

Political Participation Based on the Learning Efficacy of Dental Hygiene Policy in Dental Hygiene Students

Su-Kyung Park^{1,2} and Da-Yee Jeung^{3,†}

¹Department of Dental Hygiene, Jeonjukijeon College, Jeonju 54989, ²Department of Dental Hygiene, Yonsei University Graduate School, Wonju 26493, ³Department of Dental Hygiene, Hanyang women's University, Seoul 04763, Korea

Background: To investigate political participation by dental hygiene students and analyze the differences therein based on the learning efficacy of dental hygiene policy.

Methods: A total of 239 dental hygiene students who were expected to graduate responded to the survey. The data were collected online using a structured questionnaire consisting of 6 items on general characteristics, 10 on political participation, and 15 on the learning efficacy of dental hygiene policy. Statistical analysis was performed using SPSS 23.0. Political participation based on the learning efficacy of dental hygiene policy was analyzed using independent t-tests, ANOVA, and multiple regression analysis ($p < 0.05$).

Results: Among the dental hygiene students, 60.7% voted in all three recent presidential, general, and local elections, and 14.2% did not. For political parties supported, 65.7% responded that they had "no supporting party," and 34.3% indicated that they had a "supporting party." In terms of the level of political participation of dental hygiene students (0~50 points), the average score was 25.8 points, with the average passive political participation (0~25 points) score at 15.6 points and the average active political participation (0~25 points) score at 10.2 points. With an increase in dental hygiene policy learning efficacy, both passive and active political participation showed higher scores ($p < 0.05$).

Conclusion: Dental hygiene students showed low political participation. The presence of a supporting party, higher voting participation, and higher learning efficacy of dental hygiene policy were associated with higher passive and active political participation. Therefore, to increase this population's interest in political participation, various opportunities for related learning need to be promoted and provided in academia, leading to the enhancement of their political capabilities. In this manner, dental hygienists should expand their capabilities in various roles such as advocates, policy makers, and leaders.

Key Words: Dental hygienists, Health policy, Political activity, Political participation, Professionalism

Introduction

1. Background

Since the launching of the dental hygiene program in South Korea in 1965, approximately 90,000 dental hygienists have graduated and became licensed dental hygienists as of 2020¹⁾. Dental hygienists are medical technicians who work in the healthcare system and are important healthcare workers who promote health and oral health. Dental hygienists serve several roles, including delivery of

preventive dental care, assistance in dental care, hospital management, promotion of oral health, and education and research. Over the past 50 years, dental hygienists have primarily been limited to occupation-based roles, such as clinicians delivering preventive dental care and assisting in dental care and educators for students. However, to expand their roles as health care professionals to advocates, changemakers, and collaborators, it is important to systematically equip them with knowledge and competencies for various health problems in addition to oral health pro-

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[†]Correspondence to: Da-Yee Jeung, <https://orcid.org/0000-0003-4730-8814>

Department of Dental Hygiene, Hanyang women's University, 200 Salgoji-gil, Seongdong-gu, Seoul 04763, Korea
Tel: +82-2-2290-2577, Fax: +82-2-2291-6111, E-mail: cocojdy@hywoman.ac.kr

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blems in Korean and abroad²⁾.

Dental hygienists manage the health and oral health of individuals and populations. To effectively address health and oral health problems, it is important to gain an understanding of the political, societal, and economic structures and engage in policymaking and decision making based on the understanding^{3,4)}. Thus, dental hygienists must pay attention to healthcare issues and policies pertinent to the public's health in addition to providing dental services outlined in the Medical Service Technologies Act. Further, they are responsible to advocate for the public's health as professionals by intervening in the legislative activities, policy decisions, and political processes that impact the public's health.

