoltage protection
- Flicker-free light

Engineered for Simplicity

- Future-proof flexibility – industry leading voltage and current range enabling seamless support of LED generations and minimizing supply chain complexity

Constant Voltage Output



L 100 x W 52 x H 24 (mm)

Model Number	Alternate Reference	Max Watts (W)	Max Current (mA)	Output Current Selection Method	Output Voltage (Vdc)	Input Voltage (Vac)	Dimming Type
L1W1MID120D-20E	L05011i2	20	1200	Dipswitch	6 - 42 options	220 - 240 (50/60 Hz)	1-10V/pulse

Non-Dimming Multiple Output, Constant Current



L 99 x W 39 x H 23 (mm)

Model Number	Alternate Reference	Max Watts (W)	Output Current (mA)	Output Current Selection Method	Output Voltage (Vdc)	Input Voltage (Vac)
L1MLT020S-10E48	L05020-1248200	12	150/200	Output wires	20 - 48	115 - 240 (50/60 Hz)
L1MLT070S-12E40	L05020-1240700	12	350/700	Output wires	20 - 40	115 - 240 (50/60 Hz)

Dimming Multiple Output, Constant Current



L 99 x W 39 x H 23 (mm)

Model Number	Alternate Reference	Max Watts (W)	Output Current (mA)	Output Current Selection Method	Output Voltage (Vdc)	Input Voltage (Vac)	Dimming Type
L1E1230025S-10E	L05021-40250	10	200/250	Output wires	20 - 40	220 - 240 (50/60 Hz)	Mains Dimming
L1E1230070S-12E	L05021	12	350/700	Output wires	3 - 32	220 - 240 (50/60 Hz)	Mains Dimming
L1E1230030S-12E	L05021-40300	12	180/300	Output wires	20 - 40	220 - 240 (50/60 Hz)	Mains Dimming



L 110 x W 52 x H 24 (mm)

Model Number	Alternate Reference	Max Watts (W)	Output Current (mA)	Output Current Selection Method	Output Voltage (Vdc)	Input Voltage (Vac)	Dimming Type
L1V1230105S-25E	L05023-A	25	100 - 1050	Dipswitch/ TPSB-100EU	3 - 43	220 - 240 (50/60 Hz)	Mains Dimming
L1M1MID120S-24E	L05011i3	20	100 - 1200	Dipswitch	6 - 42	180 - 240 (50/60 Hz)	1-10V/Pot
		24	600 - 900				
L1W1MID140S-30E	L05031	30	100 - 1400	Dipswitch	6 - 42	180 - 240 (50/60 Hz)	1-10V/Pulse/Pot



TPSB-100EU
SmartSet Controller



SmartSet
Software

WorkHorse DALI-2 NFC Programmable C.C. Drivers

FEATURES:

- ✓ DALI-2 Constant Current LED Drivers.
- ✓ NFC Programmable, DT6 & DT8
- ✓ CLO, DALI Part 251, 252, 253.
- ✓ Flicker Free, 0.1-100% Dimming
- ✓ Round, Compact & Linear Form Factor
- ✓ O/P Current selection through NFC Prog.
- ✓ Power factor > 0.95, A-THD < 10%
- ✓ MADE IN INDIA

Sleek Form Factor

	ROUND MODEL	WATTAGE (W)	VOLTAGE (V)	CURRENT (mA)	DIMENSIONS (L x W x H mm)
DT6	T1A1240070P-07EE	7	2-20V	350 - 700	121x22.7x21
	T1A1240045P-10EE	10	3-42V	100-450	121x22.7x21
DT8	T1A2240070P-07EE	7	2-20V	350 - 700	121x22.7x21
	T1A2240045P-10EE	10	3-42V	100-450	121x22.7x21



Round Form Factor

	ROUND MODEL	WATTAGE (W)	VOLTAGE (V)	CURRENT (mA)	DIMENSIONS (Dia. x H mm)
DT6	T1A1240050P-10DE	10	3-42V	100 - 500	Ø57x24
	T1A1240070P-15DE	15	3-42V	200 - 700	Ø57x24
	T1A1240085P-25DE	25	3-42V	300 - 850	Ø65x30
	T1A1240120P-36DE	36	3-42V	600 - 1200	Ø72x30
DT8	T1A2240050P-10DE	10	3-42V	100 - 500	Ø57x24
	T1A2240070P-15DE	15	3-42V	200 - 700	Ø57x24
	T1A2240085P-25DE	25	3-42V	300 - 850	Ø65x30
	T1A2240120P-36DE	36	3-42V	600 - 1200	Ø72x30



Compact Form Factor

	COMPACT MODEL	WATTAGE (W)	VOLTAGE (V)	CURRENT (mA)	DIMENSIONS (L x W x H mm)
DT6	T1A1240050P-10FE	10	3-42	100-500	101x36x25
	T1A1240070P-15FE	15	3-42	100-700	135x35x20
	T1A1240070P-25FE	25	6-54	250-700	120x41x28
	T1A1240105P-36FE	36	6-54	350-1050	145x45x28
	T1A1240140P-45FE	45	6-54	500-1400	145x45x28
DT8	T1A2240050P-10FE	10	3-42	100-500	101x36x25
	T1A2240070P-15FE	15	3-42	100-700	135x35x20
	T1A2240070P-25FE	25	6-54	250-700	120x41x28
	T1A2240105P-36FE	36	6-54	350-1050	145x45x28
	T1A2240140P-45FE	45	6-54	500-1400	145x45x28



WorkHorse DALI-2 NFC Programmable C.C. Drivers

FEATURES:

- ✓ DALI-2 Constant Current LED Drivers.
- ✓ NFC Programmable, DT6 & DT8
- ✓ CLO, DALI Part 251, 252, 253.
- ✓ Flicker Free, 0.1-100% Dimming
- ✓ Round, Compact & Linear Form Factor
- ✓ O/P Current selection through NFC Prog.
- ✓ Power factor > 0.95, A-THD < 10%
- ✓ MADE IN INDIA



	LINEAR MODEL	WATTAGE (W)	VOLTAGE (V)	CURRENT (mA)	DIMENSIONS (L x W x H mm)
DT6	T1A1240085P-30EE	30	10-54	250-850	243x30x21
	T1A1240105P-40EE	40	10-54	500-1050	243x30x21
	T1A1240130P-50EE	50	10-54	650-1300	284x30x21
	T1A1240170P-60EE	60	10-54	900-1700	355x30x21
	T1A1240200P-80EE	80	10-54	1000-2000	355x30x21
DT8	T1A2240085P-30EE	30	10-54	250-850	243x30x21
	T1A2240105P-40EE	40	10-54	500-1050	243x30x21
	T1A2240130P-50EE	50	10-54	650-1300	284x30x21
	T1A2240170P-60EE	60	10-54	900-1700	355x30x21
	T1A2240200P-80EE	80	10-54	1000-2000	355x30x21

WorkHorse DALI-2 D4i NFC Programmable C.C. Drivers

FEATURES:

- ✓ DALI-2 D4i Constant Current LED Drivers.
- ✓ NFC Programmable, DT6 & DT8
- ✓ CLO, DALI Part 250, 251, 252, 253.
- ✓ Flicker Free, 0.1-100% Dimming
- ✓ Round, Compact & Linear Form Factor
- ✓ O/P Current selection through NFC Prog.
- ✓ Power factor > 0.95, A-THD < 10%
- ✓ MADE IN INDIA



