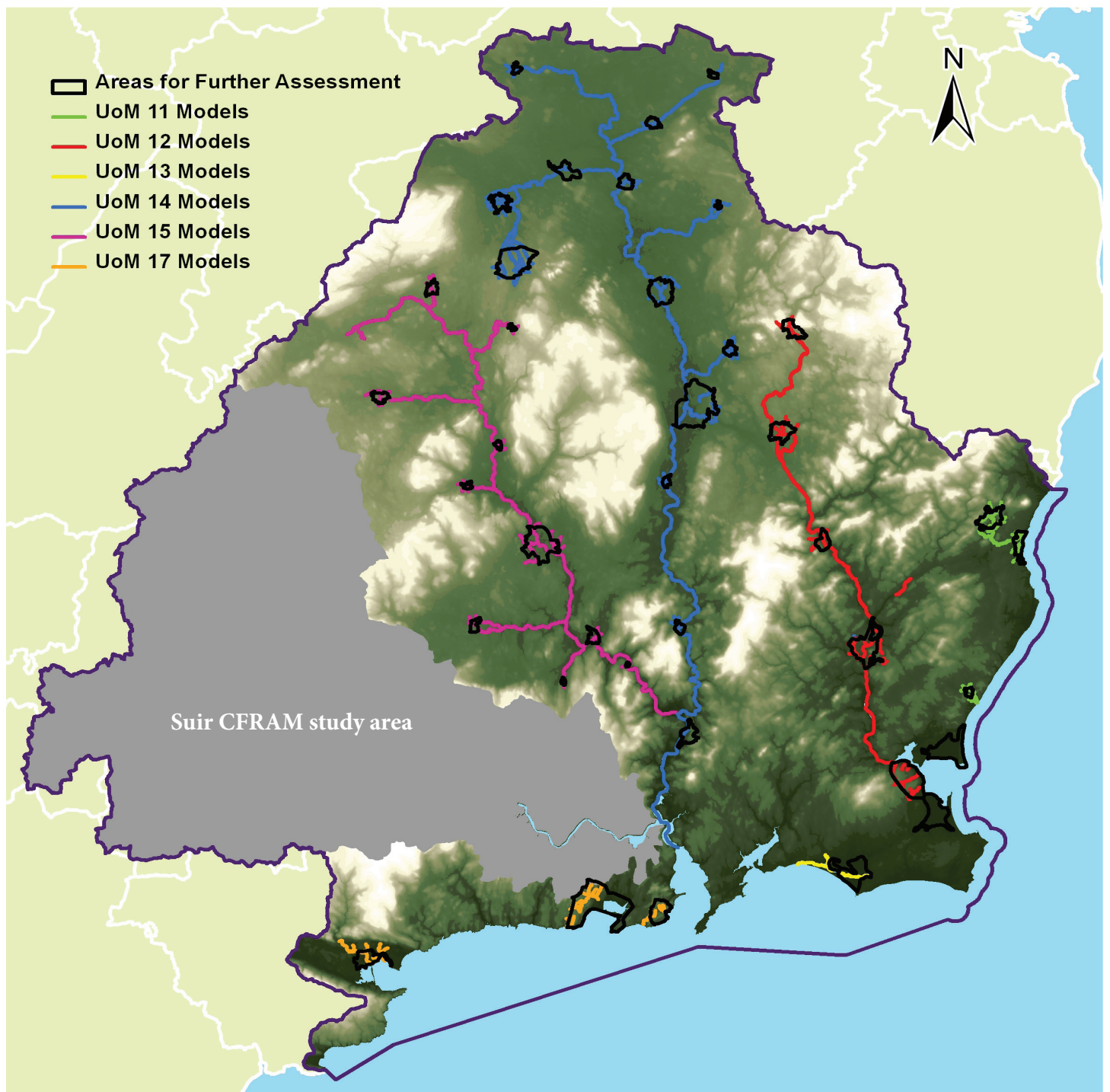


# Newsletter No. 3

September 2013

**INSIDE** | HYDROLOGY & HYDRAULICS | FREQUENTLY ASKED QUESTIONS | SUMMARY OF PROGRESS AND NEXT STEPS



# FLOOD RISK ASSESSMENT & MANAGEMENT

Flood risk assessment is the process of assessing and understanding flood risk. It involves predicting the extent of flooding and assessing the risk to receptors (people, property, the environment, the economy and cultural heritage) in the predicted flood area.

