



**Cyfoeth
Naturiol
Cymru
Natural
Resources
Wales**

Ein cyf/Our ref: CAS-145673-H8N6
Eich cyf/Your ref: P/2021/0306

Maes Y Ffynnon,
Penrhosgarnedd,
Bangor,
Gwynedd
LL572DW

Wrexham County Borough Council,
The Guildhall,
Wrexham,
LL11 1AY

ebost/email:
northplanning@cyfoethnaturiolcymru.gov.uk

12/05/2021

Annwyl Syr/Madam / Dear Sir/Madam,

BWRIAD / PROPOSAL: UNIT FOR FITTING TYRES AND CAR WASH

LLEOLIAD / LOCATION: 1 SALOP ROAD, WREXHAM

Thank you for consulting Cyfoeth Naturiol Cymru / Natural Resources Wales about the above, which we received on 13/04/2021.

We have significant concerns with the proposed development as submitted. We recommend you should only grant planning permission if the following requirement is met. Otherwise, we would object to this planning application.

Requirement: A revised Flood Consequences Assessment (FCA) is required to demonstrate the risks and consequences of flooding can be managed to an acceptable level.

Flood Risk

The planning application proposes less vulnerable development consisting of a unit for fitting tyres and car wash. Our Flood Risk Map confirms the site to be within Zone C2 of the Development Advice Map (DAM) contained in TAN15 of the River Gwenfro.

Section 6 of TAN15 requires the Local Planning Authority to determine whether the development at this location is justified. Therefore, we refer you to the tests set out in section 6.2 of TAN15. If you consider the proposal meets the tests set out in criteria (i) to (iii), then the final test (iv) is for the applicant to demonstrate through the submission of an FCA that the potential consequences of flooding can be managed to an acceptable level.

Requirement: A revised Flood Consequences Assessment (FCA) is required to demonstrate the risks and consequences of flooding can be managed to an acceptable level.

We have reviewed the FCA undertaken by Weetwood, dated March 2021, reference V1.0. Our advice to you is that the FCA fails to demonstrate that the risks and consequences of flooding can be managed to an acceptable level for the reasons explained below.

In summary, we advise that the FCA would benefit from further research, primarily in relation to the operation and maintenance of the Rivulet Road culvert/trash screen and upstream reach of the River Gwenfro which abuts the site. Our detailed advice is as follows.

Observations on the FCA:

Section 4.2 of the FCA implies that the site has not been affected by historic events. However, P/2020/0494 this is not the case as the site has been affected and the downstream boundary culvert/trash screen have blocked and overtopped.

The Rivulet Road culvert is a primary constraint to flow affecting the site. Blockage scenario discussion within section 4.3 of the FCA dismisses the likelihood of blockage and potential impacts, when the December 2016 River Gwenfro Model Update has discussed the potential in detail and included photographic evidence of the May 2013 event. We advise that the FCA includes evidence of discussions with the Lead Local Flood Authority (LLFA) as Wrexham County Borough Council (WCBC) has recently replaced the trash screen after it overturned during a high flow event in 2019. Frequent and out of hours access is required to clear the screen so the applicant and Planning Authority should consult directly with the Environment Dept of WCBC to ensure that the proposals do not hinder access to the screen/culvert.

Any structures constructed within the existing car parking area could act to divert flood flows, as well as any works to the boundary wall adjacent to the watercourse or works to the existing wall and site entrance adjacent to Salop/Rivulet roads. The Blockage outputs within the December 2016 River Gwenfro Model Update are representative of what happens during a flood incident and this can result in significant flooding to residential property.

The proposed layout would appear to locate development away from the more at-risk areas of the site, but we suggest that the site will flood and this could compromise future access to remove debris/material from the watercourse before it reaches the trash screen. We would therefore recommend that a suitable access strip/buffer be provided behind any significant structures. Once again, this should be agreed in discussion with the Environment Dept of WCBC.

Section 7.8 of TAN15 states: *“Development proposals on or adjacent to land that may be affected by contamination can have implications for water quality during times of flood. Where such sites are inundated there is an attendant risk that certain contaminants may be mobilised and could pose a threat to surface waters or leach into ground waters. In addition, where the development involves, for example, the storage/use of oils, fuels or chemicals, an industrial process or the storage or handling of waste materials, there is a risk to the water environment should the site be inundated. These factors should be taken into account in reaching a decision by forming part of an assessment required in accordance with section 7 and appendix 1 of TAN15”.*

Raised walls along the River Gwenfro may act as informal defences throughout Wrexham and this may be the case for this site. WCBC's Environment Dept should confirm whether any formal or informal walls or structures on the site act as *de facto* defences.

