

Introduction

Overview

Blue Hawk Sand and Cement Mortar is a pre-mixed general purpose mortar mix which is suitable for a wide range of building projects. The pack contains Blue Hawk Portland Cement together with fine washed sand. The cement is contained in a separate polythene bag within the pack to provide longer storage life. You can therefore mix up a quantity you like and save the rest for later if desired.

Applications

Blue Hawk Sand and Cement Mortar is ideal for bricklaying, rendering, tile fixing, paths, rockeries , ponds and general repair work on concrete, brickwork and masonry surfaces.

Note: It is not suitable for house foundations.

Product	Product size	Packaging	Typical amount produced per bag
Blue Hawk Sand and Cement Mortar	5kg	Plastic sack	0.003m³
	5kg	Plastic bucket	0.003m³
	10kg	Plastic sack	0.006m³
	10kg	Plastic bucket	0.006m³
	20kg	Plastic sack	0.012m³

Installation

Background preparation

Ensure the area being worked on is free from loose material, grease and oil. Extremely dry material may need to be dampened to avoid rapid drying out.

Mixing

Empty the contents of Blue Hawk Sand and Cement Mortar onto a smooth even mixing board and ensure that the sand and cement are well mixed. Make a crater in the centre and add a small amount of water. Do not over-water as this can affect the set and weaken the mix. Mix the Blue Hawk Sand and Cement mixture into the water together until well mixed. However, it may be necessary to make a crater to enable more water to be added. Ensure the mixture is not too slippy or crumbly. Test the mix by using the back of the shovel to flatten. The surface should be close-knit and moist but not showing too much water. Always factor in an additional 10% of material to allow for wastage.

General application

Rendering: Before applying the render, dampen down the surface with water, either sprayed using a garden sprayer or brushed on with a broom dipped in a bucket. A damp wall will help adhesion and reduce the chance of cracks occurring. Place a manageable quantity of mortar on the hawk in one hand, so you can bring a good quantity up to the work-face. Starting at the top, with the trowel facing upwards at an angle of approximately 30°, slide some of the mix onto the wall face. Move it up with some pressure to maximise bonding from the start. Cover an area of up to 1m² at a time and then smooth over slowly with steady upward strokes to obtain a level surface.

Continue in areas of approximately a square metre and, after about an hour, if this is the final coat, go back across the whole area checking for any unevenness with the straight edge. Correct if necessary and smooth over. Where several coats are necessary, allow approximately four hours for the first coat to set, then lightly scratch the surface with a 'key' or nail in a wavy, diagonal pattern of lines about 75mm apart. Further coats can be applied once the previous one has dried, generally after five to seven days. Once fully dry, it should be suitable to receive all conventional paints and finishes.

In rendering applications, it is important when applying two-coat renders (which is normal practice) that the second coat is either thinner or weaker than the scratch coat to avoid problems with shrinkage and de-lamination.

Bricklaying: The most important part of any wall is its foundation. This needs to be level and even, otherwise you may encounter difficulties in producing a level wall. Always cut your foundations horizontally and ensure that the foundation is strong enough to bear the weight of the wall. For a light garden wall, 300mm deep should be sufficient if the soil is firm and well drained. On unstable or weak ground, increase the depth to 460mm. The trench should be twice the width of the brickwork. Lay a concrete footing using a ratio of five measures of ballast to one of cement to a depth of about 150mm in the bottom of the trench.

Some bricks have an indent on one face, called a 'frog'. The bricks should be laid with the frog up. This will ensure that the frog is then filled with mortar as work progresses and no voids are left within the wall. With your foundations laid, mix enough mortar for an hour and stack bricks in proximity to the job.

Firstly, place some mortar on your mortar board, then lay a course of bricks dry to see if the work fits in the given space. Open or close joints slightly if necessary, which is preferable to cutting bricks. Start with a corner brick and bed it in mortar, running a line from the laid brick to the opposite corner of the wall. Lay a second brick a metre or so along the line, checking for evenness with the spirit level. Then fill in between bricks.



Installation (continued)

Proceed in this way until the far corner or end is reached. The first course must be straight and true.



When you have laid a number of bricks, you need to check and adjust them. The four checks are:

Gauge - Make sure that the corner brick is at the correct height.

Level - Use the spirit level to check that the row of bricks is horizontal. Do not try to level each individual brick.

Plumb - Use the spirit level to make sure the wall is vertical.

Straight - Use a straight edge horizontally along the face of the wall and adjust so that they are all in line. Remember bricks are mass produced and are not always perfectly square. Consequently there will not always be a perfect level along the top of the bricks or a straight line along the face.

