

## #Task 2

### Problem Statement:

How impactful Widhya's platform has been for the students and whether students actually like working on our platform or not.

Analysis:

We have divided the entire analysis section into two section

1. Platform and Widhya's Learning/Training process review
2. Content/Microtask review

For platform review analysis we have compiled responses from all the students, where for content (Micro-tasks) review analysis, we have considered different category wise.

Lastly, our report consists of a general analysis of how people loved "Widhya" as a learning website.

### 1. Widhya Platform & training/learning approach review Analysis:

#### a. Platform rating:

Based on the survey results on how students rate "Widhya" platform UI out of 10, we found 93% students has rated it over 6, while 73% over 7. Below is the rating details:

Rating	Number of students rated this
9	24
8	20
7	15
10	10
6	4
5	1
4	1

Table1: Ratings vs number students rated

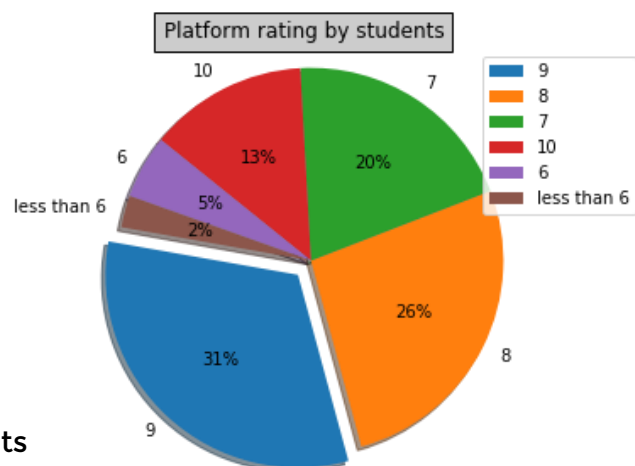


Figure 1: Rating distribution by students on Platform Look

#### b. Widhya methodology of "Learning by doing":

Based on the survey results on how students liked "Widhya" way of learning, i.e. "learning by doing", It's found that 98.7% found this quite

useful while only rest were not able to adopt this. Based on their ratings, 97% students rated “Widhya” way of learning more than 6 and 84% rated more than 7.

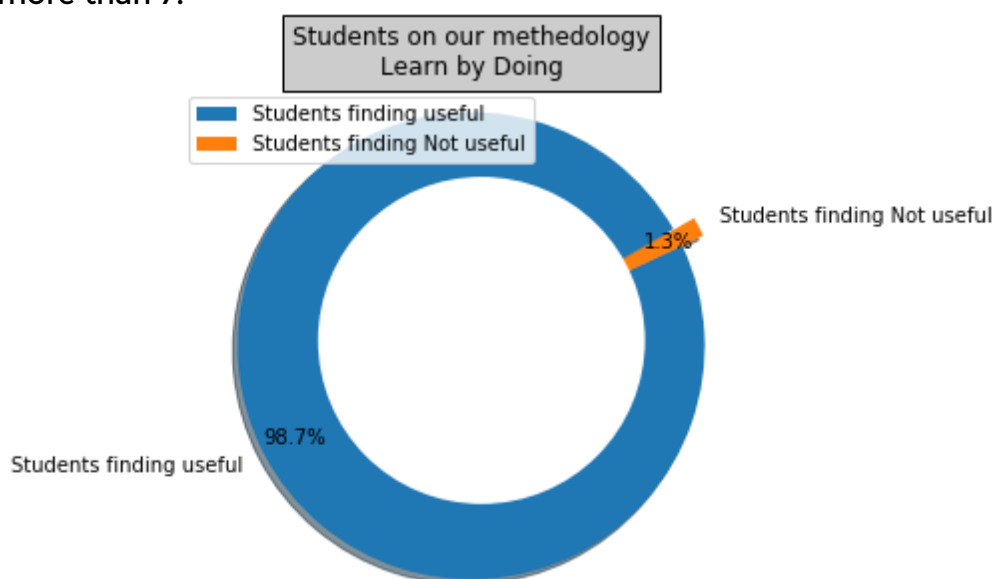


Figure 2: Ratio of student finding Widhya Learn By doing effective approach or not

Below is the rating details:

