

Exploring Asynchronous Learning: Experiences of Senior High School Students

Jade C. Colegado

Bukidnon State University, Malaybalay City, Bukidnon

ABSTRACT

Since implementing online learning methods for students, asynchronous learning has emerged as one of the most widespread forms of modality in delivering instruction at various levels of education. This study focused on exploring the experiences of Senior High School (SHS) students during asynchronous classes employing a descriptive phenomenology by Collaizi (2010). The study involved six senior high school students from the Science, Technology, Engineering, and Mathematics (STEM) Strand. From their experiences, three key themes emerged: (1) Asynchronous learning provides learners with a degree of flexibility; (2) Asynchronous learning has an impact on students' focus and motivation; and (3) The modality heavily relies on technology for its implementation. The study's findings indicate that asynchronous learning has proven to be a valuable modality providing students with flexibility. Nevertheless, it also revealed challenges related to limited physical resources, and student focus and motivation.

KEYWORDS: *asynchronous class, senior high school, descriptive phenomenology*

INTRODUCTION

Asynchronous learning is an educational approach that has gained prominence recently, particularly in response to the COVID-19 pandemic and the increasing adoption of online education. Asynchronous learning, which involves online or distance education that does not occur in real time, is facilitated by instructors through email and online discussion boards for interaction (Ruiz et al., 2006). Learning at home, particularly in asynchronous settings, necessitates stronger self-study abilities to maintain progress, which includes sufficient motivation and determination to pursue learning objectives (Hartnett, 2015). Students must possess digital skills to carry out academic tasks and effectively accomplish learning activities. (Kim et al., 2019).

Asynchronous learning has been utilized in various educational levels, from K-12 to higher education. Well-designed asynchronous classes have been found to foster student engagement (Parks-Stamm et al., 2017; Xu et al., 2020); support student active learning (Baker et al., 2005; Murphy, 2004); and critical and higher-order thinking (Frijters et al., 2008; Kwon et al., 2019). Previous research also indicated that interactive synchronous virtual classes facilitate learning and that students would instead learn via highly interactive virtual classes than asynchronously (Offir et al., 2008; Skylar, 2009). Many critical factors affect student performance in online learning, such as instructor participation in asynchronous online discussions (Getzlaf et al., 2009; MacKnight, 2000),

the types of comments they post, and the facilitation strategies they use in the discussions (Clarke & Bartholomew, 2014; Kwon et al., 2019).

Although substantial research has delved into the difficulties of synchronous and asynchronous classes, most phenomenological studies have focused on the learning interactions between instructors and students within the context of higher education. Consequently, this study aims to explore the experiences of senior high school students in asynchronous learning sessions during the academic year 2021-2022. The study seeks to uncover the factors that can positively or negatively influence students' experiences in asynchronous learning. By identifying these factors, school administrators can also benefit from understanding the elements that impact students' asynchronous sessions, leading to improved planning and implementation strategies.

Statement of the Problem

This study explored the lived experiences of Senior High School during asynchronous classes.

Specifically, the study sought to answer the following question:

1. What are the lived experiences of senior high school students during asynchronous classes?

REVIEW OF RELATED LITERATURE

Asynchronous learning refers to a method of education where students can access learning materials and complete assignments at their own pace and schedule. This approach offers several advantages over traditional synchronous learning models. Asynchronous learning allows students to learn at their own pace and choose their study hours. This flexibility is particularly beneficial for learners with other commitments, such as jobs, family responsibilities, or personal obligations (Cavanaugh & Jacquemin, 2015). Moreover, researchers found several advantages of asynchronous learning, such as students can exercise control over their time and pace of work, enabling them to work at their convenience without being restricted by time and place (Ellis & Romano, 2008; Hrastinski, 2008; Chaeruman & Maudiarti, 2018; Pang & Jen, 2018).

Similarly, Brierton et al. (2016) emphasized that asynchronous online discussion facilitates greater flexibility and comfort for students to express their views. Students are not obligated to respond immediately and have ample time to ponder their responses. It is particularly true since asynchronous learning allows students to articulate their ideas and engage in more comprehensive discussions (Brierton et al., 2016; Sun et al., 2008). Asynchronous learning opens up educational opportunities for individuals who may not have access to traditional in-person learning institutions (Means et al., 2009); students can review and revisit course materials as often as needed, allowing them to grasp concepts at their own pace (Frey & Fisher, 2013).

