

Technical Guide

MST Clay Roof Tiles

ASHBURY Handmade clay roof tiles have been independently tested by CERAM Building Technology to ensure that they comply with British Standards / European Norms required for clay roof tiles. All Ashbury Handmade roof tiles comply with:

BS EN 538:1994 - Determination of Flexural Strength.

BS EN 539-2:1998 - Testing for Frost Resistance.

BS EN 539-1: 1994 - Impermeability

We do recommend mixing tiles from three packs to ensure good colour consistency and that the tiles should be fixed in accordance with British Standard Code of Practice for Slating and Tiling BS 5534 Part 1:2003.

All tiles and fittings are supplied in non-returnable wooden crates and shrink wrapped to keep tiles clean and secure until use. Pack should be stored on clean level ground and handled with forks - not grabs.

Laying Of Tiles

The roof is covered with 265mm x 165mm Ashbury Handmade Clay Plain Tiles. Each tile is laid to a gauge to give a minimum headlap of 65mm. On roof pitch's that are below 60 degrees then at least each tile in every fifth course is to be nailed with 38mm x 3.35mm alloy nails. Above 60 degrees roof pitch all tiles are to be twice nailed.

Underlay

Roofing felt to BS747 Type IF reinforced bitumen felt or other approved reinforced roofing underlay is to be laid over rafters, lapped 100mm horizontally and 100mm vertically, carried well into gutters and secured using 19mm x 3mm extra large head felt nails. The underlay must be able to drain any moisture into the eaves gutter. It must therefore extend over the tilting fillet and fascia board and be fixed so that no troughs are formed in which water can be trapped. If necessary, full support must be provided.

Always follow the underlay manufacturer's installation guidelines.

Battens

A quality softwood tiling batten should be used with a minimum length of 1200mm and minimum size 38mm x 25mm for rafters set at 450mm centres or for rafters set at 600mm centres. These battens to be gauged to give a minimum headlap of 65mm for roof tiling and secured with suitable nails. Battens to be fixed to rafter with at least one nail. Joints in each batten cut squared and nails skew driven on each side of joint. No more than one batten in four to be joined over each support.

For vertical tiling battens to be minimum size 38mm x 25mm at 450mm span and 600mm spans, gauged to give a minimum headlap of 38mm. Counter battens are required when fixing to a structural background. They should be of sufficient size to resist predicted withdrawal loads and be fixed at maximum 600mm centres.

Eaves

Eaves are to have double courses throughout, using from our range of Ashbury handmade eaves. In both courses each tile is to be nailed twice.

Any eaves ventilation system should be installed using the manufacturer's guidelines.

Top Edge

Finish tiling with a course of eaves/top tile to maintain gauge. Every tile in the top two courses are to be nailed twice. In vertical tiling the top edge is to incorporate an eaves/top tile where under a window sill or soffitt.

A lead flashing can be used to dress down over the top course.

Verges

All verges are to be laid broken-bond with full tile and tile and a half in alternate courses, bedded on a verge of plain tiles laid with the 165mm edge showing, face side downwards and projecting approximately 35mm to 50mm over the gable walls or bargeboard. The bedding mortar to be struck off and pointed in one operation. No additional mortar to be used.

Ridge

The Ridge is to be covered with either the Ashbury Handmade half round or Hogsback ridges from our range of Ashbury range depending on blend. The ridge tiles are to be edge-bedded with a solid bed at butt joints. Solid bed end ridge tiles and fill with tile slips.

Any In-line ventilation ridge must be fixed according to manufactures guidelines.

Hips

Hips are to be covered with bonnet or Kent style hips to suit rafter pitch. The Hips are to be of similar colour to that of the main roof tiles and to be nailed to the hip rafters with 65mm x 2.65mm alloy nails. Mortar bedding is to be used under each bonnet hip tile, struck back approximately 13mm from the over/edge of the hip tile. Solid bed the bottom bonnet hip tile and fill with tile slips to reduce visible impact of the mortar bedding.

Valleys

Valleys to be formed with coursing valley tiles to suit rafter pitch. The Valley tiles should be of a similar colour to that of the main roof tiles. The adjacent plain tiles to be neatly cut to form a smooth intersection.

Our Universal valley tile is restricted to minimum 43 degree pitch and maximum 47 degree pitch. A pitch above this and below would be recommended an alternative valley or lead valleys.

Abutment

Tiled intersections with abutments to have tile and tile and half tiles in alternate courses to maintain broken bond.

Mortar and Bedding

All mortar bedding should consist of 1 part cement to 3 parts fine aggregate or 1 part cement and 1 part lime to 5 parts of fine aggregates. Bedding mortar is to be struck off and pointed in one operation to give a clean face. Pointing is not to be carried out with other separate materials.

Roof Ventilation

Ventilation of the roof space is to be in accordance with requirements of building regulations approved document F2 : 1995 and BS 5250 : 1989

Control of hazardous substances

The Ashbury handmade clay plain tile range do not present any risks to health when used as supplied.

However, if either hand or powered tools are used to cut Ashbury Handmade products, a certain amount of dust and chippings will be produced. Persons carrying out these operations must wear suitable eye protection and breathing equipment.

Technical Information

Product Range	Plain Tiles	Peg Tiles	Ornamental
Size(nominal)	265 x 165mm	255 x 155mm	265 x 165mm
Roof Pitch (Min)	40 degrees	40 degrees	90 degrees (on verticals)
Tile Lap	65mm	65mm	
Gauge	100mm	95mm	115mm
Coverage	60 tiles per square meter	66 tiles per square meter	53 tiles per square meter
Laid Weight (at 100mm Gauge)	66kg per square meter	65kg per square meter	58kg per square meter
Battens Required	10.0m	10.52m	8.7m
Batten size At less than 450mm c/c	38 x 25mm	38 x 25mm	38 x 25mm
Batten size At less than 600m c/c	38 x 25mm	38 x 25mm	38 x 25mm

Fittings & Accessories

Product Range	Roof tiling	Vertical Tiling
Tile fixing	Plain tiles 38mm x 3.35mm alloy nails Peg tiles 30mm x 4.5mm alloy pegs or hardwood pegs	Plain Ornamental 38mm x 3.35 mm alloy Nails
Eaves	Plain tiles with undercourse of eave tiles	Plain or Ornamental tiles with plain eave tile undercourse
Verge (Wet fix only)	Plain tiles and Tiles and a Half (Gables)	Gable tiles with plain or Ornamental tiles.
Ridge (Wet Fix Only)	Half round or Hogback ridge	N/A
Hip	40-50 degree Bonnet Hip 35-60 degree Kent Hip	N/A
Valley	42.5 - 47.5 degree Universal valley	N/A
Ancillaries	N/A	Ornamental Tiles incl. Club, Arrowhead, bullnose, Fishtail Vertical Angle tiles- 90 degree external Handed 90 degree internal handed