

# QUICKTRONIC® fit T5

## QT-FIT5

ECG for T5/Ø16mm linear fluorescent lamps



QT-FIT5



i.e. LUMILUX® T5



## Product Features:

- 50,000 hours lifetime<sup>1</sup>
- Lamp start with optimized filament preheating within 2 s
- Suitable for lighting with very high switching cycles
- Reliable lamp ignition between -15°C...+50°C
- Suitable for luminaries of protection class I
- CELMA Energy Efficiency Index A2
- Automatic safety shut-down in case of a defect or at the end of the lamp's life (EoL T.2)
- Automatic restart after lamp replacement
- Suitable for DC installations

## Technical Data

Max. cable diameter for push-in contact [mm <sup>2</sup> ]:	s <sup>2</sup> : 0.5 - 1.5
Starting time:	t: 2 sec.
Line voltage:	220 - 240 V
Voltage range (AC):	198 - 264 V
Voltage range (DC):	185 – 276 V; for lamp ignition min. 198 V; max. 1 hour 185 - 198V
Line frequency:	50 - 60 Hz
Operating frequency:	40 - 50 kHz
Electrical strength:	280 V → permanent; 300 V → 2 hours
Ambient temperature ta:	-15°C to +50 °C
Measuring point temperature tc:	Max. +75 °C
U-OUT:	430 V (330 V for QT-FIT5 1x14-35)



<sup>1</sup> Average lifetime

<sup>2</sup> s = solid wire

## Inrush current and max. number of ECG per circuit breaker

ECG	Inrush Current		Max. number of ECG per circuit breaker		
	I <sub>p</sub> [A]	TH [μs]	B: 10A	B: 16A	C: 16 A
QT- FIT5 1x14-35	24	230	17	28	47
QT- FIT5 2x14-35	40	200	12	19	32
QT- FIT5 3x14, 4x14	40	200	12	19	32
QT- FIT5 1x49	24	230	17	28	47
QT- FIT5 2x49	53	200	8	13	22
QT- FIT5 1x54	24	230	17	28	47
QT- FIT5 2x54	53	200	8	13	22

## Standards and approval marks

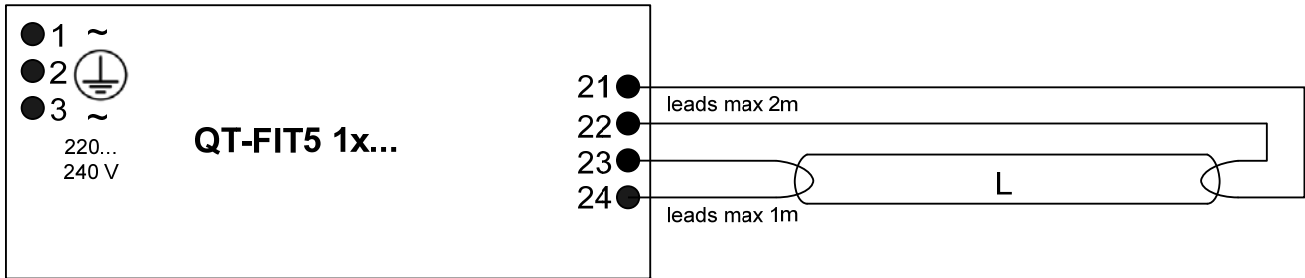
Safety:	acc. to EN 61347-2-3 / IEC 61347-2-3
Radio interference:	acc. EN 55015: 2006 + A1: 2007 + A2: 2009
Harmonic content:	acc. to EN 61000-3-2 / IEC 61000-3-2
Immunity:	acc. to EN 61547 / IEC 61547
Approval marks:	  <div style="border: 1px solid black; padding: 2px; display: inline-block;">           ENEC 10 In preparation         </div>

## Dimensions & weight

Description	Length [mm]	Width [mm]	Height [mm]	Distance Mounting Holes [mm]	Weight [g]
QT-FIT5 1x14-35	280	30	21	270	160
QT-FIT5 2x14-35	280	30	21	270	185
QT-FIT5 3x14, 4x14	280	40	21	270	220
QT-FIT5 1x49	280	30	21	270	165
QT-FIT5 2x49	280	30	21	270	185
QT-FIT5 1x54	280	30	21	270	160
QT-FIT5 2x54	280	30	21	270	190

## Lamp wiring

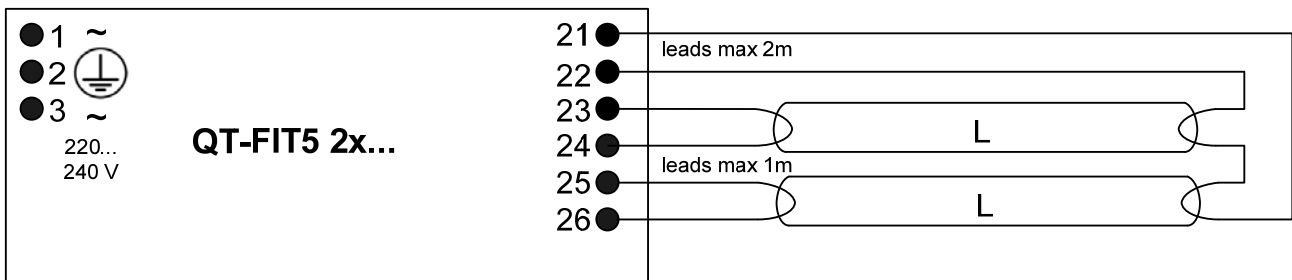
### QT-FIT5 1x...



