

Developing a Podcast Learning Model for Distance Learning in Higher Education

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Article Info:

Received: 12 Feb 2024; Revised: 07 Jul 2024; Accepted: 29 Aug 2024; Available Online: 29 Aug 2024

Abstract

This research aimed to survey the opinions of various stakeholders at Sukhothai Thammathirat Open University, including administrators, faculty, and staff, in producing and developing a podcast programme, and their readiness to use it in a distance learning setting in higher education. This research also aimed to develop a podcast learning model for distance learning in higher education at Sukhothai Thammathirat Open University. The research was divided into two phases. The sample group, selected through a purposive method, consisted of persons whose opinions and readiness in the production and use of the podcast learning programme were surveyed. They included 25 administrators, faculty, and Sukhothai Thammathirat Open University staff. The researchers then developed a podcast learning model for distance learning in higher education by studying the stakeholders' opinions and engaging 12 experts with experience in podcast programmes for learning to assess the quality and appropriateness of the model's components. The results of the research were as follows. Firstly, the survey showed that Sukhothai Thammathirat Open University staff, faculty, and administrators had a basic understanding of how to produce and develop podcast learning programmes to achieve learning outcomes, as well as their role in producing and publishing the podcast and using the podcast learning model in distance learning. Secondly, the podcast learning model consisted of five components: (a) format and characteristics of the programme, (b) content, (c) programme production, how-to-use instructions, related staff, and university support in the production and development of the podcast learning programme, (d) host or podcaster, and (e) infrastructure and channel for broadcasting the podcast. The 12 experts assessed that the quality of the model and composition of the podcast programme was at the highest level.

Keywords: podcast, podcast learning model, podcast programme, distance education, distance learning media, higher education

1. Introduction

The distance education system generally focuses on a student-centred learning experience. Its principles and learning processes allow learners to study according to their own needs using distance learning media. New media and communication channels are constantly developed to support the learners' teaching and learning activities. Podcasts are an alternative medium that is becoming increasingly popular. Podcasts can transfer knowledge and experience through interesting personal storytelling and new knowledge through a convenient and easily accessible channel.

In recent years, podcasts have emerged as a powerful tool in higher education, transforming traditional teaching methods and enhancing the learning experience. The flexibility and accessibility of podcasts make them an ideal medium for distance education, particularly in the digital age when learners seek

diverse and engaging content. Podcasts comprise digital images and audio files distributed through the Internet in the form of talks, stories, conversations, and interviews, covering a wide range of content. Users can listen to podcasts on supported devices such as computers, smartphones, and MP3 players, without limitations of time and place (Raweng & Kleechaya, 2018). Podcasts also constitute audio media that can be downloaded and stored on mobile devices and listened to anytime. Aside from serving as a medium for teaching and learning, podcasts include news, entertainment, business, self-improvement, and Dharma (i.e., Buddhism-related) programmes. The number of podcast listeners is growing (Rainsbury & McDonnell, 2006). Furthermore, podcasting is becoming increasingly popular in higher education (Abdous et al., 2012). In recent years, podcasting has witnessed tremendous and consistent development and use in higher education (Hubackova, 2013). One of the benefits of using podcasted lectures is that students can relearn or reuse recorded lectures through podcast media. This is considered an efficient method of consolidating lecture knowledge (Fietze, 2009).

At Sukhothai Thammathirat Open University (STOU), the effectiveness, quality, and standard of its distance learning system are linked to the adoption of current technology suitable for the Industry 4.0 era, which in itself is meant to improve this system ultimately. Podcasts are considered an alternative medium and additional strategy in a distance learning. In this age of media convergence, when content and knowledge are presented through several channels, podcast content is designed and created for broadcasting and then delivered to the audience in suitable ways. Podcasts combine personal media styles and experiences (i.e., lifestyle media) to build communication strategies based on the components of new communication processes, such as channels, interactions, content experience, content, and information search.

Nowadays, podcasts are regarded as an increasingly popular alternative medium because they effectively convey knowledge and experience through interesting personal storytelling. Content and knowledge are delivered through an easy and accessible medium. Therefore, developing a podcast programme for distance learning in higher education will increase options in media, channels, and learning styles to support learners in the digital age. Despite the widespread adoption of podcasts in various educational contexts, there remains a lack of structured models to integrate podcasts into distance education effectively. This gap challenges institutions seeking to enhance their distance learning offerings.

