

## Enhancing Digital Communication for Social Inclusion: Tackling English Language Proficiency Gaps in Indonesia

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### Abstract

Indonesia's struggle with English proficiency is holding back its ability to compete globally and connect with the world. This study dives into the current state of English skills in Indonesia, exploring how digital tools—like mobile apps, AI-powered platforms, gamified learning, and even virtual reality—could help turn things around. It also looks at government efforts to bring digital solutions into education. The findings show that better English skills could bring real economic boosts, and things like AI and partnerships between businesses and schools are full of potential. But there's a catch: challenges like the digital divide, spotty infrastructure, and a lack of trained teachers make it tough to roll these solutions out effectively. While tech offers exciting possibilities, leaning too heavily on it could sideline traditional teaching methods that still work well for learning languages. To make lasting progress, Indonesia needs to ensure everyone has access to these tools, invest in better infrastructure, and find a balance between cutting-edge tech and tried-and-true teaching methods that fits the country's unique context.

**Keywords:** *digital communication, english proficiency, indonesia, inclusive societies, language barriers*

### INTRODUCTION

In this digital age, communication technologies such as social media, virtual platforms, and AI-powered tools have significantly transformed how society interacts, learns, and collaborates. These advancements in digital communication help create more inclusive societies by breaking down geographical barriers, encouraging intercultural exchanges, and providing equal access to opportunities for all [1]. Nonetheless, achieving inclusivity relies on language accessibility, with English becoming the predominant language in the global digital sphere, representing more than half of the online content. For those who are not native English speakers, limited proficiency in the language poses obstacles to inclusion, hindering their ability to engage in online commerce, distance learning, and international networks [2].

This study examines Indonesia, a nation with a population exceeding 270 million, characterised by a diverse linguistic landscape comprising over 700 native dialects, where English proficiency is a challenge. According to the EF English Proficiency Index (EF EPI) 2024, Indonesia achieved a score of 468 out of 800, ranking 80th globally and 12th in Asia, below the global average of 477. This deficiency impedes digital inclusivity, as Indonesians encounter difficulties interacting with English-dominated platforms such as LinkedIn, Coursera, and

international news sources. This study aims to delineate the issues related to English language proficiency in Indonesia, their impact on digital communication, and potential solutions for fostering inclusive societies. By analysing EF EPI data from 2021-2024 alongside relevant academic literature, this study underscores the urgent need for strategic actions to enhance digital equity [3].

## **MATERIALS AND METHODS**

This research employed secondary data analysis, drawing from EF English Proficiency Index reports (2021–2024) and relevant academic literature. The EF EPI dataset, comprising 2.1–2.2 million participants annually, was analysed for national, regional, and demographic trends. Quantitative analysis included descriptive statistics and time series comparisons to assess proficiency changes over time, while qualitative thematic analysis identified recurring challenges such as the digital divide and teacher capacity issues.

Data were sourced through keyword searches (e.g., 'Indonesia score', 'gender gap', 'digital solutions') and supplemented with case studies of digital learning interventions, government education initiatives (e.g., Merdeka Belajar), and public–private partnerships. Limitations include reliance on self-reported EF EPI data, potential sampling bias, and the absence of primary data collection.

## **LITERATURE REVIEW**

In academic discussions, the significant influence of English on digital communication is often highlighted. It is argued that English's role as a global common language intensifies digital inequalities, as language skills are crucial for accessing knowledge-based economies. Language obstacles in digital spaces contribute to social inequalities, especially in developing countries. UNESCO emphasises that achieving inclusive societies requires digital integration with multilingual support; however, the dominance of English frequently sidelines those who are not proficient in it [4].

In the Indonesian milieu, investigations have revealed intricate challenges to English proficiency. Longitudinal data from the EF EPI reports (2021-2024) indicate that Indonesia's scores oscillated between 466 (2021) and 473 (2023) before descending to 468 (2024), steadfastly within the "Low Proficiency" stratum. Geographic variances are pronounced; metropolitan hubs like Surabaya (539) eclipse rural locales such as Maluku (402), mirroring disparities in infrastructural and educational provisions (EF EPI, 2024). Gender asymmetries endure, with males outperforming females by 14 points in the 18-20 cohort, tapering to 3 points beyond age 40. Temporal patterns evince post-COVID erosion in adolescent proficiency, declining from 490 (21-30 bracket) in 2023, attributable to educational interruptions.

