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Long Paper

Engagement of Students in the Research and Extension Projects of the Department of Management Studies of Cavite State University – CCAT Campus

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Abstract

Higher Education Institutions (HEIs) in the Philippines emphasize research, innovation, and extension in addition to academics. This study was conducted to understand the engagement of business management students in the research and

extension projects of the Department of Management Studies at Cavite State University—CCAT Campus. The study utilized a descriptive-correlational research design approach. Moreover, the researchers used a random sampling technique among the 888 business management students, giving each sample equal chances of being chosen. The intended sample size for the study was determined using Slovin's technique, resulting in a total of 571 respondents. A survey questionnaire was disseminated through Google Forms and distributed from different sections of all year levels, from the first to the fourth. The findings showed that students are engaged in the research and extension projects of the university. There were also constraints experienced as they engaged, such as a lack of materials and resources and financial and transportation difficulties. Furthermore, the researchers concluded that there was no significant relationship between the demographic profile of business management students and their level of engagement in factors of research and extension projects such as preparation, implementation, monitoring, and evaluation. Excluding the correlation between gender and engagement in the research projects in terms of preparation, monitoring, and evaluation, these variables have correlated significantly. As a result, the researchers recommend continuously developing the student's participation in the research and extension through various activities and seminars. Faculty members should take the initiative, necessitating programs to raise awareness of each member's role in such projects to increase future participation and engagement of students.

Keywords – constraints, engagement, extension projects, research projects, business students

INTRODUCTION

In the Philippines, Higher Educational Institutions (HEIs) are focused not just on academics but also on research, production, and extension. The Commission on Higher Education (CHED) in the Philippines has mandated that universities and colleges provide educational and civic service to the community (Quitoras, 2021). The Cavite State University Extension Services is a community outreach program that gives advanced instruction and professional training in agriculture, science and technology, education, entrepreneurship, and other relevant subjects. The university must undertake research and extension activities and it provides progressive leadership. The extension programs and activities enable diverse communities to benefit from the university's numerous activities, research, and products. Extension initiatives ranged from knowledge and technology transmission to tangible and intangible skills and process adaptation for community development. Establishing ties to higher learning institutions for academic and organizational progress and community development is one of the many important aspects of research and extension programs. The research and extension projects are important and practical community development instruments.

Conducting the research helps in problem-solving on a particular subject and also contributes to fulfilling one's curiosity. According to Western Sydney University (2021), research is the process of developing new knowledge or using existing knowledge to generate new ideas and understand concepts and methodologies. This comprises consolidating and evaluating prior studies to the extent that it produces original and innovative results. Cavite State University is responsible for developing research and extension programs and activities that address the socioeconomic requirements of the local community. These programs aim to establish extension and community services within communities, following the priorities of the various colleges, to effectively contribute by equipping people with knowledge, skills, and abilities to promote self-reliance, productivity, and community improvement. As students apply their knowledge to solve real-world problems, there is a growing recognition of the significance of research and extension activities in teaching and learning (Llenares & Deocaris, 2018).

Thus, the researchers conducted this study to determine the student's engagement in the research and extension projects of the Department of Management Studies at Cavite State University's CCAT Campus. This study identified issues and problems concerning HEIs' research and extension activities from a micro perspective. Considerably, it encompasses enhancing the research and extension paradigms of HEIs' programs towards community-sensitive and responsive activities, which address students as efficient and effective co-implementors of research and extension activities.

Objectives of the Study

Generally, the researchers aimed to determine the engagement of the Business Management Students towards research and extension projects of the Management Studies Department of Cavite State University – CCAT Campus, Rosario, Cavite.

Specifically, the researchers aimed to:

1. determine the demographic profile of the participants in terms of:
    a. age,
    b. gender, and
    c. civil status.
2. determine the engagement level of the participants in the research and extension project in terms of:
    a. preparation of the project,
    b. implementation of the project, and
    c. monitoring/evaluation of the project.
3. identify the constraints of business management students towards engagement in the research and extension project in terms of:
    a. preparation of the project,
    b. implementation of the project, and
    c. monitoring/ evaluation of the project.
4. determine the significant relationship between the demographic profile of the participants and the engagement level in the research and extension project.

5. propose interventions to address the identified constraints of the business management students in engaging in research and extension projects.

