
CATEGORY 4: DATE/TIME FUNCTIONS (10 Functions)

3 | 1 TODAY() - CURRENT DATE

SYNTAX:

`TODAY()`

PARAMETERS:

- None

EXAMPLE FROM YOUR DATASET:

Days Since Order (Calculated Column):

`Days Old = INT(TODAY() - SalesData[OrderDate])`

Result: Calculates days between order date and today

- Order from 2025-12-01 = 6 days old
- Order from 2023-01-01 = 1036 days old

Days Since Customer Joined (Calculated Column):

`Customer Age Days = INT(TODAY() - CustomerMaster[JoinDate])`

REAL USAGE:

- Calculate age of orders
 - Days since registration
 - Dynamic time calculations
-

3 | 2 DATE() - CREATE SPECIFIC DATE

SYNTAX:

`DATE(<year>, <month>, <day>)`

PARAMETERS:

- `<year>`: Year value (e.g., 2023)
- `<month>`: Month value (1-12)
- `<day>`: Day value (1-31)

EXAMPLE FROM YOUR DATASET:

Reference Date for Comparison (Calculated Measure):

`Reference Date = DATE(2025, 12, 31)`

Result: ₹12/31/2025

Year End 2025:

`Year End = DATE(2025, 12, 31)`

REAL USAGE:

- Create fixed dates
 - Set benchmarks
 - Period boundaries
-

3 | 3 DATEDIFF() - DAYS BETWEEN DATES

SYNTAX:

`DATEDIFF(<date1>, <date2>, <interval>)`

PARAMETERS:

- `<date1>, <date2>`: Dates to compare
- `<interval>`: Unit (DAY, MONTH, YEAR, QUARTER, WEEK, HOUR, MINUTE, SECOND)

EXAMPLE FROM YOUR DATASET:

Days Between Order and Today (Calculated Column):

`Days to Delivery = DATEDIFF(SalesData[OrderDate], TODAY(), DAY)`

Result: Number of days since order

Months Since Order (Calculated Column):

`Months Old = DATEDIFF(SalesData[OrderDate], TODAY(), MONTH)`

Result:

- Order 2 months ago = 2
- Order 5 months ago = 5

REAL USAGE:

- Calculate delivery time
- Measure period gaps
- Age calculations

3 | 4 EDATE() - ADD MONTHS TO DATE

SYNTAX:

`EDATE(<start_date>, <months>)`

PARAMETERS:

- `<start_date>`: Starting date
- `<months>`: Number of months to add (negative to subtract)

EXAMPLE FROM YOUR DATASET:

Next Month From Order (Calculated Column):

`Next Month Review = EDATE(SalesData[OrderDate], 1)`

Result: Adds 1 month to order date

- 2023-01-15 → 2023-02-15

3 Months from Order (Calculated Column):

`Review Date = EDATE(SalesData[OrderDate], 3)`

12 Months Ago (Calculated Column):

`Year Ago Date = EDATE(TODAY(), -12)`

REAL USAGE:

- Calculate future dates
- Warranty expiry
- Review schedules

3 | 5 EOMONTH() - END OF MONTH

SYNTAX:

`EOMONTH(<start_date>, <months>)`

PARAMETERS:

- <start_date>: Starting date
- <months>: Months to offset (0 = same month, 1 = next month)

EXAMPLE FROM YOUR DATASET:

Month End for Order (Calculated Column):

```
Month End = EOMONTH(SalesData[OrderDate], 0)
```

Result: Last day of the month

- 2023-01-15 → 2023-01-31
- 2023-02-10 → 2023-02-28

Next Month End (Calculated Column):

```
Next Month End = EOMONTH(SalesData[OrderDate], 1)
```

REAL USAGE:

- Month-end reporting
- Period calculations
- Billing cycles

3 | 6 | YEAR() / MONTH() / DAY() - EXTRACT DATE PARTS

SYNTAX:

```
YEAR(<date>)
MONTH(<date>)
DAY(<date>)
```

PARAMETERS:

- <date>: Date to extract from

EXAMPLE FROM YOUR DATASET:

Extract Year (Calculated Column):

```
Order Year = YEAR(SalesData[OrderDate])
```

Result: 2023, 2024, 2025

Extract Month (Calculated Column):

```
Order Month = MONTH(SalesData[OrderDate])
```

Result: 1, 2, 3... 12

Extract Day (Calculated Column):

```
Order Day = DAY(SalesData[OrderDate])
```

Result: 1, 2, 3... 31

Combined: Year-Month (Calculated Column):

```
Year Month = YEAR(SalesData[OrderDate]) & "-" & MONTH(SalesData[OrderDate])
```

Result: "2023-01", "2023-02", etc.

