

ASSIGNMENT: 1

What is PowerBi?

PowerBi is a market leader in data management crisis. This tool mainly aims to help organisations or individuals to visualise and organise their data. This tool is developed by Microsoft. Power BI offers users with little to no understanding of data visualizations to easily build charts and graphs that transform their data into tangible business insights.

There are three versions of PowerBi :

- PowerBi Desktop
- PowerBi Pro
- PowerBi Premium

PowerBi Desktop :

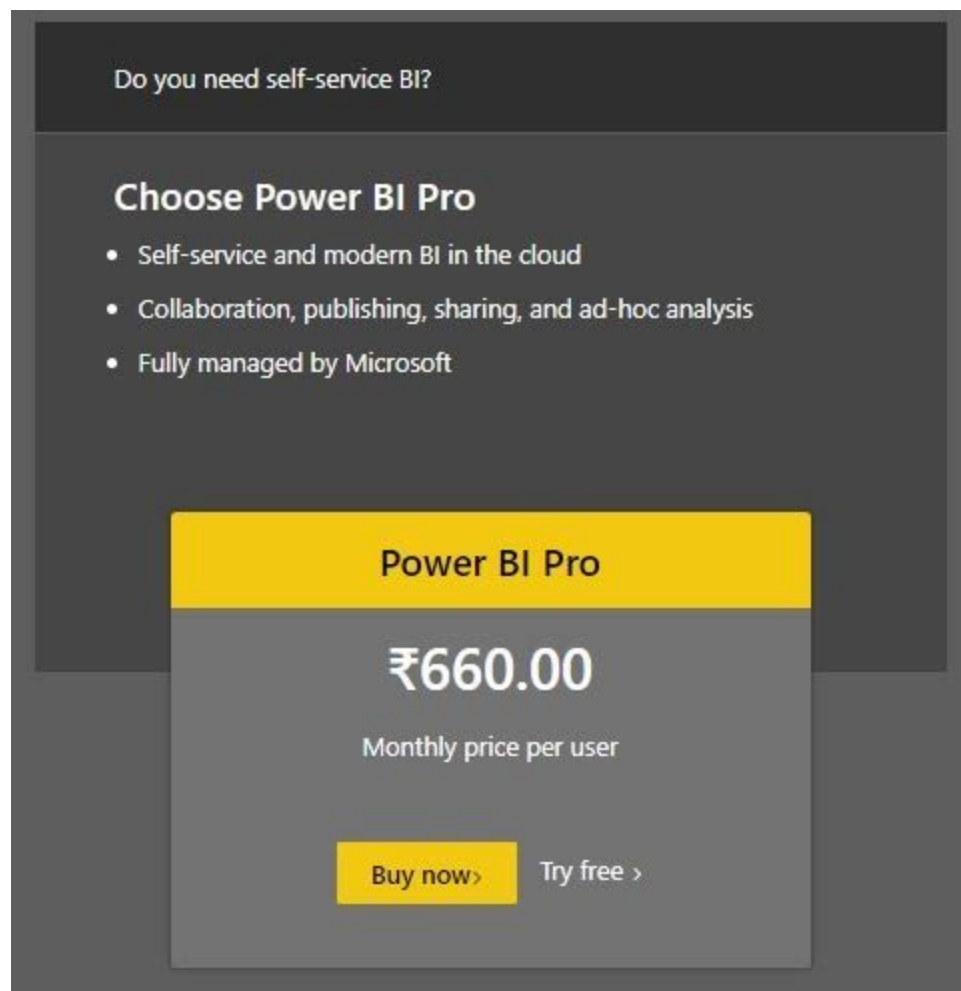
PowerBi Desktop is a free version of PowerBi. Therefore it has only basic features of PowerBi. These basic features are good enough for a learner or an individual. You can connect to multiple different sources of data, and combine them (often called modelling) into a data model.

It's the perfect version to start with for all skill levels - whether you're non-IT and wants to make your reports more interactive, or analysts seeking richer detail, it's one of the best business analytics tools to use.



