

The EFL students' online reading determinants: Perceiving from their selected folklore readings

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ABSTRACT

In an attempt to increase reading performance at university level. This study aims at perceiving the experiential determinants of EFL students' online reading performance. Data were collected from 182 undergraduate students' self-rated questionnaire based on the assigned Indonesian folklores in English version through the online reading platforms. Data analysis used descriptive statistics and factor analysis. The results showed that EFL students' reading habits and reading frequencies and trends were very supportive, whilst reading effectiveness and reading for pleasure supported their reading performance. Tests of chi-square's four variables were statistically significant indicating the proportional majority of online reading activity. Meanwhile, the Principal Components Analysis (PCA) indicated two components and variables under the eigenvalues' square root. The interpretation of two components was coherent with the pilot results on the online reading readability scale, analyzed the use of positive and negative affect items as undertaken from the pattern and structure matrix for PCA with the Obliging rotation. EFL students' online reading is engaging accordingly since students accomplished their reading performance based on individual accessibilities and habits to understand the contents of genres. This study concludes that EFL students' online reading performance has been practically facilitated by the technology devices multiply. Hence, four online reading variables increased EFL students' reading awareness and performance accordingly.

Keywords: EFL students' reading performance; online reading; reading determinants

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INTRODUCTION

In our local context, the practice of online reading for academic purposes among EFL students is still unsatisfactorily performed since some necessities regarding the crucial reading fulfilments have not been on the priority in students' mindset. This condition is not surprising us that both online and offline reading-based performance empirically derives unsatisfactory among the readers since the program for international student assessment (PISA)

reports that Indonesian students still rank 31 out of 41 countries relating to reading performance. Realizing this condition, we have been thinking that some reading aspects, such as readers' proficiency needs, reading situation, readers' interest and motivation, and reading habits will determine the skills (Liu et al., 2020) through understanding texts, hypothesis forms, and predictions to construct the meanings (Sungatullina et al., 2016). In addition, three themes relating to L2 readers' perception such

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as memorizing text details, understanding main ideas and disrupting reading fluency were connected with students' reading skills (Liu, 2020). The reading promotion might be culturally placed within locally shaped realities and noted from the unique pattern of the results-driven contexts in reading class (Garces-Bascal et al., 2018). It has shown greater increases respectively, through the reading engagement, namely: affective, creative, interactive, shared, sustained and personalised reading engagements in accordance with students' learning and developmental outcomes (Kucirkova et al., 2016). Unfortunately, The L2 readers still lack the reading habit that was allocated in their leisure times (Su, 2016).

Further, another phenomenon shows that although students do virtual or online activities repeatedly, unfortunately, their purports are often irrelevant to academic purposes. They prefer to be involved in social networking relationships and amusements, although the online activities still correspond with their educational intentions (Bottigheimer, 2019). Realizing this phenomenon, hence to promote reading comprehension, there is a need for an effective strategy in which EFL students involve in activities on how to associate with their previous knowledge and/or experience, to question and answer sessions, to look at keywords, to use sentence structure analysis of determining the grammatical usage, and skip of reading and re-reading (Drieghe et al., 2019). This strategy attempts to stimulate students' broad-mindedness, propensity, and cognitive maturity when preceding information, clarifying ideas or thinking, and discussing the importance of reading materials within the lexical interaction focus (Forrest, 2017). Besides, the learning commitment in vocabulary and text structures, either in increasing content knowledge or reading skills simultaneously are necessary to cultivate L2 readers' comprehensive access.

Studies on reading strategies highlight their connection to performance. Shih and Huang (2018) point out that reading strategies have profiled and categorized the bottom-up (scanning and the use of cues setting) and top-down (skimming and driving schemata), meta-cognitive (covering apprehension and evaluating strategy use), affective (discussing reading with peer and collaborate with a peer in the reading tasks), and test-taking (language use and test-usefulness). The strategies aim at putting a remarkable correlation between reading proficiency and successful learning processes, in which students potentially tend to show a better improvement in tough reading performance (Chen et al., 2020) since oral reading forms multiply connect the readers' ideas to comprehend the literary texts (Gopal & Singh, 2020). Hence, a central goal of reading aims at assisting low-level students to become high-level

proficiency readers through orders and intensities (Al-Qahtani, 2021).

