

TRADITIONAL CUT ROOFS
ROOF TIMBERS SHALL BE OF THE GRADES AND SIZES SHOWN ON THE STRUCTURAL ENGINEERS DRAWINGS

STRUCTURAL TIMBER SHOULD BE MARKED TO SHOW ITS STRENGTH CLASS (NORMALLY C16 OR C24).
ALTERNATIVELY, EVIDENCE OF SPECIES AND GRADE SHOULD BE AVAILABLE TO DETERMINE THE EQUIVALENT STRENGTH CLASS.
THE CORRECT SIZE OF TIMBER SHOULD BE USED FOR EACH MEMBER, AS SHOWN ON THE DESIGN DRAWINGS.

CONSTRUCTION OF TRADITIONAL CUT ROOFS SHALL ENSURE ADEQUATE STRUCTURAL STABILITY

- ITEMS TO BE TAKEN INTO ACCOUNT INCLUDE:
- LOCATION OF MEMBERS**
- ALL MEMBERS SHOULD BE ACCURATELY LOCATED. PURLINS AND BINDERS SHOULD BE BUILT IN, WHERE NECESSARY. IN A TYPICAL TRADITIONAL ROOF, THE BASIC TIMBER MEMBERS ARE:
- RAFTER: CARRIES THE WEIGHT OF THE ROOF FINISH, EG TILES, TILE BATTENS AND UNDERFELT
 - CEILING JOIST OR TIE: TRIANGULATES THE RAFTERS, STOPPING THE WALLS AND ROOF SPREADING OUTWARDS; SUPPORTS THE CEILING FINISH AND ANY WALKWAYS, ETC
 - RIDGE: PROVIDES FIXING AND SPACING FOR THE TOPS OF RAFTERS
 - PURLIN: SUPPORTS LONG SPAN RAFTERS TO PREVENT DEFLECTION AND INCREASE STIFFNESS
 - STRUTS: GIVE SUPPORT TO PURLINS TO PREVENT DEFLECTION AND TRANSMIT ROOF LOADING TO LOADBEARING STRUCTURE BELOW.
- THE FOLLOWING ARE EXTRA MEMBERS WHICH MAY BE USED ON LARGE ROOFS:
- COLLAR: TIES THE ROOF TOGETHER AT PURLIN LEVEL
 - CEILING BINDERS AND HANGERS: SUPPORT LONG SPAN CEILING JOISTS

DORMER CONSTRUCTION
THE DORMER CHEEK STUDS SHOULD BE SUPPORTED EITHER BY A DOUBLE RAFTER OR BY A DOUBLE FLOOR JOIST.
WHERE CHEEK FRAMING DOES NOT EXTEND TO FLOOR LEVEL, A DOUBLE RAFTER WILL GIVE NECESSARY SUPPORT TO THE CHEEK. THE TWO RAFTERS MUST BE FIXED TOGETHER.
TRIMMING MEMBERS AROUND DORMERS SHOULD BE LARGE ENOUGH TO TAKE THE EXTRA LOAD FROM THE CUT MAIN ROOF MEMBERS AND DORMER FRAMING AND CLADDING, AS DETAILED IN THE DESIGN.
DORMERS SHOULD BE FRAMED UP SO THEY ARE INDEPENDENT OF THE WINDOW FRAME, USING A SUITABLE LINTEL OVER THE OPENING

VALLEY AND HIP CONSTRUCTION
PARTICULAR CARE IS NEEDED IN THE CONSTRUCTION OF VALLEYS AND HIPS:

- VALLEY RAFTERS CARRY LOAD FROM BOTH SECTIONS OF THE ROOF. VALLEY RAFTERS WILL NEED TO BE LARGER THAN ORDINARY RAFTERS TO TAKE THE EXTRA LOAD AND TO PROVIDE FULL BEARING FOR THE SPLAY CUT OF JACK RAFTERS. (LONG VALLEY RAFTERS MAY NEED INTERMEDIATE SUPPORT.)

