



ORC

Offshore Racing Congress
World leader in rating technology

**2019
ORC Club
Certificate**

Rating Office

Hungarian Yachting Association
Istvanmezei ut 1-3
H-1146 Budapest
HUNGARY



Certificate

Number **008/19**
Issued On **18/05/2019**
ORC Ref **HUN10025178**
VPP Ver. **2019 1.01**
Valid until **31/12/2019**

Crew Weight

Default 789kg
Maximum **600kg**
Minimum* **450kg**
**when applied by the NoR and SI*
Non Manual Pwr **No**

Special Scoring

	ToD	ToT
Double H.GPH	605.2	0.9915
Double H.OSN	588.8	1.0190
Non Spin GPH	637.5	0.9412
Non Spin OSN	618.5	0.9701

Sails Limitations

Headsails **1** Spinnakers **4**

Spinnaker configuration

Symmetric: **No**
Asymmetric: **Yes 137.50**
Flying H/S: **No**
Spin. Pole: **Yes**

Class Division Length

CDL = 10.015

Stability (Estimated)

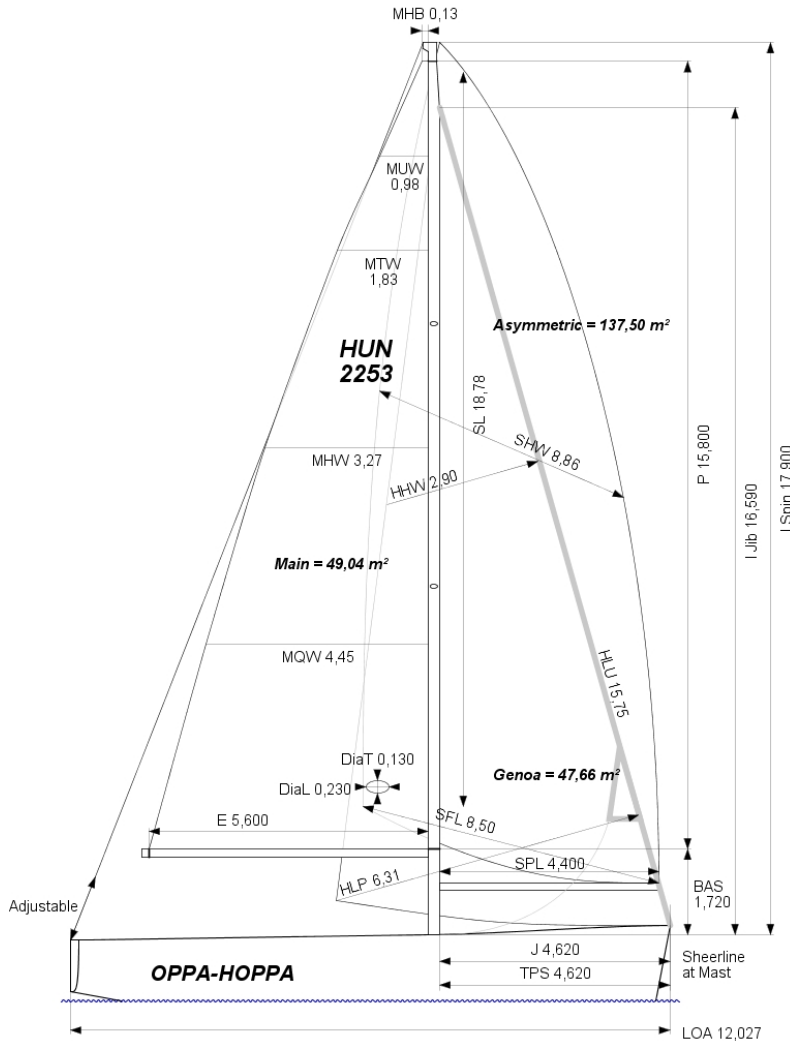
Limit Positive Stab.: **109.4°**
Stability Index: **112.0**

