



HEALTH AND SAFETY
AUTHORITY

SAFE SYSTEM OF WORK PLAN (SSWP)



NEW COMMERCIAL BUILDINGS PICTOGRAMS



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NEW COMMERCIAL BUILDINGS

PICTOGRAMS

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Start Up and Ongoing Site & Planning Requirements

SUPERVISION



Supervision, generally by the person in charge (eg, the foreman), is essential to ensure the activity is completed as planned, and to a safe system of work.

SAFE PASS



As identified in the Construction Regulations, all people engaged in construction work must possess a current Safe Pass card, having successfully completed the one-day safe-pass training. Safe Pass cards must be renewed as appropriate. Proof of such training should be available on site.

PLANT/EQUIPMENT CERTIFICATION



It is a legal requirement for most construction plant to be tested and examined regularly, in particular all lifting appliances and lifting gear. The certificates relating to these must be kept up to date.

CSCS



The Construction Skills Certification Scheme, as prescribed in the Construction Regulations, identifies certain skills on construction sites that require mandatory training. On successful completion of this training, persons are given a CSCS card. CSCS cards must be renewed as appropriate. Proof of such training should be available on site.

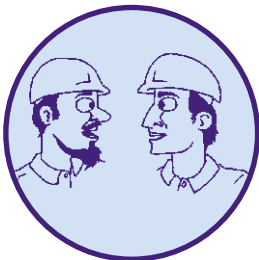
INDUCTION



Every new contractor or new employee on a site should undergo an induction when they first arrive on site. This induction should inform the attendees about: site rules and procedures, the arrangements for their safety and welfare on site, who the key duty holders are.

Emergency plans/procedures should be explained at inductions (they must also be available in writing), so that, if an incident occurs on site the risk of injury to workers and people in the vicinity is minimised. These measures must also deal with rescue. When developing the emergency plans, it may be necessary to liaise with the local emergency services.

COMMUNICATION



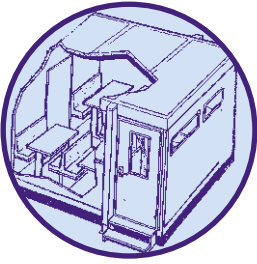
Timely and good communication is essential at all times. Clear communication helps to ensure that tasks are understood and completed in a safe manner.

WC & WASHING



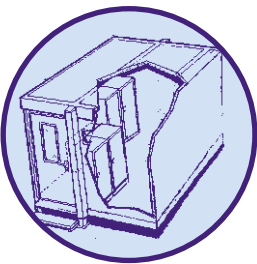
Toilets and a hand-washing facility must be provided on all sites. The facility must include a sufficient supply of hot or warm and cold running water, toilet tissue, soap and towels. The facility must be conveniently accessible and be kept clean and hygienic.

CANTEEN



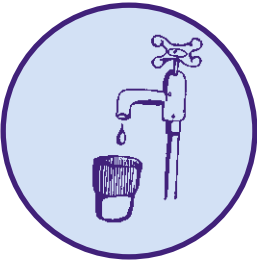
A facility must be provided for workers to take breaks. Minimum requirements include: a facility for boiling water, tables with impermeable surfaces, chairs with backs. It must be properly ventilated, have adequate light, kept in a clean, hygienic condition and should not be used for storing building materials or plant.

DRYING/CHANGING



An area, separate from the canteen facility, must be provided where workers can change and dry clothes.

DRINKING WATER



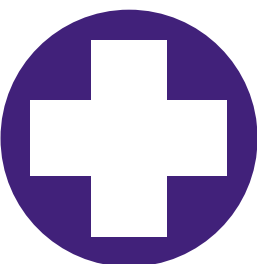
An adequate supply of wholesome drinking water must be provided at a convenient point (or points).

SMOKING CONTROL



Smoking is prohibited in enclosed work places.

FIRST AID



First-aid equipment must be provided and maintained, and be easily accessible. At least one first aider should be available if the site-specific Safety Statement risk assessment shows that this is necessary. A trained first aider should generally be available to all construction workers.

GENERAL ACTIVITY



This section identifies the general set of controls that are likely to be required for most activities covered by this form. So no matter what trade or activity you supply to the project e.g. mechanical, electrical, carpentry, painting, dry lining, roofing, frame erection and landscaping etc, this row of controls must be reviewed before any hazard specific controls are identified.

DRAWINGS



All planned work will generally be accompanied by a set of drawings. In most cases where drawings have not been provided (eg, for alterations or rework), drawings should be sought from the designers responsible. These drawings should normally identify the sequence and final position of constructed or installed equipment, components and materials, along with all other necessary information. It is also recommended that construction drawings identify notes about any relevant safety procedures/methods.

RISK ASSESSMENT



Each activity on site needs to be risk-assessed, to identify potential hazards (eg, working with live electricity, hazardous chemicals or at height, manual handling, etc). If there is risk of injury, appropriate controls must be put in place. If the hazard cannot be eliminated, the risk must be reduced as far as possible.

METHOD STATEMENT



Because construction work is hazardous, detailed method statements/procedures that describe the safe system of work, step by step, should be developed for high-risk activities. Such activities need to be suitably planned, organised and controlled. These procedures must be in writing and be communicated to all workers in a language that all can understand. The method statement should include at least the following: a) the schedule of responsibilities; b) details of selected work methods; c) details of equipment to be used; d) details of ancillary equipment; e) the name of appointed duty holders; and f) a complete plan setting out the sequence of the operation (from site preparation, arrival of equipment on site, any necessary erection, positioning of equipment, lifting and placing of load(s), and dismantling of equipment, to moving off site). The plan must take account of all structural and related surveys and drawings, etc.

HOUSEKEEPING



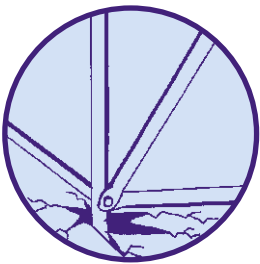
All slip, trip and fall hazards must be removed so that people can get safely to their place of work. A good housekeeping system must be adopted, so that everything has a place and is in its place. Excessive amounts of dust can cause eye and respiratory irritation. Dust and muck are a nuisance for workers and others in the vicinity. All traffic routes in public areas near construction works should be kept clear of muck. During dry periods the routes should be dampened to keep dust down.

ACCESS ROUTE



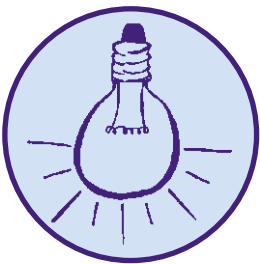
There must be safe routes to and from the place of work.

GROUND CONDITIONS



Before scaffolding is erected, or where other external access equipment is used, the ground must be prepared so that it can support the safe use of such equipment and any other loads applied.

LIGHTING



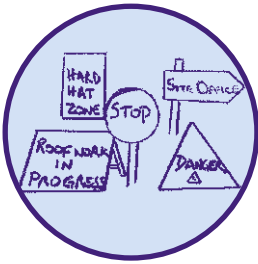
People who need to go to or work in darkened areas must have adequate lighting so they do not slip, trip or fall, or collide with projecting objects.

WORKING PLATFORM



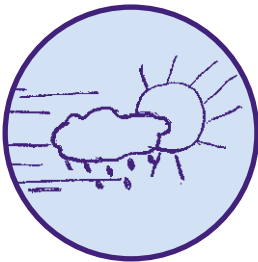
A working platform is an area that allows work at height to be carried out safely. It provides protection and prevents a worker from falling to a lower level. Generally it is used to refer to scaffold platforms but, where scaffolds cannot be erected, it can also refer to other safe platforms such as MEWPs, scaffold towers, etc.

WARNING SIGNS



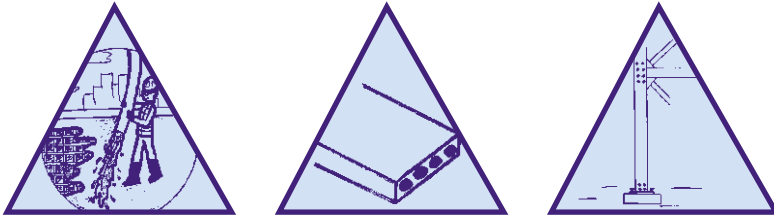
Warning signs must be used across the site to alert workers or others when they are approaching high-risk areas (eg, leading edges, excavations, and exclusion zones). Signs should also be used to convey safety information (eg, 'scaffold unsafe to use'). Signs must be placed at an appropriate location, and be clear and in a language that all workers and people on site can understand. Signs should always be complied with.

WEATHER



Bad weather can lead to unsafe working conditions. In high winds or icy weather, it may be necessary to cease work at height in exposed areas. Also, in high winds, loose materials may need to be removed or tied down to prevent them blowing or falling. Cranes must not be operated in wind speeds that are in excess of those specified by the crane manufacturer. In hot sunny weather, sun protection must be considered, as well as the provision of drinking water to prevent dehydration.

IN-SITU, PRECAST, STEEL WORK



This section highlights the main controls covering high-risk activities associated with constructing superstructures, concrete work, precast and steel-work erection.