Conversely, online-based reading presents some complexities. The acquisition of online-based reading presents EFL students' cognitive skills which differently predicted performance across reading outcomes, as follows: characteristics controls and cognitive skills, negatively impacted reading outcomes through text complexities, and specifically oral reading fluency (Spencer et al., 2019). Recently, the importance of online reading for L2 acquisition and skills development is influenced by readers' self-efficacy, the autonomy that theoretically connects with the motivational intervention, such as task-avoidant behaviors, task-engagement behaviors, and skill growth among students (Orkin et al., 2017), and collaboration with peers that indicates the learning contribution (Crawford et al., 2018). In dealing with online reading, vision focus, computer devices, sentences written in hypertext, and verbal and non-verbal appropriateness are needed to support L2 acquisition and skills development since at various levels of reading acquisition, the role of visual analysis and mental imagery to reading performance varies among students (Commodari et al., 2019). Unlike the printed reading texts, multimedia formats support the audio application symbols for students' word recognition as an effective pedagogical contribution. The applicable symbols on multimedia formats may address icons, animated symbols, informative figures and tables, and virtual reality (Li & Tong, 2019). This strategy also includes the comprehension of the main idea and infers texts underlying organization, as well as macro-strategies for presence at the gist of the text, such as suppression, generalization, construction, and integration in terms of reading purpose and or students' prior knowledge (Shelton et al., 2020).

Basically, either L1 or L2 reading transfers the word reading procedures lexically and sub-lexically to demonstrate the stimulus inversion for individual differences in reading style among EFL students (Ben-Yehudah et al., 2019). Reading readability, for those who learn reading comprehension avoid a harsh characteristic of work in the reading aspects. This shall be concise work on the process of being good readers (Jung & Révész, 2018). So, L2 readers need opportunities to receive balance amounts of readers' comprehensible input through the appropriately selected reading topics (Elleman et al., 2017). For instance, reading for pleasure shows a result in greater increases in reading rates. As a core element of the reading approach, this relates to readers' self-efficacy (Orkin et al., 2017) that can indicate poor and proficient readers in both cognitive competence and motivational level (Soto et al., 2020). In a certain case, the significant reading problem among L2 readers keeps into the low-proficiency, breaks into a downward spiral in

which they lack enjoyment, leads to less reading, and positively ensures that their fluency remains low accordingly, caused by students' behavioral issue (Roberts et al., 2019).

On the other hand, Su and Davidson (2019) address that the online approach will be a better predictor of learning processes and outcomes, as the external predictive validity is more relevant with EFL students' focus on the observed behaviours. Hence, the content-based focus is regarded as a sense of accomplishment throughout the texts, skills that match challenges via easy texts and raise the level as increased skills, such as the effects among L2 readers who showed a trend towards L1 readers' influence (Avery & Marsden, 2019). In online circumstances, under appropriate instruction, students can increase their reading exposures towards the authentic materials and focus their linguistic knowledge flexibly. The substance and teachability of reading strategies and performance have experientially been handled to ascertain students who engage and develop online reading practices (Cheng, 2016).

To support this study, EFL students' online reading influences may positively improve their reading performance through the strength of online reading effectiveness among students' communication and collaboration, and the assignments authenticity (Swaggerty & Broemmel, 2017). The more students perform their online reading experience, the better reading achievement the students improve (Yuliani & Barokah, 2017), although the true portrait of students' current condition will not comprehensively portray their performance when accessing the online sources instead of the printed hardcopies (Forzani et al., 2020). Students' cognitive (e.g.: fluency and vocabulary) and motivational (e.g.: intrinsic reading motivation) determinants show an indirect influence on reading comprehension strategy (Voellinger et al., 2018).

However, EFL students' authentic reading materials are found to strengthen their learning motivation and attitude positively. The cultivation purposes of students' L2 reading strategy awareness are also discussed with several pedagogical and theoretical theories (Kung, 2017). These purposes increase students' reading skills with high-quality lexical representations, in which the system allow to reach an advanced stage in the word-recognition processes, whether or not skip the words (Drieghe et al., 2019) with the natural way of joining students' interaction and individual-based performance. Besides that, the use of frequent online dictionary enables students to comprehend what they are reading. Additionally, the online metacognitive reading strategies are mostly applicable by the internal locus rather than external locus of students' control, and the interrelationships among types of metacognitive reading strategies are substantial

(Mesgar & Tafazoli, 2018), whilst an important part of bilingual reading comprehension is constructed by grammar and vocabulary knowledge for innovation when students have not gained a general linguistics yet for effective communication (Fox et al., 2018), as well as word recognition proficiency and sentence familiarity that increase more resources to comprehension processes (Garcia et al., 2018).

Constituting with the research gap, it is important to address that EFL students' online reading skills will supportably relate to their reading habit, reading frequencies and trends, reading effectiveness, and reading for pleasure. Hence, to accomplish EFL students' necessities, this present study proposes two research questions (RQs) relating to EFL students' online-based reading performance, as follows: (1) Do EFL students gain any assistance from reading online? (2) What aspects of EFL students' preferences have accommodated their online reading experience? This study attempts at investigating what variables of online reading strategies that EFL students can afford during their engagement in online reading performance with the selected contextual reading topics contextually.

