

Design Risk Assessment

This design risk assessment is carried out in accordance with the requirements of the Safety, Health and Welfare at Work (Construction) Regulations 2006 to identify exceptional features of design and construction affecting Safety and Health. It is not the intention to identify normal construction activities that a competent Contractor would anticipate in a project of this nature.

Project Name	Cherry Orchard Childcare Centre
Project Number	24276-REN
Project Description	New phase of existing creche with three children's rooms and two sleeping rooms
Start Date:	TBC

Issue	23/01/2025
Date	23/01/2025
Completed by	BS
Reviewed by	SM

Public	P
Site Operatives	S
Structure	ST
Site Plant	SP



Ref.	Building Element	HAZARD	RISK	Present	Severity of Risk			Likelihood			Person affected	Contractor to be notified	Design action taken to reduce specific risk (control measure)
					Severe	Medium	Low	Severe	Medium	Low			
1 Building Services													
1.01	Gas		Explosion / Fire Burns / Fatigue / Nausea / Asphyxiation	N		✓			✓				
1.02	Electric Power	Electricity Underground cables.	Electrocution Fire	Y		✓			✓		P/S/ST/SP	Y	All electric power work to be carried by qualified personnel. Cables to run in ducts, on containment trays or conduit. Meter connection to be made in consultation with ESB Networks. All distribution boards and power points to be numbered during commisioning.
1.03	Comms, TV, Satelite	Rooftop comms equipment and associated cabling. Existing cabling within building.	Electrocution Working at height	Y		✓			✓		P/S/ST/SP		Works under supervision and/or with agreement of utility provider plant protection officer. Under ground ducts to be identified by tape 100mm above duct in excavation. Services to be kept apart in containment. Method Statement required for the Installation of satellite dishes on roofs

Design Risk Assessment

This design risk assessment is carried out in accordance with the requirements of the Safety, Health and Welfare at Work (Construction) Regulations 2006 to identify exceptional features of design and construction affecting Safety and Health. It is not the intention to identify normal construction activities that a competent Contractor would anticipate in a project of this nature.

Project Name	Cherry Orchard Childcare Centre
Project Number	24276-REN
Project Description	New phase of existing creche with three children's rooms and two sleeping rooms
Start Date:	TBC

