

Unveiling the Relationship between Gen Alpha's Digital Nativity and Reading Motivation in Malaysian ESL Learners

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ABSTRACT

With the arrival of the Fourth Industrial Revolution, it promises the apex of digitalisation. However, brows were raised when the recent Programme for International Student Assessment (PISA) results carried out online, indicated a disparity in reading proficiency, urging the investigation of the declining reading motivation and digital capability among learners. Aligned with SDG 4, fostering reading motivation emerges as a pivotal element in language development, cognitive growth, and educational achievement. This is particularly relevant in Malaysia, where English is taught as a second language and holds strategic importance. Therefore, this study examines the level of Gen Alpha ESL learners' perceptions of their digital nativity and reading motivation, while also exploring the relationship between the same variables. Using a purposive sampling approach, 301 thirteen-year-old secondary students were chosen and asked to complete the Reading Motivation Questionnaire and the Digital Native Assessment Scale. From the findings, it was discovered that the majority of Gen Alpha ESL learners in Kota Bharu are digital natives and motivated readers, with a substantial association between perceived digital nativity and reading motivation. This study has led to the belief that in order to increase reading motivation, teachers should focus on honing students' digital skills to navigate the constantly evolving world of technology with awareness. It is therefore imperative that educators and policymakers utilise a variety of digital tools in the classroom to foster a love of reading in Generation Alpha.

Keywords: Digital nativity, Gen Alpha, English as Second Language (ESL), reading skills, reading motivation.

INTRODUCTION

The age of digitalisation has brought about numerous and ubiquitous changes in the landscape of education as the world is currently witnessing an accelerated evolution in the way humans acquire and retrieve knowledge (Miller 2023). As the tools become more accessible due to the pervasive influence of technology, it is pertinent that the educational milieu also morphs into a more dynamic and adaptive ecosystem that caters to the evolving needs of learners. Currently, in a time when technology is omnipresent in our lives, the rise of Generation Alpha further signals a paradigm shift in schooling (Jha 2020). This youngest generation, with a special affinity for technology is taking over the educational terrain (Jha 2020). Plus, with the Fourth Industrial Revolution that necessitates digital technology literacy, it calls for even more creative pedagogical techniques that are in line with Generation Alpha's technological aptitude as education takes on a new dimension (Miller 2023).

With this rapid evolution, the role of English as the lingua franca inherently plays a crucial role, which manifests the prominence of possessing the basic skills in the aforementioned language (Pozhydayeva 2019). This is because, in an interconnected world of digitalisation and urbanisation, proficiency in the English language is seen as a gateway to higher education, employment prospects, and participation in global communities (Szczepaniak-Kozak et al. 2022). Thus, recognizing the transformative power of education, UNESCO has set forth the Sustainable Development Goals (SDGs), a comprehensive framework for achieving sustainable development by 2030 ("Sustainable Development Goal 4 (SDG 4) | SDG4 Education 2030 - Global Education Cooperation Mechanism" n.d.). Among these goals, SDG Goal 4 focuses on Quality Education,

emphasising the importance of inclusive and equitable access to quality education and promoting lifelong learning opportunities for all, which can easily be achieved if learners possess good language comprehension and motivation. Due to this acknowledgement, within the framework of SDG Goal 4, fostering reading motivation emerges as a crucial component of language development, cognitive growth, and educational attainment.

In the Malaysian context, as this new digital generation, Gen Alpha takes over the topography of educational institution, and has distinguished preference, learning styles and learning approaches, teachers and educators should be prepared of what to come as the landscape of education has to shift in order to cater to this new generation's type of motivation (Tafonao et al. 2020). Nonetheless, in Malaysia, the Programme for International Student Assessment (PISA) results in 2022 unveiled a disconcerting reality as Malaysia merely scored 388 in reading, which was way below the OECD level (National Center for Education Statistics n.d.). What was even more surprising, the rank decreased compared to the result in 2018. Reports from The Star Online shed light on the magnitude of the problem, where approximately 13% of children in late primary schools lack proficiency in reading, while a staggering 50% of 15-year-old Malaysians demonstrate below-average reading capabilities (Kannan 2019). Since the tests were carried out online, this raised the question whether the problems stem from their reading skills or their digital skills. In a way, these alarming statistics highlight the urgent need to cultivate digital reading motivation among this digital generation of learners. The inability to read at their respective grade level has significant implications, as it increases the likelihood of students dropping out or failing to pursue education beyond the primary level (Kannan 2019). Moreover, the repercussions extend beyond reading alone. Proficiency in reading English is essential in today's interconnected world. When students struggle to read proficiently, it hampers their ability to excel in other subjects that rely on strong reading skills (Toste et al. 2020). This limitation hinders their overall academic performance and puts them at a disadvantage in an increasingly competitive global landscape.