Flood risk management is about managing the risks to receptors that were identified during flood risk assessment.

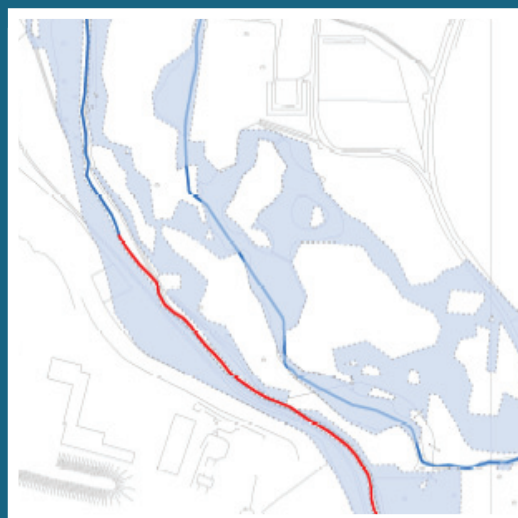
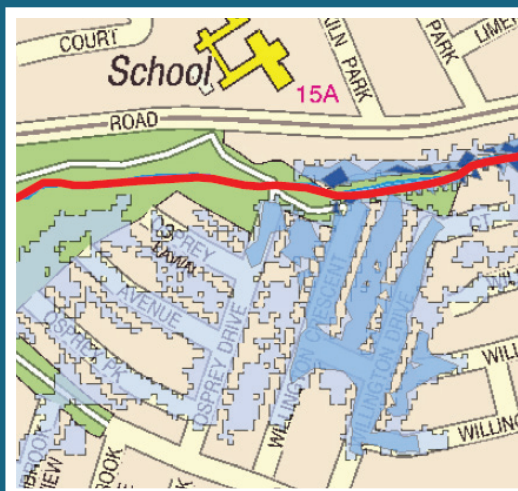
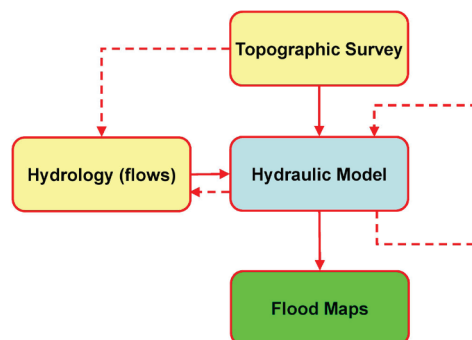
The first step in the process of flood risk assessment and management is to predict the quantities of water moving through river systems or coastal areas under different conditions, for example, during periods of heavy rainfall or during extreme tidal levels. This is achieved by carrying out hydrological studies. These studies take all of the available recorded data, both meteorological (i.e. rainfall) and hydrometric (i.e. river flows and/or levels), and use a variety of scientific methods to estimate flows and water levels in rivers and coastal areas for a range of different scenarios.

The next step uses computer models to predict how and where flooding is likely to occur. Physical characteristics of rivers, floodplains and coastal areas (such as elevation and shape) are fed into the computer models. Flow data from the hydrological studies for a range of scenarios is also fed into the models. The models can then be used to predict flooding and produce maps of where flooding is likely to occur and what receptors are likely to be affected by the flooding.

Once the flood risk is understood, work can begin to develop flood risk management measures to deal with the identified flood risk. These measures can include 'structural' measures that control or divert the pathways of floodwaters (for example building walls and embankments alongside river channels or erecting rock armour in coastal areas) or non-structural measures aimed at reducing the vulnerability of people and communities to flooding (for example flood warning systems, effective flood emergency response procedures, or flood resilience measures).