Causal factors encompass intrinsic elements, such as reduced motivation and fear, alongside external influences, including large class sizes, insufficiently trained educators, and suboptimal learning environments. Research on digital interventions highlights mobile applications (for example, Duolingo and Cakap with 1.5 million users) and artificial intelligence tools (for example, TalkPal AI) as effective strategies, enhancing accessibility given Indonesia's 300 million mobile connections. Government initiatives, such as Merdeka Belajar, have allocated IDR 541.7 trillion for education, addressing digital infrastructure. Nevertheless, challenges such as the digital divide— characterised by inadequate rural connectivity and 25.8% of youth not engaged

in education, employment, or training—impede progress (World Bank 2022). Economic analyses correlate skill proficiency with GDP growth, forecasting a Rp 4,434 trillion increase by 2030 through enhanced skills. This analysis positions Indonesia's English language challenges in the context of digital inclusivity [5].

## **METHODOLOGY**

This study employs a secondary data analysis methodology, drawing both quantitative and qualitative insights from EF EPI reports covering the period from 2021 to 2024, in conjunction with supplementary materials related to digital interventions in Indonesia. The EF EPI dataset, encompassing 2.1 to 2.2 million participants annually, offers metrics on proficiency and demographic trends categorised by age, gender, location, and sector. The analyses concentrated on Indonesia-specific reports to evaluate overall scores (e.g. 468 in 2024), regional distinctions (e.g. Java compared to Papua), and population trends.

Data retrieval was conducted through comprehensive keyword searches within PDF files for terms such as "Indonesia score," "gender gap," and "digital solutions." This process was supplemented by reviewing relevant academic journals and reports to provide additional context. The quantitative analysis aimed to identify patterns and trends, such as changes in scores from 466 in 2021 to 468 in 2024, by employing descriptive statistics and time series analysis. This approach facilitated a more nuanced understanding of the progression of the data over time. Qualitative insights from academic sources, including causes and socioeconomic impacts, were thematically categorised to identify recurring themes, such as exclusion from digital communication, barriers to technology access, and cultural factors influencing gender disparities. The analysis also incorporates case studies and expert opinions to provide a more holistic view of the situation. Additionally, a comparative analysis with other countries in the region was conducted to contextualise Indonesia's position within the broader Asian landscape.

The research methodology adopted a thorough approach to explore Indonesia's digital gender gap. This study involved analysing policy documents and initiatives, along with a quantitative assessment of national surveys and telecommunications usage data. This quantitative aspect enables the identification of trends and patterns in digital access and usage across various demographic groups [6]. This cross-country comparison offers valuable context and highlights potential strategies for improvement [7].

This study incorporated integrating diverse data sources and analytical methods, this study provides a detailed and comprehensive understanding of the complex factors that contribute to and perpetuate the digital gender gap in Indonesia. This comprehensive approach allowed researchers to develop evidence-based recommendations for policymakers, private sector stakeholders, and civil society organisations to address this critical issue [8].

The analysis remains centred on the situation in Indonesia, in comparison with regional counterparts such as Singapore, which has a score of 609. This study is constrained by its reliance on secondary sources, which may be biased towards motivated participants. Ethical protocols were implemented to ensure accurate attribution of data and data integrity. This methodology enables a comprehensive examination of proficiency challenges and their implications for inclusivity in the classroom.

## **RESULTS AND DISCUSSION**

## 1. English Proficiency Trends In Indonesia

The EF EPI data highlights the persistent low English proficiency in Indonesia. The national scores from 2021 to 2024, shown in Table 1, display minor fluctuations within the low-proficiency range. This trend indicates minimal progress in English language skills across the country, suggesting the need for enhanced educational strategies to improve overall proficiency levels.

**Table 1. Indonesia's National English Proficiency Scores (EF EPI, 2021-2024)**

Year	Score (Out of 800)	Global Rank	Proficiency Band
2021	466	80	Low
2022	469	81	Low
2023	473	79	Low
2024	468	80	Low

These figures place Indonesia below the global benchmark and trailing Southeast Asian peers, including Singapore (609), the Philippines (570), and Malaysia (566). Territorial asymmetries are evident: Java registers 492, whereas Maluku records 402, emblematic of urban-rural schisms in digital accessibility. Urban enclaves such as Surabaya (539) and Jakarta (523) surpassed their rural counterparts, where infrastructural deficits curtailed online English immersion. Age dynamics reveal post-pandemic regressions among 18-20-year-olds (413 points), juxtaposed against elevated figures in the 21-30 segment (490). Mature cohorts (over 40 years) demonstrated constancy, implying that occupational exposure fosters enhancement.

