



ORC

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2020
ORC Club
Certificate

Rating Office

Offshore
Racing
Congress



Certificate

Number **US6470**
Issued On **02/06/2020**
ORC Ref **03410000JL**
VPP Ver. **2020 1.01**
Valid until **31/12/2020**

Crew Weight

Default 718kg
Maximum **718kg**
Minimum* **539kg**
**when applied by the NoR and SI*
Non Manual Pwr **No**

Special Scoring

	ToD	ToT
Non Spin GPH	671.4	0.8937
Non Spin OSN	646.1	0.9287

Sails Limitations

Headsails **5** Spinnakers **4**

Asymmetric on centerline

Spinnaker configuration
Symmetric: **No**
Asymmetric: **Yes 110.85**
Flying H/S: **No**
Spin. Pole: **No**

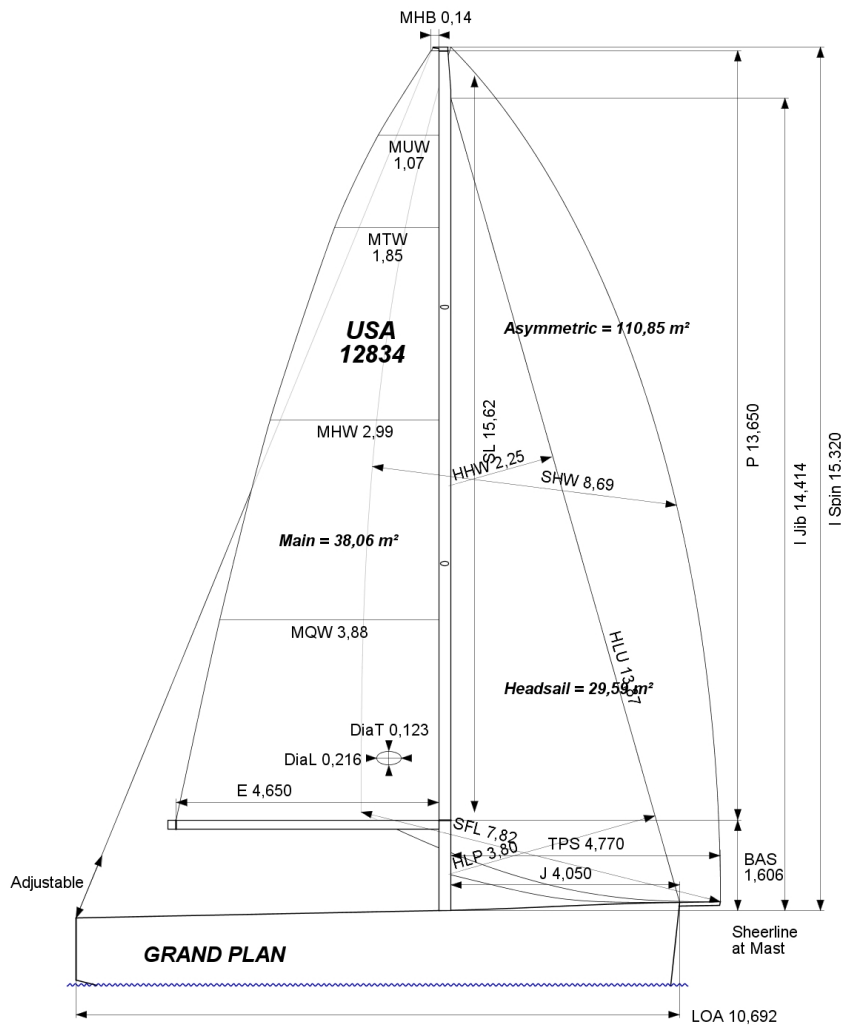
Class Division Length

CDL = 9.502

Stability (Estimated)