Extract from the December 2016 River Gwenfro Model Update - Flood History Fluvial flooding has occurred on a number of occasions within the study area. This has provided valuable information that has been used to help validate the hydraulic model by ensuring that it replicates past flooding mechanisms. Although detailed flood level and extent information is not available from past flood events, numerous other sources of flood history information have been used to validate the model (e.g. photographs, historic newspaper reports, recorded flood incidents and the location of flooded properties). Figure 1-4 summarises the flood history information that was available to this study.

Rivulet Road Culvert:

This structure is represented in the model using rectangular and sprung arch conduit units with a trash screen at the upstream face. Blockage has been modelled by applying a debris proportion to the trash screen. During the climate change enhanced 1% AEP event, the low blockage scenario is shown to have a negligible effect on water levels within the channel, whilst river level increases of up to 50mm and 490mm are predicted for the medium and high blockage scenarios, respectively, relative to baseline conditions. Downstream of the structure, water levels within the channel are shown to be reduced during the high blockage scenario, most significantly immediately downstream of the blocked structure.

During the 20% AEP event, water levels are predicted to increase by up to 130mm for the medium blockage scenario and 1060mm for the high blockage, whilst increases of up to 40mm and 430mm are predicted to occur during the 0.1% AEP event for the medium and high blockage scenarios, respectively. This highlights that a blockage at this structure will likely have a more significant effect during lower magnitude events. During both the 20% and 0.1% AEP events, water level decreases downstream of the structure are shown to occur in a similar manner as during the climate change enhanced 1% AEP event. The predicted changes in flood extent during the climate change enhanced 1% AEP event are illustrated in Figure 6-6. This shows an increased extent of flooding at Eagles Meadow in accordance with the high blockage scenario, which represents a 14% increase in the total area of flooding relative to baseline conditions. No additional flood risk is predicted for the low and medium blockage scenarios.

If no further information is submitted, or a revised FCA fails to demonstrate that the consequences of flooding can be acceptably managed over the lifetime of the development, then we object to this application.

Please inform us, in accordance with paragraph 11.7 of TAN15, if you are minded to grant permission for the application contrary to our advice.

As it is for your Authority to determine whether the risks and consequences of flooding can be managed in accordance with TAN15, we recommend you consider consulting other professional advisors on matters such as emergency plans, procedures and measures to address structural damage that may result from flooding. Please note, we do not normally comment on the adequacy of flood emergency response plans and procedures accompanying development proposals, as we do not carry out these roles during a flood. Our involvement during a flood emergency would be limited to delivering flood warnings to occupants/users.

Protected Species

We note that there is no information about protected species with the application and, therefore, are assuming that your Authority has screened the application and concluded that there is not a reasonable likelihood of protected species being present.

Other Matters

Our comments above only relate specifically to matters included on our checklist, *Development Planning Advisory Service: Consultation Topics* (September 2018), which is published on our [website](#). We have not considered potential effects on other matters and do not rule out the potential for the proposed development to affect other interests.

We advise the applicant that, in addition to planning permission, it is their responsibility to ensure they secure all other permits/consents/licences relevant to their development. Please refer to our [website](#) for further details.

Advice for the Developer

Works near Watercourse / Construction or Demolition sites

Due to the proximity of the site to watercourses, all works at the site must be carried out in accordance with GPP5 and PPG6: 'Works in, near or over watercourses' and 'Working at construction and demolition sites' which are available on the following website:

<http://www.netregs.org.uk/environmental-topics/pollution-prevention-guidelines-ppgs-and-replacement-series/guidance-for-pollution-prevention-gpps-full-list/>

Environmental Management

All works at the site must be carried out in accordance with PPG6: 'Working at construction and demolition sites' which are available on the following website:

<http://www.netregs.org.uk/environmental-topics/pollution-prevention-guidelines-ppgs-and-replacement-series/guidance-for-pollution-prevention-gpps-full-list/>

The activity of importing waste into the site for use as, for example hardcore, must be registered with Natural Resources Wales as an exempt/permittable activity under the Environmental Permitting Regulations 2016. The developer should contact Natural

Resources Wales to discuss the necessity for an exemption/permit for any material imported to and exported from the site.

If during construction/excavation works any contaminated material is revealed, then the movement of such material either on or off site should be done in consultation with Natural Resources Wales. Any waste excavation material or building waste generated in the course of the development must be disposed of satisfactorily and in accordance with Section 34 of the Environmental Protection Act 1990. Carriers transporting waste from the site must be registered waste carriers and movement of any Hazardous Waste from the site must be accompanied by Hazardous waste consignment notes.

If you have any queries on the above, please do not hesitate to contact us.

Yn gywir / Yours faithfully,

Rhys Jones

Cynghorydd - Cynllunio Datblygu / Advisor - Development Planning
Cyfoeth Naturiol Cymru / Natural Resources Wales