This study addresses this gap at STOU, which aims to develop a comprehensive podcast learning model tailored for higher education. Specifically, the research objectives are to (a) survey the opinions and readiness of stakeholders at STOU regarding the production and use of podcasts in distance learning and (b) develop a podcast learning model for distance learning in higher education.

2. Literature Review

Podcasts have become a crucial element of the digital infrastructure in higher education, affecting everything from the distribution of educational resources to teaching methods. Their adaptability has been utilised in various educational settings, ranging from platforms that disseminate state-of-the-art research in education globally to blended learning environments.

2.1. Podcasts as a tool for learning

Podcasts hold considerable potential as a tool and medium in higher education. Educational technology can broaden the scope of instructional materials, promote adaptable and learner-focused educational opportunities, and enhance collaborative learning. In the context of higher education, podcasts have facilitated a shift towards more accessible and expansive learning methods. They allow educators to disseminate knowledge beyond traditional lecture halls, thus reaching a global audience. Podcasts have been employed to supplement lectures and readings, offering students a multifaceted learning experience. Moreover, they have been instrumental in cultivating learner-teacher rapport, a critical element in creating an immersive and supportive educational atmosphere (Brehm, 2022; Conroy & Kidd, 2023). One significant advantage of podcasts is their ability to enhance collaborative learning. The flexibility of podcasts allows for a more inclusive learning environment where students can interact with content and each other in ways not possible in traditional classroom settings (González et al., 2023). Moreover,

podcasting is not just an educational tool but also a learning medium that offers students control over their knowledge acquisition, allowing them to learn at their own pace and beyond the physical constraints of the classroom (González et al., 2023). Podcasts serve a dual role: both as a pedagogical tool and a medium for content delivery. They enrich the learning experience by providing an alternative channel for information that students can access on-demand. This aligns with contemporary learning preferences, catering to a generation accustomed to consuming content across various digital platforms (Lonn & Teasley, 2009; Moore, 2022).

2.2. Podcasts in higher education

Fietze (2009) investigated the behaviour of podcast usage among higher education students at a university in Germany. The research surveyed 148 students at the University of Flensburg, most of whom had no prior experience with podcasts. Podcasted lectures were used as a communication medium, with notebooks as the primary device for listening to recorded lectures. One exciting aspect of this study was the retrospective or ‘catch-up’ learning sessions used to revisit lectures at a later occasion, while the main objective was for the students to systematically prepare themselves before sitting for written examinations. Over half of the respondents considered using podcasts as a substitute for attending lectures. One of the success factors for using podcasted lectures was the ability to re-utilise recorded lectures via the podcast channel, which is seen as an efficient way to integrate lecture content progressively.

In higher education, podcasts are becoming increasingly recognised as a valuable component in expanding digital technology. They provide a modern approach to content dissemination and can be a means to enhance traditional teaching methods. Podcasts offer a platform for faculty members to share their expertise in a format accessible to a wider audience. For students, they represent an additional resource that complements traditional lectures and readings. The literature also addresses the strategic use of podcasts to improve the rapport between learners and educators, which can contribute to a more engaging learning environment. However, there is also a discourse on the balance between the use of podcasts and traditional teaching methods, ensuring that podcasts serve as a complement to, rather than a replacement for, other educational resources (Brehm, 2022; Conroy & Kidd, 2023). Podcasts have become an integral part of the digital landscape in higher education, serving as a versatile tool for disseminating educational content (Raweng & Kleechaya, 2018). They facilitate various learning experiences, from lecture supplements to interactive discussions, enhancing the educational environment (Brehm, 2022).

2.3. Podcasts in distance learning

Teaching with podcasts is a specific form of e-learning. Much of the research into the use of podcasts shares the general objective of other forms of research in e-learning, i.e., the focus has been on how the use of technology in teaching enhances the learning process. It thereby also improves the learning outcome (Andrews & Haythornthwaite, 2007). This is in line with the views of Yiemkuntitavorn and Rattanapan (2021), who described how podcasts have become recognised as a source of entertainment and a valuable educational resource in distance learning. Podcasts cater to the current generation’s lifestyle and provide a flexible approach to language learning. Their study concluded that podcasts could substantially support English language proficiency in Thailand and encourage technology integration in educational settings to match students’ learning preferences.

