# **DAILY ASSESSMENT REPORT**

Date:	11/06/2020	Name:	Abhishek
Course:	Learn KiCad: Printed Circuit Board Design	USN:	4AL17EC001
Topic:	<ul> <li>1] Up and Running</li> <li>Silk-screen and copper pour</li> <li>Mounting holes</li> <li>Create a library and put your own</li> <li>component in that library</li> </ul>	Semester & Section:	6 <sup>th</sup> 'A'
Github Repository:	Abhishek-online-courses		

# Image of session

# Report

### Silk Screen

- The silkscreen is printed to the external surface of a PCB to aid in component identification and orientation. Typically this layer contains the component RefDes to locate components on the board after assembly.
- KiCad refers to the silkscreen layers as:
  - ✓ F.SilkS Front silkscreen layer.
  - ✓ B.SilkS Back silkscreen layer.

## **Copper Pour**

- A copper pour or fill refers to an area on a printed circuit board where the original copper is not etched away, and remains in place, usually electrically connected to the Ground signal, producing a "Ground Plane".
- This has a number of advantages, including decreasing the amount of etching fluid required during manufacturing, as well as reducing the amount of electrical noise and signal crosstalk experienced by the circuit elements.

# **Virtual Components**

- Virtual components are those which have a footprint on the PCB (and may additionally have a schematic symbol) but do not have an associated physical component which needs to be loaded onto the board during assembly.
- Examples of virtual components include:
  - ✓ Mounting holes.

- ✓ Solder bridges.
- ✓ Net ties.
- ✓ Test points.
- ✓ Fiducial markings.

**Custom libraries** can be created in KiCad using the existing libraries which can be edited however the user wants it to be and make use of the custom library in the projects.