Unit 111: Roofing occupations

# Worksheet 8: Backgrounds and components (tutor)

1. State **three** types of access equipment commonly used in the roofing industry.

Ladder – tower scaffold – full scaffold

1. State the correct ratio and angle of a ladder.

75 degrees: 1m out 4m up – can also be in feet as long as ratio of 1:4

1. State who should erect working platforms, and the reason why.

Only trained and competent persons authorised to do so. It will help to prevent accidents from happening and injuries.

1. Explain the reason why it is important to identify and report defects in scaffold components.

It will prevent accidents and injuries to yourself or other trades.

1. State why some types of underlay should not be exposed at the eaves.

The sunlight can penetrate the felt and cause rot, which could then go into the gutters and block them.

1. State **one** suitable material used to form a fire stop between properties.

Rockwool

1. What is meant by delaminating when applied to clay tiles?

It is where water has been absorbed into the tile and when the frost comes along it freezes and makes the face of the tile burst.

1. What is the **main** purpose of the roofing battens?

To allow you to fix your slates securely.

1. State the batten sizes most commonly used in slating and tiling.

25mm x 50mm

50mm x 50 mm

1. List **two** factors that influence the size of roofing battens.

The type of slate & the rafter widths

1. For a roof area of 100m² calculate the total length of batten required at 3.3m of batten per m².

330m

1. State three reasons why battens would be rejected for reuse.

Knots. Warped. Wrong size

1. Determine the single lap tile batten gauge given the following information.

Tile size – 265mm

265 – 65 = 200 mm

Headlap – 65mm

1. State three checks to be made on the roof timbers before re-roofing takes place.

Wood rot. Splits. De-nailed

1. Identify **two** methods of removing waste material from scaffold to ground level

Rubbish chute. Mini skip on loading bay

1. State the minimum felt overlap normally recommended for roofing underlay on open rafters.

100mm

1. If one roll of underlay has a net coverage of 12m², how many FULL rolls are needed for a roof area of 78m²?
2. divided by 12 = 6.6 rolls
3. State the advantages of breather membrane felt when applied to roof surfaces.

It allows your roof to breathe and prevents condensation.

1. Identify the recommended maximum and minimum overhang when applying fibre cement strips to verges.

38mm min / 50 mm max

1. Identify **three** main pieces of information that can be found in the manufacturer’s instructions.

Manufacturer name. Guarantee. Fixing instructions

1. Identify the three components of flashings shown below.



Back flashing

Soaker

Step flashing

1. State a method for ensuring the roof is square.

Using Pythagoras 3 – 4 – 5 method

1. Explain where a hip iron used and the method of fixing it.

Used at the bottom of a hip leg to prevent ridge tiles sliding off. Fixed with screws to thehip rafter.

1. Explain the reason for allowing sag in the underlay when applying battens.

To allow any rainwater which has entered to run down to the eave and into the gutter.

1. Explain the reason for striking perp lines to roof areas.

To allow you to keep your slates or tiles running straight from top to bottom.

1. Explain the purpose of ventilating roof areas.

It will prevent condensation, damp and rotten timbers. It will allow the roof space tobreathe.

1. State where insulation would be located in a warm roof.

Above the ceiling and between the rafters.