LITERATURE REVIEW

The Role of Research and Extension Projects in Higher Education Institutions

Although research as a field is underappreciated in the Philippines, it is crucial to advancing the horizons of knowledge and fostering national economic development (Formalejo & Ramirez, 2017). According to Sedanza (2018), two of the four functions of state universities and colleges (SUC) in the Philippines are research and extension, which play a significant role in higher education institutions (HEIs). Universities are realigning their teaching and research missions to accommodate community participation due to the imperative of knowledge-based and inclusive growth (Onwuemele, 2018). Academic research must demonstrate direct societal usefulness (Knudsen et al., 2018). Medina (2019) emphasized that SUCs' community engagements were traditionally divided into instruction, research, extension, and production. However, it was discovered that research and extension are at the heart of community involvement. Additionally, colleges must run extension programs, initiatives, and activities that are compatible with the programs they offer to fulfill their objectives (Sibal & Elizaga, 2019). According to Capulso (2019), HEIs are urged to answer the call for social change, particularly for the poorest of the poor.

Importance of Research and Extension Engagement

Quimbo and Sulabo (2014) proposed several policy implications for institutions of higher learning to foster and improve the research culture. These policy implications include the need for a strong faculty development program, collaborative research, research productivity, and an effective incentive system. Furthermore, Romani-Dias et al. (2019) discovered that academics' international academic experience, inclusion in international collaboration networks, international co-authorship, and experience in foreign publications were factors influencing the internationalization of higher education institutions.

Students have been encouraged to participate in community extension initiatives and activities. In addition, student involvement is one of the standards for accreditation. Consequently, all academic programs in higher education institutions now require participation in community involvement activities. According to Balila et al. (2016), one encouraging finding was that the students' participation in community extension services helped them develop morally, made them feel more accomplished, and improved their self-esteem. Their involvement in extension activities improved their social skills and increased their desire to help others. Additionally, they were more aware of social and cultural diversity.

Challenges and Difficulties in Research and Extension Activities

The research contributes to the nation's growth and development. When research findings are put to good use, they can aid people in the community (De Castro & De Castro, 2020). The study conducted by Marques et al. (2018) revealed that sustainability is strongly tied to each undergraduate course's area of knowledge and that research and extension activities are specialized to various groups within the university. Considerably, the presence of multiple campuses makes it harder to execute sustainability regulations. It was discovered that management is primarily responsible for the incorporation of sustainability into the institution and that teaching, research, and extension policies linked to sustainability can be developed and enhanced from this point forward.

METHODOLOGY

Research Design

The researchers used a descriptive-correlational research design. The demographic profile, engagement level, and constraints of the students in the research and extension projects were described through a descriptive research design. Also, the study utilized inferential analysis to evaluate the significant relationship between the demographic profile and engagement level of the participants. The data gathered from the quantitative approach justified the results of the correlational research approach.

Sources of Data

The study utilized both primary and secondary data. First-hand data were obtained from the business management students of the CvSU-CCAT campus through self-administered survey questionnaires through Google Forms. Moreover, secondary data such as academic references, scholarly articles, and other learning resources support the information that was collected from the respondents to help the research study's argument.

Sampling Design

The researchers used a participative-random sampling technique among the initially targeted total enumeration of 888 identified business management students. The participants yielded 571 respondents, which is 64.30% of the total student population.

Research Instrument

The data needed for this study was collected through survey questionnaires. The researchers used a self-constructed survey questionnaire for the collection of data through Google Forms. The researchers obtained the entire population of Business Management students from the campus registrar. Before distributing the survey questionnaire to the participants, the researchers coordinated with the various class representatives to explain the research's purpose and discuss the participants' informed consent. Considerably, the research instrument has undergone content validation from experts in related fields and study participants to test the validity and reliability of the questionnaires. The calculated Cronbach alpha is 0.72, while the LCV is 0.53, which was deemed valid and reliable based on the statistical significance or acceptability level.

Statistical Treatment

The researcher utilized descriptive statistics such as frequency and percentage distribution. Inferential statistics were also used, which is the Spearman rho correlation to test the significant relationship of the variable under study.

Ethical Consideration

The researcher informed the respondents that they would be part of the study, and their participation was voluntary so that they could withdraw at any time. A consent form was sought from the participants before they could proceed with answering the self-constructed survey questionnaire. The researchers protected the confidentiality of the respondents. In conducting this study, the researchers ensure that no one is harmed.

RESULTS

Table 1 shows the demographic profile of the respondents. It shows that the participants belong to the age range of 12 to 20 years old with a percentage of 57.80% whilst the least is 31 years old and below with 0.90 %. Additionally, females responded the most with 69 % of the total participants. Finally, participants are single with 561 out of total responses.

Table 2 presents the summary of the engagement level of the respondents in the research project. The table showed that most of the BSBM students were engaged in the research project preparation, implementation, monitoring, and evaluation, with a grand mean of 4.07, 4.04, and 4.00, respectively.