In short, due to the declining result, it raises concerns whether Gen Alpha is actually digitally driven to read or not? Research by Abbas et al. (2019) and Naveed & Ghaffar (2018) indicate a correlation between digital knowledge, academic performance, and academic reading. Not only that, a study by Adeyemi & Oni (2021) emphasises the hindrance caused by a lack of digital skills, contributing to a digital divide and impeding the realisation of SDG Goal 4. Therefore, looking at the PISA result, it demands for immediate investigation in Malaysia to ensure a better understanding how digital nativity affects the reading engagement of Gen Alpha ESL learners in Malaysia. Born into a world immersed in digital technologies, Gen Alpha faces unique challenges and opportunities that shape their cognitive and behavioral patterns. This necessitates innovative reading strategies tailored to the specific needs and preferences of learners' distinguished digital literacy to reignite their enthusiasm for literature.

The study will therefore aim to:

1. To identify the level of perceived digital nativity and the level of reading motivation among Gen Alpha ESL learners.
2. To examine the linear relationship between the perceived digital nativity and reading motivation among Gen Alpha ESL learners.

LITERATURE REVIEW

Digital Nativity

In the ever-changing world of the digital era, the concept of digital nativity has arisen as an important framework, providing insights into generational inequalities in information technology (IT) ability (Nast 2017, McCrindle 2021, Gutiérrez-Ángel et al. 2022, Prensky 2001, Teo 2013). The concept of digital nativity, introduced by Marc Prensky in 2001, is a key outline that sheds light on the varying levels of information technology (IT) proficiency across generations. This term classifies individuals as either "digital natives," who grew up in the cyber age and are fluent in the language of digital technologies, or "digital immigrants," who were born before the widespread adoption of digital technologies and navigate this space with varying degrees

of comfort (Prensky 2001). The influence of digital nativity on education has become increasingly significant, prompting shifts in teaching methodologies and the integration of digital tools in classrooms.

Digital intelligence, as outlined by Lindsay (2021), encompasses not only basic digital skills but also critical thinking, digital ethics, and an understanding of cybersecurity challenges. This comprehensive understanding is vital for navigating the intricate digital landscape, which is continuously evolving with technological advancements such as artificial intelligence and the Internet of Things. In contrast, a study by Hassan (2021) reveals that students who are digitally illiterate face numerous challenges in finding reading materials and reading comprehension because their lack of skill leads to difficulties in assessing resources that are mostly free for students, and without guidance, this also prevents them from further improving their reading skills, which negatively impacts their academic performance. These problems further highlight the need of addressing digital literacy and providing students with access to digital resources, as their proclivity for technology-driven information seeking will determine whether they are adept or inept learners in the digital age. Their skill is critical because it will radically change the design and delivery of instructional content.

Thus, it can be said that the significance of digital nativity extends beyond generational classification; it serves as a lens for understanding the evolving relationship between individuals and technology (Teo, 2013). Since the world is becoming more and more dependent on digital communications, access to information and offered services, and the necessity to conduct routine activities, it is vital to learn how various generations operate in a digital landscape. Digital nativity has a significant influence in the field of education, where it affects the way of teaching, the development of the curriculum, and the demands put on new staff and new students. The interaction between digital natives and immigrants in the labour market changes the company structure, teamwork approaches, and competencies. Digital nativity is also a crucial factor in the social relationships, communication patterns, sharing of information and general engagement in digital media. Digital natives are distinguished individuals because they have been raised with technology and they have certain unique attributes such as being familiar with digital platforms, multimedia learning tendency and the inborn ability to multitask. Nonetheless, it transcends the technological familiarity and includes critical digital literacy, information processing, and flexibility to new technological devices.

To explore deeper into the complexities of digital nativity, Teo (2013) has identified key attributes distinguishing digital natives from immigrants, including growing up with technology, comfortable with multitasking, reliance on graphics for communication, and a tendency to thrive on instant gratification. Recognizing the significance of these attributes is paramount, shaping individual experiences and holding implications for education, communication, and societal paradigms in an era where digital literacy is synonymous with empowerment. Understanding digital nativity becomes imperative for informed discourse and effective navigation in the evolving landscape of technology.

Generation Alpha

Generation Alpha, born from 2010 onward, marks a significant shift in education, immersed in a world of constant connectivity and digital engagement (Nast 2017, Jha 2020, McCrindle 2021, Gutiérrez-Ángel et al. 2022). Positioned between Generation Z and a new era, Generation Alpha exhibits a distinct comfort and affinity for technology, shaping their learning preferences, expectations, and aspirations (Réz & Nagy 2023, Ziatdinov & Cilliers, 2021, McCrindle 2021). Born into a digitalized environment where screens serve various roles, including entertainment and education, these young learners are navigating a landscape defined by rapid technological change and innovation that constantly change.

