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iSpring Suite: An Innovative E-Learning Tool for Language Education

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Abstract

The shift toward digital learning accelerated by unexpected circumstances (e.g., pandemic) has increased the demand for e-learning tools in modern education. The manifold challenges (e.g., learner engagement and inclusive online experience) educators and institutions face in digital education have heightened the need for incorporating such tools into various education contexts, including language education. To this end, this review seeks to evaluate iSpring Suite, an extensive e-learning authoring toolkit for creating interactive and multimodal educational content. Despite specific studies on iSpring Suite, there is a lack of research that examines its main features, potential pedagogical affordances, and technical/instructional limitations. Accordingly, this review intends to bridge this literature gap. This review uses a theoretical framework to reveal that iSpring Suite contains several pedagogical opportunities, including interactive learning, multimodal learning, immediate assessment/feedback, blended learning, flexibility, and customizability. However, the software has some downsides, such as limited student collaboration, labor-intensive nature, restricted content creativity, evaluative constraint, and technical difficulty and complexity. For that reason, qualitative and quantitative studies are urged in diverse language education contexts to corroborate the review's findings.

Keywords: Authoring tool; educational technology; educational software; e-learning; iSpring

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1. Introduction

Technological advancements have not only produced manifold instructional tools for language education but also led to the emergence of several fields, such as computer-assisted language learning (CALL) and mobile-assisted language learning (MALL). This implies that language education is offered within a pedagogical framework, and diverse technological instruments (e.g., computers, mobile devices, software, and the internet) are also incorporated into language classrooms. Additionally, new tools addressing various learning and teaching challenges are emerging as technology advances. In addition to catering to different educational needs, technological products foster student motivation and promote engagement (Al Balushi et al., 2024). For instance, previous research indicated pedagogical affordances manifold digital products on language education: YouGlish for pronunciation (Topal, 2023), Readable English Series for reading (Topal, 2024a), Lirica for integrated skills practice (Topal, 2024b), Tandem for linguistic and cultural exchange (Topal, 2024c), ChatGPT for personalized learning and immediate feedback (Topal, 2024d).

In response to the pedagogical challenges voiced in the literature regarding language education, particularly learner engagement, motivation, and assessment (Ajjawi et al., 2020; Aubrey et al., 2022; Tao & Gao, 2022), this study intends to evaluate iSpring Suite (https://www.ispringsolutions.com/ispring-suite), a software package that works seamlessly with PowerPoint to create interactive online courses, quizzes, video lectures, and other educational content.

1.1. Related Research

Previous work on iSpring Suite revealed the following findings. Kirillov (2021) explored its efficacy in an online business course during the pandemic and reported successful implementation. In another study, Muslan et al. (2023) voiced the tool's applicability for incorporating it into the science course. Similarly, Aryanti (2021) discovered that utilizing Android-based multimedia for financial accounting, created with PowerPoint (PPT) and iSpring Suite, was considered practical and feasible for subject matter experts and students, making it appropriate for online learning amidst the pandemic. Additionally, Muskhir et al. (2023) demonstrated that an Android-based interactive learning tool for electric lighting installation, developed using iSpring Suite, received high validity ratings from both learning media (93.8%) and materials experts (90.8%), confirming its effectiveness for teaching.

In addition, Satiti et al. (2023) created a math app for 8th graders with iSpring Suite and found it effective in teaching Relation and Function. In their research, Kurniawan and Sumargono (2021) indicated that history learning materials incorporating (Technological Pedagogical Content Knowledge) TPACK assisted by Spring Suite led to notable enhancements in student performance. Pakpahan and Rajagukguk (2023) reported positive outcomes of iSpring Suite in mathematics. Likewise, Ainiyah et al.'s (2024) research discovered that using interactive multimedia for teaching Arabic, created with PowerPoint and iSpring Suite 11, was practical. In another study, Nurhairunnisah et al. (2023) found that the interactive chemistry educational material created using iSpring Suite 9 was viable, receiving expert approval ratings and positive feedback from beta testing.