Rating	Number of students rated this
9	25
10	19
8	18
7	10
6	2
5	1

Table2: Ratings vs number students rated

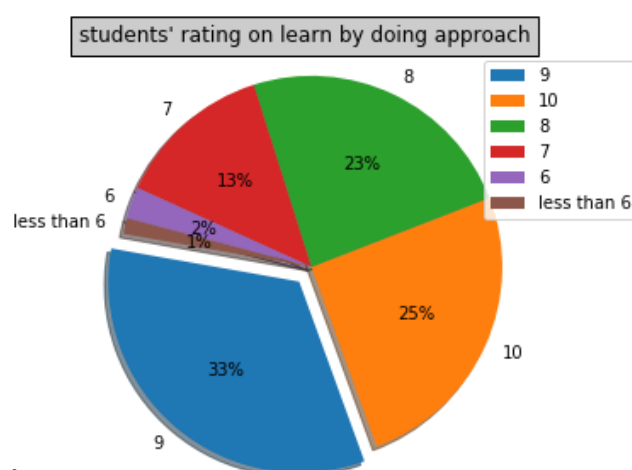


Figure 3: Student ratings on Widhya's Learn by doing approach

Moreover, we also asked student how engaged they were with Widhya's learning process. Compiling their responses, we found 96% agreed they were engaged while the rest of 4% students were not sure about their engagement with the learning process. Most important thing to notice is that 0% told they were not engaged which really reveals the strength of Widhya's training/learning model.

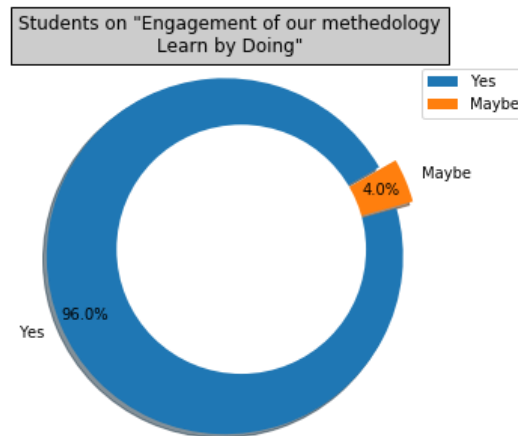


Figure 4: Students on their engagement with Widhya's way of learning

c. Platform satisfaction:

As per responses received, 89% students are satisfied with Widhya's platform if we set threshold 7 on a rating out of 10. 89% students have rated Widhya platform as 7 or more while rest has rated below 7. Majority of students have rated the platform 8 (31%), which tells that platform is one thing that needs to be improved.

## 2. Widhya Mission Contents review

a. Data Science Mission

Out of 75 responses, 42 responses were based on data science and majority of students explored the data science mission.

i. Finding Mission effectivity

From the 42 data science responses, 34 students found the mission was effective which is 81%. While 11.9% were not sure about effectiveness, 7.1% students totally declined.

Effectivity	Number of students opting for
Yes	34
May be	5
No	3

Table3: Students on mission effectivity

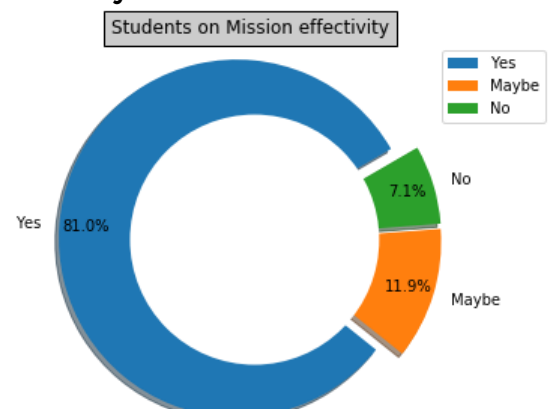


Figure 5: Students on Mission effectivity

They have also rated effectivity in a scale out of 10 and it's found that 72% students

have rated it more than 7 while 49% rated it highly effective (more than 8)

Rating	Number of students rated this
9	12
8	10
10	9
7	6
6	2
1	2
5	1

Table4: Students rating on mission effectivity

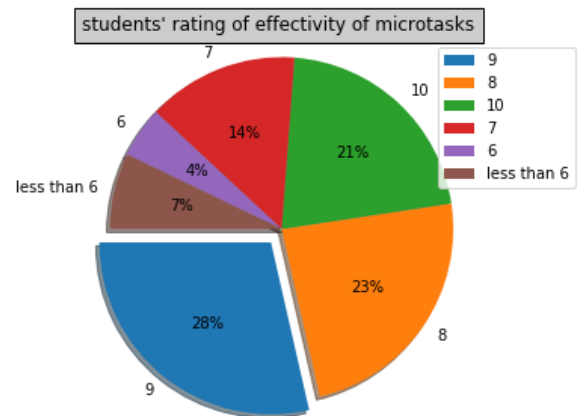


Figure 6: rating on mission effectivity

## ii. Difficulty of Mission:

Based on rating out of 5 on difficulty of the data science mission, majority of students has rated as 2 which means it was comparatively easy. 14.3% students has rated as 1 denoting it was too easy for them. Only 7.1% has rated as 4 (Kind of difficult) while none has rated 5 (difficult)

