VISUALIZING US NATURAL DISASTER DECLARATION – TRENDS AND PATTERNS

Week 1 Documentation/ Screenshots

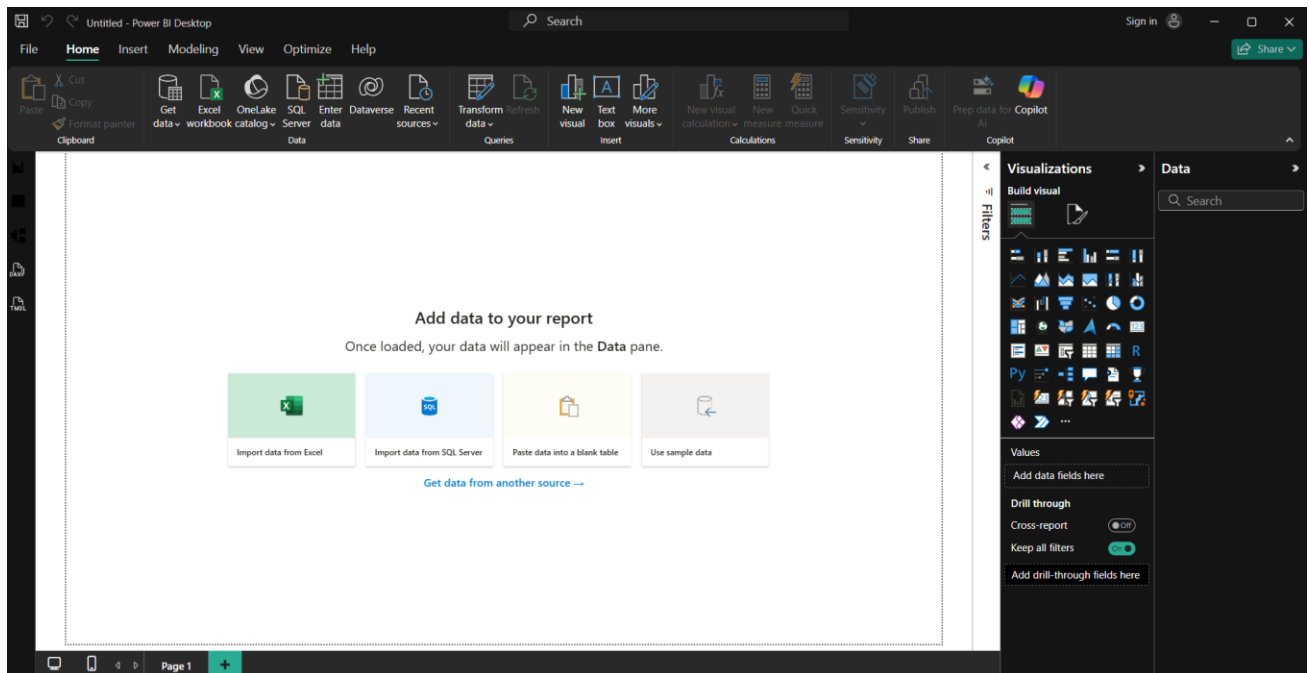### Data Cleaning in Power BI

Data Cleaning in Power BI

Fig 1.1 PowerBI Canvas

Load Data:

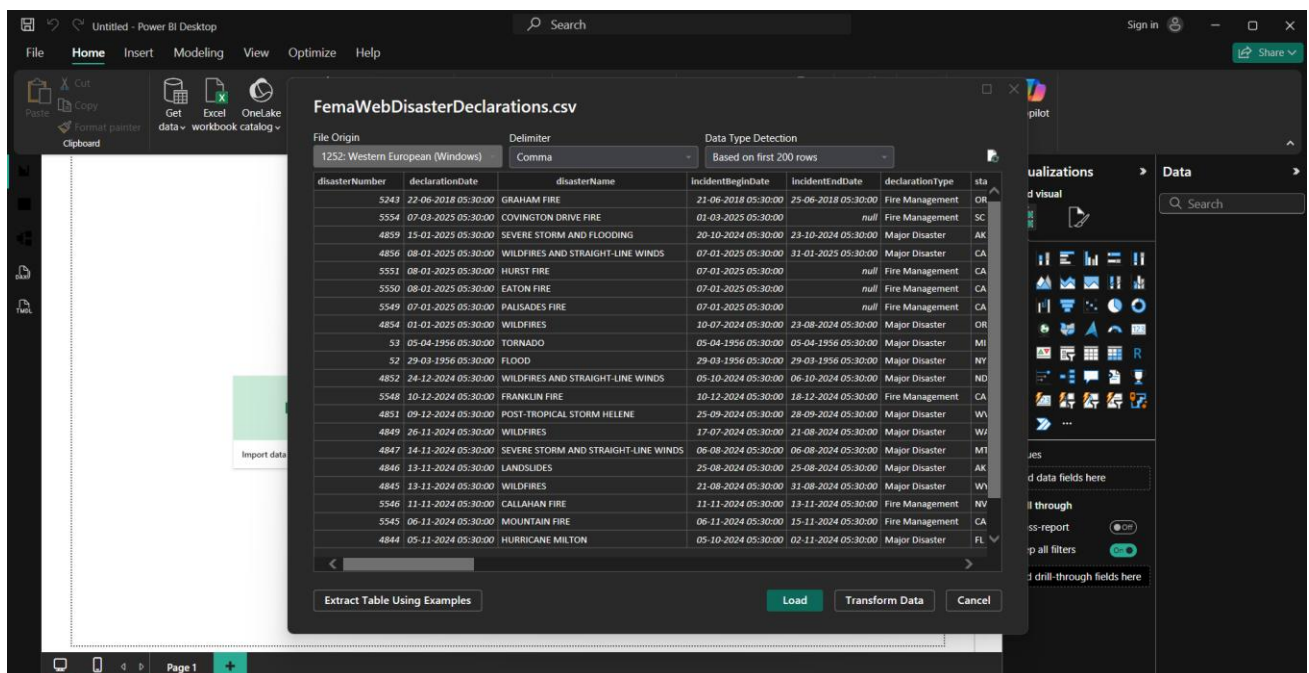Get Data -> Text/CSV -> Choose File -> Transform Data

Fig 1.2 Transform Data

Remove Duplicate Rows:

Ctrl+A -> Remove Rows -> Remove Duplicates

Remove Unnecessary Columns:

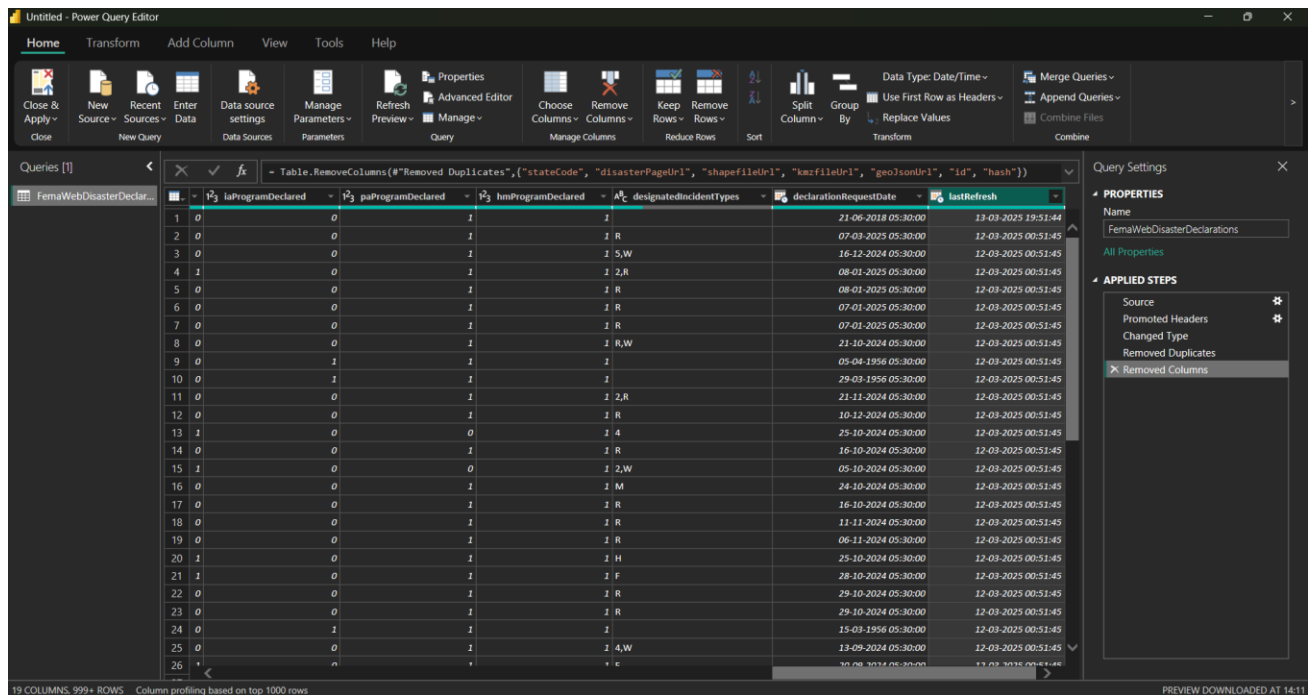Click StateCode column, Ctrl+alt+(other columns to remove) -> Remove Columns (in toolbar ribbon) -> Remove Columns

