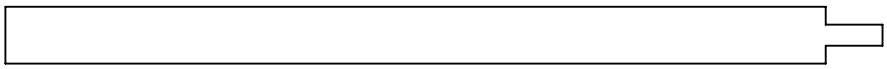
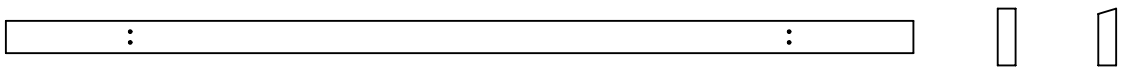
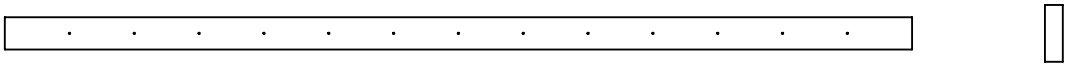
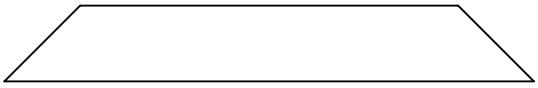
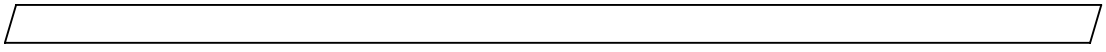
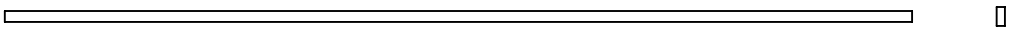
APEX BUILDINGS

GENERAL ASSEMBLY INSTRUCTIONS

- Component Drawings

Part Reference	Part Image
A	
B	
C	
D	
E	
F	

- Tools & Procedures

Important Safety Information

Before starting assembly, please read through the following safety guidelines carefully. Your safety is our priority.

Two-Person Job: Assembly of the pergola requires at least two people. Some components are heavy and require lifting and positioning at height.
Working at Height: Be cautious when working above ground level. Always use secure step ladders or hop-ups, ensuring they are positioned on level and stable ground.
Overhead Work: When handling components above head height, maintain a firm grip, and ensure your partner is aware of your movements to prevent accidental injury.
Protective Gear: We recommend wearing safety gloves, safety glasses, non-slip footwear and bump caps when working overhead to minimize the risk of injury.

Required Tools

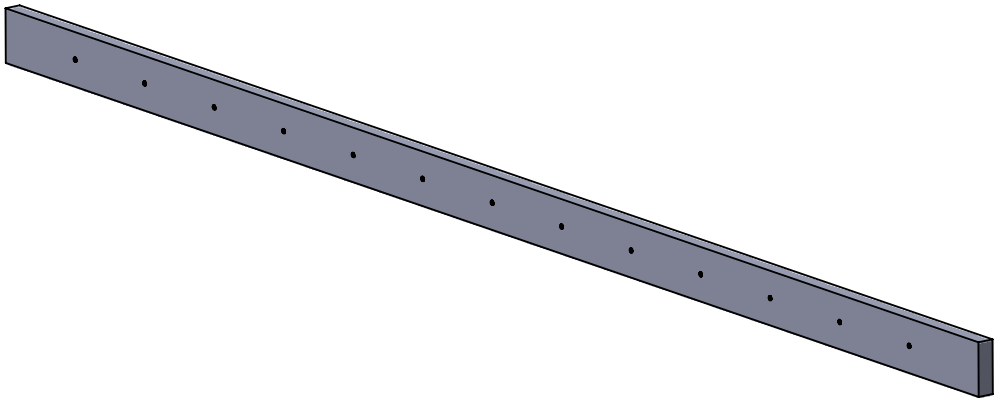
Ensure you have the following tools ready before beginning assembly:

-Impact Driver – For securing fasteners efficiently.
-Combi Drill – Required for pre-drilling holes where necessary.
-Tape Measure – To ensure accurate spacing and positioning.
-Step Ladders (x2) – Essential for working at height safely.
-String Line – Used to maintain alignment and straight edges during installation.

