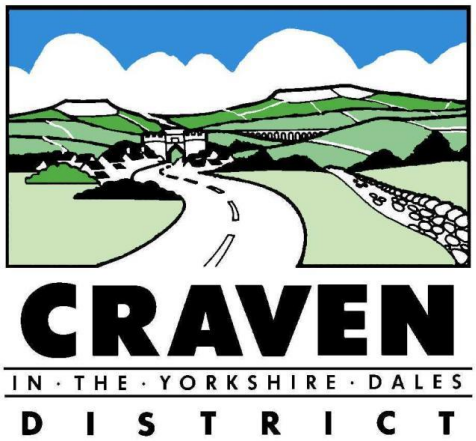

Flood Risk & Water Management

Supplementary Planning Document

Draft for Consultation

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TABLES

APPENDICES

PART ONE: CONTEXT

1.1.0 Introduction

1.1.1 The National Planning Policy Framework (NPPF) describes Supplementary Planning Documents (SPDs), in its glossary, as:

"Documents which add further detail to the policies in the development plan. They can be used to provide further guidance for development on specific sites, or on particular issues, such as design. Supplementary planning documents are capable of being a material consideration in planning decisions but are not part of the development plan."

1.1.2 This SPD provides further guidance on flood risk and water management in the Craven Local Plan area. It cannot and does not introduce any new policy requirements. Rather, in accordance with legal and NPPF definitions of SPDs, it adds further detail to help explain the objectives relating to the relevant policies of the Craven Local Plan and provides information to assist applicants meet the requirements of each relevant policy criteria. This information is set out in Part 2 of this SPD. Part Three provides guidance for applicants in preparing planning applications that involve flood risk and water management, emphasising the importance of early pre-application discussions with the Council.

1.1.3 The plan policies referred to in this SPD are:

- Policy ENV6: Flood Risk
- Policy ENV8: Water Management
- Policy SD1: Presumption in favour of sustainable development
- Policy SD2: Meeting the challenge of Climate Change
- Policy SP4: Spatial Strategy and Housing Growth
- Policy SP2: Economic Activity and Business Growth

Policies ENV6 and ENV8 are the focus of this SPD. The aims of these policies are to set out how flood risk can be reduced and mitigated when planning for new developments, and also how water can be most effectively used within existing and future development sites. These policies are set out in Appendix A (page 31).

1.2.0 Preparing, submitting and front loading of planning applications

1.2.1 In accordance with Policy SD1 of the Craven Local Plan and paragraphs 11 and 39-46 of the NPPF, the Council will take a proactive approach and will work cooperatively with people and organisations wishing to carry out development and applying for planning permission, to find solutions to secure sustainable

development that meets the relevant plan policies, and be approved wherever possible. Solutions to secure sustainable development for Craven, including contributing to the implementation of the Council's Climate Emergency Strategic Plan 2020 to 2030 through the policies of the local plan, and the efficient processing of planning applications, can be achieved through early pre-application engagement with the Council. This is called the process of 'front loading' and is strongly encouraged by the NPPF at paragraphs 39 to 46. Further guidance on this process is set out in Part Three of this SPD.

1.3.0 Public Consultation

1.3.1 This is a consultation draft SPD which is required under Regulations 12 and 13 of the Town & Country Planning (Local Planning) (England) Regulations 2021 (as amended). This first draft of the SPD is currently subject to a four-week period of public participation from 04/01/2022 to 01/02/2022. Following this period of public participation, representations will be invited on a second draft of this SPD over a four-week period in 2022. As required by regulation 12(a), a Consultation Statement will be prepared and published alongside the second draft SPD which sets out the persons the authority has consulted when preparing the SPD, a summary of the main issues raised, and how they have been addressed in the SPD.

1.3.2 Following these two periods of public participation and inviting of representations on the draft SPD, comments and representations received will inform the final SPD, which will be presented to the Council's Policy Committee for adoption and confirmed by the Council, if required. Once adopted, the SPD will be capable of being a material consideration.

1.3.3 A sustainability appraisal is not necessary for the preparation and approval of this SPD, which does not set the framework for decisions on planning applications. Sustainability appraisals have been undertaken for the local plan policies which this SPD supports. Strategic Environmental Assessment and Habitats Regulation Screening Reports for the SPD will be published alongside the second consultation draft.

1.4.0 The relationship between the Craven Local Plan, the National Planning Policy Framework (NPPF) and the Craven Climate Emergency Strategic Plan

1.4.1 The Craven Local Plan (hereafter referred to as 'the plan') was adopted on 12 November 2019.

1.4.2 The preparation of the plan, and its examination, has been based on the provisions of the 2012 NPPF, and the accompanying planning practice guidance (PPG). Hence policies ENV6 and ENV8 reflect these provisions.

1.4.3 The most recently updated 2021 NPPF (paragraphs 159 to 169) retains the same main policy approach to directing development away from areas at highest flood risk, as per the 2012 NPPF. Policies ENV6 and ENV8 remain consistent with the latest version of the NPPF.

1.4.4 In January 2020, the Council approved the Craven Climate Emergency Strategic Plan 2020 to 2030, which seeks to act upon the Council's Climate Change Emergency Declaration (adopted in August 2019) for the district to be carbon neutral by 2030. The CCESP can be viewed at: https://www.cravendc.gov.uk/media/9460/cdc-climate-emergency-strategic-plan-february-2020.pdf and reinforces the existing policies of the local plan which address climate change and carbon reduction measures. It is capable of being a material consideration in determining relevant planning applications and supports adopted local plan policies SD2, ENV6 and ENV8 to reduce energy use, water use and carbon emissions, maximise the energy efficiency of development, and reduce the environmental impacts of materials used in construction. The CCESP prioritises the reduction in energy use in residential properties.

PART TWO: CONFORMING WITH THE RELEVANT POLICIES OF THE CRAVEN LOCAL PLAN

2.1.0 Development in the lowest areas of flooding [Policy ENV6 (a)]

2.1.1 This policy criterion reflects the general approach to development and flood risk in the NPPF and the PPG (see appendix A). The first stage in this process is to identify the level of flood risk relevant to the proposed development. Details of how to do this is provided at section 3.4.0 of this SPD. This policy criterion refers to the potential need for applicants to apply the sequential and exception tests, set out as national policy in the NPPF. Applying these tests is quite complex and can require a considerable amount of pre-application work. Therefore, guidance on applying these tests is given in Part Three of this SPD. There will be many proposed developments which do not need to apply one or both of these tests. To find out more about these types of developments, applicants should refer to paragraphs 3.3.0 to 3.10.0 of this SPD.

2.2.0 Sustainable Urban Drainage Systems [Policy ENV6 (b)]

2.2.1 In natural environments, rain falls on permeable surfaces and soaks into the ground, in a process known as infiltration. In urban areas where many surfaces are sealed by buildings and paving, natural infiltration is limited. Sustainable drainage systems (SuDS) mimic natural drainage processes to manage flood and pollution risks, to reduce the effect on the quality and quantity of run-off from developments, and provide amenity and biodiversity benefits. SuDS are designed to control surface water run off close to where it falls. They provide opportunities to:

- Reduce the causes and impacts of flooding;
- Remove pollutants from urban run-off at source;
- Combine water management with green space with benefits for amenity, recreation and wildlife.

2.2.2 Generally, the aim of SuDS should be to discharge surface run off as high up the following hierarchy of drainage options as reasonably practicable:

(1) into the ground – infiltration;

(2) to a surface water body;

(3) to a surface water sewer, highway drain, or another drainage system;

(4) to a combined sewer.

2.2.3 Criterion (b) of policy ENV6 requires development to safeguard waterways by incorporating SuDS where possible. Where the use of SuDS is not possible, feasible or appropriate, criterion (b) states that other means of flood prevention

and water management should be used. The use of SuDS can also assist in meeting criteria (e) of ENV6, relating to minimising the risk of surface water flooding and criterion (f), relating to reducing the causes and impact of flooding. See appendix A for the full text of policy ENV6.

