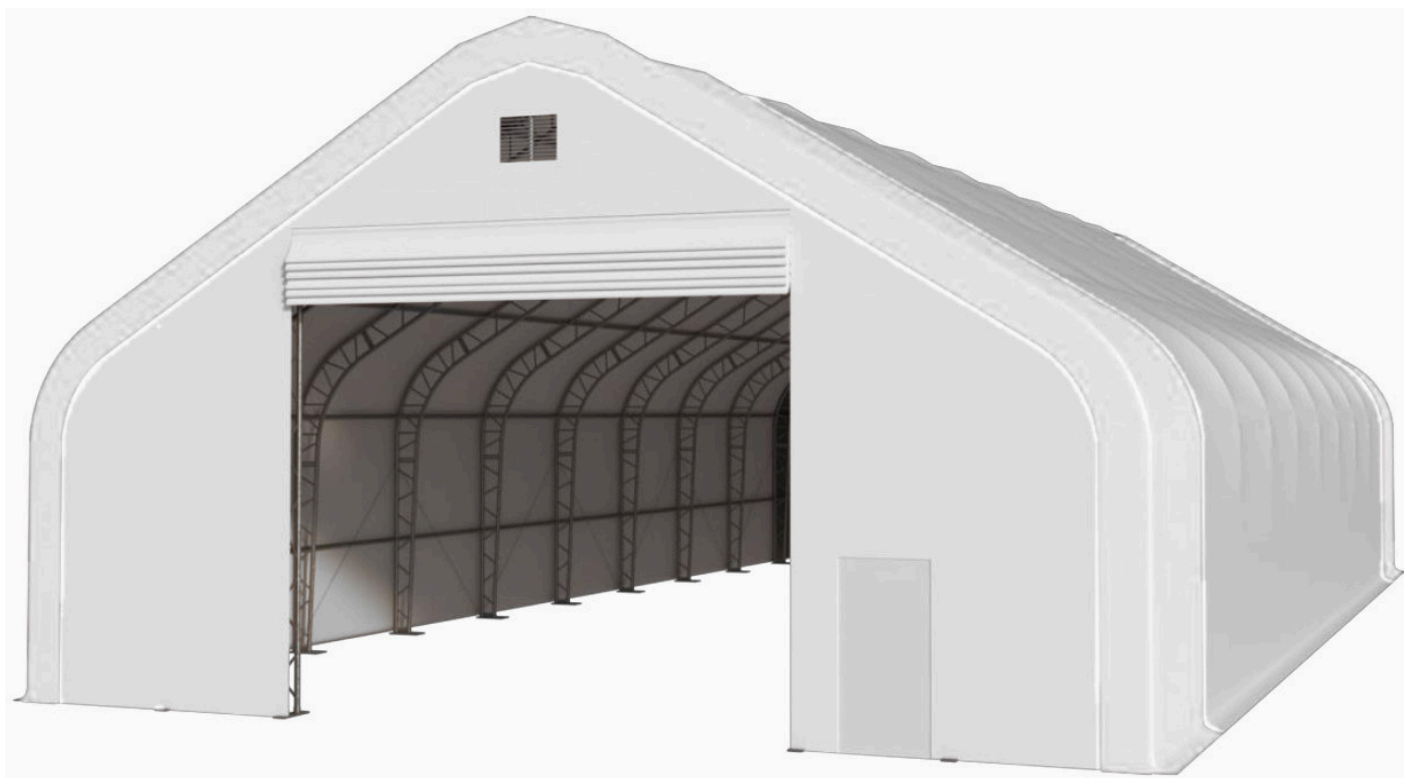




Universal assembly instructions

Basic overview and practical tips for HAGRO tent halls, animal shelters, container shelters and garages

INTRODUCTION

HOW TO USE THESE INSTRUCTIONS

These instructions briefly explain how HAGRO tent structures are assembled, what to prepare for and what to avoid. The procedure is very similar for all our halls and shelters – they differ mainly in dimensions, numbers of parts and connection details.



THIS GUIDE DOES NOT REPLACE YOUR MODEL'S MANUAL

During the actual assembly, always follow the instructions for your specific model. They contain:

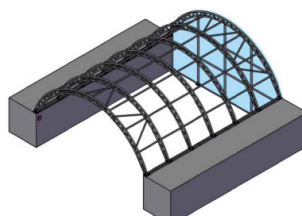
- a parts list with part numbers (codes) and quantities,
- a structure drawing and the base plate layout with dimensions,
- exact requirements for the ground and anchoring,
- the individual assembly steps with pictures.



