

ATELIER FREI OTTO
WARMBRONN
LEONARDO
07152 41084 (43006)

Hooke forest acquired
end of 70s.
design team put together
as choice of site 81-82
master plan 1983
House (prototype) 1985-6
Workshops 1988-89
ABK + Frei Otto resigned
1991.

Cullinan - Happold continue
New master plan (not used)
Westminster Lodge
Cullinan resigned.

New architects
another master plan (not used)

AA. acquired Hooke
2002-3

1981-82

This book got the show on the
road. In it are most of the ideas we used except
the joints
Frei Otto based all his skidlines on this
basis of the economic use of materials.

note by Feb. 2006.

HOOKE PARK

A FIRST COLLECTION OF IDEAS
FOR THE USE OF WET TIMBER

BY ATELIER FREI OTTO
FOR MR. JOHN MAKEPIECE
AHRENS, BURTON AND KORALEK, ARCH.
BÜRO HAPPOLD ENG.

WARMBRONN,

25. 8. 1982

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GROWTH AND SHRINKING OF WOOD

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07152-41084 (43000)

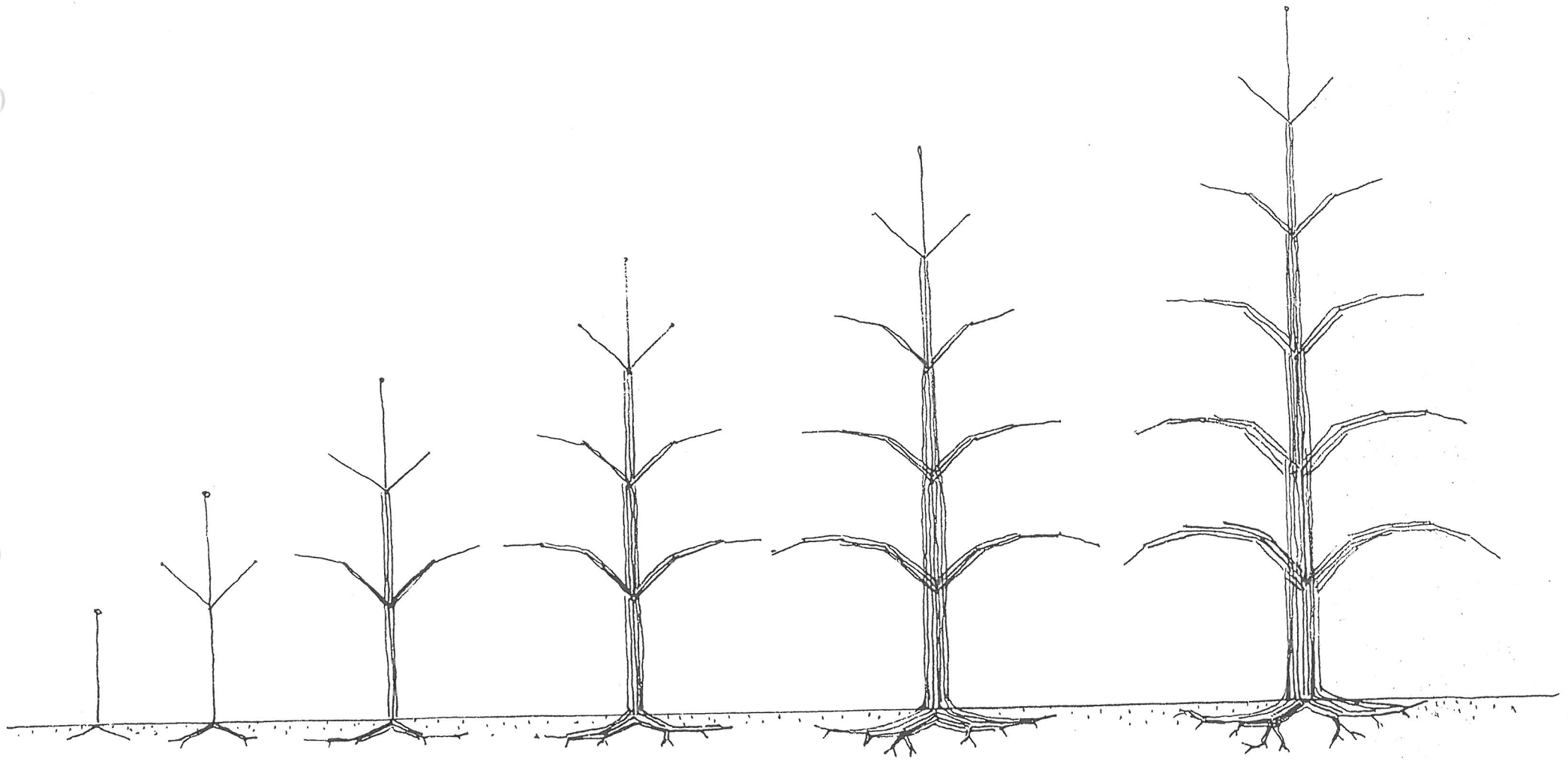
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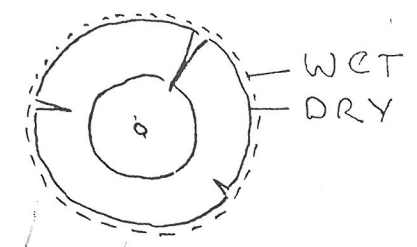
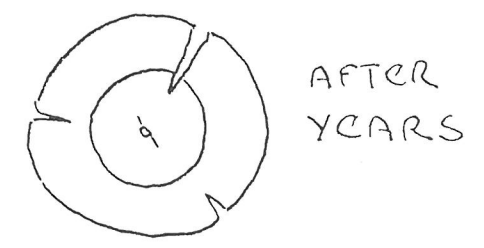
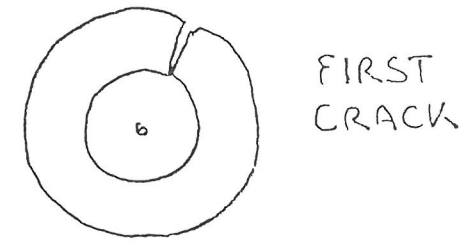
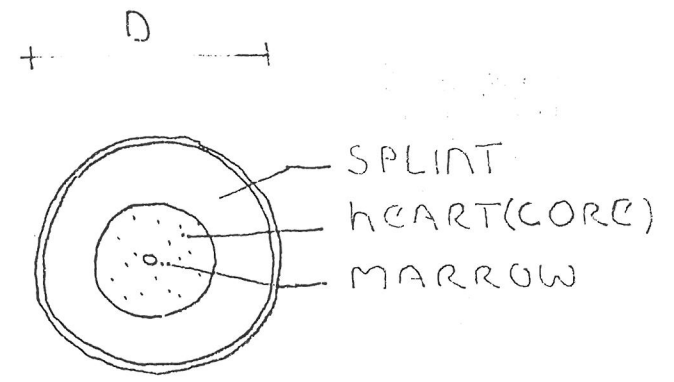
BERG AL

7250 LEONBERG

ATELIER FREI OF

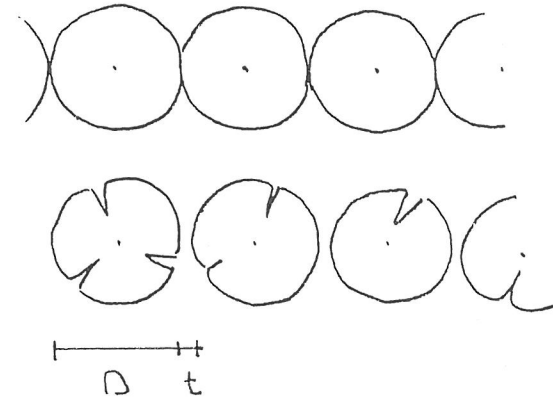
GROWTH AND SHRINKING
OF WOOD





SHRINKING OF WOOD (t)

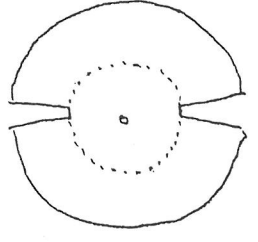
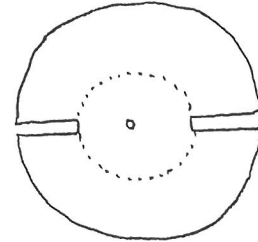
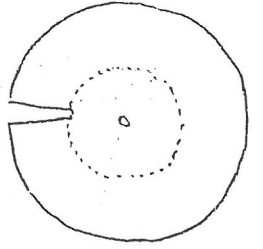
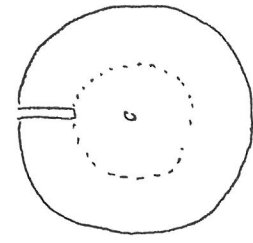
TOTAL THICKNESS D
BETWEEN 7 - 15 CM
CONIFER WOOD



$$t \approx 1/15 \text{ to } 1/25 \text{ OF } D$$

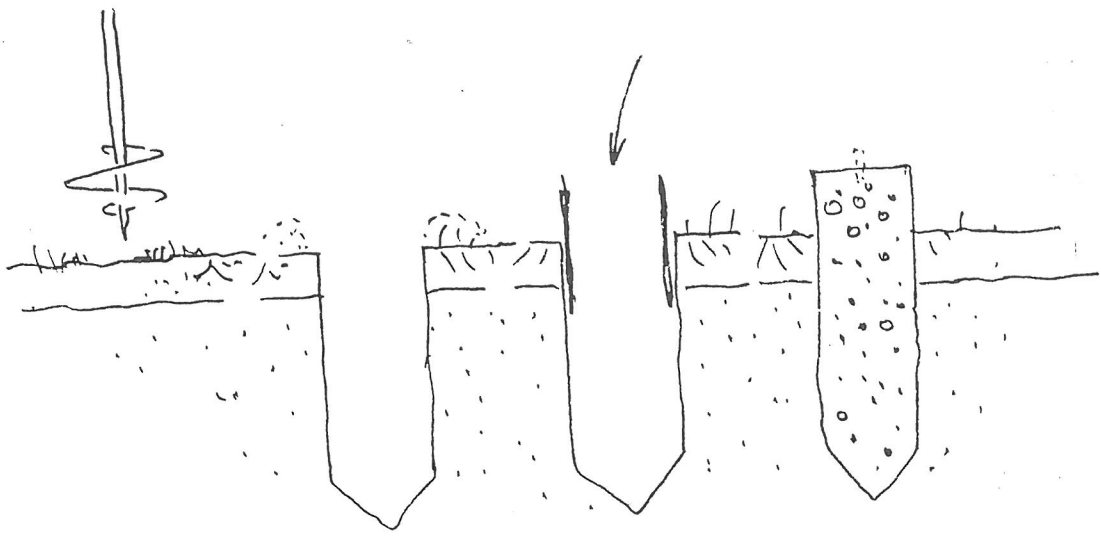
OPENING OF JOINTS IN RELATION
TO SHRINKING

NOT THROUGH THE SPLINT
WORKS LIKE AN EXPANSION JOINT -
AVOIDS CRACKS

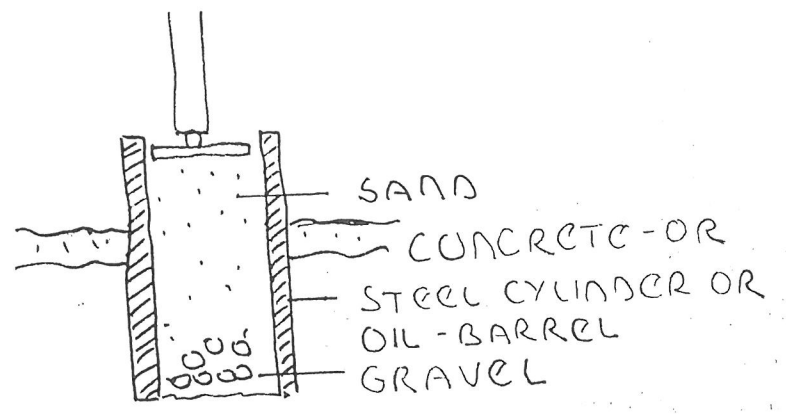


FOUNDATIONS

CONCRETE
FOUNDATION
FOR PILES OF TIMBER



'SAND POT'
ADJUSTABLE FOUNDATION
FOR COLUMNS, TENTMASTS,
ECT.

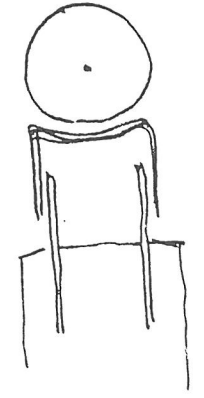
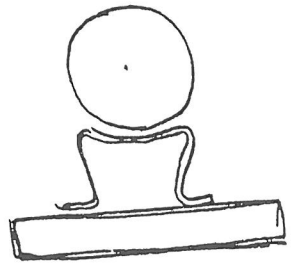
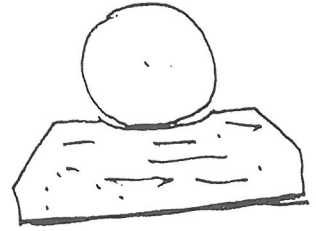


ATELIER FRIE OTTO
DAN - 7250 LEONBERG 7 BERGH
07152 - 41084 (43008)

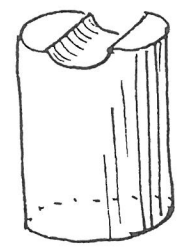
ATELIER FREI OTT
BRONN - 7250 LEONBERG 7
BERG
19
07152 - 41084 (43008)

FOUNDATIONS FOR HORIZONTAL BEAMS

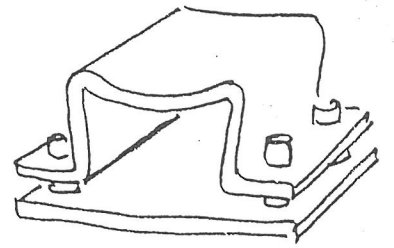
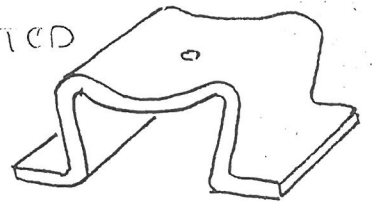
TIMBER OR STONE



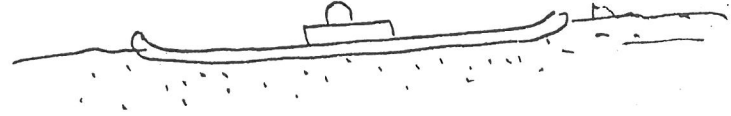
WOODEN TRUNK



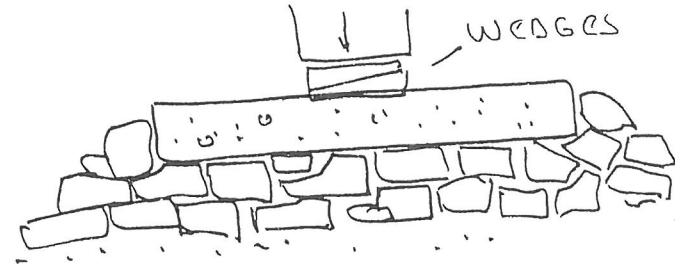
ZINC COATED STEEL



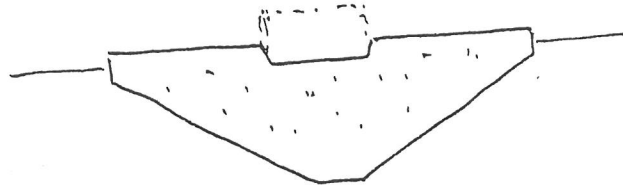
STEEL PLATE WITH THORN
FOR PILE



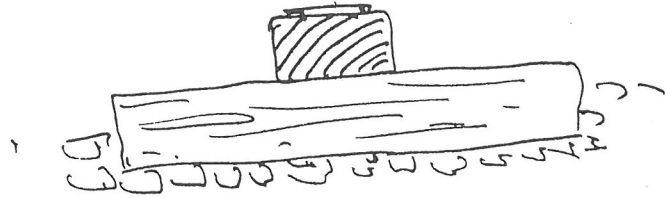
STONE SLABS ON GRAVEL
FOR WALL



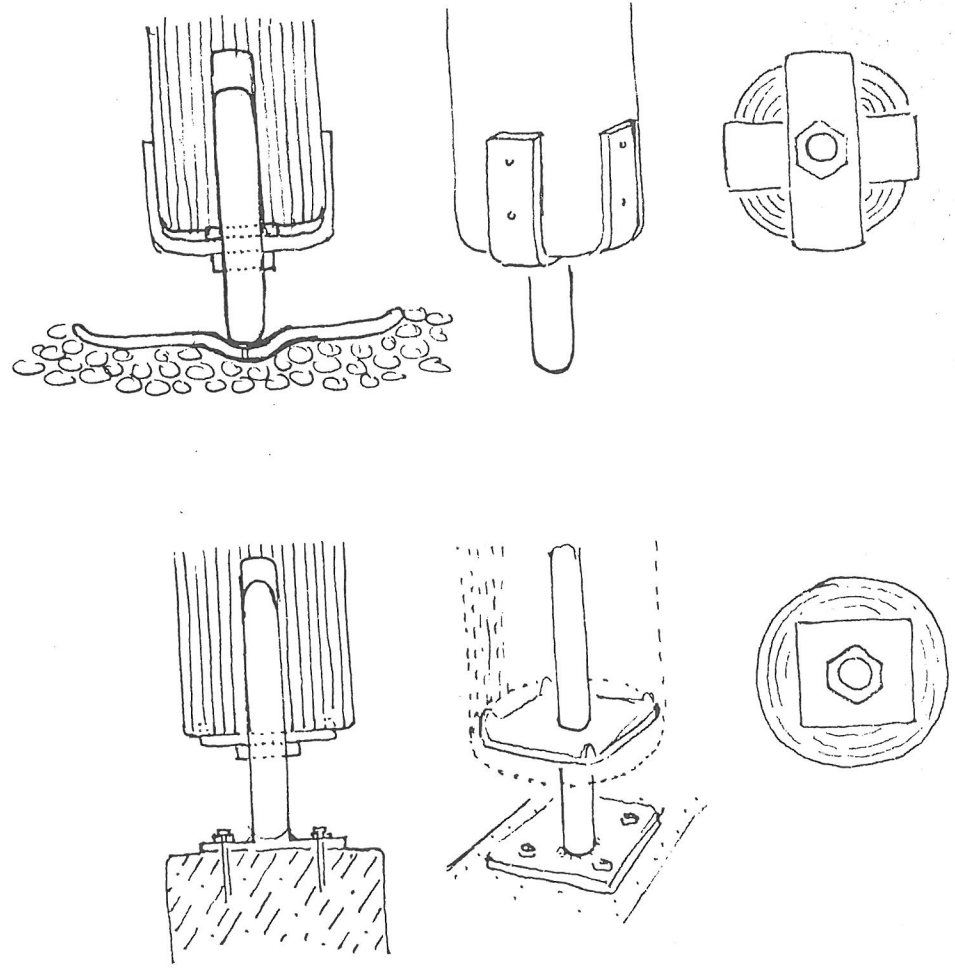
CONCRETE FOUNDATION STRIP
FOR WALL



RAILWAY SLEEPERS ON GRAVEL



STEEL SHOES



ATELIER FREI OTI

102 10

BERG

7250 LEONBERG 7

WARMBRONN

07152 - 41084 (43908)

CONNECTORS

NAILS AND BOLTS

TIMBER NAIL

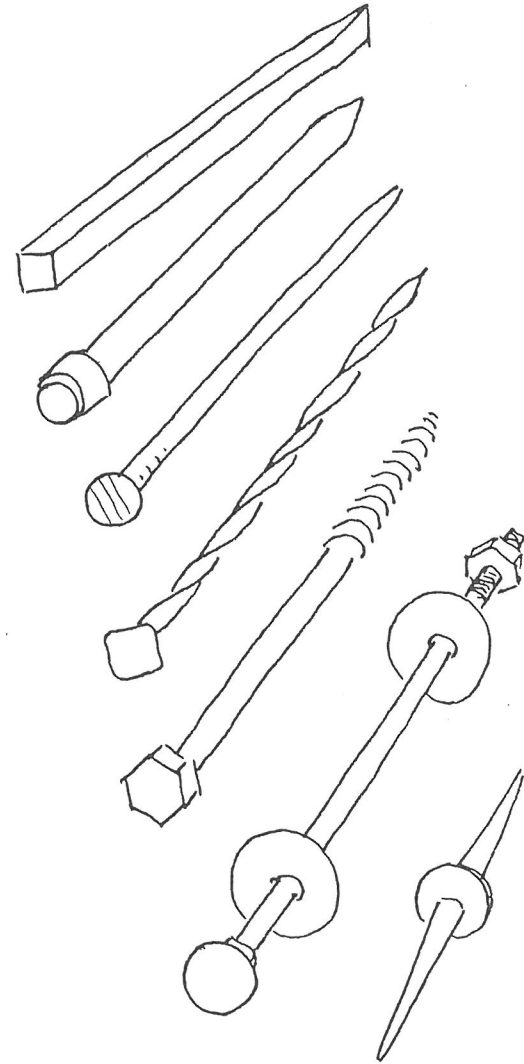
PLASTIC COATED
STEELNAIL

STEELNAIL

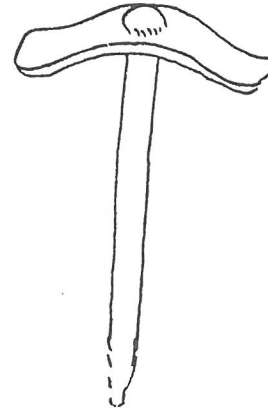
STEELNAIL WITH
WINDING

SCREW

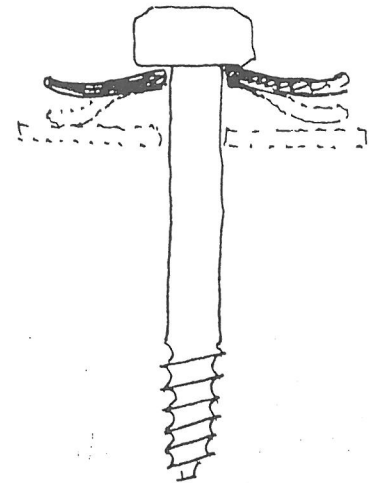
SCREW BOLT



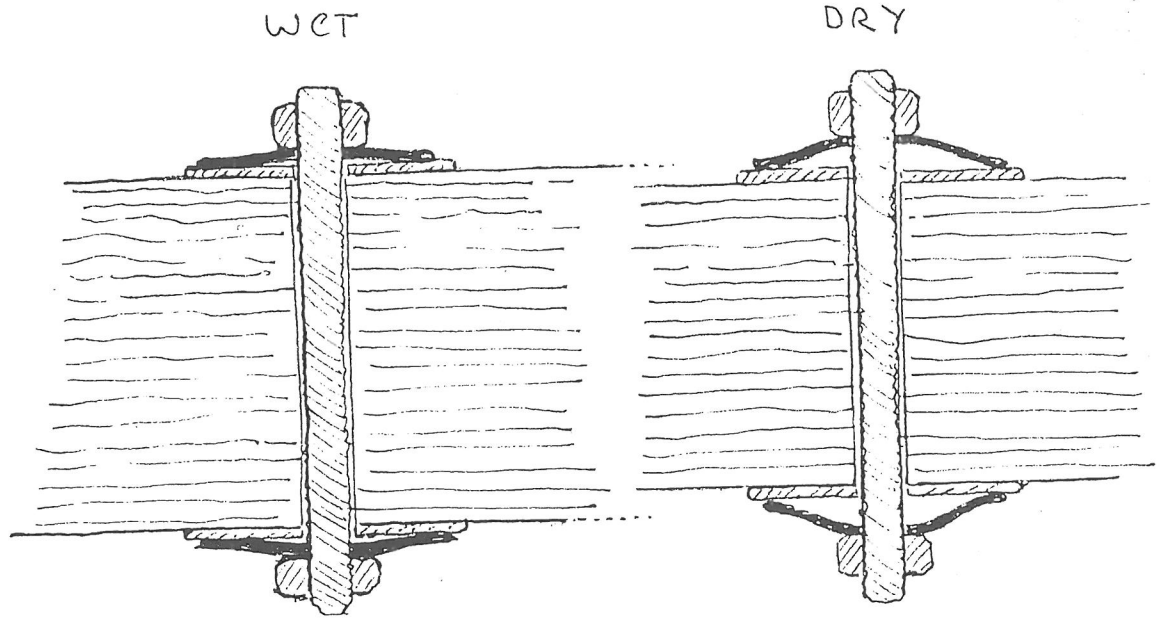
NAIL WITH 'SPRINGHEAD'
(TO ALLOW FOR SHRINKING)