2.2.4 Whether SuDS should be considered depends on the proposed development and its location in terms of flood risk. The PPG states that new development should only be considered appropriate in areas at risk of flooding if priority has been given to the use of SuDS. In line with the PPG & The Written Ministerial Statement on SuDS (2014), when appropriate, the Council requires details of SuDS to be provided in a Flood Risk Assessment when a planning application is submitted. Details of when SuDS is required, in relation to both major and minor/small developments is provided on the Council's website under the Council's local validation requirements Further details are provided in Part Three of this SPD.

2.2.5 Where SuDS are proposed as part of a planning application, the Council will regularly seek advice from North Yorkshire County Council, who acts as the Lead Local Flood Authority, including on what type of SuDS is considered to be reasonably practicable for a particular proposal. The North Yorkshire flood risk strategy is available under: https://www.northyorks.gov.uk/flood-and-water-management.

2.2.6 Table 1 below provides examples of SuDS that can be incorporated into schemes for both major and minor development proposals.

Table 1: Examples of SuDS

Type of SuDS	**Details of SuDS mechanism utilised**	**Suitability for Major or Minor Development**
Water butts	Used to collect rainwater which falls on a building's rooftop. Water is transferred through gutters and down pipes into the water butt. The water collected through rainwater harvesting can be used for plant watering, gardening jobs, etc.	Both; suitable for all types of development, including both single and multiple new dwellings, in addition to commercial buildings.
Green roofs	Roofs of a building that are partially or completely covered with vegetation and a growing medium, planted over a waterproofing membrane. May also include additional layers such as a root barrier and drainage and irrigation systems. Benefits include improving storm water management, reducing the 'heat island' effect, improving air quality, insulating the building and extending the roof life.	Both; suitable for all development types.

Permeable surfaces	Also known as porous or pervious surfaces, these allow water to percolate into the soil, to filter out pollutants and recharge the water table. Permeable paving is a method of paving vehicle and pedestrian pathways to enable infiltration of storm water runoff. These surfaces typically include pervious concrete, porous asphalt, paving stones and interlocking pavers.	Both; suitable for all development types.
Constructed wetlands	Purpose built wetlands, specially designed for wastewater treatment, and usually made up of a primary settlement tank where wastewater from the community is collected, and from that, several ponds follow, planted with wetland plants including reeds, rushes and sedges. Ponds are usually gently sloped towards a river to allow slow moving water through the wetland before flowing away. Particles in this water can settle, and pollutants can be removed.	Major developments.
Wetlands	A distinct ecosystem that is flooded by water, either permanently or seasonally, where oxygen-free processes prevail. The primary factor that distinguishes wetlands from other land forms or water bodies is the characteristic vegetation of aquatic plants, adapted to the unique hydric soil. Careful plant selection and a specifically designed substrate contribute to cleansing and re-oxygenating the water.	Major developments.

2.2.7 Criterion (b) of policy ENV6 (see appendix A) also states that all surface water drainage systems (SuDS) or other should be economically maintained for the lifetime of the development. Details of how SuDS will be maintained should be provided in a Flood Risk Assessment.

2.3.0 Maintaining access to watercourses and flood defences, and avoiding likely flood resilient areas [Policy ENV6 (c) & (d)]

2.3.1 For a proposed site to comply with criteria ENV6 (c) and (d) (see appendix A), there is first a locational element to be considered. Flood risk can be avoided or sufficiently reduced in terms of locating development in areas with the lowest risk of flooding in the Craven local plan area (see Part Three). On a wider landscape scale, natural mechanisms can be utilised to avoid or reduce the risk of the site itself increasing flood risk in the surrounding environment, in addition to reducing the flood risk within the site. These natural elements are discussed in the following paragraphs.

2.3.2 Applicants are required to establish both a suitable location and an appropriate layout and form of development, so that adequate and easy access to any nearby watercourses and flood defences are maintained, as required by criterion (c) of policy ENV6. They can then be managed and maintained by the

relevant authority. Using the natural capacity of the environment as described above can greatly assist proposals avoiding areas which have the existing capacity to increase flood resilience.

2.3.3 Criterion (d) of Policy ENV6 (see appendix A) requires development to avoid areas with the potential to increase flood resilience and seek to enhance, as far as possible, the natural capacity of soils, vegetation, river floodplains, wetland and upland habitats to reduce flood risk. In the Craven local plan area, peat moorland in the uplands and woodland on valley slopes can assist to retain rainwater, and hence slow down drainage into becks and rivers. Therefore, care must be taken to ensure that development does not degrade peat soils and upland habitats, as their capacity to store water helps to alleviate downstream flooding and protect water quality. Wetlands, floodplain grasslands, ponds and wet woodlands can offer similar benefits on the valley floor. Keeping, restoring and adding to these features can therefore offer multiple benefits for the landscape, biodiversity and flood risk – including reducing flood risk downstream for neighbouring urban areas such as Keighley, Bradford, and Leeds. The location of the site must hence be sensitive to the natural environment, and an appropriate site location can avoid damaging the ability of such natural features to reduce flood risk on both a district and regional basis.

2.3.4 The PPG also puts emphasis on applicants creating opportunities to reduce the overall level of flood risk in the site's local area and beyond. Safeguarding land for flood risk management perhaps presents the most straightforward and important opportunity. Where appropriate, it is also possible to design off-site works required to protect and support development in ways that benefit the area more generally. In addition to the suitable location of the site itself, the layout and form of development within sites can play a significant role in achieving this objective, particularly within relatively large sites in the district.

2.3.5 Green infrastructure (GI) networks play a major role in resilience to flooding in Craven and elsewhere in England. Cross reference should be made to the Council's Green Infrastructure & Biodiversity SPD, to see how the safeguarding and provision of GI can reduce flood risk.

2.4.0 Maximise opportunities for incorporation of water conservation [ENV8 (b)]

2.4.1 Policy ENV8 (b) (see appendix A) strongly promotes the maximisation of opportunities to incorporate water conservation methods in the development's design. This includes the collection and re-use of water on a site. Both the exterior and interior design of building(s) on a site offer water conservation opportunities. Applicants can also refer to Craven District Council's Good Design SPD for advice on sustainable design opportunities. There are a

number of strategies that can be employed to reduce the amount of water consumed in a development. Such methods include system optimisation (i.e. efficient water systems design, leak detection, and repair), water conservation measures, and water re-use/recycling systems.

2.4.2 More specifically, a wide range of technologies and measures can be utilised within each of the aforementioned strategies to save water and associated energy consumption in all proposed developments. These include:

- Water-efficient plumbing fixtures (low-flow and sensored sinks, low-flow showerheads and toilets, and water-efficient washing machines and dishwashers);
- Irrigation and landscaping measures (water-efficient irrigation systems, irrigation control systems, low-flow sprinkler heads, and water-efficient scheduling practices);
- Water recycling or re-use measures (grey water and process recycling systems).

2.4.3 The use of water butts is discussed in Table 1 as a mechanism of Sustainable urban Drainage Systems, in that it can slow down surface water runoff by storing and re-using water at a later time. It hence follows that mechanisms used to reduce flood risk and severity can also often greatly assist in water conservation, with such stored water reducing demands on the public water supply, particularly during hot and dry spells. It is an example of how applicants should analyse the criteria of Policies ENV6 and ENV8 together in order to recognise multiple advantages of utilising a single mechanism or instrument.

2.5.0 Adequate provision for foul and surface water disposal and waste water treatment infrastructure [Policies ENV6 (e) & ENV8 (a)]

2.5.1 Criterion ENV6 (e) (see appendix A) requires that applicants minimise the risk of surface water flooding in their proposals by ensuring adequate provision for both foul and surface water disposal in advance of occupation of any development. Such standards are set out by the Environment Agency (EA). Appendix C of the local plan details the relevant EA Technical Note on this subject, and its part (a) shows the order of priority in which surface water should be discharged. Appendix C of the Craven Local Plan can be viewed at: https://www.cravendc.gov.uk/planning/craven-local-plan/ Development necessitating a discharge to a public sewer should be supported by clear evidence demonstrating why alternative options are not available (see table 2 in Part Three).

