



National Nanofabrication Centre  
Centre for Nano Science and Engineering  
Indian Institute of Science  
Bangalore, India



## **USER AGREEMENT**

The National Nanofabrication Centre (NNfC), also referred to as the Nanofab or the Fab, is a multi-user facility serving the needs of students, staff, faculty, INUP participants and industrial visitors. The Nanofab houses many expensive pieces of sensitive equipment. It also houses many chemicals and compressed gases which pose significant hazard if handled incorrectly.

All users of the Nanofab are expected to go through the protocols, procedures and guidelines given below and detailed in various documents posted on the NNfC Twiki, the information resource of the Centre. It is impossible, however, to define a policy or a rule for every conceivable situation. Under these circumstances, the users are expected to act in a professional manner displaying courtesy and respect to the staff members of NNfC and to other users, and to exercise discipline to enable smooth and safe functioning of the facility.

### **User Guidelines**

#### **1. Essential documents**

Please read all reference documents listed below. Please note that these documents change from time to time and the users are required to keep themselves aware of the changes, in consultation with the Technologists in the Fab. Note that each piece of equipment in the Fab has an “owner” who is on the Fab staff.

- a. Cleanroom Protocols and Gowning procedure
- b. Chemical Safety and Protocols
- c. Emergency Evacuation Procedure
- d. Equipment Rules and Regulations applicable to the equipment. Trained independent users are expected to go through the equipment manuals in addition to the operating procedures in order to be able to handle the equipment in the absence of Technologists.
- e. When you are not sure of anything connected with using any equipment/facility in the NNfC, consult the NNfC staff before proceeding further.

#### **2. Responsibility**

- a. Each user is responsible for the equipment and the facilities he/she uses.
- b. Do not use any equipment without first reserving it with the online scheduler.
- c. Report to the NNfC staff if you find equipment/its accessories was left in inappropriate condition by the previous user. Report any missing accessories or malfunctioning of equipment. Do not try to repair or change other than user settings without checking with the equipment owner.
- d. Leave all equipment in the same condition as when you began work, or in a better condition. Fill out the log book after use.
- e. Report any potential safety hazards to a member of the Fab staff.
- f. A user *may not* carry out work in NNfC on behalf of anyone else, without obtaining prior permission from NNfC staff to do so.

### 3. Accountability

Violations of Nanofab protocol and procedures will result in penalty points and restricted access and privileges. A brief list of common violations is given in Annexure 1 to this agreement. Please note that this list is only indicative and all violations will attract punitive measures even if not listed here.

The disciplinary measures that will be applied are shown in the following table. NNfC management reserves the right to change or impose additional penalties from time to time.

Cumulative penalty points	Disciplinary action
>=30 points	1 week suspension
>60 points	2 week suspension
>90 points	3 week suspension
>100 points	Barred from access to the cleanroom.

Any user who has accumulated 100 penalty points and is barred from access to NNfC will be referred to NNfC disciplinary committee which will decide on future course of action in each case.

By signing below, the user warrants that he/she has read, understands and agrees to abide by the usage rules and safety provisions of the Centre. While the user will be made aware of the general chemical safety and in the operation of the particular processing equipment required for his/her work, the user assumes primary responsibility for his/her personal safety. CeNSE assumes no liability for any injury or illness suffered by the user during the course of his/her work at the NNfC. User undertakes to operate all equipment and tools in a safe and professional manner, consistent with the operating instructions and Fab rules. The user understands that he/she will be held responsible for any damage caused if he/she fails to follow proper procedures.

The user agrees to acknowledge NNfC in all publications, presentations or any other form of technical documents based on work done partially or fully at the NNfC.

Suggested text of the acknowledgement is "This work/part of this work was carried out at the National Nanofabrication Centre (NNfC) located at the Centre for Nano Science and Engineering, IISc, Bangalore, funded by MCIT and DST, Government of India."

User's signature:

Supervisor's signature

Name:

Name:

Organization:

Organization:

Email ID and phone:

Email ID and Phone:

## ANNEXURE 1

### Violations that attract 10 penalty points

- Not following the lab entry and gowning procedures
- Carrying prohibited personal belongings (carry bags, backpacks, food, drinks etc) Into the cleanroom.
- Doing personal work or browsing the net on equipment-interfaced PC
- Bringing visitors into the cleanroom without permission.

### Violations that attract 15 penalty points

- Use of equipment without prior reservation or authorization from equipment owner
- Not showing up for a booked slot without prior intimation to equipment owner
- Using equipment you are not trained on or authorized to use
- Failure to follow standard operating procedures while using the equipment
- Failure to clean up equipment workspace after your slot
- Carrying out work on behalf of others without first obtaining permission

### Violations that attract 30 penalty points

- Unauthorized removal /bringing of equipment or associated accessories/materials to or from the Fab premises
- Handling chemicals without using the recommended Personnel Protective Equipment (PPE)
- Entering speciality gas storage area without staff approval and training
- Failure to immediately respond to and/or report equipment problems, injuries or safety hazards

### Violations that attract 100 penalty points

- Tampering with the bio-metric entry system or security cameras.

❖ **Note: Repetition of same mistake will attract double the penalty point**