

ORIGINAL ARTICLES

First-year orientation activities for students in School of preventive medicine and public health- Hanoi Medical University in 2022

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ABSTRACT

Objective: The orientation activity at the beginning of the school year is one of the important sessions for medical students, especially first-year students. Well-oriented medical students will contribute to training appropriate future medical human resources, especially in preventive medicine and public health with the motto that prevention is better than cure. To describe career orientation and feedback on the first-year orientation activities of medical students at the School of Preventive Medicine and Public Health in 2022.

Methods: A mix-method of quantitative and qualitative was conducted. We carried out quantitative interviews through self-completed questionnaires on 181 first-year students with three majors: Preventive Medicine Doctor, Bachelor of Public Health, and Bachelor of Nutrition. In addition, qualitative research was conducted through 3 focus group discussions on the above 3 majors.

Results: Orientation information came mainly from parents, and family members (55.2%) and from social networks (56.9%). Students generally had an understanding of their major with 22.7% of students was full understanding and 74% of those was partial understanding. Out of 79.6% of students were satisfied with their major and the reason for choosing the major showed were their performance capacity (46.5%) and their favourite (44.2%). Out of 53% of students rated as satisfied and 12.2% rated as very satisfied with the contents of the first-year orientation activities.

Conclusions: Students responded well to the orientation activities at the beginning of the year. Besides, further suggestions that it is necessary to have information shared by former graduates about job opportunities to access the realistic information and current situation.

Key word: Orientation activities, first-year students, preventive medicine, public health.

INTRODUCTION

Career orientation is a comprehensive and continuously updated educational concept to provide individuals (students) at training

institutions with information and experience, helping them to have good preparation for choosing future jobs (1). An overview of research in the world and in Vietnam shows that the choice of medical field was influenced



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by some factors including gender, physician parent, intent to inherit existing practice, career priority,...(2). Firstly, student's major choice was driven by family influence. Among 583 students at three Canadian universities, only 20% of respondents identified family medicine as their first career choice, and about 50% of those gave family medicine in their top three aspirations (3). Besides, one of the reasons that people think the medical occupation has more opportunities to have good job than other fields (2). A research in Bangladesh shows that the first reasons for choosing a specialty among medical students are personal interests and job opportunities (4). Meanwhile, a research among Malaysian medical students pointed out that an interest in medicine and helping people were the two main reasons for choosing medical school (5). Being aware of choosing major is a part of career orientation and plays an important role in their future work. According to a survey among students at Nguyen Tat Thanh University of Pharmacy in 2021, 63.5% of students reached a basic level of awareness of their choosing major meaning having adequate level of specialized knowledge (6). Speciality orientation needs to start at the beginning when students enter school for developing their career in the future.

In addition to major orientation, first-year orientation activities were held in the first 2 weeks when the first-year students entered the university. The content of these activities at the beginning of the school year helps students understand the information from the university, about their study plans, majors and future jobs. The orientation session is also a two-way exchange, helping the Board Council and the Training Department learn about students' aspirations to promptly have student support programs. Currently, many students after graduating are still struggling to find a job. Due to if they are good at their

profession but weak in skills and attitude, they still cannot meet the requirements of employers. Therefore, the orientation event at the beginning of the year helps you orient your career more clearly, determine the necessary conditions for future work, promote the value of your talents, satisfy your passion and meet your needs and meet labor market needs.

The study was conducted to survey the orientations of students in School of Preventive Medicine and Public Health to provide necessary information to help the Board Council and the Training Department of the university develop teaching and extracurricular activities course for students with the following objective: *"To describe career orientation and feedback on the first-year orientation activities of first-year students of the School of Preventive Medicine and Public Health Training in 2022"*

METHODS

Study design: A mix-method with qualitative and quantitative research. We conducted quantitative interviews through self-completed questionnaires on 181 first-year students with three majors: Preventive Medicine Doctor, Bachelor of Public Health, and Bachelor of Nutrition. In addition, qualitative research was conducted through 3 focus group discussions on the above 3 majors.