	LINEAR MODEL	WATTAGE (W)	VOLTAGE (V)	CURRENT (mA)	DIMENSIONS (L x W x H mm)
DT6	T1A1240085P-30EE	30	10-54	250-850	243x30x21
	T1A1240105P-40EE	40	10-54	500-1050	243x30x21
	T1A1240130P-50EE	50	10-54	650-1300	284x30x21
	T1A1240170P-60EE	60	10-54	900-1700	355x30x21
	T1A1240200P-80EE	80	10-54	1000-2000	355x30x21
DT8	T1A2240085P-30EE	30	10-54	250-850	243x30x21
	T1A2240105P-40EE	40	10-54	500-1050	243x30x21
	T1A2240130P-50EE	50	10-54	650-1300	284x30x21
	T1A2240170P-60EE	60	10-54	900-1700	355x30x21
	T1A2240200P-80EE	80	10-54	1000-2000	355x30x21

WorkHorse DALI-2 DIP Switch C.C. Drivers

FEATURES:

- ✓ DALI-2 Constant current LED Drivers.
- ✓ O/P Current selection Through DIP Switch.
- ✓ Flicker Free, 1-100% Dimming.
- ✓ Compact & Linear Form Factor.
- ✓ Power factor > 0.95, A-THD < 10%

	MODEL	WATTAGE (W)	VOLTAGE (V)	CURRENT (mA)	Dimensions (L x W x H mm)
DT6	T1A1240035S-10EE	10.5	12-42	100-350	130x29x20
	T1A1240070S-10EE	10	6-27	350-700	130x29x20
	T1A1240035S-10FE	10	6-42	100-350	117x46x24
	T1A1240045S-18FE	18	3-42	300-450	131.5x44x30
	T1A1240060S-22FE	22	6-42	225-600	117x46x29
	T1A1240075S-28FE	28	6-42	300-750	117x46x29
	T1A1240110N-42FE	42	6-42	450-1100	103x69x31
	T1A1240200S-60FE	60	6-42	800-2000	123.5x79.5x31
DT8	T1A2240035S-10EE	10	12-42	100-350	111x35x20
	T1A2240035S-10FE	10	12-54	100-350	117x46x24
	T1A2240045S-22FE	22	12-54	150-450	117x46x29
	T1A2240080S-30FE	30	12-54	350-800	117x46x29
	T1A2240105S-42FE	42	12-42	600-1050	173x75x30
	T1A2240150S-60FE	60	12-42	1050-1500	191x75x30



	MODEL	WATTAGE (W)	VOLTAGE (V)	CURRENT (mA)	Dimensions (L x W x H mm)
DT6 ISOLATED SELV	T1A1240075S-30EE	30	3-42	300-750	245x30x21
	T1A1240100S-40EE	40	3-42	550-1000	285x30x21
	T1A1240125S-50EE	50	3-42	800-1250	285x30x21
	T1A1240075S-40EE	40	3-54	300-750	285x30x21
	T1A1240100S-50EE	50	3-54	550-1000	285x30x21
	T1A1240165S-60EE	60	12-42	900-1650	355x30x21
	T1A1240150S-70EE	70	3-54	1050-1500	355x36x23
	T1A1240200S-80EE	80	6-42	1200-2000	355x36x23
DT6 NON-ISOLATED	T1A1240040S-40EE	40	54-240	75-400	265x30x21
	T1A1240045S-60EE	60	54-240	75-450	265x30x21
	T1A1240055S-75EE	75	54-240	100-550	265x30x21
	T1A1240045S-75EE	75	54-200	100-450	265x30x21
	T1A1240080S-100EE	100	54-200	250-800	285x30x21
DT8	T1A2240105S-42EE	42	12-42	600-1050	285x30x21
	T1A2240150S-60EE	60	12-42	1050-1500	355x30x21



WorkHorse DALI-2 CV Drivers (Metal Housing)

FEATURES:

- ✓ Dali 2.0 Constant Voltage LED Drivers.
- ✓ Available in 24v & 48v DT6 & DT8.
- ✓ Flicker Free, 1-100% Dimming.
- ✓ Linear Form Factor
- ✓ Power factor > 0.95, A-THD < 10%



	MODEL	WATTAGE (W)	VOLTAGE (V)	Dimensions (L x W x H mm)
DT6	T1A1240024V-60E	60	24	285x30x21
	T1A1240024V-100E	100	24	355x30x21
	T1A1240024V-150E	150	24	355x36x23
	T1A1240024V-200E	200	24	321.5x48x30
	T1A1240048V-60E	60	48	285x30x21
	T1A1240048V-100E	100	48	355x30x21
	T1A1240048V-150E	150	48	355x36x23
DT8	T1A2240024V-100E	100	24	355x30x21
	T1A2240024V-150E	150	24	355x36x23
	T1A2240024V-200E	200	24	322x48.5x30.5

WorkHorse DALI-2 CV Drivers (PC Housing)

FEATURES:

- ✓ Dali 2.0 Constant Voltage LED Drivers.
- ✓ Available in 24v & 48v DT6 & DT8.
- ✓ Flicker Free, 1-100% Dimming.
- ✓ Linear Form Factor
- ✓ Power factor > 0.95, A-THD < 10%



	MODEL	WATTAGE (W)	VOLTAGE (V)	Dimensions (L x W x H mm)
DT6	T1A1240012V-60EE-G2	60	12	361.5x30x21.3
	T1A1240012V-100EE-G2	100	12	336.5x30x18.2
	T1A1240012V-150EE-G2	150	12	336.5x30x18.2
	T1A1240024V-60EE-G2	200	24	361.5x30x21.3
	T1A1240024V-100EE-G2	60	24	336.5x30x18.2
	T1A1240024V-150EE-G2	100	24	336.5x30x18.2
DT8	T1A2240024V-100EE-G2	100	24	336.5x30x18.2
	T1A2240024V-150EE-G2	150	24	336.5x30x18.2
	T1A2240024V-100EE-G2	200	24	334.8x41.5x27.5
	T1A2240024V-240EE-G2	240	24	334.8x41.5x27.5

WorkHorse + DALI-2 Outdoor IP67 CC Drivers

FEATURES:

- ✓ Dali 2.0 Constant current LED Drivers.
- ✓ Programable O/P Current.
- ✓ Flicker Free, 1-100% Dimming.
- ✓ IP67 Suitable for outdoor application.
- ✓ Power factor > 0.95, A-THD < 10%

	MODEL	WATTAGE (W)	VOLTAGE (V)	CURRENT (mA)	Dimensions (L x W x H mm)
DT6	T1A1240060P-23PE	23	12-42	250-600	137x43.5x34
	T1A1240105P-42PE	42	12-42	500-1050	143x56x34
	T1A1240150P-63PE	63	12-42	900-1650	161x50x34
	T1A1240220P-80PE	80	12-42	1500-2200	160x68x38
	T1A1240400P-152PE	152	12-42	2500-4000	197x68x38



WorkHorse + DALI-2 Outdoor IP67 CV Drivers

FEATURES:

- ✓ Dali 2.0 Constant Voltage LED Drivers.
- ✓ Flicker Free, 1-100% Dimming.
- ✓ IP67 Suitable for outdoor application.
- ✓ Power factor > 0.95, A-THD < 10%

	MODEL	WATTAGE (W)	VOLTAGE (V)	Dimensions (L x W x H mm)
DT6	T1A1240012V-100PES G2	100	12	379.6x37x21.4
	T1A1240012V-150PES G2	150	12	379.6x37x21.4
	T1A1240024V-100PES-G2	100	24	379.6x37x21.4
	T1A1240024V-150PES-G2	150	24	379.6x37x21.4
	T1A1240024V-200PE-G2	200	24	220.6x62.5x38
	T1A124024V-320PE-G2	320	24	261x62.5x41.4

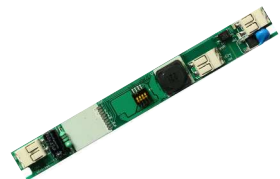


WorkHorse - DALI-2 Dimmable 48V DC-DC Converter

FEATURES:

- ✓ Multiple current selection through DIP Switch
- ✓ 48V input DC-DC
- ⊖ Flicker Free, O/P Ripple < 5%
- ✓ SELV equivalent, CLASS II

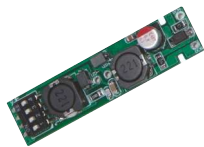
	MODEL	WATTAGE (W)	VOLTAGE (V)	CURRENT (mA)	Dimensions (L x W x H mm)
DALI-2 DIMMABLE	T1A1048080S-30AE-G1 (DT6)	30	12-42	100/150/200/250/ 300/350/ 400/450/ 500/550/600/650/ 700mA	125x14.2x10.5
	T1A2048080S-30AE-G1 (Dt8)	30	12-42	100/150/200/250/ 300/350/ 400/450/ 500/550/600/650/ 700mA	125x14.2x10.5



WorkHorse - Non-Dimmable 48V DC-DC Converter

FEATURES:

- ✓ Multiple current selection through DIP Switch
- ✓ 48V input DC-DC
- ✓ Flicker Free, O/P Ripple < 5%
- ✓ SELV equivalent, CLASS II

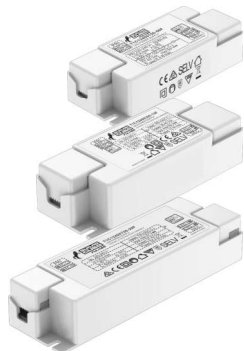


	MODEL	WATTAGE (W)	VOLTAGE (V)	CURRENT (mA)	Dimensions (L x W x H mm)
NON-DIMMABLE	T1048040S-17AE	17	12-42	150/175/200/225/250/300/350/400	58x14x9.4
	T1048080S-30AE	30	12-42	450/500/550/600/650/700/750/800	58x14x9.4

SugarCube Indoor Phase cut CC Compact Drivers

FEATURES:-

- ✓ TRIAC, LEADING & TRAILING EDGE Dimming
- ✓ Compact form factor
- ✓ SELV equivalent
- ✓ O/P overload, O/P Open & short circuit protection
- ✓ CLASS II



	MODEL	WATTAGE (W)	VOLTAGE (V)	CURRENT (mA)	Dimensions (mm)
Compact Phase cut	T1C12400150-06F	6	27-42	150	100x38x25
	T1C12400200-08F	8	27-42	200	100x38x25
	T1C12400300-12F	12	26-40	300	116x42.5x28
	T1C12400350-15F	15	27-42	350	116x42.5x28
	T1C12400700-15F	15	14-22	700	116x42.5x28
	T1C12400300-20F	20	50-68	300	116x42.5x28
	T1C12400500-21F	21	27-42	500	116x42.5x28
	T1C12400700-29F	29	27-42	700	150x45x30

SugarCube Indoor Phase cut CV Compact Drivers

FEATURES:

- ✓ TRIAC, LEADING & TRAILING EDGE Dimming
- ✓ Compact form factor
- ✓ SELV equivalent
- ✓ O/P overload, O/P Open & short circuit protection
- ✓ CLASS II



	MODEL	WATTAGE (W)	VOLTAGE (V)	Dimensions (mm)
Compact Phase cut	T1C1240024V-50FE G2	50	24	177x57.8x21.8
	T1C1240024V-100EE G2	100	24	336.6x30x18.2
	T1C1240024V-150EE G2	150	24	336.6x30x18.2
	T1C1240024V-200FE G2	200	24	215x77.5x35
	T1C1240024V-300FE G2	300	24	215x77.5x35

In-Track 1 Phase 3 Wire Adaptor Driver

- O/P Current selection through DIP Switch
- Flicker Free, O/P Ripple < 5%
- THD < 10%, Power factor > 0.95
- Life 30,000hrs
- Fits on most commonly used rail systems
- Suitable for CLASS II fixtures, SELV equivalent
- O/P Open & short circuit protection.
- O/P overload & O/P to ground short circuit protection
- Available in White and Black colour

CE

Model No.	Current(mA)	Voltage (Vdc)	Wattage (W)
T1240050S-20JE	350 - 500	28-40	20
T1240080S-32JE	500 - 800	28-40	32
T1240105S-42JE	900 - 1050	28-40	42

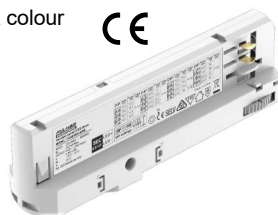


In-Track 3 Phase 4 Wire Adaptor Driver

- O/P Current selection through DIP Switch
- Flicker Free, O/P Ripple < 5%
- THD < 10%, Power factor > 0.95
- Life 50,000hrs
- Fits on most commonly used rail systems
- Suitable for CLASS II fixtures, SELV equivalent
- O/P Open & short circuit protection.
- O/P overload & O/P to ground short circuit protection
- Available in White and Black colour

CE

Model No.	Current(mA)	Voltage (Vdc)	Wattage (W)
T1240105S-42NE	300 - 1050	9-42V	42

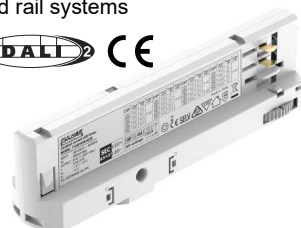


In-Track 3 Phase 6 Wire DALI-2 Adaptor Driver

- DALI-2 DT6 Constant current Driver
- O/P Current selection through DIP Switch
- Flicker Free, O/P Ripple < 5%
- THD < 10%, Power factor > 0.95
- Life 50,000hrs
- Suitable for CLASS II fixtures, SELV equivalent
- O/P Open & short circuit protection.
- O/P overload & O/P to ground short circuit protection
- Available in White and Black colour
- Fits on most commonly used rail systems

Model No.	Current(mA)	Voltage (Vdc)	Wattage (W)
T1A1240105S-42NE	300 - 1050	9-42V	42

DALI CE



PONY - 48v CV Magnetic Track Drivers

FEATURES:

- ✓ 48V IN-Track CV Driver
- ✓ Flicker Free, O/P Ripple < 5%
- ✓ SELV equivalent, CLASS II
- ✓ PF > 0.9, A-THD < 10%
- ✓ Over temperature protection
- ✓ Life 50,000hrs at max Tc.



	MODEL	WATTAGE (W)	VOLTAGE (V)	CURRENT (A)	Dimensions (L x W x H mm)
Flicker Free	T1240048V-100ME	100	48	2.08	325x46.1x22.8
	T1240048V-150ME	150	48	3.13	325x46.1x22.8
	T1240048V-250ME	250	48	5.20	404x42.4x22

PONY - 12v, 24v & 48v CV Drivers

FEATURES:

- ✓ 12V, 24V & 48V CV Driver
- ✓ Flicker Free, O/P Ripple < 5%
- ✓ SELV equivalent, CLASS II
- ✓ PF > 0.9, A-THD < 10%
- ✓ Over temperature protection
- ✓ Life 50,000hrs at max Tc.



	MODEL	WATTAGE (W)	VOLTAGE (V)	CURRENT (A)	Dimensions (L x W x H mm)
Standard Flicker Free	T1240012V-30EE	30	12	2.50	136x38x28
	T1240024V-30EE	30	24	1.25	136x38x28
	T1240012V-60EE	60	12	5.00	168x38x30
	T1240024V-60EE	60	24	2.50	168x38x30
	T1240024V-120EE	120	24	5.00	268x45x30.5
	T1240048V-120EE	120	48	2.50	268x45x30.5
	T1240024V-150EE	150	24	6.25	268x45x30.5
	T1240048V-150EE	150	48	3.13	268x45x30.5

PONY - 12v & 24v SLIM CV Drivers

FEATURES:

- ✓ 24V CV Driver
- ✓ Flicker Free, O/P Ripple < 5%
- ✓ SELV equivalent, CLASS II
- ✓ PF > 0.95, A-THD < 10%
- ✓ Over temperature protection
- ✓ Life 50,000hrs at max Tc.