Podcast learning represents a significant opportunity for distance learning in higher education, offering flexibility, engagement, and improved academic performance. In summary, podcast learning in the context of distance learning in higher education is a forward-thinking educational strategy that responds to the needs and preferences of today’s learners, providing a flexible and engaging way to enhance academic skills and knowledge outside the traditional classroom.

However, despite their advantages, podcasts face several challenges related to their use in educational contexts. These include issues related to content quality, student engagement, and the need for technological infrastructure (Fietze, 2009). Addressing these challenges requires structured models that can guide the integration of podcasts into distance learning systems.

2.4. Enhancing distance learning through the efficacy of podcasts

In the evolving landscape of distance education, podcasts have emerged as a pivotal tool for enhancing the learning experience, addressing common challenges such as student engagement and the pervasive sense of isolation. Drawing on contemporary research, podcasts have been shown to significantly bolster learner motivation, deepen engagement, and foster a sense of community, effectively bridging the gap between educators and students in the virtual classroom. The personal and accessible nature of podcasts, coupled with their flexibility in consumption, aligns well with the demands of modern learners, offering a complementary resource that can be seamlessly integrated into diverse learning strategies. Studies affirm that when used strategically, podcasts can enrich the educational tapestry of distance learning, creating a richer, more inclusive, and interactive educational environment. This is particularly relevant in light of recent global shifts towards online education, in which podcasts have demonstrated resilience as an educational medium, ensuring continuity in learning amid widespread disruptions to conventional educational settings (Kendrick et al., 2023; Anindhita et al., 2022).

While several studies have examined the use of podcasts, there is a lack of structured models specifically designed for higher education (Moore, 2022). Existing literature often focuses on the benefits and challenges without providing comprehensive frameworks for implementation (Conroy & Kidd, 2023). This gap highlights the necessity of developing a structured podcast learning model, which is the primary objective of this research.

3. Research Method

The research was conducted in two phases according to the research objectives.

3.1. Phase 1: Surveying the opinions and readiness of the stakeholders, including administrators, faculty, and staff, in producing and developing a podcast programme and their readiness to use it for distance learning in higher education at STOU

3.1.1. Sample Selection

The sample group consisted of 25 stakeholders from STOU. Selected through purposive sampling, this group included 10 administrators, 10 faculty members, and five staff members, chosen for their involvement in distance education and familiarity with podcast technology, with the following qualifications:

- Administrators involved in shaping policies and strategies at STOU who play a pivotal role in crafting policies and strategies related to distance learning media. Their decisions guide the adoption and implementation of podcasts as an educational tool.
- Faculty members involved in the production, design, and development of distance learning media at STOU in terms of content, educational technology, and evaluation. The selection of faculty members was predicated on their qualifications, with a preference for those possessing demonstrable experience or expertise in podcasting.
- Staff members who are involved in the design and production process of learning materials in the distance learning system at STOU.

3.1.2. Data Collection

Data were collected using a structured interview questionnaire designed to gather insights into the stakeholders' opinions and readiness regarding the production and use of podcasts in distance learning. The questionnaire included open-ended questions and was reviewed by three experts for quality and suitability.

3.1.3. Data Analysis

Qualitative data were analysed through a thematic analysis. Interview responses were transcribed and coded to identify key themes and patterns. The coding process involved multiple rounds to ensure

reliability and accuracy, with themes emerging related to stakeholder readiness, opinions, and perceived challenges.

3.2. Phase 2: Developing a podcast learning model for distance learning in higher education

The researcher developed a conceptual framework for producing and developing a podcast programme for distance learning in higher education. Information obtained from the study, analysis, and synthesis of the relevant information, principles, concepts, and theories were used in the design process. Subsequently, 12 experts were engaged to provide opinions on the conceptual framework in the first round of questionnaires and interviews about the components of the podcast programme for distance learning in higher education. Information and opinions obtained from questioning and interviewing the experts was used to develop a draft model, focusing on the components that support the podcast programme model for distance learning in higher education. The draft model was evaluated for suitability and quality by 12 experts, comprising four instructional design experts, four content experts, and four audio media production experts. Their suggestions were used to improve the model and make it more complete.

