# GREATER LONDON AUTHORITY

## **REQUEST FOR MAYORAL DECISION – MD 2896**

Title: Supporting solar uptake in London

### **Executive Summary:**

The Mayor wants to make London a zero-carbon city by 2030. For this to happen London will need to be supplied by a range of clean and renewable energy sources. Since 2017, Solar Together London has delivered solar PV to over 1,000 homes. Solar Together London is now in its fourth phase and over 2,700 homes have signed up to this phase of the scheme – many of which will go on to have solar PV installed.

The GLA will work with service provider iChoosr to deliver Solar Together London. The service provider will design the online platform, run the reverse auction and oversee installation. The GLA funding for the initiative will be for direct mailouts to Londoners to make them aware of the scheme, grant funding to boroughs for additional localised communications, and other London-wide communication activities.

Despite the success of Solar Together London, the solar supply chain needs to grow considerably in London if we are to achieve the Mayor's 2030 ambition. Given this, in June 2021, the Mayor launched Solar Skills London which provides comprehensive training to enable Londoners to learn more about solar technologies, with the aim of creating more green jobs in the capital.

The GLA would like to build on these successes and run a fifth phase of Solar Together London and a second phase of Solar Skills London, as well as undertake research to support the delivery of the Mayor's Solar Action Plan.

#### **Decision:**

That the Mayor approves expenditure of up to £686,500, from the Environment Unit 2021–22 revenue budget, on:

- i. the promotion of Solar Together London through a direct mail out to Londoners, the provision of funding to London boroughs as contribution to their costs of localised communications, and London-wide communications with a total delivery budget of up to £495,000
- ii. the delivery of phase two of Solar Skills London through procurement of services required to further support development of the solar supply chain with a budget of up to £150,000
- iii. research to support achievement of the Mayor's Solar Action Plan, with a budget of up to £41,500.

### **Mayor of London**

I confirm that I do not have any disclosable pecuniary interests in the proposed decision and take the decision in compliance with the Code of Conduct for elected Members of the Authority.

The above request has my approval.

Signature: Pade: 25711/2,

#### PART I - NON-CONFIDENTIAL FACTS AND ADVICE TO THE MAYOR

### Decision required - supporting report

# 1. Introduction and background

- 1.1. The Mayor has set an ambition for London to become zero carbon by 2030. For this to happen, London will need to be supplied by a range of clean and renewable energy sources. Solar energy has a crucial role to play in this.
- 1.1 The Mayor's Solar Action Plan, published in June 2018, sets out how the Mayor will seize the opportunity for solar energy in the capital and increase solar installations in the coming years. The Solar Action Plan sets an ambition for London to achieve one gigawatt of installed solar capacity by 2030. To play his part, the Mayor has set a target for his own programmes to almost double London's current installed capacity, installing an additional 100 megawatts (MW) by 2030. Further work to model pathways to 2030 is currently underway.
- 1.2. To support the Mayor's goals, Solar Together London has tested a collective purchasing approach to increase domestic rooftop solar in London. Currently Solar Together London is in its fourth phase operating on a pan-London basis. To date, the scheme has reduced the costs of domestic solar panel installation by up to a third, delivered quality installations by accredited installers and taken the stress out of buying solar panels (compared to individuals buying separately). Previous rounds of the scheme have been approved under cover of MD2708, MD2503 and ADD2180.
- 1.3. The first phase of Solar Together London launched in February 2018, with the second and third phases running in June 2018 and November 2019 respectively. Over this time, the number of boroughs directly involved in the programme has risen from five in the first phase to 14 and 10 in phases two and three respectively. Phase four of the programme, launched in November 2020, was the first to operate on a pan-London basis.
- 1.4. Solar Together London involves working with all London boroughs and a service provider (iChoosr) to promote the scheme through marketing and identifying properties to target. Interested households within the private sector (owner occupiers and private landlords) register their interest in having solar PV installed on their roofs in order to secure a better price at a guaranteed level of quality through collective purchasing. A 'reverse auction' day is then held where pre-approved solar PV suppliers bid to deliver solar installations at the lowest price possible and highest quality.
- 1.5. Through targeting the 'able to pay' market, the project secures investment directly from homeowners. Since 2018, phases one to three have resulted in almost 1,000 homes receiving solar PV and secured around £3 million of investment from London residents (see table 1). It is anticipated that up to a further 1,500 installations will have taken place by the end of phase four.
- 1.6. Each phase of Solar Together London has delivered an increased number of installations, using learnings from previous pilot phases to make improvements. Phase four, during which every London borough was targeted, included the offer of battery storage to be retrofitted and electric vehicle charging points.
- 1.7. Despite the success of Solar Together London, the solar supply chain needs to grow considerably in London if we are to achieve the Mayor's 2030 ambition. Given this, in June 2021, the Mayor launched Solar Skills London which provides comprehensive training to enable Londoners to learn more about solar technologies, with the aim of creating more green jobs in the capital.
- 1.8. This Mayoral Decision seeks approval on a package of solar work comprising phase five of Solar Together London, phase two of Solar Skills London and supporting research to help the Mayor achieve his ambitions for solar in London and contribute to London becoming a net zero carbon city by 2030.

