

Introduction to Annual Percentage Rate (APR)

Annual Percentage Rate (APR) is the annual cost of credit to the borrower which includes interest rate and all other charges associated with the credit facility. The rate at which you pay an yearly interest for a loan or the interest that you receive in your deposit account is the Annual Percentage Rate or APR. Annual rate of interest or APR is applicable on any mortgage or loan and even on credit cards.

In more simple terms, annual percentage rate or APR is the amount you pay on an yearly basis for borrowing money. As a borrower, the Annual percentage rate or APR tells you a bottom line number that you would have to pay if you borrow money from that particular lender. So, APR becomes the criteria which you can compare across lenders before borrowing money.

However, it may not be easy for consumers to compare this annual rate of interest, as it is in the lenders' power to decide what charges go into the calculation rate.

What are its benefits?

Listed below are a few of the benefits that are associated with the annual percentage rate:

- One of the salient benefits of APR is that it is known for providing you with a good understanding of the cost of the loan. You need to compare the different loan offers just by looking at the APR and determining who is offering the most affordable loan. Since the APR is known for including all fees in a loan offer, it is known for giving a clear idea of how much you will be required to pay for the loan.
- As different banks are known for having different terms, comparing different loan offers might be difficult. That's because it might not always be possible for you to go through all the tiny details of different loan offers available. In such cases, the APR might provide you with a standardised figure to look for among different loan providers and make the best decision.
- The APR is also known for providing you with an insight into the cost of your loan. Therefore, by looking at the APR, it is possible for you to gauge your repayment ability, and thereby plan accordingly.

So, based on the information above, it is important to look up the APR important while applying for a loan. Hence, before applying for a loan from the bank, please make sure that you have calculated the APR of the loan so that you are able to choose the best loan offer.

How to calculate APR in excel spreadsheet:

To calculate the APR, use IRR function in excel. IRR will return the Internal rate of return for a given cash flow, that is, the loan amount minus upfront fee and insurance premium deducted and monthly EMIs payments.

IRR Formula

=IRR(values,[guess])*12

The IRR function uses the following arguments:

Values (required argument) – This is an array of values that represent the series of cash flows. Cash flows include the net loan amount [Loan amount (minus) upfront fee/ insurance premium amount] and monthly EMIs payments

[Guess] (optional argument) – This is a number guessed by the user that is close to the expected internal rate of return (as there can be two solutions for the internal rate of return). If omitted, the function will take a default value of 0.1 (=10%).

Notes:

1. The argument value should contain at least one positive and one negative value to calculate the internal rate of return.
Hence, take the net loan amount value as negative and EMIs payment value as positive.
2. The IRR function uses the order of values to interpret cash flows. Hence, it is necessary to enter the loan amount and EMIs payments sequentially.
3. If the array or reference argument contains logical values, empty cells or text, those values are ignored.

For example:

Loan amount – 1,00,000
 Fee and Insurance amount – 2,500
 Rate of Interest – 15%
 Tenure - 12 months
 EMI – 9,026
 Net Loan amount – 1,00,000 – 2,500 = 97,500

Calculation of APR in excel spread sheet:

	A	B	C	D	E	F	G
1	Net Loan amount	-97,500					
2	EMI 1	9,026					
3	EMI 2	9,026					
4	EMI 3	9,026					
5	EMI 4	9,026					
6	EMI 5	9,026					
7	EMI 6	9,026					
8	EMI 7	9,026					
9	EMI 8	9,026					
10	EMI 9	9,026					
11	EMI 10	9,026					
12	EMI 11	9,026					
13	EMI 12	9,029					
14	APR	19.88%					
15							
16							