West Dorset Clean Rivers Action Group

Briefing Notes for 6th Jan 2023 meeting

Issues broadly fall into two groups: sewage-related (highlighted throughout in yellow) and other (land management/agriculture, flash flooding, invasive species, etc.)

One key fact affecting sewage in rivers is that The Environment Act (2021) requires all overflows to spill no more than 10 times per year, and those close to bathing waters to spill no more than 3 times per summer.

West Dorset Rivers & Coastal Streams Catchment Coordinator ~ Ian Rees

Overview

The Catchment covers the main rivers and lakes that flow into the Channel in Dorset: Swan Brook, River Wey, River Bride, River Brit & tributaries, River Char & tributaries, and Little Sea (a lake on the Studland Peninsula).

This largely rural catchment covers 434 km^2 , with 62% used for intensive agriculture and forestry, 23% for more extensive semi-natural land use (incl. 2.3% coastal habitat and 1.6% freshwater). Of the human population (app. 114,000), 47% live in Weymouth & Portland and 24% in Bridport, Beaminster, Chickerell and Swanage.

The Dorset Area of Outstanding Natural Beauty (AONB), Dorset Wildlife Trust (DWT) and the Farming and Wildlife Advisory Group South West (FWAG) have worked in partnership with the Environment Agency and the Dorset Strategy Group, as well as organisations, communities and individuals, to identify the main issues affecting the water environment and suggested actions to overcome them. The main issues are:

1. Pollution from rural areas caused by agriculture
2. Physical modifications to the channel
3. Pollution from sewage treatment works and other water industry infrastructure
4. Invasive species
5. High & low flows

River Winniford ~ Winniford River Action Group (WRAG) ~ Peter Stapleton

WRAG is separate from, but supported by, Chideock Parish Council. It began in late 2022.

Overview

1. Chideock Sewage Treatment Plant (STP) uses UV disinfection to treat flows up to 8x the dry weather flow. Flows above that spill to storage tanks. If these fill, screened but untreated sewage is discharged into the river. From 2018 to 2021 there were 60-77 spills per year, lasting app. 700 hours per year.
2. In 2023, WW will confirm whether it will undertake spill reduction work at the STP in the period 2025-2030.
3. WW increased the STP storm tank storage capacity in 2003 but says that more improvements are needed.
4. A second storm overflow from Seatown Sewage Pumping Station (SPS) spills untreated sewage between 5 and 25 times per year. WW says the SPS will also require improvements under the Environment Act.
5. Infiltration into the sewer network during wet winter periods when the groundwater rises locally is a problem. WW has identified parts of the sewer network that need to be sealed, to reduce infiltration. This work is planned for 2023. It is likely that additional work will be needed after the sealing is complete.

Future Work

1. WRAG has a tour of the STP scheduled for 11th January 2023.
2. WRAG has applied to take part in the Westcountry Rivers Trust Citizen Project.
3. WRAG is examining taking part in Riverfly testing and have been offered training by Dorset AONB, but we are advised training and kit would cost £120 per person. So far it has no funding.

Upper River Char ~ River Char Community Project (RCCP) ~ Andrew Carey

RCCP is a project initiated and overseen by Char Valley Parish Council. It began in 2021. It is run on behalf of the council by (and with funding from) Dorset AONB and Dorset Wildlife Trust.

Overview

The initial report commissioned from Dorset AONB identified these key problems and areas of concern:

1. Sediment & phosphate contamination from agriculture
2. Phosphate/sewage pollution from septic tanks
3. Flash flooding
4. Poor habitat for wildlife
5. The impact of invasive species, particularly Himalayan balsam
6. The desire for the river to function as naturally as possible, without causing issues downstream

Future work ~ RCCP will undertake:

1. Further monitoring: Training local people to do riverfly and water quality monitoring.
2. Habitat improvement & restoration: working with volunteers to restore the natural processes of the river.
3. Invasive species control: Clearing Himalayan balsam with volunteers and using rafts to monitor mink.
4. Research & survey: Further ecological and geomorphological research.
5. Community engagement: Working parties, walks, talks and demonstrations and, in particular, efforts to get residents to manage their septic tanks better.
6. Agricultural land management: working with farmers to reduce sediment runoff and nutrient pollution.
7. Natural Flood Management: leaky dams, gully blocking, and tree/hedge planting to delay and reduce floods.

