

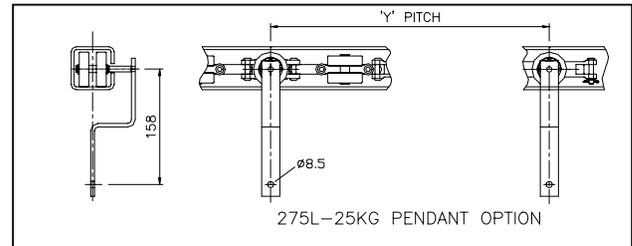
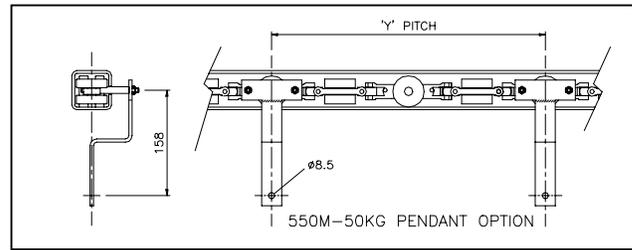
275L/550M SIDE MOUNTED



CHAIN

- Type** Fully bi-planar design.
- Construction** 'Z' shaped brackets connected to chain by either one or two pins depending on loadings. Consult Stewart Gill Engineering department for bracket options.
- Finish** Zinc plated to give protection and a high quality finish.
- Pitch sizes 'Y'** Multiple of 6" (152.4mm) or 8" (203.2mm).
- Strength** Safe working chain pull 275kg / 550kg.

Roller Options	Max pendant load (kg)	Max/Min operating temp	Weight/metre (kg) – 3" / 4"	Approx μ value
Hardened pressed steel ball bearing	(25)/275L	260 / -32°C	4.6 / 3.6	0.07
Semi shielded ribbon cage ball bearing	(50)/550M	260 / -32°C	5.4 / 4.2	0.05



TRACK

Square Tubular Section specially manufactured from cold rolled mild steel to Stewart Gill specifications.

Size 58.8 x 58.8mm external x 4mm wall with a 12.7mm slot on the side.

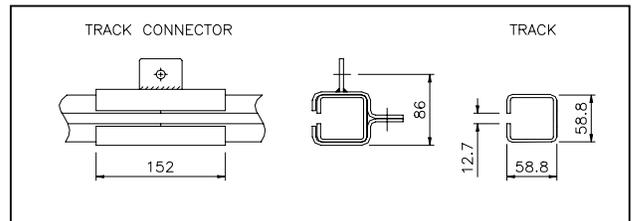
Weight 6.4kg per metre

Supports Side mounted STS bolted track connectors and hanger brackets are supplied for attaching supports/downhangers, with a third point fixing on all horizontal bends, according to the loads carried at the following recommended intervals:

Distributed load per metre in kg	15	30	60	90	120	150
Safe span between supports in metres	4.30	3.35	2.74	2.34	2.22	2.00

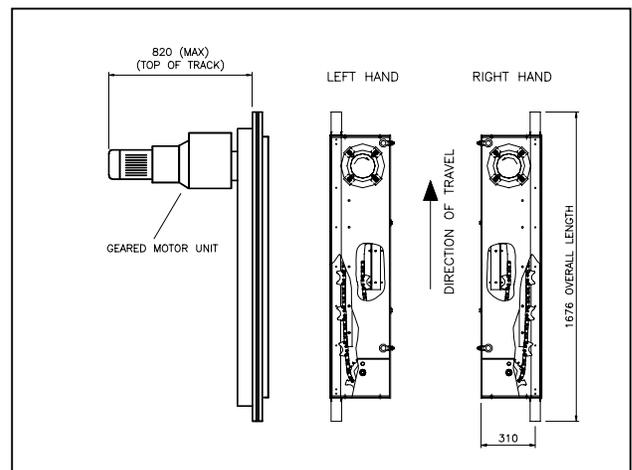
Simple drive calculations

Chain Pull = (total weight of chain+carriers+load) x coef. of μ . For normal, simple, clean running and well maintained circuits check the adjacent table for the coefficient of μ that may be used, but always confirm with Stewart Gill before ordering.



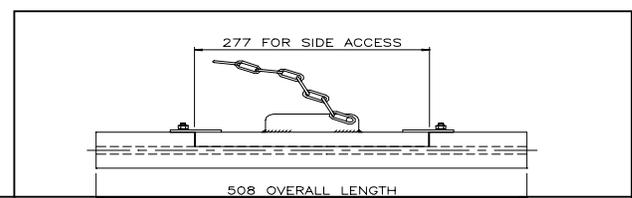
DRIVE UNIT

- Type** Linear straight through type, mounted in a straight section of track.
- Configurations** Either left or right handed.
- Drive Method** Single drive chain with pocket castings engaging the horizontal chain rollers.
- Motor/Gearbox** 0.75 kW max. in line helical geared motor unit. Available with a Varimot base giving 5:1 manual speed control. Alternatively a fixed speed unit may be supplied with either an AC inverter or DC thyristor speed controller.
- Overload Protection** Fitted with a mechanical shear pin device as standard, to protect the drive mechanism and conveyor chain in the event of a jam up. Alternative safety devices available at extra cost.
- Guards** Fitted as standard in accordance with Health & Safety at Work requirements.



