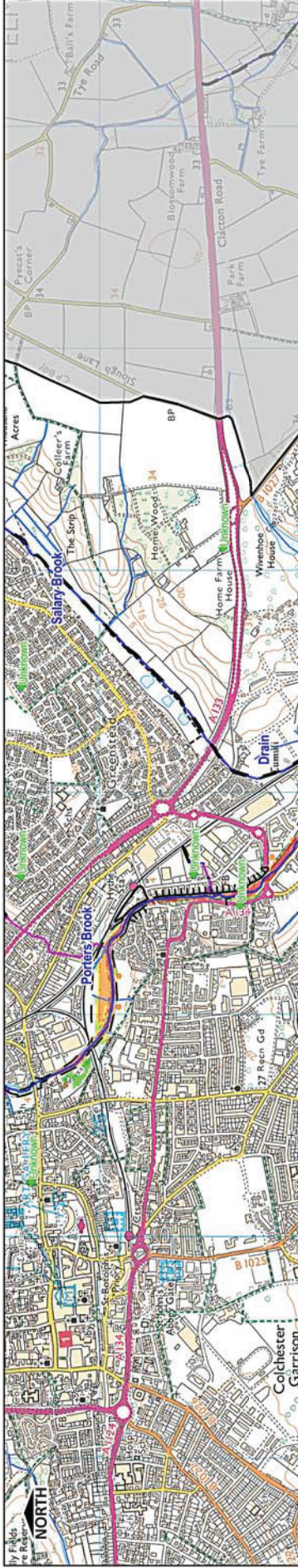


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LEGEND

- Administrative Boundaries
Main River
Ordinary Watercourse
Flood Records (Essex County Council)

Hazard Rating

Flood hazard is calculated as a function of the flood depth and flow velocity at a particular point in the floodplain, along with a suitable factor, and is defined as follows:
Low Hazard
Moderate Hazard (Danger for Some)
Significant Hazard (Danger for Most)
Extreme Hazard (Danger for All)
Asset Information Management System - Defences

- Low Hazard
Moderate Hazard (Danger for Some)
Significant Hazard (Danger for Most)
Extreme Hazard (Danger for All)
Asset Information Management System - Defences

- High Ground
Embankment
Flood Galls
Wall

Notes

An update of the Environment Agency national programme of coastal and fluvial modelling, a model of the Colne and Blackwater Estuary was developed in 2010 (CBE2). In the background of the River Colne, the most recent model used was the CBE2 model. The River Colne Estuary model was developed by the Environment Agency in 2010 and is based on the CBE2 model. The River Colne Estuary model was developed by the Environment Agency in 2010 and is based on the CBE2 model.

Output from the modelling from selected scenarios, have been presented in this report. The outputs presented in this report are based on the CBE2 model. The River Colne Estuary model was developed by the Environment Agency in 2010 and is based on the CBE2 model.

As part of the development of a model to simulate a breach in the Colne Estuary, the Environment Agency has conducted a series of model runs to assess the potential impact of a breach in the Colne Estuary. The outputs presented in this report are based on the CBE2 model.

Flood hazard is a function of the flood depth and flow velocity as well as a debris factor. Storm surge within the TUFLOW model domain has been simulated using the CBE2 model. The River Colne Estuary model was developed by the Environment Agency in 2010 and is based on the CBE2 model.

The River Colne Estuary model was developed by the Environment Agency in 2010 and is based on the CBE2 model. The River Colne Estuary model was developed by the Environment Agency in 2010 and is based on the CBE2 model.

This map is intended to provide a strategic overview of flood risk and should not be used to assess flood risk for individual properties.

This map is intended to provide a strategic overview of flood risk and should not be used to assess flood risk for individual properties.

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Revision Details

Table with columns: No., Date, Status

Purpose of Issue

VERSION 1

Client

Colchester, the place to live, learn, work, and visit.

