ERP POWER

Dimming Compatibility Matrix with 120 Vac TRIAC and ELV Dimmers

EBR015U-0500-28	Total Score:	97.3%	Driver Current (mA) with no Dimmer:	490	Driver Light (FC) with no Dimmer:	927	Scoring 0 - Needs improvement 1 - Unlikely to be noticed 2 - No issues
	Avg. Min. Dimming:	6.7%					

Dimmer List		Indiv. Score	Light Output (Foot Candle)		Current (mA)		Dimming Range[1]		Smooth Dimming[2]	Sag[3]	No Start Flash[4]	Flicker[5]	Shimmer[6]	Able to turn off[7]	Audible Noise[8]
Mfg.	Model	%	Max	Min	Max	Min	Max	Min							
Lutron	S-603PG	100.0%	842	47	435	20	91%	5%	2	0	2	2	2	2	2
Leviton	IPI06-1LZ	100.0%	927	0	490	0	100%	0%	2	2	2	2	2	2	2
Leviton	6631-2	100.0%	927	0	490	0	100%	2%	2	2	2	2	2	2	2
Lutron	DVCL-153P	100.0%	925	28	489	12	100%	3%	2	2	2	2	2	2	2
Lutron	DV600P	100.0%	926	62	490	27	100%	7%	2	2	2	2	2	2	2
Lutron	TGCL-153P	100.0%	927	58	490	25	100%	6%	2	2	2	2	2	2	2
Lutron	S600P	100.0%	927	23	490	10	100%	2%	2	2	2	2	2	2	2
Leviton	VPE06	95.8%	927	103	490	44	100%	11%	2	2	2	2	2	2	2
Lutron	DVELV303P	100.0%	927	73	490	32	100%	8%	2	2	2	2	2	2	2
Lutron	SELV300P	100.0%	927	77	490	33	100%	8%	2	2	2	2	2	2	2
Leviton	6683-IW	100.0%	927	0	490	0	100%	0%	2	2	2	2	2	2	2
Leviton	6161	91.7%	927	156	490	68	100%	17%	2	2	2	2	2	2	2
Leviton	6633-P	100.0%	927	16	490	8	100%	2%	2	2	2	2	2	2	2
Lutron	TG-600P	95.8%	927	135	490	60	100%	15%	2	2	2	2	2	2	2
Cooper	DLC03P	91.7%	927	23	490	10	100%	2%	1	2	2	2	2	2	2
Lutron	LG600P	100.0%	927	60	490	26	100%	6%	2	2	2	2	2	2	2
Lutron	CT103P	95.8%	927	98	490	42	100%	11%	2	2	2	2	2	2	2
Cooper	SLC03P	91.7%	927	9	490	5	100%	1%	1	2	2	2	2	2	2
Leviton	IPE04	91.7%	927	70	490	30	100%	8%	1	2	2	2	2	2	2
Lutron	MAELV600	95.8%	927	122	490	53	100%	13%	2	2	2	2	2	2	2
Lutron	FAELV500	95.8%	927	126	490	54	100%	14%	2	2	2	2	2	2	2
Lightolier	ZP260QEW	100.0%	927	97	490	42	100%	10%	2	2	2	2	2	2	2
Cooper	DAL06P	91.7%	927	8	490	4	100%	1%	1	2	2	2	2	2	2

NOTES:

1. If light is measured, then the dimming range is based on light output. If light is not measured, then the dimming range is based on the percentage of output current.
2. While adjusting the dimming level, a smooth dimming, with no sudden jumps in light output, results in a score of 2. A small jump that is only noticeable if directly staring at the light results in a score of 1. A large obvious jump results in a score of 0.
3. Percentage away from 100% output current when dimmer is inserted in the circuit, at the dimmer's maximum conduction angle.
4. No flash at startup (at maximum conduction angle) results in a score of 2. A smooth, but still noticeable transition from overshoot results in a score of 1. A transition with overshoot and undershoot results in a score of 0.
5. Highly visible repeating light fluctuations. No flicker results in a score of 2. Flicker results in a score of 0. There is no "1" score. Flicker is measured using a stable AC source delivered by a power supply. AC line voltage instability will cause visible light fluctuations.
6. Low frequency or random variations in light output that are typically less noticeable than flicker (the light output does not turn off at any point). No shimmer, perfect light output, results in a score of 2. Only noticeable shimmer, if staring directly at the LEDs, results in a score of 1. Obvious shimmer, even if looking away from the LEDs, results in a score of 0. Like Flicker, Shimmer is measured using a stable AC source delivered by a power supply. AC line voltage instability will cause visible light fluctuations.
7. No light output when dimmer switch or button is turned off.
8. Audible noise with driver located at 3 feet and measured at 90 degree conduction angle (worst case). A strongly apparent noise resuts in a score of 0. A score of 1 is assigned if the noise is not very obvious, and most likely to not be noticed inside of a fixture.
9. All the dimmers are set to the widest dimming range, when the trim potentiometer is available. Testing is done with 1 dimmer per LED driver.