



Pollution Mitigation Statement

Issue 1

11 March 2026

Redwood, Tiltwood, Hophurst Lane, Crawley
Down.

1.0 Introduction

This statement has been produced to address matters raised by the Flood Risk and Drainage Team at Mid Sussex District Council as part of their planning review process.

The purpose of this assessment is to demonstrate that appropriate pollution mitigation measures have been considered for the proposed single dwelling at Redwood, Tiltwood, Crawley Down.

2.0 Site Location

The site is located at Redwood, Tiltwood, Hophurst Lane, Crawley Down, Crawley, West Sussex RH10 4LL.



3.0 Pollution Mitigation

The proposed development incorporates Sustainable Drainage Systems (SuDS) measures designed to control runoff rates and provide water quality treatment prior to discharge. These measures include a blue-green roof, permeable car parking construction and footpaths which together provide attenuation and filtration of surface water.

The dwelling will incorporate a blue-green roof which temporarily stores rainfall within the drainage and substrate layers. Rainwater will pass through the vegetated growing medium where sediments and airborne pollutants are filtered prior to discharge. This provides both attenuation and water quality benefits while also contributing to improved local environmental conditions.

The blue roof system is designed to discharge via two outlets located at roof level with a combined maximum discharge rate of 0.5 litres per second during the 1 in 100 year storm event including a 40% allowance for climate change. At detailed design stage, when a specialist blue-green roof supplier is appointed, the aim will be to reduce the discharge rate further.

Surface water from the roof will enter a new site drainage system and discharge to the adjacent ditch, in accordance with the Drainage and External Works drawings 7107 – 200 and 7107 – 201.

The controlled discharge from the blue-green roof reduces peak flow rates and provides an element of water quality treatment through filtration within the vegetated roof build-up.

The proposed parking area will be constructed as a permeable surface using free draining granular material placed within a cellular confinement system. Footpaths will either be formed of a permeable construction or 'tip off' onto the permeable parking area. This permeable construction allows rainfall to infiltrate through the surface and underlying aggregate layers, providing further filtration and interception of sediments and potential pollutants associated with residential vehicle use before water enters the drainage system.

The drainage design therefore incorporates a SuDS management train, whereby runoff passes through multiple stages of treatment prior to discharge. Initial interception and filtration occur at the blue-green roof level. Additional treatment and infiltration are provided by the permeable parking surface and underlying granular layers, which assist in removing sediments and potential hydrocarbons from runoff before discharge to the receiving ditch.

The proposed development is classified as a low pollution hazard level in accordance with the SuDS Manual (C753) published by CIRIA. The blue-green roof and permeable parking construction together provide an appropriate level of treatment for runoff from roof and residential parking areas prior to discharge.

The SuDS features will be subject to routine maintenance to ensure continued hydraulic and water quality performance. This will include periodic inspection of roof outlets, maintenance of roof vegetation, and occasional removal of accumulated sediments within the permeable parking surface where necessary.

4.0 Conclusion

Together these measures provide sustainable surface water management and pollution mitigation in accordance with the principles of Sustainable Drainage Systems promoted by CIRIA and the Environment Agency. The development will ensure that runoff volumes, discharge rates and potential pollutant loads are appropriately controlled and will not adversely affect the receiving ditch or surrounding environment.