

Investigating Skill-Based Constraints in the TOEFL Test: A Quantitative Study of University EFL Learners in Ecuador, South America

Zulema Izamar Peña Alvarez^{1*}, Sonia Jannet Peña Alvarez¹

¹Universidad Nacional de Educación

Corresponding Author: Zulema Izamar Peña Alvarez^{1*}

Abstract

This study investigated skill-based constraints affecting TOEFL ITP performance among university EFL learners in Ecuador, South America. Based on the componential models of communicative competence, the research examined the predictive effects of reading comprehension constraints (RC), grammatical constraints (GC), and listening processing constraints (LC) on TOEFL total scores (TTS). A quantitative research design was used with a stratified sample of 300 non-English major undergraduates. Data were collected with the use of a structured Likert-scale questionnaire and matched with the official TOEFL ITP scores. Reliability analysis indicated excellent internal consistency (Cronbach's $\alpha = .940$). Pearson correlation and multiple regression analyses were conducted with the use of SPSS (Version 26). Results revealed a strong overall model fit ($R^2 = .839$, $p < .001$), signifying 83.9% of the variance in TOEFL scores. Listening constraints were one of the strongest predictors ($\beta = .644$, $p < .001$), followed by grammatical constraints ($\beta = .238$, $p < .001$), but reading constraints did not show a significant independent predictive effect. The findings confirmed the multidimensional nature of language proficiency and highlighted listening and grammar as key determinants of standardized test performance. The study provided empirical evidence for targeted TOEFL preparation strategies and contributes to predictive modeling research in EFL assessment contexts.

Keywords: TOEFL, English proficiency, university, Ecuador, South America,

Introduction

High-stakes English proficiency examinations are extensive benchmarks regarding academic admission, international scholarship eligibility, and graduate qualifications in non-native English contexts (Shirzadi, 2025). TOEFL is an example of such standardized tests, which evaluate many language domains, for instance, reading, writing, listening, and speaking, following strict time and format terms (Bakri, 2022). According to Ali (2023), performance in these assessments even reflects not just general language knowledge but the familiarity of learners with test formats, strategic processing, along with the particular skill competences like vocabulary and reading approaches. This complexity can develop various performance challenges among English as a Foreign Language (EFL) learners (Zarnis et al., 2023).

Though English proficiency is highly recognized as a core academic and professional asset in Ecuador, research in Ecuadorian EFL contexts has mainly focused on general English learning challenges, curriculum implementation, classroom instruction, and specific individual skill difficulties instead of predictive modeling of standardized test performance. Research in Ecuador shows that these factors impede the development of core English skills like reading, listening, speaking, and grammar, which are essential for success in international standardized tests such as TOEFL (Abad et al., 2019). However, to date there is no empirical research in the Ecuadorian context that systematically examines skill-based constraints as predictors of TOEFL test performance, indicating a significant gap in the literature and highlighting the need for predictive quantitative studies in this area (Alkayed et al., 2023).

Investigating Skill-Based Constraints in the TOEFL Test: A Quantitative Study of University EFL Learners in Ecuador, South America

This study hence assesses skill-based constraints in TOEFL examinations among university EFL learners in Ecuador, South America, where universities with a diverse student population that prepares for the international standardized tests as part of graduation or even postgraduate requirements. The objectives of the study are to (1) explain the prevalent skill challenges among South American university EFL learners, (2) identify variables that significantly predict standardized English test outcomes, and (3) share recommendations for mitigating skill-based constraints in TOEFL examinations. The key research question of this study is: To what extent do reading, grammatical, and listening constraints predict TOEFL ITP total scores among university EFL learners in Ecuador, South America?

Grounding the investigation in the documented analysis of South American EFL performance challenges and using robust quantitative methods, this study significantly contributes to the new empirical evidence on language assessment research (Rawashdeh & Idris, 2025). It also offers actionable insights for EFL curriculum design, along with the targeted test preparation interventions in the contexts where high-stakes English testing affects the academic trajectories.

Literature review

Recent scholarship in language assessment tends to conceptualize performance in high-stakes English proficiency examinations as a multidimensional construct affected by linguistic competence, demands of cognitive processing, and strategic test behaviour (ShayesteFar, 2020). Research published after 2020 highlights that standardized tests like TOEFL measure not just discrete language skills but also the ability of learners to manage time constraints, understand complex input, use grammatical knowledge precisely, and regulate affective factors like anxiety (Papi & Khajavy, 2023; Radzuan et al., 2025). Moreover, difficulties in reading comprehension even stem from limited academic vocabulary and poor strategy use, while writing and structure components are linked with syntactic complexity plus grammatical control (Papi & Khajavy, 2023). Though much of this literature is descriptive or emphasises single test sections instead of modeling the relative contribution of different skill domains to the overall test outcomes (Ghorbanpoor et al., 2026).

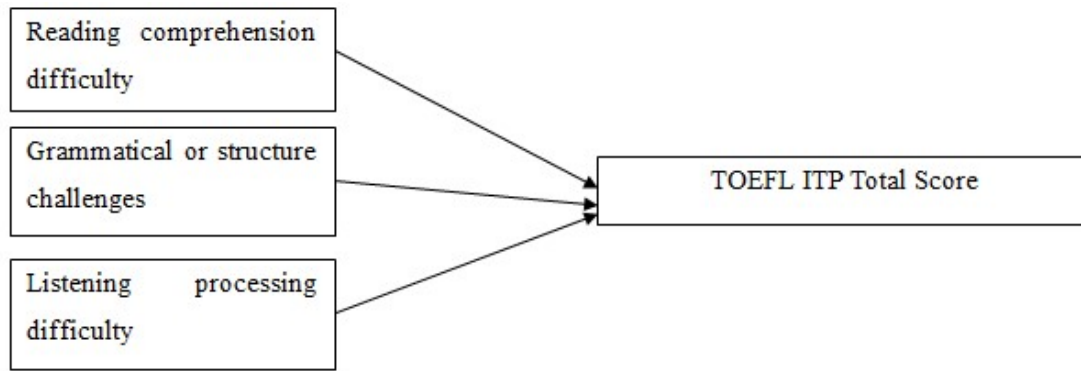
Theoretical framework

This study is grounded in componential models of language proficiency, particularly the framework proposed by Canale and Swain (1980) and later expanded by Bachman (1990) (Dibekulu, 2020). These models conceptualize language ability as consisting of distinct but interrelated components, including grammatical competence, discourse competence, and strategic competence (Congmin, 2023).

In the context of standardized testing such as TOEFL ITP, performance is assumed to reflect the cumulative functioning of discrete linguistic competencies under time constraints (Dibekulu, 2020; Congmin, 2023). Reading comprehension tasks require lexical knowledge, inferencing ability, and discourse processing (McNamara, 2021, Qusef et al., 2025). Structure and Written Expression tasks rely heavily on grammatical competence, including syntactic accuracy and morphological control (Isakova, 2025). Listening sections demand real-time processing and comprehension of spoken input (POLISHCHUK, 2025). Therefore, TOEFL total score can be conceptualized as an observable indicator of underlying linguistic competencies. Skill-based constraints in reading, grammar, and listening are thus theoretically expected to negatively predict TOEFL performance.

Conceptual Framework

The conceptual framework of this study includes discrete skill-based constraints as the independent variables, whereas TOEFL ITP Total Score is the dependent variable. Particularly, difficulty in reading comprehension, grammatical or structure challenges, and difficulty in listening processing, are modeled to be the predictors. This framework shows a predictive-explanatory quantitative model, according to which skill-based factors are assessed collectively instead of in isolation.



Research gaps

Despite national efforts to improve English proficiency in higher education and the increasing strategic value of English for academic and professional mobility in Ecuador, many EFL learners continue to face significant language learning challenges (Sevy-Biloon et al., 2020). These include limited instructional time, inadequate materials, and low overall proficiency levels (Sevy-Biloon et al., 2020). For instance, studies have assessed factors impeding English language teaching and learning in Ecuadorian schools, like pedagogical limitations, instructional time reduction ((Tenesaca & Argudo Serrano, 2025, Alomari et al., 2023). Moreover, there were curriculum challenges too, for instance teaching resources, infrastructure, and curriculum implementation issues, which affect overall language competence (Tenesaca & Argudo Serrano, 2025).

Abad et al. (2019) has worked on the individual skill difficulties like challenges in developing writing or speaking skills amongst EFL learners, identifying grammar, vocabulary, and affective limitations which impede skill development. Al-Ezzi & Al-Qudah, 2023, these studies overall highlight skill-based and systemic barriers in English language learning in Ecuador, but they do not analyze specifically how discrete skill-based constraints can predict performance on the TOEFL examination which is one of the high-stakes proficiency tests widely used for academic progression and international opportunities.

Moreover, as English proficiency outcomes and individual learner differences have been examined in some university student populations like proficiency levels of pre-service teachers (Abad et al., 2019), these analyses do not extend to the standardized test results or predictive relationships between skill limitations and TOEFL scores. It indicates a clear research gap that there is a lack of empirical research which systematically models the effects of discrete skill constraints (reading, grammatical knowledge, and listening processing) on standardized English test performance in the Ecuadorian higher education context (Baki et al., 2025). Addressing this gap can inform more targeted instructional strategies and policy decisions to improve English proficiency outcomes and test preparation practices.