Project No

COLCHESTER BOROUGH COUNCIL STRATEGIC FLOOD RISK ASSESSMENT

Drawn By

Checked By

Approved

Date

Scale of A1

AUG 2015

ACORN Internal Project No

120,000

Drawn

SL

Checked

SK

Approved

SK

Date

AUG 2015

Scale of A1

AUG 2015

ACORN Internal Project No

120,000

Drawn

SL

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AUG 2015

Scale of A1

AUG 2015

ACORN Internal Project No

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ACORN Internal Project No

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Date

AUG 2015

Scale of A1

AUG 2015

ACORN Internal Project No

120,000

Drawn

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Checked

SK

Approved

SK

Date

AUG 2015

Scale of A1

AUG 2015

ACORN Internal Project No

120,000

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FIGURE A7.1

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LEGEND

- Administrative Boundaries
- Main River
- Ordinary Watercourse
- Flood Records (Essex County Council)

Hazard Rating

Flood hazard is calculated as a function of the flood depth and flow velocity at a particular point in the floodplain, along with a suitable defences factor, and is presented in the following hazard rating categories:

- Low Hazard
- Moderate Hazard (Danger for Some)
- Significant Hazard (Danger for Most)
- Extreme Hazard (Danger for All)

Asset Information Management System - Defences

- Embankment
- High Ground
- Flood Gate
- Wall

Notes

As part of the Environment Agency national programme of coastal and fluvial modelling, a model of the Colchester and Blackwater Estuary was developed (TU) (Colchester). The model of the River Colchester was the most recent model of the River Colchester, developed in 2010, and is based on the Colchester upstream to Mylet Station, and the River Colchester upstream to Layer de la Haye, (but not as far as Marks Tey).

Outputs from the modelling from selected scenarios, have been presented. As part of the development of a model to simulate a breach in the Colchester Embankment, the model was run for a period of 10 days, and the results are presented in the form of hazard maps for the period 1st July 2015, and 1st October 2015. The hazard maps are presented in the adjacent maps.

Flood hazard is a function of the flood depth and flow velocity as well as a defences factor. Sites are not well within the TUFLOW model domain have been identified as 'Unknown' hazard. The hazard rating categories are: Low Hazard, Moderate Hazard, Significant Hazard, Extreme Hazard, and 'Unknown'. The selection of these categories is based on flood risks to people (F0202) (Data & Defences) (Environment Agency, 2005), and the following categories:

Flow velocity (m/s), D = depth (m) and QF = (shoals factor)

This map is intended to provide a strategic overview of flood risk and should not be used to assess flood risk for individual properties.

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Revision	Details	By	Check	Date	Scale

VERSION 1

Project Title: Colchester, the plan to live, learn, work, and visit.