PowerBI Pro :

PowerBI is Included with Office 365 Enterprise E5. In Powerbi Pro you can share the Dashboards and reports with others. The key difference between free and pro that dashboards and reports can be integrated into you Microsoft Word or PowerPoint. Maximum size of a single dataset can be of 1 GB and storage capacity of 10GB. Content can be view and interact in Andriod and iOS phones

A promotional card for Power BI Pro. It has a dark grey background. At the top, a dark grey banner contains the text "Do you need self-service BI?". Below this, the heading "Choose Power BI Pro" is followed by a bulleted list of features: "Self-service and modern BI in the cloud", "Collaboration, publishing, sharing, and ad-hoc analysis", and "Fully managed by Microsoft". The central part of the card features a yellow header with "Power BI Pro", a large white price tag "₹660.00", and the text "Monthly price per user". At the bottom, there are two buttons: a yellow "Buy now >" button and a grey "Try free >" button.

Do you need self-service BI?

Choose Power BI Pro

- Self-service and modern BI in the cloud
- Collaboration, publishing, sharing, and ad-hoc analysis
- Fully managed by Microsoft

Power BI Pro

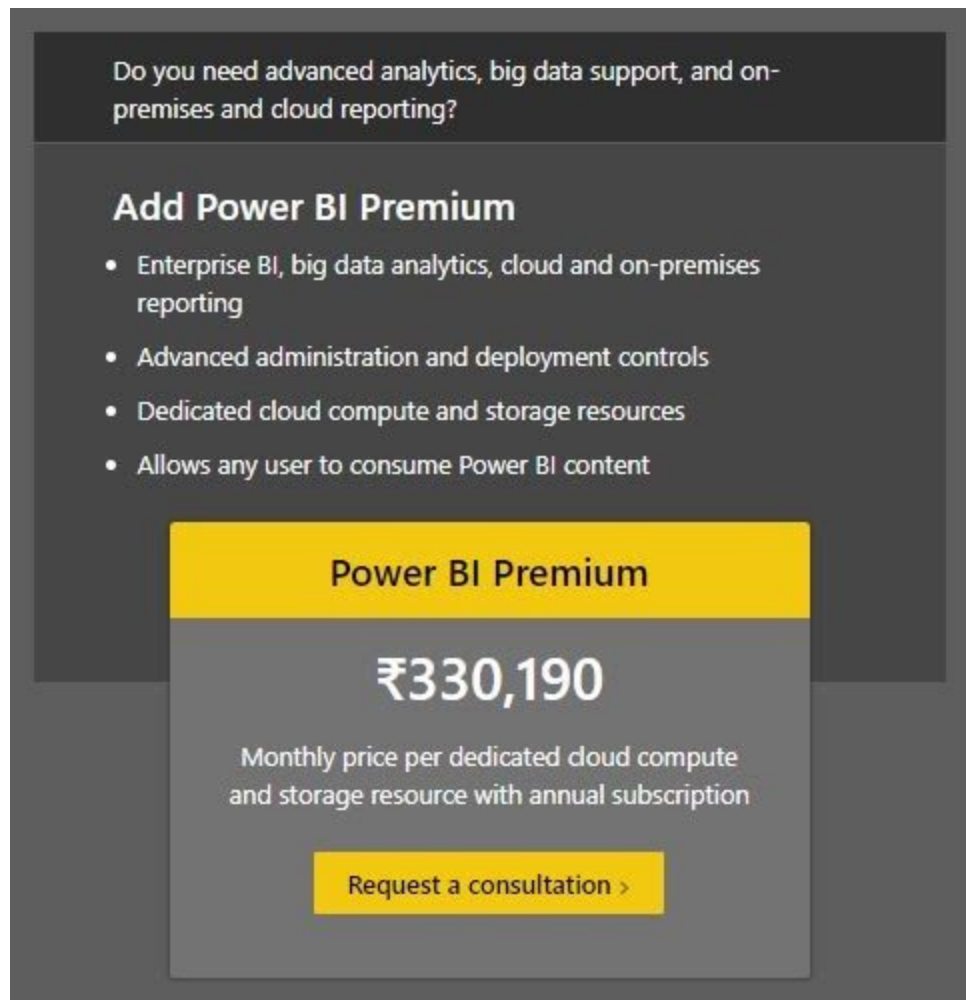
₹660.00

Monthly price per user

[Buy now >](#) [Try free >](#)

PowerBI Premium:

PowerBI premium tier is more like a company subscription plan so that the organisation can work and share the content peer-to-peer. Maximum size of a single dataset can be of 50GB and storage capacity of 1TB(1000GB). It even has a dedicated Compute processing environment.



Do you need advanced analytics, big data support, and on-premises and cloud reporting?

Add Power BI Premium

- Enterprise BI, big data analytics, cloud and on-premises reporting
- Advanced administration and deployment controls
- Dedicated cloud compute and storage resources
- Allows any user to consume Power BI content

Power BI Premium

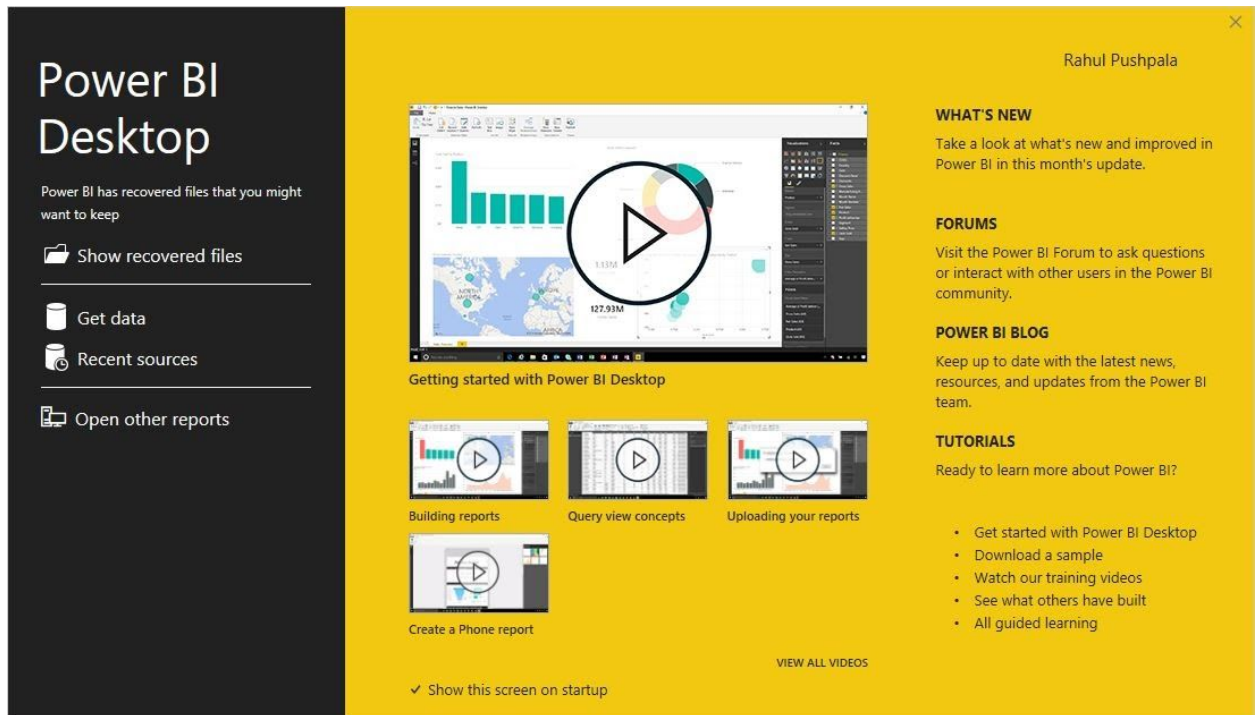
₹330,190

Monthly price per dedicated cloud compute and storage resource with annual subscription

[Request a consultation >](#)

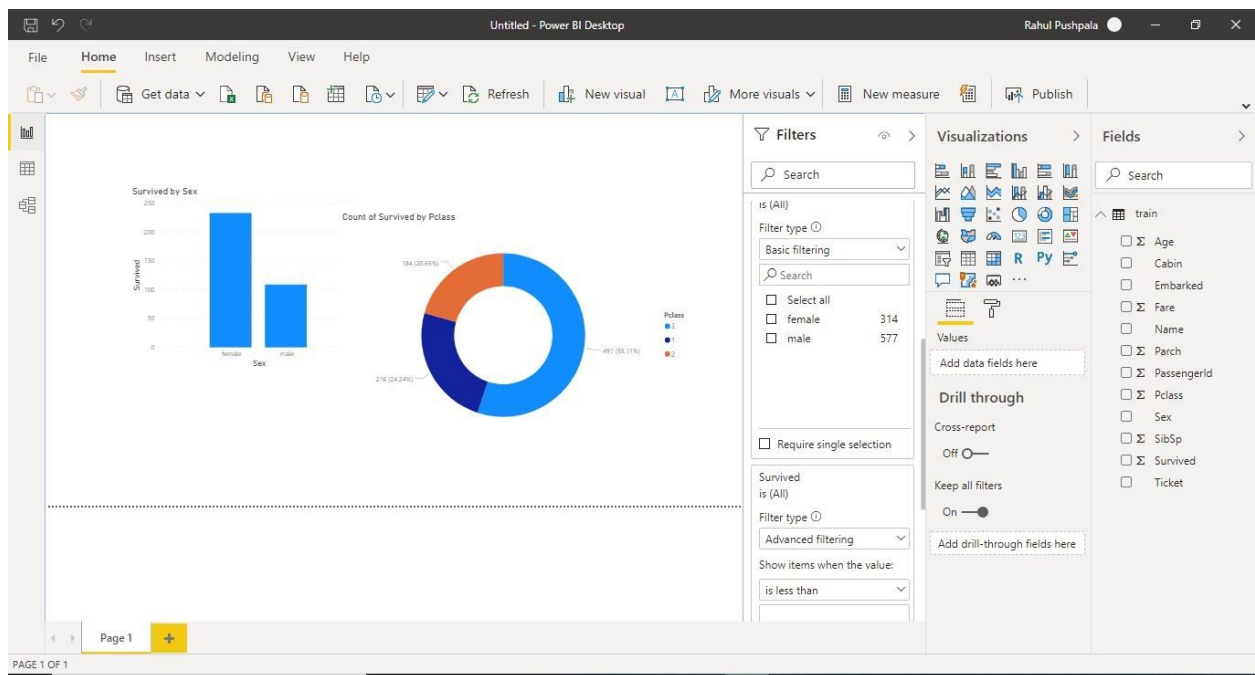
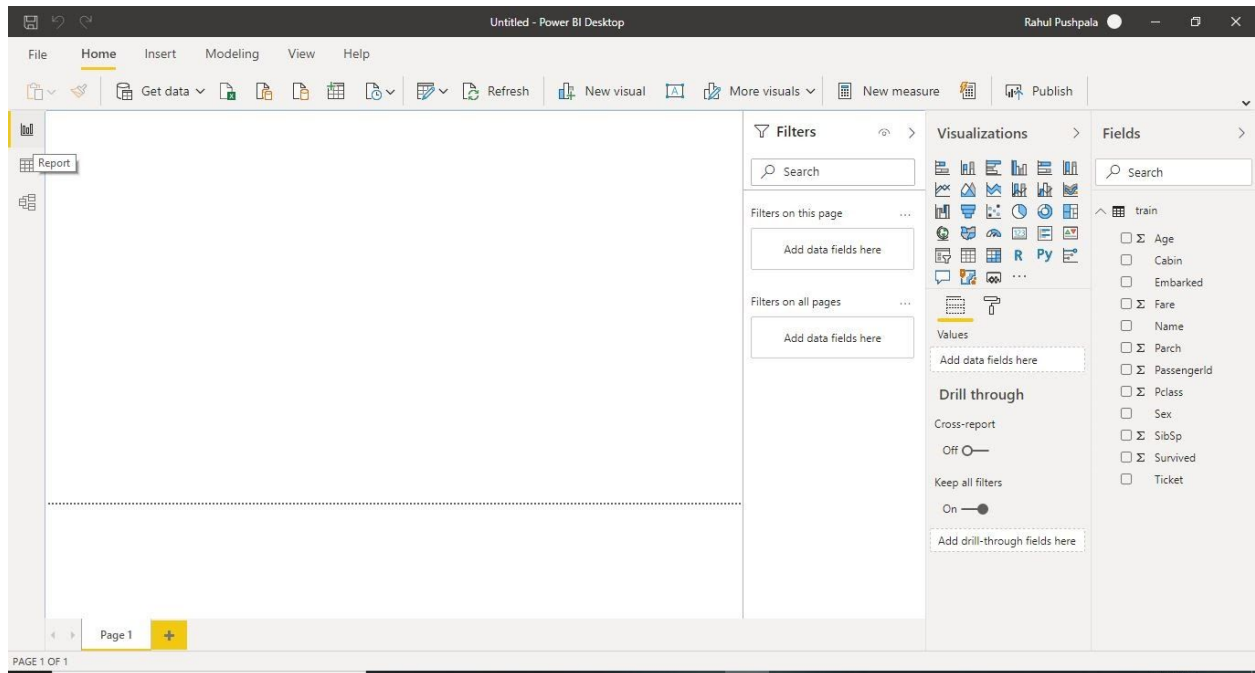
The image shows a dark grey card with a yellow header and footer. The header contains the text 'Do you need advanced analytics, big data support, and on-premises and cloud reporting?'. The main body of the card is dark grey and contains the heading 'Add Power BI Premium' followed by a bulleted list of features. Below the list is a yellow box with the text 'Power BI Premium'. Underneath this is a grey box containing the price '₹330,190' and a description of the price. At the bottom of the card is a yellow button with the text 'Request a consultation >'.

- **Screenshot of the report view page which appears when power desktop starts.**

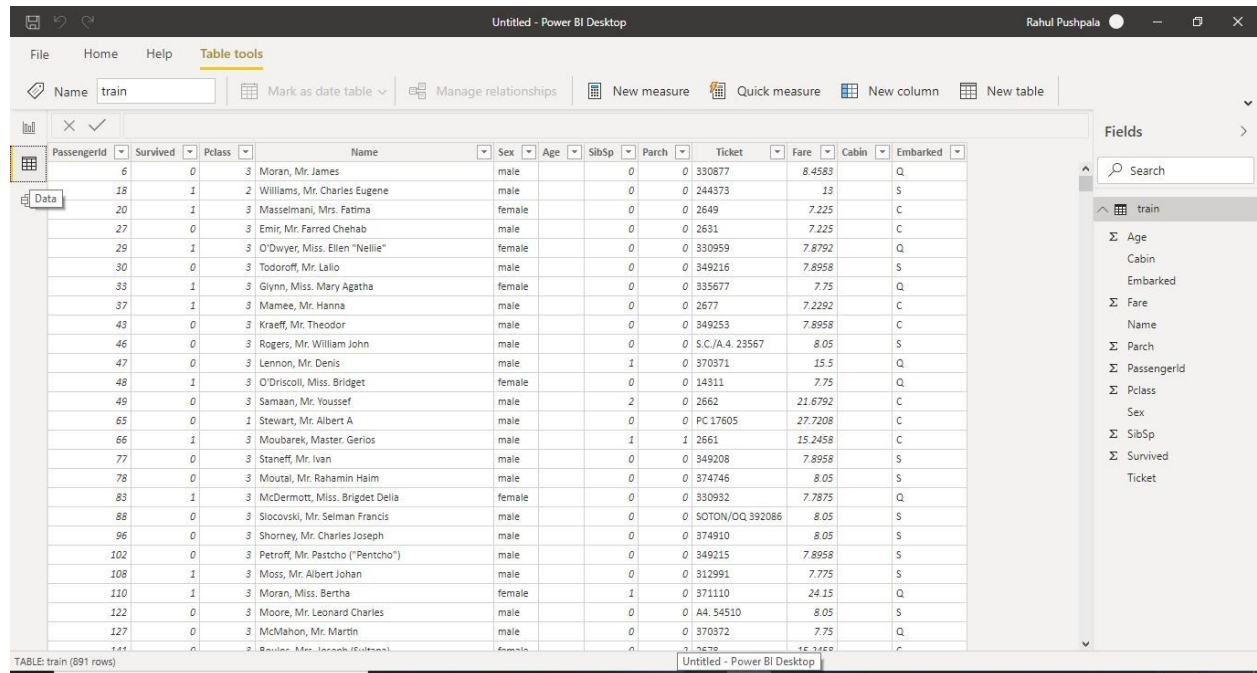


- **Screenshots of Report View, Data View, Model View, Power Query Editor and Advanced Editor.**

Report View :