PROPRIETARY WORKING PLATFORM



The manufacturers of the many types of proprietary falsework systems also supply associated working platforms, complete with safe ladder access, guard rails and toe boards, to help prevent falls from height. When proprietary systems are used, the associated designed working platform must also be used. These platforms must be erected by fully trained personnel in accordance with the manufacturer's recommendations. No contractor should erect the system in a way that deviates from the manufacturer's recommendations unless the manufacturer or a competent designer has given approval.

Where non-proprietary systems are used and work is carried out at height, workers must be protected by properly designed fall-protection systems such as working platforms complete with safe ladder access, scaffolds or mobile towers. Only as a last resort should individual fall protection measures be used.

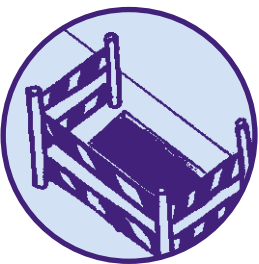
PROPRIETARY EDGE PROTECTION



Manufacturers of decking systems or form tables also supply associated edge-protection systems. These usually consist of uprights which clamp onto beams, along with guard rails and toe boards. When these proprietary systems are used, the associated edge-protection systems must also be used. These systems must be erected by fully trained personnel in accordance with the manufacturer's recommendations.

Where non-proprietary systems are used and work is carried out at height, workers must be protected by properly designed edge and fall protection systems such as working platforms complete with safe ladder access, scaffolds or mobile towers. Only as a last resort should individual fall-protection measures be used.

GUARD ALL OPES



All floor openings, as soon as they are created, must be covered or guarded to prevent falls. Normally this means surrounding the opening with visible guardrails and toe boards that are anchored and fixed securely.

Where openings are covered, the covers must be of adequate strength and size and be firmly fixed in position. These covers should identify what they are covering so that they are not inadvertently removed.

STEEL FIXING



Where possible, steel fixing should be organised to prevent manual handling injury e.g. can the work be done at waist height on tables or other raised platforms, so continual bending is not needed? Where possible, the work should be pre-assembled at ground level and then lifted into position. Slips, trips and puncture injuries are risks. Walking across steel mesh can be difficult and can result in injury. Storage areas should be set up and walkways created. Ply decking over steel mesh may assist safe access. To prevent hand and eye injuries, goggles and gloves must always be worn.

CONCRETE POUR



Working with wet cement and concrete can result in dermatitis. To prevent skin coming into contact with wet cement, overalls, gloves, high boots and goggles should be used.

CONCRETE POKER



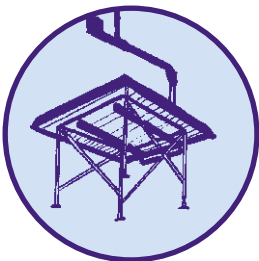
Vibrating pokers are generally used to agitate and mix wet concrete. Frequent job rotation and maintaining equipment in good order help to prevent vibration from causing ill effects. Goggles and gloves should be used. When work is at height, a properly erected working platform should be used.

STRIKING

When striking any system of formwork, tables, propping and boards, etc, all components should be lowered or removed in a planned and systematic way. No loose boards should remain in place. When formwork is being removed close to the edge of a building, make sure that no worker risks falling over the edge. A safe system of work must be put in place prior to commencing such work.

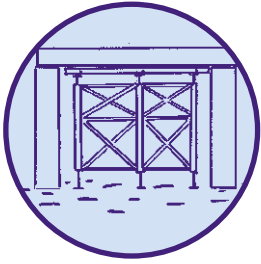
Particularly when it is windy, propping or decking components should be removed and placed in designated storage immediately. Do not strike in heavy winds.

Storage of struck components must be planned to prevent trips or injuries due to protruding nails.

FORM TABLES

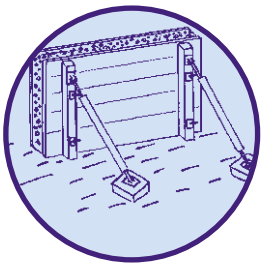
When form tables are lifted from one level to another, suitable lifting gear must be used. Proprietary table systems are normally lifted with the associated proprietary lifting gear (eg, large 'C' hooks). Such lifts will usually be coordinated between the banksman and crane operator. When the tables are dropped and moved to the edge of the slab, make sure that no worker risks being hit by the table when it is moved off the slab's edge. If chains are attached to assist the lift, the person attaching the chains must not be at risk from falls. Fall-protection measures must be used. When 'flying tables' (moving the tables from one level to another), an exclusion zone should be created under the lift area. Form tables should not be lifted in heavy winds.

TEMPORARY WORKS



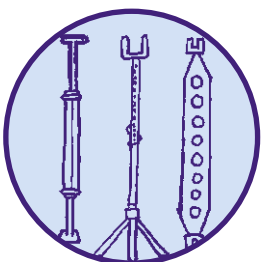
Temporary works refer to any site installations needed to facilitate the construction of permanent works but which do not remain as part of the permanent works. In this section, we are particularly referring to falsework (ie, scaffolding or other temporary structural support for concrete formwork). Temporary works generally require formal design, and an appointed competent temporary works coordinator will normally oversee, coordinate and manage the process of temporary works.

PROP SUPPORTS



Care must be taken in selecting the appropriate method for propping formwork. Calculations and decisions need to take account of such parameters as materials used, size, weight, space and location of the formwork, etc. Structural engineering advice is normally required. Formwork and related propping must only be carried out in full compliance with the approved design.

TYPES OF PROP



Whether it is propping to support formwork, or the support of a large steel or concrete component, selecting the appropriate props is crucial. Competent structural engineering advice is necessary.

Proprietary propping systems should not be mixed for the one application.

MATERIALS DELIVERY



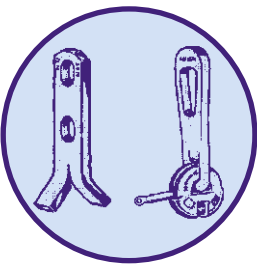
To assist in safe precast and steel erection, it is essential that the build components arrive on site in the correct order for systematic and safe erection. To avoid site congestion, transportation of large structural components to site must be carefully planned and not result in unsafe movements by vehicles or unsafe lifts that could result in workers or members of the public being injured.

SPREADER BEAMS



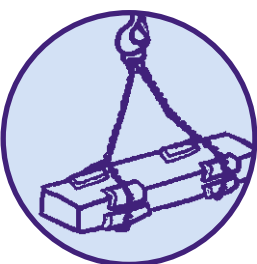
Spreader beams, which spread the load being lifted, are recommended for lifting long, large objects. As with all lifting gear, before they are used, the inspection and checks to be carried out should include: a) ensuring that the load to be lifted is within the safe working load (SWL) of the lifting gear and (b) ensuring that any defects that may reduce its capacity to function safely are repaired. Lifting gear must be appropriately certified prior to use.

CLUTCHES AND RINGS



Transport anchor systems can be used to lift precast concrete units. Advice from a competent person is required to ensure the proper selection of the ring clutches for the anchors, and for their safe use.

PACKING PIECES



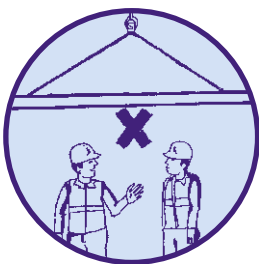
When precast components are lifted with chains, packing pieces should be used to prevent damage to the chains when the chain links bend around sharp angles.

TAG LINES



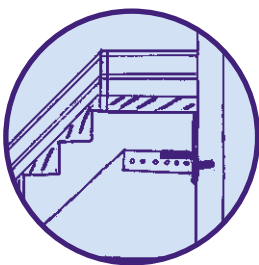
When long loads (eg, shutters, steel sections, etc) are lifted, slingers should attach a rope or 'tag line' to one or both ends of the load so that rotational movement may be controlled. Tag lines can assist precise orientation of components and control their landing so that people in the area do not risk being struck.

EXCLUSION ZONE



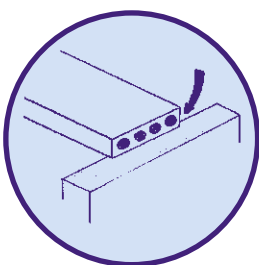
As a general rule, no-one should work under an area where loads are being lifted or within the working radius of the jib. People should be kept a safe distance from working plant. Barriers should be used where possible.

FIXINGS AND ANCHORS



Load-bearing connections, including use of angle brackets and bolts, must be as specified by the design and have regard to the manufacturer's specifications. Bolts must be of suitable size and inserted to the required depth in the correct manner, to the designed centre distances.

SLAB BEARING



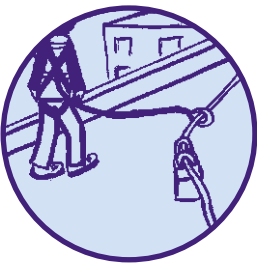
Slab bearing must be sufficient to ensure that the component is stable and not likely to crack, break or shift during further construction works. Insufficient bearing may require the slab to be replaced, or adequate propping may be needed until further reinforcement has been put in place to render the slab safe. Any slab propping or remedial works require detailed design. A detailed method statement must be prepared to enable such works to be planned and carried out safely. A temporary works coordinator should manage and oversee such works.

