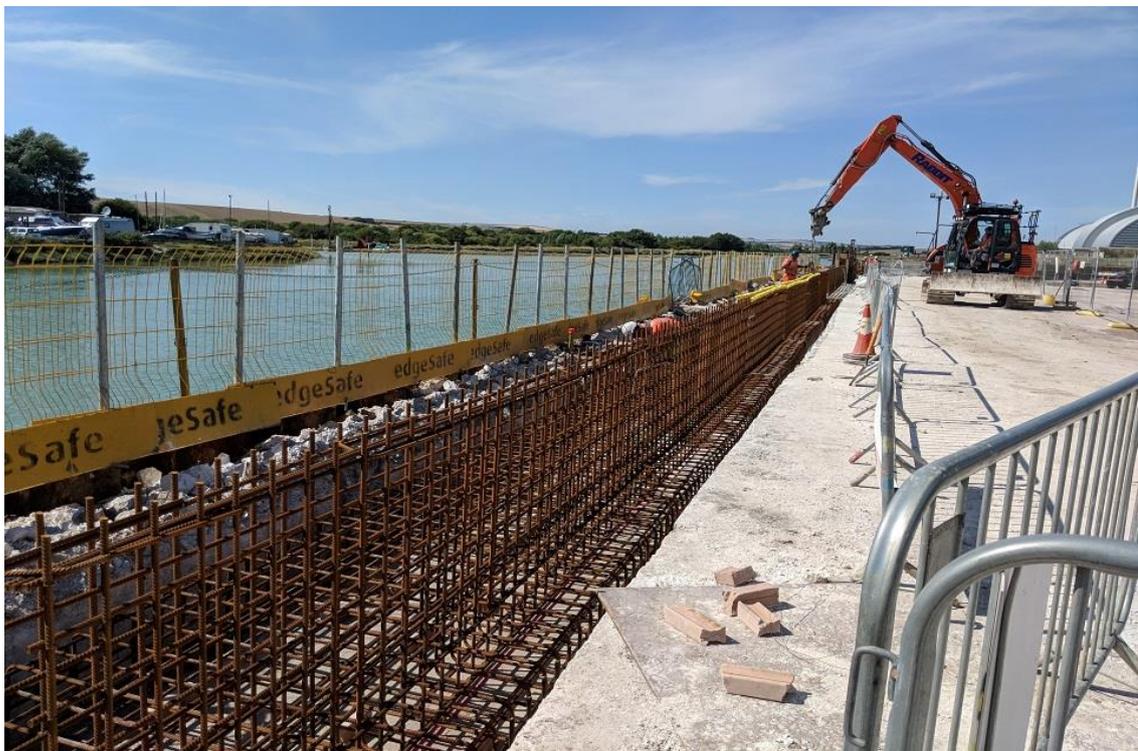




Newhaven Neighbourhood Plan 2017 – 2030



Sequential Flood Risk Test for Newhaven Neighbourhood Plan

July 2018

Contents

Section	Page
Introduction	3
Development Plans	3
Flood Risk	4
The Sequential Test and Exception Test	6
Analysis of Proposed Development	7
Site Identification Process	9
Results	10
Conclusion	21
Table 1: Summary of fluvial Flood Risk Zones	4
Table 2: Flood risk Vulnerability and flood zone compatibility	7
Table 3: Screening Criteria	10
Table 4: Newhaven Neighbourhood Plan allocation sites.	11
Table 5: Alternative sites which fall within Flood Zone 1	15
Table 6: Site Profiles – Sites which are Screened in to the Sequential Test	18
Appendix A - Flood Risk Vulnerability Classification	24
Map 1 – Extent of Flood Zone 3 within Newhaven	5
Map 2 – Neighbourhood Plan Designated Area	8

1. Introduction

- 1.1 This Sequential Test has been prepared to assess the flood risk of all sites that have been identified for potential development in the Newhaven Neighbourhood Plan. Flood risk is a key consideration in the site selection process. The purpose of this report is to demonstrate that even though some of the sites identified through the Neighbourhood Development Plan contain areas of flood risk, these areas are appropriate in the context of the Sequential and Exception Tests which are required as part of the National Planning Policy Framework 2012 (NPPF).
- 1.2 The sequential test draws upon information gathered and detailed within the Lewes District Council's Strategic Flood Risk Assessment (SFRA) (October 2009¹). The tests follow the steps outlined in the NPPF and accompanying technical guidance.
- 1.3 The NPPF requires Plans such as the District Plan and Neighbourhood Plans to "apply a sequential, risk-based approach to the location of development to avoid where possible flood risk to people and property and manage any residual risk, taking account of the impacts of climate change, by applying the **Sequential Test**, and, if necessary, applying the **Exception Test**". A sequential approach is used to steer new development to areas at the lowest risk of flooding.

