Guidance for the Evaluation of Method Statements for Entry into Hub Rooms

What is a Hub or Switch Room?

Hub rooms are spaces which are used to house information technology services and systems. These spaces contain network switches and associated control systems or telephone network control systems and are managed by IT Services. Hub rooms cannot be accessed without a Permit to Access or work which is issued by ITS.

What is a Data Centre?

Data Centres are spaces which are used to house information technology services and systems. These spaces contain servers, networking connections and associated control systems and are managed by IT Services. Data Centres cannot be accessed without a Permit to Access or work which is issued by the ITS.

Building Register

Coventry University maintains a register all areas within its estate including Hub Rooms, Switch Rooms and Data Centres. Information on each space in available from the Estates Department and or ITS

Hazards in Hub Rooms, Switch Rooms and Data Centres

Supplementary Cooling Systems - as the equipment housed in hub rooms, switch room and data centres generate significant amounts of heat supplementary cooling is installed to reduce the air temperature to a suitable level. Lower temperatures can cause fatigue and prolonged periods in these areas could lead to concentration difficulties.

Fire Suppression Systems - data centres are likely to have inert gas suppression systems installed to extinguish a fire upon early detection. Interference with such systems or subjecting the connecting pipe work or containers to damage could result in an unintentional activation of the gas. Such situations can lead to breathing difficulties and asphyxiation.

Advanced Fire detection Systems – due to the University's reliance on its IT infrastructure early detection of fire in Hub Rooms, Switch Rooms and Data Centres is critical to the business continuity plans of the University. To support the concept of early detection many of these spaces will be fitted with aspirating smoke detection which will continually sample the air for products of combustion. These detectors are especially sensitive to dust, heat and small amounts of smoke and are therefore easily activated in error.

Damaged Services and Electrical Systems – services in Hub Rooms, Switch Rooms and Data Centres such a water pipes, electrical cables and heating systems may have been damaged from theft and vandalism. It is possible for such services to be live or dangerous.

Uneven and Irregular Floor Surfaces – as Hub Rooms, Switch Rooms and Data Centres are infrequently accessed by the staff the floor surfaces can be uneven or congested as a result of the storage of spares and equipment. This may result in trip hazards being present in the building which could be the cause of falls. The risk of falls is increased in low lighting situations.

Low headroom and restricted space – some Hub Rooms, Switch Rooms and Data Centres may have pipes or ductwork that is below head height on access routes, this can lead to head injuries if a collision occurs whilst in the plant room. Some spaces will be restricted and may create additional hazards for personnel moving around the area.

Precautions for access to Hub Rooms, Switch Rooms and Data Centres

As a **minimum** the following precaution should be applied to all access into Hub Rooms, Switch Rooms and Data Centres

1. The entry into the space must be subject to the University's Permit to Access System; no other local arrangements or contractors systems should be accepted. There permit must not be issued until a suitable and sufficient risk assessment and safe system of work has been supplied by the company or individuals undertaking the work.

2. The permit to access does not cover working and a separate permit must be applied for to undertake work in Hub Rooms, Switch Rooms and Data Centres.

3. Those entering the space should be aware of any residual hazards that exist in the space; this information can be gained from the hazards register for each Hub Rooms, Switch Rooms or Data Centre.

4. Those entering the space should not touch or interfere with any equipment in the area unless they have a permit to work and are considered to be competent in working on the specific equipment.

5. The entry into the space should involve an effective communication system which enables lone working procedures to be followed.

6. Safe access and egress to the space should be identified in the safe system of work; this may need to provision of temporary escape routes. Clear and conspicuous safety signage must identify that entry into areas left open for access is prohibited.

7. Suitable lighting should be available during the task either from existing lighting in the area or supplementary lighting such as battery powered lighting. In either case emergency lighting should be available to aid escape in the event of a power failure.

8. Where necessary Isolation of fire detection and suppression systems. Isolation requires the physical disconnection of the flow of power to the equipment in such a way that they cannot be accidentally reenergised. This will usually require isolation and locking off of the plant at the distribution board or at the local isolation switch. Any devices used to lock off equipment should only be removable by those working in and controlling the space.

9. The wearing of Personal Protective Equipment (PPE) such as overalls, safety footwear, gloves, safety helmet and dust masks. Consideration should be given the specification of PPE where a contaminated atmosphere may exist. In high noise areas the wearing of suitable hearing protection must be considered as a mandatory item of PPE.

Further Guidance

Further Guidance on entry into plant rooms is available from the Estates Department, ITS and the University's Safety and Risk Management Team.