Flood and Coastal Erosion Risk Management Strategy Roadmap

The Environment Agency's Flood and Coastal Erosion Risk Management (FCERM) Strategy, published in 2020, represented a major step forward in tackling the increasing risks of flooding and coastal change.

The Strategy sets out a long-term vision for **"a nation ready for, and resilient to, flooding and coastal change – today, tomorrow and to the year 2100**". It sets the direction to make our country more resilient to future flooding and coastal change. The Strategy also contributes to net zero targets.

In 2022, we published a Roadmap to 2026 to deliver the Strategy's vision. The Roadmap was developed collaboratively between the Environment Agency and 28 partners across multiple sectors. It sets out the practical actions we will take to achieve the ambitions in the Strategy and tackle the growing threat of flooding from rivers, the sea, and surface water as well as coastal erosion. It also delivers a host of wider benefits, including local nature recovery, carbon reduction and more integrated water management to help with both flood and drought resilience.

What will the Strategy Roadmap to 2026 achieve?

Strategy Ambition 1: Climate Resilient Places

People and places will be more resilient to flood and coastal change in a changing climate

People and places will be able to plan for future flooding and coastal change and adapt to future hazards

People and places will maximise the use of nature based solutions to enhance flood and coastal resilience and nature recovery

Farming and land management practices will better support rural resilience to both floods and droughts

Strategy Ambition 2: Growth and Infrastructure

New homes will be safe from flooding by avoiding flood risk areas or building in flood resilience

Flood and coastal risk management investments will drive environmental improvements and sustainable growth

More people will take action to build back better and recover more quickly when flooding happens

Flood risk assets will be safe and resilient to current and future risks from flooding and coastal change

National infrastructure will be more resilient to current and future risks from flooding and coastal change

Strategy Ambition 3: A nation ready to respond/adapt to flooding & coastal change

People will understand and will be better prepared to respond to flooding and coastal change risks

People and businesses will get back to normal quicker after flooding

More people will have the education and skills they need to develop careers in flood and coastal risk management

Flood and coastal erosion risk management policy and delivery will be underpinned by world leading research and international best practice

Carbon emissions from flood and coastal risk management investments will be significantly reduced to meet net zero targets

Cross-cutting Enabling Ambition: Future Risk and Investment

People, risk management authorities and infrastructure providers will better understand current and future risk and investment needs for flooding from rivers, the sea and surface water

Funding contributions from non-public sources will be invested in flood and coastal resilience

Over the next few pages we display some of the successes arising from FCERM National Strategy and Roadmap delivery over 2022/2023 and we showcase examples on how the nation is becoming more resilient to flooding and coastal erosion.

FCERM Strategy Roadmap Successes 2022/23

Ambition 1: Climate Resilient Places

All 25 places in the £150 million Flood and coastal resilience innovation programme (FCRIP) have developed business cases and are starting to take forward innovative practical resilience actions. North Norfolk District Council and East Riding of Yorkshire have completed project plans to help vulnerable communities adapt to coastal erosion, as part of the £36 million Coastal Transition Accelerators Programme (CTAP).

The Flood and Coastal Innovation Programmes have developed an Engagement HQ site for sharing information and learning to benefit practitioners and policy makers. The first edition of 'Horizons' e-magazine was also published in May 2023 for providing the latest insights from the inspiring projects.

As part of the £8 million Adaptive Pathways Programme (APP) we have developed a knowledge bank of best practice to equip risk management authorities to embed adaptive approaches to flooding and coastal change into their projects, investments and strategic plans.

In May 2023 we published the updated Thames Estuary 2100 Plan which helps to protect over 1.4 million people and £321 billion worth of property in London and the wider estuary. It is internationally recognised as a leading example of a climate adaptation plan and was updated in collaboration with a wide range of partners including local councils, the Greater London Authority, the Port of London Authority and the Wildlife Trusts.

Following the completion of the government funded £15 million Natural Flood Management (NFM) Pilots Programme, the Environment Agency published an evaluation of the 60 projects and lessons learnt in December 2022. The pilots have shown that NFM not only improves resilience to flooding, but also benefits nature recovery and stores carbon, helping to regulate the local climate.

Together with lead local flood authorities we published the final second cycle Flood Risk Management Plans (FRMPs) in December 2022**.** The FRMPs will drive action on the ground that align with the FCERM Strategy. A new flood plan explorer tool has also been launched to help people understand the actions in the FRMPs.

FCERM Strategy Roadmap Successes 2022/23

Ambition 2: Growth and Infrastructure

We worked alongside Water UK, Ofwat and other risk management authorities to support the development of draft Drainage and Wastewater Management Plans (DWMPs). The new plans should help to improve resilience to surface water and drainage flood risk.

Together with Water UK, we published examples of good practice of where risk management authorities are working together to improve resilience to surface water and drainage flood risks. By promoting the good practice that exists, we're encouraging others to follow.

Together with the Reservoir Safety Research Advisory Group (ReSRAG) we agreed, reviewed and updated the Reservoir Research and Development Strategy, which now considers climate change in all new work.