Max. permitted cable length in between ECG and lamp: 2.0 m (PIN 21, 22); 1.0 m (PIN 23, 24)

### QT-FIT5 2x...

Max. permitted cable length in between ECG and lamp: 2.0 m (PIN 21, 22); 1.5 m (PIN 23, 24); 1.0 m (PIN 25, 26)

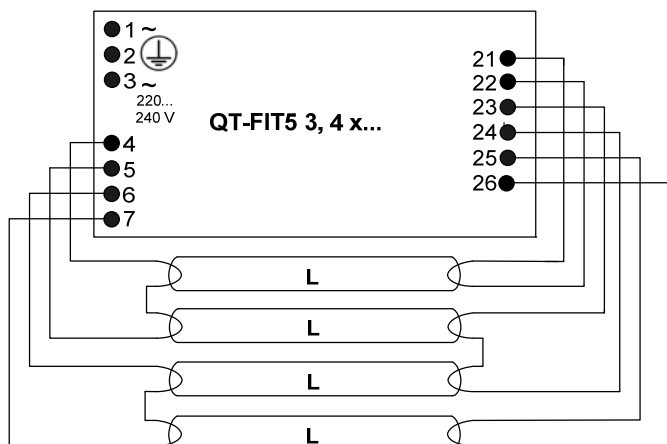


### QT -FIT5 3x14, 4x14, 3 lamp operation



Max. permitted cable length in between ECG and lamp: 1.0 m (PIN 25, 26); 1.5 m (PIN 4, 5, 21, 22, 23, 24)

## QT -FIT5 3x14, 4x14, 4 lamp operation



Max. permitted cable length in between ECG and lamp: 1.0 m (PIN 6, 7, 25, 26); 1.5 m (PIN 4, 5, 21, 22, 23, 24)

## Logistic Data

Description	EAN 10	EAN 40	Packaging Unit
QT-FIT5 1x14-35	4008321971234	4008321971241	20
QT-FIT5 2x14-35	4008321971258	4008321971265	20
QT-FIT5 3x14, 4x14	4008321971210	4008321971227	20
QT-FIT5 1x49	4008321832139	4008321832146	20
QT-FIT5 2x49	4008321832153	4008321832160	20
QT-FIT5 1x54	4008321812537	4008321812544	20
QT-FIT5 2x54	4008321812551	4008321812568	20

## Lifetime

Measuring point temperature tc:	Lifetime with max. 10% failure rate
75 °C	30,000 h
70 °C	50,000 h

### Expected lifetime

ECG	Lamp	ECG ambient temperature (ta)			
		40°C	50°C	60°C	
QT- FIT5 1x14-35	HE 14 W	lifetime [h]	in preparation		
		temperature at tc-point [°C]	in preparation		
	HE 21 W	lifetime [h]	100,000	100,000	60,000
		temperature at tc-point [°C]	45	55	65
	HE 28 W	lifetime [h]	100,000	100,000	60,000
		temperature at tc-point [°C]	45	55	65
	HE 35 W	lifetime [h]	100,000	100,000	60,000
		temperature at tc-point [°C]	50	55	65
	HE ES13 W	lifetime [h]	100,000	100,000	70,000
		temperature at tc-point [°C]	45	55	65
	HE ES 19 W	lifetime [h]	100,000	100,000	60,000
		temperature at tc-point [°C]	45	55	65
	HE ES 25 W	lifetime [h]	100,000	100,000	60,000
		temperature at tc-point [°C]	50	55	65
	HE ES 32 W	lifetime [h]	100,000	100,000	60,000
		temperature at tc-point [°C]	50	55	65
QT- FIT5 2x14-35	HE 14 W	lifetime [h]	in preparation		
		temperature at tc-point [°C]	in preparation		
	HE 21 W	lifetime [h]	in preparation		
		temperature at tc-point [°C]	in preparation		
	HE 28 W	lifetime [h]	100,000	70,000	50,000
		temperature at tc-point [°C]	55	65	70
	HE 35 W <sup>1</sup>	lifetime [h]	70,000	40,000	x
		temperature at tc-point [°C]	60	70	x
	HE ES13 W	lifetime [h]	in preparation		
		temperature at tc-point [°C]	in preparation		
	HE ES 19 W	lifetime [h]	in preparation		
		temperature at tc-point [°C]	in preparation		
	HE ES 25 W	lifetime [h]	in preparation		
		temperature at tc-point [°C]	in preparation		
	HE ES 32 W <sup>1</sup>	lifetime [h]	90,000	60,000	x
		temperature at tc-point [°C]	60	65	x
QT- FIT5 3x14, 4x14	HE 14 W (3lamp operation)	lifetime [h]	in preparation		
		temperature at tc-point [°C]	in preparation		
	HE 14 W (4lamp operation)	lifetime [h]	100,000	60,000	30,000
		temperature at tc-point [°C]	55	65	75
QT- FIT5 3x14, 4x14	HE ES13 W (3lamp operation)	lifetime [h]	in preparation		
		temperature at tc-point [°C]	in preparation		
	HE ES 13 W (4lamp operation)	lifetime [h]	100,000	80,000	50,000
		temperature at tc-point [°C]	55	60	70