While asynchronous learning provides numerous benefits, it is essential to acknowledge that there may be better fits for some learners or subjects. One of the primary challenges in asynchronous learning is maintaining student engagement. Students must manage their time effectively to stay on track with course materials and assignments. Some learners may struggle with time management, leading to incomplete or delayed coursework (Guri-Rosenblit, 2005); technical issues can disrupt the learning process and negatively impact students' experiences (Baticulon et al., 2021); the lack of immediate support can hinder the learning process and create frustration for learners (Chen & Jang, 2019).

Asynchronous learning offers a flexible and personalized approach to education, empowering students to learn at their own pace. It provides opportunities for self-control, improved time management, and a sense of responsibility. As technology continues to evolve, asynchronous learning becomes more accessible to diverse learners. While it may lack immediate interaction, it fosters independent learning. Addressing the challenges and leveraging its strengths, asynchronous learning can transform education and create inclusive learning environments.

METHODOLOGY

The study utilized a descriptive phenomenology by Colaizzi (2010). Colaizzi (1978) emphasizes the importance of flexibility in research procedures, stating that the pursuit of understanding a phenomenon's essence should not be confined to rigid rules but rather an all-encompassing and profound exploration of its meaning. This study employed Colaizzi's approach of data analysis outlining seven steps: (1) Identifying significant statements and phrases; (2) Extracting Significant Statements that Pertain to the Phenomenon; (3) Aggregation of the formulated meanings; (4) Categorizing and clustering of themes and sub-themes; (5) Exhaustive Description of the Phenomenon; (6) Description of the Fundamental Structure of the Phenomenon; and (7) Validation of Description of the Fundamental Structure.

Informants of the Study

As Polkinghorne (1989) suggested, 5-25 individuals who have all experienced the phenomenon can serve as informants. In this study, six (6) participants were randomly chosen from students undergoing asynchronous sessions. The study participants were taken following the inclusion criteria: (1) must be officially enrolled students for the school year 2021-2022, and (2) must have actively complied with the requirements in asynchronous modality.

Data Collection

In-depth interviews with the participants were conducted to gather the data. In-depth interviews are appropriate for understanding other people's lived experiences with interest in others' stories because they are valuable and necessary (Seidman, 2013). Two major open-ended questions with less than ten (10) sub-questions were asked. It allowed participants maximum freedom and control over the interview content (Gray, 2014). The interviews were done online via Zoom Application and Google Meet, which was more convenient for the participants. After the online interviews, the data were transcribed, encoded, and later presented to the participants for their input and validation. Considering their feedback and ideas, necessary adjustments were made to refine the results. The approach used to assess qualitative data is critical in establishing rigor, dependability, and credibility requirements. Lincoln and Guba's (1985) four criteria for developing trustworthiness in qualitative research, according to Cope (2014), must be established: credibility, dependability, confirmability, and transferability.

Ethical Considerations

Before conducting the study, the researcher secured permission from authorities to adhere to policies. The researcher first sought approval from school authorities. Parents' consent forms were secured via Google Forms, informing them of the study's objectives and the possible gains it may bring the participants. Data is treated with the utmost confidentiality.

RESULTS AND DISCUSSIONS

There were three themes derived from the analysis of data generated by this study: (1) *Asynchronous learning provides learners with a degree of flexibility*; (2) *Asynchronous learning has an impact on students' focus and motivation*; and (3) *The modality heavily relies on technology for its implementation*.

Theme 1: Asynchronous learning provides learners with a degree of flexibility

Asynchronous learning allows students to control their learning pace and tailor their study hours according to their schedules. This level of flexibility proves especially advantageous for learners juggling various commitments (Cavanaugh & Jacquemin, 2015). Scholars have acknowledged the benefits of asynchronous learning. One such advantage is that students can exercise control over their time and pace of work, enabling them to work at their convenience without being restricted by time and place (Ellis & Romano, 2008; Hrastinski, 2008; Chairman & Maudiarti, 2018; Pang & Jen, 2018).

“From what I have experienced, I find asynchronous classes easy at times because I can answer the tasks any time I want. But, I haven’t fully adjusted to its pace yet” – Participant 2

According to Brierton et al. (2016), asynchronous online discussion facilitates greater flexibility and comfort for students to express their views. Students are not obligated to respond immediately and have ample time to ponder their responses. This is particularly true since asynchronous learning allows students to articulate their ideas and engage in more comprehensive discussions (Brierton et al., 2016; Sun et al., 2008).