However, the integration of Generation Alpha into traditional educational settings poses challenges, as noted by Maeliva and Gandha (2020). They explored the adaptability of existing educational systems to meet the needs of this technologically advanced generation. The finding is in line with Patel et al.'s study (2022) on the neuroplasticity of Generation Alpha children which emphasises their remarkable capacity to adapt to technological progress. Another research by Thompson and Patel (2021) emphasises the digital fluency of Generation Alpha, highlighting their natural ability to multitask across various digital platforms. This fluency influences their decision-making processes, leading them to prefer interactive and visual learning materials over traditional text-based methods. Next, in the aspect of social and cognitive development, the study by Lee

and Kim's study (2022) reveals potential challenges in interpersonal skills despite high competence in digital communication. Thus, as advocated by Ziatdinov & Cilliers (2021), technology inclusion in education, aligning with Generation Alpha's preference for collaborative and experiential learning deserves immediate attention. The same echo is also drummed by Gomez and Patel's study (2021), which highlights the need for a comprehensive approach that integrates traditional play-based learning with digital technologies to support holistic development. It is important that the learners are having a mindful interaction with technology (Johnson and Thompson 2022).

As Generation Alpha is expected to shape future classrooms and higher education institutions, innovative pedagogical approaches are essential (Gutiérrez-Ángel et al. 2022). Understanding their unique proficiencies and needs goes beyond acknowledging their technological prowess; it involves exploring psychological, cognitive, and neural traits (Nast 2017, McCrindle 2021). Influenced by millennial parents and immersed in a digitalized world since their early years, Generation Alpha demands a paradigm shift in education driven by technological innovation (Miller 2023). The integration of technology into the educational fabric revolutionizes instructional methodologies and the student learning experience, requiring educators to adapt strategies that align with Generation Alpha's online learning preferences and characteristics (Miller 2023).

Hence, as the torchbearers of the Fourth Industrial Revolution, Generation Alpha's career path is defined by adaptability and this necessitates regular upskilling and retraining (Gutiérrez-Ángel et al. 2022). This generation is not merely defined by chronological birth years but by distinct characteristics influenced by individualization, technology, and constant development (McCrindle 2021). Thus, in order to understand Generation Alpha, it encompasses recognizing their technological adeptness, material preferences, empowerment, and the unique challenges they might face.

Reading Motivation and Digital Nativity.

The link between digital nativity and learning motivation, particularly in the context of Generation Alpha, has been extensively explored in recent years, shedding light on the psychological and neurological dimensions of this relationship (Çoklar & Tatlı 2021, Hui et al. 2023).

1) Psychological Factor: Numerous studies have highlighted the profound impact of digital nativity on psychological aspects such as self-efficacy, beliefs, and motivation in reading (Çoklar & Tatlı 2021, Hui et al. 2023). Digital natives, deemed as familiar with digital tools from an early age, have a distinguished shape of perceptions and abilities which enable them to navigate digital reading materials (Çoklar & Tatlı 2021, Hui et al. 2023). Their early exposure to diverse digital platforms contributes significantly to the development of digital literacy skills, fostering a belief in their competence to engage with complex digital texts (Wang et al. 2019, Hui et al. 2023). Hence, the confidence that they possess in navigating digital platforms promotes a proactive approach to digital reading, making tasks seem like achievable challenges, contributing to sustained motivation (Wang et al. 2019, Genç & Köksal, 2021). Consequently, the association between technology and information access becomes fundamental to their reading goals, while particularly emphasising efficiency and immediacy (Thompson 2013, Hui et al. 2023, Cladis 2018).

Apart from that, growing up in a digitally immersive environment, digital natives tend to develop an appreciation for interactive and engaging reading experiences, aligning seamlessly with intrinsic motivation (Thompson 2013, Cladis 2018). This is due to the fact that multimedia-rich content fosters curiosity, enjoyment, and personal fulfillment, which inherently becomes a driving force behind sustained engagement and motivation with reading materials. This factor not only shapes their motivation but also material preferences. As connoted by Forzani et al (2020) and Çoklar (2021), individual preferences for diverse reading formats, including e-books and audiobooks, are influenced by the accessibility and convenience offered by digital platforms, signaling a departure from traditional print-centric choices. Thus, recognizing these preferences is crucial for educators and publishers, as adaptive personalization in reading material preferences rises with machine learning algorithms in analyzing individual reading habits (Cladis 2018).

However, despite the positive light for this generation when it comes to digital literacy and reading, challenges persist if no immediate action is taken. Some of the obstacles include shifts in cognitive skills, a proclivity for

quick information retrieval, diminished patience for deep reading, and increased reliance on technology for learning and information validation (Çoklar 2021). Apparently, efficiency and immediacy can serve as a double-edged sword; it might be quicker for them to get to their goals but it also alters their psychological condition. Not only that, the pervasive digital environment also introduces distractions like pop-ups, notifications, and hyperlinks, fostering a culture of skimming and scanning at the expense of deep, sustained reading (Hu & Yu 2021). Plus, it is already not easy for this generation, who are known for their multitasking ability. Multitasking, inherent in the digital natives' approach, may hinder cognitive processes essential for deep reading, and the quick pace conditions reduce attention spans, posing barriers to investing time in in-depth reading experiences (Hu & Yu, 2021). As they read online while multitasking due to their nature, coupled with distractions from the digital devices, this will subsequently introduce more challenges for them to stay deeply engaged with the reading materials. Korteling (2019) believes that the emergence of such problems will hinder the formation of robust memory circuits crucial for comprehension and retention. The fact that it is very easy to access information on digital platforms is also a 'no help' as it fosters a mindset of prioritizing quick information retrieval over in-depth understanding, further challenging their engagement with complex texts that demand critical analysis (Hui et al. 2023).

2) *Neurological Factor*: Apart from psychological factors, digital nativity's impact also extends to neurological factors, particularly neuroplasticity and reading patterns (Korteling 2019, Körte 2020, Cladis 2018). Neuroplasticity, the brain's capacity to reorganize itself, intertwines with reading patterns, reflecting the adaptability of cognitive structures associated with reading (Korteling 2019). Therefore, in the context of digital nativity and reading, constant exposure to digital stimuli from an early age leads to neuroplastic changes. This means that growing up in a digitally saturated environment, individuals are constantly exposed to digital stimuli from an early age, which leads to malleability in neuroplastic changes, especially in areas linked to language processing and comprehension (Nast 2017). Cladis (2018), suggest that digitally native individuals may exhibit different neural patterns when processing information from digital sources compared to traditional print. The constant exposure to multimedia elements in digital reading platforms stimulates various brain regions simultaneously, potentially rewiring neural pathways and impacting attention, memory, and comprehension processes (Turker & Hartwigsen 2021, B. Hu et al. 2022).

Next, the traditional reading behaviours, which involve linear and sequential interaction with printed material, may contrast dramatically with the nonlinear and multitasking nature of digital reading (Körte 2020). As a result, the brains of digital natives may exhibit unique patterns of neuronal activation. Thus, the impact of digital nativity on reading habits is visible in how people approach textual material. The rapid and often fragmented nature of digital content encourages a reading style that emphasises quick scanning, skimming, and non-linear navigation (Körte 2020). This reading behaviour, moulded by digital immersion, differs from the deep and contemplative engagement normally associated with printed texts. Thus, neurologically, the preferences for rapid information processing and frequent task-switching in digital natives may lead to alterations in attention spans and working memory. This is supported by a study by Eng et al. (2019) which indicates the influence of digital reading on attention and memory, revealing that continual exposure to digital stimuli may decrease attention spans and pose challenges in recalling information from longer texts. On the other hand, Patel and Thompson (2022) analyze how growing up with digital technology affects the parts of the brain responsible for language processing. They found that the areas of the brain related to language are impacted by digital nativity. This is because individuals exposed to various digital content from an early age, known as digital natives, process language differently when reading digital materials compared to printed ones. This suggests a difference in how digital stimuli influence the brain compared to traditional reading.

Therefore, based on the past studies, it is evident that students who grow up in a digital environment, armed with digital ability, possess different psychological and neurological traits when it comes to reading. Psychologically, digitally native learners tend to be more confident to read, turning tasks into achievable challenges while sustaining their motivation. However, it can be a challenge if they fail to avoid the distractions as their in-depth reading skill might be at stake. As for the neurological aspect, it was found that digitally native learners have different neurological pathways and patterns, which is parallel with the rapid and fragmented nature of digital content. In return, this leads to a reading style that prioritises quick scanning, skimming and non-linear navigation.

METHODOLOGY

Research Design

The study employed a quantitative research design, specifically adopting quantitative data collection and analysis to assess the level of perceived digital nativity and reading motivation among Gen Alpha ESL learners in Kota Bharu, Malaysia.

Research Sample

A total of 301 13 years-old Gen Alpha ESL learners from cluster schools in Kota Bharu are involved in the purposive sampling method. The participants include 188 (62.5%) females and 113 (37.5%) males with a majority (n=282, 93.8%) possessed their own technological device while 8 (2.8%) use their parents' device and 11 (3.4%) share a device with their siblings. The participants also mostly use the Internet every day (n=254, 84.1%), or at least two to four times a week (n=48, 15.9%).