COLCHESTER BOROUGH COUNCIL
STRATEGIC FLOOD
RISK ASSESSMENT

Client: Colchester Borough Council

Project No: 60473444

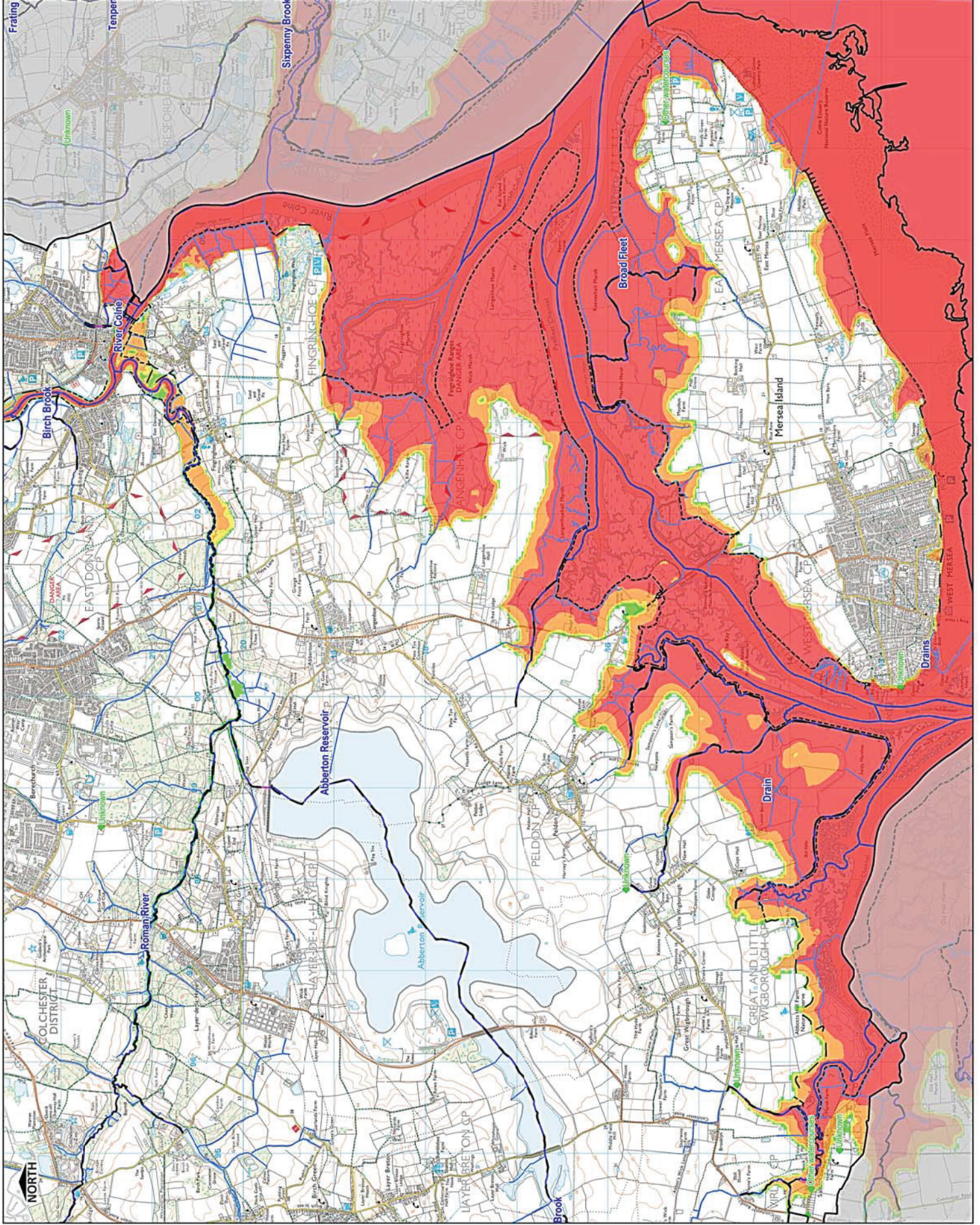
Scale: 1:35,000

Issue Date: AUG 2016

COLCHESTER AND BLACKWATER ESTUARY MODEL
100-YEAR FLOOD HAZARD
0.1% AEP (100YR) 2015

AECOM

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LEGEND

- Administrative Boundaries
- Main River
- Ordinary Watercourse
- Flood Records (Essex County Council)

Hazard Rating

Flood hazard is calculated as a function of the flood depth and flow velocity at a particular point in the floodplain, along with a suitable factor, and is shown on the map using the following hazard rating color code (as defined in the Flood Hazard Rating Methodology Report 11/2010 (Data and Government Agency, 2010))

- Low Hazard
- Moderate Hazard (Danger for Some)
- Significant Hazard (Danger for Most)
- Extreme Hazard (Danger for All)

Asset Information Management System - Defences

- High Ground
- Embankment
- Flood Gate
- Wall

Notes

An update of the Environment Agency national programme of coastal and fluvial modelling, a model of the Colchester and Blackwater Estuary was developed in 2010 (M10). In the background of the model is the most recent data for the Environment Agency's River Colchester and River Blackwater Catchment upstream to Wivenhoe Station, and the River Row to upstream to Layer de la Haye (but not as far as Marks Tey).

Outputs from the modelling from selected scenarios, have been presented. As part of the development of a model to simulate a breach in the Colchester and Blackwater Estuary, a model was developed in 2010 and used to estimate likely tide levels for the period 2010 and 2015, and to model the likely impacts of sea level rise in 2010 and 2015. The outputs presented in the adjacent maps therefore correspond to these time horizons.

Flood hazard is a function of the flood depth and flow velocity as well as a debris factor. Since you will see the TUFLOW model domain has been divided into 10m squares, the debris factor is set to 1.0. The debris factor categories is based on flood risks to homes (F0202) (Data & Government Agency, 2010), with a debris factor of 1.0 (Where V = velocity (m/s), D = depth (m) and GF = debris factor).

This map is intended to provide a strategic overview of flood risk and should not be used to assess flood risk for individual properties.

Revision Details

No.	Check	Date	By
1			

Proposed Issue

VERSION 1

Client

Colchester, the place to live, learn, work, and visit.

