

Minimum Standards Framework

Buried Services & Breaking Ground

Minimum Standards

- ❖ Only competent and trained operatives to carry out works. SMSTS, CAT & Genny, First Aid at Work
- ❖ CAT g4+ or equivalent to be used as a minimum on all Davidsons sites.
- ❖ All services identified **MUST BE MARKED** on the ground with spray paint.
- ❖ Only insulated tools to be used for hand digging.
- ❖ Requirements to be checked by Davidsons site team before works commence.

- ❖ Service drawings and GPR Surveys to be referenced and areas to be excavated highlighted before works commence (copies attached to Permit)
- ❖ HS15 A Breaking Ground Permit to Dig must be completed before works commence.
- ❖ Area scanned for depth and line and services marker sprayed on the ground.
- ❖ No mechanical digging once the top layer of tarmac has been removed as most services will now be within 500mm.

What Good Looks like



Prohibited items & Practices

No mechanical digging within 500mm of a known live service.



Tools & Equipment



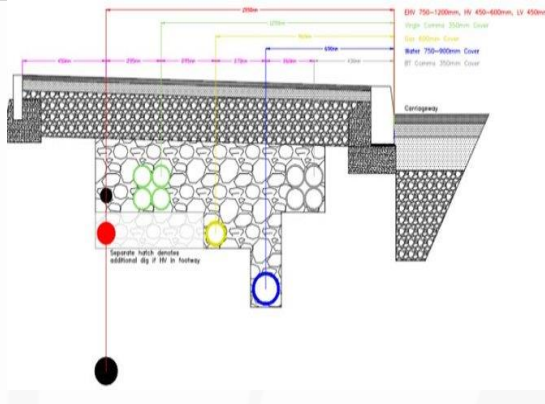
Minimum Standards Framework

Protecting & Exposing Service Connections

Minimum Standards

- ❖ All services to be laid in accordance with National Joint Utilities Group guidance.
- ❖ Bulk bags partly filled with sand to be laid in excavations where service connections will be required.
- ❖ Stone to be laid and compacted to underside of base course.
- ❖ Before tarmac is laid timber bearer to be placed across the path either side of the proposed service excavation to mitigate mechanical digging
- ❖ When required tarmac and stone are removed with excavator Bulk bag of sand is now removed exposing services.
- ❖ Hand dig remaining aggregates from around the services.
- ❖ Road plates, Chapter 8 barriers and signage must be used where required.
- ❖ Detectable warning tape to be placed 300mm on a sand bed above any service

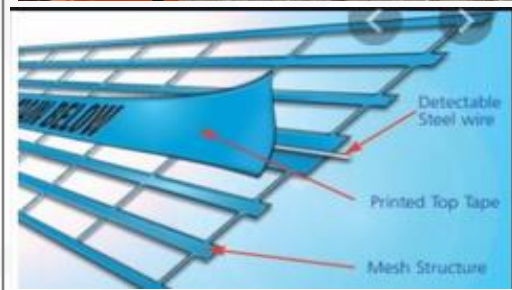
What Good Looks like



Prohibited items & Practices



No steel shovels or mechanical digging within 500mm of live services



Tools & Equipment



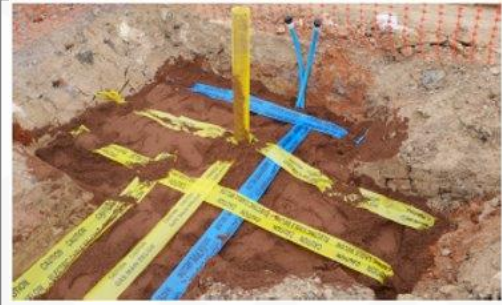
New Service Installation

Minimum Standards

- ❖ Bulk bags of sand to be placed where known service connections and road crossings will be required.
- ❖ Backfill to be sand and MOT type 1 Only
- ❖ Detectable warning tape to be laid on sand 300mm above the service .
- ❖ Flexible vertical sleeves (duct) placed to protect any purge valves (nipples). Loaded with bulk bag of sand and detectable marker tape.

