

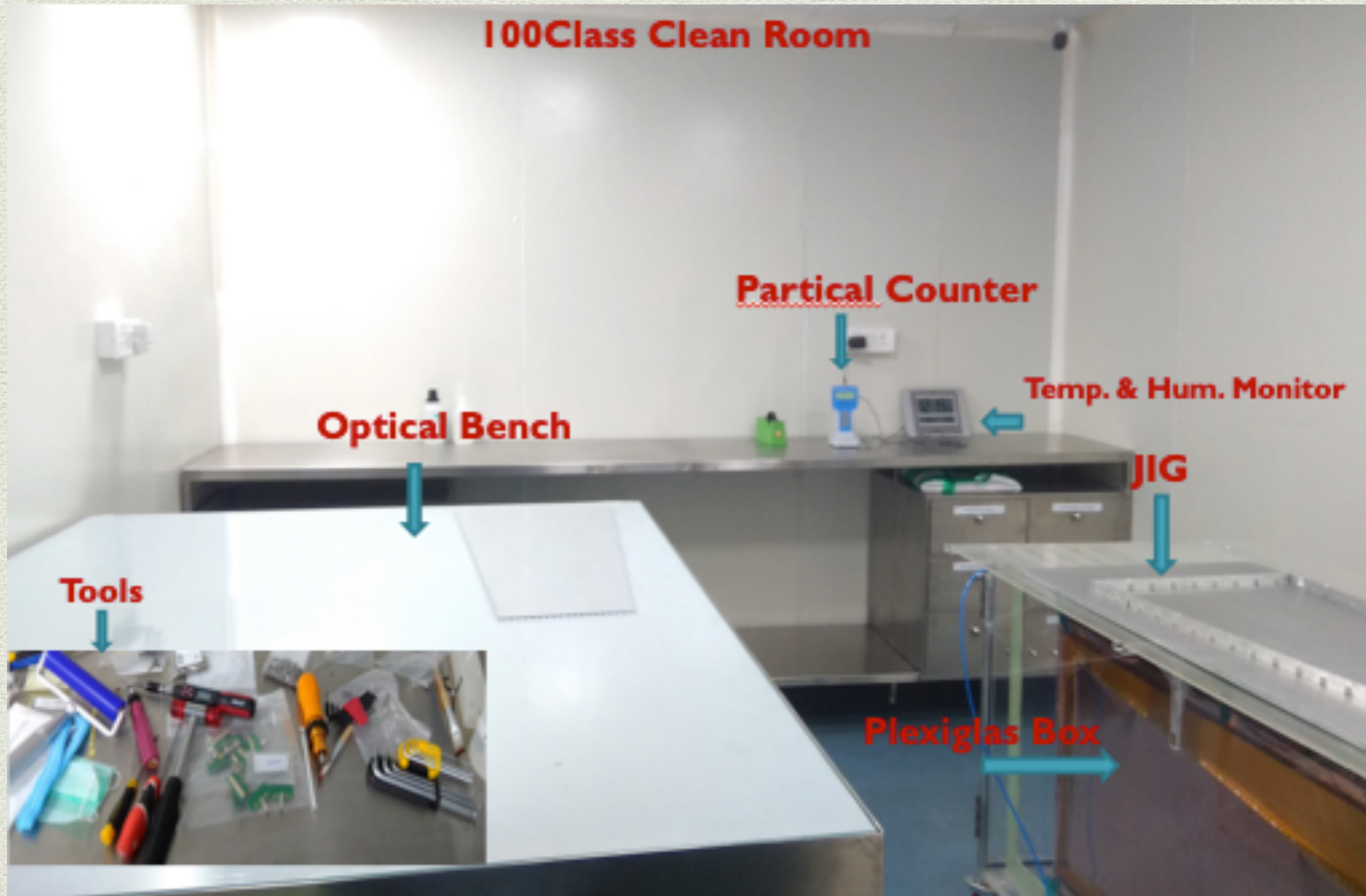
# Status of Delhi University

*Mohit Gola (University of Delhi)*

*on behalf of*

*Delhi GEM group*

# Clean Room



# Gas Mixing Unit

- ❖ We have two gas mixing unit.
- ❖ One with the manual MFCs and also we have designed and made locally with the help of digital MFCs.
- ❖ Also having a facility of pre-mix bottle of Ar/CO<sub>2</sub>.



# Gas leak Setup (QC3)

- ❖ Gas leak setup used for the GE1/1 production is fully functional.
- ❖ Another setup prepared.
- ❖ Two chambers can be tested simultaneously.
- ❖ No change in the setup required after GE1/1 testing.



# High Voltage Test(QC4)

- ◆ DAQ for the QC4 test is fully operational and tested for small size detectors.
- ◆ Procured few more modules and one more Mini-crate to replica this setup like pre-amp, scalar, power-supply, etc.
- ◆ Which helps in testing of two chambers simultaneously.



# Gain and Response Uniformity(QC5)

- ◆ Buying a new X-Ray, may be available by this year.
- ◆ Also procured few spare modules like pre-amp, amp., etc.
- ◆ Fully functional SRS system with FECv6.
- ◆ Have two or three pairs of spare APV.



# Summary

- ◆ We have assembled 8 detectors and tested 16 (8 from Delhi + 8 from Punjab) detectors till response uniformity QC5(2).
- ◆ The Delhi site is fully ready to produce the GE2/1 modules. And we can produce two modules or more per week.
- ◆ Need to do few minor modification in quality controls setups due to shape of the GE2/1 modules like supporting structure of copper box, rotatory table, HRS to Panasonic connector.
- ◆ Also need to procure assembly tooling required to build GE2/1 modules like jig, plexiglass.
- ◆ The manpower includes the 2 Physicist, 2 Research scholars and 2 Engineer. Also, few (2-3) Ph.D. students are going to join our group before the end of this year.

**Thanks**