Research subjects: First-year students are studying at the School of Preventive Medicine and Public Health, Hanoi Medical University with 3 majors: Doctor of Preventive medicine, Bachelor of nutrition, Bachelor of health public. We selected first-year students studying at the School of Preventive Medicine and Public Health, Hanoi Medical University who voluntarily agreed to participate in the study. The participants were excluded when having health problems and cannot complete

the survey. Or subject was not present at the time of data collection.

Study time and Location: This study was carried out from October 2022 to October 2023 at School of Preventive Medicine and Public Health, Hanoi Medical University

Sample size and sampling method: In quantitative research, we selected all subjects that met the criteria for research. A total of 181 first-year students participated in the study. With qualitative research, we organized 3 Focus group discussions for each major: Doctor of Preventive Medicine, Bachelor of Public Health and Bachelor of Nutrition. Each group discussion consists of 4-6 students.

Research variables and indicators: In quantitative research, we use the following variables: 1. General information: Age, gender, major, current residence; 2. Students' major orientation: reasons for choosing career, information sources, desired major, knowledge of the industry, level of satisfaction with the major, reason for choosing the major; 3. Feedback from first-year orientation activities includes information learned, information desired to learn, and level of satisfaction of these activities. For qualitative research, the following groups of variables are used: 1. Major orientation of student: Reason for choosing school; Knowing what source to get to the school; Knowledge of the major; Level of satisfaction with major; Reasons for choosing a major; 2. Assessment of orientation activities at the beginning of the year: The information is known; Information that you don't know and want to hear; Level of satisfaction

Data collection: Research was conducted through online data collection. We used Redcap software to create a form according to a pre-prepared set of questions. The form

included the following sections: introducing and inviting subjects to participate in the study, confirming consent to participate in the study, a set of questions with detailed explanations in each section, phone number and email address of the team of investigators to clarify questions when necessary. After completing the form, we contacted the staff of the groups and sent the form via social networking platforms and email for participants to fill out the answer sheets themselves. Besides, in qualitative research, we contacted and invited subjects to participate in the research. During the group discussion, we took notes of the discussion and opinions of the participants.

Data analysis: Quantitative data collected directly using Redcap software on PC or Android/iOS interface. Analyzes was performed using STATA 15 software. Statistical data was used for analysis with mean, standard deviation for quantitative variables, frequency for qualitative variables. A statistical significance level of $\alpha = 0.05$ was applied. With qualitative data, the focus group discussion were recorded and then transcribed in to text. Analyzing qualitative results was according to content /topics.

Ethics approval: The study was approved by the Research Council of Hanoi Medical University according to Decision No. 1102/QD-DHYHN dated April 25, 2023. Subjects participating in the study were voluntary and had the right to withdraw from the study at any time of this research. The information subjects provide for the study was confidential and just for research purposes only.

RESULT

General information of research subjects

Table 1. General information about research subjects

	Frequency	Percent (%)
Sex		
Male	61	33.7
Female	120	66.3
Ethnic		
Kinh	166	91.7
Other	15	8.3
Accommodation		
Live with family	47	26.0
Living at a friend's house	19	10.5
In the dormitory	50	27.6
Rented	65	35.9
Major		
Doctor of Preventive Medicine	66	36.5
Bachelor of Nutrition	69	38.1
Bachelor of Public Health	46	25.4

Table 1 shows that most study subjects were women (66.3%). Current residence was mainly rented (35.9%); in dormitory (27.6%) and 26% live with family. The major of

preventive medicine doctors accounted for 36.5%; Bachelor of nutrition was 38.1% and Bachelor of Public Health was 25.4%.

Major orientation of students

Table 2. Situation of students ' major orientation

	Frequency	Percent
Reason for orientation	181	100
Family/parental orientation	54	29.8
Having family members who work in medicine	9	5.0
Likes studying at Hanoi Medical University	107	59.1
Other: reputation, many job opportunities,....	11	6.1
Oriented information source (multiple choices)		
Parents/siblings/family members	100	55.2
Teachers/friends	67	37.0
Social networking sites	103	56.9
Websites of the Ministry of Education and Ministry of Health	77	42.5
Admissions consultation from the Hanoi medical University website	58	32.0
The first aspiration		
Doctor of Preventive Medicine	41	22.7