Issue	23/01/2025
Date	23/01/2025
Completed by	BS
Reviewed by	SM

Public	P
Site Operatives	S
Structure	ST
Site Plant	SP



Ref.	Building Element	HAZARD	RISK	Present	Severity of Risk			Likelihood			Person affected	Contractor to be notified	Design action taken to reduce specific risk (control measure)
					Severe	Medium	Low	Severe	Medium	Low			
2	General - Mechanical & Electrical												
2.01	Working at Heights	Missing platforms/ hand-rails Overloading Damaged fittings Unsound erection Outriggers not used	Fall from height Fall of materials, tools or equipment Serious injury or fatality to operatives or those below or in vicinity of such works Damage to property, plant, equipment Scaffold collapse	Y		√			√		P/S/ST/SP		All personnel working at heights to work within edge protection barriers All materials at height are securely stacked / stored All openings are secured, covered, edge protection barrier and identified to all Area below such works is cordoned off with suitable notices posted and where possible/practicable a safety watch posted Co-ordination of all works with site and other contractors in area Use of competent personnel All scaffolds built as to accepted practices No interference with scaffold structure or members by our operatives
2.02	Ladders	Step Ladders / Ladders	Fall of operative Ladder slipping, unstable Materials dropped by ladder user, when using Overreaching & long work periods from a ladder	Y		√			√		P/S/SP		Ladders full opened out and positioned safely Ladders secured & regularly maintained Only works permitted while standing on the rungs below the top three
2.03	Mobile Scaffold Towers	Tower collapse Movement	Fall of Operatives Fall of materials, plant or equipment Collapse of Tower Overturning of Tower	N		√				√			
2.04	MEWP	Movement Overturning	Fall of operative, equipment or materials from height Overturning of machine / poor ground conditions Collision with structure, plant & overhead services Collision with ground based operatives in vicinity	N		√			√				
2.05	Pulley Blocks & Ginnys	Failure Slippage Untying	Collapse of Pulley / Wheel Sprain / Strain on Operative Struck by Load under lift Collision of Load under lift to adjacent structure	N		√			√				
2.06	General Work	Within the defined working location	Noise & Dust Injuries to third parties Slips, Trips & Falls Electric Shock Fire Explosions	Y		√			√		P/S/ST/SP		Supervisor communicates with Management to identify existing hazards, operations and area of works responsibility including any adjacent works ongoing Barriers to be erected to isolate works from unauthorised access No materials or tools to be left unattended. Fire exits to be maintained or agreed with management as to an alternative route to be designated If working over public thoroughfares – covered walkways, exclusion zones debris netting & fans or other suitable measures to be employed to protect the public Posting of a Safety Watch operative during such works as are adjacent or which could come into contact with the public area/ Regular communication with client All works to ensure that all risks to the public are eliminated as far as reasonably practicable and in accordance with best practice and the Scaffolding Code of Practice. All delivery vehicles including unloading to be carried out at such time when the public presence is low and all such works strictly supervised
2.07	Material Storage	Stacking Collapse	Unsafe / Unsecured storage - Falling materials Slips, trips, falls Musculoskeletal injuries from lifting materials overreaching Blocking access routes	Y			√			√	P/S/ST/SP		All materials stored in stillages and site box and excess materials returned to same Only quantities as per site requirements are delivered to site Interim transit of materials on site as per mechanical lift devices No placement of materials along access ways or gangways All personnel in receipt of manual handling training Any palletised loads not to exceed two pallets in height All materials surplus to immediate requirements to be stored in client designated area Piping, Tubes etc to be stored on lengths of timber / racks which facilitate ease of access for mechanical fork lifts or teleportsers c/w forks to access and lift, and such to be stored in client designated area and used as required.
2.08	Manual Handling	Awkward loads Incorrect lifting techniques Loading onto High/Low Platforms Repetitive Movements,	Sprains, strains, Musculoskeletal /injuries Repetitive strain injury Damage to materials & property Injury to others	Y		√			√		P/S/ST/SP		Manual handling of loads to be avoided where possible & practicable Mechanical lifting methods to be used where possible & practicable Persons required to carry out this tasks are trained in correct lifting methods All tasks requiring M/H are planned to minimise risks Work areas, access/egress routes are free of trip hazards Operatives use appropriate P.P.E. when carrying out there duties – safety boots etc. If loads are to be handled then they are to be broken down into manageable lifts When lifting of scaffold parts all parts are to be handled and not thrown. Due consideration to be made to those around, environmental conditions and ground conditions

Design Risk Assessment This design risk assessment is carried out in accordance with the requirements of the Safety, Health and Welfare at Work (Construction) Regulations 2006 to identify exceptional features of design and construction affecting Safety and Health. It is not the intention to identify normal construction activities that a competent Contractor would anticipate in a project of this nature.

Project Name	Cherry Orchard Childcare Centre
Project Number	24276-REN
Project Description	New phase of existing creche with three children's rooms and two sleeping rooms
Start Date:	TBC