Difficulty(5 high,1 low)	Number students rated
2	22
3	11
1	6
4	3

Table5: Students on mission difficulty

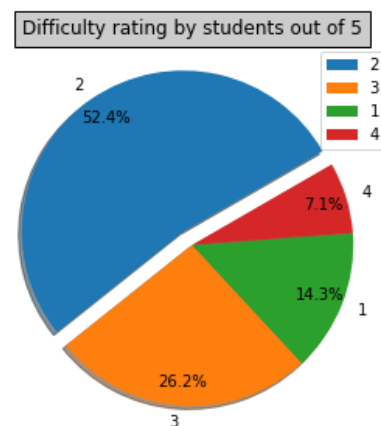


Figure 7: Difficulty level rating out of 5

### iii. Quality of Micro-tasks

87% students rated quality of micro-tasks more than 6 while majority rated as 8. 42% students has rated the quality highly (more than 8). Below is the full stat of the ratings.

Ratings	Number of students rated
8	13
9	10
10	8
7	5
6	2
5	1
4	1
3	1
2	1

Table6: students on task quality

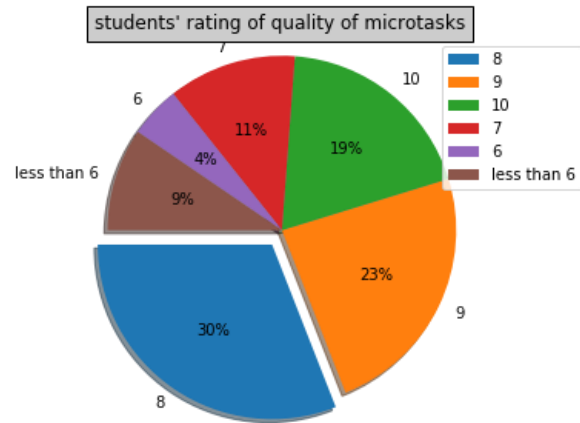


Figure 8: Quality of content rating out of 10

### iv. Widhya Setting a learning curve for data science aspirants

While surveying we also asked students whether our data science mission has been able to set a learning curve for them or not. 95.2% students agreed that we have set a learning path for them while others denied.

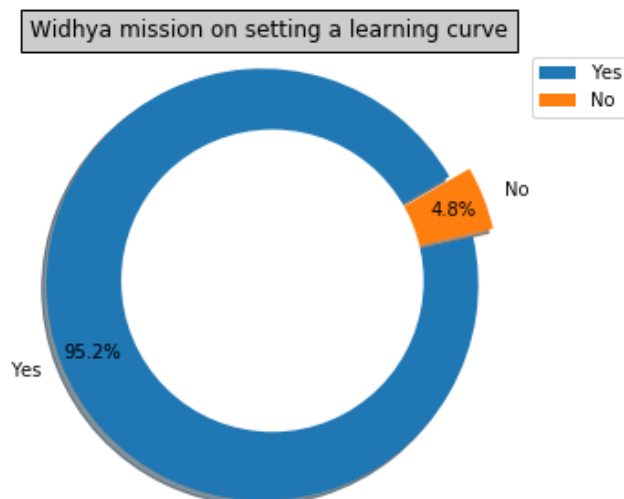


Figure 9: Widhya Data science mission setting a learning curve for the students

- v. **Data Science Mission weighted rating:**  
Based on students rating on quality and effectivity of the missions we have generalized total rating giving both the features equal weightage

$$Overall_{rating} = \frac{quality_{rating} + effectivity_{rating}}{2}$$

$Overall_{rating}$  itself takes a value within the range [1,10]

Based on our analysis of  $overall\_rating$  we classified people who liked “Widhya Data Science Mission” and who didn’t, by setting threshold=7. It’s found that 85.7% liked our data science mission whereas rest has rated below 7 overall.