METHOD

Participants

This study set up the descriptive quantitative design that involved a hundred eighty-two ($n = 182$) undergraduate students due to its accessibility in the COVID-19 pandemic to be the participants through the simple random sampling at the multiple semesters. All respondents were subject to the undergraduate students at a private university in Yogyakarta, Indonesia that managed the English Education Department as one of its core study programs at the Faculty of Teacher Training and Education. This study formally commenced at the second semester of the 2019-2020 academic year from the reading class and accommodated the systematic sampling design to engage every respondent to the homogeneous samples.

Instruments

This study firstly determined Cronbach's alpha reliability coefficient to standardize the criteria of alpha's value. Based on the test of reliability coefficient, Cronbach's alpha (α) gained .741, whilst the values among four variables ranged in between .642 to .773, through undertaking of other thirty-seven ($n = 37$) EFL students to be the sample size in validity and reliability. These values corresponded with the online reading texts that represented students' habits (.773), frequencies and trends of online reading texts (.686), effective online reading texts (.715), and reading for pleasure (.642).

Procedure

The procedure of the online reading genre selection for EFL students' reading assignment dealt with the narrative texts which were written in lecturer's teaching syllabus through the running semester. However, a minor adjustment upon students' assigned themes at the teaching syllabus were consulted and discussed with the reading lecturer before being assigned to students since the narrative texts of Indonesian folklore themes did not focus on the online learning platform. Consultation and discussion sessions also accommodated two approval titles of the Indonesian folklores in the English version, namely: Calon Arang and Lutung Kasarung, which corresponded with the epic, myth, and tale. Students were individually responsible to afford the assigned online reading themes through the internet access by their smartphone, iPad, tablet, and laptop.

EFL students were assigned to read those titles within 30' (thirty minutes) through the guided links for the folkloric themes of Calon Arang and Lutung Kasarung. After allocating thirty minutes to read the folklores, students were voluntarily required to fill in the online questionnaire through the Google form to obtain their perception of online folklores-based reading. The questionnaires of online reading matters consisted of four items for reading habits, four items for reading frequencies and trends, five items for reading effectiveness, and four items for reading for pleasure. However, the purpose of this online reading constituted with the preparation of implementing another learning platform, which was used to be conventionally experienced before the COVID 19 pandemic struck us in March 2020 into a new adaptable learning model substantially. This online reading platform was expected to be culturally in line with the necessities of students' learning model in the future.

Data Collection and Analysis

Data used the returned self-rated questionnaire from EFL students after they completely read two folklores in the English version. The closed statements consisted of a 5-point Likert scale ranging from 5 to 1 (5 = very supportive, 4 = supportive, 3 = fair, 2 = less supportive, and 1 = not supportive) were given to 182 participants. Basically, out of 185 students participated in this study, but two students missed the reading class twice, so they were absent from the questionnaire fulfilment, whereas another student was absent from the reading class during the semester. Overall, 182 EFL students were involved in this study with the compositions of 42 (23%) males and 140 (77%) females. They ranged in age from 20 to 23 years old (Mage = 21.20; SD = 2.121) at the time of fulfilling the questionnaire. Data analysis used descriptive

statistics, chi-square test for goodness of fit, and factor analysis was applied to measure the online-based reading processes.

FINDINGS AND DISCUSSION

These descriptive findings quantitatively relied on EFL students' online reading outputs to support their performance in the four aspects of reading variables. Those aspects are as follows: the students' reading habits that might naturally create their positive and constructive cultures with the eligible reading themes, either academic or non-academic purposes, students' reading frequencies and trends towards a new perspective of reading knowledge which might increase their reading knowledge and experience, students' reading effectiveness that corresponded with the generated meanings, summarized, clarified words and difficult phrases, and predicted what the substance of paragraphs, and students' reading for pleasure that virtually facilitated all levels of low, medium, and high proficient students' comprehension. The summary of descriptive statistics showed its mean and standard deviation for EFL students' online reading habits, where $M = 3.95$; $SD = .653$.

Do EFL students gain any assistance from reading online?