Fig 1.3 Removed unnecessary columns

Check Datatype:

To convert disaster programs declared to Boolean: Click the number icon -> true/false

Fig 1.4 Changed Datatype

Replace blank with Unknown: (in designatedIncidentType)

Select column -> replace values ->   , Unknown

Fig 1.5 Replaced blank values

Adding Useful Columns:

1. Status

   Creating Conditional Columns:
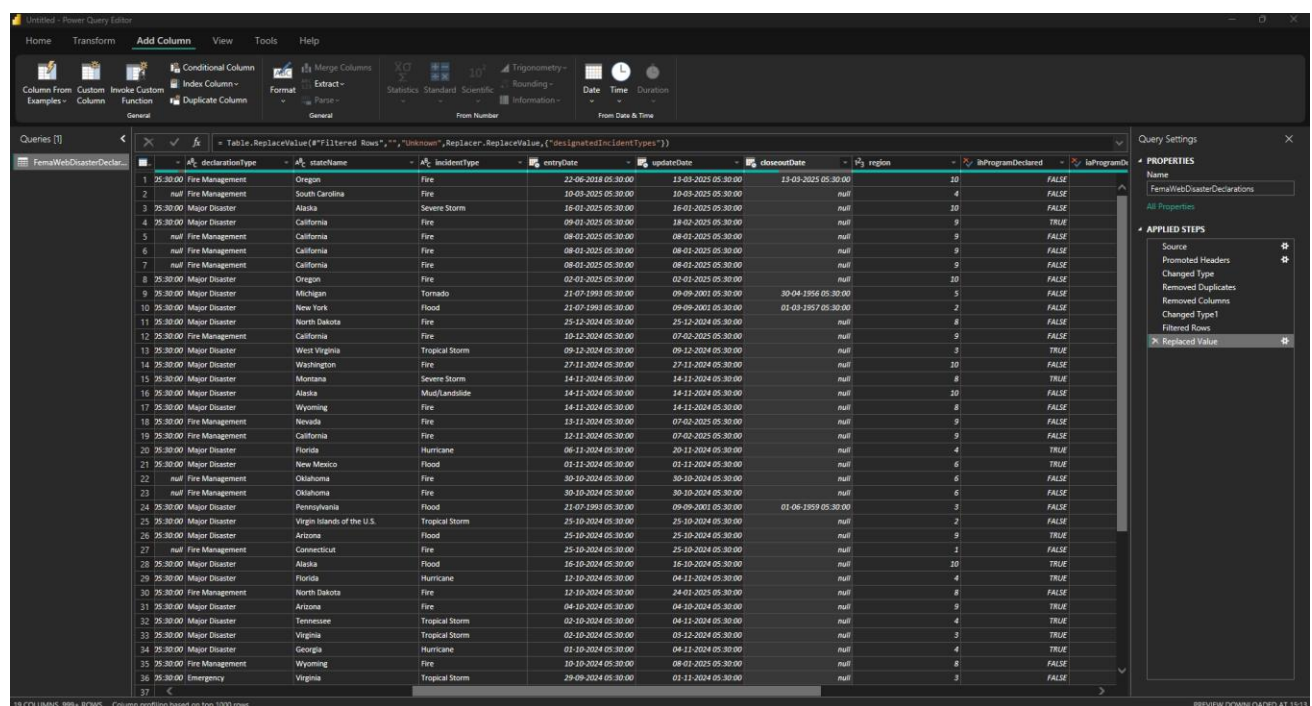
   Select column -> Add Column -> Conditional Column

Using closeOutDate:

Create a column named "Status" which is used to depict whether the disaster is official declared as closed or not.