Table 1. Demographic profile of the respondents

Demographic Profile	Frequency (N = 571)	Percentage (%)

Age	17 to 20 years old	328	57.40
	21 to 25 years old	232	40.60
	26 to 30 years old	6	1.10
	31 and above	5	0.90
Gender	Male	145	25.40
	Female	394	69.00
	Gay	4	0.70
	Bisexual	12	2.10
	Transgender	1	0.20
	Queer	2	0.40
	Rather not say	13	2.30
Civil Status	Single	561	98.20
	Married	2	0.40
	Widowed	1	0.20
	Cohabitation	7	1.20

Table 2. The engagement level of the respondents in the research project

	Category	Mean	Descriptive Value
Preparation	Conducting research proposal review	4.11	Engaged
	Participating in the presentation of the research proposal	4.04	Engaged
	Approval of research proposal	4.06	Engaged
	Grand Mean	**4.07**	**Engaged**
Implementation	Participating in the data-gathering procedure	4.10	Engaged
	Participating in the interpretation of data gathered	4.00	Engaged
	Evaluating the data gathered.	4.02	Engaged
	Grand Mean	**4.04**	**Engaged**
Monitoring and Evaluation	Participating in the results and discussion	4.02	Engaged
	Assessment of the possible constraints encountered during the project	3.97	Engaged
	Giving conclusion and recommendations	4.02	Engaged
	Grand Mean	**4.00**	**Engaged**

Table 3 showcases the summary of the engagement level of the respondents in the extension project. This shows that the BSBM students were engaged in the extension project with a grand mean of 3.95, 3.97, and 3.84 for preparation, implementation, monitoring, and evaluation, respectively.

Table 3. The engagement level of the respondents in the extension project

Category		Mean	Descriptive Value
Preparation	Conducting a training needs assessment	3.99	Engaged
	Participating in a series of meetings as part of the planning process	3.95	Engaged
	Drafting and submission of extension proposal	3.91	Engaged
	Grand Mean	**3.95**	**Engaged**
Implementation	Participating in the orientation of beneficiaries	4.01	Engaged
	Coordinating the pre-assessment procedure	3.95	Engaged
	Engaging in the extension activity evaluation	3.96	Engaged
	Grand Mean	**3.97**	**Engaged**
Monitoring and Evaluation	Assessment of the status of the extension project	3.87	Engaged
	Listing down the possible challenges encountered during the extension project	3.89	Engaged
	Drafting the terminal report for the extension project	3.74	Engaged
	Grand Mean	**3.84**	**Engaged**

Table 4 presents the constraints in the preparation of the research and extension project. Considerably this shows that lack of resources, difficulty in transportation, lack of preparedness, and budget for materials were the most encountered constraints by the BSBM students, with 21.08%, 14.85%, 12.40%, and 12.02%, respectively.

Table 5 presents the constraints in the implementation of the research and extension project. Most respondents indicated that it is due to a lack of financial support, with 315 or 23.9% of the total responses. It was followed by their perceived lack of skills with 204 or 15.5% responses, their lack of communication with 204 or 15.5%, and their varied personalities and characteristics having 184 responses or 13.97%.

Table 4. Constraints in the preparation of research and extension project

Constraints	Frequency	Percentage

Lack of resources	328	21.08
Difficulty in transportation	231	14.85
Lack of initiatives	160	10.28
Lack of preparedness	193	12.40
Familiarity	177	11.38
Budget for food and drinks	119	7.65
Weather	154	9.90
Budget for materials	187	12.02
Others	7	0.45
Total	1556	100.0

Table 5. Constraints in the implementation of research and extension project

Constraints	**Frequency**	**Percentage**
Lack of financial support	315	23.92
Lack of support from the Department	73	5.54
Clarity of instructions	116	8.81
Lack of skills	220	16.70
Language barrier	81	6.15
Lack of communication	204	15.49
No accompaniment	119	9.04
Varied personalities and characteristics	184	13.97
Others	5	0.38
Total	1317	100.00

Table 6 exhibits the constraints in the monitoring and evaluation of the research and extension project. The results show that health risk, focus on tasks, accessibility, and participation with 16.58%, 16.34%, 15.85%, and 13.64%, respectively, were the common constraints of the BSBM students in the monitoring and evaluation of research and extension project.