This disparity in English proficiency scores across Indonesia reflects the complex interplay of geographical, socioeconomic, and demographic factors. The urban-rural divide is particularly striking, with major cities outperforming remote areas because of better access to educational resources, technology, and exposure to English-language media. The discrepancy between Java and Maluku exemplifies the broader challenge of equitable development across Indonesia's diverse archipelago [9].

Age-related trends provide insights into the impact of education and work experience on language proficiency. The lower scores among 18-20-year-olds may indicate disruptions in formal education during the pandemic, potentially highlighting the importance of in-person learning for language acquisition. Conversely, the higher scores in the 21-30 age group suggest that early career experiences and continued education contribute positively to English skills [10].

The stability of scores for those over 40 years underscores the role of professional environments in maintaining and improving language proficiency. This trend may also reflect the increasing importance of English in various sectors of the Indonesian economy, particularly in industries with international ties [11].

Policymakers and educators may need to consider targeted interventions to address these disparities and improve overall English proficiency. These include enhancing digital infrastructure in rural areas, developing online learning platforms tailored to different age groups, and promoting English language use in professional settings across various industries. Additionally, efforts to bridge the urban-rural divide through improved educational resources and opportunities for language immersion could help narrow the regional proficiency gap [12].

Gender disparities favour males, especially among young people; however, these differences lessen over time. This is due to deep-rooted educational biases and a lack of female representation in professional fields [13].

## 2. Problems Of English Language In Indonesia

The principal obstacles are as follows:

**Instructional Deficiencies:** Substandard methodologies, expansive class sizes (reaching 40 pupils), and inadequately credentialed instructors engender motivational deficits and trepidation. Only 20% of educators attain proficiency thresholds [14].

**Digital Schism:** Peripheral zones exhibit connectivity voids (for example, Eastern Indonesia below 450), alienating 25.8% of NEET youth from virtual instruction. Mobile ubiquity (300 million) offers avenues, yet the content remains Anglocentric [15].

**Socioeconomic Determinants:** Inferior proficiency is associated with joblessness; vocational alumni (70% employment-seeking) deficient in English for digital vocations [16].

**Cultural and Motivational Impediments:** Sparse quotidian English application and indigenous linguistic prioritisation curtail rehearsal prospects [17].

These quandaries materialise as digital ostracism: Indonesians forego global e-instruction (for example, Coursera MOOCs), occupational portals (for example, Upwork), and social discourse, thereby amplifying the existing disparities.

## 3. Impacts on Inclusive Digital Societies

Limited proficiency hinders inclusivity by restricting access to digital communication channels. In Indonesia's swiftly growing digital economy, estimated to reach Rp 4,434 trillion by 2030, English is crucial for technology and innovation. Women and those living in rural areas face greater challenges, perpetuating gender and geographical disparities. The COVID-19 pandemic exacerbated the gaps in virtual education, leading to a 50-point decline in proficiency among teenagers (EF EPI, 2022). Conversely, digital platforms like Cakap, which saw a 300% growth in 2021, and gamification, which increased motivation by 80%, demonstrate potential, although their adoption varies [18].

This discussion aligns with existing research: skill level is correlated with innovation ( $r=0.56$ , EF EPI, 2023) and the presence of competitive talent pools. Indonesia's lag behind its ASEAN peers highlights the need to align with Sustainable Development Goals in education and inclusion [19].

## 4. The Discrepancy Between Reported Grades and Actual Proficiency: Evidence of Grade Inflation

When comparing local academic records with national and regional proficiency standards, a strong argument for grade inflation becomes apparent, highlighting a significant discrepancy between reported academic success and actual language skills. An analysis of anonymized data from a high school in Samarinda (SMA Negeri 9, Class 11-5, 2024/2025 academic year) shows high English scores with an average of 85.00 among 34 students, ranging from 83 to 89. These numbers suggest a high level of proficiency, exceeding the criteria for "high" achievement in local grading systems. However, this depiction sharply contrasts with Indonesia's EF EPI scores, which

consistently place the country in the "Low Proficiency" category (468-473 out of 800 from 2021-2024), reflecting basic communication skills that are insufficient for complex digital interactions.

