

Portsmouth
Water



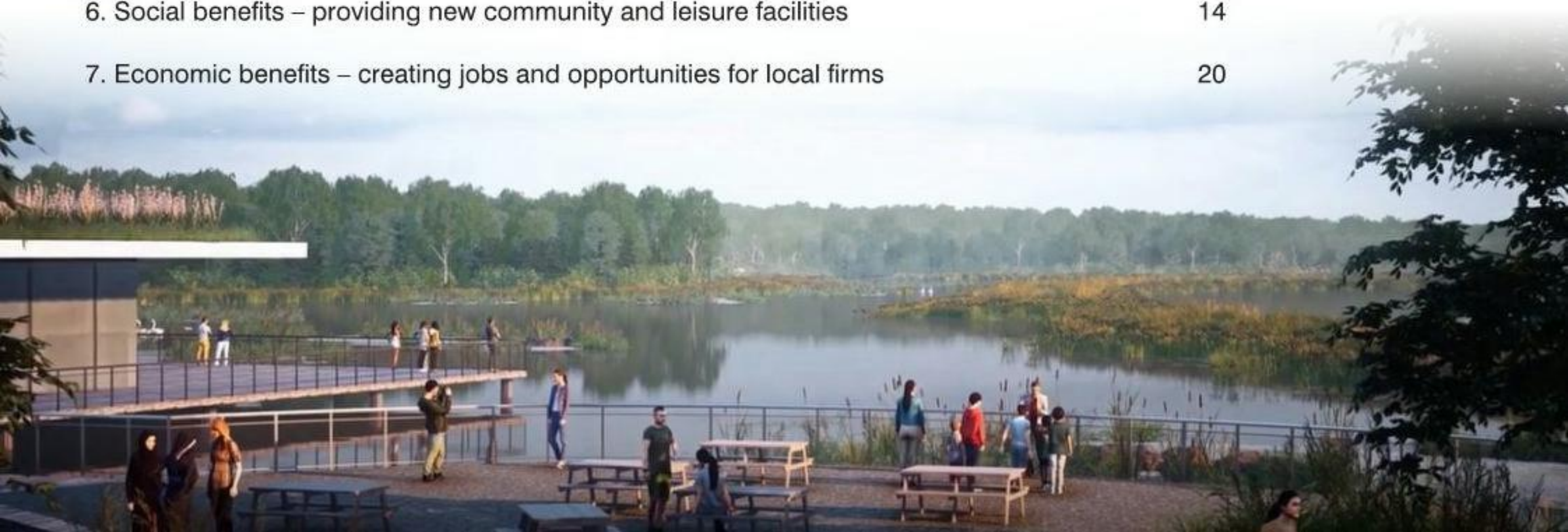
HAVANT THICKET RESERVOIR



A summary of the benefits of Havant Thicket Reservoir

Contents

Havant Thicket Reservoir - Benefitting society and the environment for decades to come	3
1. This report	4
2. Our purpose	5
3. Introduction	6
4. Maximising the positive impact of the project	8
5. Environmental benefits – supporting nature and wildlife	11
6. Social benefits – providing new community and leisure facilities	14
7. Economic benefits – creating jobs and opportunities for local firms	20



Havant Thicket Reservoir

Benefitting society and the environment for decades to come

Foreword from Bob Taylor, Chief Executive Officer of Portsmouth Water

We are in a privileged position to be progressing the first water storage reservoir in the UK for decades, providing a flagship project for the South East which would ensure our area thrives during climate change.

The reservoir, which would be the first to be built in this country since the 1980s, would boost the resilience of water supplies in the water-stressed South East. It also has a fundamental role to play in protecting two precious chalk streams in Hampshire – the River Test and River Itchen – by supporting Southern Water to reduce the amount of water it takes from them to supply its customers.

As well as providing vital water resources, we are tapping into the site's potential to offer a host of wider benefits to the environment and our communities – education, health, wellbeing, local employment and training. Overall, building the reservoir would bring more benefits for nature, wildlife and local people than the existing grassland.