3.2.1. Data Collection Instruments

The instruments used consisted of (a) an opinion-based questionnaire for experts on the components of developing a podcast programme for learning in distance education (for the first round of the interview), (b) a draft model of the podcast programme for distance learning in higher education, and (c) an evaluation form given to the experts to determine the appropriateness of components and quality assessment of the podcast programme model for distance learning in higher education (for the second round of confirming evaluation).

3.2.2. Data Analysis

The data analysis involved a thorough examination of content and opinion consistency, alongside an assessment of the experts’ opinions, through descriptive statistics, on the quality of the model. This iterative process ensured the model’s robustness and suitability for enhancing distance learning at STOU.

The following diagram describes the research procedure.

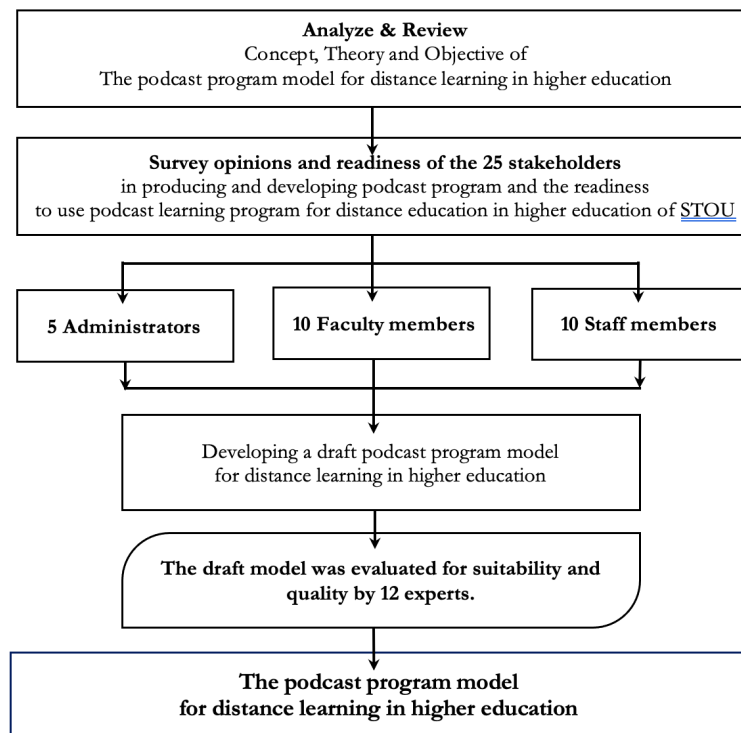


Figure 1. Steps for Developing a Podcast Programme Model for Distance Learning in Higher Education.

4. Findings and Discussion

4.1. Results of the opinions of relevant stakeholders on the production and development of a podcast programme and its use for distance learning in higher education

