



ORC
Offshore Racing Congress
World leader in rating technology

2020
ORC Club
Certificate

Rating Office

EYU
Purje 8
11911, Tallinn
Estonia

Certificate

Number **EST571**
Issued On **4/22/2020**
ORC Ref **03580000HEO**
VPP Ver. **2020 1.01**
Valid until **31/12/2020**

Crew Weight

Default	649kg
Maximum	810kg
Minimum*	608kg

*when applied by the NoR and SI

Non Manual Pwr **No**

Special Scoring

	ToD	ToT
Non Spin GPH	661.0	0.9077
Non Spin OSN	639.9	0.9376

Sails Limitations

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

Spinnaker configuration

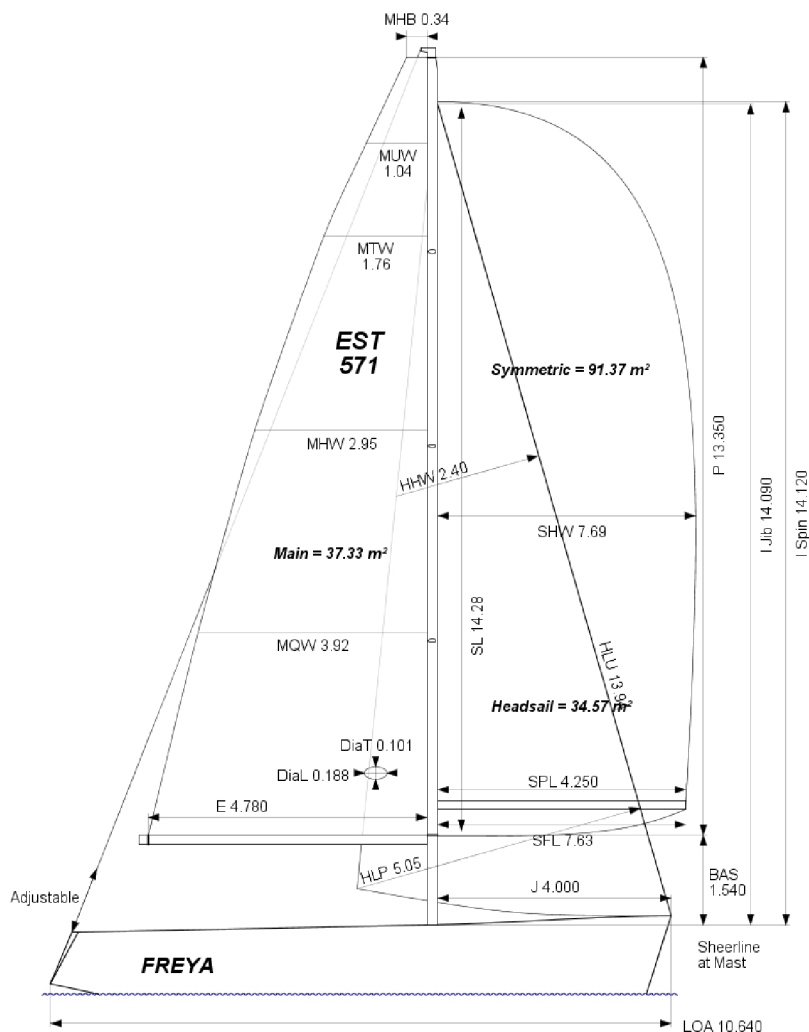
Symmetric: **Yes** **91.37**
Asymmetric: **No**
Flying H/S: **No**
Spin. Pole: **Yes**

Class Division Length

CDL = 9.185

Stability (Measured)

Limit Positive Stab.: **113.4°**
Stability Index: **115.8**



BOAT			GPH		HULL		
Name FREYA Sail Nr EST 571			629.2		Data File Est0571	LOA 10.640m	
					Offset File F196.BOF	MB 3.458m	
					Displacement 5,792kg	Draft 2.233m	
CLASS					IMS Division Cruiser/Racer	Dynamic All. 0.180%	
Class First 36.7					Plan Review	Construction Solid	
Designer B.Farr					Fiber Rigging No	Aramid Core No	
Builder Beneteau S.A.					Crew Arm Ex	Carbon Rudder No	
Series 01/2001					Light Stanchions		
Age Date 07/2008					IMSL 9.630m	VCGD 0.136m	
Age Allowance 0.487%					RL 8.747m	VCGM 0.114m	
					WS 25.46m		
COMMENTS					LSM0 9.595m	Displacement/Length ratio	
					Water Ballast	Trim Tab No	
					BLR Index 0.0000		
PROPELLER					CENTERBOARD		
Installation Strut			PRD 0.410	N/A			
Type Folding 2 blades			PBW 0.130				
			PIPA 0.0027				
SCORING OPTIONS							
	COASTAL / LONG DISTANCE				WINDWARD / LEEWARD		
Time on Distance	610.3				677.7		
Time on Time	0.9831				0.9961		
Triple Number	Low	Medium	High	Low	Medium	High	
Time on Distance	722.5	557.1	496.9	931.0	681.8	590.1	
Time on Time	0.9343	1.2117	1.3583	0.7250	0.9900	1.1439	