- ❖ Preparing for future gas and water connections with timber bearers and sprayed brick over vertical sleeve
- ❖ Tarmac base course can be removed without mechanical cutting .
- ❖ Base course and top layer of type 1 can be removed mechanically until bulk bag lifting straps are located.
- ❖ All open excavation **MUST** be protected with Chapter 8 barriers, signs and road plates where required in line with NRSWA.

What Good Looks like



Prohibited items & Practices

No mechanical cutting and **ONLY** the correct backfill to be used



Tools & Equipment



Use of Vacuum Extraction

Minimum Standards

- ❖ Vac Ex will be used when HV cables, High Pressure gas, large water services or where multiple services have been identified .
- ❖ Where risk assessments identify difficulties in excavating safely a Vac Ex must be used.
- ❖ All operators must be suitably trained to operate a Vac Ex (CPCS category , A78 (A-H) Vacuum Excavation)



What Good Looks like



Prohibited items & Practices

Only use for designed purpose

Tools & Equipment



Deep Excavations

Minimum Standards

- ❖ All deep excavation works must be planned, managed, carried out and monitored by competent persons.
- ❖ RAMS and Rescue plans must be robust enough to cover the work activity and rehearsed periodically
- ❖ Where deep excavation works are required suitable ground supports and shoring **MUST** be in place.
- ❖ All lifting equipment and accessories must have supporting Thorough Exam Certs

- ❖ Temporary Works designs and /or certification must be in place and checked for all ground support systems before works commence.
- ❖ Trench boxes, fixed edge protection, secured ladders, ladder access gates and gantry's **MUST** be in place.
- ❖ Rescue Equipment must be present on site to facilitate a rescue.

What Good Looks like



Prohibited items & Practices

- ❖ If any element of the requirements are missing then works must not commence.
- ❖ No work to be carried out in unsupported deep excavations.
- ❖ No operatives are permitted within a trench box when the excavators are operating.
- ❖ No loads to be slung over an excavation that has operatives working within.

Tools & Equipment



Confined Spaces

Minimum Standards

- ❖ Trained & Competent Operatives and Supervision. SMSTS, First Aid at Work, Confined Spaces (NC2 Min)
- ❖ Robust SSOW & Rescue Plan.
- ❖ Confined Spaces Permit to Work in place HS09A.
- ❖ All equipment to be used must be checked for up to date certification and must meet requirements
- ❖ All confined spaces works must be in line with Confined Spaces Regulations 1997.
- ❖ All Confined Spaces works will meet the minimum standards as set out in ACOP L101 3rd Edition 2014

Equipment required :

- ❖ Tripod
- ❖ Winch
- ❖ Harness
- ❖ Gas detector
- ❖ BA System
- ❖ Fire Extinguisher (RA to dictate)
- ❖ Protective fencing (double clipped Heras to perimeter of confined spaces work area) & warning signage

What Good Looks like



Prohibited items & Practices

- ❖ No untrained operatives to enter a confined space.
- ❖ If any element of Davidsons requirements for confined spaces works are missing then works CANNOT commence until satisfied NO EXCEPTIONS!!

Tools & Equipment



Lift Plans & Common Lifts

Minimum Standards

- ❖ All common lifts of materials and plant must have a lift plan in place.
 - ❖ All operatives involved must have suitable training and experience including slinger signaller (CPCS Slinger Signaller (excavator) – A40D) Endorsement C if CPCS or N100 if NPORS for plant operator
 - ❖ In date Thorough Examination Certificates must be in place for all plant and lifting accessories
- ❖ Items to be lifted and plant used must be relevant to the lift plan.
 - ❖ Lift plan must be provided and approved by a competent person (Appointed Person) with relevant experience.
 - ❖ No lift plan NO LIFT!!

What Good Looks like



Prohibited items & Practices

- No lifting without a slinger signaller in place
- No lift without a suitable lift plan in place
- No lifting without thorough examination certificates in place for lifting attachments and accessories.

Tools & Equipment