Hypothesis development

Considering the theoretical framework and preceding empirical findings, the following hypotheses are considered,

H1: Reading comprehension constraints significantly predict TOEFL ITP total score.

H2: Grammatical constraints significantly predict TOEFL ITP total score.

H3: Listening processing constraints significantly predict TOEFL ITP total score.

Methods

Research Design

This study conducted a quantitative research design for investigating the predictive relationships between skill-led constraints and performance in high-stakes English proficiency examinations amongst the university EFL learners. This design links with contemporary applied linguistics research focusing on the construct validation and predictive modeling in language assessment contexts.

Study Setting

The research was conducted at a public university in Ecuador, South America, with a diverse student population who are enrolled in undergraduate programs across different disciplines. The university needs students to obtain a minimum English proficiency score, such as an institutional TOEFL equivalent, as part of graduation or academic progression requirements. English is taught as a compulsory subject in early semesters, and students regularly prepare for the standardized tests to meet the institutional benchmarks or pursue international academic opportunities. This setting gives a relevant and authentic context to examine skill-based constraints linked with high-stakes English testing.

Participants

The participants comprised undergraduate students who are enrolled in non-English major programs, preparing for or having recently taken a standardized English proficiency examination. The sample population included 300 students to ensure adequate statistical power. Participants represented diverse academic disciplines, including business, engineering, social sciences, and education.

Sampling Method

A stratified random sampling approach was used to ensure the representation across different faculties, including academic levels. Faculties were treated as strata, whereas participants were selected randomly from each department to reduce sampling bias. This method improved the representativeness and enhanced the generalizability of findings in the institutional context. When the full randomization was not feasible because of administrative constraints, a proportionate convenience sampling strategy was used while maintaining diversity across the academic disciplines.

Data Collection Instruments

The study used a structured self-report questionnaire based on established constructs in the language assessment literature. The instrument measured the four main domains: reading comprehension constraints, grammatical/structure constraints, and listening processing constraints. All the domains consisted of Likert-scale items (1 = Strongly Disagree to 5 = Strongly Agree). Items were made for capturing the perceived difficulties regarding vocabulary knowledge, time management, syntactic processing, listening speed, accent comprehension, hesitation in fluency, and test-based anxiety. Although the independent variables are self-reported constraints, prior research suggests perceived difficulty reflects underlying linguistic limitations that may influence objective test performance.

Procedure

Data collection was done over four weeks in the academic semester. After attaining institutional approval, students were asked to participate voluntarily. The purpose of the study was defined, and informed consent was obtained before participation. The questionnaire was shared in paper-based format during the scheduled sessions and electronically through a secure online platform. Participants needed about 20–25 minutes to complete the survey. Test score data were also matched to questionnaire responses with the use of anonymized identification codes to ensure confidentiality. All responses were screened for completeness before data entry into SPSS.

Materials Used

The primary materials were the validated skill-based constraints questionnaire as well as official

standardized English proficiency test score reports. SPSS software (Version 26) was used to do data entry, coding, and statistical analysis. A data codebook was made for defining the variable labels and measurement scales, along with the coding procedures. Reliability outputs, correlation matrices, and regression tables were generated with the use of SPSS statistical functions.

Data Analysis Methods

Data analysis included,

Frequency analysis

Demographic analysis was conducted by measuring the frequencies of each demographic variable.

Multiple Regression Analysis

A standard multiple regression analysis was conducted to examine the predictive effects of reading comprehension constraints (RC), grammatical constraints (GC), and listening processing constraints (LC) on TOEFL total score.

Pearson Correlation Analysis

Bivariate correlations were conducted to examine the strength and direction of relationships between each independent variable and the dependent variable.

Reliability Analysis

Cronbach's alpha coefficients were calculated for all the skill-based constraint domains to ensure the internal consistency reliability.

Ethical Considerations

Ethical approval was obtained from the research ethics committee of the university before the data collection process. Participation was voluntary, whereas students were informed of their right to withdraw whenever they wanted without academic consequences. Informed consent was taken in written or electronic form. Confidentiality was maintained strictly by anonymizing participant data and giving identification codes rather than names. Test scores were solely used for research purposes and securely stored. No sensitive personal information was attained beyond demographic variables needed for analysis. All procedures adhered to the principles of academic integrity, transparency, and responsible research conduct.