- i) To address the research question on stakeholder readiness and opinions on podcast production and use in distance learning, the findings indicate a generally positive perception among STOU personnel and staff. The majority (80%) reported a good understanding of the role of podcasts in learning. Respondents highlighted several advantages, including ease of access, flexibility, and the ability to review materials independently. There are sufficient and appropriate equipment and facilities to produce and develop podcast programmes because they require only a few basic radio programme production tools. Further personnel skills development may require additional training to enhance understanding of the characteristics, presentation styles, and distribution channels to meet the standard requirements. The style and nature of the podcast depend on the programme's objective. The design of the podcast programme should be diverse while focusing on an engaging and attractive programme to create attention and ensure continuous listening. In addition, components in other aspects of the podcast should also be considered, such as content, programme producers, programme production, programme interaction, listeners, programme publishing, and programme monitoring and evaluation. Opinions on listeners' needs in learning-based podcasts encompassed two main characteristics: (a) content that is consistent with and meets the objectives of a particular course and (b) content that is consistent with the course and can be used as an academic service programme for society. Besides having expertise in the content, instructors should also be able to transfer knowledge through podcast media and participate in designing the programme format with educational technology instructors. STOU personnel and staff acknowledged that the driving management policy introduced by STOU executives is the main success factor in producing and developing a podcast programme model for distance learning. The challenge in producing and developing a podcast programme is creating a new learning experience for learners and listeners.
- ii) STOU faculty members gave their opinions on the production and development of the podcast programme for distance learning. Overall, instructors have a good understanding and knowledge of the features of podcasts for learning and believe they could produce podcasts independently using existing tools because the process requires neither too many nor too complicated equipment and tools; for example, a smartphone could be used to produce podcast media. The format and nature of the podcast programme should be developed to meet specific learning objectives and outcomes. The programme should also combine academic content with real-world experience. The presentation style and programme type should be varied to suit different student levels, the learning objectives, and the podcast duration. The podcast should be utilised as a supplementary medium for teaching and learning to help learners review lessons or as a medium for further study. The teaching and learning process using the podcast programme should consist of (a) studying the course's teaching and learning procedure, (b) studying the course's content in teaching materials, (c) studying the content using the podcast programme, and (d) performing the specified activities. To create a more immersive experience for learners, teaching activities and interactions may need to include extra communication channels. For example, live podcasts could be broadcast on platforms such as Facebook or YouTube, and a question-and-answer activity with hidden questions could be included in each episode. A time period and channel for discussion and exchange through other online media channels should be determined, as well as both online and offline media and communication channels for the podcast programme. Success factors in producing and developing the podcast programme for distance learning include the readiness, knowledge and understanding of podcasts of all stakeholders, including instructors, learners, executives, and others involved.
- iii) STOU executives also gave their opinions on the production and development of a podcast programme in distance learning. According to them, policy or guideline formulation for supporting new media production must support learner behaviours in the digital era, technological advances, and prioritise the students' outcome-based education. The current reformed policy is expected to transform STOU into a digital university. The podcast programme could be considered a supplementary, alternative, or main medium. However, before making policy decisions, there

should be a coverage survey to assess listener opinions and needs. Executives are ready to provide support in any area to address learners' needs and demands. There is support for using podcasts in the teaching and learning process. STOU has a policy encouraging the use of podcasts for teaching and learning, and podcasts can be used as a supplementary or alternative medium under the design of the learning ecosystem. Media and interaction channels must be designed from end to end. Interaction activities may be synchronous or asynchronous. Alternatively, a hybrid model can be implemented, emphasising designing an appropriate learning ecosystem. The success factor in podcast production and development emphasises the production of teaching materials and the common goal of producing valuable materials for learners. The challenge lies in convincing the relevant stakeholders to accept new media like podcasts and understand the importance of podcast media production. The limitation is an organisational culture that may not be bold or adventurous enough to adopt novel approaches, preferring to persist with the same rules and regulations until they become a corporate culture.

These findings are significant as they demonstrate the stakeholders' strong readiness to integrate podcasts into distance learning. This readiness suggests that podcasts can significantly enhance learning outcomes and engagement in higher education with adequate support and training. A positive perception of podcasts also indicates a potential for broader adoption, which could transform the current distance learning landscape.

4.2. Results of developing the podcast programme for distance learning in higher education

In response to the research question that addresses the development of a podcast learning model, the findings from expert evaluations reveal several key components necessary to ensure effectiveness. The podcast programme model for distance learning in higher education consists of five components. The first, i.e., the model and characteristics of the podcast programme, comprises the following three sub-components: (1.1) model and characteristics of the podcast programme, (1.2) characteristics of the podcast programme for learning, and (1.3) length of presentation of the podcast programme. The second is programme content, with the following three sub-components: (2.1) objectives and strategies of content presentation, (2.2) content order of difficulty and arrangement of structure, and (2.3) knowledge, originality, creativity, and modern presentation of content. The third is programme production, directions for use, related personnel, and university support in producing and developing the podcast programme for distance learning. This component comprises the following four sub-components: (3.1) programme production, (3.2) steps and methods for using the podcast programme in distance learning, (3.3) personnel involved in the production and development of the podcast programme for learning, and (3.4) support from the university. The fourth component is presenter or podcaster, comprising the following four sub-components: (4.1) personality, (4.2) skills, knowledge, expertise and experience, (4.3) identity and reputation, and (4.4) language, style, techniques, and strategies for stimulating listeners. Finally, the fifth component is infrastructure and the dissemination channel of the podcast programme for learning, comprising the following two sub-components: (5.1) equipment and tools used in production and development, and (5.2) devices and tools used for listening to and accessing the podcast programme for learning.

