

# **Technical description floating Hotel Suites**

**Milford Marina**

**Milford Haven, Wales**

**Building on Water v.o.f.**

Amsterdam

February 21th, 2018

## Contents

	page
Concrete hull	3
Superstructure	3
Interior finish	4
Gangway	4
Plumbing services	5
Sewage pump	5
Mechanical ventilation	5
Heating	5
Sanitary standard model	6
Sanitary DDA compliant model	6
Electrical installation	7
Warranties	8
Annex 1 sanitary	7
Annex 2 towel radiator + thermostat RF	12
Annex 3 ventilation unit	13
Annex 4 electrical switches + wall sockets	14
Annex 5 emergency unit	15
Annex 6 lighting	16

### **Concrete hull**

- Calculations will be made by structural engineer
- Concrete
  - C35/45 XC3 – F4 Spramex, class 2
- Steel reinforcement
  - FeB 500, ribbed
  - Double steel net according to calculations of structural engineer
- Wall 150 mm
- Floor 210 mm
- Length 9.000 mm
- Width 4.000 mm
- Height external 1300 mm
- Fender 40 x 90 mm
- Inside the hull 2 support timber frame walls with 2 openings

### **Superstructure (wind- & waterproof)**

- Timber frame
  - SLS 38x235mm
- OSB 9mm on both end faces
  - Vapor permeable foil
  - 240mm glass wool
  - Insulation U value 0,222 W/m2K
  - Vapor tight foil
  - Fiber reinforced gypsum board 12,5mm
- Hull not insulated, natural ventilated
- Floor
  - Timber beams, dimensions to be calculated by structural engineer
  - V313 floor panels
  - Glass wool insulation
  - 1 hatch
- Cladding
  - Horizontal
    - Dumowood, rhombus 92mm and 144mm
    - 10mm openings
    - Colours NCS 3020-Y30R, 420-Y30R and 5020-30R
  - Vertical
    - Dumowood, channel sidings and double rhombus
    - Colour RAL9001
- Roof
  - Steel corrugated profile
  - Insulation U value 0,1667 W/m2K
  - PVC single membrane, colour close to RAL7042
- Overhang terrace / outside ceiling
  - HPL Panels, screw fixed
- Windows and front door
  - PVC
  - Outside HLS colour coating, colour RAL9001
  - Inside standard white
  - Front door colour RAL7039

- Glazing
  - HR++
  - Glass tint t.b.d.

### **Interior finish**

- Internal walls

#### **Timber frame**

- Insulation
- Fibre reinforced gypsum board 12,5mm
- Flattened
- Non-woven, fibre reinforced wallpaper
- Colour white RAL9010
- Ceiling
  - Gypsum board 9,5mm
  - Flattened
  - Non-woven, fibre reinforced wallpaper
  - Colour white RAL9010
- Interior door
  - Wood
  - Painted white RAL9010
- Floor bedroom
  - Laminate, “light oak” or similar
  - Plinths included
- Terrace
  - Hardwood flat planks
  - Railing powder-coated steel bars, colour white RAL9001

### **Gangway**

- 1.000mm wide and length t.b.d. on site
- One-sided railing, powder-coated steel bars (like terrace), colour white RAL9001
- Deck hardwood flat planks (mind periodical maintenance to avoid fouling)

### **Plumbing Services**

- 2 “indoor rainwater downpipes” (behind external cladding)
- Roof gland for mechanical ventilation
- Roof gland for aeration sewer
- Utility connecting plate on outside of concrete hull
- Sewage installation in accordance with NEN 3215 en NPR 3216, pipes in grey PVC
  - 1 connection for toilet
  - 1 connection for sink
  - 1 connection for shower
- Aeration sewage pump
- Water piping synthetic, fabrication Rehau
  - 1 connection for toilet
  - 1 connection for sink
  - 1 connection for shower

### **Sewage pump**

- 1 sewage pump, KSB type U1-60D including non-return valve and disconnector
- High-pressure PVC sewage pipe, diameter 63 mm

### **Ventilation**

- Mechanical ventilation will be installed in the bathroom.
- Ventilator Vent type Axia

### **Heating**

- Hot water is provided by an electronic heater Luxus Electronic type Hand 12 kW
- Heating bathroom 1 electrical radiator + Vasco towel warmer
- Heating hotel room 2 electrical radiators Adax Neo lux white \* 2 \* 1.400 Watt
- 1 thermostat RF

## **Sanitary Standard Model**

### **Toilet**

- Geberit concealed cistern system
- Geberit flush plate
- Sphinx 300 wall closet, including toilet seat and lid
- Toilet roll holder

### **Sink**

- Sphinx 300 sink 600mm
- Sphinx 300 planchet
- Mirror ø600mm
- Grohe faucet

### **Shower**

- Wisa shower tray
- Shower screen
- Grohe thermostat
  
- Vasco towel radiator

## **Sanitary DDA Compliant Model**

### **Toilet**

- Geberit concealed cistern system for the purpose of disabled people
- Geberit flush plate
- Sphinx 280 disabled wall closet, including toilet seat, no lid
- Toilet roll holder
- 1 Norm fold up bracket
- 1 Norm fixed bracket