	Frequency	Percent
Bachelor of Nutrition	46	25.4
Bachelor of Public Health	24	13.3
Other: Other majors, other schools,..	70	38.7
Level of knowledge about the major		
Comprehensive knowledge	41	22.7
Partial knowledge	134	74.0
Don't know at all	6	3.3
Level of satisfaction with the major		
Completely satisfied	24	13.3
Satisfied	144	79.6
Unsatisfied	13	7.2
The reason of choosing the major		
Family/parental orientation	31	17.1
Own preferences	80	44.2
Yourself capacity is enough to choose major	66	46.5
Other	4	2.2

Table 2 showed that most reasons for choosing a school were because they liked studying at Hanoi Medical University (59.1%). Orientation information came mainly from parents, family members (55.2%) and from social networking sites (56.9%). Students' first choice was mainly another major (38.7%). Only 22.7% of students had full understanding of their chosen major, and 74% had partial understanding. 79.6% of students were satisfied with the major they are studying and the reason for choosing the major shows that 46.5% were because they had enough their capacity in these majors and 44.2% answered because they liked to study this major.

Reason for choosing university: Almost student said that because of orientation from relatives, reputation of the school,...

"My dad and uncle work in a nutrition company."/; *"Highly reputable school, close to my home."* (Bachelor of Nutrition student).

"Because the school is in the top medical

field in Vietnam." (Bachelor of Public Health student).

"Because Hanoi Medical University is the top school in medical training." (Doctor of Preventive Medicine student).

Besides, there were reasons from personal feelings: *"I have dreamed of entering this school since middle school."* (Bachelor of Public Health student).

"The medical school has a good learning environment and a high chance of getting a job after graduation." (Doctor of Preventive Medicine student)

Know what source to get information about the university: From high school teacher, family, relatives,...

"The homeroom teacher has direction for me." (Bachelor of Nutrition student).

"From family, friends, teachers, mass media". *"I knew about it through the Internet and from my previous classmates in high school."*

(Bachelor of Public Health student).

“From parents’ direction and my own research through websites, newspapers, radio, and television.” (Doctor of Preventive Medicine student).

Knowledge of the major: Students mostly had knowledge about their professions and future jobs

Nutrition: *“Even though I know there are some universities that offer nutrition training, but with training at medical school, there are many job opportunities at hospitals, companies, and gyms.”*

Public Health: *“Opportunities to work at medical centers, health ministries, local health stations; average income; many opportunities.”*

“Hospitals, research institutes; income is probably in the low-average range; little development opportunity”.

“Being an Environmental Health Scientist, Public Health Advisor; income can be in the mid-high range; There may be many opportunities for development.”

“Industry lecturers; low income; There are not many opportunities for development.”

Preventive Medicine: *“The Preventive Medicine Doctor field is a medical field of study and requires 6 years of university study, from basic medical subjects to specialized subjects.”*

“There are opportunities to work in clinics and medical facilities from commune to district, provincial and central levels.”

“The Preventive Medicine major that I am studying can later help me work in hospitals, basic health care facilities, research institutes, etc. Great development opportunity.”

Level of satisfaction with major

Most students were quite satisfied and rated it from 7 to 8 points on a 10-point scale:

“I am quite satisfied with the major I studied.” (Doctor of Preventive Medicine student)

Reasons for choosing a major

“From reality, there are many job opportunities at hospitals, food companies, and nutrition consulting companies.” (Bachelor of Nutrition student)

“Helping people around”; “Because I love the medical profession”; “Because my academic performance is too low, I have enough points to enter this field.” (Bachelor of Public Health student)

“Due to my own research and feeling quite suitable”; “Because I personally like it and find myself quite suitable for this industry after doing some research, and also have the consent and support of my family.” (Doctor of Preventive Medicine student)

Student feedback on first-year orientation activities

Table 3. Level of understanding and satisfaction with information in the orientation activities at the beginning of the year

