

## Specification for consultancy services

Reference: 2016/17 : 07 – Circular economy scoping study at Old Oak and Park Royal

### Invitation to tender

#### 1. Overview

This invitation to tender is issued by the London Waste and Recycling Board (LWARB) ('the Customer') for the provision of consultancy services ('the Service Provider') to provide technical assistance in the development of a circular economy scoping study for the Old Oak Park Royal opportunity area in north west London.

This brief sets out the requirements of LWARB ("the client") working in partnership with the Old Oak and Park Royal Development Corporation (OPDC) and GLA, to be provided by the consultant ("the bidder"), in the form of a scoping study assessing circular economy opportunities for the Old Oak and Park Royal areas.

#### 2. Background to London Waste and Recycling Board (LWARB)

The London Waste and Recycling Board is a statutory Board established by the GLA Act 2007 to provide a strategic approach to waste management in London. The Board is chaired by the Mayor of London (or his representative). As well as the Chair, the membership comprises four councillors and two independents nominated by London Councils and one independent appointed by the Mayor of London. In addition, LWARB has a small team of officers who oversee the day to day activities of the Board.

The LWARB business plan 2015 – 2020 has three areas of focus:

- LWARB manages a £20 million investment fund which provides tailored financial support to businesses interested in developing waste projects in and around London. The funds, to be deployed by 2020, are invested on commercial terms and take the form of equity and/or debt.
- Resource London is a programme of support for London waste authorities delivered as a partnership between LWARB and WRAP , the government's resource efficiency body.
- A programme to support the capital's transition from a linear to a more circular economy

More information about LWARB can be found on our [website](#).

#### 3. LWARB and circular economy

In July 2014, the former Mayor of London published the London Infrastructure Plan. This plan looks at the scale of development required to enable London's growing population to thrive in the capital. As part of this plan, the Mayor has stated his ambition that London becomes a world leader in the development of the circular economy so that it is best placed to reap the rewards of the transition.

The Mayor has given LWARB the task of developing a route map to accelerate the transition to a more circular economy in London. The Mayor tasked the GLA with promoting circular

economy through procurement. LWARB and the GLA are working with the public and private sector and the London Infrastructure Delivery Board to understand the actions and policy opportunities needed to accelerate the move to a circular economy in London and contribute to the sustainable growth of London.

In December 2015, LWARB published its 'Towards a circular economy – context and opportunities' report, that identifies five areas for initial focus. These areas are built environment, electricals, textiles, food and plastics. These areas have been identified by looking at their environmental impact, the retained value of the products involved and their re-use/recycling potential. They are also items which also can be seen in high volumes in London's residual waste. LWARB is currently developing more detailed plans on each of the identified focus areas which will be published in summer/autumn 2016.

LWARB and the GLA are joint members of the Ellen MacArthur Foundation CE100 programme, which brings together businesses, universities, governments and cities who seek to accelerate the transition towards a circular economy.

LWARB has identified the value in working to embed circular economy principles in the 38 opportunity areas identified through the London Plan. The Old Oak Park Royal opportunity area, as the largest regeneration project in Europe, with a mix of residential and commercial activity was chosen as the starting point. LWARB and the OPDC have had early discussions about creating exemplar circular economy activity on site.

#### **4. Background to the Old Oak Park Royal circular economy scoping study**

Formed as the second Mayoral Development Corporation on 1 April 2015, OPDC's purpose is to realise the wider investment potential from the HS2 and Crossrail transport infrastructure projects. In doing so, OPDC aims to create an exemplar new sustainable community of at least 25,500 new homes, and to provide 65,000 new jobs over the next 20-30 years.

Effective from 1 April 2015, OPDC became the local planning authority, with responsibility for all planning functions in its area. OPDC is in the process of developing its Local Plan, related policies and strategies to guide future development. As part of this, LWARB is seeking to appoint a consultant team to carry out a scoping study on the potential for circular economy thinking to be incorporated into the development of the OPDC area to ensure exemplar standards can be achieved.

The scoping study will focus on Park Royal and Old Oak as two distinct areas.