We plan to create a new wetland to support threatened species of local and migrating birds, as well as new woodlands, hedgerows and wildflower banks, and improve existing woodlands. We began planting new trees in 2019, with a further 3,000 planted in 2020 to create a memorial garden and provide a future foraging habitat for the 13 species of bat recorded on the site.

In addition, we want to build a visitor centre with education facilities, play and picnic areas and paths for walking, running, dog walking, cycling and horse riding. We will continue to explore ways the site can support local residents, with a particular focus on providing great facilities. For example, we intend to create opportunities for training, volunteering and jobs as the reservoir and its amenities are created and come into day-to-day use.

We are also keen to maximise opportunities for local employment during the reservoir's construction, as well as develop skills locally and leave a really positive legacy in our communities.



Bob Taylor
Chief Executive Officer
Portsmouth Water



1. This report

This report sets out the environmental, economic and social benefits that would be delivered through the construction of the reservoir as we seek to improve the local area and provide amenities for all to enjoy.

This is becoming an increasingly important area as we are beginning to understand more about the links between enjoying nature, wellbeing and health.

By building this reservoir, we would improve the local area and support the wider regeneration effort already underway, strengthening the wellbeing and social cohesion of our community and the environment.





2. Our purpose

We are here to serve the community

We have always been a community-focused company working to benefit society through our 160+ year history by providing water to the local community and constantly working to improve the quality of our supplies and our network. We are proud to serve our community and we hope the reservoir will improve our services to create a better Portsmouth Water for everyone.

Protecting the environment and ensuring sustainability

We already go "above and beyond" to support the environment by maintaining and enhancing nature, as well as undertaking biosecurity work on our sites. We deliver 'on the ground action' catchment programmes to protect and improve drinking water quality, as well as look after the quality of local rivers and coastal waters. We're committed to recycling and we run a number of initiatives to reduce waste such as single-use plastics. More than 95% of our electricity comes from renewable sources and we use solar resources at six of our own sites. We run a 'Saving Water Challenge' for our customers and have a dedicated programme to reduce leakage. Our next step is to further embrace conservation, environmental sustainability and enhancements as part of the reservoir project.

Connection with community

We have a history of working closely with local schools and for the reservoir project we have already provided assembly talks, site visits, interactive model sessions, letters, helped pupils grow on saplings and plant them on the site and even produced a lockdown educational sheet for primary schools with a competition to name our reservoir duck. The reservoir will create many more educational opportunities during and after construction. Volunteers from Leigh Park volunteering group Positive Pathways and Friends of Staunton Country Park have also been busy on the site, putting up fences, planting hedgerows and trees to boost a new memorial woodland. We want to create hundreds of volunteering opportunities once the reservoir is built.

Improving local amenities and the local area

We have taken this opportunity to improve amenities and engage with lots of people and groups in developing our plans for the reservoir. We have worked closely with the dedicated Havant Thicket Reservoir Stakeholder Group. We have also worked with groups relating to cycling, angling, ramblers, horse-riding, the Wetland and young people. We also have a Community Advisory Group which will continue to give input all the way through.

3. Introduction

We want to invest more than £120 million to develop a new reservoir in Havant, in an innovative collaboration with Southern Water to help secure more reliable and resilient water resources for the wider South East.

