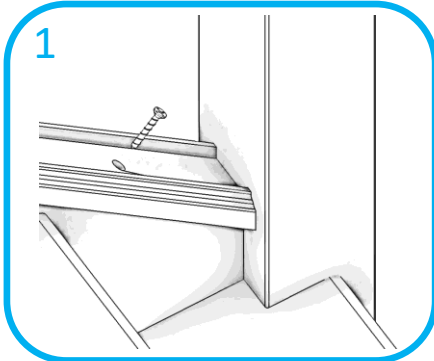
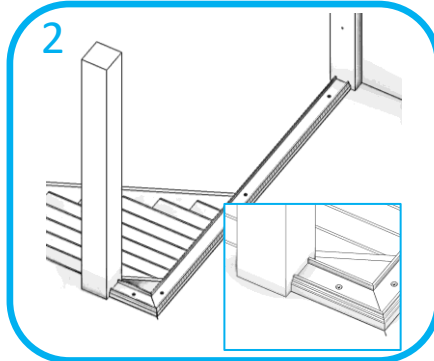


# FITTING INSTRUCTIONS – Handrails & Base rails

## Base rails...

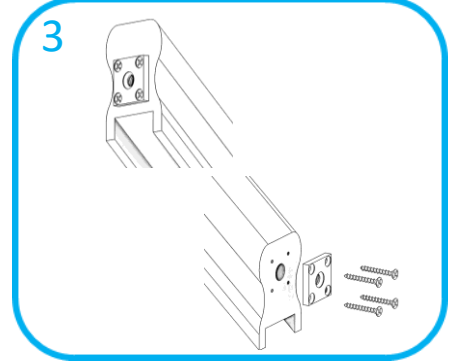


Place base rail on stair nosing's and up against top and bottom newel posts. Mark and cut to length. Offer onto string and position centrally to newel post faces. Drill holes every 600mm through base rail groove into string and countersink. Secure base rail using 4mm x 75mm flat head csk screws, ensuring that the screw head is located below surface. If fixing un-grooved base rails, counterbore screw holes to accept 9.5mm timber plugs

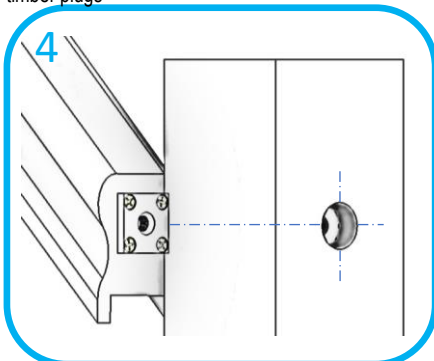


On landing, draw layout for where base rail is going to be positioned, ensuring that the layout starts and ends central to landing newel posts. Use layout to place the base rail onto and use as a template to cut to length. Drill series of holes through base rail groove and countersink. Secure to floor with screws. If fixing un-grooved base rails, counterbore screw holes to accept 9.5mm timber plugs

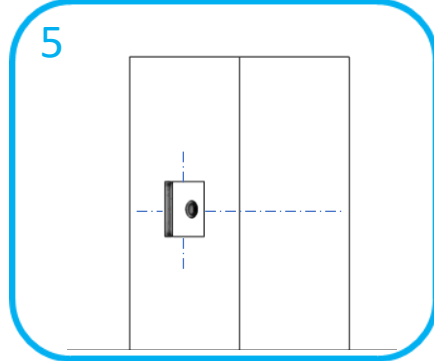
## Handrails...



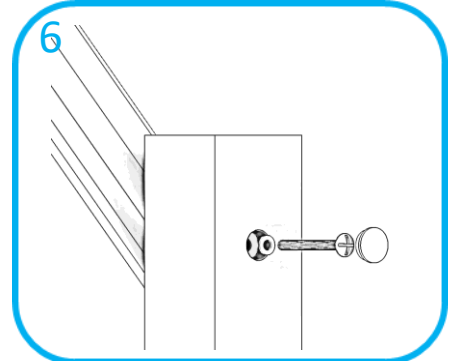
Place handrail on stair nosing's and up against top and bottom newel posts. Mark and cut to length. On bottom handrail face, offer fixing bracket to top half of face and mark position of screw holes and central bolt hole. Pilot drill screw holes and a clearance hole for central bolt boss. Secure with screws. Repeat at the top rail end face but position the bracket on bottom half of face to allow for screw lengths.



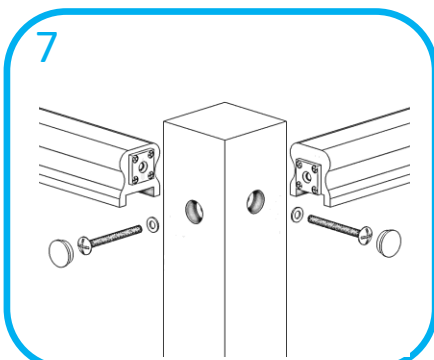
Offer rail and brackets to side of top and bottom newel posts so top of handrail is 900mm minimum height from pitch line. Draw line from centre of bracket to opposite face of newel. Drill counterbored hole through to accommodate bracket fixing bolt. Repeat for both newel posts



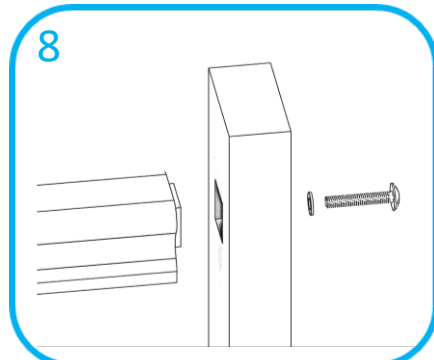
On opposite face, mark and rebate the newel to accommodate the fixing bracket. Repeat for both newel posts



Apply some pva adhesive to handrail faces, and offer brackets into top and bottom newel post rebates. Secure with bolt and washer supplied.



For landing handrails, repeat the procedure used on the stairs. Where a corner newel post is present, stagger the height position of the brackets by 10mm to avoid the bolts colliding in the corner newel post



When fixing handrails to half newel posts, fix handrail to half newel post first, then fix half newel post to wall