Table 6. Constraints in the monitoring and evaluation of research and extension project

Constraints	**Frequency**	**Percentage**
Health risk	203	16.58
Participation	167	13.64
Safety of environment	89	7.27
Self-perceived difficulty	133	10.87
Focus on tasks	200	16.34
Accessibility	194	15.85
Privacy	94	7.68
Technical expertise	135	11.03
Others	9	0.74
Total	1224	100.00

Table 7 presents the correlation between the age of the respondents and the engagement level in the research project. This shows that the variable under study has no significant relationship. Thus, the null hypothesis is accepted.

Table 7. Correlation between age and engagement in the research project

Category		Coefficient	P-Value	Description	Significance
Preparation	Conducting research proposal review	0.037	0.371	Positive Very Weak Correlation	Insignificant
	Participating in the presentation of the research proposal	0.049	0.240	Positive Very Weak Correlation	Insignificant
	Approval of research proposal	0.017	0.689	Positive Very Weak Correlation	Insignificant
Implementation	Participating in the data-gathering procedure	-0.022	0.592	Negative Very Weak Correlation	Insignificant
	Participating in the interpretation of data gathered	-0.029	0.486	Negative Very Weak Correlation	Insignificant
	Evaluating the data gathered	-0.007	0.876	Negative Very Weak Correlation	Insignificant
Monitoring and Evaluation	Participating in the results and discussion	0.009	0.839	Positive Very Weak Correlation	Insignificant
	Assessment of the possible constraints encountered during the project	-0.009	0.838	Negative Very Weak Correlation	Insignificant
	Giving conclusion and recommendations	-0.044	0.291	Negative Very Weak Correlation	Insignificant

Table 8 presents the correlation between the age of the respondents and the engagement level in the extension project. This shows that the variable under study has no significant relationship. Thus, the null hypothesis is accepted.

Table 8. Correlation between age and engagement in the extension project

Category		Coefficient	P-Value	Description	Significance
Preparation	Conducting a training needs assessment	-0.033	0.433	Negative Very Weak Correlation	Insignificant
	Participating in a series of meetings as part of the planning process	-0.016	0.699	Negative Very Weak Correlation	Insignificant
	Drafting and submission of extension proposal	-0.014	0.747	Negative Very Weak Correlation	Insignificant
Implementation	Participating in the orientation of beneficiaries	-0.043	0.307	Negative Very Weak Correlation	Insignificant
	Coordinating the pre-assessment procedure	-0.030	0.480	Negative Very Weak Correlation	Insignificant
	Engaging in the extension activity evaluation	-0.042	0.313	Negative Very Weak Correlation	Insignificant
Monitoring and Evaluation	Assessment of the status of the extension project	-0.059	0.157	Negative Very Weak Correlation	Insignificant
	Listing down the possible challenges encountered during the extension project	-0.051	0.225	Negative Very Weak Correlation	Insignificant
	Drafting the terminal report for the extension project	-0.015	0.712	Negative Very Weak Correlation	Insignificant

Table 9 presents the correlation between the gender of the respondents and the engagement level in the research project. Considerably, it shows that participation in the presentation of the research proposal, assessment of the possible constraints encountered and giving a conclusion and recommendation has a significant relationship with the gender of the respondents, hence rejecting the null hypothesis. Generally, this means that female BSBM students were more likely to engage in research projects as compared to another gender, specifically in the preparation, monitoring, and evaluation of research projects.

Table 9. Correlation between gender and engagement in the research project

Category		Coefficient	P-Value	Description	Significance
Preparation	Conducting research proposal review	-0.069	0.101	Negative Very Weak Correlation	Insignificant
	Participating in the presentation of the research proposal	-0.094*	0.024	Negative Very Weak Correlation	Significant
	Approval of research proposal	-0.045	0.286	Negative Very Weak Correlation	Insignificant
Implementation	Participating in the data-gathering procedure	-0.058	0.168	Negative Very Weak Correlation	Insignificant
	Participating in the interpretation of data gathered	-0.039	0.358	Negative Very Weak Correlation	Insignificant
	Evaluating the data gathered	-0.062	0.142	Negative Very Weak Correlation	Insignificant
Monitoring and Evaluation	Participating in the results and discussion	-0.059	0.162	Negative Very Weak Correlation	Insignificant
	Assessment of the possible constraints encountered during the project	-0.083*	0.048	Negative Very Weak Correlation	Significant
	Giving conclusion and recommendations	-0.105*	0.012	Negative Very Weak Correlation	Significant

Table 10 showcases the correlation between gender and engagement in the extension project. This reveals that all the variables understudy have no significant relationship. Hence, accepting the null hypothesis. This contradicts the study of Mojares (2015) in which, from the perspective of the faculty, gender and extension involvement has a moderately positive relationship. This means that female faculty members were likely to involve in the extension activities.