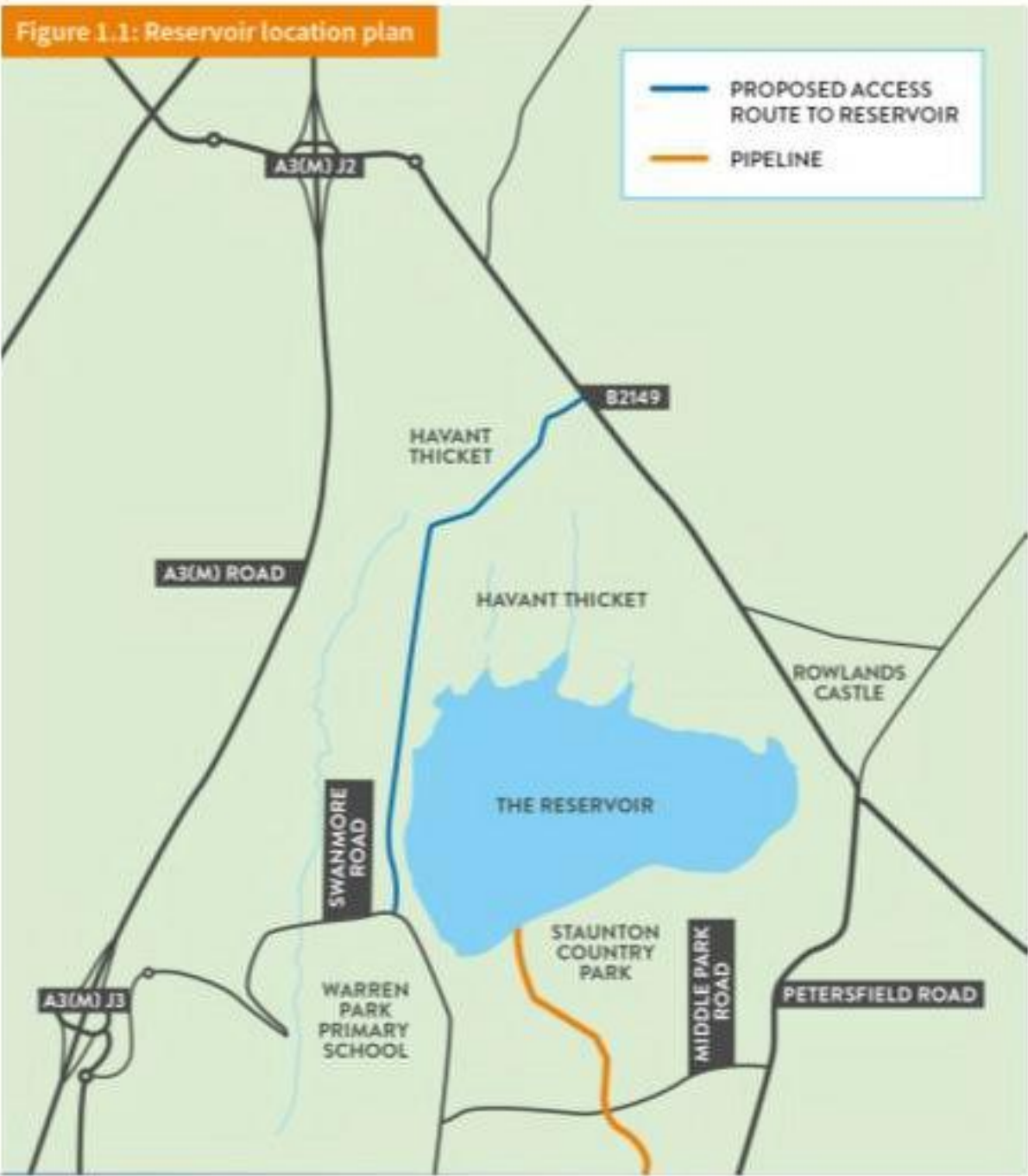
The reservoir is planned for a 160-hectare site which we have owned since 1965. The site is next to Rowlands Castle, Leigh Park and Warren Park and bordered by Havant Thicket woodland to the north, which is owned by Forestry England, and Staunton Country Park to the south, owned by Hampshire County Council.

At 1.6km from east to west and 0.8km from north to south, the reservoir would hold approximately 8.7 billion litres of water and would be able to supply 21 million litres of water each day.

