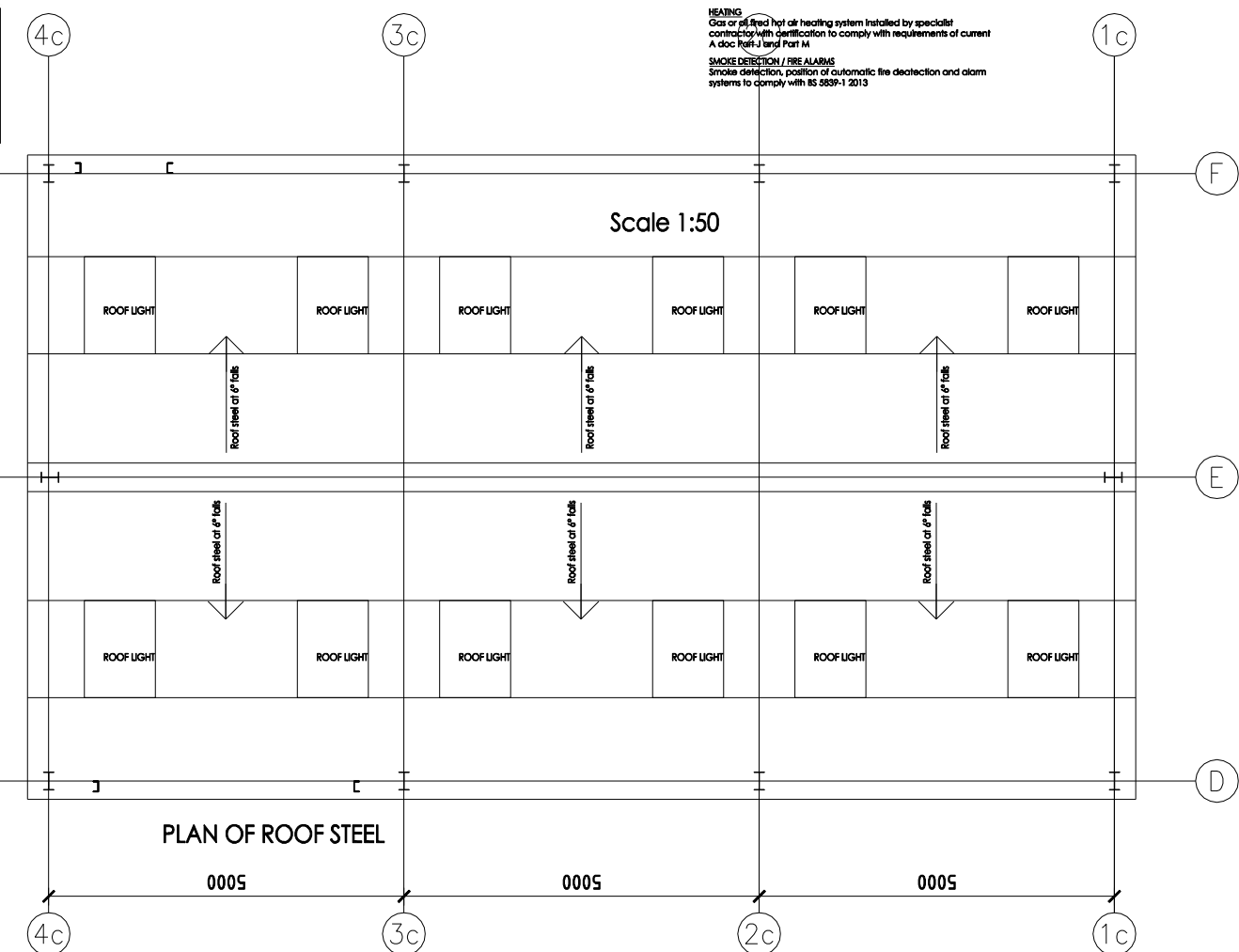


THE VALE OF  
GLAMORGAN COUNCIL  
TOWN AND COUNTRY PLANNING ACT 1990  
**APPROVED**  
SUBJECT TO COMPLIANCE WITH CONDITIONS (IF ANY)



**FOUNDATIONS**  
1200 x 1200 x 750mm deep mass concrete pad foundations to each station - all to Structural Engineer's specification and design. Cable steel and foundations offset 15mm inwards.

**STRUCTURE**  
Cable Stanchions:  
254 x 146 x 31 UB set on base plate 300 x 350 x 15 with 220 holes with 4 No M20x30 N/D bolts  
Main (Intermediate) Stanchions:  
305 x 145 x 40 UB set on base plate 300 x 300 x 15 with 220 holes with 4 No M20x30 N/D bolts  
Structure to incorporate buffer stays and edge gusset plates as indicated

**FLOOR CONSTRUCTION**  
175mm min thick concrete slab with 1 layer A193 reinforcement laid on 100mm overall insulation - Kingspan Thermobloc 170 or equal approved on 50mm min sand bedding on 150mm minimum hardcore  
Slab to fix to 450mm minimum base plate beneath perimeter wall  
Dimensions to be confirmed by Structural engineer and to provide a minimum U-Value of 0.25W/m<sup>2</sup>K

**ROOF CLADDING**  
100mm Kingspan K31000RW to provide a minimum U-Value of 0.25W/m<sup>2</sup>K  
Cladding laid on purlins (Alblon Z14615 sleeved rail system or equal approved)