2.5.2 Criterion ENV8 (a) (see appendix A) sets similar requirements of applicants from the viewpoint of protecting surface and ground water resources. It states that adequate wastewater treatment infrastructure should match the type,

scale, location and phasing of the development. Hence similarly to what is outlined in section 2.4.0, applicants can successfully meet both flood risk and water resource requirements by early and effective planning and design of proposals.

2.5.3 Sustainable Urban Drainage Systems (see section 2.2.0) can assist to appropriately meet requirements of both ENV6 (e) and ENV8 (a) (see appendix A). The management sequence of SuDS may include these stages:

- Source control methods decrease the volume of water entering the drainage/river network by intercepting run-off water on roofs for subsequent re-use (e.g. for irrigation) or for storage and subsequent evapotranspiration (e.g. green roofs);
- Pre-treatment steps, such as vegetated ditches or filter trenches, remove pollutants from surface water prior to discharge to watercourses or aquifers;
- Retention systems delay the discharge of surface water to watercourses by providing storage within ponds, retention basins or wetlands;
- Infiltration systems, such as infiltration trenches and soakaways mimic natural recharge, allowing water to soak into the ground.

2.6.0 Ensuring adequate attenuation and long term storage [ENV6 (f)]

2.6.1 Criterion ENV6 (f) (see appendix A), promotes that the development will possess adequate and sufficient attenuation and long term storage to accommodate storm water on site. This can greatly reduce flood risk to people and property and without overflowing into a watercourse (as per standards set out by the Environment Agency and subsequent updates to the standards). Appendix C of the local plan contains a technical note from the Environment Agency on this subject, and its part (e) details how development design can accommodate sufficient attenuation and long term storage. Appendix C of the Craven Local Plan can be viewed at:
https://www.cravendc.gov.uk/planning/craven-local-plan/

2.6.2 Paragraph 167 of the NPPF (2021) requires Local Planning Authorities, when determining any planning applications, to ensure that flood risk is not increased elsewhere. In doing so and specifically in terms of the requirements set out in criterion (f) of policy ENV6, development should only be allowed in areas at risk of flooding where, in the light of a Flood Risk Assessment, it can be demonstrated that the development is appropriately flood resistant and resilient such that, in the event of a flood, it could be quickly brought back into use without significant refurbishment. The sequential and exception tests may also be required, as applicable (see Part Three of this SPD). Paragraph 167 also includes other criteria that would need to be demonstrated to ensure that flood risk is not increased elsewhere.

2.6.3 Flood-resilient buildings are designed and constructed to reduce the impact of flood water entering the building so that no permanent damage is caused, structural integrity is maintained and drying and cleaning is easier. The Ministry of Housing Communities and Local Government has published guidance on how to improve the resilience of new properties in low or residual flood risk areas by the use of suitable materials and construction methods. This guidance is available at: https://www.gov.uk/government/publications/flood-resilient-construction-of-new-buildings.

2.7.0 Water Quality [ENV8 (c) & ENV8 (d)]

2.7.1 Criterion ENV8 (c) (see appendix A) advises that applicants must anticipate any likely negative impacts of proposals on water resources, and incorporate adequate mitigation measures where necessary. Hence there is a need for applicants to:

1. identify if a proposed development is near a watercourse;
2. assess whether the proposed development will have any negative impacts on the watercourse; and
3. If so, set out what mitigation measures are proposed in the design to mitigate the negative impacts on the watercourse.

2.7.2 The planning and construction of a proposed development are the key stages in terms of assessing and mitigating water pollution risks. An applicant may wish to commission an appropriate professional to carry out the stages identified above. In terms of step 1 listed above, the Council's mapping system may assist applicants in identifying whether a proposed development is near an existing watercourse. This can be accessed here.

2.7.3 In terms of step 2 it is important to understand how proposed development can have negative impacts on a watercourse. There are a number of scenarios where the location and type of development can cause a concern for water quality. Direct impacts involve physical modifications to a water body such as flood storage areas, channel diversions and dredging, removing natural barriers, construction of new locks, new culverts, major bridges, new barrages/dams, new weirs (including for hydropower) and removal of existing weirs. There can be also indirect effects on water bodies, such as the redevelopment of land that may be affected by contamination, mineral workings or wastewater treatment. Clearly, the closer a proposed development is to a water body, the greater the pollution risk. For smaller-scale and householder developments, potential water pollution risks can arise from:

- Toxic substances such as diesel, oil, cement and/or paint, which can seep into soil, enter water via drains, or directly run off into water bodies;

- The inappropriate disposal of site waste;
- Uncleaned footpaths and roads adjacent to the site, where silt and other pollutants can run off into water bodies;
- Wastewater that is not properly collected or treated during construction and/or development operation stages.

2.7.4 In terms of the third step set out at paragraph 2.7.1 above, if a proposed development would have any negative impacts on a watercourse, an applicant would then need to show what mitigation measures are proposed. Most of the measures needed to prevent pollution cost very little, especially if they are included at the planning stage of any proposed development scheme. Appendix C has a range of mitigation measures to be considered when meeting the requirements of criteria (c) and (d) of policy ENV8. These could be shown on the architectural drawings and/or within supporting documents submitted with a planning application (see table 2 in Part Three of this SPD which provides a list of the supporting documents commonly required to accompany a planning application). If necessary and appropriate, the local planning authority can attach a condition to a planning permission requiring appropriate mitigation measures to be provided in a development scheme.

2.7.5 Policy ENV8 (d) (see appendix A) requires that applicants need to carefully consider the location and type of new development where an assessment of the potential impacts on water bodies and protected areas is required under the Water Environment Regulations, 2017 (related to the Water Framework Directive). These regulations apply to surface waters and groundwater. They set out requirements to prevent the deterioration of aquatic ecosystems. They aim to protect, enhance and restore water bodies to 'good' or 'high' status, and achieve compliance with standards and objectives for protected areas. These regulations are available to view using the following link: https://www.legislation.gov.uk/uksi/2017/407/made .

2.7.6 The PPG emphasises that multiple benefits for people and the environment can be achievable through good design and mitigation within and adjacent to site boundaries. For example, water quality can be improved by protecting and enhancing green infrastructure. Further information on this can be found in the PPG in its natural environment section, and Craven District Council's draft SPD on Green Infrastructure & Biodiversity. Flood risk can be reduced and biodiversity and amenity improved by design that includes permeable surfaces and other sustainable urban drainage systems (see section 2.2.0 of this SPD), removing artificial physical modifications (e.g. weirs and concrete channels), and recreating natural features. The sections of the PPG relating to food risk and water supply, wastewater and water quality provide further detail of how

developments should reduce the risk of pollution and deterioration of water resources.

2.8.0 Groundwater [ENV8 (e) & ENV8 (f)]

2.8.1 Criterion ENV8 (e) requires that applicants protect surface and groundwater when planning for and implementing development proposals. Surface water is an important natural resource used for many purposes, especially public supply and irrigation. Groundwater provides approximately one third of the drinking water in England, and it also maintains the flow in many of the country's rivers. It is therefore crucial that development protects surface and groundwater sources, and a preliminary site investigation is necessary in this regard. This investigation should gather background information about surface and groundwater sources, which will need to be considered during planning, design and construction. These water sources may merit more detailed physical investigations, such as site surveys. See table 2 in Part Three of this SPD which provides a list of the supporting documents commonly required to accompany a planning application.

2.8.2 Criterion ENV8 (f) focuses specifically on Source Protection Zones (SPZs), which are areas close to drinking water sources where the risk associated with groundwater contamination is greatest. The Environment Agency has defined SPZs for groundwater sources such as wells, boreholes and springs used for public drinking water supply. It is important for any site proposal to consider its location in relation to SPZs in the Craven local plan area. The location of SPZs in the Craven area is available to view with the following mapping website: https://magic.defra.gov.uk/. These zones show the risk of contamination from any activities that may cause pollution in the area. Generally, the closer the activity is, the greater the risk to groundwater.