1.2. Purpose of study

Despite multiple studies on iSpring Suite and positive findings regarding this tool, the relevant research was conducted mainly in the Indonesian context and on subjects different from language education. Additionally, the tool is updated frequently; therefore, previous studies may have used former versions. Considering these, this study critically evaluates the tool's potential pedagogical affordances in language education. In doing so, it aims to bridge the literature gap and serve as a guide for prospective researchers in language education.

1.3. Theoretical Framework

Using iSpring Suite as a pedagogical tool can be based on sundry educational theories. Initially, it is plausible to assert that iSpring Suite's ability to combine diverse media (e.g., text, audio, video, and images) and

interactive elements (e.g., quizzes and scenarios) aligns well with Mayer's (2001) cognitive model of multimedia learning (CTML), postulating that multimodality promotes effective learning. The platform's tools for creating videos and interactive quizzes enhance learner engagement through multimedia channels that help understand content and retrieve information. Utilizing iSpring Suite can also be grounded on Kolb's (1984) experiential learning theory, emphasizing a learning environment where learners create knowledge constructed through experiential transformation based on active experimentation, concrete experience, abstract conceptualization, and reflective observation. Role-plays and scenario-based learning experiences on the platform support experiential learning by allowing learners to apply knowledge in practical contexts, reflect on their experiences, and adjust their understanding through feedback.

In addition, iSpring Suite might be associated with the self-determination theory (Deci & Ryan, 1985), suggesting that intrinsic motivation is driven by autonomy, competence, and relatedness. The evaluated educational software promotes autonomous learning through self-paced learning, learners' control over their learning environment through mobile compatibility and flexibility, and control over learning progress through immediate feedback. With its extra-scholastic affordances, such as engaging content through video lectures and interactive modules, iSpring Suite might further be connected with blended learning (Graham, 2006) and flipped learning (Bergmann & Sams, 2015) models, which integrate face-to-face and online modes of education and shift the focus from teacher instruction to individualized learning.

iSpring Suite can be utilized to design scaffolded learning experiences through guided tutorials, immediate feedback during quizzes, and hinted support. It might thus be linked with Vygotsky's (1978) zone of proximal development, which underscores the salience of scaffolding – a type of assistance for learners to bridge the gap between what they know and what they are learning. Moreover, iSpring Suite's flexibility and customizability align it with Knowles's (1978) andragogy (or adult learning theory), which concentrates on the difference between adults and children and highlights the significance of past learning experiences, practical relevance, and self-direction. The platform allows learners to engage in self-paced, goal-oriented learning experiences through courses that relate to their past experiences and professional contexts.

2. Methods and Materials

The study employed a descriptive research method (Nassaji, 2015) since it aimed to summarize and document the features of a technology product (i.e., iSpring Suite) rather than explaining or predicting outcomes or experimentally comparing it with other tools. The researcher reviewed several rapid authoring tools (e.g., Articulate Storyline, Adobe Captivate, Camtasia, and Lectora Inspire), interactive content platforms (e.g., Elucidat and Evolve Authoring Tool), and video-focused tools (e.g., Vyond and Powtoon). However, iSpring Suite was selected because of its integration with PowerPoint, ease of use, comprehensive features, affordability, and language learning-specific tools. With this aim, the study adopted Topal's (2022) adapted framework for evaluating media products, consisting of an introduction, theoretical framework, general description, pedagogical affordances, limitations, and conclusion.

Since this review did not include human participation, it did not require ethics committee approval. The reviewed product is also accessible to individuals through its website (https://www.ispringsolutions.com/ispring-suite/features). Hence, they do not need extra permission to use the information they provide. References to other sources were duly provided.

3. Results and Discussion

3.1. General Description

iSpring Suite (https://www.ispringsolutions.com/ispring-suite) is an e-learning authoring tool launched by Spring Solutions more than two decades ago. This quick and intuitive e-learning software integrated with PowerPoint enables users to produce a course, record voiceovers, compile a quiz, and distribute the course online effortlessly, even without prior experience in e-learning development (Figure 1). The iSpring Suite preserves all transitions, hyperlinks, buttons, styles, SmartArt objects, and 167 animations, maintaining the

original look of the PPT presentation in the output course. Utilizing the same tool, users can exploit iSpring's Narration Editor to record audio or video narration, sync it with their slides, edit out unnecessary parts, eliminate background noise, and adjust the volume. iSpring Suite Max provides over 2,300 pre-designed slide templates that allow you to assemble courses quickly. Users can choose from various templates in the Content Library, such as title slides, tables of contents, and timelines, and then customize the colors to align with their brand.

