

Philips SILHOUETTE™ T5 Fluorescent Lamps

featuring ALTO® Lamp Technology

Powerful, Environmentally-Responsible Ultra-Slim Lamps



Photo Courtesy of Laszlo Regos

Ideal for general, decorative and architectural lighting in offices, retail stores, hotels, schools and hospitals

▶ Miniaturization

Slim profile lamp and ballast

▶ Operates on Programmed Start Electronic Ballasts Only

▶ Variety of Shapes and Color Temperatures

▶ Environmentally Responsible

- Low mercury: TCLP¹-compliant
- Energy efficient
- Long life

▶ Sustainable Lighting Solution

Less mercury combined with energy efficiency reduces the impact on the environment

▶ Look for the Green End-Caps®

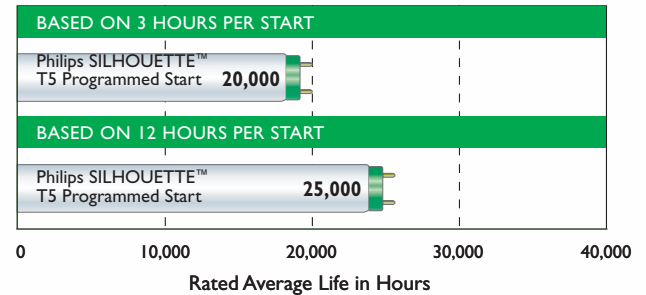
Our Green End-Caps mean you are using ALTO® environmentally-responsible lamps

1) The TCLP is the U.S. EPA's toxicity characteristic leaching procedure

† This product utilizes ALTO® Lamp Technology. ALTO products pass the US EPA's Toxicity Characteristic Leaching Procedure (TCLP) and can be classified as non-hazardous waste. Check with state and local regulations.



Philips SILHOUETTE™ T5 Lamp Rated Average Life



**Philips Silhouette™ T5
Warranty Period: 24 months**

PHILIPS

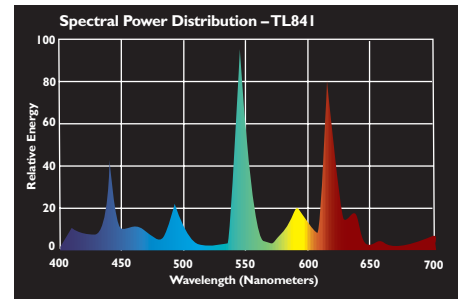
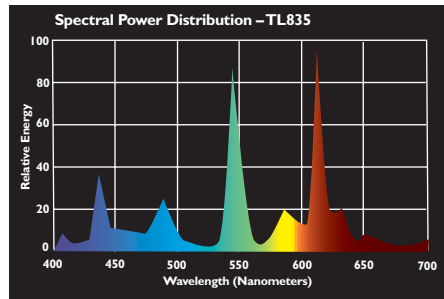
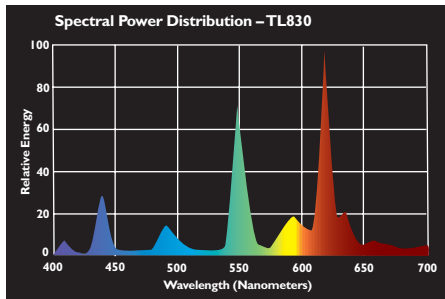
SILHOUETTE™ T5 Fluorescent Lamps featuring ALTO® Lamp Technology

Electrical, Technical and Ordering Data (Subject to change without notice)

Product Number	Description	Nominal Watts	Bulb	Base	Std. Pkg. Qty.	Color Temp. (Kelvin)	Color Rendering (CRI)	Average Nominal Length (in)	Rated Average Life (hrs) ¹	Approx. Initial Lumens ^{2,3}	Design Lumens ⁴
23077-1	F14T5/830/ALTO	14	T5	Min. Bipin	40	3000K	85	22	20,000	1350	1275
23079-7	F14T5/835/ALTO	14	T5	Min. Bipin	40	3500K	85	22	20,000	1350	1275
23080-5	F14T5/841/ALTO	14	T5	Min. Bipin	40	4100K	85	22	20,000	1350	1275
23081-3	F21T5/830/ALTO	21	T5	Min. Bipin	40	3000K	85	34	20,000	2100	2000
23082-1	F21T5/835/ALTO	21	T5	Min. Bipin	40	3500K	85	34	20,000	2100	2000
23083-9	F21T5/841/ALTO	21	T5	Min. Bipin	40	4100K	85	34	20,000	2100	2000
23084-7	F28T5/830/ALTO	28	T5	Min. Bipin	40	3000K	85	46	20,000	2900	2750
23085-4	F28T5/835/ALTO	28	T5	Min. Bipin	40	3500K	85	46	20,000	2900	2750
23086-2	F28T5/841/ALTO	28	T5	Min. Bipin	40	4100K	85	46	20,000	2900	2750
23088-8	F35T5/830	35	T5	Min. Bipin	40	3000K	85	58	20,000	3650	3450
23091-2	F35T5/835	35	T5	Min. Bipin	40	3500K	85	58	20,000	3650	3450
23095-3	F35T5/841	35	T5	Min. Bipin	40	4100K	85	58	20,000	3650	3450

- 1) Average life under specified test conditions with lamps turned off and restarted no more frequently than once every 3 operating hours. Lamp life is appreciably longer if lamps are started less frequently.
- 2) Approximate initial lumens. The lamp lumen output is based upon lamp performance after 100 hours of operating life, when the output is measured during operation on a reference ballast under standard laboratory conditions.
- 3) For expected lamp lumen output, commercial ballast manufacturers can advise the appropriate ballast factor for each of their ballasts when they are informed of the designated lamp. The ballast factor is a multiplier applied to the designated lamp lumen output.
- 4) Design lumens are the approximate lamp lumen output at 40% of the lamp's rated average life. This output is based upon measurements obtained during lamp operation on a reference ballast under standard laboratory conditions.

Spectral Power Distribution



Lamp Dimensions

Lamp Type	A MAX.		B MIN.		B MAX.		C MAX.	
	inches	mm	inches	mm	inches	mm	inches	mm
	F14T5	21.61	549.0	21.80	553.7	21.89	556.1	22.17
F21T5	33.42	849.0	33.61	853.7	33.70	856.1	33.98	863.2
F28T5	45.24	1149.0	45.42	1153.7	45.52	1156.1	45.80	1163.2
F35T5	57.05	1449.0	57.23	1453.7	57.33	1456.1	57.61	1463.2