In Park Royal the study will investigate opportunities to develop new circular approaches to the existing industrial area. The study will investigate how circular economy can be used as part of the regeneration and urban intensification process to deliver economic growth and jobs whilst reducing waste, pollution and carbon.

In Old Oak, the study will investigate the role of circularity in shaping and influencing approaches to planning and design of the spatial masterplan including design, construction and operation of buildings, infrastructure, utilities (energy, water, sewage, waste, IT), food and mobility.

The appointed contractors will work closely with OPDC, LWARB, GLA and the Environment Agency (EA) to understand the area. A steering group to guide the project will include OPDC, LWARB, the GLA and EA at a minimum.

## 5. Context at Old Oak Park Royal

Today, Old Oak is 135 hectares of industrial and railway land in west London. The area has limited public transport access and is occupied primarily by railway depots, rail lines, waste sites, a second hand car dealership, light industrial premises and a small number of residential units.

By 2026, the construction of a new High Speed 2, GWML and Crossrail interchange station (Old Oak Common station), coupled with new London Overground stations, and improvements to existing stations at Willesden Junction and North Acton, will dramatically transform public transport accessibility. Old Oak Common station will be one of the busiest stations in the country with an interchange capacity of over 250,000 people. It will serve as a significant catalyst for regeneration of the wider area.

The public sector already owns close to 70 per cent of the land in Old Oak. This land could accommodate approximately 10,500 homes and 46,000 jobs. The March 2016 budget recognises the scale of regeneration at Old Oak and to facilitate this proposes the pooling of all central government land in this area and transferring it to OPDC to drive forward the area's comprehensive regeneration. However, a significant portion of this land is currently in use as operational rail land that will require careful planning to facilitate its relocation to alternative sites.

To the west of Old Oak is the Park Royal industrial estate. Spanning 450 hectares, the industrial estate is the largest in Europe, housing over 1,200 businesses employing over 36,000 people. The London Plan (March 2015) identifies Park Royal as an Opportunity Area and identifies it as having capacity for further growth with an indicative target of 10,000 new jobs. It is identified as a strategic industrial location.

The regeneration of Old Oak will be the equivalent of a delivering a new town on a brownfield site in central London, and OPDC's aim is that this new town will be an exemplar for sustainable development. The significant scale of regeneration planned, particularly at Old Oak, means there are opportunities for an integrated and synergistic approach to delivering development and multiple utilities, particularly in the sectors of heat and power, waste, water, clean air and digital connectivity, and in the use of smart technologies. This commission is a critical stage of evidence gathering to ensure that future development and infrastructure delivery is an exemplar of circular economy.

OPDC has, and will be, commissioning separate studies on environmental standard setting, a Decentralised Energy Strategy, a Waste Strategy, an Integrated Water Management Strategy, an Air Quality Strategy; Transport strategies for Old Oak and Park Royal as well as Pedestrian and Cycle strategies; a Smart Strategy and other related studies.

In addition, OPDC are currently running a tender for a masterplanning consortium to develop overall spatial principles for Old Oak. The commission will be awarded in September and relevant recommendations should inform that work. This scoping study will be expected to complement and draw on these and other supporting evidence.

The Smart Strategy, which is already underway, will set out OPDC's aspirations for establishing Old Oak and Park Royal as a world leading location for the exploration and implementation of smart city technologies. The potential for smart city technology, such as sensors, offers a significant opportunity to improve the efficiency of utilities infrastructure. In addition it will provide data to monitor environmental elements in real-time and at the micro-

scale to inform strategic planning, which both contribute to the implementation of environmental targets. This should complement the circular economy scoping study with digital technology being key to many circular economy solutions.

Two other relevant opportunities in the area are:

- The development of the White City Campus is Imperial College's major new campus, co-locating world class researchers, businesses and higher education partners  
[www.imperial.ac.uk/white-city-campus/](http://www.imperial.ac.uk/white-city-campus/)
- The proposed development of a clean tech cluster at Park Royal by the London Sustainable Development Commission  
[www.londonsdc.org/clean-tech-innovation-default/default-Copy.aspx](http://www.londonsdc.org/clean-tech-innovation-default/default-Copy.aspx)

The OPDC area has a complex planning policy background being subject to the adopted and emerging planning policy of three constituent London Boroughs (Brent, Ealing, and Hammersmith and Fulham). To provide strategic planning guidance the mayor has adopted an opportunity area planning framework that sets out the early key principles for development. OPDC is now established as the local planning authority for this area and is in the process of preparing its local plan and community infrastructure levy.