Figure 1. *A snapshot of an online course*

iSpring Suite Max includes over 116,000 photos of diverse characters of various ages, ethnicities, and occupations (Figure 2). Each e-learning avatar offers various emotions, facial expressions, and poses to suit course scenarios. Users can enhance their courses by incorporating top-notch visuals of workplaces such as offices, hospitals, banks, classrooms, and shops. iSpring Suite offers over 2,500 stunning settings for various training situations and authentic objects like stationery, devices, and interior items. Users can also utilize over 3,600 icons to create an attractive, unified course design. However, they must ensure that checkboxes, radio buttons, indicators, sliders, symbols, and other visual elements coordinate seamlessly to give content a professional and polished appearance.

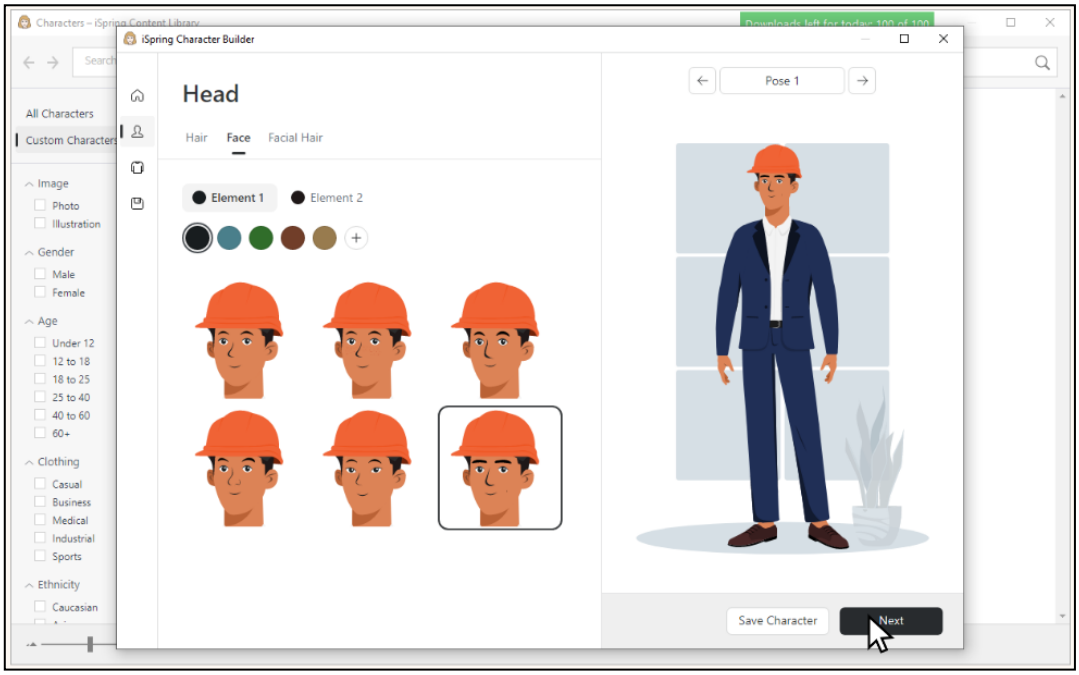

Figure 2. *Character builder*

Users can further experience the pleasure of collaborating on e-learning projects with virtual support that assists them in developing courses whenever they require help with writing, editing, or formatting. More specifically, they can generate course syllabuses, create visually appealing manuals, devise quiz inquiries half the time, ask the artificial intelligence (AI) assistant (Figure 3) to condense their text, use more straightforward language, correct spelling errors, automatically emphasize crucial sections, generate lists, and choose headings. The platform also allows the development of distinct characters for online courses adaptable to any learning situation. Numerous opportunities are offered for customization, from facial expressions to clothing and hair color.