	MODEL	WATTAGE (W)	VOLTAGE (V)	CURRENT (A)	Dimensions (L x W x H mm)
Standard Flicker Free	T1240012V-60EES	60	12	5.20	329x30x17
	T1240024V-60EES	60	24	2.50	329x30x17
	T1240012V-100EES	100	12	8.33	365x30x18
	T1240024V-100EES	100	24	4.17	365x30x18
	T1240024V-160EES	160	24	6.64	395x30.5x21.5



- 250mA - 1500mA programmable output current
- 0-10V dimming
- Handheld programmer or SmartSet software
- Programmable dimming curve allows step dimming and dim-to-off
- Advanced programmability of output current and thermal temperature protection (NTC)



0 - 10V Dimming

Model Number	Output Watts (W)	Output Current (mA)	Output Voltage (VDC)	Input Voltage (VAC)	Dimming Type	Surge Protection		IP	Dimensions mm (L x W x H)	Case Type
						L-N	L&N-G			
T1M1UNV105P-40E	40	250 - 1050	10 - 57	120-277; 50/60Hz	0 - 10V	2kV	4kV	20	275 x 31 x 25	Linear w/End Terminals
T1M1UNV105P-60E	60	250 - 1050	10 - 57	120-277; 50/60Hz	0 - 10V	2kV	4kV	20	237 x 40.4 x 30	Linear w/End Terminals
T2C1UNV150P-40L*	40	250 - 500	10 - 57	120-277; 50/60Hz	0 - 10V or Bluetooth	2.5kV	2.5kV	20	167.89 x 50.4 x 30	Compact w/End Leads
L1V1230105S-25E	25	100-1050	3-43	220-240; 50/60Hz	Triac Leading & Trailing edge	2kV	3kV	20	110 x 52 x 23.5	Compact w/End Terminals

SmartSet: The Power of Programmability

Fulham's programmable WorkHorse LED drivers run on the innovative SmartSet programming platform, an intuitive, flexible system that gives the user the power to create the right driver for any situation. Benefits include SKU reduction and the ability to integrate more efficient LED modules into existing luminaire designs.

- Output current programmable in 1mA increments
- Allows custom dimming curves (for step dimming and dim-to-off)
- Driver does not need to be powered during programming
- One touch Auto-Programming capability for high volume usage
- Programming via handheld controller or PC software



TPSB-100EU
SmartSet Controller



SmartSet
Software

To see the Fulham SmartSet programming platform in action visit the links below:

Overview of basic programming features: www.fulham.com/smartsetprogramming

One touch Auto-Programming: www.fulham.com/smartsetauto

Programming custom dimming curves: www.fulham.com/smartsetdimmingcurve

Low Profile Linear High Output DC LED Modules

- Ideal replacement for T5HO in linear highbays, water/vapor proof, and recessed and wall luminaires
- Aluminium extrusion mount provides superior thermal management
- Low profile design for use in smaller luminaires
- Constant current, high-efficacy LEDs, 3 SDCM for high color consistency
- Up to 219 lm/W; output range 234 lm to 14,699 lm (@4000K/80CRI)
- Optional lenses snap on in seconds



Specifications

Operating Temp. Range	-40°C to 55°C / -40°F to 131°F	PCB Material	MCPCB (Aluminium Clad)
Color Consistency	Binning per ANSI C78.377-2015 @ 25°C; 3 SDCM	Warranty	5 years @ 105°C Tc from the date of manufacture
Lumen Maintenance	L70: >60,000 hrs / L90: 40,000 hrs (meets DLC Premium and Standard requirements)	Safety/compliance	cURus (File # E351548), UL Class 2 Lighting System, CE, SELV, RoHS Compliant

Product Models

Model Number / Dimension (L x W x H)	Number of LEDs	Input Current (mA)	Nom. Fwd. Voltage (VDC)	Nom. Rated Power (W)	Max. Fwd. Voltage (V)	Max. Rated Power (W)	Nom. Lum. @4000K/80CRI (lm)	Nom. Efficacy @4000K/80CRI (lm/W)
VMU048012LPyxxA 140mm x 32mm x 7.4mm	24	175	22.3	3.9	25	4	799	205
		350	23.1	8.1	25	9	1518	187
		480*	23.8	11.40	26	12	1959	172
VMU064025LPyxxA 278mm x 32mm x 7.4mm	48	350	34.0	11.9	37	13	2347	197
		450	34.7	15.6	38	17	2942	189
		640*	35.6	22.8	39	25	3919	172
VMU080030LPyxxA 559mm x 32mm x 7.4mm	60	350	33.7	11.8	37	13	2380	202
		700	35.1	24.6	39	27	4418	180
		800*	35.6	28.5	39	31	4899	172
VMU125050LPyxxA 559mm x 32mm x 7.4mm	96	350	32.9	11.5	35	12	2425	211
		700	34.1	23.9	36	26	4698	197
		1250*	35.5	44.4	38	49	7700	173
VMU140055LPyxxB[†] 840mm x 32mm x 7.4mm	108	700	33.8	23.7	36	25	4736	200
		1050	34.7	36.4	38	39	6847	188
		1400*	35.5	49.7	39	55	8656	174
		700	33.8	23.7	36	25	4736	200
VMU140055LPyxxA 1121mm x 32mm x 7.4mm	108	1050	34.7	36.4	38	39	6847	188
		1400*	35.5	49.7	39	55	8656	174
		700	33.8	23.7	36	25	4736	200
		1050	34.7	36.4	38	39	6847	188
VMU140055LPyxxC[†] 1168mm x 32mm x 7.4mm	108	1400*	35.5	49.7	39	55	8656	174
		700	33.0	23.1	35	24	4838	209
		1400	34.2	47.9	37	52	9331	195
		2400*	35.6	85.4	39	94	14,699	172
VMU240095LPyxxA 1121mm x 32mm x 7.4mm	180	700	33.0	23.1	35	24	4838	209
		1400	34.2	47.9	37	52	9331	195
		2400*	35.6	85.4	39	94	14,699	172
		700	33.0	23.1	35	24	4838	209
VMU240095LPyxxC[†] 1472mm x 32mm x 7.4mm	180	1400	34.2	47.9	37	52	9331	195
		2400*	35.6	85.4	39	94	14,699	172
		700	33.0	23.1	35	24	4838	209
		1400	34.2	47.9	37	52	9331	195

* Indicates maximum rated current. Modules may be operated at a current less than or equal to this value, below the Tc rating.

† Made to order. Minimum order quantity applies.

