



RHONDDA CYNON TAF COUNTY BOROUGH COUNCIL

CLIMATE CHANGE CABINET SUB-COMMITTEE

23rd March 2023

PROPOSED SOLAR FARM

REPORT OF THE DIRECTOR OF CORPORATE ESTATES IN DISCUSSION WITH THE CABINET MEMBER FOR CLIMATE CHANGE & CORPORATE SERVICES

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Anthony Roberts, Head of Energy & Carbon Reduction.**

1. PURPOSE OF THE REPORT

- 1.1 The purpose of the report is to provide a further update to Members with regards to the work underway in the development of a 'Land Based Solar Farm', to be located on Council owned land located at Coed Ely, on an 84-acre 'terraced' former colliery site, near Tonyrefail. The facility will, when constructed, be an asset owned by Rhondda Cynon Taf County Borough Council.

2. RECOMMENDATIONS

It is recommended that Members:

- 2.1 Note the contents of this report as part of the ongoing work in response to our climate change ambitions and agree to the further progress of the project proposals, in line with the contents of this report.
- 2.2 Receive further report(s) to provide updates on progress as/when deemed appropriate.

3. REASONS FOR RECOMMENDATIONS

- 3.1 The contents of this report provide key information updates on the proposal where the Council has plans to build and finance a credible solar farm, that will make a vastly significant contribution to the Council's

ability to offset its Carbon Footprint, and towards achieving its Net Zero Carbon target.

4. BACKGROUND

- 4.1 Previous reports have described the ongoing work to investigate the potential of using RCT owned land for the development of major renewable energy projects for both wind and solar generation, including proposals developed with the assistance of the Welsh Government Energy Service (WGES). This project will be primarily developed by the Council and as such would both contribute to the increase in the renewable energy provision and carbon reduction/offsetting in the area, whilst also making a positive, long term, economic contribution to the financial situation of the Council, for the benefit of citizens.
- 4.2 The project is described as a 6MW Solar Farm, comprising a 5MW array (at 33kV) connected to the National Grid, and also a 1MW array (at 11kV) to be connected to a 'public sector' partner, via a private wire arrangement.
- 4.3 The project has the potential to generate a long-term income for the Council, over and above the term cost of financing and/or operating the scheme and can provide a substantial financial benefit once the said term has passed. The project will also 'offset' around 55,000 tonnes of Carbon over the expected 35yr 'minimum' lifecycle of the project, as explained in more detail in section 8.
- 4.4 Consent was granted by Cabinet, following the presentation of the previous reports in March and October 2022, to proceed with the proposals and permission was given to move plans forward, as described therein.
- 4.5 In September 2022 the Council appointed a Project Manager to take the project through to the Planning, Detailed Design and Construction Stages, a process that also involved updating the project timeline and a review of the budget. These activities all took place during the third quarter of fy'2022/23, together with some other key project milestones, and we are now able to provide further details on, as described below.

5. UPDATED PROJECT INFORMATION

- 5.1 A specialist company were commissioned to produce an outline design of the solar farm, using innovative solar design techniques. The purpose of the exercise was to assess the extent of the available land that would be needed to achieve the stated output targets (*referred to above*) whilst considering the geography of the proposed site. The specialist company were also asked to produce a high-level cost profile of their proposals and to provide a detailed prediction of energy 'yield', both of which could then be used to inform future expenditure and income predictions.
- 5.2 Following the receipt of this information, Officers were able to revise both the initial budget needed and programme/timeline for the project

proposals. The information also enabled discussions to take place with specialist consultants to assess the requirements for taking the project to the next stage of development, and through the planning process.

- 5.3 Following a brief consultation period, a tender process was undertaken, in conjunction with our Procurement colleagues, and a consultant was selected to help take the project forward through the Planning process. At the time of writing, the 'Activity Schedule' for the Project is currently in the process of being formulated, which will then allow Officers to update the project timeline.
- 5.4 The project team is also currently collating information with a view to submitting a Pre-planning Application Consultation (PAC) in early summer of 2023. Following this it is anticipated that a planning application will be submitted, and if successful, it is expected that construction will be able to start during 2024.
- 5.5 Officers and our lawyers are working on the conclusion to the Heads of Terms for the private wire connection arrangement and Power Purchase Agreement (*or Offtake Contract*) with a potential 'public sector' partner. The Council has signed a Non-Disclosure Agreement regarding this sensitive matter and so no further details regarding this aspect of the project can be made public. However, it is anticipated that the related 'private wire' element of the Project will need to be completed during the Summer of 2024, to coincide with completion of the A4119 road scheme.
- 5.6 Negotiations are ongoing with the local Farmer, who is a Tenant and has access to/over the land with grazing rights, regarding the future management of the land on which the solar farm is to be built. It is hoped that the Tenant will be able to make a positive contribution to the future running of the Council's proposed asset.
- 5.7 Both the development costs and the headline estimated figures for the capital cost of the project have now been updated (*refer to section 10 below*) to take account of the latest project information and inflation since the previous initial budget proposals were compiled. However, it should also be noted that the current economic situation with the unstable economy, high inflation and volatile energy costs means that it is likely that regular updates and re-assessments will be needed.
- 5.8 Periodic updates will be provided to Members during the progress of the project and further approval will be sought at each notable stage of development (*also refer to 10.4 below*).

