

#### INFORMATION REPORT

Agenda item:

9

Title of meeting: Cabinet.

**Date of meeting:** 3<sup>rd</sup> March 2014.

**Subject**: Portsmouth City Council Flood Update

**Report by:** Simon Moon, Head of Service, Transport and Environment

Wards affected: All

### 1. Purpose of item

- 1.1 To inform Cabinet of storm damage and actions undertaken by officers in dealing with the exceptional weather conditions.
- 1.2 To advise on funding arrangements for emergency works and capital schemes and costs incurred to date on repairs.
- 1.3 To thank staff and outside Agencies for their work.

## 2. Background

Portsmouth has (along with the rest of the country) been subjected to unprecedented weather. This commenced with a major thunderstorm event on the evening of the 22<sup>nd</sup> of October followed by the St Jude storm on the 27<sup>th</sup> October, the East Coast storm surge on the 6<sup>th</sup> of December, high winds, rain and exceptional tides on the 23<sup>rd</sup> of December through to the 6<sup>th</sup> of January.

High rainfall and storm force winds continued into the first two weeks of February with amber weather alerts for gale force conditions and heavy rain becoming frequent notifications. Extreme storm conditions were experienced overnight on February 14<sup>th</sup>.

### 3. Information

- 3.1 The events have in themselves been exceptional and have produced some statistics that are worth repeating. The thunderstorm event of October 22<sup>nd</sup> deposited 26mm of rain on the city in barely 1 hour this has been measured as a 1/36 year event. Southern water had both the main pumps at Eastney and the new sister pumping station fully operational to take this water away from the City.
- 3.2 Rainfall for the Solent and South Downs Area in December was measured at 205% of the long-term average (180mm) and in January this figure increased to 254% of the long term average with 217mm of rainfall. This is the highest monthly rainfall since 1910.
- 3.3 The storm surge of the 6<sup>th</sup> December produced a prolonged tide of 5.41 metres against the Old Portsmouth floodgates for nearly 2 hours. Spring tides increased levels to 5.51 metres in early January these were accompanied by gale force south easterly winds.



3.4 Groundwater levels remain at exceptionally high levels throughout the city and cellar flooding and some overland flooding have been reported.

# 4. Damage Assessment, Mitigation and Actions

- Tree damage was sustained throughout the period, commencing with the St Jude Storm on the 27<sup>th</sup> October and culminating in the recent loss and precautionary felling of trees on the Tangiers Road. Tree surgeons have worked sensitively throughout the stormy weather often at night and out of hours in order to minimise disruption.
- Flooding of the Eastern Road on New Years' day, resulting in temporary Road Closure. This
  happened due to an extremely high tide and a South Easterly wind causing some wave
  over-topping of the defences. Future work to prevent this re-occurring has already
  commenced. A public consultation on options for the refurbishment of North Portsea Coastal
  defences will commence on 20<sup>th</sup> Feb at Anchorage lodge. A business case of which the
  Eastern Road defence is part will be put to the Environment Agency for approval in July
  2014.
- Damage to the Seafront at Southsea Opposite the Model Village Jan 4<sup>th</sup> 6<sup>th</sup>. Concrete coping was displaced and hundreds of tonnes of shingle were deposited on the esplanade and road. This was removed and repaired as part of the PFI contract. This part of the Esplanade is being assessed as part of the Southsea Flood Defence Refurbishment Schemes. Public consultation on this scheme is due to commence in June/July 2014.
- Undercutting of the Esplanade at Southsea near the War Memorial Jan 4<sup>th</sup> 6<sup>th.</sup> Remedial work has already been undertaken by Colas as part of the PFI contract. Further damage on 14<sup>th</sup> Feb.
- Hovercraft terminal shingle deposition. Jan 4<sup>th</sup> 6<sup>th</sup>. Several thousand tonnes of shingle was
  deposited on the Hoverport Terminal Apron. This was removed in a joint venture by the
  operators and PCC. The operator has to clear the shingle and PCC need it to re-profile the
  beach where there is obvious shingle loss. This area is included in the Southsea Defence
  Refurbishment schemes.
- Southampton Road overtopping. Jan 4<sup>th</sup> 6<sup>th</sup>. Coping stones were dislodged and a large amount of debris was deposited on the pathway. Repairs have been made and the debris removed. Further damage 14<sup>th</sup> Feb. Remedial work now completed.
- Flooding of the Pyramid Centre, Rock Gardens and Canoe Lake. 4<sup>th</sup> Feb. This was attributed to extremely unusual wind and tide conditions that caused overtopping of defences behind Southsea Castle and at the section of esplanade by Canoe Lake where the foreshore is very narrow. High waves and a SS Easterly wind coincided with a storm surge and high tide. These conditions have not been experienced before, and did not occur during higher tide levels over the New Year period. This over-topping will be addressed as part of the Southsea Scheme.
- South Parade Pier has sustained considerable damage to its forward boat deck. Remains of
  this structure were washed up on the beach at Southsea. The owners are aware and are in
  dialogue with our Seafront Management Team. A scheme is underway to prevent access
  under the pier whilst its structural condition remains unknown.
- Incremental damage is being sustained to Long Curtain Moat Sea Wall by continuous waveaction and high tides. The sea wall is being assessed on a daily basis. Colas have an
  instruction to undertake emergency repair work as soon as they can access the area safely.
  Further and more significant damage occurredat Long Curtain Moat on the 14<sup>th</sup> February.
  Temporary repairs are being undertaken to the structure and the millennium walkway will be
  re-opened when re-assessed by PCC structural engineers. (See 5.4).