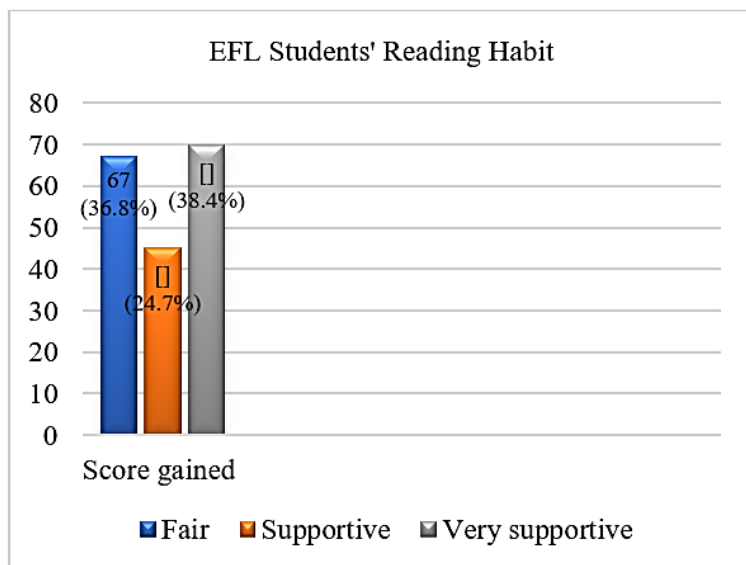
Firstly, in EFL students' frequencies of reading habit, there were 67 or 36.8% respondents confirming that reading habit had established in a fair category, 45 or 24.7% reading habits were supportive and 70 or 38.4% reading habits were very supportive to their online reading platform (Table 1 and Figure 1). There was no student perceiving that reading habits accomplished them in less and not supportive categories. The EFL students' beneficial assistance from reading habit relied on their literacy creation (comprehending online Calon Arang and Lutung Kasarung folklores with vocabulary, grammar, textual structure, and linguistic feature competencies) when being engaged in online reading, ideas elaboration with other classmates, and media support that introduced and acknowledged EFL students' capacity to be familiar with online reading system. The EFL students might also gain assistance through online reading habit which stimulated their attitudes, metacognitive reading, self-awareness critical thinking skills, verbal fluency academically and non-academically from which they experienced with online learning platforms. Empirically, EFL students' reading habit figured out that most readers' experience gained a very supportive with 70 (38.4% respondents).

Table 1
Frequencies of EFL Students' Reading Habit

	Frequency	Percent	Valid Percent	Cumulative Percent
Valid 3.00 (Fair)	67	36.8	36.8	36.8
4.00 (Supportive)	45	24.7	24.7	63.2
5.00 (Very supportive)	70	38.4	38.4	100.0
Total	182	100.0	100.0	

Note. Frequencies of EFL students' reading habit descriptively established in fair category which provided fair (67%), supportive (24.7%), and very supportive (38.4%), with $M = 3.95$ and $SD = .653$

Figure 1
Bar Diagram on EFL Students' Reading Habit



Note: This bar diagram showed EFL students' reading habit that corresponded with the levels of their online reading activities.

Further, EFL students' reading habit proved their online reading experience by asking and answering questions, exposing, and elaborating ideas upon the guided folklores (Calon Arang and Lutung Kasarung) together with their peer. So, the preferable reading behaviour in scheduled activities turned to a better refinement, in which reading repetition up to thirty minutes could be uninterruptedly maintained by these autonomous readers. Reading repetition might lead to the key point of the sustained silent reading when the readers concentrated with the folklores. As a matter of fact, students' silent reading become the available reading option and gain stronger for the narrative genre (Schimmel & Ness, 2017). Students' online reading habits create their literacy, elaborate ideas and support media (Yuliani & Barokah, 2017) to enhance their reading skills (Kumara & Kumar, 2019). The relationships between the reading habits, attitudes, and metacognitive reading comprehension of students' self-awareness are found to be positive, middle criterion, and meaningful (Memiş & Kandemir, 2019). Students who develop their reading habit academically and non-academically, will directly develop their critical thinking skills, verbal fluency, and better academic outcomes

accordingly (Balan et al., 2019), as well as improve mental capability (Kumara & Kumar, 2019). Hence, Wu and Peng (2017) determine that online reading habits affect students' performance in various modes and lead to significant impacts for instructional interventions. Students' reading habits can be figured out from the way they experience with this learning platform, which indicate that the most students' experience gained a very supportive reading habit with 70 or 38.4% respondents.

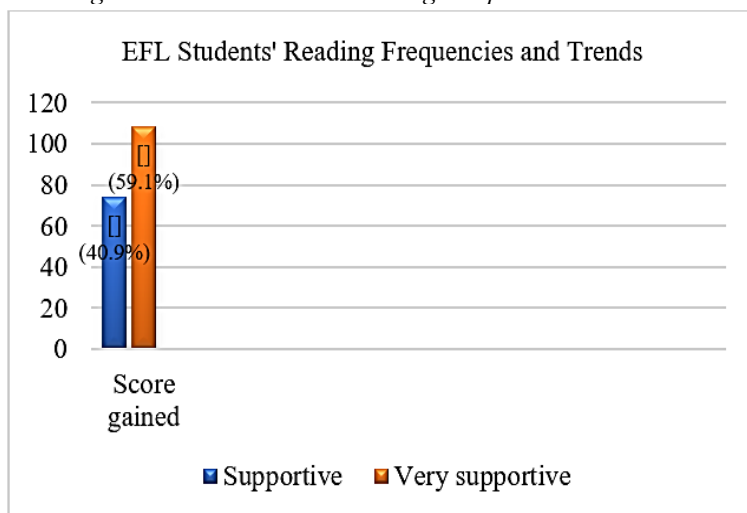
Secondly, the summary of descriptive statistics on online reading frequencies and trends showed that the mean and standard deviation proceeded accordingly, where $M = 4.59$; $SD = .503$. Based on the data, EFL students' reading frequencies and trends gained in the following: 74 or 40.9% respondents responded that reading frequencies and trends ranked in a supportive category, whilst 108 or 59.1% respondents perceived that reading frequencies and trends influenced their online reading platform with very supportive category (Table 2 and Figure 2). Meanwhile, there was no student confirming that reading frequencies and trends were in fair, less, and not supportive categories.