By following these safety precautions and using the correct tools, you'll ensure a smooth and secure assembly process for your pergola kit. Always take your time and work methodically for the best results.

If you have any questions, refer to the full instruction manual or contact our support team

- Step 1



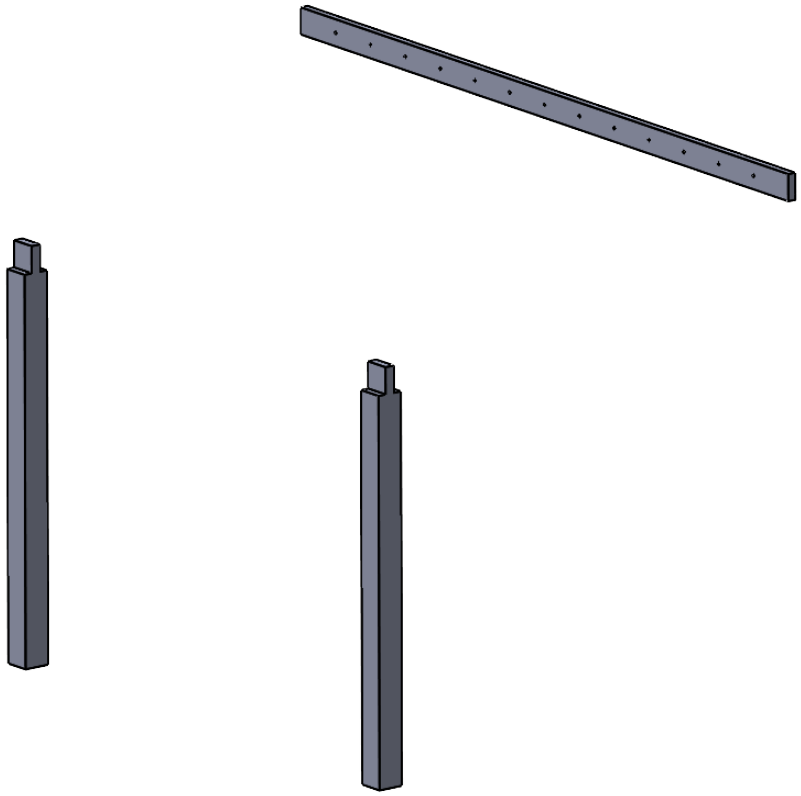
Begin by securing the timber wall plate (Part C) to the supporting wall of the property. This forms the main structural anchor for the lean-to pergola and must be fixed securely.

Positioning: The wall plate should be set at a height of 2950mm from ground level to the top edge of the timber. This ensures proper roof pitch and headroom for the pergola.

Fixings:
We recommend using heavy-duty fixings at 300–400mm intervals along the full length of the wall plate. This spacing ensures even load distribution and a secure attachment.
Please note: Masonry fixings are not supplied with this kit. The appropriate type of fixing will depend on your wall construction (e.g., brick, block, timber-frame, etc.). Consult a qualified professional or your local building supplier for guidance on the most suitable fixings for your specific wall type.

Check for Level: Use a spirit level to ensure the wall plate is level before securing it fully. An uneven wall plate can affect the stability and appearance of the finished structure.

- Step 2



With the wall plate securely in place, the next step is to set the vertical support posts. A lean-to pergola typically requires 2 or 3 posts arranged in a straight line, set parallel and square to the wall plate, rather than in a square layout like a freestanding pergola.

Positioning:
Posts should be set 500mm in from each end of the wall plate. If using a third (central) post, position it equidistant between the two outer posts.

The centre of each post should be positioned 75mm less than the total pergola width from the wall. For example: a 2.4m wide lean-to will have post centres located at 2.325m from the wall.

Use a string line or straight edge at the front edge of the planned post line to ensure all post positions are aligned and check that posts are positioned square to the wall plate.

