Welcome to our first Lowestoft Flood Risk Management Project newsletter.

The project is still in its early stages but over the next year there are some significant milestones we hope to reach that will support progress and help us to achieve our plan for completion in 2020 / 2021. Lowestoft is vulnerable to flooding from all sources and some of our residents and businesses have sadly been impacted by this: during the 2013 tidal surge and surface water flooding in 2015. The actions that are being taken as part of this project will find the best way to address this for the future. In addition, by addressing Lowestoft’s flood risk we will support new opportunities for much needed growth and development and support education and employment.

There will be opportunities for the community, businesses, schools, colleges and organisations to get involved with the project and to help shape what we hope to achieve. The first of these opportunities will be to join us at our business and community advisory group meeting. More details are contained later in the newsletter.

We hope that you will find the information contained helpful, do get in touch with us if you have any questions.

Kind regards

David Ritchie
Chair, Lowestoft Flood Risk Management Board

For more details

More information at http://www.lowestoftfrmp.org.uk/

Who can you contact?
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Background to the project

During the December 2013 tidal surge over 160 homes and businesses in Lowestoft were flooded. In addition to this road and rail networks were significantly disrupted.

The Lowestoft Flood Risk Management Project is about developing a way forward to reduce the risk of flooding from the sea, rivers and from extreme rainfall. The target date for completion is 2020 / 2021 and when finished, the project will support the economic growth and regeneration of Lowestoft and reduce the risk of flooding to existing homes and businesses.

In order to obtain Environment Agency approval to access national funding and to build a strong business case for other funders such as the New Anglia Local Enterprise Partnership, an overarching strategy is being developed. This includes the need to complete modelling and studies, including environmental studies to help make sure that we are doing the right thing in the right way.

A vital part of the project is working with and consulting local communities, businesses and organisations. Your views are important. At various points in the project there will be public consultations, providing everyone with a chance to have their say. We will also be meeting with communities and businesses throughout the process. In addition, we formed a Business Advisory and Community Advisory Group.

What are we considering and how has the project progressed?

Flooding from the sea

The main risk from tidal flooding is from the sea. This is caused by a tidal surge that develops in the North Sea along the eastern coastline of the United Kingdom as was demonstrated by the events in 1953 and most recently in December 2013 and again in 2017 although to a lesser extent. Lowestoft has very limited existing tidal flood defences and without this investment, the town will remain at significant risk.

The part of the project addressing tidal flooding covers the areas of Lowestoft deemed to be at significant risk between the Outer Harbour and the western end of Lake Lothing at Mutford Lock.
Flooding from the sea continued

In deciding the best ways in which we should manage flood risk in Lowestoft now and in the future, we have carried out a number of studies looking at:

- the current extent and risk of flooding
- how flood risk could increase in the future through the impacts of climate change
- the costs and benefits of providing different flood risk management solutions

To ensure that impacts to people, the local economy and the environment have been fully understood and taken into consideration, everyone living, visiting or working on or around Lowestoft will have the opportunity to take part in determining how flood risk within Lowestoft should be managed.

To date this has been through:

- engagement with people who are directly affected by the plans such as businesses and communities through public consultations and events
- one-to-one discussions with local businesses
- feedback from social media and through our website www.lowestofffrmp.org.uk
- the formation of a Business and Community Project Advisory Group, consisting of members of the community and local businesses.

Between 6th June and 29th July 2016 we held a public consultation. We are extremely grateful to everyone who took the time to respond to the consultation, either through the website, sending responses to us by post, through social media or by coming along to one of the drop-in sessions.

We have used the feedback from this consultation to make decisions on the best approach and the options that are proposed to be taken forward in the strategy.

Since the public consultation you may have noticed some activity in and around the Outer Harbour. Between August and October 2016 we carried out some initial ground investigations. These are extremely important investigations which help us to determine the type and extent of civil engineering that is required for the project. We are analysing the results of the investigations at the moment and assessing whether we need to do any further work.
Flooding from the sea continued

Lowestoft’s temporary flood barriers were delivered in November and are now operational. We have worked closely with all professional partners such as the blue light services, the Environment Agency, Associated British Ports and the Suffolk Resilience Forum to develop a deployment plan and operational protocols. This plan and the deployment of the barriers were tested during the tidal surge that happened on Friday 13th January 2017. Although the tide did not reach the heights predicted, the barrier deployment has been tested in some extreme weather conditions. A wash up session with those involved has been held on Monday 23rd January to ensure that we have captured any lessons learnt.

Flooding from rivers and extreme rainfall

To date the partners have considered a long list of options that may reduce the risk of flooding from rivers (fluvial) and surface water (pluvial) in Lowestoft. These include;

- the strategic use of Sustainable Drainage Systems (SuDS) across the town that would increase the area of permeable land and places where water can be stored at times of high rainfall;
- as well as a list of options along the Kirkley Stream, which has suffered some flooding within the last 2 years.

These options have now been modelled for different types of flood event, with an assessment of their effectiveness carried out alongside an estimate of the cost. Currently the most cost effective option along the Kirkley Stream has been identified as property level resilience, this would involve the installation of flood resistant doors and non-return valves in sewer systems to prevent internal flooding to the most vulnerable properties. Other options showing some flood risk benefit include increased storage capacity in the river channel and an increase in SuDS to retain water away from the channel. This information will be used to develop a more detailed business case that will enable the costs to be refined and the funding package to be confirmed.
How are we assessing what solutions will work best?

In assessing the possible options the following criteria have been used to decide which offer the best with ways to manage tidal flood risk in Lowestoft now and in the future:

- Level of flood risk reduction
- Impact on navigation
- Impact on residents and businesses
- Environmental and landscape impact
- Impact on highways and bridges
- Buildability
- Delivery timescale
- Cost – capital and whole life
- Potential regeneration benefits
- Potential benefits linked with 3rd Crossing project

In the mean-time an improved maintenance programme for the Kirkley Stream is being implemented by Suffolk County Council, Anglian Water, the Environment Agency with the support of Waveney District Council, this will include significant clearance of current bankside vegetation and works to the flood attenuation ponds alongside Tom Crisp Way. This will be complete by spring 2017 and will allow regular future maintenance to be undertaken.
What happens next and how can you get involved?

There are three key milestones for the project between now and the end of June.

- **On 15th February** at Waveney District Council offices, Riverside, 4 Canning Road, Lowestoft from 4pm to 6pm we will be holding our inaugural business and community project advisory group meeting. If you’d like to come along please email project manager Sharon Bleese sharon.bleese@eastsuffolk.gov.uk

- So that we can gain approval from the government for the project and help secure public grant aid monies to contribute to the cost of the flood risk management solutions we need approval from the Environment Agency’s Large Project Review Group. In May 2017 we will be seeking approval for our Strategic Outline Case. This is a really important step in the process.

- If we are successful in gaining approval for our Strategic Outline Case we will be taking this to the Waveney District Council Cabinet in June 2017. At this meeting we hope to gain approval to go ahead to the next stage and also for approval to begin with a Transport Works Act Order for the tidal barrier which is a critical part of reducing the risk of tidal flooding to Lowestoft.

- With all of these important first stage approvals in place we can move the project forward to the next stage, the Outline Business Case which we hope to submit before the end of 2017. This will mean that in 2018 we can hopefully move closer to beginning work on the ground.