

Engineers Comments Regarding Surface Water Drainage

Application Reference:	BN/96/25/PL	Reviewer Reference:	ADC/KW/SB
Planning Officer:	Amber Willard	Date of Review:	
Site Name:	Land West of Brookside, Highground Lane, PO7 4SX		
Application Description:	Demolition of existing barn to be replaced by a new barn within the existing footprint. This application is in CIL zone 3 (zero rated) as other development. This may affect the character and appearance of the Church Lane, Barnham Conservation Area.		
Assessment Number:	1 of 1		

Policy and Guidance Information	
Arun District Council Surface Water Drainage Guidance (including design checklists) - https://www.arun.gov.uk/surfacewater Land Drainage Consent – https://www.westsussex.gov.uk/fire-emergencies-and-crime/dealing-with-extreme-weather/flooding/flood-risk-management/ordinary-watercourse-land-drainage-consent/ Arun District Council Land Drainage Byelaws - https://www.arun.gov.uk/byelaws/ Arun District Council surface water pre-commencement conditions - https://www.arun.gov.uk/planning-pre-commencement-conditions The National Standards for SuDS - https://www.gov.uk/government/publications/national-standards-for-sustainable-drainage-systems/national-standards-for-sustainable-drainage-systems-suds The SuDs Manual [C753] by CIRIA	

Response	Objection
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References
The NPPF states that when determining any planning application, local planning authorities should ensure that flood risk is not increased elsewhere (paragraph 181, 182 and 187e). The PPG guides local planning authorities to refer to 'Sustainable drainage systems: non-statutory technical standards' [NsTS] and detailed industry guidance like The SuDS Manual [C753] by CIRIA to guide decisions about the design, maintenance, and operation of sustainable drainage systems for non-major development. The NsTS have been superseded by the National Standards for Sustainable Drainage Systems [NSfS] from 19 June 2025. This consultation has been primarily informed by the NSfS and The SuDS Manual.

Summary

This summary highlights if critical items aligning with each of the standards have been met. Critical items are highlighted in **bold** on our surface water drainage design checklist (linked above). A failure to address these will likely result in an **objection** to an objection to a full or reserved matters planning application.

If any of these items are inadequately addressed by the submission, then their correction may result in a redesign of the surface water drainage scheme. A redesign is likely to have site wide implications such as the potential for storage structures to increase in volume or plan area, or the provision of other important infrastructure to satisfy the NSfS set out below.

A full written explanation of the assessment and response is given in the consultation comments to the planning officer.

Standard	Assessment	Response
1. Runoff destination	Insufficient	Objection
2. Interception drainage	Insufficient	No objection subject to conditions
3. Extreme Rainfall and Flooding	Insufficient	Objection
4. Water Quality	Insufficient	No objection subject to conditions
5. Amenity	Insufficient	No objection subject to conditions
6. Biodiversity	Insufficient	No objection subject to conditions
7. Construction, operation, maintenance, decommissioning and structural integrity	Insufficient	No objection subject to conditions

Reviewed Plans

The following documents have been submitted and reviewed to inform this consultation with reference to surface water drainage:

Flood Risk Assessment - Proposed Replacement Barn - on Land off Highground Lane, Barnham

Consultation comments to the planning officer

0. General

Insufficient information regarding surface water drainage has been submitted to evidence that flood risk will not be increased as due to the proposed development.

1. Runoff destination

Due to the low-lying nature of the land and the presumed presence of high groundwater levels, attenuation has been proposed. However, the applicant has not identified a final discharge destination. It is important to note that attenuation alone does not constitute a discharge location.

In the absence of a clearly defined or evidenced runoff location, we are unable to confirm whether the proposal complies with Standard 1 of NSfS. As such, **we object** to the proposal.

Furthermore, no winter groundwater monitoring or infiltration testing has been undertaken to support the applicant's assumptions. There is also no evidence provided regarding the existing drainage arrangements. The submission of this information may have implications for the scale and layout of the proposed development.

Standard 1 of the NSfS prioritises the following sustainable means of draining a site, we have summarised the constraints of this site against each priority option:

1. Water reuse – not proposed but will not provide a full design solution and can be secured via condition.
2. Infiltration – not investigated.
3. To a watercourse – Ordinary water courses (OWC) can be found to the immediate west and north of site, and a main river to the south.
4. To a surface water sewer – none available.
5. To a highway drainage system – none available according to our records.
6. To a combined sewer – none available.

It is essential that each discharge destination is considered in strict priority order, with higher priority options fully explored and demonstrably exhausted before progressing to lower priority alternatives. Robust evidence must be provided to discount a higher priority destination.