However, while asynchronous learning offers flexibility, it can be overwhelming for learners to manage their time effectively. Participant 1 highlighted the importance of self-control and time management, *“The best way is to have self-control, you need to plan everything and adjust yourself to balance everything, because if you can’t, your activities will pile up and you will have a hard time”*. By setting aside dedicated time for learning, learners can immerse themselves in deep learning processes, resulting in improved retention and a deeper understanding of the subject matter (Cepeda et al., 2006).

Moreover, research has shown that in asynchronous learning, learners cannot get timely feedback or avail the chance to interact with their peer group and instructors in real-time (Francescucci & Rohani, 2019; Wang, 2008).

“I would say that these challenges have made me really incompetent because of the current learning methods that forces me to self-study and I still haven’t gotten used to that” – Participant 3

“Sometimes, I can’t understand the study guide on my own because I am a visual and tactile learner. I prefer a more hands-on way of teaching style.” – Participant 4

The absence of incentive to engage in self-directed study may have arisen due to the limited opportunity students have to discuss with their instructors and peers regarding unfamiliar topics, which is compounded by the challenges of time management that arise from the transition to online learning (Reyes-Chua et al., 2020). One of the main drawbacks of asynchronous learning is the

absence of real-time interaction between students and instructors. This lack of immediate feedback and discussion opportunities can lead to feelings of isolation and disengagement. It may also hinder students' ability to clarify doubts promptly, resulting in a slower learning process.

Theme 2: Asynchronous learning affects students' focus and motivation in doing school activities

Asynchronous learning relies heavily on learners' self-discipline and motivation. With a structured schedule and accountability, some students might find it easier to focus and stay on track with the coursework. Motivation is a significant issue for students since Dörnyei (2020) implies that motivation is directly linked to engagement, and student involvement in asynchronous sessions is insufficient. Accordingly, student barriers to online learning during the COVID-19 pandemic include limited space conducive to studying, home responsibilities, family conflicts, and household financial distress (Baticulon et al., 2021).

“The longer we had to do asynchronous classes, the more I lost my focus on other important tasks because there are a lot of distractions on my plate. Although, it is something that I can manage through self-control and it has nothing to do with the school but it has something to do with me” –
Participant 6

The participants raised concerns about their struggles with maintaining focus and motivation for school activities, citing easy distractions at home from tasks assigned by their parents and temptations to engage in social media and online games. Participant 3 stressed, *“At times, it is a hassle because my parents depend on me to take care of my siblings and do chores amidst my studies.”* Household chores can be considered a form of multitasking when students attempt to balance chores with their study time, and it can lead to a significant increase in cognitive load and reduce overall performance and learning outcomes (Ophir et al., 2009; Kiesel et al., 2010).

Another factor contributing to students' need for more focus is distracting environment during asynchronous learning. As emphasized by Participant 5, *“My environment here is indecent for someone who is undergoing asynchronous classes, it has many distractions, and the surroundings are very noisy. We are near the highway, so the cars are very loud and disruptive”*. This is supported by studies that found that noise, especially at higher levels, negatively affected participants' ability to comprehend and retain information while learning (Klatte et al., 2013), and noise led to decreased attention and hindered performance on tasks requiring concentration (Hughes et al., 2013).

All participants agree that a quiet and well-settled environment will positively affect their sessions as it helps them put themselves in deep focus and concentrate on an activity that they are currently doing. It helps in concentration as asynchronous sessions allow students to manage their own time and explore freely.

Theme 3: Asynchronous learning is technology-driven

Asynchronous learning and technology have become inseparable companions in the current education system. Integrating technology into asynchronous learning has revolutionized the accessibility and engagement of educational materials and resources (Palloff & Pratt, 2007). Baticulon et al. (2021) emphasized that the lack of devices or limited access due to gadget sharing, unreliable, slow, or no Internet access can be challenging during asynchronous learning.

Asynchronous learning heavily relies on technology, and technical issues such as internet connectivity problems or software glitches can disrupt the learning experience. Many, if not all, participants claimed that their internet connections impeded their studies as they sought to finish their assignments.