Results

Demographic analysis

Table 1 Demographic

Variable	Category	Frequency (n)	Percentage (%)
Gender	Male	147	49.0
	Female	153	51.0
Age Group	18–19 years	79	26.3
	20–21 years	117	39.0
	22–23 years	72	24.0
	24 years and above	32	10.7
Department	Department of Engineering	79	26.3
	Department of Business and Economics	117	39.0
	Department of Social Sciences and Humanities	72	24.0
	Department of Education	32	10.7

Year of Study	Year 1	79	26.3
	Year 2	117	39.0
	Year 3	72	24.0
	Year 4	32	10.7
TOEFL ITP	310–399	104	34.7
	400–499	77	25.7
	500–549	83	27.7
	550–677	36	12.0

Regression analysis

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.916 ^a	.839	.837	.296919392892729

a. Predictors: (Constant), LC, GC, RC

Table 3 ANOVA

	Model	Sum of Squares	df	Mean Square	F	Sig.
1	Regression	135.702	3	45.234	513.084	.000 ^b
	Residual	26.096	296	.088		
	Total	161.798	299			
a. Dependent Variable: TTS						
b. Predictors: (Constant), LC, GC, RC						

Table 4 Coefficient

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	-.030	.096		-.312	.756
	RC	.097	.117	.091	.832	.406
	GC	.200	.028	.238	7.196	.000
	LC	.703	.118	.644	5.966	.000
a. Dependent Variable: TTS						

Table 4 is of coefficient which shows that LC and GC can significantly predict TTS as the value of p for both is 0.000, having LC as the strongest predictor. However, the value of p for RC is 0.406 which means it is not significant.

Correlation analysis

Table 5 Correlation

		RC	GC	LC	TTS
RC	Pearson Correlation	1	.706**	.976**	.888**
	Sig. (2-tailed)		.000	.000	.000
	N	300	300	300	300
GC	Pearson Correlation	.706**	1	.699**	.752**
	Sig. (2-tailed)	.000		.000	.000
	N	300	300	300	300
LC	Pearson Correlation	.976**	.699**	1	.899**
	Sig. (2-tailed)	.000	.000		.000
	N	300	300	300	300
TTS	Pearson Correlation	.888**	.752**	.899**	1
	Sig. (2-tailed)	.000	.000	.000	
	N	300	300	300	300

** . Correlation is significant at the 0.01 level (2-tailed).

Table 5 shows a correlation proving that all the variables have strong, positive, and significant correlations, as $p < 0.01$. TTS is highly correlated with LC 0.899, followed by RC 0.888 and GC 0.752.

Reliability statistics

Table 6 Reliability Statistics

Cronbach's Alpha	N of Items
.940	4

Table 6 is of reliability, which proves that the scale demonstrated excellent internal consistency since the value of Cronbach's $\alpha = 0.940$.

Discussion

The present study assessed skill-based constraints in TOEFL ITP performance amongst South American university EFL learners using a predictive quantitative framework. The findings confirmed that TOEFL performance is strongly linked with fundamental linguistic constraints, and all the objectives of the study were achieved. The descriptive results proved that most of the students were concentrated in the lower to mid proficiency bands (310–499), which indicated continuous academic English challenges. It aligns with preceding South American research like Wicaksono et al. (2025) proving that university EFL learners even struggle with the vocabulary range, syntactic complexity, and the listening speed in the standardized testing contexts, for example, studies on TOEFL reading and structure difficulties amongst South American undergraduates. These findings are consistent with wider international research proving that EFL learners in non-native contexts experience measurable linguistic barriers in high-stakes proficiency tests (Ahmad et al., 2025).

The regression model described 83.9% of the variance in TOEFL total scores ($R^2 = .839$), which indicated a very strong predictive relationship between the skill-based constraints and test performance. The finding strongly supported componential models of communicative competence that were proposed by Canale and Swain and later discussed by Bachman, who theorized language proficiency as an interaction of grammatical competence, strategic competence, and discourse competence. The strong model fit confirmed that TOEFL performance reflected the cumulative functioning of such underlying competencies instead of the isolated skill performance.

Listening constraints were one of the strongest predictors of TOEFL scores as $p < .001$. This finding is supported by the recent language assessment research focusing on the cognitive complexity of listening comprehension in the standardized tests. Trang (2021) argued that listening involved rapid lexical access, processing of working memory, inferencing, as well as instant interpretation without the opportunity for review. In the high-stakes tests like TOEFL ITP, the time-bound as well as non-repeatable nature of listening input increases the cognitive load. Luke Harding & Brunfaut (2022) even explained that listening performance is highly sensitive to processing speed and decoding accuracy, mainly for EFL learners having limited exposure to authentic spoken English. The strong predictive power of listening constraints in this study thus aligns with theoretical as well as empirical accounts, which position listening as one of the highly cognitively demanding language skills (Darwish et al., 2025).

