The IGNITION Project Interim Report

April 2021

the ignition PROJECT
NATURE-BASED SOLUTIONS TO THE CLIMATE EMERGENCY

GREATER MANCHESTER DOING THINGS DIFFERENTLY
UIA Urban Innovative Actions
European Union European Regional Development Fund

The IGNITION Project: Interim Report April 2021

Executive summary

The IGNITION project is a 12-partner innovation project working across government, academia, business and communities to establish innovative ways of financing urban nature-based solutions (NBS) that build resilience to climate change.

Since its inception in 2019, this £4 million, EU-funded project is well on its way to providing the tools needed to increase the use of nature-based solutions in Greater Manchester (GM). This interim report summarises the progress made to date, the lessons learnt and challenges still to be addressed.

The project has established a clear process for moving from the current situation, whereby NBS are generally financed on a site by site basis from statutory funding or grants, to the point where large-scale private investment could be secured to roll out NBS at scale across GM.

The project has established a broad framework for understanding the existing level of green space across GM. In the process, we have learnt that increasing urban green space is not a simple, linear process and we are now looking at how we can establish a metric to reflect an increase in functional green space which builds resilience to climate change rather than a generic increase in green space.

Building confidence in the functionality and benefits, green space can provide is necessary to engage investors. Through the establishment of an evidence base that brings together data from over a thousand sources, the project has both identified areas where further evidence needs to be collated, and published a range of resources that are already informing the wider industry.

The process to establish investment in a sizeable pipeline of NBS projects

The Living Lab at the University of Salford will help to fill some of those evidence gaps identified. Due for completion in spring 2021, the Living Lab is unique in creating an installation of interconnected NBS which will provide further evidence of their cost and functionality as well as providing a physical site to inspire and educate all stakeholders from investors to local citizens.

The project has focussed on four potential investment pipelines; the principal one addressing SuDS at non-domestic properties whereby potential savings in wastewater charges could offset the cost of installation and provide a return on investment.

The key lessons learnt to date are firstly that the costs and benefits of SuDS vary significantly from site to site; so the project is working with project partner and water company, United Utilities to identify a more strategic approach focused on areas of climate risk. Secondly, this funding stream is reliant on a charging regime which is liable to change beyond a one-year period and subsequently cannot be relied on to repay up front capital costs or provide a long-term return on investment.

Beyond this the project has looked at additional funding streams relating to co-investment, parks and green-spaces and green roofs. There are shared challenges around translating the potential financial value into investment; willingness to invest, confidence in returns, maintenance and budget management all provide barriers to investment. Each of these funding streams is progressing in the development of specific financing options, with the ambition to produce summary reports detailing the potential for developing an outline strategic case for investment by the end of the project in spring 2022.

For the priority funding stream, the team will focus on identifying additional sources of investment to meet the potential shortfall in terms of charging band savings and financial benefits to United Utilities. The potential to look to philanthropic or government funding to bridge this gap is also being investigated.

Feedback and learnings from the last two years of the project have demonstrated that a successful output of the priority business model would be a large-scale pilot funded through a mix of private, philanthropic investors and potentially, public, finance.

A successful pilot will prove the model, building investor confidence and enabling us to attract private investment at scale in the future. If it can be demonstrated that NBS can generate cash flow at scale, investment in it would operate as other mainstream investment markets do.

The project has also contributed to the establishment of the Greater Manchester Environment Fund. This is a pioneering regional impact investment vehicle that provides a means to unite public, private, and philanthropic funding partners to facilitate strategic environmental investment to address the climate challenges faced by Greater Manchester.

The IGNITION project aims to have accelerated progress substantially towards demonstration that NBS can generate cash flow at scale, enabling investment in it to operate as other mainstream investment markets do.

Living Wall at University of Salford

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Imagine a greener Greater Manchester. A place that works with nature and where the urban landscape is filled with rain gardens, street trees and green roofs, walls and spaces.

The ground-breaking IGNITION project aims to do just this by developing innovative financing solutions for investment in Greater Manchester's green infrastructure. Having started in 2019, this £4 million, EU-funded project is well on its way to providing the tools needed to increase the use of nature-based solutions (NBS) in Greater Manchester.

NBS, such as rain gardens, street trees, green roofs and walls and parks and green spaces, provide natural ways to cope with the extreme effects of climate change such as flooding events and over-heating in urban areas. They can also help to tackle socio-environmental challenges relating to air quality, biodiversity and human health and wellbeing.

The IGNITION project, backed by the EU's Urban Innovation Actions (UIA) initiative, brings together **12 partners** from local government, universities, NGOs and business.

The multiple benefits of NBS are increasingly well documented, but currently rely heavily on statutory or philanthropic funding for implementation. The IGNITION partnership set out to build confidence in the benefits of NBS and understand how these could be translated into financial savings or returns. The ultimate aim of the project is to attract investment to deliver NBS projects at the scale needed to ensure the climate resilience of our city region.

Diagram of a nature-based solution (swale) in action

The ambition of the project is to generate investment that will enable an increase in greenspace across Greater Manchester by 2038.