This discrepancy highlights grade inflation as a widespread issue, where educators increase scores to meet institutional requirements, such as minimum competency standards, or to alleviate dissatisfaction from stakeholders, including parents and administrative oversight. EFL teachers in Bandung admit to facing subtle pressures to raise grades, ostensibly to enhance student motivation; however, this practice compromises the integrity of evaluations and maintains a false appearance of academic achievement. Consequently, inflated grades create a deceptive impression of readiness, leaving graduates unprepared for global digital environments where genuine skills are crucial [20].

The analysis of nearby regions supports this argument. Singapore (EF EPI 2024:609, "Very High Proficiency"), the Philippines (570, "High Proficiency"), and Malaysia (566, "Moderate Proficiency") exhibit superior English proficiency, which correlates with enhanced digital access and economic strength. In contrast, Indonesia's inflated academic statistics, when juxtaposed with these regional disparities, expose a systemic illusion: students appear proficient on paper, yet their actual skills are lacking, hindering their participation in English-speaking digital spaces and increasing their exclusion. This façade not only diminishes educational credibility but also perpetuates socioeconomic stagnation, as new workforce entrants encounter significant skill gaps in the global context [21].

Research has deepened our understanding of ethical dilemmas, revealing that educators often consider non-cognitive elements, such as effort and participation, when assessing students. This practice, which can contribute to grade inflation, is complicated by biases and external pressures. Although these actions are defended as motivational, they compromise the objectivity and ethical standards of grading, as underscored by frameworks prioritising fairness and accuracy. Consequently, grade inflation has become a widespread issue, distorting reality and hindering the development of inclusive digital societies by fostering a false sense of competence despite actual deficiencies [22].

## CONCLUSION

Indonesia's low English proficiency is a real hurdle in creating a truly inclusive digital society. It's clear in the educational gaps and social exclusion many face. The EF English Proficiency Index shows progress has been flat, and the digital divide is only widening these disparities. As the world leans more into digital spaces, not knowing English makes it tougher to access information or seize online opportunities. To turn this around, weaving digital tools into initiatives like Merdeka Belajar is crucial—think better infrastructure and more support for teachers. But it's not just about tech; solutions need to respect Indonesia's rich linguistic diversity and cultural nuances. Bringing together schools, tech companies, and the government is essential to crack this challenge. Boosting English skills can open doors to better digital communication, global competitiveness, and even attract investment, while helping people share knowledge and climb the socioeconomic ladder. Looking ahead, we need research to dig into how well these digital learning programs work across different groups and how English skills tie to economic growth and digital know-how. Exploring new tech to tackle old-school language learning barriers is also worth a shot.