To support an infiltration-based design, winter groundwater monitoring must be undertaken to confirm that a minimum of 1 metre of unsaturated ground can be maintained between the base of the soakaway or infiltration structure and the peak groundwater level. Ground conditions and infiltration potential in Barnham are highly variable. While infiltration may be feasible in some areas, others experience high groundwater levels or poor infiltration rates that render it unviable. This must be robustly demonstrated by the applicant.

The application site is in the Lidsey Wastewater Treatment Catchment Area. This catchment is the subject of a surface water management plan due in part to the recognised history of foul sewer flooding. The site is within a local flood risk zone identified within the surface water management plan [LFRZ_020]. The plan states that flood risk from pluvial water, groundwater and public sewers is high. It states that "hydraulic overload of the foul sewer system has been confirmed." Therefore, it is important to ensure that future development does not exacerbate this problem.

2. Interception drainage

The applicant has not proposed any interception features. In recognition that the National Planning Policy Framework states that SuDS should be proportionate to the nature and scale of the proposal we are willing to accept that the following interception features can demonstrate compliance without further detailed assessment.

- infiltration features designed to meet extreme rainfall standards.
- water butts or other means of reuse that are not designed for regular daily demand attached to all new downpipes.
- raingardens and bioretention features attached to all new downpipes.
- permeable surfacing.

These features will not affect the scale or layout of development and as such can be secured by condition.

3. Extreme rainfall and flooding

The site is currently located within Flood Risk Zone 3a, indicating a high probability of flooding. Flood Zone 3b is defined as the extent of flooding in the 3.33% AEP event and typically referred to as the functional flood plain. At the time of writing modelling data for this event has not been published to cover this area. The models that are available, are for the 1.3% AEP (less likely) and the 5% AEP (more likely) events. The site is within the extents of the 5% AEP flood event. This is important as there is a risk that the site may be at risk in the 3.33% AEP event and therefore should not be developed unless it is essential infrastructure or water compatible development.

The submitted Flood Risk Assessment (FRA) has not provided robust or accurate hydraulic modelling to demonstrate the site's flood risk during the 3.3% AEP event. It is not supported by product 4 data for the site which can be requested from the Environment Agency. It is important that this information is submitted as it will demonstrate accurately the flood risk on the site and its source. SuDS features should not be located in fluvial flood zones. (Please see our guidance relating to this at www.arun.gov.uk/surfacewater). Without an accurate understanding of the flood risk on the site, we cannot assess if the proposed drainage strategy is compliant. Therefore, I object to the application.

The site is also at high risk of surface water flooding, which is not accounted for by the FRA. This will also need to be considered for the SuDS design for the site.

Due to the site's location within the flood plain, further detail of the existing and proposed levels, for both the barn and its access track are requested to ensure that flood risk is not being increased due to changes in levels.

At present insufficient detail has been included on the drainage plans submitted for engineering assessment. In the absence this evidence, and without accurate understanding of the existing site drainage, we cannot assess if flood risk will be increased by the surface water drainage of the proposed development. Therefore, this application does not accord with the NPPF as set out above.

4. Water quality

Insufficient evidence of water quality benefits has been provided, and as such, Standard 4 of the NSfS has not been met. However, the submission of this evidence is unlikely to affect the scale or layout of the development. Therefore, we do not object to the proposal on these grounds, subject to a condition securing the provision of details demonstrating water quality benefits.

5. Amenity

Insufficient amenity benefits arising from the proposed SuDS have been identified, and therefore Standard 5 of the Systems NSfS has not been met. However, the submission of such evidence is unlikely to affect the scale or layout of the development. Accordingly, we do not object to the proposal on these grounds, subject to a condition securing details of amenity benefits.

6. Biodiversity

Insufficient biodiversity benefits arising from the proposed SuDS have been identified, and therefore Standard 6 of the Systems NSfS has not been met. However, the submission of such evidence is unlikely to affect the scale or layout of the development. Accordingly, we do not object to the proposal on these grounds, subject to a condition securing details of biodiversity benefits.

7. Construction, operation, maintenance, decommissioning and structural integrity

Insufficient information regarding the construction, operation and maintenance of the SuDS system, and therefore Standard 8 of the Systems NSfS. However, in the absence of significant existing trees which could impact the scale and layout and location of SuDS features, most elements of this standard can normally be secured via condition. The submission of a Management and Maintenance Plan is unlikely to affect the scale or layout of the development. Accordingly, we do not object to the proposal on these grounds, subject to a condition securing the detailed surface water drainage design.

8. Suggested conditions / Overcoming the objection

As this is not a holding objection or a request for further information, requested conditions are not listed. If you are minded to approve this application, please reconsult engineers for a list of suggested conditions to ensure that the development is adequately drained and does not increase flood risk elsewhere.

