

2020 ORC Club Certificate

Rating Office

EYU
Purje 8
11911, Tallinn
Estonia

Certificate

Number **Est431**
Issued On **5/18/2020**
ORC Ref **035800001EQ**
VPP Ver. **2020 1.02**
Valid until **31/12/2020**

Crew Weight

Default 298kg
Maximum **298kg**
Minimum* **213kg**
*when applied by the NoR and SI
Non Manual Pwr **No**

Special Scoring

ToD ToT
Non Spin GPH **854.4 0.7022**
Non Spin OSN **821.3 0.7305**

Sails Limitations

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

Spinnaker configuration

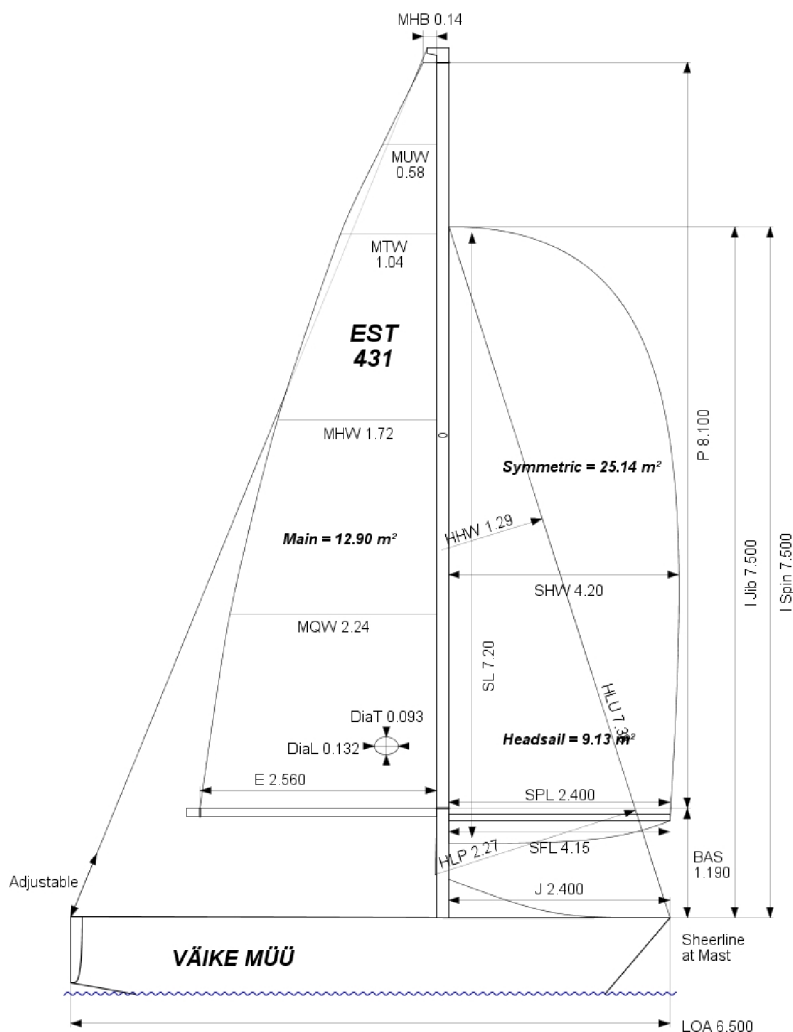
Symmetric: **Yes 25.14**
Asymmetric: **No**
Flying H/S: **No**
Spin. Pole: **Yes**

Class Division Length

CDL = **5.129**

Stability (Estimated)

Limit Positive Stab.: **117.4°**
Stability Index: **109.1**



BOAT		GPH		HULL			
Name Väike Müü		818.2		Data File Est0431		LOA 6.500m	
Sail Nr EST 431				Offset File APHRODITE22.o		MB 2.480m	
				Displacement 1,290kg		Draft 1.355m	
CLASS				IMS Division Cruiser/Racer		Dynamic All. 0.329%	
Class APHRODITE 22				Plan Review		Construction Solid	
Designer				Fiber Rigging No		Aramid Core No	
Builder				Crew Arm Ex		Carbon Rudder No	
Series 01/1993						Light Stanchions No	
Age Date				IMSL 5.577m VCGD -0.081m Sink 7.10kg/mm			
Age Allowance 0.487%				RL 4.681m VCGM -0.011m WS 10.22m			
COMMENTS				LSM0 5.564m Displacement/Length ratio			
Kaal koos päramootoriga				Water Ballast Trim Tab No			
				BLR Index 0.0000			
PROPELLER				CENTERBOARD			
Type No Propeller				N/A			
SCORING OPTIONS							
	COASTAL / LONG DISTANCE			WINDWARD / LEEWARD			
Time on Distance	793.6			881.8			
Time on Time	0.7560			0.7655			
Triple Number	Low	Medium	High	Low	Medium	High	
Time on Distance	940.0	724.3	644.8	1211.2	887.8	772.7	
Time on Time	0.7181	0.9319	1.0469	0.5573	0.7603	0.8736	

