

Donna Nook Coastal Defence Project

Project

Flood defence works at Donna Nook nature reserve in Lincolnshire

Client

Birse Civils

Contract Responsibilities

Flood defence structures, New Control Building, Landscaping and Excavation Works



The Overview

The construction of a new 2,600m long flood defence embankment on land around the Humber Estuary, creating an intertidal habitat through the managed re-alignment and improvement of the existing coastal defences.

Galloway's role was to construct reinforced in-situ concrete retaining and outfall structures, including the construction of a new control building to operate the existing pump house. Landscaping and mass excavation works with associated interface considerations, were required for the installation of the new ductile iron pipework system. diverted from the existing pump building through the new outfall structure.

The Challenge

The site is adjacent to an Environment Agency Site of Special Scientific Interest, meaning the team had to work around the restrictions of nesting birds, badgers and local wildlife. The project also had to be programmed around the migration of grey seals. Task specific challenges included working below the water table with the continuous consideration of ground water control and running sand.

The Solution

The works were carried out in a series of bays to minimise disruption and to limit plant movement. The construction of the below ground outfall structures was carried out within piled cofferdams to control water ingress, until such time that the embankment was opened up. Mass excavations and water diversion techniques were utilised to aid the works.

Benefits achieved included improved environmental, social and economic outcomes creating 110ha of new intertidal habitat improving the condition of the nationally important wetlands and contributing to national biodiversity targets. This showcase scheme has facilitated further flood defence schemes elsewhere along the Humber, in line with the flood defence strategy.



T 0161 749 8803
E info@galloway.co.uk
W www.galloway.co.uk

Birse
Civils