Table 2
Frequencies of EFL Students' Reading Frequencies and Trends

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	4.00 (Supportive)	74	40.9	40.9	40.9
	5.00 (Very supportive)	108	59.1	59.1	100.0
Total		182	100.0	100.0	

Note. Frequencies of EFL students' reading frequencies and trends descriptively established in very supportive category which provided supportive (40.9%), and very supportive (59.1%) with M = 4.59 and SD = .503

Figure 2
Bar Diagram on EFL Students' Reading Frequencies and Trends



Note: This bar diagram showed EFL students' reading frequencies and trends that relied on their reading comprehension.

The EFL students' reading frequencies and trends might be initiated by comprehending their proficiency with regular practices to increase their literacy skills. These reading frequencies and trends proved the readers in relevance with their reading repetitions and accessibilities upon the selected reading themes (Calon Arang and Lutung Kasarung) through their smartphone, iPad, tablet, and laptop. Some informal discussion also appeared among readers in the classroom when they attempted to comprehend the themes. According to Hahnel et al. (2018), skilled students may maximize their significant roles and perform good courtesy when getting online for academic purposes. They are eligible to accommodate their cognitive resources effectively and efficiently, although they did not dominate the discussion and kept reading collaboratively. Meanwhile, students' behavioral reading cultures may be implicated from using the sustainable internet facility, which is recently very well-known among college students. By accessing several online reading links, such as magazines, novels, e-books, and articles (Satriani, 2019), they constructively engaged themselves in extensive reading frequently.

However, EFL students' online reading capacity and engagement will be naturally promoted when the online reading class remarkably appreciates the academic reading values and considers it as a fascinating exercise (Ho, 2016),

besides the relevance of being conducive in physical and socio-emotional learning atmosphere (Sumekto et al., 2020) will be prioritized. Empirically, students' reading frequencies and trends could be remarkable from their cultures of accessing online reading sources. The more frequently students accessed online reading sources, the more trending students acknowledged their reading knowledge and experience. This could be notable that most students (74 or 40.9% respondents) gained supportive in reading frequencies and trends.

Thirdly, the summary of descriptive statistics on online reading effectiveness indicated that the mean and standard deviation resulted accordingly, where M = 3.90; SD = .683. Regarding the data, EFL students' reading effectiveness displayed in the following records: 50 or 27.3% respondents replied that reading effectiveness placed in the fair category, 99 or 54.5% respondents perceived that reading effectiveness ranked in an supportive category, and 33 or 18.2% respondents confirmed that reading effectiveness showed very supportive with the online reading platform (Table 3 and Figure 3). By confirming readers' online reading experience their selected folklores, this study addressed students' reading effectiveness that linked with comprehensive monitoring, unequivocal reflective teaching from the lecturer, modelling reading with some digital devices, and contextual reading mechanism to stimulate students' higher-

order thinking skills. Another students' reading effectiveness issue aimed to facilitate reading deficiencies of accessing online folklores of Calon Arang and Lutung Kasarung. The EFL students' online reading effectiveness complies with the effective and accomplishable reading for students (Kazemi et al., 2020). Its effectiveness and accomplishment rationally relate to lecturer supervision, unequivocal teaching, modelling,

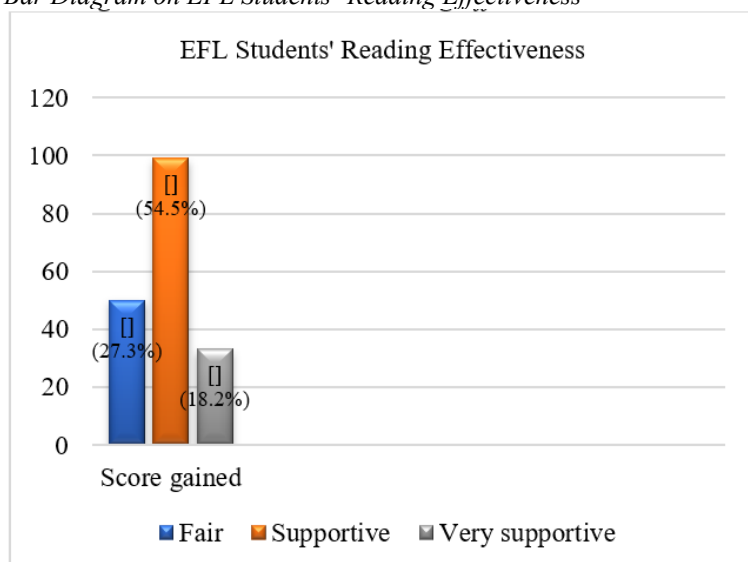
comprehensive monitoring, and guided reading mechanism to perform students' higher-order thinking skills using the online reading sources flexibly and independently (Tâm & Linh, 2017). Ragan et al. (2019) point out that online reading assists students in bridging the deficiencies, such as the use of students' e-textbook features (e.g.: glossary, quizzes, notes, audio, and video) increased after having any library tutorials.