Table 1: Summary of installations through previous phases of Solar Together London

Phase number	Number of homes with installed PV	Number of homes with added battery storage	Number of homes with retrofitted batteries/smart energy benefits	Total investment by residents	
STL1     262       STL2     322       STL3     359		N/A	N/A	£1,061,705 £1,298,558 £1,811,166	
		N/A	N/A		
		80	N/A		

### Scheme delivery

- 1.9. iChoosr was procured in 2017 to provide the online platform and marketing expertise to encourage households within the private sector (owner occupiers and private landlords), to register an interest in solar PV installations. Under cover of MD2503 the Mayor approved expenditure to deliver Solar Together London phase three in 2019-20, an exemption from the GLA's Contracts and Funding Code. The award of a service concession contract to iChoosr (at no cost to the GLA) to manage a solar PV collective purchasing scheme, and a delegation to the Executive Director of Development, Enterprise and Environment to extend the scheme for up to an additional three years (subject to achieving the target amount of installations and subject to budget).
- 1.10. Following this approval, the GLA entered into a service concession contract with iChoosr to deliver the scheme including designing the online platform, running the reverse auction, delivering communications activities, and overseeing installation. This agreement expires in July 2023.
- 1.11. Solar Together London is relatively low risk in terms of a paid-for GLA activity. In the most recent phase of the scheme, the average saving per customer against the typical market rate for Solar PV installation was 33 per cent. For an eight-panel system the most common system installed Londoners saved 31 per cent, a cost saving of £3,504 per household.

### Rationale for phase five of Solar Together London

- 1.12. There remains a strong case for Mayoral intervention to drive uptake in household solar PV and without active support in the short to medium term, delivery levels are likely to remain far behind other regions (despite public perceptions of solar PV technology improving and delivery costs reducing). For example:
  - the London Assembly report 'Bring me sunshine! How London's homes could generate more solar energy' (October 2015), noted that London has particular barriers to solar PV in terms of demographics and home typologies (such as a lot of terraced housing with little roof space, a greater proportion of residents living in flats rather than houses, higher installation costs and planning issues relating to the high prevalence of conservation areas)
  - according to the most recent available data (Installed capacity of sites generating electricity from renewable sources, 2019), London has the lowest amount of installed solar power capacity of any region in the UK, despite being the most affluent and second most populous region and having a favourable climate by UK standards.
- 1.13. GLA officers held a workshop on 29 September 2021 to gain feedback, insights and ideas from London boroughs to inform the next phase of Solar Together London. This was well attended by 23 borough officers representing 18 boroughs. The workshop concluded that there is still significant appetite for Solar Together London across London boroughs, the level of grants to boroughs for marketing and communications is appropriate, additional London-wide communications would be

beneficial, and an additional follow-up direct mailout to interested parties is likely to lead to increased installations.

