

APR calculation report

Reference/notes

Advances/credit:

Loan amount/value of goods	£7,500.00
Deposit amount	£0.00
Credit amount	£7,500.00
Advance date	0 Months after relevant date

Total credit amount : £7,500.00

Miscellaneous/single charges:

administration fee

Charge amount	£25.00
Charge date	3 Months after relevant date

Total charges amount : £25.00

Installments:

Installments amount	£207.67
First installment date	3 Months after relevant date
Installments frequency	47 installments, paid every 1 Months
This installments total	£9,760.49

Installments amount	£207.50
First installment date	50 Months after relevant date
Installments frequency	1 installments, paid every 1 Months
This installments total	£207.50

Total installments amount : £9,967.99

Calculation results

Calculated APR : 14.5% (0.14549494240349)

Total amount of credit : £7,500.00

Total amount payable : £9,992.99

Total charge for credit : £2,492.99

Appendix A - Method of calculation

The calculations in this document were carried out in accordance with the formulae and guidelines contained in the Office of Fair Trading manual 'Credit charges and APR' (OFT144)

The calculation was made using the statutory formula, the full transcript and working of which is shown below. The balance of the equation may be out to an infinitesimal amount due to rounding errors but it should remain well within allowed tolerances.

All figures used in the calculation are kept to at least eight decimal places during calculation, ensuring that the end result far surpasses the required accuracy.

The statutory equation for the calculation is :

$$\sum_{x=1}^{x=N} \frac{C_x}{(1+A)^{T_x}} = \sum_{y=1}^{y=M} \frac{D_y}{(1+A)^{T_y}}$$

Where :

A = The value of APR expressed as a decimal

N = The number of advances of credit

x = The number identifying a particular advance of credit

C_x = The amount of advance x

T_x = The interval expressed in years, between the relevant date and the date of advance x

M = The number of installments (or payments)

y = The number identifying a particular installment

D_y = The amount of installment y

T_y = The interval expressed in years, between the relevant date and the date of installment y

Note that:

An advance of credit on the left hand side of the equation is any loan amount or credit for goods or services (after any deposit)

An installment on the right hand side of the equation is any installment payment, single charge or fee etc.

The left and right hand sides should balance, the equation is evaluated in full below.

The left hand side of the equation evaluates as follows:

Amount	Date	Gap in years	APR	Calculation	Result
£7,500.00	0/12 years	0	0.145495	7,500.00/(1+0.145495) ⁰	7500
Total Left hand side :					7500

The right hand side of the equation evaluates as follows:

Amount	Date	Gap in years	APR	Calculation	Result
£25.00	3/12 years	0.25	0.145495	25.00/(1+0.145495) ^{0.25}	24.165273
£207.67	3/12 years	0.25	0.145495	207.67/(1+0.145495) ^{0.25}	200.736094
£207.67	4/12 years	0.333333	0.145495	207.67/(1+0.145495) ^{0.333333}	198.476627
£207.67	5/12 years	0.416667	0.145495	207.67/(1+0.145495) ^{0.416667}	196.242593
£207.67	6/12 years	0.5	0.145495	207.67/(1+0.145495) ^{0.5}	194.033704
£207.67	7/12 years	0.583333	0.145495	207.67/(1+0.145495) ^{0.583333}	191.849679