OPDC is part of the wider Mayoral family of organisations and therefore has a significant requirement to be consistent with, and where possible exceed, the London Plan, the Mayor's associated Supplementary Planning Guidance and Mayoral Strategies. The scale of development at Old Oak is set out in the London Plan (March 2015).

- Further guidance is set out in the Mayor's Old Oak and Park Royal Opportunity Area Planning Framework (OAPF), November 2015. The OAPF is adopted Supplementary Planning Guidance to the London Plan, and has a significant influence on planning decisions in the area.
- The OPDC draft Local Plan is currently at 'Regulation 18' public consultation stage, and expected to be submitted for public examination ('Regulation 19') in autumn 2016. The scoping study will be required to contribute to a sound evidence base for the 'Regulation 19' stage of the local plan.

## **6. The specified requirement**

### **Old Oak and Park Royal Circular Economy Scoping study**

The purpose of the study is to identify how the circular economy can be a driver for more sustainable development at the Old Oak and Park Royal sites, delivering growth, jobs, whole life value and social and environmental benefits.

The goal is to produce a strategic narrative that pulls together innovation in circular economy and related areas like the sharing economy, smart technology and big data, systems thinking; maker spaces and Fab Cities to inform development of the Opportunity Area.

The output should include a vision, informed by case studies and emerging trends, and a strategy and recommendations for applying circular economy to the Opportunity Area over the short, medium and long term and at different stages of the project including during design, construction and once the development is fully functioning.

The output will be used to help OPDC, its stakeholders and partners understand the potential value that the circular economy could bring to the development and regeneration of Old Oak and Park Royal.

It should investigate ways in which the circular economy could influence all elements of the project from intensification and growth of Park Royal, to investment in buildings, green space, public realm, transport systems, utilities and social infrastructure on Old Oak. Approaches and solutions for Old Oak and Park Royal are likely to be different to reflect their distinct characters, land uses, investment and development programmes and operational requirements.

The output should be tangible and generative, testing scenarios and developing narratives. It should be illustrative, visual and user centred. It should include a report, supporting evidence and other materials that ensure the findings are engaging and accessible.

