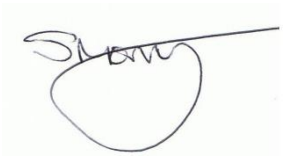
RELOCATABLE
Event Structures and Temporary Buildings
Freephone: 08 007 314 007

Risk Assessment & Method statement
For
Relocatable Ltd – Macey & Bond

Assessors Name:	S Morris
Position:	Director
Signature:	
Date of Assessment:	**26-01-2021**
Address:	**Various – Generic Assesments**
Equipment to be used:	Ladders, Wackers, Hand tools, Drills, Forklifts / Telehandlers / Scaffold Towers If Necessary
Working Environment: Hazards:	Working at height, weather, moving vehicles, underground / overhead services
Safety equipment to be used:	Hard hats, Gloves, High Visual clothing, Safety footwear, gloves, eye protection, ear defenders.
Employees involved:	The foreman in charge is either fully qualified to NVQ Level III in " Events for Temporary Structures" is or 'timed served' within the trade and is fully trained and is such fully conversant with safe practices and regulations on site. Only qualified personnel to operate plant.
Others who may be at risk:	Clients staff, other contractors, visitors, general public, young persons, persons with a medical condition, anyone with a disability.

Contents

METHOD STATEMENT

1. Site Conditions/Services

Relocatable, is able to overcome most problems relating to site conditions. We have a thorough system for identifying possible hazards and introducing controls to reduce the risk of injury. The structures we erect are of mixed size from 2 meters to 25 meters. All equipment will be erected using the manufacturers recommended procedures. Mechanical handling is essential on some sites, and only trained competent persons shall operate the machinery.

The following precautions have been allowed for at necessary venues.

Weather forecasts and communication procedures are in place.

The presence of underground / overhead services is to have been identified previously by the client, using our Site Safety Form, and any a risks at the venue to have been identified and clearly marked out accordingly prior to arrival at the venue.

Areas of Public Access will generate a certain public interest, but during the build and dismantle period, in the marquee site area, there should be no access for the general public and usual site rules will apply.

All marquee dimensions are measured to the centre of the leg and a further area needs to be provided for the base plates, as is normal practice.

Structures to be secured using adequate ground anchors. Marquee's on grass sites are to be staked using 500mm, 1000mm, 1500mm long, depending upon ground and weather conditions or if on hard surfaces bolted using M12 expanding bolts or M16 hammer in anchors for 15M structures, alternatively weighted down using the appropriate means, based on the available fixings and prevailing conditions.

When weighting, the friction between the foot and the ground is to be considered and appropriate action taken to minimize slippage.

Adequate security must be maintained by the client, to prevent theft, abuse or damage to the marquee and ancillary equipment.

2. Loading/Unloading of Material/Trucks

An area to be made available for the unloading / loading of lorries. Equipment can be unloaded, loaded and erected manually. Should the use of heavy plant machinery be required for such tasks, it will give rise to certain obvious hazards: load shift/load collapse/falling objects etc. All persons working on behalf of Relocatable, who operate such machinery are qualified, licensed and appointed to do so.

3. Machinery

The use of site machinery probably involves the most risks to workers undertaking site operations. Poorly maintained machines are dangerous and costly to repair. A good maintenance schedule is therefore essential to reduce the untimely need of emergency replacement.

Relocatable hire in plant from reputable hire companies within the U.K. Our agreement with hire companies is that all machinery is supplied with a current safety inspection certificate.

Only experienced and competent personnel are permitted to use machinery. A person is deemed to be competent on the successful completion or relevant training in combination with their on-site performance.

4. Laying out of Structure

The hazards involved with the lying out of the structure are predominately those arising from manual handling operations (repetitive strain injury, upper body limb disorders, muscle fatigue and tiredness). Although it is not possible to completely remove all of these hazards on a site, we do have ways of reducing the risk of injury. All materials can be located very closely to their required destination, thereby limiting the distance for the materials to be carried.

5. Pushing Up Structures

Because this is one of the higher risk areas, it is perhaps the most carefully monitored of all our operations. We are dealing with heavy materials being pushed into the air with a team of builders working beneath. There is an obvious danger of falling materials with the potential to cause major injury. The heavier materials have the potential to cause the most harm, therefore only the most experienced foremen are authorised to build structures. As a minimum 2 persons to lift 2M, 3M frames, 3 persons to lift 6M & 9M frame, 4 persons to lift 12M frame and 7 persons lift 15M frame. The majority of 25M frames will be pushed up using a telehandler of appropriate size.

Appropriate PPE such as hard hats must be worn at all times when working above head height.

