**2.1 Related Literature**

**Community Extension**

Education serves society by extending its expertise to individuals, groups, or communities. Universities often engage in activities known as extension services or outreach programs. Through these programs, universities, aided by their students and supervised by faculty or staff, apply their knowledge to meet the needs of specific communities within their various focus areas.

A Community Extension Program provides a unique learning experience, emphasizing practical application over theoretical knowledge. The meaning of the program can differ for each participant, often encouraging qualities like kindness and compassion towards those less fortunate. Working in groups and sharing ideas can be challenging for some students, but the program helps develop personal traits such as leadership skills, public speaking, and confidence.

Guiron, C. V., Abrigo, A. J. M. J., Dalmacio, J. C., Bangcoro, R. A. T., Villarosa, M. F., & Felicen, S. S. (2019, January). Participation and Attitudes of Community Extension Officers Towards Community Development. <https://research.lpubatangas.edu.ph/wp-content/uploads/2019/07/APJEAS-2019.6.1.06.pdf>.

**Community Extension Services**

The article titled “Empowering the Community through Extension Services of a Teacher Education Institution in the Philippines,” authored by Corpuz et al. (2022), examines the impact of extension services provided by the College of Teacher Education (CTE) at Nueva Vizcaya State University (NVSU). The research employed a descriptive survey method and utilized a structured questionnaire validated by experts to gather data from 45 implementers and 200 beneficiaries of these services. The findings indicate that both beneficiaries and implementers are actively involved in the college’s Projects HELP and KKK, with a growing number of participants. Minor issues identified include sporadic consultative sessions, disorganization among residents, and irregular monitoring and assessment. Overall, these extension services have gained community acceptance, demonstrating a positive impact on people's lives.

Corpuz, D. A., Time, M. J. C., & Afalla, B. T. (2022). Empowering the community through the extension services of a teacher education institution in the Philippines. Cogent Education, 9(1). <https://doi.org/10.1080/2331186x.2022.2149225>

**4. Recommender System Algorithm**

**5. Short-Term and Long-Term**

**Long-Term**

A study conducted by Magnaye, R. P., & Ylagan, A. P. (2021, September.)The university is dedicated to promoting a harmonious relationship with society as well as catering for the underprivileged members of the society. This includes, among other things, the Sotero H. Laurel Restoration Village in Barangay Sico, Batangas City which is an institutional project in partnership with Couples for Christ Family Life Foundation that hopes to give homes to indigent families. For many years, this institution has been improving lives of people living in adopted communities. The aim of this community extension program is assisting poor people get over their challenges and start living meaningful lives independently. Hence, it should be efficient and sustainable so as to help more people benefit from it in future. Hence, it is important to assess how successful these community extension programs are towards achieving the goals set by the university. This study will endeavor to have a broader picture on how far reaching an influence this program has on those who are its beneficiaries enabling them to raise themselves on higher levels. Magnaye, R. P., & Ylagan, A. P. (2021, September.). Effectiveness and Impact of Community Extension Program of One Philippine Higher Education Institution as Basis for Sustainability.

[http://apjarba.apjmr.com/wp-content/uploads/2021/09/2-APJARBA-2021-27.pdf](https://l.messenger.com/l.php?u=http%3A%2F%2Fapjarba.apjmr.com%2Fwp-content%2Fuploads%2F2021%2F09%2F2-APJARBA-2021-27.pdf&h=AT3A84Fme6q913JVZFGib9nBlMpumiVswYz1xRItOczbpzguz5dhGBuvfIn0BdiEGyYbDiJQGXnRgFe73lpo25uoVXg73zEyvPN_-cBwi9nmDlSfH0xvvEDSA-TgWVJ1tpeiXg)

**Medium-Term**

A study conducted by Salazar, T. (2020, May). Community involvement as a necessary result area is what makes the community feel the presence of the institution. This extension and linkages are not meant only for people outside the campus, but within the institution itself. The teaching and learning process appreciates that higher education extensions have an effect in it due to students using their disciplinary knowledge in addressing real life issues. The target audience’s needs should inform extension programs and projects should also be consistent with government’s ten-point agenda and Bicol Region’s medium term regional development plan, specifically poverty alleviation. Salazar, T. (2020, May). (PDF) an impact study of the community extension programs in a State College in the Philippines.

<https://www.researchgate.net/publication/342757198_An_Impact_Study_of_the_Community_Extension_Programs_in_a_State_College_in_the_Philippines>

**Government Extension**

A study by Mores, Lee, and Bae (2019) highlights the potential for collaboration between universities and local government units (LGUs) to achieve sustainable community development. However, the research often overlooks the preparedness of both sides, including factors like negotiation expectations, target setting, and problem anticipation. This study focuses on identifying the right environment, resource availability, and motivation for universities to engage in urban planning.

The University of the Philippines Los Baños has partnered with several LGUs throughout the region and the country. Local universities have the capability, resources, technology, and strategic location to facilitate local plan preparation more quickly and at a reduced cost. However, LGUs have yet to fully utilize this resource despite the rapid growth of public universities in terms of finance, enrollment, and resources. State universities are also mandated to provide extension services, which can include local plan preparation.