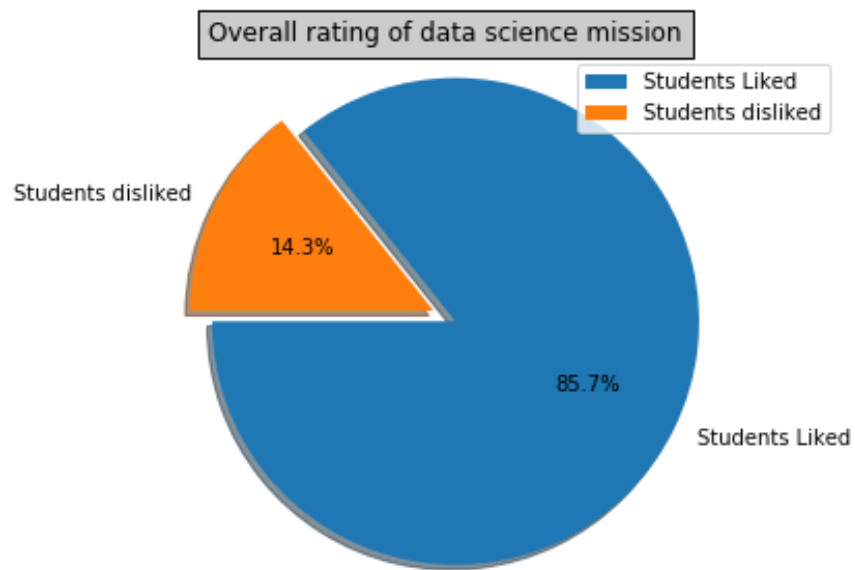


Figure 10: Overall rating of students on data science mission

b. Full Stack Development Mission

Out of 75, 25 students opted for Full stack development mission and this is the second most explored mission out of the three.

- i. **Mission effectivity:**  
From the 25 Full Stack Development responses, 23 students found the mission was effective which is 92%, while 8% was not sure. None of the responses has denied totally stating mission ineffective.

Effectivity	Number of students opting for
Yes	23
May be	2

Table7: Full stack dev mission effectivity

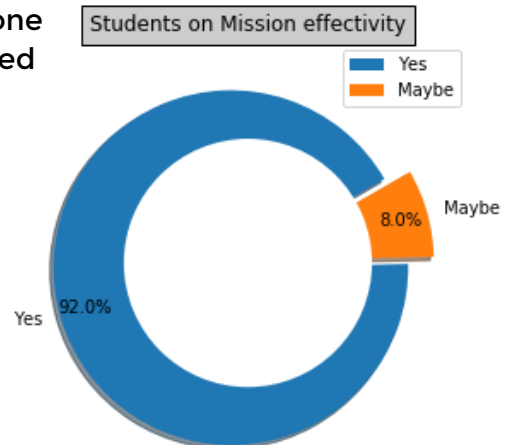


Figure 11: Students on Full stack Mission effectivity

They have also rated effectivity in a scale out of 10 and it's found that 65% students have rated it more than 7 while 34% rated it highly effective (more than 8)

Rating	Number of students rated this
8	8
9	6
10	3
6	3
7	2
5	2
4	1

Table8: Full stack effectivity rating

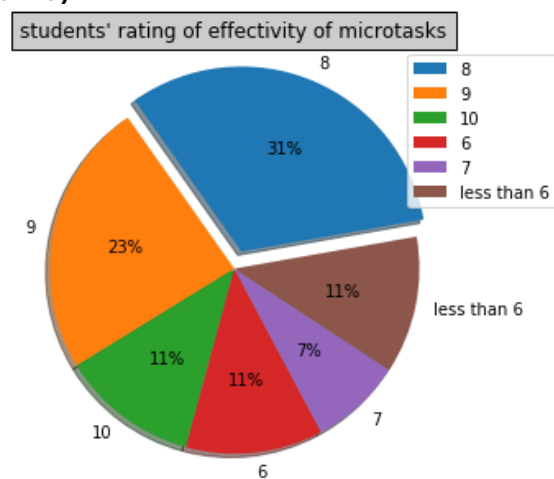


Figure 12: Effectivity ratings for Full stack mission

ii. Difficulty of Mission

Based on rating out of 5 on difficulty of the Full Stack Development mission, majority of students has rated as 3 which means it was average difficulty wise. 12% students has rated as 1 denoting it was too easy for them. 16% has rated as 4 (Kind of difficult) while none has rated 5 (difficult)