INSPECTION STATION

Fitted with retaining bolts for operator safety. To be installed either side of the drive unit and at every 30 metres approx. around the circuit to facilitate chain insertion and maintenance.



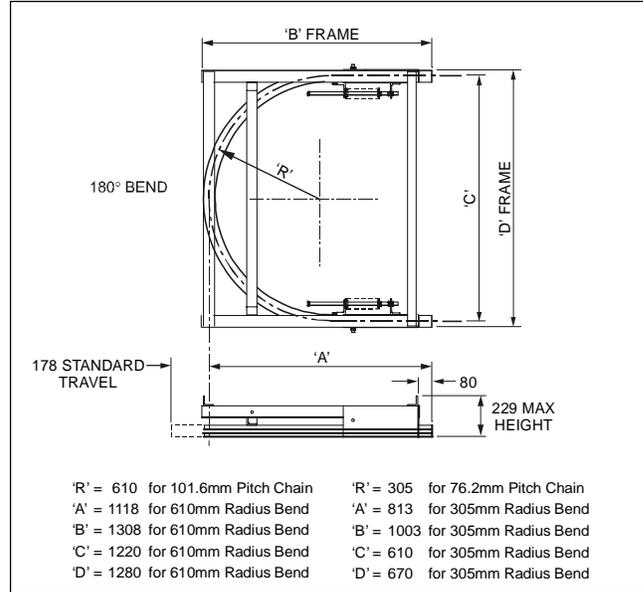
275L/550M SIDE MOUNTED



TENSION UNITS

These must be fitted to all installations as near as possible after the drive in the direction of travel to ensure smooth running. Tension units incorporate a pair of special tongue and sleeve sliding track sections and are mounted on either side of a single 180° or a pair of 90° horizontal track bends on a complete chassis assembly. There are four main types of tension unit available and can be supplied in either **internal** or **external** form :-

- Drawbolt** Allows manual adjustment of chain tension suitable for short systems running in ambient temperatures only.
- Spring operated** Where conveyors run under heat or through process plant, spring operated tensioning is provided to compensate for chain expansion.
- Pneumatically Operated** These give accurate preset tension conditions and a safety stop limit when maximum adjustment is reached.
- Dead weight** Can be supplied, for unusual tension conditions.
- Standard sizes** 180°x305mm radius for 76.2mm pitch chains.
180°x610mm radius for 101.6mm pitch chains.
Special sizes are available to special order for parallel track centres up to 3 metres at extra cost.

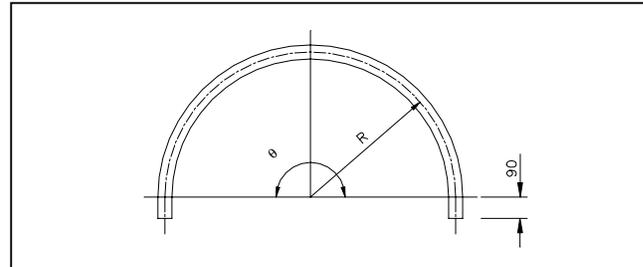


HORIZONTAL BENDS

Supplied complete with 90mm straight at each end to facilitate assembly into track with STS connectors.

- Standard 'θ'** 30°, 45°, 90°, 180°.
- Standard 'R'** 305mm for 3" (76.2mm) pitch chain.
610mm for 4" (101.6mm) pitch chain.

Supplied in either **internal** or **external** form.
Special bends can be supplied at extra cost.

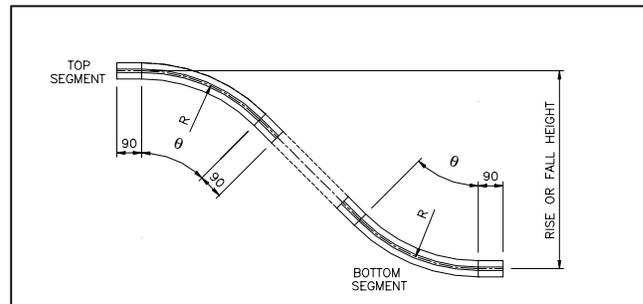


VERTICAL BENDS

Supplied as standard top and bottom vertical bend segments each with 90mm straight to facilitate assembly into track with STS track connectors.

- Standard 'θ'** 15°, 30°, 45°.
- Standard 'R'** 305mm for 3" (76.2mm) pitch chain.
610mm for 4" (101.6mm) pitch chain.

Special bends can be supplied as welded one piece units or to non-standard angles at extra cost.



LUBRICATOR

For trouble free operation and longer life the conveyor should be fitted with an automatic lubricator. This standard unit is supplied in a section of track complete with microswitch operated trip valve and spray nozzles to give air pulse injection lubrication.

- Air supply** 40p.s.i. (2.8 Bar) – 80p.s.i. (5.5 Bar)
- Capacity** Oil reservoir – 2 litres
- Recommended lubricants** Shell Tellus 37 for ambient temperatures.
Mobil Pyrolube 830 for temperatures up to 260°C

The lubricator unit should be fitted, where possible, just before the drive unit.

FINISH

- Standard** Painted orange (or high temp silver through ovens).
Galvanised and stainless steel finish available at extra cost.

This data sheet is for guidance only. Please contact our engineering department prior to ordering.

Stewart Gill has a policy of continuous improvement, we therefore reserve the right to change any of the details included within this data sheet without prior notice.