COMMUNICATION



Precast, in-situ concrete work and steel erection involve specialists working together, including the erection gangs, banksman, and crane operator. These teams must be in constant communication to ensure the tasks are completed safely.

SAFETY LINES



Safety lines are set up in conjunction with individual fall-protection systems. These are a last option, only to be used when collective measures cannot be used. The lines are set up to enable individuals wearing full fall-arrest or fall-restraint equipment to get close to leading edges. Each component on the line must be inspected prior to use: it must be able to bear any applied load. These measures prevent injury and save lives; only competent people should set them up.

SLAB SAFETY ANCHOR



To ensure the safety of the precast erection team, precast floor slabs must be laid in a systematic pattern that facilitates the use of collective fall-arrest systems, so that workers do not risk falling over the consistent leading edge. Anchors must be designed and planned to facilitate safe slab erection.

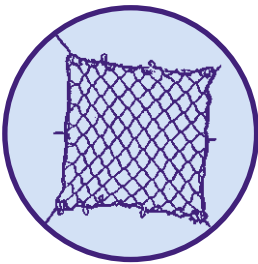
All anchors used must be specified by a competent designer. Clear and complete information must be given to the contractor who is to install them.

SAFE ACCESS



To facilitate the safe erection of steel work at height, safe access must be provided. This generally involves using Mobile Elevating Work Platforms (MEWP). The operators fully control the movement of the MEWP. People working from these platforms should keep their feet firmly on the floor of the platform. Harness and lanyard should be worn and attached to an approved anchor point in the platform.

NETS/BEAN BAGS



Safety nets should be used to protect workers carrying out high-level work on portal frames. Safety nets, bean bags and air bags should also be considered for other roof-work applications where there is a risk of falling internally. Before use these nets and bags should be inspected, tested and certified. They must be installed by competent and fully trained people.

FALL-ARREST AND RESCUE

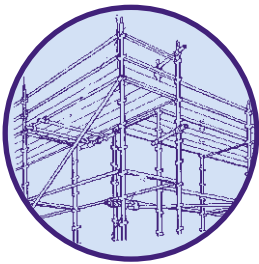


Fall-arrest systems should be used in conjunction with a rescue plan. Safety harnesses with a fall-arrest system (including other components such as lanyard, shock absorber and anchors) are used to prevent a person from hitting the ground in the event of a fall. Safety harnesses and personal fall-arrest equipment are not a substitute for working platforms or collective protection such as safety nets. Each component in the fall-arrest system must be inspected before use. It is recommended that a competent person examine the system formally at regular intervals (depending on a risk assessment) and at least every three months.

WORKING AT HEIGHT AND FALLING OBJECTS

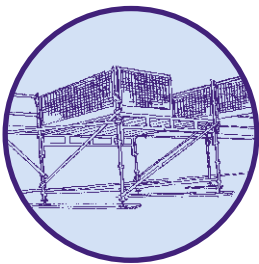


SCAFFOLDING



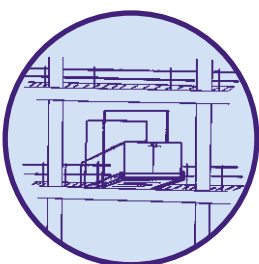
Scaffold platforms should where possible be used as working platforms for all work at height and in particular for all works above two metres. The scaffold platform must be designed, planned and erected by trained personnel, in accordance with all relevant legislation, codes of practice and manufacturer's instructions. Scaffolds should include dedicated ladder access bays and, where required, properly constructed loading bays. Hand-over certificates and the use of relevant signage (eg, capacity of loading bays) are recommended.

LOADING BAYS



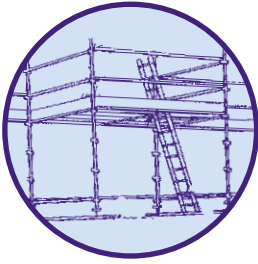
Materials must be stored on platforms designed to take the applied loading. Material must not be placed in areas where it could present a hazard (eg, stored on working platforms so as to restrict safe access around the scaffolds). All external scaffolds used for commercial building should be designed with adequate loading bays.

SLAB LOADING BAY



For safe movement of materials in and out of completed slabs, special loading bins which cantilever in and out can be used. These slab loading bays must be erected by competent persons to the manufacturer's requirements. The maximum load capacity should be clearly marked on each loading bay.

LADDER ACCESS



All ladder access must be erected by competent people who will ensure: adequate length of ladder, tying and footing, lack of defects. Access onto and egress off ladders must be such that workers do not have to cross large gaps through which they could fall before they have a firm handhold on the ladder.

SAFE LADDER



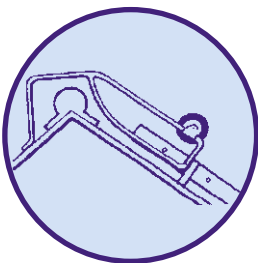
All ladders, including step ladders, must be: carefully selected for each task, free from patent defects, of correct length, carefully tied, set at the correct angle and, where necessary, footed. Ladders must be controlled and checked frequently to ensure they are fit to use.

TIE LADDER



All ladders must be tied or footed so that, when in use, they will not slip or slide.

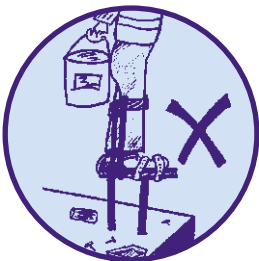
ROOF LADDER



Roof ladders should always be used on sloping roofs. They should be used in conjunction with properly constructed scaffold platforms. Roof ladders must be CE-marked (see list of abbreviations at end) and free from defects. Roof ladders should reach and anchor around the ridge.

A-FRAME LADDER

A-frame ladders should not be used close to leading edges, or over or close to internal openings where workers risk falling. When in use, they must have their restraint cord fully extended, to prevent the ladder from splaying open. A-frame ladders should only be used where using a safe working platform is impractical. They should not be used as a support for planks to create a work platform.

STILTS

Stilts should not be used near internal openings or leading edges, where the ground is uneven, or where there is rubbish or debris on the ground. Stilts should only be used in limited situations, where sufficient controls are in place to prevent the likelihood of any falls occurring. They must always be kept clean and inspected before use to ensure the soles and ties are in good condition. It is highly recommended that an assist person be always in the work area so that bending, frequent descents or overstretching are avoided.

TRESTLES

Trestle work platforms should not be used close to leading edges or to span open holes. They must only be erected by competent persons, be free from defects and be suitable for their purpose. Only 'locating pins' which the manufacturer recommends should be used, and care must be taken to insert these correctly. The trestle legs must be on firm foundations so they are not likely to slip or shift. The platform level must be fully boarded and not overloaded.

EDGE PROTECTION



All people must be protected from falling off edges, through hazardous openings or off stairs. Protection measures include handrails, barriers, and toe boards, etc.

STAIR PROTECTION



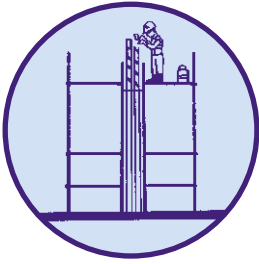
People must not be at risk of falling from or over stair edges or landings. Suitable handrails and barriers must be erected to prevent falls.

MOBILE SCAFFOLD



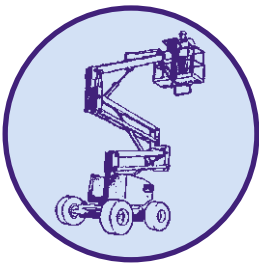
Mobile scaffolds or tower scaffolds must be carefully planned and erected by trained personnel in accordance with the manufacturer's instructions. The spread of the out-riggers fitted to each corner of the scaffold depends on the height of the tower. When in use the tower must be secured, and each wheel brake locked. The platform must be fully boarded, and be complete with mid rails and top guardrails. Before the platform is moved to another location, workers must descend from the tower. They must not resume work until it has been secured in its new position. The mobile scaffold must be inspected before use to ensure it is in good working order (eg, the wheel brakes) and that all components are in place.

FALL PROTECTION



Blocks from the inside of a structure at upper levels should never be laid unless there is scaffolding or other edge protection on the outside of the structure – all overhand work must be avoided.

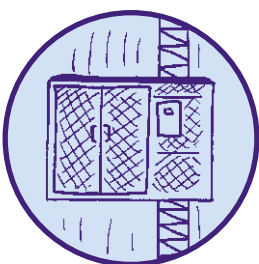
MEWP (Mobile Elevating Work Platforms)



A boom hoist, which has an extendable folding boom with cage attached, can be used for work at height if ground conditions are suitable. Boom hoists can also be used to enable access to remote areas. Selection must be based on suitability for the task. Particular attention should be given to ground conditions. It should be possible to follow fully the manufacturer's guidelines for safe use. Only competent and trained operators should control the movement of these hoists. Other vehicles should be strictly controlled in the vicinity of hoists.

