

# Testing: EnergyCalc

J Jandrell

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Module tested	energyCalc
Version	v0.1
File Path	CODE/Energy_Calculations
Last written by	K Ngwenya
Tested by	J. Jandrell

## 1 Results

No.	Input	Expected output	Output given	Punch list
1	distanceTraveled(1320, 125)	65		
2	distanceTraveled(11987,10241)	1746		
3	distanceTraveled(1027, 1027)	0		
4	fuelUsed(142, 8.2)	$\simeq 11.644$	12	2
5	fuelUsed(301, 6.3)	$\simeq 18.963$	19	2

Note: if a cell is left blank that implies that no issues occurred during the test and thus no comment or action is required.

## 2 Punch list

No.	Description	resolved	Developer
1	Function name 'energyCalc' does not make sense of a function which determines fuel usage. Rename to 'fuelUsage'	22-23-05	J Jandrell
2	Failure: significant calculation error due to premature rounding and loss of sig-figs.	22-05-23	J Jandrell

## 3 Concerns and future considerations

### 3.1 No defensive coding

The code does not have any protection against illogical user inputs, negative distances or other issues that could arise from human error. Will we check for these errors before we reach this point?

### 3.2 Energy calculation

Now that we have a way of finding distance energy can be found using the unit converter.