

Project Development Phase

Delivery of Sprint-1

Date	31 OCT 2022
Team ID	PNT2022TMID33778
Project Name	Analytics for Hospitals' Health-Care Data

Project Development Phase:

Sprint-1:

- Data Collection
- Data Preparation

Sprint-2:

- Data Exploration

Sprint-3:

- Dashboard
Creation

Sprint-4:

- Report Creation
- Story Creation

ANALYTICS FOR HOSPITAL HEALTHCARE

TEAM MEMBERS:

Team lead

AGS Jimson

Team member 1

Venciya R

Team member 2

Vishnu K

Team member 3

Tamil kumaran C

Sprint-1:

Data Collection: Download the Dataset Dataset link :

https://drive.google.com/drive/folders/1qozDgfVw04hGS8Di_SFhUNdUKUdjkhT?usp=sharing

Load the Dataset:

Tool used: IBM Cognos Analytics

The screenshot displays the IBM Cognos Analytics user interface. At the top, a dark blue header bar contains the text "IBM Cognos Analytics with Watson" on the left, a notification area in the center showing "6 items open" with a dropdown arrow and a "28" badge, and a search bar on the right labeled "Search content". To the right of the search bar are icons for help, notifications, and the user profile.

Below the header, a file upload progress bar is visible. It shows two files being uploaded: "Reading train_data.csv..." and "Reading test_data.csv...". Each file has a blue progress bar and a "Cancel Details" link to its right. On the left side of this section, there is a "Watch video" button and a "Take a pr..." button.

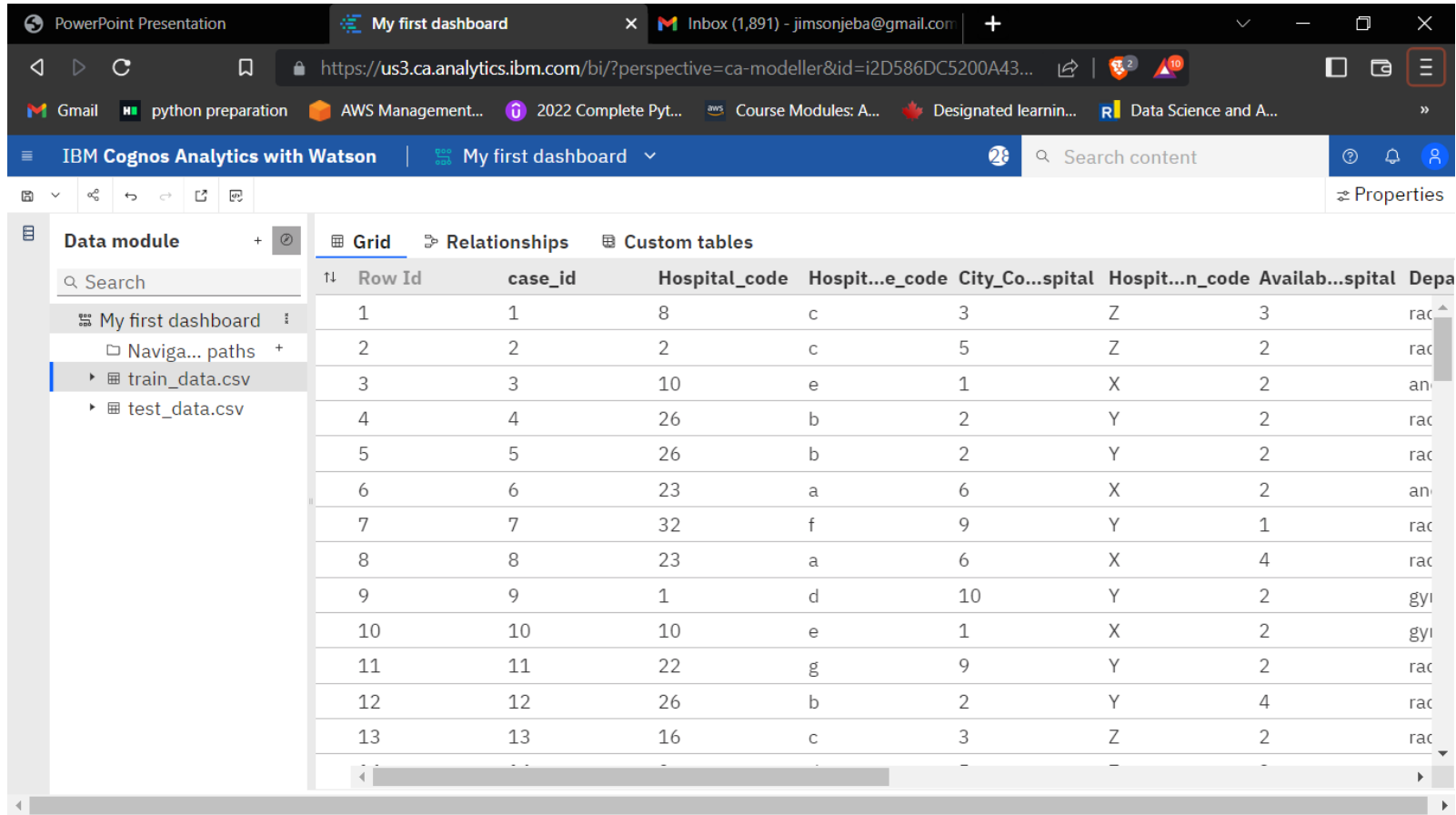
Below the progress bar, a "Quick launch" section is visible, featuring four large, light gray tiles with blue icons and text:

- Upload data**: Upload or drag and drop spreadsheets, csv files, and other data sources.
- Prepare data**: Use data modules to clean and connect data from multiple resources.
- Exploration**: Quickly find unbiased answers by identifying trends in your data with data explor...
- Present data**: Create sophisticated, multi-page, multi-query dashboards, reports, or stori...