Although the dental hygienist population is the largest healthcare worker population in Korea⁵⁾, organizational-level political involvement, primarily centered around the Korean Dental Hygienists Association (KDHA), is low, with notably low interests in or participation in politics at the individual level as well. Significant policy agendas are present in the field of dental hygiene, such as incorporation of dental hygienists as healthcare professionals⁶⁾, introduction of advanced dental hygiene practitioners⁷⁾, involvement of dental hygienists in the Community Care Project⁸⁾, and establishment of the Korean Dental Hygiene Education Accreditation and Evaluation Agency⁹⁾, but due to the lack of political participation and interest among dental hygienists, dental hygienists fail to play a central role in legislative processes and government decision-making regarding healthcare policies.

Advances in social media (e.g., Facebook, Instagram, Kakaotalk, YouTube) in recent years have enabled college students and young adults to actively post and share their thoughts and opinions. Such rapid development of social media channels reorganizes politics, society, and culture and facilitates networking and connection to various groups. In recent years, there has been a noticeable surge in political participation activities among college students and young adults, particularly through online platforms such as social media as well as social movements led by issue-oriented groups¹⁰⁾. Given their future roles as dental hygienists responsible for public health and leaders in health policies, it is crucial for dental hygiene students to

actively engage in political activities. However, the current dental hygiene curriculum in Korea predominantly focuses on theoretical and practical subjects required for the national examination, so students lack expert knowledge in ways to raise awareness on social issues in the healthcare sector as well as legislative processes. Further, the lack of education on actual political participation limits students from actively engaging in political activities. To safeguard the rights and interests of dental hygienists, previous studies have emphasized the need for dental hygienists to acquire knowledge and competence in oral health policy and to establish learning objectives that foster active involvement of dental hygienists in policymaking as healthcare professionals^{11,12)}.

In other healthcare professions, there has been extensive research on the political participation of registered nurses. These studies have conceptualized nurses' political competency and developed instruments to measure it¹³⁾, developed political competence by education level¹⁴⁾, and examined political participation of nursing students¹⁵⁾ and hospital nurses¹⁶⁾. Past studies have reported that nurses exhibit poor political efficacy or political competence. Enhancing political competence requires political knowledge, political efficacy, and active political behaviors and interactions with the public, government, and legislators, which in turn entails relevant education from the undergraduate level and collective effort by the professionals as a whole.

However, studies examining political participation and political efficacy among dental hygienists or dental hygiene students in Korea or abroad are virtually lacking, and there is no available data shedding light on the extent and rationale for political participation among dental hygienists and dental hygiene students.

2. Objectives

This study aims to examine the extent of political participation of current dental hygiene students on their final year of school. This study aims to examine the extent of political participation of current dental hygiene students on their final year of school. Additionally, we sought to compare the differences in political participation according to learning efficacy of dental hygiene policy and identify

the predictors of political participation. Ultimately, we aim to present foundational data for spurring political interest and boosting political participation among dental hygiene students.

Materials and Methods

1. Study design

This study is a descriptive survey using a structured questionnaire. The questionnaire was administered for about two months from January 1, 2021 to February 28, 2021. After being given an explanation about the purpose and method of the questionnaire survey, participants who consent to participate in the study completed an online self-report questionnaire.

2. Participants

Of current dental hygiene students in Korea, students who are scheduled to graduate in 2021 (third-year students in a three-year school, fourth-year students in a four-year school) were enrolled. Per Cohen's sample size calculation equation, sample size was determined using the G*Power software. For regression analysis with a power ($1-\beta$) of 0.90, significance level (α) of 0.05, medium effect size of 0.15, and 10 predictor variables, the minimum sample size was calculated to be 192. To account for 10~20% potential dropout rate, the target sample size was set to 230.

The participants were quota sampled in consideration of the admission capacity and school systems for dental hygiene in Korea. A total of 239 participants completed the questionnaire, which was about 4.8% of the total study population. By region, 28.9% of the sample was from Seoul, Gyeonggi, or Incheon, followed by 28.5% from Chuncheong region, 18.4% from Gyeongsang region, 12.6% from Gangwon region, and 11.7% from Jeolla region. This regional distribution was aligned with that of the matriculants of dental hygiene departments nationwide.