2. Development Plans

- 2.1 Once adopted, the Newhaven Neighbourhood Plan will become part of the Statutory Development Plan along with the Lewes District Local Plan Part 1 Joint Core Strategy 2016 and the emerging South Downs Local Plan². The Core Strategy states that out of the 6,900 homes to be delivered in the Lewes District, a minimum of 825 homes are to be delivered in Newhaven. Spatial policy 2, allocates a minimum of 400 net additional units to be built at Harbour Heights, a large greenfield site adjacent to the cliffs in the south wester corner of the town, which leaves a minimum of 425 net additional units to be allocated in the Neighbourhood Plan.
- 2.2 The Lewes District Strategic Flood Risk Assessment (SFRA) 2009 states that the vast majority of flooding problems in the District can be attributed to the River Ouse or the

¹ <http://www.lewes-eastbourne.gov.uk/planning-policy/strategic-flood-risk-assessment-sfra/>

² <https://www.southdowns.gov.uk/planning/national-park-local-plan/>

sea (primary sources). Other flood sources such as groundwater, sewers, surface water and infrastructure failure have a limited effect in terms of extent but could have as much of an impact as the primary sources. The tidal influence along the River Ouse extends upstream from Newhaven at the mouth to Barcombe Mills. Along this stretch flooding can be caused by a combination of high tides and significant river flows that individually may not cause any problems to the system. The Environment Agency has identified seven flood warning areas within the River Ouse Catchment, five of which are within Lewes District.

3. Flood Risk

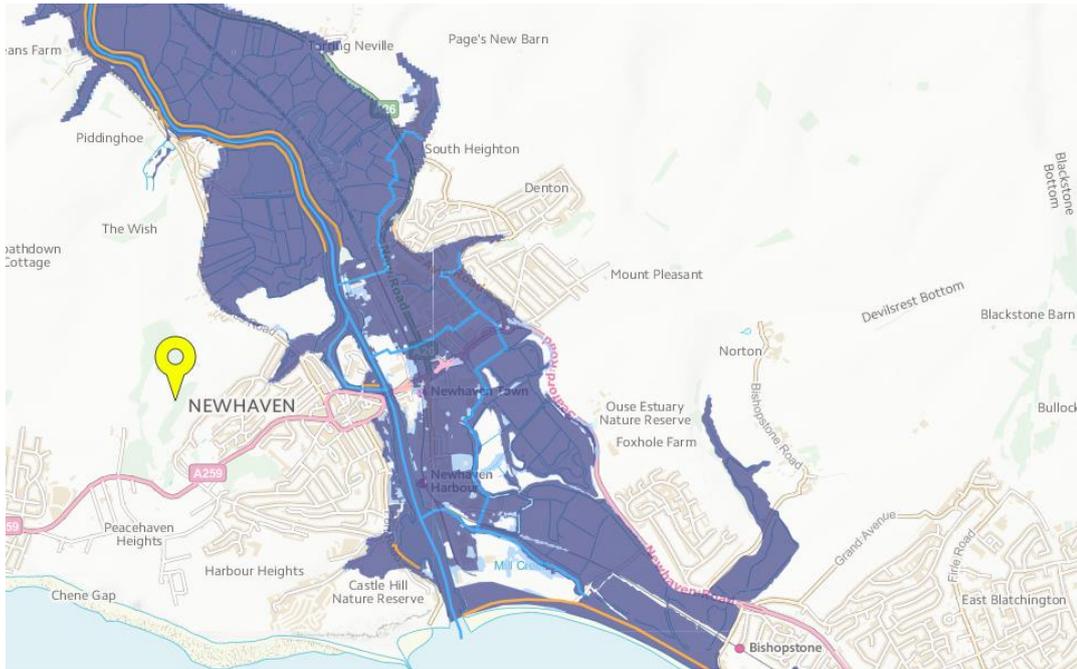
- 3.1 The definition of “flood risk” is taken from the National Planning Practice Guidance (NPPG) and refers to a combination of the probability and the potential consequences of flooding from all sources including from rivers and the sea, directly from rainfall on the ground surface and rising groundwater, overwhelmed sewers and drainage systems, and from reservoirs, holding basins canals and lakes and other artificial sources.
- 3.2 The Environment Agency (EA) provides mapping of flood risk arising from sea and river sources. Flood risk is mapped according to the probability of flooding and is expressed in three “Flood Zones”. The risk of river flooding of an area is categorised by the probability of flooding occurring in that area in any given year and these categories are summarised in Table 1.