- Ground water flooding is being assessed at Stanley Avenue to see if there is an appropriate
  and cost effective solution. It should be noted this does not affect residential properties and
  flooding is limited to an access track and garages at the rear of some properties.
- Throughout the stormy conditions officers have patrolled and monitored areas at risk to ensure that appropriate early responses can be taken.

## • Update Monday AM Further damage from Friday Storm

- Long Curtain Moat Structural damage has been caused by high waves and the largest tide
  in seven years. This is being assessed now by PCC officers. The footpath has been closed
  and stabilisation of the existing structure is being treated as a priority. There has been
  damage to the gates at Sallyport and plates at the gunports have broken loose. Remedial
  work to these items will also commence as soon as possible. Guy Mason has been
  speaking to Cllr Wood regarding this.
- Anchorage Park. Officers held a tide watch at this location due to the forecast tide, but o
  problems were reported.
- Flooding at Pier Road, Durisburg Road and Copnor Road. Sheer volumes of water caused groundwater and surface water flooding at these locations. The Copnor Road flooding will be substantially reduced by the Surface Water Separation scheme which will divert water from this location to Great Salterns Lake and Pumping Station.
- Rees Hall Students accommodation. Sandbags were placed as a precaution in the location to prevent surface water flooding.
- Property Flooding To date no residential flooding has been reported, although residents of the Southampton Road were subject to hoax calls asking them to evacuate. This was dealt with by the Police. Mentioned on Sky News Feed.

### 5. Continuing work to build resilience and obtain funding

Over recent years we have taken a strategic approach to reducing flood risk in the city of Portsmouth. This has included working closely with our partners at the Environment Agency, Southern Water and Colas and this continues to be part of a long term flood risk management plan.

- Despite record levels of rainfall there have been only a few instances of surface water flooding. This has been made possible through the efforts of PCC officers who have established and led a comprehensive gulley cleansing programme now undertaken by Colas. This work is directly in line with the Pitt Review produced after the summer 2007 floods. The Report identified blocked gullies as a major source of surface water flooding. In the last year from March 2013, just under **16,000** gullies have been cleaned, with a target figure approaching **21,000** to be completed before the end of February 2014. This is huge achievement which has directly resulted in fewer surface water problems.
- A series of surface water separation schemes are being undertaken by Southern Water throughout the City. PCC officers have been instrumental in the fast tracking of this work through planning permissions and building restrictions and have worked closely with the contractor to ensure delivery with minimum disruption. These individual projects will come 'on line' in late spring/early summer 2014 and will give even further resilience to the City. Approximately 6000 litres of surface water per second will be removed from the sewer system by this work, raising our standard of protection to 1/76 years (possibly higher) at a cost of over £20 million pounds funded directly by Southern Water. Further collaboration with Southern Water will soon commence which will identify more opportunities to reduce surface water flood risk.



- 5.3 PCC is currently undertaking options appraisal for the refurbishment of Coastal Flood Defences at North Portsea and Southsea. A business case for the approval of the North Portsea schemes will be presented to the Environment Agency For approval in June/July of this year. This item has already come before informal cabinet. The Southsea Schemes are due to start public consultation in June/July and will follow the North Portsea schemes for approval in 2015. Treasury guidelines currently state these schemes will qualify for full funding, but officers are keen to seek contributions from all parties to prioritise the schemes over and above others. Although no accurate costs have been identified other than those in the Portsea Island Strategy, funding could exceed £60 Million.
- 5.4 Officers are now working with the Environment Agency seeking opportunities to bring forward elements of the Southsea refurbishment work at Long Curtain Moat. Storm damage at this location effectively re-prioritises the need for wholesale replacement as opposed to ad-hoc repair.
- 5.5 A bid from PCC for funding to cover remedial repairs and clean-up operations has already been put to the Environment Agency for some £18.5K. This figure may rise due to the problems with the seawall at Long Curtain Moat.
- 5.6 Members should note that a substantial amount of the clean-up work both after and during the storms has been covered by the PFI contractor within the existing service agreement.
- 5.7 In accordance with the Flood and Water Management Act 2010, PCC has produced a Preliminary Flood Risk Assessment, a Surface Water Management Plan and finally a Flood Risk Management Strategy which sets out our aims and objectives for the next 5-10 years. This document has been produced in conjunction with our partners and stakeholders and with the approval of the Environment Agency.
- 5.8 Officers will look for funding opportunities which become available after the recent offer of financial assistance made by the Prime Minister in Parliament. However, the current level of damage may not qualify for emergency financial assistance under the existing Bellwin Scheme available to Councils for emergency work.
- 5.9 Officers from our Civil Contingency Unit have been instrumental in the work they have done at Netley with their colleagues in Hampshire for Emergency Response and have been asked to assist on-going County-wide operations. Coastal and Drainage Officers and The PFI Team continue to monitor and patrol, working to minimise both damage and risk.

signed by:	Simon woon, Head of Service, Transport and Environment

**Appendices:** 

Background list of documents: Section 100D of the Local Government Act 1972



The following documents disclose facts or matters, which have been relied upon to a material extent by the author in preparing this report:

Title of document	Location	
Photographs of recent storm damage		
The recommendation(s) set out above were by on	approved/ approved as amended/ deferred/ re	ejected
Signed by: Councillor Gerald Vernon-Jackson	on - Leader of the Council	