## Frames (molds) and Top of Plank Dimensions for 16-foot (4.8-metre) gandelow © 2019Sep25 by P. Beautement [inc Tony Daley's advice]

elftship tations	Grey for info only	SPs back from FP FP = 0.00	Half / Full breadths to *Inside of Planks*, plus Top-of-Plank to Top of Floor (mold at *90° to DATUM* at C/L) - decimal inches									Numbers in <b>BLACK</b> are measured from <b>DATUM</b> .
192			Floor	ToP Gar	ToP B-1	ToP B-2	Sheer	Rocker data, actuals, Datum at CL to		Angle data (degrees)		Top of Stem Head is 29.13" above Datum.
	ToPs on Stem at back rabbet (1.5" full breadth)	Back from FP >	14.00	9.50	7.00	5.19 21.63	3.63 26.75		Floor top (+0.75)	Sheer to mold (plan)	Chine angle plus bevel undercut (decimal, fract inch)	Actual LOA, front of cutwater (at head) to rear of stern post (behind the transom) = 192" / 16 feet (4.8-metres) Numbers in <b>GREEN</b> are measured from Top of Floor. KEY: Gar = Garboard. B-1, -2 = Butterfly plank 1 / 2. BR = Back Rabbet. C/L = Centreline. FP = Front perpendiclar. HBr = Half-breadth. HT = height. LoA = Length overall. NoF = Nose of floor. RP = Rear perpendicular. SPs = Station positions. ToF = Tail of floor. ToP = Top of plank. VW = Visible width.
		Tip of floor at 10" (before 3" cut off for stem)	Up from Datum >	11.25						34		
179	At NoF, angled up 4° from horizontal	13.00	0.75 / 1.50 / 0.06	HB / FB / ToP	HB / FB / ToP	HB / FB / ToP	6.50 / 13.00 / 19.06	3.88	4.63	-	70 0.28 1/4+	
167	Stations (18" apart) Number 1	25.00	6.44 / 12.88 / 0.19	8.00 / 16.00 / 5.56	9.75 / 19.50 / 9.88	11.44 / 22.88 / 14.44	13.00 / 26.00 / 18.88	3.13	3.88	24	68 0.283 5/16-	Numbers in <b>BROWN</b> are angles (or their undercut in inches, where shown)
149	2	43.00	11.94 / 23.88 / 0.63	14.00 / 28.00 / 5.38	16.25 / 32.50 / 9.63	18.56 / 37.13 / 14.00	20.63 / 41.25 / 18.31	1.56	2.31	19	64 0.38 3/8-	Chine bevel angle is measured from the edge of the curved top of floor NOT the horizontal. The bevel angle is measured in line with the stations and NOT at the tangent to the curve at the edge of the floor.
131	3	61.00	15.31 / 30.63 / 1.00	17.69 / 35.38 / 5.31	20.38 / 40.75 / 9.38	23.00 / 46.00 / 13.56	25.44 / 50.88 / 17.69	0.63	1.38	11	55 0.50 1/2	The Sheer to Frame angles are in plan view and reflect the curve of the sheer where it meets each frame when viewed from above.
113	4	79.00	16.56 / 33.13 / 1.19	19.06 / 38.13 / 5.25	22.06 / 44.13 / 8.94	24.81 / 49.63 / 12.94	27.50 / 55.00 / 16.94	0.31	1.06	3	53 0.56 9/16	My strongback Datum, ie the lowest part of underside of floor, is 20" (50.8cm) above the concrete surface of the workshop (but you can change this to what suits you).
95	5	97.00	16.50 / 33.00 / 1.16	19.06 / 38.13 / 5.25	21.94 / 43.88 / 8.63	24.94 / 49.88 / 12.63	27.63 / 55.25 / 16.56	0.00	0.75	2	52 0.515 9/16+	Floor planks are 0.75" (20mm) thick. Floor made from 3 x 7.63" plus 2 x 5.63" wide planks (total width 34.16" before bevelling). Length 174" overall before the 3" tips are removed.
77	6	115.00	15.88 / 31.75 / 1.09	18.00 / 36.00 / 4.63	20.69 / 41.38 / 8.38	23.53 / 47.06 / 12.38	26.19 / 52.38 / 16.38	0.13	0.88	7	54 0.56 9/16-	In the floor width column, the third number reflects the curve of the floor edge above the top of floor at the centreline (diagram to follow).
59	7	133.00	14.19 / 28.38 / 0.88	15.88 / 31.75 / 4.38	18.50 / 37.00 / 8.25	21.38 / 42.75 / 12.13	23.94 / 47.88 / 16.31	0.50	1.25	9	59 0.44 7/16	
41	8	151.00	11.13 / 22.25 / 0.56	12.38 / 24.75 / 4.88	15.44 / 30.88 / 8.50	18.56 / 37.13 / 12.00	21.00 / 42.00 / 16.25	1.25	2.00	11	67 0.31 5/16	Side planks blanks are 0.63" (16mm) thick, 7.75" wide (19.7cm) and 18 feet (5.4m) long. Given the 0.88" landing and a 4.75" (12.1cm) visual width (VW) x 4 planks = 19" (48.25cm) high at the middle.
23	9	169.00	5.69 / 11.38 / 0.16	7.75 / 15.50 / 6.44	11.31 / 22.63 / 9.56	14.94 / 29.88 / 12.25	17.81 / 35.63 / 16.50	2.50	3.25	12	70 0.263 1/4+	This doesn't allow for the extra width (top to bottom) needed for scribing plank's 'banana' shape.
11	At ToF angled up 5° from horizontal	181.00 (tip at 184)	0.75 / 1.50 / 0.06	Set by transom	Set by transom	Set by transom	15.50 / 31.00 / 17.06	4.00	4.75	-	78 0.19 3/16	Centre of Effort is 7' 9.63" and Centre of Bouyancy is 7' 11.18" from stem.
	At outer rear edge of transom	Varies	Up from Datum >	0.75 / 1.50 / 15.25	6.44 / 12.88 / 16.88	10.81 / 21.63 / 19.13	12.44 / 24.88 / 23.63			13	-	Transom bevels for: standing, sheer, butterfly and stern post rabbet dimensions - see new 16-foot Gandelow Plans (PDF) for details.
0	RP at Stem post is 192" from FP	Forward from RP >	11.34	8.38	7.25	6.25	3.50	Top of Stern Post is 25.31" above Datum.				