



**ORC**

Offshore Racing Congress  
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**2020  
ORC Club  
Certificate**

**Rating Office**

**Offshore  
Racing  
Congress**



**Certificate**

Number **US6593**  
Issued On **20/08/2020**  
ORC Ref **03410000QD**  
VPP Ver. **2020 1.02**  
Valid until **31/12/2020**

**Crew Weight**

Default 674kg  
Maximum **650kg**  
Minimum\* **488kg**  
*\*when applied by the NoR and SI*  
Non Manual Pwr **No**

**Special Scoring**

	ToD	ToT
Non Spin GPH	<b>571.2</b>	<b>1.0504</b>
Non Spin OSN	<b>558.4</b>	<b>1.0745</b>

**Sails Limitations**

Headsails **6** Spinnakers **4**

**Asymmetric on centerline**

**Spinnaker configuration**  
Symmetric: **No**  
Asymmetric: **Yes 120.20**  
Flying H/S: **Yes 48.23**  
Spin. Pole: **No**

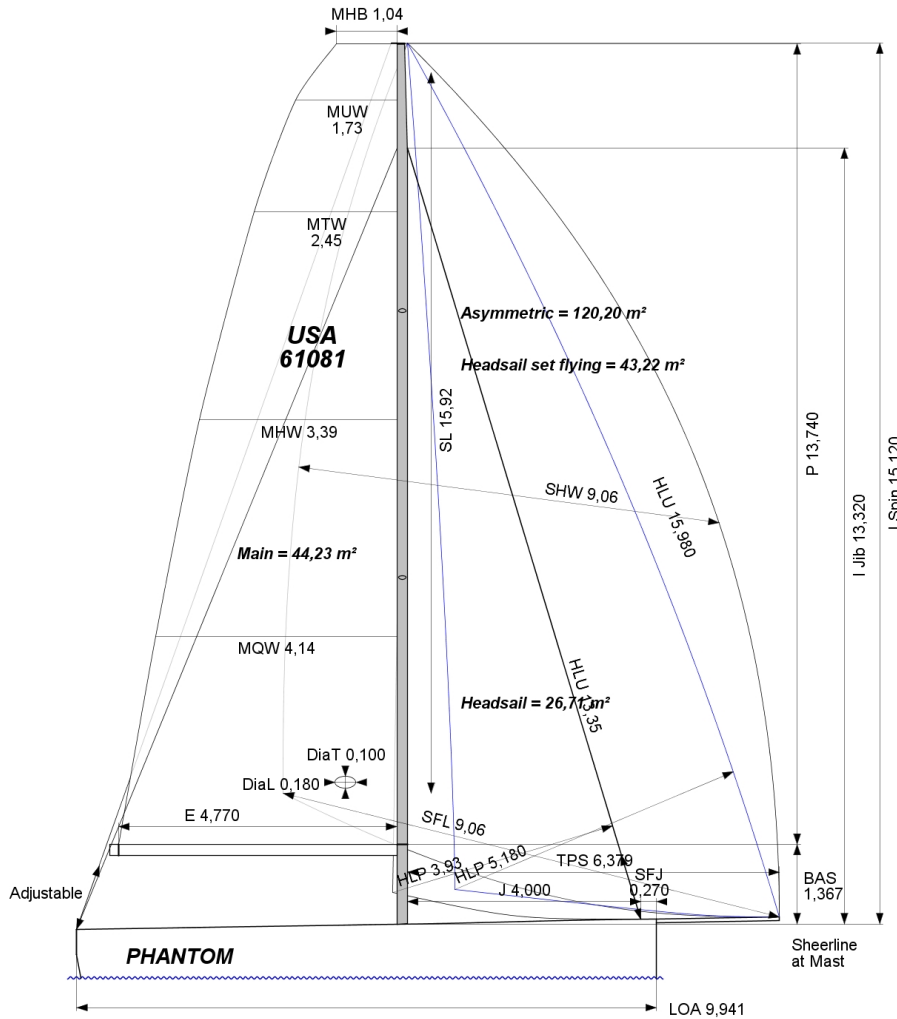
**Class Division Length**

**CDL = 10.292**

**Stability (Estimated)**

Limit Positive Stab.: **122.9°**  
Stability Index: **117.3**

**Owner**



BOAT	GPH	HULL
Name <b>PHANTOM</b> Sail Nr <b>USA 61081</b>	<b>525.1</b>	Data File <b>US6593</b> LOA <b>9.941m</b> Offset File <b>xtreme32.off</b> MB <b>3.178m</b> Displacement <b>2,316kg</b> Draft <b>2.486m</b>