The reservoir, when constructed, would be filled with surplus water drawn from the springs at Bedhampton, when flows are at their highest during winter - this would be via a new pipeline that would also be built. It would provide water supplies to our customers as required and allow other water in the west of our region to be supplied to Southern Water for its customers, enabling Southern Water to reduce the water it takes from the Rivers Test and Itchen.



The Reservoir Site (including proposed access routes):





4. Maximising the positive impact of the project

Environmental and social benefits are deeply embedded in this project and we are committed to the development and implementation of a social-value procurement policy to maximise the positive impacts suppliers can bring to local communities.

Our core strategic objectives are as follows:

- Increase the resilience of supplies;
- Deliver environmental benefits to the South of England;
- Provide best value for customers;
- Support the local economy;
- Support the local community; and
- Ensure effective collaboration with our communities.

Project drivers

To help us meet these core objectives, we've developed a number of project 'drivers'. These provide a high-level framework to guide the project. Environmental, social and economic factors are at the very heart of this framework.



Working with our communities

We have worked hard to make sure as many local people as possible have had the opportunity to tell us what they would like to see from the reservoir.

We've worked closely with a wide range of community representatives, such as local councillors, community groups and representatives from environmental groups to develop the reservoir design so far and will continue to do so. In large part, these discussions have taken place via the dedicated Havant Thicket Reservoir Stakeholder Group, which we formed in 2004 to bring together the knowledge, expertise and insight of local stakeholders, environmental organisations and regulators.

More recently, we carried out public drop-in exhibitions, workshops and surveys with local communities in 2019, followed by a broader formal public consultation in May-June 2020. This ensures our plans reflect the views of the people who live near the reservoir or are interested in its creation.

Despite the Covid-19 situation, we made extensive efforts to ensure the public consultation for the reservoir and pipeline could still take place effectively, reaching a wide audience and enabling people to find out more about our proposals and have their say.

We took an innovative approach in undertaking a mostly digital, or online, public consultation, including creating a series of short videos with team specialists, hosting public webinars with live Q&A sessions, sharing an animated fly-through to show what the completed reservoir would look like and creating an interactive consultation website. At the same time, we distributed promotional leaflets to 50,000 households to raise awareness of the consultation and encourage feedback, with printed copies of the brochures supplied to those who requested them and to residents living adjacent to the site.

We also undertook phone surveys with residents and online surveys with young people in a local secondary school to make sure we heard views from a wide range of the community.

There was a high level of engagement and the feedback on our approach was overwhelmingly positive.



5. Environmental benefits – supporting nature and wildlife

Greater good of the region

We are building the reservoir as the South East as a whole is under 'serious water stress' and water companies are being asked to take less water from some of their sources – such as the chalk rivers in Hampshire – to keep them healthy and protect wildlife.

At the same time, water companies need to find more water to cater for the effects of climate change and a growing population.

This particularly affects Southern Water at the moment as the company has a pressing need to find new water resources for the customers it supplies drinking water to in Hampshire to replace water taken from the River Test and the River Itchen.

Portsmouth Water is in a better position currently as our supply area is only under 'moderate water stress'. This is because there are underground springs which provide plentiful, clean water. In winter, much of this water is surplus to our requirements and flows out to sea, so we could make better use of some of it by capturing it and storing it in the reservoir until it is needed. This will allow us to share more water with Southern Water's customers in Hampshire from our network.

Overall, building the reservoir will make the whole South East much more resilient to droughts, which are likely to happen more often in the future due to climate change.

The reservoir would also see the creation of a new green leisure hub, benefiting local people and wildlife.

Furthermore, the scheme would result in substantial reductions in nutrients loads (particularly nitrates) to the internationally protected Chichester and Langstone harbour and would deliver improvements to water quality and aquatic ecology in the nearby Hermitage Stream.

The national picture

The Government is currently calling for water companies to invest in more projects to help supply water, such as reservoirs and regional transfers. Projects like this are needed to secure reliable water supplies for the future, alongside reducing the amount of water lost through leaks and encouraging people to use less water.