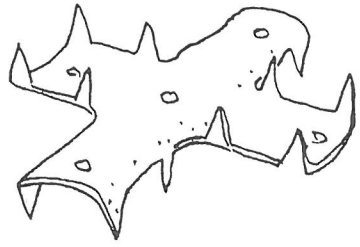
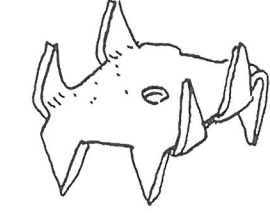
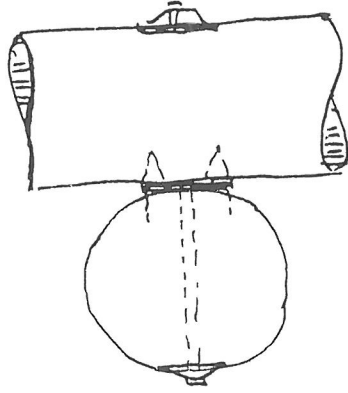
SCREW BOLT
WITH SPRING WASHER



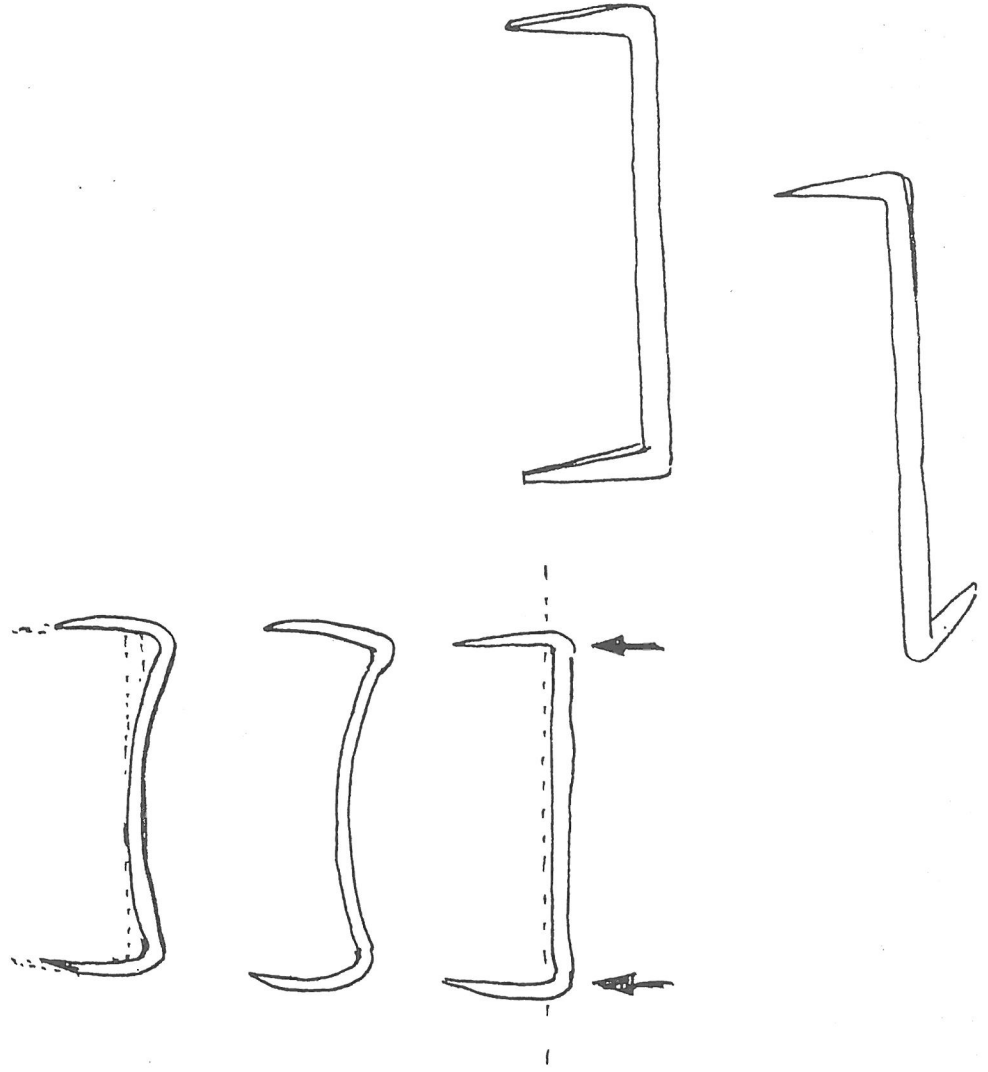
BOLTS WITH SPRINGWASHERS
DURING SHRINKING PROCESS



NAIL PLATES



STEEL CLAMP



STRING CONNECTORS

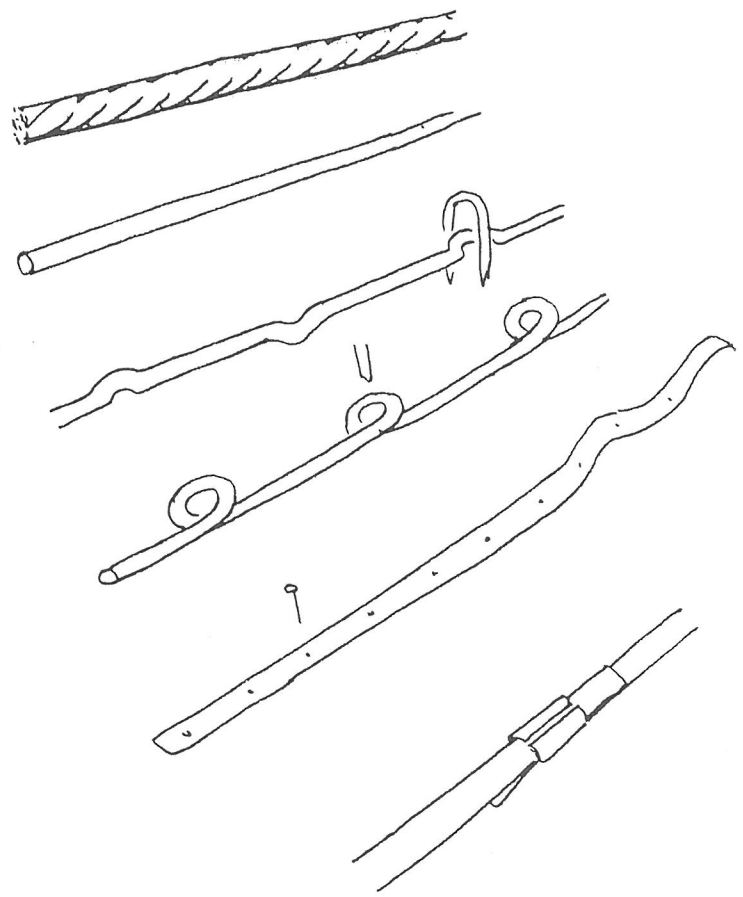
ROPES (HIGH ELASTICITY, NYLON
PERLON, OR SELF SHRINK-
ING HANF)

WIRES OR THREADS

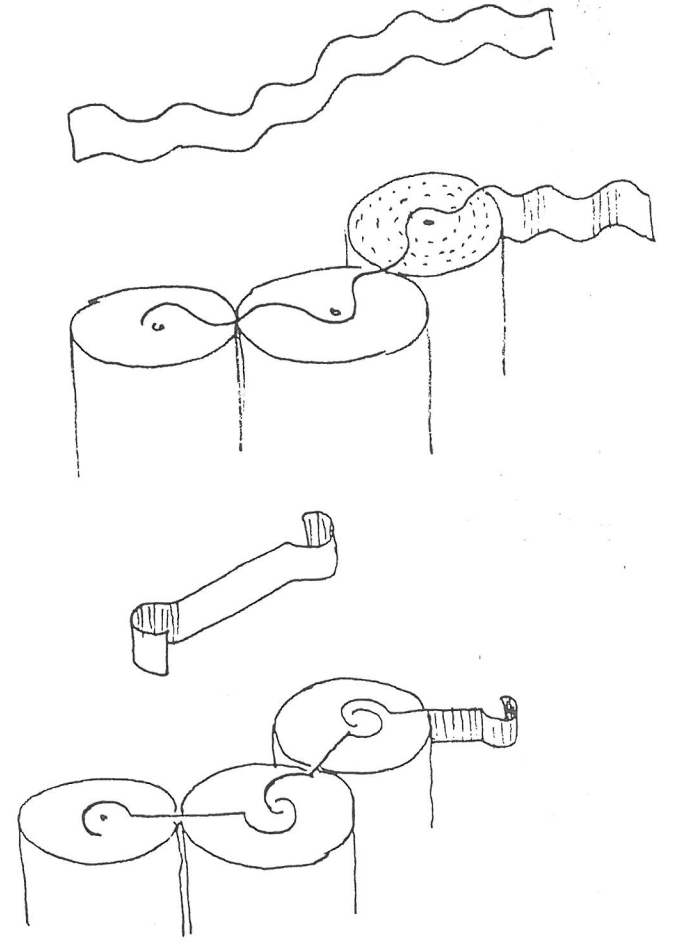
SPRING WIRES

FLAT SPRINGS

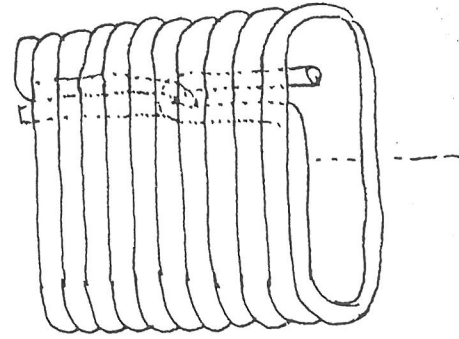
METAL BAND



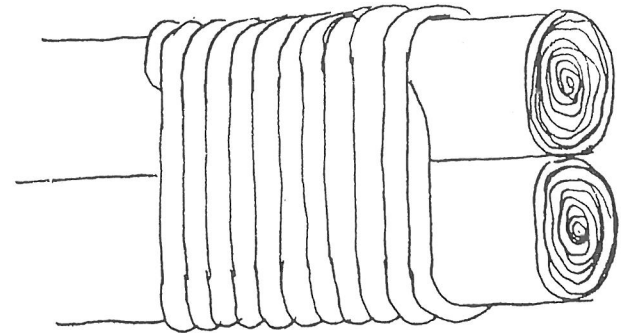
METAL STRIP



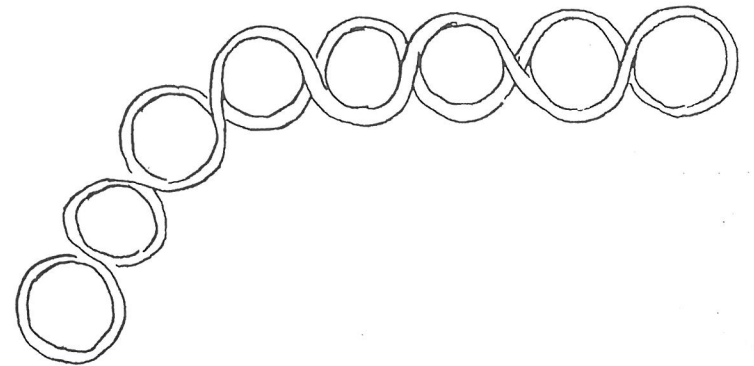
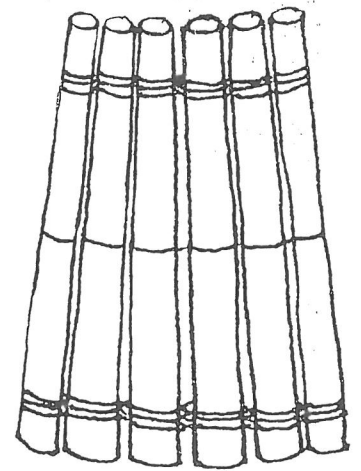
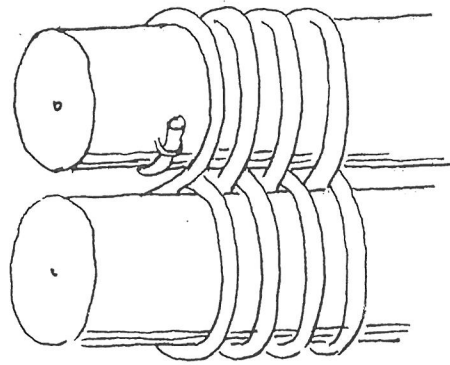
STRING CONNECTIONS



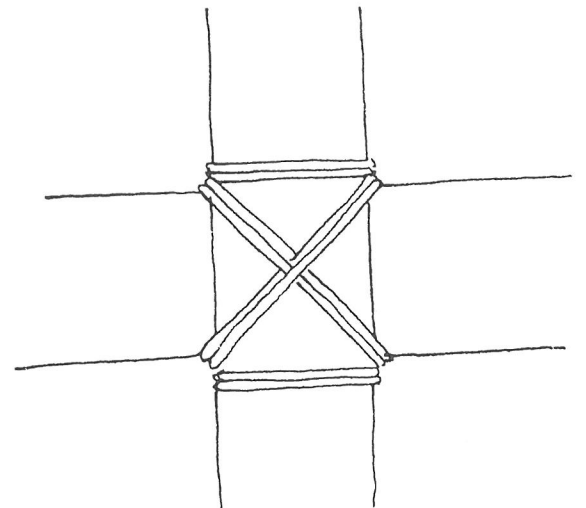
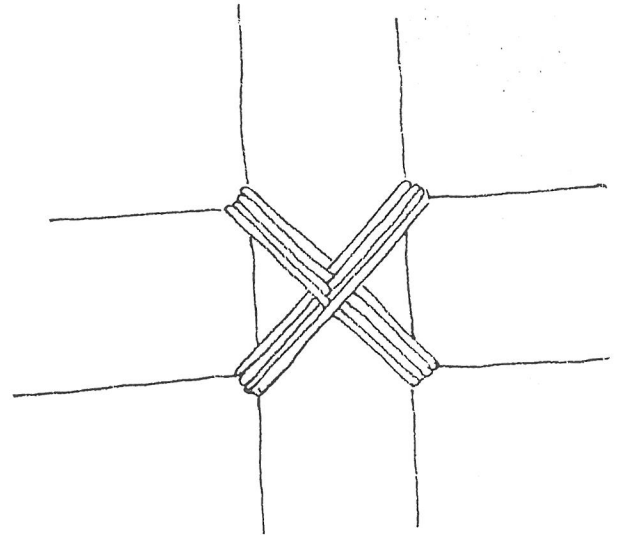
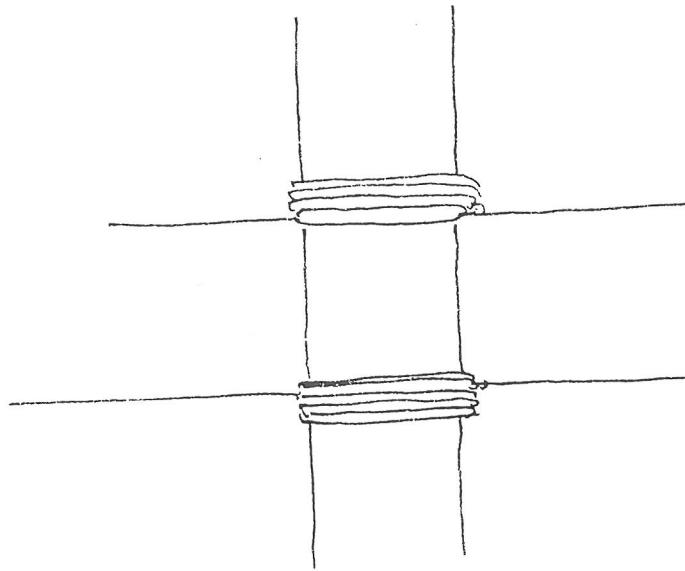
FOR 2 PARALLEL BEAMS

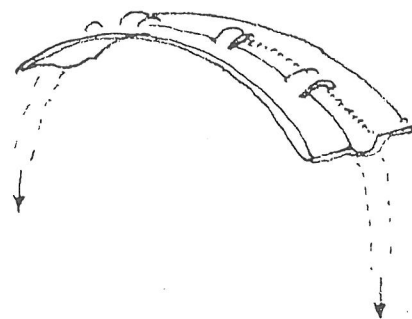
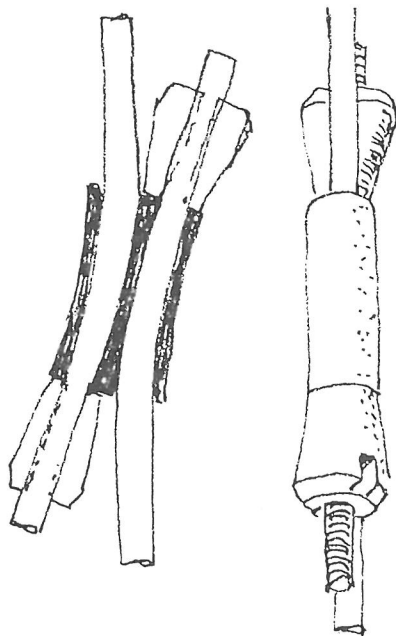
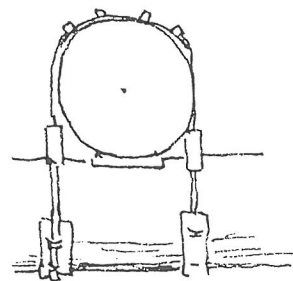
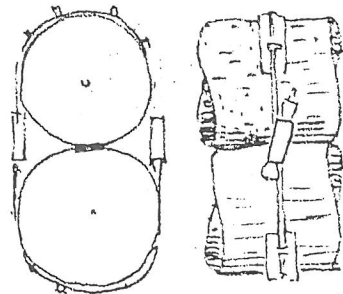


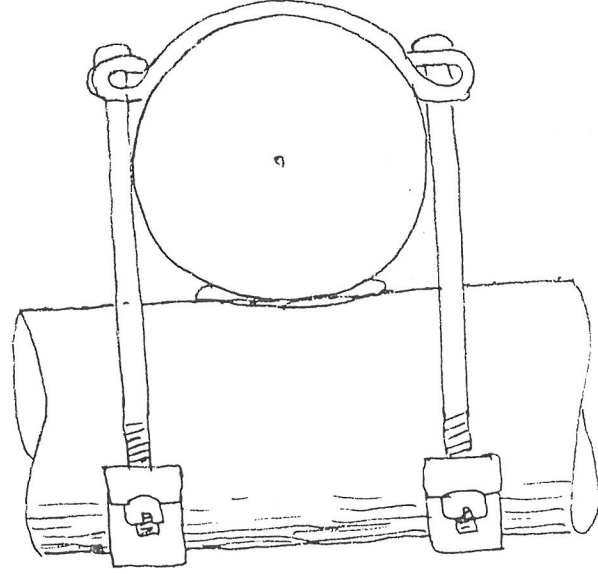
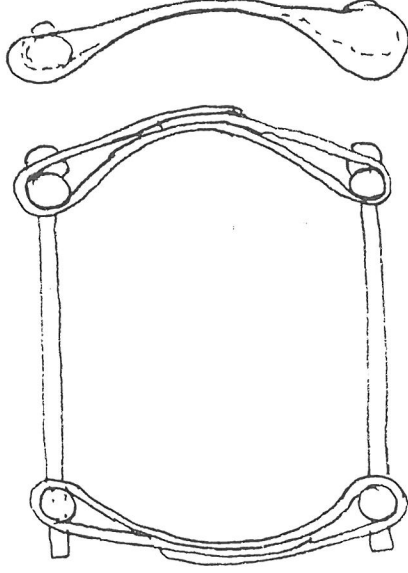
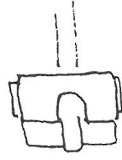
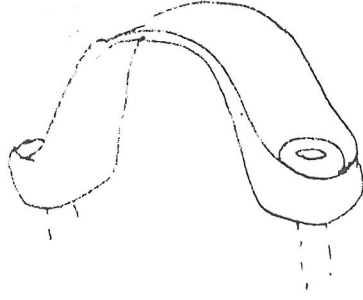
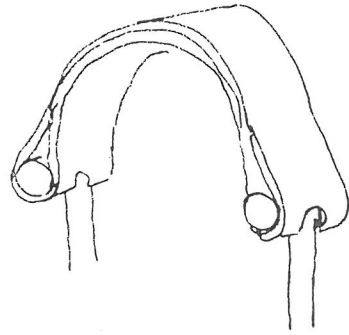
STRING CONNECTIONS
FOR SEVERAL PARALLEL
BEAMS