Research Instrument

The study employed two questionnaires, (1) Reading Motivation Questionnaire, adapted from Guthrie et al. (1994) and (2) Digital Native Assessment Scale, adapted from Teo (2003). The Reading Motivation Questionnaire comprised of 3 composites which are Efficacy Beliefs, Goals for Reading and Reading Material Preferences while the Digital Native Assessment Scale consists of 4 measures which are Growth in Technology, Comfort at Multitasking, Reliance on Graphics and Thrive on Instant Gratification. Both tests use 1 to 4 Likert scale on likeness, with 1 = very different from me, 2 = a little different from me, 3 = a little like me, and 4 = a lot like me. The items in the questionnaire exhibited high reliability as the overall Cronbach's alpha value is 0.85, considered acceptable by Law (1987).

Data collection and Analysis procedure

The questionnaire was passed to the students' English teachers who then distributed the Google Form link to their students, with prior consent obtained from Educational Research Application System (ERAS) and school administrators. The data collection procedure then concluded after three weeks, once the number of valid responses were collected. Next, the data was downloaded and computed to SPSS version 29 to be analysed for both descriptive and inferential statistics. To answer the first research question, descriptive analyses were employed where the data were presented based on mean and standard deviation. Next, for the second research question, regression analysis was conducted to make an inferential analysis for the relationship between the level of digital nativity and reading motivation of Gen Alpha ESL learners.

RESULTS AND DISCUSSION

A. Research Question 1: To identify the level of perceived digital nativity and the level of reading motivation among Gen Alpha ESL learners.

The research was selected to interpret mean scores using Nunally's (1978) technique to ensure a consistent and objective analysis of the data.

Table 1: Level of mean interpretation

Mean Value	Level of Interpretation
1.01 – 2.00	Low
2.01 – 3.00	Moderate
3.01 – 4.00	High

The respondents' strongest agreement is indicated by the highest mean scores in each composite, whilst the respondents' moderate agreement is suggested by the lowest mean values. Nunally (1978) made his interpretation option based on the idea that greater mean values suggest a higher degree of agreement among respondents, which is a more encouraging indication for the study.

Level of Perceived Digital Nativity

The amount of perceived digital nativity among Gen Alpha ESL learners in terms of reading activity was determined by tabulating the results of several variables based on each respondent's mean score. The mean score is calculated from their replies to the Digital Native Assessment Scale (DNAS), which consists of fifteen items. Table 2 simplifies the reading based on each participant's level of digital nativity.

Table 2: Participants' degree of digital nativity

Mean Value	Level	Frequency	Percentage
1.01 – 2.00	Low	2	0.7
2.01 – 3.00	Moderate	99	32.9
3.01 – 4.00	High	200	66.4

Table 2 shows that 200 participants (66.4%) have a 'High' degree of digital nativity, 99 (32.9%) have a 'Medium' level, and just 2 participants (0.70%) have a 'Low' level. This suggests that the majority agrees with Marc Prensky's idea of digital natives, demonstrating a high level of familiarity with digital technologies, as highlighted by Teo (2013) and McCrindle (2021). McCrindle (2021) describes Gen Alpha learners as the most digitally savvy and adaptable generation, which aligns with Teo's (2013) characteristics of growing up with technology, multitasking, reliance on graphics, and expecting rapid satisfaction. Hence, in order to take advantage of this digital fluency, educators should incorporate interactive content and multimedia elements that suit the tastes of digital natives (Teo 2013, Nast 2017, McCrindle 2021).

However, 32.9% of Gen Alpha ESL learners rate themselves as 'Medium', indicating that they are comfortable with digital technology but do not have the highest skill. This necessitates a specialised approach that includes assessing specific digital skills, providing additional resources, workshops, or interventions, and gradually incorporating advanced digital learning activities to assist learners in this category.

Contrary to common assumption, 0.70% of participants perceive themselves at a 'Low' level of digital nativity, undermining the notion that all Gen Alpha persons are intrinsically digitally native. Teo (2013) proposes that, despite being a member of the digitally native generation, some people may be less confident or proficient in their digital skills due to a lack of familiarity with technology. As a result, students in the 'Low' group require targeted interventions that prioritise core digital skills and gradual exposure to diverse digital tools and platforms, as advocated by Hassan (2021), Hu & Yu (2021), and Zagkos et al. (2022). It is pertinent to recognize individual differences within a generation in order to promote inclusivity for students and to make sure the SDG Goal 4 of inclusive and equitable access to quality education and promoting lifelong learning opportunities for all is achieved.

Next, the ranking of the mean scores for the Digital Native Assessment Scale is then tabulated and presented in Table 3 below.

