

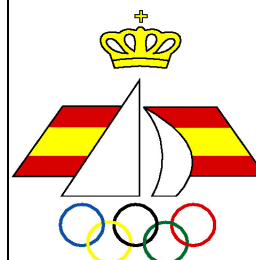


World Leader in Rating Technology

## 2017 ORC Club Certificate

### Oficina de emisión

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### Certificado

Numero **002101**  
emitido **23/02/2017**  
ORC Ref **ESP00021661**  
VPP Ver. **2017 1.00**  
Valid hasta **31/12/2017**

### Peso de tripulación

Declarado **400kg**  
Defecto **543kg**  
Winches electrico **No**

### Special Scoring

	ToD	ToT
Red.GPH	<b>674,9</b>	<b>0,8890</b>
Red.OSN	<b>662,2</b>	<b>0,9061</b>
Sin Spin GPH	<b>686,0</b>	<b>0,8746</b>
Sin Spin OSN	<b>671,0</b>	<b>0,8942</b>

### Limites de velas

Velas proa **1** Spinaker **3**

### Dacron Sails

Configuración de Spinaker  
Simetrico **Si** **68,84**  
Asimetrico **No**  
Volante H/S: **No**  
Tangón **Si**

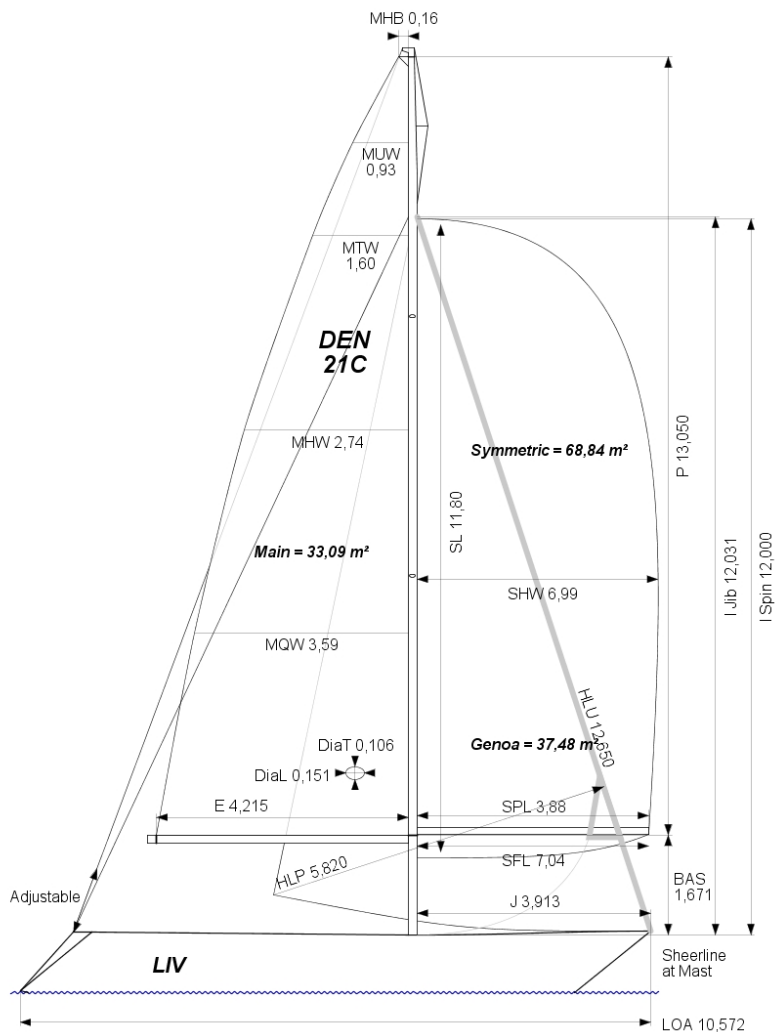
### Class division Length

**CDL = 7,754**

### Stability (Estimated)

Limit Positive Stab.: **124,9°**  
Indice de estabilidad **129,6**

### Armador



BARCO
Nombre <b>LIV</b> N. Vela <b>DEN-21_C</b>

GPH
<b>669,3</b>

casco	
Fichero dxt <b>DEN21_C</b>	LOA <b>10,572m</b>
Fichero Casco <b>ATHENA34.OFF</b>	Manga <b>2,930m</b>
Desplazamient <b>4.554kg</b>	Calado <b>1,768m</b>