Part Numbering Key

V M U 240 095 LP 8 30 A

C _{or} Temperature	Standard:	30 = 3000K 35 = 3500K 40 = 4000K 50 = 5000K
	Made-to-order:	27 = 2700K 57 = 5700K 65 = 6500K
CRI	Standard:	8 = 80
	Made-to-order:	9 = 90

Linear High Output DC LED Modules

- Ideal replacement for T5HO in linear highbays, water/vapor proof, and recessed and wall luminaires
- Aluminum extrusion mount for thermal management with positioning magnets
- LED at each end and connector underneath for even light distribution
- Constant current, high-efficacy LEDs, 3 SDCM for high color consistency
- Up to 198 lm/W; output range 2,200 lm to 13,310 lm (@4000K/80CRI)



Specifications

Operating Temp. Range	-40°C to 55°C / -40°F to 131°F	PCB Material	CEM3
Color Consistency	Binning per ANSI C78.377-2015 @ 25°C; 3 SDCM	Warranty	5 years @ 105°C Tc from the date of manufacture
Lumen Maintenance	L70: >60,000 hrs / L90: 40,000 hrs (meets DLC Premium and Standard requirements)	Safety/compliance	cURus (File # E351548), UL Class 2 Lighting System, CE, SELV, RoHS Compliant

Product Models

Model Number / Dimension (L x W x H)	Number of LEDs	Input Current (mA)	Nom. Fwd. Voltage (VDC)	Nom. Rated Power (W)	Max. Fwd. Voltage (V)	Max. Rated Power (W)	Nom. Lum. @4000K/80CRI (lm)	Nom. Efficacy @4000K/80CRI (lm/W)
TMU125050CLYxxA 560mm x 44mm x 10mm	96	350	33	12	35	12	2245	195
		1050	35	37	38	40	6210	169
		1250*	36	44	39	49	7130	161
TMU140055CLYxxA 1120mm x 44mm x 10mm	108	350	33	11	34	12	2255	196
		1050	35	36	38	39	6340	174
TMU140055CLYxxB† 840mm x 44mm x 10mm	180	1400*	36	50	39	55	8015	161
		350	32	11	34	12	2230	198
TMU240095CLYxxA 1120mm x 44mm x 10mm	180	1400	34	48	37	52	8640	180
		2400*	36	85	39	94	13610	159
TMU240095CLYxxC† 1473.2mm x 44mm x 13.3mm								

* Indicates maximum rated current. Modules may be operated at a current less than or equal to this value, below the Tc rating.

† Made to order. Minimum order quantity applies.

Part Numbering Key

T M U 240 095 CL 8 30 A

CRI

Standard: 8 = 80
Made-to-order: 9 = 90

Color Temperature

Standard: 30 = 3000K
35 = 3500K
40 = 4000K
50 = 5000K

Made-to-order: 27 = 2700K
57 = 5700K
65 = 6500K

Accessories for Low Profile Linear HO & Linear HO Output DC Modules

Model Number	Description	Model Number	Description
TLE-OPT-120-002	5.5" snap-on lens, 82% transmissivity	TLE-OPT-120-021*	58" snap-on lens, 82% transmissivity
TLE-OPT-120-003	11" snap-on lens, 82% transmissivity	TLE-OPT-120-020	Standard LinearHO module end caps (2 pieces)
TLE-OPT-120-004	22" snap-on lens, 82% transmissivity	VLE-OPT-120-012*	Low Profile LinearHO module end caps (2 pieces)
VLE-OPT-120-033D*	33" snap-on lens, 82% transmissivity	TLC-HN02	22" wire harness for 1 or 2 modules in parallel
TLE-OPT-120-013	44" snap-on lens, 82% transmissivity	TLC-HN04	22" wire harness for 3 or 4 modules in parallel
TLE-OPT-120-014*	46" snap-on lens, 82% transmissivity		

*Made to order.

450mA ECO Series DC LED Modules

- Range of common lengths and wattages to fit a variety of luminaires
- High efficacy: up to 150 lm/W @ 350mA, 4000K/90 CRI
- On board connectors allow easy wire connections and end-to-end board linking
- 3 SDCM for high color consistency
- CRI90 Standard, meets CEC Title 24 requirement



Specifications

Beam Angle	120°
Operating Temperature Range	-35°C to +45°C (-31°F to 113°F)
Lumen Maintenance	L70 = 60,000hrs @ Tc=105°C / L90 = 40,000hrs @ Tc=105°C
Color Consistency	Binning per ANSI C78.377-2008; 4 SDCM
PCB Material	FR-4
Warranty	5 years @ Max Tc from the date of manufacture
Safety/compliance	cURus (File # E351548), Class 2 Lighting System, RoHS Compliant

Product Models

Model Number	Number of LEDs	Nominal Input Current* (mA)	Forward Voltage (VDC)	Nominal Power (W)	Dimensions (L x W) (including connector)	Lumens @4000K/80CRI (lm)	Nom. Efficacy @4000K / 80 CRI (lm/W)
VMU045005EC9xxA	12	350	11.5	4.0	38 x 24 x 5.6	554	138
VMU045005EC9xxB	12	350	11.5	4.0	38 x 24 x 5.6	605	150
VMU045010EC9xxA	24	350	23.0	8.1	127 x 18 x 5.6	1096	136
VMU045010EC9xxB	24	350	23.0	8.1	279.4 x 18 x 5.6	1172	145
VMU045010EC9xxC	24	350	23.0	8.1	432 x 18 x 5.6	1172	145

* Max input current 450mA. See specification sheets for detailed information on input current levels.

Part Numbering Key

V M U 045 015 E C 9 30 A

└─┬─┘
CRI

Color Temperature

Standard: 30 = 3000K
35 = 3500K
40 = 4000K

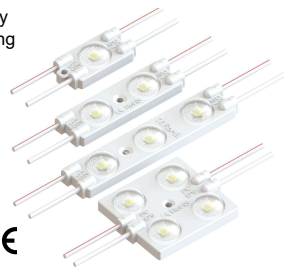
Made-to-order: 27 = 2700K
50 = 5000K

Standard: 9 = 90

Some products may not carry CE marking. Contact Fulham for more information.

SIGNAGE LED Modules

- Wide beam angle ~ 170°
- LED with one bin system (3SDCM) Consistent color.
- Cutable, Stable & Reliable.
- Suitable for Dimming applications
- 12VDC Constant voltage operated
- High grade 3M self adhesion tape for easy installation, in addition with screw mounting provision.
- Rated for IP67 applications
- CCT - 6500K, Red, Green, Blue
- 80 CRI



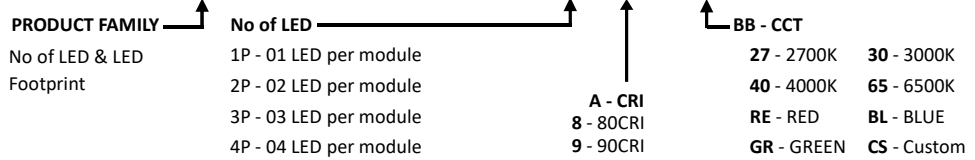
Application:

LED modules for light panel based advertising | Backlighting | Sign boards | Barrisol Ceiling

Specifications	
Input Voltage	12VDC ± 3%
LED Quantity	Options - 1LED, 2LED, 3LED OR 4LED
CRI	Standard 80 CRI, (90 CRI available on request)
Storage temp. range	-25°C ~ +60°C / 60RH
Operating temperature range (Ta)	-10°C ~ +45°C
Max Tc	70°C
Estimated Lumen Maintenance	L70: 50,000 hrs
Housing material	FR Grade Polycarbonate

Part Numbering Key

1SMD-2835 SIGNFLEX-1P-A-BB



FLEXIBLE LED Strips

- Super Bright LEDs - Stable & Reliable
- LED with one bin system (3SDCM) Consistent color
- Mounting means - 3M double side adhesive tape
- LEDs equally spaced to allow uniform light distribution
- Non-IP and IP66/68 version available
- 120° viewing angle per module
- 80 CRI/ 90 CRI Variants



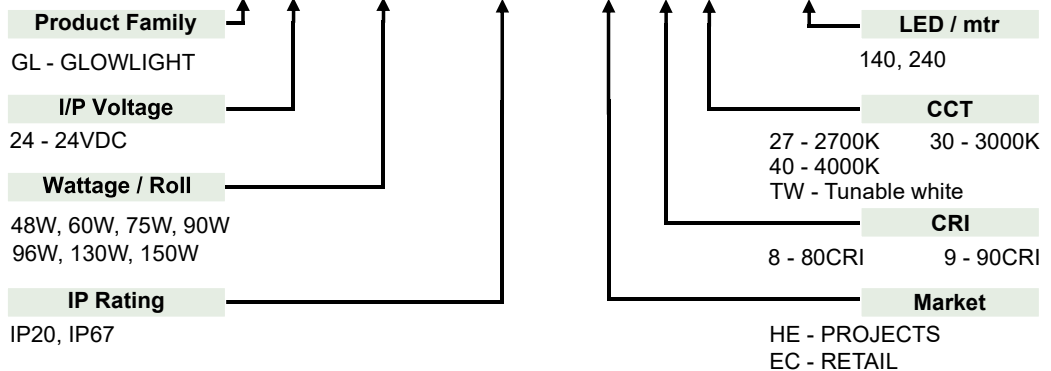
Applications:

Hospitality Lighting, Cabinet Lighting, Signage, Architecture Lighting, Wall Integration
Residential, Retail, Façade Lighting, Cove Lighting, Landscape Lighting

Specifications	
Input Voltage	24VDC ± 5%
LED Quantity	60 / 120 / 180 nos. (As per the Series)
Length	5 meter per reel
CRI	Standard 80, 90 available
Storage temp. range	-25°C ~ +60°C / 60RH
Operating temperature range (Ta)	-10°C ~ +45°C (For IP20 Rated models 10°C ~ +45°C)
Beam Angle	120°
Color Consistency	Binning per ANSI C78.377-2015 @ 25°C Tj; 3 SDCM
Estimated Lumen Maintenance	L70: 50,000 hrs
Safety/Compliance	Dry and Damp Location
Mounting solution	3M tape

Part Numbering Key

GL-24-48W-IP67-HE-927-140L



BLUETOOTH CONTROLS



EliteControl
FULHAM

SIG Qualified Bluetooth® Mesh Lighting Control System



Bluetooth mesh is an emerging platform for connected lighting that is paving the way to IoT smart lighting. It provides fast, reliable performance, unmatched scalability, high-level security and out-of-the-box interoperability, creating opportunities for larger, more efficient lighting networks.

- **Wireless** High speed communication at distances of over 90 meters, creating massive savings on installation and wiring
- **Scalable** Start small with a single room, or connect thousands of devices in a building-wide installation
- **Secure** Advanced encryption standards with multiple authentication keys for maximum protection
- **Reliable** Self-healing network prevents communication losses and allows devices to be added or removed without disruption
- **Interoperable** All SIG Qualified Bluetooth mesh devices can communicate seamlessly, regardless of manufacturer

Fulham eliteBlue Commissioning Software

Fulham's eliteBlue commissioning software provides an intuitive set of tools for commissioning and monitoring qualified Bluetooth mesh lighting devices. Using simple web and iOS apps, users can easily customize lighting control parameters in accordance with site-specific needs and building energy codes.

- **Web portal**

Used off site to manage lighting installation projects and plan commissioning, including mapping zones within a building, setting up control scenarios for zones and managing users collaborating on the project.

Try it at eliteblue.fulham.com

- **Mobile app for iOS**

Used onsite to commission devices and fine-tune installations. No specialized training or lighting control expertise is needed- the intuitive interface lets you add Bluetooth mesh lighting devices to a wireless network in no time.



Connected Driver

A 40W, 0-10V constant current driver with the unique ability to add Bluetooth mesh connectivity by attaching an intelligent Bluetooth antenna. Compatible with third-party sensors, wall switches, and other devices, the connected driver serves as the core component for powerful, easy-to-expand connected systems.

- 0-10V dimming standard. Add Bluetooth dimming with optional ESLI01HB01 SmartLink
- Compatible with Fulham's SmartSet programming platform



Specifications

Model Number	Input Voltage (VAC)	Watts	Output Voltage (VDC)	Dimensions (L x W x H)	Case Type	Case Qty.
T2C1UNV150P-40L	UNV (120-277)	40	10-57	167 x 50.4 x 30	Compact w/End Leads	20

Bluetooth to 0-10V SmartBridge

A simple, easy-to-install component that connects to an existing 0-10V driver to add SIG Qualified Bluetooth mesh capability. The SmartBridge is an ideal solution for manufacturers looking to develop their Bluetooth product lines or contractors seeking to provide wireless lighting options in the field.



Specifications

Model Number	Max Load (W)	Max Input Current (A)	Input Voltage (VAC)	IP	Features	Dimensions (L x W x H)	Case Qty.
CTBRCB02JM02	600	5	UNV (120-277)	66	On / Off, 0-10V Dimming Control, Sensor Input	131.3 x 57.4 x 32.8	30
CTBRCB03JM03-PC*					On / Off, 0-10V Dimming Control, Sensor Input, Color Control, Power Metering		

*Made to order.

Bluetooth Accessories

Model Number	Description
ESLTOPJX00SR	Short-range PIR occupancy, daylight harvesting sensor and Bluetooth Radio for connected LED driver
ESLTOPJX00LR	Long-range PIR occupancy, daylight harvesting sensor and Bluetooth Radio for connected LED driver
ESLI01HB01	Bluetooth SmartLink (attaches to T2C1UNV150P-40L to provide Bluetooth capability)
ELIOPJX00SR	Short-range PIR occupancy and daylight harvesting sensor for SmartBridge
ELIOPJX00LR	Long-range PIR occupancy and daylight harvesting sensor for SmartBridge
ESRPB-W-EO	Single Rocker EnOcean Switch (US version)
EDRPB-W-EO	Double Rocker EnOcean Switch (US version)
CTGATBPOE	IoT Bluetooth Gateway extends a mesh network with Internet access to visualize/analyze data



EMERGENCY FIRE ESCAPE SOLUTIONS

The revolutionary HotSpot Plus LED Driver & Emergency System combines the functions of a dimmable, programmable LED driver, emergency LED driver, and replaceable backup battery in a single compact unit. Under normal conditions this all-in-one solution operates as a constant current driver; during a power outage the integrated battery automatically activates, providing reliable emergency illumination for safe building egress. Benefits include smaller size, simplified installation, and the ability to bring emergency LED capability to smaller luminaires.

- Programmable output current in 1mA increments
- UL 924 Self-Diagnostics
- Selectable emergency output:
 - 40W models: 5W for 180 minutes or 10W for 90 minutes
 - 70W model: 7W for 90 minutes, programmable for lower power and longer runtime
- Compact size and simple installation for maximum flexibility



HotSpot Plus LED Driver and Emergency System

Watts	Output Current (mA)	Output Voltage (VDC)	Model Number	Input Voltage (VAC)	Dimming Type	Ch.	Dimensions (L x W x H)	Case Type
40	250-1400	11-55	FHSAC1-UNV-40BLS	120-277;50/60Hz	0-10V	1	161.8 x 79.5 x 39.12	Compact w/ Bottom Leads
40	250-1400	11-55	FHSAC1-UNV-40C	120-277;50/60Hz	0-10V	1	160.53 x 79.5 x 29	Compact w/ End Leads
40	250-1400	11-55	FHSAC1-UNV-40L	120-277;50/60Hz	0-10V	1	241 x 61 x 34	Linear w/ End Leads
70	350-2400	11-55	FHSAC1-UNV-70SE	120-277;50/60Hz	0-10V	1	424.2 x 30 x 25.4	Linear w/ Terminals
45	250-1400	11-50	FHASAC1-230-45CED	220-240; 50/60Hz	0-10V	1	234 x 82 x 34	Compact w/ Terminals
45	350-2400	11-50	FHASAC1-230-45CE	220-240; 50/60Hz	0-10V	1	228 x 82 x 34	Compact w/ Terminals

HotSpot Plus Accessories

FHS-TSTWL-BC	IP67, bicolor LED Indicator / test switch for use in exposed, outdoor-rated luminaires for 40W models
FHS-TSTWL-BC-S*	IP67, bicolor LED Indicator / test switch for use in exposed, outdoor-rated luminaires for 70W model
FHS-EXT-48-TST	1219mm test switch extension cable

*Made to Order

 = Self-Diagnostic

The Power of Programmability

All HotSpot LED drivers feature Fulham's innovative SmartSet programming platform, which gives the user the power to create the right driver for any situation.