	Frequency	Percent
Level of understanding of information		
<i>Administrations</i>		
Not mentioned	1	0.6
Mention some information	59	32.6
Mention complete information	121	66.9
<i>Union-Association-Club</i>		
Not mentioned	3	1.7
Mention some information	57	34.5
Mention complete information	121	66.9
<i>Learning methods</i>		
Not mentioned	2	1.1
Mention some information	65	35.9
Mention complete information	114	63.0
<i>Evaluation and feedback methods</i>		
Not mentioned	1	0.6
Mention some information	57	31.5
Mention complete information	123	68.0
<i>Training regulations and student work regulations</i>		
Not mentioned	2	1.1
Mention some information	46	25.4
Mention complete information	133	73.5
<i>Information about the major</i>		
Not mentioned	4	2.2
Mention some information	79	43.6
Mention complete information	98	54.1
<i>Instructions for using the library</i>		
Not mentioned	0	0
Mention some information	42	23.2
Mention complete information	139	76.8
<i>Residence-related issues and dormitory</i>		
Not mentioned	4	2.2
Mention some information	61	33.7
Mention complete information	116	64.1
<i>Health insurance</i>		
Not mentioned	3	1.7
Mention some information	53	29.3
Mention complete information	125	69.1
Level of satisfaction		

	Frequency	Percent
Very unsatisfied	7	3.9
Unsatisfied	1	0.6
Normal	55	30.4
Satisfied	96	53.0
Very satisfied	22	12.2

Table 3 showed that the information most fully known to students in the first course activities was the regulations on training and student work (73.5%); library use (76.8%); Health insurance (69.1%). In contrast, information about majors was provided less (54.1%). There was 53% of students rated as satisfied and 12.2% rated as very satisfied with the contents of the first-year orientation activities.

The information was provided in this course

Mainly know information related to studying...

“I learned about the class schedule, exam schedule as well as support from the teaching staff.” (Bachelor of Nutrition student)

“Learn about training regulations, learn more about school regulations and scholarships, conditions for re-taking exams, re-studying and being forced to drop out of school”; “Knowing about new educational methods.” (Bachelor of Public Health student)

“Know about the development history, training process, and the school’s rules and regulations on tuition payment, retakes, retakes, and improvement.” (Doctor of Preventive Medicine student)

Information that you don’t know and want to hear in this course

Students wanted to hear from alumni about jobs, future job opportunities, salaries,...

“Share from upperclassmen about studying,

work after graduation, monthly salary, ...”;
“Communication is not attractive to me.”
 (Bachelor of Nutrition student)

“I understand the information and want to know more about future job opportunities”;
“Want to hear about seniors who were successful after graduating.” (Bachelor of Public Health student)

Level of satisfaction of this course

Students were mostly satisfied with orientation activities at the beginning of the school year about from 8- 8.5 in 10 scale. Students wanted to listen to the sharing of the old students about jobs and success to have motivation to strive right from the beginning.

“There is quite a lot of information introduced to students, it is impossible to grasp it all in a short time.” (Bachelor of Nutrition student)

“I feel satisfied and will try to improve my score.” (Bachelor of Public Health student)

“Very satisfied” (Doctor of Preventive Medicine student)

DISCUSSION

Major orientation of students

Research results showed that the main reason for choosing the school was preferring Hanoi Medical University. The school had a high reputation in the specialty, was among the top in medical training, was famous for training many good doctors, had a good learning environment

and had a high chance of getting a job after graduation. The source of information to help students know about the school was mainly from parents and relatives, in addition to social networking sites. Research on 132 medical students in Bangladesh showed that only 3% of students chose to major in preventive and social medicine, 3% chose health management, and over 67% wanted to participate in private medical service (7). In a study of 583 students at three Canadian universities, only 20% of respondents identified family medicine as their first career choice, and about half ranked family medicine among their top three aspirations. their head. Logistic regression showed that students who identified family medicine as their first choice tended to be older, interested in a medical lifestyle, and to have lived in smaller communities by the time they finished high school. study, they are also less likely to go to the hospital (8). Research at 16 medical schools in Canada identified factors that influence first-year students' decisions to choose family medicine. While a positive correlation exists between career choice in family medicine and medical lifestyle factors ($r = 0.11$), social orientation ($r = 0.25$), and scope of practice diverse careers ($r = 0.26$), there is a negative correlation between career choice in family medicine and prestige ($r = -0.11$) and hospital orientation ($r = -0.18$) (9),(5). In a study of medical students in the Netherlands, three distinct career orientations were identified among students, the first focusing on lifelong personal development, the second focusing more on work-life balance, and the third is more concerned with achievement and recognition of their work (10).

