# Free Measurements

Requirements?

# Photocurrent vs. Wavelength

Devices used:

* SMU (Keithley 2600)
* LIA (SRS 810)
* OPM (PM400)
* OPA (Orpheus HP)

Input parameters:

* SMU fixed voltage, V
* SMU Channel Do you need channel selection?
* OPA Start wavelength, nm
* OPA Stop wavelength, nm
* OPA Scan resolution, nm *or* Number or points
* Integration time, sec
* Delay time, ms What is role of Delay time?
* Accumulation

Algorithm:

1. Set SMU output **voltage**
2. Set SMU **output** enabled
3. Set OPA output signal **wavelength**
4. Set OPM wavelength
5. OPA **open** shutter
6. Wait **integration time**
7. Measure SMU Current, A (repeatedly **Accumulation** times and get average)
8. Measure LIA Magnitude (repeatedly **Accumulation** times and get average)
9. Repeat steps 3-8 until not **Stop wavelength** reached
10. OPA **close** shutter

# I-V Curve

Devices used:

* SMU (Keithley 2600)
* LIA (SRS 810)
* OPM (PM400)
* OPA (Orpheus HP)

Input parameters:

Algorithm:

# Photocurrent mapping

Devices used:

Input parameters:

Algorithm: