STATISTICAL ANALYSIS ON STUDY OF STUDENT PREFERENCES

(A CASE STUDY OF HND 1 STUDENT, DEPARTMENT OF STATISTICS,KWARA STATE POLYTECHNIC, ILORIN)

BY

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CERTIFICATION

This is to certify that this project was carried out by **UTHMAN AMINAT TITILAYO** with Matric number **ND/23/STA/FT/0124**. This project has been read and approved as meeting part of the requirement for the award of National Diploma in Statistics, Kwara State Polytechnic, Ilorin.

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DEDICATION

This project is dedicated firstly to God Almighty, the source of my strength, wisdom, and inspiration.And also to my family.

ACKNOWLEDGEMENT

First and foremost, I give all thanks and glory to the Almighty God for His grace, wisdom, and strength throughout the duration of this project.

I sincerely appreciate my supervisor, Mr Sikiru Suleiman, for his/her invaluable guidance, encouragement, and support throughout this research work.

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ABSTRACT

This study investigates the preferences of students in areas such as color, beverage, soft drinks, music genres, fashion styles, future careers, and hobbies among full-time HND I Statistics students at Kwara State Polytechnic. With the growing importance of youth-driven consumer choices, cultural trends, and lifestyle dynamics, understanding students' preferences can provide insight for academic planning, marketing strategies, and social engagement. A structured questionnaire was administered to a random sample of 50 students to gather information on various preference categories and demographic factors. The analysis provides a comprehensive distribution of these preferences by gender, age, and ethnicity, highlighting patterns that can inform future studies and institutional development.

Keywords:Students' preferences, Color Preference, Music Genre, Beverages, Soft Drink, Hobbies, Future Profession, Statistical Analysis, Demographic Influence.

CHAPTER ONE

 INTRODUCTION

1.1 Background to the Study

In the contemporary world, the study of human preferences has gained prominence in various fields such as psychology, sociology, education, marketing, and behavioral science. Among young adults, especially those in tertiary institutions, preferences in areas like music, fashion, color, beverages, and future career aspirations have become vital indicators of identity, social alignment, lifestyle, and even academic behavior. Students often express themselves and connect with their environment through such preferences.

Understanding student preferences is not only essential for improving learning environments but also crucial in designing social programs, campus activities, and marketing strategies. For example, students' beverage choices can guide decisions on what refreshments to offer at campus events; their music preferences can influence the type of entertainment provided; while fashion trends among students can reveal broader cultural shifts and social influences.

Young people are often influenced by factors such as gender, age, peer pressure, ethnicity, cultural exposure, media influence, and individual personality traits. For instance, Rentfrow and Gosling (2003) noted that music preference is a valid expression of personality dimensions, and individuals often gravitate toward genres that reflect their inner experiences. Similarly, Delsing et al. (2008) discovered that adolescent preferences

in music were strongly linked to emotional regulation and peer bonding.

Color preferences also hold psychological and sociological significance. Khine (2001) emphasized that children and young adults often associate colors with emotions, moods, and cultural symbolism. In a diverse society like Nigeria, these associations can be even more dynamic due to the influence of ethnic heritage and regional identity.

Fashion preference is another crucial area, as it combines personal identity with societal trends. Fashion among students can serve as both a statement of self and a means of belonging to a group. Adeyeye (2017) noted that tertiary-level students often adopt fashion trends that mirror global styles while adapting them to local cultures. This duality creates a unique fashion identity among students in institutions such as polytechnics and universities.

Beverage and soft drink preferences are also shaped by accessibility, peer influence, advertising, and health consciousness. In a study conducted by Ogunleye et al. (2019), it was found that Nigerian students leaned more toward soft drinks and fruit juices, with occasional interest in energy drinks, depending on academic workload and social lifestyle.

In the context of Kwara State Polytechnic, full-time HND I students in the Department of Statistics represent a unique subset of the Nigerian student population. They are immersed in an academic discipline that values logical reasoning and critical thinking but are also socially and culturally engaged in the trends and preferences that shape youth

identity in today's world. However, despite their active involvement in these lifestyle domains, little research has been done to analyze their preferences statistically.

This study seeks to bridge that gap by collecting and analyzing data from HND I students to understand how they express their preferences in color, music, beverage, soft drinks, fashion, career goals, and hobbies. The study aims to provide empirical evidence of how these preferences vary based on demographic factors such as gender, age, and ethnicity, offering a deeper understanding of student behavior within a polytechnic settings

As Nigeria continues to develop its educational and youth engagement policies, understanding the nuanced preferences of students is crucial. Studies like this one can guide curriculum design, counseling strategies, marketing efforts, and social planning, making student voices central to institutional and societal development.

1.2 Statement of the Problem

Despite the rising significance of personal and cultural preferences in shaping youth identity and behavior, limited academic attention has been paid to analyzing these preferences statistically among tertiary students in Nigeria. While anecdotal observations suggest that students have strong opinions and inclinations toward particular colors, fashion, music genres, beverages, and professional aspirations, these trends have not been systematically studied—especially within the Kwara State Polytechnic setting.

This lack of empirical research leaves a gap in knowledge for educators, administrators, marketers, and youth planners who wish to engage students more effectively. The inability to access accurate, data-driven insights into student preferences makes it difficult to plan events, support student wellness, design academic guidance services, or structure extracurricular activities that truly resonate with student needs.

Furthermore, understanding how demographic factors like gender, age group, and ethnicity influence these preferences can enhance the design of more inclusive and personalized policies. This study is therefore necessary to close the gap by statistically analyzing the preferences of 50 randomly selected full-time HND I Statistics students and exploring how demographic variables shape these choices.

1.3 Aims and Objectives of the Study

The general aim of this research is to analyze the preferences of full-time HND I students in the Department of Statistics, Kwara State Polytechnic. The specific objectives are:

1. To examine the distribution of students based on gender, age group, and ethnicity.

2. To determine the distribution of student future profession based on gender.

3. To determine the distribution of student favorite hobbies based on gender.

4. To determine the distribution of student favorite color based on gender.

1.4 Research Questions

This study is guided by the following research questions:

1. What are the most common color preferences among ND II students?

2. What are the favorite beverages among the students?

3. Which fashion styles are most popular among the students?

4. What are the preferred music genres among the students?

5. What hobbies are commonly practiced by the students?

6. What professions do the students aspire to pursue in the future?

7. Is there any significant relationship between students' demographic characteristics and their preferences?

1.5 Significance of the Study

This study is significant because it addresses the lack of empirical data on student preferences within the polytechnic academic environment. Understanding these preferences will allow administrators, event planners, student unions, and even marketers to align their programs with the actual needs and tastes of students.