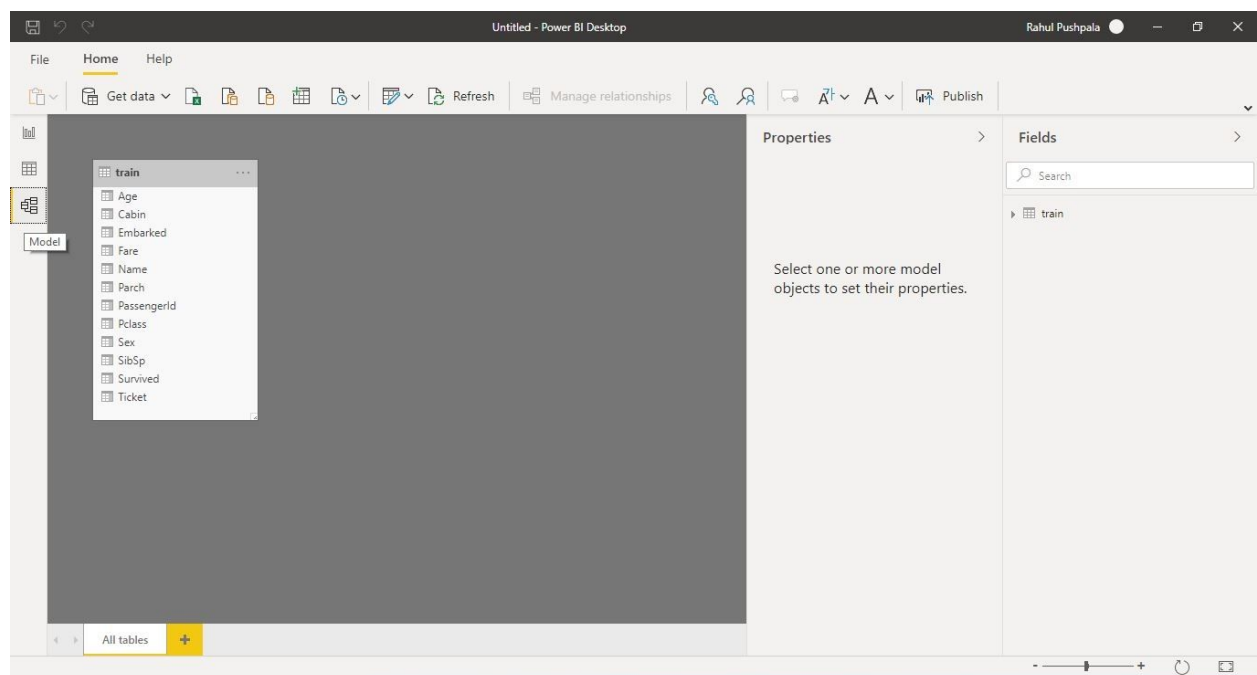
Data View:



The screenshot shows the Power BI Desktop interface in Data View. The main area displays a table named 'train' with 891 rows and 12 columns. The columns are: PassengerId, Survived, Pclass, Name, Sex, Age, SibSp, Parch, Ticket, Fare, Cabin, and Embarked. The table contains data for various passengers, including their survival status, class, name, sex, age, siblings/spouses, parents/children, ticket number, fare, cabin, and embarkment point.

PassengerId	Survived	Pclass	Name	Sex	Age	SibSp	Parch	Ticket	Fare	Cabin	Embarked
6	0	3	Moran, Mr. James	male		0	0	330877	8.4583		Q
18	1	2	Williams, Mr. Charles Eugene	male		0	0	244373	13		S
20	1	3	Masseimani, Mrs. Fatima	female		0	0	2649	7.225		C
27	0	3	Emir, Mr. Farred Chehab	male		0	0	2631	7.225		C
29	1	3	O'Dwyer, Miss. Ellen "Nellie"	female		0	0	330959	7.8792		Q
30	0	3	Todoroff, Mr. Lailo	male		0	0	349216	7.8958		S
33	1	3	Glynn, Miss. Mary Agatha	female		0	0	335677	7.75		Q
37	1	3	Mamee, Mr. Hanna	male		0	0	2677	7.2292		C
43	0	3	Kraeff, Mr. Theodor	male		0	0	349253	7.8958		C
46	0	3	Rogers, Mr. William John	male		0	0	S.C./A.4. 23567	8.05		S
47	0	3	Lennon, Mr. Deniz	male		1	0	370371	15.5		Q
48	1	3	O'Driscoll, Miss. Bridget	female		0	0	14311	7.75		Q
49	0	3	Samaan, Mr. Youssef	male		2	0	2662	21.6792		C
65	0	1	Stewart, Mr. Albert A	male		0	0	PC 17605	27.7208		C
66	1	3	Moubarek, Master. Gerios	male		1	1	2661	15.2458		C
77	0	3	Staneff, Mr. Ivan	male		0	0	349208	7.8958		S
78	0	3	Moutal, Mr. Rahamin Haim	male		0	0	374746	8.05		S
83	1	3	McDermott, Miss. Brigdet Della	female		0	0	330932	7.7875		Q
88	0	3	Slocovski, Mr. Selman Francis	male		0	0	SOTON/OQ.352086	8.05		S
96	0	3	Shorney, Mr. Charles Joseph	male		0	0	374910	8.05		S
102	0	3	Petroff, Mr. Pastcho ("Pentcho")	male		0	0	349215	7.8958		S
108	1	3	Moss, Mr. Albert Johan	male		0	0	312991	7.775		S
110	1	3	Moran, Miss. Bertha	female		1	0	371110	24.15		Q
122	0	3	Moore, Mr. Leonard Charles	male		0	0	A4. 54510	8.05		S
127	0	3	McMahon, Mr. Martin	male		0	0	370372	7.75		Q
141	0	3	Bailey, Mrs. Joseph (Susan)	female		0	0	31678	16.3469		C