Issue	23/01/2025
Date	23/01/2025
Completed by	BS
Reviewed by	SM

Public	P
Site Operatives	S
Structure	ST
Site Plant	SP



Ref.	Building Element	HAZARD	RISK	Present	Severity of Risk			Likelihood			Person affected	Contractor to be notified	Design action taken to reduce specific risk (control measure)
					Severe	Medium	Low	Severe	Medium	Low			
2.09	Teleporter	Operations	Collapse of load Overturning of machine Impaired operators vision Collision with pedestrians / plant / site vehicles	Y		√			√		P/S/ST/SP		Trained, experienced, CSCS/CITB accredited operators Planned and regular maintenance including operator inspection & weekly updating of CR 4B's Current thorough examination certificate – CR 4A – every 14 months No overloading of machine and no passengers Vehicle driven at site speed limits Due care and attention when working on slopes or gradient and unloading delivery vehicles Restrictive vision arises – use of bank man to be employed Machine never to be left unattended with the key in ignition or when engine is running Operator to carry out daily checks
2.1	Transport	Movement on site	Undue care & attention. Poor driving Poor ground / unstable conditions Serious injury / fatality Damage to vehicle / plant / structure Collision with reversing / manoeuvring vehicle	Y		√			√		P/S/ST/SP		All transport / store personnel to receive appropriate training & posses suitable qualifications All machines to be reg maintained & recorded All operators to work in a safe manner taking others into consideration when manoeuvring and as to safe operating procedures for road use as well as site. Speed limited as to requirements When deemed necessary, a signaller/ banksman to be used when vision is restricted or impaired No passengers to be carried unless provision made in accordance with manufacturers instruction & legislation and in accordance with company policy Flashing warning beacon to be used @ all times when vehicles is in operation c/w reserve audible alarm, on site Operators to familiarise themselves with overhead lines, excavations, work areas, ramps etc associate with each site and to conform to the requirements by each location for deliveries Operators to be within current certification / license to drive said vehicles
2.11	Transport	Delivery of Materials Loading Unloading	Load collapse Fall from trailer of vehicle	Y		√			√		P/S/ST/SP		Full PPE to be worn especially Hi-Vis Vest Direct visual contact with driver at all time when vehicle reversing and always positioned off to one side Check load as to how it is secured prior to commencing unloading. Utilise mechanical lift devices for unloading where possible Ensure unloading area is free from personnel not directly involved in lift and where public is concerned ensure area is secured from unauthorised access with a safety watch posted in addition Ensure off loading area is level and that the centre of gravity is obtained for each load before it moves off from the trailer If unloading requires manual intervention ensure all concerned are trained in manual handling techniques and that each individual only lifts a load that they are able to lift safely as to their determination If loads are to be lifted off by crane, then each load must be slung by a competent, trained CSCS Slinger / Signaller All lifting operations are under the control of the slinger / signaller During such lifts, all personnel shall leave the lift zone including the driver of the vehicle and cooperate with instruction issued by the slinger / signaller <u>Where goods hoist are utilised, client instructions are to be followed</u>
2.12	Transport	Unloading of Large Plant Items	Load collapse Fall from trailer of vehicle Collision with reversing / manoeuvring vehicle	Y		√				√	P/S/ST/SP		Ensure all plant items where possible are delivered in sectional pieces. Full PPE to be worn especially Hi-Vis Vest Direct visual contact with driver at all time when vehicle reversing and always positioned off to one side Check load as to how it is secured prior to commencing unloading. Utilise mechanical lift devices for unloading where possible Ensure unloading area is free from personnel not directly involved in lift and where public is concerned ensure area is secured from unauthorised access with a safety watch posted in addition Ensure off loading area is level and that the centre of gravity is obtained for each load before it moves off from the trailer If unloading requires manual intervention ensure all concerned are trained in manual handling techniques and that each individual only lifts a load that they are able to lift safely as to their determination If loads are to be lifted off by crane, then each load must be slung by a competent, trained CSCS Slinger / Signaller All lifting operations are under the control of the slinger / signaller During such lifts, all personnel shall leave the lift zone including the driver of the vehicle and cooperate with instruction issued by the slinger / signaller <u>Where goods hoist are utilised, client instructions are to be followed</u>
2.13	Housekeeping	Bad practice Site rules not enforced or obeyed	Slips, trips, falls, sprain strains, fractures, cuts & abrasions, puncture wounds. Serious injury Collapse of stacked materials	Y			√			√	P/S/ST/SP		Regular Housekeeping procedure, Removal of waste & debris De-nailing of unused timber immediately Work areas maintained free of debris, Access/egress ways maintained free of materials, rubbish etc All materials properly sited & securely stored so as not to pose a danger All operatives to receive training & instruction as to current procedures Regular site inspections Use of site waste disposal facilities and full conformance to procedures set out

Design Risk Assessment

This design risk assessment is carried out in accordance with the requirements of the Safety, Health and Welfare at Work (Construction) Regulations 2006 to identify exceptional features of design and construction affecting Safety and Health. It is not the intention to identify normal construction activities that a competent Contractor would anticipate in a project of this nature.

Project Name	Cherry Orchard Childcare Centre
Project Number	24276-REN
Project Description	New phase of existing creche with three children's rooms and two sleeping rooms
Start Date:	TBC