Table 10. Correlation between gender and engagement in the extension project

Category		Coefficient	P-Value	Description	Significance
Preparation	Conducting a training needs assessment	-0.061	0.144	Negative Very Weak Correlation	Insignificant
	Participating in a series of meetings as part of the planning process	-0.064	0.127	Negative Very Weak Correlation	Insignificant
	Drafting and submission of extension proposal	-0.080	0.055	Negative Very Weak Correlation	Insignificant
Implementation	Participating in the orientation of beneficiaries	-0.036	0.396	Negative Very Weak Correlation	Insignificant
	Coordinating the pre-assessment procedure	0.014	0.731	Positive Very Weak Correlation	Insignificant
	Engaging in the extension activity evaluation	-0.003	0.947	Negative Very Weak Correlation	Insignificant
Monitoring and Evaluation	Assessment of the status of the extension project	-0.039	0.354	Negative Very Weak Correlation	Insignificant
	Listing down the possible challenges encountered during the extension project	-0.043	0.310	Negative Very Weak Correlation	Insignificant
	Drafting the terminal report for the extension project	-0.047	0.257	Negative Very Weak Correlation	Insignificant

Table 11 shows the correlation between civil status and engagement in the research project. This reveals that all the variables have no significant relationship; thus, the null hypothesis is accepted.

Table 11. Correlation between civil status and engagement in the research project

Category		Coefficient	P-Value	Description	Significance
Preparation	Conducting research proposal review	0.023	0.575	Positive Very Weak Correlation	Insignificant
	Participating in the presentation of the research proposal	0.016	0.697	Positive Very Weak Correlation	Insignificant
	Approval of research proposal	-0.004	0.920	Negative Very Weak Correlation	Insignificant
Implementation	Participating in the data-gathering procedure	-0.024	0.575	Negative Very Weak Correlation	Insignificant
	Participating in the interpretation of data gathered	-0.030	0.471	Negative Very Weak Correlation	Insignificant
	Evaluating the data gathered	-0.034	0.421	Negative Very Weak Correlation	Insignificant
Monitoring and Evaluation	Participating in the results and discussion	0.002	0.966	Positive Very Weak Correlation	Insignificant
	Assessment of the possible constraints encountered during the project	0.026	0.531	Positive Very Weak Correlation	Insignificant
	Giving conclusion and recommendations	-0.013	0.754	Negative Very Weak Correlation	Insignificant

Table 12 shows the correlation between civil status and engagement in the extension project. This reveals that all the variables have no significant relationship. Thus the null hypothesis is accepted.

Table 12. Correlation between civil status and engagement in the extension project

Category		Coefficient	P-Value	Description	Significance
Preparation	Conducting a training needs assessment	0.020	0.638	Positive Very Weak Correlation	Insignificant
	Participating in a series of meetings as part of the planning process	0.022	0.606	Positive Very Weak Correlation	Insignificant
	Drafting and submission of extension proposal	0.027	0.513	Positive Very Weak Correlation	Insignificant
Implementation	Participating in the orientation of beneficiaries	-0.022	0.602	Negative Very Weak Correlation	Insignificant
	Coordinating the pre-assessment procedure	-0.039	0.353	Negative Very Weak Correlation	Insignificant
	Engaging in the extension activity evaluation	-0.021	0.622	Negative Very Weak Correlation	Insignificant
Monitoring and Evaluation	Assessment of the status of the extension project	-0.035	0.407	Negative Very Weak Correlation	Insignificant
	Listing down the possible challenges encountered during the extension project	-0.022	0.595	Negative Very Weak Correlation	Insignificant
	Drafting the terminal report for the extension project	0.014	0.731	Positive Very Weak Correlation	Insignificant

Proposed Interventions to the Identified Constraints

In terms of research and extension project preparation, the researchers proposed the following possible solutions that students could use to address the constraints when participating in the research and extension project of the University's Department of Management Studies:

1. Students may lack resources when engaging in school-related activities in some situations, such as when they are working students. The students can learn time management skills to set aside enough time for work, schoolwork, and other activities. Since this is one of the frequent issues working students face, they must establish their priorities before choosing to work or study;

2. Students may plan their travel and communicate with the faculty member in charge of their transportation concerns to maximize the time allotted for extension and research activities.

3. The student may do an advanced reading or do more research about the university's research and extension projects. It can help them gain more knowledge or have a little background regarding the successful projects of the university. According to Llenares et al. (2018), as students apply their discipline knowledge to solve real-world problems, there is a growing recognition of the importance of higher education extension in teaching and learning.