PART THREE: PREPARING AND SUBMITTING PLANNING APPLICATIONS TO ADDRESS FLOOD RISK

3.1.0 Pre-application discussions

3.1.1 The importance of pre-application engagement between developers and the local planning authority and early resolution of policy issues ('front loading') is highlighted within the NPPF, in paragraphs 39 to 46. Also, in light of the Council's Climate Emergency Strategic Plan (CCESP), it is important to reflect one of the actions of the CCESP here. This action (CND03) states that the Council will *"work with developers as new sites across Craven are approved to ensure that opportunities for efficiency and carbon reduction are maximised."*

3.1.2 The key aim of policies ENV6 and ENV8 is that growth in housing, business and other land uses are accompanied by the minimisation of flood risk, and safeguarding and improving water resources, respectively. In order to achieve this in proposed developments, and to meet the specific requirements of each policy, an applicant should refer to the relevant policies of the adopted local plan (see appendix A) and the further detail provided in Parts Two and Three of this SPD. The applicant should then discuss these matters at the earliest opportunity with the Council's Development Management (DM) team. It is the Council's practice to charge for all such engagement. Pre-application enquiry forms and charging rates for the Council can be found at: https://www.cravendc.gov.uk/planning/information-and-advice/obtaining-pre-application-planning-advice-temporarily-suspended/. Contact details at the time of publication for the Council's Development Management (DM) team: planning@cravendc.gov.uk.

3.1.3 Paragraph 174 of the NPPF states that planning policies and decisions should contribute to and enhance the natural and local environment. Early discussions between applicants, Craven District Council and the relevant local community is important for clarifying development expectations and reconciling local and commercial interests. The opportunity for the Council to inform and influence the flood risk and/or water resource characteristics of a proposal early in the design process is a more efficient process than an applicant trying to implement suggested revisions at a later stage, particularly with major proposals.

3.2.0 Documents to Support a Planning Application

3.2.1 The information in Table 2 below lists relevant supporting documents, many of which will be necessary and/or helpful, to accompany an application to show how the requirements of policies ENV6 and ENV8 have been met, both in relation to the Council's validation requirements and other supporting documentation. Table 2 includes the national validation requirement for

architectural drawings to accompany any planning application, hence applicants are strongly encouraged to commission an architect or suitably qualified professional to produce drawings that fully consider the design of any development proposal. Applicants may also need to provide other supporting documents not listed in the table below (such as a Planning Statement) depending on the individual circumstances of a proposal.

3.2.2 Where the supporting documents, necessary to meet the Council's validation requirements are not required, applicants are encouraged to provide supporting documentation setting out similar information, in order to show how the proposal conforms with relevant adopted local plan policy criteria, including policies ENV6 and ENV8.

3.2.3 The local validation requirements referred to in this SPD were published by the Council on 1st September 2020. It should be noted that the Council has a requirement to review local validation lists at least every two years, hence users of this SPD should refer to the most up to date local validation requirements published on the Council's website.

Table 2: Supporting documents which are commonly required to accompany a planning application

Craven Local Plan Policy	**Supporting Documents**	**Purpose**	**Further Information**
SD1, SD2, ENV3, ENV6 & ENV8	Preliminary drawings, site and location plans.	Pre-application discussions relating to overall design of a proposal.	Pre-application enquiry forms and charging rates for the Council can be found at: https://www.cravendc.gov.uk/planning/information-and-advice/obtaining-pre-application-planning-advice-temporarily-suspended/
ENV3, ENV6 & ENV8	Architectural drawings are a national validation requirement and are necessary to accompany the planning application.	To set out the scale, design and layout of a proposal.	CDC website: https://www.cravendc.gov.uk/planning/planning-applications-and-notifications/national-and-local-planning-validation-requirements/statutory-national-information-requirements/
ENV6 & ENV8	Environmental Impact Assessment (EIA) is a national validation requirement and may be necessary to accompany a	To analyse the impact of the proposal on the environment and put forward mitigation effects. The EIA can include information relating to preliminary site investigations to ensure protection of	CDC website: Environmental Impact Assessment

	planning application.	surface water and ground water from pollution (see paragraphs 2.7.0 and 2.8.1).	
ENV8	A Foul Drainage Assessment form is on the Council's local validation list and may be necessary to accompany the planning application.	A completed Foul Drainage Assessment form is required when new or replacement non-mains drainage is proposed.	CDC website: https://www.cravendc.gov.uk/planning/planning-applications-and-notifications/national-and-local-planning-validation-requirements/local-information-requirements/non-mains-drainage-assessment/
ENV8	A Non-mains drainage and water supply assessment form is on the Council's local validation list and may be necessary to accompany the planning application.	A completed Non-mains drainage and water supply assessment form is required for any proposal where property(s) will be served by a private water supply or private distribution system.	CDC website: https://www.cravendc.gov.uk/planning/planning-applications-and-notifications/national-and-local-planning-validation-requirements/local-information-requirements/private-water-supply-assessment/
ENV6	A Flood Risk Assessment / Matrix is on the Council's local validation list and may be necessary to accompany the planning application.	To identify and assess the risks of all forms of flooding to and from the proposed development, including details of the sequential test (see section 3.11.0 below) if required. For site specific flood risk assessments, see section 3.13.0 below.	CDC website: https://www.cravendc.gov.uk/planning/planning-applications-and-notifications/national-and-local-planning-validation-requirements/local-information-requirements/flood-risk-assessment-matrix/
ENV6, INF4	Surface Water Drainage Scheme, Sustainable urban Drainages (SuDS) is on the Council's local validation list and may be necessary to accompany the planning application.	To demonstrate that the proposed site can be sustainably drained, at the earliest opportunity. Where a development proposes to discharge surface water into a public sewer, applicants are required to demonstrate why alternative options	CDC website: https://www.cravendc.gov.uk/planning/planning-applications-and-notifications/national-and-local-planning-validation-requirements/local-information-requirements/surface-water-drainage-scheme-sustainable-urban-drainages-suds/

		are not available (see paragraph 2.5.1).	
ENV3 (s) & (t), ENV4, ENV5, ENV6 and ENV8	Sustainable Design and Construction Statement is on the Council's local validation list and is necessary to accompany the planning application.	To explain how a proposal's design and construction will contribute towards the achievement of sustainable development and, in particular, to the mitigation of and adaptation to climate change, in line with relevant policies of the Craven Local Plan and the National Planning Policy Framework (NPPF).	Appendix B of the Good Design SPD and CDC website: https://www.cravendc.gov.uk/planning/planning-applications-and-notifications/national-and-local-planning-validation-requirements/local-information-requirements/sustainable-design-and-construction-statement-sdcs/

3.3.0 Stepped Approach to Sequential & Exception Testing: Introduction

3.3.1 The following paragraphs set out a stepped approach to fulfilling the requirements of the sequential and exception tests (Policy ENV6 a), taking into account the local circumstances in Craven (see also paragraph 2.1.1 of Part Two).

3.3.2 Applicants are recommended to follow the stepped approach below when preparing planning applications for development in the Craven Local Plan area. Applicants should also take account of the relevant parts of the guidance provided in the PPG's section on Flood Risk and Coastal Change at: https://www.gov.uk/guidance/flood-risk-and-coastal-change.

3.4.0 Step 1 – Identifying the flood risk

3.4.1 Flood risk is a combination of the probability and the potential consequences of flooding from all sources – including from rivers and the sea, directly from rainfall on the ground surface and rising groundwater, overwhelmed sewers and drainage systems, and from reservoirs, canals and lakes and other artificial sources. The first stage is to identify the level of flood risk relevant to the proposed development. The main data on flood risk in Craven is found in:

(a) The Environment Agency's Flood Mapping (EAFM); and

(b) Craven District Council's Level 1 Strategic Flood Risk Assessment (SFRA).

3.4.2 Craven District Council's SFRA was completed in 2017 as part of the preparation for the adopted Craven Local Plan, and the SFRA assessed the risk across the local plan area from all flooding sources.