3. Study variables

The study questionnaire consisted of 31 items, including 10 items for political participation, 15 items for learning efficacy of dental hygiene policy, and six items for general characteristics.

1) Political participation

Political participation refers to a collective set of actions undertaken with the aim of influencing policy decisions in a desired direction. Passive participation includes voting, posting an opinion on the website of a political party or candidate, and writing about a political or societal problem online, while active participation includes participating in a petition drive or political party, meeting with a politician, or attending a gathering about a sociopolitical issue. Political participation was assessed using the items used by Shin¹⁷⁾ with some modifications. Five items were used to measure passive political participation, and five items were used to measure active political participation. Each item is rated on a Likert scale from 1~5, with the total score ranging from 10~50. A higher score indicates greater political participation. The Cronbach's α was 0.78 for political participation, 0.68 for passive political participation, and 0.74 for active political participation.

2) Learning efficacy of dental hygiene policy

To measure learning efficacy of dental hygiene policy, the learning objectives for oral health policy presented by Park et al.¹¹⁾ were revised to reflect learning efficacy of dental hygiene policy. The instrument comprised 15 items rated on a continuous scale from 0~5. The total score ranged from 0~75, and a higher score indicates higher learning efficacy of dental hygiene policy. The Cronbach's α was 0.92. The total learning efficacy of dental hygiene policy score was divided into quartiles: low, middle-low, middle-high, and high.

4. Statistical methods

Statistical analyses were performed using the PASW Statistics 23.0 (IBM Corp., Armonk, NY, USA) software. Participants' general characteristics and dental hygiene school systems by region were analyzed with frequency analysis. Differences in learning efficacy of dental hygiene policy and political participation according to participants' general characteristics, and differences in political participation according to learning efficacy of dental hygiene policy were analyzed with independent t-test and ANOVA. The predictors of political participation were identified with multiple regression analysis.

Statistical significance was set at 0.05.

Results

1. Political characteristics of study participants

A total of 239 participants were enrolled. The sample consisted of three male (1.3%), 236 female (98.7%), 125 third-year students (52.3%), and 114 fourth-year students (47.7%). Their grades for the relevant courses (public oral health, community dental hygiene, social dental hygiene) were A (≥ 90 scores; 27.2%), B (80~89 scores; 62.8%), or C (< 79 scores; 10.0%).

In terms of political characteristics, 60.7% of the participants voted in all three major elections in the past four years (presidential, general, local elections) while 25.1% and 14.2% voted in 1~2 of the elections and 0 elections, respectively. At the time of the voting, 34.3% had a party preference (52.5% liberal, 8.5% conservative, 39.0% moderate), while 65.7% did not have a party preference. A total of 3.3% of the participants were an active member of a political party (Table 1).

2. Learning efficacy of dental hygiene policy of study participants

The mean learning efficacy of dental hygiene policy score was 2.96 (from 1~5). By item, the highest score was for “I can explain participating in the policy process” (3.38), followed by “I can identify the goals of Korea’s oral health policies” (3.14) and “I can explain the association between health policies and community health problems” (3.08). However, scores for items pertaining to actual political participation in the field of dental hygiene as a dental hygienist were low, namely “As a dental hygienist, I can present my opinion about dental hygiene policy issues” (2.86) and “As a dental hygienist, I can explain how to participate in dental hygiene policies” (2.78). Further, scores for items pertaining to Korea’s health policies were also low, namely “I can identify Korea’s public health problems” (2.84) and “I can identify Korea’s current health policies” (2.77) (Table 2).