ECG	Lamp	ECG ambient temperature (ta)			
		40°C	50°C	60°C	
QT-FIT5 1x49	HO 49	lifetime [h]	100,000	70,000	40,000
		temperature at tc-point [°C]	55	60	70
	HO ES 45 W	lifetime [h]	100,000	80,000	50,000
		temperature at tc-point [°C]	50	60	70
QT-FIT5 2x49	HO 49	lifetime [h]	in preparation		
		temperature at tc-point [°C]	in preparation		
	HO ES 45 W	lifetime [h]	in preparation		
		temperature at tc-point [°C]	in preparation		
QT-FIT5 1x54	HO 54 W	lifetime [h]	100,000	80,000	50,000
		temperature at tc-point [°C]	60	60	70
	HO ES 50 W	lifetime [h]	in preparation		
		temperature at tc-point [°C]	in preparation		
QT-FIT5 2x54	HO 54 W <sup>1</sup>	lifetime [h]	70,000	40,000	x
		temperature at tc-point [°C]	60	70	x
	HO ES 50 W	lifetime [h]	in preparation		
		temperature at tc-point [°C]	in preparation		

1

ECG	Lamp	ECG ambient temperature (ta)		
		58°C		
QT-FIT5 2x14-35	HE 35 W	lifetime [h]		30,000
		temperature at tc-point [°C]		75
	HE ES 32 W	lifetime [h]		30,000
		temperature at tc-point [°C]		75
QT-FIT5 2x54	HO 54 W	lifetime [h]		30,000
		temperature at tc-point [°C]		75

*Expected lifetime is the calculation of the ECG lifetime according to IEC\_60929\_Edition\_4\_2011. As background for this estimation, are the MTTF values according to SN 29500 and the component- parameters used*

## Lamp/ECG System Combination

ECG	Lamp	HF lamp wattage [W]	System wattage [W]	Line current [A]	Luminous flux at 25°C [lm]	Luminous flux at 35°C [lm]	Power factor [λ]
QT-FIT5 1x14-35	HE 14	14	16	0.08	1200	1350	0.95
	HE 21	21	23	0.11	1900	2100	0.95
	HE 28	28	31	0.14	2600	2900	0.96
	HE 35	35	38	0.17	3320	3650	0.97
	HE ES 13 W	13	15	0.07	1150	1350	0.95
	HE ES 19 W	19	22	0.09	1800	2100	0.95
	HE ES 25 W	25	28	0.13	2450	2900	0.96
QT-FIT5 2x14-35	HE 14	2x 14	32	0.15	2x 1200	2x 1350	0.98
	HE 21	2x 21	46	0.22	2x 1900	2x 2100	0.98
	HE 28	2x 28	61	0.28	2x 2600	2x 2900	0.98
	HE 35	2x 35	78	0.35	2x 3320	2x 3650	0.98
	HE ES13 W	2x 13	29	0.13	2x 1150	2x 1350	0.95
	HE ES 19 W	2x 19	43	0.19	2x 1800	2x 2100	0.98
	HE ES 25 W	2x 25	56	0.25	2x 2450	2x 2900	0.98
QT-FIT5 3x14, 4x14	HE ES 32 W	2x 32	71	0.32	2x 3100	2x 3650	0.98
	HE 14	3x 14	49	0.22	3x 1200	3x 1350	0.98
	HE 14	4x 14	63	0.28	4x 1200	4x 1350	0.98
	HE ES13 W	3x 13	43	0.19	3x 1150	3x 1350	0.98
QT-FIT5 1x49	HE ES13 W	4x 13	56	0.25	4x 1150	4x 1350	0.98
	HO 49	49	54	0.24	4310	4900	0.98
QT-FIT5 2x49	HO ES 45 W	45			4310	4900	
	HO 49	2x 49	106	0.47	2x 4300	2x 4900	0.98
QT-FIT5 1x54	HO ES 45 W	2x 45			2x 4310	2x 4900	
	HO 54 W	54	59	0.25	4450	5000	0.98
QT-FIT5 2x54	HO ES 50 W	50			4450	5000	
	HO 54 W	2x 54	115	0.49	2x 4450	2x 5000	0.98
	HO ES 50 W	2x 50			2x 4450	2x 5000	

For more information on ECG refer to <http://www.osram.com>

For more information on System Guarantee refer to <http://www.osram.com>

GL SCL EU&LM TLS ECG13 Edition:11.2012. Subject to change without notice. Despite careful review, the possibility of mistakes cannot be excluded – no guaranty will be provided.