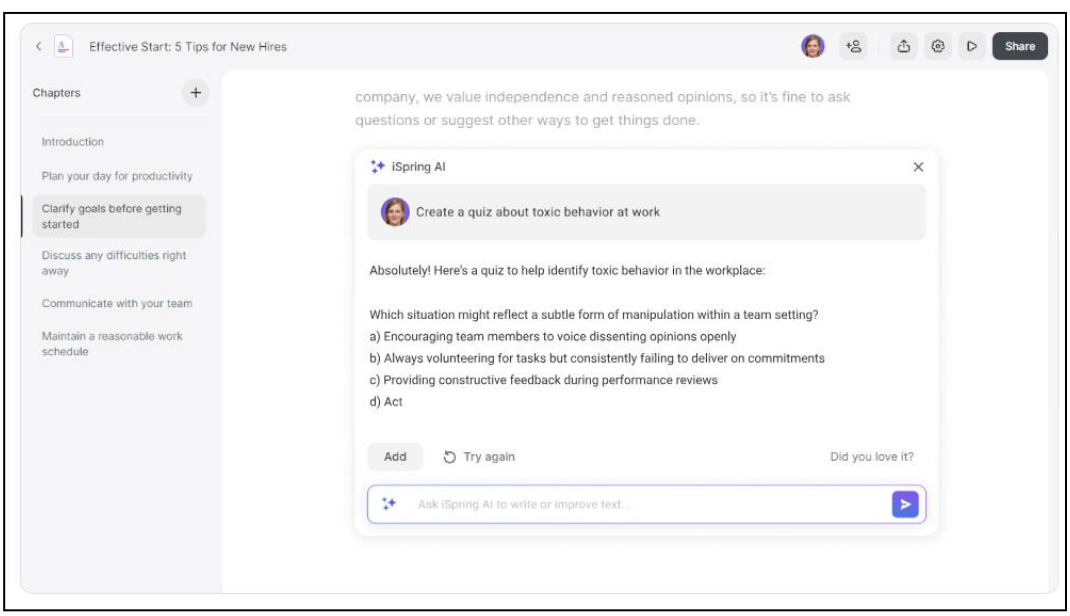

Figure 3. *The AI assistant*

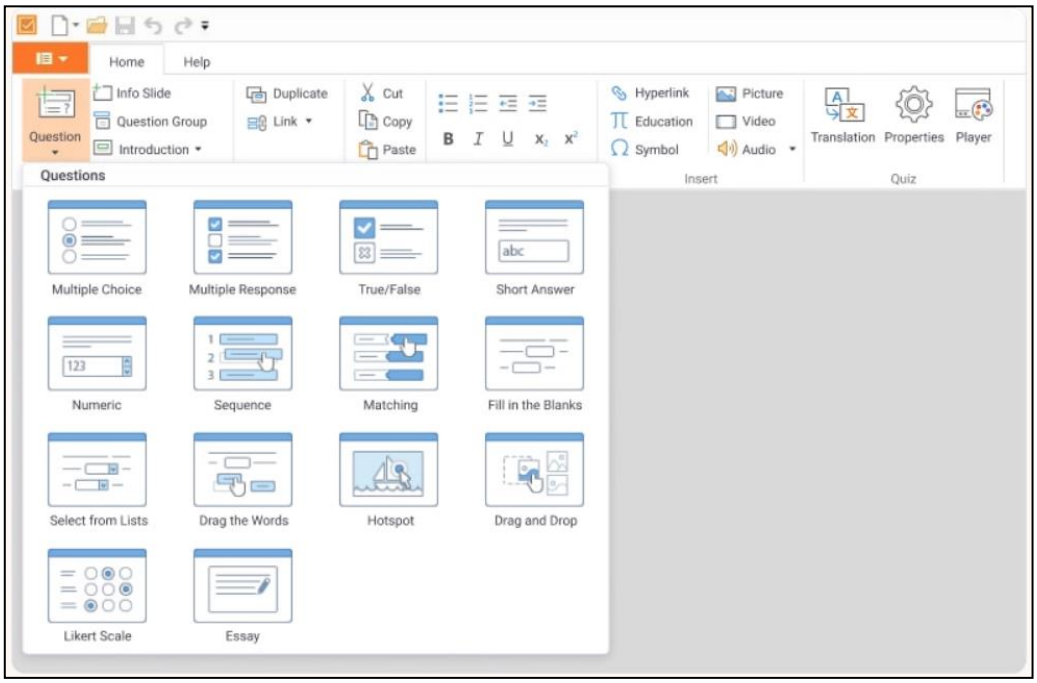

Figure 4. *The assessment feature*

The platform's vital feature is to assess learners' development and collect input using engaging quizzes, drag-and-drop exercises, surveys, branching scenarios, and detailed feedback (Figure 4). iSpring Suite's convenient video studio also allows users to produce high-quality tutorials featuring screencasts, talking-head videos, annotations, hints, and other elements (Figure 5). The software also enables users to develop conversation skills in learners by designing interactive role-play simulations (Figure 6). Users can further exploit iSpring Suite's interactions to include more information on a single slide and display it more engagingly and interactively (Figure 7). Moreover, iSpring Suite offers valuable tools for organizing course content and additional materials, allowing users to assign presenters to individual slides, limit navigation, and set up different paths through the course.