MODELO
Modelo <b>ATHENA34</b>
Diseñador <b>SOEDERGREN</b>
Constructor
Fecha de la Serie <b>01/1982</b>
fecha de Botadura <b>01/1982</b>
Bonificación <b>0,487%</b>

Division IMS <b>Crucero/regat</b>	Dynamy c All. <b>0,070%</b>
Acom. Proa <b>Si</b>	Construcción <b>Sandwich</b>
Aparejo Fibra <b>No</b>	Nido de Abeja <b>No</b>
Crew Arm Ex	Timón Carbono <b>No</b>
	Pulpitos ligeros

IMSL <b>8,458m</b>	VCGD <b>-0,157m</b>	Sink <b>14,45kg/mm</b>
RL <b>7,049m</b>	VCGM <b>-0,090m</b>	WS <b>20,70m²</b>
LSM0 <b>8,472m</b>	Displacement/Length ratio <b>7,4892</b>	

Comentario

Tanque <b>0</b>	Trim Tab <b>No</b>
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Helice	
Instalación <b>Z Sumergida</b>	PRD <b>0,425</b>
Tipo <b>Plegable 2 palas</b>	PBW <b>0,105</b>
	PIPA <b>0,0033</b>

Centerboard
<b>N/A</b>

Opciones de clasificaciones	COSTERA/LARGA DISTANCIA			Barlovento/Sotavento		
	Tiempo x Distancia	<b>655,3</b>			<b>730,5</b>	
Tiempo x Tiempo	<b>0,9156</b>			<b>0,9241</b>		
Triple Number	Bajo	Medio	Alto	Bajo	Medio	Alto
Time on Distance	<b>749,7</b>	<b>597,7</b>	<b>542,6</b>	<b>971,1</b>	<b>734,3</b>	<b>644,5</b>
Time on Time	<b>0,9004</b>	<b>1,1294</b>	<b>1,2439</b>	<b>0,6951</b>	<b>0,9192</b>	<b>1,0473</b>



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## ORC Club Certificate Appendix

<b>BARCO</b>	
Nombre <b>LIV</b>	Número certificado <b>002101</b>
N. Vela <b>DEN-21_C</b>	emitido <b>23/02/2017</b>

<b>VPP S/M</b>							
Velocidad del viento	6 kt	8 kt	10 kt	12 kt	14 kt	16 kt	20 kt
Beat VMG	<b>1072,9</b>	<b>913,4</b>	<b>832,9</b>	<b>795,4</b>	<b>776,3</b>	<b>768,6</b>	<b>756,7</b>
52°	<b>705,1</b>	<b>600,6</b>	<b>561,7</b>	<b>548,8</b>	<b>542,6</b>	<b>538,9</b>	<b>533,5</b>
60°	<b>664,6</b>	<b>573,8</b>	<b>544,6</b>	<b>533,5</b>	<b>527,7</b>	<b>524,3</b>	<b>519,5</b>
75°	<b>628,9</b>	<b>556,1</b>	<b>530,9</b>	<b>515,9</b>	<b>506,9</b>	<b>501,3</b>	<b>496,8</b>
90°	<b>629,3</b>	<b>554,5</b>	<b>527,9</b>	<b>510,0</b>	<b>494,5</b>	<b>481,8</b>	<b>470,7</b>
110°	<b>675,5</b>	<b>566,2</b>	<b>528,1</b>	<b>503,9</b>	<b>487,2</b>	<b>476,2</b>	<b>461,1</b>
120°	<b>698,6</b>	<b>579,5</b>	<b>534,5</b>	<b>509,6</b>	<b>485,8</b>	<b>463,6</b>	<b>443,2</b>
135°	<b>772,1</b>	<b>635,8</b>	<b>558,1</b>	<b>526,6</b>	<b>503,6</b>	<b>480,0</b>	<b>436,0</b>
150°	<b>915,3</b>	<b>728,8</b>	<b>618,5</b>	<b>554,1</b>	<b>525,6</b>	<b>503,8</b>	<b>459,6</b>
Run VMG	<b>1056,9</b>	<b>841,4</b>	<b>711,9</b>	<b>622,8</b>	<b>562,8</b>	<b>531,3</b>	<b>488,0</b>