1.14. It is therefore proposed that the GLA runs a fifth phase of the scheme involving all London boroughs to build on progress to date. This phase would aim to exceed the total number of installations that will be achieved through phase four.

### Phase two - Solar Skills London

- 1.15. Whilst it is recognised that Solar Together London can support the supply chain and help to grow the market for solar, more needs to be done. A recent survey of the electrotechnical industry run in partnership with Solar Energy UK, found that 49 per cent of those trading in solar and storage lacked access to skilled employees, and 48 per cent felt there was insufficient industry training available.<sup>1</sup>
- 1.16. In recognition of the need to grow the solar supply chain in London, the Mayor launched Solar Skills London in June 2021, under cover of MD2708. The project has five objectives: the development of a solar PV learning curriculum; a series of introductory workshops for potential new solar industry trainees; the creation of a placement programme for trainees with London solar businesses; the publication of an online solar training and careers hub; and, a small grants scheme to help London's solar businesses provide training for their employees.
- 1.17. The first phase of Solar Skills London is having a positive impact by supporting the creation of new jobs and a high-quality pipeline of talent for London's solar businesses. However, it is on a small scale, so we need to broaden this offering to enable the solar industry to grow further in London. A stronger solar supply chain will also support delivery of a range of Mayoral programmes including (but not limited to) Solar Together London, the Mayor's Retrofit Accelerators and the London Community Energy Fund. It will also support delivery of the Green New Deal recovery mission objective to double the size of the green economy by 2030.
- 1.18. It is therefore proposed that the GLA runs a second, larger phase of Solar Skills London. This work will complement the development of Green Skills Academies, providing a focus on solar PV which is not directly within the scope of the Academies. One of the recognised barriers within the supply chain is the lack of diversity within the sector, which further reduces the attractiveness of the industry. This project will therefore include a specific aim to support increased diversity within the sector.

### Research to support the Mayor's Solar Action Plan

- 1.19. The Mayor's Solar Action Plan includes five key objectives: lead by example by maximising solar energy technologies on GLA Group buildings and land; encourage solar energy installations through the planning system; help Londoners to retrofit solar energy technologies on their homes and workplaces; help Londoners to make informed decisions about investing in solar energy technologies; and call on government to set a national policy framework that unlocks London's solar energy potential. Work is already underway through initiatives such as Solar Together London, London Community Energy Fund and the Mayor's Retrofit Accelerators to support these objectives.
- 1.20. To further support delivery of these objectives, two complementary pieces of research are proposed. One will look at how to maximise solar uptake through a more consistent application of planning guidance including in conservation areas and on heritage buildings and the other will explore how best to optimise the deployment of energy generated from renewable sources such as solar.
- 1.21. The first piece of research will map the variance of local planning approaches to the installation of solar PV. This will aid a more consistent application of the guidance, allowing boroughs to learn from each other.

<sup>&</sup>lt;sup>1</sup> Skills4Climate Industry Survey Report, ECA, 2021; <a href="https://www.eca.co.uk/CMSPages/GetFile.aspx?quid=4ca8bc6e-0316-4f69-8e0c-ecb45d20ed20">https://www.eca.co.uk/CMSPages/GetFile.aspx?quid=4ca8bc6e-0316-4f69-8e0c-ecb45d20ed20</a>

1.22. In addition, there is a body of emerging evidence which highlights the important role energy flexibility (i.e. reducing energy demand through changed patterns of use and smart technology) must play in supporting cities, but further research is needed to show how flexibility can maximise carbon reduction. This second piece of research will identify how to better 'match' energy demand to maximise carbon savings from the use of renewably generated energy, enabled through the deployment of flexible energy technologies such as battery storage.