Owner

Laszlo Pozsar
Kellenvolgyi utca 15
HUNGARY

I certify that I understand my responsibilities under ORC Rules and Regulations

Signature



BOAT		GPH		HULL		
Name	Oppa-Hoppa			Data File	HUN2253	
Sail Nr	HUN-2253			Offset File	HS400Eb.off	
		600.7		Displacement	8 400kg	
				LOA	12.027m	
				MB	4.034m	
				Draft	2.054m	
CLASS		IMS Division Cruiser/Racer Dynamic All. 0.202%				
Class	Hanse 400	Fwd Accom.	Yes	Construction	Cored	
Designer	Judel/Vrolijk	Fiber Rigging	No	Aramid Core	No	
Builder	YZ Greifswald	Crew Arm Ex		Carbon Rudder	No	
Series	01/2006			Light Stanchions	No	
Age Date	01/2009	IMSL	11.068m	VCGD	-0.019m	
Age Allowance	0.422%	RL	8.960m	VCGM	0.202m	
		WS	33.78m²	LSM0	10.999m	
		Displacement/Length ratio	6.3128	Water Ballast	0	
COMMENTS		Trim Tab	No	BLR Index	0.0000	
PROPELLER		CENTERBOARD				
Installation	Strut	PRD	0.419	N/A		
Type	Folding 2 blades	PBW	0.110			
		PIPA	0.0035			
SCORING OPTIONS						
	COASTAL / LONG DISTANCE			WINDWARD / LEEWARD		
Time on Distance	583.7			654.7		
Time on Time	1.0280			1.0310		
Triple Number	Low	Medium	High	Low	Medium	High
Time on Distance	693.4	530.5	473.1	901.8	659.1	571.0
Time on Time	0.9734	1.2723	1.4269	0.7485	1.0242	1.1821

2019

ORC Club Certificate Appendix

BOAT

Name	Oppa-Hoppa	Certificate Number	008/19
Sail Nr	HUN-2253	Issued On	18/05/2019

TIME ALLOWANCES

Wind Velocity	6 kt	8 kt	10 kt	12 kt	14 kt	16 kt	20 kt
Beat VMG	1060.8	873.8	767.1	705.4	683.7	675.9	679.7
52°	682.4	573.0	509.7	481.0	471.0	467.1	466.0
60°	638.0	541.2	490.1	467.5	457.1	453.1	451.0
75°	604.3	517.3	476.7	456.7	443.3	434.0	427.1
90°	606.7	505.8	465.3	451.4	439.4	425.3	403.6
110°	597.0	496.9	457.1	435.1	416.5	405.1	388.1
120°	612.1	507.6	462.5	438.0	415.5	395.0	368.6
135°	679.6	553.6	485.1	453.8	431.3	408.8	366.6
150°	805.2	643.2	545.1	485.4	455.7	434.4	393.6
Run VMG	929.8	742.7	629.3	555.4	506.8	469.7	426.6

Selected Courses

Windward / Leeward	995.3	808.3	698.2	630.4	595.3	572.8	553.1
Circular Random	830.9	669.4	582.5	532.1	501.5	482.2	459.8
Coastal / Long Distance	988.8	756.5	626.2	548.7	510.3	480.7	435.6
Non Spinnaker	897.3	716.3	617.2	558.7	522.6	499.6	472.9

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	44.3°	42.7°	42.5°	41.4°	40.5°	40.3°	40.8°
Beat VMG	3.39	4.12	4.69	5.10	5.27	5.33	5.30
52°	5.28	6.28	7.06	7.48	7.64	7.71	7.73
60°	5.64	6.65	7.35	7.70	7.88	7.95	7.98
75°	5.96	6.96	7.55	7.88	8.12	8.30	8.43
90°	5.93	7.12	7.74	7.98	8.19	8.47	8.92
110°	6.03	7.25	7.88	8.27	8.64	8.89	9.28
120°	5.88	7.09	7.78	8.22	8.66	9.11	9.77
135°	5.30	6.50	7.42	7.93	8.35	8.81	9.82
150°	4.47	5.60	6.60	7.42	7.90	8.29	9.15
Run VMG	3.87	4.85	5.72	6.48	7.10	7.67	8.44
Gybe Angles	142.0°	148.5°	150.4°	155.2°	167.7°	180.0°	180.0°