Tent halls



Animal shelters



Container shelters



Garages and carports

ASSEMBLY IN SEVEN STEPS

STEP 1

Site preparation

STEP 2

Delivery check

STEP 3

Base plates and anchoring

STEP 4

Frame assembly

STEP 5

Front and rear wall

STEP 6

Roof cover

STEP 7

Final tensioning and check

BEFORE ASSEMBLY

SITE PREPARATION AND ANCHORING

CHOOSING AND PREPARING THE SITE

- Choose a level site with good drainage. Level the ground precisely where the edges of the structure will be – all base plates must be on one level.
- Leave enough free space around the structure for moving parts, tightening bolts from the outside and spreading the cover along its full length.
- If possible, orient the hall so that the prevailing wind does not blow into the end walls.
- Prepare the ground and the anchoring method before assembling the first parts.
- The exact ground requirements are given in the instructions for your model – for example, for tent halls 6 to 18.3 m wide, max. 2 % slope of the surface, concrete at least 20 cm thick or asphalt at least 18 cm thick.

ANCHORING METHOD BY GROUND TYPE

Ground	Anchoring method	What to watch out for
Uniform (homogeneous) soil	Rebar ground anchors or stakes from the kit, or ground screws	Not suitable for stony, frozen, sandy or gravel soil.
Concrete, asphalt, paving	Chemical or mechanical (drive-in) anchors	Use them according to the anchor manufacturer's recommendations; the base must be thick enough.
Non-uniform soil or windy location	Concrete footings	Where there is a risk of strong wind, our instructions recommend anchoring into concrete.
Containers	Frame fixed directly to the containers	Follow the instructions for the container shelter.



ANCHORING IS MANDATORY

- The structure must be anchored, otherwise it may be damaged by wind.
- Also prepare temporary anchoring in case you have to interrupt the assembly – even a light wind can damage a partly assembled structure.

TOOLS AND AIDS

Measuring tape

Alignment string

Marking stakes

Ladder, scaffold or scissor lift

Hammer or mallet

Drill

Spanners for bolts and nuts

Knife or scissors

Ropes for pulling the cover over

Work gloves and safety glasses

For larger halls you will also need a lifting device (hoist, jack or crane). The exact list of tools is in the instructions for your model.

SAFETY

SAFETY DURING ASSEMBLY

- Keep the work area clean and clear – clutter is a common cause of injuries.
- Children and animals must not be in the work area during assembly.
- Wear work gloves, safety glasses and long-sleeved clothing – some parts have sharp edges.
- Take care not to trap your fingers between the clamps (clips) and the tubes.
- Do not lean out and keep a stable stance. Open the ladder fully and place it on a level surface before climbing. Never put your weight on the roof.
- Do not assemble under the influence of alcohol, drugs or medication that affect judgement or reflexes.
- Work carefully with power tools and familiarise yourself with their operation.

PEOPLE AND WEATHER

- Work in pairs at least – one person holds the parts, the other connects them. Call more helpers for pulling the roof cover over.
- Choose a dry, calm day for assembly. Do not assemble on slippery, wet or snow-covered surfaces or in strong wind.

PRACTICAL TIPS

TIPS FOR SMOOTH ASSEMBLY

- Before you start, read the whole instructions for your model and look through all drawings and photos.
- Sort the parts by number – you will save a lot of searching time.
- Assemble the arches and the front and rear walls on the ground first, and only then place them on the base plates.
- Tighten the connections only when the frame is complete and aligned.
- Never leave the cover unsecured until the assembly and tensioning are fully completed.
- Strong wind is dangerous when handling the cover, but a light breeze can help: pull the cover over so that the wind blows into it and lifts it.
- When assembled in the cold, the cover is stiff. It slackens when it gets warmer, so retighten it after a few months.
- Several tension adjustments will be needed to get a straight, taut roof – this is normal.
- If you interrupt the assembly, anchor the structure temporarily.



MOST COMMON MISTAKES

- Base plates not on one level or not at right angles – the frame then does not fit and the cover cannot be tensioned evenly.
- Fitting the cover in strong wind.
- Insufficient anchoring or stakes in unsuitable ground.
- Tightening the ratchets on one side only – the cover becomes skewed.

ASSEMBLY PROCEDURE

STEP-BY-STEP ASSEMBLY

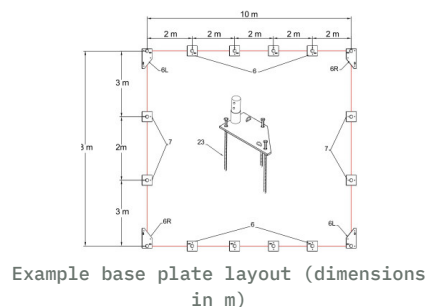
The following procedure shows how assembly works in general. Always take part numbers, dimensions and bolts from the instructions for your model.

1

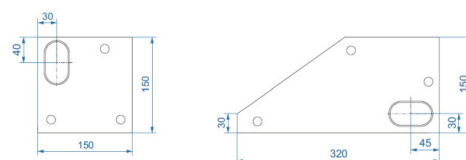
Check the delivery. Lay out the parts and use the parts list to check that the delivery is complete. Each part is marked with a number (code) that matches the parts list and the drawings – follow these numbers throughout the assembly.