Assessment was done by the 12 experts to evaluate the quality of the model and components of the podcast programme, which yielded the highest overall quality level. This assessment detailed several components. Firstly, the components related to the format and characteristics of the podcast programme were rated as highly suitable ($\bar{x} = 4.75$, $SD = 0.45$). The content components of the podcast programme for learning were considered to be at the highest level of suitability ($\bar{x} = 4.83$, $SD = 0.39$). The components of the programme's production including methodologies, personnel involved, and university support for developing and enhancing the podcast for distance learning, were found to be most fitting ($\bar{x} = 4.67$, $SD = 0.78$). 4), while the elements related to the podcast hosts or podcasters were assessed as being highly suitable ($\bar{x} = 4.83$, $SD = 0.39$). Finally, components concerning the infrastructure and dissemination channels for the educational podcast were also rated as being most appropriate ($\bar{x} = 4.75$, $SD = 0.45$).

This comprehensive evaluation highlights the programme's excellence in facilitating distance learning at STOU.

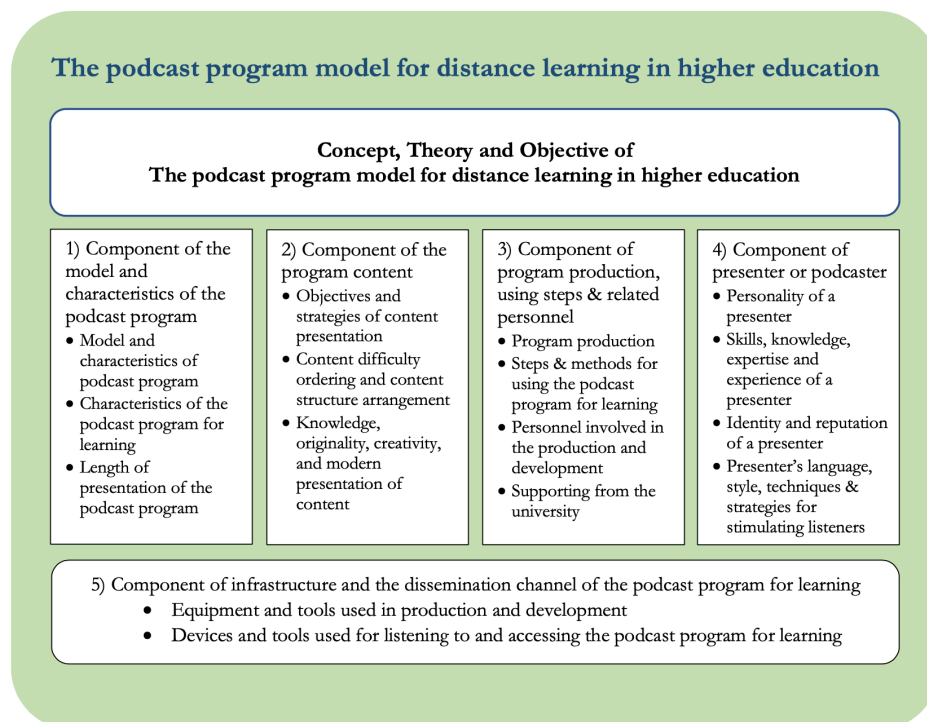


Figure 2. The podcast programme model for distance learning in higher education.

4.3. Discussion

The persons involved in the production, development, and use of the podcast programme model for distance learning, in this case the personnel and staff in STOU's distance learning system, agreed that the supporting tools and facilities for producing and developing the podcast programme were sufficient and appropriate. Podcast programme production requires only minimal and uncomplicated basic radio programme production tools. Most of the personnel and staff have had experience with producing radio and television broadcasting programmes. Therefore, it would not be difficult to create a podcast programme to support the policy. This is consistent with Thongbai's (2019) view that producers generally deem that podcasts are easy to create. Creating audio media is easier than motion-picture media or other types of media. The production cost is low because it does not require a significant budget for filming and editing, neither does it require a lot of time spent on planning a set or hiring film staff. It requires only fresh ideas and content. Nowadays, mobile phones can record high-quality audio that can be immediately edited using built-in applications. As a result, anyone can become a podcaster. The ease of production is a key factor in producing more podcasts and can result in an increased variety of content.