3.4.3 (a) Environment Agency (EA) Flood Maps: Applicants for all development types should access the interactive EA Fluvial Flood Map on the EA website to identify which fluvial flood zone their site lies within: https://flood-map-for-planning.service.gov.uk/. The four categories of fluvial flood risk used in the UK are set out at https://www.gov.uk/guidance/flood-risk-and-coastal-change#flood-zone-and-flood-risk-tables. The EA flood map depicts:

- Flood Zone 3 (a) and (b) (high probability) in dark blue;
- Flood Zone 2 (medium probability) in light blue; and
- Flood Zone 1 (low probability) having no colour.

The EA also produces mapping showing flood risk from surface water at: https://www.gov.uk/government/publications/flood-risk-maps-for-surface-water-how-to-use-the-map, and provides information on flood risk from groundwater at: https://www.gov.uk/government/collections/groundwater-current-status-and-flood-risk#groundwater-situation-reports.

3.4.4 (b) Craven's Strategic Flood Risk Assessment (SFRA): The Council's Level 1 SFRA should be reviewed to identify more detailed and locally specific flood risk information relating to a site. This includes information showing the extent of Functional Floodplain (Flood Zone 3b) and areas at risk from other sources of flooding, such as surface water, reservoirs, canals, and sewers/drains (which create critical drainage areas). The SFRA also contains other relevant information including historic flooding incidents (from various sources), flood warning areas, and local geology and topography.

3.5.0 Step 2 - Is a flood risk sequential test required?

3.5.1 Once the level of flood risk has been identified, including which fluvial flood zone the proposed development site lies within, the next step is to identify if it is necessary to apply the flood risk sequential test. The flood risk sequential test is not necessary for all development proposals in the Craven Local Plan area. For fluvial flood risk (watercourses and rivers), the sequential test is generally not necessary where the proposal is:

- On land in Flood Zone 1;
- For residential development on land allocated for housing in the Craven Local Plan;
- For employment development on land allocated for employment in the Craven Local Plan;
- For minor development set out in paragraph 164 of the NPPF;

- Changes of use.

The applicant is advised to refer to the PPG for some exceptions to the above, in particular paragraphs 3, 19 and 33 in the Flood Risk and Coastal Change section. In addition, where the SFRA or other more recent sources of information indicate there may be flooding issues currently or in the future a sequential test may still be necessary for proposals in Flood Zone 1.

3.5.2 A fluvial flood risk sequential test is not appropriate for certain types of development in Flood Risk Zones 3a and 3b. This is because such development should not be permitted in these high flood risk areas and cannot generally be justified by the sequential or exception test. The applicant is advised to refer to the flood risk vulnerability tables in the PPG at: https://www.gov.uk/guidance/flood-risk-and-coastal-change#Table-2-Flood-Risk-Vulnerability-Classification. These tables are also copied in Appendix B of this SPD. For all other developments not identified above, a fluvial flood risk sequential test will be required.

3.5.3 For other non-fluvial flood risks, and for land use compatibility issues identified in the flood risk documents given in Step 1 above, applicants should contact the Council's Development Management team to discuss the need for an alternative sequential test and the suitability the intended land use. Contact details at the time of publication for the Council's Development Management (DM) team are: planning@cravendc.gov.uk.

3.6.0 Step 3 – The fluvial (rivers and watercourses) flood risk sequential test

3.6.1 The PPG (paragraph 18: flood risk and coastal change) summarises the general approach of sequential testing as designed to ensure that areas at little or no risk of flooding from any source are developed in preference to areas at higher risk. The aim of the sequential test is to keep development out of medium and high flood risk areas (Flood Zones 2 and 3) and other areas affected by other sources of flooding where possible.

3.6.2 Paragraph 162 of the NPPF is unequivocal in its intention and states that developments should not be permitted if there are reasonably available sites appropriate for the proposed development in areas with a lower risk of flooding. Therefore, the sequential test compares a proposed development site with other suitable and available development sites to establish which has the lowest flood risk. If the proposed development could take place on a lower flood risk site, permission should not be granted.

Sequential test for non-residential development

3.6.3 For non-residential development, due to the variety of different land uses and circumstances that relate these proposals, the council will, following the

guidance in the PPG, apply the sequential test on a case by case basis. Paragraph 033, Reference ID: 7-033-20140306 of the PPG provides useful guidance on this matter. The applicant should see also this SPD's guidance on the sequential test for proposals on previously developed land below.

Sequential test for residential development

3.6.4 For residential development, it is useful to set out some guiding and generic principles on how the sequential test should be undertaken in the Craven Local Plan area. These principles are set out in Steps 3(a) to 3(d) below, albeit the guidance in the paragraph below on the sequential test for proposals on previously developed land also applies to residential development.

Sequential test for proposals on previously developed land

3.6.5 The development of previously developed land often supports the regeneration of an area. In such circumstances, it might be impractical to suggest that there are more suitable alternative locations for that development elsewhere. The PPG (para 33 Ref ID: 7-033-20140306) indicates that where this is the case *"a pragmatic approach on the availability of alternatives should be taken."* In addition, the re-use of previously developed land is highly valued in the planning system and has wider sustainability advantages over the development of greenfield land.

3.6.6 Therefore, where the council consider that it would be impractical to suggest there are more suitable alternative locations for a proposal on previously developed land, these proposals will be deemed to have passed the sequential test. Of course, these developments, in accordance with Appendix B, may still be required to pass the exception test, as set out in Step 4 below.

3.7.0 Step 3 (a) - The area to apply the sequential test for residential development

3.7.1 The PPG at paragraph 033 (reference ID: 7-033-20140306) states that:

"*For individual planning applications ……....the area to apply the Sequential Test across will be defined by local circumstances relating to the catchment area for the type of development proposed. For some developments this may be clear, for example, the catchment area for a school. In other cases, it may be identified from other Local Plan policies, such as the need for affordable housing within a town centre, or a specific area identified for regeneration……*"

The Craven Local Plan Area

3.7.2 The Craven Local Plan (CLP) was found sound by an independent planning inspector, who accepted that the Craven District is an appropriate housing

market area to plan for new housing development. Housing need has been measured for the whole district and then for the plan area itself (the latter excludes that part of the district lying within the Yorkshire Dales National Park). There has been no assessment of housing need below the plan wide area. All residential development across Craven is providing for this plan wide need. Therefore, apart from the potential exception outlined below, the plan area is the appropriate 'catchment area' to use as the area of search to identify alternative locations to develop housing on land of a lower risk from flooding.

Potential exception to the Craven Local Plan Area in tiers 1 to 4 settlements

3.7.3 Policy SP4 of the local plan seeks to ensure that the plan area wide housing need is distributed in a sustainable pattern of growth. Each individual settlement listed in the settlement hierarchy (tiers 1 to 4 settlements on page 59 of the local plan) has been given a housing provision figure to reflect this sustainable pattern of growth.

3.7.4 The local plan has sought to allocate land within these settlements so as to allow their housing provision figure to be delivered. However, if these settlement housing figures are not delivered, this threatens the ability of the plan to achieve sustainable development. Therefore, it is the council's view that, for residential proposals within or adjoining the main built up area of the settlement, where that settlement is not likely to deliver its housing numbers within the plan period, the area to apply the sequential test can be confined to within and adjoining the settlement (main built up area) itself. An important, but not conclusive, piece of information in determining whether a settlement is likely to deliver its housing numbers, is the Council's latest quarterly Settle Growth Monitoring Report of housing completions and commitments for each listed settlement.

3.7.5 Therefore, the Craven Local Plan area is the appropriate catchment area to be used to apply the sequential test, unless the Council consider that the settlement where the proposal is located is unlikely to deliver its (Policy SP4) housing numbers. In this case, the area to apply the sequential test search for alternative sites can be confined to within and adjoining the main built up area of that settlement.