BOAT										INCLINING TEST AND FREEBOARDS									
Name FREYA					Sail Nr EST 571					Inclining Test Current Inclining									
File Est0571					Data in meters/kilograms					Flotation date 18/05/2009 SG 1.0020									
RIG										FFM 1.315 FF 1.330 SFFP 0.367 FAM 1.040 FA 1.051 SAFFP 10.162									
Forestay Tension Aft Spreaders 3 Inner Stay None Fitted Runners/Checkstays 0 Carbon Mast No Jib Furler No Fiber Rigging No Main Furler No Non-Circular Rigging No Articulated Bowsprit No										W1 76.0 PD1 209.0 WD 10.610 W2 76.0 PD2 210.0 GSA 12.6 W3 76.0 PD3 211.0 RSA 4298.7 W4 76.0 PD4 210.0 PLM 2005.0									
P 13.350 E 4.780 MDT1 0.101 MW 0.188 IG 14.090 J 4.000 MDL1 0.188 GO 0.207 ISP 14.120 SFJ 0.101 MDT2 0.101 BD BAS 1.540 SPL 4.250 MDL2 0.150 MWT 150.00 FSD 0.035 TPS 0.220 TL 0.220 MCG 5.050										LCF from stem on CL / on sheer 5.886 / 6.109 Maximum beam station from stem 6.980 RM Measured 134.3kg·m RM Default 139.9kg·m Limit of positive stability / Stab.Index 113.4° / 115.8 Freeboard at mast at 4.000 1.183									
MIZZEN RIG AND SAILS										PROPELLER									
N/A										Installation Strut PRD 0.410 Type Folding 2 blades PBW 0.130 Twin Screw No PIPA 0.0027									
										ST1 0.042 ST3 0.280 ST2 0.090 ST4 0.090 EDL 2.450									
COMMENTS										MOVABLE BALLAST									
										N/A									
CENTERBOARD																			
										N/A									
SAILS INVENTORY																			
MAINSAIL (1)																			
Id	MHB	MUW	MTW	MHW	MQW	Area	Measurer	Meas.Date	Manufacture	Material	Comment								
4	0.34	1.04	1.76	2.95	3.92	37.33	EST 1	29/07/2015		Unknown									
HEADSAILS (1)																			
Id	HHB	HUW	HTW	HHW	HQW	HLP	HLU	Ovrlp	Area	Btn	Flying	Measurer	Meas.Date	Manufacture	Material	Comment			
4	0.15	0.63	1.16	2.40	3.75	5.05	13.94	126%	34.57	No	EST1	13/05/2012		Unknown					
SYMMETRIC SPINNAKERS (1)																			
Id	SLU	SLE	SL	SHW	SFL	Area	Measurer	Meas.Date	Manufacture	Material	Comment								
3	14.28	14.28	14.28	7.69	7.63	91.37	EST 1	19/05/2011		Unknown									
ASYMMETRIC SPINNAKERS (0)																			
Id	SLU	SLE	SL	SHW	SFL	Area	Kind	Measurer	Meas.Date	Manufacture	Material	Comment							



2020 Measurements Datasheet

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ORC Club Certificate Appendix

BOAT			
Name	FREYA	Certificate Number	EST571
Sail Nr	EST 571	Issued On	4/22/2020

TIME ALLOWANCES							
Wind Velocity	6 kt	8 kt	10 kt	12 kt	14 kt	16 kt	20 kt
Beat VMG	1054.9	878.9	773.1	714.0	693.8	685.6	684.1
52°	692.7	586.9	531.6	507.5	497.4	493.5	491.4
60°	656.3	560.3	517.4	496.9	485.6	480.7	477.6
75°	630.6	542.3	507.1	487.8	473.1	461.9	452.5
90°	638.1	542.8	499.0	480.3	469.1	453.4	429.0
110°	642.9	534.1	492.7	468.2	446.4	430.8	412.1
120°	661.1	545.9	498.1	472.3	448.7	426.2	394.2
135°	727.9	594.5	521.5	489.2	466.0	442.6	399.3
150°	863.1	687.5	582.4	519.7	490.0	468.3	425.8
Run VMG	996.6	793.8	671.9	591.2	536.1	500.4	457.3
Selected Courses							
Windward / Leeward	1025.8	836.3	722.5	652.6	614.9	593.0	570.7
Circular Random	866.5	699.8	610.4	558.5	526.8	506.4	481.7
Coastal / Long Distance	1022.9	785.9	652.6	574.2	536.1	506.8	460.5
Non Spinnaker	923.7	740.2	640.4	581.7	545.6	522.3	494.2

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	42.4°	40.7°	40.5°	38.6°	37.5°	37.9°	37.9°
Beat VMG	3.41	4.10	4.66	5.04	5.19	5.25	5.26
52°	5.20	6.13	6.77	7.09	7.24	7.30	7.33
60°	5.49	6.43	6.96	7.25	7.41	7.49	7.54
75°	5.71	6.64	7.10	7.38	7.61	7.79	7.96
90°	5.64	6.63	7.21	7.50	7.67	7.94	8.39
110°	5.60	6.74	7.31	7.69	8.06	8.36	8.74
120°	5.45	6.60	7.23	7.62	8.02	8.45	9.13
135°	4.95	6.06	6.90	7.36	7.73	8.13	9.02
150°	4.17	5.24	6.18	6.93	7.35	7.69	8.46
Run VMG	3.61	4.54	5.36	6.09	6.72	7.19	7.87
Gybe Angles	145.0°	150.0°	151.0°	157.0°	175.0°	180.0°	180.0°