Table 3
Frequencies of EFL Students' Reading Effectiveness

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	3.00 (Fair)	50	27.3	27.3	27.3
	4.00 (Supportive)	99	54.5	54.5	72.7
	5.00 (Very supportive)	33	18.2	18.2	100.0
Total		182	100.0	100.0	

Note. Frequencies of EFL students' reading effectiveness descriptively addressed in supportive category which provided fair (27.3%), supportive (54.5%), and very supportive (18.2%) with $M = 3.90$ and $SD = .683$

Figure 3
Bar Diagram on EFL Students' Reading Effectiveness



Note: This bar diagram showed EFL students' reading effectiveness that comprehended with their online reading sources flexibly and independently.

However, students with reading deficiencies need to discover significant problem-solving to obtain reading comprehension. Realizing this condition, online reading remained a substantial current trend of comprehending EFL students' literacy skills with the digitized information era (Cheng, 2016). In this case, students' reading effectiveness determined their online reading experience by applying some digital devices accordingly. Students' reading effectiveness set forth that their highest interval score was in the very supportive category with 99 or 54.5% respondents.

Fourthly, the summary of descriptive statistics on online reading for pleasure placed that the mean

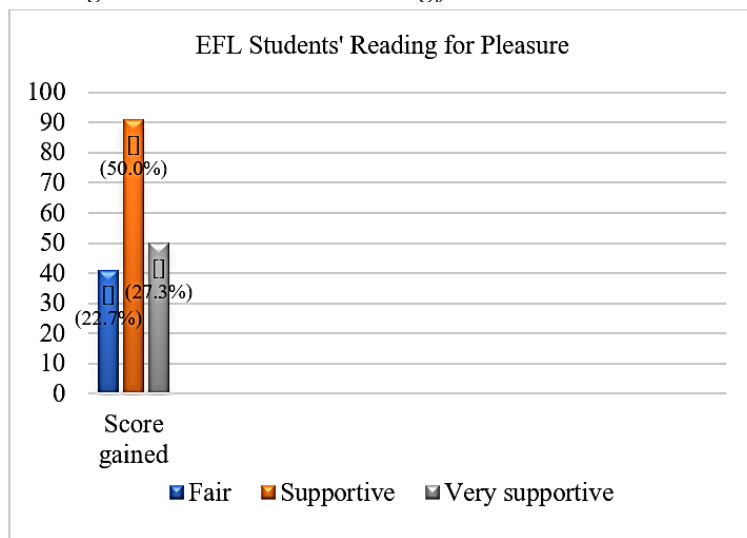
and standard deviation concluded consequently, where $M = 4.04$; $SD = .722$. According to the obtained data, EFL students' reading for pleasure resumed in the following results: 41 or 22.7% respondents ascertained that reading for pleasure constituted with fair category, 91 or 50.0% respondents placed that reading for pleasure ranked in an supportive category, and 50 or 27.3% respondents perceived that reading for pleasure gained very supportive when the online reading platform was done (Table 4 and Figure 4), but, there was no student perceiving that reading for pleasure reading was remarkably less and not supportive categories.

Table 4
Frequencies of EFL Students' Reading for Pleasure

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	3.00 (Fair)	41	22.7	22.7	22.7
	4.00 (Supportive)	91	50.0	50.0	77.3
	5.00 (Very supportive)	50	27.3	27.3	100.0
Total		182	100.0	100.0	

Note. Frequencies of EFL students' reading for pleasure descriptively indicated supportive category which provided fair (22.7%), supportive (50.0%), and very supportive (27.3%) with $M = 4.04$ and $SD = .722$

Figure 4
Bar Diagram on EFL Students' Reading for Pleasure



Note: This bar diagram showed EFL students' reading for pleasure that enhanced their personal and social imperiousness.

The EFL students' reading for pleasure might constitute what themes they read in their comfortable times. The readers empirically showed more tolerant and adapted with other readers when they had time together in online reading session. They had sense of awareness to be collaborative and openness to discuss the critical issues on Calon Arang and Lutung Kasarung folklores. Having more or less 30 minutes of reading, they showed enjoyable and flexible moments to access some relevant sources, such as digital dictionary, comparative folklores, keywords, sentences construction, and other versions of those folklores to acknowledge their reading capacity.

