



<b>Title of project/experiment/activity</b>			
Surface Profilometry			
<b>Location of activity</b> EEDB Annexe, Ground floor, Atomic Force Microscopy Laboratory		<b>Start and end dates</b> 10/6/2016 – open-ended	
<b>Brief description (or attach procedure/protocol)</b> A Bruker DektakXT Stylus profilometer is used to measure step heights. A metal needle, stylus, is used to scan across samples and measure differences in height along a measured line. A height profile of the sample surface along the measured line are obtained.			
<b>Hazard</b>	<b>Effect</b>	<b>Control measures</b>	<b>Residual risk</b>
Pinch point	Skin damage, bruises	Wherever possible, physical guards have been placed around moving parts to prevent users from contacting them. The exceptions are the areas around and above the X-Y stage. The motorized stage can move in x-y direction. The movements of all axes are slow, but are capable of exerting high forces. Users should wait for the stage movement to finish before loading and unloading samples to avoid their hand being caught. Do not put your hands close to the stylus.	Low risk
Electrical shock	Shock to user	No non user-serviceable parts such as electronics should be opened. They can only be serviced by Bruker. Users should not attempt any system repairs.	Low risk



<b>Personal Protective Equipment required [eye/face protection, respiratory protection, gloves, lab coat etc]</b> No general personal protective equipment is required. Some samples might require wearing gloves.
<b>Emergency Instructions &amp; First Aid</b> <b>Fire:</b> In case of fire, the fire alarm should be activated and fire service called. Evacuate the building. <b>Other:</b> In case of any emergency, press the emergency power off button on the remote control.
<b>Any special monitoring required [e.g. hearing test, vibration monitoring, health surveillance]</b> N/A
<b>Further control measures required? If yes, list with actions.</b> N/A
<b>Biological/Laser/Radiation Approval [requires relevant Specialist Safety Officer signature and date]</b>  <i>Signature of Departmental Laser Officer:</i>  <i>Date:</i>
<b>Out of hours/Lone working</b> Out of hours working must be authorized according to Engineering Department regulation.

**Department of Engineering – Risk Assessment**

**Ref No.**

Signature to confirm that this is a suitable and sufficient assessment of risk and that stated control measures are in place. This risk assessment should be reviewed if additional risks not covered in this assessment are identified or if there is any reason to indicate that the control measures are insufficient.

<b>Name of Assessor</b> Anna Ott Email: ako24@cam.ac.uk	<b>Signature</b> 	<b>Date</b> 10.6.2016
<b>Name of Supervisor</b> Prof. A.C. Ferrari Email: acf26@cam.ac.uk	<b>Signature</b> 	<b>Date</b>

<b>Local Safety Coordinator</b>	<b>Signature</b> 	<b>Date</b> 1/11/16.
<b>Departmental Safety Office</b> IAN SLACK	<b>Signature</b> 	<b>Date</b> 23 AUG 2017

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approved by Y. Hawesidge (Fac. Mgr)  
 Ava