System Usability Scale - First time evaluation

User task:

- 1. Ask the user to enter the note page.
- 2. Ask the user to find the group page and view the group task.
- 3. Ask users to read and understand the content on the main screen.
- 4. Ask users to find the social interface and see other people's profiles.
- 5. Ask the user to enter the course content interface and view others' study notes.
- 6. Users are required to enter the course content interface through the main interface.
- 7. Ask users to view daily tasks.
- 8. Ask users to check the group page.
- 9. Ask users to find out setting page.
- 10. Ask user go back to main page.

Our user tests are independent of each other, which ensures that our users can experience our prototype at a deeper level and can explore it for themselves. We believe this is a valuable and realistic way to reflect the flaws in our product design. After users complete the user test, we rate their usability and our team records all the data and calculates the total score.

Usability scale testing process

Our prototype was tested a total of 10 times on the usability scale, with each user performing the same user test session and completing the usability scale score. The average user time to complete our user tests was about 4 minutes, and the usability scale tests and feedback sessions were about 8 minutes, so the total testing time was closer to 2 hours, excluding the additional time spent connecting with users. During the test, the majority of users were proficient in the interaction between the pages and did not need additional guidance from us. We recorded the test results in the following table and processed the data.

	A	В	С	D	Е	F	G	Н	Ι	J	
1	4	5	5	4	5	5	4	3	4	3	
2	1	2	1	2	2	1	2	2	3	2	
3	5	5	5	4	4	5	4	5	5	4	
4	3	3	3	2	2	1	2	1	3	2	
5	5	4	5	4	5	5	4	5	4	4	
6	3	2	2	2	1	2	2	2	2	1	76.75
7	4	5	4	5	4	5	3	4	3	2	
8	3	2	2	1	1	2	2	2	2	2	
9	5	5	4	4	4	3	4	4	3	4	
10	1	1	2	1	2	3	1	2	1	3	
AVG	85	85	82.5	72.5	75	80	70	75	75	67.5	

SUS data processing:

- 1. For questions with odd numbers, subtract 1 from the score.
- 2. For questions with even numbers, subtract the score from 5.

The results are as follows:

	A	В	С	D	Е	F	G	Н	I	J	
1	3	4	4	3	4	4	3	2	3	2	
2	4	3	4	3	3	4	3	3	2	3	
3	4	4	4	3	3	4	3	4	4	3	
4	2	2	2	3	3	4	3	4	2	3	
5	4	3	4	3	4	4	3	4	3	3	
6	2	3	3	3	4	3	3	3	3	4	79.25
7	3	4	3	4	3	4	2	3	2	1	
8	2	3	3	4	4	3	3	3	3	3	
9	4	4	3	3	3	2	3	3	2	3	
10	4	4	3	4	3	2	4	3	4	2	
AVG	80	85	82.5	82.5	85	85	75	80	70	67.5	

Overall result analysis

As can be seen from the SUS score distribution table, when the system usability scale score is higher than 68, it is better than 50% of the products on the market, and when the final score of the system usability scale is higher than 80, it has reached the EXCELLENT range, which is acceptable to most users. The final test score of our product is 79.25, which belongs to GOOD, and most of the user feedback is acceptable.

	A	В	С	D	Е	F	G	Н	Ι	J	
1	3	4	4	3	4	4	3	2	3	2	3.2
2	4	3	4	3	3	4	3	3	2	3	3.2
3	4	4	4	3	3	4	3	4	4	3	3.6
4	2	2	2	3	3	4	3	4	2	3	2.8
5	4	3	4	3	4	4	3	4	3	3	3.5
6	2	3	3	3	4	3	3	3	3	4	3. 1
7	3	4	3	4	3	4	2	3	2	1	2.9
8	2	3	3	4	4	3	3	3	3	3	3. 1
9	4	4	3	3	3	2	3	3	2	3	3
10	4	4	3	4	3	2	4	3	4	2	3.3
AVG	80	85	82.5	82.5	85	85	75	80	70	67.5	

At the same time, from the average score of each point, we can see that most users think that the content of our project is too much, which may require a certain learning cost. At the same time, since the software itself is aimed at students, most of the content of the project is about professional knowledge, so a certain threshold may be required.

Final result

Through SUS test, we come to the following conclusions. In the following prototype iteration, we will focus on information display and function re-optimization, and conduct another SUS test for the prototype after the iteration and modification:

- 1. The score range of the project is 2.8 to 3.6, which is a relatively satisfactory result.
- 2. The final score of the project is 79.25, and there is room for further improvement.
- 3. The information displayed in the system is not comprehensive enough, and users are prone to misunderstanding.