The reservoir was selected as part of work carried out by the Water Resources South East (WRSE) group, which includes the six water companies in the region and their regulators. It is one of eight 'big ticket' schemes which could deliver more than 15 million litres of water each day.

The case for increased investment to build resilience to drought across the UK was made in Water UK's Water Resources Long-Term Planning Framework, published in 2016, and the 2018 National Infrastructure Commission Report - Preparing for a Drier Future. The Government has also highlighted the importance of developing

strategic water supply management schemes and unlocking investment from water companies to bolster resilience in their 'Flood and Coastal Erosion Risk Management Policy Statement' (published in July 2020).





Providing new wetland and wildlife habitats

The reservoir gives us a great opportunity to create a new wildlife conservation area, by developing a 10-hectare wetland on the reservoir's northern edge. This is a key part of our overall environmental mitigation and compensation plan for the project, in recognition of the fact the current site would be changed by the reservoir being built.

Wetlands are a vital habitat for wildlife and for people to enjoy and get closer to nature, but they are coming under increasing pressure from pollution and droughts. We want to create a sustainable wetland along the northern shore of the reservoir to offer a new home for a wide range of wetland wildlife which could be easily experienced and enjoyed by the public. Right, is an image of how the wetland might look:

The wetland will:

- Provide a resilient habitat which will thrive and which can be managed and maintained so it lasts for decades to come
- Create a diverse ecosystem which connects to other habitats on the reservoir site, supporting wildlife
- Give people a new green space to enjoy and learn about nature and the environment.

We will make sure the materials we use to create the wetland are taken as much as possible from the existing site, to minimise what we need to bring in.

Woodland

We want to deliver many benefits for the environment through the reservoir project.

We considered 72 sites before selecting the Havant Thicket site, which offers the most sustainable source of water and on-site material to create a reservoir.

Regrettably, we will need to remove existing woodland to develop the reservoir but we have continually reviewed the design to see how we can reduce the amount which would be lost.

By realigning the embankment, relocating the visitor car park out of Bell's Copse woodland, retaining an area of woodland in the proposed wetland, redesigning the pipeline route to avoid Great Copse Woodland and reducing the northern access road to single carriageway, we have now reduced this to 12.5 hectares.

We have worked closely with Natural England, Forestry England, Hampshire County Council, the Environment Agency, local planning authorities and wildlife trusts to develop extensive plans to compensate for the loss.

This includes replanting and improving at least 110 hectares of woodland and grassland near to the reservoir and further afield, creating the new wetland area described above and establishing a grant scheme to get other environmental projects in the area off the ground. Improvements would also be made to the Hermitage Stream in Havant.

Extensive surveys have already been carried out to look for and monitor wildlife, such as dormice and bats, and new habitats will be established for wildlife to migrate to before work to build the reservoir would begin.



6. Social benefits – providing new community and leisure facilities

Through the reservoir project, we want to create a place for people of all ages to stay active and healthy, learn more about water and wildlife and get together as a community.

A reservoir visitor centre, car park, play and picnic areas and bird watching facilities would be grouped together to create an attractive and accessible 'green hub' for local communities to enjoy. The hub would be surrounded by a 5km network of paths for walkers, cyclists and horse-riders, as shown in the masterplan map on the next page.

The reservoir would provide a new recreational facility/resource adjacent to one of the most deprived parts of South East Hampshire, in an area which the community can access on foot, by bike, or through existing bus routes. It also offers further opportunities to connect to the wider footpath, cycleway and bridleway networks in the area. More than 29,500 people live within a reasonable walking distance of the site (1.5km) and 120,000 people live within reasonable cycling distance (4.5km).