# 2. Objectives and expected outcomes

### Solar Together London

- 2.1. It is proposed that the GLA spends up to £495,000 in total on Solar Together London phase five. Surveys of previous phases have demonstrated that direct mail ('Letter from my council') should account for the majority of the spend as it is the most efficient means of customer acquisition. For phase five, the mailout will reach more Londoners than any previous phase (c. 850,000 households across all London boroughs). There will also be a further mailout to those who register an interest with a view to increasing conversion rates. The budget for this aspect is up to £355,000. In addition to direct mail, spend will include London-wide communications (up to £20,000) and grants to boroughs for customer acquisition and promotion of the scheme (grants of £6,000 to 20 boroughs totalling £120,000).
- 2.2. Although it is impossible to predict the exact number of installations that will be achieved (as it is a demand-led scheme), phase five is expected to deliver up to 1,600 new solar PV installations. This estimate is based on conversion rates from previous phases and reflects the fact that phase five is pan-London, as well as accounting for market changes. Achieving 1,600 installations would result in 3.9MW installed solar capacity (and it is also estimated that up to 50 per cent of these installations would include a battery storage option).
- 2.3. Solar Together London provides a relatively low risk return on investment for the GLA. Based on the above targets, the average cost to the GLA per installation would be around £309, depending on take up.
- 2.4. Other benefits would be energy bill savings for participating residents, as would be expected when residents are using energy from their solar system rather than the national grid. In addition, there would be increased work for the supply chain, and the potential to link into other GLA work such as the Smart Energy agenda, which investigates demand-side response for those residents opting for battery storage.

### Solar Skills London phase two

- 2.5. It is proposed that the GLA spends up to £150,000 on Solar Skills London. This will build on the work currently underway through phase one of the programme and will aim to:
  - increase the solar supply chain in London
  - further support London businesses to develop their skills and diversify the range of activities they can undertake
  - provide useful and pragmatic support for businesses from a range of different areas
  - increase the equality and diversity of the solar supply chain
  - share lessons learned with other areas of the supply chain within the decarbonisation sector, including through inputting into other Mayoral programmes such as the Green Skills Academies.

2.6. A prospectus will be issued seeking proposals from the sector to help deliver the next phase of Solar Skills London. Successful proposals will be required to set out detailed project outcomes which will deliver the objectives above.

Research to support the Mayor's Solar Action Plan

- 2.7. It is proposed that the GLA spends up to £41,500 on research to support delivery of the Mayor's Solar Action Plan and associated Mayoral projects and programmes.
- 2.8. The first piece of research will focus on the planning system with an aim of ensuring planning policies and approaches do not unnecessarily restrict solar installation on existing properties. This will involve mapping the variance of planning approaches and identifying opportunities for a more consistent approach across London.
- 2.9. The second piece of research will investigate how London's solar assets contribute towards London's decarbonisation targets and how flexible energy technologies can maximise carbon savings.

# 3. Equality comments

- 3.1. Under section 149 of the Equality Act 2010 (the Equality Act), as a public authority, the Mayor and the GLA must have due regard to the need to eliminate unlawful discrimination, harassment and victimisation, and to advance equality of opportunity and foster good relations between people who share a protected characteristic and those who do not. Protected characteristics under the Equality Act comprise age, disability, gender reassignment, pregnancy and maternity, race, religion or belief, sex, sexual orientation, and marriage or civil partnership status (the duty in respect of this last characteristic is to eliminate unlawful discrimination only).
- 3.2. The GLA will take appropriate steps to ensure that there are no potential negative impacts expected on those with protected characteristics. Those with protected characteristics will gain from the positive benefits of this scheme in equal measure should their properties be selected, and there will be equality of access to participate in the delivery and benefit from the scheme, without discrimination.
- 3.3. Electricity generated by a home through solar PV can especially benefit those more housebound e.g. as a result of disability and age, since they can take advantage of the power as it is generated, through for example running appliances in the daytime when the panels will be producing the most electricity, rather than the majority of the power being exported to the National Grid.
- 3.4. Whilst Solar Together London targets the able to pay market, the success of Solar Together London as well as Solar Skills London and supporting research could have a longer-term positive impact on lower income and fuel poor households by supporting growth of the solar PV market in London. This could encourage a stronger, more diverse supply chain and cheaper installations. Private landlords as well as homeowners are eligible to participate in this scheme also, benefiting their own, potentially vulnerable residents.
- 3.5. The next phase of Solar Skills London will have an explicit focus on trying to increase the diversity of the solar supply chain.

