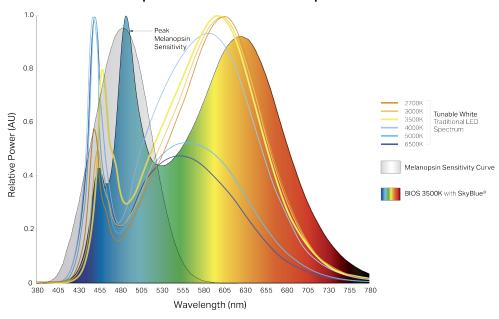
## **bios** SPD Comparison

## **BIOS vs Tunable White**

#### **BIOS vs Tunable White**

**Spectral Power Distribution Comparison** 

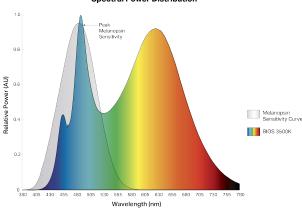


## Tunable White SPD + Melanopsin

### Spectral Power Distribution

# Traditional 3500K 480 505 530 555 580 605 630 655 680 705 730 755 Wavelength (nm)

#### BIOS 3500K SPD + Melanopsin Spectral Power Distribution



#### **KEYTAKEAWAYS**

- · Research has shown that our circadian system has its peak sensitivity in the 'sky blue'
- BIOS spectrum includes a distinct peak in the 'sky blue' region at 490nm where traditional LEDs (used for color tuning) have a significant drop in their sky blue content, regardless of color temperature.
- BIOS surpasses traditional white LEDs in melanopic content regardless of CCT.
- · Beware of sources that claim to provide 'circadian lighting' and do not address this important wavelength within the visible spectrum.
- Color temperature (CCT) alone does not communicate whether a light source will have the proper spectrum to address the melanopsin sensitivity curve.