Figure 6.1: Outline masterplan



Key:

- Red line boundary
- Permissive path - pedestrian use (existing)
- - - Permissive path pedestrian use (proposed)
- Bridleway - pedestrian, cycle and equestrian use (existing)
- - - Bridleway - pedestrian, cycle and equestrian use (proposed)
- - - Path - pedestrian and cycle use (proposed)
- Existing cycle path
- • • Long distance path
- - - Temporary bridleway diversion (will be reinstated to permissive path access)

- Bird watching
- Car Park
- Children's playground
- Vehicle access point
- Picnic area
- Entrance point
- Viewing point

- Existing woodland
- New woodland
- Proposed wet woodland
- Proposed scrub regeneration
- Proposed wet grassland
- Proposed embankment grassland
- Proposed wetlands
- Proposed reservoir

A variety of routes for all different users will start at the reservoir promoting activity, health and wellbeing across the site whilst experiencing different landscapes such as the reservoir, wetlands, grassland, and forests, connecting people to nature and different wildlife species.

It's also being designed to cater for the needs of a wide range of people:



Accessible users



Cyclists



Dog walkers



Older users



Bird watchers



Families



School groups



Runners



Walkers

In addition, we want to offer a wide range of volunteering opportunities, with potentially up to 200 volunteers assisting with work and activities at the visitor centre or on the site.

Illustration of what the proposed visitor centre and the educational bird hide could look like



Reservoir visitor centre – a new facility and resource for the future

The visitor centre would be located on the waterfront in the north western corner of the reservoir site, with direct views across the wetland and reservoir. The visitor centre is being designed to fit in with the local natural environment, using natural materials such as wood available on the site.

Education and play

The educational bird hide is being designed with a lobby area large enough to accommodate a school group. The wetland area and bird hide would be used as an educational resource for people of all ages, to help share information with the community on nature and the environment.

There would also be spaced play areas, combining nature-themed playground equipment with trails and green pathways to create an enjoyable trail experience for children and families.

The centre will be surrounded by nature with direct views across the wetland and reservoir, connecting the visitors to their natural surroundings.

Vision for the Visitor Centre:



The visitor centre would include:

- A reception area with information about water, wildlife, the historic environment and the activities for visitors
- A large open plan café with large windows to give views over the wetland, with seating for up to 50 people
- A waterside terrace, with wildlife viewing facilities and space for additional visitors
- A small space where locally grown food, art and other produce could be sold
- A flexible education and community space, with a separate outdoor area, cloakroom, toilets and storage
- A staff area with office, break room, store and toilet.

The location of the visitor centre within the wetlands allows for a building surrounded by nature.

The route to the centre, with paths adjacent to the wetlands and potentially with bridge links, would enable visitors to experience the surrounding habitats.

The placement of bird watching facilities away from the visitor centre will provide a quieter area to view wildlife. The journey to the hide from the car park and centre would take visitors alongside the wetlands into a wildflower meadow with a clearly defined path. To access the educational bird hide from the centre, visitors would be taken on a journey past the outdoor educational area to a more secluded part of the site, with the hide facing eastwards over and along the wetlands.

Working with the public

We are working with local communities to continue to develop the plans and have brought together representatives from a broad range of organisations including local councils, Forestry England, walking and cycling groups, wildlife groups, community organisations and schools to discuss key issues and obtain feedback.

A wide range of visitors are expected and studies have shown that the increase in visitor numbers will lead to more local people doing 30 minutes of moderate to intense activity each week with a significant cost saving to the NHS.



Memorial woodland

Portsmouth Water has been working closely with Havant Borough Council to establish a new memorial woodland to give local people a place to visit for quiet reflection and to remember those who have passed away.

The scheme, which is part of the overall reservoir project, has seen more than 3,000 trees planted, creating an enhanced green space just off Swanmore Road in Warren Park, next to where the reservoir is set to be built. By planting now, the woodland has time to become established earlier on. Trees which suffered during the extended dry, hot weather in 2020 have been replaced.

These additional trees will also create valuable, new wildlife habitat, providing connection between other areas of woodland nearby and further afield. This means birds and mammals, such as dormice and bats, will be able to move around and feed more easily. A mixture of different types of trees have been planted, including 100 already three metres high, which will help the woodland to establish a good structure more quickly. Portsmouth Water is committed to the on-going care and maintenance of the memorial woodland beyond the planting stage.