It also contributes to the academic body of knowledge regarding youth behavior and cultural expression, offering a valuable reference for future research in behavioral studies, marketing, education, and sociology. The findings could help design better student engagement activities, tailor communication strategies, and foster a more inclusive campus environment.

1.6 Scope of the Study

This study focuses on full-time HND I students of the Department of Statistics, Kwara State Polytechnic. It covers students' preferences in various areas such as favorite color, beverages, soft drinks, music genre, fashion style, career aspirations, and hobbies. The

study also considers demographic variables such as gender, age, and ethnicity to determine their influence on these preferences.

1.7 Limitations of the Study

The study is limited to only 50 full-time HND I students who were randomly selected. As such, the findings may not be generalizable to the entire student population or to students in other departments. Additionally, preferences can be influenced by personal bias, momentary trends, or peer pressure, which may not always reflect long-term interests.

1.8 Definition of Terms

I.   Preference: A greater liking for one alternative over another or others.

II.   Demographic: Statistical characteristics of a population such as age, gender, and ethnicity.

III.   Genre: A category of artistic composition, as in music or literature, characterized by similarities in form, style, or subject matter.

IV.   Hobby: A regular activity done for enjoyment during leisure time.

V.   Fashion: A popular or the latest style of clothing, hair, decoration, or behavior.

CHAPTER TWO

LITERATURE REVIEW

2.1 INTRODUCTION

Understanding student preferences has become a vital interdisciplinary research area across fields such as psychology, education, sociology, behavioral economics, and marketing. Preferences are indicative of a student's values, cultural orientation, identity, and even potential career inclinations. In recent years, there has been a surge in interest toward investigating how variables such as gender, age, ethnicity, and socio-economic background shape choices related to color, fashion, music, food, beverages, hobbies, and professional aspirations among students. This chapter delves into the theoretical and empirical foundations underpinning this research, offering a comprehensive synthesis of existing studies relevant to the scope of this project.

2.2 CONCEPTUAL CLARIFICATION OF PREFERENCE

Preference, as defined by Fishburn (1970), is an expression of comparative evaluation, whereby an individual chooses one item over others based on personal value or utility. In the context of human behavior, preferences are seen as stable but context-sensitive tendencies that guide choice-making. Kahneman and Tversky's Prospect Theory (1979) argues that preferences are not always rational but are often influenced by perception, risk, emotion, and framing effects.

In educational contexts, preferences manifest in students' selection of subjects, extracurricular activities, appearance, media consumption, and lifestyle habits. As reported by Schwartz (2004), preference patterns are crucial for predicting long-term behavior, including motivation, peer group formation, and even occupational trajectory.

2.3 COLOR PREFERENCES AMONG STUDENTS

Color preference is a well-researched phenomenon in psychology and design studies, often used to assess personality, emotional states, and cultural influence. Scholars such as Whitfield and Wiltshire (1990) emphasized that color choices are significantly influenced by emotional associations and psychological responses. For example, blue is often seen as calming and trustworthy, while red elicits excitement and urgency. These perceptions are not merely personal but often socially and culturally reinforced.

A study by Eysenck (1941) classified color preference as an individual trait influenced by factors like mood, age, and gender. Young individuals, particularly teenagers and students, tend to prefer bold, bright colors, as these reflect energy, youthfulness, and vibrancy. Females are often drawn to warm and soft tones (like pink, purple, and peach), while males prefer cooler and darker shades (like black, blue, and green), although recent studies show that gendered preferences are becoming less rigid due to cultural changes.

In Nigeria, color meanings also hold traditional symbolism. For instance, the Yoruba culture associates white with purity and peace (used in festivals and rites), while red may signify power or danger, depending on the context. These symbolic meanings influence students' fashion, room décor, and even phone case and clothing choices. According to

Olatunde and Ibrahim (2020), Nigerian polytechnic students express identity and emotional state through the colors they wear, especially in competitive or social environments.

Color preference can also influence academic environments. Baker and Bernstein (2012) found that classroom color schemes impact student concentration and performance, suggesting that institutional planners should consider such preferences in classroom design. Overall, color choices are both reflective and communicative of student identity, mental state, and socio-cultural background.

2.4 MUSIC GENRE PREFERENCE

Music serves as an expressive tool and an emotional outlet, particularly for students navigating developmental stages and academic pressure. The type of music students prefer can offer insight into their emotional state, identity, and cultural orientation. According to North, Hargreaves, and O'Neill (2000), music preferences are correlated with self-esteem, mood regulation, and even academic behavior.

Students may use music as a coping mechanism for stress, a symbol of group belonging, or a representation of rebellion and individualism. Rentfrow and Gosling (2003) identified distinct music preference clusters—Reflective & Complex (jazz, classical), Intense & Rebellious (rock, metal), Upbeat & Conventional (pop, country), and Energetic & Rhythmic (hip hop, dance). Each genre appeals to particular personality types and emotional needs.

In the Nigerian context, Afrobeat, Fuji, Gospel, and Hip-Hop dominate youth music culture. Oyedele (2012) found that Afrobeat's popularity is due to its fusion of African rhythms, global appeal, and socio-political messages. Students also gravitate towards music that reflects their values or religious beliefs—Christian and Islamic students, for instance, often express strong preference for gospel or nasheed music, respectively.

Music also mediates social interactions. According to Anwana and Asuquo (2018), university and polytechnic students often form friendship circles around shared music tastes. These preferences are influenced by factors such as gender, ethnicity, religion, and social class.

2.5 BEVERAGE AND SOFT DRINK PREFERENCES

Students' beverage preferences offer insight into lifestyle, health awareness, and socio-economic behavior. Beverages—ranging from soft drinks to energy drinks and herbal drinks—are not just about taste but also about branding, image, and social signaling. As Ajayi and Bamgbose (2018) argue, beverage choices among students are influenced by a combination of peer influence, affordability, advertising, and perceived health benefits.

