

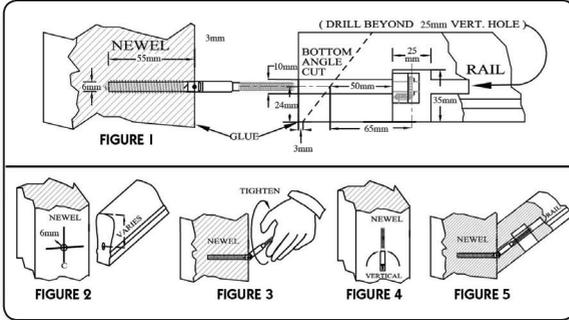
# IMPORTANT NOTICE!

Always start with the bottom joint first.

## Instructions - Bottom Joint



QT11.550



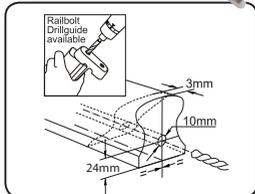
- 1 Cut rail 90 degrees square, then mark angle on handrail 3mm in from the end of the 90 degree cut (fig 1)
- 2 Mark the centerline on the handrail on 90 degree cut, up 24mm from bottom of handrail. (INCLUDING INFILL STRIP) (fig 1)
- 3 Down side of the handrail measure 65mm from the centre of the 10mm hole ( this is the centre point for the 25mm hole)
- 4 Drill a 25mm hole x 35mm deep in the bottom of handrail. (INCLUDING INFILL STRIP)
- 5 Drill a 10mm dia hole in the end of rail. Hole should be 90mm long. It is very important that the 10mm hole is drilled before cutting the angle.
- 6 Cut Handrail to the correct angle and length.
- 7 Measure the distance from top of the handrail to centre of the 10mm hole. (fig 2)
- 8 Mark centerline on newel post and also mark the desired finish height of handrail. (fig 2)
- 9 Mark pilot hole on newel post by measuring down from the desired marked handrail height along the centre line.
- 10 Drill (6.5mm for softwood) or ( 7.0mm for hardwood) pilot hole 65mm deep. (fig 2)
- 11 Wind the screw end into pilot hole on newel post until the beginning of the knuckle. (fig 3)

- 12 Ensure that the bolt ends in the vertical position (fig 4).
- 13 Slide rail on to bolt and "DRY FIT" if adjustment is needed recut to correct angle.(fig 5)
- 14 If using the QT11.550 in conjunction with ANGLE SLIPFIX do not move to step 15 until the Angle Slipfix (Top Joint) is ready for gluing and tensioning. (fig 5)
- 15 When correct angle has been established, glue, tension gear housing by a 5mm hex driver bit.

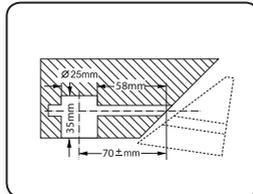
## Top Joint



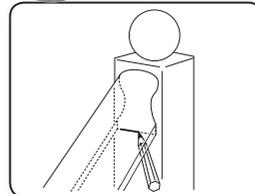
QT13.900



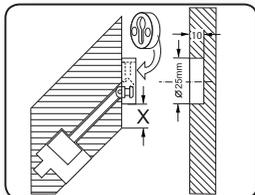
- 1 Cut hand rail 90° SQUARE. Mark the angle on handrail 3mm in from the end of the 90° cut Mark the centre line on the underside of the hand rail. Bring the centre line to the face on the handrail. Measure 24mm up the face of the handrail following the centre line (INCLUDING INFILL STRIP).



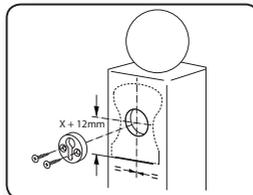
- 2 Down the side of the handrail measure 70mm from the centre of the 10mm hole. Mark that measurement on the underside of the hand rail. Use the centerline to form a cross, which will be the centre point for the 25mm gear housing. Bore a 25mm hole 35mm deep (INCLUDING INFILL STRIP) for the gear housing. Then bore 10mm hole, 90mm long, 24mm up from the base of handrail as previously marked. Cut handrail to the correct length and angle.



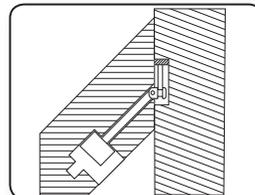
- 3 Mark the height on the newel post where the handrail is to finish. Offer up the handrail to height marking and draw a line on the underside of the handrail.



- 4 Insert the Slipfix shall down the 10mm hole Attach the metal gear housing and tension until the knuckle is protruding. Take the keyhole plate and slide over the protruding shaft. Tighten fully until keyhole plate is tight against handrail as shown. On the handrail, draw a line under keyhole plate. From that line, measure to the underside of the handrail. This is measurement X (Very Important)



- 5 Add 12mm to measurement X. This is the centre point for the keyhole plate. From the bottom line on the newel post mark measurement X plus 12mm on the centre line. Bore a 25mm hole 10mm deep for keyhole plate. This is important that it is 10mm.



- 6 Screw the keyhole plate on the newel post. Make sure it is central. Tension gear housing so that knuckle is protruding 13mm from face of rail. Ensure knuckle is at 90° to the keyhole plate. Slide handrail into position ensuring that the knuckle remains at 90°. Glue and tension fully.

Making your life easier!