7. Economic benefits – creating jobs and opportunities for local firms

The reservoir site would be located adjacent to Leigh Park and Warren Park. The Indices of Multiple Deprivation produced by the Ministry of Housing, Communities and Local Government (MHCLG) show that Leigh Park has some of the most deprived wards in England with Warren Park ward having the highest percentage of long-term unemployed or residents who have never worked. This section sets out how the reservoir will create jobs and opportunities for the future.

Health, Well-Being and the Economy

The importance of access to the natural environment and its contribution to the local economy is being increasingly recognised and can be sizeable. Activities such as walking, cycling and horse riding, bird watching, angling and picnicking all attract visitors and can support better health and wellbeing which in turn supports the economy.

Jobs – boosting local employment

The reservoir scheme would have a positive impact for the local economy, both during construction and for the longer term. For example, the development of the reservoir and the visitor centre is expected to improve sustainable tourism in the local area. This will be particularly important given the widespread impact of Covid-19 and the need to create high-quality and long-lasting jobs.

A report undertaken by Natural Capital Solutions in January 2018 identified employment numbers could be as high as the equivalent of 53 full time jobs in the construction phase. The report identified that once the reservoir is built there could be an equivalent of up to 11 full time jobs created at the site through the visitor centre, café and site management roles. Additionally, the report estimated that spending by employees, visitors and volunteers could support up to 20 new full-time jobs per year. Further work will be undertaken to determine employment opportunities and identify the economic benefits.

Reservoir construction

The project would help support local construction firms operating within the region and provide jobs in the industry. Businesses in the local area would also potentially benefit during construction, for example, with jobs for local suppliers of construction materials and equipment. Local businesses would generally also benefit from temporary increases in local spending, as a result of the direct and indirect employment effects of the construction phase – for example, as construction workers spend their wages in local shops, on accommodation and other facilities.

Reservoir operation

A small number of jobs would be created to manage and run the reservoir site and visitor centre. A number of local businesses may also benefit due to the increase in visitors once the reservoir is open to the public.

Using local suppliers and companies

As discussed earlier, one of our core objectives is to support the local economy and provide opportunities for small local companies. We have held a Supply Chain Engagement Event to brief local, regional and national suppliers on the plans for the reservoir and associated works. We will be working closely with local member associations such as the Hampshire Chamber of Commerce, Civil Engineering Contractors Association (CECA) and the Water Industry Forum. We will also work with local and regional media to promote opportunities.

Increasing prosperity

The area around the reservoir has been designated as an area in need of 'urgent regeneration' and local landowners and estate agents have suggested development of the reservoir could increase property prices. Research has shown house prices can increase when they are located near fresh water. This may particularly be the case for a project like this which is creating additional amenities, including a visitor centre.

Economic benefits of water provision

The reservoir would provide economic and environmental benefits as it would supply Southern Water with extra water and enable it to take less water from the River Test and River Itchen. This would support sustainable growth in the region and provide additional resilience, including in terms of mitigating the economic impacts of water shortages and periods of drought.

Portsmouth Water – a valued local employer

We are proud the reservoir would create skilled jobs for the long term. At Portsmouth Water, we recognise the people we employ are our most important asset. Therefore, we aim to ensure all employees have the knowledge, skills and experience necessary to perform their job to a high standard. This, in turn, enables our business goals and targets to be met.

We offer opportunities through a range of Modern Apprenticeships, including Mechanical and Electrical, Business Administration and Customer Services, allowing employees to obtain qualifications ranging from an NVQ Level 2 to HNC.

Employees are encouraged to further their academic qualifications in relation to their job activity. For example, a number of employees have gone on to achieve, with our full support, Degree and MSc qualifications.

Finding Out More

To find out more about the reservoir project, ask questions and share ideas, visit portsmouthwater.co.uk/havant-thicket-reservoir.