IF (closeOutDate EQUALS null) THEN Status = "Open"

ELSE Status = "Closed"

Fig 1.6 Before creating "Status" column
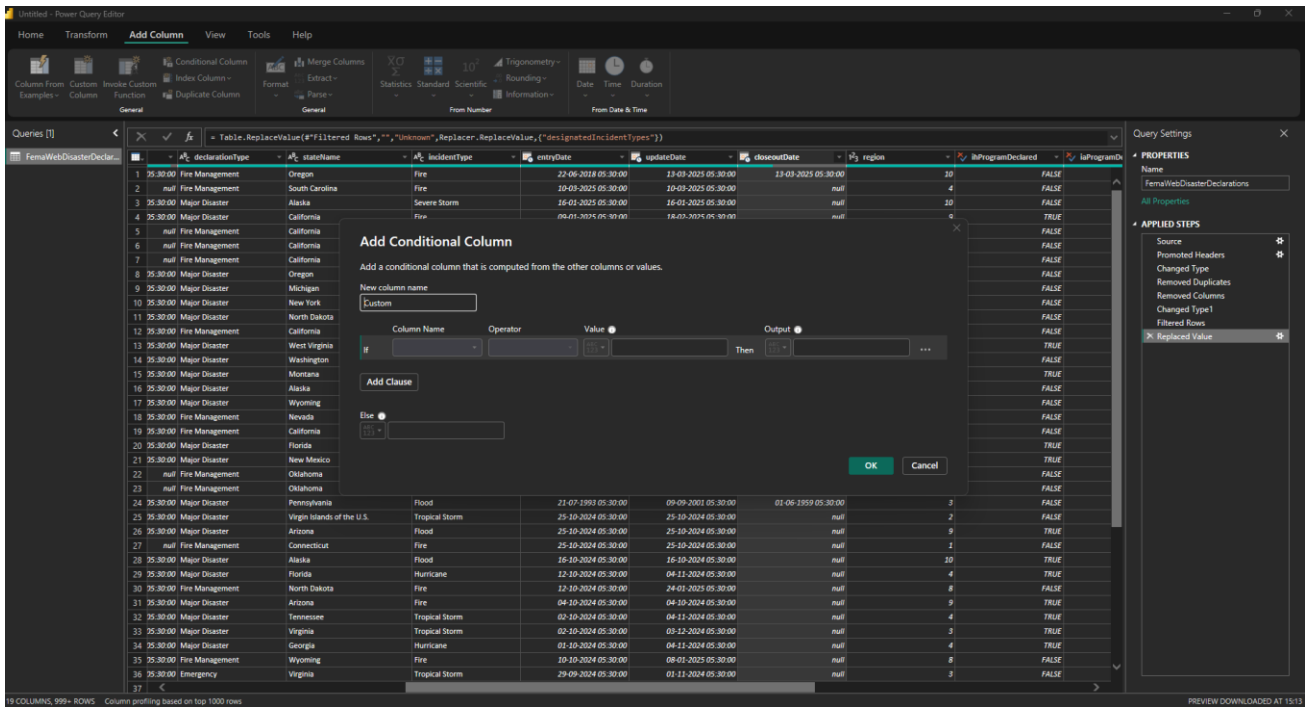
Fig 1.7 "Add Conditional Column" pop-up
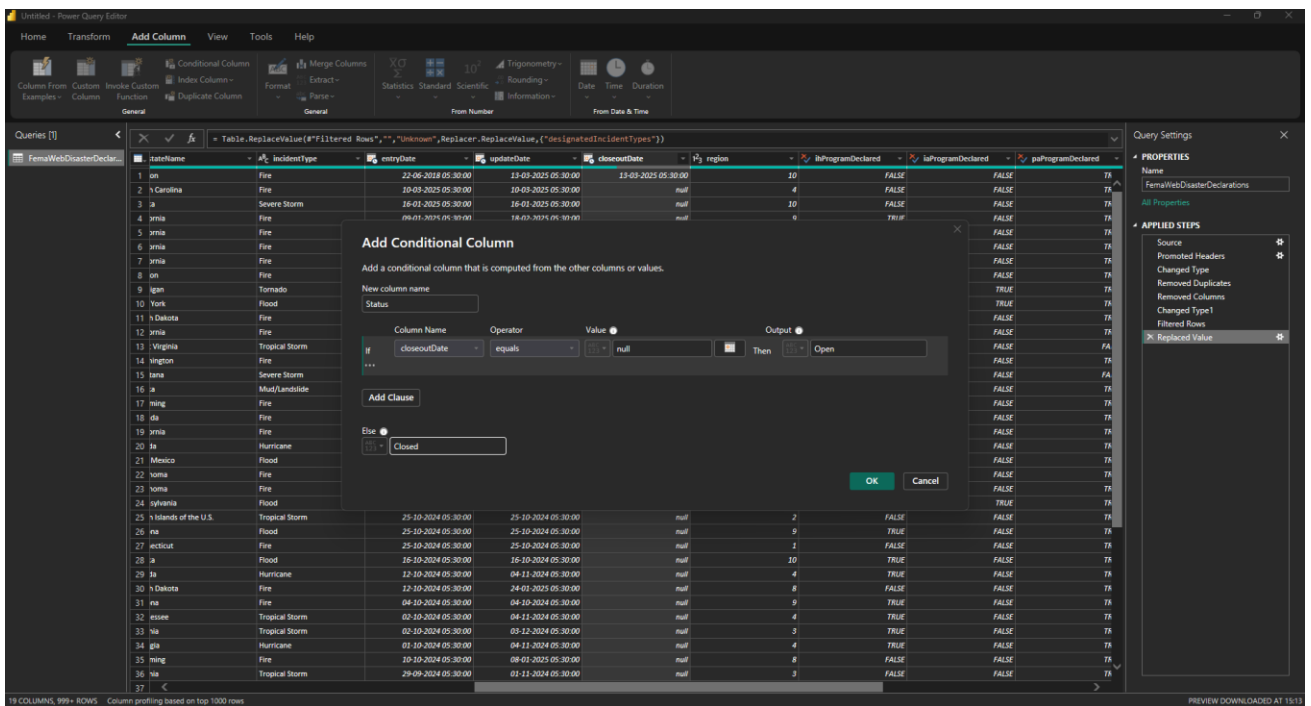
Fig 1.8 "Add Conditional Column" pop-up