Instructors explained that the design of the podcast programme must be consistent and suitable with the learning objectives and outcomes. The programme should present academic content together with knowledge-based experiences. When producing a podcast programme, great emphasis should be placed on content because good and effective content will attract the interest of the audience, both regular and new. The programme content design guidelines must take into consideration the principles and criteria for valuing the hearing from the content that listeners desire to receive (Prapayont & Satawedid, 2021). The design of the programme should allow listener participation in order to meet the needs of those who are listening to the programme. Priyakorn and Satararujj (2018) stated that listeners should be able to participate in determining programme content by communicating with the producers through various channels. Listeners should be able to ask the presenter for the content they want to hear, and the presenters can then provide the relevant content.

The executives, who believed in developing policies and guidelines to promote new media production that supports learner behaviour in the digital era and meets learning outcomes, remarked that a podcast programme can either be a supplementary, alternative, or main medium. However, before making any policy decisions, the university should conduct a coverage survey to assess listener opinions and needs. The main factor in the design and production process of podcast media is the common goal of producing quality materials for learners while also considering learning outcomes and goals. In addition, there should be a study on the behaviour of learners' media consumption in the digital age. After a programme has been broadcast, an opinion survey may be conducted to determine areas that require improvement. A study and feedback survey of the podcast programme can be done in several ways. According to Priyakorn and Satararuji (2018), a popularity survey can acquire feedback from programme listeners. This can be done by reviewing comments and shares on the programme's social media pages. One method that is very popular among podcast hosts in Thailand is the use of hashtags for programmes that use social media in order to categorise people who mention the programme more precisely. This is in line with Prapayont and Satararuji's (2021) statement that the evaluation or measurement of the podcast programme can be classified into two types: (a) download or listener count, whereby a high number of downloads and listeners indicates that a podcast broadcast is quite popular while a small number of followers may indicate that a podcast show is not yet popular, and (b) social media engagement, which can measure the participation of listeners or followers, such as likes, comments, shares, or the number of clicks received on the podcast's 'listen' button.

Thailand has recently started emphasising podcasts as a learning medium to complement other teaching and learning activities, especially at the higher education level. According to Fietze (2009), who studied podcast use behaviour of learners in higher education, one advantage of using podcasted lectures is allowing learners to review learning or catch up on lectures. The podcast's main objective was to systematically prepare the learners for written examinations. More than half of the respondents considered using podcasts as a substitute for attending lectures. One of the benefits of using podcasted lectures is that learners can re-use recorded lectures made available via podcast to consolidate the content of the lectures over time effectively.

Additionally, the value of listening that is consistent with the listeners' personal preferences is a factor that influences their choice of podcast programmes. Podcast content must be easy to understand, uncomplicated, and concise. It must be unique and cannot be found elsewhere. The credibility of the programme or the reputation of the presenter also plays an important role in creating listening value for the listeners (Prapayont & Satawedini, 2021). Learning podcasts should continue to develop with content that is interesting, appealing, and unique. (Suvarnaphaet & Suvarnaphaet, 2021). This is in accordance with the research of Perks et al. (2019), who studied and developed the theory of uses and gratifications of podcast listeners and found that podcast listeners' satisfaction depend on the following four elements: (a) controlling edutainment, (b) storytelling transportation, (c) social engagement, and (d) multitasking. These aspects must be demonstrated in the quality and efficiency of producing and developing a podcast programme for learning.