Flood Zone	Risk of Fluvial Flooding
1	Low probability – land assessed as having a less than 1 in 1,000 annual probability of flooding (<0.1%)
2	Medium probability – land assessed as having between a 1 in 100 and 1 in 1,000 annual probability of flooding (1% -0.1%)
3a	High probability – land assessed as having a 1 in 100 or greater annual probability of flooding (>1%)
3b	This zone comprises land where water has to flow or be stored in times of flood.

Table 1: Summary of fluvial Flood Risk Zones

- 3.3 Map 1 below³ shows the extent of Flood Zone 3 (dark blue) within Newhaven.

³ <https://flood-map-for-planning.service.gov.uk/confirm-location?easting=544158.001&northing=100146.615&placeOrPostcode=newhaven>



Map 1 – Extent of Flood Zone 3 within Newhaven

3.4 The Environment Agency, in partnership with Lewes District Council, is developing a scheme to reduce flood risk from the sea⁴. The scheme will reduce the risk of flooding to approximately 430 homes and 390 businesses in and around the East Sussex town of Newhaven. The scheme will be designed to provide a 1-in-200-year standard of protection, taking into account the effects of climate change. This means that in any one year there will be a 0.5% chance that Newhaven will experience flooding from the sea. This greatly increases the flood protection to Newhaven. The scheme covers both banks of Newhaven, including the commercial areas near the port. Construction of the scheme started in January 2017 and is scheduled to be complete by autumn 2019. The scheme has been divided into 5 areas:

- Area 1: A26 to Energy Recovery Facility
- Area 2: Energy Recovery Facility to Swing Bridge (East)
- Area 3: Riverside Park to Swing Bridge (West)
- Area 4: Swing Bridge (West) to West Quay
- Area 5: Swing Bridge (East) to Newhaven Beach

3.5 Technical Guidance to the National Planning Policy Framework classifies types of development into five categories of flood risk vulnerability; essential infrastructure, highly vulnerable, more vulnerable, less vulnerable and water-compatible development.

⁴ <https://www.gov.uk/government/publications/newhaven-flood-alleviation-scheme/newhaven-flood-alleviation-scheme>

Appendix A lists the types of development that are classified under each flood risk vulnerability classification.

4.0 The Sequential Test and Exception Test in preparation of a Neighbourhood Plan

- 4.1 The Sequential Test and Exception Test are processes put in place by the NPPF to ensure that development is allocated and permitted in areas of the lowest possible flood risk. The general aim is to steer development away from the medium and high risk areas (Flood Zone 2 and Flood Zone 3), however the risk from other sources of flooding must also be considered. Within each flood zone, new development should be directed first to sites at the lowest probability of flooding and the flood vulnerability of the intended use matched to the flood risk of the site, i.e. higher vulnerability uses should be located on parts of the site at lowest probability of flooding. The Sequential Test is the process to ensure that this happens.
- 4.2 The tests are not intended to prevent all development on sites liable to flooding; accepting that some form of development may have to be located here. Where required growth cannot be met by sites within Flood Zone 1, sites within Flood Zone 2 are then considered. If development cannot be accommodated within Flood Zone 2, lower risk sites in Flood Zone 3 can be considered, although the Exception Test must be applied.
- 4.3 The Exception Test is only appropriate when there are large areas in Flood Zones 2 and 3, where the Sequential Test alone cannot deliver acceptable sites but where some continuing development is necessary for wider sustainable development reasons. It may also be appropriate where restrictive national designations such as landscape, heritage and nature conservation designations prevent the availability of unconstrained sites in lower risk areas. Therefore, for the Exception Test to be satisfied, and development to be allocated, the following two criteria must be met:
1. The development must provide wider sustainability benefits to the community that outweigh flood risk.
 2. A site-specific Flood Risk Assessment must demonstrate that the development will be safe for its lifetime, taking account of the vulnerability of its users, without increasing flood risk elsewhere, and, where possible, will reduce flood risk overall.

4.4 Table 2 below shows which type of development can be appropriately located in each flood zone, and where the Exception Test is required.

Flood risk vulnerability classification		Essential infrastructure	Water compatible	Highly vulnerable	More vulnerable	Less vulnerable
Flood Zone	Zone 1	✓	✓	✓	✓	✓
	Zone 2	✓	✓	Exception test required	✓	✓
	Zone 3a	Exception test required	✓	X	Exception test required	✓
	Zone 3b functional floodplain	Exception test required	✓	X	X	X

Key: ✓ Development is appropriate.
 X Development should not be permitted.