<b>CLASS</b> Class <b>X-Treme 32</b> Designer <b>Reichel &amp; Pugh</b> Builder <b>G-Force</b> Series <b>01/2018</b> Age Date <b>01/2018</b> Age Allowance <b>0.065%</b>		IMS Division <b>Performance</b> Dynamic All. <b>0.000%</b> Plan Review Construction <b>Cored</b> Fiber Rigging <b>No</b> Aramid Core <b>No</b> Crew Arm Ex Carbon Rudder <b>No</b> Light Stanchions <b>No</b>
<b>COMMENTS</b>		IMSL <b>9.999m</b> VCGD <b>-0.400m</b> Sink <b>15.65kg/mm</b> RL <b>10.584m</b> VCGM <b>-0.405m</b> WS <b>19.41m²</b> LSM0 <b>9.857m</b> Displacement/Length ratio <b>2.4183</b>
<b>PROPELLER</b> Installation <b>Strut</b> PRD <b>0.300</b> Type <b>Folding 2 blades</b> PBW <b>0.090</b> PIPA <b>0.0032</b>		Water Ballast <b>0</b> Trim Tab <b>No</b> BLR Index <b>0.0000</b>
		<b>CENTERBOARD</b> <b>N/A</b>
<b>SCORING OPTIONS</b>		
	<b>COASTAL / LONG DISTANCE</b>	<b>WINDWARD / LEEWARD</b>
Time on Distance	<b>516.2</b>	<b>584.0</b>
Time on Time	<b>1.1624</b>	<b>1.1559</b>
Triple Number	Low Medium High	Low Medium High
Time on Distance	<b>585.6 474.3 409.0</b>	<b>753.8 593.5 504.4</b>
Time on Time	<b>1.1527 1.4230 1.6505</b>	<b>0.8955 1.1373 1.3381</b>

# 2020

## ORC Club Certificate Appendix

<b>BOAT</b>			
Name	<b>PHANTOM</b>	Certificate Number	<b>US6593</b>
Sail Nr	<b>USA 61081</b>	Issued On	<b>20/08/2020</b>

