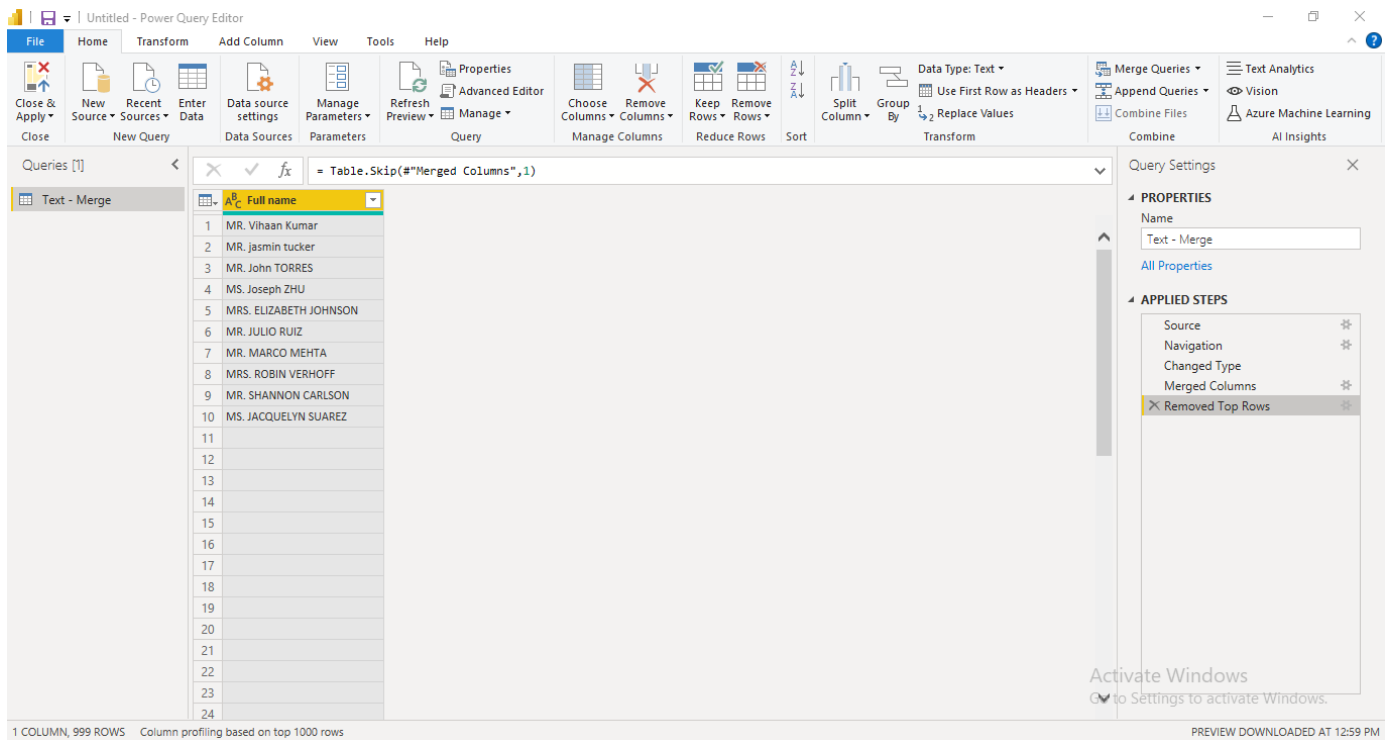


POWER QUERY WRAP UP

TEXT FUNCTIONS IN POWER BI (POWER QUERY)

1. Merge columns

I extracted the data from excel file in Power Bi and chose to transform it before loading. Since there were three different columns: Prefix, First Name, and Last Name, I merged them all into one as Full name. I also removed the first row because it was the headers of the previous data i.e., it said Prefix FirstName LastName.



2. Split & Trim Text in Power BI

In our data, column A – Shipping address has messy data. For instance city, state, and place are all merged together but I want to split them all. Also, some rows even have empty spaces or white spaces, so we need to transform our data.

Untitled - Power Query Editor

File Home Transform Add Column View Tools Help

Close & Apply New Source Recent Sources Enter Data Data source settings Data Sources Manage Parameters Refresh Preview Advanced Editor Choose Columns Remove Columns Keep Rows Remove Rows Split Column Group By Data Type: Text Use First Row as Headers Replace Values Merge Queries Append Queries Combine Files Text Analytics Vision Azure Machine Learning

Queries [1] `= Table.TransformColumnTypes(#"Promoted Headers",{{"Shipping Address", type text}, {"Sales", Int64.Type}})`

Text - Split and Trim

	A ^B C Shipping Address	1 ² 3 Sales
1	Pimpri,Pune, Maharashtra	642
2	Dhayri,Pune,Maharashtra	191
3	Faizabad, Lucknow, Uttar Pradesh	547
4	Berhampur, Berhampur, Odisha	779
5	Shrirampur, Pune, Maharashtra	544
6	Tehri, Dehradun, Uttarakhand	868
7	Maheana, Ahmedabad, Gujarat	912
8	Tonk, Ajmer, Rajasthan	688
9	Khandwa, Indore, Madhya Pradesh	570
10	Anakapalle, Visakhapatnam, Andhra Pradesh	650
11	null	null
12	null	null
13	null	null
14	null	null
15	null	null
16	null	null
17	null	null
18	null	null
19	null	null
20	null	null
21	null	null
22	null	null
23	null	null
24	null	null

2 COLUMNS, 999 ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 10:35 AM

Query Settings

PROPERTIES

Name

Text - Split and Trim

APPLIED STEPS

Source

Navigation

Promoted Headers

Changed Type

Activate Windows

Go to Settings to activate Windows.

Untitled - Power Query Editor

File Home Transform Add Column View Tools Help

Group By Use First Row as Headers Transpose Reverse Rows Detect Data Type Rename Pivot Column Unpivot Columns Split Column Format Merge Columns Statistics Standard Scientific Trigonometry Date Time Duration Run R script Run Python script

Queries [1] `= Table.RenameColumns(#"Changed Type1",{{"Shipping Address.1", "Place"}, {"Shipping Address.2", "City"}, {"Shipping Address.3", "State"}}`

Text - Split and Trim

	A ^B C Place	A ^B C City	A ^B C State	1 ² 3 Sales
1	Pimpri	Pune	Maharashtra	642
2	Dhayri	Pune	Maharashtra	191
3	Faizabad	Lucknow	Uttar Pradesh	547
4	Berhampur	Berhampur	Odisha	779
5	Shrirampur	Pune	Maharashtra	544
6	Tehri	Dehradun	Uttarakhand	868
7	Maheana	Ahmedabad	Gujarat	912
8	Tonk	Ajmer	Rajasthan	688
9	Khandwa	Indore	Madhya Pradesh	570
10	Anakapalle	Visakhapatnam	Andhra Pradesh	650
11	null	null	null	null
12	null	null	null	null
13	null	null	null	null
14	null	null	null	null
15	null	null	null	null
16	null	null	null	null
17	null	null	null	null
18	null	null	null	null
19	null	null	null	null
20	null	null	null	null
21	null	null	null	null
22	null	null	null	null
23	null	null	null	null
24	null	null	null	null

4 COLUMNS, 999 ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 10:35 AM

Query Settings

PROPERTIES

Name

Text - Split and Trim

APPLIED STEPS

Source

Navigation

Promoted Headers

Changed Type

Split Column by Delimiter

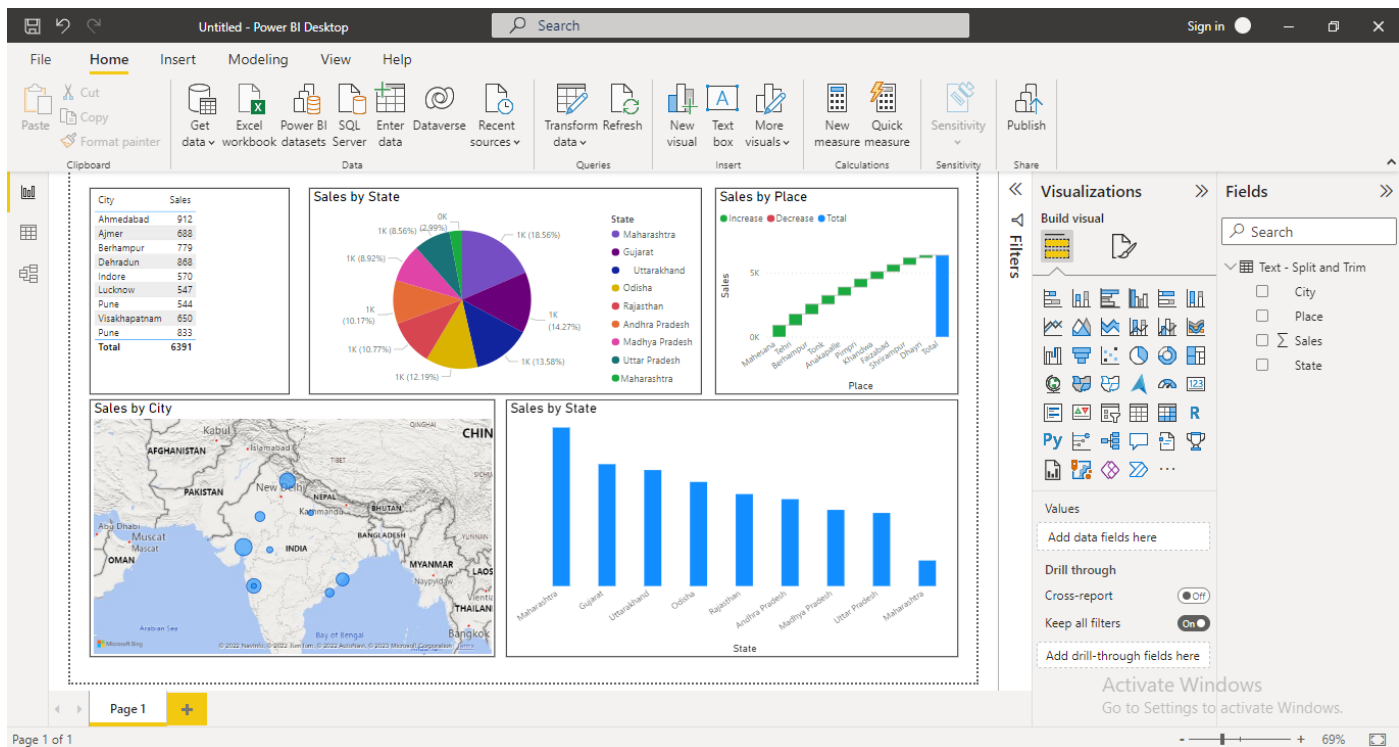
Changed Type1

Renamed Columns

Activate Windows

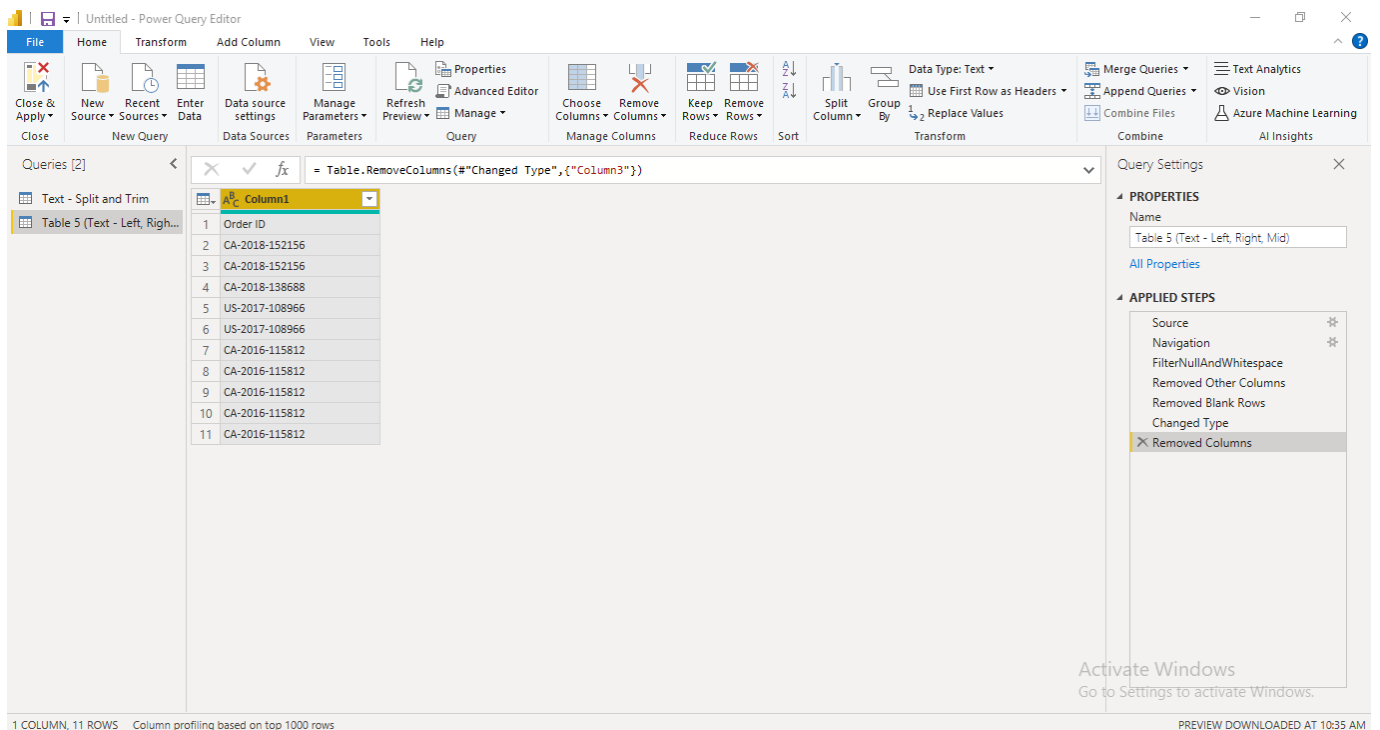
Go to Settings to activate Windows.

Below are some of the analysis we can make using our data:



3. Left, Right, & Mid Function

Here, in this exercise, we will explore how to extract right, left or middle characters. Below is our raw data:



Untitled - Power Query Editor

File Home Transform Add Column View Tools Help

Column From Custom Examples Column Invoke Custom Function Duplicate Column

General

Format ABC 123 Extract Parse From Text

Statistics Standard Scientific Rounding Information

From Number

Trigonometry

Date Time Duration From Date & Time

Text Analytics Vision Azure Machine Learning AI Insights

Queries [2]

Text - Split and Trim

Table 5 (Text - Left, Right, Mid)

fx = Table.AddColumn(#"Inserted Last Characters", "Text Range", each Text.Middle([Column1], 3, 4), type text)

Column1	First Characters	Last Characters	Text Range
Order ID	Or	der ID	er I
CA-2018-152156	CA	152156	2018
CA-2018-152156	CA	152156	2018
CA-2018-138688	CA	138688	2018
US-2017-108966	US	108966	2017
US-2017-108966	US	108966	2017
CA-2016-115812	CA	115812	2016
CA-2016-115812	CA	115812	2016
CA-2016-115812	CA	115812	2016
CA-2016-115812	CA	115812	2016
CA-2016-115812	CA	115812	2016

Query Settings

PROPERTIES

Name

Table 5 (Text - Left, Right, Mid)

All Properties

APPLIED STEPS

Source

Navigation

FilterNullAndWhitespace

Removed Other Columns

Removed Blank Rows

Changed Type

Removed Columns

Inserted First Characters

Inserted Last Characters

Inserted Text Range

Activate Windows

Go to Settings to activate Windows.

4 COLUMNS, 11 ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 10:35 AM

That was simple, but how do I extract the text when the dataset have delimiters like shown below?

Untitled - Power Query Editor

File Home Transform Add Column View Tools Help

Column From Custom Examples Column Invoke Custom Function Duplicate Column

General

Format ABC 123 Extract Parse From Text

Statistics Standard Scientific Rounding Information

From Number

Trigonometry

Date Time Duration From Date & Time

Text Analytics Vision Azure Machine Learning AI Insights

Queries [2]

Text - Split and Trim

Table 5 (Text - Left, Right, Mid)

fx = Table.TransformColumnTypes(#"Removed Blank Rows",{{"Column1", type text}, {"Column3", type text}})

Column1	Column3
Order ID	Text with Delimiters
CA-2018-152156	Mr#Vihaan@Kumar
CA-2018-152156	Mr#Pavan@Lalwani
CA-2018-138688	Mr#John@TORRES
US-2017-108966	Ms#Joseph@ZHU
US-2017-108966	Mrs#ELIZABETH@JOHNSON
CA-2016-115812	Mr#JULIO@RUIZ
CA-2016-115812	Mr#MARCO@MEHTA
CA-2016-115812	Mrs#ROBIN@VERHOFF
CA-2016-115812	Mr#SHANNON@CARLSON
CA-2016-115812	Ms#JACQUELYN@SUAREZ

Query Settings

PROPERTIES

Name

Table 5 (Text - Left, Right, Mid)

All Properties

APPLIED STEPS

Source

Navigation

FilterNullAndWhitespace

Removed Other Columns

Removed Blank Rows

Changed Type

Removed Columns

Inserted First Characters

Inserted Last Characters

Inserted Text Range

Activate Windows

Go to Settings to activate Windows.