### 4. Other considerations

Key risks and issues

4.1 Key risks and mitigations are set out in the table below.

Risk	Likelihood (out of 4)	impact (out of 4)	Rating	Mitigation
Boroughs will not get involved in Solar Together London	1	2	2	Ongoing engagement from GLA officers (including workshop attended by 18 boroughs on 29 September 2021) shows a willingness on their part to get involved. Following on from phase four of the scheme, there is now a mechanism in place to enable pan-London delivery, even if a borough doesn't want to be directly involved.
Uptake through Solar Together London could be low and, if so, could represent a reputational risk for the Mayor and GLA	2	2	4	Whilst it is impossible to predict levels of interest, uptake levels have increased through each previous phase. Additional measures to increase uptake, for example a follow-up mailout and London-wide communications, are included in phase five.  Value for money under this approach is good and better than other alternatives to drive household solar uptake.
Installer quality through Solar Together London presents a reputational risk for the GLA and boroughs	1	3	3	The scheme is designed to improve quality as well as affordability. All installers to be used under the scheme must be accredited as a prerequisite. In addition, an independent and specialist third-party will inspect approximately one in 20 installations throughout the delivery phase of Solar Together London.
Supply chain disruption could result in installation delays through Solar Together London	2	2	4	This will be tested through the supplier selection process. The platform supplier will work with installers to ensure any delays are built into the timeframes for residents, so their expectations are managed. Clear communications will be provided to residents.
The GLA is unable to procure a suitable delivery partner for the next phase of Solar Skills London	1	3	3	The GLA has already identified several potential delivery partners for this work and is confident that the procurement will result in an appropriate supplier. There is sufficient time to be able to conduct stakeholder engagement activities to publicise the programme and encourage bidders.

### Links to Mayoral strategies and priorities

- 4.2 The Solar Together and Solar Skills programmes support the achievement of objectives from Mayoral plans and strategies as follows:
  - London Environment Strategy:
    - objective 6.1: Reduce emissions from London's homes and workplaces whilst protecting the most disadvantaged by tackling fuel poverty.
    - objective 6.2: Develop clean and smart, integrated energy systems utilising local and renewable energy sources.
  - Economic Development Strategy
    - policy 5.5: Low Carbon and Environmental Goods and Services the Mayor wants London's economy to grow, but he also wants to shape the direction of that growth and what it delivers for London and Londoners. He wants growth that is more inclusive, with less inequality as well as lower carbon and more circular in nature to make London a greener, cleaner and more sustainable city.
  - Solar Action Plan:
    - the Mayor has set an ambition for London to achieve 1GW of installed capacity by 2030, ten times more than today's levels, and 2 GW by 2050.
  - Green New Deal recovery mission:
    - double the size of the green economy by 2030.

### 5. Financial comments

- 5.1 Approval is sought for expenditure of up to £686,500 to deliver the fifth phase of Solar Together London and a second phase of Solar Skills London, as well as undertake research to support the delivery of the Mayor's Solar Action Plan.
- 5.2 Expenditure allocation

• promotion of Solar Together London £495,000

◆ delivery of Phase 2 of Solar Skills London
 £150,000

• research to support the achievement of the Mayor's Solar Action Plan £41,500

5.3 The £686,500 Revenue expenditure will be funded from the Solar & Community Energy budget (£650,000) and Green New Deal budget (£36,500) both held within the wider Environment budget and approved as part of the 2021-22 budget setting process.