Planned project activities

The key activities that the project set out to undertake included:

- An assessment of the amount of greenspace already within Greater Manchester (GM) to provide a baseline against which to measure an increase in urban greenspace.
- Research into the multiple benefits of different types of NBS to inform the development of potential innovative financing models.
- Development of a digital tool that would facilitate the identification of potential sites for investment in NBS at scale through overlaying different social, environmental, and physical data across the city region.
- Development of a feasibility study that identified reductions in wastewater charging through the installation of sustainable drainage systems (SuDS) as a potential income stream to provide return on investment.
- Establishment of a special-purpose vehicle that would enable the governance, procurement, and management of long-term investment in one or more pipelines of projects.
- A Living Lab at the University of Salford that would be the first of its kind to study the functionality of combined systems of NBS.
- A diverse plan of stakeholder engagement to build confidence and knowledge around NBS and the systemic change required to move towards a situation where investment in and roll-out of functional green and blue space is the norm.

The 12 partners have worked on these aspects of the project in parallel, with strong connections between each package of work. The project started in earnest in April 2019 and was due to be complete in October 2021.

Due to the challenges faced during the COVID-19 pandemic, the project has been extended until the end of April 2022 and this report provides an update on what has been achieved and learnt over the past two years. It includes the challenges still faced and what we hope to ultimately deliver in the remaining year of the project.

Despite the challenges encountered due to the pandemic, IGNITION has continuously reviewed and adapted to deliver the project in a locked-down world. The project has achieved many key successes; this interim report will highlight these achievements and recognise the lessons learned, ongoing challenges and next steps.

The process

The overarching ambition of IGNITION is to establish investment in a sizeable pipeline of NBS programmes from the end of the project.

To go from where we are today, whereby NBS projects are generally financed on a site-by-site basis, and investment comes from statutory funding or other grants, to the point whereby significant private investment could be secured to fund a pipeline of projects across GM, cannot be achieved overnight.

This requires going through several steps within IGNITION, which in turn would establish a precedent for rolling out the model at scale across urban conurbations in the UK and beyond. The diagram below details the process and approach the IGNITION project took.

The process to establish investment in a sizeable pipeline of NBS projects

Step 1: Establish evidence of environmental benefits

NBS provide a range of environmental and social benefits and services. Understanding how to measure the value of greenspace, its value as an NBS, and the opportunity to increase functional greenspace across GM was key to establishing a baseline for the project.

There is a growing body of evidence to support these benefits, however, the diversity of types of NBS and the different context in which they can be installed means that current confidence in investing in green infrastructure rather than traditional grey infrastructure is low.

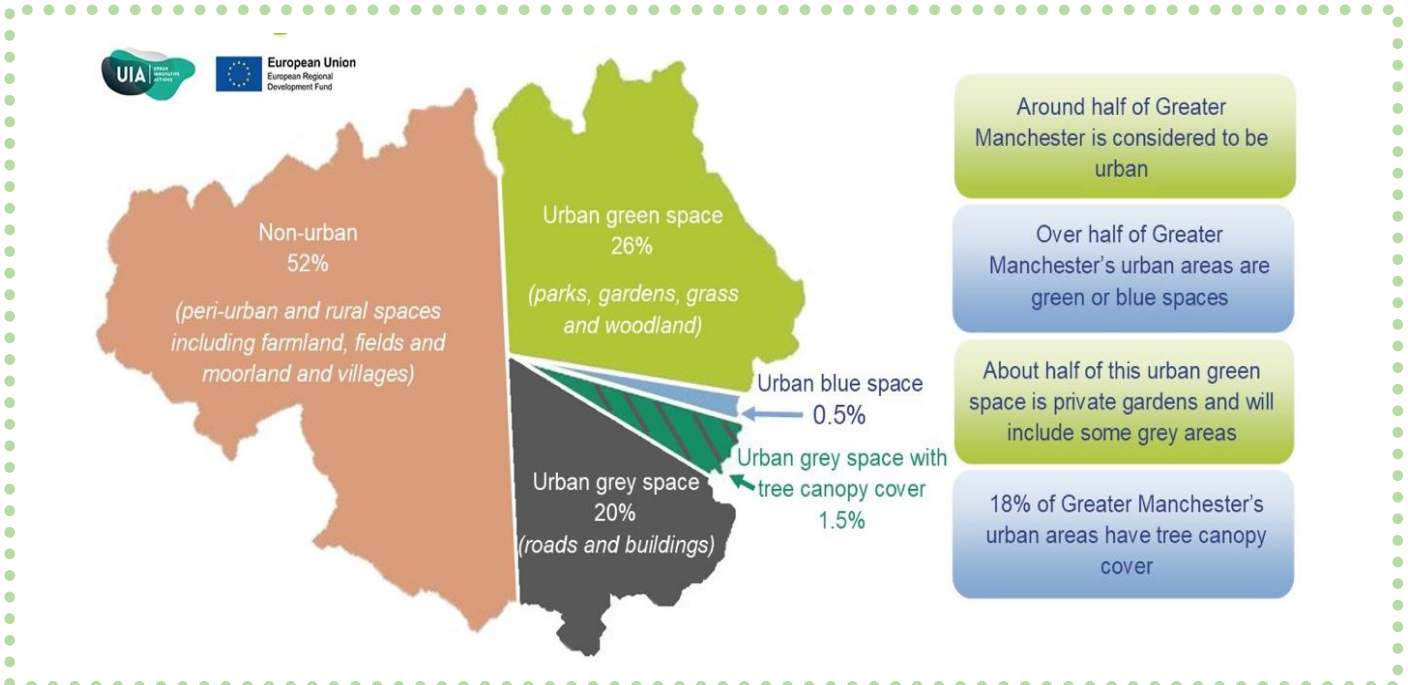
The project set out to establish what evidence existed, how this could best be used to build confidence in NBS, and where additional research and evidence were needed.