Scissors lifts which can extend to significant heights, using hydraulic scissors movement, may be used where scaffold platforms are not possible. Selection must be based on suitability for the task. Particular attention should be given to ground conditions. The manufacturer's guidelines for safe use should be followed. Only competent and trained operators should control their movement.

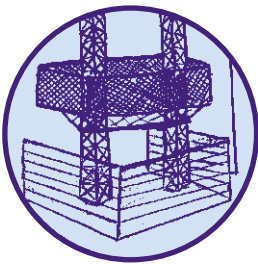
GOODS/PERSON HOIST



Hoists may be used either to carry goods alone or to carry goods and people. Such hoists are normally attached to the side of buildings and are designed to have controlled and safe landings at each floor level. Hoists will need on occasion to be raised or

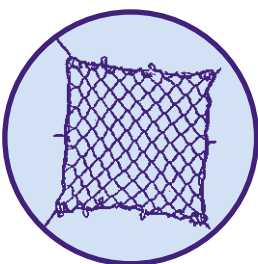
lowered as the level of the building changes. Before the hoist is first used, or if it is modified or repaired, a competent person must test or examine it, or both, so that legal requirements are complied with. The results of such tests or examinations must be entered onto the approved forms.

MAST CLIMBER



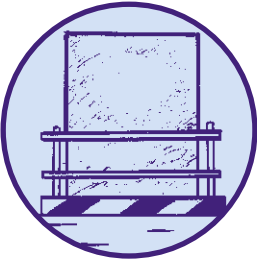
Mast climbers, like hoists, are normally attached to the side of buildings and are designed to have controlled and safe access. The mast climber should only be used on firm and level surfaces, within the tolerances specified by the manufacturer. At the base of the mast climber there should be an enclosure at ground level to prevent any unauthorised people from entering the landing zone. Before the hoist is first used, or if it is modified or repaired, a competent person must test or examine it, or both, so that legal requirements are complied with. The results of such tests or examinations must be entered onto the approved forms. No-one should erect, dismantle or operate a mast work platform unless trained and authorised to do so.

NETS/BEAN BAGS



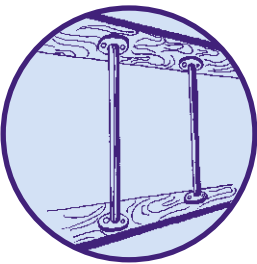
People working in roof areas that have internal openings (eg, portal framed structures) can be protected by the use of safety nets. Safety nets, bean bags and air bags should also be considered for other roof work applications where there is a risk of falls. Before use these safety nets and bags should be tested, inspected and certified. They must be installed by competent, trained people.

SHAFTS/OPES



All shaft openings where there is a risk of falls should be securely guarded with guard rails, mid rail and toe board or equivalent.

PROPPING



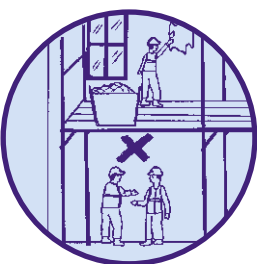
Propping is required during the construction stages of a project to give temporary support to prevent collapse due to overloading of structural components (eg, when loading pallets of block or other materials on joist work, when installing precast slabs and stairs, etc). The contractor must ensure that the number and location of the props – as specified by the designer (generally a structural engineer) – are correct and that the units are supported as indicated on the construction drawings. Normally a temporary works co-ordinator should be appointed to ensure that correct propping procedures are followed and operations carried out safely.

BLOCKWORK COURSES



Laying too many courses of blocks in one day can cause a wall to collapse. Weather conditions and the drying time of mortar should be taken into account.

OVERHEAD WORK



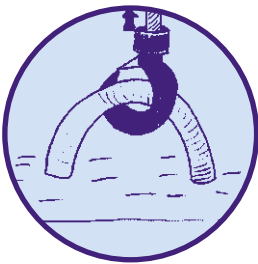
All workers should make sure before they start working that no work is taking place above them.

EXCLUSION ZONE



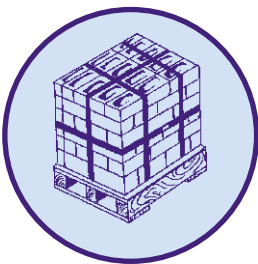
Work should never take place directly above other workers. Where overhead work is likely to occur, adequately sized exclusion zones should be created to ensure that no-one is at risk from falling objects.

LIFTING POINTS/EYES



All lifting points and lifting eyes must be carefully designed to take the maximum load that is to be applied. They should be certified and tested by the manufacturer prior to arriving on site. Lifting eyes, which are often cast into floor slabs, may serve a dual purpose: for the lift itself, and for aiding a system of fall protection (eg, use of safety lines, lanyards, etc). When complete, these eyes should be removed by cutting. Otherwise they will serve as potential trip points.

PALLETS/BALES



Where possible, materials should be kept on pallets or in bales with adequate strapping to ensure they do not fall when being lifted.

BLOCK GRABS AND NETS



Block grabs are considered to be lifting gear. Before use, they must be in good working order and attached correctly to the relevant lifting appliance. When in use, an appropriate net must be used to prevent the fall of any loose blocks.

CHUTES



Chutes should be used for discarding materials. Materials should never be thrown from scaffolding or windows, etc. The chute should extend down into a waste skip. Exclusion zones should always be created in the area where construction materials and debris are dropped.

SHEETING/FANS



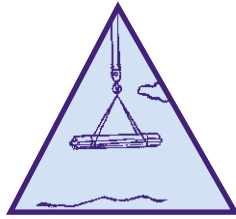
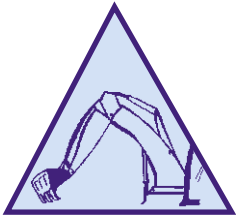
Sheeting should be used to enclose scaffolding on its public side to prevent loose materials from falling on to members of the public. Fans should be erected on the scaffold to supplement the sheeting. These measures are particularly important where the scaffolding fronts on to a public access way.

STORAGE

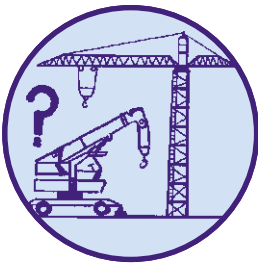


All materials should be stored where they cannot fall on to workers below. Materials should be kept tidy and stable. All access routes must be kept clear. Working platforms should not be cluttered or blocked with materials. There must always be adequate space for safe access. All loose materials should be removed on an ongoing basis.

PLANT AND EQUIPMENT, LIFTING OPERATIONS

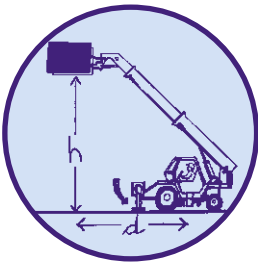


SELECTION/SUITABILITY



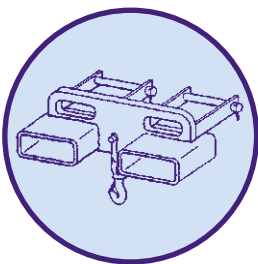
Before any piece of plant is selected and used, it must be checked for its suitability for the task (eg, safe working loads, accessories available, reach capability, etc). When plant such as dumpers and bulldozers are being bought or used, the potential risks to workers from vibration emissions must be considered.

TELEPORTER



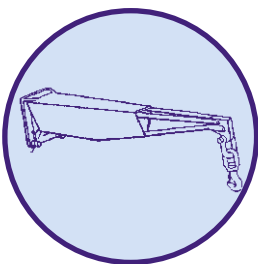
The teleporter must be suitable for the task. Before use, it must be checked for appropriate certification and fitness for use. Teleporters should be serviced regularly.

FORKS CLAMP



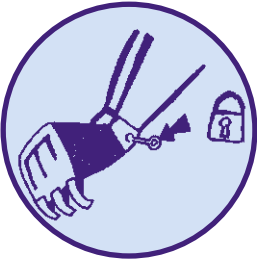
Chains and slings must not be wrapped around the forks of a teleporter when used to lift a load. When chains or slings with forks are used, suitable fork clamps should also be used, with the chain or sling suspended from a suitable hook or shackle.

FORKS EXTENSION



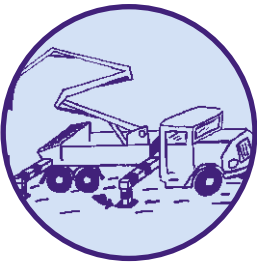
Chains and slings must not be wrapped around the forks of a teleporter when used to lift a load. When loads are being lifted, the forks should be removed and a crane extension with hook or shackle should be used.

LOCKING ATTACHMENTS



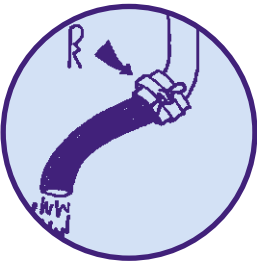
Ancillary equipment used in connection with any construction plant must at all times be secured (eg, quick hitch with bucket or rock breaker to excavator, etc). This may require the insertion of locking pins, to prevent dropping of the attachment.