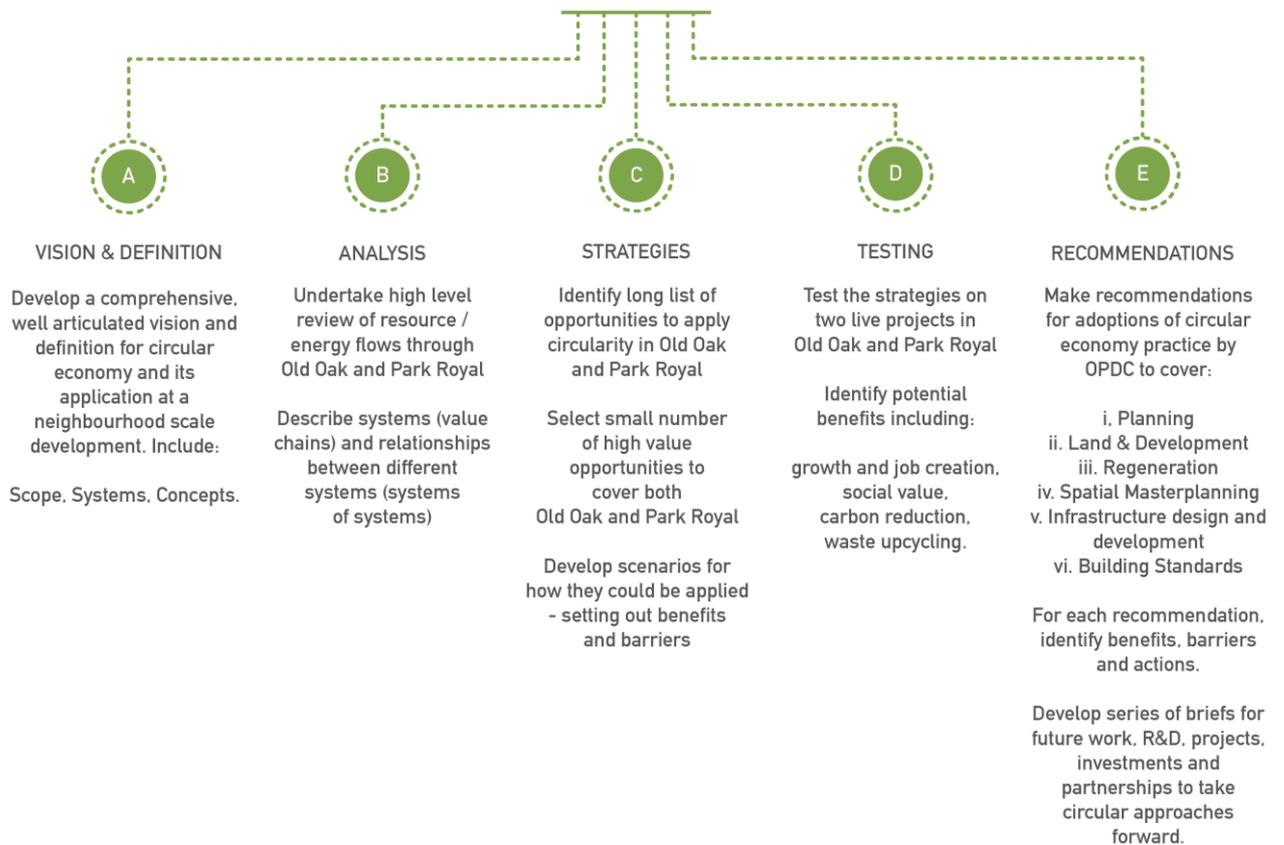
The output will be used in presentations to the OPDC board; by the different teams at OPDC responsible for policy, development and regeneration; and to inform a wider group of stakeholders.

The area contains some of the most strategically important waste transfer and processing sites in London. Opportunities to use the waste infrastructure to generate additional value and deliver growth and jobs whilst reducing waste, pollution and carbon emissions should inform this work.

# BRIEF FOR CIRCULAR ECONOMY STUDY FOR OLD OAK AND PARK ROYAL

Undertake a circular economy scoping study that looks at how circular economy thinking and approaches can support the development of Old Oak and Park Royal, and support opportunities to be the most sustainable and innovative development in London.

The scope of works is as follows:



The study should follow the following 5 steps:

## **1. Vision and Definition**

Scope out and develop a vision and definition of circularity that is specific to Old Oak and Park Royal.

There are many definitions and approaches to circularity. The consultant should develop a clear definition of circularity that specifically addresses the context and nature of the development on Park Royal and Old Oak and informs the work of the planning, development and regeneration teams at OPDC.

The definition should define the boundaries for circularity and identify key concepts and value chains that are relevant to the OPDC area.

It should explain how related ideas and trends like the sharing economy, fab cities, industrial symbiosis, smart strategies and additive manufacturing relate to the circular economy and its application at OPDC.

The work should refer to LWARB's Circular Economy Route Map for London; the LSDC Circular Economy Jobs Reports and other relevant studies.

<http://www.lwarb.gov.uk/what-we-do/accelerate-the-move-to-a-circular-economy-in-london/towards-a-circular-economy/>

<http://www.londonsdc.org/documents/LondonCircularEconomyJobsReport2015OnlineVersionFinal.pdf>

## **Outputs**

The output should be a clear and concise vision, definition and scope for circular economy at Old Oak and Park Royal that is highly visual, engaging and accessible. It does not necessarily have to be written. Other ways to present complex ideas in engaging ways would be welcome.

The vision should be supported by a few carefully chosen case studies and examples that help to animate, illustrate and explain the vision.

## **2. Analysis**

### **a. Flow analysis**

Undertake high level analysis of the flow of material/energy/resources and waste through Old Oak and Park Royal using ONS and other publically available data; Environment Agency information about waste movements into and out of the site; the Park Royal Atlas of businesses and other related data.