- Auto-Programming capability for high volume usage
- Driver does not need to be powered during programming
- Programming via handheld controller or PC software



TPSB-100EU
SmartSet Controller



SmartSet
Software

To see the Fulham SmartSet programming platform in action visit the links below:

Overview of basic programming features: www.fulham.com/smartsetprogramming

One touch Auto-Programming: www.fulham.com/smartsetauto

Programming custom dimming curves: www.fulham.com/smartsetdimmingcurve

HotSpot Constant Power Programmable Emergency System

- Provides programmable, constant power emergency output for LED modules.
- Advanced features include self-diagnostics and detailed data logging.
- Compatible with Fulham SmartSet Programming Platform and TPSB-100EU handheld controller.
- Complete system includes emergency driver and emergency battery.



Specifications

Model Number	FSHACP-230-10P-L-SD	RFI/EMI	FCC Part 15A Non-Consumer
Input Voltage	100 - 277VAC, 50/60Hz	Number of Output Channels	1 Channel
Input Current	0.06A Max.	Output Type	Class 2
Output Power	1-10W	Battery Type	LiFePO4 9.6VDC
Output Current	620mA Max.	Battery Recharge Time	12 Hours
Output Voltage Range	16 - 55VDC	Dimension	200,4 x 52 x 29,7
Ambient Operating Temperature	10°C to 55°C	Input Surge Protection	Line-Neutral 2kV, Line & Neutral-Ground 2kV

HotSpot Constant Power Programmable Battery Packs

Model Number	Max. Load for 90 Min	Capacity	Dimensions (mm) (L x W x H)
FHSBATL3-1.5-SD*	5W	1500mAh	89 x 70 x 25
FHSBATL9-.6-SD*	6W	1800mAh	191 x 48 x 22
FHSBATL3-3-SD	10W	3000mAh	112 x 72 x 33
FHSBATL6-1.5L-SD*	10W	3000mAh	200 x 40 x 23
FHSBATT8-C3L-SD*	10W	3000mAh	235 x 54 x 31

* Contact Fulham for lead time and availability

Why Battery Chemistry Matters

Fulham's HotSpot LED Emergency drivers are designed with safety, reliability, and performance in mind. This is why our newest drivers use LiFePO4 (Lithium Phosphate) batteries. They are non-toxic, contain no heavy metals, and provide the highest levels of safety, efficiency, and high temperature tolerance.

	Lithium Batteries				
Chemistry	LiFePO4	LiMn2O4	LiCoO2	NiMH	NiCd
Voltage	3.2 V	3.7 V	3.6 V	1.2 V	1.2 V
Volume Energy density	290Wh/L	320 Wh/L	500Wh/L	260Wh/L	150Wh/L
Weight Energy density	130Wh/kg	135 Wh/kg	200Wh/kg	80Wh/kg	60Wh/kg
Safety	Good	Acceptable	Bad	Good	Good
Toxic or green	Green	Green	Toxic	Green	Toxic
Tolerance high Tem.	Good	Bad	Acceptable	Acceptable	Good
1C Cycle life (<80%)	>2000	~ 400	~ 500	~ 500	~ 500
Self-discharge / month	5%	8%	8%	35%	30%
Memory effect	no	no	no	no	yes
Energy efficiency	95%	90%	90%	70%	75%

HotSpot2 LED Emergency System

The HotSpot2 emergency lighting system drives existing constant current LED modules during power outages. A complete system is composed of an emergency driver, emergency battery, and output wire harness. A wide range of lumen output and run times are available.



OEM ONLY



HotSpot2 Drivers

Model Number (CEC Title 20)	FHS2-UNV-36L	FHS2-UNV-56S
Input Voltage	100-277VAC	
Input Frequency	50/60Hz	
Input Current	0.1A Max	
LED Currents	100mA - 700mA	
Standby Input Power	<0.8W	
Total LED Power	20W	
Input Surge Protection	2.5KV Ring Wave	
Over Current Protection	Fuse	
Illumination Time	90 - 350 Min	
LED Connection	Series	
LED Output Protection	Self Resetting PTC	
Output Classification	UL1310/Class 2	
Bicolor LED Indicator	Included LED indicator / test switch provides automatic system status updates	
Output Voltage	12 - 55VDC	12 - 56VDC
Dimension (L x W x H)	135.6 x 42.9 x 23.6	240.3 x 30 x 25.4

HotSpot2 Emergency Battery Packs

Model Number	Dimensions (L x W x H)	Chemistry	Capacity (mAh)	Battery Count	Recharge Time	Max. Load for 90 min. (W)	
						-36L	-56S
FHSBATT8-AA.9	132.8 x 63.5 x 17.8	NiCd	900	8 Cells	24Hrs	4	4
FHSBATL3-1	88.4 x 59.7 x 25.2	LiFePO4	1000	3 Cells	24Hrs	4	4
FHSBATL6-6	132.8 x 47.5 x 21.6	LiFePO4	1200	6 Cells	24Hrs	6	4
FHSBATL3-1.5	88.4 x 70.1 x 25.2	LiFePO4	1500	3 Cells	24Hrs	8	8
FHSBATL3-1.5S	225.3 x 28.19 x 24.4	LiFePO4	1500	3 Cells	24Hrs	8	8
FHSBATL9-6	191 x 47.5 x 21.6	LiFePO4	1800	9 Cells	24Hrs	10	8
FHSBATCC3-3†	152.4 x 91.4 x 39.4	LiFePO4	3000	3 Cells	24Hrs	14	14
FHSBATL6-1.5	144.8 x 70.1 x 25.2	LiFePO4	3000	6 Cells	24Hrs	16	14
FHSBATL6-1.5L	200.4 x 39.6 x 23.4	LiFePO4	3000	6 Cells	24Hrs	16	14
(with optional mounting bracket)	230.4 x 41.4 x 23.6						
FHSBATL6-1.5S	423.4 x 28.19 x 24.4	LiFePO4	3000	6 Cells	24Hrs	16	14
FHSBATT8-C3	105.4 x 83.6 x 53.6	NiCd	3000	8 Cells	24Hrs	16	16
FHSBATT8-C3L	200.4 x 55.1 x 26.4	NiCd	3000	8 Cells	24Hrs	16	16
(with optional mounting bracket)	230.4 x 55.4 x 27.2						
FHSBATL3-3	111.5 x 71.3 x 33	LiFePO4	3000	3 Cells	24Hrs	16	16
FHSBATT8-D4*	124.2 x 97.5 x 69.1	NiCd	4000	8 Cells	24Hrs	20	20
FHSBATL6-3	191 x 71.6 x 33	LiFePO4	6000	6 Cells	32Hrs	20	20
FHSBATL6-3L	201.7 x 55.1 x 30.7	LiFePO4	6000	6 Cells	32Hrs	20	20
(with optional mounting bracket)	232 x 56.1 x 32.5						

† Cold Pack Battery: -20°C minimum operating temperature * Made to Order

HotSpot2 Accessories

Wiring harnesses:

Used to set the output current to the LED module during emergency operation. Using lower current will allow longer run times.