<b>Recorridos</b>							
Barlovento/Sotavento	<b>1064,9</b>	<b>877,4</b>	<b>772,4</b>	<b>709,1</b>	<b>669,6</b>	<b>649,9</b>	<b>622,4</b>
Circular random	<b>905,1</b>	<b>738,0</b>	<b>650,3</b>	<b>600,7</b>	<b>570,9</b>	<b>551,7</b>	<b>527,3</b>
Ocean for PCS	<b>1113,5</b>	<b>868,1</b>	<b>731,0</b>	<b>648,0</b>	<b>594,5</b>	<b>557,4</b>	<b>505,9</b>
Sin Spinaker	<b>935,3</b>	<b>759,3</b>	<b>666,1</b>	<b>612,7</b>	<b>580,3</b>	<b>559,4</b>	<b>533,4</b>

<b>Predicción de Velocidad en Nudos para Viento Real</b>							
Velocidad del viento	6 kt	8 kt	10 kt	12 kt	14 kt	16 kt	20 kt
Beat Angles	<b>42,7°</b>	<b>42,6°</b>	<b>42,3°</b>	<b>41,0°</b>	<b>40,0°</b>	<b>39,7°</b>	<b>39,4°</b>
Beat VMG	<b>3,36</b>	<b>3,94</b>	<b>4,32</b>	<b>4,53</b>	<b>4,64</b>	<b>4,68</b>	<b>4,76</b>
52°	<b>5,11</b>	<b>5,99</b>	<b>6,41</b>	<b>6,56</b>	<b>6,63</b>	<b>6,68</b>	<b>6,75</b>
60°	<b>5,42</b>	<b>6,27</b>	<b>6,61</b>	<b>6,75</b>	<b>6,82</b>	<b>6,87</b>	<b>6,93</b>
75°	<b>5,72</b>	<b>6,47</b>	<b>6,78</b>	<b>6,98</b>	<b>7,10</b>	<b>7,18</b>	<b>7,25</b>
90°	<b>5,72</b>	<b>6,49</b>	<b>6,82</b>	<b>7,06</b>	<b>7,28</b>	<b>7,47</b>	<b>7,65</b>
110°	<b>5,33</b>	<b>6,36</b>	<b>6,82</b>	<b>7,14</b>	<b>7,39</b>	<b>7,56</b>	<b>7,81</b>
120°	<b>5,15</b>	<b>6,21</b>	<b>6,74</b>	<b>7,06</b>	<b>7,41</b>	<b>7,77</b>	<b>8,12</b>
135°	<b>4,66</b>	<b>5,66</b>	<b>6,45</b>	<b>6,84</b>	<b>7,15</b>	<b>7,50</b>	<b>8,26</b>
150°	<b>3,93</b>	<b>4,94</b>	<b>5,82</b>	<b>6,50</b>	<b>6,85</b>	<b>7,15</b>	<b>7,83</b>
Run VMG	<b>3,41</b>	<b>4,28</b>	<b>5,06</b>	<b>5,78</b>	<b>6,40</b>	<b>6,78</b>	<b>7,38</b>
Gybe Angle	<b>146,7°</b>	<b>151,9°</b>	<b>152,4°</b>	<b>162,6°</b>	<b>180,0°</b>	<b>180,0°</b>	<b>180,0°</b>