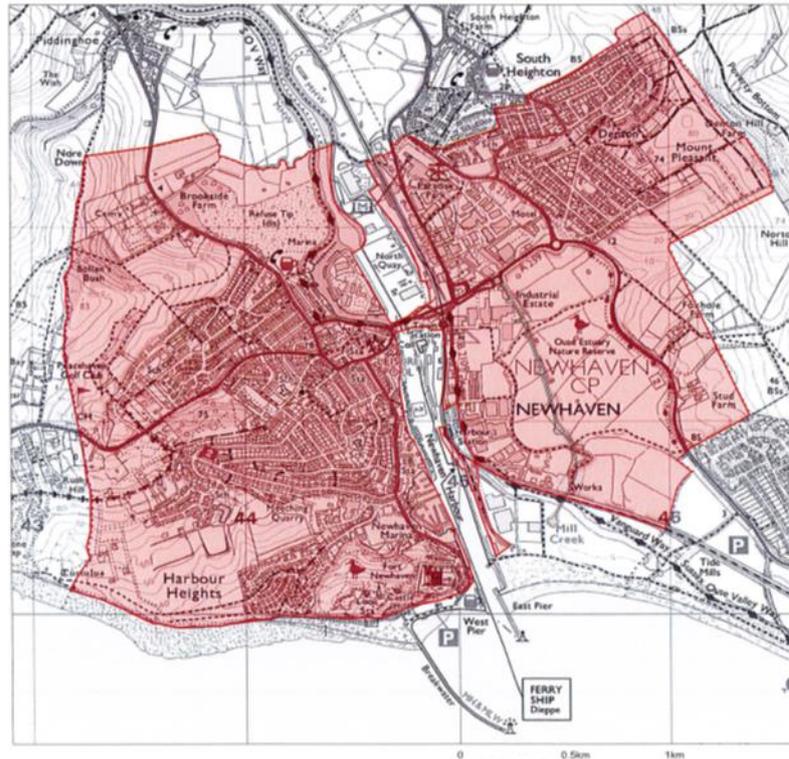
Table 2 Flood risk Vulnerability and flood zone compatibility

5. Analysis of proposed development areas identified

5.1 In accordance with national planning policy, in order for development to pass the sequential test it has to be demonstrated that there is no availability of reasonable alternative sites appropriate for the proposed development located in areas with a lower risk of flooding. Reasonable available sites are those that are deliverable and developable (as defined by the NPPF, para. 47) for the allocation proposed and:

1. The site is within the agreed area of search.
2. The site is of comparable size and can accommodate the requirements of the proposed development.
3. The site is either owned by the applicant; OR for sale at a fair market value; or is publicly owned land that has been formally declared to be surplus and is available for purchase.
4. The site is not safeguarded in the Local Plan for another use. Sites are not considered to be reasonably available if they fail to meet any of the above requirements or already have planning permission for a development that is likely to be implemented.

- 5.2 For purposes of this document, the area of search for alternative sites is the whole of the Neighbourhood Plan Area as shown on Map 2 below.



Map 2 – Neighbourhood Plan Designated Area

6. Site Identification Process

- 6.1 The Lewes District Core Strategy states that out of the 6,900 homes to be delivered in the district, a minimum of 825 homes are to be delivered in Newhaven. Spatial policy 2, allocates a minimum of 400 net additional units to be built at Harbour Heights, a large greenfield site adjacent to the cliffs in the south wester corner of the town, which leaves a minimum of 425 net additional units to be allocated in the Neighbourhood Plan.

- 6.2 Sites considered in the Neighbourhood Plan process were identified through the Lewes District Strategic Housing and Economic Land Availability Assessment and a Neighbourhood Plan 'Call for Sites' where landowners were invited to submit sites for consideration. Local residents were also asked at the consultation exercises if they were aware of any available sites.
- 6.3 Sites identified through these approaches were then assessed against a number of criteria to consider their suitability, availability and achievability for development so that a judgement could be made as to whether sites were deliverable (i.e. there is a reasonable prospect that housing will be delivered in the plan period) and developable (that the site is in an appropriate location for development and available).
- 6.4 Following the assessment of whether sites were deliverable and developable, all the sites were assessed through the Sustainability Appraisal (SA) as to the contribution they would make towards sustainable development. Sites were assessed against a range of sustainability objectives which showed which site options would bring the most positive benefits to social, economic and environmental indicators.
- 6.5 In total 42 sites were appraised by members of the Neighbourhood Plan steering group (the long list) taking into account site constraints and other matters. These were appraised against the original set of sustainability objectives. The objectives have since been refined and amended and are now included within the SA. The list of the 42 sites can be found on the Town Council's website. Following this assessment, a short list of preferred sites was compiled. Out of the list of preferred sites, those that were selected by Newhaven Town Council as best meeting the objectives of the Neighbourhood Plan and Sustainability Appraisal were allocated in the Neighbourhood Plan. The allocated sites are shown below in Table 4.