Difficulty(5 high,1 low)	Number students rated
3	9
2	9
1	4
4	3

Table9: Full stack difficulty rating

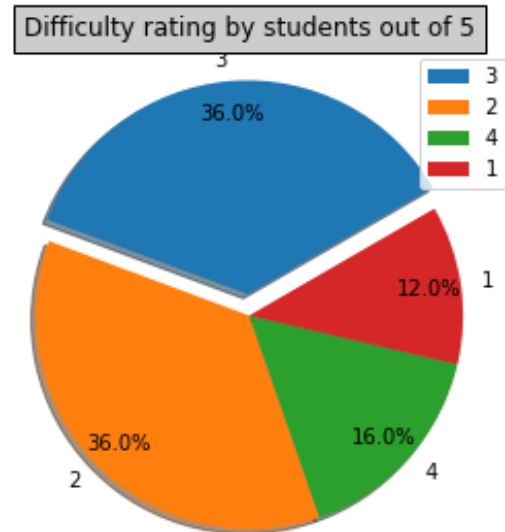


Figure 13: Difficulty rating for Full stack dev mission

iii. Quality of Micro-tasks:

86% students rated quality of micro-tasks more than 6 while majority rated as 8. 26% students has rated the quality highly (more than 8). Below is the full stat of the ratings.

Ratings	Number of students rated
8	8
7	6
9	4
10	3
6	2
5	2

Table10: Full stack quality rating

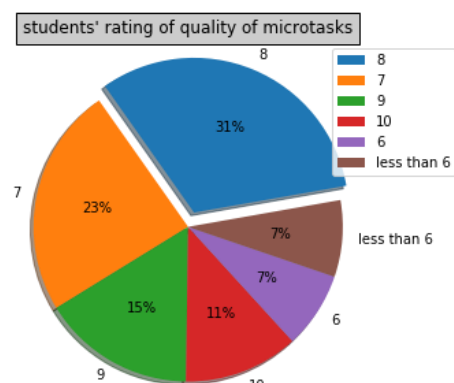


Figure 14: Quality of Full Stack Dev micro-tasks



iv. **Widhya Setting a learning curve for Full Stack aspirants**

While surveying we also asked students whether our Full Stack development mission has been able to set a learning curve for them or not. 96% students agreed that we have set a learning path for them while others denied.

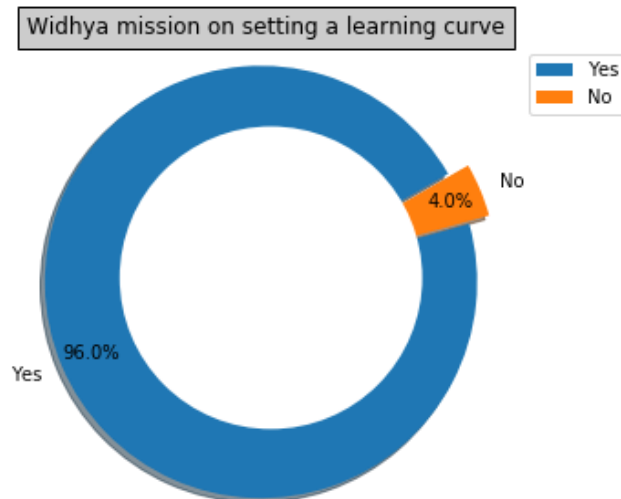


Figure 15:96% students agreed Widhya Full Stack setting a learning curve for them

v. **Full Stack Development Mission weighted rating:**

Based on students rating on quality and effectivity of the missions we have generalized total rating giving both the features equal weightage

$$Overall_{rating} = \frac{quality_{rating} + effectivity_{rating}}{2}$$

$Overall_{rating}$  itself takes a value within the range [1,10]

Based on our analysis of  $overall\_rating$  we classified people who liked “Widhya Full Stack development Mission” and who didn’t, by setting threshold=7. It’s found that 76% liked our data science mission whereas rest has rated below 7 overall.