A greenspace baseline for Greater Manchester

Produced by the University of Manchester, a green infrastructure (GI) baseline has been produced for GM's urban areas. This shows that 55% of GM's urban areas are green and blue spaces that can be classified as GI. Not all GI can provide NBS benefits, however, it provides the initial foundation for the project.

The IGNITION GI baseline is two-dimensional. As well as surface cover, the baseline also incorporates tree canopy cover. This demonstrates that 18% of GM's urban area has tree canopy cover. This is a useful innovation and enhances our understanding of GM's GI, providing an understanding of where new or existing green and blue spaces could give the most value in the form of NBS.

Infographic of green and blue space in Greater Manchester



Lessons learned

Establishing a baseline that enables the project to identify a 10% uplift by 2038 is not a simple, linear process. The project team has worked to identify the conflict between generic greenspace and functional greenspace that acts as an NBS and delivers urban resilience.

The baseline doesn't provide a measure of functionality, therefore moving forward the project has revised the ambition of 10% as something that is currently difficult to quantify. We have revised the project to look at ensuring that uplift in greenspace both provides new green and blue spaces and enhances the functionality of existing green infrastructure.

Moving forward

In addition to quantifying GM's urban GI baseline, IGNITION is developing options for setting and monitoring the achievement of NBS targets. Following the completion of the baseline, the IGNITION partnership decided to move from an 'expansionist' approach based on increasing GI coverage, to a target that focuses on 'uplift' of NBS benefits of green and blue space.

Work is ongoing to identify options to enable the IGNITION partnership to select a preferred approach to GM's GI uplift target.

An evidence base for NBS

The project team has compiled an evidence base that draws on evidence from over 1,000 sources to demonstrate the economic, social and environmental drivers for NBS. **The evidence base on urban NBS** pulls together the extensive available evidence into an accessible resource.

Partners have produced a report that translates key findings in the evidence base to address priorities of business and the built environment. This report, "**Nature-based solutions to the climate emergency**", aims to inspire confidence in business leaders and investors to increase their use of NBS to deliver greater outcomes for business, society and the environment.

Lessons learned

Key areas where current evidence is limited include:

- The wider benefits of SuDS beyond water quality and flood management
- Local business and economic benefits of NBS
- Health and wellbeing value of specific types of NBS

Moving forward

The evidence base will continue to be an open-source live repository of knowledge on NBS performance, accessible to all. The evidence base will incorporate learnings from the Living Lab and invites other research projects to contribute evidence.

To date, the evidence base has informed:

- United Utilities' green recovery bid
- Other European NBS and resilience projects
- The development of a Green Roof Cost Benefit Analysis tool
- The Greater London Authority Sector SuDS guidance compiled by CIRIA
- UK Green Building Council's wider work on NBS and the built environment

Nature-Based Solutions Living Lab:

The IGNITION Living Lab at the University of Salford will showcase a range of innovative, interconnected NBS and highlight their benefits for people, biodiversity and society. The impressive structure, including a rain garden, trees and green wall and green roof across two university buildings, will be completed in spring 2021.

The Living Lab has two key roles that span the project:

1. To capture new evidence on the efficacy of interconnected NBS systems

2. To provide an inspirational, educational and engaging centre where all stakeholders can learn more about NBS

The Lab was planned and constructed by sustainable drainage experts at **SEL Environmental** and will be launched officially alongside the Natural Capital Group Conference in June 2021.

Lessons learned

- Involving all stakeholders from the outset is key to achieving an innovative NBS installation

- Focus on innovation in design was a key criterion to ensure the involvement of inventive contractors

- A collaborative approach to working with stakeholders and contractors ensured agility and ongoing development of the design

Moving forward

The Living Lab will be an interactive showcase of NBS in action and provide a living legacy for IGNITION. With the constraints on in-person meetings brought on by the COVID-19 pandemic, the project will create a virtual tour making the lab accessible globally. The evidence gathered will continue to inform the evidence base and the wider case for increasing NBS across Greater Manchester and in other urban areas.