A systematic approach to the development of podcast programmes for distance learning in higher education is characterised by an iterative process. This process encompasses both the creation of the podcast programme and its implementation as either a component of an online course, or supplementary media. The feedback loop from students to instructors is critical, signifying the importance of iterative improvement grounded in user experience. At the start of programme development, instructors or faculty members initiate the process by collaborating with instructional designers. This collaboration ensures that educational theories and instructional design principles are integrated into the podcast content, thereby enhancing the learning experience. The instructional designer must work closely with the staff involved in producing and developing the podcast, thus ensuring that technical production aligns with educational objectives. Once the podcast is developed, it can serve a dual purpose: both as a standalone learning resource for online courses, and as supplementary media to existing course materials. Students engage with the podcast, and their understanding and feedback is made a vital part of the learning process. This flowchart of podcast programme development for distance learning (Figure 3) is consistent with the study done by Copley (2007), which emphasises the role of podcasts in facilitating student learning outside

traditional classrooms. Additionally, the study describes the integration of podcasting into distance educational settings to enhance the reach and effectiveness of instruction.

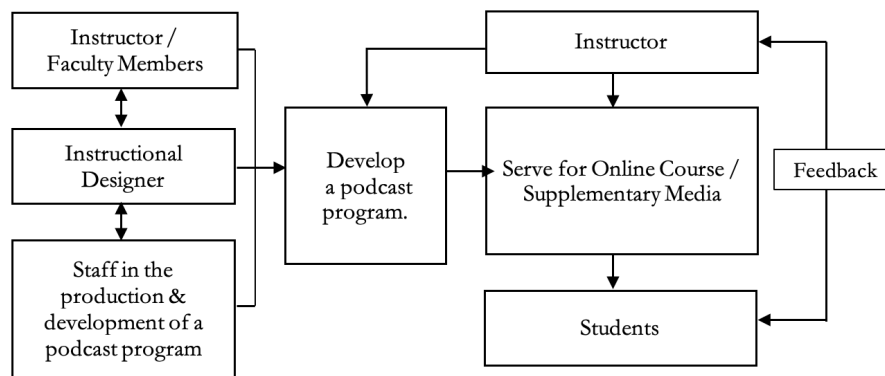


Figure 3. Flowchart of Podcast Programme Development for Distance Learning

The study's findings indicate a strong readiness among STOU stakeholders to adopt podcasts for distance learning. The developed podcast learning model was well-received by experts, who highlighted its potential to enhance educational outcomes. The positive reception of the podcast learning model also suggests several practical implications. Educators should consider incorporating podcasts into their teaching strategies to enhance student engagement and provide flexible learning options. Institutions should invest in training for faculty and staff on podcast production and integration into the curriculum. Additionally, the support for podcasts as an educational tool indicates they can play a significant role in modernising distance education systems.

Future research should explore the long-term effects of podcasts in distance education, particularly their impact on student performance and engagement. Additionally, studies could investigate the components of podcast content that are most effective in promoting learning. Another area of interest is the potential for podcasts to support different learning styles and how they can be tailored to meet diverse student needs.

5. Conclusion

This research aimed to study the opinions of key persons involved in producing podcast programmes at STOU, and their readiness to use them in a distance learning setting. This study also aimed to develop a podcast programme model for distance learning in higher education. This study gathered the opinions of all stakeholders involved, i.e., administrators, faculty, and staff, in the distance education system at STOU. The findings reveal that STOU staff, faculty, and administrators possess an essential grasp of the processes involved in creating and developing a podcast programme to fulfill learning outcomes. Moreover, they possess knowledge of designing the podcast learning programme and understand the importance of their participation in the production, publishing, and use of the podcast learning model for distance learning. They also demonstrated knowledge in designing the programme and the skills and techniques required of a podcaster. They suggested that podcast programmes should be diverse and interesting and have a clear strategy for conveying and presenting content. Podcasts should also respond to the learning styles and lifestyles of different learners. The opinions of experts who have experience in producing learning podcasts were used as a guideline for developing the podcast programme model for distance learning in higher education. The developed model consists of five related components: programme production and development, including the model and characteristics of the programme, programme content, implementation, presenters, and infrastructure and distribution channels. Experts assessed the model as having the highest quality and suitability. Overall, the findings from this study contribute to the growing body of literature supporting the use of podcasts in education. By developing and validating a podcast learning model, this research provides a practical framework for integrating podcasts in a distance learning setting, offering valuable insights for educators and policymakers aiming to enhance learning experiences in the digital age.

Funding: This study was funded by the distance education fund from the Research and Development Centre of Sukhothai Thammathirat Open University in 2020.

Acknowledgement: The authors are grateful for STOU's support and the collaboration of all participants, who provided useful information for this research.

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