# 6. Legal comments

- 6.1 The foregoing sections of this report indicate that:
  - the decisions requested of the Mayor concern the exercise of the GLA's general powers, falling
    within the GLA's statutory powers to do such things considered to further or which are
    facilitative of, conducive or incidental to the promotion of the improvement of the environment
    in Greater London

- in formulating the proposals in respect of which a decision is sought, officers have complied with the Authority's related statutory duties to:
  - o pay due regard to the principle that there should be equality of opportunity for all people
  - consider how the proposals will promote the improvement of health of persons, health inequalities between persons and to contribute towards the achievement of sustainable development in the United Kingdom
  - o consult with appropriate bodies.
- 6.2 In taking the decisions requested, the Mayor must have due regard to the Public Sector Equality
  Duty namely the need to eliminate discrimination, harassment, victimisation and any other conduct
  prohibited by the Equality Act 2010 and to advance equality of opportunity and foster good
  relations between persons who share a relevant protected characteristic (race, disability, gender, age,
  sexual orientation, religion) and persons who do not (section 149 of the Equality Act 2010). To this
  end, the Mayor should have particular regard to section 3 (above) of this report.
- 6.3 If the Mayor is minded to make the decisions sought, officers must ensure that to the extent that expenditure concerns the:
  - award of grant funding, that it is distributed fairly, transparently, in manner which affords value for money and in accordance with the requirements of the GLA's Contracts and Funding Code and grant funding agreements are put in place between and executed by the GLA and delivery partners before any commitment to fund is made
  - payment for services, those services are procured in liaison with TfL Procurement and in accordance with the GLA's Contracts and Funding Code and contracts are put in place between and executed by the GLA and contractors before commencement of such services.

# 7. Planned delivery approach and next steps

Activity	Timeline
Announcement	November 2021
Procurement of contracts (Solar Skills London phase 2 and research)	End January 2022
Funding agreements with boroughs in place to deliver Solar Together London activities	January 2022
Solar Together London 5 registration opens	February 2022
Final reports – research	March 2022
Solar Together London auction	15 March 2022
Solar Together London installation phase	May-November 2022
End of Solar Skills London phase two	March 2023

**Appendices and supporting papers:** None

#### Public access to information

Information in this form (Part 1) is subject to the Freedom of Information Act 2000 (FoIA) and will be made available on the GLA website within one working day of approval.

If immediate publication risks compromising the implementation of the decision (for example, to complete a procurement process), it can be deferred until a specific date. Deferral periods should be kept to the shortest length strictly necessary. **Note**: This form (Part 1) will either be published within one working day after it has been approved or on the defer date.

#### Part 1 - Deferral

### Is the publication of Part 1 of this approval to be deferred? YES

If YES, for what reason: Please defer until the Mayor announces the initiative.

Until what date: 31 December 2021

### Part 2 - Sensitive information

Only the facts or advice that would be exempt from disclosure under FoIA should be included in the separate Part 2 form, together with the legal rationale for non-publication.

### Is there a part 2 form -NO

is there a part 2 form – NO				
ORIGINATING OFFICER DECLARATION:	Drafting officer to confirm the following (✓)			
Drafting officer:				
Lisa Bennett has drafted this report in accordance with GLA procedures and confirms the following:	✓			
Sponsoring Director:				
Phil Graham has reviewed the request and is satisfied it is correct and consistent with the Mayor's plans and priorities.	d is satisfied it is correct and consistent with			
Mayoral Adviser:				
Shirley Rodrigues has been consulted about the proposal and agrees the recommendations.	<b>√</b>			
Advice:				
The Finance and Legal teams have commented on this proposal.	✓			
Corporate Investment Board				
This decision was agreed by the Corporate Investment Board on 22 November 2021	<b>√</b>			

### **EXECUTIVE DIRECTOR, RESOURCES:**

I confirm that financial and legal implications have been appropriately considered in the preparation of this report.

Signature

Date

22 November 2021

D. Garge

#### CHIEF OF STAFF:

I am satisfied that this is an appropriate request to be submitted to the Mayor

Signature

Date:

21 November 2021