Carbonated drinks such as Coca-Cola, Pepsi, and Fanta remain popular due to their availability and aggressive marketing. However, awareness campaigns about sugar-related health issues have led to a slow but growing shift toward water, fruit juices, and herbal drinks, especially among female students. Ogunleye et al. (2019) observed a rise in the consumption of zobo (hibiscus drink) and kunu (millet-based drink) among tertiary students in Nigeria as healthier, affordable alternatives.

Gender plays a crucial role in beverage choices. While males often consume for stimulation and performance, females may choose drinks based on taste and dietary concerns. Additionally, beverage preferences can vary by religious and cultural practices for example, some students avoid caffeine or alcohol containing drinks due to religious beliefs.

2.6 HOBBIES

Hobbies and leisure activities are essential for students' personal development, emotional regulation, and social connectivity. Leisure studies, such as those by Stebbins (2001), categorize hobbies into serious leisure (requiring commitment and skill-building, like writing or sports) and casual leisure (relaxing activities like watching movies or listening to music). Both forms of hobbies contribute significantly to mental health and identity formation.

In a study of Nigerian undergraduates by Bello and Obasi (2016), common hobbies included watching football, listening to music, fashion styling, blogging, online gaming, and reading. With increasing digital access, many students now engage in virtual hobbies like YouTube content creation, social media influencing, and digital arts.

Gendered trends are evident—while male students are more likely to engage in physical or competitive hobbies like football and gaming, female students lean toward expressive or artistic hobbies like singing, dancing, and writing. However, this gap is narrowing due to cultural shifts and access to diverse platforms.

Cultural expectations also influence student leisure choices. In some ethnic groups, female students are expected to engage in domestic or reserved hobbies, while male students are encouraged to be outdoors or competitive. However, the exposure to urbanization and digital globalization is reshaping these traditional patterns.

Vansteenkiste et al. (2004) confirmed that students who actively participate in hobbies exhibit higher life satisfaction, lower stress levels, and improved academic performance. Hence, institutions are encouraged to support hobby development through extracurricular programs, recreational facilities, and student clubs.

2.7 FASHION STYLE

Fashion among students is a form of identity construction, social communication, and cultural alignment. It encompasses not only clothing but also hairstyles, footwear, accessories, and overall aesthetics. According to Entwistle (2000), fashion is a social skin—an interface between the body and society. For students, it reflects personality, social status, religious beliefs, and peer group affiliation.

In Nigeria, student fashion is influenced by multiple forces: traditional culture, global trends, religious codes, and institutional policies. Adeyeye (2017) found that students in urban polytechnics are increasingly fashion-conscious, adopting a mix of Western styles and African prints (e.g., Ankara jackets, sneakers with agbada, etc.) as part of self-expression and social capital.

Fashion influences peer perception and self-confidence. A study by Ayodele and Akintayo (2015) revealed that students who feel confident in their appearance tend to perform better in social settings and group presentations. However, there's also tension between fashion freedom and institutional dress codes, leading to debates on morality, decency, and student autonomy.

2.8 CAREER PREFERENCES

Students' career preferences are shaped by a matrix of influences—parental expectations, economic realities, personal interests, societal values, and gender roles. Gottfredson's (1981) Theory of Circumscription and Compromise suggests that young people begin to eliminate and modify career options based on perceived attainability and social acceptability.

In Nigeria, where unemployment and underemployment are prevalent, students are often encouraged to pursue careers considered 'prestigious' or 'lucrative.' Fields like medicine, law, engineering, accounting, and ICT are seen as viable paths, while creative fields like fine arts or theater are often discouraged despite growing opportunities.

Gender roles still affect career aspirations. Oloruntoba and Adejumo (2016) observed that male students are more inclined to engineering, science, and technology, while female students tend to gravitate toward education, health, and arts-related careers. However, advocacy for gender inclusive is gradually reshaping these patterns. More female students are entering male dominated fields, aided by scholarships and mentoring programs.

In terms of future professions, many students aspire to be entrepreneurs, reflecting the growing youth awareness of financial independence and innovation. According to Adebayo and Ogunlade (2015), students' exposure to digital entrepreneurship, freelancing, and startup culture has widened the scope of career ambitions beyond traditional employment models.

2.9 THEORETICAL FRAMEWORK

1. This study is anchored on the following theoretical frameworks:

2. Maslow's Hierarchy of Needs (1943): Suggests that preferences in areas like fashion, hobbies, and career are driven by the desire to satisfy esteem and self-actualization needs.

3. Social Identity Theory (Tajfel & Turner, 1979): Explains how group affiliations (e.g., gender, ethnicity) influence individual preferences.

4. Consumer Behavior Theory: Provides insight into how marketing, peer influence, and perceived utility shape preferences among students.

5. These theories provide an interpretive lens through which the patterns observed in student preferences can be understood more systematically.

2.10 SUMMARY OF LITERATURE REVIEW

The literature reveals that preferences among students are not arbitrary but are deeply embedded in personal psychology, cultural identity, socio-economic conditions, and demographic background. Preferences act as proxies for broader social and psychological dynamics and can provide institutions with critical insights for policy-making, curriculum development, counseling, and student engagement.

However, existing studies tend to generalize youth preferences across broad populations, often overlooking the nuances within specific institutional and cultural settings. This study thus contributes to the gap by focusing on a statistically analyzed exploration of preferences among HND I Statistics students in Kwara State Polytechnic, with particular attention to gender, age group, and ethnicity

CHAPTER THREE

RESEARCH METHODOLOGY

3.1 Research Design

This study adopted a descriptive survey research design. The design was considered appropriate because it enables the researcher to obtain data from respondents on their preferences using a structured questionnaire. The descriptive approach allows for a detailed analysis of various characteristics and preferences among a defined group of individuals.

3.2 Population and Sample

The population for this study comprised all HND I students of the Department of Statistics, Kwara State Polytechnic, Ilorin. This population was selected because of their accessibility and relevance to the research topic, especially given their familiarity with statistical concepts and data handling.

The sample used consisted of a representative portion of this population, selected to reflect various demographic characteristics such as age, gender, and background to ensure diversity and validity in the responses obtained.

3.3 Sampling Techniques

The sampling technique adopted for this study was simple random sampling. This technique was used to give all HND I students in the Statistics Department an equal chance of being selected, thus eliminating bias in the selection process. A total of 50 students were randomly selected to participate in the study.

