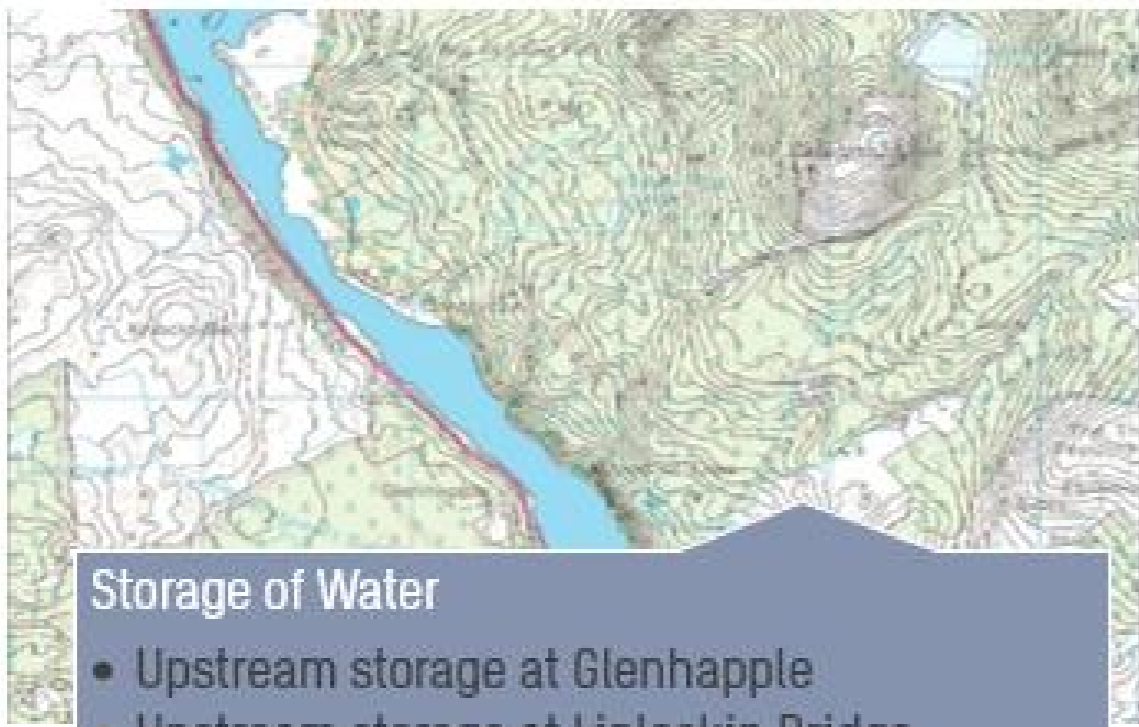


### Board 2: Progress to Date – Long List to Preferred Option

#### Long-List Options

The Long-list comprised the 'list of all possibilities' – no matter how likely they were to progress.



#### Storage of Water

- Upstream storage at Glenhapple
- Upstream storage at Linloskin Bridge
- Upstream storage at Frankie Hill
- Upstream storage at The Ghyll
- Upstream storage in River Cree tributaries