3. Political participation according to general characteristics and learning efficacy of dental hygiene policy

The mean political participation score was 25.8 out of 50

Table 1. Political Characteristics of Study Participants (N=239)

| Variables | Divisions | N (%) |
|----------------------------------|---------------|------------|
| Sex | Male | 3 (1.3) |
| | Female | 236 (98.7) |
| School system | 3-year school | 125 (52.3) |
| | 4-year school | 114 (47.7) |
| Grade in relevant course | C | 24 (10.0) |
| | B | 150 (62.8) |
| | A | 65 (27.2) |
| Voting frequency* | 0 | 34 (14.2) |
| | 1 | 41 (17.2) |
| | 2 | 19 (7.9) |
| | 3 | 145 (60.7) |
| Party preference | No | 157 (65.7) |
| | Yes | 82 (34.3) |
| | Liberal | 43 (52.5) |
| | Conservative | 7 (8.5) |
| Active member of political party | Moderate | 32 (39.0) |
| | Yes | 8 (3.3) |
| | No | 231 (96.7) |

Values are presented as n (%).

*Number of times the individual voted in the presidential, general, local elections in the past four years.

Table 2. Learning Efficacy of Dental Hygiene Policy of Study Participants

| Learning efficacy of dental hygiene policy | Mean±SD |
|--|-----------|
| 1. I can explain how to participate in the policy process. | 3.38±0.97 |
| 2. I can identify the goals of Korea's oral health policies. | 3.14±0.94 |
| 3. I can explain the association between health policies and community health problems. | 3.08±1.00 |
| 4. I can explain the method of policy evaluation. | 3.04±1.01 |
| 5. I can identify the problems of Korea's oral health policies. | 3.03±0.91 |
| 6. I can explain the steps of the policy process. | 3.02±1.05 |
| 7. I can list Korea's oral health laws. | 2.93±1.06 |
| 8. I can identify Korea's current oral health policies. | 2.93±0.91 |
| 9. I can explain the components of a policy. | 2.92±1.06 |
| 10. As a dental hygienist, I can present my opinions about dental hygiene policy issues. | 2.86±0.91 |
| 11. I can explain the government's role in health policies. | 2.84±0.96 |
| 12. I can identify the problems of Korea's health policies. | 2.84±0.93 |
| 13. I can explain the basic concepts of a policy. | 2.84±1.01 |
| 14. As a dental hygienist, I can explain how to participate in dental hygiene policies. | 2.78±0.94 |
| 15. I can identify Korea's current health policies. | 2.77±0.86 |

Values are presented as mean±standard deviation.

(passive participation 15.6, active participation 10.2). In terms of school systems, the political participation scores were similar between the three-year (25.8) and four-year schools (25.8). Political participation was higher with higher school grade (26.0 for A, 25.8 for B, 25.3 for C), but it was not statistically significant.

Political participation was higher among those who had a party preference at time of voting (28.1), higher with higher number of voting (21.5 for 0 elections, 22.6 for 1 election, 24.0 for 2 elections, 28.0 for 3 elections), and increasing learning efficacy of dental hygiene policy score (23.9 for low quartile, 25.4 for middle-low quartile, 26.0 for middle-high quartile, 27.8 for high quartile) ($p < 0.01$).

For political participation, the mean passive political participation score was 15.6 out of 25, and active political participation score was 10.2 out of 25.0, showing lower active political participation. Passive political participation increased with increasing voting frequency, but active political participation did not differ between groups; these differences were not significant. Both passive political participation (14.9 for low, 15.5 for middle-low, 15.4 for middle-high, 16.7 for high) and active political participation (8.9 for low, 9.9 for middle-low, 10.6 for middle-high, 11.1 for high) increased with increasing learning efficacy for dental hygiene policy ($p < 0.01$) (Table 3, Fig. 1).

4. Factors affecting political participation in dental hygiene students

Multiple regression was performed to identify the predictors of political participation among dental hygiene students. For the analysis, three-year school and four-year school were coded as 0 and 1, respectively, and grades C, B, and A were coded as 0, 1, and 2, respectively. Party preference was coded as 0 (no) or 1 (yes). We adjusted for general characteristics in model 1, general characteristics and political characteristics for model 2, and general characteristics, political characteristics, and learning efficacy of dental hygiene policy for model 3. In terms of the fit of the regression model, the variance inflation factor (VIF) among the independent variables was below 10, confirming the absence of multicollinearity. The assumptions of the regression for independent variables were tested with the Durbin-Watson test, and a Durbin-Watson statistic of 1.836 confirmed the independence of the independent variables for the regression analysis.