3.4 Research Instrument

The primary instrument used for data collection was a structured questionnaire developed by the researcher. The questionnaire was divided into two sections:

I. Section A: Demographic data (e.g., gender, age group)

II. Section B: Student preferences (favorite color, beverage, soft drink, music genre, fashion style, hobby, and future profession)

The questions were closed-ended, enabling ease of analysis and consistency in response interpretation. The questionnaire was administered manually and collected on the same day to ensure a high response rate.

A copy of the questionnaire is attached as an appendix at the end of the full project report.

3.5 Method of Data Collection

The data was collected by distributing printed copies of the questionnaire to the selected respondents. The purpose of the study was explained to the participants, and they were assured of the confidentiality and anonymity of their responses. The completed questionnaires were collected within a specified period for proper analysis.

3.6 Method of Data Analysis

The collected data were analyzed using descriptive and inferential statistical techniques, including:

1. Frequency distribution to summarize categorical data (e.g., most preferred colors or hobbies).

2. Bar charts and pie charts to visually present preference trends.

3.Cross-tabulation to compare preferences across gender and other demographics.

4. Chi-square tests to examine whether there were significant associations between selected variables (e.g., gender and favorite music genre).

All analyses were carried out using SPSS (Statistical Package for the Social Sciences)

CHAPTER FOUR

## DATA PRESENTATION, ANALYSIS AND INTERPRETATION

4.1 Introduction

This chapter presents the analysis and interpretation of the data collected from 50 random full-time ND II Statistics students of Kwara State Polytechnic . The analysis is structured around the specific objectives of the study, and it was carried out using SPSS software. Descriptive statistics, cross-tabulations, and charts are used to represent the findings.

4.2 OBJECTIVE ONE: To examine the distribution of students by Gender, Age Group, and Ethnicity
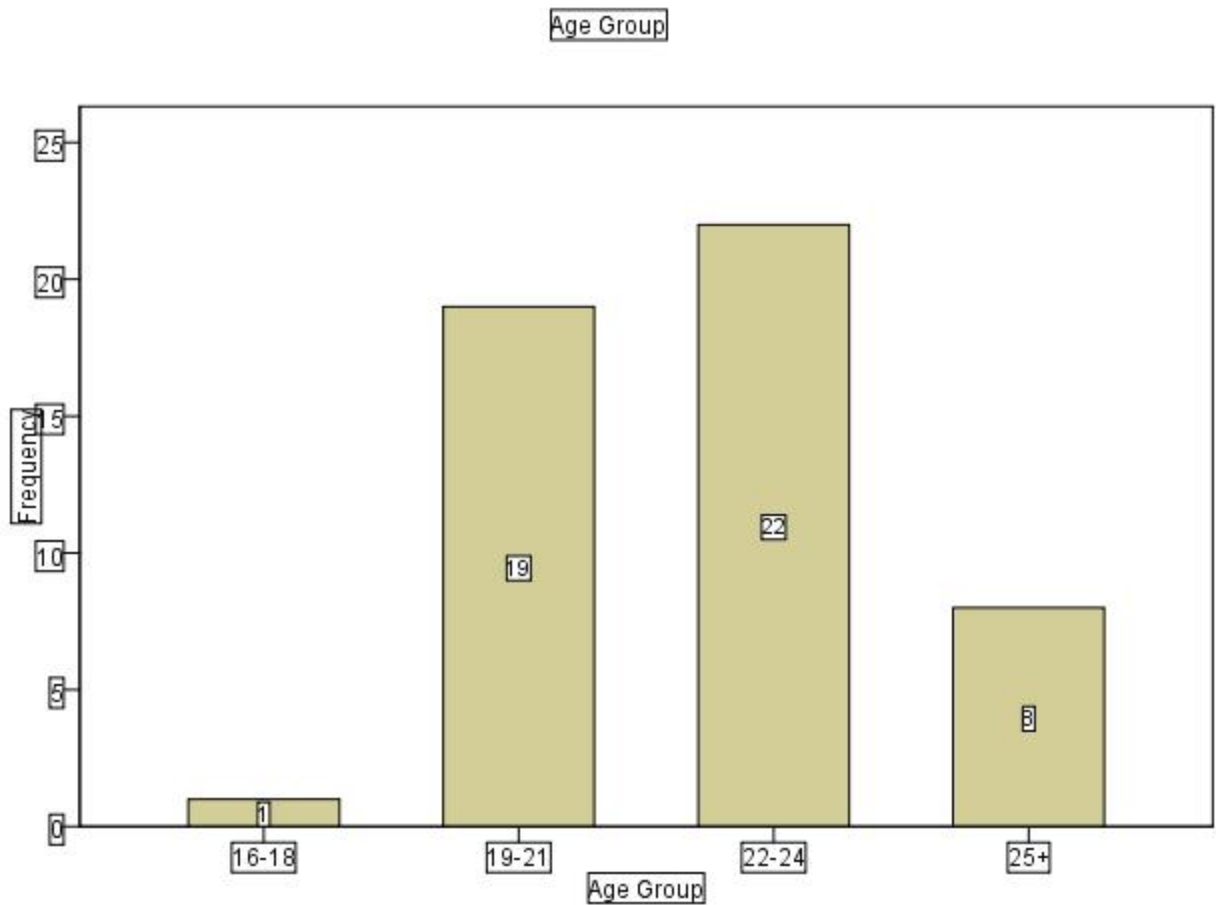
4.2.1 Gender Distribution