“The number one thing that I dislike about asynchronous classes is the constant internet problems that we face every day.” – Participants 2 & 6

According to data, the Philippines is towards the bottom of the globe in terms of Internet speed, Internet accessibility, and information exchange (PIDS, 2016). Individuals and businesses in the Philippines will be more productive if more measures to improve internet connectivity are undertaken (Azcarraga & Peña, 2019); until then, problems regarding interconnectivity will not cease. Due to growing computer usage, most students experience anxiety during sessions (Khouja et al., 2019). According to Asio et al. (2021), lacking technology and an internet connection is the most significant obstacle to overcoming teaching and learning problems. Consequently, a weak internet signal and irregular internet connections impede the successful delivery of education. Conversely, technology malfunctions may negatively affect online learner participation (McBrien et al., 2009).

CONCLUSION AND RECOMMENDATION

Asynchronous learning has emerged as a highly valuable modality in education in the context of the new normal in education. This modality has demonstrated multiple advantages for students and educators, considering being unable to be physically present at school. One of its key benefits is its flexibility and convenience, enabling students to assume greater responsibility for their learning journey. It allowed learners to progress at their own pace and develop a sense of responsibility for their education.

However, it is essential to acknowledge that asynchronous learning has challenges. Some learners needed help with self-motivation and time management, inability to balance studies and other responsibilities at home, and inadequacy of physical resources such as gadget availability and intermittent internet connectivity, which contributed to their lack of focus and motivation during asynchronous sessions.

This study's results may be considered baseline data for schools that will still utilize asynchronous learning as part of the teaching and learning modality. Additionally, future researchers are encouraged to broaden the participant pool, encompassing a more significant number of individuals from other senior high school strands, to obtain more comprehensive and robust data. Furthermore, it is suggested that researchers explore teachers' experiences who utilize asynchronous sessions in their instructional practices. By doing so, a more holistic understanding of the effectiveness and implications of asynchronous learning can be attained.

REFERENCES

- i. Asio, J. M. R., Gadia, E. D., Abarintos, E. C., Paguio, D. P., & Balce, M. (2021, June 30). Internet Connection and Learning Device Availability of College Students: Basis for Institutionalizing Flexible Learning in the New Normal. Retrieved May 15, 2022, from <https://files.eric.ed.gov/fulltext/ED613639.pdf>.
- ii. Baticulon, R. E., Sy, J. J., Alberto, N. R. I., Baron, M. B. C., Mabulay, R. E. C., Rizada, L. G. T., ... & Reyes, J. C. B. (2021). Barriers to online learning in the time of COVID-19: A national survey of medical students in the Philippines. *Medical science educator*, 31, 615-626.
- iii. Cavanaugh, C. S., & Jacquemin, S. J. (2015). Asynchronous discussions and assessment in online learning. *American Journal of Distance Education*, 29(2), 109-120.
- iv. Cepeda, N. J., Pashler, H., Vul, E., Wixted, J. T., & Rohrer, D. (2006). Distributed practice in verbal recall tasks: A review and quantitative synthesis. *Psychological bulletin*, 132(3), 354–380. <https://doi.org/10.1037/0033-2909.132.3.354>.
- v. Chen, Y. H., & Jang, S. J. (2019). Exploring the relationship between self-regulation and TPACK of Taiwanese secondary in-service teachers. *Journal of educational computing research*, 57(4), 978-1002.
- vi. Clarke, L. W., & Bartholomew, A. (2014). Digging beneath the surface: Analyzing the complexity of instructors' participation in asynchronous discussion. *Online Learning*, 18(3), 1– 22. <https://doi.org/10.24059/olj.v18i3.414>.
- vii. Dörnyei (2020) *Innovations and Challenges in Language Learning Motivation* Routledge. <https://www.routledge.com/Innovations-and-Challenges-in-Language-Learning-Motivation/Doranyi/p/book/9781138599161>.
- viii. Frijters, S., ten Dam, G., & Rijlaarsdam, G. (2008). Effects of dialogic learning on value-loaded critical thinking. *Learning and Instruction*, 18(1), 66– 82. <https://doi.org/10.1016/j.learninstruc.2006.11.001>.
- ix. Frey, N., Fisher, D., & Gonzalez, A. (2013). Teaching with Tablets: How do I integrate tablets with effective instruction (ASCD Arias). ASCD.
- x. Getzlaf, B., Perry, B., Toffner, G., Lamarche, K., & Edwards, M. (2009). Effective instructor feedback: Perceptions of online graduate students. *The Journal of Educators Online*, 6(2), 1– 22. <https://doi.org/10.9743/jeo.2009.2.3>.
- xi. Guri-Rosenblit, S. (2005). 'Distance education 'and 'e-learning': Not the same thing. *Higher education*, 49, 467-493.
- xii. Hartnett, M., St George, A., and Dron, J. (2011). Examining motivation in online distance learning environments: complex, multifaceted, and situation-dependent. *Int. Rev. Res. Open Dist. Learn.* 12, 20–38. doi:10.19173/irrodl.v12i6.1030.