Project Ref

COLCHESTER BOROUGH COUNCIL
STRATEGIC FLOOD
RISK ASSESSMENT

Drawing Title
COLCHESTER AND BLACKWATER ESTUARY MODEL
MAXIMUM FLOOD HAZAR
0.1% AEP (1000YR) INCL CLIMATE CHANGE 2115

Drawn	SL	Checked	SL
Approved	CP	Scale of A3	AUG 2016
AECOM Internal Project No.	80473444	Scale of A4	1:20,000

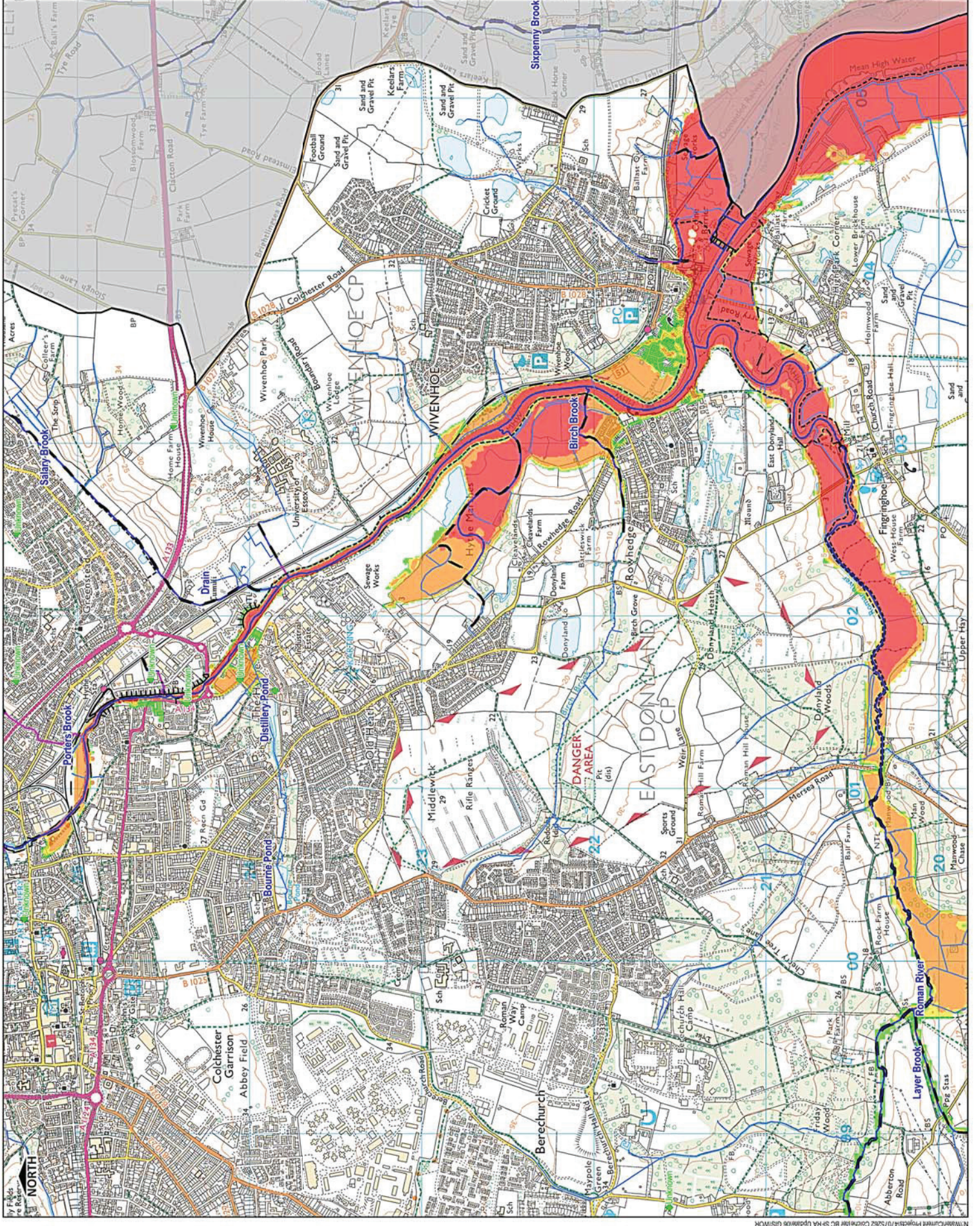
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Scale of A3