- Step 2.1

Fixing Methods:
There are three common ways to install the posts, depending on your ground surface and preference:

Bolt Down Post Holders
Ideal for solid surfaces like concrete or paving.

Position the post holders directly on your marks.

Use a straight edge or string line to make sure all holders are aligned and square to the wall plate.

Fix them in place, then slot in the posts and tighten the bolts.

Drive-In Post Holders
Suitable for soft ground (e.g., soil or turf).

Align each holder with your marks.

Drive the holder into the ground using a sledgehammer and a scrap piece of wood or a post driver, until the spike is fully submerged.

Insert the posts and tighten the bolts.

Concrete-In Posts
This method provides maximum strength and durability.

Dig holes approximately 450mm (18") in diameter and 1/4 of the post's total length deep.

Add a layer of aggregate for drainage.

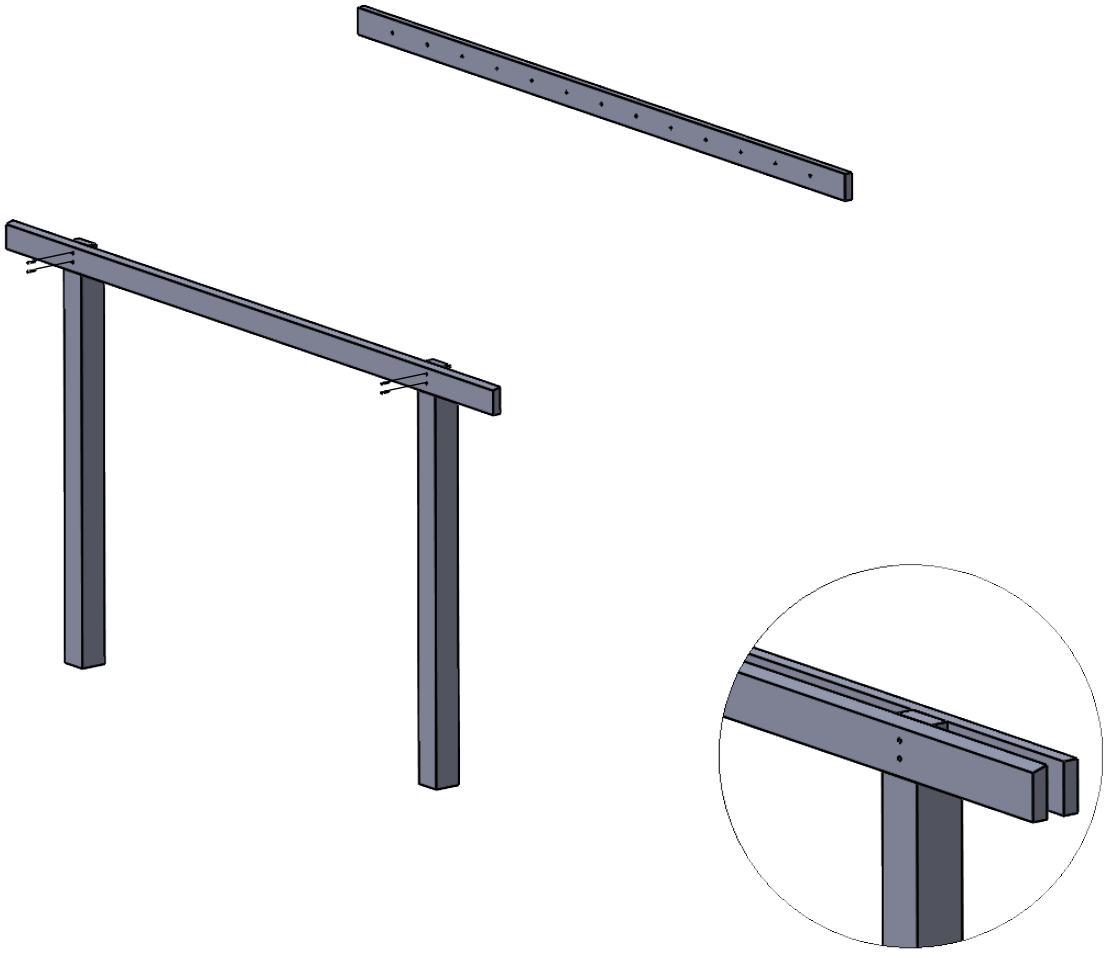
Check that the base of each hole is level across all positions.