Use the data alongside the local plan and other studies to identify key material and resource flows into the area (now and over the life of the development) and key waste streams that are being handled and exported from the site.

Carryout a high level assessment of the waste flows that will be generated by the new development at Old Oak and Park Royal using current the capacity studies in the Local Plan and current data on waste generated per capita.

#### **b. Systems and model analysis**

Using the flow analysis, develop models and narratives for how circular economy systems could be applied to the different aspects of the development of Old Oak and Park Royal, including:

- Commercial, residential, retail development.
- Social infrastructure provision
- Development of transport infrastructure (stations, roads, networks and systems to support multi modal and fully integrated transport)
- Utilities (energy, sewage, water, waste and IT systems)
- Public realm and blue/green infrastructure
- New industrial and commercial space
- New and regenerated infrastructure
- New industrial processes

#### **Output**

The output from the material/resource flow analysis should be a short report with references. It should include an illustrated and accessible presentation showing all the key flows in and out of the area.

The expectation is that the analysis will be high level and provide rough estimates of resource and waste flows through the OPDC area.

A series of narratives that explore different circular economy systems that could be adopted in Old Oak and Park Royal.

**N.B: The contractor is not expected to generate any new data at this stage. The analysis should use existing and readily available data and identify key flows.**

### **3. Strategies**

From the analysis of the material flows and overview of the way in which circular economy systems and models could influence and impact on the development, draw up a long list of circular economy opportunities.

Carry out a high level feasibility assessment of these opportunities, identifying short, medium and long term opportunities. At a minimum the feasibility assessment should include:

- A brief description of the value chain
- A high level financial and economic case
- An assessment of the ease of implementation
- Evidence – case studies, data, proof of concept
- Environmental/resource impact
- Social impact
- Opportunities to finance / ownership solutions

Take 4 of the most promising circular economy systems and develop a strategy for how these systems could be delivered. Assess the strategy in relation to a business as usual approach. Map out the actions needed to deliver the opportunity.

For each opportunity carryout a more detailed assessment to understand the financial and business benefits; the socio-economic and environmental benefits and provide evidence in the form of case studies, proof of concept.

## **Output**

Output to include a graphic and well-illustrated presentation of the selected opportunities and the strategies for delivering those opportunities through the life cycle of the project.

A feasibility study setting out as a minimum:

- Brief description of the value chain
- The financial and economic case at a high level
- Ease of implementation
- Evidence – case studies, data, proof of concept
- Environmental/resource impact
- Social impact
- Opportunities to finance / ownership solutions

## **4. Testing**

In order to understand the practical challenges of introducing circular economy approaches to the project, the consultant is asked to test circularity on 2 projects, including a spatial project on Old Oak and a waste project on Park Royal.

Examples of the types of projects the contractor might test include:

- A review of the benefit and impact of inserting a circular economy approach into the development of the Scrubs Lane or Victoria Road masterplan. To do this the consultant will engage with the OPDC delivery manager and consultant team. Outputs could include planning goals, investment opportunities, and adaptations to the brief etc. The output will include the case study and an assessment of the impact, costs, benefits, barriers and actions required to realise the opportunity.
- Development of a brief for a demonstrator project looking at conversion of a significant waste stream into a new value chain in Park Royal. Output might include proposals for a micro system demonstration project and high level business plan.

Lessons learned could be used to:

- Inform the overall masterplan, transport, energy, water, waste and green infrastructure and related studies.
- Support development of proposal for investment in circular economy related social enterprise initiatives as part of the regeneration programme.

## **Output**

The projects will provide insight into the challenges of adopting circular economy projects on Old Oak and Park Royal.

The output should demonstrate clearly and simply the implications and benefits of adopting the circular economy.

The materials should be clear, accessible, and visual and focus on lessons learned. They should form part of a presentation to the OPDC Board and inform the work of the land team on the masterplan and the regeneration team.

## **5. Recommendations**

Use the lessons learned from the previous stages to develop a list of recommendations for the adoption of circular economy approaches by OPDC.

The recommendations should be targeted at planning, land and development and regeneration.

The recommendations should include practical actions that OPDC can take to support the circular economy. They should cover short, medium and long term actions.