6. Electrical Equipment

Electrical equipment provided by Relocatable are PAT tested and regular checks are made to ensure there are no loose wire or damaged components. Any hired electrical equipment must be delivered with a guide to its safe use. All site workers are familiar with the safe use and working practices using electrical equipment. The equipment which may be used on site include lighting, drills, saws, hoover's and a generator.

7. Adverse Weather Conditions

In very strong winds, it may be necessary to cease or delay such operations as erecting or dismantling structures for safety reasons. Likewise, snow falling on an unheated structure that has its roof-sails in position creates a danger of overloading the roof beams and collapse. Regular checks are made with the Meteorological Office to avoid, so far as is reasonably practicable, adverse weather conditions. In strong winds the erection can be delayed for Health & Safety, and the site supervisor will monitor winds on site.

All Relocatable site supervisors have the authority to make such decisions, as they deem appropriate and necessary, with regard to the erection and evacuation of the structures, because of unsafe situations arising from adverse weather conditions.

Walter Losberger & Premium Roder Marquees Used By Macey & Bond - Wind & Snow Resistance

	Snow		Wind	
	Loads as per CTS regulations	Effective Load	Loads as per CTS regulations	Effective Load
All structures except 5m x 5m Garden Cottage	10kg / sq. m	10kg/ sq. m	47km/h pressure	100km/h pressure
5m x 5m Garden Cottage	10kg/ sq. m	10kg/ sq. m	30kn/h pressure	80km/h pressure

8. Personal Safety Clothing

Employees are made aware that they are required to wear PPE such as Hard Hats, High Visual Jackets, Safety boots and Gloves.

METHOD STATEMENT FOR ERECTION AND STRIKING OF TEMPORARY STRUCTURE

Work Equipment

Equipment
Sufficient, suitable, equipment in good condition must be supplied to allow the job to be done safely. All equipment must be checked and/or serviced before it leaves the depot. Faulty equipment, including ladders and steps, must not be delivered on site.

Tools
The correct tools for the job must be provided, and they must be used in the correct manner.

Personal Protective Equipment
Personal protective equipment is provided for all employees and must be worn at appropriate times, as instructed by the site supervisor. **Appropriate PPE such as hard hats must be worn at all times when working above head height.**

Goggles
Must be worn when power saws are being used.

First Aid
A First Aid Kit is provided in all of Macey & Bond's company vehicles with a minimum of one qualified First Aid trained member of crew. Measures are also taken to ensure that the emergency services can be alerted if required.

Transport
The equipment is loaded on the lorry under supervision of the lorry driver and site supervisor. Equipment loaded on and off the lorry (at head office and sometimes on site) is generally by fork truck. The driver is responsible for the ensuring the load is loaded evenly, within the weight limits and is secure, and thus its security.

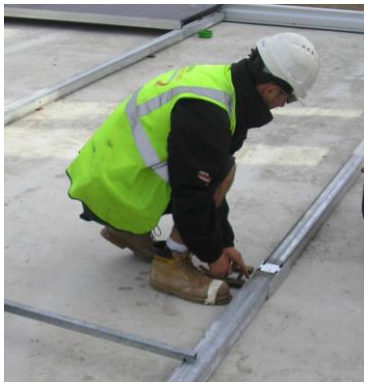
Erection
The frame work of the structure can be laid in place followed by assembly of the legs and beams making sure that the locking pins are correctly positioned.
The 'A' frame is lifted into the air slowly to avoid undue frame stress and twisting around the base plate pivot point until the frame is vertical and square.
Use either cross bracing or eave bars to hold the 'A' frame in an up right position.
Repeat the above and lift the next frame into position.

Secure by dropping in the purlins and eaves bars, on first bay 3 or 5m you must place a set of bracing wires and then as per manufactures specification thereafter.
The next section can then be raised and secured as before. This procedure is then repeated until completion.
A pulling line can then be thrown across the ridge of one bay and two hauling lines clipped to it before it is retrieved back.
The roof sheet is fitted into the kader of the beams through the guides and the hauling ropes clipped onto 'D' rings. The original pulling rope is also secured on to a D ring.
The roof sheet can now be pulled over the structure, the two hauling ropes unclipped and secured to the original pulling rope which can then pull them back over the roof sheet and slid along to the next bay to repeat the procedure.
The sheets are secured and tensioned by tensioning with a ratchet system.
The roof bracing wires can now be fitted to the relevant eyebolts on the legs and fully tensioned to ensure that the structure is rigid and true.
The walls are then attached to the legs by sliding the kader onto the eve purlin, the kader on the wall into the kader groove on each leg, the two halves pulled to the centre and laced together.
If the structure is having solid panels and glass doors, these require the addition of leg channels fitting to the leg.
The glass panels and doors are fitted by using the correct size leg channel and sliding the door or glass into this and then fitting either a H channel upright or T channel upright depending on whether it is first or last upright and finished with a locking plate onto the T channel.
The ground rail then goes through the pocket and is fitted to the leg base pivot pin.
Remember to replace the 'R' clip through the pinhole.
The gable ends can be installed pvc attached with the walls laced together and secured to complete the erection.
The remaining securing stakes can now be driven in or if it is not practical to stake, the structure may by bolted down, using either M12 or M16 expanding bolts requiring a hole to be drilled to 22mm by the correct depth for the anchor used.
If the holes are to be filled after the event it will be with proprietary cold setting tarmac type product.
However weights in some instances may also be used to secure the structure to the ground, if this is the case, manufactures recommendations are followed to determine the loading required for each leg.