We entered general characteristics, political characteristics, and learning efficacy of dental hygiene policy in model 3. Model 3 was found to explain for 39.0% of the variance and had a significant model fit ($F=23.88$, $p < 0.001$). The most potent predictor of political participation was learning efficacy for dental hygiene policy ($\beta=0.15$, $p < 0.001$), party preference ($\beta=1.99$, $p=0.001$), and voting frequency ($\beta=2.16$, $p < 0.001$) (Table 4).

Table 3. Political Participation according to General Characteristics and Learning Efficacy of Dental Hygiene Policy

| Variables | Divisions | Political participation | | Passive political participation | | Active political participation | |
|--|---------------|-------------------------|---------|---------------------------------|---------|--------------------------------|---------|
| | | Mean±SD | p-value | Mean±SD | p-value | Mean±SD | p-value |
| School system | 3-year school | 25.81±5.12 | 0.724 | 15.56±3.39 | 0.785 | 10.23±2.95 | 0.943 |
| | 4-year school | 25.78±5.41 | | 15.71±3.06 | | 10.13±2.69 | |
| Grade in relevant course | C | 25.83±4.80 | 0.661 | 15.63±3.23 | 0.905 | 10.18±2.82 | 0.867 |
| | B | 25.30±5.30 | | 15.04±3.57 | | 10.26±2.73 | |
| | A | 25.81±4.92 | | 15.70±3.15 | | 10.11±2.73 | |
| Party preference | Yes | 25.97±5.56 | 0.000 | 15.68±3.31 | 0.000 | 10.29±3.09 | 0.000 |
| | No | 24.61±4.83 | | 15.03±3.21 | | 9.58±2.72 | |
| Voting frequency | 0 | 28.14±4.89 | 0.000 | 16.80±2.96 | 0.000 | 11.34±2.67 | 0.282 |
| | 1 | 21.48±5.27 | | 11.00±2.30 | | 10.48±3.24 | |
| | 2 | 22.63±3.75 | | 12.88±1.45 | | 9.76±2.58 | |
| | 3 | 24.00±3.46 | | 14.74±1.76 | | 9.26±2.13 | |
| Learning efficacy of dental hygiene policy | Low | 27.95±4.39 | 0.001 | 17.60±1.98 | 0.021 | 10.35±2.86 | 0.001 |
| | Middle-low | 23.89±4.62 | | 14.95±3.42 | | 8.95±2.26 | |
| | Middle-high | 25.39±4.55 | | 15.46±3.21 | | 9.93±2.47 | |
| | High | 25.97±4.67 | | 15.35±2.92 | | 10.62±2.81 | |
| | | 27.75±5.84 | | 16.69±3.21 | | 11.07±3.20 | |

Values are presented as mean±standard deviation.