CONCRETE PUMP



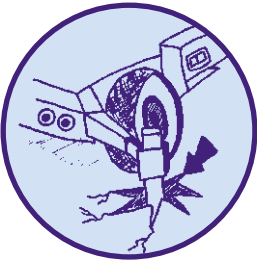
Concrete pumping rigs must be maintained and serviced regularly (this includes checks on outriggers, etc). Special care must be taken when working in the vicinity of overhead lines.

PUMP CONNECTIONS



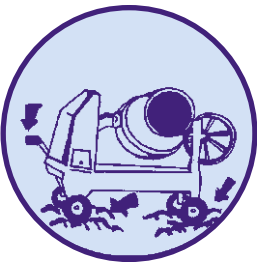
Each pipe connection on the pumping rig must be secured with the correct clip. The manufacturer's recommendations should be followed.

GROUND CONDITIONS



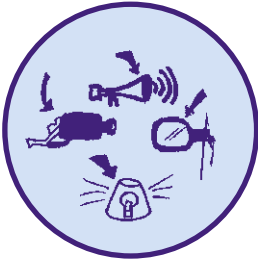
The ground on which any plant is to be used should be examined to ensure that it is capable of taking the applied loads. Expert advice may be necessary.

MIXER



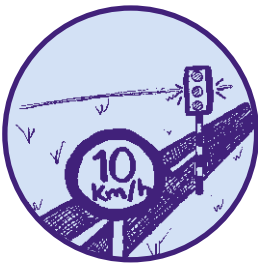
Cement mixers must be maintained in good working order and regularly serviced. They should be set up on firm, level ground and not be mounted on blocks. The starter handle should be stored after use. Only trained personnel should set up, start and operate cement mixers. Anyone working with wet cement should wear gloves to reduce the risk of dermatitis.

REVERSE WARNING DEVICES



With plant that has restricted visibility, and particularly during reversing operations, suitable warning devices or sight-seeing devices – such as CCTV, flashing beacons, convex mirrors, audible warning, etc – must be fitted.

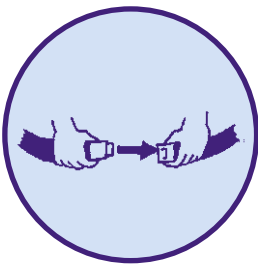
TRAFFIC/SPEED CONTROL



Traffic-control plans must be prepared to help control traffic movement, especially at the entrance to any construction site. Measures to control traffic may include: use of warning signs, bollards, stop-go systems, ramps, temporary traffic lights, flagmen and stop-go men. Liaison with local gardaí may also be necessary. The Department of the Environment's Traffic Signs Manual should be referred to.

Vehicular speeds must be controlled on construction sites. Signs advising drivers of permitted speeds must be erected and displayed appropriately.

SEAT BELTS



Where seat belts are fitted they must be worn. In the event of an overturn they can save lives.

COMPOUND



A designated area should be fenced off for parking vehicles and storing materials. A safe pedestrian walkway should be clearly marked out. At the end of the day, the compound must be secured to prevent unauthorised access.

PEDESTRIAN ROUTES



All pedestrians – whether workers or members of the public – should be kept away from construction plant operations. Dedicated and clearly identified pedestrian routes should be used.

FLAGMAN/STOP-GO MAN



Where construction activity requires the managing of traffic or pedestrians in nearby public areas, trained flagmen (to slow down traffic) or trained stop-go men are used to ensure safety. Stop-go men and flagmen must wear high-visibility vests and use approved stop-go signs or flags. Where two stop-go men are required, they must be able to see each other clearly or be able to communicate with each other by voice e.g. use of 2 way radio etc..

BANKSMAN



A banksman (a trained slinger and signaller) must always be used where loads are lifted and safe direction is given to operators of lifting appliances. The banksman directing a crane's movements should be easily identifiable to the crane driver (eg, by the wearing of uniquely identifiable high-visibility clothing, and/or the use of radio call signs).

COMMUNICATION



Good communication is essential for safe lifting, whether between crane operator and banksman, or between the operator of any lifting appliance (eg, a teleporter) and the person receiving the load. If normal verbal communication is not possible because of noise or distance, recognised hand signals, two-way radio, telephone or closed-

circuit television should be used, as appropriate. Any communication must be clearly understandable and given in the language of the person being addressed.

CRANE COORDINATION



To ensure that the safe system of work is implemented, one person should be appointed to have overall control of the crane operation(s). This person should have the necessary training and experience to fulfil this role. The coordinator's duties include: planning, ensuring that ground supports are adequate, selecting cranes and lifting gear, and preparing any method statements required. Crane coordination is particularly important where two or more cranes are working in close proximity. In such cases, strict controls must be implemented (and documented) to ensure that the cranes or their loads do not come into contact.

PLAN LIFT



All lifting operations should be planned to ensure that they are carried out in a safe manner. Generally a method statement should be prepared in advance of the operation.

SAFE WORKING LOAD (SWL)



Lifting appliances and lifting gear should never be used to lift beyond their stated safe working load. This, as assessed by a competent person, is the maximum load that an item of lifting equipment may raise, lower or suspend under the particular service conditions.

CHECK LIFTING GEAR



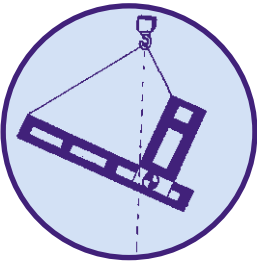
Lifting gear means any gear or cable by which a load can be attached to a lifting appliance. It includes chain sling, rope sling, hook, shackle or eye bolt. Before lifting gear is used it must be examined to check for safe working load (SWL) and so that defects, which may reduce its capacity to function safely, are repaired. Lifting gear must be certified prior to use.

GLAZING/SUCTION



Where glazing is lifted into place by suction lifting devices, such attachments must be regularly inspected to ensure that adequate suction is maintained over the required period.

LOAD STABILITY



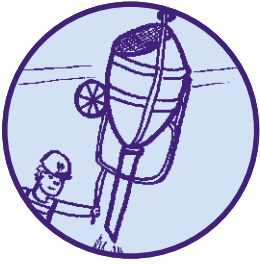
The load must be checked to ensure that it is stable and properly secured to the lifting appliance before lifting begins.

SKIPS/BINS



All skips and bins must be appropriate for the task. If used as lifting gear when attached to lifting appliances, all lifting lugs and lifting eyes must have their safe working load (SWL) clearly visible. The SWL must always be checked before lifting commences. When used as lifting gear, such bins and skips must be certified.

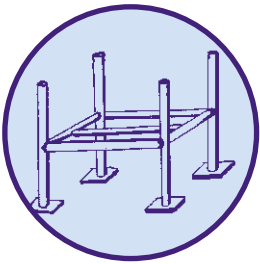
CONCRETE SKIPS



When concrete is discharged from concrete skips, care must be taken to use the appropriate discharge handle, and hands must be kept away from any other moving or pinch points.

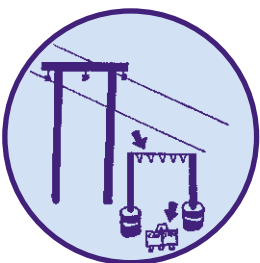
Ride-on concrete skips are not recommended, and should only be used if providing a safe working platform is not practicable. When ride-on concrete skips are used, extreme care must be taken to prevent the operator being thrown out of the skip due to recoil of the crane's jib after the load is discharged, etc. Operators must use a fall-arrest system that is secured to a certified anchor point.

STILLAGES



All stillages must be of good design and construction. All loads that are to be lifted with stillages must be well secured prior to lifting (eg, double wrap with a cloth strop). In general, a test lift should be carried out (the operator may lift the load just clear of the ground to assess both the security of the slinging and the load stability before completing the lift).

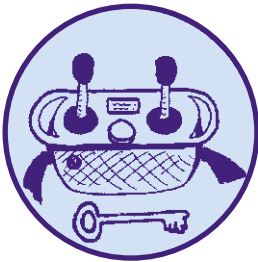
OVERHEAD LINES



Burns and electrocution can result if raised tipper-truck bodies, cranes or excavators touch or come close enough to overhead power lines to cause arcing. The operators of high-reach machines, including delivery lorries and lorry loaders etc. must pay particular attention to the position of any live overhead lines, and always remain at a safe distance from them. Warning goal posts should be erected a safe distance either side of the lines. Any passing plant must only access

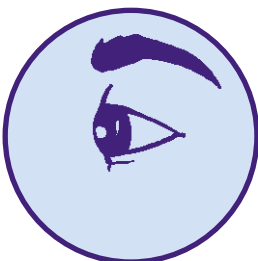
under the lines via the goal posts. The exposed lengths of the overhead lines must be guarded from unapproved access. (See ESB Guidelines for further information).

