

# SWITCHEX Series

## 12V/24V All-In-One Dimmer + Driver

SWITCHEX simplifies LED array lighting systems by combining an in-wall LED dimmer switch and power supply into a single integrated unit. SWITCHEX mounts in a standard in-wall switch box, accepts 120V AC and converts to low voltage DC. SWITCHEX is compatible with most 12VDC and 24VDC tape light\*\* and fixtures.

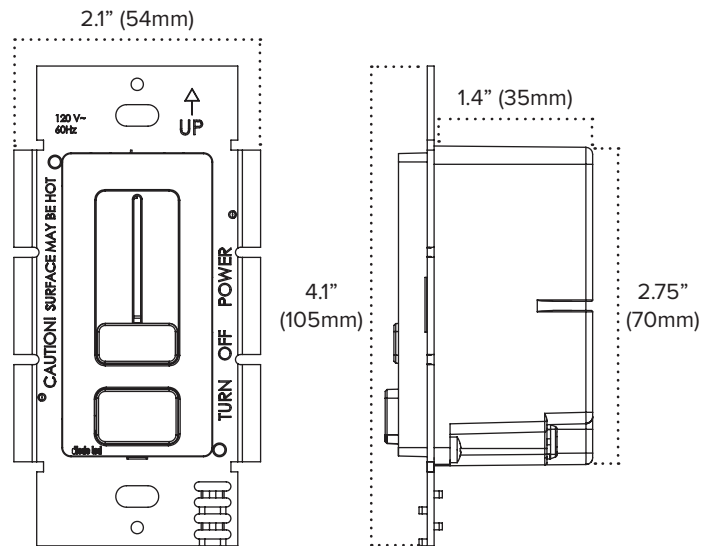
- All-in-one LED Driver + In-Wall Dimmer Switch
- Simplifies LED installation by eliminating compatibility issues\*
- Fits in a standard recessed electrical box
- 5-100% dimming range - No minimum load
- Single Pole preset dimmer with on/off push switch
- Adjustable voltage output dial to address voltage drop
- Includes voltage barrier partition to install high and low voltage circuit in same switch box
- No derating required when ganging units
- Power failure memory recalls settings prior to interruption
- Includes three face plates: White, Almond, and Dark Brown (Trim plates not included)



### SWITCHEX QUICK SPECS

|                       |   |
|-----------------------|---|
| <b>INPUT VOLTAGE</b>  | 120V AC (108~132VAC), 50/60Hz                                   |
| <b>INPUT CURRENT</b>  | <1.0A @ 120VAC max load   |
| <b>OUTPUT VOLTAGE</b> | 12V DC / 24V DC   |
| <b>STAND-BY POWER</b> | ≤0.5W   |
| <b>MAX LOAD</b>       | 60W, 5A (12V 60W) / 60W, 2.5A (24V 60W) / 100W, 4.2A (24V 100W) |
| <b>POWER FACTOR</b>   | >0.9/120VAC @ max load  |
| <b>EFFICIENCY</b>     | 91% @ 120V max load   |
| <b>DIMMING</b>        | 5-100%  |
| <b>PROTECTIONS</b>    | Short Circuit, Thermal Runway, Over Voltage                     |
| <b>AMBIENT TEMP</b>   | 0°C to 40°C   |
| <b>RATINGS</b>        | cULus Listed / Indoor Use Only                                  |

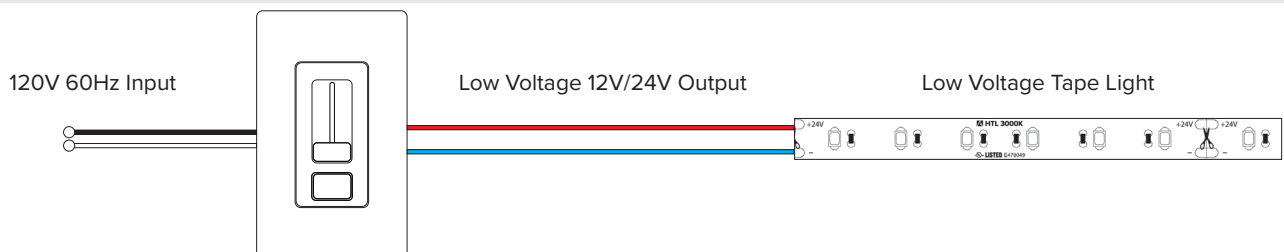
### SWITCHEX QUICK DIMENSIONS



### SWITCHEX ORDERING INFORMATION

| ITEM NUMBER         | DESCRIPTION                         |
|---------------------|-------------------------------------|
| <b>LS-EX-60-12</b>  | 12V - 60W SWITCHEX Dimmer + Driver  |
| <b>LS-EX-60-24</b>  | 24V - 60W SWITCHEX Dimmer + Driver  |
| <b>LS-EX-100-24</b> | 24V - 100W SWITCHEX Dimmer + Driver |

### SWITCHEX QUICK SET-UP



### SWITCHEX COMPLIANCE & REGULATIONS

- cULus Listed (US & Canada) Low Voltage Lighting System
- FCC Approved. Complies with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules.
- RoHS Certified.
- CE Certified.
- Conforms to NEC Code 725.136 (See Mechanical Diagram): Class 1 and Class 2 circuit in same enclosure must be separated by a barrier (partition) unless Class 2 circuit conductors are install in accordance with 725.41 Class 1 Circuits.

### SWITCHEX INPUT

- Input Voltage: 120VAC (108 ~ 132VAC), 50/60Hz (47 ~ 63Hz)
- Power Factor: >0.9 @ 120VAC 60Hz max load.
- Total Harmonic Distortion (THD):  $\leq 20\%$  @ 120VAC 60Hz max load.
- Tested to comply in accordance with IEC 61000-3-2.
- Stand-by Power:  $\leq 0.5W$ .
- Efficiency:  $\geq 91\%$  @ 120VAC max load.
- Input Current: <1.0A @ 120VAC max load.
- In-Rush Current: Meets NEMA-410 requirement at any nominal input full sine wave voltage and maximum load at 25°C.
- Leakage Current: <500 $\mu$ A @ 120VAC.
- Surge/Transient: Tested to meet transients defined in IEC 6100-4-4, level 3 & IEC 6100-4-5, level 3.

### SWITCHEX OUTPUT

- Dimming: Output voltage is adjustable via sliding lever
- Voltage Adjustment Dial: Increases output +1V to compensate for voltage drop from control to luminaire.
- Startup Time: The main supply output voltages remain within the regulation limit of +/- 3%.
- Protections: Short circuit, thermal runaway, and over voltage.
- Output Ripple Current:  $\leq 20\%$  of the rated output current @ 120VAC max load.

### SWITCHEX VOLTAGE ADJUSTMENT

SWITCHEX can provide a 1V boost if the fixture is receiving noticeable light degradation.

- Pop off face plate.
- Use a small screwdriver to adjust output voltage by turning adjustment dial clockwise.

