

# Joint Executive (Cabinet) Committee

Forest Heath & St Edmundsbury councils

**West Suffolk**  
working together

<b>Title of Report:</b>	<b>Review of Performance of Forest Heath District Council's Solar Farm – Year Two</b>	
<b>Report No:</b>	<b>CAB/JT/18/036</b>	
<b>Report to and date:</b>	<b>Joint Executive (Cabinet) Committee</b>	2 October 2018
<b>Portfolio holder:</b>	Councillor Stephen Edwards FHDC Portfolio Holder for Resources and Performance <b>Tel:</b> 01799 530325 <b>Email:</b> <a href="mailto:stephen.edwards@forest-heath.gov.uk">stephen.edwards@forest-heath.gov.uk</a>	
<b>Lead officer:</b>	Gregory Stevenson Service Manager (Finance and Performance) <b>Tel:</b> 01284 757264 <b>Email:</b> <a href="mailto:gregory.stevenson@westsuffolk.gov.uk">gregory.stevenson@westsuffolk.gov.uk</a>	
<b>Purpose of report:</b>	To report on performance on the second year anniversary of the purchase of Toggam Solar farm in July 2016.	
<b>Recommendation:</b>	<b>It is <u>RECOMMENDED</u> that the Joint Executive (Cabinet) Committee note the second year review of performance of Forest Heath District Council's Solar Farm.</b>	
<b>Key Decision:</b>  <i>(Check the appropriate box and delete all those that <b>do not</b> apply.)</i>	<i>Is this a Key Decision and, if so, under which definition?</i> Yes, it is a Key Decision - <input type="checkbox"/> No, it is not a Key Decision - <input checked="" type="checkbox"/>	
<i>The decisions made as a result of this report will usually be published within <b>48 hours</b> and cannot be actioned until <b>five clear working days of the publication of the decision</b> have elapsed. This item is included on the Decisions Plan.</i>		
<b>Consultation:</b>	Portfolio Holders have had the opportunity to feed into this report	
<b>Alternative option(s):</b>	Not applicable.	

<b>Implications:</b>			
Are there any <b>financial</b> implications? If yes, please give details		Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	
		None as a direct result of this update report however the report refers to the financial performance of the 2 <sup>nd</sup> year of the solar project.  Separate reports will be presented setting out any business case for enhancing the performance of the current solar farm and/or investing in other opportunities as appropriate.	
Are there any <b>staffing</b> implications? If yes, please give details		Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	
Are there any <b>ICT</b> implications? If yes, please give details		Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	
Are there any <b>legal and/or policy</b> implications? If yes, please give details		Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	
Are there any <b>equality</b> implications? If yes, please give details		Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	
<b>Risk/opportunity assessment:</b>		<i>(potential hazards or opportunities affecting corporate, service or project objectives)</i>	
<b>Risk area [may change to be linked to the decisions]</b>	<b>Inherent level of risk</b> (before controls)	<b>Controls</b>	<b>Residual risk</b> (after controls)
Performance of Toggam Solar Farm fails to deliver the predicted investment returns	Medium	Robust budgetary and operational management processes will be kept in place to monitor and mitigate any threats to the long term viability of the solar farm	Low
<b>Ward(s) affected:</b>		All Wards	
<b>Background papers:</b> <i>(all background papers are to be published on the website and a link included)</i>		<a href="#">Report No: CAB//FH/17/052</a> and <a href="#">Appendix 1</a> First Year Review of Performance of the Council's Solar Farm (FHDC Cabinet: 24 October 2017)	
<b>Documents attached:</b>		None	

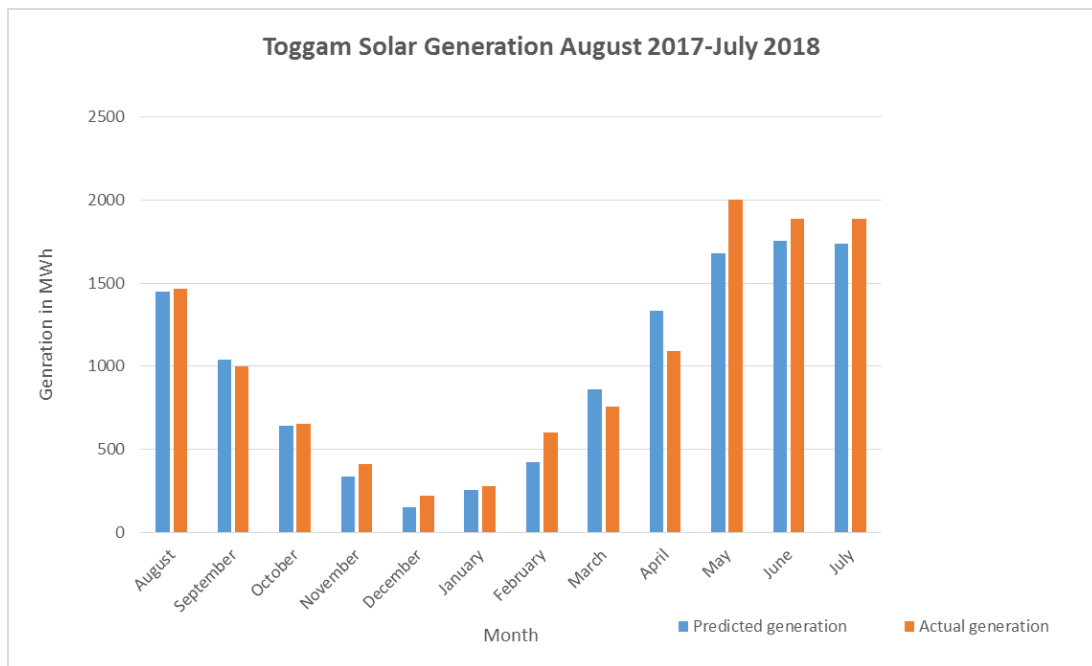
## **1. Key issues and reasons for recommendation(s)**