REMOTE CONTROL



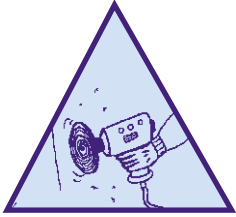
To prevent unauthorised use, the driver of a crane controlled by transmitted signals should either (a) always retain the transmitter or key in his or her possession or (b) remove the key when the crane is not in use and, for short periods, retain the key in his or her possession, or, for longer periods, deposit the transmitter or key in safe storage. When the controller is fitted with a belt or harness, the operator should be wearing the harness before switching it on, so that accidental operation of the crane is prevented. The controller should be switched on only when the crane is being operated, and should be switched off before the harness is removed. In the event of loss of power during the operation, the crane should be fitted with a cut-out mechanism that halts the crane's movements until control is re-established. The controller must be maintained so that it performs as specified by the manufacturer.

EXAMINATION & INSPECTION



A competent person is required to examine and inspect statutory plant and equipment. Any defects must be noted and remedial action to repair the plant should take place immediately, or the plant should be replaced. A report of the inspection/examination should be recorded on the approved form.

HAND-HELD EQUIPMENT

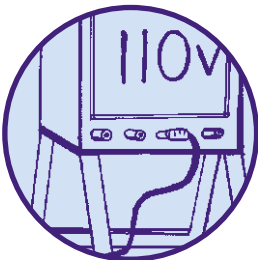


SELECTION/SUITABILITY



Before any electrically powered hand tool or other hand-held equipment is selected and used, it must be checked for its suitability to the task (eg, voltage rating, size and condition, etc). When hand-operated power tools such as grinders, saws and drills are being bought or used, consideration must be given to the potential risks to workers from vibration emissions.

VOLTAGE



All portable electric tools rated below two kilowatts that are used on construction sites must be rated at 110V.

CHECK CABLE



Before any electric appliance (including transformers and extension reels) is used on site, the cables and connectors attached must be examined to ensure that they are not damaged.

CABLE PROTECTION



Trailing electric cables which would risk being damaged because of their position must be protected from such damage, or else they should be placed in a safe location.

GUARDS



Many hand/portable tools have rotating shafts and components. Others emit fragments, dust and sparks. Such tools must have suitable guards fitted (eg, circular saw guards, power-take-off shaft guards, etc).

GENERATORS OUTSIDE



To avoid the silent killer, petrol and diesel-driven generators must always be used outdoors to avoid the deadly effects of the build-up of carbon monoxide from exhaust gases.

COMPRESSOR & WHIP CHECKS



Compressors must be maintained and serviced regularly. All connections and flexible hosing must be in good condition and replaced if damaged. All guards must be secured before starting, so that no rotating pulleys or belts are exposed. 'Whip checks' (safety clips) should be used at connections on all pneumatic hose lines. This control prevents the hose from whipping around in the event of the connection failing. The safety clips must all be inspected prior to the compressor being turned on. Alternatively, automatic cut-off valves may be used.

JACK HAMMER/KANGO



To reduce and eliminate the risk of ill health due to vibration, jack hammers and kangos must be serviced regularly and maintained in good condition. Jack hammers should not be used for long periods. Workers may be rotated to other tasks to reduce exposure time and prevent vibration-

related ill health. Workers using jack hammers and kangos and anyone likely to remain in the immediate vicinity should wear ear defenders.

DUST SUPPRESSION



Tools and equipment which generate dust clouds should be fitted with extraction or wetting aids.

CARTRIDGE TOOLS



Use of cartridge tool guns and staplers requires careful planning, to assess what will be fired into, and who or what may be behind the target. People should be kept a safe distance from the firing zone. Whoever uses these tools should always wear goggles and ear protection. Such tools must be maintained in good working order, and should be operated only by trained persons.

PAINT SPRAYER



Spray-painting equipment must be set up in accordance with the manufacturer's guidelines. It should undergo regular service and maintenance checks. To prevent others coming into contact with spray products, exclusion zones need to be set up.

The Safety Data Sheets (SDSs) for any hazardous paints and solvents used should be available to each team of painters. Handling and storage precautions outlined in these SDSs must be adhered to.

Appropriate PPE (personal protective equipment) must be used.

HOT WORKS



Welders and flame cutters must only be used by competent, qualified persons. Suitable PPE (personal protective equipment) must be provided and used. A fire extinguisher and sand bucket along with appropriate screens must be readily available during cutting and welding. In many situations where hot working is used, a permit-to-work system should apply to prevent the risk of fire and explosion.

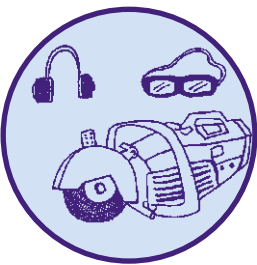
For welding, local exhaust systems should be considered to remove fumes from the breathing zone. If the welding is carried out in a confined space or if the welding zone becomes a confined space because of the set-up, extra controls are required (see section dealing with Confined Space below).

GAS/FLAME ARRESTER



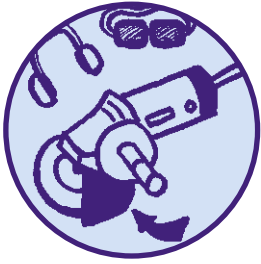
Gas bottles must always be stored upright, and chained to prevent falling. Flash-back arresters must be used on gas bottles. All flexible hosing and connections should be checked daily, and any damaged parts replaced prior to use.

CON SAW



Consaws, which are widely used on construction sites, must be maintained in good working order and regularly serviced. Guards must be in place at all times. Appropriate PPE (personal protective equipment) must be used.

ANGLE GRINDER



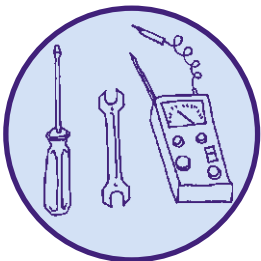
Angle Grinders must be maintained in good working order and regularly serviced. Guards must be in place at all times. Appropriate PPE (personal protective equipment) must be used.

POWER FLOATING



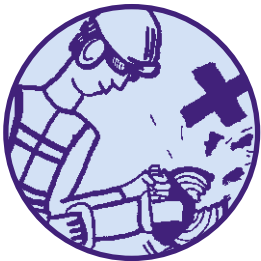
Power floating is the process of levelling concrete floors. Power-floating equipment should be regularly serviced to ensure it is in good working order. Damaged or worn handgrips should be replaced immediately. All guards must be kept in place. If power-floating takes place close to open edges, adequate edge protection must be provided.

MAINTENANCE



All construction equipment should undergo regular service and maintenance checks, to ensure continued fitness for use. It is good practice to keep written records of such maintenance checks.

REPLACE DAMAGED PARTS



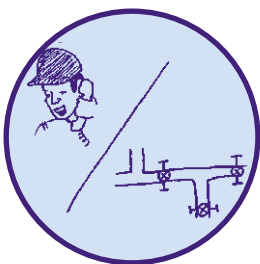
All equipment should be checked before use, and any damaged parts must be replaced before work begins.

SERVICES (including electricity, gas, sewage)

Before any construction work, it is necessary to ensure that existing services such as gas, electricity, water and sewers are secured, so that, because of works being undertaken, they do not pose a risk to workers or people in the vicinity. Adequate measures must be taken to protect workers.

SERVICE SUPPLIER (eg, ESB, Bord Gais, local authority)

Where construction work is to begin and services are unknown, the relevant utility company must be contacted to obtain drawings and advice on the position of underground and overhead services.

DIVERT/OFF

Before work near overhead or underground cables, gas services or other underground services begins, the relevant utility company must be asked to divert the service away from the work zone, or if necessary to switch off or stop the service temporarily to allow work to proceed safely. Contact with overhead lines can kill. Never erect scaffolding or similar structures close to or under live overhead lines. Never work close to, or access close to, or under live overhead lines.

DETECTOR AND MARK

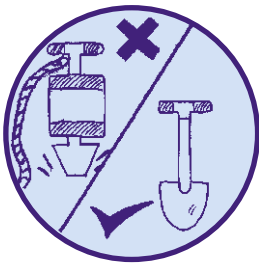
Before drilling or cutting begins, the area should be scanned with a detector to verify the position of any services. The position of the service should be carefully marked, to ensure that subsequent work does not come into contact with it.

PERMIT TO WORK



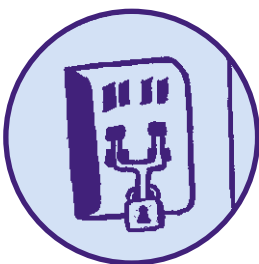
To ensure that appropriate controls are rigidly adhered to when high-risk work (eg, with live electricity or biological agents) is being carried out, a permit-to-work system should be used. This ensures that works do not begin until all the safety and environmental controls are in place, and signed off.