Students in general had an understanding of the major they are studying. They were all oriented towards job opportunities at labor recruitment employer in the future. This was a good thing because from the first year, students had had career orientations to practice and strive for right from the beginning. Almost all students were

quite satisfied with the major they have chosen. The reason for choosing the major of Preventive Medicine and Public Health was mainly due to their own academic ability and entrance exam scores being enough to choose this major, and some also find themselves suitable and liked it as well as being accepted. Family members supported when choosing a major. According to a survey of students at Nguyen Tat Thanh University of Pharmacy, Vietnam in 2021, 63.5% of students reached a basic level of awareness of their chosen major, and 36.5% of students did not achieve it. have adequate level of specialized knowledge (6). At Thai Nguyen University of Medicine and Pharmacy in 2020, nearly 85% of students said they had a clear choice of major. Among male students, surgery was the most popular specialty (33.3%), followed by obstetrics (19.1%) and internal medicine (18.2%). Among female students, internal medicine is the most preferred choice (32.3%), followed by gynecology and obstetrics with 25% and 21.8%, respectively (11).

Student feedback on first year orientation activities

In addition, in the beginning activities, students learned and were provided with the most complete information related to regulations on training, student affairs, library use, and school insurance. On the contrary, information about the major you study was not provided in this activity. From there, students wanted to listen to information about job opportunities shared by the alumni that have been successful. Students also realized that the way of communicating from previous courses will help students absorb better. The students were also quite satisfied with the content of the week of orientation activities at the beginning of the year as well as career orientation organized by the University. The desired to know about job opportunities is a satisfactory need. Studies showed that one of the reasons individuals consider the medical

field to have more career opportunities than other fields is the reason why students choose it. In Bangladesh, research on medical students showed that the top reasons for choosing a specialty are personal interests and open job opportunities (4). Meanwhile medical students in Malaysia pointed out that an interest in medicine and helping people were the two main reasons cited for entering medical school. It can be seen that orientation activities at the beginning of the year are very important for first-year students. The orientation activities at the beginning of the year help students learn information from the School about their study plans, majors and future jobs. The orientation session is also a two-way exchange, helping the Board Council and the Training Department learn about students' aspirations to promptly have student support programs.

Limitation

The study was a cross sectional study, so we can only evaluate at one point in time the career orientations and feedback of students without determining the relationship between influencing factors. Besides, the research combines both qualitative and quantitative methods. For qualitative component, the study only conducted focus group discussion among students, it means that the information just collected from one site of students. Therefore, we lacked information from other stakeholders as university leaders, teachers, persons who in charge of undergraduate division in the university. This suggests that we do future research to collect enough information from relevant parties.

Conclusion and Recommendations

The main reason for choosing the school was preferring to study at Hanoi Medical University (59.1%). Orientation information came mainly from parents, family members (55.2%) and from social networking sites

(56.9%). About knowing major showed that 22.7% of students with full understanding and 74% with partial understanding of their major. 79.6% of students were satisfied with their major and the reason for choosing the major showed that 46.5% of students had enough their capacity in these majors and 44.2% of them liked to study this major.

Orientation activities helped students become fully aware of the regulations on training and student work (73.5%); library use (76.8%); Health insurance (69.1%). In contrast, information about majors was provided less (54.1%). 53% of students rated as satisfied and 12.2% rated as very satisfied with the contents of the first year orientation activities. There needs to be more sharing from graduates about work to help students have a clearer direction.

In the future, this is also a suggestion for organizing orientation courses at the beginning of the year to focus on the needs and desires of students, to achieve the highest efficiency. This is also an impact in the training of doctors of preventive medicine, bachelors of Public Health and bachelors of nutrition so that students can better understand their majors and orient themselves from the beginning about the learning process, job opportunities and developments after graduation.

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