

Report from the Flood Event Debrief Meeting held on 12 December 2024

1. Cllr Danny Moody, Cllr Steve Wheeler, and Richard Farquharson and Chris Thorpe (Flood Wardens) met in the Reading Room.
2. The purpose was to debrief the flood event that occurred on Sunday 24 November 2024 and to identify actions to alleviate future flooding.
3. The flood event followed significant and abnormal rainfall in Northamptonshire over the weekend of 23 & 24 November 2024. This itself followed significant snow and subsequent thaw the previous week so that the land surrounding the village was already waterlogged.
4. The level of the Helmdon brook rose gradually on Sunday. Around 1400 water was flooding down Grange Lane and Station Road. By 1500 water had started flooding in the layby in front of The Green and this rapidly worsened so that by 1700 the flood was across the road, and bow waves from passing vehicles risked water entering properties. By 2100 the flood water was abating.
5. Flood water coming down Grange Lane has been seen before, but there was also an unusually large amount of water coming down Station Road and from the School Field, all gathering in the middle of the village.
6. At 1500 Chris Thorpe and Faye Holloway had cleared drains of leaves and at 1630 Duncan Cairns dug out the grips on Grange Lane, which diverted water into the ditch running along the village side of the embankment and then into the brook.
7. Anecdotal evidence suggests that the flood mitigations on Grange Lane were overwhelmed between 1400 and 1630. The catchpit to the west of the Grange Lane Tunnel was overflowing and, in any case, water was bypassing it due to a small earth bank to the west of it. The volume of water coming down Grange Lane overwhelmed the highway table. By 1630 it appears that the volume of water had reduced to the point where the highway table once again diverted it into the ditch once the grips were cleared out.
8. Residents used vehicles to block Station Road to through traffic from Jeff's Bridge to the junction with Church Street. This prevented flood damage to properties from bow waves.
9. The Duncombes hired a 1,000 litre per minute pump and this was deployed late afternoon near the Pumping Station with the outlet pipe feeding into the brook downstream of Jeffs Bridge. It is thought that the pump prevented the flood water from rising to the point where it would enter properties. Apart from some small ingress of water to the front of the garage of one property, no properties were flooded.
10. The four gullies in front of The Green were operational, but they discharge via a 12" pipe into the brook just upstream from Jeff's Bridge. When the water level in the brook rises to certain height, the water pressure in the brook prevents or inhibits the discharge of water from this pipe.
11. The northernmost gully connects under the road to a gully in the gateway of Bridge House and thence into the brook downstream of Jeff's Bridge but via a smaller 9" pipe. It is not known exactly where these pipes discharge or what condition they are in. The gully pot by Bridge House was completely blocked throughout the flooding event, but

water may still have been moving through the pipe under it.

12. Flood mitigation falls into four categories:

- 12.1. Preventing flood water from surrounding farmland arriving in the village.
- 12.2. Diverting the water into the brook as early as possible, rather than it coming down Grange Lane and Station Road into the middle of the village.
- 12.3. Making sure that water in the brook can escape downstream of the village as quickly and effectively as possible.
- 12.4. Having the ability to move flood water if it cannot be prevented from flooding in front of The Green.

13. The group discussed the following mitigations:

- 13.1. Encouraging landowners to maintain ditches and land drainage systems, so that the farmland surrounding Helmdon is well drained and doesn't become waterlogged so that any additional rain pours straight off it.
- 13.2. All riparian owners upstream of Jeff's Bridge to keep the brook clear and free flowing.
- 13.3. Ensure that flood water coming off the fields to the southwest of the Grange Lane Tunnel and from the western line bank goes into the catch pit.
- 13.4. Ensure that the catchpit is properly maintained, build a proper headwall to take water from the catchpit into the pipe under Grange Lane, and inspect this pipe and if necessary, have it jetted.
- 13.5. Ensure that any water coming from west of the Grange Lane tunnel is prevented from coming through the tunnel and is diverted along the ditch at the bottom of the western embankment. This could be achieved with flood barriers or sandbags.
- 13.6. Keeping the grips on Grange Lane clear and operational should any water come down Grange Lane, so that it is diverted along the ditch at the bottom of the eastern embankment.
- 13.7. Infill the ditch alongside the southern edge of Grange Lane from the Grange Lane Tunnel to where it crosses under the road via a 4" pipe into the ditch at the bottom of the eastern embankment. The 4" pipe is ineffective at dealing with all the water coming off the eastern line bank.
- 13.8. Check the ditch and flood mitigations on the school field to make sure that they have not be compromised.
- 13.9. Clean and maintain all the gully pots in front of The Green and potentially look to see if the discharge pipe into the brook can be repositioned to make it more effective even when the level of water in the brook rises.
- 13.10. Investigate the two pipes that discharge just downstream of Jeffs Bridge and ensure they are operating as effectively as possible.

- 13.11. Have a 1,000 L/min pump permanently on standby instead of having to hire one in an emergency, which takes up precious time.
- 13.12. All riparian owners downstream of Jeff's Bridge to keep the brook clear and free flowing. It was noted that there are blockages in the brook around and just downstream of the School Wildlife Area and an almost complete blockage approximately 500 metres downstream of Jeff's Bridge, which must have caused floodwater to not be able to get away as fast as it otherwise would.
14. This flood event did not trigger the requirement for a Formal Flood Investigation (FFI) by West Northamptonshire Council (WNC) because no properties were flooded. However, it may be that such an investigation could be paid for by the parish council. It has not yet been possible to contact WNC to find out because the Flood Team is focused on the communities in Northamptonshire, particularly on the Upper Nene that experienced significant flooding damage, some for the first time.
15. Thinking about the potential mitigations above, some are very long term and would require the input or co-operation of outside agencies and/or landowners. Therefore, the group tried to identify some quick wins that were within the gift of the council to progress with immediately. The group recommends that the parish council:
 - 15.1. Purchases sandbags to be kept on the verge just to the northeast of the Grange Lane Tunnel. For convenience it is proposed to purchase 80 x 10Kg filled sandbags at an approximate cost of £220 plus delivery (e.g. see <https://thesandbagco.co.uk/products/sandbags-pre-filled-black-uv-protected-80x10kg>).
 - 15.2. Purchases 2 x "Flood" warning signs at a cost of £15.23 + VAT each (e.g. see <https://startsafety.uk/products/metal-sign-flood>).
 - 15.3. Notes that Helmdon Fireworks has purchased a 1,000 L/min pump and it will be kept in a property near The Green.
 - 15.4. Talks to the new owner of the land above and to the south of the Grange Lane Tunnel to ask what plans he has for the catchpit and whether he will consider building a headwall and cleaning out the pipe under Grange Lane.
 - 15.5. Finds out who all the riparian owners are from the Viaduct to Astwell Mill and asks them to ensure that their stretch of the brook is clear and free flowing. If any landowner cannot be identified or if any are uncooperative, to ask the Environment Agency what enforcement powers there are.
 - 15.6. To contact WN Highways and ask for all the gully pots on Station Road to be cleaned out and whether Highways would investigate the pipes to and from the gully pot by Bridge House.
 - 15.7. To consider whether it is worth engaging a consultant to advise on the mitigations outlined at Section 13.
16. The Parish Council was included in Northamptonshire County Council's Pathfinder flood alleviation initiative some years ago and received some grant funding from it. There is still a sum of £3,000 in the council's earmarked reserve for flood mitigation activities.