HAND DIG



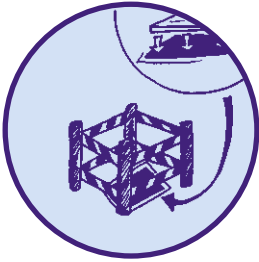
Mechanical cutting or digging at or close to underground services is generally not permitted except in limited circumstances and only under strict supervision. Such services are normally uncovered or made visible by controlled hand digging, to minimise the risk of cutting or puncturing the service. However, care should be taken during hand digging, as this can also result in cutting services and exposing live conductors. Normally only when all lines are clearly visible should mechanical digging commence. Consideration may also be given to having a representative of the relevant utility company present when work takes place close to underground services.

ISOLATION/LOCK OUT



Where electrical power remains live, and subsequent work is required (including live work), isolation and tagging-off systems (including permit-to-work systems) should be used. All electrical work must be closely supervised by trained and competent electricians. The Electricity Regulations and the ETCI rules must be fully complied with.

BARRIERS



Where services have been uncovered or made visible, and remain visible or are insufficiently backfilled, suitable barriers should be erected at a sufficient distance around the service area to protect and warn drivers of plant and others of the danger.

NO FLAMES



Gas is highly flammable. Flame or any sources of ignition (sparks, static electricity, etc) must be kept away from live gas.

OVERHEAD LINES



Working close to, or accessing under live overhead lines with plant and equipment that have the potential to extend to, or operate close to such lines can be dangerous. Measures must be put in place to ensure that high reach plant does not come into contact or come within the arcing distance of live overhead lines. Warning goal posts should be erected at a safe distance either side of the lines and any plant requiring access under these lines must ensure that they pass via the goal posts. The exposed lengths of the overhead lines must be guarded from unapproved access. Refer to the ESB Guidelines for further information.



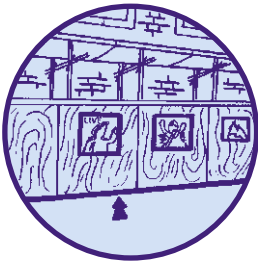
WORKING CLOSE TO THE PUBLIC

FENCING



Construction activity should not present an undue risk to members of the public, especially to children. Suitable fencing must be used to secure sites.

HOARDING



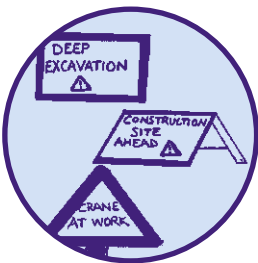
Particularly on street-side works, adequately designed and constructed hoarding should be erected to secure construction work. Arrangements must be put in place to ensure that normal pedestrian and public vehicular traffic is not put at undue risk, as a result of any changes made.

BARRIERS



All ongoing works – in particular street-related activities, open excavations, exposed manholes, etc – must be protected with barriers and identified with warning signs.

WARNING SIGNS



People approaching construction work must be given advance warning, especially where specific hazards exist. Warning signs must be erected and, where necessary, must give clear directions to passing members of the public.

SECURITY



Only authorised people should be allowed onto construction sites. Trained security personnel can help to control access.

TRAFFIC CONTROL



Traffic-control plans must be prepared, to help control traffic movement especially at the entrance and exit of any construction site. These may include warning signs, bollards, stop-go systems, ramps, temporary traffic lights, stop-go men and flagmen. Liaison with local gardaí may also be necessary. The Department of the Environment's Traffic Signs Manual should be referred to.

FLAGMAN/STOP-GO MAN



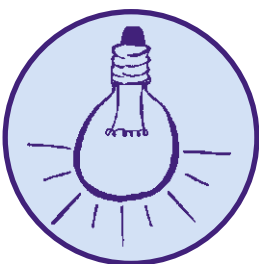
Where construction activity requires the managing of traffic or pedestrians in nearby public areas, trained flagmen (to slow down traffic) or trained stop-go men are used to ensure safety. Stop-go men and flagmen must wear high-visibility vests and use approved stop/go signs or flags. Where two stop-go men are required, they must be able to see each other clearly or be able to communicate with each other by voice e.g. use of 2 way radio etc.

BANKSMAN



A banksman (a trained slinger and signaller) must always be used where loads are lifted, and safe direction is given to operators of lifting appliances.

LIGHTING



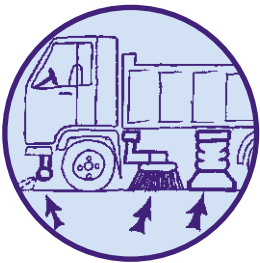
Adequate lighting must be provided in darkened areas to prevent people from slipping, tripping, falling or being hit by projecting objects.

PEDESTRIAN WAYS



Where members of the public have to access close to, or around construction work, suitable safe routes must be provided to protect them. Consideration must be given to people with disabilities. Construction debris must be kept clear from such public areas. Muck, dust, trip hazards, protruding puncture objects and objects likely to fall, etc, must be removed. Where reinstatement is required, it must be completed without delay.

DUST/MUCK



Excessive amounts of dust can cause eye and respiratory irritation. In general, dust and muck are a nuisance for both workers and others in the vicinity. All traffic routes in public areas near construction works should be kept clear of muck. During dry periods the routes should be dampened to keep dust down.

HANDOVER CONTROL



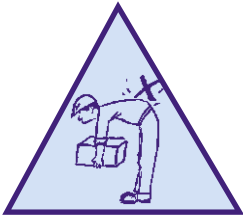
When units are handed over to their owners, there must be controls in place to ensure that the new residents are not affected by ongoing construction work. These units must be segregated from adjacent construction work by adequate fencing and separate traffic routes, where possible. Where it is not possible to have separate access routes, adequate traffic-control measures including reduced speeds must be operated.

VISITOR CONTROL



All visitors to a construction site need to be registered as being on site and accompanied on their visit around the site.

MANUAL HANDLING



Manual handling means more than just lifting or carrying something. It describes a range of activities including lifting, lowering, pushing, pulling, carrying, moving, supporting or holding an object or person. Up to one-third of all work injuries are injuries due to manual handling activity.

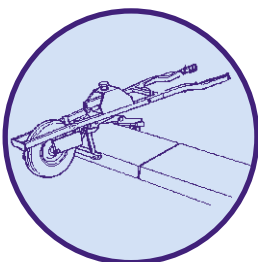
The manual handling regulations require that manual handling activities should be assessed taking account of risk factors (unfavorable ergonomic conditions) and that appropriate control measures should be put in place to avoid or reduce the risk of injury.

RISK ASSESSMENT



Each activity on site needs to be risk-assessed to identify whether there is a manual-handling hazard present. If there is, appropriate controls must be put in place to eliminate the risk. If the hazard cannot be eliminated, the risk must be reduced to as low a level as possible.

MECHANICAL AIDS



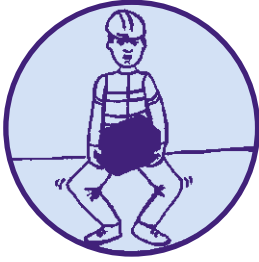
Mechanical aids are devices used to lift, pull or push objects, which either eliminate the need to manually handle the object or reduce the manual handling required.

WORK ORGANISATION



Work organisation requires that the method of physical work be assessed to see whether it can be organised in such a way as to minimise or eliminate the need for manual handling.

TRAINING



Manual-handling training is a legal requirement for anyone required to carry out manual-handling operations at work. Workers are trained how to move loads so that they do not risk injury.

PPE (personal protective equipment)

Personal protective equipment protects individuals from harm when all other methods have been employed to eliminate risk. PPE is a last resort. It should be maintained at all times in good working order. The PPE listed below must conform to the relevant Irish Standard.

HELMET/BOOT



Safety helmets/hard hats are used to protect the head from falling objects and from striking off objects. They should be replaced periodically.

Workers using safety harnesses should wear a helmet with a secure chin strap to keep it on the head in the event of a fall.

Safety boots are required on all building sites. They should have steel toecaps and sole protection to prevent the toes from being crushed and any object from penetrating the sole.

EYE PROTECTION



Eye protection in the form of glasses/goggles or visors protects the eyes from flying objects, dust and splashes (eg, when grinding and cutting).

SAFETY GLOVES



Safety gloves protect the hands from cuts and from contact with harmful substances and sharp objects, etc.

EAR PROTECTION



Ear protectors help to protect hearing from loud sudden noise or from continuous loud noise. There are two action levels. Where noise exposure is at or exceeds 80 dBA, individual hearing protectors must be made available. Where noise exposure is at or exceeds 85 dBA, individual hearing protectors must be made available and must be used. There is also a limit value set at 87 dBA which must not be exceeded. The limit value takes account of the attenuation provided by hearing protectors worn by the worker. The action values do not take account of the effect of such protectors. Where risk assessment reveals that noise exposure is a risk to the worker's health, audiometric testing (hearing check) will have to be made available.

In dirty and dusty environments, earmuffs are the recommended form of ear protection.

HI-VISIBILITY VEST



Hi-visibility vests help to ensure that a worker can be seen by drivers and operators of plant and other vehicles.

DUST MASKS



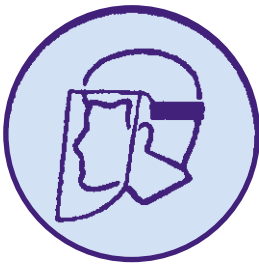
Dust masks protect workers from inhaling harmful dusts.