7 Results

- 7.1 A simple 'colour-coding' assessment methodology has been used, as shown below to screen the allocated sites and ascertain the likelihood of flooding. In this respect, the likelihood of flooding for sites categorised as green is unlikely/low, therefore these sites pass the Sequential Test and are 'screened out' from further assessment. Sites

categorised with a (red) likelihood of flooding, were 'screened in' to undergo further assessment.

Screening Criteria	
Passes Sequential Test and screened out	Development sites located wholly within Flood Zone 1
Does not pass Sequential Test and is screened in for further assessment	Development sites located within Flood Zones 2 or 3

Table 3 Screening Criteria

7.2 Table 4 set out below shows the following:

- Sites allocated within the Neighbourhood Plan.
- The existing flood risk characteristics of these locations.
- The existing land use(s) of each area.
- The proposed use(s) of each area.

Table 4 Newhaven Neighbourhood Plan allocation sites.

Location	Flood risk zone/s (area of site within flood zone)	Existing Uses	Proposed Development	Flood vulnerability classification ⁵	Screened in or out of further consideration?
Policy H2: Newhaven's Former Police Station, South Road	Eastern edge (1m) within flood zone 2 and 3a,	Brownfield site – now a redundant Police station	Minimum of 18 dwellings	More vulnerable ⁶	IN
Policy H3: Housing sites on Eastside - Seahaven Caravans	Flood zone 2 and 3	Brownfield site currently used for car sales and storage	Minimum of 22 dwellings	More vulnerable	IN
Policy H3: Housing sites on Eastside- Land East of Reprodux House	Flood zone 2	Brownfield site used for warehouse and storage	Minimum of 80 dwellings	More vulnerable	IN
Policy H3: Housing sites on Eastside - Bevan Funnell site	Flood zone 2	Brownfield site used for warehouse and storage	Minimum of 60 dwellings	More vulnerable	IN
Policy H3: Housing sites on Eastside – Beach Road	Flood Zone 3	Business units	Minimum of 60 dwellings	More vulnerable	IN
Policy H3: Housing sites on Eastside - Land west of Railway Road	Flood Zone 3	Business units	Minimum of 28 dwellings	More vulnerable	IN
Policy H4: Robinson Road Depot, Robinson Road	Eastern tip with flood zones 2 and 3	Brownfield land used for parking of the District	Minimum of 40 dwellings	More vulnerable	IN

⁵ See Appendix A

⁶ Provided there is no basement living accommodation

		Council's refuse lorries.			
Policy H5: Town Centre, Lower Place	Flood Zone 1	Public carpark	Part of total of minimum of 110	More vulnerable	OUT
Policy H5 Town Centre, Multi Storey	Flood Zone 1	Public Car Park	Part of total of minimum of 110	More vulnerable	OUT
Policy H5: Town Centre, Land at the former Co-op building	Flood Zone 1	Previously a retail unit now empty	Part of total of minimum of 110	More vulnerable	OUT
Policy H5: Town Centre Seahaven Swimming Pool	Flood Zone 1	Leisure Centre	Part of total of minimum of 110	More vulnerable	OUT
Policy H6: Former Lewes District Council Offices, Fort Road	Flood Zone 1	Former council office building	Minimum of 8 dwellings	More vulnerable	OUT
Policy H7: Former Grays School	Flood Zone 1	Former school has been identified by East Sussex County Council as being surplus to requirements	Minimum of 30 dwellings	More vulnerable	OUT
Policy H8: Old Conservative Club, South Way	Flood Zone 1	The former Conservative Club was destroyed by fire and now an empty site.	Minimum of 10 dwellings	More vulnerable	OUT

- 7.3 Five sites are considered to be at low risk of fluvial or tidal flooding (see green colour coding in Table 4) and therefore pass the Sequential Test.
- 7.4 In total, seven out of the 14 allocated sites in the Newhaven Neighbourhood Plan are considered to be at risk of fluvial or tidal flooding because all or part of the site is located within Flood Zones 2 or 3 and do not pass the Sequential Test. These sites are therefore subject to further consideration and are:

- Policy H2: Newhaven's Former Police Station, South Road
- Policy H3: Housing sites on Eastside - Seahaven Caravans
- Policy H3: Housing sites on Eastside- Land East of Reprodux House
- Policy H3: Housing sites on Eastside - Bevan Funnell site
- Policy H3: Housing sites on Eastside – Beach Road site
- Policy H3: Housing sites on Eastside - Land west of Railway Road
- Policy H4: Robinson Road Depot, Robinson Road

- 7.5 For these seven sites, further analysis was required in terms of:
- Could the proposed site allocation be alternatively located in a site wholly within Flood Zone 1?
 - Can the more sensitive development use types be directed to parts of the site where the risks are lower for both occupiers and the premises themselves?