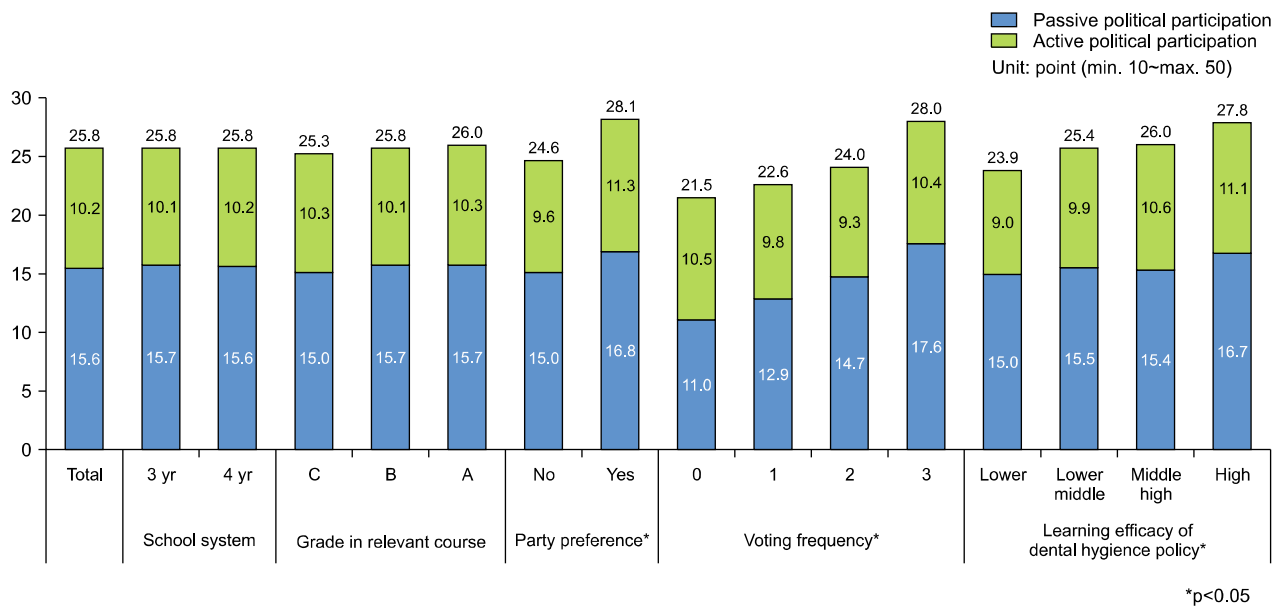


Fig. 1. Political participation according to general characteristics and learning efficacy of dental hygiene policy.

Discussion

1. Interpretation and comparison with the results of previous studies

This study was a cross-sectional study aiming to examine the level of political participation and learning efficacy of dental hygiene policy in dental hygiene students and to identify the predictors of political participation. The results are discussed below.

In our study, the mean political participation was 25.8 out of 50.0, with an average of 2.58 for each of the ten items. Studies that used the same instrument to measure

Table 4. Predictors of Political Participation

| Variables | Model I | | | | Model II | | | | Model III | | | |
|--|------------------------------|-------|-------|---------|------------------------------|--------|--------|---------|------------------------------|--------|--------|---------|
| | Non-standardized coefficient | | t | p-value | Non-standardized coefficient | | t | p-value | Non-standardized coefficient | | t | p-value |
| | B | SE | | | B | SE | | | B | SE | | |
| School system | 0.052 | 0.670 | 0.078 | 0.938 | -0.135 | 0.553 | -0.244 | 0.808 | -0.726 | 0.552 | -1.316 | 0.190 |
| Grade | 0.276 | 0.573 | 0.482 | 0.630 | -0.200 | 0.475 | -0.421 | 0.674 | -0.653 | 0.479 | -1.363 | 0.174 |
| Party preference | | | | | 2.538 | 0.594 | 4.272 | 0.000 | 1.992 | 0.591 | 3.373 | 0.001 |
| Voting frequency | | | | | 2.134 | 0.246 | 8.667 | 0.000 | 2.167 | 0.243 | 8.923 | 0.000 |
| Learning efficacy of dental hygiene policy | | | | | | | | | 0.151 | 0.032 | 4.706 | 0.000 |
| F (p) | | 0.119 | | | | 27.970 | | | | 23.877 | | |
| Adjusted R ² | | 0.001 | | | | 0.326 | | | | 0.390 | | |
| Durbin-Watson | | 1.940 | | | | 1.743 | | | | 1.836 | | |

Values are presented as number only.