Issue	23/01/2025
Date	23/01/2025
Completed by	BS
Reviewed by	SM

Public	P
Site Operatives	S
Structure	ST
Site Plant	SP



Ref.	Building Element	HAZARD	RISK	Present	Severity of Risk			Likelihood			Person affected	Contractor to be notified	Design action taken to reduce specific risk (control measure)
					Severe	Medium	Low	Severe	Medium	Low			
2.14	Noise	Exposure	Hearing Loss Hearing Impairment Tinnitus	Y			✓			✓	P/S		All client operation to comply with the requirements of the Noise at Work Regulations 2006 Where noise exceeds the exposure levels, Client shall inform this company and its operatives Where such notification is received, a specific risk assessment shall be taken to determine the levels pertaining, sample noise testing etc and to determine best course of action to be followed Adequate hearing protection to be worn where noise levels exceed exposure limits and operatives to fully comply with the wearing of same – audiometry testing made available to operatives. This is viewed as a last resort – client noise reduction measures are requested primarily Reduction of operative exposure by reducing time spent near excessive noise sources – exposure only of short duration Posting of Warning signs with specific instruction and operatives to comply with same Regular monitoring and inspection
2.15	Dust & Fumes	Exposure Inhalation	Inhalation of contaminants Ingestion of contaminants Asphyxia Skin Irritation / Disease	Y			✓			✓	P/S		Prior specific assessment of proposed work area and adjacent activities Material Safety Data Sheet checked for dusts / fumes / vapours producing elements produced by client. Hazardous / toxic materials identified & appropriate control measures implemented Exposure to hazardous chemicals/ toxins to be eliminated prior to works commencing and suitable client controls in place. Full communication of hazards to operatives and of necessary precautions to be taken in advance of works undertaken. Windblown dusts to be reduced by dampening down roads / work surfaces by site No eating or smoking in such atmospheres to be strictly enforced Client to monitor actively area of works for accidental exposure Full conformance to Respiratory Protective Equipment wearing as a precautionary measure
2.16	Lighting	Inadequate Site Illumination	Slips, falls, trip Contusions, abrasions Vehicular accidents/incidents Damage to equipment or structures	Y			✓			✓	P/S/ST/SP		All work areas to be suitably illuminated Use of temporary site lighting. all temp. light fixtures to be of 110 V supply All access/egress ways to be suitably illuminated. Provision of access/egress lighting all equipment / cables to be sound condition and be so positioned as not to cause a hazard, or to come in contact with surface water lighting circuits to be wired through a RCD and MCB The erection of lighting to be carried out by trained & competent personal
2.17	Hazardous Materials	Handling Burns Skin irritation Eye irritation	Skin or eye irritant Burns Respiratory problems Ingestion with food Exposure levels exceeded Fire/explosion	N		✓			✓				
2.18	Site Office	General Equipment Photocopiers, Printers, scanners	Slips, trips, falls – trailing leads etc Serious injury Electrocution, burns, fire, explosion Fume/dust inhalation, exposure to hazardous substances	Y			✓			✓	P/S/ST/SP		Correct use, installation & storage of toner powder Avoid trailing leads Switch off equipment & unplug for servicing & when not in use Don't overload sockets & keep area clear around equipment – allow to ventilate All operations and general operating conditions as to manufacturers instructions Get assistance when moving office equipment Ensure photocopier is well ventilated All workstations are comfortable and seating is adjustable to suit the height of the desks c/w a footrest to reduce muscular strain. First aid boxes to be supplied, easily accessible and fully stocked c/w someone appointed and trained as a First Aider Avoid excessive manual handling, do not store materials at height Provide adequate ventilation and lighting
2.19	Site Office	Display Screen Equipment	Slips, Trips, Falls from trailing Data & Computer leads Poor workstation organisation / inadequate work space Incorrect seating, poor lighting & general environmental conditions Inadequate screen display characteristics	Y		✓				✓	P/S/ST/SP		Regular inspections of all electrical equipment, cords, and outlets should be carried out to identify wear, damage, or defects. Faulty equipment should be promptly replaced or repaired. Only extension cords and power strips in good condition and rated for the intended load should be used, and overloading of electrical outlets with multiple devices should be avoided. Cords and cables should be organized to prevent tripping hazards, and emergency shutdown procedures should be established in case of electrical fires or emergencies. Training on electrical safety practices, including proper use of electrical equipment and fire extinguisher operation, should be provided to all personnel. Electrical equipment should be stored in a dry, protected area when not in use to prevent exposure to moisture or extreme temperatures.
2.2	Powered tools	Incorrect volatge Frayed cables Damaged transformers	Electrocution Cuts, grazes Sprains, strains Dark working areas	Y		✓			✓		P/S/ST/SP		All operations as to safe working procedures Inspect all light fittings, cables Only 110v tools permitted on site If, in exceptional circumstances, higher voltage lights are required, a Method Statement to be produced Cable runs to be clearly marked, not transversing walk ways at ground level causing a trip hazard

Design Risk Assessment This design risk assessment is carried out in accordance with the requirements of the Safety, Health and Welfare at Work (Construction) Regulations 2006 to identify exceptional features of design and construction affecting Safety and Health.
It is not the intention to identify normal construction activities that a competent Contractor would anticipate in a project of this nature.