3.8.0 Step 3 (b) - Identifying reasonably available sites for residential development within the Sequential Test (ST) area

3.8.1 The purpose of this step is to start to identify whether or not there are any alternative development sites within the relevant ST area (usually the plan area) which offer a lower risk of flooding than the site of the development proposed. There is no definition given in the NPPF or PPG on the meaning of 'reasonably available' sites as it relates to the ST on flood risk. The reference made in paragraph 33 of the PPG to adopting a 'pragmatic approach' on the availability of alternative sites provides guidance on an appropriate ST area.

3.8.2 However, paragraph 19 in the PPG's section on 'Housing and Economic Land Availability Assessment' provides useful guidance on housing land availability,

stating *"The existence of planning permission can be a good indication of the availability of sites."* The Council produces a quarterly Settlement Growth Monitoring Report, detailing potential housing delivery from sites with planning consent, and sites allocated in the Local Plan that do not yet benefit from planning consent. To produce these reports, the Council must identify all extant planning permissions within the District. This information can be provided to applicants by a request to the Spatial Planning team (spatialplanning@cravendc.gov.uk).

3.8.3 Paragraph 19 of the PPG also states that where a developer or landowner has expressed an intention to develop land, that land can be considered available. These sites are identified through the production of the Council's Strategic Housing and Employment Land Availability Assessments (SHELAA).

3.8.4 The Environment Agency (EA) has published its own guidance on what sites might be 'available' at https://www.gov.uk/guidance/flood-risk-assessment-the-sequential-test-for-applicants. This advises potential applicants to: *"check with your local planning authority whether there are any 'windfall sites' in your search area. Windfall sites are sites that aren't allocated in the local plan and don't have planning permission, but that could be available for development."* Craven District Council agree with this approach put forward by the EA and again, draw attention to its SHELAA which identifies such sites.

3.8.5 Hence, using the guidance in the PPG (paragraph 19) applicants are advised to draw up their list of 'reasonably available' sites in the plan area (unless different due to the circumstances stated in paragraph 3.5.6 above), from a review of the following sources:

- The Craven Local Plan sites allocated for residential development (Policies SP5 – SP10);
- Non-allocated sites with planning permission (outline, full and reserved matters approval) for residential development, identified in the Council's most recent Settlement Growth Monitoring Report; and
- The Council's SHELAA is updated annually and provides details of sites that are considered to be 'suitable, available and achievable' for development.

3.8.6 All size of sites should be identified in this step, including those sites smaller than the proposed residential development. These smaller sites may, cumulatively, be able to provide sufficient land for the amount of new homes on the proposed development. The sequential test is about the general availability of land for housing development, and not the availability of land on which a particular applicant can build houses.

3.9.0 Step 3 (c) - Which identified 'reasonably available' sites are appropriate / suitable for the proposed residential development?

3.9.1 There is no guidance in the PPG on how the wording 'appropriate for the proposed development' should be defined. However, 'appropriate sites' would be those identified as 'suitable, available and achievable' in the SHELAA. It is

the Craven District Council's view that all alternative sites identified in Step 3 (b) be considered appropriate for the proposed development unless:

- The development of the alternative site would be in conflict with the policies of the Craven Local Plan and in particular Policy SP4: Spatial Strategy and Housing Growth; or
- The development of the alternative site is clearly not suitable for the type of housing proposed on the potential application site.

3.10.0 Step 3 (d) - Are there any available and appropriate alternative sites of lower fluvial flood risk than the proposed residential development site?

3.10.1 The flood risk of any available and appropriate alternative sites identified in Step 3 (c) should now be compared with the flood risk of the proposed application site. The starting point for this comparison will be the Council's Strategic Flood Risk Assessment and the Environment Agency's most up to date flood risk mapping (see Step 1 above). The Environment Agency (EA) has published the related information within their guidance note, available at: https://www.gov.uk/guidance/flood-risk-assessment-the-sequential-test-for-applicants and the relevant information text is as follows:

"You need to compare the risk of flooding at the site you're proposing to use with the risk of flooding at the alternative sites you've identified. You can use the following resources to compare flood risk:

- *the Environment Agency's Flood Map for Planning*
- *the Environment Agency's Long Term Flood Risk Information*
- *a strategic flood risk assessment if one's been adopted as part of the local plan - contact your local authority to check this and to get a copy*
- *existing flood risk assessments on the sites - contact your local planning authority to get these*
- *any other source of flooding information (e.g. surface water management plans from your lead local flood authority)*

If the sites you're comparing are in the same flood zone and you compare them using the Environment Agency flood map, you'll have to use at least one other method of comparison as well as the flood map to get sufficient detail."

3.10.2 Applicants are recommended to have early discussions with the Council and the EA as to what are the most appropriate flood mapping/assessments to use at that time. Contact details at the time of publication for the Council's Development Management (DM) team are: *planning@cravendc.gov.uk* The outcome of the above comparison will be the conclusion on whether there are or are not any alternative sites which are of a lower flood risk than the application site proposal.

3.11.0 Step 3 (e) - The applicant's report on the Sequential Test

3.11.1 A written report of the applied fluvial flood risk sequential test should be submitted to Craven District Council alongside the relevant planning application. This report should list all the sites identified at Steps 3 (b), (c) and (d) above, give reasons why sites have or have not been taken forward from one step to the other, and set out the flood risk position of each site to compare with the application site. As well as information on flood risk from rivers, details of other sources of flood risk need to be included in the report.

3.11.2 The Environment Agency has published guidance about information applicants should provide on these sites. This guidance can be found at: https://www.gov.uk/guidance/flood-risk-assessment-the-sequential-test-for-applicants.

3.11.3 As stated in this guidance, the Council will need information on the number of dwellings likely to be delivered on each site. For sites with planning permission, the sequential test should use the housing numbers granted approval, unless there are good reasons why not. For local plan allocated sites and SHELAA sites, the sequential test should use the estimated housing yield published by Craven District Council, unless there are good reasons why not. If the site has no planning permission or published housing yield, an appropriate density for that particular site/part of site should be agreed with the Council, in line with the Council's adopted local plan Policy SP3 Housing Mix and Density. The applicant can refer here to Policy SP3: Housing Mix and Density, whose objective is that the mix and density of new housing developments will ensure that land is used in an effective and efficient manner to address local housing needs.

3.11.4 The PPG, at paragraph 034 (reference ID: 7-034-20140306), states that: *" It is for local planning authorities, taking advice from the Environment Agency as appropriate, to consider the extent to which Sequential Test considerations have been satisfied, taking into account the particular circumstances in any given case."* Hence, it is the role of Craven District Council, as the Local Planning Authority, to review the sequential test and inform applicants if the sequential test has been passed.

3.12.0 Step 4 - The need for, and content of, an exception test: all development proposals

3.12.1 Paragraph 163 of the NPPF states that *'…..If it is not possible for development to be located in zones with a lower risk of flooding (taking into account wider sustainability development objectives), the exception test may have to be applied…...'*

3.12.2 Paragraph: 068 Reference ID: 7-068-20140306 of the PPG states that: *"It is advisable to contact the local planning authority to confirm whether the exception test needs to be applied and to ensure the appropriate level of information is provided".*

3.12.3 In response to the PPG above, the following text and table 3, informed by the PPG (036 Reference ID: 7-036-20140306) provides the Council's position on the need for an exception test in connection with residential development.

- If the Council is satisfied that the sequential test has been passed, and there are no suitable alternative sites (of lower flood risk) on which to build the proposed new homes, then an exception test will be necessary if the proposed residential development is within flood zone 3a and must be passed to allow the proposal to be permitted;
- If the Council considers the sequential test to have been failed because there are alternative sites (of lower flood risk) on which to build the proposed new dwellings, then an exception test is not necessary as the proposal should not be permitted.

Table 3: Sequential and Exception test requirements for residential development by flood zone

Flood Zone	Sequential Test	Exception Test
Zone 1	Not required	Not required
Zone 2	Required*	Not required
Zone 3(a)	Required	Required if sequential test passed. Not required if sequential test has been failed**
Zone 3(b)	Not required**	Not required**

*Development should not be permitted if appropriate flood zone 1 sites are available. Development may be permitted without the need for the exception test if there are no appropriate flood zone 1 sites available (see steps 3a to 3d above).
**Development should not be permitted.

