

HOT WORKS - Safety Guidance note

Scope:

Any works on site which involves hot works such as those activities requiring a naked flame, soldering or welding etc.

These activities can cause the structure or other material on site to catch fire and or directly cause injury to operatives or others in the proximity of the work.

These activities can give rise to the need to transport and store flammable materials on site, as such special precautions will be required to ensure items such as gas bottles are transported, stored and handled in an appropriate and safe manner at all times.

Typical activities which involve hot work are torch applied felt roofing, soldering lead roof material, welding pipe work in plant rooms, at roof level or within buildings, heating pre-soldered pipe connections in plumbing installations with a blow torch, cutting steel with oxy/acetylene torch etc.

Control Measures:

- 1) Where possible the hazard is to be designed out by the designer, for example use a cold applied roof material instead of torch applied material. Alternatives may be more expensive but this expense needs to be weighed in favour of safety to operatives, occupiers and property.
- 2) A hot work permit system is to be employed to control the work. This to be detailed in the contract documents and include the need for
 - UoE to issue an overriding permit (via Concept) to the contractor which calls for the contractor to issue a daily permit after inspection of the work area, the use of trained personnel, the provision of fire extinguishers at the work site, the need to stop hot work one hour prior to end of working day and inspections for smoulder to be made and logged after 5 minutes and every 10 minutes thereafter up to one hour – all inspections to be logged.
 - UoE clerk of works/project coordinator/consultant to visit site and inspect the hot work permit system and work area in detail at least every two days. Record visit and findings in accordance with Contractor Performance Monitoring arrangements.
 - Any shortcoming in procedure or site works to be immediately brought to the attention of the main contractor. Hot work to be immediately halted pending remedial action. Hot work only to be recommenced with approval of UoE clerk of works/project coordinator/consultant. If the contractors cannot get the works carried out in accordance with the permit to work or satisfaction of the University then the sub-contract or main contract is to be terminated in accordance with the terms of the contract. Ensuring the roof works are brought to a waterproof standard prior to contractor leaving site.
 - Fire procedure to be detailed and issued to all site personnel via detailed site induction process. It is important the site personnel understand how to raise the alarm immediately in order to evacuate the building (if occupied) on the outbreak of a fire. Site personnel must also clearly understand how to evacuate the site and call emergency services.

Insurance:

Ensure both the main contractor and sub-contractor have at least £5.0m public liability insurance which specifically includes hot work on the policy document. This will entail obtaining the relevant insurance documents and detailing this requirement in the contract documents at tender stage.

Notify the University insurance office of the fact hot works are involved at least three days in advance of works commencing and they will require copies of the insurance documents of both the main contractor and sub-contractor. Insurance office contact is Paul Hirst on 3087 or P.S.Hirst@ex.ac.uk.

Reference:

- **CDM 2007 REGULATIONS APPROVED CODE OF PRACTICE**
- **CIRIA 662** - CDM 2007 – Construction Work Sector Guidance for Designers (Third Edition) is also a very useful guide to designers when assessing hazards.
- **CIRIA 663** - CDM 2007 – Workplace “In Use” Guidance for designers.
- **CITB CONSTRUCTION SITE SAFETY GE700** (ensure use of up to date publication as revised annually)