STRING
CROSS -
CONNECTION







F 07152 - 41084 (43908)

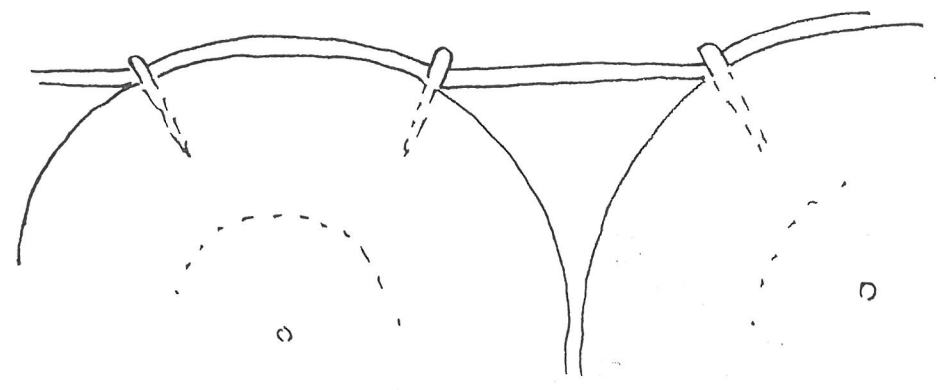
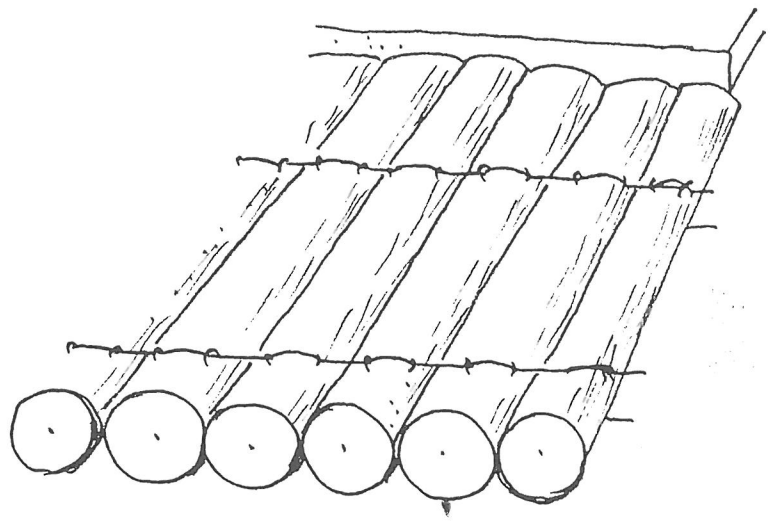
BERG 1000 19

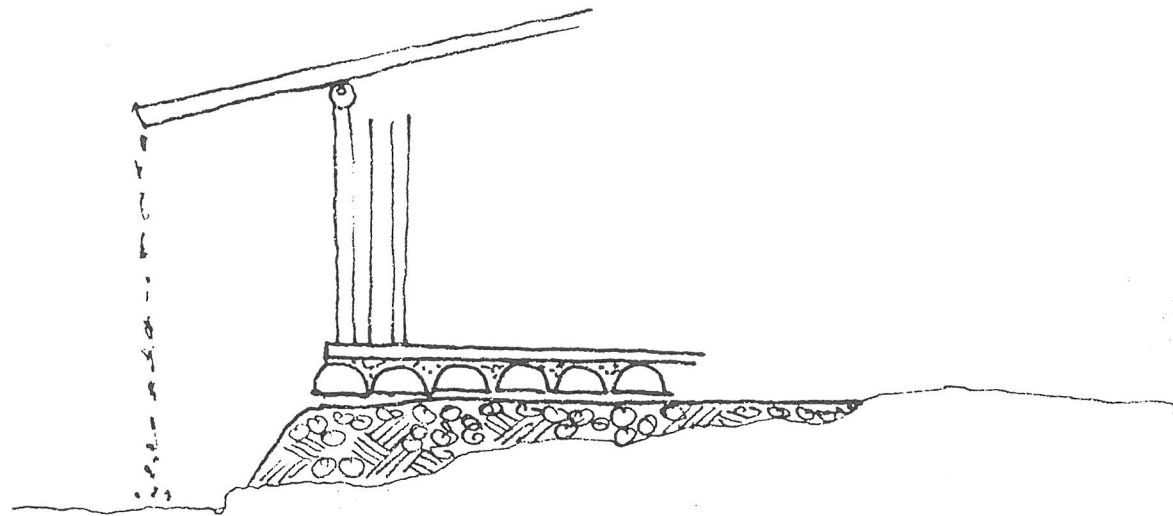
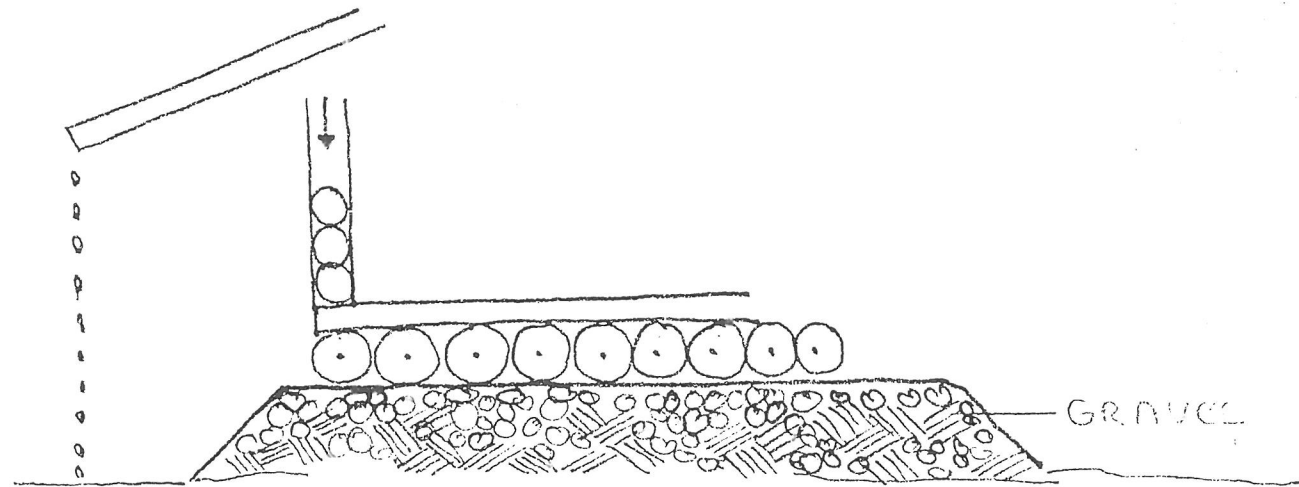
7250 LEONBERG 7

ATELIER FROLOT MARMIERON

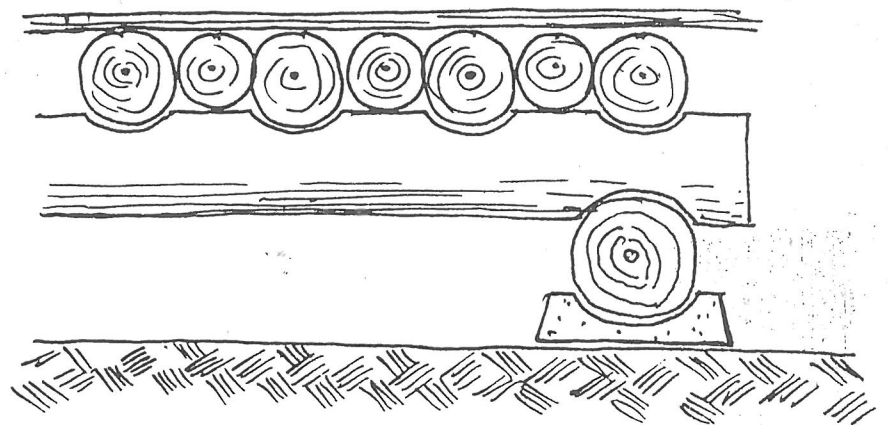
FLOORS

STÄBCHEN WIRE



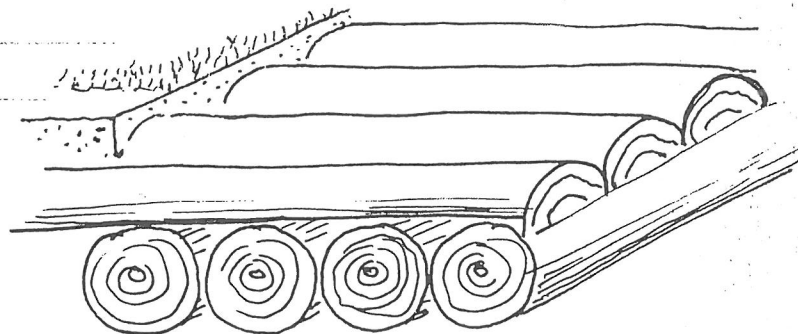


PLYWOOD
LOGS

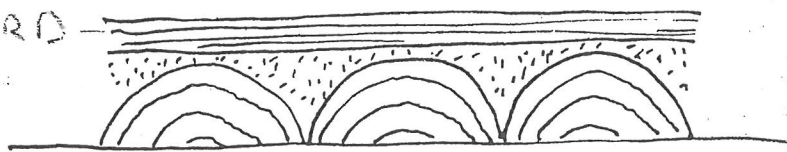


STONE
SOIL

CARPET
PAPER
CESTRICH
LOGS



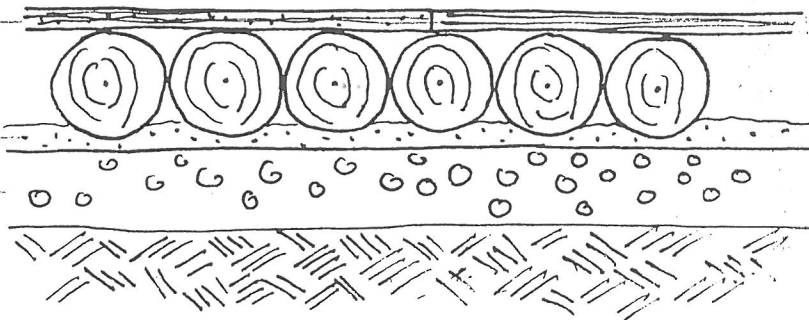
FIBER BOARD
SAND



PLYWOOD /
FIBERBOARD OR
PLANKS
TREATED
WOOD
FINE GRAVEL

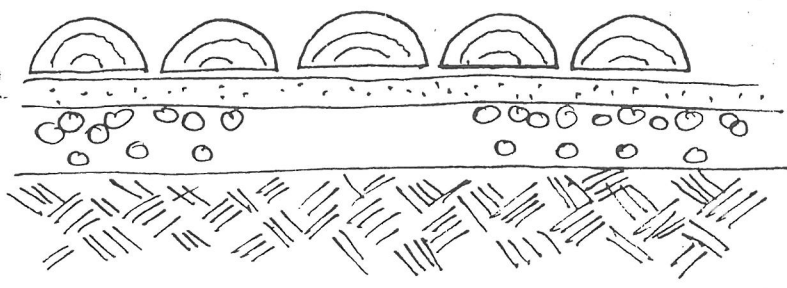
GRAVEL

SOIL

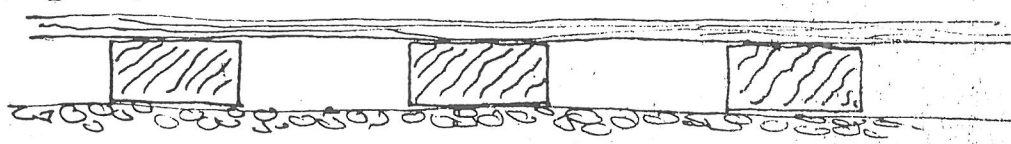


LOGS
FINE GRAVEL
GRAVEL

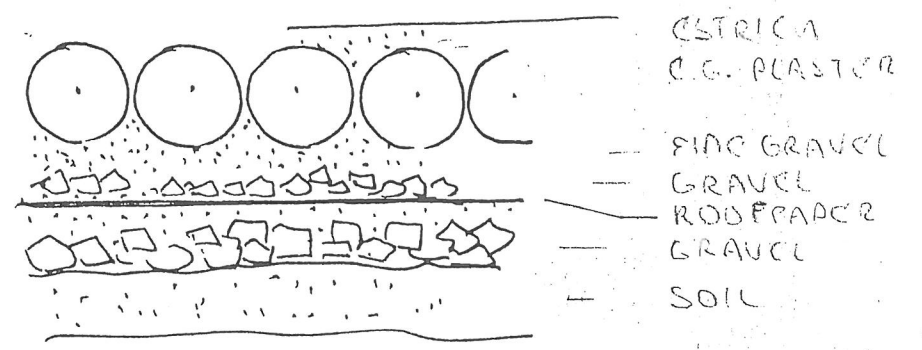
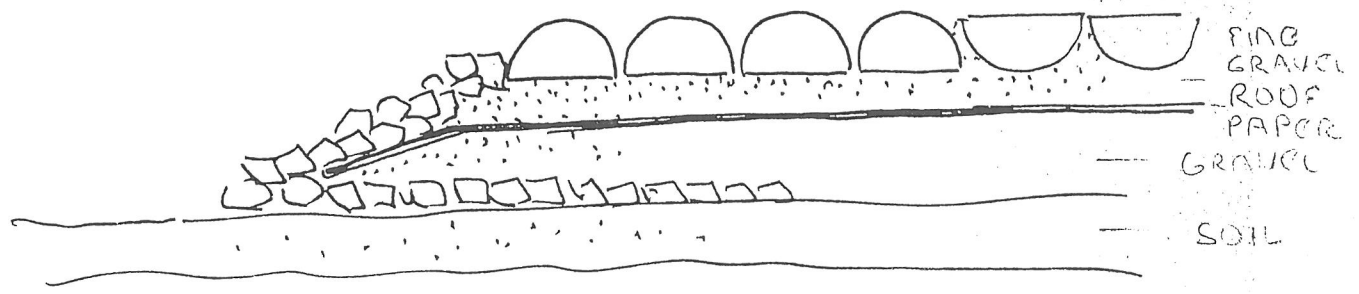
SOIL



FIBER BOARD OR
PLANKS
SLEEPERS
GRAVEL



ATELIER FREI OTT WARMBRONN - 7250 LEONBERG 7 BERG ALDE 19 U/152 - 41004 1430007

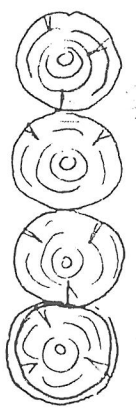


ATELIER FREI OT WARMSTRONN · 7250 LEONBERG 7 BERG ALDE 19 · 07152 · 41064 · 1734683

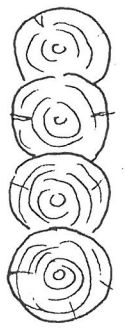
WALLS

SHRIMPING

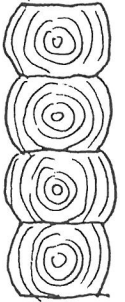
MUCH



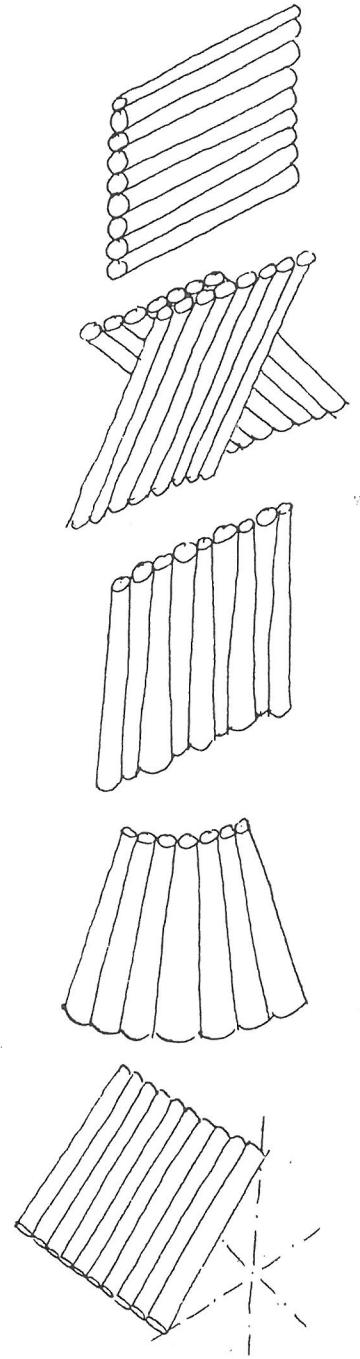
LESS



LITTLE

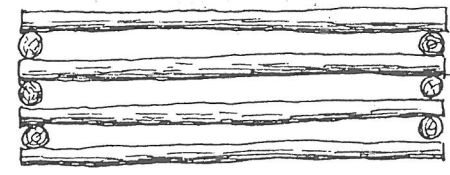


LOG WALLS

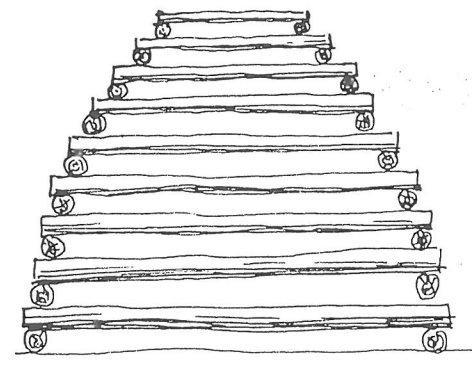
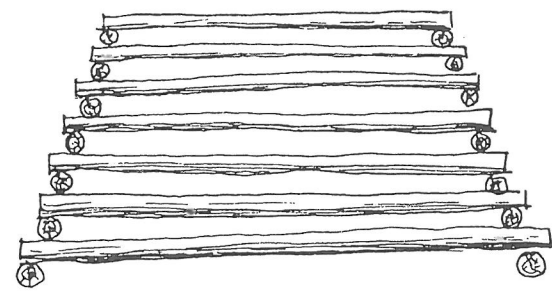
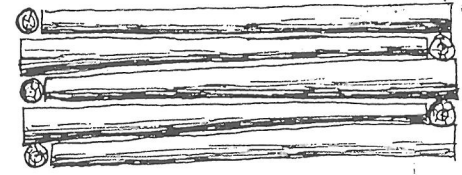


CROSS-LOG-WALL

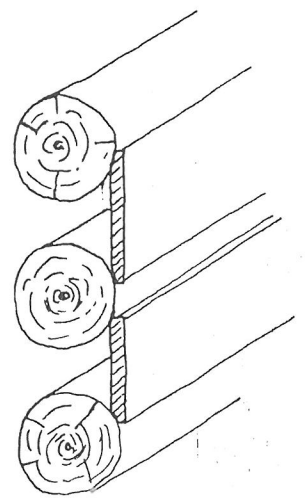
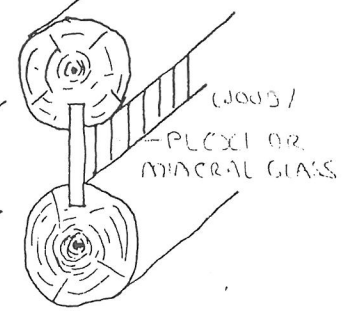
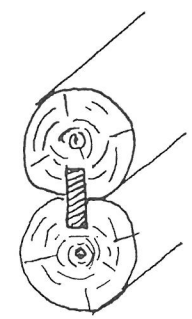
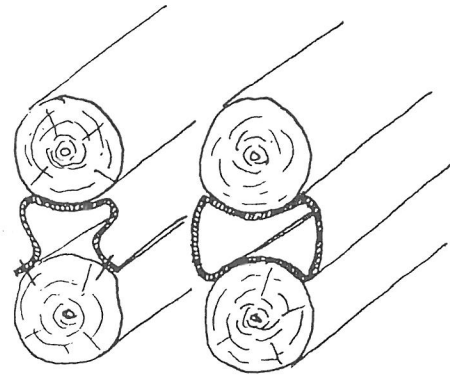
OPEN OR WITH INFILL



STAGGERED T-JOINTS

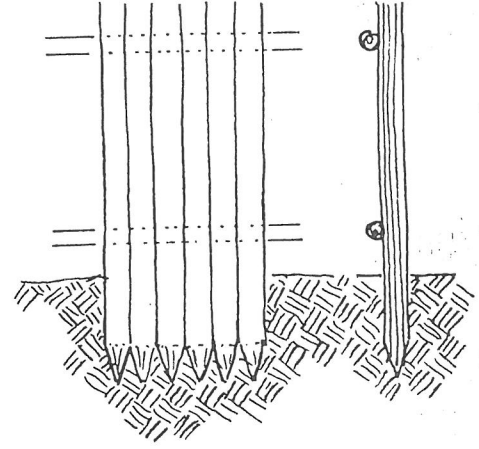
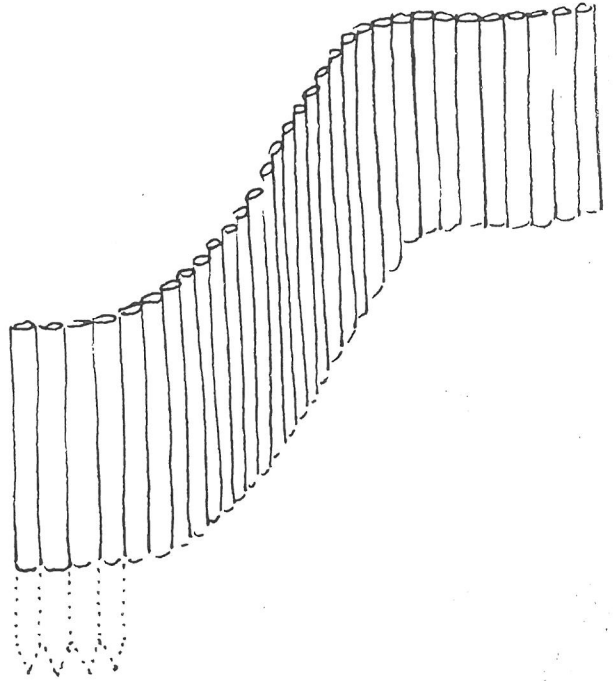