In summer 2021, the University of Salford will launch an online platform sharing the live

Living Lab at the University of Salford

Step 2: Identify potential finance streams

Having established the evidence to support the environmental benefits of NBS, the project partners set out to identify where the multiple benefits of NBS could have a financial value identified and who may be willing to pay for those benefits. As the environmental and social benefits of NBS are numerous, and often considered as 'public services', this has been a particular challenge for the project to overcome.

The project partners have been working to develop several "business models" to demonstrate the potential financial value of different types of NBS in different contexts and who would benefit from those.

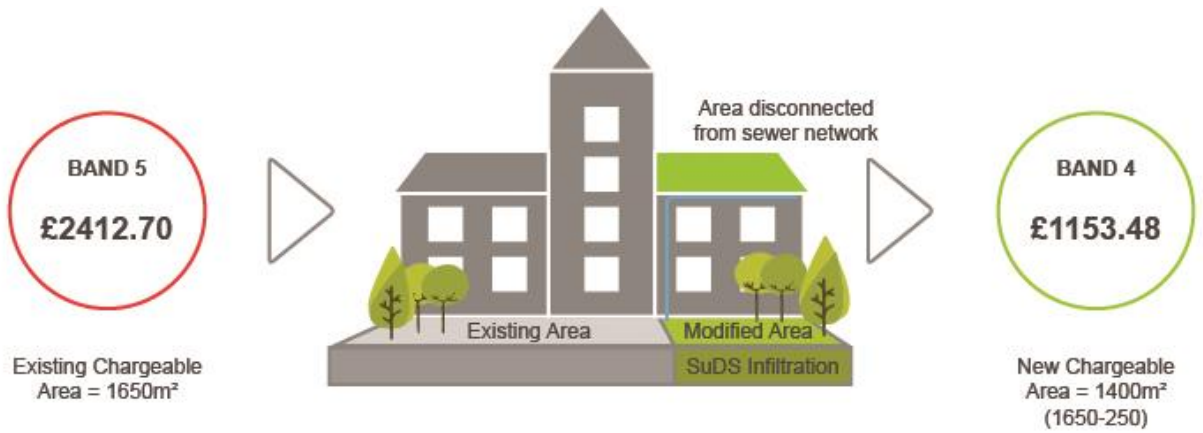
The Priority Business Model SuDS at non-domestic properties

A potential, ready-made way of placing a financial value on NBS exists in Greater Manchester. The North West's water company, United Utilities, has a charging policy that incentivises SuDS on non-domestic properties by offering a financial discount on wastewater charges where SuDS of sufficient size are installed.

Our work on progressing this model builds on Water Resilient Cities work completed by BITC's Water Taskforce that identified this approach as a way to potentially place a financial value on SuDS in non-domestic properties.

The original model

We have used this previous work to develop a pipeline of public estate sites across GM that could reduce their wastewater charges if they installed SuDS of a sufficient size.



A diagram representing the priority business model

Lessons learned

Following refinement of the original model, we have found that this model on its own would not be sufficient to incentivise SuDS:

- Reductions in charges are not generally sufficient to repay the upfront capital costs of SuDs installation
- Where they are sufficient, they generally pay back over a relatively long period of time (10-15 years)
- The existing water charging regime in England is liable to change beyond a one-year period, so reduction in charges cannot be relied upon to repay the upfront capital installation costs
- The benefits SuDS provide vary significantly depending on location, including topography and proximity to high-risk flood infrastructure. Reductions in wastewater charges are applied in a blanket way, irrespective of flood risk

Adapting the model

We have, therefore, had to adapt this original model to accommodate this learning. Alongside looking at sites that would be able to reduce their wastewater charges, we are identifying those sites where SuDS would have the most benefit in terms of reducing the risk of flooding incidents in the local areas.

Together, these create financial value (savings to United Utilities in reduced flooding incidents and to site owners through reduced charges) that we will seek to use to contribute to the cost of the SuDS and their maintenance over time.

We have developed a replicable site-screening tool allowing for easy refinement of feasible sites. This has enabled us to create a long list of around 600 sites based on the sites' ground conditions and their potential to reduce surface water charges.

We developed processes and methodologies for assessing sites – remotely and through visits – to understand the practicalities of SuDS being installed. These have been applied and tested across GM sites both in person and remotely.

Moving forward

The process of moving towards private investment in NBS is covered in detail later in this review. The next steps in progressing this model are:

- Refining the long list of sites using on-site and desk-based analysis and reviewing with stakeholders to assess if they will deliver the necessary benefits to justify investment
- Development of a Strategic Outline Case (SOC) for the pipeline of viable sites
- Engaging with public, private and philanthropic investors to generate initial investment and attract private investment
- Establishing a special purpose vehicle that can procure, deliver, and govern investment, maintenance and returns on the installations

Shaw Heath NHS Health Centre, Rain Garden
A pilot site for the Water Resilient Cities work

Future funding streams

Alongside the priority business model, the project team carried out a broad scoping exercise to identify other potential funding streams that could provide the basis for an innovative pipeline of investible NBS projects.