Insert posts, prop them upright, and ensure they are level and square to the wall plate.

Fill with concrete and allow to set fully before removing supports.

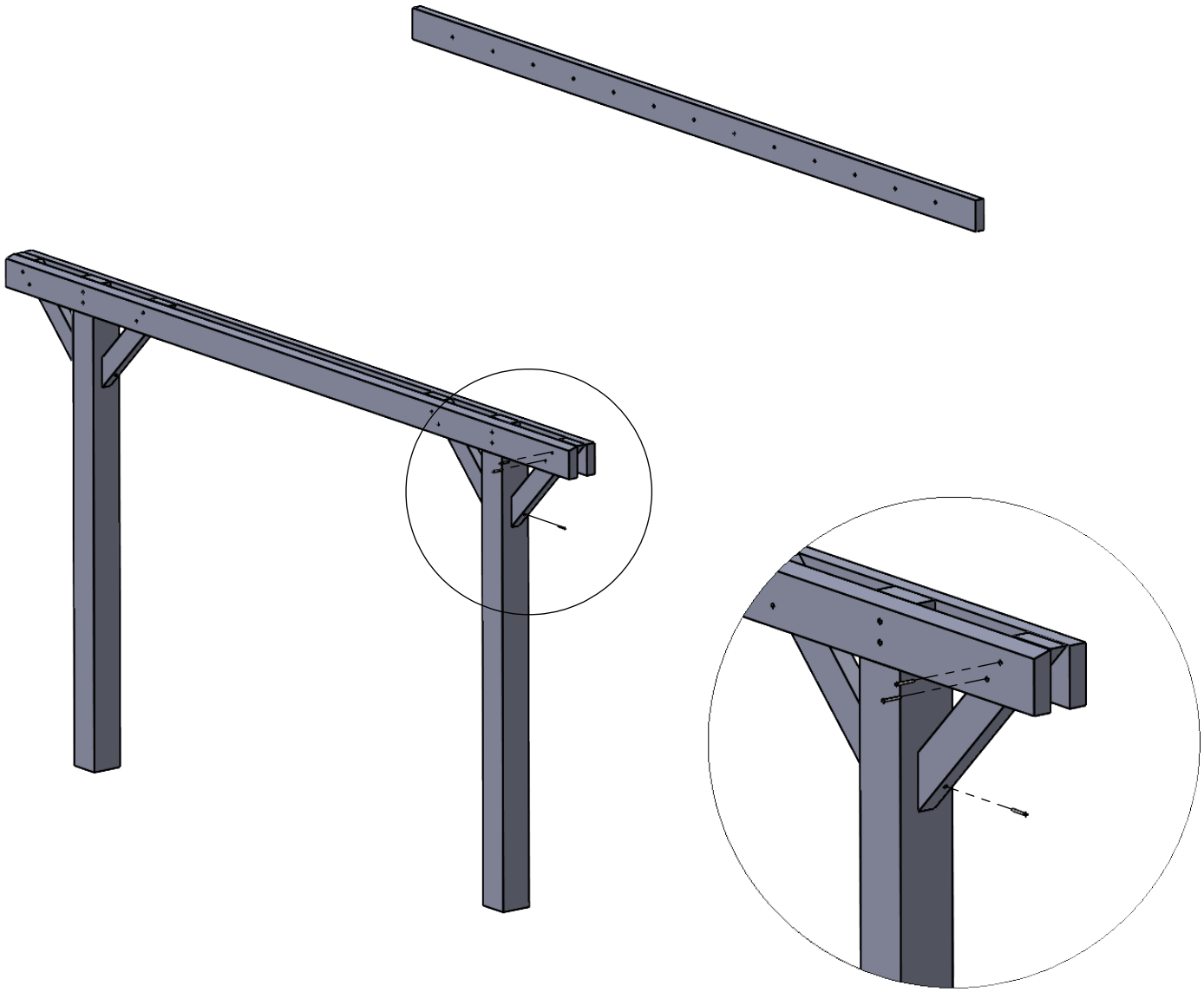
Optional: Top the holes with soil or decorative ground cover once set.