Grammatical constraints also predicted TOEFL performance significantly, as $p < .001$. This finding supports preceding South American studies reporting that the learners frequently face difficulties with clause structure, consistency in tenses, prepositions, and pronoun reference in the TOEFL Structure and Written Expression sections. Referring to a theoretical perspective, Bachman's (1990) model identified grammatical competence as a key component of language ability, underlying both receptive and productive skills. Empirical research has constantly demonstrated that grammatical accuracy significantly correlates with the standardized test outcomes, as syntax supports reading comprehension along with the listening interpretation (Vafae & Suzuki, 2020). For instance, Johnson & Tabari (2025) emphasized that grammatical knowledge affects comprehension while facilitating sentence parsing, including meaning construction. Hence, in this study, the significant predictive role of grammatical constraints is consistent with the established literature.

However, reading constraints did not predict TOEFL scores independently in the regression model, though they were strongly correlated with TOEFL performance ($r = .888$). It suggests overlapping variance amongst predictors, mainly given the extremely high correlation between reading and listening constraints ($r = .976$). This multicollinearity specifies that such skills share underlying cognitive-linguistic mechanisms. Reading comprehension depends upon vocabulary knowledge, syntactic parsing, inferencing approaches, and discourse processing, which are also central to listening comprehension (Zhang, 2022). Dibbley (2022) argued that reading in academic contexts is mainly dependent on linguistic processing efficiency along with strategic competence. Thus, the non-significant regression result does not oppose existing research but instead demonstrates the interdependent nature of language skills when simultaneously modeled.

The correlation analysis proved strong and significant relationships among all variables ($p < .01$), which reinforced the multidimensional nature of language proficiency. The findings aligned with integrated skill perspectives in applied linguistics, emphasizing that language abilities operate interactively instead of independently. The strong intercorrelations empirically validate the communicative competence theory, proving that reading, grammar, and listening are linked components contributing to the overall proficiency.

The reliability analysis proved excellent internal consistency (Cronbach's $\alpha = .940$), which indicated that the measurement instrument was stable as well as coherent. High reliability strengthened confidence in the validity of the findings, whereas it supported the argument that perceived constraints meaningfully reflected actual linguistic limitations. Preceding research in language testing suggests that self-reported difficulties of learners even correspond to the objective performance outcomes, mainly in structured testing contexts (Ober et al., 2021).

Regarding the hypotheses of the study, H2 (grammatical constraints significantly predict TOEFL scores) and H3 (listening constraints significantly predict TOEFL scores) were supported. However, H1 (reading constraints significantly predict TOEFL scores) was not supported in the regression model but was supported at the correlational level. Hence, the study partially proved the hypothesized relationships.

Recommendations

Pedagogically, the results suggested that TOEFL preparation programs in South American universities should give priority to listening strategy development and systematic grammar reinforcement (Zhang, 2022). Listening training must include exposure to the varied accents, note-taking strategies, and real-time processing exercises (Vafaei & Suzuki, 2020). Grammar instruction must pay heed to syntactic awareness, clause relationships, and error recognition in the structured formats (Dibbley, 2022). Though reading did not evolve as an independent predictor, its strong correlations recommend that integrated skill instruction remains vital.

Conclusion

This study assessed the predictive effects of reading, grammatical, and listening constraints on TOEFL ITP performance among South American university EFL learners. The results proved a strong predictive model, with listening and grammatical constraints significantly affecting total scores, while reading constraints had strong correlations but no independent predictive effect. The findings confirmed the multidimensional nature of language proficiency and support componential theories of communicative competence. Thus, the study attained its objectives by identifying key skill-based barriers and quantifying their relative impact. The research contributes empirical evidence to language assessment literature and offers data-driven direction for improving TOEFL preparation practices in higher education contexts.

Implications

The findings carried theoretical, pedagogical, and assessment implications. Theoretically, the results reinforced multidimensional models of language proficiency, confirming the interrelated functioning of linguistic competencies in the standardized testing (Min & Aryadoust, 2021). Pedagogically, institutions must adopt skill-prioritized TOEFL preparation curricula, having a stronger emphasis on listening, processing, and grammar mastery (Bakri, 2022). Assessment designers may even consider the integration of the diagnostic sub-skill profiling to support the targeted intervention. For policymakers in higher education, the results highlighted the need for systematic language support programs before high-stakes proficiency requirements (Ali, 2023). In addition, the strong predictive power of skill constraints suggests that enhancement in the core linguistic competencies may considerably enhance standardized test outcomes in EFL contexts (Zarnis et al., 2023).

Limitations

Apart from its contributions, this study has many limitations. First, the data were gathered from a single public university in Ecuador, which may limit generalizability to other South American or international contexts. The skill-based constraints were measured by the self-reported questionnaires, which may have a perception bias. In addition, the study emphasised only TOEFL ITP and did not have any other productive skills, such as speaking and writing. Future research must use multi-institutional samples, objective skill assessments, and advanced modeling techniques such as structural equation modeling.