1. Co-investment in SuDS

SuDS provide multiple benefits to a range of stakeholders. There is also a lot of willing amongst both public and private landowners or developers to install NBS. However, as the initial outlay is often greater for installing a green rather than grey solution, green infrastructure such as SuDS or street trees is often cost engineered out before the design or construction stage.

The project looked at a model that would identify existing local authority planned capital spend, for example through highways, and see where installing SuDS as part of this development could provide benefits to others, such as the Lead Local Flood Authority, the sewerage undertaker or water company and other any other beneficiaries.

By identifying multiple beneficiaries who could gain environmental benefits or services from installing NBS, this could provide the foundation for a model of co-investment.

Lessons learned

By overlaying areas of flood risk, planned capital investment, sewerage and flooding incidences, we have identified Hot Spots were a co-investment model could deliver benefits to multiple stakeholders.

A key learning was that engaging potential beneficiaries and investors from the outset is essential to identify Hot Spots without the need for ongoing revision of maps. Acquiring data on priority areas is needed to ensure that the areas identified can deliver services to a range of beneficiaries. This methodology has been refined and exists as a replicable process for other urban areas.

Moving forward

- Agree a checklist to identify priority co-investment neighbourhoods
- Undertake performance modelling to quantify the water management benefits of SuDS at a neighbourhood scale within one priority Hot Spot neighbourhood
- Further engagement with co-investors to ensure buy-in of the approach taken

The ambition for the end of the IGNITION project is to have a model that could provide the basis for a Strategic Outline Case for co-investment.

2. Financing Green roofs

IGNITION has developed a site-specific tool to evaluate the costs and benefits of retrofitting a green roof on a property, to include financial benefits (such as property value uplift and energy cost savings) and non-financial benefits (such as carbon sequestration and water quality improvements).

Diagram of a green roof

Lessons learned

Our work has demonstrated that the financial benefits of a green roof can not currently be realised in a way that would make even a large scale pipeline of installations deliver a return to an external investor. However, the multiple benefits can provide significant value to property owners.

The potential for green roofs to provide carbon or biodiversity net gain (BNG) credits was investigated. Currently, an average green roof installation could only deliver a small fraction of a credit for either carbon or BNG. However, this is an area of wider interest and may help to deliver a financial return in the future.

Moving forward

- We will shortly be launching the cost-benefit analysis tool as a web-based tool
- The project intends to work with one or more organisations in GM to test the effectiveness of the tool and its findings across their portfolio of properties. This will enable us to create a multi-site investment example of green roofs
- To test the robustness of the tool with suppliers and to improve cost and benefits data on green roofs via collaboration with the Living Lab
- Further investigation with commercial property owners where the wider benefits of green roofs can help to deliver against multiple drivers will help to inform the case for investment in retrofitting green roofs
- Working with other organisations in GM, the project will aim to learn from other projects about the multiple socio-economic benefits of green roofs as community hubs

3. Financing parks and green spaces

Parks and green spaces provide a range of social and environmental benefits across GM, however, in many cases core local authority budgets to maintain and maximise the functionality of these spaces are decreasing. As identified in our original baseline work, not all greenspace provides the same benefits.

One of the future funding streams has been focused on understanding how climate resilient parks and greenspaces can best be financed and to explore options for financing new climate-resilient parks and greenspaces.

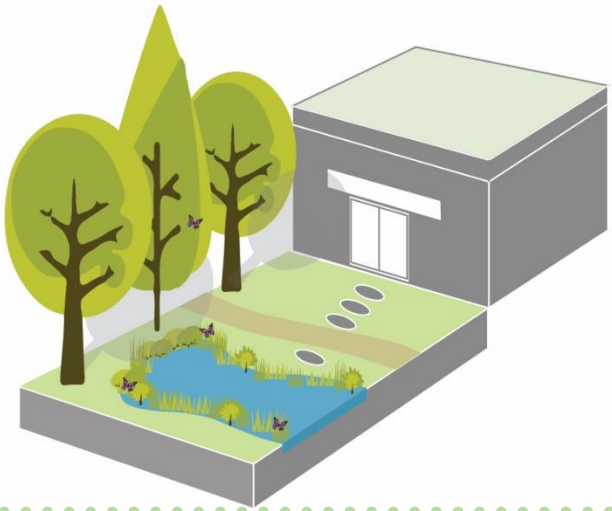
Existing parks

- Conducted interviews with GM park managers across all 10 local authorities to explore opportunities and barriers around finance for NBS
- Analysed the results of the GM parks survey to understand individuals' willingness to financially support or spend in parks and greenspace
- Reviewed and reported on the two main management models for improving parks financing nationally: (i) parks trusts and (ii) parks foundation models
- Identified the potential for a GM Park Foundation as an option to facilitate capital investment in climate resilient parks
- Created an income generation catalogue identifying opportunities for parks and greenspaces to increase income

New parks

- With additional investment from the City Finance Lab (CFL), possible models to sustainably finance new greenspaces at Manchester's Victoria North have been identified
- Additional models for endowment-based funding of new greenspaces identified in Oldham and Stockport and Service Charge-led models at Angel Meadows, Manchester