2

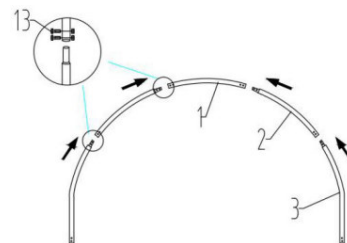
Lay out the base plates according to the drawing. Dimensions are measured from tube centre to tube centre. Check the right angle – both diagonals must be the same length. If they are not, adjust the position of the base plates.

**3**

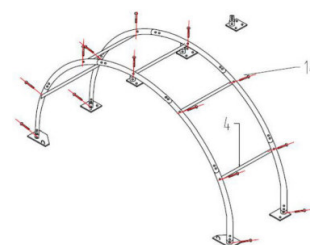
Anchor the base plates. Mark the anchor positions through the holes in the base plates, then anchor the plates in a way suitable for your ground (see the anchoring table). The number of anchors per base plate is given in the instructions for your model.

**4**

Assemble the arches on the ground. Connect the tubes in the order shown in the drawing and by part numbers. Do not fully tighten the nuts until the whole frame is assembled and in place. If tape is supplied, wrap the joints with it so that they do not rub against the cover.

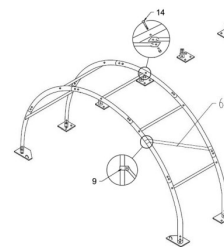
**5**

Stand the first two arches on the base plates and immediately connect them with longitudinal tubes (purlins). Then gradually add further arches and purlins.



6

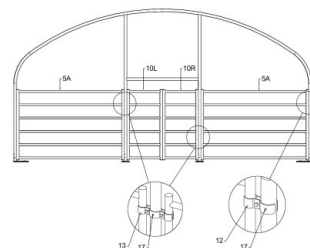
Fit the wind bracing (diagonal tubes or cables) if your model has it. It stiffens and aligns the frame. When the frame is complete and aligned, tighten all connections.



Diagonal wind bracing

7

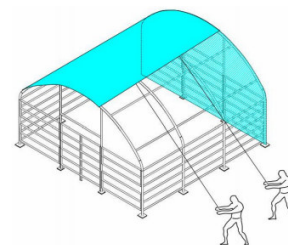
Assemble the front and rear walls – the end-wall frame, doors or railings according to the drawing – and fit the end-wall covers.



Front wall frame with door

8

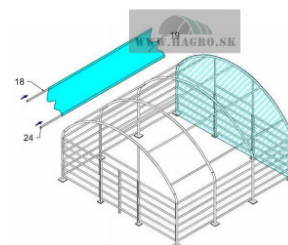
Pull the roof cover over. Throw the ropes attached to the cover over the frame and, with several people, pull the cover over from the other side – evenly, carefully and slowly. Centre the cover so that it sits straight on the frame on all sides.



Pulling the roof cover over the frame

9

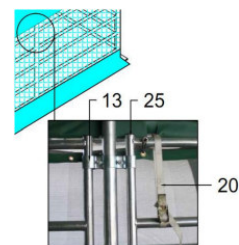
Insert the tensioning tubes into the pockets at the cover edges and first secure the straps only loosely in the ratchets – do not tighten yet.



Tensioning tubes in the cover pockets

10

Tension the cover. Tighten the ratchets gradually and alternately along the whole length so that the cover is tensioned evenly. Finally, tension the hems and the end-wall covers.



Ratchet with strap



CONTAINER SHELTERS

The frame is not anchored into the ground but fixed directly to the containers – using base rails, angle brackets or connectors according to the instructions for your model. The rest of the procedure (arches, cover, tensioning) is the same.

MAINTENANCE

MAINTENANCE AND USE

- Check the tension of the roof cover regularly – the cover must be smooth, without sagging or "pockets". Our instructions recommend a check once a month.
- Retighten the cover after a few months of use and always before winter; a check in spring after the frosts is also advisable.
- Remove snow from the roof immediately if it does not slide off by itself.
- Remove the covers in a windstorm. The limit wind speed is given in the instructions for your model.
- Do not place heat sources near the cover and do not expose it to open fire.
- Ventilate the space regularly – this prevents mould and removes exhaust gases and other fumes. You can treat the cover with standard anti-mould products.
- Do not use acidic cleaning agents or pressure washing for cleaning.
- Regularly check the fasteners and anchoring and retighten as necessary.
- Treat scratches and rust on the structure as soon as possible.
- If the structure has a door winch, lubricate its moving parts and check the cable – a damaged cable must be replaced (see the winch instructions).



ANY QUESTIONS ABOUT ASSEMBLY?

If you are unsure about any step, contact us before assembly – we will advise you. Keep these instructions and the instructions for your model for future reference.



Finished tent hall



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Contact us with any questions about assembly.