

# DATAPLAY'S GOOGLE REVIEWS ANALYSIS

USING COUNT VECTORIZER AND WORD CLOUD

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### Objective

- DataPlay, an ed-tech company, has a wealth of user feedback in its Google reviews. We have the opportunity to work on this raw data to get valuable insights.
- ➤It is to see if this unstructured text data, directly impacts business strategies and customer satisfaction efforts.



#### Data collection

The raw data(online Google Reviews) is scraped into an Excel worksheet in the following manner. This first step of tokenization work is done by some of the interns on behalf of DataPlay.

		I VIIII VIII PRII
NAMES	RATING	GOGLE REVIEW COMMENT
Abhinav Bharat	5	
		That a rankastic experience at Datamag. The institute orners excellent training in data analysis, covering statistics, exceroperations, and mower or tools. The knowledgeaute institutions and comprehensive materials make it a top online roll aspiring data.
Divyanshu Choudhary	5	scientists. Highly recommended for quality education and hands-on learning!
Jatin Bhagtani	5	
Jinal Shukla	5	
مونك	5	
Konstrute Beset cest		
Kurakula Prashanth	4	
		According to me it's a very good place for learning with a good hearted teachers too.
		Most of institutes are not put efforts towards the students who are average but in DataPlay they put efforts for every single student and their teaching style is so nice because I'm new in that course I didn't wonder why I softly understand every single thing they
Mradul Shrotriya		thought me and it is possible just because of their student friendly teaching.
Nishita Sharma	5	Nishant sir and Mahima ma'am have outstanding sessions that help you gain clarity and improve your skills.
Prit Anand	5	Altogether it has been a great experience, the mentors are really helpful and does a very well job in making the classes engaging and interactive.
		2 days agoNew
		My overall experience was great. Mentors were incredibly supportive, effectively explaining tools and concepts through real-life scenarios. I gained valuable hands-on experience with Power BI and Excel, engaged in discussions about interview questions and
Rishabh Vaish	5	significantly improved my knowledge throughout the course.
Tejasvi Poonia	5	The explanations start from the very basics so the content is easy to understand while the assignments provide a route for application of concepts.
UTPALKUMAR BAY	5	DataPlay is an excellent learning place for aspiring Data Scientist & Data Analyst. I am currently enrolled in Data Science training program. The mentors are truly good hearted and experienced professionals who provide valuable guidance. They helps every student
Vaidik Asawa	5	I'm currently learning Data Analysis from here and its going well, started from the basics at a very good pace. Sessions are very interactive. Good place to start.
Yaman Sain	5	

> We have a total of 58 entries of Google reviews from which 17 entries show only rating (no text reviews).



#### Working tools

- MS Excel is used in the data preparation part with some advanced formulas like
- Text-to-columns tab with delimiter and Transpose (for Tokenization)
- UNIQUE and COUNTIF function ( for Count vectorizer)
- Power BI is used in the data analysis part where we imported and used:
- **OWORD CLOUD**



#### Data preparation

Now, we started our work by splitting each word of the GOOGLE REVIEW COMMENT column into multiple columns using text-tocolumns tab (with space as a delimiter)

ı	had	a	fantastic	experienc	at	DataPlay.	The	institute	offers	excellent	training	in	data	analysis,
According	to	me	it's	а	very	good	place	for	learning	with	а	good	hearted	teachers
_	sir	and		ma'am	have	outstandi		that	help	you	gain	clarity	and	improve
Altogethe		has	been	a	great	experienc			are	really	helpful	and	does	а
Aitogetile		IIUS	been	u	Bicat	CAPCITETIC	tire	mentors	uic	rearry	ncipiui	unu	GOCS	u



#### Data preparation (cont.)

- Then we copied the multiple columns, and pasted into one column 'Value' with the help of Transpose as columns.
- The UNIQUE function is used on this new column to get only Unique words in the data.
- Finally, the **COUNTIF** function works to obtain the frequency of these Unique values.

Value	Uniquevalues	Frequency
I	l	8
had	had	1
a	a	29
fantastic	fantastic	1
experience	experience	7
at	at	5
DataPlay.	DataPlay.	1
The	The	43
institute	institute	2
offers	offers	2
excellent	excellent	3
training	training	5
in	in	13
data	data	23
analysis,	analysis,	1
covering	covering	1
statistics,	statistics,	1
Excel	Excel	3
operations,	operations,	1



#### Analysis and report

- >Here comes the need for Power BI
- > WORD CLOUD is formed with the columns calculated in Excel before i.e. Unique values and their Frequencies.
- Here we saw some words (The, is, are, I, etc.) have high frequencies which make the analysis errorsome as these words don't give any direction to our analysis.
- So we made sure that these STOP WORDS are removed.



\*\*Initially, we have taken all those words with a minimum no. of repetitions as 1. So, there are so many words in the visual. Further, we will try some with higher frequencies.\*\*



### Analysis and report (cont.)

- ➤ Now, to understand the data more precisely, we took only the words with minimum no. of repetitions = 3
- Now easy to notice the words like good, great, exceptional, valuable, supportive, outstanding, nice, friendly, understanding, helpful, perfect, engaging, excellent, clarity etc. which show clear positive vibes among the candidates.





#### Analysis and report (cont.)

For a clearer view, we again considered words with even more frequency, we saw the word 'supportive' coming 5 times and 'nice' 10 times, which indicates a favourable situation for students.





\*\*words with minimum no. of repetitions = 5

\*\* words with minimum no. of repetitions = 10



### Analysis and report (cont.)

> Finally, we thought of watching the words only with a minimum no. of 15 repetitions.





- Here 'Good' and 'great' are coming 26 and 20 times respectively. Now here comes an interesting part.
- From all entries, (58-17) = 41 people have given their valuable reviews; so, 'Good' and 'great' are appearing approx. 63% and 48% times respectively.
- > Therefore, this organization is a pleasant experience for the on-board learners!



# Thank You!