Project Name	Cherry Orchard Childcare Centre
Project Number	24276-REN
Project Description	New phase of existing creche with three children's rooms and two sleeping rooms
Start Date:	TBC

Issue	23/01/2025
Date	23/01/2025
Completed by	BS
Reviewed by	SM

Public	P
Site Operatives	S
Structure	ST
Site Plant	SP



Ref.	Building Element	HAZARD	RISK	Present	Severity of Risk			Likelihood			Person affected	Contractor to be notified	Design action taken to reduce specific risk (control measure)
					Severe	Medium	Low	Severe	Medium	Low			
2.21	Temporary lights	Incorrect volatge Frayed cables Insecure mounting	Electrocution Cuts, grazes Sprains, strains Eye injuries	Y		√			√		P/S/ST/SP		PPE to be worn at all times (Safety glasses, ear defenders, gloves) All personnel in receipt of training All operations as to safe working procedures Inspect all tools, charging equipment, cables Only 110v tools permitted on site If, in exceptional circumstances, higher voltage tools are required, a Method Statement to be produced Cable runs to be clearly marked, not transversing walk ways at ground level causing a trip hazard
2.22	Atrium	Access Working at height	Fall from height Fall of materials, tools or equipment	N		√			√				
2.23	Roof	Access Working at height	Fall from height Fall of materials, tools or equipment	Y		√			√		P/S/ST/SP		Trained + competent personnel Use of "FALL ARRESST" system on roof areas Consider a Permit to Work system
2.24	COVID 19	Infection	Catching Coronavirus	Y		√			√		P/S/ST/SP		All Site Personnel & Visitors shall abide by Site Covid 19 Regulations and Procedures put in place by the Main Contractor & Sub Contractors.

Design Risk Assessment

This design risk assessment is carried out in accordance with the requirements of the Safety, Health and Welfare at Work (Construction) Regulations 2006 to identify exceptional features of design and construction affecting Safety and Health.
It is not the intention to identify normal construction activities that a competent Contractor would anticipate in a project of this nature.

Project Name	Cherry Orchard Childcare Centre
Project Number	24276-REN
Project Description	New phase of existing creche with three children's rooms and two sleeping rooms
Start Date:	TBC

Issue	23/01/2025
Date	23/01/2025
Completed by	BS
Reviewed by	SM

Public	P
Site Operatives	S
Structure	ST
Site Plant	SP



Ref.	Building Element	HAZARD	RISK	Present	Severity of Risk			Likelihood			Person affected	Contractor to be notified	Design action taken to reduce specific risk (control measure)
					Severe	Medium	Low	Severe	Medium	Low			
3	Mechanical												
3.01	Hot Works	Operations	Fire and explosion Burns Injury to personnel Fatalities	N		✓			✓		P/S/ST/SP		Hot works permit required - Trained + competent personnel Use of “FLASH BACK ARRESTORS” on O2, acetylene cylinders Proper storage of cylinders in a well ventilated + secure area/cage All cylinders to be in the erect / vertical position Regular maintenance Procedures
3.02	Welding	Oxy Acetelyne Electric Arc	Fire & explosion from the ignition of gas cylinders Ignition of other flammable materials during welding operations Metal splatter & Hot work pieces Prolonged exposure to heat Infra-red & visible light given off by welding gas Gas & Fumes:-iron oxide, Carbon monoxide, ozone gas, nitrous fumes & carbon (when combustion is incomplete)	Y		✓			✓		P/S/ST/SP		Hot works permits to be issued before any works commenced Where possible, all flammable materials should be removed from the welding operations area Contractors undertaking welding operations should produce a method statement prior to work Fire resisting sheets should be used to protect the surroundings from flame and spatter PPE should be worn The cable connecting any welding apparatus to the source of electrical supply to be as short as possible Care to be taken to ensure that all wiring is suitable to carry the heavy currents required and that all connections are correctly made so that they cannot give rise to overheating or sparking Extra ventilation should be introduced to reduce the likelihood of heat stress occurrence The placing of a second person on stand-by in case of emergency should be considered Reduced time exposure should be considered Effective fume control equipment should be provided The catchment hood of any extraction equipment should be placed adjacent to the weld so that the fume is picked up as soon as it is produced; this fume should be exhausted to the atmosphere or filtered through an electrostatic filter so the clean air is returned to the workroom If welding operations are being undertaken on coated metals, air sampling should be carried out & consideration given to the use of respirators for this work. The Control of lead at Work Regulations 1998 (SI 1998 No 543) must be observed under these circumstances Where other operations are being undertaken adjacent to the welding area, e.g. painting, the combined effect <u>should be considered & suitable systems of work put in places</u>
3.03	Abrasive Wheels		Vibration – hand/ arm, Vibration White Finger Air borne elements & dust inhalation, flying particles, eye injuries Noise hot surfaces Flammable fuel, burns, Fire, Explosion Mech moving parts, entanglement, wheel shatter, amputation, lacerations, Noise, Trailing Cables, trips	Y		✓			✓		P/S/ST/SP		Use of trained/competent staff. All operations as to safe practices, procedures, manufacturers instructions & equip. to be tagged Equipment used as to manufacturers instruction & serviced, Use of correct replacement parts Caution to be exercised to surrounding work area & materials. Due care & attention to others in carrying out of operations Correct positioning of cables so as not to cause trip hazard & not to come in contact with water Any defective equipment to be replaced immediately. All maintenance/repairs to be carried out by qualified personnel. Operatives trained in the changing of an abrasive wheel Prior to usage daily inspection to be carried out by operator. When not in use equipment to be stored in a secure dry area Guards always correctly positioned and adjusted for the work. Operator not to use undue pressure and to use the correct disc / wheel. Only 110v equipment to be used Disc cutters to be used only when standing on a firm level base and for angle grinders a “Dead mans switch” is fitted Where a potentially flammable or explosive atmosphere exists, cutting activities are to be controlled by Permit to Work conditions Adequate ventilation & dust extraction at the point of works Full use of PPE