To extend students' online reading for pleasure, websites, song lyrics, magazines, textbooks, storybooks, newspapers (Friedman, 2018), narrative fiction, non-fiction (Alexander & Jarman, 2018), comic and picture books, social media, blogs, and graphic novels (Beam et al., 2017) can be supportably online reading sources. Reading for pleasure has personal and social imperiousness which illustrates comprehensive students' vocabulary for individual development purposes (Kamal, 2019), as well as it may enhance empathy, improve mutual relationships and well-being, and reduce the symptoms of striking depression (Willard

& Buddie, 2019). The theory-driven approach identifies ways from which students' effective application can be developed through the conceptual elaboration of digital personalization affordances in online reading (Kucirkova & Cremin, 2017). Further, reading for pleasure greatly engages students in maximizing their creative practices and services inquiry both present and future actions (Merga, 2017), intrinsically motivates them by providing supports to reading options (Wood et al., 2017), and incorporates flexibly more internet accessibility rather than merely spends reading in the classrooms (Whitten et al., 2016).

What aspects of EFL students' preferences have accommodated their online reading experience?

By reporting the results of frequencies above, herein the beneath of statistics for skewness and kurtosis attempted in corresponding with the reading habit (.042; -.368), reading frequencies and trends (-.397; -2.037), reading effectiveness (.114; -.649), and reading for pleasure (-.069; -.929). All data were inconsiderable for hundred and eighty-two ($n = 182$) EFL students when they proved online reading performance. Pointedly, data were normally distributed (Table 5).

Table 5
Descriptive Statistics of Skewness and Kurtosis' Online Reading among EFL Students

Variable	N	Min.	Max.	Mean	Std. Dev.	Skewness		Kurtosis	
	Stat.	Stat.	Stat.	Stat.	Stat.	Stat.	Std. Error	Stat.	Std. Error
Reading habits	182	3.00	5.00	3.9545	.65300	.042	.491	-.368	.953
Reading frequencies and trends	182	4.00	5.00	4.5909	.50324	-.397	.491	-2.037	.953
Reading effectiveness	182	3.00	5.00	3.9091	.68376	.114	.491	-.649	.953
Reading for pleasure	182	3.00	5.00	4.0455	.72225	-.069	.491	-.929	.953
Valid N (listwise)	182								

Note. The descriptive statistics of skewness and kurtosis' online EFL students reading reported reading habit (.042; -.368), reading frequencies and trends (-.397; -2.037), reading effectiveness (.114; -.649), and reading for pleasure (-.069; -.929) with n = 182 when they read the online selected readings of Indonesian folklores.

Further, EFL students' online reading performance established four variables in the chi-square test by describing each variable. The overall tests of chi-square's four variables were statistically significant, where reading habits ($\chi^2 = 6.636$ (2, n = 182), $p < .03$); reading frequencies and trends ($\chi^2 = .727$ (1, n = 182), $p < .39$); reading effectiveness ($\chi^2 = 4.727$ (2, n = 182), $p < .09$); and reading for pleasure ($\chi^2 = 2.818$ (2, n = 182), $p < .24$). Hence, the chi-square test for goodness of fit indicated that there was no significant difference in the proportional majority of students' online reading activity shown by a hundred and eighty-two (n = 182) sample size. It meant that students' reading habit, reading frequencies and trends, reading effectiveness, and reading for pleasure empirically stimulated and acknowledged their reading activities, although these determinants could not be generalizable. Regarding the online reading that supported this chi-square test for goodness of fit, Kannianen et al.

(2019) suggested online reading instruction should focus on effective locating and evaluation strategies to help students become more comprehensive using the relevant online texts, as well as requiring novel approaches for teaching reading strategies. Meanwhile, Stearns (2017) recommended that utilized method and thematic analysis were effective in motivating students' reading rates and critical thinking. They would be ready to read frequent times in the fullness of full awareness upon the content-rich notions, text-based structures, common sense of knowledge, fluency improvement, aiming-creating, vocabulary, phonics, writing, grammar, and spelling skills. The fullness of awareness enabled students' competence and confidence when reading more challenging themes. Further, students' collaboration seemed to be an effective effort to increase vocabulary in reading class and triggered their self-confidence in group interactions, as well as encouraged learning behaviours (Ariffin, 2021).

Table 6
Chi-Square Test for EFL Students' Online Reading Variables

	Reading habit	Reading frequencies and trends	Reading effectiveness	Reading for pleasure
Chi-Square	6.636 ^a	.727 ^a	4.727 ^a	2.818 ^a
Df	2	1	2	2
Asymp. Sig.	.03	.39	.09	.24

Note. 0 cells (.0%) have expected frequencies less than 5; the minimum cell frequency is 12.5; n = 182 upon the Chi-Square test for EFL students' online reading.