- Step 3



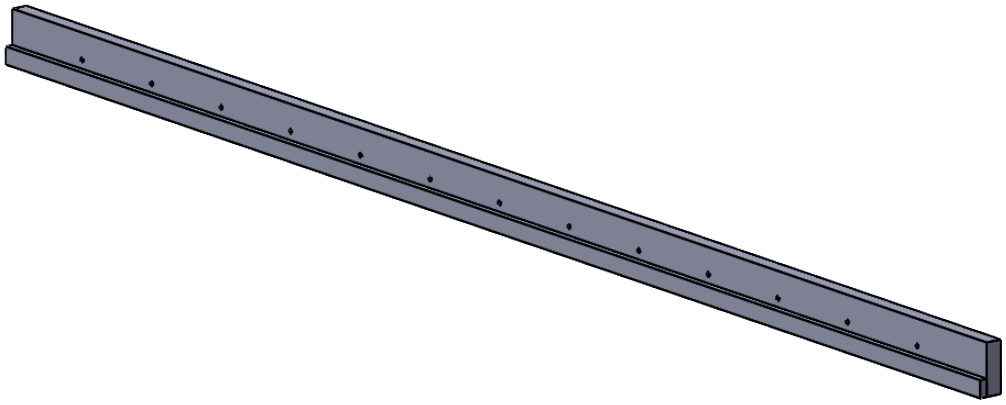
Place each ring beam (Part B) on top of the support posts (Part A), ensuring an equal overhang on both sides. Once positioned correctly, use two 6.7mm x 125mm screws to secure each ring beam to the top of each post.

