Graded by David Atkins

MAT-20037 Project Rubric

Activity: Submit Your Project Here

Course: MAT-20037-XF121 Solve Problems with Math 22DA06

Name: Fernando Merlina

Criteria	Mastered	Not Mastered	Criterion Score
Calculates the total energy output of a solar panel system in kilowatt hours (kWh)	1 point ✓	0 points	/ 1
Criterion Feedback 7/10/2022: Mastered			
Calculates the difference between the current electricity usage and the electricity generated by a solar panel system in kilowatt hours (kWh) and in dollars	1 point	0 points ✓	/ 1
Criterion Feedback 7/10/2022: This is a two part question, but you do have the first part correct. The difference between the current usage and the amount generated by the solar panel system is 614017.24. Now, the second part of that question asks you to find the difference in dollars knowing that each kwh is worth $0.165.			

Criteria	Mastered	Not Mastered	Criterion Score
Determines the likelihood of receiving a damaged panel	1 point	0 points ✓	/ 1

Criterion Feedback

7/10/2022:

Each panel has a 0.001 probability of being damaged. In your calculations, you are accounting for that difference twice. When you computed the Ratio, you divided by 1000 but in the next step you multiplied by 0.001. Well, multiplying by 0.001 is the exact same computation as dividing by 1000. So, that last step should not be done. From there, how do you convert a decimal probability into a percentage?

Determines how long it would take to pay back the cost of buying the system in years	1 point	0 points ✓	/ 1

Criterion Feedback

7/10/2022:

You will first need to complete the second critical element to answer this question properly. There are two types of savings the school will be using. First, the $44,756 is not longer being paid and that can be used to help pay this debt. Second, remember, the system is generating more than enough electricity and the school can sell some of that back and use that money to help pay off any debt. Again, you will need to calculate that value up in the second critical element first.

Determines whether there is a cost savings over 10 years for leasing the solar panel system	1 point ✓	0 points	/ 1

Criterion Feedback

7/10/2022:

Mastered

Criteria	Mastered	Not Mastered	Criterion Score
Recommends whether SNHU should install solar energy panels on its building, based on calculations	1 point	0 points ✓	/ 1
Criterion Feedback 7/10/2022: Go ahead and get the calculations above corrected and look over the last few critical elements again. Once you have updated the calculations, some of the thoughts and ideas might change or it might now. It is just that one of the values will change significantly.			
Explains whether to purchase upfront or lease solar energy, based on calculations	1 point	0 points ✓	/ 1
Written answers are clear; use correct grammar, sentence structure, and spelling; and show an understanding of audience and purpose	1 point	0 points ✓	/ 1
Lists sources where applicable using citation methods with no major errors	1 point	0 points ✓	/ 1
Total			/ 9

Overall Score

Mastered	Not Mastered
Student has achieved Mastered on all rubric criteria.	Student has not achieved Mastered on all rubric criteria. ✓