Table 3: Mean Ranking for Digital Native Assessment Scale

Rank	Digital Native Assessment Scale	Mean	SD	Interpre-tation
1	I am able to use more than one application on the computer at the	3.49	0.501	High

	same time to help with my reading comprehension			
2	When I study, I prefer to learn from applications that I can easily understand	3.44	0.523	High
3	I expect quick access to information when I need it	3.43	0.522	High
4	I expect the websites that I visit regularly to be constantly updated	3.42	0.527	High
5	When using the internet for reading, I am able to listen to music as well	3.36	0.725	High
6	I feel satisfied when I improve my game scores whenever I play mobile game related to vocabulary	3.30	0.646	High
7	I do not like to wait for too long for information to be given to me	3.24	0.646	High
8	When I need to know something, I search the internet first	3.22	0.640	High
9	I use pictures more than words when I wish to explain something	3.21	0.498	High
10	I am able to understand pictures better than words	3.21	0.498	High
Rank	Digital Native Assessment Scale	Mean	SD	Interpre-tation
11	I wish to be rewarded for everything I do	3.20	0.707	High
12	I use the internet every day	3.19	0.741	High
13	I enjoy playing mobile games because I want to earn more points	3.07	0.692	High
14	I use a lot of graphics and icons when I send messages (For example: emojis, stickers and GIFs).	2.86	0.839	Moderate
15	I prefer reading from my device's screen compared to printed sources	2.70	0.790	Moderate

In Table 3, the highest-ranked item has the highest mean score (mean = 3.49, SD = 0.501), demonstrating the importance of multitasking for Gen Alpha ESL learners. This item, "I am able to use more than one application on the computer at the same time to help with my reading comprehension," demonstrates their choice for understandable digital learning tools and is consistent with McCrindle's (2021) and Teo's (2013) definitions of a digital native mindset. It emphasises the importance of using many applications at the same time, highlighting the distinct qualities and behaviours of this generation, which has been shaped by constant technological engagement.

The middle ranking, the statement "When I need to know something, I search the internet first" (mean = 3.22, SD = 0.640) indicates that students rely on digital channels to find information. This further emphasises the need for information literacy abilities, as mentioned by Hassan (2021). Regardless of their digital nativity, Gen Alpha learners require instruction to appropriately evaluate online resources. Teachers should prioritise both language skills and literacy training to help students navigate the digital realm freely. Hassan's (2021) studies also show that technologically proficient readers are better at identifying and accessing online resources, which contributes to their academic achievement in blended learning.

Level of Reading Motivation

Moving on to the students' reading motivation among Gen Alpha ESL learners, the means for multiple variables from Reading Motivation Questionnaire (RMQ), which consists of 30 questions and 3 categories were tabulated. Table 4 summarises each individual's responses in determining the level of reading motivation.

Table 4: Participants' level of reading motivation

Mean Value	Level	Frequency	Percentage
1.01 – 2.00	Low	0	0
2.01 – 3.00	Medium	51	16.9
3.01 – 4.00	High	250	83.1

Table 4 shows that 250 individuals (83.1%) have 'High' reading motivation, whereas 51 participants (16.9%) have 'Medium' reading motivation. According to their RMQ responses, no student has a 'Low' level of reading motivation. This demonstrates that the majority of participants are highly motivated to read. Generation Alpha was born into a digitalized environment and is intrinsically comfortable with gadgets such as smartphones, tablets, and video games, which shapes their tastes and expectations, especially those linked to reading (Jha 2020). As mentioned by Hu & Yu (2021) in their studies, students in this age surprisingly read a lot from their social media, particularly skimming and scanning a variety of content in a short time. Thus, their strong reading motivation reflects digital adaptability, which fosters familiarity as well as a sense of autonomy and participation. As a result, Generation Alpha's reading habits are likely to extend beyond traditional media, including interactive educational apps, online resources, and visually appealing information (Jha 2020; Ziatdinov & Cilliers 2021). Hence, technology facilitates a diverse approach to reading materials, leading to a 'High' degree of reading motivation for those who enjoy interactive and visually interesting content (Jha 2020, Šramová & Pavelka 2023). This predisposition indicates the influence of their digital upbringing on their learning preferences, indicating a shift away from traditional pedagogical approaches centred on textual learning.

On the other hand, the 'Moderate' level of reading desire identified among some Generation Alpha ESL learners necessitates a more in-depth examination of specific elements influencing their psychological, cognitive, and environmental experiences. This moderation could be influenced by a variety of factors, as highlighted by Hu & Yu (2021) and Wang et al (2019b), who stated that demographics, accessibility, digital literacy, and gender could all contribute to generational variations.

Next, the ranking of the mean scores for Reading Motivation Questionnaire is then tabulated and presented in Table 5 below.