Green space



Lessons learnt

- Funding for parks and greenspaces is complex and there is not a one-size-fits-all approach. To provide high-quality, climate-resilient spaces that meet the needs of the community, a blended approach is required
- Parks budgets are facing increasing cuts meaning it is becoming increasingly hard to maintain greenspace, let alone invest in new functional NBS
- Feedback from GM citizens suggests that people are happy to pay for services whilst visiting a park or greenspace, but feel strongly that others should be provided free of charge
- There are only a few examples of successful Park Trusts in operation in the UK. Increasingly, local authorities are working with wider organisations to establish Park Foundations which can generate additional finance for parks and green spaces without the liability of managing the land

Moving forward

- Exchange knowledge and expertise between local authority parks leads on new management models and income generation opportunities for improving parks finance
- Co-create '*what works and where and why'* case studies with local authorities to understand how to make the most of opportunities to improve finances
- To utilise learning from the CFL report (plus Oldham, Stockport and Angel Meadows) to create a conceptual model for an endowment and service charge-led mechanism for funding new parks
- To create a conceptual structure for a proposed GM Parks Foundation (focussed on Salford) as a vehicle for investing in climate-related projects in parks
- To create a business plan and set-up plan for a GM Parks Foundation (focused on Salford) formulating income mechanisms and predicted revenues using Salford's data

Challenges in translating benefits into financial income streams

We have identified shared challenges across the models the project has investigated:

- Despite evidence showing a range of benefits and value that a specific NBS installation can deliver, this doesn't necessarily translate into someone being willing to pay for it. Organisations and individuals are not necessarily prepared to pass on savings, and identifying the relevant budget lines, risk reduction savings or income generation then converting that to a stable return on investment (ROI) is a challenge

- Where financial value is identified, it doesn't mean beneficiaries can be identified or are willing to pay for them – for example, SuDS may lead to health benefits (for example, a new publicly accessible rain garden) but there is no readily available mechanism for the health service to pay for these

- In many cases, NBS would provide a range of benefits to several beneficiaries. Aggregating these benefits and associated income streams is complex. Often certain stakeholders such as water companies and local authorities are expected to bear the brunt of investment whilst multiple stakeholders benefit

- Not all the environmental benefits of SuDS can be translated into financial value – for example, SuDS may lead to an increase in property value of the site, but cannot be realised (unless the site were to be sold)

- This leads to a potential funding gap – we may need to identify and bring in other sources of funding to cover any gap and there may be a role for public funding in doing so

- This is further complicated by the lack of reliable information around the capital and operational costs of different SuDS, which can vary significantly from site to site. This makes them more challenging to implement than conventional "grey" solutions, for which costs are more likely to be standardised

- Policy and legislation surrounding developments, surface-water charging, flood management and greenspace is currently primarily advisory rather than mandatory. A lack of legal requirement and long-term policy commitment around NBS and green infrastructure, makes it challenging to de-risk investment opportunities to a level where private investors would consider financing NBS

The IGNITION project NBS benefit icons

Step 3: Develop the case for investment

Once we have demonstrated the financial benefits that can flow from NBS and understand any gaps in funding, we will need to move these to a point of investment readiness. To do this we need to demonstrate cash flows and how delivery will be structured – looking at the role of different types of investment (private, philanthropic, and public) in delivering projects, project structures and risks and potential returns.

The project is currently at this point with the priority funding stream. Working with key stakeholders and consultants Jacobs and Finance Earth, the partners are working towards establishing an investment-ready model by summer 2021.

Lessons learned

Focussing primarily on our priority funding stream, we have identified a range of factors that directly influence the ability to create a Strategic Outline Case for investment:

- Property rights – given payment for an area of a site for specific purposes, such as installation of SuDS, there needs to be clarity about ownership of the NBS asset and the function it performs
- Maintenance – there needs to be confidence that site owners/operators will maintain the SuDS for the period required to deliver the benefits agreed. The requirements and resources for ongoing maintenance over this period will need to be considered
- Risk and liability – there needs to be agreement about how and where risk is apportioned and where liability lies in the event of the environmental outcomes (and therefore financial benefits) expected from the NBS not being fully delivered as envisaged

The project team is currently focussing on identifying additional sources of investment to meet the potential shortfall in terms of charging band savings and financial benefits to United Utilities. The potential to look to philanthropic or government funding to bridge this gap is also being investigated.

Step 4: Raise initial investment

We have consulted stakeholders extensively throughout this process as is detailed in the next section. One of the key pieces of feedback we gained from discussions with investors, funders and those in the financial sector was that to move from the current situation, where NBS is primarily funded through statutory funding at a small scale to our end goal of large-scale private investment in a significant and maintainable pipeline of NBS projects requires a phased approach that can provide confidence to private investors.

If pathfinder investment can be sourced to deliver our primary pipeline of projects, this will then begin to gather evidence to demonstrate that securing private capital into NBS can deliver environmental benefits, financial benefits and returns on investment. This step will be key to de-risking the model for private investors.