By stepwise multiple regression analysis at $\alpha=0.05$.

political participation reported a score of 3.24 among nursing students, 2.76 among social welfare students, and 1.98 among college students in some regions^{18,19}). Studies that used a different instrument to measure political participation (out of 5) reported a score of 2.86 among nursing students and 2.36 among general college student population,¹⁵ showing that dental hygiene students have lower political participation compared to nursing and social welfare students but higher than general college students. College students' political participation varies according to the time of survey, school year, major, and completion of major and elective courses, but the results generally indicate that college students majoring in health-care or social welfare than general college students. It is speculated that students could have been directly and indirectly influenced by their professors, fellow students, and curriculum depending on their major, and particularly, health majors would have higher levels of interest and participation in policy due to reasons such as their major courses involving analysis of healthcare environment in Korea and abroad, healthcare policies, political participation, policy decision-making process, and professional consciousness. Particularly, nursing students have demonstrated an increased inclination towards political participation, primarily driven by various contentious issues such as the recent enactment of the Nursing Act, increased opportunity to attend various nursing policy workshops

and seminars organized by the Korean Nurses Association, and active participation in outside activities, such as national supporters for nursing students and press corps^{13,15}). However, our study reveals that dental hygiene students or new graduate dental hygienists exhibit low political competence, as evidenced by the low scores in learning efficacy of dental hygiene policy, namely in items such as "As a dental hygienist, I can explain how to participate in dental hygiene policies" and "As a dental hygienist, I can present my opinions about dental hygiene policy issues." Therefore, to bolster political participation among dental hygiene students, it is imperative to cultivate their interest in the political sphere and enhance their political efficacy. Additionally, it is crucial to design and implement programs that go beyond theoretical learning in the current curriculum, incorporating practical experiences such as seminars, special lectures, and other non-curricular activities pertaining to political participation.

In terms of political participation, the mean passive participation score (e.g., voting and expressing opinions on social media) was 15.6 out of 25.0, while the mean active participation score (e.g., involvement in political parties, launching petition drives, and attending social gatherings) was 10.2 out of 25.0, showing lower active political participation. These findings may reflect the demographic composition of the study participants, who predominantly consisted of college students. Unlike older

generations, college students and young adults tend to actively utilize various online media for communication, such as social networking sites, YouTube, and blogs, so it is easier for them to participate in politics passively in an online platform, with which they are more familiar, as opposed to active political participation. Particularly, college students and young adults tend to actively present their opinions anonymously, raise pertinent issues, and influence public opinion in an online space.¹⁰⁾ Thus, various measures should be explored to promote political participation tailored to different age groups.

The major predictors of political participation among dental hygiene students were identified as learning efficacy for dental hygiene policy, party preference, and voting frequency. Political participation has been reported as the overarching construct among various properties of politics, where “political participation” competence increases when there is active “political interaction” (interpersonal political competence) based on “political knowledge” (objective political competence) and “political efficacy” (subjective political competence)¹³⁾. Barriers to political participation among dental hygiene students included a lack of knowledge about political agenda, limited understanding of the legislative process, low political awareness, lack of time due to high workload, male-predominant political environment, and lack of curriculum that prepare students for political activities. On the other hand, facilitators of political participation included organized group-centered campaigns (e.g., professional associations), participation in voting, involvement in healthcare policy, and the development and implementation of educational programs. Particularly, curriculum development has been identified as a crucial factor in fostering political competence and personal efficiency^{20,21)}. Thus, to enhance the political participation of dental hygiene students, it is essential to discuss and explore measures that foster their interest in current dental hygiene-related problems, issues, and situations. To increase learning efficacy for dental hygiene policy, students must gain experience in non-curricular programs that allow them to raise a political issue and develop resolutions, such as debates, public hearings, campaigns, and community services, and various educational programs should be implemented to increase

their political interest, knowledge, efficacy, and interactions, all of which facilitate political participation.