Table 5: Mean Ranking for Reading Motivation Questionnaire

Rank	Com-posite	Reading Motivation Questionnaire	Mean	SD	Interp-retation
1	GR	It is very important to me to be a good reader	3.64	0.508	High
2	GR	I like to get compliments for my reading	3.55	0.543	High
3	GR	I read to improve my grades	3.53	0.532	High
4	GR	Grades are a good way to see how well you are doing in reading	3.51	0.575	High

5	MP	I wish some mystery and sci-fi books have animations on them	3.51	0.656	High
6	GR	I look forward to finding out my reading grade	3.50	0.598	High
Rank	Com-posite	Reading Motivation Questionnaire	Mean	SD	Interp-retation
7	MP	I wish I can click on my books to know how to pronounce certain words	3.48	0.557	High
8	MP	I wish I can click on my books to know the meaning of certain words	3.48	0.557	High
9	MP	There are a lot of difficult vocabulary in factual text and non-fiction	3.48	0.557	High
10	EB	I know that I will learn more from reading	3.46	0.608	High
11	GR	I read about my hobbies to learn more about them	3.45	0.628	High
12	GR	I am willing to work hard to read better than my friends	3.43	0.496	High
13	MP	I enjoy long, involved story or fiction book	3.43	0.600	High
14	MP	I don't like reading factual text or non-fiction	3.43	0.600	High
15	GR	I like to read about new things	3.43	0.594	High
16	GR	I enjoy reading books about people in different countries	3.43	0.594	High
17	EB	If a book is interesting, I don't care how hard it is to read	3.41	0.644	High
18	GR	I read to learn new information about topics that interest me	3.40	0.566	High
19	EB	I know that I do well in reading	3.39	0.564	High
20	GR	I try to get more answers right than my friends	3.37	0.554	High
21	GR	If the teacher discusses something interesting, I might read more about it	3.37	0.554	High
22	GR	If I am reading about an interesting topic, I sometimes lose track of time	3.34	0.546	High
23	MP	If there is a game-like quiz after reading factual text, I would read it	3.34	0.581	High
24	GR	I like to know my reading marks instantly	3.34	0.631	High
25	MP	I like mysteries and sci-fi books	3.33	0.601	High

26	EB	I like it when the questions in books make me think	3.24	0.608	High
27	EB	I usually learn difficult things by reading	3.03	0.652	High
28	EB	I don't like vocabulary questions	2.26	0.722	Mode-rate
29	GR	I sometimes feel like there is no reason for me to read	2.10	0.661	Mode-rate
30	GR	I only read if I have to	2.10	0.661	Mode-rate

Based on Table 5, the highest mean score is for the item "It is very important to me to be a good reader" (mean = 3.64, SD = 0.508), which is part of the Goals for Reading (GR) composite. This finding implies that students place a high value on being a competent reader, implying that they are naturally motivated to improve their reading skills. The GR composite includes the second and third highest mean scores. "I like to get compliments for my reading" (mean = 3.55, SD = 0.543) and "I read to improve my grades" (mean = 3.53, SD = 0.532), respectively. These results indicate that pupils are driven to read for both personal and academic reasons. The composite demonstrates that students value being recognised as good readers and want recognition for their reading talents (Miller 2023). This intrinsic motivation is compatible with their upbringing in a digital environment where acknowledgement is highly prized, sometimes in the form of likes, shares, or virtual badges generated by digital technologies (Djiwandono 2019). The top-ranked items highlight their commitment to reading excellence, as well as the uniqueness of their learning goals and preferences.

In contrast, both items "I sometimes feel like there is no reason for me to read" and "I only read if I have to" reveal similar results, which are at 'Moderate' level of mean (mean=2.10, SD=0.661). This proves that the students largely were not in agreement to this. The outcome is an indication of the idea that Wang et al. 2019 and Hui et al. 2023 brought the forward regarding the way Gen Alpha is motivated in reading since this generation trust that they can read. They are also encouraged to read on their own initiative particularly when it is interactive.

D. Research Question 2: To examine the linear relationship between the perceived digital nativity and reading motivation among Gen Alpha ESL learners.

Table 6: Model summary of coefficient of determination

Model Summary ^b					
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.497 ^a	0.247	0.244	0.23681	0.247
Change Statistics					
R Square Change		F Change	df1	df2	Sig. F Change
0.247		97.836	1	299	0.000
a. Predictors: (Constant), Mean Digital Nativity					
b. Dependent Variable: Mean Reading Motivation					

The regression analysis, as shown in Table 6, reveals that perceived digital nativity and reading motivation are significantly associated in Gen Alpha ESL learners. The value of R-squared (0.247) suggests that nearly a quarter (24.7%) of the variability in reading motivation can be attributed to differences in perceived digital nativity. Consequently, as the perceived level of digital nativity increases, a positive association with higher

levels of reading motivation becomes evident. This finding advocates for targeted interventions in harnessing digital proficiency to enhance reading motivation levels among Gen Alpha ESL learners.

