ENVIRONMENTAL HEALTH - PLANNING MEMO

Date: 1st of February 2022

Register Reference: SD21A/0338

Development: Construction of a detached single storey bungalow;

vehicular entrance; secondary effluent treatment system; all

associated site works.

Location: Ringwood, Hazelhatch, Cellbridge, Co. Kildare

Applicant: Frank Reynolds **App. Type:** Permission

Planning Officer: SARAH WATSON

Date Received: 13-Dec-2021 Decision Due Date: 15-Feb-2022

Comments

The Environmental Health Department notes this application entails the construction of a detached single storey bungalow and installation of a secondary effluent system.

When assessing a proposal for a waste water treatment system the main considerations include:

- 1. Potential risk of groundwater contamination
- 2. Contamination risk of other water sources e.g. well, mains etc.
- 3. Public health risk to members of the public should site be unsuitable

The applicant has submitted a site characterisation report dated 12th of November 2021. The report was conducted by Dr Eugene Bolton of the company Trinity Green.

The report confirms the site has a groundwater response rating of R1 as classified under the EPA's code of practice for wastewater treatment systems. This references the groundwater as being extremely vulnerable. The site characterisation report confirms there are no wells or springs in the area. The result of the testing carried out on site concluded that soakage "is within the acceptable range".

The assessor states that a Septic tank system would not be suitable however has indicated that a secondary treatment system or tertiary treatment system would be suitable.

Secondary Treatment Systems are self-contained waste water treatment systems which uses the processes of aeration followed by clarification to achieve biological treatment of wastewater. As the systems is self-contained this poses less risk to groundwater and surrounding areas.

The Site Assessor has made some site specific recommendations and these have been incorporated into the conditions below to safeguard against any public health concerns.

The proposal is **acceptable** to Environmental Health subject to the following conditions set out below.

- 1. As per the site characterisation report conducted by Dr Eugene Bolton and dated the 12th of November 2021 the following site specific conditions must be adhered to when installing the secondary effluent treatment system:
 - Install BAF P6 followed by soil filter with base of gravel at 300mm above existing ground level
 - The required 900mm depth of free draining soil under gravel distribution layer must be achieved
 - When preparing the area ensure vegetation is removed. A layer of soil 300mm deep is to be placed on the prepared area (soil from the site can be used). A 200mm layer of distribution gravel is placed on this soil.
 - The distribution pipes (32mm diameter) are placed on the gravel and covered with a further 100mm gravel.

PE = 6 Hydraulic Load = 900 litres T = 20 - 40 Load at 10 litres/m2 Require 90m2 soil filter

- 2. The applicant shall enter into an on-going maintenance contract with an appropriately qualified person for the lifetime of the waste water treatment system to ensure the wastewater treatment system is working effectively at all times.
- 3. The proposed polishing filter percolation area and packaged system must comply with all relevant set back distances as per the EPA Code of Practice: Wastewater Treatment and Disposal Systems Serving Single Houses (p.e ≤ 10) 2009, to include:
 - 3 metres from the site boundary
 - 4 metres from any roads
 - 10 metres from the percolation area for any dwelling
 - 7 meters from the existing septic tank on-site.
- 4. The polishing filter should be inspected regularly for ponding.
- 5. No heavy construction equipment/machinery (to include pneumatic drills, construction vehicles, generators, etc) shall be operated on or adjacent to the construction site before 07:00 hours on weekdays and 09:00 on Saturdays nor after 19:00 hours on weekdays and 13:00 hours on Saturdays, nor at any time on Sundays, Bank Holidays or Public Holidays.

Kieran Groarke

Environmental Health Officer

1st February 2022

Fiona Byrne
Senior Environmental Health Officer