PRODUCT DATA





Page 1 of 2

Metal SDS Flanged Hex Head

Self Drilling Screw (SDS) #12-14

Applications

- Metal to metal fixing
- · Fastening roofing panels to steel purlins/battens
- · Crest fixing- roofing sheet
- XGRiP® to hold roofing profile (if external load applied)

Material



C1022 Hardened

Finish



Class 4

| | Pullout Values | | | | | | | | |
|-------------------|--------------------------|---------------|-------------------------------------|------------------|--|--|--|--|--|
| Plate (Purlin) | Metal Plate Thickness | ¹Mean Load | ² Characteristic Load | ³Working Load | | | | | |
| | (mm) | (N) | (N) | (N) | | | | | |
| G2 | 1.1 | 1650 | 1400 | 550 | | | | | |
| G450 | 2.0 | 5000 | 4650 | 1850 | | | | | |
| G450 | 2.5 | 6900 | 6200 | 2500 | | | | | |
| G450 | 3.8 | 10350 | 9600 | 3850 | | | | | |







| Drill Point Test | | | | | | |
|-------------------|--------------------------|------|------------------------|---------------------------------|------------------------------|--|
| Plate (Purlin) | Metal Plate Thickness | Load | Drill Speed Drill Time | | Drill Time | |
| | (mm) | (kg) | (RPM) | (Max. individual) Seconds | (Max. average) Seconds | |
| G450 | 2.0 | 18 | 2200 | 5.5 | 4 | |

| Mechanical Properties | | | | | | |
|-----------------------|---------------------------|--|--|--|--|--|
| Torsional Strength | ¹Mean Tensile Strength | ¹ Mean Shear Strength | ² Characteristic Tensile Strength | ² Characteristic Tensile Strength | | |
| (Nm) | (N) | (N) | (N) | (N) | | |
| 10.9 | 16450 | 9900 | 13800 | 8300 | | |

Note: 1000N = 1kN

¹Mean Load/Strength is the average ultimate strength of samples tested.

²Characteristic Load/Strength: 95% of these screws are expected to have a strength greater than the loads shown.

³Working Load is the governing minimum allowable load obtained by comparing relevant concrete and steel working loads. Factor of Safety (FOS=2.5 for steel, FOS=2.5 for timber and FOS=3.0 for concrete) are already included.

All values are obtained under laboratory conditions using DRiLLX product. Safety factors should be considered for design purposes. Actual pullout loads may differ slightly depending on certain properties of the base material.

Disclaimer: While every reasonable effort has been made to ensure that this document is correct at the time of printing, Hobson Engineering®, its agencies and employees, disclaim any and all liability to any person in respect of anything or the consequences of anything done or omitted to be done in reliance upon the whole or any part of this document.



PRODUCT DATA

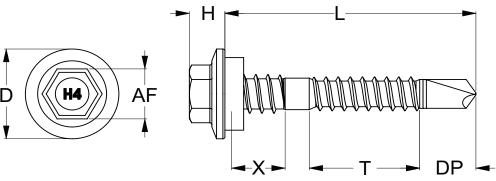




Metal SDS Flanged Hex Head

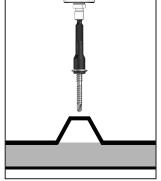
Page 2 of 2

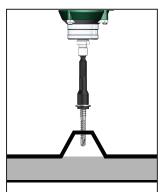
| Part | QFind | Gauge | TPI | Length | Thread Length | Drill Point Length | XGRiP® Thread Length | Head Height | Head ø | Drive Size | Pack Qty |
|----------------|-------|-------|-----|--------|------------------|-----------------------|----------------------------|----------------|--------|---------------|-------------|
| | | | | L (mm) | T (mm) | DP (mm) | X (mm) | H (mm) | D (mm) | AF (inch) | |
| T9PM4XH1214037 | Q295 | 12 | 14 | 37 | 18 | 7.5 | 7.8 | 5.5 | 14 | HEX 5/16" | 1000 |
| T9PM4XH1214043 | Q296 | | | 43 | 21 | | | | | | 1000 |
| T9PM4XH1214053 | QA40 | | | 53 | 27 | | | | | | 500 |

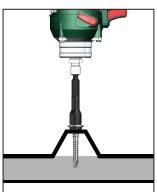


Installation









Recommended **HEX 5/16 inch Drive Bit:**

| Part | QFind | Length | |
|---------------|-------|--------|--|
| | | (mm) | |
| TXDIPNSS31045 | BA18 | 45 | |
| TXDIPNSS31065 | B090 | 65 | |
| TXDDPNSS31100 | B060 | 100 | |
| TXDDPNSS31150 | B075 | 150 | |
| TXDDPNSS31200 | BA01 | 200 | |
| TXDDPNSS31300 | BA02 | 300 | |

Installation Guide

- **1.** Use a cordless screw driver set between 2,200-3,000 RPM. Fit the HEX Drive Bit over the screw and place at the fastening position.
- **2.** Apply consistently firm pressure to the screw driver while the screw is drilling.
- 3. Care should be taken not to over-tighten the screw.

Disclaimer: While every reasonable effort has been made to ensure that this document is correct at the time of printing, Hobson Engineering®, its agencies and employees, disclaim any and all liability to any person in respect of anything or the consequences of anything done or omitted to be done in reliance upon the whole or any part of this document.

HOBSON ENGINEERING

^{*}Installation with impact drivers not recommended.