- Step 4



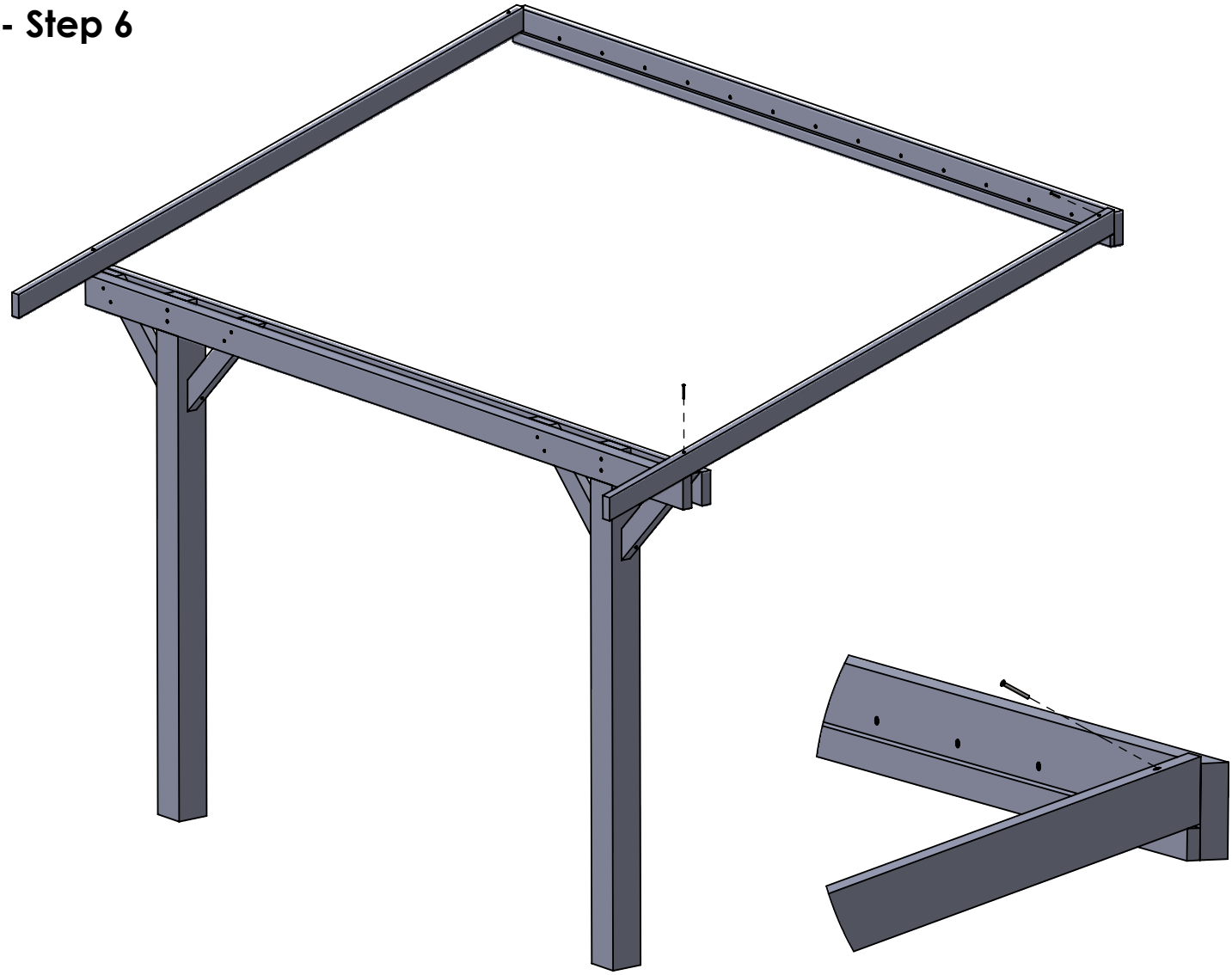
Next, attach the knee braces (Part D) to provide additional lateral support by connecting the ring beams (Part B) to the support posts (Part A). Position each knee brace between the post and the ring beam. Secure the bottom of the brace to the support post using one 5.0mm x 100mm screw. Then, fasten the top of the brace to the ring beam using two 5.0mm x 100mm screws.

- Step 5



Now the 2" x 1" support batten (Part F) can be fixed to the wall plate. This is secured flush with the bottom of the wall plate using 40mm nails every 400-600mm across it's length.

- Step 6



Begin by positioning the two outermost rafters (Part E). These should sit on top of the ring beam and rest securely on the support batten. Align each rafter so it is flush with the ends of both the ring beam and the wall plate. To fix in place, drive one 6.7mm x 125mm screw vertically down into the ring beam. Then, angle a 5.0mm x 100mm screw through the top of the rafter into the wall plate to secure it firmly.

- Step 7

Now, repeat the process from Step 6 to install the remaining rafters (Part E). Position them evenly along the length of the lean-to, using the same method to secure them—one screw into the ring beam and one angled screw into the wall plate. Rafter spacing should be indicated by pre-marked positions on the ring beam.

If the markings are no longer visible, follow these steps to calculate even spacing:

Measure the distance between the two outer rafters installed in Step 6.
Example: 2350mm

Calculate the total thickness of the remaining 4 rafters.
4 rafters × 50mm = 200mm

Subtract the combined thickness from the total span.
2350mm – 200mm = 2150mm

Divide the remaining space by one more than the number of rafters to determine spacing.
2150mm ÷ 5 = 430mm spacing

Mark these intervals along the ring beam and wall plate, then secure each rafter in place as described in Step 6.

RUBY

Looking for something bespoke or expert advice?
We'd love to help!

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Customer Service | customersupport@ruby-group.co.uk