2 COLUMNS, 11 ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 10:35 AM

Untitled - Power Query Editor

File Home Transform Add Column View Tools Help

Column From Custom Invoke Custom Examples Column Function General

Conditional Column Index Column Duplicate Column

Format Parse From Text

Merge Columns Extract

Statistics Standard Scientific Trigonometry Rounding Information

Date Time Duration From Date & Time

Text Analytics Vision Azure Machine Learning AI Insights

Queries [2]

Text - Split and Trim

Table 5 (Text - Left, Right, Mid)

fx = Table.ReorderColumns(#"Inserted Text Between Delimiters",{"Order ID", "Text with Delimiters", "Text Before", "Text Between Delimiters", "Text After Delimiter"})

Order ID	Text with Delimiters	Text Before Delimiter	Text Between Delimiters	Text After Delimiter
1	CA-2018-152156	Mr#Vihaan@Kumar	Mr	Vihaan Kumar
2	CA-2018-152156	Mr#Pavan@Lalwani	Mr	Pavan Lalwani
3	CA-2018-138688	Mr#John@TORRES	Mr	John TORRES
4	US-2017-108966	Ms#Joseph@ZHU	Ms	Joseph ZHU
5	US-2017-108966	Mrs#ELIZABETH@JOHNSON	Mrs	ELIZABETH JOHNSON
6	CA-2016-115812	Mr#JULIO@RUIZ	Mr	JULIO RUIZ
7	CA-2016-115812	Mr#MARCO@MEHTA	Mr	MARCO MEHTA
8	CA-2016-115812	Mrs#ROBIN@VERHOFF	Mrs	ROBIN VERHOFF
9	CA-2016-115812	Mr#SHANNON@CARLSON	Mr	SHANNON CARLSON
10	CA-2016-115812	Ms#JACQUELYN@SUAREZ	Ms	JACQUELYN SUAREZ

Query Settings

PROPERTIES

Name

Table 5 (Text - Left, Right, Mid)

APPLIED STEPS

- Source
- Navigation
- FilterNullAndWhitespace
- Removed Other Columns
- Removed Blank Rows
- Changed Type
- Promoted Headers
- Changed Type1
- Inserted Text Before Delimiter
- Inserted Text After Delimiter
- Inserted Text Between Delimit...
- Reordered Columns

5 COLUMNS, 10 ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 10:35 AM

4. Upper, lower & Proper Case

I got a distorted data as shown below:

Untitled - Power Query Editor

File Home Transform Add Column View Tools Help

Group Use First Row as Headers Count Rows

Transpose Reverse Rows

Data Type: Text Replace Values Fill Unpivot Columns Move

Detect Data Type Rename Pivot Column Convert to List

Any Column

Split Column

Format Parse

Merge Columns Extract

Statistics Standard Scientific Trigonometry Rounding Information

Date Time Duration From Date & Time

Run R script Run Python script

Scripts

Queries [3]

Text - Split and Trim

Table 5 (Text - Left, Right, Mid)

Text- Upper,Lower,Proper

fx = Table.TransformColumnTypes(#"Text- Upper,Lower,Proper_Sheet",{"Column1", type text}, {"Column2", type text})

Column1	Column2	Column3
1	Prefix	FirstName LastName
2	MR.	VihAAN KumaR
3	MR.	Pavan Lalwani
4	MR.	Amit BadanAA
5	MS.	Joseph ZHUaan
6	MRS.	ELIZABETH JOHNSON
7	MR.	JuLLiooo RUIZ
8	MR.	MARCO MEHTAJi
9	MRS.	ROBIN VERHOFF
10	MR.	DinchAKK PoolJA
11	MS.	JACQUELYN SUAREZ
12	null	null null
13	null	null null
14	null	null null
15	null	null null
16	null	null null
17	null	null null
18	null	null null
19	null	null null
20	null	null null
21	null	null null
22	null	null null
23	null	null null
24	null	null null

Query Settings

PROPERTIES

Name

Text- Upper,Lower,Proper

APPLIED STEPS

- Source
- Navigation
- Changed Type

3 COLUMNS, 999+ ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 10:35 AM

The screenshot displays the Microsoft Power Query Editor. The ribbon at the top includes 'File', 'Home', 'Transform', 'Add Column', 'View', 'Tools', and 'Help'. The 'Queries' pane on the left shows three queries: 'Text - Split and Trim', 'Table 5 (Text - Left, Right, Middle)', and 'Text - Upper, Lower, Proper'. The main area shows a table with columns 'Prefix', 'FirstName', and 'LastName'. The 'Query Settings' pane on the right shows the 'APPLIED STEPS' list, with 'Capitalized Each Word' selected.

Prefix	FirstName	LastName
1 MR.	Vihaan	Kumar
2 MR.	Pavan	Lalwani
3 MR.	Amit	Badanaa
4 MS.	Joseph	Zhuasan
5 MRS.	Elizabeth	Johnson
6 MR.	Julliooo	Ruiz
7 MR.	Marco	Mehtaji
8 MRS.	Robin	Verhoff
9 MR.	Dinchakk	Pooja
10 MS.	Jacquelyn	Suarez
11	null	null
12	null	null
13	null	null
14	null	null
15	null	null
16	null	null
17	null	null
18	null	null
19	null	null
20	null	null
21	null	null
22	null	null
23	null	null
24	null	null

We can find out Year, Quarter, Month & Day from our date column:

We can find out Year, Quarter, Month & Day from our date column:

Untitled - Power Query Editor

File Home Transform Add Column View Tools Help

Column From Examples Custom Column Invoke Custom Function General Conditional Column Index Column Duplicate Column Format ABC 123 Extract Parse From Text Statistics Standard Scientific 10² Trigonometry Rounding From Number Date Time Duration From Date & Time Text Analytics Vision Azure Machine Learning AI Insights

Queries [8]

- Text - Split and Trim
- Table 5 (Text - Left, Right, Middle)
- Text- Upper,Lower,Proper
- Blad2
- Blad4
- Blad5
- Table 7 (Blad2)
- Table 8 (Blad4)

fx = Table.AddColumn(#"Removed Columns1", "Day", each Date.Day([Date]), Int64.Type)

	Date	Year	Quarter	Month	Day
1	6/6/1988	1988	2	6	6
2	12/4/1977	1977	4	12	4
3	9/23/1985	1985	3	9	23
4	11/24/1982	1982	4	11	24
5	umar 2/5/1990	1990	1	2	5
6	ara 1/25/1988	1988	1	1	25
7	8/7/1992	1992	3	8	7
8	6/1/1985	1985	2	6	1
9	10/13/1993	1993	4	10	13
10	10/11/1993	1993	4	10	11

Query Settings

PROPERTIES

Name: Table 7 (Blad2)

APPLIED STEPS

- Source
- Navigation
- Removed Top Rows
- Changed Type
- Renamed Columns
- Inserted Year
- Inserted Quarter
- Inserted Month
- Inserted Week of Year
- Inserted Day
- Removed Columns
- Inserted Day of Year
- Removed Columns1
- Inserted Day1

Activate Windows
Go to Settings to activate Windows.

6 COLUMNS, 10 ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 11:48 AM

We can also find out the Month and Day Name just by a few clicks:

Untitled - Power Query Editor

File Home Transform Add Column View Tools Help

Column From Examples Custom Column Invoke Custom Function General Conditional Column Index Column Duplicate Column Format ABC 123 Extract Parse From Text Statistics Standard Scientific 10² Trigonometry Rounding From Number Date Time Duration From Date & Time Text Analytics Vision Azure Machine Learning AI Insights

Queries [9]

- Text - Split and Trim
- Table 5 (Text - Left, Right, Middle)
- Text- Upper,Lower,Proper
- Blad2
- Blad4
- Blad5
- Table 7 (Blad2)
- Table 8 (Blad4)
- Order Data

fx = Table.AddColumn(#"Inserted Day Name", "Month Name", each Date.MonthName([Date]), type text)

	Column1	Date	Day Name	Month Name
1	Ajinkya Rahane	6/6/1988	Monday	June
2	Ajit Agarkar	12/4/1977	Sunday	December
3	Ambati Rayudu	9/23/1985	Monday	September
4	Amit Mishra	11/24/1982	Wednesday	November
5	Bhuvneshwar Kumar	2/5/1990	Monday	February
6	Cheteshwar Pujara	1/25/1988	Monday	January
7	Deepak Chahar	8/7/1992	Friday	August
8	Dinesh Karthik	6/1/1985	Saturday	June
9	Hanuma Vihari	10/13/1993	Wednesday	October
10	Hardik Pandya	10/11/1993	Monday	October

Query Settings

PROPERTIES

Name: Table 7 (Blad2)

APPLIED STEPS

- Source
- Navigation
- Removed Top Rows
- Changed Type
- Renamed Columns
- Inserted Year
- Inserted Quarter
- Inserted Month
- Inserted Week of Year
- Inserted Day
- Removed Columns
- Inserted Day of Year
- Removed Columns1
- Inserted Day1
- Removed Columns2
- Inserted Day Name
- Inserted Month Name

Activate Windows
Go to Settings to activate Windows.

4 COLUMNS, 10 ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 11:48 AM

If we have two date columns, we can subtract them, find the earliest and latest dates in each rows, too:

Untitled - Power Query Editor

File Home Transform Add Column View Tools Help

Column From Examples Custom Column Invoke Custom Function General Conditional Column Index Column Duplicate Column

Format ABC 123 Extract Parse From Text Merge Columns Statistics Standard Scientific 10² Trigonometry Rounding Information From Number Date Time Duration From Date & Time Text Analytics Vision Azure Machine Learning AI Insights

Queries [11]

Text - Split and Trim
Table 5 (Text - Left, Right, Middle)
Text - Upper, Lower, Proper
Blad2
Blad4
Blad5
Table 7 (Blad2)
Table 8 (Blad4)
Order Data
Date and Time
Date - Difference

fx = Table.AddColumn(#"Inserted Earliest", "Latest", each List.Max({[Date2], [Date1]}), type date)

	Date1	Date2	Subtraction	Earliest	Latest
1	3/10/2019	3/30/2019	20	3/10/2019	3/30/2019
2	3/11/2019	3/31/2019	20	3/11/2019	3/31/2019
3	3/12/2019	4/1/2019	20	3/12/2019	4/1/2019
4	3/13/2019	4/2/2019	20	3/13/2019	4/2/2019
5	3/14/2019	3/3/2019	-11	3/3/2019	3/14/2019
6	3/11/2020	3/31/2020	20	3/11/2020	3/31/2020
7	3/12/2020	3/1/2020	-11	3/1/2020	3/12/2020
8	3/13/2020	4/2/2020	20	3/13/2020	4/2/2020
9	3/14/2020	4/3/2020	20	3/14/2020	4/3/2020
10	2/21/2020	2/12/2020	-9	2/12/2020	2/21/2020

Query Settings

PROPERTIES

Name
Date - Difference

APPLIED STEPS

- Source
- Navigation
- Promoted Headers
- Changed Type
- Removed Columns
- Filtered Rows
- Inserted Date Subtraction
- Inserted Earliest
- Inserted Latest

Activate Windows
Go to Settings to activate Windows.