Design Risk Assessment

This design risk assessment is carried out in accordance with the requirements of the Safety, Health and Welfare at Work (Construction) Regulations 2006 to identify exceptional features of design and construction affecting Safety and Health. It is not the intention to identify normal construction activities that a competent Contractor would anticipate in a project of this nature.

Project Name	Cherry Orchard Childcare Centre
Project Number	24276-REN
Project Description	New phase of existing creche with three children's rooms and two sleeping rooms
Start Date:	TBC

Issue	23/01/2025
Date	23/01/2025
Completed by	BS
Reviewed by	SM

Public	P
Site Operatives	S
Structure	ST
Site Plant	SP



Ref.	Building Element	HAZARD	RISK	Present	Severity of Risk			Likelihood			Person affected	Contractor to be notified	Design action taken to reduce specific risk (control measure)
					Severe	Medium	Low	Severe	Medium	Low			
3.04	Cutting	Manual tools	Explosion /Fire Burns/Fatigue /Nausea Crush from falling objects Asphyxiation	Y		✓			✓		P/S/ST/SP		Hot work permit required for welding and burning operations Used only by experienced operator or trainer under close supervision Watch out for others passing who could get splashed with molten material Equipment supplied by an approved supplier only to be used. P.P.E. for eyes and body supplied. Checked for leaks and damage before use Ignition according to manufacturers instructions Bottles chained in an upright position Plant & equipment being worked on to be checked in details for explosive substances or gases Provide fire extinguisher near all work Adequate fire firefighting equipment provided and staff trained to use this Remove flammable materials from work area before starting- cover with fire blanket if required Bottles stored in a separate designated area- Full/empty Use trolley to move gas bottles, bottles to be secured to the trolley
3.05	Compressed Air	Compressed Air storage Cylinders Compressors	Explosion /Fire Burns/Fatigue /Nausea Crush from falling objects Asphyxiation Exposure to hazardous noise levels Air entering body orifices or skin under pressures Whiplash of airline Eye injury Inhalation of exhaust fumes	N	✓				✓				
3.06	Cartridge Operated Tools	Operation Noise Storage	Flying Splinters causing eye injuries Penetration through Shot surface Misuse of unfired cartridge Ricochets, Misfire	Y		✓			✓		P/S/ST/SP		Only trained operatives will be authorised to operate cartridge tool. Training to include specific training in issue & use They must not be used in explosive or flammable atmosphere Operatives must not be under 18 yrs Planning must include procedures for the strict control of the use of cartridge tools and cartridge ammunition to prevent injury to users & others in the vicinity The general principle is to treat these tools as firearms Care must be taken to ensure the work done with these tools and the presence of others in the immediate vicinity Cartridges to be issued & selected to suit materials to be fixed Misfire drills must be strictly followed, misfire cartridges shall be safely retained for examination Misfired cartridges must only be removed according to manufacturers instructions Eye & hearing protection are mandatory for operatives using these tools Site Supervisor to make specific arrangements for issue, storage & use of these tools & their cartridges, including the safe locked storage of cartridges & the return of mis-fires
3.07	Insulating Material	Non Asbestos	Inhalation of material Heat stress in confined areas Skin irritation	Y			✓			✓	P/S/ST/SP	Y	All necessary equipment & PPE will be on site before works start In planning the use of non-fibrous materials or other substitutes, dust suppressants should be considered The area of work may be isolated by the use of enclosures or screens, so as to prevent the spread of dust & materials Waste or old materials should be dampened down or left to reduce dust and then placed in bags or sealed containers for disposal as classified waste Use of PPE will be monitored by management to ensure that operatives do not put themselves at risk Operatives using PPE will be trained in its use, care & storage
3.08	Insulating Material	Asbestos	Inhalation of material Heat stress in confined areas Skin irritation	N			✓			✓			