Lower River Char ~ Lower Char Community Project (LCCP) ~ Dana Assinder

LCCP is an independent community project begun in 2022, which has worked closely with Wessex Water (WW).

Overview

1. Main issues on the Lower Char are sewage releases, but climate-led sea-level rise is a growing issue. There is a historical problem with pollution from plastic biobeads from SWW's Sewage Treatment Plant in Uplyme.
2. Untreated, diluted sewage is illegally discharged by WW into the river about 12 times a year at Newlands Bridge and legally discharged into the sea about 70 times a year from the Charmouth Sewage Treatment Plant.
3. The sewage problem is mainly caused by storm flows in wet weather, because roof and surface water is handled by the sewage system, which gets overwhelmed.

Future work ~ LCCP has launched a campaign to get:

1. WW to stop all sewage discharges at Newlands Bridge and install 6mm screens as a temporary measure.
2. the Environment Agency (EA) to start monitoring water quality at the mouth of the river (where families swim all summer). The Agency used to test here regularly but stopped in 2019.
3. WW to cut discharges of untreated sewage into the sea to less than 3 per bathing season.
4. South West Water to clean up its plastic biobeads, which are littering Charmouth Beach.

To help make this happen, LCCP will:

1. film the plume of untreated sewage pouring from the offshore pipe.
2. press WW to adapt the storm tanks at its Sewage Treatment Plant *or* install UV treatment there.
3. offer to work with Char Valley Parish Council, Newlands Holiday Park and the residents of Stonebarrow Lane to help divert rainwater so it no longer flows into the sewerage system.
4. offer to work with Wessex Water to create reedbeds to reduce flooding and clean stormwater.
5. host a public Charmouth Dragon River Festival on 27th May, 2023

River Asker, Mangerton & Lower Brit ~ Michelle Warrington & Howard Atkinson

Overview

1. Regular Riverfly monitoring took place in 2022 at 7 locations on these rivers. Detailed reports are available; headline results show that the river is within the top 20% of UK rivers for water quality.
2. The Environment Agency fails the Asker in its biological assessment because of a lack of fish (in common with other Dorset rivers). A main contributor to its failure is the lack of water plants and the fish habitat this provides. A main cause is trees overshadowing the narrow river.
3. Trail cameras monitor wildlife associated with the river (to-date 42 species of birds and 13 mammals).
4. Chemical water quality is measured with kit provided by Westcountry Rivers Trust at 4 sites. Results suggest little pollution from agricultural or other human activities.
5. The water of the Asker and the Mangerton fails chemical assessment by the Environment Agency for the presence of mercury and polybrominated diphenyl ethers (PBDE) and the Mangerton for Perfluorooctane sulphonate (PFOS). These pollutants are widespread in UK rivers and rivers elsewhere.

Future work

1. Continue monitoring at the existing sites.
2. Acquire and utilise mink monitoring rafts to determine if this predator prevents colonisation of much of the Asker and Mangerton by water voles.
3. Support efforts to install a fish bypass for Loders weir to a) encourage the European Eel (critically endangered species) and b) help trout already entering the lower Asker to reach spawning grounds.

River Mangerton ~ Chuck Willmott

There is no separate group for the Mangerton but it is partially covered by the Asker group. Information is as above (River Asker, Mangerton & Lower Brit) but additionally:

Overview

1. The Mangerton has a sewage works at Powerstock and transfer at West Milton. There are probably septic tank discharges along the whole route.
2. Farm run-off is a problem in some areas.
3. Himalayan Balsam is controlled in some places but is a major problem in others along the river banks, lanes and woods. Group action needed to tackle it early in the season.

Future Work is as above (River Asker, Mangerton & Lower Brit)

River Simene ~ Steve Evans

Steve is joining us at extremely short notice and there has not been time to get any information on issues affecting the River Simene for this briefing.

River Lim ~ River Lim Action Group (RLAG)

RLAG is an independent community project begun in 2022. It is briefing Chris Loder separately.