RESPIRATORY EQUIPMENT



Respiratory equipment protects workers by filtering out harmful substances from the air breathed in. To work effectively, they must be well maintained.

FACE PROTECTION



Face-protection visors protect the face from flying objects, sparks and splashes from hot or harmful substances.

SAFETY HARNESS



Safety harnesses with a fall-arrest system (including other parts such as lanyard, shock absorber, and suitable anchors) prevent people from hitting the ground if they fall from a height. Fall-arrest systems should be used in conjunction with a **rescue plan**. Safety harnesses and personal fall-arrest equipment are not a substitute for safe working platforms or collective protection such as safety nets.

SAFETY OVERALLS



Safety overalls protect the body from coming into contact with harmful substances.

**FIRE**

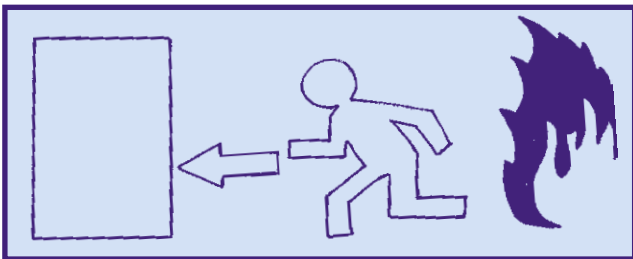
The risk of fire is generally ever present on construction sites. Fire prevention has to be considered at the various levels of construction planning. Providing means of escape and installing temporary fire-detection and alarm systems should be considered.

Bar heaters should not be used on site, and use of all naked flames must be tightly controlled.

Flammable materials must be stored separately in a well-ventilated, lockable location, away from any likely ignition sources, and such liquids should be removed from site when no longer required.

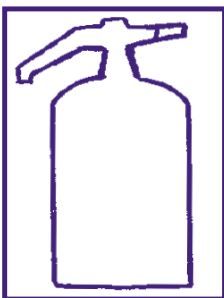
After hot works have taken place, the area should be revisited to ensure that fires have not developed.

Sand and fire blankets can be used in certain cases, such as a small smouldering fire, to eliminate the chances of fire developing.

**Emergency Route**

To prevent injury from fire, all employees must be instructed what to do in the event of a fire, what the approved escape route is, and where the

assembly points are located. Fire drills should be held regularly.

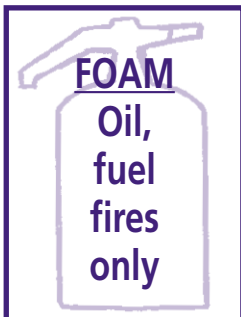
**Fire Extinguishers**

People need to be trained how to operate fire extinguishers. They should only be used for small fires.



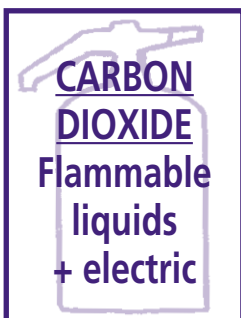
Water Extinguishers

Water fire extinguishers are used only to put out fires involving cloth, paper and wood.



Foam Extinguishers

Foam extinguishers are suitable for most fires involving flammable liquids.



Carbon-Dioxide Extinguishers

Carbon-dioxide extinguishers may be used on fires involving flammable liquids or electrical apparatus.



Dry-Powder Extinguishers

Dry-powder extinguishers may be used on most fires including electrical fires.

ABBREVIATIONS

CCTV	Closed-circuit television
CE	Refers to European Community. Is marked on products and machines which comply with essential safety requirements of any relevant standards which are set down by the CEN, a European standard-setting body.
CSCS	Construction Skills Certification Scheme
ESB	Electricity Supply Board
ETCI	Electro-Technical Council of Ireland
MEWP	Mobile Elevating Work Platform
PPE	Personal Protective Equipment
RPE	Respiratory Protection Equipment
RSJ	Rolled Steel Joist
SDS	Safety Data Sheet
SWL	Safe working load: the maximum load which an item of lifting equipment may raise, lower or suspend under the particular service conditions.

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SAFE SYSTEM OF WORK PLAN (SSWP) GUIDELINES

The Safe System of Work Plan (SSWP) complements the Safety Statement required under the Safety, Health and Welfare at Work Act, although it does not replace the requirement for such a Safety Statement. Specific Guidelines on Safety Statements are available from the Health and Safety Authority.

This guidance, which is particularly relevant to contractors, self-employed persons and employees, deals with the completion of SSWP for Construction.

The SSWP will help users to complete construction work activity in a safe manner.

Completing and using the SSWP will also help you to meet some of the legal obligations placed on you by health and safety legislation.

The Safe System of Work Plan (SSWP)

The primary objective of the SSWP is to identify the major hazards associated with your work activities and to ensure that appropriate controls are in place before work commences.

The SSWP achieves many other objectives, including:

- Links the implementation of the Safety Statement directly to the work activity.
- Focusing on safety for a particular task. The SSWP is completed at the start of each activity, and can be reviewed at any time during the work.
- Increasing awareness. It encourages the users to consider a range of options to deal with the risks. The users will become familiar with the various controls available.
- Communicating through the use of pictograms so that the meaning can be understood by persons who possess little or no English.
- Being user friendly: just tick the hazards and controls.

The Safe System of Work Plan (SSWP) should be used as a final check to ensure that the identified controls for a specific construction work activity are available and in place. However safety starts long before any specific construction activity takes place. Hazard identification, risk assessment, the elimination and control of identified hazards must take place through all stages of construction from the planning stage, through the design process, the tendering process and on to the construction stage so that each specific construction activity will have had safety built in.

SAFE SYSTEM OF WORK PLAN (SSWP) GUIDELINES - cont'd

The SSWP: A 3-part process:

- Part 1: Planning the activity
- Part 2: Hazard Identification, and Control Identifier
- Part 3: Sign off

PART 1

This part will be completed by the person planning the activity. Normally this will be carried out by the supervisor/foreman and/or self-employed person prior to work starting. Where a site safety officer is employed they should be involved in the process.

- Identify who the employer/self-employed person is, e.g. *Acme Pipe Laying Ltd*
- Name of the Supervisor for the activity, e.g. *A. McSample*
- Identify the number of workers in the team, e.g. *3*
- Identify the specific location of the activity, e.g. *gridline x to gridline y*
- Describe the specific activity, e.g. *pipelaying*
- When the work is to start, the date, e.g. *Tuesday, 1st June*
- What skills are required, e.g. *360 excavator driver, banksman, pipelayer, flag man*
- Plant and Equipment required, e.g. *Fiat Hitachi EX200, Sling, Shackle*
- Hazardous Materials, if used, e.g. *Acme Bondex XXX, R45*
- Contact Names & Tel No. in the event of an emergency, e.g. *Site Foreman, Safety Officer*
- Name of the First Aider, and the location of the nearest First Aid Box
- Are Permits to Work required? Tick type
- The final section of this part: list requirements that are identified in the Construction Regulations and other Legislation as mandatory.

Note: For sites where more than 20 persons are normally employed at any one time, a site safety representative should be appointed.

PART 2

This part of the SSWP form deals with hazard identification, risk assessment, and risk control. Normally this will be carried out by the supervisor/foreman and/or self-employed person prior to work starting. Where a site safety officer is employed they should be involved in the process.

SAFE SYSTEM OF WORK PLAN (SSWP) GUIDELINES - cont'd



The Hazards or Activities should first be identified by **ticking the square boxes** in the "Select Hazard or Activity" column.

The appropriate **Controls** to eliminate the hazard or reduce the risk should be identified by **ticking the square boxes** in the "Select Control" column.



When controls are in place **tick the round box**. This must be done in conjunction with the workers at the specific work location prior to the work taking place.



Similarly, the Personal Protective Equipment (PPE) and Fire Equipment required, should be selected by **ticking the square boxes** in the PPE/Fire sections, and when acquired by **ticking the round box**.

NOTE: The list of Hazards and Controls depicted in each form is not exhaustive.

Part 2 of the form may also contain several blank hazard triangles, each labelled with the word "identify", and several blank control boxes, each labelled with the word "other". As the list of hazards depicted is not exhaustive, where other hazards are identified, these can be written into the blank hazard triangles. Similarly, as the list of controls depicted is not exhaustive, where other controls are identified, these can be written into the blank control boxes.

PART 3

This part deals with the signing off of the SSWP. The purpose of signing off is to identify the person who has prepared the SSWP, and also to confirm that the completed SSWP has been brought to the attention of all those to whom the SSWP applies.

Note 1: The completed SSWP must remain at the specific location of the work with the persons carrying out the work activity.

Note 2: A new SSWP must be completed when (1) a new hazard is identified, (2) the task changes, or (3) the environment changes.

Optional: A record sheet is available inside the back cover.

REMEMBER "IF IT'S NOT SAFE DON'T DO IT, AND INFORM SITE MANAGEMENT"

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Safe System of Work Plan (SSWP) New Commercial Buildings

*Achieving a
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and Safe
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-Together*

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