BOAT										INCLINING TEST AND FREEBOARDS									
Name Väike Müü					Sail Nr EST 431					Inclining Test Club Estimated VCG									
File Est0431					Data in meters/kilograms					Flotation date 15/10/2019 SG									
RIG Forestay Tension Aft Spreaders 1 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					FFM FF 0.825 SFFP 0.341 FAM FA 0.839 SAFF 6.249 LCF from stem on CL / on sheer 3.666 / 3.845 Maximum beam station from stem 4.625 RM Measured 21.3kg·m RM Default 20.7kg·m Limit of positive stability / Stab.Index 117.4° / 109.1 Freeboard at mast at 2.400 0.826														
MIZZEN RIG AND SAILS N/A					PROPELLER Type No Propeller					Certificate Number Est431 ORC Ref 035800001EQ Issued On 5/18/2020 VPP Ver. 2020 1.02 Valid until 31/12/2020									
COMMENTS Kaal koos pāramootoriga					MOVABLE BALLAST N/A														
					CENTERBOARD N/A														
SAILS INVENTORY																			
MAINSAIL (1)																			
Id	MHB	MUW	MTW	MHW	MQW	Area	Measurer	Meas.Date	Manufacture	Material	Comment								
1	0.14	0.58	1.04	1.72	2.24	12.85													
HEADSAILS (1)																			
Id	HHB	HUW	HTW	HHW	HQW	HLP	HLU	Ovrlp	Area	Btn	Flying	Measurer	Meas.Date	Manufacture	Material	Comment			
1	0.05	0.37	0.73	1.29	1.82	2.27	7.38	95%	9.13		No					Unknow			
SYMMETRIC SPINNAKERS (1)																			
Id	SLU	SLE	SL	SHW	SFL	Area	Measurer	Meas.Date	Manufacture	Material	Comment								
1	7.20	7.20	7.20	4.20	4.15	25.14													
ASYMMETRIC SPINNAKERS (0)																			
Id	SLU	SLE	SL	SHW	SFL	Area	Kind	Measurer	Meas.Date	Manufacture	Material	Comment							



2020 Measurements Datasheet

2020

ORC Club Certificate Appendix

BOAT

Name **Väike Müü**
Sail Nr **EST 431**

Certificate Number **Est431**
Issued On **5/18/2020**

TIME ALLOWANCES

Wind Velocity	6 kt	8 kt	10 kt	12 kt	14 kt	16 kt	20 kt
Beat VMG	1429.4	1195.1	1065.9	976.0	925.4	915.6	946.6
52°	935.2	788.2	709.7	672.8	651.7	642.1	644.9
60°	885.4	748.8	684.5	655.4	635.4	622.2	619.0
75°	850.5	717.3	661.4	635.0	617.8	598.8	575.9
90°	807.4	680.8	634.9	603.8	580.2	569.0	552.4
110°	806.8	681.0	633.7	598.8	566.5	540.2	507.6
120°	836.3	696.5	643.0	609.2	576.1	546.8	499.4
135°	931.6	758.9	670.3	631.1	598.5	567.4	515.0
150°	1072.3	854.7	725.1	660.6	626.5	596.0	541.2
Run VMG	1238.2	981.8	828.9	721.1	662.4	629.0	571.4
Selected Courses							
Windward / Leeward	1333.8	1088.4	947.4	848.5	793.9	772.3	759.0
Circular Random	1128.5	911.0	793.8	725.3	683.6	657.7	630.5
Coastal / Long Distance	1324.2	1019.8	853.9	750.1	692.6	654.6	596.0
Non Spinnaker	1194.0	957.1	827.9	751.7	705.2	676.3	645.6

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	43.5°	42.6°	42.4°	40.9°	39.8°	39.8°	42.2°
Beat VMG	2.52	3.01	3.38	3.69	3.89	3.93	3.80
52°	3.85	4.57	5.07	5.35	5.52	5.61	5.58
60°	4.07	4.81	5.26	5.49	5.67	5.79	5.82
75°	4.23	5.02	5.44	5.67	5.83	6.01	6.25
90°	4.46	5.29	5.67	5.96	6.21	6.33	6.52
110°	4.46	5.29	5.68	6.01	6.35	6.66	7.09
120°	4.30	5.17	5.60	5.91	6.25	6.58	7.21
135°	3.86	4.74	5.37	5.70	6.01	6.34	6.99
150°	3.36	4.21	4.96	5.45	5.75	6.04	6.65
Run VMG	2.91	3.67	4.34	4.99	5.44	5.72	6.30
Gybe Angles	150.0°	155.0°	160.0°	180.0°	180.0°	180.0°	180.0°