### **1.1 Background**

- 1.1.1 In July 2016, following unanimous cross party approval, Forest Heath District Council (FHDC) completed the acquisition of Toggam Farm Solar Farm. In September 2017, the first year of performance of the Solar Farm was reported through to Cabinet on 24 October 2017 (Report No: CAB/FH/17/052 refers).
- 1.1.2 The financial business case for the acquisition of the solar farm at Toggam Farm, predicted a net revenue benefit (after allowing for capital outlay to be recouped) at around £300k for the first year, raising each year of the 25 year project.
- 1.1.3 The electricity generated at the site is supplied into the national grid and made available to the wholesale electricity market. The site is accredited with the energy regulator (Ofgem) so that it is entitled to receive, for a period of 20 years following accreditation, Renewable Obligations Certificates (termed ROCs) for each megawatt hour of power produced which are redeemed for a monetary entitlement.
- 1.1.4 The electricity and ROCs are sold in accordance with a Power Purchase Agreement (PPA) to a licensed energy supply company via the grid. Following a competitive auction process, the Council entered into a new PPA in April 2019 with the licensed supply company, Statkraft Energy, with a total (power sales and ROC) value of £107.4 per MWh. The PPA will run until the end of March 2019. Preparations are already underway to establish the selection process for power sales when the current agreement term ends.

## **2. Year 2 Performance**

- 2.1 The data below sets out the performance of the site during the second year of ownership to the end of July 2018. In future years, we plan to report over the Council's financial budget year, April-March as part of the annual outturn report.
- 2.2 Overall, the site has, like Year 1, performed slightly above the modelled performance. It was predicted that the site would produce 11,649MWh of electricity, but the actual generation was 12,247Wh. The solar farm generation is enough electricity to power around 3,300 homes and offset CO<sub>2</sub> emissions from 1,500 cars.



- 2.3 The total income for the project was £1,303,359 over the 12 month period, compared to a predicted total income of £1,255,320. These income totals are before allowing for the sites operational costs and the capital outlay to be recouped.
- 2.4 After accounting for operational costs such as business rates, insurance, the operational and maintenance contract, lease payment, and the capital investment, this has resulted in a net benefit of £373,466 compared to a predicted £331,978 net benefit, to be re-invested into the delivery of much valued district wide services. The Council has not had to borrow externally to fund this investment, it was internally borrowed from available cash deposits. This drives an additional saving of £202k per year from interest payable against the original business case.
- 2.5 The site has an Operational and Maintenance (O&M) contract in place, which is currently delivered by Greenheath Ltd and the solar contractor which built the farm, Greencells. The Council receives a monthly report highlighting all performance and operational issues, as well as details on the bi-annual preventive maintenance work. To assist with the ground maintenance, sheep are now grazing on the land. This O&M contract runs to August 2019 and work has started to procure the next contract period. It is anticipated that annual savings on the contract will be achievable from this procurement process.
- 2.6 The site is currently covered by an Engineering, Procurement and Construction (EPC) contract in relation to the design, supply, installation, testing and commissioning of the solar farm and associated connection to the local power grid. This contract ensures the site performs to a guaranteed standard specified within the contract and covers the first two years of operation.
- 2.7 In line with the EPC contract, the site was independently tested under the first year 'Interim Acceptance Test' over the summer of 2017, with a further test now underway (the 'Final Acceptance Test'). The Council has retained the technical consultants, Fichtner Consulting, used during the

pre-acquisition due diligence, to conduct and verify these acceptance tests.

- 2.8 The tests include assessing the Performance Ratio for the site. This is the industry standard measurement of how well a solar installation is operating. It measures the actual output against a predicted output based on the irradiance that being the amount of sunlight available over the acceptance test period. It then compares that measured performance against predicted and actual data collected over the whole year. By doing this a solar installation can be compared against another irrespective of location. The site is also monitored monthly to calculate in-period Performance Ratio, which allows more routine assessment of performance.
- 2.9 The Interim Acceptance undertaken by Fitchner concluded that the site achieved a Performance Ratio of 89.74% against the contractual minimum of 84%.
- 2.10 The solar farm has been subject to two separate independent assessments, one by the Council's insurer, Zurich Insurance, and by the government advisory service, Local Partnerships. Both have provided positive feedback regarding the site's construction, performance and maintenance.
- 2.11 The first two years of operation has shown that Toggam Solar is performing above the level predicted in the original business case. Officers will continue to manage the site with the purpose of ensuring that the solar farm continues to meet expected performance. Furthermore, Officers have also been exploring opportunities to further invest and uplift the value of the asset. Any proposals will be the subject of future reports. If considered both feasible and viable, business cases will be brought forward for consideration by Members.
- 2.12 It should be noted that the Solar Farm is just one of FHDC's investments. Members and Officers remain open to the discussion and exploration of other ideas that will ultimately help toward achieving our objectives while also creating a source of income to support the delivery of day-to-day services to our residents and businesses.