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Figure Number

Sheet	1
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LEGEND

- Administrative Boundaries
- Main River
- Ordinary Watercourse
- Flood Records (Essex County Council)

Maximum Flood Depth (m)

- 0.1 - 0.5m
- 0.5 - 1.0m
- 1.0 - 1.5m
- 1.5 - 2.0m
- 2.0 - 3.0m
- > 3.0m

Asset Information Management System - Defences

- High Ground
- Enbankment
- Flood Gate
- Wall

Notes

As part of the update to the Level 2 Strategic Flood Risk Assessment (SFRA) for Colchester Borough Council (CBC), revised modelling has been undertaken to provide an up-to-date assessment of the residual flood risk at Wivenhoe. Details are provided in Appendix B.

Maximum flood depths have been presented above the map in order to show the maximum depth of flooding experienced at each point in the catchment throughout the entire model simulation.

This map is intended to provide a strategic overview of flood risk and should not be used to assess flood risk for individual properties.

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Revision Details	By	Checked	Date	Status

Version 1

Client: Colchester, the place to live, learn, work, and visit.

Project File: COLCHESTER BOROUGH COUNCIL STRATEGIC FLOOD RISK ASSESSMENT

Drawing Title: COLNE BARRIER BREACH MODELLING MAXIMUM FLOOD DEPTH 0.5% AEP (200TRI) 2015

Drawn: SL

Checked: SK

Approved: CP

Date: AUG 2016

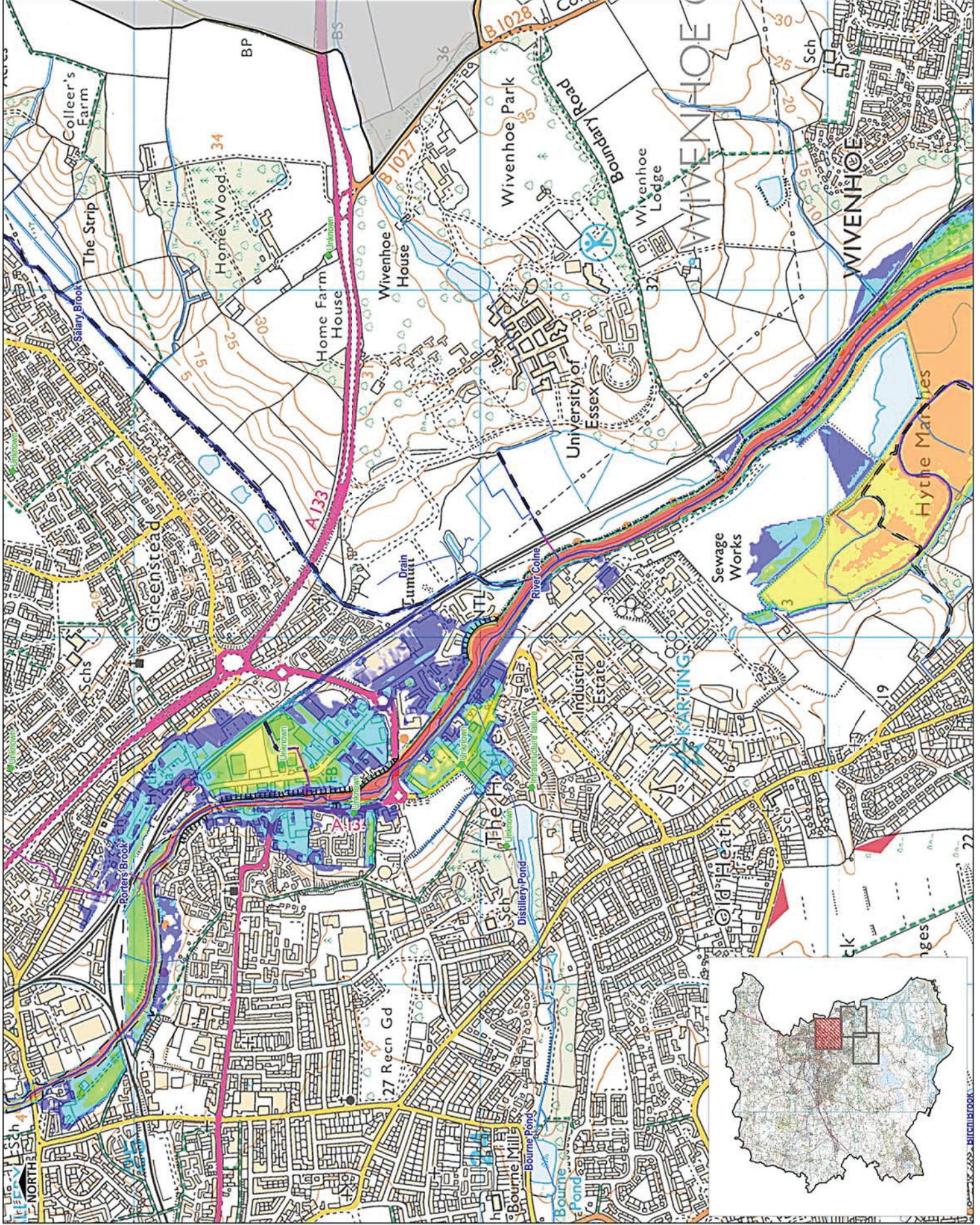
Scale of A3: 1:10,000

ACCOM Internal Project No: 80473444