The following are possible solutions that students could use to address the challenges encountered when engaging in the research and extension project of the Department of Management Studies of the University in terms of implementation:

1. When discussing financial support from the department, they can still think of another way to collect funds if there is insufficient money to fund the project. One way is through solicitation. They must make a letter intended for the higher-ups, like the president or chairperson. After the approval, that's the time when they can gather financial support from different departments. According to Mani and Zulueta (2018) number of professors actively involved in research, the number of papers published and peer-reviewed, and the number of financed r&d proposals determined their university's success and growth in becoming known locally and internationally;

2. Through time, a student can continue to learn new things. They can contact their professors for advice on accomplishing a project or attend seminars to improve their research techniques. It would take some time, but if the student has a routine and has committed a task to memorize, they can work independently while still seeking advice if they want to; and

3. Good communication and support systems are the keys to successful outcomes. It may be possible to avoid bother and problems along the route by communicating with the students involved and the project's coordinators. Suppose they believe something needs to be addressed. In that case, they must inform one another, talk about the issue, and get input from those involved to come up with an excellent and better solution, especially when a project is ongoing.

The following are possible solutions that students could use to address the challenges when engaging in the research and extension project of the Department of Management Studies of the University in terms of research and extension project monitoring and evaluation:

1. Exercising precaution matters. Keep an eye on the project while taking in the surroundings. When working on a project, plan the steps needed to take to reduce potential risks or, better yet, eliminate them. A first aid kit and a medicine kit must be prepared beforehand. Always be proactive and work in conjunction with the project manager;

2. Students should only focus on completing things well when working on them. If you are one of the people in charge of monitoring the project, reducing all unnecessary activities, stopping multitasking, and putting an end to everything that might divert your attention. This way, you could do your task better and smoothly; and

3. When working on a project, there are things to consider, and one of those is the location. Assuming a place accessible to everyone will make it easy for them to go to the area without compromising their time and money. Especially when monitoring and evaluating the project, the people involved might go there more than twice or thrice to ensure the project is going well and that everyone's hands-on. According to Mani & Zulueta (2018), as the college seeks to establish itself as a university, conducting various RDE activities is one component that is being looked into to achieve such a goal.

DISCUSSION

The results reveal that most of the students were between 17 and 20 years old, which accounts for 57.4% of the total responses. Considerably, the age group with minor participation in the research and extension belongs to those 31 and older, with five responses from the entire group. On average, the students participating in the research and extension projects belong to the sophomore age group. According to Morrow-Howell et al. (2019), universities have traditionally focused on young people and have remained very age-segregated across their long histories. It shows that most students were female, with 69% of the total responses. Considerably, the gender with minor participation in the research and extension projects belongs to transgender people, with one response from the entire group. Moreover, the findings reveal that the majority of the respondents were single, with 561 respondents, or 98.2% of the total responses, while the least were widowed, with 0.20 percent. These findings coincide with the study conducted by Corpuz et al. (2022), in which most of the business management students at Cavite State University belonged to the age group of 17 to 21 years old, were female, and were single. Students gradually acknowledged the importance and expressed

favorable attitudes about research, as well as their achievement in overcoming the difficulty of conducting research. Over time, student attitudes and views of research procedures altered (Wishkoski et al., 2022).

Specifically, the study conducted by Rubio et al. (2016) found that business administration students participated in extension activities due to the anticipated benefits. They believed that participating in extension activities would help them grow and become more productive and responsive members of the community. According to Knudsen et al. (2019), universities work more actively and responsibly with various public and commercial players to address broad industrial and societal concerns through technology development and market insights. According to Medina (2019), the success of community services is influenced by a small budget, prioritizing institutional impacts, community location, sensitivity to community needs, and project duration. Consequently, Sermona et al. (2020) suggested that higher education institutions conducting extension activities should consider adopting communities in nearby locations. A close distance from the partner communities influences the success of the program. Lack of budget and the unavailability of resources like vehicles for transportation restricted extension activities. Moreover, as to the challenges identified, it was noted that according to Landicho (2020), the impediments to research were a lack of time, a lack of research experience, and a lack of resources. On the other hand, fund availability was the main problem encountered by the Business Administration students in joining the community extension program (Rubio et al., 2016). Considerably, based on the study of Sedanza (2018), in which the faculty are conducting research and extension projects, the top three problems encountered were as follows: a negative attitude in conducting research and extension projects, a lack of capability, and a lack of time in conducting research and extension projects.

Finally, the inferential analysis of correlation yielded insignificant results in general. This can be attributed to the recent policy of the department requiring all students, regardless of their profiles, to participate in the research and extension projects of the department. This negated the findings of Buckley (2017), where students' engagement toward research was highly visible considering the western context of academic practices.