Declarations

Ethics Approval and Consent to Participate

Ethical approval for this study was obtained from the Research Ethics Committee of the participating public university in Ecuador, South America. All procedures were conducted in accordance with institutional research guidelines and ethical standards. Participation was voluntary, and informed consent was obtained from all participants prior to data collection. Participants were informed of their right to withdraw at any time without academic consequences.

Consent for Publication

Not applicable.

Availability of Data and Materials

The datasets generated and analyzed during the current study are available from the corresponding author upon reasonable request.

Competing Interests

The authors declare that they have no competing financial or non-financial interests related to this study.

Funding

This research received no specific grant from any funding agency in the public, commercial, or not-for-profit sectors.

Acknowledgements

The authors would like to thank the participating students and faculty members for their cooperation and support during the data collection process.

References

- Abad, M., Argudo, J., Fajardo-Dack, T., & Cabrera, H. (2019). English proficiency and learner individual differences: A study of pre-service EFL student-teachers. *Maskana*, 10(1), 1–9. <https://doi.org/10.18537/mskn.10.01.01>
- Ahmad, M., Haider, A. S., & Saed, H. . (2025). Assessing AI-driven dubbing websites: Reactions of Arabic native speakers to AI-dubbed English videos in Arabic. *Research Journal in Advanced Humanities*, 6(1). <https://doi.org/10.58256/64dz1c72>
- Al-Ezzi, R., & Al-Qudah, I. (2023). English translation of verbal humour in Egyptian comedy films. *World Journal of English Language*, 14(1), 157. <https://doi.org/10.5430/wjel.v14n1p157>
- Ali, S. W. (2023). EFL students' problems and strategies in TOEFL test. <https://doi.org/10.46870/lets.v4i2.510>
- Alkayed, M., Almasalha, F., Hijjawi, M., & Qutqut, M. H. (2023). *Factors Analysis Affecting Academic Achievement of Undergraduate Student: A study on Faculty of Information Technology Students at Applied Science Private University*. <https://www.semanticscholar.org/paper/Factors-Analysis-Affecting-Academic-Achievement-of-Alkayed-Almasalha/37cd1e6e5c5425c4590653cacc5c05e46d5fca1e>
- Alomari, M. A., Khabour, O. F., Alzoubi, K. H., & Aburub, A. (2023). The impact of COVID-19 confinement on reading behavior. *United Arab Emirates - Ministry of Health and Prevention*. <https://doi.org/10.2174/issn-vxx-yymdd-2022-42>
- Baki, Hanan & Jaradat, Abdulazeez & Haider, Ahmad. (2025). Reaching Arab Consumers Through Dubbing English Advertisements into Arabic. 10.1007/978-3-031-84889-6_24.
- Bakri, H. (2022). Evaluating and testing English language skills: Benchmarking the TOEFL and IELTS tests. *International Journal of English Linguistics*, 12(3), 99-110. doi:10.5539/ijel.v12n3p99
- Congmin, Z. H. A. O. (2023). Theorizing the language ability and language assessment. *US-China Foreign Language*, 21(7), 261-266. doi:10.17265/1539-8080/2023.07.002
- Darwish, N., Haider, A., Tannous, B., Rumman, R. N. A., Alantari, D., Saed, H., & Dagamseh, M. (2025). A reception study of AI-translated idioms and proverbs between Arabic and English. *Research Journal in Advanced Humanities*, 6(3). <https://doi.org/10.58256/k4d6pp20>
- Dibbley, M. (2022). Perspectives of ESL Students and Teachers on Syntactic Parsing Instruction and

Reading Comprehension: A Design-Based Research Study. Biola University.

Dibekulu, D. (2020). Strategic competence and its implication in language teaching. *Journal of Advances in Social Science and Humanities*. <http://www.academicresearchjournals.org/IJELC/Index.htm>

Ghorbanpoor, M., Mathew, B., & Al Ofi, AH. (2026). The development and validation of the English-as-a-Foreign-Language Listening Test Anxiety Scale. *Lang Test Asia*. <https://doi.org/10.1186/s40468-025-00420-6>

Gunantar, D. A. A., & Rosaria, S. D. (2023). Difficulties of Non-English Study Program Students in Carrying Out the Institutional TOEFL Test. *English Education: Jurnal Tadris Bahasa Inggris*, 16(1), 119-134. <https://doi.org/10.24042/ee-jtbi.v16i1.16106>

Holmes, J. R. (2025). Challenging Equivalency: A Two-Site Analysis of English Language Proficiency Pathways and Academic Achievement in Canadian Higher Education. <https://hdl.handle.net/10315/43391>

Isakova, M. (2025). Issues of Grammar: Morphology And Syntax.