ACCOM Infrastructure & Environment UK Limited

Wivenhoe

1



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LEGEND

- Administrative Boundaries
- Main River
- Ordinary Watercourse
- Flood Records (Essex County Council)

Maximum Flood Depth (m)

- 0.1 - 0.5m
- 0.5 - 1.0m
- 1.0 - 1.5m
- 1.5 - 2.0m
- 2.0 - 3.0m
- > 3.0m

Asset Information Management System - Defences

- High Ground
- Embankment
- Wall
- Flood Gate

Notes

As part of the update to the Level 2 Strategic Flood Risk Assessment (SFRA) for Colchester Borough Council (CBC), revised modelling has been undertaken to provide an up-to-date assessment of the residual flood risk to the town of Colchester. This assessment is based on the current River Colne and Wivenhoe. Details are provided in Appendix B.

Maximum flood depths have been presented above the 1:10,000 return epoch of flooding throughout of each point in the catchment throughout the entire model simulation.

This map is intended to provide a strategic overview of flood risk and should not be used to assess flood risk for individual properties.

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Revision Details	By	Check	Date	Scale

Purpose of Issue: **VERSION 1**

Client: Colchester, the place for live, learn, work, and visit.

Project File: COLCHESTER BOROUGH COUNCIL STRATEGIC FLOOD RISK ASSESSMENT

Drawing Title: COLLINE BARRIER BREACH MODELLING MAXIMUM FLOOD DEPTH 0.5% AEP (200YR) 2015

Drawn	SL	Checked	SK	Approved	CP	Date	JUL 2016
AECOM Internal Project No.							Scale of A3
60473444							1:10,000