CONCLUSIONS AND RECOMMENDATIONS

After the facilitation, processing, analysis, and discussion, the researchers concluded that most students are 17 to 20 years old, mostly female, and single. The engagement level of the business management students in the research and extension projects in terms of preparation, implementation, monitoring, and evaluation of conducting research and extension projects was engaged. In addition, the most encountered constraints of the students in research and extension are lack of resources, transportation is tough, lack of initiative in deciding on projects, lack of preparedness, familiarity with the research and extension projects, and funding for materials needed. Furthermore, among the variables under study, it was found that there was a correlation

between gender and engagement in the research project in terms of preparation of the project and monitoring and evaluation, respectively.

The researchers advise business management students to broaden their knowledge and abilities to contribute to the university's research and extension initiatives. Innovative resource-allocation strategies and open communication help them better understand the goals of the research and extension process. Faculty members in the Department of Management Studies should plan activities and discussions about their research and extension projects to keep students interested. To develop effective, responsive, and community-sensitive projects, greater collaboration between academic members and the research and extension unit is recommended. They must also prioritize developing a strategic budget plan to maximize available resources.

Other factors influencing student engagement levels, such as financial status, willingness to cooperate, and other difficulties, should be investigated by future researchers. They may also devise new approaches to address other potential barriers to participation in the research and extension initiative.

IMPLICATIONS

This research could be used to improve the campus's research and extension services. As a result, in accordance with the sustainable research and extension paradigm, an obvious improvement in the processes, content, and delivery mechanisms of research and extension projects is expected.

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DECLARATIONS

Conflict of Interest

The authors concur and declare that there are no conflicts of interest between any co-authors regarding the subjects or materials discussed in this paper.

Informed Consent

The study secured the people's approval behind the sources and ensured they understood the process clearly. A proper briefing was conducted as part of the interview protocol, and debriefing took place after the interview. The participants received an explanation regarding their given information's composition, plans, and implications.

Ethics Approval

Using the instrument for gender sensitivity known as the Harmonized Gender and Development Guidelines (HGDG), the Gender and Development Unit of the Campus approved this research study for gender sensitivity and inclusvity.

REFERENCES

Balila, J. S., Carpizo, E., Rumarate, M., & Adanza, J. (2016). Effects of involvement in community extension programs on student outcomes. *Abstract Proceedings International Scholars Conference*, 4(1), 81. https://doi.org/10.35974/isc.v4i1.1801

Buckley, A. (2018). The ideology of student engagement research. *Teaching in Higher Education*, 23(6), 718–732. https://doi.org/10.1080/13562517.2017.1414789

Capulso, L. (2019). Level of awareness, implementation, and engagement on the community outreach activities of a selected higher education institution in Cavite: Basis for a community extension services plan. *Ascendens Asia Journal of Multidisciplinary Research Abstracts*, 3(8). https://ojs.aaresearchindex.com/index.php/AAJMRA/article/view/2731

Corpuz, J. T., Sullano Peña, G., & Dela Torre Baconguis, R. (2022). Achievement, affiliation, power, and academic performance of business management students of a state university in Cavite, Philippines. Cogent Social Sciences, 8(1), 2060538. https://doi.org/10.1080/23311886.2022.2060538

De Castro C. A., & De Castro E. G. (2020). Utilization of completed research projects in one Philippine higher education institution: Basis for future research and extension directions. *Asia Pacific Journal of Multidisciplinary Research* 8 (3), 45-52. http://www.apjmr.com/wp-content/uploads/2020/08/APJMR-2020.8.3.02.06.pdf

Formalejo, W. I., & Ramirez, E. J. D. (2017). Research instruction among secondary schools implementing Science, Technology, and Engineering (STE) Program in MIMAROPA Region. *Palawan Scientist*, 9, 49-62. http://www.palawanscientist.org/fast_tract_articles/aug2017/4_Formalejo%20et%20al.%202017_for%20online%20posting.pdf

Knudsen, M. P., Frederiksen, M. H., & Goduscheit, R. C. (2021). New forms of engagement in third mission activities: A multi-level university-centric approach. *Innovation*, 23(2), 209-240. https://doi.org/10.1080/14479338.2019.1670666

Landicho, C. J. B. (2020). Secondary school students' attitudes and practices toward research writing and reporting in science. *Issues in Educational Research*, 30(1), 156–168. https://search.informit.org/doi/10.3316/informit.085935282069270

Llenares, I. I., & Deocaris, C. C. (2018). Measuring the Impact of a Community Extension Program in the Philippines. *Malaysian Journal of Learning and Instruction (MJLI)*, 15(1), 35-55. DOI:10.32890/mjli2018.15.1.2