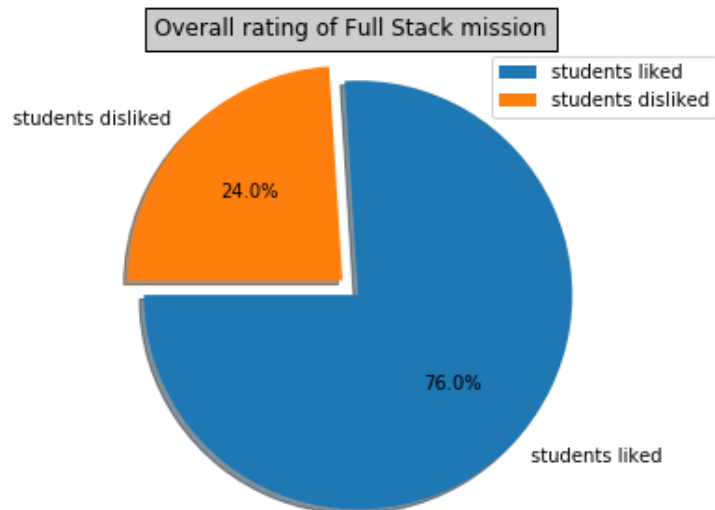


Figure 16: Overall rating on Full Stack mission

### C. NLP Mission

Out of 75, 8 students opted for NLP mission and this least explored mission out of the three.

#### i. Mission effectivity:

From the 8 NLP mission responses, 5 students found the mission was effective which is 62.5%, while rest was not sure. None of the responses has denied totally stating mission ineffective.

Effectivity	Number of students opting for
Yes	5
May be	3

Table11: NLP mission effectivity

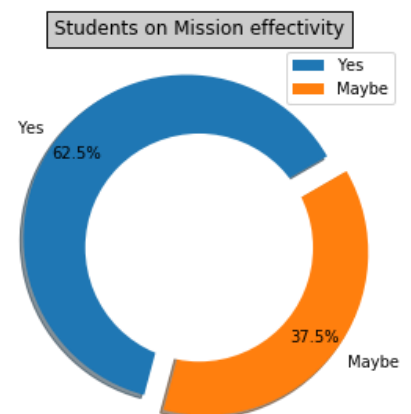


Figure 17: NLP mission effectivity

They have also rated effectivity in a scale out of 10 and it's found that 100% students have rated it more than 6 while 25% rated it highly effective (more than 8)

Rating	Number of students rated this
7	3
8	3
10	1
9	1

Table12: NLP mission effectivity rating

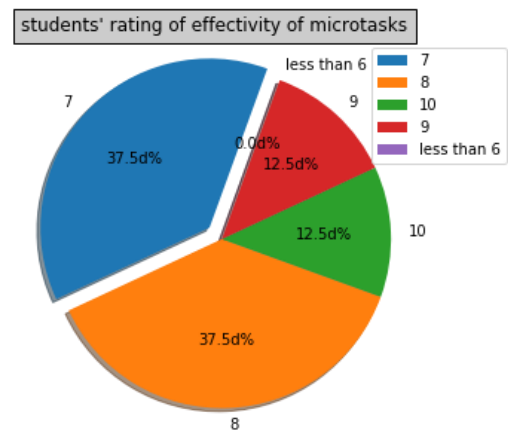


Figure 18: Effectivity rating of NLP missions

ii. Difficulty of Mission:

Based on rating out of 5 on difficulty of the NLP mission, majority of students has rated as 3 and 1 which means for a cluster of students it was average difficulty wise and for the another majority cluster it was easy. 25% students has rated as 4 denoting it difficult to some extent.

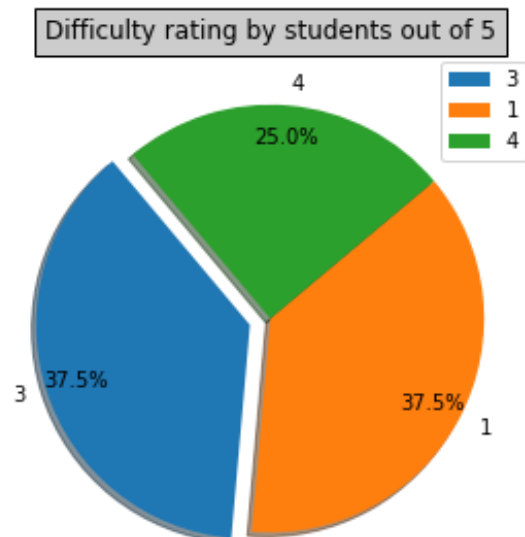


Figure 19: Difficulty rating for NLP mission

Difficulty(5 high,1 low)	Number students rated
3	3
1	3
4	2

Table13: NLP mission difficulty rating

- iii. **Quality of Micro-tasks:**  
75% students rated quality of micro-tasks more than 7 while majority rated as 10. 50% students has rated the quality highly (more than 8). Below is the full stat of the ratings.