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## REFERENCES

- [1] D. Naik, "The influence of social media on public opinion in the digital age," *EPRA*, pp. 771–774, Jun. 2025, doi: 10.36713/epra22452.
- [2] A. Alberth, "How important is communicating with native English speakers to EFL learners' self-confidence in their English language proficiency?," *Journey*, vol. 6, no. 2, pp. 380–393, Jul. 2023, doi: 10.33503/journey.v6i2.3169.
- [3] B. Endarto, "The urgent need for blue bond regulation in Indonesia," *Juridical Tribune - RCIL*, vol. 14, no. 4, pp. 530–546, Dec. 2024, doi: 10.62768/tbj/2024/14/4/01.
- [4] O. Duraipandi and A. A. A. Murugan, "Role of digital communication in learning the English language," *RRRJ*, vol. 3, no. 1, pp. 258–273, Jun. 2024, doi: 10.36548/rrrj.2024.1.017.
- [5] A. Uyar, "Effective use of artificial intelligence tools in STEM education: Perspectives of STEM educators," *JBSE*, vol. 24, no. 3, pp. 552–566, Jun. 2025, doi: 10.33225/jbse/25.24.552.
- [6] J. Wahid, J. Ho, B. T. Y. Cheng, M. Ibrahim, and T. C. Nam, "Analysing library usage patterns: A visual exploration of book loan and room reservation trends," *JSDS*, pp. 154–172, Apr. 2024, doi: 10.32890/jdsd2024.2.1.10.
- [7] S. Bahagijo, B. Tua, Y. E. Prasetyo, A. D. Eridani, and D. Kawuryan, "Closing the digital gender gap in Indonesia through the roles and initiatives of civil society organizations," *Jurnal Ilmu Sosial*, vol. 21, no. 1, pp. 14–38, Jan. 2022, doi: 10.14710/jis.21.1.2022.14-38.
- [8] Z. Yuan, "Analysis of the dilemma of women facing the digital gender gap under the digital economy," *JISEM*, vol. 10, no. 27s, pp. 473–479, Mar. 2025, doi: 10.52783/jisem.v10i27s.4432.
- [9] A. Adam, S. Takim, R. Tidore, N. Buamona, A. Agus, and K. Rajabi, "Digital divide in education in North Maluku: The technology gap between cities and villages," *Soc. Econ. Hum. Aspects Town. Ind.*, vol. 3, no. 1, pp. 130–139, Jan. 2025, doi: 10.59535/sehati.v3i1.451.
- [10] Y. Li, R. Liao, and D. Zhong, "From theory to practice: Assessing the impact of innovative English teaching on college students' language proficiency," *Innovation: The European Journal of Social Science Research*, vol. ahead-of-print, no. ahead-of-print, pp. 1–22, Feb. 2025, doi: 10.1080/13511610.2025.2453707.
- [11] X. Yan, P.-L. Chuang, and C. Zhang, "Economic return of English language proficiency: Do English proficiency scores predict employee income in China?," *SiLA*, pp. 108–140, Sept. 2024, doi: 10.58379/dldi3148.
- [12] S. R. Foster and C. P. Gillette, "Can micropolitan areas bridge the urban-rural divide?," *Theoretical Inquiries in Law*, vol. 24, no. 2, pp. 93–117, Jul. 2023, doi: 10.1515/til-2023-0017.
- [13] A. Dweik, H. Dweik, H. Mian, M. Mohan, C. Schinke, and S. Al Hadidi, "Gender disparities in multiple myeloma publications," *eJHaem*, vol. 3, no. 3, pp. 966–969, Jun. 2022, doi: 10.1002/jha2.470.
- [14] D. O. Decrepito, Jr. and E. M. M. Ph.D., D. M., "Educators' instructional strategies, learning environment and performance," *IJSMS*, pp. 26–38, Jan. 2025, doi: 10.51386/25815946/ijms-v8i1p104.
- [15] H. Hardiani, Y. Yulmardi, and N. D. Maisyarah, "Exploring the determinants of NEET youth in Jambi Province: A socioeconomic perspective," *JES*, vol. 11, no. 1, pp. 31–44, Apr. 2023, doi: 10.22437/ppd.v11i1.22074.
- [16] E. Roldán González, P. R. Lerma Castaño, G. Bonilla Santos, A. Y. Aranda Zemanate, and Á. G. Caicedo Muñoz, "Healthy lifestyles associated with socioeconomic determinants in the older adult population," *J. Prim. Care Community Health*, vol. 13, no. 3, p. 215013192211128, Jan. 2022, doi: 10.1177/21501319221112808.

- [17] A. D. C. Lizardo Perez, R. Rodriguez Bastarmerito, F. J. Martinez Romero, S. G. Gomez Jimenez, and A. D. R. Pulido Tellez, "Cultural center for indigenous languages: Education for the care of the national cultural and linguistic heritage," *Association of Technology Education Development*, Nov. 2022, doi: 10.21125/iceri.2022.1571.
- [18] M. D. Anggraeni, R. Setiyani, E. Triyanto, A. Iskandar, D. Nani, and A. Fatoni, "Exploring the antenatal care challenges faced during the COVID-19 pandemic in rural areas of Indonesia: A qualitative study," *BMC Pregnancy Childbirth*, vol. 23, no. 1, Mar. 2023, doi: 10.1186/s12884-023-05495-8.
- [19] J. Jungo, A. Botelho, and M. Madaleno, "The effect of financial inclusion on the sustainable development goals," *IGI Global*, 2024, pp. 1–17, doi: 10.4018/979-8-3693-0522-5.ch001.
- [20] M. A. Arrafii, "Grades and grade inflation: Exploring teachers' grading practices in Indonesian EFL secondary school classrooms," *Pedagogy, Culture & Society*, vol. 28, no. 3, pp. 477–499, Sept. 2019, doi: 10.1080/14681366.2019.1663246.
- [21] R. A. Sabri and R. Hamid, "Socioeconomic status and motivation effect on students' English speaking skill," *IJELAL*, vol. 3, no. 2, pp. 141–153, Jul. 2023, doi: 10.21111/ijelal.v3i2.10117.
- [22] S. L. Baglione, Z. Smith, and O. Roach, "Grade inflation: Graduate students' perspective," *Educational Research and Evaluation*, vol. 30, no. 1–2, pp. 115–136, Nov. 2024, doi: 10.1080/13803611.2024.2422617.