

Essex County Council
**Development and Flood Risk
Waste & Environment**
E3 County Hall
Chelmsford
Essex CM1 1QH



David Baker
Epping Forest District Council
Planning Services

Date: 6th September 2018
Our Ref: SUDS-002914
Your Ref: EPF/2115/18

Dear Sir/Madam,

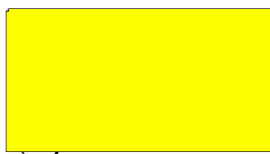
**Consultation Response – EPF/2115/18– 13-15a Alderton Hill Loughton Essex IG10
3JD**

Essex County Council as the Lead Local Flood Authority (LLFA) has received the above planning application on 15/08/2018. This application has been reviewed for surface water drainage aspects in accordance with our statutory consultee role.

Currently, consultants from **McCloy CONSULTING** are working on behalf of the Flood Risk Management team to provide comments.
These have formed the basis of our recommendation to this planning application, please see attached letter.

Should further correspondence be required, please contact the SuDS team directly using the below details.

Yours sincerely,



John Meehan
Head of Sustainability & Resilience
Service: Waste & Environment
Essex County Council

Internet: www.essex.gov.uk
Email: suds@essex.gov.uk

Essex County Council Drainage Review – 13 - 15a Alderton Hill Loughton Essex IG10 3JD

Planning application:	EPF/2115/18
District:	Epping Forest
Our ref:	M01762-02-DG153-01
Date:	6 September 2018

Consultation Response – EPF/2115/18– 13-15a Alderton Hill Loughton Essex IG10 3JD

Thank you for your email which provides Essex County Council (ECC) with the opportunity to assess and advise on the proposed surface water drainage strategy for the aforementioned planning application.

As the Lead Local Flood Authority (LLFA) this council provides advice on SuDS schemes for major developments. ECC have been statutory consultee on surface water since the 15th April 2015.

In providing advice this Council, and their appointed consultants, looks to ensure sustainable drainage proposals comply with the required standards as set out in the following documents:

- Non-statutory technical standards for sustainable drainage systems
- Essex County Council's (ECC's) adopted Sustainable Drainage Systems Design Guide
- The CIRIA SuDS Manual (C753)
- BS8582 Code of practice for surface water management for development sites.

Lead Local Flood Authority position

Having reviewed the Flood Risk Assessment and Outline Drainage Strategy and the associated documents which accompanied the planning application, acting on behalf of ECC we do not object to the granting of Outline planning permission based on the following:

Condition 1

No works shall take place until a detailed surface water drainage scheme for the site has been submitted to and approved in writing by the local planning authority based on

sustainable drainage principles and an assessment of the hydrological and hydro geological context of the development.

The scheme should demonstrate compliance with the NSTS and ECC's Sustainable Drainage Systems design Guide, and should include but not be limited to:

- Verification of the unsuitability of infiltration of surface water for the development. This should be based on infiltration tests that have been undertaken in accordance with BRE 365 testing procedure. Please submit infiltration tests that satisfy BRE 365 requirements or similar approved.
- Limiting discharge rates from the site as per the rates provided in the Flood Risk Assessment submitted with this application.
- Provide evidence that runoff volume is discharged or infiltrating at a rate that does not adversely affect flood risk, and that unless designated to flood that no part of the site floods for a 1 in 30 year event, and 1 in 100 year event in any part of a building, utility plant susceptible to water within the development.
- Provide sufficient storage to ensure no off-site flooding as a result of the development during all storm events up to and including the 1 in 100 year plus climate change event.
- Provide details of pre- and post-development 100 year, 6 hour rainfall event runoff volume to prove that post-development volumes are less than existing or as close to existing as reasonably practicable.
- Final modelling and calculations for all areas of the drainage system.
- Evidence that all runoff leaving the site has undergone the appropriate level of treatment, in line with the CIRIA SuDS Manual C753, section 26.
- Detailed engineering drawings of each component of the drainage scheme.
- The final drainage plan should detail exceedance and conveyance routes in addition to FFL and ground levels, and location and sizing of drainage features.
- A written report summarising the final strategy and highlighting any minor changes to the approved strategy.

As part of the scheme, please also provide evidence of the following:

- A letter or certificate or other documentation from the supplier of the geocellular storage structures declaring the structure proposed suitable for installation at a depth of 0.6m below trafficked areas.
- The confirmed invert level of the storm sewer to which storm drainage from the development shall connect.

The scheme shall subsequently be implemented prior to occupation.

Reason

- To prevent flooding by ensuring the satisfactory storage of/disposal of surface water from the site.
- To ensure the effective operation of SuDS features over the lifetime of the development.

- To provide mitigation of any environmental harm which may be caused to the local water environment

Failure to provide the above required information before commencement of works may result in a system being installed that is not sufficient to deal with surface water occurring during rainfall events and may lead to increased flood risk and pollution hazard from the site.