5 COLUMNS, 10 ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 11:48 AM

Suppose we have a column with both dates and time as shown below, but we want them in separate columns. We can also extract Date and Time in Power BI (Power Query).

Untitled - Power Query Editor

File Home Transform Add Column View Tools Help

Column From Examples Custom Column Invoke Custom Function General Conditional Column Index Column Duplicate Column

Format ABC 123 Extract Parse From Text Merge Columns Statistics Standard Scientific 10² Trigonometry Rounding Information From Number Date Time Duration From Date & Time Text Analytics Vision Azure Machine Learning AI Insights

Queries [11]

Text - Split and Trim
Table 5 (Text - Left, Right, Middle)
Text - Upper, Lower, Proper
Blad2
Blad4
Blad5
Table 7 (Blad2)
Table 8 (Blad4)
Order Data
Date and Time
Date - Difference

fx = Table.SelectRows(#"Changed Type", each ([Column1] <> null))

	Column1	Column2
1	Trx10001	9/25/2019 5:54:00 AM
2	Trx10002	9/25/2019 7:10:00 AM
3	Trx10003	9/25/2019 7:01:00 AM
4	Trx10004	9/25/2019 12:50:00 AM
5	Trx10005	9/25/2019 4:55:00 AM
6	Trx10006	9/25/2019 12:18:00 AM
7	Trx10007	9/25/2019 1:43:00 AM
8	Trx10008	9/25/2019 12:01:00 AM
9	Trx10009	9/25/2019 6:01:00 AM
10	Trx10010	9/25/2019 4:19:00 AM

Query Settings

PROPERTIES

Name
Date and Time

APPLIED STEPS

- Source
- Navigation
- Changed Type
- Filtered Rows

Activate Windows
Go to Settings to activate Windows.

2 COLUMNS, 10 ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 11:48 AM

Untitled - Power Query Editor

File Home Transform Add Column View Tools Help

Column From Custom Examples Column Invoke Custom Function General Conditional Column Index Column Duplicate Column Format ABC 123 Extract Parse From Text From Number From Date & Time Date Time Duration Text Analytics Vision Azure Machine Learning

Queries [11]

Text - Split and Trim
Table 5 (Text - Left, Right, Middle)
Text- Upper, Lower, Proper
Blad2
Blad4
Blad5
Table 7 (Blad2)
Table 8 (Blad4)
Order Data
Date and Time
Date - Difference

fx = Table.AddColumn(#"Inserted Date", "Time", each DateTime.Time([Column2]), type time)

	Column1	Column2	Date	Time
1	Trx10001	9/25/2019 5:54:00 AM	9/25/2019	5:54:00 AM
2	Trx10002	9/25/2019 7:10:00 AM	9/25/2019	7:10:00 AM
3	Trx10003	9/25/2019 7:01:00 AM	9/25/2019	7:01:00 AM
4	Trx10004	9/25/2019 12:50:00 AM	9/25/2019	12:50:00 AM
5	Trx10005	9/25/2019 4:55:00 AM	9/25/2019	4:55:00 AM
6	Trx10006	9/25/2019 12:18:00 AM	9/25/2019	12:18:00 AM
7	Trx10007	9/25/2019 1:43:00 AM	9/25/2019	1:43:00 AM
8	Trx10008	9/25/2019 12:01:00 AM	9/25/2019	12:01:00 AM
9	Trx10009	9/25/2019 6:01:00 AM	9/25/2019	6:01:00 AM
10	Trx10010	9/25/2019 4:19:00 AM	9/25/2019	4:19:00 AM

Query Settings

PROPERTIES

Name
Date and Time

APPLIED STEPS

Source
Navigation
Changed Type
Filtered Rows
Inserted Date
X Inserted Time

Activate Windows
Go to Settings to activate Windows.

4 COLUMNS, 10 ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 11:48 AM

Lastly, from date of birth, we can calculate age of a person:

Untitled - Power Query Editor

File Home Transform Add Column View Tools Help

Column From Custom Examples Column Invoke Custom Function General Conditional Column Index Column Duplicate Column Format ABC 123 Extract Parse From Text From Number From Date & Time Date Time Duration Text Analytics Vision Azure Machine Learning

Queries [11]

Text - Split and Trim
Table 5 (Text - Left, Right, Middle)
Text- Upper, Lower, Proper
Blad2
Blad4
Blad5
Table 7 (Blad2)
Table 8 (Blad4)
Order Data
Date and Time
Date - Difference

fx = Table.RemoveColumns(#"Changed Type1", {"Age"})

	Cricketers Players Name	Date Of Birth	Total Years
1	Ajinkya Rahane	6/6/1988	35
2	Ajit Agarkar	12/4/1977	45
3	Ambati Rayudu	9/23/1985	37
4	Amit Mishra	11/24/1982	40
5	Bhuvneshwar Kumar	2/5/1990	33
6	Cheteshwar Pujara	1/25/1988	35
7	Deepak Chahar	8/7/1992	31
8	Dinesh Karthik	6/1/1985	38
9	Hanuma Vihari	10/13/1993	29
10	Hardik Pandya	10/11/1993	29

Query Settings

PROPERTIES

Name
Blad2

APPLIED STEPS

Source
Navigation
Promoted Headers
Changed Type
Inserted Age
Inserted Total Years
Changed Type1
X Removed Columns

Activate Windows
Go to Settings to activate Windows.

3 COLUMNS, 10 ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 11:48 AM

NUMBER FUNCTIONS IN POWER BI (POWER QUERY)

Here is the raw data:

Untitled - Power Query Editor

File Home Transform Add Column View Tools Help

Close & Apply New Source Recent Sources Enter Data Data source settings Manage Parameters Refresh Preview Properties Advanced Editor Choose Columns Remove Columns Keep Rows Remove Rows Sort Split Column Group By Data Type: Text Use First Row as Headers Replace Values Merge Queries Append Queries Combine Files Text Analytics Vision Azure Machine Learning

Queries [12]

Table 5 (Text - Left, Right, Top, Bottom) Text - Upper, Lower, Proper Blad2 Blad4 Blad5 Table 7 (Blad2) Table 8 (Blad4) Order Data Date and Time Date - Difference NumberTable

Table.TransformColumnTypes(NumberTable_Table,{{"Product Name", type text}, {"Sales", type number}, {"Quantity", type number}, {"Discount", type number}, {"Profit", type number}})

	Product Name	Sales	Quantity	Discount	Profit
1	Bush	10000	2	0.4	41.91361111
2	Hon	731.94	3	0	219.582
3	Self	14.62	2	0	6.8714
4	Bretford	957.5775	5	0.45	-383.031
5	Eldon	22.368	2	0.2	2.5164
6	Eldon	48.86	7	0	14.1694
7	Newell	7.28	4	0	1.9656
8	Mitel	907.152	6	0.2	90.7152
9	DXL	18.504	3	0.2	5.7825
10	Belkin	114.9	5	0	34.47

5 COLUMNS, 10 ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 1:18 PM

I want to calculate total sales, so I can utilize multiplication operation under numbers function. I chose sales, quantity, and discount columns and multiplied them. But since some of the rows in discount table had data = 0, we got the final multiplication answer also zero. So we changed a formula a bit and here is the result:

Untitled - Power Query Editor

File Home Transform Add Column View Tools Help

Column From Custom Examples Column Invoke Custom Function Duplicate Column Conditional Column Index Column Format Merge Columns Extract Statistics Standard Scientific Trigonometry Rounding Information Date Time Duration Text Analytics Vision Azure Machine Learning

Queries [12]

Table 5 (Text - Left, Right, Top, Bottom) Text - Upper, Lower, Proper Blad2 Blad4 Blad5 Table 7 (Blad2) Table 8 (Blad4) Order Data Date and Time Date - Difference NumberTable

Table.TransformColumnTypes(NumberTable_Table,{{"Product Name", type text}, {"Sales", type number}, {"Quantity", type number}, {"Discount", type number}, {"Profit", type number}})

Custom Column

Add a column that is computed from the other columns.

New column name: Multiplication

Custom column formula: = List.Product({[Sales], [Quantity], (1- [Discount])})

Available columns: Product Name, Sales, Quantity, Discount, Profit

Learn about Power Query formulas

✓ No syntax errors have been detected.

