

Mainsail: 7001212 AI -1 Mercedes Clipper fullbatt Mainsail.des

Design Info
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Design File:
\\NAS\Engineering files\Queenie-Customer Order\Fareast Sails\2024 Orders\Need to be Confirmed\7001212 AI\70012

Initial Design Date: 9/1/2024
Boat:

Comments:

Client:

Design Data
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Main

Measurements

Luff geodesic: 11.730m
 Leech geodesic: 12.285m
 Foot geodesic: 3.840m
 Head geodesic: 0.115m
 Upper width (MUW): 0.765m
 Three-quarter width (MTW): 1.393m
 Half width (MHW): 2.421m
 Quarter width (MQW): 3.223m
 Foot median: 11.981m
 ORC Mainsail area: 26.449m?
 Surface area: 27.119m?
 Clew height: 0.100m
 Mast rake: 0.000m

Battens

Position	Length	Roach	Angle	Luff	Leech	Full
80.000%	1.213m	0.264m	73.777?	9.379m	9.794m	Full
60.000%	2.091m	0.343m	73.777?	7.034m	7.346m	Full
40.000%	2.804m	0.302m	73.777?	4.689m	4.897m	Full
20.000%	3.373m	0.174m	73.777?	2.344m	2.449m	Full

Reefing Points

- 1, Luff: 1.349m ; Leech: 1.388m ; Offset: 0.000m ; Number Eyelets: 3
- 2, Luff: 2.756m ; Leech: 2.833m ; Offset: 0.000m ; Number Eyelets: 3
- 3, Luff: 4.398m ; Leech: 4.524m ; Offset: 0.000m ; Number Eyelets: 2
- 4, Luff: 6.509m ; Leech: 6.710m ; Offset: 0.000m ; Number Eyelets: 2

Draft Stripes

- 1, Luff: 3.870m ; Leech: 3.903m ;
- 2, Luff: 7.740m ; Leech: 7.946m ;

Luff Slides

- 1, Position: 0.781m
- 2, Position: 1.563m
- 3, Position: 3.126m
- 4, Position: 3.907m
- 5, Position: 5.470m
- 6, Position: 6.252m
- 7, Position: 7.815m
- 8, Position: 8.597m
- 9, Position: 10.163m
- 10, Position: 10.946m

Luff Curve

		Fanned Luff (@ 5.00% [0.191m])	Before BSeam
11.730m,	0.000m	100% (11.730m) :	0.000m
10.268m,	-0.027m	90% (10.557m) :	0.046m
8.797m,	-0.046m	80% (9.384m) :	0.085m
7.323m,	-0.055m	70% (8.211m) :	0.112m
5.865m,	-0.056m	60% (7.038m) :	0.126m
4.371m,	-0.052m	50% (5.865m) :	0.129m
2.932m,	-0.041m	40% (4.692m) :	0.123m
1.462m,	-0.023m	30% (3.519m) :	0.105m
0.000m,	0.000m	20% (2.346m) :	0.076m
		10% (1.173m) :	0.038m
		0% (0.000m) :	0.000m

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Seam Allowances			
Zone:	Split	Radial	Cross
1	0.030m	0.030m	0.030m

Edge Excesses			
Sail:	Luff	Leech	Foot
	0.000m	0.000m	0.000m

Total Seam Lengths (m)

Horizontal	23.87
Radial/Vertical	0.00
Bi-Radial Split	0.00

Materials

Material	Area (m ²)	Panels
Material 1	27.12	1,2,3,4,5 6,7,8,9,10 11