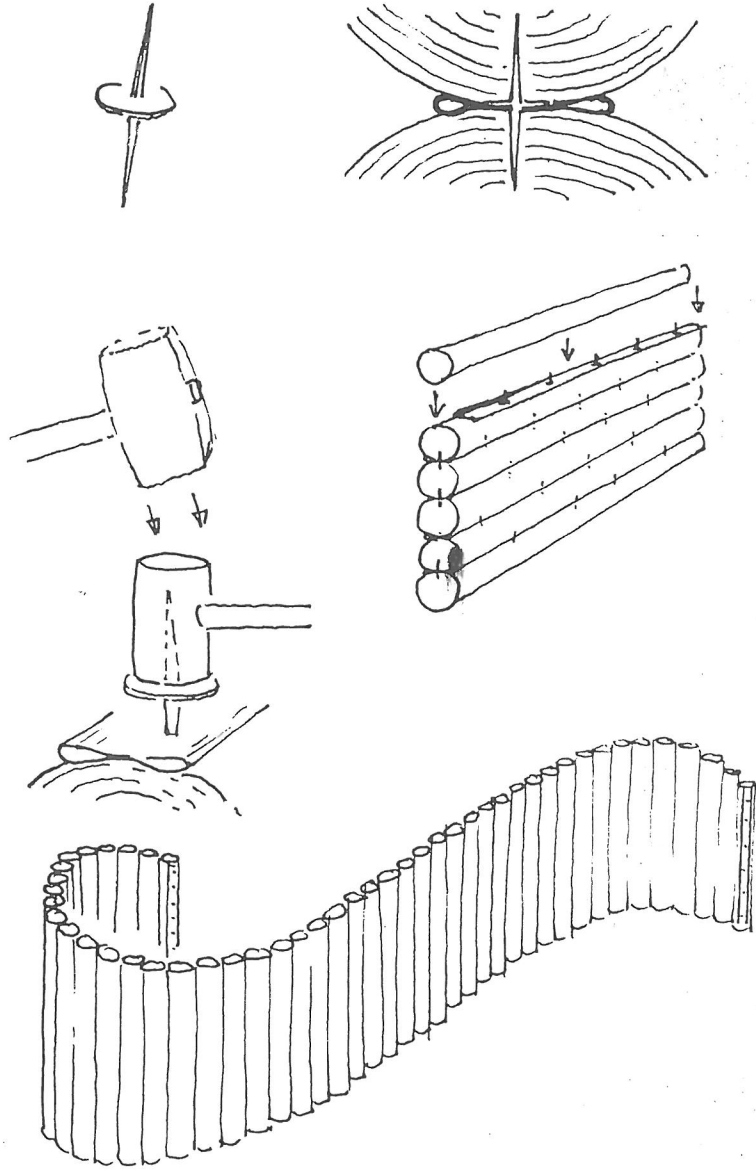
NEEDLE
3/4 CLEAR
PVC TUBE



ATELIER FRED OTTO WARMBORN - 7250 LEONBERG 1 - 09122 TROST ARNOLD

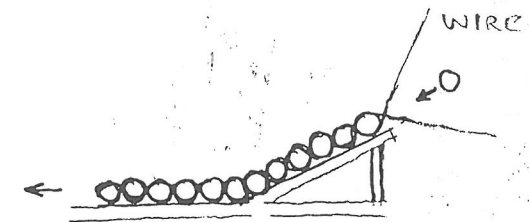
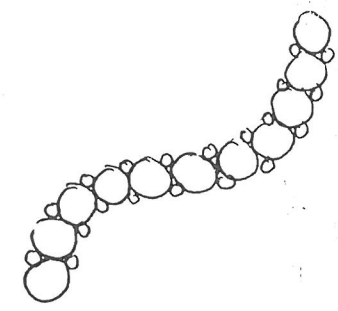
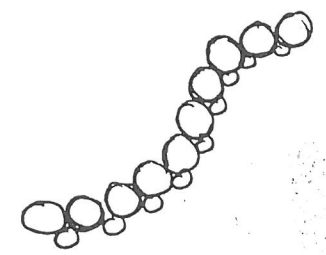
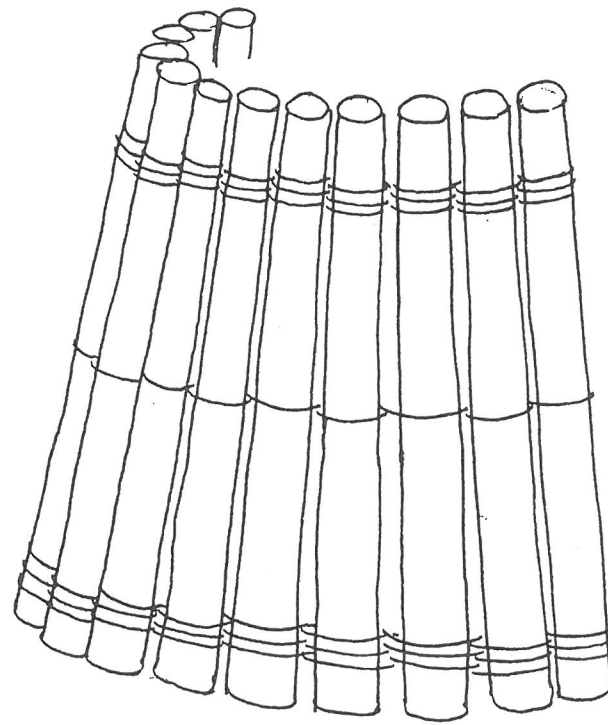
WALL OF VERTICAL PILES





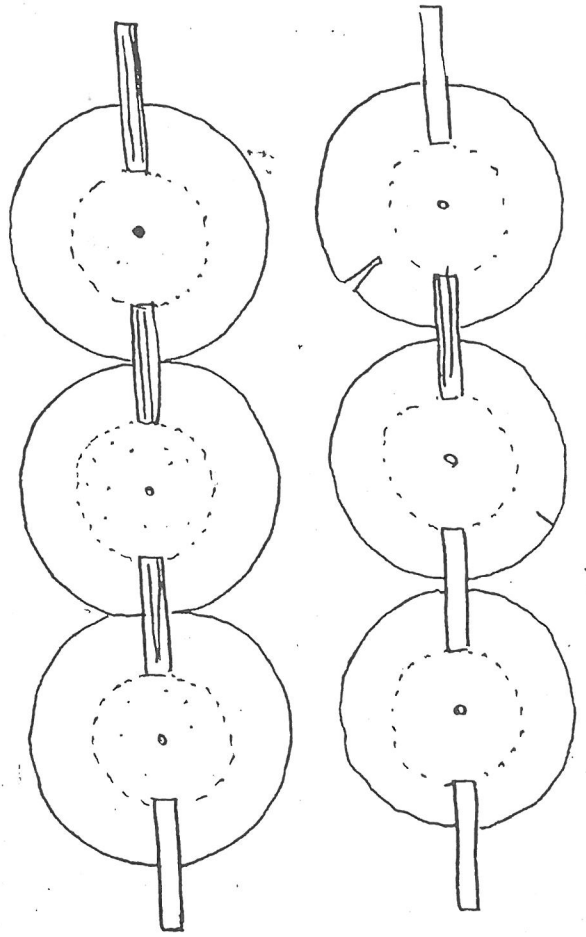
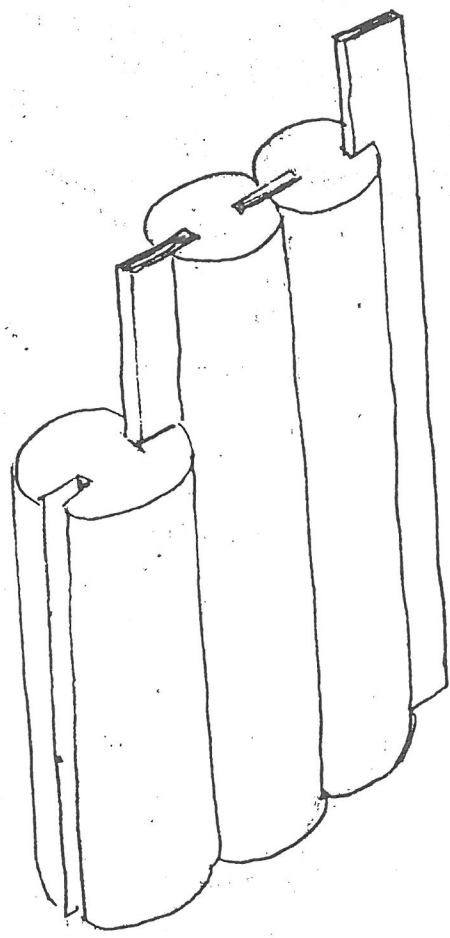
ATELIER FREI OT WARMBRONN - 7250 LEONBERG 7 BERG ALDE 19 07152 - 41084 (43908)

STRING-CONNECTED PILE WALL



CONNECTION METHOD

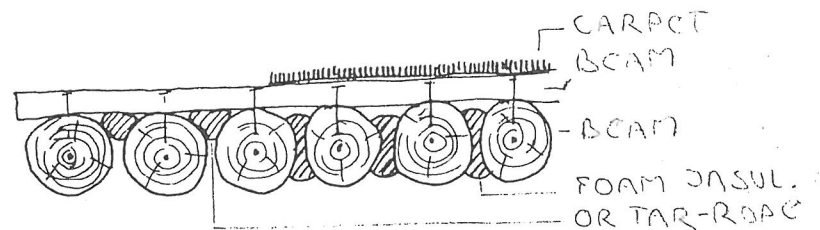
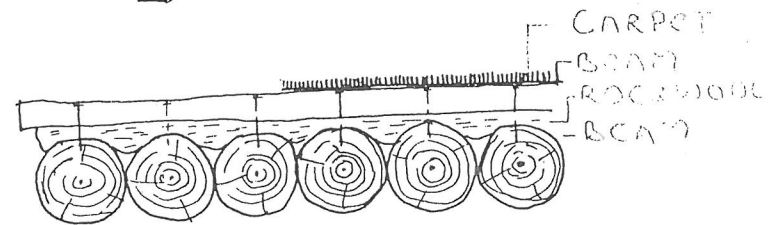
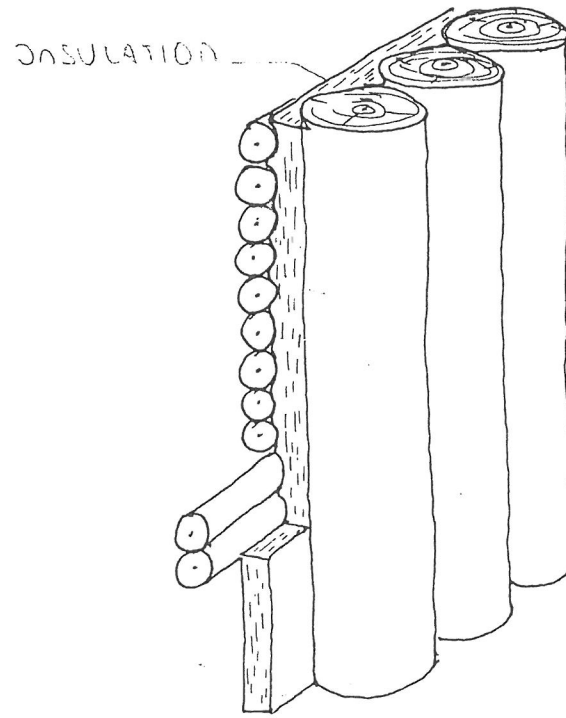
NUT + SPRING
WALL



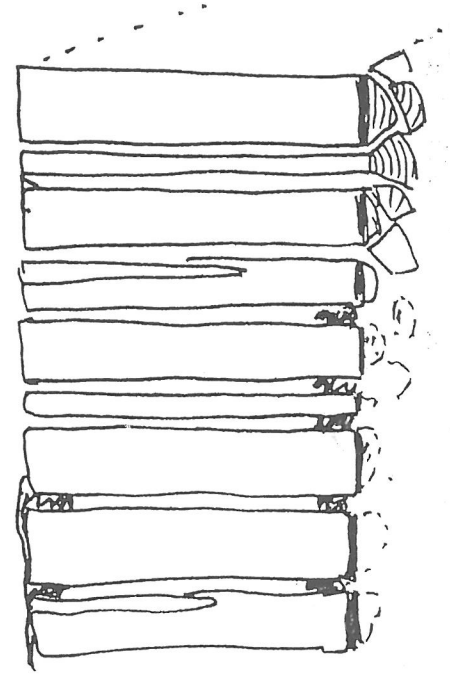
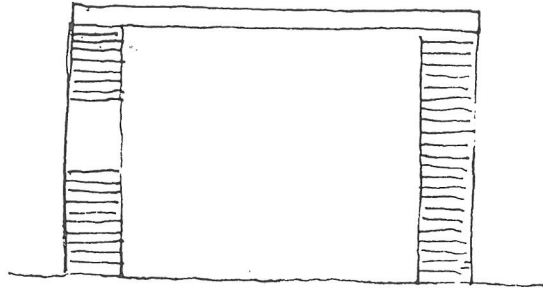
WET

DRY

INSULATED WALL
OF WOODEN BEAMS



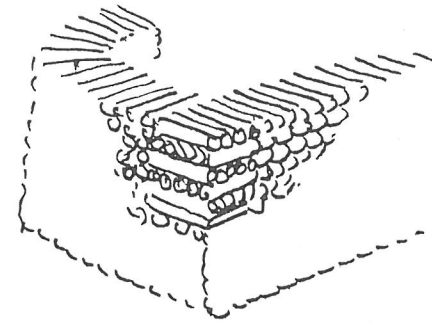
'FIRE WOOD' WALL



PLANC

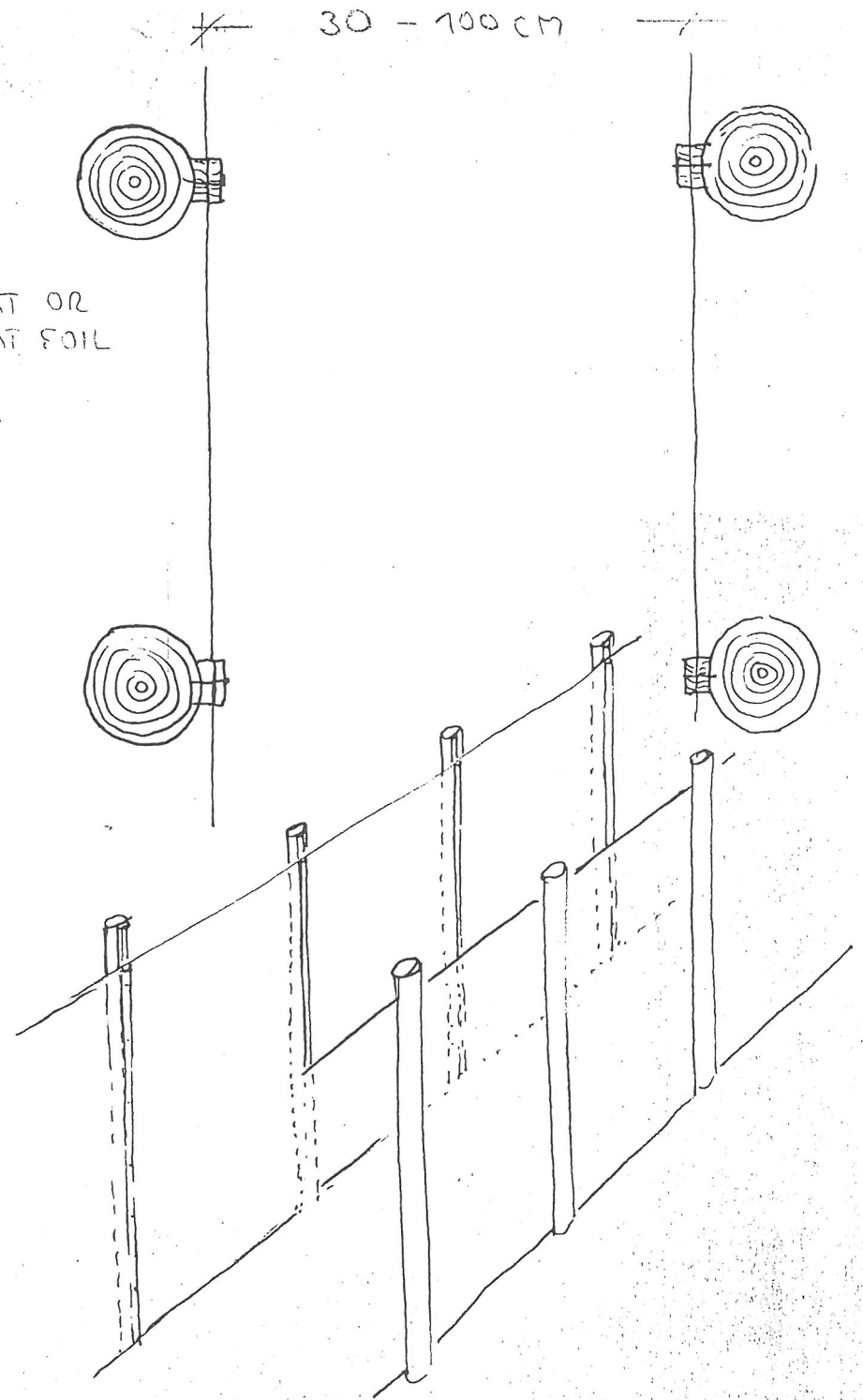
PLASTERED
ON ONE SIDE

PLASTERED
ON TWO SIDES



DOUBLE TEXTILE WALL

TRANSPARENT OR
TRANSLUCENT FOIL
OR CANVAS



ATELIER FREI OT WARMBRONN - 7250 LEONBERG 7 BERG - DE 19 07152 - 41084 (43908)

ATELIER FREI OT WARMBRONN - 7250 LEONBERG 7 BERG - DE 19

ATELIER FREI OT WARMBRONN - 7250 LEONBERG 7

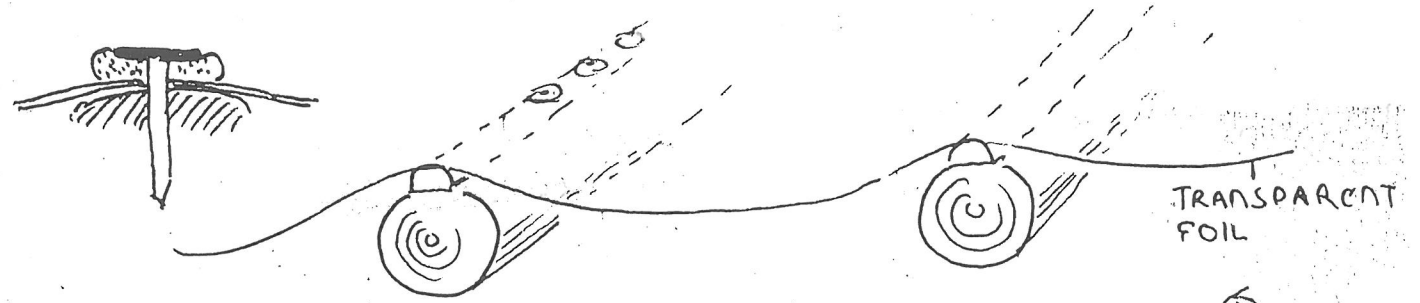
ATELIER FREI OT WARMBRONN - 7250 LEONBERG 7

