

Strategic Flood Risk Assessment - Summary paper

The full report is available to view and download at:

Full Report:

www.melton.gov.uk/downloads/download/634/melton_strategic_flood_risk_assessment

Appendix A:

www.melton.gov.uk/downloads/download/635/melton_strategic_flood_risk_assessment_appendix_a

Appendix B:

http://www.melton.gov.uk/downloads/file/2374/melton_strategic_flood_risk_assessment_appendix_b

Appendix C , D, F and G

http://www.melton.gov.uk/directory_record/9485/melton_strategic_flood_risk_assessment_appendix_c_d_f_and_g

Appendix E:

http://www.melton.gov.uk/directory_record/9481/melton_strategic_flood_risk_assessment_appendix_e

Appendix H:

http://www.melton.gov.uk/directory_record/9480/melton_strategic_flood_risk_assessment_appendix_h

Appendix Index Map:

http://www.melton.gov.uk/directory_record/9484/melton_strategic_flood_risk_assessment_appendix_index_map

1. Background

- 1.1 The National Planning Policy Framework advises that Local Plans should be supported by a Strategic Flood Risk Assessment (SFRA) in order to provide evidence to inform a Council's choice of allocations and policies. In order to achieve this, an SFRA for the Borough of Melton was completed in March 2015. This replaces the 2008 SFRA.
- 1.2 The SFRA will be used to inform the preferred location of future development and the formulation of flooding policies in the Council's emerging Local Plan. It can also be used in decision making on planning applications. It uses the latest information to show areas of high and low flood risk.
- 1.3 The SFRA is a Borough wide assessment, but also provides more detailed evidence in relation to eight large scale development sites that were identified in the Emerging Local Plan and the Council's Strategic Housing Land Availability Assessment. The SFRA

seeks to provide a framework for flood risk assessment of future site options and provides a framework for the 'Sequential Test'¹ of sites and, where necessary, the 'Exception test'².

2. SFRA content

2.1 The main content of the SFRA includes:

- An updated flood map covering the Borough of Melton, including Main River, Ordinary Watercourse, surface water and groundwater flooding and the location of the functional floodplain;
- An assessment of the effectiveness of 'flood risk' protection provided by existing infrastructure;
- An assessment of eight large scale Strategic Development Site Options, including: the north and south of Melton Mowbray; Welby; Thorpe Arnold; Bottesford, Six Hills and Normanton & Dalby airfields. The SFRA considered the potential flooding impacts of these developments both within and outside the Borough of Melton; and
- An updated review of historic flooding incidents, potential flood hazards and an assessment of the potential increase in flood risk due to climate change.

3. Key findings

3.1 The SFRA identified that Melton Borough will experience a variety of sources of flooding, including flooding from rivers and water-courses and surface water flooding. The areas at risk are shown on a Borough-wide flood zone map and a series of more local flood maps in areas where there is potential for growth.

3.2 The cumulative impact of development has been considered along with an assessment of potential cross-boundary issues. The SFRA does not identify any 'show-stopping' flooding constraints in the context the proposed levels of growth. It does, however, make recommendations in relation to potential mitigation measures that would help to mitigate any impacts including:

- The provision of Sustainable Drainage Systems (SuDS) and other measures to regulated surface water infiltration;
- Incorporating Green Infrastructure; and,

¹ This approach is designed to ensure areas with little or no risk of flooding (from any source) are developed in preference to areas at higher risk.

² The 'Exceptions' test is applied when, following the Sequential Test, it is not possible to meet development needs in areas with a lower probability of flooding (zones 1 and 2). The aim of the Exception Test is to ensure that more vulnerable property types, such as residential development can be implemented safely and are not located in areas where the hazards and consequences of flooding are inappropriate.

- Seeking to ensure that detailed designs incorporate measures to avoid areas at highest risk of flooding, including hazard free access to sites for vehicles in the event of flooding.

3.3 In the context of the Large Site options that were assessed, the SFRA concludes that there are no insurmountable flooding issues. The sites at Thorpe Arnold (15%), Bottesford (16%) and Six Hills (7%) recorded the largest percentage of land within flood zone 3. All other proposed large scale sites had less than 3% coverage of flood zones 3a and 3b. In summary, it is considered that any adverse flooding impacts were capable of being mitigated.

4. Next stages and Further work

4.1 In the context of next stages and future work, the SFRA makes the following recommendations:

- That further hydrological modelling work be carried out in relation to specific sites as they emerge, in order to assess detailed flooding implications;
- That a Sequential approach to flood risk be adopted and where necessary an exceptions test; and
- That the Local Plan incorporates policies relating to Sustainable Drainage Systems and use of Green Infrastructure for managing surface water runoff.