The models can then be used to predict the effectiveness of the flood risk managements measures. For example, the details of proposed walls or embankments can be fed into the models to predict whether or not they would be effective at preventing or reducing flooding. This process contributes to the choice of preferred flood risk management options which will be included in Flood Risk Management Plans.

## FLOOD MAPPING PROCESS





# FREQUENTLY ASKED QUESTIONS

## What is the Floods Directive and the CFRAM Programme?

In the past, flood risk in Ireland tended to be managed in a reactive manner i.e. measures to deal with flooding were introduced in response to the occurrence of flooding and such measures were generally structural in nature, for example the construction of walls and embankments to contain flood waters. The introduction of the EU Floods Directive in 2007, and the results of a review of national flood policy undertaken in 2004, now require that flooding is dealt with differently. The focus now is on proactively managing flood risk through the CFRAM Programme. Flood risk must be considered at the catchment scale rather than on a piecemeal basis and the potential impacts upstream and downstream of implementing flood risk management measures must be assessed. This more proactive approach to assessing and managing flood risk includes the preparation of Flood Maps and Flood Risk Management Plans to facilitate and plan for flood management.

## Who is in charge of flood risk management in Ireland

In September 2004, the Irish Government confirmed the Office of Public Works as the State's lead agency in relation to flooding, tasked with delivering an integrated programme aimed at mitigating future flood risk and impact.

## What are AFAs?

The Preliminary Flood Risk Assessment (PFRA), a national screening exercise which was undertaken by the OPW in 2011, identified areas of potential significant flood risk (referred to as Areas for Further Assessment, or AFAs) based on available and readily derivable information. The AFAs are the focus of the CFRAM Programme and detailed Flood Maps will be prepared for them as well as Flood Risk Management Plans.

## My area floods but it is not considered an AFA, why not?

It would not be possible for the CFRAM Programme to address every flooding problem throughout the country. The Programme is focusing on 300 AFAs nationally where the risk has been determined as being most significant. If your area is not classified as an AFA, then it will not be the focus of assessment under the current CFRAM Programme. However, if there is a flood problem in your community, you should contact your local authority as they may be able to provide some protection through the Minor Works Scheme.

## Will the flood maps be used by the insurance industry when setting insurance premiums?

Insurance companies take account of a variety of factors and different sources of information in assessing risk. The OPW does not have any role or function in regulating the insurance industry. Decisions on the provision of any specific form of insurance cover, and the price at which it is offered, are a commercial matter for each insurance company and an insurance company is not obliged or compelled to accept a particular insurance risk.

## Is the OPW in discussions with the insurance industry?

The OPW is providing information to the insurance industry on flood mitigation and defence works to enable the fullest possible assessment of risk. A joint working group has been set up between the OPW, the Irish Insurance Federation (IIF) and several insurance companies to progress agreement on a sustainable system to exchange information on flood defence schemes. This group is meeting regularly.

## What can I do now to protect myself and my property from flooding?

The OPW website [www.flooding.ie](http://www.flooding.ie) provides practical advice in relation to assessing whether your home/property is at risk from flooding, preparing for a flood, some protection measures that can be taken, how to clean up after a flood and who to contact for more information or in an emergency.

Queries or submissions can be made at any time by phone, email, in writing, or via the national and project websites. Contact details are as follows:

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Tel. 01 4882940  
Email. [info@southeastcframstudy.ie](mailto:info@southeastcframstudy.ie)  
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## SUMMARY OF PROGRESS AND NEXT STEPS

- All survey work, to gather data on the elevation and shape of river channels and floodplains to feed into the computer models, is complete.
- The development of computer models to predict flood extents and flood risk for each AFA is ongoing.
- Flood mapping will be developed for all of the AFAs within the South Eastern CFRAM study area by May 2014.
- A series of public consultation days will be held in relation to the flood mapping between June 2014 and August 2014. These will be announced online and in the media.
- Flood risk management measures to deal with the identified flood risk will be developed during 2014 to 2015.
- Flood Risk Management Plans, including measures to deal with flood risk, will be published in 2016.