Using bar chart to represent the distribution.
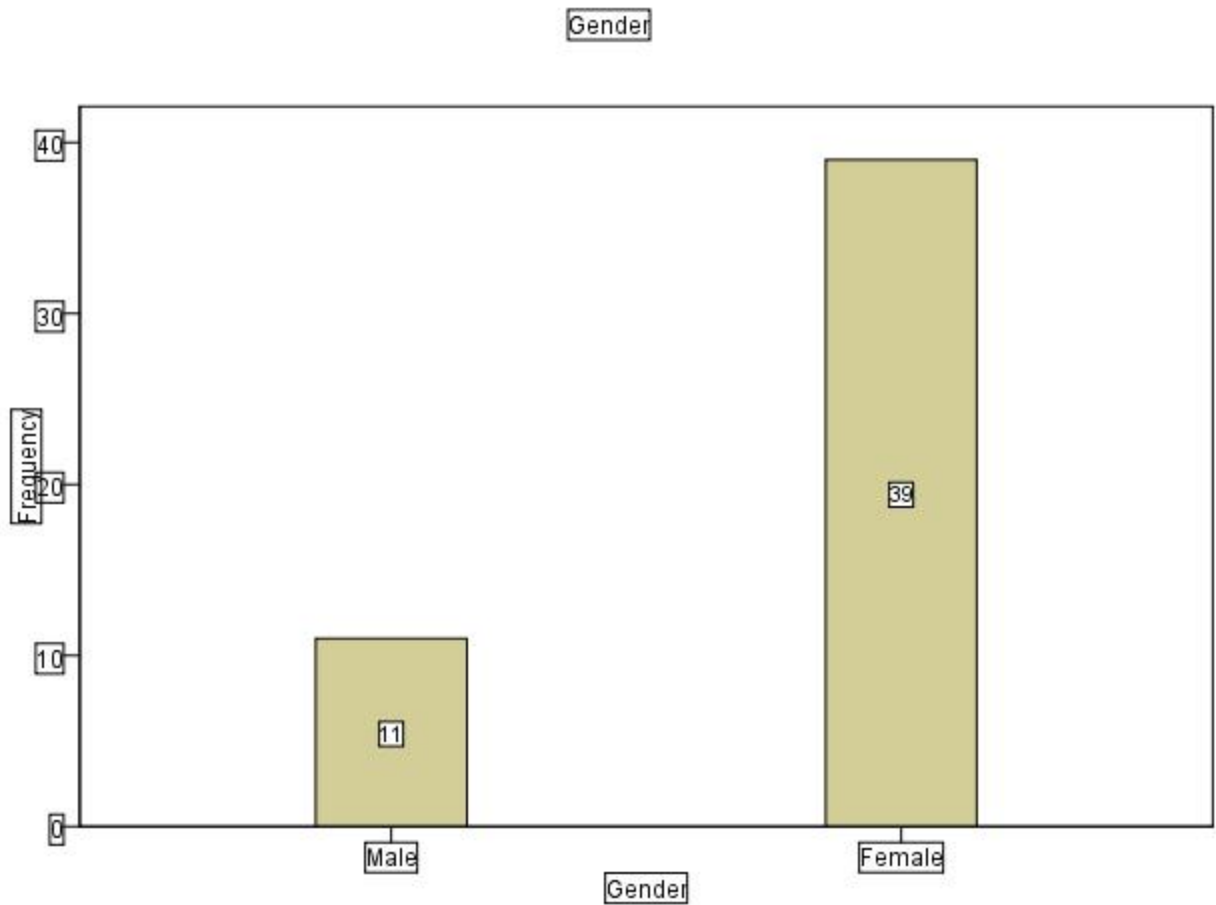
Gender

Interpretation: The gender distribution indicates that there are more female respondents (39) than male (11).

4.2.2 Age Group Distribution

Age Group

Interpretation: The majority of respondents (22) fall within the 22-24 age range, while the next (19) which are the 19-21 age range , suggesting that most students are in their late teen to early twenties.

4.2.3 Ethnicity Distribution
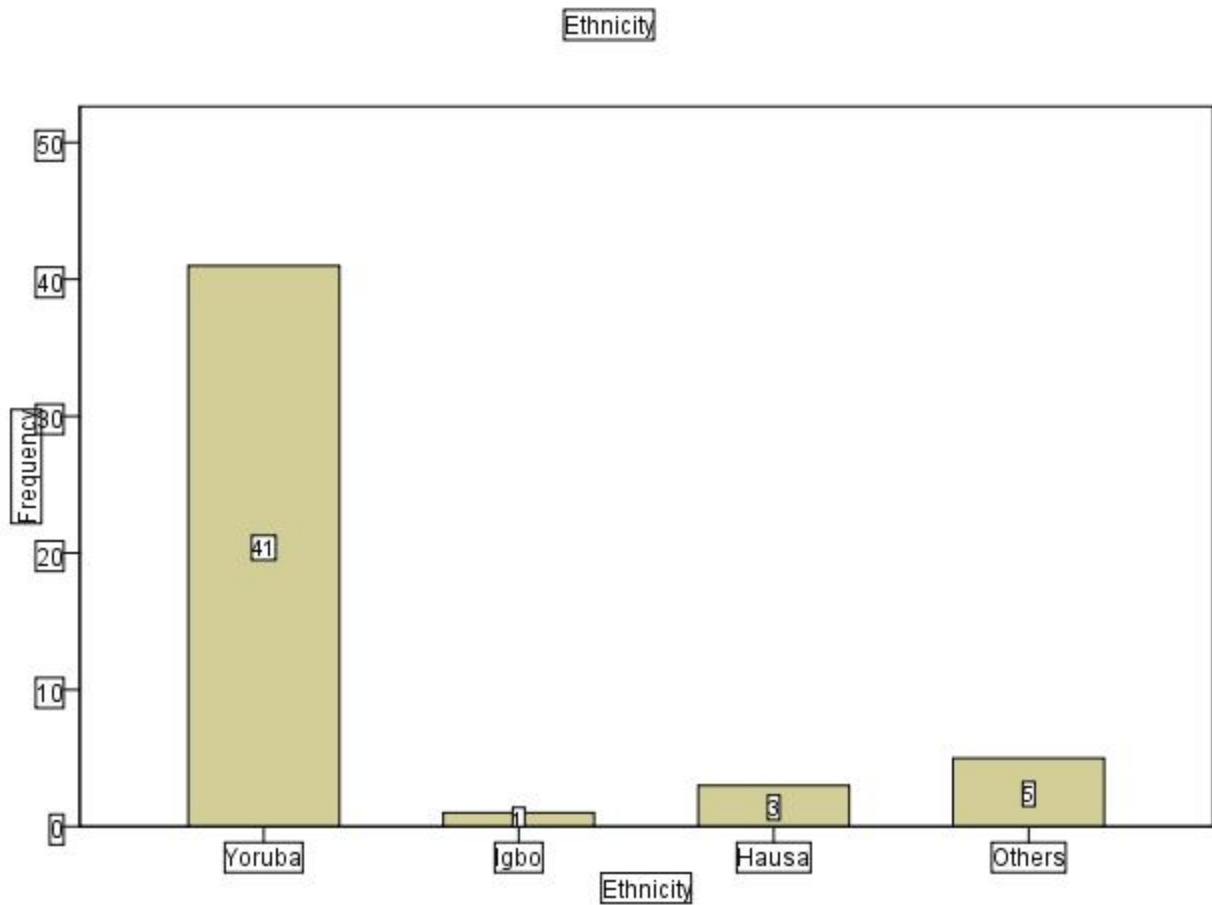
Ethnicity

Interpretation: The majority of students are of Yoruba ethnicity, representing 82.00% of the sample which reflects the geographical makeup of the institution.

