

Highways, Transportation & Waste Drainage & Flooding Swale Cyclical & Hotspot Cleansing



The Highways & Transportation Drainage Team improves highway safety by making sure water is removed effectively from the road network during moderate to heavy rainfall. We do this by inspecting, maintaining, improving and setting standards for 250,000 road drains and associated drainage systems.

Our most critical service within the Drainage Team is flood response which can involve;

- Clearance of highway flooding causing major disruption and a risk to the safety of highway users
- Clearance of highway water causing flooding to private property
- Provision of flood boards to warn the travelling public of minor flooding
- Provision of appropriate traffic management, including road closures where necessary, to manage the risk created by minor flooding
- Where private dwellings are affected, we can also provide disposable, absorbent bags called FloodSax® to provide property protection.



We have a full complement of Technicians within the team to take emergency calls during the working day and determine the priority of which resource is deployed to each incident that presents the potential for harm to pedestrians, road users or an immediate high risk of internal property flooding.

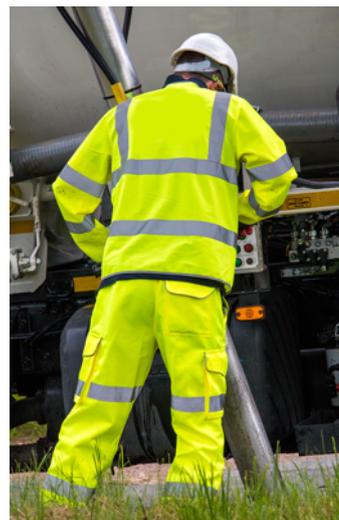


Out of hours reports of flooding will be called through to the out of hours duty officer for action who have access to three out of hour crews on standby every week throughout the year and access to sub-contracted tanker services. All other reports of flooding will be passed to the drainage team for review and action on the next working day.

The three types of resource that we have available are;

- Combination Units – which have a capacity of 9,800 litres and can be deployed to clear minor flooding and can cleanse drainage systems where required.
- Super Combination Units – which have a capacity of 18,000 litres can be deployed to clear moderate flooding and can also cleanse drainage systems where required.
- Tankers – which have a capacity of up to 27,000 litres and can be deployed to react to major flooding incidents.

In 2019 Drainage received 9358 enquiries of which 438 of these were emergencies and reacted to within 2 to 24 hours. We have been experiencing a large increase in demand compared to previous years following some intense storms across the county which has taken the team some months to recover from. We use Met Office data to obtain information where heavy rain and flooding is forecast so that we may proactively prepare for emergency situations and be ready throughout winter.



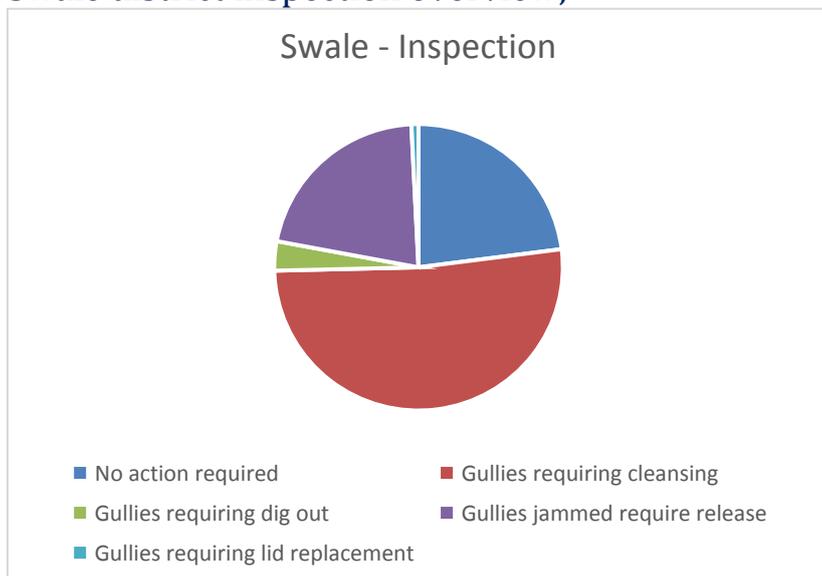
We carry out inspections of all our Strategic & Locally Important Routes and include all gullies that require clearance within a programme across the year which is attended by District.

We have recently carried out our pre-inspection of Swale Borough and have found the following.

| District | Swale |
|---|--------------|
| Month Cleansing Due | March |
| No gullies due for inspection | 4921 |
| Total gullies found upon inspection | 5541 |
| % Extra gullies found | 13% |
| Number gullies requiring cleansing | 2862 |
| % Requiring Cleansing | 52% |
| Number gullies requiring dig out | 183 |
| % Requiring Dig Out | 3% |
| No gullies jammed | 1179 |
| % Requiring Unjamming | 21% |
| No gullies requiring lid replacement | 44 |
| % Requiring Lid Replacement | 1% |

We will carry out cleansing of those gullies that allow us to immediately access within March 2020. Gullies that were found to have another defect e.g. jammed/broken lid will be attended within 90 days and follow up cleansing carried out once the defect is rectified.

Swale district inspection overview;



In addition to this we carry out 6-monthly Hotspot cleansing which includes roads that are known to us as a flood prone section of the highway network. Roads that are not classed as Strategic & Locally Important are inspected and cleansed on a targeted basis when we receive reports from members of the public. Information on Strategic & Locally Important roads are available on request.

If Member's or Councillors believe they are aware of a hotspot that is not included within our current list, please feedback those locations to the drainage team so we can determine if it is likely a maintenance issue or may require investigation and/or repairs. Where possible could we please be provided with evidence of the flooding (dates of floods, extent, photos etc.) to support any reports we already hold, as this will assist with our risk assessments and prioritisation.



Asset management is key to the drainage service and we now collect our asset data. Around 80,000 drains on our main network have been collected and we have now started gathering the data on our urban and rural network.

During the cyclic programme the inspection data for each drain is collected on site, the data recorded includes date attended, silt levels, defects and whether the drain was successfully cleansed. In the future, data collected will help us determine where our highest risk areas are so that we can allocate funding more effectively to locations where drains are subject to becoming blocked more frequently.

We carry out minor repairs and improvements to sites where the road floods regularly to the extent that there is a danger to road users and/or residential property is regularly internally flooded by water from the highway. Sites are risk assessed accordingly to determine the appropriate action.

In addition to minor drainage works we have also successfully completed 90 large drainage improvement schemes to resolve long standing flooding issues throughout the County with approximately 70 initial schemes planned for 2019 to 2020.