### **Sink**

- Hewi S50 adjustable sink
- Hewi S50 mirror module
- Venlo faucet

### **Shower**

- Norm corner bracket with guide rod
- Venlo shower thermostat set
- Ideal hand-shower
- Shower hose
- Shower seat
- ACO drain
  
- Vasco towel radiator

## Electrical installation

- Electrical installation accordance with NEN 1010
- The main connection will be a CEE 32A 5p 400V
- The distribution box including safety breaker (ground leak switch) will be installed near the entrance
- All switches and other material Gira Event White
- Entrance
  - 1 switch for ceiling light near entrance
  - 1 recessed ceiling light, LED
  - 1 single wall socket next to switch
  - 1 outdoor lamp with dimmer switch
  - 1 lighted sign emergency exit above door
- Living / Bedroom
  - 1 switch for ceiling lights above bed
  - 1 switch for ceiling lights near sliding doors
  - 1 switch for outside ceiling lights
  - 5 recessed ceiling lights, LED
  - 1 recessed emergency ceiling light
  - 2 double wall sockets including USB sockets (left and right of bed)
  - 1 single wall socket for TV
  - 1 TV socket UK-standard
  - 1 double wall socket including USB sockets above desk
  - 1 double wall socket above desk (for refrigerator and water heater)
  - 1 smoke detector
- Terrace
  - 2 recessed ceiling lights outside, LED
- Bathroom
  - 1 switch for ceiling light
  - 1 switch for light behind mirror
  - 2 recessed ceiling lights, LED
  - 1 single wall socket near sink
  - Light behind mirror
- Cellar
  - 1 ceiling light TL
  - 1 switch for ceiling light on hatch
- Distribution box
  - 1 wall socket for ventilation unit
  - 1 double wall socket
  - 1 power supply for hot water unit
  - Main switch
  - Ground leak switches

**Warranties**

- Concrete hull & superstructure : 10 years
- PVC roof membrane : 10 years
- Hinges doors & windows : 1 year
- KSB sewage pump : 1 year
- Mechanical ventilation : 2 years
- Electrical installation : 2 years
- HR++ glazing (condense, leakage) : 10 years



## Annex 1 sanitary



## Annex 1 sanitary



## Annex 1 sanitary



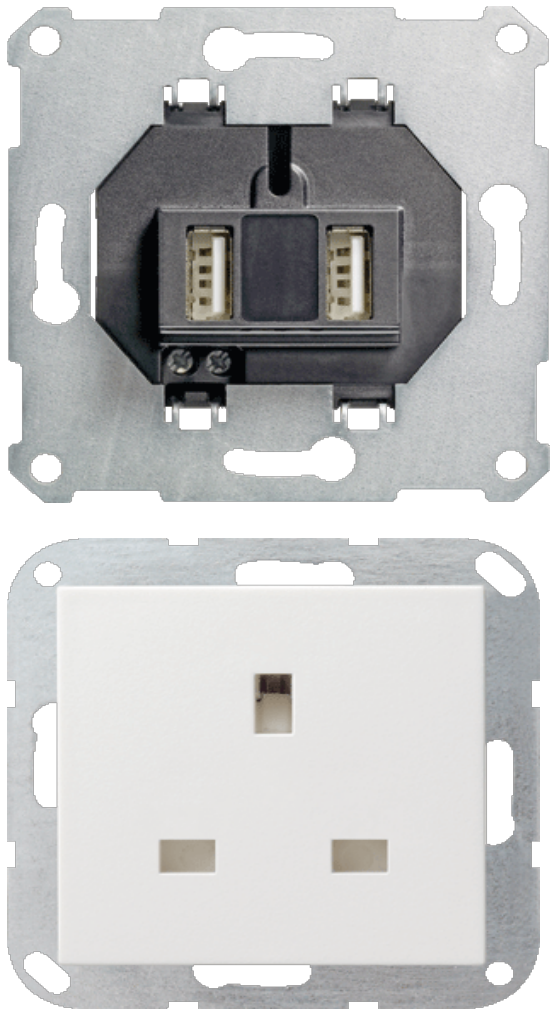
## Annex 2 towel radiator + thermostat RF



### Annex 3 ventilation unit



#### Annex 4 electrical switches + wall sockets



## Annex 5 emergency unit

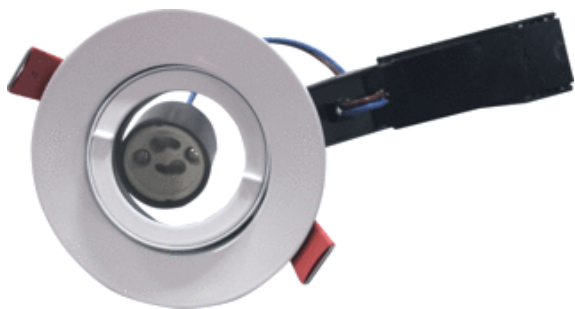


## Annex 6 lighting

1 x outdoor lamp



2 x bathroom 12 V. white ( led)



1 x bathroom (near mirror)



6 x room + entrance 230 V chrome ( led)



2 x outside terrace 230 V dark grey