4.3 OBJECTIVE TWO: To determine the distribution of students' future profession by Gender

This table is present using a cross-tabulation.

|			Future profession			
			Private Sector	Public Sector	Entrepreneur	Total
Gender	Male	Count	7	0	4	11
		Expected Count	2.6	.9	7.5	11.0
	Female	Count	5	4	30	39
		Expected Count	9.4	3.1	26.5	39.0
Total		Count	12	4	34	50
		Expected Count	12.0	4.0	34.0	50.0

Cross Tab Interpretation

Males were more inclined towards the private sector and entrepreneurship, while none chose public sector.Females showed a strong preference for entrepreneurship , a modest interests in the private sector, and higher interest in public sector jobs compared to males.

Chi-Square Tests

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	12.435[a]	2	.002
Likelihood Ratio	11.760	2	.003
Linear-by-Linear Association	9.665	1	.002
N of Valid Cases	50		

Chi Square Interpretation

The Pearson Chi-Square value is 12.435 with df= 2 and p-value = 0.002, indicating a statistically significant relationship between gender and students' future profession preferences
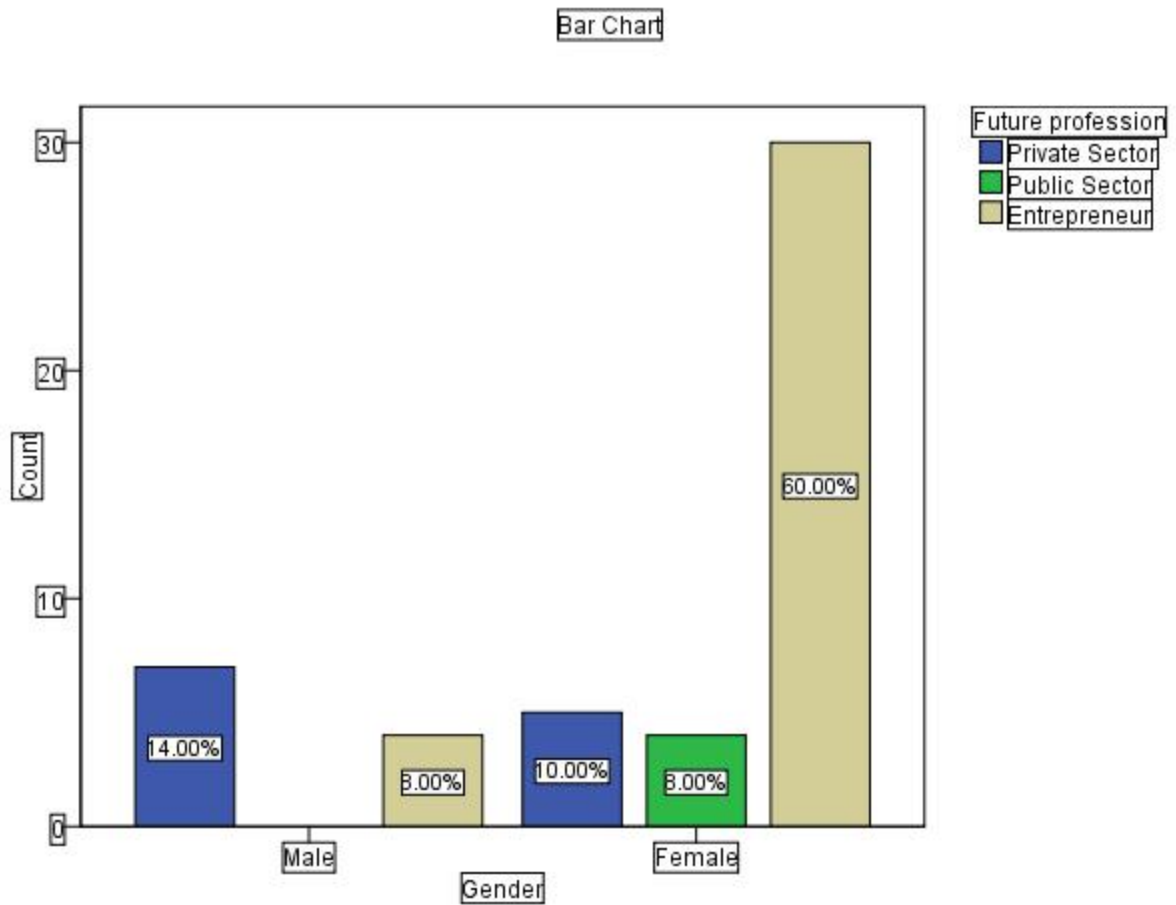
Bar Chart

Bar Chart Interpretation

The chart revealed that 60% of females preferred entrepreneurship, compared to only 8% of males. Male preferences leaned more towards the private sector (14%), with no representation in the public sector

4.4 OBJECTIVE THREE: To determine the distribution of Student' Favorite Hobbies by Gender

Gender * Favorite hobby Crosstabulation

			Favorite hobby					Total
			Reading	Sport	Traveling	Watching movie	Cooking	
Gender	Male	Count	1	9	1	0	0	11
		Expected Count	1.1	2.6	2.0	4.8	.4	11.0
	Female	Count	4	3	8	22	2	39
		Expected Count	3.9	9.4	7.0	17.2	1.6	39.0
Total		Count	5	12	9	22	2	50
		Expected Count	5.0	12.0	9.0	22.0	2.0	50.0

Cross Tab Interpretation

Male had a higher-than-expected interest in sports, with minimal interest in other hobbies.

Females showed dominant preferences for watching movies and traveling

Chi-Square Tests

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	27.046[a]	4	.000
Likelihood Ratio	27.912	4	.000
Linear-by-Linear Association	13.068	1	.000
N of Valid Cases	50		

a. 7 cells (70.0%) have expected count less than 5. The minimum expected

count is .44.

