

Risk Assessment Form

(This is an active document and must be maintained)



UNIVERSITY OF
CAMBRIDGE

Materials Science and Metallurgy

Date: 10/10/18

New Building

Supervisor of Room/Area: N.STELMASHENKO

Room or area: Room -1_019
(Describe location)

Name of Assessor(s): H. Bradshaw

Title of Activity / Experiment / Work Area:

Thin film growth Laboratory/ Sputtering Room

Description of Activity / Experiment / Work Area:

1. Loading crucibles/Pumping UHV System
2. Liquid N₂ handling
3. Sputtering
4. Filling-up gas reservoirs

SECTION 1: Identify all significant hazards, who or what may be affected by each individual hazard and controls in place to reduce risk to a minimum.

Hazard Description	Hazard to whom or what	Controls in place to reduce risk to a minimum
1a) Back injury	User	Training in correct loading technique and posture
1b) Burns from bake-out	User and others in the Room	Change of the tape colour when heated
2a) Cold burns	User and others in the Room	Proper user training and available protective clothing
2b) Asphyxiation	Everybody in the Room	Ventilation and oxygen sensors are installed
3. Electrocution by HT sputtering supply	User	Full system isolation with safety breakers; proper user training and established operational protocol.
4. Quick release of pressurized gas	User	Gas bottles secured, use of regulators, user training provided.

Continued overleaf.....

SECTION 2: Emergency Procedures

1a) Long-term occupational risk, no emergency procedure

1b) Standard first aid against burns – keep the injured part under running cold water for 10 min

2a) Keep the injured part under running cold water for 10 min

2b) Evacuate the room when oxygen alarm sounds and contact the FIRST AID PERSON

3. Shut down power supply, ensure affected person is grounded before approaching, call for medical backup.

Signature of Assessor(s)		Date:10/10/18
Signature of Supervisor		Date:10/10/18

SECTION 3: Review - This assessment must be reviewed every 12 months or earlier if the basis of the original assessment is altered.

Review Date	Reviewed by (Signature)

Review Date	Reviewed by (Signature)