A Site Profile is presented in Table 6 for each of the seven sites which require further consideration

- 7.6 Table 5 below sets out the alternative available sites which fall within Flood Zone 1 but were not selected as allocations. These sites were not selected because they do not meet the objectives of the Neighbourhood Plan and/or are too small to be allocated. In some cases, allocating these sites could result in potential significant negative effects as identified through the SA objectives relating to biodiversity, sustainable transport, impact on National Park/landscape quality and re-using brownfield land. Table 5 demonstrates that there are no alternative sites considered to be available within the Neighbourhood Plan Area.

Table 5: Alternative sites which fall within Flood Zone 1

Site name	No. of proposed dwellings	Flood Zone	Reason site doesn't meet NP and SA objectives
Southern Water Pumping Station Site, Fort Road	6	Mostly Flood Zone 1 but small part in Flood Zone 3	Brownfield site and within walking distance of bus services to town centre which is approximately 900m from site. Small north section within flood zone 3. Slight impact on areas of historic interest. In addition, the site may contain contamination associated with sewage works. Site too small for allocation
Land to West of St Luke's Court	12	Flood Zone 1	Site is within walking distance of town centre services and public transport links however may not be accessible for those with mobility problems. Adjacent to Meeching Down SNCI so possible impact on biodiversity. The site is greenfield.
Part of the former ASDA site, Eastside	66	Large part in Flood Zone 1 but also 2 and 3.	This site was originally within the Regulation 14 NP. However, following comments received during the consultation period, it is now excluded from the NP. Site is greenfield site which is located some distance away from services in the town centre but walking distance to the train station and out of town retail park. It is located within the Enterprise Zone.
Hill Road (Rear of 7-10 Park Drive Close), Denton	8	Flood Zone 1	Greenfield site within the National Park. Small part of north corner in Archaeological Notification Area. It is within walking distance of bus stop, local convenience store and primary school. Fairly steep gradients which means accessibility will be difficult for some.
Hill Road, Denton (South of Site 5 above)	8	Flood Zone 1	As above.

Land at the Crescent, Denton	3	Flood Zone 1	Greenfield site on edge of urban location which acts as a buffer to National Park. Unsustainable location and too small for allocation.
Land at Crest Road, Denton	8	Flood Zone 1	Greenfield site on edge of urban location. Unsustainable location.
South of Valley Road	24	Flood Zone 1	Site is greenfield land located at north west edge of Newhaven town. Site is located outside the National Park and within walking distance of primary school and bus stop and just over 800m to town centre shops and services but due to topography, it is not accessible for many and is in proximity to the rural hinterland of Newhaven.
South side of Western Road	8	Flood Zone 1	This is part greenfield/part brownfield garage area but the area for development is brownfield. It is not easily accessible by pedestrians with mobility issues although it is in close proximity to a local shop. It is not on a bus route.
Land at Kings Avenue	2	Flood Zone 1	Greenfield site on edge of urban development. It is adjacent to SNCI. Limited opportunities to use sustainable transport. These relate to accessibility and distance from facilities as well as supporting sustainable forms of transport. Too small for allocation.
Land north of Holmesdale Road, Denton (Mount Pleasant)	21	Flood Zone 1	Greenfield site located adjacent to National Park. Reads as part of the landscape of the National Park and occupies an elevated position. Access to site is difficult as both adjacent roads are private unadopted tracks which require upgrading. No on-site historical or environmental designations, but within 200m of SNCI. Not within walking distance of town centre. Bus stop and local convenience shop approx. 400m from site.
Multi Story Car Park, Dacre Road	24	Flood Zone 1	Site is brownfield within the town centre and walking distance to the train station. However, it is located within the EZ and would result in the loss of a car park.

Neills Close	2	Flood Zone 1	This is a greenfield site that is currently surplus garden space within the urban area. It is too small to allocate.
Plot of land south of Mariners Wharf, Fort Road	4	Flood Zone 1	Greenfield site. Although there is a bus service to the town, the site is considered isolated from the main town centre and station. In close proximity to flood zone 3. It is too small to allocate.
South of Shakespeare Hall, Fort Road	2	Flood Zone 1	Greenfield site. Although there is a bus service to the town, the site is considered isolated from the main town centre and station. In close proximity to flood zone 3. Significant negative impact also on areas of historic interest. Too small to allocate.
Garages at Valley Road	4	Flood Zone 1	This is a small site of existing garages. It is located some distance away from the town centre and train station and not accessible for those with mobility problems. It is too small to allocate.
1, Nore Road	15	Flood Zone 1	This site is located outside of the current development boundary of Newhaven by some distance and forms part of the important green gap between Newhaven and Peacehaven. The site 'reads at part of the wider landscape and is part of green strip of land that borders the A259 forming part of the countryside that surrounds the town. In sustainable access terms, the site functions poorly as it is remote from shops and facilities, other than a bus service.

