

Assessment tool on flood pump flow capacity: Bridge Street flooding

Date and type of flood	Initial response and effectiveness	Second response and effectiveness	Evaluation of incident
26/12/15 River deluge	Fire Brigade portable pump, 10,500 gallons per hour Effective initially, ineffective after 1 hour.	Environment Agency 8” pump. Controlled river deluge escaping through surface water drains on Bridge Street. In effective on river breach.	Environment Agency pump most effective: incident was river deluge escaping through surface water drains on Bridge Street. In effective due to river breach.
23/08/15 Surface water flooding	N/A no pump deployed.	N/A no pump deployed.	N/A no pump deployed.
22/08/15 Surface water and sewer flooding	Fire Brigade full tender pump 26,500 gallon per hour: effective.	N/A Fire Brigade full tender pump (same pump): effective.	Fire Brigade full tender pump effective, alleviated surface water flooding.
08/08/14 Surface water flooding	Fire Brigade full tender pump: effective. Initial pumping was performed from a SW drain near the river: unsuccessful.	N/A Fire Brigade full tender pump (same pump): effective.	Fire Brigade full tender pump effective, alleviated surface water flooding.

23/08/13 Surface water flooding	N/A no pump deployed.	N/A no pump deployed.	N/A no pump deployed.
31/12/12 Surface water flooding	Fire Brigade full tender pump: effective.	N/A Fire Brigade full tender pump (same pump): effective	Fire Brigade full tender pump effective, alleviated surface water flooding.
26/09/12 Surface water and river deluge back up.	Fire Brigade portable pump, 10,500 gallons per hour effective initially, ineffective after a few hours.	Environment Agency 8" pump deployed due to potential river breach: effective.	Environment Agency pump most effective alleviated river deluge flooding, escaping through surface water drains.

Approximate Flow rate of the Fire Brigades full tend pumps: 26,500 gallons per hour/ 10 PSI.

All successful pumping was performed outside the Sonali restaurant.

Approximate Flow rate of the Environment Agency's pumps: 0.17m³/s equates to a maximum of 134621 gallons/hour.

All pumping was performed outside Simply Party.

Road closures were provided in all incidents.

Conclusion:

Based on the previous flooding events over the last four years it has been determined that a pump of at least **26,500 flow rate per hour** is required to manage foreseeable circumstances of surface water flooding.

An assessment tool has not been determined for Commercial Street and Crab Garth due to limited deployment of pumps.



Tadcaster Flood Action Group 22 Bridge Street, Tadcaster, LS24 9AL