Limit Positive Stab.: **118.1°**
Stability Index: **120.5**

Owner



BOAT	GPH	HULL
Name GRAND PLAN Sail Nr USA 12834	625.9	Data File US6470 LOA 10.692m Offset File gs3418sr2.0.off MB 3.600m Displacement 6,428kg Draft 2.221m
CLASS Class GRAND SOLEIL 34 Designer Skyron Builder Cantiere Del Prado Series 01/2019 Age Date 01/2019 Age Allowance 0.033%		IMS Division Cruiser/Racer Dynamic All. 0.240% Plan Review Construction Cored Fiber Rigging No Aramid Core No Crew Arm Ex Carbon Rudder No Light Stanchions
COMMENTS		IMSL 10.355m VCGD 0.147m Sink 22.21kg/mm RL 8.648m VCGM 0.083m WS 28.59m² LSM0 10.301m Displacement/Length ratio 5.8808
PROPELLER Installation Strut PRD 0.420 Type Folding 2 blades PBW 0.100 PIPA 0.0037		Water Ballast 0 Trim Tab BLR Index 0.0000
		CENTERBOARD N/A
SCORING OPTIONS		
	COASTAL / LONG DISTANCE	WINDWARD / LEEWARD
Time on Distance	606.4	681.1
Time on Time	0.9895	0.9910
Triple Number	Low Medium High	Low Medium High
Time on Distance	728.0 551.2 488.3	945.5 686.1 591.0
Time on Time	0.9272 1.2245 1.3824	0.7139 0.9838 1.1421

2020

ORC Club Certificate Appendix

BOAT							
Name	GRAND PLAN	Certificate Number			US6470		
Sail Nr	USA 12834	Issued On			02/06/2020		

TIME ALLOWANCES							
Wind Velocity	6 kt	8 kt	10 kt	12 kt	14 kt	16 kt	20 kt
Beat VMG	1110.3	909.8	793.9	718.0	685.2	675.8	670.1
52°	721.5	604.8	536.4	500.1	484.9	480.2	478.4
60°	680.9	575.2	516.8	488.1	473.4	467.0	464.0
75°	653.3	552.7	502.0	479.1	462.7	450.1	438.9
90°	630.3	524.3	480.4	465.0	457.3	445.2	417.0
110°	621.5	515.9	474.1	449.2	427.7	414.6	394.1
120°	640.7	528.1	480.4	453.9	428.4	404.2	373.1
135°	718.6	579.4	504.8	471.8	447.7	422.9	375.0
150°	850.9	675.1	571.1	511.8	484.6	464.6	425.8
Run VMG	982.5	779.5	659.4	591.0	557.3	513.7	464.0
Selected Courses							
Windward / Leeward	1046.4	844.7	726.7	654.5	621.3	594.8	567.1
Circular Random	870.9	699.3	606.6	552.5	519.4	498.0	471.4
Coastal / Long Distance	1040.0	790.9	652.1	568.6	528.6	497.2	448.7
Non Spinnaker	957.0	759.1	649.5	583.6	542.4	515.8	485.0

Velocity Prediction in Knots for True Wind Speeds							
Wind Velocity	6 kt	8 kt	10 kt	12 kt	14 kt	16 kt	20 kt
Beat Angles	43.1°	41.3°	40.5°	39.8°	38.6°	38.3°	37.9°
Beat VMG	3.24	3.96	4.53	5.01	5.25	5.33	5.37
52°	4.99	5.95	6.71	7.20	7.42	7.50	7.52
60°	5.29	6.26	6.97	7.37	7.60	7.71	7.76
75°	5.51	6.51	7.17	7.51	7.78	8.00	8.20
90°	5.71	6.87	7.49	7.74	7.87	8.09	8.63
110°	5.79	6.98	7.59	8.01	8.42	8.68	9.14
120°	5.62	6.82	7.49	7.93	8.40	8.91	9.65
135°	5.01	6.21	7.13	7.63	8.04	8.51	9.60
150°	4.23	5.33	6.30	7.03	7.43	7.75	8.46
Run VMG	3.66	4.62	5.46	6.09	6.46	7.01	7.76
Gybe Angles	144.0°	147.5°	147.0°	149.0°	151.5°	175.0°	178.0°