

Sheffield's River Sheaf screen gets £3m upgrade

Work has started on a £3 million project to improve the screen and replace the mechanical arm used to clear it.

The upgrade work is being done while adhering to strict Government guidelines on social distancing and is expected to be complete by the end of the year.

The Sheaf Screen prevents debris from travelling underground along the river where it may become lodged, creating a blockage. Blockages underground, in culverts, which are tunnels that carry water under roads, railways and buildings, are very difficult to clear and can result in flooding to the local area.

The screen currently needs regularly clearing using a combination of the mechanical arm controlled by an operator and manual labour, which can be very resource intensive during an incident. The current screen is in poor condition with some of the screen bars damaged or missing, so the screen is being replaced and two 'grabs' will be installed on an overhead monorail, making it easier to clear debris when it collects on the screen.

Phil Rogers, project manager at the Environment Agency said:

This upgrade work for the Sheaf screen is critical to help modernise this important piece of flood risk reduction equipment. The improvements mean that the grabs will work automatically around the clock to remove debris from the river and place in a skip for removal, significantly reducing the need for Environment Agency staff to be on site.

Sheffield has a history of river flooding, with the city experiencing floods in 1973, 1991, 2000 and 2007. Flooding from the River Sheaf in 1991 extended to the central train station and closed the East Coast mainline for four days. This flooding is caused because of blockages at culverts and bridges especially in the urban reaches of the River Sheaf and Porter Brook where large sections of the rivers are culverted.

Sheffield's Victorian-engineered underground waterway, known as 'The Megatron', was built in the mid-1800s below the city centre and boasts an impressive network of cathedral-like brick archways and interconnecting darkened tunnels to contain the overflow of water from a storm.

The Sheaf Screen in Sheffield city centre is located at the upstream end of a 750m culvert which carries the River Sheaf below the central train station and the markets area. It joins up with the Porter Brook which is also largely hidden from view in the city and heads towards its confluence with the River Don.

As well as natural vegetation, the Sheaf Screen regularly collects larger objects including mattresses, tree trunks, bikes, branches and pipes. If these weren't caught by the screen they could cause a significant blockage and increase the risk of flooding to the city.

While the work is in progress Sheaf Walk will be closed between Duchess Road and the A61. One lane of the A61 will occasionally be closed for deliveries to site. We apologise for any disruption this may cause while we carry out the work.

[Sheaf screen proposed works](#)