REAL USAGE:

- Group by year/month/day
- Seasonal analysis
- Date decomposition

3 | 7 | QUARTER() - GET QUARTER

SYNTAX:

QUARTER(<date>)

PARAMETERS:

- <date>: Date to extract quarter from

EXAMPLE FROM YOUR DATASET:

Order Quarter (Calculated Column):

Order Quarter = QUARTER(SalesData[OrderDate])

Result: 1, 2, 3, 4

- Jan-Mar → Q1
- Apr-Jun → Q2
- Jul-Sep → Q3
- Oct-Dec → Q4

Quarter Label (Calculated Column):

Quarter Label = "Q" & QUARTER(SalesData[OrderDate])

Result: Q1, Q2, Q3, Q4

REAL USAGE:

- Quarterly reporting
 - Financial analysis
 - Trend grouping
-

3 | 8 WEEKDAY() - DAY OF WEEK

SYNTAX:

WEEKDAY(<date>, [return_type])

PARAMETERS:

- <date>: Date to check
- <return_type>: 1=Sunday-Saturday, 2=Monday-Sunday, 3=Monday=0

EXAMPLE FROM YOUR DATASET:

Day of Week Number (Calculated Column):

Day Number = WEEKDAY(SalesData[OrderDate], 1)

Result: 1-7 (1=Sunday, 7=Saturday)

Is Weekend (Calculated Column):

Is Weekend = IF(WEEKDAY(SalesData[OrderDate]) > 5, "Weekend", "Weekday")

Result: "Weekend" for Saturday/Sunday, "Weekday" otherwise

REAL USAGE:

- Weekend vs weekday analysis
 - Day-based patterns
 - Weekend orders tracking
-

3 | 9 DATESYTD() / DATESQTD() / DATESMTD() - TIME INTELLIGENCE

SYNTAX:

```
DATESYTD(<dates>, [year_end_date])      - Year to date  
DATESQTD(<dates>, [quarter_end_date])    - Quarter to date  
DATESMTD(<dates>, [month_end_date])       - Month to date
```

PARAMETERS:

- <dates>: Date column from Date Table
- <year_end_date>: Year ending date (optional, default Dec 31)

EXAMPLE FROM YOUR DATASET:

Year-to-Date Sales (Calculated Measure):

```
YTD Sales = CALCULATE(SUM(SalesData[FinalAmount]), DATESYTD(DateTable[Date]))
```

Result: Sum of sales from Jan 1 to today

- As of Dec 7, 2025: ₹12,500,000 (cumulative)

Quarter-to-Date Sales (Calculated Measure):

```
QTD Sales = CALCULATE(SUM(SalesData[FinalAmount]), DATESQTD(DateTable[Date]))
```

Result: Sum of sales from Q start to today

Month-to-Date Sales (Calculated Measure):

```
MTD Sales = CALCULATE(SUM(SalesData[FinalAmount]), DATESMTD(DateTable[Date]))
```

Result: Sum of sales from month 1st to today

REAL USAGE:

- Track year-to-date progress
- Monitor quarterly performance
- Monthly targets vs actual
- REQUIRES DATE TABLE!

4 0 DATEADD() - ADD PERIODS TO DATE

SYNTAX:

```
DATEADD(<dates>, <number>, <interval>)
```

PARAMETERS:

- <dates>: Date column
- <number>: Number to add (negative to subtract)
- <interval>: Unit (DAY, MONTH, QUARTER, YEAR)

EXAMPLE FROM YOUR DATASET:

Same Month Last Year (Calculated Measure):

```
Sales Last Year Same Month = CALCULATE(SUM(SalesData[FinalAmount]),  
DATEADD(DateTable[Date], -12, MONTH))
```

Result: Sales from December last year

Used for Year-over-Year comparison

Previous Quarter (Calculated Measure):

```
Sales Last Quarter = CALCULATE(SUM(SalesData[FinalAmount]),  
DATEADD(DateTable[Date], -1, QUARTER))
```

Last 30 Days (Calculated Measure):

```
Sales Last 30 Days = CALCULATE(SUM(SalesData[FinalAmount]),  
DATEADD(DateTable[Date], -30, DAY))
```

REAL USAGE:

- Year-over-year comparisons

- Period-to-period analysis
- Historical trends
- REQUIRES DATE TABLE!