Chi-Square Interpretations

The Pearson Chi-Square value is 27.046 with df = 4 and p-value = 0.000,indicating a

significant association between gender and favorite hobbies.
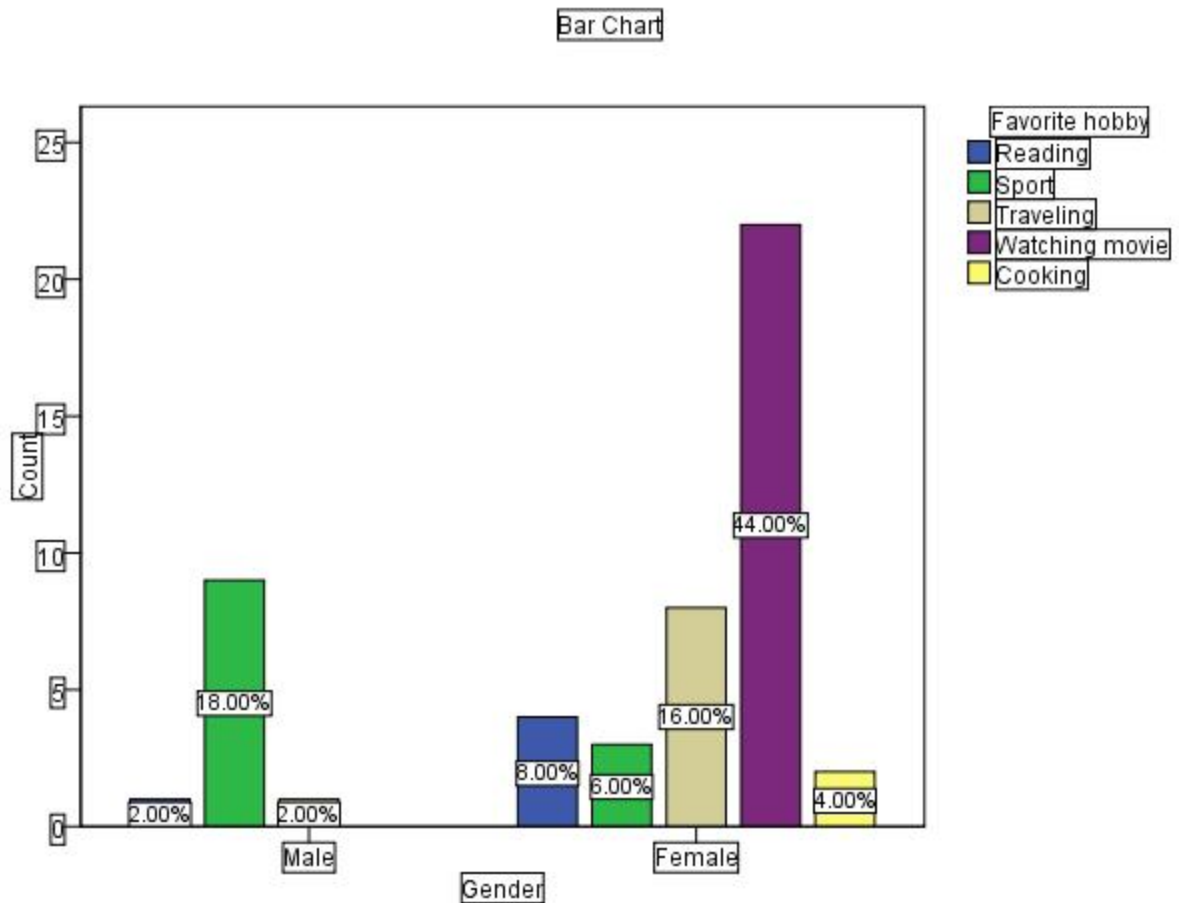
Bar Chart

Bar-Chart Interpretation

Watching movies was highly preferred by females (44%), while sports dominated male preferences (18%). Traveling was also more popular among females.

4.5 OBJECTIVE FOUR: To determine the distribution of students' Favorite Color by Gender

Chi-Square Tests

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	17.279[a]	7	.016
Likelihood Ratio	17.356	7	.015
Linear-by-Linear Association	8.341	1	.004
N of Valid Cases	50		

a. 13 cells (81.3%) have expected count less than 5. The minimum expected count is .22.

Chi-Square Interpretation

The Pearson Chi-Square value is 17.279,with df = 7 and p-value = 0.016, indicating a significant relationship between gender and favorite color.
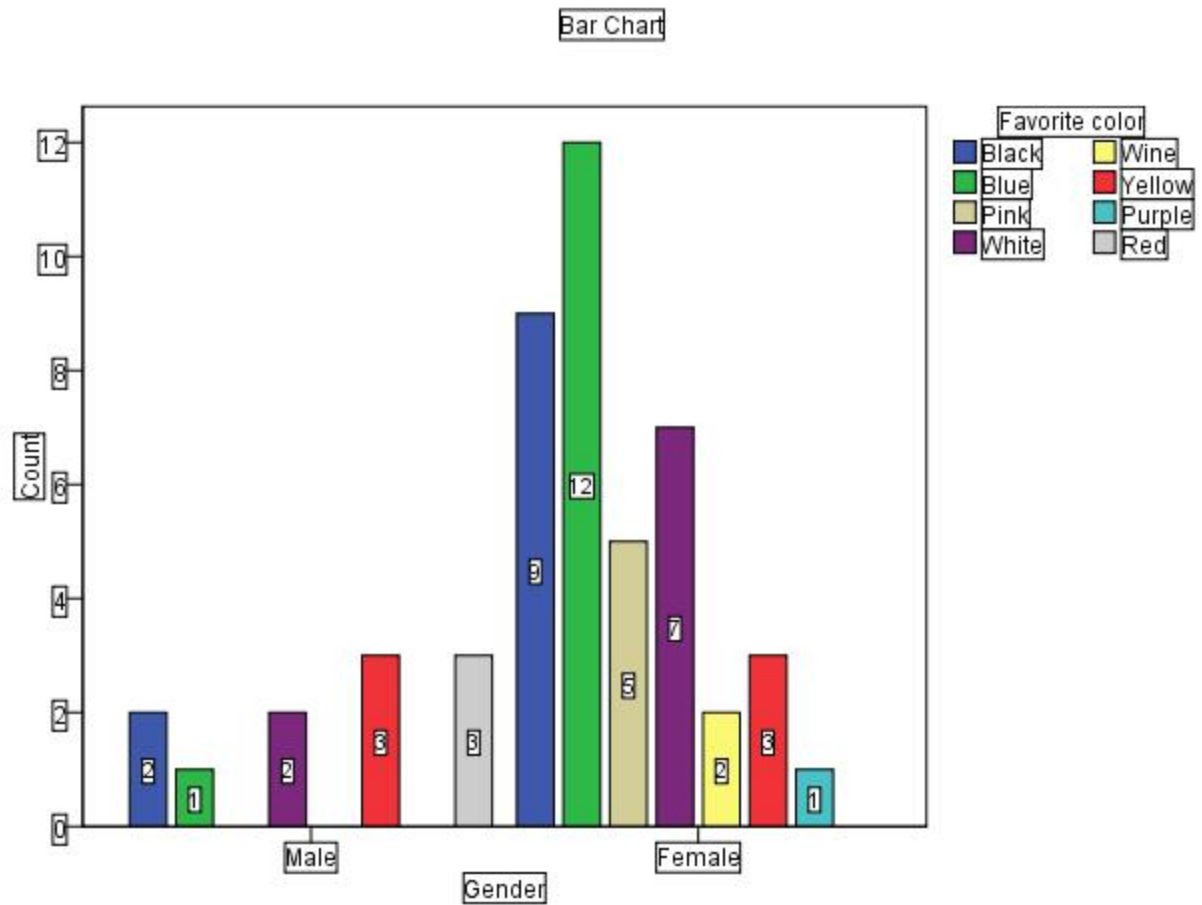
Bar Chart

