



In choosing an LED light there are many factors that you will want to take into consideration.

First and foremost is the light's spectrum. LED lights are made up of many small LEDs, or light emitting diodes, that each project one specific wavelength of the electromagnetic scale. We interpret this as the visible (although sometimes invisible) color of a diode. Plants use and absorb an array of colors from 400nm to 700nm in order to carry out photosynthesis. Many LED companies only use 2-3 of the primary colors needed for photosynthesis and plant growth. While these lights provide the plant with the most readily absorbed wavelengths, they ignore crucial parts of the spectrum that the plants also utilize, albeit in smaller quantities. While plants subjected to these conditions find a way to survive and carry out photosynthesis, they are far from actually thriving. Plants that are not receiving their complete lighting spectrum needs can become leggy and produce only wispy flowers. Kind LED Grow Lights feature a complete 12-band spectrum that provides your plants every lighting component needed for robust and complete growth,

throughout all stages of their life cycle.

Another important consideration in choosing an LED grow light is the power of the diode chip set, or wattage. Single watt LEDs are weak and do not have enough intensity to penetrate the canopy of the plant. On the other end of the range, new 10 watt chip sets are unstable, and the heat generated from such a large diode can be difficult to manage. Five watt chips, while stable, can also pose issues if they are not incorporated into the panel in the correct proportion. For this reason, three watt diodes are considered the sweet spot. They incorporate the perfect blend of intensity, durability, and low operating temperature that all LED lights need to succeed. Three watt LED chips can also be driven at the most efficient power level of any sized chip, capable of running at around 80% power, with no detrimental degrading of the chip. Kind LED K3 Series three watt LEDs run at 700ma and are thus the most efficient on the market.