<b>TIME ALLOWANCES</b>							
Wind Velocity	6 kt	8 kt	10 kt	12 kt	14 kt	16 kt	20 kt
Beat VMG	<b>823.9</b>	<b>713.1</b>	<b>667.5</b>	<b>649.1</b>	<b>634.8</b>	<b>624.5</b>	<b>622.4</b>
52°	<b>538.0</b>	<b>491.8</b>	<b>474.5</b>	<b>464.6</b>	<b>458.3</b>	<b>445.3</b>	<b>436.9</b>
60°	<b>511.5</b>	<b>474.7</b>	<b>456.8</b>	<b>443.2</b>	<b>432.7</b>	<b>423.9</b>	<b>410.2</b>
75°	<b>493.5</b>	<b>450.1</b>	<b>423.5</b>	<b>407.0</b>	<b>395.5</b>	<b>387.1</b>	<b>367.7</b>
90°	<b>490.4</b>	<b>443.8</b>	<b>402.8</b>	<b>381.9</b>	<b>366.9</b>	<b>354.3</b>	<b>339.5</b>
110°	<b>519.2</b>	<b>459.5</b>	<b>416.5</b>	<b>386.4</b>	<b>350.1</b>	<b>324.3</b>	<b>292.2</b>
120°	<b>537.2</b>	<b>464.4</b>	<b>410.8</b>	<b>376.8</b>	<b>349.7</b>	<b>321.4</b>	<b>281.0</b>
135°	<b>597.7</b>	<b>490.8</b>	<b>440.3</b>	<b>387.8</b>	<b>339.6</b>	<b>303.7</b>	<b>259.5</b>
150°	<b>714.2</b>	<b>565.9</b>	<b>488.9</b>	<b>446.1</b>	<b>397.9</b>	<b>351.4</b>	<b>266.9</b>
Run VMG	<b>824.7</b>	<b>653.5</b>	<b>567.0</b>	<b>515.1</b>	<b>459.4</b>	<b>405.8</b>	<b>308.2</b>
<b>Selected Courses</b>							
Windward / Leeward	<b>824.3</b>	<b>683.3</b>	<b>617.3</b>	<b>582.1</b>	<b>547.1</b>	<b>515.2</b>	<b>465.3</b>
Circular Random	<b>707.0</b>	<b>580.0</b>	<b>511.9</b>	<b>470.2</b>	<b>441.0</b>	<b>418.3</b>	<b>383.4</b>
Coastal / Long Distance	<b>824.3</b>	<b>644.1</b>	<b>555.4</b>	<b>500.1</b>	<b>458.6</b>	<b>420.4</b>	<b>360.5</b>
Non Spinnaker	<b>790.9</b>	<b>638.2</b>	<b>554.9</b>	<b>504.3</b>	<b>470.4</b>	<b>445.5</b>	<b>409.3</b>

<b>Velocity Prediction in Knots for True Wind Speeds</b>							
Wind Velocity	6 kt	8 kt	10 kt	12 kt	14 kt	16 kt	20 kt
Beat Angles	<b>42.9°</b>	<b>39.8°</b>	<b>37.5°</b>	<b>36.9°</b>	<b>36.0°</b>	<b>35.9°</b>	<b>36.4°</b>
Beat VMG	<b>4.37</b>	<b>5.05</b>	<b>5.39</b>	<b>5.55</b>	<b>5.67</b>	<b>5.76</b>	<b>5.78</b>
52°	<b>6.69</b>	<b>7.32</b>	<b>7.59</b>	<b>7.75</b>	<b>7.86</b>	<b>8.08</b>	<b>8.24</b>
60°	<b>7.04</b>	<b>7.58</b>	<b>7.88</b>	<b>8.12</b>	<b>8.32</b>	<b>8.49</b>	<b>8.78</b>
75°	<b>7.29</b>	<b>8.00</b>	<b>8.50</b>	<b>8.85</b>	<b>9.10</b>	<b>9.30</b>	<b>9.79</b>
90°	<b>7.34</b>	<b>8.11</b>	<b>8.94</b>	<b>9.43</b>	<b>9.81</b>	<b>10.16</b>	<b>10.60</b>
110°	<b>6.93</b>	<b>7.83</b>	<b>8.64</b>	<b>9.32</b>	<b>10.28</b>	<b>11.10</b>	<b>12.32</b>
120°	<b>6.70</b>	<b>7.75</b>	<b>8.76</b>	<b>9.55</b>	<b>10.30</b>	<b>11.20</b>	<b>12.81</b>
135°	<b>6.02</b>	<b>7.33</b>	<b>8.18</b>	<b>9.28</b>	<b>10.60</b>	<b>11.86</b>	<b>13.87</b>
150°	<b>5.04</b>	<b>6.36</b>	<b>7.36</b>	<b>8.07</b>	<b>9.05</b>	<b>10.24</b>	<b>13.49</b>
Run VMG	<b>4.37</b>	<b>5.51</b>	<b>6.35</b>	<b>6.99</b>	<b>7.84</b>	<b>8.87</b>	<b>11.68</b>
Gybe Angles	<b>142.0°</b>	<b>145.5°</b>	<b>152.0°</b>	<b>149.8°</b>	<b>145.5°</b>	<b>145.5°</b>	<b>143.6°</b>