The imposition of conditions at this stage rather than overcoming the objection could result in a circumstance where the condition cannot be discharged. In the event of attaching a condition that cannot be discharged, permission may be invalid or that condition could be deemed to be unreasonable.

If you are minded to allow the applicant additional time to submit further documents to support this application, then further evidence may overcome our objection. Please do not allow the applicant to submit further documents without prior discussion as to whether it will be possible for these to be assessed or influence your determination.

Drainage Impact on Other Planning Matters

This application has been assessed with regards to surface water drainage design only, together with land drainage aspects if deemed necessary.

Other planning matters occasionally effect the surface water drainage design. If plans relating to other matters have been assessed for their impact on the proposed drainage, then it must not be assumed that they have been assessed for any other purpose. The planning officer is advised to check for conflicts with any existing approved plans and to consult any relevant consultees as appropriate.

It has been identified that the following consultees may have comments about the plans that have been submitted and reviewed for this application:

- ☐ Landscaping officer (proposed trees and landscaping)
- ☐ Tree officer (existing trees)
- ☐ Environment Agency (main rivers and fluvial/tidal flood risk, River Arun internal drainage board, groundwater source protection zones)
- ☐ Southern Water (foul drainage and surface water disposal to public sewer network/groundwater source protection zones)
- ☐ Portsmouth Water (groundwater source protection zones)
- ☐ Lead local flood authority (all other sources of flooding and ordinary watercourses)
- ☐ Other: Specify
- ☐ None

From: Nicola Oktay on behalf of Planning.Responses
Sent: 03 November 2025 10:07
To: Planning Scanning
Subject: FW: Planning Consultation on: BN/96/25/PL
Attachments: BN-96-25-PL Highground Lane.docx

Drainage Engineers response

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To register to receive notifications of planning applications in your area please go to <https://www1.arun.gov.uk/planning-application-finder>



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Improving the wellbeing of Arun

Delivering the right homes in the right places

Supporting our environment to support us

Fulfilling Arun's economic potential

From: Kathryn Welch <Kathryn.Welch@arun.gov.uk>
Sent: 31 October 2025 14:41
To: Planning.Responses <Planning.Responses@arun.gov.uk>
Cc: Sarah Burrow <Sarah.Burrow@arun.gov.uk>; Paul Cann <Paul.Cann@arun.gov.uk>; Amber Willard <Amber.Willard@arun.gov.uk>
Subject: RE: Planning Consultation on: BN/96/25/PL

Please find the engineers response attached; an objection. Apologies or the delayed response.

Regards,

Kathryn Welch
Senior Planning Officer, Planning Department

Please note: My working hours are currently split between Development Management and ADC Engineers, which may result in extended response times. **Development Management:** Tuesdays and Thursdays **ADC Engineers:** Mondays, Wednesdays, and Fridays

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Our priorities...

Improving the wellbeing of Arun

Delivering the right homes in the right places

Supporting our environment to support us

Fulfilling Arun's economic potential

From: Planning.Responses <Planning.Responses@arun.gov.uk>
Sent: 27 August 2025 13:34
To: Land Drainage <Land.Drainage@arun.gov.uk>
Subject: Planning Consultation on: BN/96/25/PL

To: **Engineers (Drainage)**

NOTIFICATION FROM ARUN DISTRICT COUNCIL

Town & Country Planning Act 1990 (as amended)

Town and Country Planning (Development Management Procedure) (England) Order 2015

Planning Permission

Application No:	BN/96/25/PL
Registered:	26th August 2025
Site Address:	Land West of Brookside Highground Lane
Grid Reference:	495593 103800
Description of Works:	Demolition of existing barn to be replaced by a new barn within the existing footprint. This application is in CIL zone 3 (zero rated) as other development.

The Council have received the above application.

[Click here to view the application and documents](#) The website is updated once a day in the evening, so you may need to wait until the day after this notification to view the documents.

Should you have any comments to make, these should be sent by replying to this email by 25th September 2025 . You can also monitor the progress of this application through the Council web site:

<https://www.arun.gov.uk/planning-application-search>

The application will be determined having regard to the development plan policies (if any are relevant) and other material considerations. The development plan can be accessed via the website <https://www.arun.gov.uk/development-plan> as can information on what comments we can consider <https://www.arun.gov.uk/planning-application-comments>

Please be aware that any comments you may make will be available on our website so please do not insert personal details or signatures on your reply.

Should the application go to appeal the Planning Inspectorate will publish any comments made to the Council on their website: <https://acp.planninginspectorate.gov.uk/> but they will protect personal details.

In the absence of a reply within the period stated, I shall assume that you have no observations to make.

Yours sincerely

Amber Willard

Planning Officer- Arun District Council

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