

How to Calculate Cumulative Totals in Power BI – 1 Method at a Time

Method 1: Calculated Column

I want to calculate the running account balance

I'm working with the dataset below

Date	Account	TransactionType	Amount
1-8-2025	A	Deposit	1000
1-8-2025	B	Deposit	500
2-8-2025	A	Withdrawal	-200
2-8-2025	B	Withdrawal	-100
3-8-2025	A	Deposit	500

Let's use a calculated column and build this from the ground up

Summing the [Amount] column leads to a simple sum:

$$1000 + 500 - 200 - 100 + 500 = 1700$$

Not yet what we are looking for

```
1 RunningBalanceColumn = SUM(FactBankAccountMutations[Amount])
```

Date	Account	TransactionType	Amount	RunningBalanceColumn
1-8-2025	A	Deposit	1000	1700
1-8-2025	B	Deposit	500	1700
2-8-2025	A	Withdrawal	-200	1700
2-8-2025	B	Withdrawal	-100	1700
3-8-2025	A	Deposit	500	1700

Let's use **CALCULATE** to force context transition
The current row becomes a filter for this table

Still not what we are looking for

```
1 RunningBalanceColumn =  
2 CALCULATE(  
3 |     SUM(FactBankAccountMutations[Amount])  
4 )
```

Date	Account	TransactionType	Amount	RunningBalanceColumn
1-8-2025	A	Deposit	1000	1000
1-8-2025	B	Deposit	500	500
2-8-2025	A	Withdrawal	-200	-200
2-8-2025	B	Withdrawal	-100	-100
3-8-2025	A	Deposit	500	500

Now let's use some variables to make stuff more readable and testable and apply a filter on account

We get the final balance for each account. Now we're cooking; close, but not there yet

```
1 RunningBalanceColumn = // Cumulative Total
2 VAR _CurrentAccount = 'FactBankAccountMutations'[Account]           // Saving the account of the current row
3 VAR _Result =
4     CALCULATE(                                                       // Use CALCULATE to apply filters and force context transition
5         SUM('FactBankAccountMutations'[Amount])
6         , FILTER(
7             'FactBankAccountMutations',
8             'FactBankAccountMutations'[Account] = _CurrentAccount    // I want the sum of the amount of the account of the current row
9         )
10    )
11 RETURN
12
13 _Result
```

Date	Account	TransactionType	Amount	RunningBalanceColumn
1-8-2025	A	Deposit	1000	1300
2-8-2025	A	Withdrawal	-200	1300
3-8-2025	A	Deposit	500	1300
1-8-2025	B	Deposit	500	400
2-8-2025	B	Withdrawal	-100	400

Adding a filter on the [Date] column gives us what we are looking for

```
1 RunningBalanceColumn = // Cumulative Total
2 VAR _CurrentAccount = 'FactBankAccountMutations'[Account]           // Saving the account of the current row
3 VAR _CurrentDate = 'FactBankAccountMutations'[Date]                 // Saving the date of the current row
4 VAR _Result =
5     CALCULATE(                                                       // Use CALCULATE to apply filters and force context transition
6         SUM('FactBankAccountMutations'[Amount])
7     , FILTER(
8         'FactBankAccountMutations',
9         'FactBankAccountMutations'[Account] = _CurrentAccount       // I want the sum of the amount of the account of the current row
10        && 'FactBankAccountMutations'[Date] <= _CurrentDate         // I want the sum of the amount of the account of the date of the current row and all the rows
11        that have a date that is smaller or the same
12    )
13 RETURN
14
15 _Result
```

Date	Account	TransactionType	Amount	RunningBalanceColumn
1-8-2025	A	Deposit	1000	1000
2-8-2025	A	Withdrawal	-200	800
3-8-2025	A	Deposit	500	1300
1-8-2025	B	Deposit	500	500
2-8-2025	B	Withdrawal	-100	400

First method of calculating the cumulative totals

The next method will use a measure and
CALCULATE

Do you have anything to add? Did I miss something?

Let me know in the comments!