**WALL CLADDING**  
80mm Kingspan K31000RW to provide a minimum U-Value of 0.25W/m<sup>2</sup>K  
Cladding fixed to (Alblon Z14615 sleeved sheeting rail system or equal approved)

**DISABLED ACCESS WC**  
To comply with Diagram 18 Section M1 / M3 of current Building Regulations/Part M

**INTERNAL WALLS**  
100mm thick medium density block walls finished fairfaced to receive decoration by others

**PERIMETER WALLS**  
225mm high x 100mm thick medium density block walls finished fairfaced to receive decoration by others with 20mm thick natural finish Vermiculite board countersunk and profiled and plugged and screwed to top of block wall to seal cavity - Junction with cladding sealed using two part poly subside mastic  
Blockwork built off DPC on RC slab and lapped over overall DPM  
Blockwork tied back to structural steel using ANCON PFR 815 sliding archbar complete with de-bonding sleeves 125mm long drilled to columns using 6mm Ø solid tapping screws or similar approved at 750mm centres vertically

**WATER HEATING**  
Each hand basin to have individual instantaneous electric hot water supply

**VENTILATION TO WC**  
To have mechanical extract fans providing minimum 40L per WC per hour electrically linked to light switch with 20 minute overrun

**HEATING**  
Gas or oil fired hot air heating system installed by specialist contractor with certification to comply with requirements of current A doc Part J and Part M

**SMOKE DETECTION / FIRE ALARMS**  
Smoke detection, position of automatic fire detection and alarm systems to comply with BS 5839-1:2013

**WINDOWS/DOORS**  
UPVC Thermally broken double glazed with 16mm minimum air gap (Low E, E<sub>n</sub> = 0.2) to provide a minimum U-Value of 2.2 W/m<sup>2</sup>K  
Glazed and part glazed doors to be fitted with laminate toughened glass to comply with BS 6263 / 1981  
Main entrance doorway to incorporate level threshold

**SERVICE DOORS**  
3m high x 2.5m wide sectional insulated doors to provide a minimum U-Value of 1.5 W/m<sup>2</sup>K

**FLASHINGS / SEALS**  
All flashings to be as per Kingspan standard detail sheets and in compliance with current Building Regulations

**STORM WATER DRAINAGE**  
0.7mm thick PVA Gutter double sided plastil coated as Kingspan standard details with all necessary support brackets to discharge via 4 No 100mm Ø aluminium downpipes to trapped gutters to connect to 150mm Ø PVC drains laid to minimum falls 1 in 60 to existing (if) surface water drainage system  
Pipes to be surrounded in pea gravel or weak mix concrete where subjected to vehicular traffic

**FOUL DRAINAGE**  
100mm Ø UPVC foul drains laid to minimum falls 1 in 60 to connect into existing (if) foul drainage  
Pre-cast concrete inspection chambers with heavy duty galvanneal steel double seal covers with strong mortar bedding, slow bends SVP as noted 100mm Ø UPVC with dual proof vent at top terminating minimum 250mm above eaves line  
Waste(s) to handbasin(s) to be 38mm with 75mm Ø bottle traps via back inlet gutters  
Waste(s) to sink(s) to be 40mm with 75mm Ø bottle traps via back inlet gutters  
Wastes to WCs to be 100mm Ø - All in UPVC

**EMERGENCY LIGHTING**  
Positions of emergency lighting to comply with BS 5266:1 2011

**STRUCTURAL DETAILS AND CALCULATIONS**  
For details and calculations refer to design sheets 1-31 Ref Windmill Estate, Barry

This drawing to be read in conjunction with all specifications and all other consultants design information. Any contradictions between this drawing and any other design information to be advised to the contract administrator and author immediately

The contractor to site measure, check and verify all information issued, and confirm the correctness of the contents prior to the commencement on site.

The contractor to comply with all current statutory legislation, Building Regulations, British Standards, and good building practice.

Do not scale from this drawing.

Mitigation Measures as recommended by Sanderson Associates (Consulting engineers) Ltd's report dated 13 November 2014

Any proposed development that has the potential to change the flood mechanisms on a site is to be designed such that there is no increased flood risk to the site itself, or sites upstream and downstream of the development. Any critical plant or water sensitive stored goods within the site should be raised to a minimum of 600mm above the finished floor level of the proposed units where practicable to do so. The floor slab of the unit and internal walls up to 600mm above slab level should be sealed with a treatment that will prevent the leaching of flood waters. This will assist in the cleaning of the units should a flood event occur. Drains within the limits of the site should be regularly inspected and cleared wherever necessary to reduce the risk of blockages and subsequent flooding. A flood evacuation plan should be provided for the site staff. The flood evacuation plan should include the following information for the current occupiers and must be passed onto any subsequent occupiers to ensure continuity as far as is practicably possible:

- How to register for 'Flood Warnings Direct', a free NRW service which provides flood warnings to each registered member by selected media such as telephone, email, text message which is tailored to each registered members requirements.
- What the different flood codes mean for the property when issued by the NRW (Natural Resources Wales) and what actions to take.
- Confirmation of what the sources of flood risk are to the property
- Confirmation of escape routes from the site should evacuation be attempted
- Advice on what to include in the flood kit
- Useful contact numbers if required.

Client: Windmill Property Development  
Units 11 and 12  
Title: UNIT 12 - PROPOSED STRUCTURE  
Scale: 1 : 50 @ A1  
Date: April 2014  
Drawing No: A 012 Revision: A

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