Marques, C. S., Trindade, N. R., Favarin, R. R., Telocken, S. G., & Trevisan, M. (2018). Reflections on Sustainable Practices: Analyzing Teaching, Research, Extension, and Management of a Brazilian Public University. In Towards Green Campus Operations (pp. 41-56). Springer, Cham. https://doi.org/10.1007/978-3-319-76885-4_2

Medina, B. O. (2019). Community engagement of state universities and colleges in the Philippines: Towards socially and culturally responsible research and extension initiatives. *International Journal of Advanced Research and Publications*, 3(4), 2019. http://www.ijarp.org/published-research-papers/apr2019/Community-Engagement-Of-State-Universities-And-Colleges-In-The-Philippines-Towards-Socially-And-Culturally-Responsible-Research-And-Extension-Initiatives.pdf

Mojares, J. G. (2015). The construct of extension from the university faculty perspective. *Asia Pacific Journal of Multidisciplinary Research*, 3(5), 1-11. http://www.apjmr.com/wp-content/uploads/2016/01/APJMR-2015-3.5.2.01.pdf

Morrow-Howell, N., Lawlor, E. F., Macias, E. S., Swinford, E., & Brandt, J. (2020). Making the case for age-diverse universities. *The Gerontologist*, 60(7), 1187-1193. https://doi.org/10.1093/geront/gnz181

Onwuemele, A. (2018). University-community engagement in Nigeria: evidence from selected universities. *Mediterranean Journal of Social Sciences*, 9(5), 29-29. https://www.richtmann.org/journal/index.php/mjss/article/view/10290

Quimbo, M. A. T., & Sulabo, E. C. (2014). Research productivity and its policy implications in higher education institutions. *Studies in Higher Education*, 39(10), 1955-1971. https://doi.org/10.1080/03075079.2013.818639

Quitoras, M. C. L., & Abuso, J. E. (2021). Best practices of higher education institutions (HEIs) for the development of research culture in the Philippines. *Pedagogical Research*, 6(1), em0087. https://doi.org/10.29333/pr/9355

Romani-Dias, M., Carneiro, J., & Barbosa, A. D. S. (2019). Internationalization of Higher Education Institutions: The Underestimated Role of Faculty. *International Journal of Educational Management*, 33(2), 300-316. https://doi.org/10.1108/IJEM-07-2017-0184

Rubio, J. A. M. A., Pentinio, C. V. P., Ascan, J. C., Mendoza, M. C. D., Vito, J. V., & Encio, H. A. (2016). Involvement in community extension program of business administration students in one higher education institution in the Philippines. *Asia Pacific Journal of Multidisciplinary Research*, 4(1), 109-122. http://research.lpubatangas.edu.ph/wp-content/uploads/2016/05/APJMR-2016-4.1.13-1.pdf

Sedanza, N. C. (2018). Research and extension participation, performance and motivation of the Leyte Normal University faculty: Input to policy redirection. International *Journal of Research-GRANTHAALAYAH*, 6(11), 184-199. http://dx.doi.org/10.29121/granthaalayah.v6.i11.2018.1117

Sermona, N., Talili, I., Enguito, R., & Salvador, M. (2020). Implementation of Extension Services in Select State Universities and Colleges In The Philippines. *Sci. Int. (Lahore)*, 32(6), 609-614. https://www.researchgate.net/profile/Nivea-Louwah-Sermona/publication/345959096_IMPLEMENTATION_OF_EXTENSION_SERVICES_IN_SELECT_STATE_UNIVERSITIES_AND_COLLEGES_IN_THE_PHILIPPINES/links/6052fce4a6fdccbfeae957d9/IMPLEMENTATION-OF-EXTENSION-SERVICES-IN-SELECT-STATE-UNIVERSITIES-AND-COLLEGES-IN-THE-PHILIPPINES.pdf

Sibal, C. A., & Elizaga, J. B. (2019). Impact assessment of extension program of the college of public administration, Cagayan State University, Carig campus. International *Journal of Advanced Research in Management and Social Sciences*, 8(6), 780-794. https://www.indianjournals.com/ijor.aspx?target=ijor:ijarmss&volume=8&issue=6&article=056

Wishkoski, R., Meter, D. J., Tulane, S., King, M. Q., Butler, K., & Woodland, L. A. (2022). Student attitudes toward research in an undergraduate social science research methods course. *Higher Education Pedagogies*, 7(1), 20–36. https://doi.org/10.1080/23752696.2022.2072362

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