

Appendix B – Financial Analysis Spreadsheet

System Size	50	Total Cost									
Output/kW	1083	Maintenance									
Est Production	54,150	10 yr Inverter Replacement									
PPA Use	75%	Management Costs									
Export	25%	Contingency rate	10%								
RPI	2.5%	PPA Rate	£ 0.13								
EPI	5.0%	Export Rate	£ 0.055								
Building Energy Demand	82,000	Current Electricity Rate	£ 0.14								
Loan Rate		Loan Taken	Yes								
Loan Duration	25	Loan Annual Repayment									

Year	Production kWh/a	PPA	Export	Financial Benefit	Maintenance	Management	Loan Repayment	Contingency	Culmative Contingency	Annual Benefit	Culmative Benefit
1	54,150										
2	52,796										
3	52,417										
4	52,038										
5	51,659										
6	51,280										
7	50,901										
8	50,522										
9	50,143										
10	49,764										
11	49,385										
12	49,006										
13	48,627										
14	48,248										
15	47,869										
16	47,490										
17	47,111										
18	46,731										
19	46,352										
20	45,973										
21	45,594										
22	45,215										
23	44,836										
24	44,457										
25	44,078										

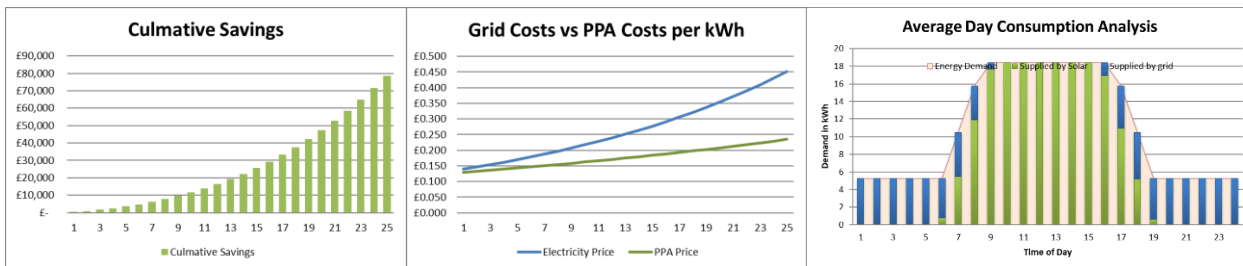
Sheet showing financial analysis, provides a breakdown of the performance over 25 years as well as an initial modelled ROI.

The system then goes through another resilience test by the Upper and Lower Indices which account for higher or lower system performance and energy demand.

The contingency is to allow for unforeseen costs arising from the system as well as equipment replacement when required.

System Location	Example Site	Energy Demand	82,000		Year 1 Savings	
System Size	50	Covered by Solar	50%		25 year Savings	
Output/kW	1083	Current Electricity Price			Year 1 Carbon Saving	10.38 Tonnes CO2e
Est Production	54,150	PPA Price				
Onsite Use	75%	Electricity Price Increase	5%			
Solar Consumption	40,608	RPI	2.5%			

Year	Solar Consumption kWh/a	PPA Cost	Supplier Cost	New Annual Cost	Do Nothing Electricity Costs	Annual Savings	Culmative Savings
1	40,608						
2	39,593						
3	39,309						
4	39,024						
5	38,740						
6	38,456						
7	38,172						
8	37,887						
9	37,603						
10	37,319						
11	37,035						
12	36,750						
13	36,466						
14	36,182						
15	35,898						
16	35,613						
17	35,329						
18	35,045						
19	34,761						
20	34,476						
21	34,192						
22	33,908						
23	33,624						
24	33,339						
25	33,055						



Analysis sheet provided for the business. Compares benefit of PPA to current cost of electricity.

Also copies of the graphs that are produced including the potential average day coverage by solar and the grid.

This sheet will go out to businesses as part of their proposal so they can see the benefit of the system over the lifetime of the PPA.