ATELIER FREI OT WARMBRONN - 7250 LEONBERG 7

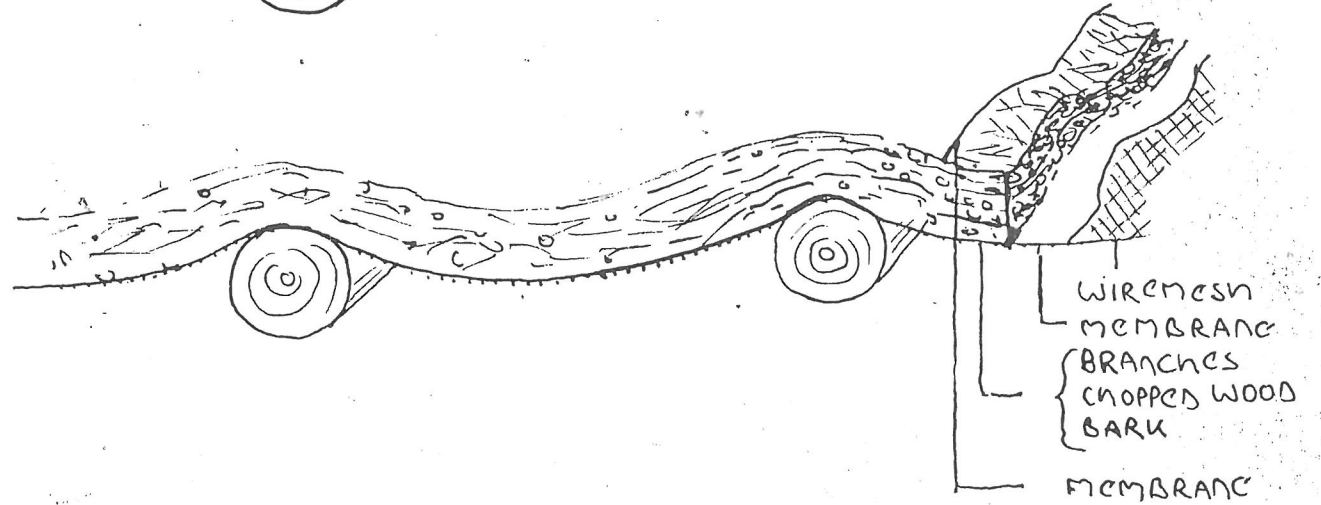
ROOFING

ROOFS

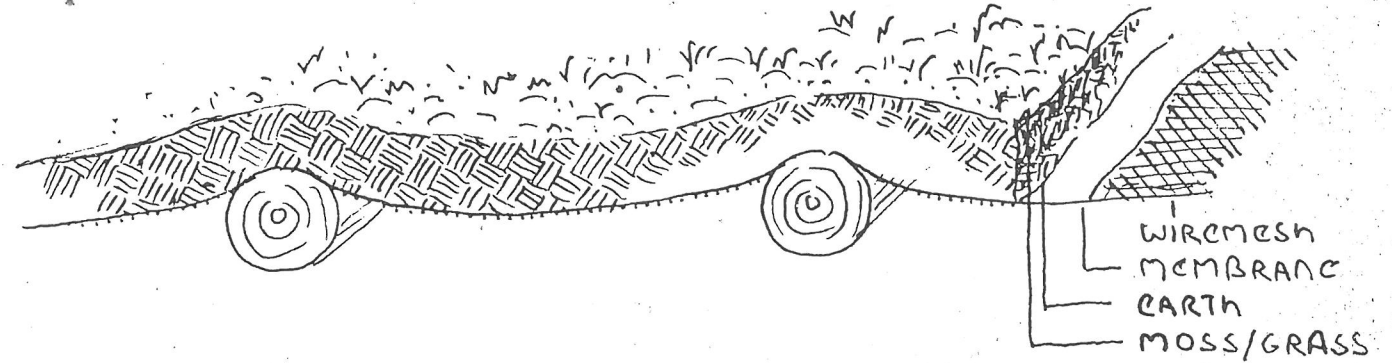
WEATHER SKIN -
CLIMATE HULL

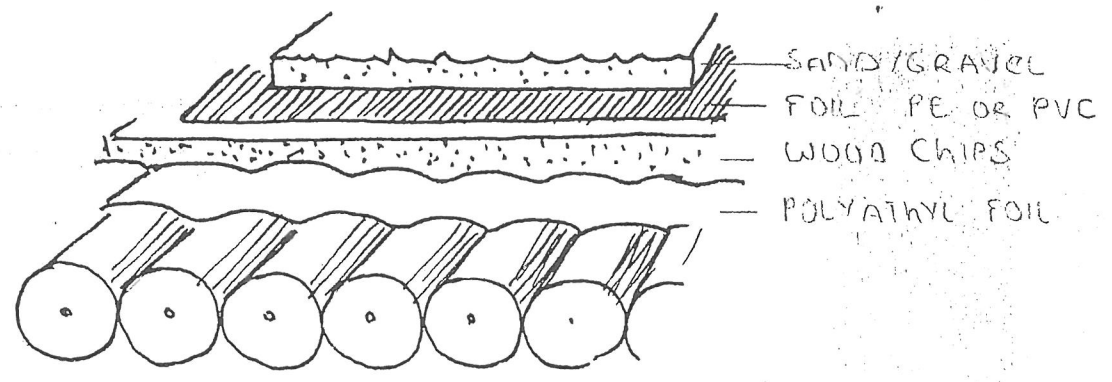


INSULATED ROOF

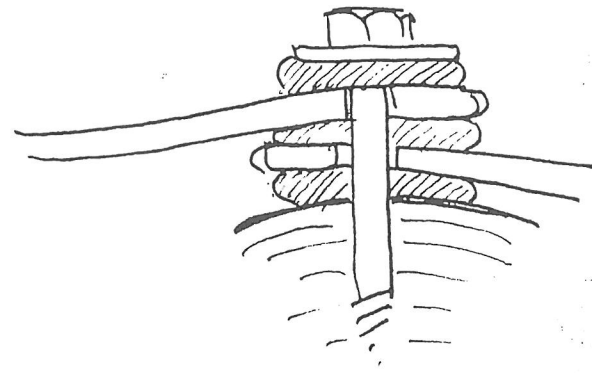
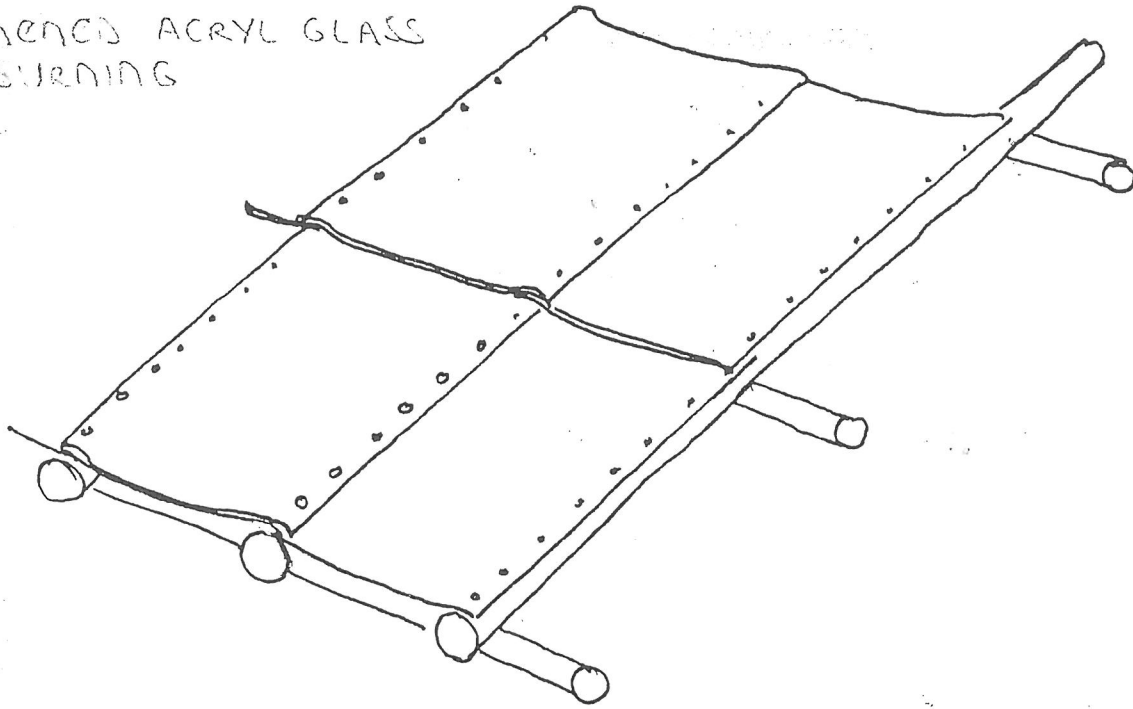


MOSS / GRASS ROOF





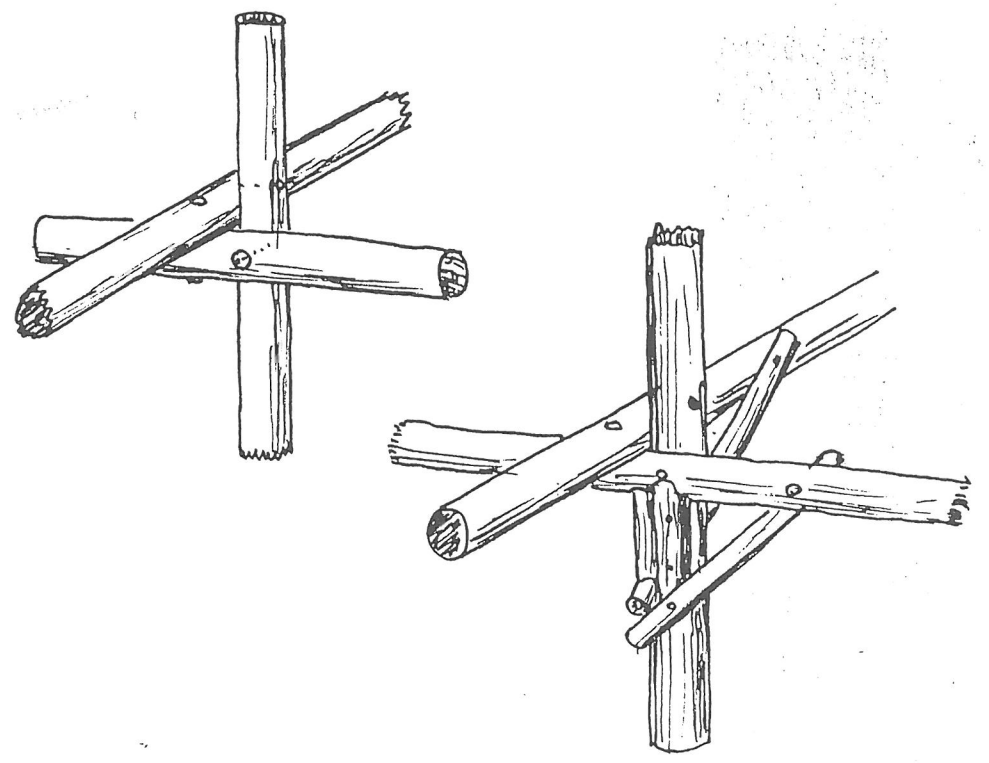
TOUGHENED ACRYL GLASS
NON BURNING



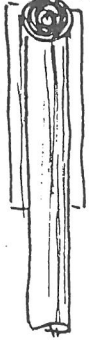
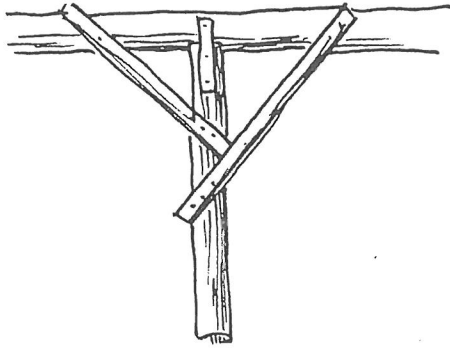
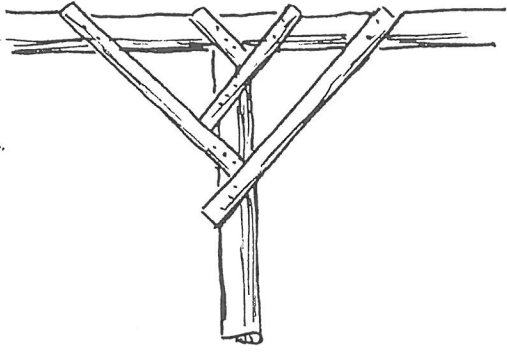
ATELIER FREI OT WARMBRONN - 7250 LEONBERG 7 BER ALDE 19 ☎ 07152 - 41084 (439008

SCCLETON AND FRAMEWORK

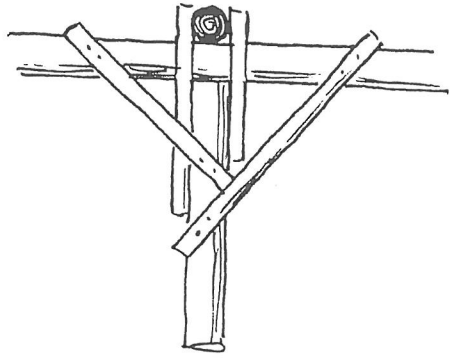
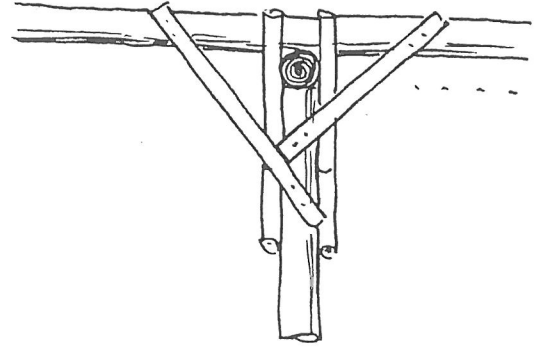
CROSS CONNECTIONS

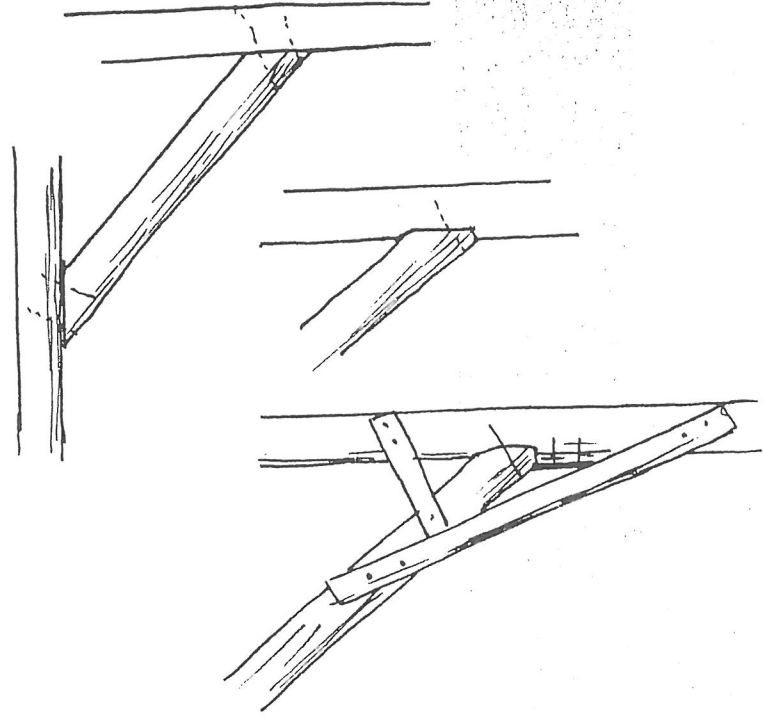
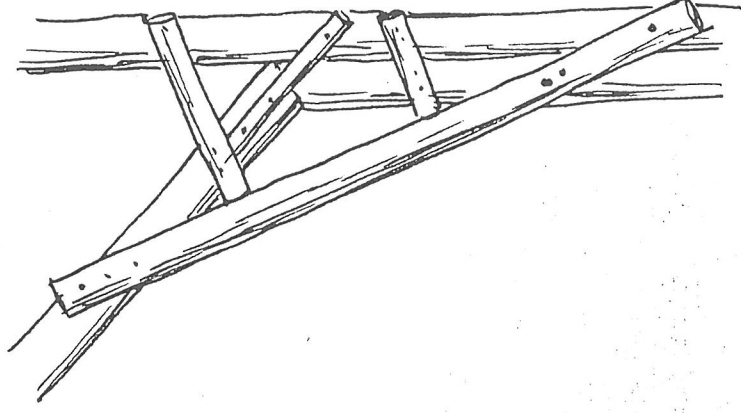
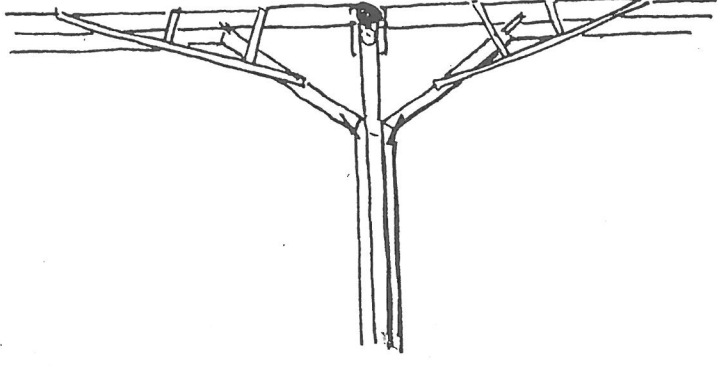


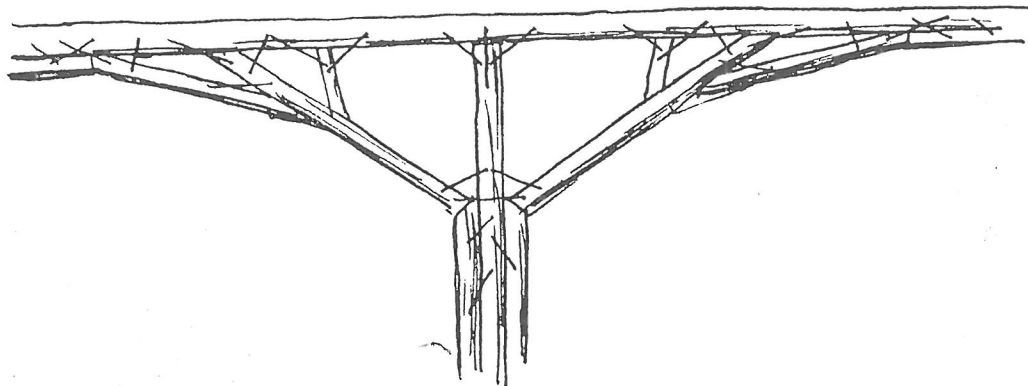
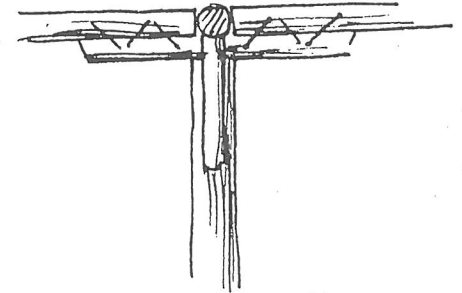
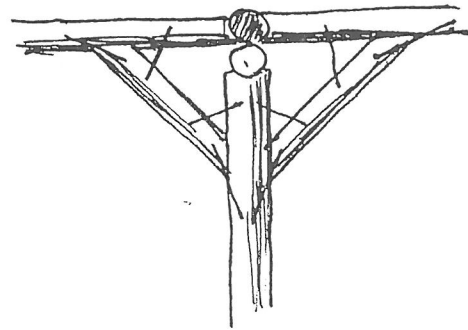
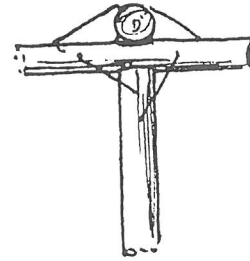
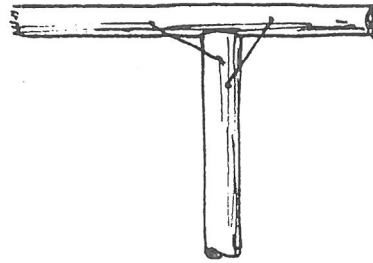
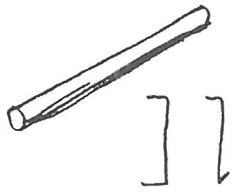
ATELIER FRED OT - WARMBRONN - 7250 LEONBERG 7 BERG - LDC 19 © 07152 - 41064 (430001)



7250 LEONBERG 7 BE HALDE 19 07152 - 41084 (430)



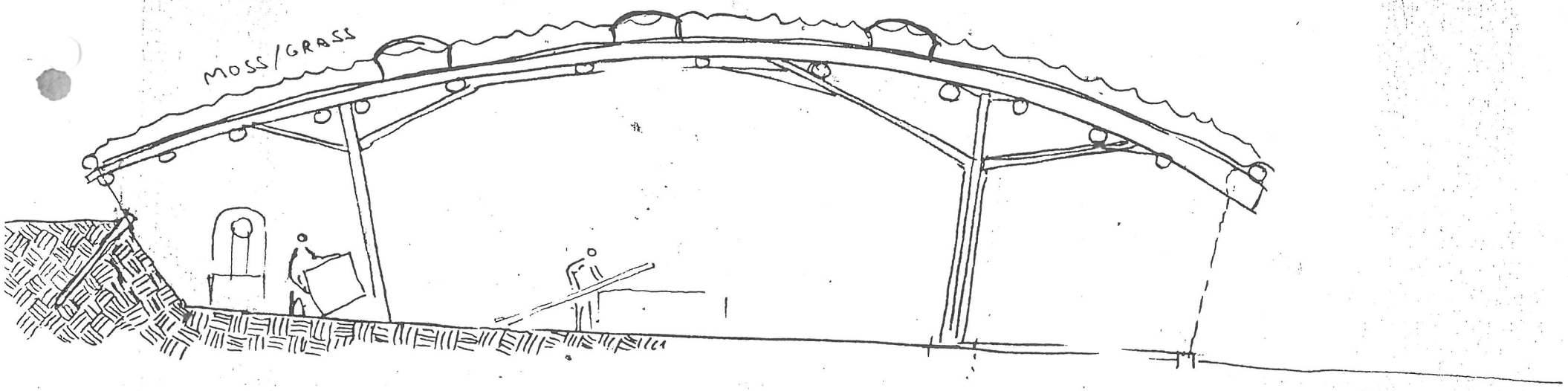


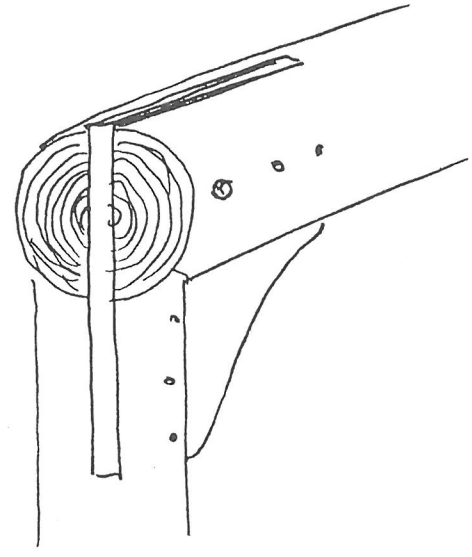
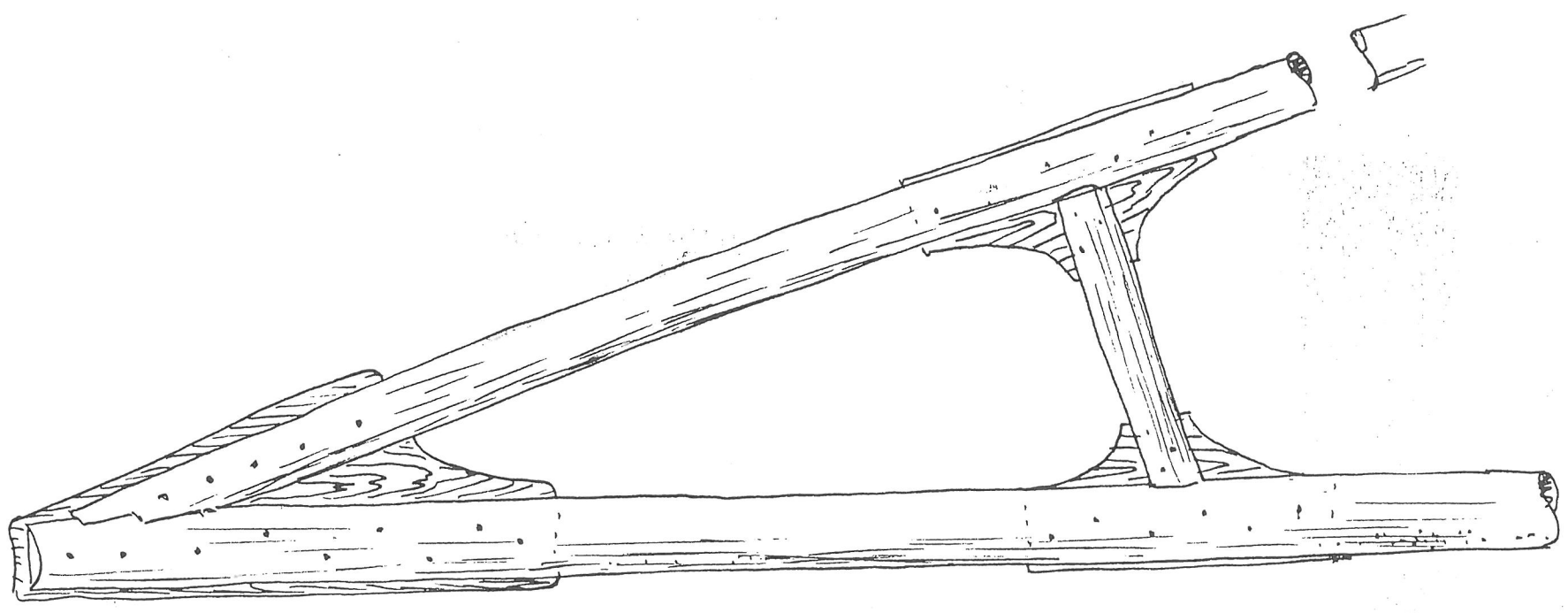