<u>Flooring</u>
If a wooden interlocking floor if provided will be laid to ground conditions ensuring the boards are correctly connected with no tripping points.

In the event of a suspended cassette system the assembly of the flooring system is something that has to be accurate to insure that the structure is set on a level base.

Firstly, install the perimeter ring beam. The ring beams are in 3m or 5m lengths and are placed in between the base plates. They form the outer frame for the floor boards to secure into along with



Intermediate profile beams are then laid out parallel to the eave of the structure. These create the support rails of which the floorboards are laid on. These are then adjusted to the correct width so that the runners sit up in the correct position for the board to slot into.

The ground surface will have imperfections and this can affect the level of the floor system. In the case of this happening the use of a laser level will detect any rise or falls in the ground. The use of metal shims brings the floor to the exact level needed to ensure the structure is of a safe standard. These are placed at the joins of the bars and at two other points along the beam to reduce flex in the intermediate profile.

As the floor is being laid it is essential that the boards are slotted together correctly as gaps in the floor can create trip hazards, not only is this a hazard when the building is finished but also during the installation.

Risk Rating Classification		
	Rating	Definition
Severity	3	Death, major injury, major loss. (as defined in RIDDOR)
	2	Injuries where people may be off work.
	1	All other injuries.
Likelihood of Occurrence	3	Where it is certain or near certain that harm or hazard may occur.
	2	Where harm or hazard is likely to occur.
	1	Where harm or hazard is unlikely to occur.

Significant hazard associated with	Who might be harmed?	Risk Factor		Control Measures
		Severity	Likelihood	
Manual handling. Back injury	Installation crew	2	2	Insuring correct lift action is applied. Making sure what is about to be lifted is not too heavy.

If carpet is to be provided to ground conditions a plastic membrane is laid to the ground surface with the carpet laid over the top. The edges of the carpet are to be taped and or nailed to prevent trip hazards.
If the carpet is to be laid upon a floor surface the carpet to have stapled and or glued and or taped edges to minimise trip hazards.

If linings and lighting are to be installed, the use of lining bars fixed to marquee through D-Rings, pullies and rope.

Internal Lighting
If lighting is to be installed, this is installed upon the lining bar, at waist level and joined together using weather proof cables and sockets. The lighting supplied is PAT tested, however the lights should be tested before installing linings to ensure no bulbs are faulty.

Internal Lining
The roof linings to be installed on the bar at waist level then hoisted into the roof area of the marquee. The lining ropes to be tied off and secured. The wall linings to be installed together with the valance. Lining weight bars to be slid into the wall pockets.

Furnishings
Should furnishings be required the furniture to be installed as per the agreed layout plan.

Final Checks
The site supervisor to perform a final check of the structure to ensure it is correctly positioned and secured, all electrical equipment is tested to ensure it is working correctly and safely.

Marquee erected in accordance with the manufacturers instructions and the MUTAmarq Code Of Practice, the marquee safety checklist completed by supervisor and signed.

Delivery note to be checked and signed by the on site contact, the Safety Notice given to the on site contact.

Striking

Remove any furnishings installed.
Remove the interior linings & lighting and store away.
Remove ground rails and side wall/s in the reverse order of the erection. Roof covers and wires to be removed.
Remove purlins and eaves beams and lower the 'A' frame to the ground and dismantle. Repeat for each frame.
Flooring systems are lifted, and dismantled and stacked into correct pack sizes for easy loading.
Carpet can be rolled or folded and have tape and all nails removed, be turned over folded in half, then rolled from the fold end.
Loading to commence onto appropriate vehicles
Check to ensure all equipment is clear from venue.
Marquee removed in accordance with Manufacturers instructions and the MUTAmarq 'Guide to Safe Working Procedures & Practices'.