Model Number	mA	Model Number	mA	Model Number	mA
FHS-HARNESS-100	100	FHS-HARNESS-250	250	FHS-HARNESS-550	550
FHS-HARNESS-125	125	FHS-HARNESS-300	300	FHS-HARNESS-600	600
FHS-HARNESS-150	150	FHS-HARNESS-350	350	FHS-HARNESS-650	650
FHS-HARNESS-175	175	FHS-HARNESS-400	400	FHS-HARNESS-700	700
FHS-HARNESS-200	200	FHS-HARNESS-450	450		
FHS-HARNESS-225	225	FHS-HARNESS-500	500		

FHS-TSTWL-BC

IP67, bicolor LED Indicator / test switch for use in exposed, outdoor-rated luminaires

FHS-EXT12M

305mm battery extension cable

FHS-EXT-48-TST

1219mm test switch extension cable

Also available: battery mounting brackets and wallplates. For more information, visit www.fulham.com



UV Ballast

- Program / Rapid start ballast
- Globally certified products (CE, UL, cULus, RCM, CB)
- 30% Less energy use than traditional magnetic ballasts
- Multi-current operation: Up to 6 lamps can be run off one ballast
- Constant UV output eliminates Buck/Boost transformer
- Low radiant heat reduces air conditioning costs
- Extended lamp life reduces maintenance costs
- Dimming models feature Instant start with 0-10V dimming control and linear (smooth) dimming from 100-70%
- Compatible with wide range of lamp types & configurations



MODEL	WATTAGE	Size (mm) (L x W x H)
SHS1-UNV-C	55	128.5x68x25.1
SHS1-UNV-C-I	45	128.3x60x25.4
SHS2-MLT-L	40	163.8x37.85x24.4
SHS3-MLT-L	40	163.8x37.85x24.4
SHS4P-UNV-C	112	172x76.7x32.2
SHS10-UNV-H	150	254x66x32
SHS11-UNV-H	190	32x66x254
SHS5P-UNV-H	320	254x71x45.5
SHS-DISP	Display & Communication device	125x85x27.8



Differential Strengths of Fulham



Photometry Lab to test LEDs & LED Modules



Reliability Testing Facilities for New Products



Installed Capacity to manufacture > 300K LED Drivers per month



State-of-the-Art Auto Insertion and SMT Line



Four Highly-Flexible Manual Insertions Lines for driver assembly



Fully-Automated Soaking Set Up



Dedicated Line for LED Module Assembly



LED Module Soaking Set Up for 100% soaking of LED Modules



Dedicated team for custom-built LED Module design



Management system as per ISO 9001 : 2015



Limited Warranty

Length of Warranty and Coverage

Warranty period will be determined from the date of manufacture as indicated by the date code stamped on each product and will be covered as follows:

EliteControl™ - Hardware: 5 years

FireHorse™ - 2 to 5 Years

FireHorse HotSpot™ - 3 to 5 Years*

IceHorse™ Ballast - 3 Years

LongHorse™ Electronic Remote Fluorescent Ballast - 5 Years

LumoSeries™ - 5 Years

PONY™ Electronic Ballast - 2 Years

PONY™ Electronic SugarCube™ - 2 Years

PONY™ Electronic Transformer - 2 Years

RaceHorse™ Electronic Ballast - 70°C 5 Years, 90°C 3 Years

SunHorse™ Ballast - 3 Years

ThoroLED™ Drivers - 2 to 5 Years

ThoroLED™ Modules/Engines - 3 to 5 Years*

ThoroLED™ Retrofit - 5 Years*

ThoroLED™ Luminaire - 5 Years*

Vizion™ Modules/Engines - 5 Years*

Vizion™ Retrofit - 5 Years*

Vizion™ Luminaire - 5 Years*

WorkHorse™ Electronic Fluorescent Ballast - 5 Years

WorkHorse LED™ Drivers - 5 Years

* Covered defects for Vizion, ThoroLED, and HotSpot LED modules. For purposes of this limited warranty, a defect in a module shall be defined as one or more individual LEDs dark at initial installation or greater than 10% of individual LEDs dark during the Warranty Period. Replacement and/or repair of individual Vizion, ThoroLED, or HotSpot LED Modules does not extend this limited warranty beyond the original Warranty Period.

Warranty Conditions

Fulham extends this express limited warranty only to the original purchaser or to the first user. This constitutes the complete warranty for the product.

Fulham is not responsible for any auxiliary equipment not furnished by Fulham, which is used in connection with or attached to the product, or for operation of the product with any auxiliary equipment. Damage to all such equipment is expressly excluded from this warranty. In addition, Fulham is not responsible for any damage to the product resulting from the use of auxiliary equipment not supplied by Fulham.

Warranty Conditions Not Covered

* This warranty is not applicable to any product manufactured by Fulham not installed and operated in accordance with:

* Underwriters Laboratories Inc. (UL)

* National Electrical Code (NEC)

* Standards set by the International Electrotechnical Commission (IEC)

* European Norms Electrical Certification (ENEC)

* Applicable international federal, state and local codes
Remote applications beyond maximum distance noted on product specification sheet. If maximum distance is not provided, remote application is not covered.

* Fulham specific, most recent instructions and application guidelines provided for installation of the product
Additionally, this warranty is not applicable to Fulham manufactured products that have been subjected to excessive stress including, but not limited to, operating temperatures exceeding the recommended maximum temperature on any part of the product.

Obtaining Warranty Service

If within the warranty period it appears that the installed product does not meet the warranty conditions specified, the purchaser must notify Fulham of its warranty claim. Fulham or its authorized service company will provide warranty service directly to you.

General Provisions

All responsibilities regarding the product are set forth by this warranty. Replacement or repairs of the product is your exclusive remedy. For purposes of clarity, "replacement or repairs of the product" does not include any removal or reinstallation costs or expenses, including, without limitation, any labour costs or expenses, shipping costs to return non-conforming products or any damages that may occur during the return of product to Fulham. If Fulham chooses to replace the product and is not able to do so because it has been discontinued or is not available, Fulham may replace it with a comparable product. Fulham reserves the right to use new, reconditioned, refurbished, repaired or re-manufactured products or parts in the repair or replacement of any product covered by this warranty. If no replacement product is available, Fulham, solely at its discretion, may issue a credit for the product, prorated for its remaining warranty life.

This warranty is given in lieu of all other express warranties. Implied warranties, including those without limitation, warranties of merchant ability and fitness for a particular purpose, are limited to the duration of this limited warranty. Fulham shall in no event be liable for damages in excess of the purchase price of the product, for any loss of use, loss of time, inconvenience, commercial loss, lost profits or savings or other incidental, special or consequential damages arising out of the use or inability to use such product, to the full extent such may be claimed by law.

Local Exceptions

Some jurisdictions do not allow the exclusion or limitation of incidental or consequential damages, or limitations on how long an implied warranty lasts, therefore the above limitations or exclusions may not apply to you. This warranty gives you specific legal rights, and purchasers may have other rights that vary by jurisdiction.

Returned Materials Authorizations (RMA)

Customers shall contact Fulham directly for all RMA's.

After receiving the RMA, the user shall promptly return the product at the user's expense to Fulham after receiving instructions as to when and where to ship product. Failure to follow this procedure shall void this warranty. Should the number of pieces received by Fulham differ from the RMA either +/-, the customer will be notified and adjustments will be made at that time.

Fulham reserves the right to examine all failed products to determine the cause of failure and patterns of usage and reserves the right to be the sole judge as to whether any products are defective and covered under this warranty.

Contact Information

Fulham Europe

+31.72.572.3000
warranty@fulham.com

Effective: August 1st, 2018



FULHAM®

Harness the Horsepower



Fulham Europe

Albert Andreev | Commercial Manager Europe | Fulham Company B.V.
Mob: +359 888 592 700 | aandreev@fulham.com | www.Fulham.com | [@FulhamEurope](https://twitter.com/FulhamEurope)

Office Europe: PO Box 1191, 1700 BD, Heerhugowaard, The Netherlands | +31 72 572 30 00
Warehouse Europe: Kaapstadweg 36A, 1047 HG, Amsterdam, The Netherlands
Sales Support: sales.eu@fulham.com | +91 686 264 27
Headquarters: order@fulham.com | +1 323 779 29 80



www.fulham.com