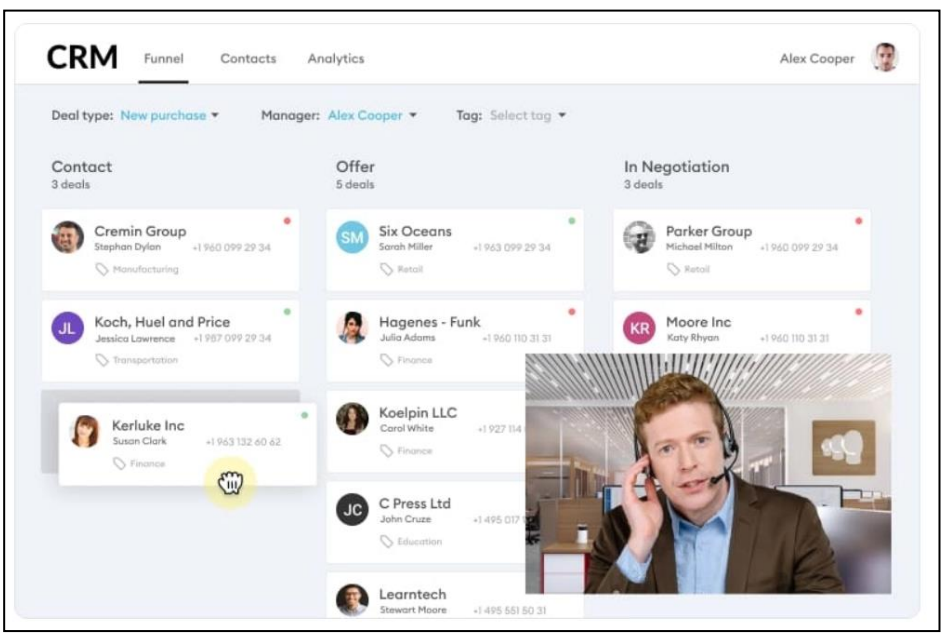

Figure 5. *Video lessons and screencasts*

Figure 6. *Role-plays*

Figure 7. *Interactions*

Furthermore, iSpring Suite can create lifelike AI narrations for your courses and efficiently adapt your content for different locations (Figure 8). Additionally, users can develop digital courses, assessments, conversational scenarios, engagements, and digital books that are easily accessible to users with disabilities (Figure 9). No separate versions are necessary since learners can switch to an accessible viewing mode with just one click. Last, users can use iSpring Suite to swiftly and effortlessly convert their course into a web-compatible format and promptly upload it to their website or LMS. Once published, iSpring courses are accessible on all types of devices (Figure 10).