Johnson, M. D., & Tabari, M. A. (2025). Cognitive Task Complexity and Second Language Performance.

Kholidi, M. A., Sujana, I. M., Susanti, N. W. M., Damio, S. M., & Ashfiya, H. (2025). INVESTIGATING THE CHALLENGES ENCOUNTERED BY NON-ENGLISH STUDENTS IN THE STRUCTURE AND WRITTEN EXPRESSION SECTION OF TOEFL. *Jurnal Tatsqif*, 23(1), 38-57. DOI: <https://doi.org/10.20414/jtq.v23i1.14749>

Kubiszyn, T., & Borich, G. D. (2024). Educational testing and measurement. John Wiley & Sons.

Luke Harding & Brunfaut, T. (2022). Listening assessment. In *The Routledge Handbook of Second Language Acquisition and Language Testing*. Routledge.

McNamara, D. S. (2021). If integration is the keystone of comprehension: Inferencing is the key. *Discourse Processes*, 58(1), 86-91. <https://doi.org/10.1080/0163853X.2020.1788323>

Min, S., & Aryadoust, V. (2021). A systematic review of item response theory in language assessment: Implications for the dimensionality of language ability. *Studies in Educational Evaluation*, 68, 100963. <https://doi.org/10.1016/j.stueduc.2020.100963>

Ober, T. M., Hong, M. R., Rebouças-Ju, D. A., Carter, M. F., Liu, C., & Cheng, Y. (2021). Linking self-report and process data to performance as measured by different assessment types. *Computers & Education*, 167, 104188. <https://doi.org/10.1016/j.compedu.2021.104188>

Olson, D. J. (2024). A systematic review of proficiency assessment methods in bilingualism research. *International Journal of Bilingualism*, 28(2), 163-187. <https://doi.org/10.1177/13670069231153720>

Papi, M., & Khajavy, H. (2023). Second language anxiety: Construct, effects, and sources. *Annual Review of Applied Linguistics*, 43, 127-139.

POLISHCHUK, G. (2025). LISTENING AS THE MAJOR LANGUAGE PROCESSING SKILL OF SPOKEN INTERACTION. *АКТУАЛЬНІ ПИТАННЯ ГУМАНІТАРНИХ НАУК*, 2025189. <https://doi.org/10.24919/2308-4863/84-3-27>

Qusef, A., Murad, S., Alsali, N. R., & Gharaibeh, F. A. (2025, June 2). *Leveraging Artificial Intelligence to Identify Students with Learning Challenges*. Qusef | *International Journal of Learning, Teaching and Educational Research*. <https://www.ijlter.org/index.php/ijlter/article/view/13087>

Radzuan, F. A. A., & Arif, M. M. (2025). Vocabulary Learning Research in ESL/EFL: A Bibliometric Review of Trends, Innovations, and Gaps. <https://doi.org/10.37134/ajelp.vol13.2.4.2025>

Rawashdeh, Awni & Idris, Mohammed. (2025). Synchronized curriculum adaptation: a strategy for enhancing skill development in accounting education. *Journal of International Education in Business*. 18. 269-288. 10.1108/JIEB-01-2024-0001.

Sevy-Biloon, J., Recino, U., & Munoz, C. (2020). Factors affecting English language teaching in public schools in Ecuador. *International Journal of Learning, Teaching and Educational Research*, 19(3), 276-294.

ShayesteFar, P. (2020). A model of interplay between student English achievement and the joint affective factors in a high-stakes test change context: Model construction and validity. *Educational Assessment, Evaluation and Accountability*, 32(3), 335-371. <https://doi.org/10.1007/s11092-020-09326-8>

Shirzadi, G. (2025). Governing through testing: the history, implementation, and impact of English language proficiency policy in Canadian immigration and higher education. <http://hdl.handle.net/1993/39492>

Taguchi, N. (2025). Development of Intercultural Communicative Competence in an English-Medium University in Japan. *TESOL Quarterly*. <https://doi.org/10.1002/tesq.70038>**Digital Object Identifier (DOI)**

Trang, N. M. (2021). Understanding listening comprehension processing and challenges encountered: Research perspectives. *International Journal of English Language and Literature Studies*. 10.18488/journal.23.2020.92.63.75

Vafae, P., & Suzuki, Y. (2020). The relative significance of syntactic knowledge and vocabulary knowledge in second language listening ability. *Studies in Second Language Acquisition*, 42(2), 383-410. DOI: <https://doi.org/10.1017/S0272263119000676>

