TREFOREST HYDRO PROPOSED LARINIER
FISH/CANOE PASS - HYDRAULIC BAFFLE DETAILS

UPSTREAM LEVELS

WING WALLS - 47.500 AOD
Q5 - 47.458 AOD
Q10 - 47.237 AOD
Q20 - 46.978 AOD
QMEAN (Turbine @ Full Load) - 46.855 AOD
Q50 (Turbine Running) - 46.804 AOD
Q90 (Turbine Off) - 46.819 AOD

HANDS OFF FLOW Q95 - 46.804 AOD

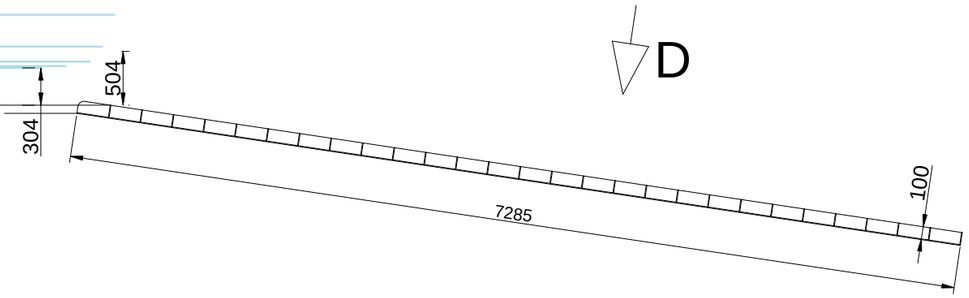
FISH PASS TOP BAFFLE HEIGHT - 46.500 AOD

7.3m (28 Baffle) Larinier fish pass fabricated in 10mm Mild Steel Galvanised(TBC) fully radiused top edges.
Top baffle 20mm thick with 50mm radius on chevron points.
3.0m Overall Pass Width - 5x 0.6m baffle sets.
Designed operating head on top baffle - 0.304m @ Q95
Design Flow - 1.000m^3/s @ 1.30m/s average velocity @ Q95
Baffle height 0.100m
Slope 15% (8.5deg)

Above figures derived from flow charts in EA Fish Pass Manual
GEHO 0910 BTBP-E-E

DOWNSTREAM LEVELS
(After 3rd Baffle Flight)

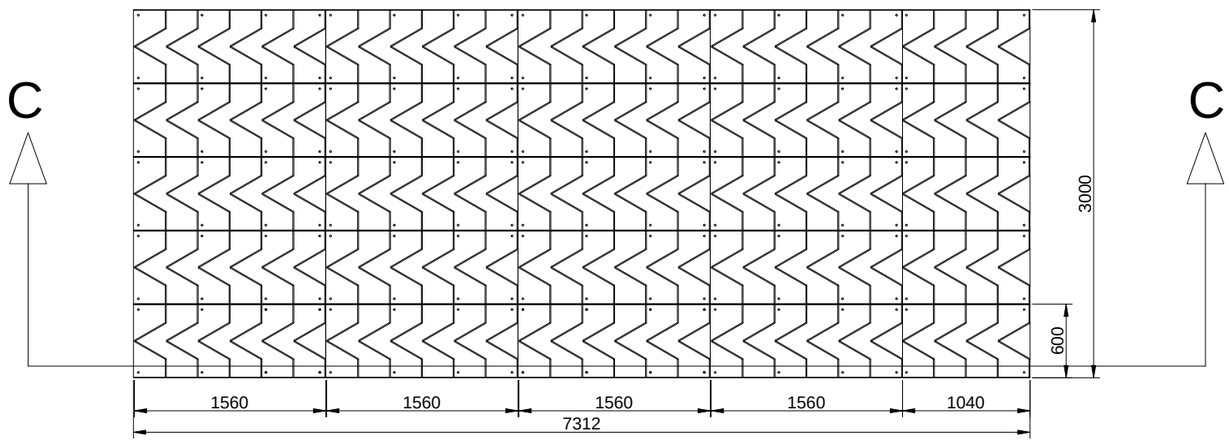
44.590 AOD - Q5
44.390 AOD - Q10
44.119 AOD - Q20
43.970 AOD - QMEAN
43.780 AOD - Q50
43.620 AOD - Q90
43.600 AOD - Q95

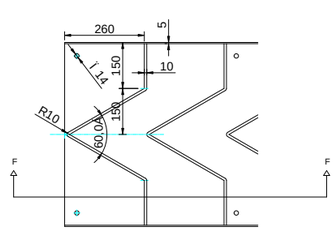


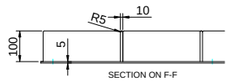
SECTION ON C-C

ALL INDICATED ELEVATIONS IN METRES ABOVE NEWLYN DATUM
REFER TO SPREADSHEET "Treforest Fish Pass Level Calculations" FOR CALCULATIONS

VIEW ON D







DETAIL OF BAFFLES (SCALE 1:20)

BAFFLES FOLDED FROM 100X10 MILD STEEL FLAT BAR
TOP EDGE FULLY RADIUSED
BAFFLES STITCH WELDED TO CHANNEL
CHANNEL IN 5MM MS PLATE
HOT DIP GALVANIZED FINISH

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Client	RCT		
Project	Treforest Hydro		
Title	Fish Pass Baffle Details		
Date	12 03 2025	Dwg No.	TREF-010.4
Scale	1:50 @A3	Sheet No.	1 of 1
Drawn By	JH	Revision	0

Key

0 1 2 3 4m