WORKSHOP - HALL
MADE OF WHOLE
TREE - TRUNKS

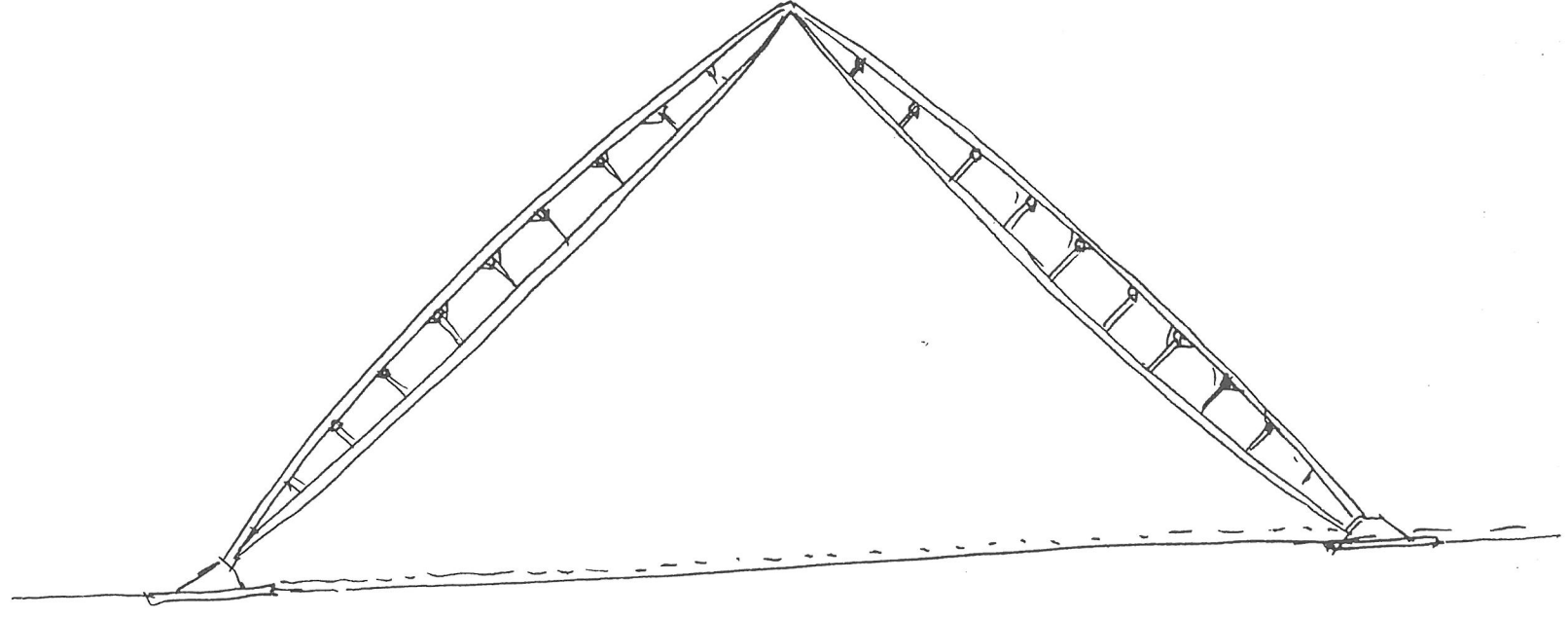
front length

MOSS / GRASS

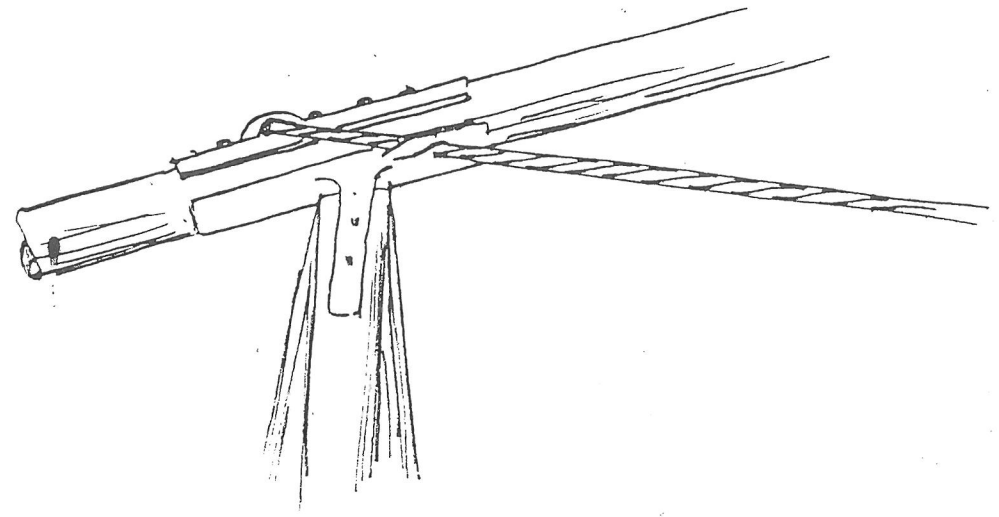
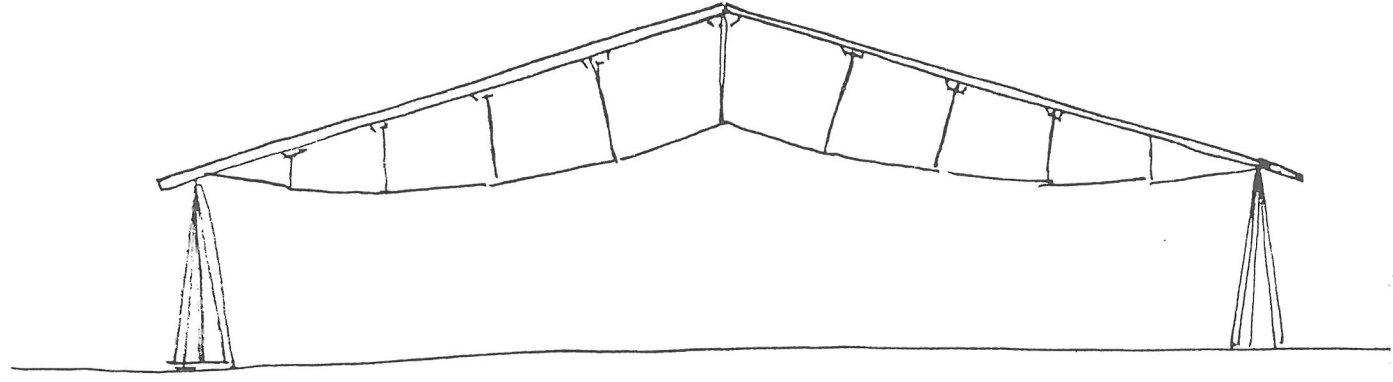




ATELIER FREI OTTO WARMBRONA - 7250 LEONBERG 7 BERG-ALDE 19 07152 - 41004 (439000)

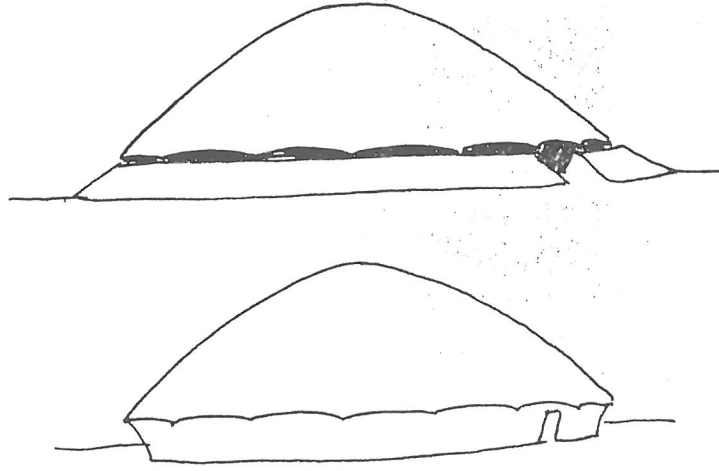
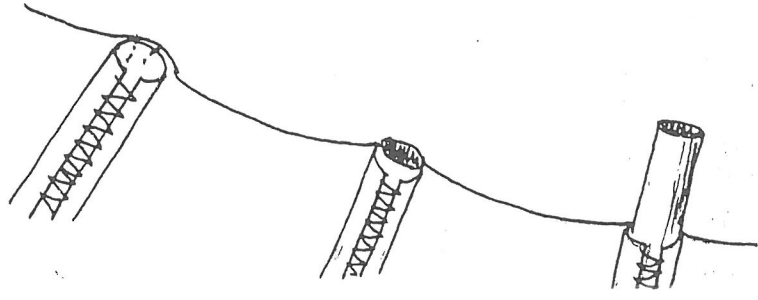
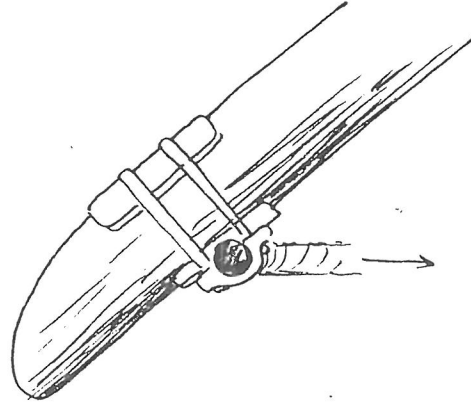
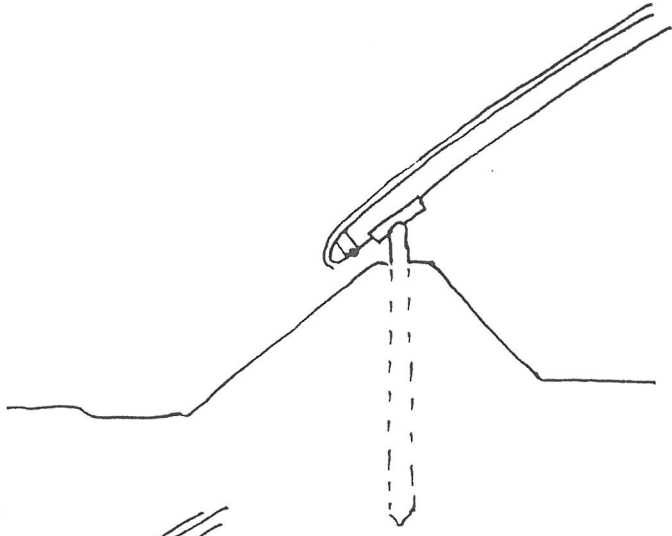
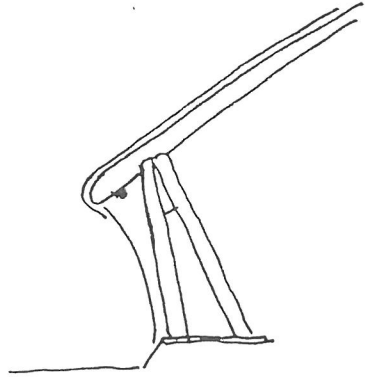


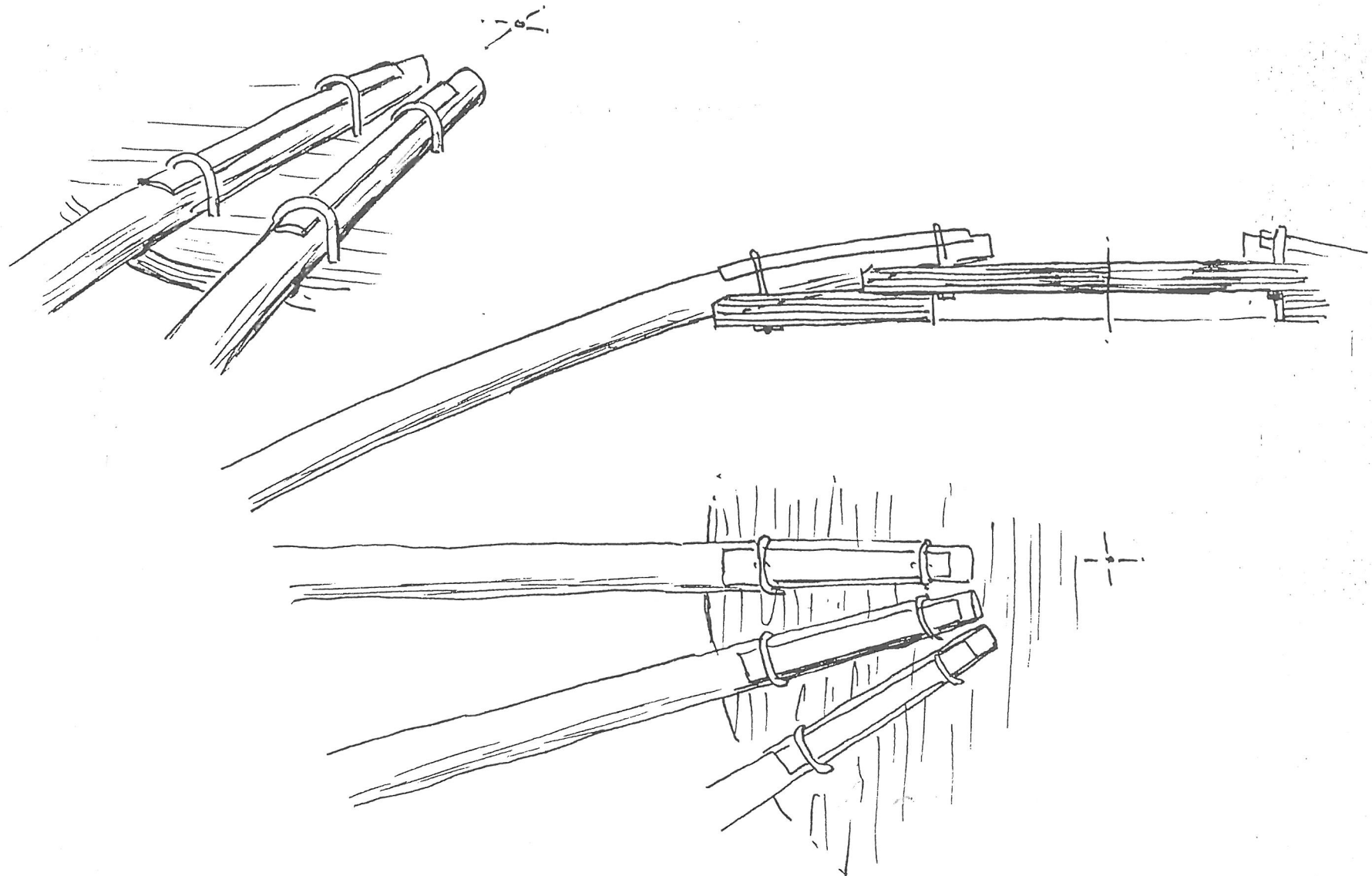
ATELIER FREI OTT WARMBRONN 7250 LEONBERG 7 BEHG 1 DE 19 € 0152 - 41004 (0,35€)

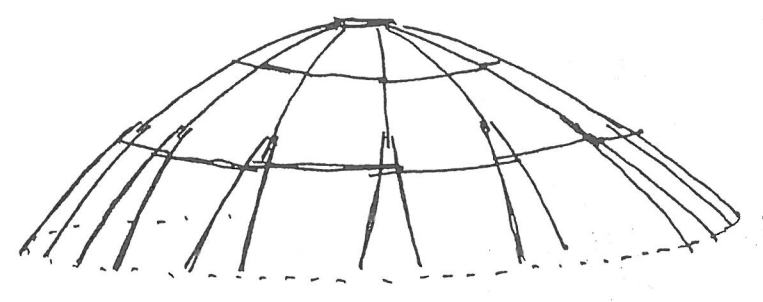
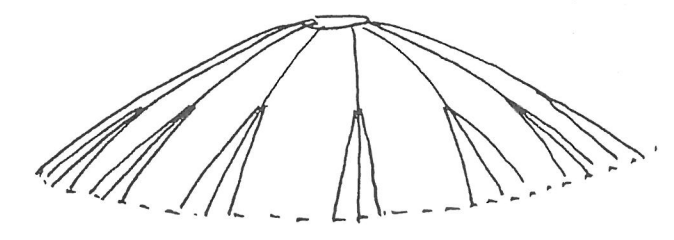
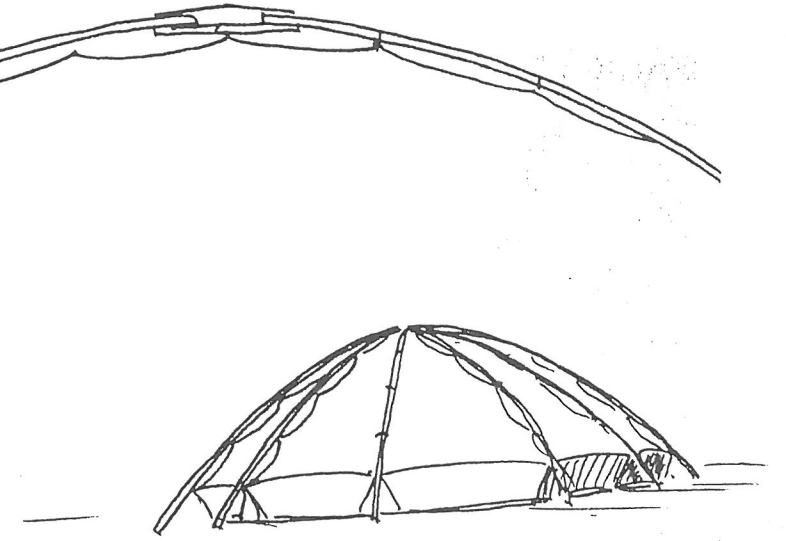
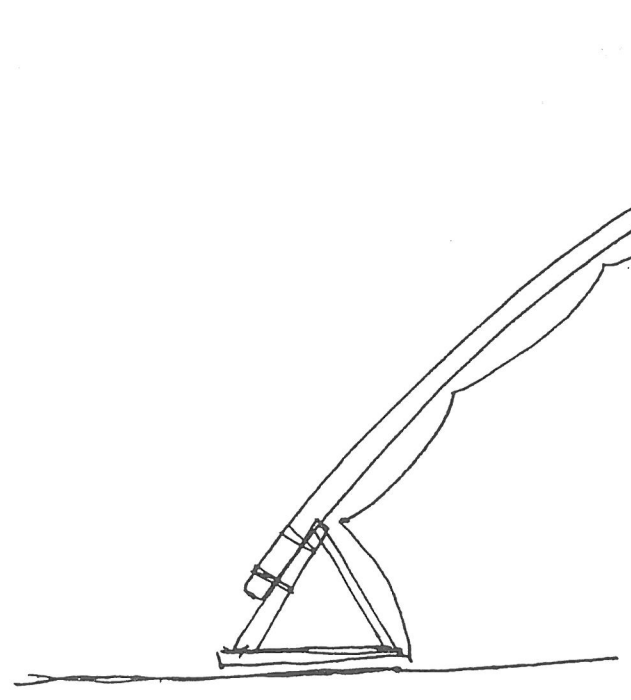