Design Risk Assessment

This design risk assessment is carried out in accordance with the requirements of the Safety, Health and Welfare at Work (Construction) Regulations 2006 to identify exceptional features of design and construction affecting Safety and Health. It is not the intention to identify normal construction activities that a competent Contractor would anticipate in a project of this nature.

Project Name	Cherry Orchard Childcare Centre
Project Number	24276-REN
Project Description	New phase of existing creche with three children's rooms and two sleeping rooms
Start Date:	TBC

Issue	23/01/2025
Date	23/01/2025
Completed by	BS
Reviewed by	SM

Public	P
Site Operatives	S
Structure	ST
Site Plant	SP



Ref.	Building Element	HAZARD	RISK	Present	Severity of Risk			Likelihood			Person affected	Contractor to be notified	Design action taken to reduce specific risk (control measure)
					Severe	Medium	Low	Severe	Medium	Low			
3.09	Pneumatic power tools	Operating Vibration	Exposure to hazardous noise level Vibration Eye injuries Striking by falling objects Inhalation of exhaust fumes Vibration injuries (White Finger) Inhalation of lubricating oil mists Inhalation of dust	Y			✓			✓	P/S/ST/SP		Compressors/tools are subject to planned maintenance & suitable weekly inspections are required Air receivers, will be identified by serial/plant numbers & be fitted with pressure gauge, safety valve, drain point & access for cleaning The safe working pressure will be identified on air receivers & will not be exceeded All guards & covers must be fitted to moving parts or compressors, especially on v-belts and pulleys Cutting tools provided to be kept sharp Operating instructions must be available for all plant prior to use Ensure that hoses are the right size for the tools & the length of the hose is kept as short as possible Hoses must be kept free from corrosive materials & protected from interference by passing traffic Hoses must be kept clean when disconnected All connections must be properly clamped to prevent the hose whipping Compressed air should not be used to clean clothes All operatives must wear appropriate PPE Operatives will be trained in the safe use of pneumatic tools & the precautions necessary & of the dangers associated with the compressed air if required
4 Electrical													
4.01	Sub Station Switch room	Working in room Open trench in floor Working on Electrical boards	Electrocution Fall Hazard Injury to personnel Fatalities	Y		✓			✓		S/ST/SP		Trained + competent personnel Ensure that all power is cut off from cabling in areas where the cables are likely to be cut as part of the building works. Ensure that protective covers and casings are promptly refitted to electrical plant after work has been carried out. Care is required near overhead E.S.B. Cables and Masts. Permit To Work required on H.T. 10kV or MV Installations.
4.02	Cables	Electrical – Leads, Transformers & Services to portable equipment	Electrocution Fire, Explosion, Burns Slips, trips, falls, Contusion, Abrasions Mechanical damage to equipment	Y		✓			✓		P/S/ST/SP		All electric leads * extensions are 110V and wired into an RCD & colour coded yellow All yellow sockets are waterproof & in good condition, not damaged or broken Transformers & distributions boards are in good condition c/w all trips devices operational All equip. are tagged and subject to weekly. Checks & monthly inspections Power supply leads to the transformers is kept to the recommended length – 2 m Damaged cables & transformers & parts are isolated & replaced Cables & equipment is positioned so as not to traverse across walkways, door's, stairs etc. Cables crossing site roads are suitably buried in appropriate Mech. protective ducting All cables, supplies, panels etc are to be treated live until confirmed otherwise Full observance of warning notices and signs to be observed
4.03	Electrical Services	Distribution Boards Cables Containment	Electrocution Fire Manual handling	Y		✓			✓		P/S/ST/SP		Electricians should be fully informed of the requirements for cabling , routing etc Only competent electrical tradesman/contractors should install electrical systems & proof of competence should be obtained Site based training on the operations & use of the permits to work systems should be provided Manual handling training should be provided A safe distribution system should be in place Electrical supplies installed in hazardous situations, e.g. excavations, may require the advice of an electrical engineer with appropriate qualifications and /or experience Any metal work that could be made live by any leakage of electricity should be earthed Permit to work systems should be used for work on live systems, and on any equipment which has been made dead Load requirements of the system should be calculated & the system planned to take account of unforeseen load requirements & environmental condition Systems should be tested & certified as tested prior to use All temporary switch rooms, distribution cabinets, etc, should be locked Warning notices ("Electrical hazard") should be placed on all live distribution equipment Fire extinguishers (CO2) should be placed at distribution units PPE should be worn & rubber mats placed on the ground for all live work Cable routine should be planned to minimise tripping hazards Any cables used on site should be sheathed & their routes recorded if buried