Ratings	Number of students rated
10	2
9	2
8	2
7	1
6	1

Table14: NLP mission quality rating

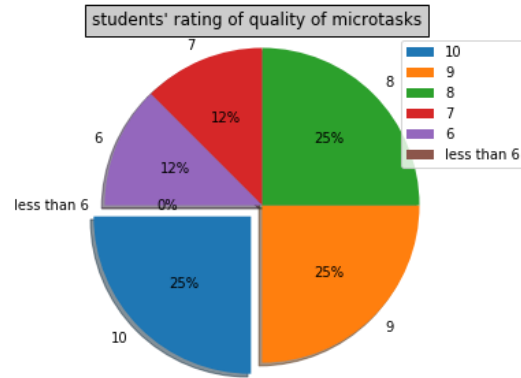


Figure 20: Quality of NLP micro-tasks

- iv. **Widhya Setting a learning curve for NLP aspirants**

While surveying we also asked students whether our NLP mission has been able to set a learning curve for them or not, 100% students agreed that we have set a learning path for them while others denied. That's an achievement!

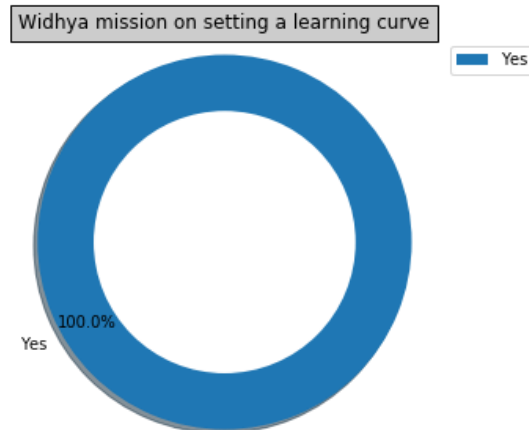


Figure 21:100% students agreed Widhya NLP setting a learning curve for them

- v. **NLP Mission weighted rating:**  
Based on students rating on quality and effectivity of the missions we have generalized total rating giving both the features equal weightage

$$Overall_{rating} = \frac{quality_{rating} + effectivity_{rating}}{2}$$

$Overall_{rating}$  itself takes a value within the range [1,10]

Based on our analysis of *overall\_rating* we classified people who liked “Widhya NLP Mission” and who didn’t, by setting threshold=7. It’s found that 75% liked our NLP mission whereas rest has rated below 7 overall.

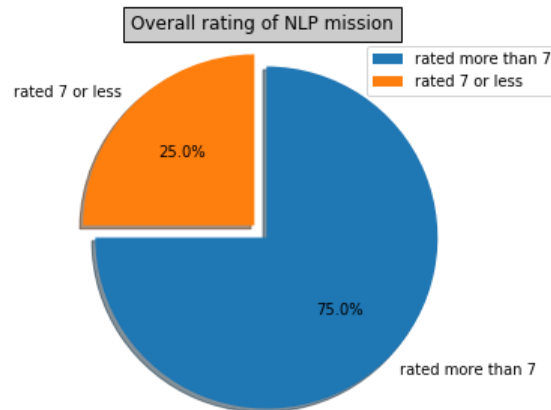


Figure22: Overall rating on NLP mission

#### Relative comparisons between Data science, Full stack Development & NLP Mission reviews

	No of students reviewed	Avg. rating of effectiveness(out of 10)	Avg. rating of difficulty(out of 5)	Avg. rating of quality(out of 10)	Number of students finding a learning graph(%)	Most frequent quality rating(out of 10)	Most frequent effectiveness rating (out of 10)	Most frequent difficulty rating(out of 5)	Overall weighted rating(out of 10)
Data science	42	8.07	2.26	7.97	95.2	8	9	2	8.02
Full stack Development	25	7.76	2.56	7.76	96	8	7	3	7.76
NLP	8	8.0	2.5	8.37	100	10	8	3	8.17

## Students on recommending Widhya as a learning medium

We also asked student how much they will rate us for recommending to others out of scale 1-10, where 10 defines extremely likely. Based on their rating we found that majority (31%) has rated as 10 which states that they are extremely likely to recommend us. 11% has rated below 7 which states their dissatisfaction on Widhya.

Below is the detailed stat.