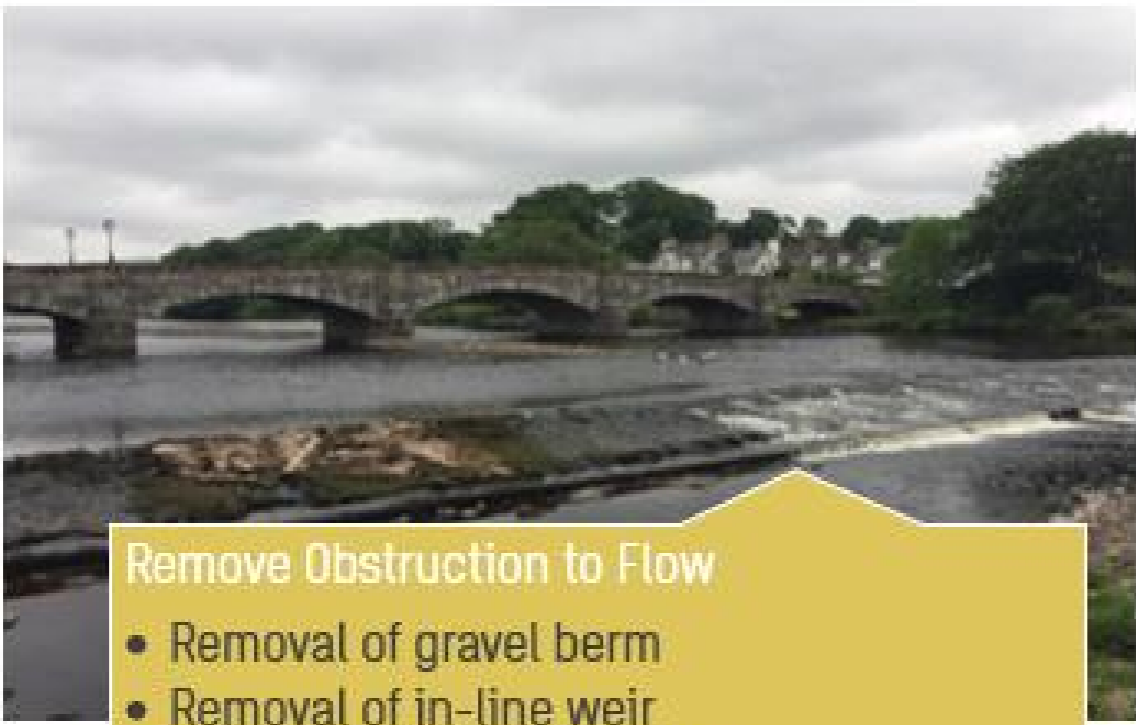


#### Direct Defences



#### A75 Road

- Increase flow area beneath A75 bridge
- Removal of A75 embankment
- Creation of a diversion channel beneath the A75



#### Remove Obstruction to Flow

- Removal of gravel berm
- Removal of in-line weir
- Removal of upstream weir
- Remove Mill Island
- Remove sediment build-up at structures



#### Modify River Channel

- Placement of obstruction (River Cree)
- Placement of obstruction (Penkiln Burn)
- Reconnect Penkiln Burn upstream
- Diversion of Penkiln Burn
- Dredge Channel
- Disconnect former mill lade



#### Reprofile Land

- Reprofile land at Broomisle
- Reinstatement of flood banks in upper catchment
- Reprofile of land around pumping station
- Mitigation of forest management

All of these options were considered and narrowed down to a short list at the VM1 meeting. Several options were proven not to reduce flood risk, or unsuitable due to other constraints.

The Short List included the below options which were discounted:

<p><b>Installation of Obstructions on the River Cree</b></p> <p>Storage area was found to be significantly below what would be required to impact flooding within the town.</p>	<p><b>Upstream Storage at Linloskin Bridge</b></p> <p>Obstructions placed in river slowed flow at less intense storms, but were ineffective during extreme events.</p>	<p><b>Additional Flood Relief Culverts Beneath A75</b></p> <p>Ground levels near to the A75 embankment eliminated any impact additional culverts would provide.</p>
<p><b>Reinstatement Storage Area at Water of Minnoch</b></p> <p>Storage area was found to be significantly below what would be required to impact flooding within the town.</p>	<p><b>Upstream Storage at The Ghyll</b></p> <p>Presence of former lead mine a pollution risk. High cost of relocating roads, services and property from inundated area.</p>	<p><b>Upstream Storage in River Cree Tributaries</b></p> <p>Small number of impoundments yielded no improvement. Prohibitively high number of impoundments required.</p>

Further investigations, modelling, and public and stakeholder engagement followed, allowing the selection of a preferred option.

#### The Preferred Option

The preferred option comprises a combination of options:

- Direct defences at locations to be determined during outline design
- Increase flow area beneath A75 bridge
- Two stage channel to facilitate increased flow area, extending upstream to pumping station
- New Sparling Bridge to tie-in with the above interventions