Mores, L. S., Lee, J., & Bae, W. (2019, March 27). University-Community Partnerships: A local planning co-production study on Calabarzon, Philippines. MDPI.

<https://www.mdpi.com/2071-1050/11/7/1850>

**Challenges of Community Extension Programs**

A study conducted by Santiago, C. J. S., Manuel, J. A. C., Ferrer, A. P., Reyes, J. L., Malabag, B. A. & Cahapin, E. L.(2024). In this project is how Higher Education Institutions (HEIs) can be used to enhance the development of societies through relevant extension activities. It investigated college teachers’ perspectives on why those are involved in conducting community service projects, their personal and professional motivations, challenges encountered, etc. The university has taken measures so as to facilitate delivery of extension services. One must therefore look for such an extension delivery system that makes possible for high technology transfer and management leading to increase profitability of the production sector. Therefore, understanding the reasons behind such practices and difficulties faced by the professors during conducting outreach programs within their locality becomes a critical tool to their success. This research was conducted in order to find out institutional, personal, and professional incentives, extent of involvement and some challenges from college teachers who were responsible for organizing local community activity.

Santiago, C. J., Manuel Jr., A., Ferrer, A., Reyes, J., Malabag, B., & Cahapin, E. (2024, January 28). Perceptual Motivation and Involvement of Faculty towards Community Extension. Puissant, 5, 1155-1170. Retrieved from //

[puissant.stepacademic.net/puissant/article/view/214](http://puissant.stepacademic.net/puissant/article/view/214)

**Utilization of Budget**

The article of Mukaramoja and Abraham (2019) explores the impact of budget utilization on public expenditures in The County Government of Trans Nzoia, Kenya drawing from Budgeting Theory and Resource Allocation Theory. This study employed descriptive survey design type and targeted 112 respondents such as internal auditors accountants, economists, directors of departments, chief officers and finance officers. A sample size of 88 was obtained using Taro Yamane’s proportional sampling technique. Structured questionnaires were self-administered to collect data that was pilot tested for reliability and validity in Uasin Gishu county. SPSS version 24 was used to process the data while descriptive statistics were used for summarizing data through frequencies percentages means etc. Inferential statistics such as Pearson correlation coefficient used to determine relationships between variables include multiple regression analysis. The results are summarized in tables and show that knowing budget utilization can enable policy makers to have effective policies as well as help stakeholders achieve a proper budget execution with an aim of controlling extravagant expenditures among governments at counties levels.

Mukaramoja, J. K., & Abraham, M. (2019). INFLUENCE OF BUDGET UTILIZATION ON EFFECTIVE PUBLIC EXPENDITURES IN THE COUNTY GOVERNMENT OF TRANS NZOIA, KENYA. the Strategic Journal of Business & Change Management, 6(4). <https://doi.org/10.61426/sjbcm.v6i4.1442>

**Monitoring and Tracking of Budget**

The study by Kala (2020) investigates the influence of monitoring and evaluation (M&E) practices on the performance of county government projects in Mandera Central Sub-county, Mandera County, Kenya. It specifically examines the roles of stakeholders’ engagement, capacity building, budgetary allocation, and technology adoption in M&E. Theories utilized include the Resource Based View Theory, Principal Agent Theory, Theory of Change, and Stewardship Theory. Employing a descriptive survey research design, the study targeted 67 projects tendered by the county government, with a sample size of 267 determined using Yamane's simplified formula. Stratified random sampling was used, and data were collected via questionnaires and analyzed with SPSS Version 25.0, using both descriptive and inferential statistics, including multiple regression analysis. Key findings indicate that adequate budget allocation, timely disbursement of funds, advocacy, collaborations, technical expertise, surveillance systems, and privacy/security concerns significantly influence project performance. Among these factors, capacity building for M&E had the greatest impact, followed by stakeholders’ engagement and technology adoption, with budgetary allocation having the least influence. The study recommends comprehensive training on technology for county projects, involving professionals in project management phases, and deliberate stakeholder involvement for improved project outcomes.

Kala, Y. (2020). Influence of Monitoring and Evaluation Practices on the Performance of County Government Projects: a Case of Mandera Central Sub-county, Mandera County: Kenya. <http://erepository.uonbi.ac.ke/handle/11295/153291>

**Participant's Engagement on Community Extension Program**

A study conducted by C. V. Guiron, A. J. M. J. Abrigo, J. C. Dalmacio, R. A. T. Bangcoro, M. F. Villarosa, and S. S. Felicen(2019) Education extends its services to individuals, teams, or communities through extension services or outreach programs. Universities engage in these activities by having their students, supervised by faculty or staff, assist in meeting community needs in various fields. This study aims to determine the level of participation and attitudes of Batangas Community Extension Officers of HEIs towards community development. It seeks to explore the relationship between their attitudes and participation in community involvement, as well as present their profile based on age, sex, educational attainment, and type of school. Additionally, it examines the extent to which respondents contribute to HEI's goals in educational, health, livelihood, and ecological projects.