OK Cancel

Table.TransformColumnTypes(NumberTable_Table,{{"Product Name", type text}, {"Sales", type number}, {"Quantity", type number}, {"Discount", type number}, {"Profit", type number}, {"Multiplication", type number}})

	Product Name	Sales	Quantity	Discount	Profit	Multiplication
1	Bush	10000	2	0.4	41.91361111	8000
2	Hon	731.94	3	0	219.582	0
3	Self	14.62	2	0	6.8714	0
4	Bretford	957.5775	5	0.45	-383.031	154.549375
5	Eldon	22.368	2	0.2	2.5164	8.9472
6	Eldon	48.86	7	0	14.1694	0
7	Newell	7.28	4	0	1.9656	0
8	Mitel	907.152	6	0.2	90.7152	1088.5824
9	DXL	18.504	3	0.2	5.7825	11.1024
10	Belkin	114.9	5	0	34.47	0

6 COLUMNS, 10 ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 1:18 PM

Untitled - Power Query Editor

File Home Transform Add Column View Tools Help

Column From Custom Examples Column Invoke Custom Function General

Conditional Column Index Column Duplicate Column

Format Merge Columns Extract Parse From Text

Statistics Standard Scientific 10² Trigonometry Rounding Information From Number

Date Time Duration From Date & Time

Text Analytics Vision Azure Machine Learning AI Insights

Queries [12]

Text - Split and Trim

Table 5 (Text - Left, Right, Middle)

Text- Upper, Lower, Proper

Blad2

Blad4

Blad5

Table 7 (Blad2)

Table 8 (Blad4)

Order Data

Date and Time

Date - Difference

NumberTable

fx = Table.RenameColumns(#"Inserted Multiplication",{{"Multiplication", "Total Sales"}})

Line Item	1.2 Sales	1.2 Quantity	1.2 Discount	1.2 Profit	Total Sales
1	10000	2	0.4	41.91361111	12000
2	731.94	3	0	219.582	2195.82
3	14.62	2	0	6.8714	29.24
4	957.5775	5	0.45	-383.031	2633.338125
5	22.368	2	0.2	2.5164	35.7888
6	48.86	7	0	14.1694	342.02
7	7.28	4	0	1.9656	29.12
8	907.152	6	0.2	90.7152	4354.3296
9	18.504	3	0.2	5.7825	44.4096
10	114.9	5	0	34.47	574.5

Query Settings

PROPERTIES

Name

NumberTable

APPLIED STEPS

Source

Navigation

Changed Type

Inserted Multiplication

Renamed Columns

Activate Windows

Go to Settings to activate Windows.

6 COLUMNS, 10 ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 1:18 PM

If I want to calculate cost, I will subtract total sales and profit:

Untitled - Power Query Editor

File Home Transform Add Column View Tools Help

Column From Custom Examples Column Invoke Custom Function General

Conditional Column Index Column Duplicate Column

Format Merge Columns Extract Parse From Text

Statistics Standard Scientific 10² Trigonometry Rounding Information From Number

Date Time Duration From Date & Time

Text Analytics Vision Azure Machine Learning AI Insights

Queries [12]

Text - Split and Trim

Table 5 (Text - Left, Right, Middle)

Text- Upper, Lower, Proper

Blad2

Blad4

Blad5

Table 7 (Blad2)

Table 8 (Blad4)

Order Data

Date and Time

Date - Difference

NumberTable

fx = Table.RenameColumns(#"Inserted Subtraction",{{"Subtraction", "Cost"}})

Line Item	1.2 Quantity	1.2 Discount	1.2 Profit	Total Sales	Cost
1	10000	2	0.4	41.91361111	11958.08639
2	731.94	3	0	219.582	1976.238
3	14.62	2	0	6.8714	22.3686
4	957.5775	5	0.45	-383.031	3016.369125
5	22.368	2	0.2	2.5164	33.2724
6	48.86	7	0	14.1694	327.8506
7	7.28	4	0	1.9656	27.1544
8	907.152	6	0.2	90.7152	4263.6144
9	18.504	3	0.2	5.7825	38.6271
10	114.9	5	0	34.47	540.03

Query Settings

PROPERTIES

Name

NumberTable

APPLIED STEPS

Source

Navigation

Changed Type

Inserted Multiplication

Renamed Columns

Inserted Subtraction

Renamed Columns1

Activate Windows

Go to Settings to activate Windows.

7 COLUMNS, 10 ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 1:18 PM

Now, we can also find Percentage. For example, we calculated 10 percent of total sales:

Untitled - Power Query Editor

File Home Transform Add Column View Tools Help

Column From Custom Examples Column Invoke Custom Function General

Conditional Column Index Column Duplicate Column

Format Parse From Text

Merge Columns ABC 123 Extract

Statistics Standard Scientific From Number

Trigonometry Rounding Information

Date Time Duration From Date & Time

Text Analytics Vision Azure Machine Learning AI Insights

Queries [13]

Text - Split and Trim

Table 5 (Text - Left, Right)

Text - Upper, Lower, Proper

Blad2

Blad4

Blad5

Table 7 (Blad2)

Table 8 (Blad4)

Order Data

Date and Time

Date - Difference

NumberTable

number function part 2

fx = Table.AddColumn(#"Changed Type1", "Percentage", each [Total Sales] * 10 / 100, type number)

	1.2 Total Sales	1.2 Percentage
1	12000	1200
2	2196	219.6
3	29	2.9
4	2633	263.3
5	36	3.6
6	342	34.2
7	29	2.9
8	4354	435.4
9	44	4.4
10	574	57.4

Query Settings

PROPERTIES

Name

number function part 2

APPLIED STEPS

Source

Navigation

Changed Type

Inserted Multiplication

Renamed Columns

Inserted Subtraction

Renamed Columns1

Removed Other Columns

Changed Type1

Inserted Percentage

Activate Windows

Go to Settings to activate Windows.

2 COLUMNS, 10 ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 1:18 PM

We can also round our values, for example in the below picture, we rounded up, down and simply rounded values for the profits column:

Untitled - Power Query Editor

File Home Transform Add Column View Tools Help

Column From Custom Examples Column Invoke Custom Function General

Conditional Column Index Column Duplicate Column

Format Parse From Text

Merge Columns ABC 123 Extract

Statistics Standard Scientific From Number

Trigonometry Rounding Information

Date Time Duration From Date & Time

Text Analytics Vision Azure Machine Learning AI Insights

Queries [14]

Text - Split and Trim

Table 5 (Text - Left, Right)

Text - Upper, Lower, Proper

Blad2

Blad4

Blad5

Table 7 (Blad2)

Table 8 (Blad4)

Order Data

Date and Time

Date - Difference

NumberTable

number function part 2

rounding

fx = Table.AddColumn(#"Inserted Round Down", "Round", each Number.Round([Profit], 2), type number)

	1.2 Profit	1.2 Round Up	1.2 Round Down	1.2 Round
1	41.91361111	42	41	41.91
2	219.582	220	219	219.58
3	6.8714	7	6	6.87
4	-383.031	-383	-384	-383.03
5	2.5164	3	2	2.52
6	14.1694	15	14	14.17
7	1.9656	2	1	1.97
8	90.7152	91	90	90.72
9	5.7825	6	5	5.78
10	34.47	35	34	34.47

Query Settings

PROPERTIES

Name

rounding

APPLIED STEPS

Source

Navigation

Changed Type

Inserted Multiplication

Renamed Columns

Inserted Subtraction

Renamed Columns1

Inserted Round Up

Reordered Columns

Removed Columns

Removed Other Columns

Inserted Round Up1

Inserted Round Down

Inserted Rounding

Activate Windows

Go to Settings to activate Windows.

4 COLUMNS, 10 ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 1:18 PM

Lastly, we can also determine whether our values are even or odd and what is the sign (positive or negative).

Untitled - Power Query Editor

File Home Transform Add Column View Tools Help

Column From Custom Invoke Custom Examples Column Function Duplicate Column

Conditional Column Index Column

Format Merge Columns

Statistics Standard Scientific

Trigonometry Rounding Information

Date Time Duration

Text Analytics Vision Azure Machine Learning

Queries [15]

Text - Split and Trim

Table 5 (Text - Left, Right, Middle)

Text - Upper, Lower, Proper

Blad2

Blad4

Blad5

Table 7 (Blad2)

Table 8 (Blad4)

Order Data

Date and Time

Date - Difference

NumberTable

number function part 2

rounding

NumberTable (2)

fx = Table.AddColumn(#"Inserted Is Odd", "Sign", each Number.Sign([Profit]), Int64.Type)

	1,2 Profit	Is Even	Is Odd	Sign	
1	41.91361111	FALSE	TRUE	1	1
2	219.582	FALSE	TRUE	1	1
3	6.8714	TRUE	FALSE	1	1
4	-383.031	TRUE	FALSE	-1	-1
5	2.5164	TRUE	FALSE	1	1
6	14.1694	TRUE	FALSE	1	1
7	1.9656	FALSE	TRUE	1	1
8	90.7152	TRUE	FALSE	1	1
9	5.7825	FALSE	TRUE	1	1
10	34.47	TRUE	FALSE	1	1

Query Settings

PROPERTIES

Name

NumberTable (2)

APPLIED STEPS

Source

Navigation

Changed Type

Inserted Multiplication

Renamed Columns

Inserted Subtraction

Renamed Columns1

Inserted Round Up

Reordered Columns

Removed Columns

Removed Other Columns

Inserted Is Even

Inserted Is Odd

Inserted Sign

Activate Windows

Go to Settings to activate Windows.

