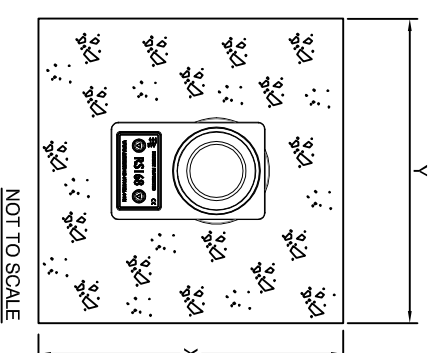
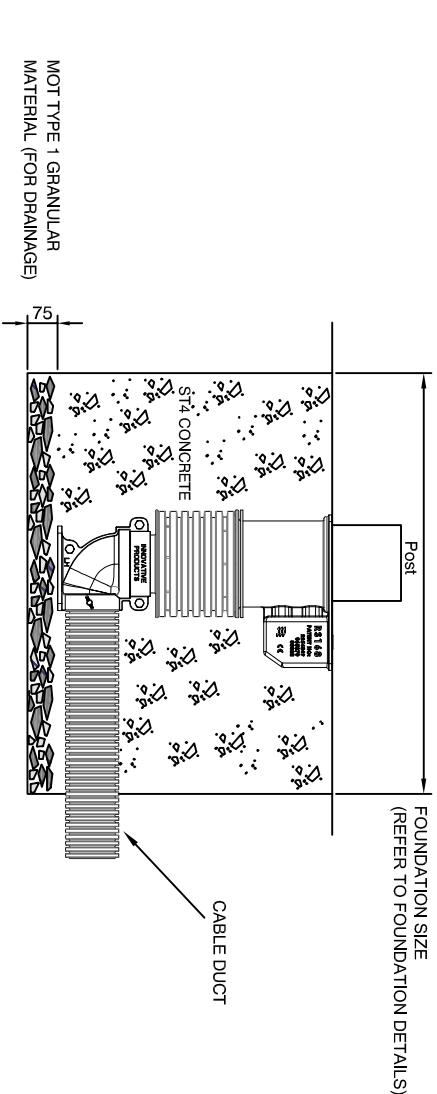


**FOUNDATION DETAIL**



**RETENTION SOCKET FOUNDATION DETAILS**

| SOLID GROUND (Cat IV, WIND 26m/s) |                        |                       |             |  |       |
|-----------------------------------|------------------------|-----------------------|-------------|--|-------|
| RETENTION SOCKET DEPTH            | 600mm                  | 750mm                 | 900mm       | MINIMUM DISTANCE TO EDGE OF CONCRETE PAD | 250mm |
| RETENTION SOCKET SIZE             | POST HEIGHT CALCULATED | FOUNDATION WIDTH (mm) |             |  |       |
| RS168                             | 10m                    | 1370 x 1370           | 1300 x 1300 | 1250 x 1250                              |       |

**LOOSE GROUND (Cat II, WIND 26m/s)**

| LOOSE GROUND (Cat II, WIND 26m/s) |                        |                       |              |  |       |
|-----------------------------------|------------------------|-----------------------|--------------|--|-------|
| RETENTION SOCKET DEPTH            | 600mm                  | 750mm                 | 900mm        | MINIMUM DISTANCE TO EDGE OF CONCRETE PAD | 250mm |
| RETENTION SOCKET SIZE             | POST HEIGHT CALCULATED | FOUNDATION WIDTH (mm) |              |  |       |
| RS168                             | 10m                    | *1710 x 1710          | *1620 x 1620 | *1560 x 1560                             |       |