Model View:



The screenshot shows the Power BI Desktop interface in Model View. The main area displays a table named 'train' with a list of fields: Age, Cabin, Embarked, Fare, Name, Parch, PassengerId, Pclass, Sex, SibSp, Survived, and Ticket. The Properties pane on the right shows the selected table and its fields. The Fields pane on the right shows the selected table and its fields.

train
Age
Cabin
Embarked
Fare
Name
Parch
PassengerId
Pclass
Sex
SibSp
Survived
Ticket

Power Query Editor:

The screenshot shows the Power Query Editor window with the title bar 'Untitled - Power Query Editor'. The ribbon includes 'File', 'Home', 'Transform', 'Add Column', 'View', 'Tools', and 'Help'. The 'Home' tab is active, showing options like '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: Whole Number', 'Use First Row as Headers', 'Replace Values', and 'Combine'. The 'Queries' list on the left shows a query named 'train'. The main area displays a table with 12 columns and 891 rows. The first three columns are 'Name', 'Sex', and 'Age'. The 'Name' column contains names like 'Braund, Mr. Owen Harris', 'Cumings, Mrs. John Bradley (Florence Briggs Thayer)', 'Heikinen, Miss. Laina', etc. The 'Sex' column contains 'male' and 'female'. The 'Age' column contains numerical values. The status bar at the bottom indicates '12 COLUMNS, 891 ROWS' and 'Column profiling based on top 1000 rows'. The right sidebar shows 'Query Settings' with 'Name' set to 'train' and 'Applied Steps' including 'Source', 'Promoted Headers', and 'Changed Type'.

	Name	Sex	Age
1	Braund, Mr. Owen Harris	male	
2	Cumings, Mrs. John Bradley (Florence Briggs Thayer)	female	
3	Heikinen, Miss. Laina	female	
4	Futrelle, Mrs. Jacques Heath (Lily May Peel)	female	
5	Allen, Mr. William Henry	male	
6	Moran, Mr. James	male	
7	McCarthy, Mr. Timothy J	male	
8	Palsson, Master. Gosta Leonard	male	
9	Johnson, Mrs. Oscar W (Elisabeth Vilhelmina Berg)	female	
10	Nasser, Mrs. Nicholas (Adele Achem)	female	
11	Sandstrom, Miss. Marguerite Rut	female	
12	Bonnell, Miss. Elizabeth	female	
13	Saunderscock, Mr. William Henry	male	
14	Andersson, Mr. Anders Johan	male	
15	Vestrom, Miss. Hulda Amanda Adolfina	female	

Advanced Editor:

The screenshot shows the Power Query Editor with the 'Advanced Editor' window open. The 'train' query is selected. The M code in the editor is as follows:

```
let
    Source = Csv.Document(File.Contents("C:\Users\rahul\OneDrive\greyatom\titanic\train.csv"),[Delimiter=";", Columns=12, Encoding=1252],
    #"Promoted Headers" = Table.PromoteHeaders(Source, [PromoteAllScalars=true]),
    #"Changed Type" = Table.TransformColumnTypes(#"Promoted Headers",{{"PassengerId", Int64.Type}, {"Survived", Int64.Type}, {"Pclass", Int64.Type}},
in
    #"Changed Type"
```

The status bar at the bottom indicates '12 COLUMNS, 891 ROWS' and 'Column profiling based on top 1000 rows'. The right sidebar shows 'Query Settings' with 'Name' set to 'train' and 'Applied Steps' including 'Source', 'Promoted Headers', and 'Changed Type'.