Recommen- dation rating	Number of students rated
10	24
9	17
8	16
7	9
5	5
6	4

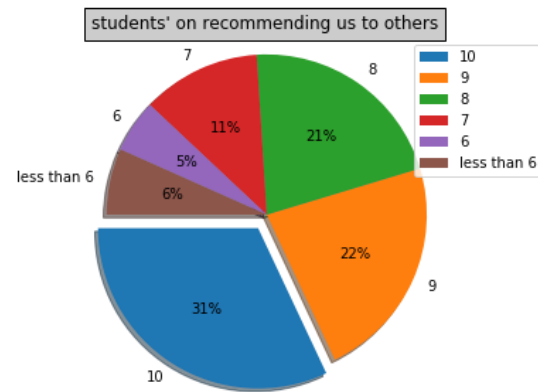


Figure 23: Students rating on recommending us

## Summarizing overall review analysis- How students liked us

Considering all the features, we have summarized a final rating for Widhya where we have considered some selective features and assigned weights based on their impact to analyse a learning platform.

The features we have selected is:

$$F = \{f_1, f_2, f_3, f_4, f_5, f_6, f_7\}$$

Where,

$$f_1 = \text{Platform look rating}$$

$$f_2 = \text{learning by doing effectivity rating}$$

$$f_3 = \text{micro - task difficulty ratings} * 2 \text{ (to normalize)}$$

$$f_4 = \text{micro - tasks quality ratings}$$

$$f_5 = \text{Micro - task effectivity ratings}$$

$$f_6 = \text{Platform satisfaction}$$

$$f_7 = \text{Recommendation rating}$$

Our final rating for each response is calculated as

$$R_j = \sum_{i=1}^7 w_i f_i$$

Where  $w_i$  corresponds to weighted assigned and vector  $W$  is:

$$W = [0.1, 0.1, 0.1, 0.1, 0.2, 0.2, 0.2]$$

After computing the final report we found avg. rating for Widhya is 7.89 where 80% students rated more than 7 while 20% 7 or below.

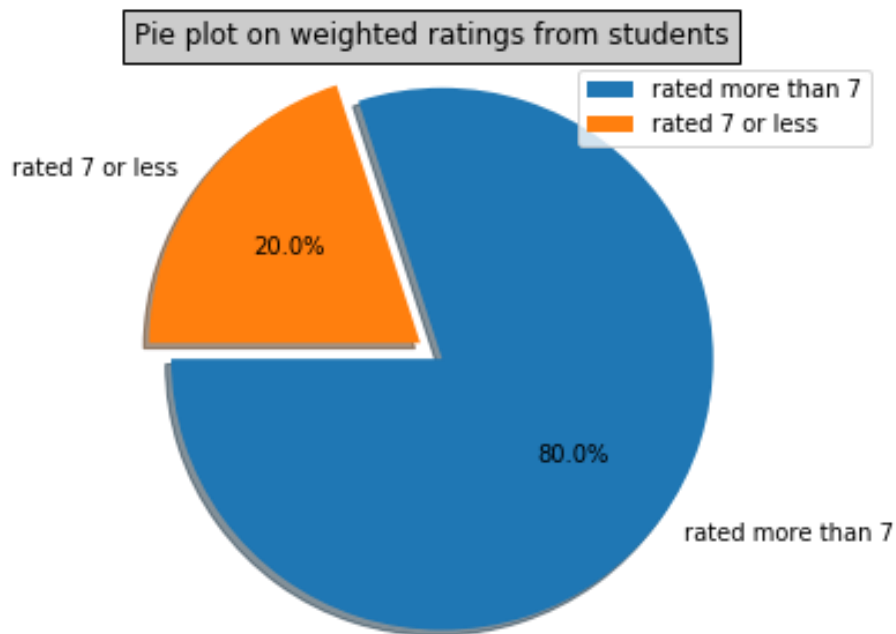


Figure 24: Final rating pie chart

### Conclusion and Comments

The above analysis simply reveals that majority of students liked Widhya and wants to recommend us. Though, average rating analysis clearly states that We need to work on different area like Platform look and increasing difficulty and quality of missions to engage more students on Future. Among the three missions, data Science stood out to be the most effective one while Full stack was not so effective comparatively. Quality wise , NLP mission stands out way ahead of the other two, but it may be due the less population(Number of students attempted) in the NLP ratings. Overall as a learning medium Widhya has a high growth graph considering more than 95% people liked “Widhya’s way of learning- Learn by Doing”.