6. EQUALITY AND DIVERSITY IMPLICATIONS / SOCIO-ECONOMIC DUTY

- 6.1 This supporting report is for the purpose of an update and consequently an Equality Impact Assessment is not required in regard to this report.

7. WELSH LANGUAGE IMPLICATIONS

- 7.1 This supporting report is for the purpose of an update and consequently Welsh Language Impact Assessment is not required with regard to this report, however a copy can be made available in Welsh if requested.

8. CLIMATE CHANGE IMPLICATIONS

- 8.1 The intent of this report is in furthering the ambitions for the Council's Climate Change Agenda.
- 8.2 As previously reported, the project has the potential to 'offset' over 1,500 tonnes of carbon per-annum and around 55,000 tonnes over the expected 35yr 'minimum' lifecycle of the project (*figures calculated using currently published carbon conversion factors*).

9. CONSULTATION / INVOLVEMENT

- 9.1 There are no consultation requirements at present with regard to this supporting report.

10. FINANCIAL IMPLICATION(S)

- 10.1 Development costs for the project for the current financial year 2022/23 are estimated to be within the region of £145k and these costs have been met from within existing budgets.
- 10.2 There will be a need to allow for further development costs in fy'2023/24 which are estimated to be in the region of £400k, also met from existing budgets. This figure also includes for planning application charges and SAB fees that will be payable to service areas within the Council.
- 10.3 As mentioned in 5.7, the initial budget estimate for the full development and construction costs for the entire project have been reassessed, in the light of all the additional information we now have available and considering current market conditions, etc., the estimated budget now stands in the in the region of £8.5million, a figure that includes all identified development costs and allowance for the provision of the private wire installation.
- 10.4 As stated in item 5.7 all costs will be subject to periodic review, and then reported on at each notable stage of development. It is anticipated that the project will be mainly funded by use of Prudential Borrowing, with the annual income from the energy generation being sufficient to cover the annual borrowing repayments and the ongoing annual costs and maintenance commitments of the asset. This is subject to a full project report and business case being presented to Cabinet and, if approval is then given, a further report to Council to obtain the Prudential Borrowing approval.
- 10.5 It should be noted that despite the recent rises in the cost of borrowing, Officers are continuing to monitor the availability of grant funding to help with the cost of developing the Solar Farm. In support of this an application has recently been submitted for £75k worth of grant

development funding towards the expenditure in the financial year 2022/23 and if this endeavour is successful, it will result in covering over 50% of the development costs for this financial year.

- 10.6 It is hoped that the availability of grant funding in assisting the development of the project, together with the increased wholesale market prices in energy costs, will mean that the project model can show an increasingly favourable payback period. However, this situation will be fully advised when the final budget/income review is assessed, prior to submitting the business and funding case report.

11. LEGAL IMPLICATIONS OR LEGISLATION CONSIDERED

- 11.1 There are no legal implications aligned to this report, at this stage.

12. LINKS TO THE CORPORATE AND NATIONAL PRIORITIES AND THE WELL-BEING OF FUTURE GENERATIONS ACT.

- 12.1 The purpose of the report is to provide an interim update report relating to the work of the Climate Change Cabinet Sub Committee with regards to the work underway on the development of key renewable energy projects and certain other related issues. Any future actions that arise because of the recommendations of the Climate Change Cabinet Sub Committee report will be considered by the Council's Cabinet and it will take full regard to the seven national wellbeing goals.

13. CONCLUSION

- 13.1 This report provides a key update on the proposals for a Solar Farm, which is one of the areas of work covered by the Climate Change Cabinet Sub-Committee. It provides an update on the proposal where the Council has plans to build and finance a credible land based solar farm, as previously reported in October 2022.

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