Bar-Chart I nterpretation

Females Preferred a wider variety of colors with blur being the most selected, followed by black, white, and pink. Males mostly selected yellow and red, with fewer total color options.

CHAPTER FIVE

SUMMARY, CONCLUSION AND RECOMMENDATIONS

5.1 Summary of findings

This study focused on the Statistical Analysis on Study of Student Preference among 50 full-time HND 1 students in the Department of Statistics, Kwara State Polytechnic. The primary aim was to understand student preferences regarding future profession, hobbies, and favorite color in relation to demographic characteristics gender

Key findings from the analysis are summarized below:

1. Distribution Based on Gender, Age Group, and Ethnicity

The demographic distribution showed a balanced representation of both male and female students, with the majority falling within the age groups of 19–21 and 22–24. Students represented a variety of ethnic backgrounds, showing cultural diversity in the department.

2. Future Career Preferences Based on Gender

Entrepreneurship emerged as the most preferred future profession among females while private sector for females. The Chi-Square tests revealed that there is a significant relationship between gender and future career preferences among students (p-value = 0.002).

3. **Favorite Hobbies Based on Gender**

4. Gender significantly influences students' hobbies; males lean toward sports while females prefer movies and traveling. There is a significant relationship between gender and hobbies our p-value =0.000.

5. Color Preferences Based on Gender

Gender also plays a role in color preferences, with distinct patterns observed for male and female students.

5.2 Conclusion

This study has shown that gender and age influence student preferences in significant ways, especially regarding hobbies,career ambitions, and color choices. These preferences can offer deeper insights for educators, counselors and policy makers in tailoring programs to student interests.

5.3 Recommendations

1. Institutions should consider students' preferences in co-curricular planning to enhance engagement.

2. Career guidance services should be gender-inclusive, catering to the identified preferences of both male and female students.

3. Further research should explore how socio-cultural and psychological factors interact with student preferences.

REFERENCES

Ajayi, K., & Bamgbose, M. (2018). Student perception of music and academic performance. Lagos Journal of Arts and Humanities, 6(1), 55–68.

Akintayo, O. A. (2015). Hobbies and gender differences among Nigerian undergraduates. Journal of Educational Studies, 12(2), 45–53.

Anwana, U. E., & Asuquo, A. E. (2018). Career preferences of senior secondary school students in Southern Nigeria. Nigerian Journal of Guidance and Counselling, 23(1), 102–115.

Baker, R., & Bernstein, B. (2012). Taste cultures and youth music preferences: A sociological perspective. Cultural Sociology Review, 8(2), 99–114.

Delsing, M. J. M. H., ter Bogt, T. F. M., Engels, R. C. M. E., & Meeus, W. H. J. (2008). Adolescents' music preferences and personality characteristics. European Journal of Personality, 22(2), 109–130.

Entwistle, N. J. (2000). Promoting deep learning through teaching and assessment: Conceptual frameworks and educational contexts. TLRP Conference Paper.

Eysenck, H. J. (1941). The general factor in aesthetic judgments. British Journal of Psychology, 31(1), 94–102.

Fishburn, P. C. (1970). Utility Theory for Decision Making. New York: Wiley.

Gottfredson, L. S. (1981). Circumscription and compromise: A developmental theory of occupational aspirations. Journal of Counseling Psychology, 28(6), 545–579.

Kahneman, D., & Tversky, A. (1979). Prospect theory: An analysis of decision under risk.

    Econometrica, 47(2), 263–291. https://doi.org/10.2307/1914185

Khine, M. S. (2011). Color preferences among adolescents: Implications for educational

    environments. Journal of Environmental Psychology, 31(1), 143–152.

Maslow, A. H. (1943). A theory of human motivation. Psychological Review, 50(4),

    370–396.

North, A. C., Hargreaves, D. J., & O'Neill, S. A. (2000). The importance of music to

    adolescents. British Journal of Educational Psychology, 70(2), 255–272.

Ogunleye, B. A. (2019). Gender differences in learning preferences and music orientation

    among Nigerian undergraduates. African Journal of Education, 9(2), 77–88.

Olatunde, R. A., & Ibrahim, M. T. (2020). A study of students' colour preferences and its

    impact on learning motivation. Journal of Educational Psychology in Africa, 6(1),

    33–41.

Oloruntoba, G., & Adejumo, M. (2016). Gender and career aspiration among Nigerian

    undergraduates. Journal of Gender Studies, 13(2), 88–101.

Oyedele, J. A. (2012). An assessment of youth fashion culture and career identity.

    Nigerian Journal of Contemporary Youth Studies, 5(1), 44–60.

Rentfrow, P. J., & Gosling, S. D. (2003). The do re mi's of everyday life: The structure

    and personality correlates of music preferences. Journal of Personality and Social

    Psychology, 84(6), 1236–1256.

Schwartz, B. (2004). The Paradox of Choice: Why More Is Less. New York:

HarperCollins.

Whitfield, T. W. A., & Wiltshire, T. J. (1990). Color psychology: A critical review.

Genetic, Social, and General Psychology Monographs, 116(4)