4 COLUMNS, 10 ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 1:18 PM

By selecting only positive +1, we will get the values that are profits. And upon selecting negative -1, we will get the loss values.

Merge Files and Tables in Power BI

We can merge data from different excel workbooks. For example, here we have two different excel files that we wish to merge in Power BI.

Name	Date modified	Type	Size
(1) . Master Table	3/7/2023 1:18 PM	Microsoft Excel W...	10 KB
(2) Transactional Table	3/7/2023 1:19 PM	Microsoft Excel W...	11 KB

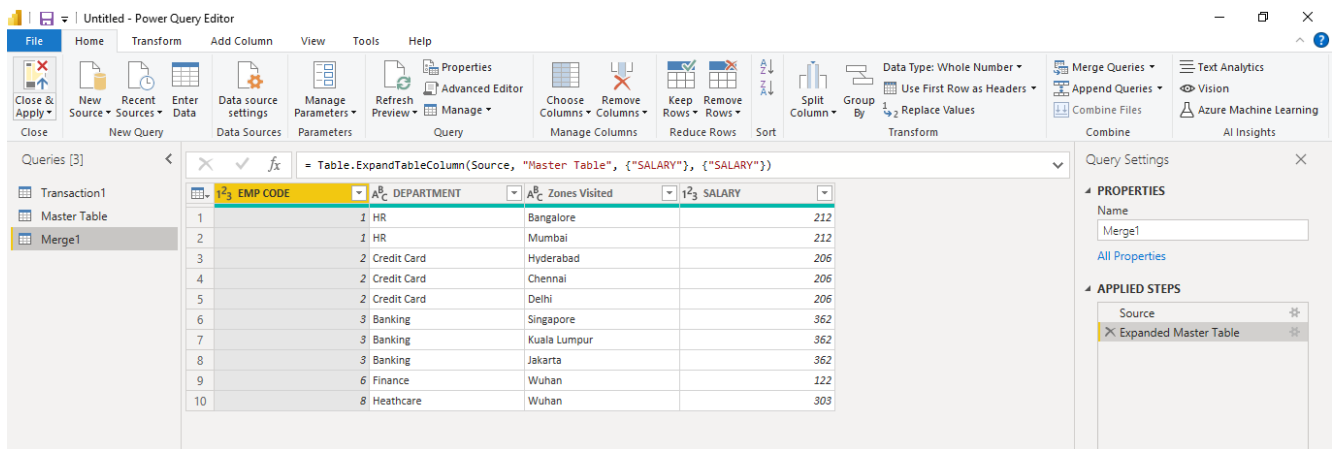
This is our Transaction table that we uploaded in Power Query:

= Table.TransformColumnTypes(Transaction1_Table,{{"EMP CODE", Int			
1 ² ₃ EMP CODE	A ^B _C DEPARTMENT	A ^B _C Zones Visited	
1	1 HR	Bangalore	
2	1 HR	Mumbai	
3	2 Credit Card	Hyderabad	
4	2 Credit Card	Chennai	
5	2 Credit Card	Delhi	
6	3 Banking	Singapore	
7	3 Banking	Kuala Lumpur	
8	3 Banking	Jakarta	
9	6 Finance	Wuhan	
10	8 Heathcare	Wuhan	

And this is Master table

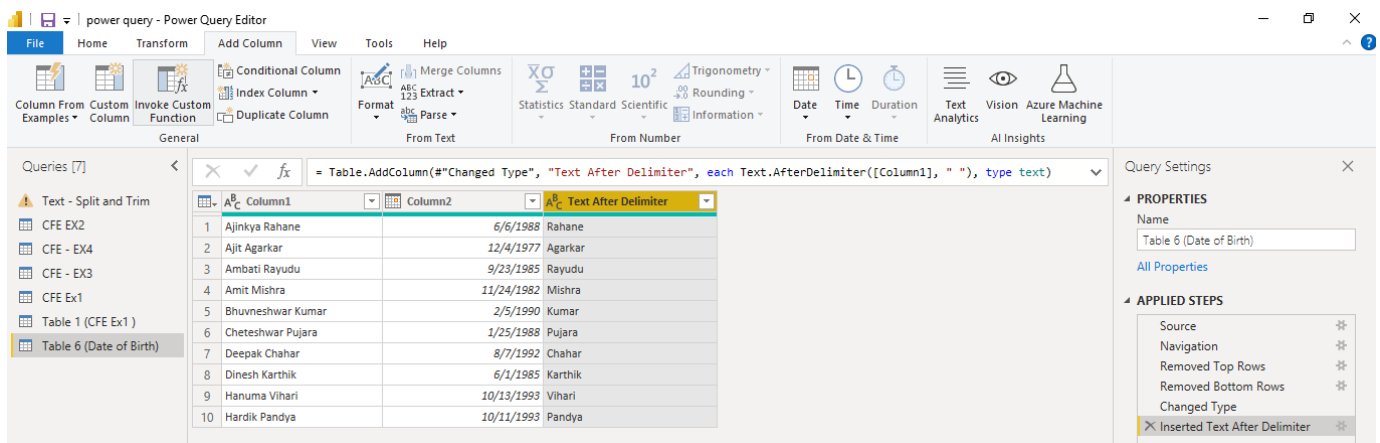
= Table.TransformColumnTypes("#Promoted Headers",{{"EMP CODE", 1			
1 ² ₃ EMP CODE	A ^B _C EMP FIRST NAME	1 ² ₃ SALARY	
1	1 Pavan	212	
2	2 Vihaan	206	
3	3 Kapil	362	
4	4 Hemant	283	
5	5 Mahesh	304	
6	6 Umesh	122	
7	7 Gopal	273	
8	8 Praveen	303	
9	9 Rahul	465	
10	10 Raj	281	

We want to merge these two in a new query. So we build a relationship since both have EMP CODE column. Also, since we only needed SALARY column from Master Table in our Transaction Table, we selected that.

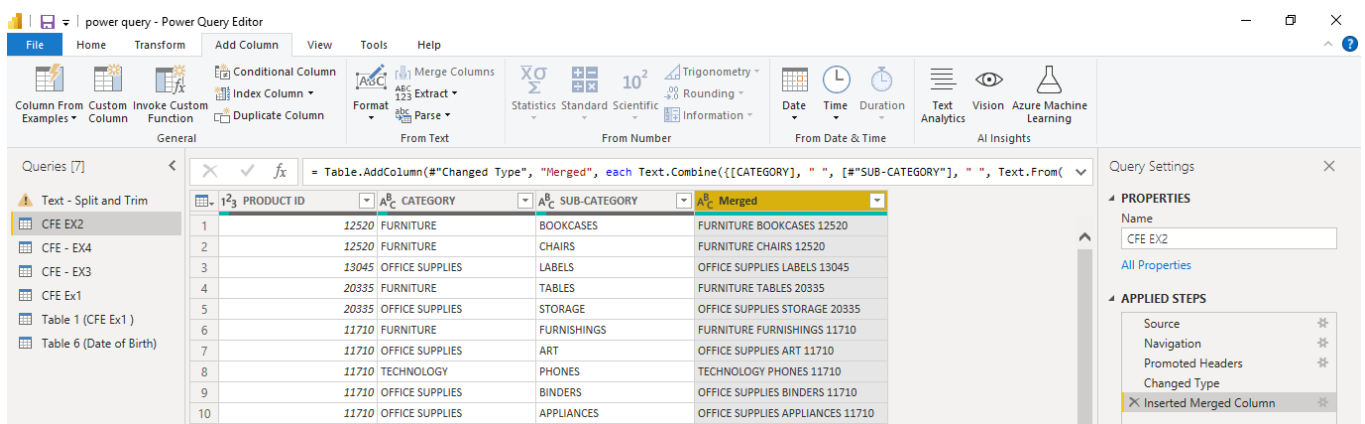


Column from Examples

Like flash fill feature in excel, we can use column from examples in power BI. Here are a few examples:



In another example, our dataset had 3 columns: category, sub-category, and product ID. So we used column from examples > from all columns so the final result is a merged column:



Again, using column from example features, we extracted day, month, year, and even a custom column from our date column:

power query - Power Query Editor

File Home Transform Add Column View Tools Help

Column From Examples Custom Column Invoke Custom Function Index Column Duplicate Column

Conditional Column Merge Columns Format Extract Parse From Text From Number From Date & Time

Statistics Standard Scientific Trigonometry Rounding Information

Date Time Duration Text Analytics Vision Azure Machine Learning

Queries [7]

Text - Split and Trim CFE EX2 CFE - EX4 CFE - EX3 CFE Ex1 Table 1 (CFE Ex1) Table 6 (Date of Birth)

fx = Table.AddColumn(#"Reordered Columns1", "Custom", each Text.Combine([Date], "****"), "-", Date.ToText

	Date	Day	Month	Year	Custom
1	6/6/1988	6		6	1988 June-6-1988
2	12/4/1977	4	12		1977 December-4-1977
3	9/23/1985	23	9		1985 September-23-1985
4	11/24/1982	24	11		1982 November-24-1982
5	2/5/1990	5	2		1990 February-5-1990
6	1/25/1988	25	1		1988 January-25-1988
7	8/7/1992	7	8		1992 August-7-1992
8	6/1/1985	1	6		1985 June-1-1985
9	10/13/1993	13	10		1993 October-13-1993
10	10/11/1993	11	10		1993 October-11-1993