Four variables of online reading determinants were subjected to the principal components analysis (PCA). Before performing these components, data suitability for the factor analysis was examined. The inspection of the correlation matrix revealed the presence of some coefficients of .107 and above. The Kaiser Meyer-Olkin (KMO) value was .612, exceeding the recommended value of .6, and Bartlett's Test of Sphericity was $p = .000$ fulfilling the statistical significance and supported the factorability of the correlation matrix. The principal components analysis addressed the presence of four components with eigenvalue outreaching 1, determining 53%, 20.1%, 12.3%, and 8.6% of the variance respectively, as shown in Table 7. Hence,

four components in online reading could be maximized by the ICT devices towards daily teaching and learning activities as if increasing efforts to the university learning circumstances. The efforts inculcated good reading habits and encouraged participation in the reading class (Chong & Soo, 2021). The scrutiny of the scree plot discovered a definite part after passing out of four components. This was then supported by the parallel analysis results, which merely indicated two components with the eigenvalue outreaching towards the supporting criterion values for a randomly brought about the data matrix of the size provided, as four variables timed by hundred and eighty-two EFL students as the respondents.

Table 7
Principal Component Analysis of EFL Students' Online Reading

Reading Determinants	Initial Eigenvalue		Extraction Sums of Squared Loadings		Extraction Sums of Squared Loadings		
	Total	% of Variance	Cum.%	Total	% of Variance	Cum.%	Total
1. Reading habit	3.181	53.019	53.019	3.181	53.019	53.019	2.690
2. Reading frequencies and trends	1.210	20.162	73.181	1.210	20.162	73.181	1.320
3. Reading effectiveness	.740	12.338	85.519	.740	12.338	85.519	1.372
4. Reading for pleasure	.540	8.668	94.187	.540	8.668	94.187	2.061

Note. Extraction Method that derived the Principal Component Analysis. When the components were correlated, sums of squared loadings could not be added to obtain a total variance.

Moreover, another part of this factorial analysis relied on two extracted components with a total of 73.18% of the variance. Component 1 contributed 53.01%, whilst component 2 contributed 20.16%. To obtain the interpretation of these components, the oblimin rotation was determined. The rotated solution performed the presence of a simple structure with both components showing some squared loadings and four variables that loaded substantially on component 1 only. The results matched to Santos et al. (2019) interpretable components or correlations of the PCA that indicated components and variables—simply calculation through the multiple component values under the eigenvalues' square root. The interpretation of two components was coherent with the pilot results on the reading readability scale, in which component 1 definitely showed the positive effect items and component 2, whilst another component accordingly showed the negative effect

items. However, there was a weak negative correlation between the two factors ($r = -.03$). This PCA interpretation analyzed the use of both the positive and negative affect items as the separated scales as undertaken from pattern and structure matrix for principal component analysis with the Oblimin rotation of online reading platform (Table 8) and reduced the dimensionality of the datasets, increased interpretability, and minimized information loss at the same time. Conversely, it also created current uncorrelated factors which consecutively maximized the variances at hand (Jolliffe & Cadima, 2016), and performed stable for smaller sample sizes (Marrero, 2018), since this online reading performance empirically encouraged EFL students and lecturer's communication in inquiring the appropriate contributions (Sumekto & Setyawati, 2020) with each other through the online facility.

Table 8
Pattern and Structure Matrix for PCA with the Oblimin Rotation

Reading Determinants	Pattern coefficients		Structure coefficients		Communalities
	Component 1	Component 2	Component 1	Component 2	
4. Reading for pleasure	.909	N/A	.909	N/A	.735
3. Reading effectiveness	.903	N/A	.903	N/A	.740
2. Reading frequencies and trends	.363	.781	.361	.780	.686
1. Reading habits	.377	-.768	.380	-.770	.584

Note. Major loadings for each item were in boldface.

CONCLUSION

The EFL students' online reading performance accomplishes their readability in the individual accessibilities and habits to understand the contents of genres. In practice, students have equipped their learning with the technology devices, such as the smart-phone, tablet, and laptop although their preferences in using these technology devices are still various. Four online reading variables, namely: reading habits, reading frequencies and trends, reading effectiveness, and reading for pleasure have increased students' reading awareness and performance accordingly. This study addresses that the online reading empirically accommodates students' motivations and experiences since they are

supportive in reading with the technology devices, and determines lecturer' teaching designs. This empirical online reading can be a framework for designing the various types of classroom-based learning observations to examine the instructional judgments that fully involve their participation.

However, this current study realizes limitations in terms of its small sample size ($n = 182$), hence a more comprehensive study will be better conducted by involving bigger samples sizes with the multiple contributing variables on EFL students' online reading performance. Another limitation lacks the robustness of the normality assumption, variance-covariance metrics, associated error, and multivariate methods to enrich the quality of the

findings, hence students' online reading performance becomes unavailable to comprehend rigidly. The next limitation deals with a limited research site on this study (e.g.: a merely private university) without having another comparative study, therefore, this study is limited in single generalizability. This study encounters four components based on authors' reading on relating works of literature without comparing from other existing previous studies to extend students' online reading determinants.

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