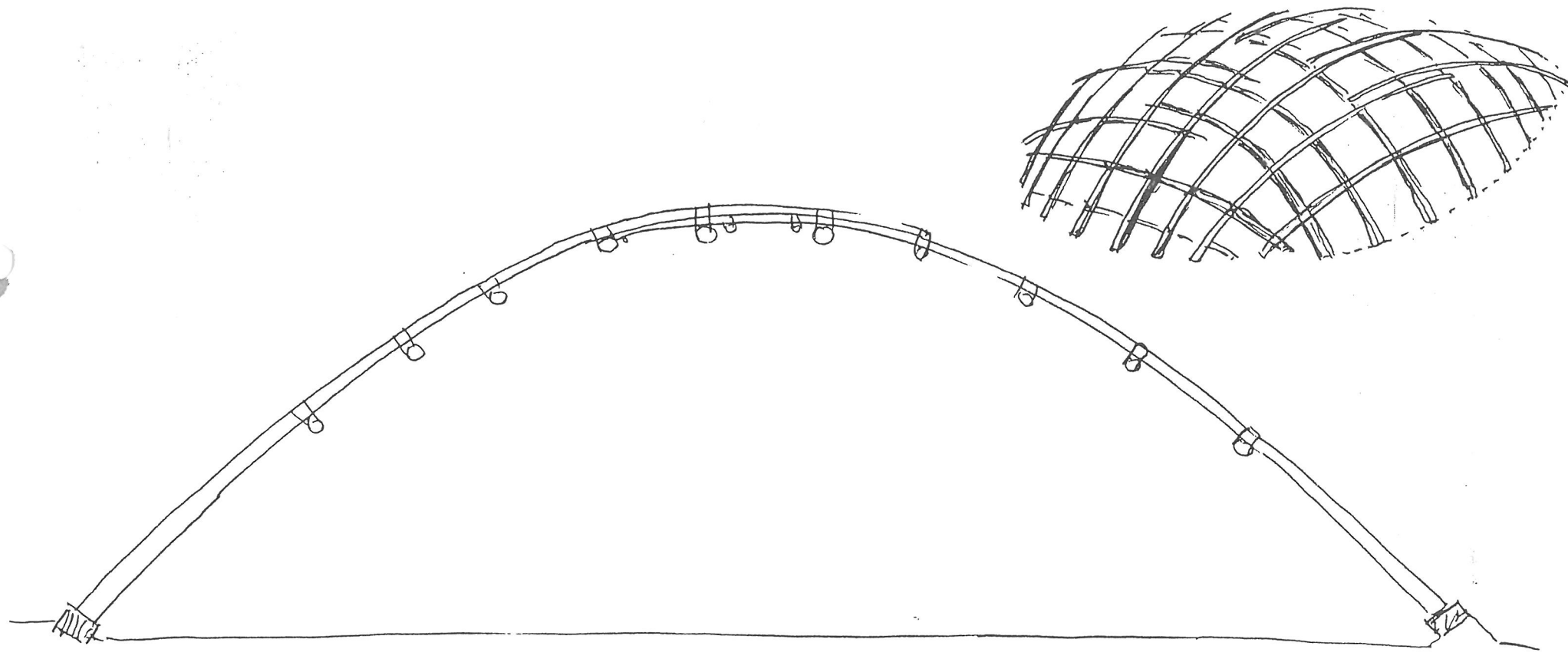
ATELIER FREI OT WARMBRONN - 7250 LEONBERG 7 BERG LDC 19 07152 - 41084 (43908)

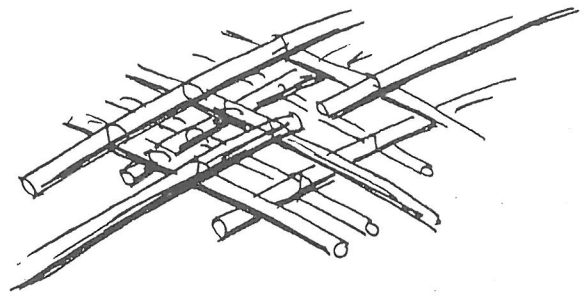
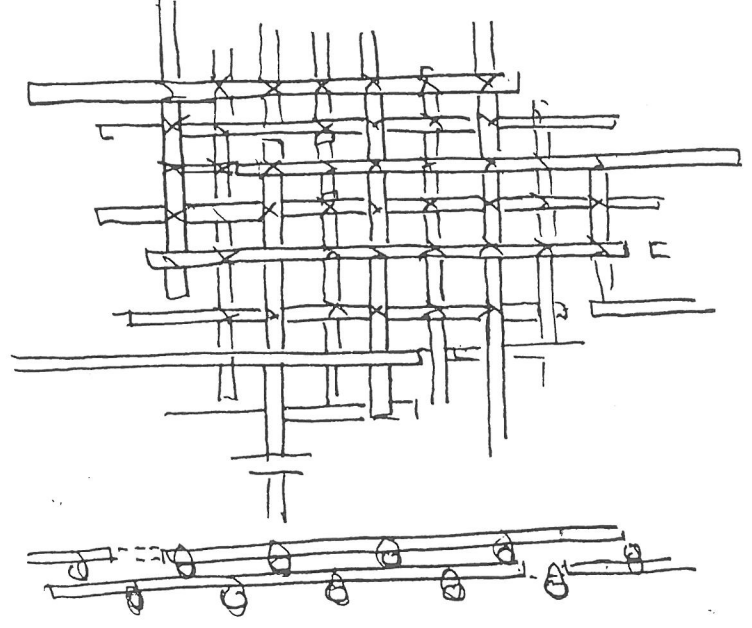
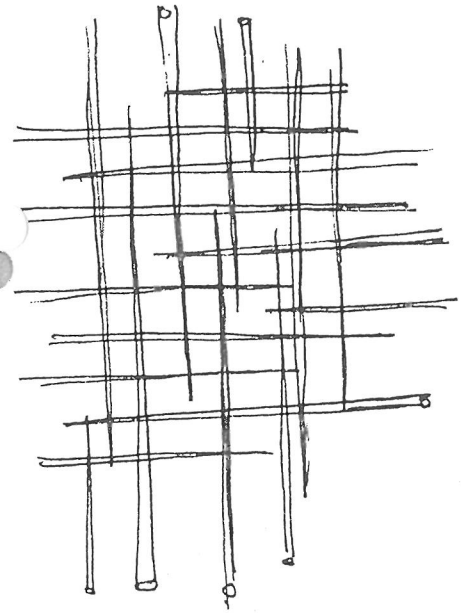
SNELLS

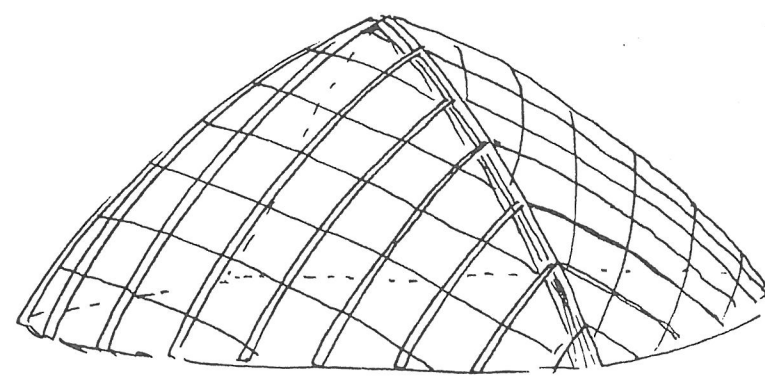
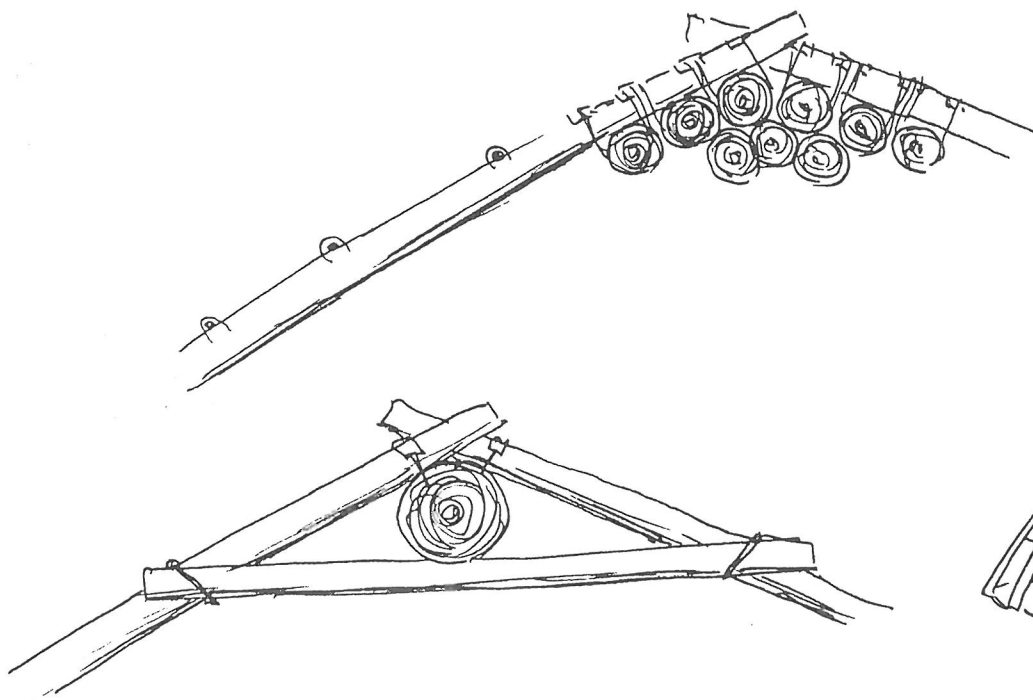










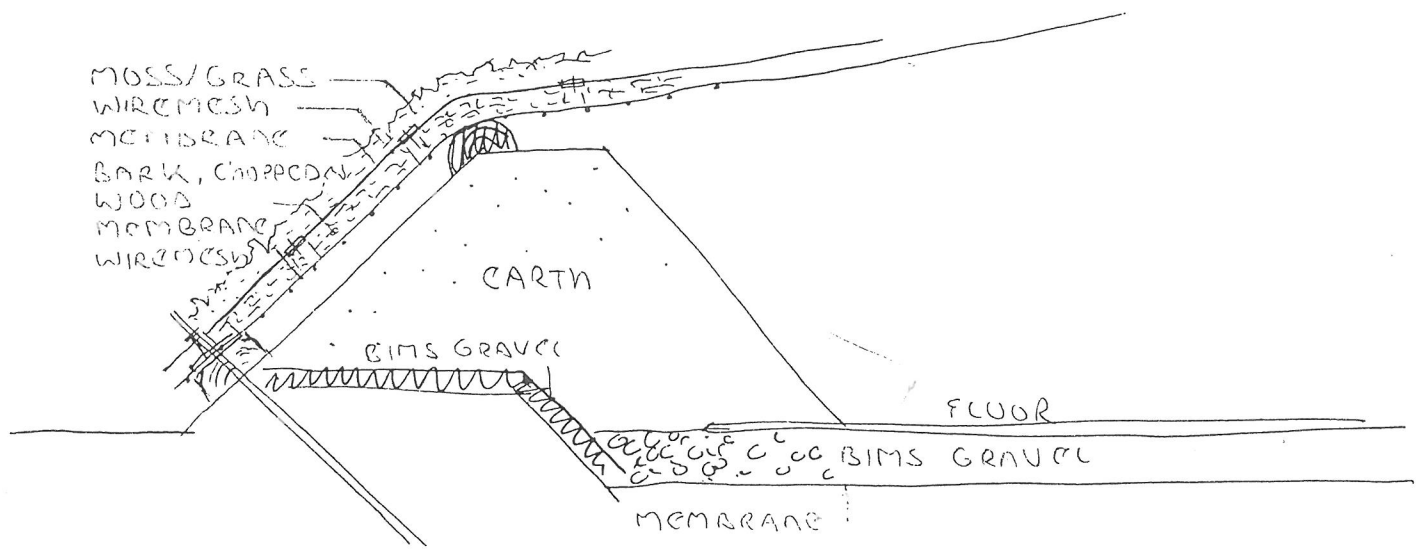
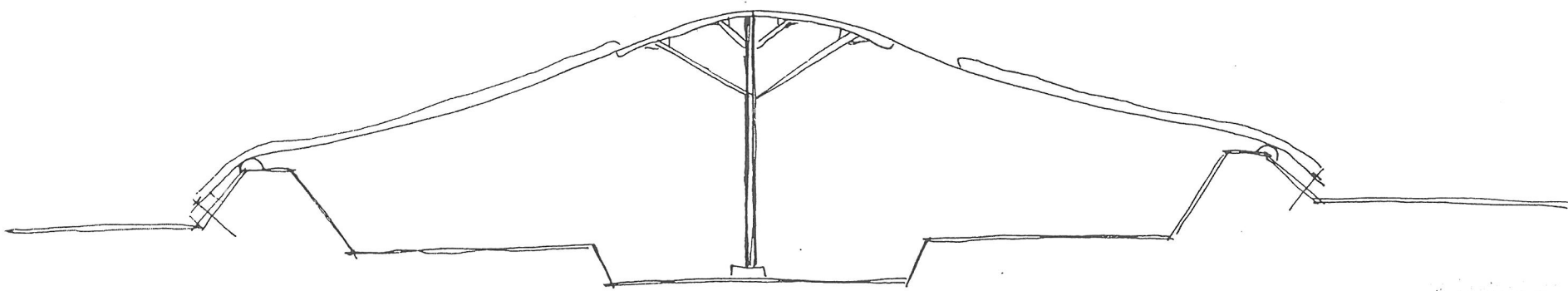


ATELIER FREI OT WARMBRONN - 7250 LEONBERG 7 BERG ALDE 19 07152 - 41084 (43901

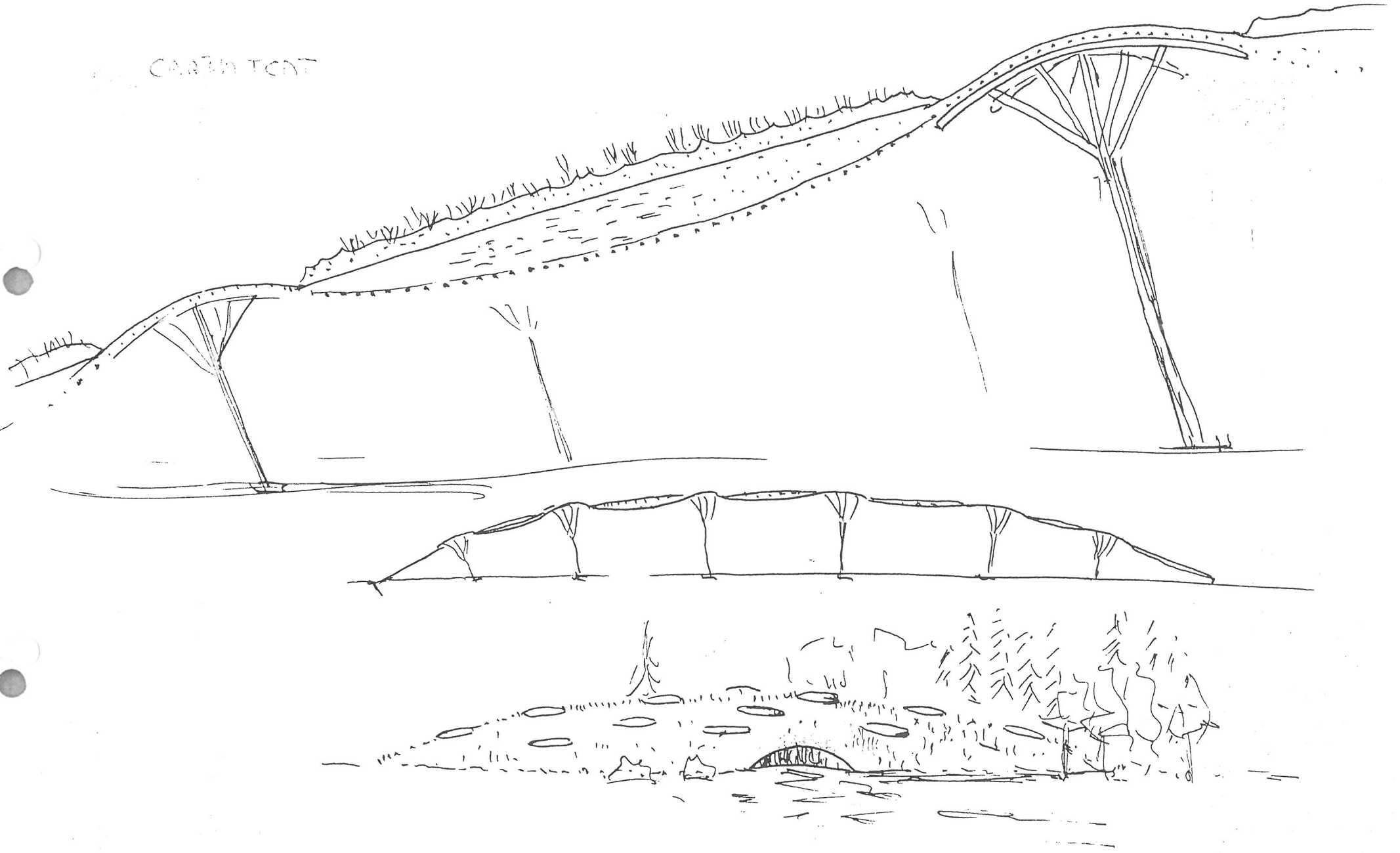
TENTS

ATELIER FREI OT WARMBRONN - 7250 LEONBERG 7 BERG ALDE 19 07152 - 41084 (43908)

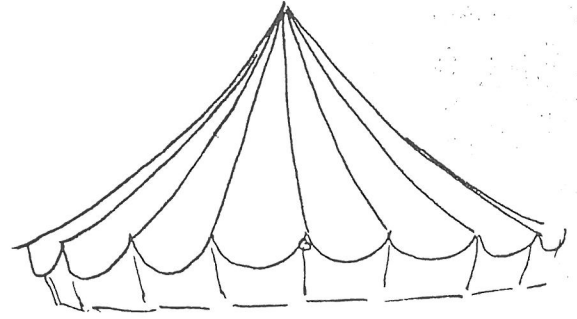
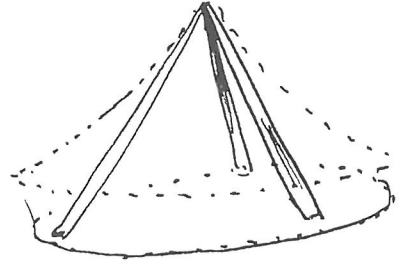
EARTH TREAT



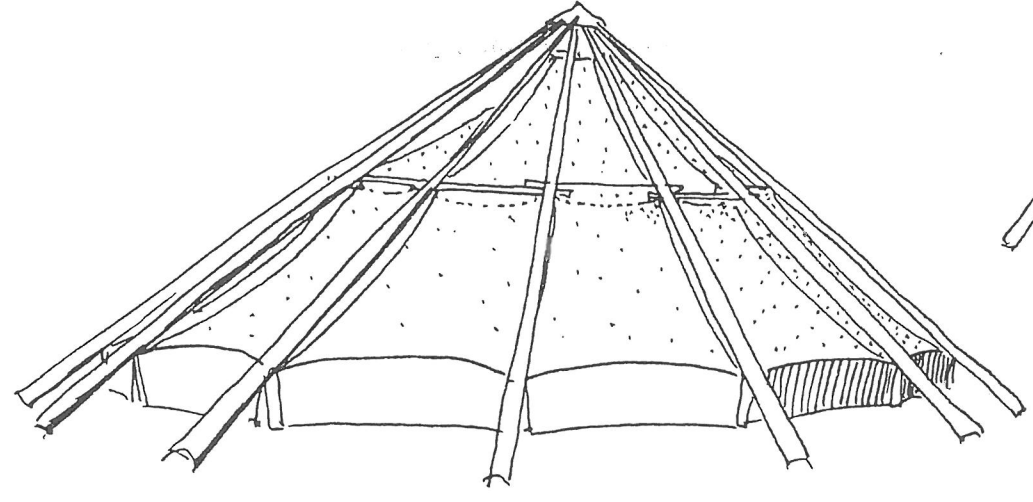
CANTH TENT

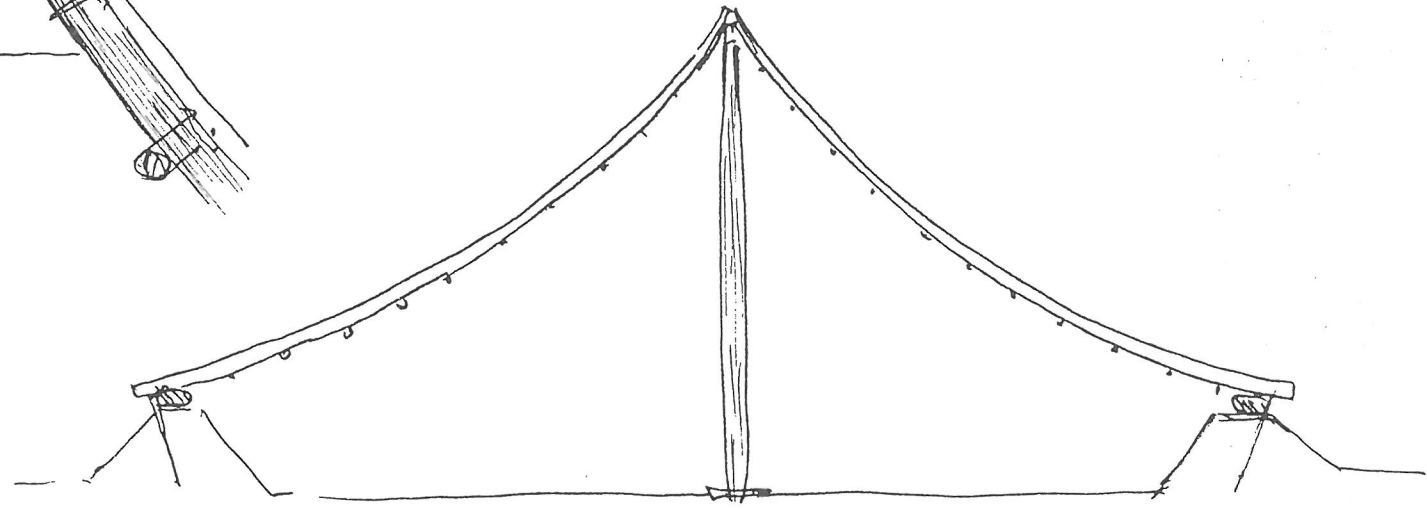
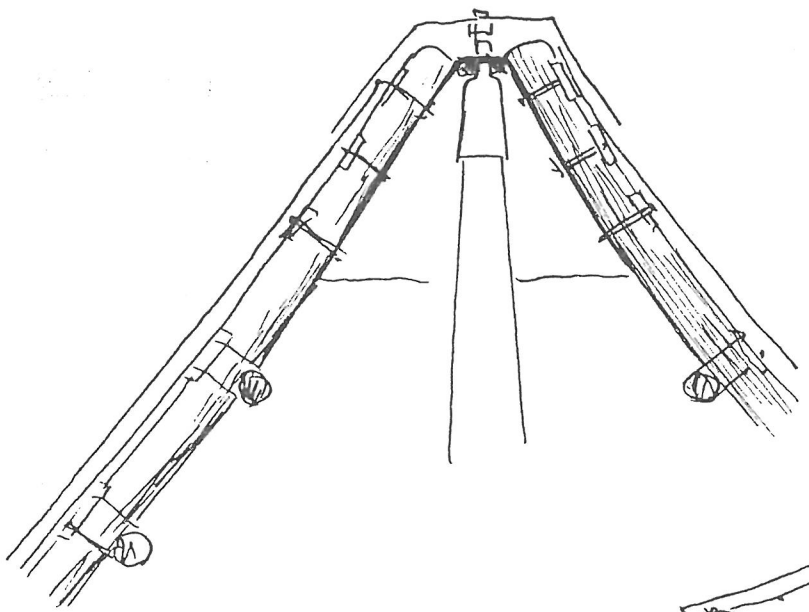