- 7.7 As stated earlier, Paragraph 102 of the NPPF establishes the need for the Exception Test to be applied where it is not possible for development to be located within areas with a lower probability of flooding. For the Exception Test to be passed it must be demonstrated that: the development provides wider sustainability benefits to the community that outweigh flood risk; and a site-specific flood risk assessment must demonstrate that the development will be safe for its lifetime taking account of the vulnerability of its users.
- 7.8 The Site Profiles outlined in Table 6 below contain information to show how a proposed site allocation would meet the Exception Test if it is proven necessary for any of the proposed housing development to be located within Flood Zone 3. Information on the sustainability benefits of the proposed allocation is provided. Each of the sites could pass the Exception Test based on their contributions to meeting the Neighbourhood Plan objectives and the positive sustainability benefits the sites will deliver. All of the allocations 'screened in' to the Sequential Test will need to be subject to deliver flood resilient design that is evaluated in a site specific Flood Risk Assessment (FRA).

Table 6 Site Profiles – Sites which are Screened in to the Sequential Test

Site Name and Address	Policy H2: Newhaven's Former Police Station, South Road
Flood Risk	Eastern edge (1m) within flood zone 2 and 3a
Screening Decision	IN
Can the development be alternatively located to a site wholly within Flood Zone 1?	No
Can the more sensitive development use types be directed to parts of the site where the risks are lower for both occupiers and the premises themselves?	As a small part of the site is within Flood Zones 2 and 3, it is possible that more sensitive uses could be directed to the parts of the site which are less at risk from flooding. A site-specific FRA would determine this and would be able to more accurately determine the Flood Risk Zones on site.
Exception Test	Site could pass the sustainability elements of the Exception Test on the basis of its contribution to meeting the NP objectives and the positive sustainability benefits the site will deliver. Mitigation to be flood resilient design and evaluated in a site specific FRA. This is a brownfield site – now a redundant Police station. It is a sustainable site, within walking distance of town centre services, bus stops, train station, health facilities and primary school. However, it is within an archaeological notification area. The location of the site on a street

	corner and fronting the A259 provides an opportunity to provide a landmark and distinctive building. Residential development on this site could be car light or car free, owing to the sites proximity to day to day facilities.
Site Name and Address	
Policy H3: Housing sites on Eastside - Seahaven Caravans	
Flood Risk	Flood zone 2 and 3
Screening Decision	IN
Can the development be alternatively located to a site wholly within Flood Zone 1?	No
Can the more sensitive development use types be directed to parts of the site where the risks are lower for both occupiers and the premises themselves?	The site appears to be split 50/50 between Flood Zones 2 and 3. It is possible that more sensitive uses could be directed to the parts of the site which are less at risk from flooding. A site-specific FRA would determine this and would be able to more accurately determine the Flood Risk Zones on site. Flood defence works are due to be completed by 2019 which will positively impact on the site.
Exception Test	This is a brownfield site which is located in a gateway/focal position off the A26 on the approach into the town. It is currently used for car sales and storage and is located close to the town centre and nearby to train station. The site is in a highly sustainable location being adjacent to shops and the transport hub where trains and buses converge. The proximity of transport would support development being either car light or car free. The prominent location provides an opportunity for the development to make a positive qualitative impact on the character of the area, through design approached where a range of land uses are located. The site is part of a wider regeneration of Eastside focus to the Neighbourhood Plan providing a range of benefits for the town.
Site Name and Address	
Policy H3: Housing sites on Eastside- Land East of Reprodux House	
Flood Risk	Flood Zone 2
Screening Decision	IN
Can the development be alternatively located to a site wholly within Flood Zone 1?	No
Can the more sensitive development use types be directed to parts of the site	More Vulnerable uses can be accommodated within Flood Zone 2 without the need for an Exception Test. The benefits of the allocation are, however, set out below.

where the risks are lower for both occupiers and the premises themselves?	
Exception Test	This a brownfield site which is located a walking distance away from services in the town centre and the train station and out of town retail park. It is located within the EZ and will form part of a mixed use development and a central part to the regeneration of Eastside for the wider benefit of the town. Flood defence works will be completed by 2019.
Site Name and Address	Policy H3: Housing sites on Eastside - Bevan Funnell site
Flood Risk	Flood Zone 2
Screening Decision	IN
Can the development be alternatively located to a site wholly within Flood Zone 1?	No
Can the more sensitive development use types be directed to parts of the site where the risks are lower for both occupiers and the premises themselves?	More Vulnerable uses can be accommodated within Flood Zone 2 without the need for an Exception Test. The benefits of the allocation are, however, set out below.
Exception Test	As above, this a brownfield site which is located a walking distance away from services in the town centre and the train station and out of town retail park. It is located within the EZ and will form part of a mixed use development and a central part to the regeneration of Eastside for the wider benefit of the town. Flood defence works will be completed by 2019.
Site Name and Address	Policy H3: Housing sites on Eastside – Beach Road site
Flood Risk	Flood Zone 3
Screening Decision	IN
Can the development be alternatively located to a site wholly within Flood Zone 1?	No
Can the more sensitive development use types be directed to parts of the site where the risks are lower for	Has potential