Build up the corners, checking each course (gauge, level, plumb and straight). Once the corners are built, you can fill in the rest of the wall using a line between the corners.

The actual joints may look a little ragged, so as the mortar stiffens use a Gyproc pointing trowel to finish the mortar course. If there is any mortar on the surface of the bricks, use a soft bristle brush to remove.

Repair work - Mix Blue Hawk Sand And Cement Mortar as above. Dampen the area to be repaired with a little water and using firm pressure, push into place.

Finishing

Drying

Protect the newly laid material from wind and direct sunlight with polythene or damp hessian for three days to stop it from drying out too quickly. In hot weather, it may be necessary to frequently dampen. In cold weather the material should be protected from frost for at least 7 days after completion.

Conditions

The addition of old mixtures is not recommended and could adversely affect the performance of the finished product.

Effect of condensation and other moisture: Concrete strengths are improved by keeping the hardened concrete damp.

Effect of temperature: Application temperature: +5°C to +40°C.

Storage

Blue Hawk Sand and Cement Mortar, under the Chromium (VI) Directive, has a shelf life of 6 months from the manufacturing date indicated on the packaging. The product is also marked with a batch number for manufacturing traceability. Ensure good stock rotation methods are carried out so as to avoid product setting quicker than expected. Always store the product in cool, dry conditions, off the floor and protected from draft and moisture as failure to do so may result in the product's performance being compromised.

Standards

The cement used in Blue Hawk Sand and Cement Mortar mix conforms fully to **BS EN 197-1:2000 Cement – Part 1:** Composition, specifications and conformity criteria for common cements, type CEM I Portland Cement strength class 52,5N. Artex Limited is a quality assured company and operates a Quality Management System in accordance with **BS EN ISO 9001:2008.** The QMS is independently audited (certificate no: **FM 504548**).

Manual handling

Blue Hawk Sand and Cement Mortar should always be carried using correct manual handling techniques and safe systems of work appropriate to the size and length of the product. Some of these guidelines are summarised below and overleaf. For further guidance, please refer to the Manual Handling section of the British Gypsum **SITE BOOK** and the British Gypsum Manual Handling Guide. Both can be downloaded from **www.british-gypsum.com** or can be obtained by calling the British Gypsum Technical Advice Centre on 0844 800 1991.

- Whenever possible, place one foot in front of the other to produce a good base and reduce the pressure on the body.
- Assess the load by placing your hand on it and moving.
- Only handle what you feel you can manage.
- Initiate movements with your legs, unlocking the knees and driving with the legs to start the lift.



Conditions (continued)

- Keep the load as close to your body as possible when lifting or handling.
- Turn instead of twisting and move your feet.
- Let your back find its natural curvature.
- Never lose control of the load.

Loading and unloading pallets

- Always wear safety shoes.
- Always place one foot forward by operating from the corner of the pallet or placing one foot on the pallet taking care to ensure that the pallet does not tip in the process.
- Unlock the knees for low level work.

- Take a firm grip of the load with both hands.
- Lift using the legs to start the movement.
- Turn by moving the feet.

Application and installation

- Always work in a balanced position.
- Operate with one foot forward.
- Keep the body upright.
- Always use appropriate platforms where necessary.

General notes

In practice, consideration must be given to design criteria requiring specific project solutions. Please contact the British Gypsum Technical Advice Centre for further guidance on 0844 800 1991 or at bgtechnical.enquiries@bpb.com

Gyproc, Thistle, Gypframe and Glasroc are all registered trade names of BPB United Kingdom Limited. Isover is a registered trade name of Saint-Gobain.

Proprietor: BPB United Kingdom Limited registered in England 734396, registered office Saint-Gobain House, Binley Business Park, Coventry, CV3 2TT, UK.

British Gypsum reserves the right to revise product specifications without notice. The information in this document was correct to the best of our knowledge at the time of publication. It is the user's responsibility to ensure that it remains current prior to use. The information in this document is for guidance only and should not be read in isolation. Users should read and familiarise themselves with all the information contained in this document and ensure that they are fully conversant with the products and systems being used, before subsequent specification or installation.

For a comprehensive and up-to-date library of information visit the British Gypsum website at: www.british-gypsum.com

Telephone: 0844 800 1991 Fax: 0844 561 8816

© Artex May 2012 PDS -BHSACM-02

Email: bgtechnical.enquiries@bpb.com Training enquiries: 0844 561 8810