The intricate relationship between perceived digital nativity and reading motivation among Gen Alpha ESL learners could be contributed by the psychological and neurological factors as laid out by past research. Hence, this study provides an extended insight of what the future could hold if students are given more training to hone their digital literacy skills in this age of the Fourth Industrial Revolution. Studies made by Adeyemi & Oni (2021) imply that hurdles caused by lack of digital skills will lead to digital divide; as if we do not already have it across different generations, we do not need more in between the same generation. What makes it even more worrying, there is a correlation between digital knowledge, academic performance and academic reading (Abbas et al. 2019 and Naveed & Ghaffar 2018).

As Gen Alpha is expected to be armoured with strong digital skills from a young age, their distinguished perceptions somehow enable them to navigate around digital reading materials with ease (Çoklar & Tatlı 2021, Hui et al. 2023). Thus, it is not surprising that the finding from this study supports Wang et al. 's (2019) and Hui et al.'s (2023) notion that strong digital literacy skills harbours students' beliefs in their competence to engage with complex digital texts. They become more confident to take proactive approaches as they are able to figure their ways out in the digital landscape, making reading tasks as achievable challenges (Wang et al. 2019, Genç & Köksal, 2021). This consequently promotes the motivation to read, especially in this age, where more reading materials are readily available on the screen.

Plus, digital reading materials, unlike the conventional printed formats, offer colourful and multimedia-rich content, taking the learners to the sea of interactive reading, escalating their intrinsic motivation a notch. Thus, the stimuli coming from this digitally saturated environment has involuntarily led to different neural patterns as they process the context from digital materials in comparison to printed materials (Cladis 2018). As their brain processing become more adept to quick scanning, skimming and non-linear navigation as suggested by Korte (2020), it becomes more important than ever for educators to figure out ways on how to assist the learners in their in-depth reading as this generation of multitasking may have altered attention spans and working memory when it comes to digital materials (Eng et al. 2019). Not to mention, distractions in the form of notifications, pop-ups and hyperlinks will also put their skill for deep and sustained reading at risk (Hu & Yu 2021). Therefore, if learners of Generation Alpha are not exposed to ways on how to remove the distractions, this will persist as a challenge for them to engage with complex texts and critical analysis.

In a nutshell, although it is great that their digital competence will be able to guide them through the maze of constantly emerging digital reading materials, it is also crucial to find a balance so as not to diminish their motivation to read. The passion for reading should be nurtured since young and sustained throughout their life, not just temporarily existing when colours, interactions and rewards are available. Hence, in order to achieve this, deep reading is needed to make the activity a meaningful one, instead of a fleeting sense of entertainment and game.

CONCLUSION

The study of Gen Alpha ESL learners' digital nativity and reading motivation provides important new insights into how the digital era is changing the educational landscape. Generation Alpha, who were born and raised in the digital era, demonstrates a strong link between their motivation to read, their use of digital tools, and their digital nativity. The study divides their digital nativity into three categories (low, moderate, and high) and identifies the unique traits and reading preferences that belong to each group. This categorisation does not only highlight the heterogeneous digital landscape that Gen Alpha lives in, but also shows how digital nativity specifically shapes their motivation to read.

One interesting finding is the adaptability and durability of Gen Alpha learners across the digital nativity spectrum. Although more digital literacy is generally associated with greater drive to read, the study casts doubt on this notion as the level of digital nativity and reading motivation did not show similarity. Due to this, it uncovers a more complex relationship between digital competency and reading motivation by showing that even individuals with lesser levels of digital competency can still demonstrate admirable desire to read.

Thus, from the findings and discussions, it becomes pertinent for educators and policymakers to think about the implications, which should lead to a reassessment of teaching strategies to accommodate Gen Alpha learners' diverse digital profiles as this youngest generation today will soon dominate various level of educational landscape, from primary to tertiary. The data also proves that it is now necessary to integrate technology into learning environments as a part of the component rather than just a tool. As students have varied digital adaptability, it is crucial to modify educational materials to accommodate varying degrees of digital comfort in order to maintain inclusion in a rapidly changing digital environment. It is also made clear that teachers should not bear presumptive belief that all Generation Alpha possesses a 'High' level of digital nativity.

As for the future directions, this research particularly urges a qualitative approach in addition to quantitative data in order to achieve a thorough grasp of the Gen Alpha generation. More inclusive research that takes socioeconomic and cultural factors into account should be considered by examining a variety of populations and conducting comparative studies between urban and rural areas. This is because the longitudinal component is an essential component for further research as it offers insights into the long-term effects of digital immersion on learning and development, which would hopefully help to shape flexible and student-sensitive teaching practices and policies.

To sum up, the findings from this study clarifies the complex relationship between Gen Alpha ESL learners' digital nativity and reading motivation, yet providing insightful information for the whole education sector. This presents an opportunity to improve learning outcomes as well as to create a more stimulating and effective learning environment for coming generations. It is hoped that this research adds an important contribution to the ongoing effort of understanding how Generation Alpha interacts with the digital world by embracing the characteristics of this digitally native generation and modifying educational procedures accordingly.

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