Query Settings

PROPERTIES

Name Table 6 (Date of Birth)

APPLIED STEPS

- Source
- Navigation
- Removed Top Rows
- Removed Bottom Rows
- Changed Type
- Inserted Text After Delimiter
- Removed Other Columns
- Renamed Columns
- Inserted Year
- Inserted Month
- Reordered Columns
- Inserted Day
- Reordered Columns1
- Added Custom Column

In last example, we have both alphabets and numeric values in a single column, so again using column from examples, we extracted each values in a separate column. And that's how our clean data looks now:

power query - Power Query Editor

File Home Transform Add Column View Tools Help

Group By Use First Row as Headers Count Rows Transpose Reverse Rows

Data Type: Text Detect Data Type Fill Pivot Column Convert to List

Replace Values Unpivot Columns Move

Split Column Format Extract Parse

Statistics Standard Scientific Trigonometry Rounding Information

Date Time Duration Run R Run Python script

Queries [7]

Text - Split and Trim CFE EX2 CFE - EX4 CFE - EX3 CFE Ex1 Table 1 (CFE Ex1) Table 6 (Date of Birth)

fx = Table.ReorderColumns(#"Capitalized Each Word1",{"Name Code City Profit Region AvgProfit", "Name", "Code", "CITY",

	Name	Code	City	Profit	Region	AvgProfit
1	Pavan	10	Mumbai			
2	Vihaan	20	Chennai			
3	Vijay	30	Hyderabad			
4	Prem	40	Bangalore			
5	Jeetu	50	Pune			
6	Mayur	60	Mumbai	East	25	
7	Manoj	70	Chennai	South	90	
8	Deva	80	Hyderabad	South	100	
9	Ram	90	Bangalore	South	88	
10	Raj	100	Pune	East	43	

Query Settings

PROPERTIES

Name CFE - EX4

APPLIED STEPS

- Filtered Rows
- Promoted Headers
- Changed Type1
- Inserted Text Before Delim...
- Renamed Columns
- Inserted Text Between Delim...
- Renamed Columns1
- Inserted Text Between Delim...

Conditional Column in Power BI

We have this dataset:

power query - Power Query Editor

File Home Transform Add Column View Tools Help

Close & Apply Close New Source Recent Sources Enter Data Data source settings Manage Parameters Refresh Preview Properties Advanced Editor Manage Query Choose Column

Queries [4]

Table 1 (CF-Ex1)

Table 2 (CF-Ex1)

Table 3 (CF-Ex2)

Table 4 (CF-Ex2)

Customers Profit

1	IBM	300
2	Wipro	200
3	LNT	100
4	Cognizant	400
5	HSBC	100
6	Kotak	100
7	Paytm	300
8	Google	400
9	Yahoo	100
10	Reliance	500

= Table.TransformColumnTypes("#Promoted Headers", ...)

We want to apply condition in profit column. 3 conditions: <200 is low profit, >400 is high profit, and the range 200-400 represents average profit.

power query - Power Query Editor

File Home Transform Add Column View Tools Help

Column From Custom Examples Column Invoke Custom Function Duplicate Column Conditional Column Index Column Merge Columns Extract Parse From Text Statistics Standard Scientific From Number Trigonometry Rounding Information Date Time Duration From Date & Time Text Analytics Vision Azure Machine Learning All Insights

Queries [4]

Table 1 (CF-Ex1)

Table 2 (CF-Ex1)

Table 3 (CF-Ex2)

Table 4 (CF-Ex2)

Customers Profit Profit status

1	IBM	300	Average Profit
2	Wipro	200	Average Profit
3	LNT	100	Low Profit
4	Cognizant	400	Average Profit
5	HSBC	100	Low Profit
6	Kotak	100	Low Profit
7	Paytm	300	Average Profit
8	Google	400	Average Profit
9	Yahoo	100	Low Profit
10	Reliance	500	High Profit

= Table.AddColumn("#Changed Type", "Profit status", each if [Profit] < 200 then "Low Profit" else if [Profit] > 400 then "High Profit" else "Average Profit")

Query Settings

NAME

Table 1 (CF-Ex1)

ALL PROPERTIES

APPLIED STEPS

- Source
- Navigation
- FilterNullAndWhitespace
- Removed Bottom Rows
- Transposed Table
- Added Custom
- Added Index
- Added Custom1
- Removed Blank Rows
- Filled Down
- Grouped Rows
- Selected Group
- Removed Columns
- Transposed Table1
- Promoted Headers
- Changed Type
- Added Conditional Column

But what if we want to apply condition to two different columns like the below data?

power query - Power Query Editor

File Home Transform Add Column View Tools Help

Close & Apply New Source Recent Sources Enter Data Data source settings Manage Parameters Refresh Preview Properties Advanced Editor Manage Choose Columns Remove Columns Keep Rows Remove Rows

Queries [4]

- Table 1 (CF-Ex1)
- Table 2 (CF-Ex1)
- Table 3 (CF-Ex2)
- Table 4 (CF-Ex2)

fx = Table.TransformColumnTypes(#"Promoted Headers",{{"Name", type text}},)

	A ^B _C Name	A ^B _C Gender	A ^B _C Marriage Status
1	Pavan	M	M
2	Perter	M	S
3	Robert	M	M
4	Prem	M	S
5	Jeet	M	S
6	Mayur	M	S
7	Suzi	F	M
8	Rita	F	M
9	Simran	F	S
10	Lu	F	S

Here, based on gender and marital status, we will give the anmes a prefix i.e., Mr.,Mrs., or Miss.

power query - Power Query Editor

File Home Transform Add Column View Tools Help

Column From Examples Custom Column Invoke Custom Function General Conditional Column Index Column Duplicate Column Merge Columns ABC 123 Extract Format From Text Statistics Standard Scientific 10² Trigonometry Rounding Information Date Time Duration Text Analytics Vision Azure Machine Learning AI Insights

Queries [4]

- Table 1 (CF-Ex1)
- Table 2 (CF-Ex1)
- Table 3 (CF-Ex2)
- Table 4 (CF-Ex2)

fx = Table.AddColumn(#"Changed Type1", "Prefix", each if [Gender] = "M" then "Mr." else if [Marriage Status] = "S")

	A ^B _C Name	A ^B _C Gender	A ^B _C Marriage Status	ABC 123 Prefix
1	Pavan	M	M	Mr.
2	Perter	M	S	Mr.
3	Robert	M	M	Mr.
4	Prem	M	S	Mr.
5	Jeet	M	S	Mr.
6	Mayur	M	S	Mr.
7	Suzi	F	M	Mrs.
8	Rita	F	M	Mrs.
9	Simran	F	S	Miss
10	Lu	F	S	Miss

Now, comparing two columns:

power query - Power Query Editor

File Home Transform Add Column View Tools Help

Column From Examples Custom Column Invoke Custom Function

Conditional Column Index Column Duplicate Column

Format Merge Columns Extract Parse

Statistics Standard Scientific Rounding Information

Date Time

General From Text From Number From Date

Queries [3]

Text - Split and Trim

CF - EX4

Table 5 (CF EX3)

= Table.RemoveColumns(#"Added Conditional Column2",{ "Comparison" })

	Customer1	Customer2	Compare
1	IBM	IBM	IBM
2	Wipro	Wipro	Wipro
3	LNT	LNT9	0
4	Cognizant	Cognizant	Cognizant
5	HSBC	HDBC	0
6	Kotak	Kotak	Kotak
7	Paytm	Paytm	Paytm
8	Google	Google	Google
9	Yahoo	Yahooo	0
10	Reliance	Reliance	Reliance

Exploring other features in Power BI

- We can fill down a value in Power Query:

power query - Power Query Editor

File Home Transform Add Column View Tools Help

Transpose Reverse Rows Count Rows

Data Type: Text Replace Values Fill Unpivot Columns Move Convert to List

Split Column Format Text Column

Statistics Standard Scientific Rounding Information

Date

Table

Queries [2]

Text - Split and Trim

FillDown

= Table.TransformColumnTypes(FillDown_Table,{{"Country", type text}, {"Cities", type text}, {"Population", type text}})

	Country	Cities	Population
1	India	Pune	4672000
2		Mumbai	18978000
3		Chennai	7163000
4		Hyderabad	6376000
5		Ahmadābād	5375000
6		Bengalūru	6787000
7		Delhi	15926000
8		Hāora	4841638
9		Kolkata	14787000
10		Sūrat	3842000
11	China	Beijing	11106000
12		Chengdu	4123000
13		Chongqing	6461000
14		Dongguan	4528000
15		Guangzhou	8829000
16		Shanghai	14987000
17		Shenyang	4787000
18		Shenzhen	7581000
19		Tianjin	7180000
20		Wuhan	7243000
21	Indonesia	Bandung	2394000
22		Bekasi	2378211
23		Bogor	918000
24		Cilacap	1174964

power query - Power Query Editor

File Home Transform Add Column View Tools Help

Group By Use First Row as Headers Count Rows

Table

Any Column

Text Column

Number Column

Date & Time Column

Scripts

Queries [2]

Text - Split and Trim

FillDown

fx = Table.FillDown(#"Changed Type",{"Country"})

