

COALESCE Function

Function returns the first non-missing value found in an array of columns.

The order of the columns listed in the function determines the order in which they are searched.

- If you need to perform analysis across multiple columns of heterogeneous data, see *Analyze across Multiple Columns*.
- If you need to perform analysis across multiple homogeneous columns, see *Calculate Metrics across Columns*.

Basic Usage

```
derive type:single value: COALESCE([col1,col2,col3]) as: 'firstValue'
```

Output: Generates the `firstValue` column, which contains the first non-missing detected in `col1`, `col2`, or `col3` in that order.

Syntax and Arguments

```
derive type:single value: COALESCE([col_ref1,col_ref2, col_ref3])
```

A reference to a single column does not require brackets. References to multiple columns must be passed to the function as an array of column names.

Argument	Required?	Data Type	Description
col_ref1	Y	string	Name of the first column to find the first non-missing value
col_ref2	N	string	Name of the second column to find the first non-missing value
col_ref3	N	string	Name of the third column to find the first non-missing value

For more information on syntax standards, see *Language Documentation Syntax Notes*.

col_ref1, col_ref2, col_ref3

Name of the column(s) searched for the first non-missing value.

Usage Notes:

Required?	Data Type	Example Value
Yes	String (column reference)	[myColumn1, myColumn2]

Examples

Tip: For additional examples, see *Common Tasks*.

Example - Find first time

You are tracking multiple racers across multiple heats. Racers might sit out heats for various reasons.

Source:

Here's the race data.

Racer	Heat1	Heat2	Heat3
Racer X		38.22	37.61
Racer Y	41.33		38.04
Racer Z	39.27	39.04	38.85

Transform:

Use the following transform to grab the first non-missing value from the Heat columns:

```
derive type:single value:COALESCE([Heat1, Heat2, Heat3]) as:'firstTime'
```

Results:

Racer	Heat1	Heat2	Heat3	firstTime
Racer X		38.22	37.61	38.22
Racer Y	41.33		38.04	41.33
Racer Z	39.27	39.04	38.85	39.27