Recommendations should include but not be limited to:

- Development of policy goals to be included in the local plan and related policy documents to embed circular economy approaches;
- High level procurement requirements to be included in design and construction contracts;
- Investment opportunities to support circular economy innovation at Park Royal.
- Demonstrator projects and delivery programmes
- Masterplanning guidance including spatial and policy requirements
- Guidance on design of energy, water, waste, transport, logistics, construction and industrial processes
- Next steps and briefs for future follow up work including research
- Funding and partnership opportunities

## **Output**

A final report

A series of clear recommendations that have been assessed

An action plan setting out next steps including outline briefs for follow on studies

## **7. The project deliverables are:**

- Attendance at a project inception meeting on 7<sup>th</sup> July 2016 at LWARB's offices. This meeting will provide an opportunity to discuss and agree the following issues with the team:
  - Scope;
  - Timelines;
  - Discuss any other matters.
- Step 1 – a clear and well-articulated vision and definition of circularity with supporting case studies and examples signed off by the project steering group

Step 2 – a high level analysis of the flow of resources and waste and narratives that explore different circular economy systems that could be adopted in Old Oak and Park Royal.

- Step 3 – well-articulated strategies setting out how circularity could be embedded into the project and a presentation
- Step 4 – Output from this step is a demonstration of the impact and benefits of adopting circular economy on actual projects
- Step 5 – final report with associated evidence including a list of recommendations and next steps

At the end of each step a workshop with the project steering group will be organised to review the output and provide feedback. The feedback from each phase of work will be incorporated in to the output.

The output from each step is described above. Output should be accessible, well-illustrated and user centred. They should:

- Define and scope out circularity as it applies to OPDC.
- Present a clear vision that addresses the different elements of OPDC's work.
- Identify key opportunities that the project should focus on
- Identify costs, benefits and barriers including social and environmental benefits associated with each opportunity
- Demonstrate how circularity can be embedded into the project strategically and practically.
- Provide a clear set of recommendations for adopting circular economy on the project and a suite of follow up actions

The final output should include a short written summary and slide deck of the findings and associated evidence that is accessible and engaging, and communicates complex ideas simply.

All deliverables are to be developed in conjunction with, and signed off by, the LWARB Circular Economy Manager and the OPDC Environmental Lead. The contractor project manager will have a weekly catch up with the OPDC Environmental Lead and LWARB Circular Economy Manager. Steering group meetings will be held every 4 weeks and fit in with project deliverables where possible.

## **8. Timetable for procurement**

The timetable below gives an indicative timeline for this project. Bidders are advised that, with the exception of the tender submission date, this timetable is not binding and may be changed if necessary.

Bidders are asked to note the timescale for delivery and in their tender submission they should set out how they propose to complete the work within this timescale and identify key dates where they would expect input from LWARB (including OPDC and GLA).

<b>Milestone</b>	<b>Date</b>
Invitation to Tender issued	06/06/16
Deadline for clarification questions	21/06/16
Clarification question responses returned by	24/06/16
Tender return deadline	30/06/16 (9am)
Award of contract	05/07/16
Inception Meeting	07/07/16
Step 1 completed	20/07/16
Step 2 completed	17/08/16
Step 3 and 4 completed	19/09/16
Step 5 completed	03/10/16

## 9. Interface/ Contract management

The main point of liaison between the Service Provider and LWARB will be Clare Ollerenshaw, Circular Economy Manager at LWARB.

[clare.ollerenshaw@lwarb.gov.uk](mailto:clare.ollerenshaw@lwarb.gov.uk) / T: 020 7960 3686 / 078 278 96140

## 10. Quality of Service

The Service Provider shall provide the services in a competent, timely manner in accordance with recognised industry quality standards. The Service Provider shall ensure an adequate supply of suitably qualified and competent personnel are available to fulfil the requirements of the Contract.

## 11. Delivery Personnel

LWARB requires Bidders to nominate key personnel with appropriate skills to perform the service for the duration of the contract.

Bidders shall provide a CV for all key personnel as part of their submission. The CV shall demonstrate the individual's experience, competence and capability and their role in the project and should be no more than 1 side.