Wicaksono, A., Sulistyani, S., & Aji, M. P. P. (2025). ROADBLOCKS TO PROFICIENCY: TOEFL READING COMPREHENSION CHALLENGES FOR UNIVERSITY STUDENTS. *JEELL (Journal of English Education, Linguistics and Literature)*, 12(3), 257-268. <https://doi.org/10.32682/jeell.v12i3.90>

Zambrano Tenesaca, M. S., & Argudo Serrano, J. C. (2025). Exploring the challenges faced by EFL learners in developing writing skills: a mixed methods case study. *MQRInvestigar. Revista Multidisciplinaria de Investigación Científica*, 9(2), 1-20. Article e440. <https://doi.org/10.56048/MQR20225.9.2.2025.e440>

Zarnis, Y., Septiana, T. I., & Trisanti, O. L. (2021). Analysis of students' problems on the reading section of TOEFL. *ELT Echo: The Journal of English Language Teaching in Foreign Language Context*, 6(1), 139-154.

Zhang, S., & Zhang, X. (2022). The relationship between vocabulary knowledge and L2 reading/listening comprehension: A meta-analysis. *Language Teaching Research*, 26(4), 696-725. <https://doi.org/10.1177/1362168820913998>

Questionnaire

Section A: Demographic Information

1. Age

- ☐ 17–19 years (Early undergraduate stage)
- ☐ 20–22 years (Mid undergraduate stage)
- ☐ 23–25 years (Late undergraduate stage)
- ☐ 26 years and above (Non-traditional students)

2. Gender:

- ☐ Male

☐ Female

3. Department:

☐ Department of Engineering

☐ Department of Business and Economics

☐ Department of Social Sciences and Humanities

☐ Department of Education

4. Year of Study:

☐ 1

☐ 2

☐ 3

☐ 4

5. Most recent total score

☐ 310–399

☐ 400–499

☐ 500–549

☐ 550–677

Section B: Skill-Based Constraints Scale

Instructions:

Please indicate your level of agreement with the following statements.

(1 = Strongly Disagree, 2 = Disagree, 3 = Neutral, 4 = Agree, 5 = Strongly Agree)

S No.	Questions	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree
Reading Comprehension Constraints (RC)						
RC1	I struggle to understand academic vocabulary in reading passages.	☐	☐	☐	☐	☐
RC2	Long reading passages make it difficult for me to maintain concentration.	☐	☐	☐	☐	☐
RC3	I have difficulty identifying the main idea of reading texts.	☐	☐	☐	☐	☐
RC4	I find it challenging to answer inference questions in reading sections.	☐	☐	☐	☐	☐
RC5	Time pressure negatively affects my performance in reading tests.	☐	☐	☐	☐	☐
RC6	I often reread passages because I do not understand them the first time.	☐	☐	☐	☐	☐

Grammatical / Structure Constraints (GC)						
GC1	I have difficulty identifying grammatical	☐	☐	☐	☐	☐

Investigating Skill-Based Constraints in the TOEFL Test: A
Quantitative Study of University EFL Learners in Ecuador,
South America

	errors in sentences.					
GC2	Complex sentence structures confuse me during tests.	☐	☐	☐	☐	☐
GC3	I am unsure about correct tense usage in formal English.	☐	☐	☐	☐	☐
GC4	I struggle with subject-verb agreement in written English.	☐	☐	☐	☐	☐
GC5	Prepositions and articles are difficult for me to use correctly.	☐	☐	☐	☐	☐
GC6	Grammar questions reduce my confidence during exams.	☐	☐	☐	☐	☐

Listening Processing Constraints (LC)						
LC1	Fast speech in listening tests is difficult for me to follow.	☐	☐	☐	☐	☐
LC2	Different English accents make listening tasks challenging.	☐	☐	☐	☐	☐
LC3	I struggle to take effective notes while listening.	☐	☐	☐	☐	☐
LC4	I miss important details during listening sections.	☐	☐	☐	☐	☐
LC5	I find it hard to understand conversations without visual support.	☐	☐	☐	☐	☐
LC6	I feel anxious during listening tests.	☐	☐	☐	☐	☐

TOEFL Total Score					
TTS1	I achieved a satisfactory overall score on the TOEFL ITP test.	☐	☐	☐	☐
TTS2	My overall TOEFL ITP performance reflects my true English ability.	☐	☐	☐	☐
TTS3	I performed well across all sections of the TOEFL ITP test.	☐	☐	☐	☐
TTS4	I am satisfied with my overall TOEFL ITP total score.	☐	☐	☐	☐
TTS5	My TOEFL ITP total score met my academic expectations.	☐	☐	☐	☐
TTS6	Compared to other test takers, my TOEFL ITP total score was high.	☐	☐	☐	☐