Summary of Flood Risk Responsibilities for your Council

We have not considered the following issues as part of this planning application as they are not within our direct remit; nevertheless these are all very important considerations for managing flood risk for this development, and determining the safety and acceptability of the proposal. Prior to deciding this application you should give due consideration to the issue(s) below. It may be that you need to consult relevant experts outside your planning team.

- Sequential Test in relation to fluvial flood risk;
- Safety of people (including the provision and adequacy of an emergency plan, temporary refuge and rescue or evacuation arrangements);
- Safety of the building;
- Flood recovery measures (including flood proofing and other building level resistance and resilience measures);
- Sustainability of the development.

In all circumstances where warning and emergency response is fundamental to managing flood risk, ECC advise local planning authorities to formally consider the emergency planning and rescue implications of new development in making their decisions.

Please see Appendix 1 at the end of this letter with more information on the flood risk responsibilities for your council.

INFORMATIVES:

- Essex County Council has a duty to maintain a register and record of assets which have a significant impact on the risk of flooding. In order to capture proposed SuDS which may form part of the future register, a copy of the SuDS assets in a GIS layer should be sent to suds@essex.gov.uk.
- Any drainage features proposed for adoption by Essex County Council should be consulted on with the relevant Highways Development Management Office.
- Changes to existing water courses may require separate consent under the Land Drainage Act before works take place. More information about consenting can be found in the attached standing advice note.
- It is the applicant's responsibility to check that they are complying with common law if the drainage scheme proposes to discharge into an off-site ditch/pipe. The applicant should seek consent where appropriate from other downstream riparian landowners.
- The Ministerial Statement made on 18th December 2014 (ref. HCWS161) states that the final decision regarding the viability and reasonableness of maintenance requirements lies with the LPA. It is not within the scope of the LLFA to comment on the overall viability of a scheme as the decision is based on a range of issues which are outside of this authority's area of expertise.
- ECC will advise on the acceptability of surface water and the information submitted on all planning applications submitted after the 15th of April 2015 based on the key documents listed within this letter. This includes applications which have been previously submitted as part of an earlier stage of the planning process and granted planning permission based on historic requirements. The Local Planning Authority should use the information submitted within this response in conjunction with any other relevant information submitted as part of this application or as part of preceding applications to make a balanced decision based on the available information.

Whilst we have no further specific comments to make at this stage, attached is a standing advice note explaining the implications of the Flood and Water Management Act (2010) which could be enclosed as an informative along with your response issued at this time.

Yours faithfully,

Barry Ward

On behalf of

McCloy Consulting Ltd.

Working as consultants for:

Team: Development and Flood Risk

Service: Waste & Environment

Essex County Council

Internet: www.essex.gov.uk

Email: suds@essex.gov.uk

Appendix 1 - Flood Risk responsibilities for your Council

The following paragraphs provide guidance to assist you in determining matters which are your responsibility to consider.

- Safety of People (including the provision and adequacy of an emergency plan, temporary refuge and rescue or evacuation arrangements)

You need to be satisfied that the proposed procedures will ensure the safety of future occupants of the development. In all circumstances where warning and emergency response is fundamental to managing flood risk, we advise LPAs formally consider the emergency planning and rescue implications of new development in making their decisions.

We do not normally comment on or approve the adequacy of flood emergency response procedures accompanying development proposals as we do not carry out these roles during a flood.

- Flood recovery measures (including flood proofing and other building level resistance and resilience measures)

We recommend that consideration is given to the use of flood proofing measures to reduce the impact of flooding when it occurs. Both flood resilience and resistance measures can be used for flood proofing.

Flood resilient buildings are designed to reduce the consequences of flooding and speed up recovery from the effects of flooding; flood resistant construction can help prevent or minimise the amount of water entering a building. The National Planning Policy Framework confirms that resilient construction is favoured as it can be achieved more consistently and is less likely to encourage occupants to remain in buildings that could be at risk of rapid inundation.

Flood proofing measures include barriers on ground floor doors, windows and access points and bringing in electrical services into the building at a high level so that plugs are located above possible flood levels. Consultation with your building control department is recommended when determining if flood proofing measures are effective.

Further information can be found in the Department for Communities and Local Government publications '[Preparing for Floods](#)' and '[Improving the flood performance of new buildings](#)'.

- Sustainability of the development

The purpose of the planning system is to contribute to the achievement of sustainable development. The NPPF recognises the key role that the planning system plays in helping to mitigate and adapt to the impacts of climate change, taking full account of flood risk and coastal change; this includes minimising

vulnerability and providing resilience to these impacts. In making your decision on this planning application we advise you consider the sustainability of the development over its lifetime.