



**SAFETY ALERT**



**JKKP/DOSH**

## **COLLAPSE OF FALSEWORK**



A falsework collapsed during concreting works in construction site in Kuala Lumpur. The accident causing 1 worker died. Based on investigation, cause of the accident was the falsework structure not capable to bear the applied load. Lack of co-ordination between the contractors, engineers and suppliers of falsework material and lack of understanding on structural shoring details and requirements could possibly be the underlying cause of the accident.

Falsework is any temporary structure used to support a permanent structure while it is not self-supporting, either in new construction or refurbishment. Any failure of falsework may lead to the collapse of the supported structure. All parties including suppliers are responsible to ensure the safety of workers who work with falsework. As per mentioned in section in section 20 of Occupational Safety and Health Act 1994, it shall be the duty of a person who designs, manufactures or supplies material for use as falsework to:

- a) ensure, so far as is practicable, that the material is designed and constructed as to be safe and without risks when properly used;
- b) carry out such testing and examination as may be necessary for the performance of the material;
- c) to take necessary steps to secure that there will be adequate information about the materials and any condition necessary to ensure that it will be safe when used.

The law requires formwork and reshores shall be certified structurally safe by a Professional Engineer and shall be properly braced or tied together so as to maintain position and shape as required by regulation 28(1) of the Factories And Machinery (Building Operations And Works Of Engineering Construction) (Safety) Regulations 1986 (BOWEC). A **designated person** should be appointed for each site, with responsibility for co-ordinating the various items and stages of use of the falsework. The **designated person must**:

- i) ensure that correct falsework procedures are followed and that operations are carried out safely. Falsework should be constructed in accordance with BOWEC 1986 and BS 5975 Code of practice for falsework (and subsequently to BS EN 12812, when it is published) or other relevant standards.
- ii) suitably technical person who has structural engineering knowledge.

iii) concern towards the preparation of a design brief, which should serve as the starting point for subsequent decisions, design work, calculations and drawings. Initial planning should cover what needs to be supported, and how it should be done and how long the falsework will be in use.

**Further Information:**

Occupational Safety and Health Act 1994

Factories and Machinery (Building Operations And Works Of Engineering Construction) (Safety) Regulations 1986 (BOWEC)