3.12.4 As regards other types of development proposals, the need for the exception test will depend on the potential vulnerability of the site in flood risk terms and of the development proposed, in line with the flood risk vulnerability classifications set out in Table 3 of the PPG (See Appendix B of this SPD). The PPG indicates that an applicant should undertake the exception test if the proposed development is termed 'highly vulnerable' and in Flood Zone 2, 'essential infrastructure' in Flood Zone 3a or 3b, and 'more vulnerable' in Flood Zone 3a.

3.12.5 As set out in paragraph 164 of the NPPF (2021), the application of the exception test should be informed by the Council's SFRA and the research contained in

a site-specific flood risk assessment (FRA) being prepared for the site. For the exception test to be passed it should be demonstrated that:

(a) The development would provide wider sustainability benefits to the community that outweigh the flood risk; and
(b) The development will be safe for its lifetime taking account of the vulnerability of the land use, without increasing flood risk elsewhere, and where possible, reducing flood risk overall.

3.12.6 Part (a), paragraph 037 (Reference ID: 7-037-20140306) of the PPG recommends that the applicant can use the local authority's sustainability appraisal process to assess the overall sustainability performance of their proposal. Therefore, Craven District Council would expect applicants to demonstrate how their proposals contribute to the objectives of its own sustainability appraisal, produced for the current Craven Local Plan and available on the Council's website at: https://www.cravendc.gov.uk/planning/spatial-planning/evidence-and-monitoring/sustainability-and-habitats/.

3.12.7 The information required to satisfy part (b) should be provided in a site specific FRA (see Step 5 below). Paragraphs 23 to 26 and 35 to 42 of the PPG (Flood risk and Coastal Change) provide guidance on the content of exception tests.

3.13.0 Step 5 – Site specific Flood Risk Assessments (FRAs)

3.13.1 A site specific flood risk assessment is carried out by (or on behalf of) an applicant to assess the flood risk to and from a proposed development site. The council's local validation requirements, reflecting the PPG, states that a FRA is required to accompany planning applications for proposals where the site falls within:

- Flood Zone 1 (flooding from watercourses) and the development site has a site area of one hectare or greater, or has critical drainage problems as notified by the Environment Agency; or,
- Flood Zones 2 and 3 (flooding from watercourses); or,
- Areas identified as having a moderate or high risk of flooding from surface or ground water; or
- Non mains drainage schemes.

3.13.2 The FRA should demonstrate how flood risk will be managed now and over the proposed development's lifetime, taking climate change into account, and with regard to the vulnerability of the land use. Paragraph 030 of the PPG (Reference ID: 7-030-20140306) states that the objectives of the FRA are to establish:

- Whether a proposed development is likely to be affected by current or future flooding from any source;
- Whether it will increase flood risk elsewhere;
- Whether the measures proposed to deal with these effects and risks are appropriate;
- The evidence for the planning authority to apply (if necessary) the sequential test; and
- Whether the development will be safe and pass the exception test, if applicable.

3.13.3 Paragraphs 30 to 32 of the PPG (Flood Risk and Coastal Change) provide guidance on what a FRA should contain and includes reference to a checklist of information required: https://www.gov.uk/guidance/flood-risk-and-coastal-change#Site-Specific-Flood-Risk-Assessment-checklist-section, and two important guidance documents provided by the EA: https://www.gov.uk/guidance/flood-risk-assessment-for-planning-applications, and https://www.gov.uk/guidance/flood-risk-assessment-for-planning-applications#when-to-follow-standing-advice. Craven's Development Management team can assist in agreeing the scope of the flood risk assessment with the applicant, using the Environment Agency's standing advice on flood risk (https://www.gov.uk/guidance/flood-risk-assessment-standing-advice). This process should involve consultation with the Environment Agency and North Yorkshire County Council, as the lead local flood authority.

3.13.4 Site-specific flood risk assessments should always be proportionate to the degree of flood risk and make optimum use of information already available, including information in the Strategic Flood Risk Assessment for the Craven local plan area, and the interactive flood risk maps available on the Environment Agency's website. Hence, appropriate analysis of the SFRA and the relevant interactive flood risk maps of the EA can provide a sound basis for a site-specific flood risk assessment.

3.14.0 Outline, Reserved Matters and Planning Conditions

3.14.1 The Council may wish to encourage details relating to flood risk and water resources on or near a development site to be agreed as part of the initial permission, so that important elements are not deferred for later consideration. It can also be important to ensure that applications to discharge conditions or amend approved schemes do not undermine development quality.

3.14.2 Applications for outline planning permission should seek to establish whether the scale and nature of a proposed development would be acceptable before

fully detailed proposals are put forward. Flood risk assessment and water resource safeguarding can be considered at this stage in order to assist community engagement, inform a design and access statement (where required), and provide a framework for the preparation and submission of reserved matters proposals.

3.14.3 Pre-application advice can be used as a stage for applicants and the Council to discuss the use of planning conditions in relation to meeting the requirements of policy ENV6 & ENV8, in terms of flood risk and water resources and quality. For example, if necessary, the requirement for mitigation measures to reduce the risk of proposed development from pollution and deterioration of water resources, as required by criterion (c) of policy ENV8, may be a condition attached to a planning permission. Hence there is an opportunity for prospective applicants and the Council to discuss the intended approach to a site and how flood risk and water quality policies and guidance need to be applied.

Appendix A

Policy ENV6: Flood Risk

Growth in Craven will help to avoid and alleviate flood risk in the following ways:

a) *Development will take place in areas of low flood risk wherever possible and always in areas with the lowest acceptable flood risk, by taking into account the development's vulnerability to flooding and by applying any necessary sequential and exception test;*
b) *Development will safeguard waterways and benefit the local environment (aesthetically and ecologically) by incorporating sustainable drainage systems (SuDS); where the use of SuDS is not possible, feasible or appropriate other means of flood prevention and water management should be used. All surface water drainage systems (SuDS or other) should be economically maintained for the lifetime of the development;*
c) *Development will maintain adequate and easy access to watercourses and flood defences, so that they may be managed and maintained by the relevant authority;*
d) *Development will avoid areas with the potential to increase flood resilience, and seek to enhance as far as possible the natural capacity of soils, vegetation, river floodplains, wetland and upland habitats to reduce flood risk;*
e) *Development will minimise the risk of surface water flooding by ensuring adequate provision for foul and surface water disposal in advance of occupation (as per standards set out by the Environment Agency and subsequent updates to the standards, see Appendix C). Surface water should be managed at the source and not transferred, and every option should be investigated before discharging surface water into a public sewerage network;*
f) *Development will maximise opportunities to help reduce the causes and impacts of flooding by ensuring adequate sufficient attenuation and long term storage is provided to accommodate storm water on site without risk to people or property and without overflowing into a watercourse (as per standards set out by the Environment Agency and subsequent updates to the standards, see Appendix C).*

In all of the above, it will be important to refer to the latest and best flood risk information from Craven's strategic flood risk assessment and any relevant site-specific flood risk assessment, plus advice from the Environment Agency and the contents of the NPPF.

POLICY ENV8: Water Resources, Water Quality and Groundwater

Growth in Craven will help to safeguard and improve water resources in the following ways:

Water Resources

a) Development will be served by adequate sewerage and waste water treatment infrastructure, which matches the type, scale, location and phasing of the development, and which safeguards surface and ground water resources;

b) Development will maximise opportunities for the incorporation of water conservation into its design, including the collection and re-use of water on site;

Water Quality

c) Development will reduce the risk of pollution and deterioration of water resources by anticipating any likely impact and incorporating adequate mitigation measures into the design;

d) Development will not lead to pollution of controlled waters in line with the requirements of the Water Framework Directive;

Groundwater

e) Developers will protect surface and groundwater from potentially polluting development and activity, by carrying out preliminary site investigations prior to permission being granted to ensure that land is suitable for the intended use;

f) Developers will ensure that sources of groundwater supply are protected by guiding development away from identified Source Protection Zones (SPZ), i.e. areas close to drinking water sources where the risk associated with groundwater contamination is greatest. The Source Protection Zones in the Craven plan area are shown on the Proposals Map.

