



**SEAWARD**  
ELECTRICAL SAFETY TESTING  
& MEASURING.

# What happens if the irradiance changes during an I-V curve measurement?

Ideally, if the real life irradiance is constant, the I-V curve will be a straight line. However, in real life, the irradiance can change during the measurement. This is because the irradiance can change due to the sun moving or clouds passing over the solar panel. If the irradiance changes during the measurement, the I-V curve will be distorted. The shape of the I-V curve will depend on how the irradiance changes. If the irradiance increases during the measurement, the I-V curve will be shifted upwards. If the irradiance decreases during the measurement, the I-V curve will be shifted downwards. If the irradiance fluctuates during the measurement, the I-V curve will be distorted in a more complex way. Therefore, it is important to ensure that the irradiance is constant during the I-V curve measurement. This can be done by using a solar simulator or by measuring the I-V curve in a controlled environment.

If you require more help, please contact us at <https://www.seaward.com/login/enquiry/>.