A Property Flood Resilience (PFR) public awareness campaign was jointly launched by Flood Re and the Environment Agency in May. The launch event marked the opening of a dedicated PFR facility at HR Wallingford. The campaign aims to increase public awareness of what PFR is and what's available to homeowners, specifically aimed at those living in high flood risk areas that are already undertaking home improvements.

We have partnered with the Town & Country Planning Association to create learning materials for risk management authorities, local authority planners and planning committee members. This includes producing an introductory video on addressing flood risk through the planning system in England and running webinars on the updates to planning practice guidance on flood risk and coastal change.

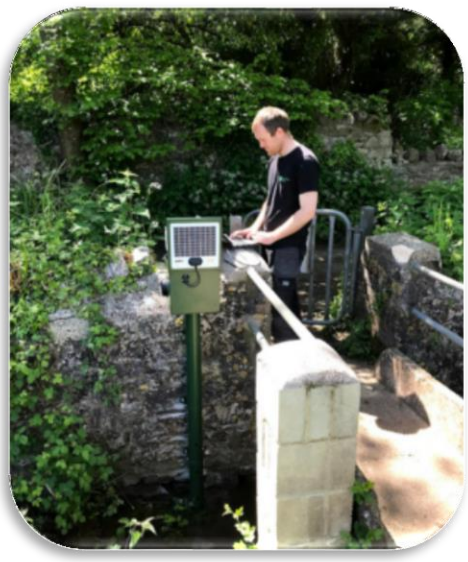
We have also worked with the TCPA on a training and skills survey for local planning authorities on planning for climate change and flood risk –published in March 2023.

FCERM Strategy Roadmap Successes 2022/23

Ambition 3: A nation ready to respond and adapt to flooding and coastal change

We have shared lessons learnt with Environment Agency staff, other risk management authorities and delivery partners from the first year of our low carbon innovation pilot trials.

These trials included the use of low and ultra-low carbon cements in major projects such as the Lydd Ranges Sea Defence Scheme and Tenbury Wells Flood Risk Management Scheme.



There are over 1.6 million users registered to receive flood warnings. The Environment Agency has successfully expanded coverage of the flood warning service to reach a further 110,000 flood risk homes and businesses. Over 78,000 of these properties have been reached thanks to additional government funding for a dedicated expansion programme. This has focused on delivering flood warnings to those properties which pose challenges for traditional river monitoring and forecasting approaches.

We worked with the Department for Education (DfE) to help deliver its Sustainability and Climate Change Strategy and National Education Nature Park. This work with DfE will support climate education, promotion of green skills and careers and enhance the flood resilience of the schools' estate.

ADA published a guide to carbon reduction techniques for water level management in lowland pumped catchments. This action contributes towards carbon emissions being significantly reduced.

We completed a ground breaking research project which has developed new and better ways to work in collaboration with communities facing difficult climate adaptation choices. It follows pilot projects with residents in Hemsby, North Norfolk and Caterham in Surrey where partners trialled new engagement approaches. New tools and learning for public bodies to use were published in January 2023.

FCERM Strategy Roadmap Successes 2022/23

Enabling Ambition: Future Risk and Investment

We have developed the Full Business Case for the next Long Term Investment Scenarios (LTIS) study. LTIS gives improved evidence to inform future risk and investment needs for managing all sources of flood and coastal change.

Forward look to 2023/2024

We are continuing to work on the new National Flood Risk Assessment (NaFRA) which involves creating a new national model complemented by local modelling and mapping. This will improve and expand the flood risk information that is available across England and significantly enhance our understanding of current and future surface water flood risk. Draft flood risk information is being developed for review in 2023 and early 2024, ready for publication later in 2024.

The Environment Agency will publish Shoreline Management Plan (SMP) Explorer and will update the National Coastal Erosion Risk Maps (NCERM) data. Together they will help easier decision making on the coast, reflecting the latest climate change projections and coastal geomorphology information.

We will continue designing and rolling out the 5 Year Engagement Skills Programme to build the engagement capacity of both Environment Agency staff and other risk management authority staff. This will help to make sure that communities are actively involved and understand the decisions that are made.

The Environment Agency working with Defra, Natural Resource Wales and the Scottish Environmental Protection Agency will update the Working with Natural Processes Evidence Directory on gov.uk. This will include key evidence, case studies and learning from the NERC Natural Flood Management research programme and the £15m NFM Programme.

The Environment Agency, will develop methods and/or tools to capture and monitor data on Biodiversity Net Gain (BNG) in EA-led flood and coastal projects and programmes. This is to demonstrate compliance with mandatory BNG requirements and other targets

The NFU are working with us to develop the newly established Rural Flood Resilience Partnership focused on helping farmers and growers adapt to a changing climate. The group, which includes Action with Communities in Rural England, Association of Drainage Authorities, Natural England and the Country Land and Business Association are looking at how farming practices can enhance flood resilience in rural areas, alongside sustainable food production.

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