\* 2 LAYERS OF A393 MESH TO BE USED FOR ALL INSTALLATIONS IN LOOSE GROUND

**NOTES:**

- RETENTION SOCKETS TOPS MUST BE CONSTRUCTED FROM CAST STEEL TO GS240 OR DUCTILE IRON TO BS2789 500-7
- RETENTION SOCKETS MUST BE CAPABLE OF WITHSTANDING HIGH SPEED VEHICLE IMPACT FORCES TO STEEL POSTS WITH A WALL THICKNESS OF 6mm. RETENTION SOCKETS MUST BE ABLE TO WITHSTAND IMPACT WITHOUT ANY STRUCTURAL SURROUND TO THE TOP 80mm OF THE UNIT.
- ALL SOCKETS MUST BE IMPACT TESTED BY AN INDEPENDENT CERTIFIED TEST CENTRE AND MUST BE IMPACT TESTED WITH A MIN 6mm STEEL POST AT 50kph. TEST DATA AND INDEPENDENT CERTIFICATION MUST BE AVAILABLE TO SUBSTANTIATE CLAIMS FOR SOCKETS AND FOUNDATIONS.
- POSTS MUST BE POSITIVELY SECURED INTO THE RETENTION SOCKETS AND BE ABLE TO WITHSTAND A TURNING MOMENT OF 3.4kNm THROUGH A LOAD OF 230kg @ 1.5 METRE FROM THE CENTRE OF POST WITHOUT ANY ROTATION.
- SECURING MECHANISM OF SOCKETS TO POST MUST NOT DAMAGE THE COATING OR GALVANISED SURFACE OF THE POST.
- ALL FIXINGS WHICH SECURE POSTS IN PLACE MUST BE HOUSED BELOW GROUND ENSURING NO RISK OF DAMAGE, VANDALISM OR THEFT.
- RETENTION SOCKET PEDESTRIAN PLUGS MUST BE TESTED TO EN124 - B125 (12.5 TONNE) LOADING.
- RETENTION SOCKETS MUST HAVE THE ABILITY TO BE REDUCED IN DEPTH ON SITE EASILY TO A MIN OF 600mm.
- RETENTION SOCKETS MUST BE SUPPLIED WITH A BOTTOM ENTRY BEND THAT CAN SWIVEL 360 DEGREES. THE BEND MUST HAVE THE ABILITY TO UTILISE THE FULL BORE 100mm DIAMETERS FOR EASY CABLE ENTRY. THE BEND MUST BE COMPACT, ALLOWING THE POST TO REST NO FURTHER THAN 150mm ABOVE THE FOUNDATION BASE. DUCTS MUST BE ABLE TO BE INSERTED A MIN OF 75mm INTO THE BEND AND BE MECHANICALLY FIXED TO ENSURE NO DISPLACEMENT OCCURS DURING BACKFILL.
- RETENTION SOCKETS INSTALLED IN LOOSE GROUND CONDITIONS SHALL REQUIRE 2 LAYERS OF A393 MESH.
- ALL OPERATING COMPONENTS MUST BE SERVICEABLE ON SITE WITHOUT EXCAVATING THE SOCKET.
- THE RETENTION SOCKET MUST BE CAPABLE OF BEING INSTALLED IN AREAS OF GRADED SURFACES SUCH AS THOSE AT PEDESTRIAN CROSSING WHILE THE INSTALLED POLE IS VERTICAL.
- RETENTION SOCKETS SUPPLIED MUST HAVE AN ASSOCIATED LIFTING MECHANISM WHICH ENABLES TRAFFIC SIGNAL POLES TO BE LIFTED AND LOWERED IN AND OUT OF THE RETENTION SOCKET. THIS MUST BE OPERATED WITHOUT THE REQUIREMENT FOR CARRIAGEWAY CLOSURES / TM.
- SUPPLIERS OF RETENTION SOCKETS MUST BE ABLE TO SUPPLY EN40 & BD94/07 FOUNDATION DESIGN CALCULATIONS FOR ALL SIZES AND DEPTHS OF RETENTION SOCKETS SUPPLIED.
- ALL RETENTION SOCKETS MUST BE PROVIDED TO THE ABOVE SPECIFICATION BY NAL LTD, OR ANY EQUALLY APPROVED MANUFACTURER.

Rev. No.: Standard Detail File Ref.: 05796.43

Title:

RS168 'DUCKFOOT BEND'  
RETENTION SOCKET DETAIL

Drawn: RPF  
Chd: AB  
Authd: AB  
Date: 10/15



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Drawing No.: ESD 6/43  
Scale @ A3: N.T.S