At the bottom of the interface, there is a navigation bar with two tabs: "Get started" (which is selected and highlighted with a blue underline) and "Recent".

Data Preparation:

Prepare the Dataset



The screenshot shows the IBM Cognos Analytics web interface. The browser tabs include 'PowerPoint Presentation', 'My first dashboard', and 'Inbox (1,891) - jimsonjeba@gmail.com'. The address bar shows a URL from 'us3.ca.analytics.ibm.com'. The page header includes 'IBM Cognos Analytics with Watson' and a search bar. The left sidebar shows a 'Data module' with a search bar and a list of items: 'My first dashboard', 'Navigation paths', 'train_data.csv', and 'test_data.csv'. The main content area displays a table with columns: 'Row Id', 'case_id', 'Hospital_code', 'Hospit...e_code', 'City_Co...spital', 'Hospit...n_code', 'Availab...spital', and 'Depa'. The table contains 13 rows of data.

Row Id	case_id	Hospital_code	Hospit...e_code	City_Co...spital	Hospit...n_code	Availab...spital	Depa
1	1	8	c	3	Z	3	rac
2	2	2	c	5	Z	2	rac
3	3	10	e	1	X	2	an
4	4	26	b	2	Y	2	rac
5	5	26	b	2	Y	2	rac
6	6	23	a	6	X	2	an
7	7	32	f	9	Y	1	rac
8	8	23	a	6	X	4	rac
9	9	1	d	10	Y	2	gyl
10	10	10	e	1	X	2	gyl
11	11	22	g	9	Y	2	rac
12	12	26	b	2	Y	4	rac
13	13	16	c	3	Z	2	rac

Null Values Cleaning Process :

The screenshot shows the IBM Cognos Analytics web interface. At the top, there's a browser window with multiple tabs including 'PowerPoint Presentation', 'My first dashboard', and an email inbox. The main interface has a header with 'IBM Cognos Analytics with Watson' and a search bar. A 'Create calculation' dialog is open, showing the name 'City_Code_Patient'. The 'Components' panel on the left lists various functions, with 'Operators' selected. The 'Expression' field contains the following SQL-like code:

```
1 IF ( City_Code_Patient IS missing )  
2 THEN ( median (City_Code_Patient))  
3 ELSE (City_Code_Patient)
```

Below the expression field is an 'Information' section. At the bottom of the dialog, there is a checkbox labeled 'Calculate after aggregation' which is currently unchecked, and two buttons: 'Cancel' and 'OK'.

PowerPoint Presentation

* My first dashboard

Inbox (1,891) - jimsonjeba@gmail.com

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Create calculation

Name Bed Grade

Components

Expression

1 IF (Bed_Grade is missing) THEN (median (Bed_Grade)) ELSE (Bed_Grade)

Information

median (expression [auto])
median (expression for [all | any] expression { , expression })
median (expression for report)
Returns the median value of selected data items.

☐ Calculate after aggregation

Cancel

OK

Hospital Data :

PowerPoint Presentation | * My first dashboard | Inbox (1,891) - jimsonjeba@gmail.com | +

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IBM Cognos Analytics with Watson | * My first dashboard | Search content | Properties

Data module | Grid | Relationships | Custom tables

Search

City...spital

Hosp...ode

Avail...pital

Depa...ent

Ward_Type

Ward...ode

Bed Grade

patientid

City...tient

Type ...sion

Seve...ness

Visit...tient

Age

Admi...osit

Stay

test_d...a.csv

Hospital_code	Hospit...e_code	City_Co...spital	Hospit...n_code	Availab...spital	Department	Ward_Type
8	c	3	Z	3	radiotherapy	R
2	c	5	Z	2	radiotherapy	S
10	e	1	X	2	anesthesia	S
26	b	2	Y	2	radiotherapy	R
26	b	2	Y	2	radiotherapy	S
23	a	6	X	2	anesthesia	S
32	f	9	Y	1	radiotherapy	S
23	a	6	X	4	radiotherapy	Q
1	d	10	Y	2	gynecology	R
10	e	1	X	2	gynecology	S
22	g	9	Y	2	radiotherapy	S
26	b	2	Y	4	radiotherapy	R
16	c	3	Z	2	radiotherapy	R

PowerPoint Presentation

* My first dashboard

Inbox (1,891) - jimsonjeba@gmail.com

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📄 Bed Grade

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▶ abc Age

📄 Admi...osit

▶ abc Stay

▶ 📄 test_d...a.csv

📄 Grid

🔗 Relationships

📄 Custom tables

↕	Bed Grade	City_Co...atient	Row Id	case_id	Hospital_code	Hospit...e_code	City_Co...spital	Hosp
3	8	16	16	16	6	a	6	X
3	8	17	17	17	23	a	6	X
3	8	18	18	18	29	a	4	X
2	8	19	19	19	32	f	9	Y
2	8	20	20	20	12	a	9	Y
3	8	21	21	21	16	c	3	Z
3	8	22	22	22	3	c	3	Z
3	8	23	23	23	21	c	3	Z
3	8	24	24	24	6	a	6	X
1	8	25	25	25	26	b	2	Y
2	2	26	26	26	28	b	11	X
3	2	27	27	27	26	b	2	Y
3	2	28	28	28	26	b	2	Y

Prepared data link :

https://us3.ca.analytics.ibm.com/bi/?perspective=ca-modeller&pathRef=.my_folders%2FMy%2Bfirst%2Bdashboard