



Stonbury was enlisted to install emergency erosion control measures to a riverbank in Northwest England after a section had collapsed.

A riverbank wall on the River Kent had failed. The point of collapse was situated on a river bend and unfortunately coincided with an existing sewer main located in the garden of a local resident. The rising and falling of the water level during rainfall had eroded the exposed riverbank and undermined the sewer main. An temporary solution of Rock Roll – a robust and manoeuvrable stone system – was chosen to swiftly stabilise the riverbank and protect the existing sewer.

Due to space restrictions, the team had to utilise the resident’s driveway to lift and transport materials via a crane to the area of works. Therefore, significant preparatory works were completed prior to works commencing. These included a ground survey completed by Soil Engineers to ensure the ground was strong enough to bear the crane weight, followed by Plate Bearing tests to determine the type of driveway protection required.

Once these measures were successfully in place, crane mobilisation and material deliveries began. 120 tonnes of non-calcareous rock material was used in the makeup of the Rock Roll basket system. Together with gravel pipe bedding, this was manoeuvred into position section by section, building the wall shape until all sections were complete.

Flex MSE soil bags were applied as a top section material to encourage regeneration of vegetation and finally covered with choir matting. The choir matting was utilised to secure and protect the underlying materials as well as to collect silt and seeds to assist the regeneration of the bank.

Sustainable and visually attractive chestnut wood fencing was erected around the area for public safety. Once the works were complete, the trackway was dismantled and collected. A permanent wall will be reinstated at a suitable time of year.