	A ^B C Country	A ^B C Cities	1 ² 3 Population
1	India	Pune	4672000
2	India	Mumbai	18978000
3	India	Chennai	7163000
4	India	Hyderabad	6376000
5	India	Ahmadābād	5375000
6	India	Bengalūru	6787000
7	India	Delhi	15926000
8	India	Hāora	4841638
9	India	Kolkata	14787000
10	India	Sūrat	3842000
11	China	Beijing	11106000
12	China	Chengdu	4123000
13	China	Chongqing	6461000
14	China	Dongguan	4528000
15	China	Guangzhou	8829000
16	China	Shanghai	14987000
17	China	Shenyang	4787000
18	China	Shenzhen	7581000
19	China	Tianjin	7180000
20	China	Wuhan	7243000
21	Indonesia	Bandung	2394000
22	Indonesia	Bekasi	2378211
23	Indonesia	Bogor	918000
24	Indonesia	Cilacap	1174964

3 COLUMNS, 999+ ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED AT 140 PM

■ Grouping

In the dataset below, I want them to group by country so I can see what is the average score and total population by country:

power query - Power Query Editor

File Home Transform Add Column View Tools Help

Group By Use First Row as Headers Count Rows

Table

Any Column

Text Column

Number Column

Date & Time Column

Scripts

Queries [2]

Text - Split and Trim

Group1

fx = Table.TransformColumnTypes(Group_Table,{{"Country", type text}, {"Cities", type text}, {"Population", Int64.Type}}

	A ^B C Country	A ^B C Cities	1 ² 3 Population	1 ² 3 Score
1	India	Pune	4672000	13
2		Pune	18978000	84
3		Chennai	7163000	40
4		Chennai	6376000	31
5		Pune	5375000	45
6		Bengalūru	6787000	62
7		Pune	15926000	13
8		Hāora	4841638	19
9		Pune	14787000	58
10		Chennai	3842000	97
11	Indonesia	Bandung	2394000	21
12		Bandung	2378211	67
13		Bandung	918000	74
14		Cilacap	1174964	100
15		Jakarta	9125000	84
16		Jakarta	1262000	33
17		Jakarta	2115000	31
18		Palembang	1749000	41
19		Semarang	1396000	57
20		Surabaya	2845000	38
21	Oman	lbrī	101640	93
22		Al Buraymī	null	98
23		Al Madrah Samā'il	47718	92
24		Ar Rustāq	null	33

4 COLUMNS, 999+ ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED ON FRIDAY

power query - Power Query Editor

File Home Transform Add Column View Tools Help

Group By Use First Row as Headers Count Rows

Table

Queries [2]

Text - Split and Trim

Group1

fx = Table.Group(#"Filled Down", {"Country"}, {"Total Population by Country", each List.Sum([Population]), type

Country	Total Population by Country
1 India	88747638
2 Indonesia	25357175
3 Oman	1552293
4 Afghanistan	6589540
5 Albania	1716996
6 Algeria	7391474
7 American Samoa	12576
8 Andorra	53998
9 Angola	7302523
10 Antigua And Barbuda	35499
11 Argentina	19872389
12 Armenia	1435437
13 Aruba	68775
14 Australia	16048381
15 Austria	3587353
16 Azerbaijan	3148824
17 Bahamas, The	253323
18 Bahrain	563920
19 Bangladesh	21407691
20 Barbados	191152
21 Belarus	4295815
22 Belgium	4641244
23 Belize	143282
24 Benin	1896884

2 COLUMNS, 221 ROWS Column profiling based on top 1000 rows

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power query - Power Query Editor

File Home Transform Add Column View Tools Help

Group By Use First Row as Headers Count Rows

Table

Queries [2]

Text - Split and Trim

Group1

fx = Table.Group(#"Filled Down", {"Country"}, {"Total Population by Country", each List.Sum([Population]), type

Country	Total Population by Country	Avg Score
1 India	88747638	46.2
2 Indonesia	25357175	54.6
3 Oman	1552293	64.125
4 Afghanistan	6589540	52.3
5 Albania	1716996	69.5
6 Algeria	7391474	54.4
7 American Samoa	12576	95
8 Andorra	53998	55
9 Angola	7302523	58.7
10 Antigua And Barbuda	35499	66
11 Argentina	19872389	52.2
12 Armenia	1435437	47.54545455
13 Aruba	68775	74
14 Australia	16048381	60.8
15 Austria	3587353	67.2
16 Azerbaijan	3148824	50.2
17 Bahamas, The	253323	82
18 Bahrain	563920	79
19 Bangladesh	21407691	69.4
20 Barbados	191152	46
21 Belarus	4295815	63.9
22 Belgium	4641244	56.4
23 Belize	143282	46.71428571
24 Benin	1896884	60.91666667

3 COLUMNS, 221 ROWS Column profiling based on top 1000 rows

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■ Transpose

In below dataset, we have so many null values. We can see only 3 rows have the values, so I'll just remove other rows first.

power query - Power Query Editor

File Home Transform Add Column View Tools Help

Close & Apply New Source Recent Sources Enter Data Data source settings Manage Parameters Refresh Preview Advanced Editor Choose Columns Remove Columns Keep Rows Remove Rows Sort Split Column Group By Data Type: Text Use First Row as Headers Replace Values Merge Queries Append Queries Combine Files Text Analytics Vision Azure Machine Learning

Queries [3] Text - Split and Trim Group1 Transpose

fx = Table.TransformColumnTypes(#"Promoted Headers",{"Column1", type text}, {"Column2", type any}, {"TOP 10 CITIES PER COUNTRY BY POPULATION", type any})

Column1	Column2	Column3	Column4	Column5
1	null	null	null	null
2	null	null	null	null
3	null	null	null	null
4	Country	India		
5	Cities	Pune	Mumbai	Chennai
6	Population	4672000	18978000	7163000
7	null	null	null	null
8	null	null	null	null
9	null	null	null	null
10	null	null	null	null
11	null	null	null	null
12	null	null	null	null
13	null	null	null	null
14	null	null	null	null
15	null	null	null	null
16	null	null	null	null
17	null	null	null	null
18	null	null	null	null
19	null	null	null	null
20	null	null	null	null
21	null	null	null	null
22	null	null	null	null
23	null	null	null	null
24	null	null	null	null

999+ COLUMNS, 37 ROWS Column profiling based on top 1000 rows

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Query Settings

PROPERTIES

Name

Transpose

APPLIED STEPS

Source

Navigation

Promoted Headers

Changed Type

power query - Power Query Editor

File Home Transform Add Column View Tools Help

Close & Apply New Source Recent Sources Enter Data Data source settings Manage Parameters Refresh Preview Advanced Editor Choose Columns Remove Columns Keep Rows Remove Rows Sort Split Column Group By Data Type: Text Use First Row as Headers Replace Values Merge Queries Append Queries Combine Files Text Analytics Vision Azure Machine Learning

Queries [3] Text - Split and Trim Group1 Transpose

fx = Table.FirstN(#"Removed Top Rows",3)

Column1	Column2	Column3	Column4	Column5
1	Country	India		
2	Cities	Pune	Mumbai	Chennai
3	Population	4672000	18978000	7163000

999+ COLUMNS, 3 ROWS Column profiling based on top 1000 rows

PREVIEW DOWNLOADED ON FRIDAY

Query Settings

PROPERTIES

Name

Transpose

APPLIED STEPS

Source

Navigation

Promoted Headers

Changed Type

Removed Top Rows

Kept First Rows

Next, I will transpose these rows:

power query - Power Query Editor

FileHomeTransformAdd ColumnViewToolsHelp

Close & ApplyNew SourceRecent SourcesEnter DataData source settingsManage ParametersRefresh PreviewPropertiesAdvanced EditorChoose ColumnsRemove ColumnsKeep RowsRemove RowsSortSplit ColumnGroup ByData Type: TextUse First Row as HeadersReplace ValuesMerge QueriesAppend QueriesCombine FilesCombineText AnalyticsVisionAzure Machine LearningAI Insights

CloseNew QueryData SourcesParametersQueryManage ColumnsReduce RowsTransform

Queries [3]

Text - Split and TrimGroup1Transpose

fx

= Table.TransformColumnTypes(#"Promoted Headers1",{{"Country", type text}, {"Cities", type text}, {"Population",

	Country	Cities	Population
1	India	Pune	4672000
2		Mumbai	18978000
3		Chennai	7163000
4		Hyderabad	6376000
5		Ahmadābād	5375000
6		Bengalūru	6787000
7		Delhi	15926000
8		Hāora	4841638
9		Kolkata	14787000
10		Sūrat	3842000
11	China	Beijing	11106000
12		Chengdu	4123000
13		Chongqing	6461000
14		Dongguan	4528000
15		Guangzhou	8829000
16		Shanghai	14987000
17		Shenyang	4787000
18		Shenzhen	7581000
19		Tianjin	7180000
20		Wuhan	7243000
21	Indonesia	Bandung	2394000
22		Bekasi	2378211
23		Bogor	918000
24		Cilacap	1174964

Query Settings

PROPERTIES

Name

Transpose

All Properties

APPLIED STEPS

Source

Navigation

Promoted Headers

Changed Type

Removed Top Rows

Kept First Rows

Transposed Table

Promoted Headers1

Changed Type1

3 COLUMNS, 999+ ROWS

Column profiling based on top 1000 rows

PREVIEW DOWNLOADED ON FRIDAY