Fig 1.9 Created a conditional column "Status"

2. Incident Duration

$$= Duration.Days([incidentEndDate] - [incidentBeginDate])$$

In header, Add Column -> Custom Column

Fig 1.10 Custom Column pop-up

Fig 1.11 Added "incidentDuration" column

Change datatype of "incidentDuration" – whole number

3. Fiscal Year

In header, Add Column -> Custom Column

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= if (Date.Month ([declarationDate]) >= 10)
   then (Date.Year([declarationDate]) + 1)
   else (Date.Year([declarationDate]) )
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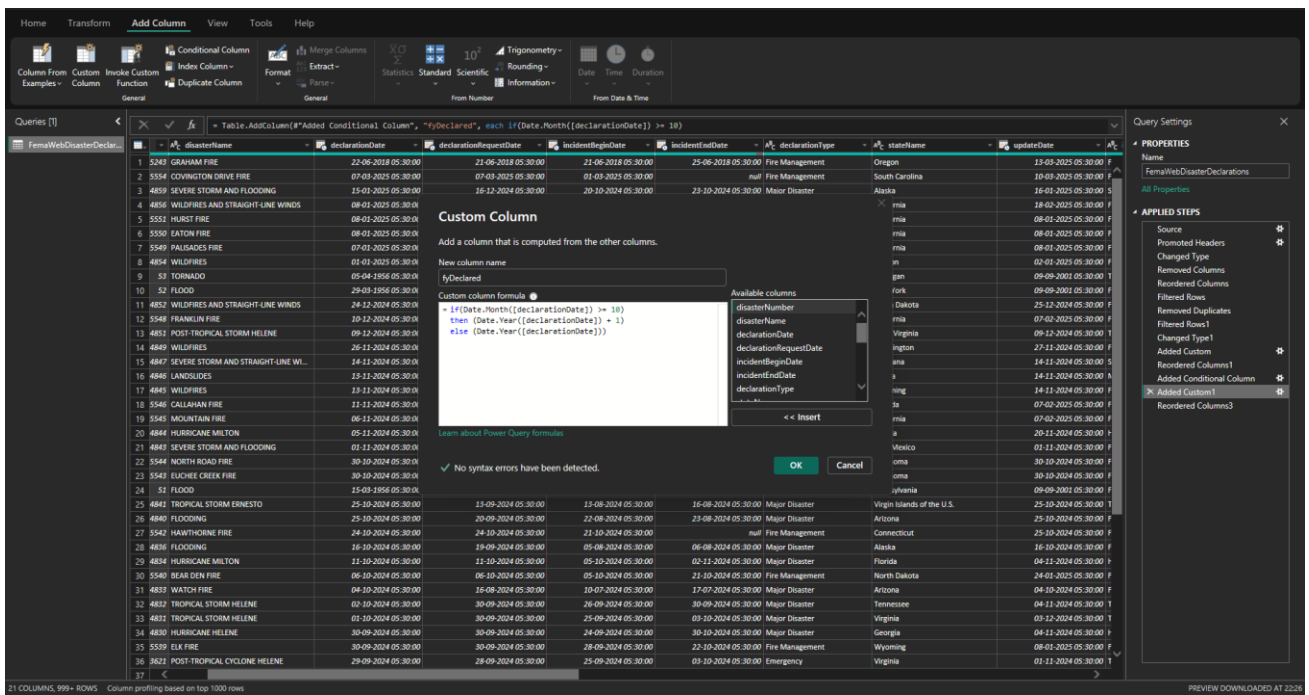
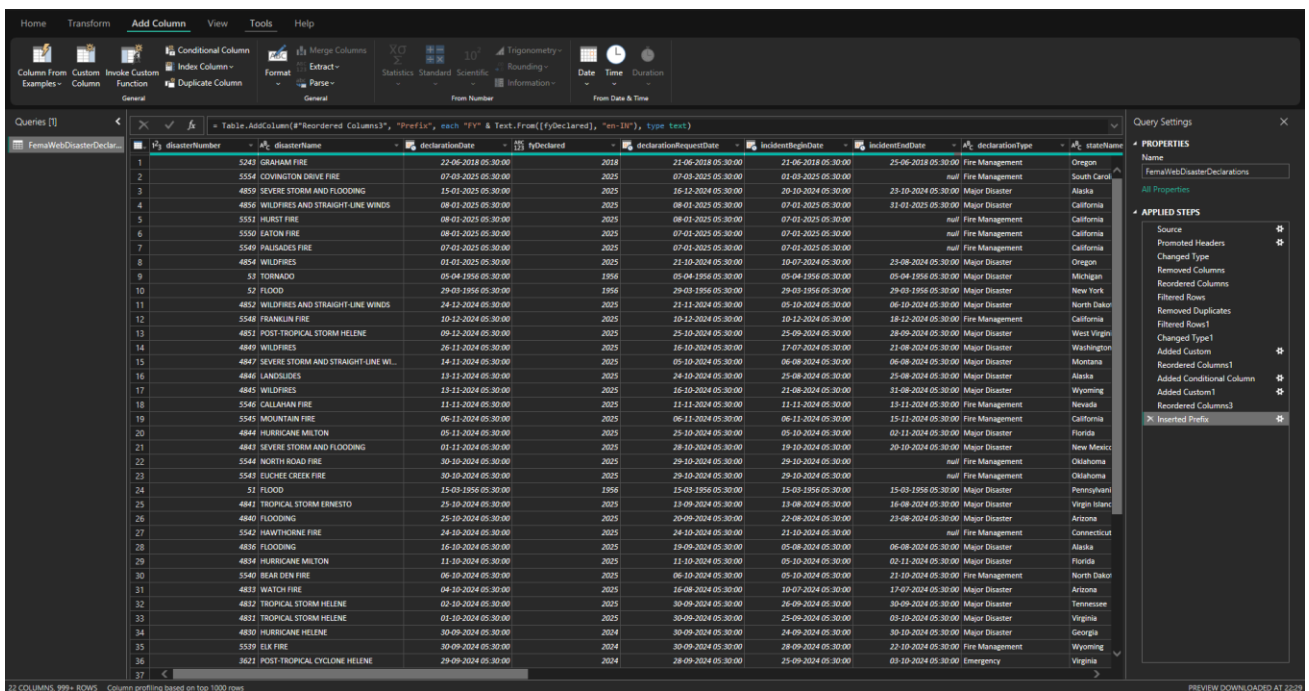Fig 1.12 Custom Column pop-up for "fyDeclared" column

Fig 1.13 Added fyDeclared column

Select column -> Format -> Add Prefix -> FY

Delete previous column

Rename column

Fig 1.14 Final fyDeclared column