- xiii. Hughes, R. W., Hurlstone, M. J., Marsh, J. E., Vachon, F., & Jones, D. M. (2013). Cognitive control of auditory distraction: impact of task difficulty, foreknowledge, and working memory capacity supports duplex-mechanism account. *Journal of experimental psychology. Human perception and performance*, 39(2), 539–553. <https://doi.org/10.1037/a0029064>.
- xiv. Kiesel, A., Steinhauser, M., Wendt, M., Falkenstein, M., Jost, K., Philipp, A. M., & Koch, I. (2010). Control and interference in task switching--a review. *Psychological bulletin*, 136(5), 849–874. <https://doi.org/10.1037/a0019842>.
- xv. Kim, H. J., Hong, A. J., and Song, H.-D. (2019). The roles of academic engagement and digital readiness in students' achievements in university e-learning environments. *Int. J. Educ. Technol. High. Educ.* 16, 1–18. doi: 10.1186/s41239-019-0152-3.
- xvi. Klatt, M., Bergström, K., & Lachmann, T. (2013). Does noise affect learning? A short review on noise effects on cognitive performance in children. *Frontiers in psychology*, 4, 578. <https://doi.org/10.3389/fpsyg.2013.00578>.
- xvii. Khouja et al. (2019) Is screen time associated with anxiety or depression in young people? Results from a UK birth cohort *BMC Public Health*. <https://bmcpublichealth.biomedcentral.com/articles/10.1186/s12889-018-6321-9>
- xviii. Kwon, K., Park, S. J., Shin, S., & Chang, C. Y. (2019). Effects of different types of instructor comments in online discussions. *Distance Education*, 40(2), 226– 242. <https://doi.org/10.1080/01587919.2019.1602469>.
- xix. Means, B., Toyama, Y., Murphy, R., Bakia, M., & Jones, K. (2009). Evaluation of evidence-based practices in online learning: A meta-analysis and review of online learning studies.
- xx. McBrien, J. L., Jones, P. T., & Cheng, R. (2009). Virtual spaces: Employing a synchronous online classroom to facilitate student engagement in online learning. *International Review of Research in Open and Distance Learning*, 10(3). <https://doi.org/10.19173/irrodl.v10i3.605>.
- xxi. Offir, B., Lev, Y., & Bezalel, R. (2008). Surface and deep learning processes in distance education: Synchronous versus asynchronous systems. *Computers & Education*, 51(3), 1172–1183. <https://doi.org/10.1016/j.compedu.2007.10>.
- xxii. Ophir, E., Nass, C., & Wagner, A. D. (2009). Cognitive control in media multitaskers. *Proceedings of the National Academy of Sciences of the United States of America*, 106(37), 15583–15587. <https://doi.org/10.1073/pnas.0903620106>.
- xxiii. Palloff, R. M., & Pratt, K. (2007). *Building online learning communities: Effective strategies for the virtual classroom*. John Wiley & Sons.
- xxiv. Parks-Stamm, E. J., Zafonte, M., & Palenque, S. M. (2017). The effects of instructor participation and class size on student participation in an online class discussion forum: Instructor participation and class size. *British Journal of Educational Technology*, 48(6), 1250– 1259. <https://doi.org/10.1111/bjet.12512>
- xxv. PIDS, (2016) Examining Trends in ICT Statistics: How Does the Philippines Fare in ICT? Philippine Institute for Development Studies. <https://dirp4.pids.gov.ph/websitcems/CDN/PUBLICATIONS/pidsdps1616.pdf>.

-
- xxvi. Reyes-Chua, E., Sibbaluca, B. G., Miranda, R. D., Palmario, G. B., Moreno, R. P., & Solon, J. P. T. (2020). The status of the implementation of the e-learning classroom in selected higher education institutions in region IV-A amidst the covid-19 crisis. *Journal of Critical Reviews*, 7(11), 253-258.
- xxvii. Xu, B., Chen, N. S., & Chen, G. (2020). Effects of teacher role on student engagement in WeChat-based online discussion learning. *Computers & Education*, 157, 103956. <https://doi.org/10.1016/j.compedu.2020.103956>.

www.ijahms.com