In the UK, the market for private capital investment in the natural environment is underdeveloped across all areas, including in investment in urban NBS. If investment can be successfully made in a pipeline of projects through IGNITION, this will help prove the concept of the environmental outcomes, revenue and returns on investment that can be gained from urban NBS.

This would include gathering evidence from the set of projects on the following:

- The delivery of environmental outcomes by urban NBS at scale, as compared with the theoretical/predicted outcomes shown in pilot projects (for example, the IGNITION Living Lab) and existing evidence (for example, the IGNITION evidence base)
- The sources of revenue that can be gained by different beneficiaries, particularly water companies, from these environmental outcomes
- The payment of returns to investors and the value of bringing private investment into NBS

This evidence would be delivered after IGNITION as the project concludes in April 2022 and would show the ability for this model to be replicated and scaled up within the UK and beyond.

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Step 5: Mainstream private investment and replication

If it can be demonstrated that NBS can generate cash flow at scale, investment in it would operate as other mainstream investment markets do. Private finance has a significant potential role to play in NBS investment as it does in other sectors – bringing in greater amounts of capital than the public and philanthropic sectors can deliver alone while, at the same time, potentially reducing costs and sharing risks

We hope that, by the end of the project in spring 2022, the experience and learning from IGNITION will have further moved NBS on this journey towards mainstream investment. We will have put the structures in place locally for this to happen – however, there remain particular challenges in achieving this longer-term objective.

Lessons learned

IGNITION has contributed to the establishment of the Greater Manchester Environment Fund (GMEF). This is a pioneering regional impact investment vehicle that provides a means to unite public, private, and philanthropic funding partners in a mission to tackle the urgent environmental challenges faced by Greater Manchester. The GMEF has been established as an independent vehicle able to:

- Align existing restricted and unrestricted public funding streams for strategic use to benefit the environment
- Mobilise and leverage public, private and philanthropic capital to catalyse further investment in the environment
- Deliver grant funding, capacity building, seed funding and repayable finance for strategic environmental projects
- Build a self-sustaining local environmental impact investment vehicle
- Deliver a consistent and transparent governance framework for funders and delivery bodies to set local priorities, access funds and deliver accountable results

The establishment of the GMEF in this way allows it to be able to coordinate public sector funding efforts with the private and philanthropic sectors to deliver significantly greater benefit that will make GM a leader in the fight against climate change and biodiversity loss.

Moving forward

Experience from other environmental markets (for example, renewable energy) indicates that clear, legally binding targets are required to provide the longer-term certainty that there will be a demand for the environmental benefits NBS provide. In the UK, the government is acting to create this certainty by introducing a legal requirement for Biodiversity Net Gain for new property developments in the Environment Bill.

However, without changes to the water regulatory and policy framework, such incentives will not exist for NBS. The IGNITION partners have been working to engage the water regulator (Ofwat), water companies, Defra, Environment Agency (EA) and Natural England as well as local authority planning teams to help develop an enabling environment within which to establish a shared a policy framework, which can provide maximum benefits for the environment, communities, and business.

Communications and engagement

A key focus of the project has been to engage all stakeholders in the process, creating an enabling environment where NBS are embraced as key to enhancing the urban environment, building climate resilience, improving amenity, and delivering value for money.

Cross-partner stakeholder mapping sessions identified target groups who were considered integral in helping to inform, accelerate or upscale IGNITION's objectives:

- Land / property owners and managers
- Investors – private finance
- Local authorities
- Water industry – water companies, retailers and regulators
- Government
- Other research bodies and projects addressing NBS and resilience
- Greater Manchester citizens and community groups
- Business with an interest in environmental sustainability and the built environment
- Suppliers – designers, installers, landscape architects and technical consultancies

Critical friends round table events

We held round table consultation events and workshops with all these groups to sense-check the project plans, identify barriers and opportunities and to help establish a network of ambassadors for the IGNITION project.

Lessons learned

There were key learnings from each of the round table events and workshops, which were compiled in a critical friend's report. Some common themes were cross-cutting.

- There is an opportunity to capitalise on post-pandemic recovery plans for a green recovery
- Carbon capture and the potential for local offsetting and achieving net zero are real drivers and conversation starters for many stakeholders
- Social value is a driver for investment for many stakeholders but, for private investors, the financial case has to be met first
- A successful output of the priority business model would be a large-scale pilot funded through philanthropic investors or local authorities. This would still serve as proof of the model that would make it easier to attract private investment at a later date
- Need to work with Ofwat and policy makers to look at surface water charging across all water companies
- Currently there is no industry standard value for SuDS or the cost of surface water to water companies
- The evidence base was identified as key to engaging with all stakeholders

Citizen engagement

In 2020, the IGNITION project's citizen engagement team used a survey to ask the people of Greater Manchester about their knowledge of climate change. Out of 2,000 survey respondents, 97% thought that climate change is a risk to GM, with flooding and increased temperature being issues that would affect the most amount of people.