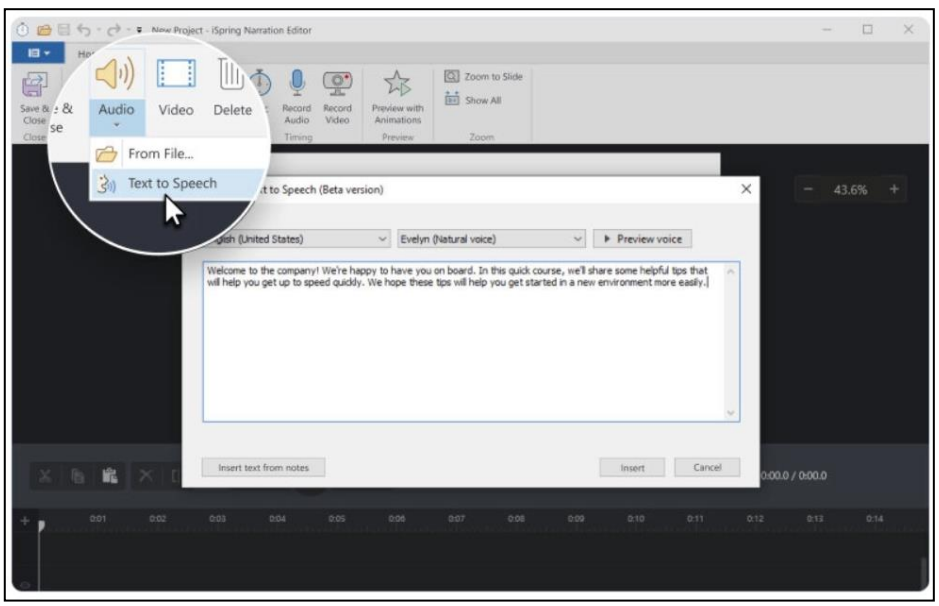

Figure 8. *Voice-over and localization*

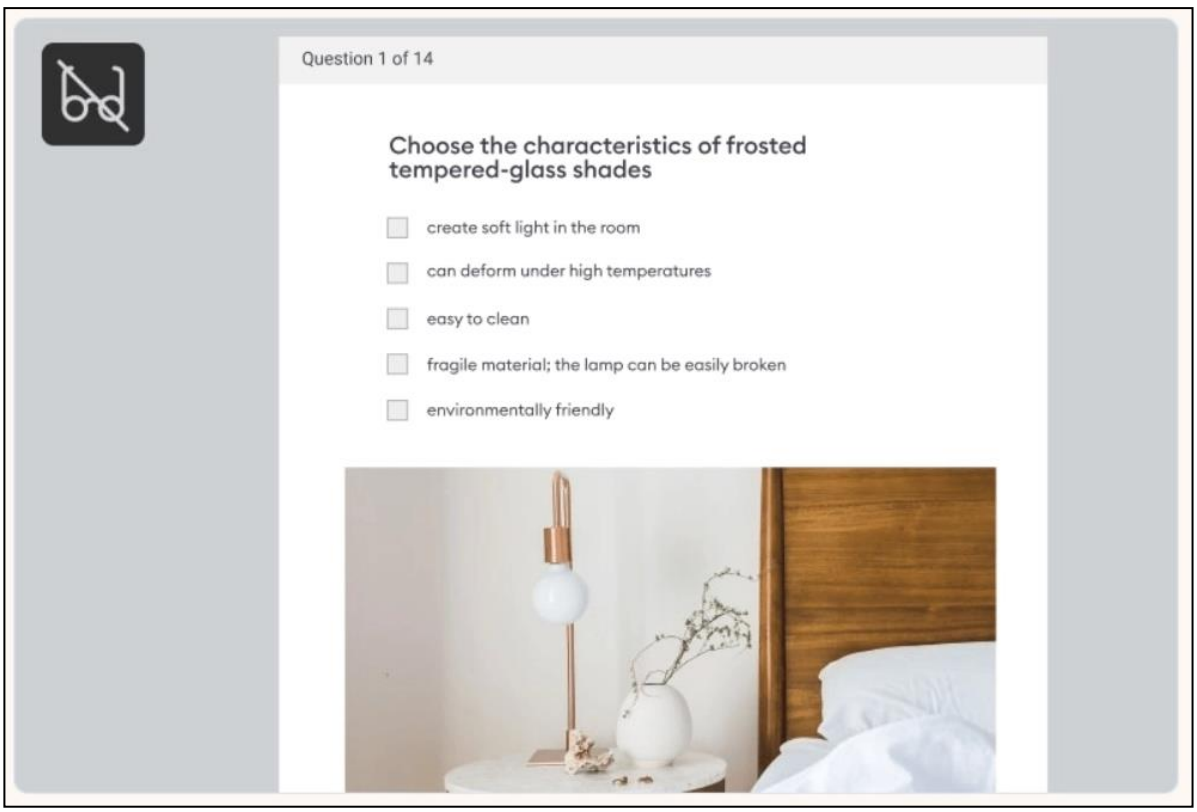

Figure 9. *Accessibility*

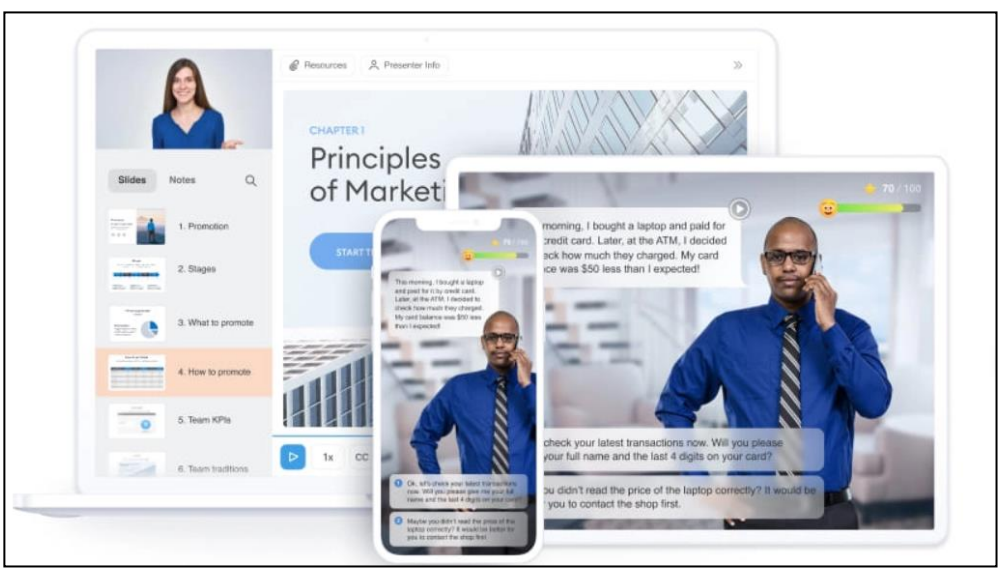

Figure 10. Fast delivery and tracking

3.2. Pedagogical Affordances and Downsides

Given the need for interaction in online or blended courses (van Der Stap et al., 2024) and the heightened opportunities of online platforms for learner interactions (Quadir et al., 2022), iSpring Suite offers an interactive learning environment because it (i) utilizes interactive quizzes, role-plays, and video lectures to develop captivating content that encourages student engagement and active participation in the learning process and (ii) its role-play functionality replicates real-life scenarios, allowing learners to hone their decision-making and communication abilities. iSpring Suite accommodates a range of media formats, such as videos, audio, and interactive quizzes, to cater to diverse learning preferences and encourage deeper comprehension. Previous research indicated the efficacy of multimodality of learning tools, concurring with our argument (Kang & Kim, 2023; Domínguez Romero & Bobkina, 2021).

One distinctive feature of iSpring Suite is assessment and immediate feedback. Earlier research reported difficulties with immediate feedback (Canals et al., 2020). iSpring Suite's quizzes provide instant feedback, enabling students to recognize and learn from their errors as they occur. This feature strengthens learning and facilitates individualized, self-paced advancement (Corral et al., 2021; Fu & Li, 2022). The software also enables the creation of assessments that can be adjusted based on the student's earlier answers, thereby personalizing the learning process (McCarthy et al., 2020) and mitigating the unfavorable effects of individual differences (Chen et al., 2021).

iSpring Suite also promotes blended learning through its integration with PowerPoint and SCORM/xAPI compliance, allowing teachers to upload their courses to learning management systems and blend in-person and online classes. Previous studies revealed that blended learning positively impacted language learning, including student motivation, autonomous learning abilities, conversational enhancement, and general English skills (Moradimokhles & Hwang, 2022; Wang, 2021; Wang & Zhang, 2022).