£207.67	8/12 years	0.666667	0.145495	$207.67/(1+0.145495)^0.666667$	189.690237
£207.67	9/12 years	0.75	0.145495	$207.67/(1+0.145495)^0.75$	187.555101
£207.67	10/12 years	0.833333	0.145495	$207.67/(1+0.145495)^0.833333$	185.443999
£207.67	11/12 years	0.916667	0.145495	$207.67/(1+0.145495)^0.916667$	183.356658
£207.67	12/12 years	1	0.145495	$207.67/(1+0.145495)^1$	181.292813
£207.67	13/12 years	1.083333	0.145495	$207.67/(1+0.145495)^1.083333$	179.252198
£207.67	14/12 years	1.166667	0.145495	$207.67/(1+0.145495)^1.166667$	177.234552
£207.67	15/12 years	1.25	0.145495	$207.67/(1+0.145495)^1.25$	175.239616
£207.67	16/12 years	1.333333	0.145495	$207.67/(1+0.145495)^1.333333$	173.267135
£207.67	17/12 years	1.416667	0.145495	$207.67/(1+0.145495)^1.416667$	171.316856
£207.67	18/12 years	1.5	0.145495	$207.67/(1+0.145495)^1.5$	169.38853
£207.67	19/12 years	1.583333	0.145495	$207.67/(1+0.145495)^1.583333$	167.481908
£207.67	20/12 years	1.666667	0.145495	$207.67/(1+0.145495)^1.666667$	165.596748
£207.67	21/12 years	1.75	0.145495	$207.67/(1+0.145495)^1.75$	163.732806
£207.67	22/12 years	1.833333	0.145495	$207.67/(1+0.145495)^1.833333$	161.889845
£207.67	23/12 years	1.916667	0.145495	$207.67/(1+0.145495)^1.916667$	160.067628
£207.67	24/12 years	2	0.145495	$207.67/(1+0.145495)^2$	158.265922
£207.67	25/12 years	2.083333	0.145495	$207.67/(1+0.145495)^2.083333$	156.484495
£207.67	26/12 years	2.166667	0.145495	$207.67/(1+0.145495)^2.166667$	154.72312
£207.67	27/12 years	2.25	0.145495	$207.67/(1+0.145495)^2.25$	152.981571
£207.67	28/12 years	2.333333	0.145495	$207.67/(1+0.145495)^2.333333$	151.259625
£207.67	29/12 years	2.416667	0.145495	$207.67/(1+0.145495)^2.416667$	149.557061
£207.67	30/12 years	2.5	0.145495	$207.67/(1+0.145495)^2.5$	147.87366
£207.67	31/12 years	2.583333	0.145495	$207.67/(1+0.145495)^2.583333$	146.209208
£207.67	32/12 years	2.666667	0.145495	$207.67/(1+0.145495)^2.666667$	144.563491
£207.67	33/12 years	2.75	0.145495	$207.67/(1+0.145495)^2.75$	142.936298
£207.67	34/12 years	2.833333	0.145495	$207.67/(1+0.145495)^2.833333$	141.32742
£207.67	35/12 years	2.916667	0.145495	$207.67/(1+0.145495)^2.916667$	139.736652
£207.67	36/12 years	3	0.145495	$207.67/(1+0.145495)^3$	138.163789
£207.67	37/12 years	3.083333	0.145495	$207.67/(1+0.145495)^3.083333$	136.60863
£207.67	38/12 years	3.166667	0.145495	$207.67/(1+0.145495)^3.166667$	135.070976
£207.67	39/12 years	3.25	0.145495	$207.67/(1+0.145495)^3.25$	133.55063
£207.67	40/12 years	3.333333	0.145495	$207.67/(1+0.145495)^3.333333$	132.047396
£207.67	41/12 years	3.416667	0.145495	$207.67/(1+0.145495)^3.416667$	130.561083
£207.67	42/12 years	3.5	0.145495	$207.67/(1+0.145495)^3.5$	129.0915
£207.67	43/12 years	3.583333	0.145495	$207.67/(1+0.145495)^3.583333$	127.638458
£207.67	44/12 years	3.666667	0.145495	$207.67/(1+0.145495)^3.666667$	126.201771
£207.67	45/12 years	3.75	0.145495	$207.67/(1+0.145495)^3.75$	124.781256
£207.67	46/12 years	3.833333	0.145495	$207.67/(1+0.145495)^3.833333$	123.37673
£207.67	47/12 years	3.916667	0.145495	$207.67/(1+0.145495)^3.916667$	121.988013
£207.67	48/12 years	4	0.145495	$207.67/(1+0.145495)^4$	120.614927
£207.67	49/12 years	4.083333	0.145495	$207.67/(1+0.145495)^4.083333$	119.257297
£207.50	50/12 years	4.166667	0.145495	$207.50/(1+0.145495)^4.166667$	117.818422
Total Right hand side :					7500

NB Items in blue italics are single/misc charges, others are installments/regular payments

It is normal for the left and right hand sides to differ by amounts less than .0001 - this does not affect the calculation accuracy

Please note that the calculation is carried out using figures to considerably more decimal places than those

shown in this table. Hence, if the figures from this table are used to check the calculation, the result can differ slightly

SAMPLE ONLY