Design Risk Assessment This design risk assessment is carried out in accordance with the requirements of the Safety, Health and Welfare at Work (Construction) Regulations 2006 to identify exceptional features of design and construction affecting Safety and Health. It is not the intention to identify normal construction activities that a competent Contractor would anticipate in a project of this nature.

Project Name	Cherry Orchard Childcare Centre
Project Number	24276-REN
Project Description	New phase of existing creche with three children's rooms and two sleeping rooms
Start Date:	TBC

Issue	23/01/2025
Date	23/01/2025
Completed by	BS
Reviewed by	SM

Public	P
Site Operatives	S
Structure	ST
Site Plant	SP



Ref.	Building Element	HAZARD	RISK	Present	Severity of Risk			Likelihood			Person affected	Contractor to be notified	Design action taken to reduce specific risk (control measure)
					Severe	Medium	Low	Severe	Medium	Low			
5	Particular Risks												
5.01	Confined spaces	Working in restricted access spaces	Foul air Noise Difficulty in entry or exit	N		✓			✓				
5.02	Traffic hazard		Building fronts onto existing main road Traffic collision Personell injury Pedestrian / driver injury Smokers & gas explosion risk	Y	✓				✓		S/ST/SP	Y	A Risk Assessment and Method Statement is required, to identify if a traffic management plan is required in this area A Permit to Work must be sought and issued before the work can commence. An assessment must be made on the traffic & pedestrain control in the vinity of the works No naked flames, ignition sources allowed near the works All smokers to be banned from the area; care to be taken of high level smokers on the upper decks of the car park An assessment on how plant and equipment is brought into the area and removed must be made An assessment must be made on adjacent working and whether or not this needs to cease during this confined space work Full observance of warning notices and signs to be observed
5.03	Lifting apparatus hoisting plant & equipment into the works area	Working with lifting appartatus, cranes, hoists Use of ropes, belts and chains	Plant to be lifted up onto the roof and upper floors Personal injury	Y		✓			✓		S/ST/SP	Y	A Risk Assessment and Method Statement is required, compliant with the HSA Working in Confined Spaces recommendations http://www.hsa.ie/eng/Topics/Work_at_Height/ A Permit to Work must be sought and issued before the work can commence. A person must be designated to be in control of the operation at all times An assessment must be made on whether adjacent work must cease and the area cleared An assessment on how plant and equipment is brought into the area and anchored; a solid footing / base may need to be constructed Full observance of warning notices and signs to be observed
5.04	Open trenches, excavations	Working in or adjacent to open trenches, pits	Collapsing banks, flooding, foul air	Y							S/ST/SP	Y	A Risk Assessment and Method Statement is required, A Permit to Work must be sought and issued before the work can commence. An assessment must be made on edge protection An assessment must be made on traffic management, pedestrian access An assessment on how plant and equipment is brought into the area and removed must be made An assessment on any other below ground services and these need to be clearly marked / indicated An assessment must be made on adjacent working and whether or not this needs to cease during this excavation work An assessment must be made on the time that the excavation remains open and the date for back filling Full observance of warning notices and signs to be observed
5.05	Heavy, awkward or bulky items	Manhandling or moving , plant or equipment	Plant to be raised to upper floors & to the roof Injuries or strain to staff involved in moving items, collapse of floors or platforms	Y		✓			✓		S/ST/SP	Y	A Risk Assessment and Method Statement is required, compliant with the HSA manual handling recommendations A Permit to Work must be sought and issued before the work can commence. An assessment on local Lighting must be carried out An assessment on how the item/s, plant and equipment is brought into the area and maneuvered into place An assessment on any obstructions, changes in height must be made to determine the best route into the work area An assessment must be made on adjacent working and whether or not this needs to cease during this movement work Full observance of warning notices and signs to be observed