The Service Provider shall ensure any changes to the key personnel be undertaken with minimal negative impact to the service and at no additional cost to LWARB.

LWARB may at, its discretion, request that the Service Provider remove and replace any Key Personnel from the service that LWARB considers in any respect unsatisfactory in the delivery and performance of the contract. LWARB shall not be liable for the cost of replacing any Key Personnel.

LWARB would consider a consortia bid for this tender. In the case of a consortia bid, the contract would be held between LWARB and the lead consortia member.

Bidders may include other specialists (“Sub-contractors”) in their Delivery Teams. However, the Service Provider will remain entirely responsible for the performance of the service. Such Sub-contractors must act in accordance with the terms and conditions of the contract entered into between LWARB and the Service Provider.

## 12. Submissions

Bidders are requested to submit:

- Details of their suitability to fulfil the contract, how the contract is to be managed and their approach to delivering the required specification within the timeline indicated in 8 above. **Maximum 10 sides of A4** (excluding project experience, examples and CVs which can be included as an Appendix).
- Please provide three examples of previous work carried out by suggested personnel included in the bid, that best demonstrate understanding of the brief and your ability to deliver its requirements. Please keep examples to a maximum of two sides each
- Details of the personnel comprising the Delivery Team, including CVs (should be no more than one side) and a description of their role in delivering the contract
- A Pricing Schedule giving day rates and anticipated number of days for nominated personnel and showing the anticipated total amount for the project. All costs quoted are to **include VAT and expenses**. The pricing envelope for this project is £50k – £55k.

Bids must be submitted by email to [info@lwarb.gov.uk](mailto:info@lwarb.gov.uk) by 9.30am on Thursday 30th June with the reference “LWARB tender: 2016/17 – 07”

## 13. Contract

The contract will be let by the London Waste & Recycling Board.

The following special terms shall apply:

### Travel and Expenses

All fees shall be inclusive of any travel and subsistence incurred to locations in Greater London.

Where additional expenses\* are incurred, the following rates will apply:

Hotel accommodation	Value for money must be sought at all times. Officers and Board Members should endeavour to keep costs below £200 per night in Greater London and £175 per night elsewhere. Extras such as newspapers, minibar costs and entertainments will not be reimbursed.
<b>TRAVEL</b>	
Public Transport (Train, tube, tram, bus,	Actual cost. NB you cannot claim travel from home to your normal place of work or vice versa.

light rail)	Rail travel will be standard class.
Taxis	Only to be used in exceptional circumstances. Actual cost.
Mileage	Private cars may only be used where reasonable public transport is not available and you have a valid business insurance cover. HMRC approved rates are applied.

*\*additional expenses to be agreed with LWARB prior to being incurred.*

## 12. Evaluation

LWARB must be satisfied that each potential contractor has the appropriate capabilities and resources available to undertake the work to our requirements and provide the necessary services. The process we use to select contractors is a competitive one. Your tender submission will be evaluated by against the following criteria:

<b>Evaluation criteria</b>	<b>Weighting</b>
Price – total price and day rate <sup>1</sup>	25%
Understanding of circular economy within the context of the project	20%
Methodology – the proposed approach and timeline to deliver the project requirements	20%
Authority of allocated personnel, their skills and technical capability especially in the areas of scoping studies, circular economy and built environment	35%

<b>Scoring</b>	
Outstanding - cannot be faulted	100
Excellent	90
Very good	80
Good	70
Above average	60
Average	50
Below average	40
Poor	30
Very poor	15

## 13. Acceptance of bids

In issuing this invitation to bid, LWARB is not bound to accept the lowest or any bid and reserves the right to accept the whole or any specified part of the bid unless the bidder expressly stipulates otherwise.

LWARB will not enter into discussion with non-selected potential suppliers, or justify its decision. Potential suppliers are deemed to have accepted these conditions by the act of submitting their

---

<sup>1</sup> This will be assessed by deviation from the lowest compliant tender

quote. The selected preferred supplier cannot assume they have been granted the contract until a formal contract is signed.

**14. Period for which bids shall remain valid**

Unless otherwise stipulated by the bidder, bids shall remain valid for 30 days from the closing date for receipt of tenders.