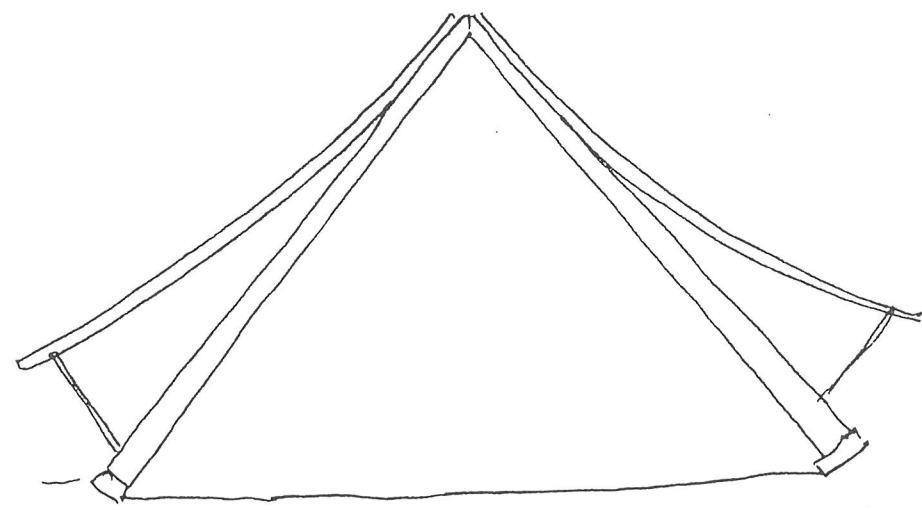
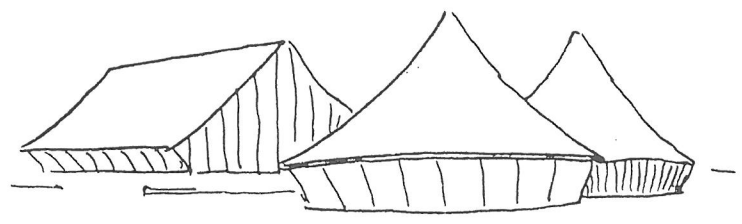
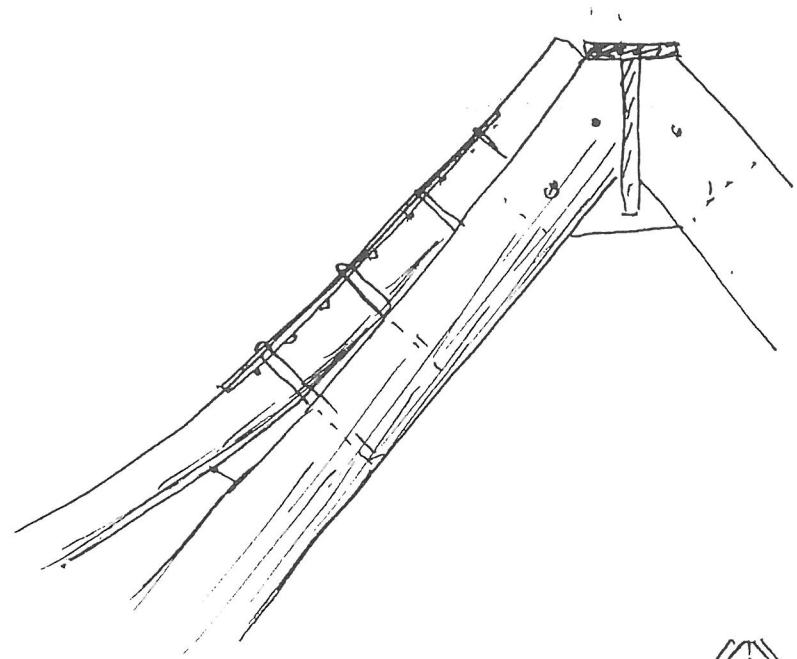
CANVAS + WOOD TENT

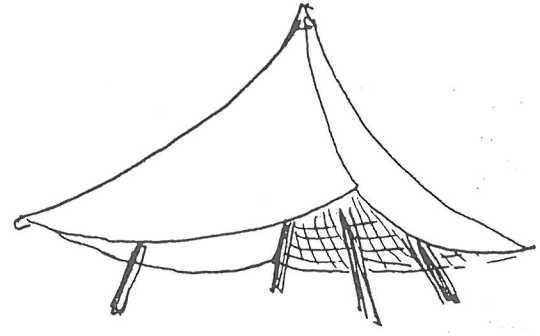
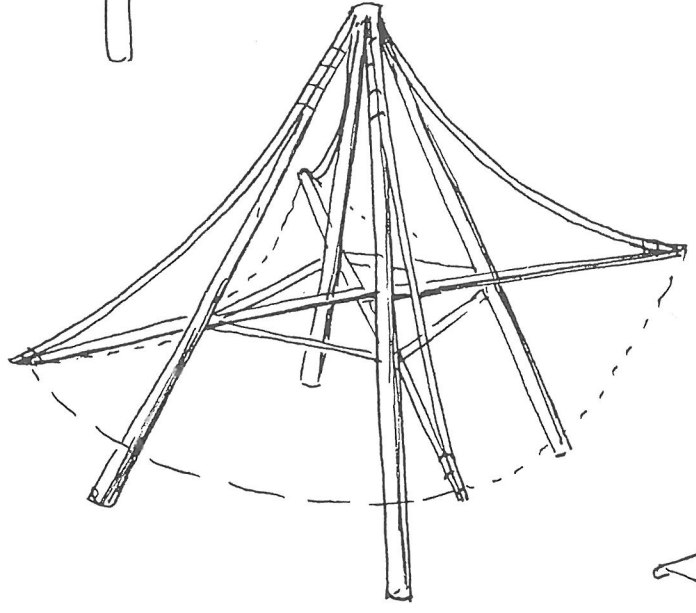
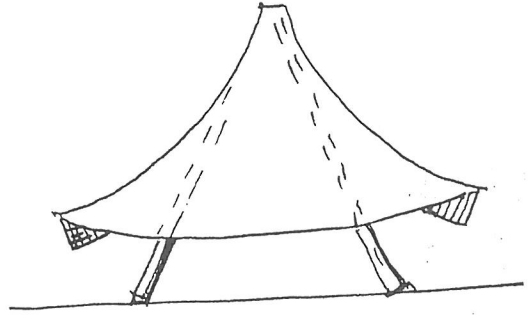
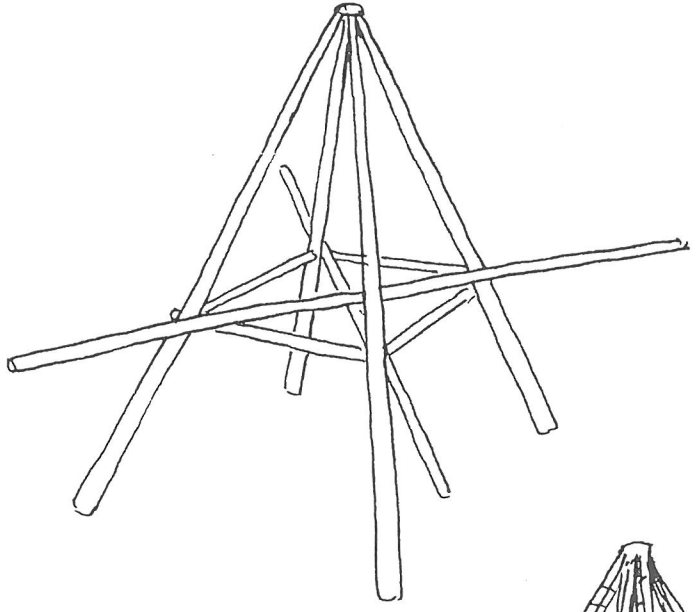


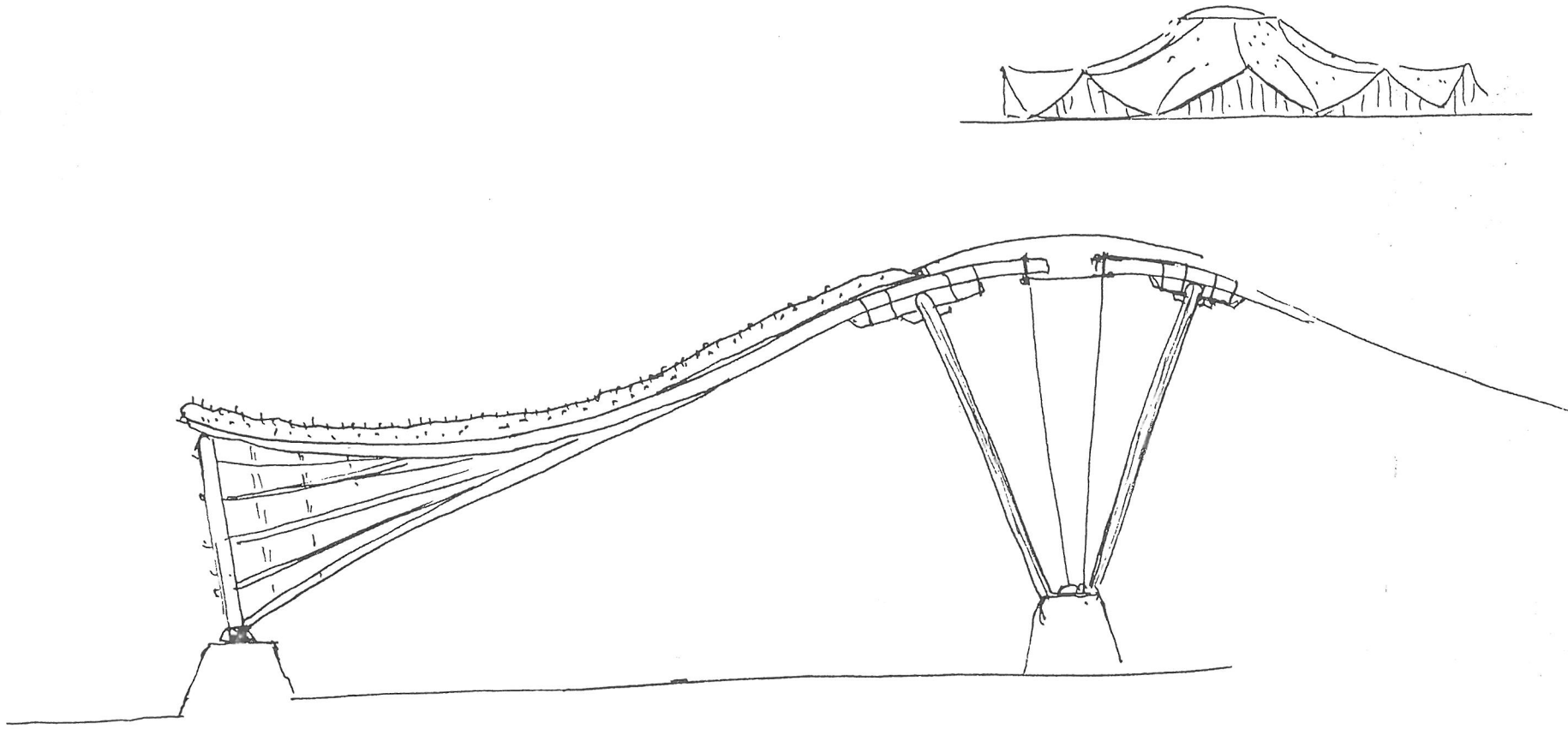
BLOODEH CANVAS



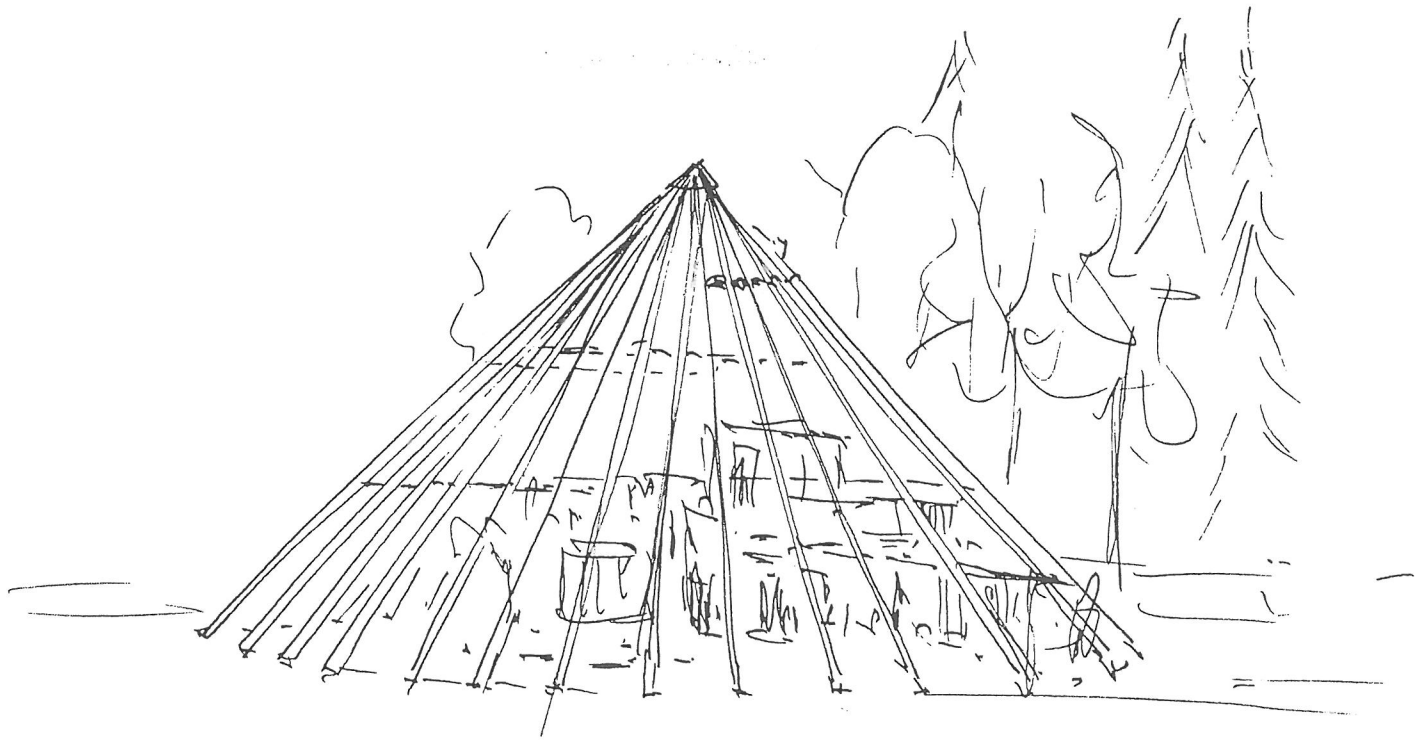


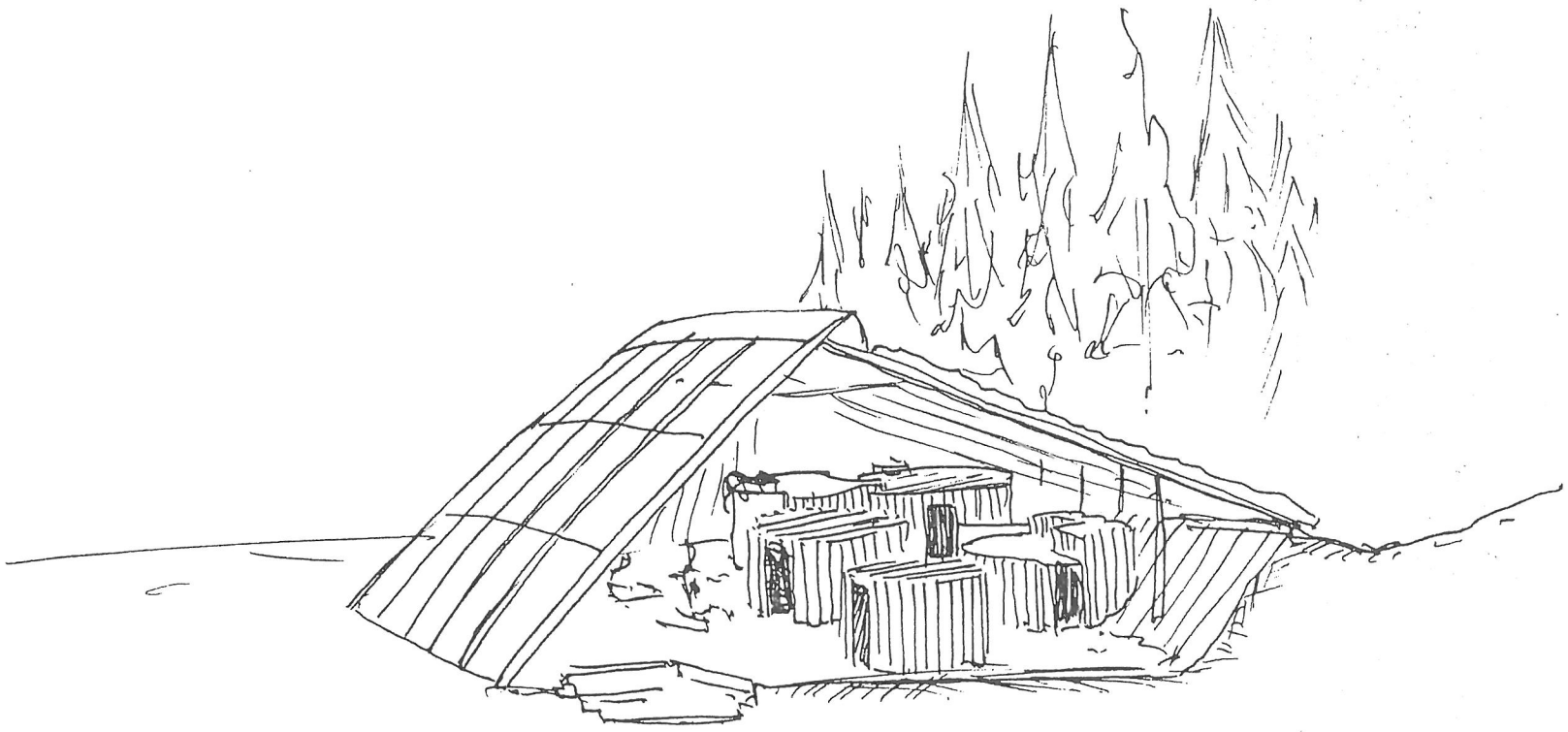




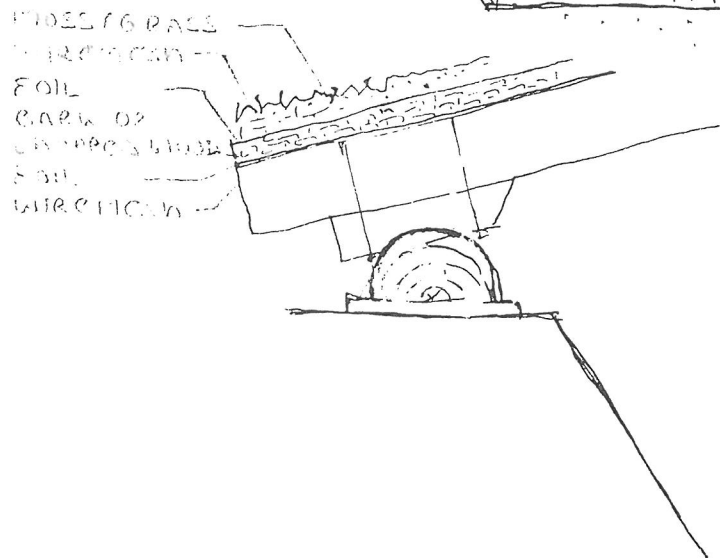
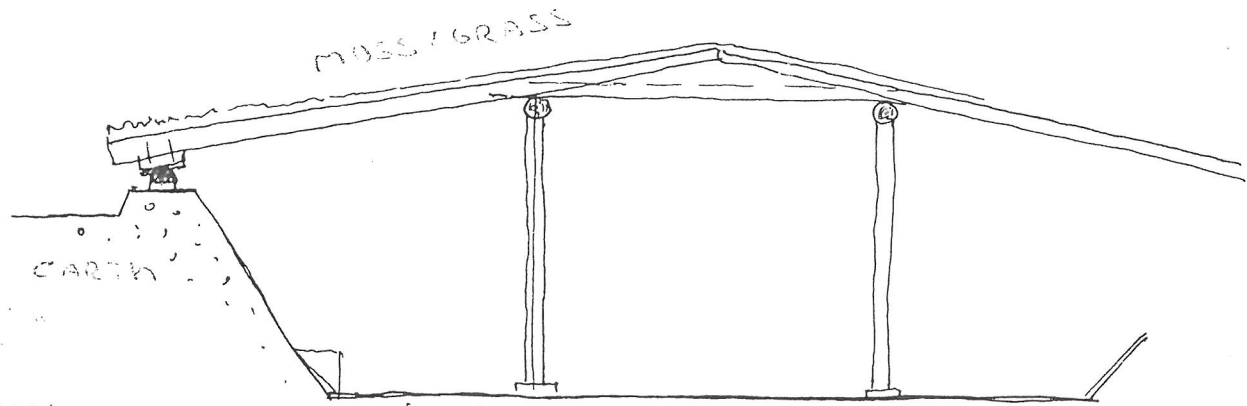


SPECIAL HOUSETYPES





CART HOUSE



ATELIER FREI OT WARMBRONN - 7250 LEONBERG 7 BERG ULDE 19 07152 - 41084 (43908