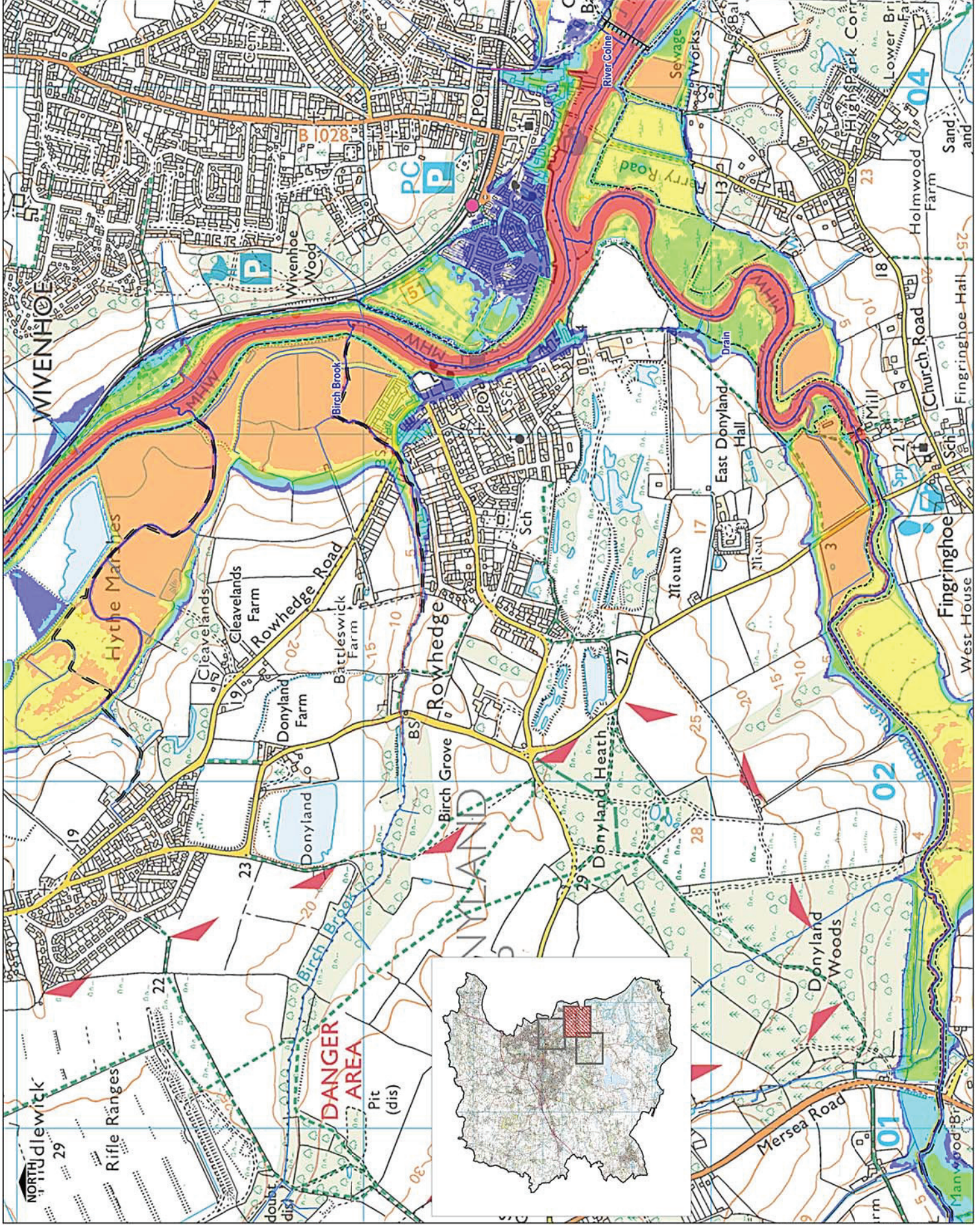
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Drawing Number: **AECOM**

Revision: **1**

FIGURE A10



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LEGEND

- Administrative Boundaries
- Main River
- Ordinary Watercourse
- Flood Records (Essex County Council)

Maximum Flood Depth (m)

- 0.1 - 0.5m
- 0.5 - 1.0m
- 1.0 - 1.5m
- 1.5 - 2.0m
- 2.0 - 3.0m
- > 3.0m

Asset Information Management System - Defences

- Embankment
- High Ground
- Flood Gate
- Wall

Notes

As part of the update to the Level 2 Strategic Flood Risk Assessment (SFRA) for Colchester Borough Council (CBC), revised modelling has been undertaken to provide an up-to-date assessment of the residual flood risk from the River Colne and the River Cressing. This assessment includes the River Colne at the location of the Colne Barrer. Details are provided in Appendix B.

Maximum Flood Depth results have been presented above the terrain map to show the predicted maximum depth of flooding at each point in the catchment throughout the entire model simulation.

This map is intended to provide a strategic overview of flood risk and should not be used to assess flood risk for individual properties.

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Revision Details	By	Check	Date	Scale

Purpose of Issue: VERSION 1

Client: Colchester, the place to live, learn, work, and visit.

Project File: COLCHESTER BOROUGH COUNCIL STRATEGIC FLOOD RISK ASSESSMENT

Drawing Title: COLNE BARRIER BREACH MODELLING MAXIMUM FLOOD DEPTH RISK ASSESSMENT

Drawn	SL	Checked	SK	Scale of A3	Date

05% AEP (200YR) 2015

ACCOM Internal Project No: 60473444

ACCOM Internal Project No: 60473444

Scale of A3: 1:10,000

Date: AUG 2016

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