Appendix B: Flood Risk Vulnerability Tables from the PPG

Table 1: Flood risk vulnerability classification

Essential infrastructure

- Essential transport infrastructure (including mass evacuation routes) which has to cross the area at risk.
- Essential utility infrastructure which has to be located in a flood risk area for operational reasons, including electricity generating power stations and grid and primary substations; and water treatment works that need to remain operational in times of flood.
- Wind turbines.

Highly vulnerable

- Police and ambulance stations; fire stations and command centres; telecommunications installations required to be operational during flooding.
- Emergency dispersal points.
- Basement dwellings.
- Caravans, mobile homes and park homes intended for permanent residential use.
- Installations requiring hazardous substances consent. (Where there is a demonstrable need to locate such installations for bulk storage of materials with port or other similar facilities, or such installations with energy infrastructure or carbon capture and storage installations, that require coastal or water-side locations, or need to be located in other high flood risk areas, in these instances the facilities should be classified as ‘Essential Infrastructure’).

More vulnerable

- Hospitals
- Residential institutions such as residential care homes, children’s homes, social services homes, prisons and hostels.
- Buildings used for dwelling houses, student halls of residence, drinking establishments, nightclubs and hotels.
- Non–residential uses for health services, nurseries and educational establishments.
- Landfill* and sites used for waste management facilities for hazardous waste.
- Sites used for holiday or short-let caravans and camping, subject to a specific warning and evacuation plan.

Less vulnerable

- Police, ambulance and fire stations which are not required to be operational during flooding.
- Buildings used for shops; financial, professional and other services; restaurants, cafes and hot food takeaways; offices; general industry, storage and distribution; non-residential institutions not included in the ‘more vulnerable’ class; and assembly and leisure.
- Land and buildings used for agriculture and forestry.

- Waste treatment (except landfill* and hazardous waste facilities).
- Minerals working and processing (except for sand and gravel working).
- Water treatment works which do not need to remain operational during times of flood.
- Sewage treatment works, if adequate measures to control pollution and manage sewage during flooding events are in place.

Water-compatible development

- Flood control infrastructure.
- Water transmission infrastructure and pumping stations.
- Sewage transmission infrastructure and pumping stations.
- Sand and gravel working.
- Docks, marinas and wharves.
- Navigation facilities.
- Ministry of Defence defence installations.
- Ship building, repairing and dismantling, dockside fish processing and refrigeration and compatible activities requiring a waterside location.
- Water-based recreation (excluding sleeping accommodation).
- Lifeguard and coastguard stations.
- Amenity open space, nature conservation and biodiversity, outdoor sports and recreation and essential facilities such as changing rooms.
- Essential ancillary sleeping or residential accommodation for staff required by uses in this category, subject to a specific warning and evacuation plan.

” * “ Landfill is as defined in Schedule 10 of the Environmental Permitting (England and Wales) Regulations 2010.

Table 2: Flood Zones and Flood Risk Vulnerability Classification

	Essential Infrastructure	Highly vulnerable	More vulnerable	Less vulnerable	Water Compatible
Flood Zones					
Zone 1	Yes	Yes	Yes	Yes	Yes
Zone 2	Yes	Exception Test required	Yes	Yes	Yes
Zone 3a^	Exception Test required^	No	Exception Test required	Yes	Yes
Zone 3b*	Exception Test required*	No	No	No	Yes*

Key:

Yes: Development is appropriate

No: Development should not be permitted

Appendix C: Suggested mitigation measures to reduce risk of pollution and deterioration of water resources (ENV8 Criteria c & d)

Below is a list of suggested measures to mitigate the pollution risk of water bodies during site development in order to meet requirements set out in criteria c) & d) of policy ENV8:

- All works associated with any proposed on-site wastewater treatment system will be carried out in accordance with Environment Agency and current Building Regulations standards. Its installation should be by an experienced contractor and supervised by a qualified engineer;
- Fuels, lubricants and hydraulic fluids for equipment used on the site will be carefully handled to avoid spillage, properly secured against unauthorised access or vandalism, and provided with spill containment;
- All construction waste materials will be stored within the confiners of the site, prior to removal from the site to a permitted waste facility. Waste oils and hydraulic fluids will be collected in leak-proof containers and removed from the site for disposal or recycling;
- Vehicles will never be left unattended during refuelling. Only dedicated trained and competent personnel will carry out refuelling operations and plant refuelling procedures shall be detailed in the contractor's method statements;
- Potential impacts caused by spillages etc. during the construction phase will be greatly reduced by keeping spill kits and other appropriate equipment on-site;
- The materials, equipment or vehicles on site that are used to implement the proposed works should not come into contact with the waters of any nearby water body at any stage, for washing purposes or otherwise.
- The incorporation of sustainable urban drainage systems (SuDS) to minimise the risk of pollution of water resources.

Appendix D: Glossary

Area for Further Assessment (AFA): Areas where, based on the Preliminary Flood Risk Assessment, the risks associated with flooding are considered to be potentially significant. For these areas further, more detailed assessment is required to determine the degree of flood risk, and develop measures to manage and reduce the flood risk.

Climate change: Climate change refers to long-term shifts in temperatures and weather patterns. These shifts may be natural, such as through variations in the solar cycle. But since the 1800s, human activities have been the main driver of climate change, primarily due to burning fossil fuels like coal, oil and gas.

Consequences (flooding): The impacts of flooding, which may be direct (e.g., physical injury or damage to a property or monument), a disruption (e.g., loss of electricity supply or blockage of a road) or indirect (e.g., stress for affected people or loss of business for affected commerce).

Drainage: Works to remove or facilitate the removal of surface or sub-surface water, e.g., from roads and urban areas through urban storm-water drainage systems, or from land through drainage channels or watercourses that have been deepened or increased in capacity.

Flood: The temporary covering by water of land that is not normally covered by water, and the flood extent is often represented on a flood map.

Flood Hazard Map: A map indicating areas of land that may be prone to flooding, referred to as a flood extent map, or a map indicating the depth, velocity or other aspect of flooding or flood waters for a given flood event. Flood hazard maps are typically prepared for either a past event or for (a) potential future flood event(s) of a given probability.

Flood Risk Management Plan: A Plan setting out a prioritised set of measures within a long-term sustainable strategy aimed at achieving defined flood risk management objectives. The plan is developed at a River Basin (Unit of Management) scale, but is focused on managing risk within the AFAs.

Floodplain: The area of land adjacent to a river or coastal reach that is prone to periodic flooding from that river or the sea.

Fluvial: Riverine, often used in the context of fluvial flooding, i.e., flooding from rivers, streams, etc.

Hydrology: The science of the natural water cycle, often used in this context in relation to estimating the rate and volume of rainfall flowing off the land and of flood flows in rivers.

National Planning Policy Framework: This document sets out the government's planning policies for England and how these policies are expected to be applied. The document was last updated in July 2021.

Receptor: Something that may suffer harm or damage as a result of a flood, such as a house, office, monument, hospital, agricultural land or environmentally designated sites.

Risk (flooding): The combination of the probability of flooding, and the consequences of a flood.

Runoff: The flow of water over or through the land to a waterbody (e.g., stream, river or lake) resulting from rainfall events. This may be overland, or through the soil where water infiltrates into the ground.

Surface Water: Water on the surface of the land. Often used to refer to ponding of rainfall unable to drain away or infiltrate into the soil.

Topography: The shape of the land, e.g., where land rises or is flat.

Vulnerability: The potential degree of damage to a receptor (see above), and/or the degree of consequences, that could arise in the event of a flood.

Water Framework Directive: This directive (2000/60/EC) aims to protect surface, transitional, coastal, and ground waters to protect and enhance the aquatic environment and promote sustainable use of water resources.