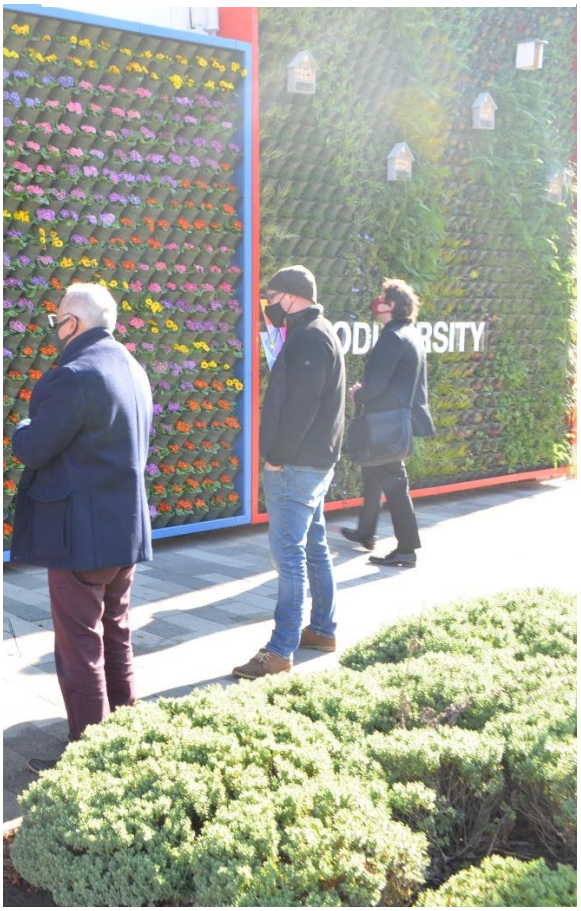
Our citizen engagement team, comprising RHS, Groundwork and City of Trees, has been working to empower the schools, community groups and young people of GM with knowledge of NBS. Citizens are a key stakeholder group as the effects of climate change will directly influence their lives, choices, and homes, and they have the power to drive policy change by sharing their views.

Through this survey and a series of workshops – attended by almost 750 people – the citizen engagement team was able to produce a baseline for resident knowledge of NBS and made subsequent plans to build on and improve knowledge across the city region.

Moving forward

- The IGNITION project is establishing a peer-learning forum with other UIA funded projects. This will inform a project conference in the summer, bringing together UK and European projects that are developing urban NBS and resilience projects
- The project is working towards the Conference of Parties (COP) in Glasgow in the autumn and looking to engage stakeholders through the Living Lab, both virtually and in person
- A report for local authorities will be launched with accompanying workshops in the summer
- We are feeding into Government and the water regulator around our findings and experience with a view to influencing future policy and removing barriers to investment in NBS
- A school campaign toolkit to allow young people to create student-led environmental campaigns
- Creative community workshops to explore the climate crisis
- A digital tool that will give citizens the chance to co-design NBS with the IGNITION project
- The Eco-Streets project will equip local GM communities with the skills to design, install and maintain NBS to create vibrant, green community spaces to benefit people while tackling climate change.

Living Wall at University of Salford



Get involved

We hope you have gained insight into the work of the IGNITION project and the benefits it will bring to the people, businesses, and environment of Greater Manchester and beyond.

The project will continue to work towards its aims until spring 2022 where we will release our findings and look at the impact IGNITION will have on the city region and future policy.

In the meantime, there are many ways you can help to shape the future of the project:

- **Contribute to the evidence base**, data on cost, functionality and benefits from your own installations or research
- Get in touch with us about the work you are doing, to share case studies or to tell us about similar projects at the email address below
- Find out about all our **upcoming events** for business, investors, local authorities and community groups
- Join us at the Natural Capital Group Conference in June
  Nature Greater Manchester website
- Visit the Living Lab at the University of Salford's main campus or find out more online. We will be offering virtual tours and visits after June 2021
  Living Lab Newsletter
  Living Lab YouTube channel
- Access other IGNITION reports and fact sheets to find out more about the project on **our website**
- Contact us on the email below to find out how your business or community group can take steps towards a greener Greater Manchester
- Use the **evidence base** or our **business report** to inform decisions and planning within your organisation
- Download **our toolkit** to take steps to make your workspace greener and more resilient

For more information about the IGNITION project, you can email the team at greencity@greatermanchester-ca.org.uk.

Or to access our nature-based solutions fact sheets and key project reports, head to **our website.**

the ignition PROJECT
NATURE-BASED SOLUTIONS TO THE CLIMATE EMERGENCY

GREATER MANCHESTER DOING THINGS DIFFERENTLY · UIA URBAN INNOVATIVE ACTIONS · European Union European Regional Development Fund

BUSINESS IN THE COMMUNITY The Prince's Responsible Business Network · Manchester City of Trees · Environment Agency · GMCA Greater Manchester Combined Authority · GROUNDWORK Changing Places Changing Lives · Manchester City Council

Royal Horticultural Society · Salford City Council · UK GBC · United Utilities Water for the North West · Manchester 1824 The University of Manchester · University of Salford Manchester