Voting and having a party preference were the two most powerful predictors of political participation among dental hygiene students. To promote these factors, it is crucial to elucidate the role and significance of institutions like the Korean Dental Hygienists Association and other political organizations and agencies within the healthcare sector and to inform and educate students about the policymaking process in healthcare and political activities starting from their undergraduate years. In addition to the campaign to encourage each member of the Korean Dental Hygienists Association and dental hygiene student to join a political party, participation in fundraising and support campaigns for politicians, and improving work environment to promote voting, the students’ political participation should be progressively expanded through involvement in regional or online civil organizations and social organizations. In nursing, another field of healthcare dominated by females, political competence has been differentiated among different levels of education (bachelor’s, master’s, doctorate), and the roles, educational contents, and educational activities by level of difficulty and education level have been reported¹⁴⁾. For instance, political competence is progressively expanded across different levels of education, from “policy participation at the professional association and community level” at the bachelor’s level, to “policy participation and formation at the local or state level” at the master’s level, and ultimately to “policy development at the national level” at the doctoral level. Similarly, political competence appropriate for each level of education (bachelor’s, master’s, and doctorate) should be developed and progressively expanded in dental hygiene as well. Through such approach, importance of political participation should be underscored in advocating for public health as a healthcare professional and safeguarding the rights and interests of dental hygienists.

2. Limitations

This study has a few limitations. First, only about 5% of the total population of dental hygiene students were enrolled in the study, and most questionnaire items relied on subjective judgments. Thus, the findings cannot be

generalized to the entire dental hygiene student population. Future studies should recruit a larger study sample in consideration of region, school system, and school year in order to enhance the reliability of the study. Second, political competence and political participation are yet to be conceptualized in the field of dental hygiene, and there are no available instruments to assess them. Hence, this may have caused confusion among the respondents between the general concept of political participation used in the survey and political participation specific to the field of dental hygiene. Moreover, the items for learning efficacy of dental hygiene policy were developed based on the learning objectives for oral health policy in the public oral health course, which may fail to accurately reflect the actual level of political participation. Therefore, subsequent studies should first develop a standardized instrument tailored to the field of dental hygiene.

Nonetheless, given that there is a lack of studies examining political participation and political efficacy among dental hygiene students and licensed dental hygienists in Korea and globally, this study is significant as the first study to shed light on the need to facilitate political participation among dental hygienists and dental hygiene students. Furthermore, another strength of this study is that it provides foundational data for developing various intervention programs by proposing practical measures to expand political participation.

3. Suggestions

In the future, studies should first establish a theoretical framework for and conceptualize political participation, political activity, and political competence in the context of dental hygiene. Based on such foundations, studies should continuously explore the definition and properties of political competence among dental hygienists or dental hygiene students. Moreover, standardized instruments and competence-specific learning objectives should be developed to evaluate the level of political competence among dental hygienists and encourage students to cultivate their interest in political participation and enhance their competence from their undergraduate years until they licensed dental hygienists.

Through these measures, dental hygienists should gain

an understanding of the policy decision-making process and changes in healthcare policies and undertake a role as an advocate and changemaker by actively presenting opinions and participating in policies through TV, newspaper, and social network services as well as stakeholder and civil organizations, political parties, and voting. In addition to their clinical roles, dental hygienists should expand their capabilities to encompass various other roles, including advocates, policymakers, and leaders. To increase interest in political participation, it is important to establish a systematic system that identifies, supports, and educates politicians through various programs. This will enable dental hygienists to advocate for public health and demonstrate their expertise in the field.

Notes

Conflict of interest

No potential conflict of interest relevant to this article was reported.

Ethical approval

This study was approved by the Institutional Review Board of Hanyang Women's University (IRB No. HYWC-2020-09).

Author contributions

Conceptualization: Su-Kyung Park. Data acquisition: Su-Kyung Park and Da-Yee Jeung. Formal analysis: Su-Kyung Park. Supervision: Da-Yee Jeung. Writing-original draft: Su-Kyung Park and Da-Yee Jeung. Writing-review & editing: Su-Kyung Park and Da-Yee Jeung.

ORCID

Su-Kyung Park, <https://orcid.org/0000-0002-0738-4786>

Da-Yee Jeung, <https://orcid.org/0000-0003-4730-8814>

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Data availability

Data availability The data is provided at the request of the corresponding author for reasonable reason.

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