Moreover, the content created using iSpring Suite is optimized for mobile devices, allowing learners to review materials conveniently. It is conducive for students in distant or varied locations, facilitating asynchronous learning (Moorhouse & Wong, 2022). In addition to promoting independent learning, mobile devices were found to have numerous advantages for language learning (Gutiérrez-Colón et al., 2023; Puebla et al., 2022; Zhang & Zou, 2022). Furthermore, iSpring Suite allows for customization, enabling educators to tailor educational material to meet the specific needs of each learner, guaranteeing that learners are provided with suitable resources that align with their skill level, background, or areas of interest. This accords with course design principles, mainly customizing the content according to learner profiles (Tomlinson, 2022). Since this personalization provides learners with their desired content, it will increase their motivation and engagement (Alamri et al., 2020; Ram et al., 2024).

However, several pedagogical concerns must be raised regarding the software's use. Despite providing interactive content, there is a risk that students might absorb information without active engagement, mainly if the content does not promote critical thinking or encourage active participation. Similarly, educators unfamiliar with eLearning authoring tools may find it challenging to create fully interactive content, although iSpring Suite works alongside PowerPoint. In addition, creating engaging and interactive educational material, such as quizzes, videos, and role-plays, can take up a significant amount of time, which may affect teachers' preparation time.

Since the software operates within PowerPoint, the creative options are limited by the platform's constraints. More advanced multimedia design tools may, therefore, provide more flexibility.

iSpring's quiz creation feature is vital but mainly geared toward objective assessments, potentially restricting the thorough evaluation of critical analysis and problem-solving skills. However, teachers can facilitate this process by designing problem-solving scenarios through this software, thus fostering higher-order thinking skills. Although iSpring Suite does offer automated feedback, it lacks functionalities for peer review, which is crucial for collaborative learning settings (Sippel, 2024). Additionally, iSpring Suite may not fully meet accessibility standards and has a pricing structure that might not be affordable for all educators or institutions. Furthermore, its multimedia-heavy courses require reliable internet access, which may not be available to all learners, particularly in underserved regions or areas with poor connectivity.

4. Conclusion

This study evaluated an innovative and practical educational tool (i.e., iSpring Suite) for language education. To this end, it initially laid the theoretical grounds for its use. The tool was generally described next. Pedagogical affordances and limitations were outlined later.

Following the evaluation, the study revealed that iSpring Suite might offer interactive learning, multimodal learning, immediate assessment/feedback, blended learning, flexibility, and customizability. Hence, it fosters learner engagement and motivation. However, a few impediments can occur before or during its implementation. It might be labor-intensive, have restricted content creativity and assessment means, and create technical difficulty and complexity for technologically incompetent users.

However, it is noted that all digital tools come with specific technical or pedagogical downsides (Haleem et al., 2022; Selwyn, 2016). It must be acknowledged that educational tools are just a means, not a magic formula, that will revolutionize education or result in definite learning outcomes. Nevertheless, research is conducted to explore how to exploit these digital resources best for learning and teaching.

Most studies on iSpring Suite were conducted in Indonesian settings, particularly in fields different from language education. For that reason, qualitative and quantitative research is urged for two reasons: to corroborate the review's findings and explore the tool's implementation with language learners from different linguistic and cultural backgrounds. In this regard, prospective researchers can investigate iSpring Suite's impact on or effectiveness in language skills (e.g., vocabulary and grammar), assessment, learner motivation, or involvement. Students' technology acceptance levels and perceptions of teachers and students toward this tool can also be examined in future studies.

Ethical Approval: The study does not require ethical approval since it does not include human participation nor does it harm any product.

Conflict of Interest: The author declares no conflict of interest.

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