both occupiers and the premises themselves?	
Exception Test	Site could pass the sustainability elements of the Exception Test on the basis of its contribution to meeting the NP objectives and the positive sustainability benefits the site will deliver. Mitigation to be flood resilient design and evaluated in a site specific FRAs above. This a brownfield site which is located a walking distance away from services in the town centre and the train station and out of town retail park. It is located within the EZ and will form part of a mixed use development and a central part to the regeneration of Eastside for the wider benefit of the town. Flood defence works will be completed by 2019.
Site Name and Address	Policy H3: Housing sites on Eastside - Land west of Railway Road
Flood Risk	Flood Zone 3
Screening Decision	IN
Can the development be alternatively located to a site wholly within Flood Zone 1?	No
Can the more sensitive development use types be directed to parts of the site where the risks are lower for both occupiers and the premises themselves?	Has potential
Exception Test	As above, site could pass the sustainability elements of the Exception Test on the basis of its contribution to meeting the NP objectives and the positive sustainability benefits the site will deliver. Mitigation to be flood resilient design and evaluated in a site specific FRA. This a brownfield site which is located a walking distance away from services in the town centre and the train station and out of town retail park. It is outside of the EZ and will form part of a mixed use development and a central part to the regeneration of Eastside for the wider benefit of the town. Flood defence works will be completed by 2019.
Site Name and Address	Policy H4: Robinson Road Depot, Robinson Road
Flood Risk	Eastern tip with Flood Zones 2 and 3
Screening Decision	IN
Can the development be alternatively located to a site	No

wholly within Flood Zone 1?	
Can the more sensitive development use types be directed to parts of the site where the risks are lower for both occupiers and the premises themselves?	Yes. There is only a small part of the site outside Flood Zone 1. It is possible that more sensitive uses could be directed to the parts of the site which are less at risk from flooding. A site-specific FRA would determine this and would be able to more accurately determine the Flood Risk Zones on site.
Exception Test	Site is a brownfield urban location and is highly visible as seen from the river and old town. Currently commercial premises and operational Council Depot. Within walking distance of town centre shops, health centre and primary school. Within 400m of bus stop and 800m of train station. Potential new scheme could include new commercial/retail premises.

8. Conclusion

- 8.1 This report has assessed the sites proposed for allocation in the Newhaven Neighbourhood Plan against their vulnerability to flooding. Seven sites out of the 14 allocations in the Neighbourhood Plan, that were screened for flood risk, contain land that is within Flood Zone 2 and/or 3. These sites have been subject to more detailed analysis in terms of: whether any reasonable alternative sites within Flood Zone 1 or 2 were available that would still meet the objectives of the Lewes Neighbourhood Plan; and whether more vulnerable uses could be accommodated within sites on areas of lower flood risk.
- 8.2 Alternative sites within Flood Zones 1 and 2 have been considered but the findings identified that the alternatives sites do not meet the Neighbourhood Plan and SA objectives to the extent that the selected sites do. The alternative sites could also result in a number of significant negative sustainability impacts.
- 8.3 Consideration has also been undertaken to determine whether the more sensitive development use types within the 'screened in' sites can be directed to parts of the site where the risks are lower for both occupiers and the premises themselves. In some examples, this may be possible but site specific FRA may be required in order to undertake this in detail.

8.4 The Exception Test has therefore been applied to the site allocations which fall within or contain areas within Flood Zones 2 and 3 where no alternative sites are available within Flood Zone 1. The Exception Test in Table 6 set out the wider sustainability benefits to the community that these allocations would provide. This shows that each of the sites could pass the Exception Test based on their contributions to meeting the Neighbourhood Plan and SA objectives and the positive sustainability benefits the sites will deliver. The allocations 'screened in' to the Sequential Test will need to be subject to deliver flood resilient design that is evaluated in a site-specific Flood Risk Assessment (FRA).

APPENDIX A 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 stations, ambulance stations and fire stations and command centres and telecommunications installations required to be operational during flooding.
- Emergency dispersal points.
- Basement dwellings.
- Caravans, mobile homes and park homes intended for permanent residential use³.
- 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 and cafes, hot food takeaways, offices, general industry, storage and distribution, non-residential institutions not included in "more vulnerable", 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.*