

REFERENCES

- Ainan Ningrum, & Dewi, U. (2024). The Use of Google Translate and U-Dictionary as Machine Translation for Translating Text: EFL College Student's Preference and Perceptions. *ETERNAL (English Teaching Journal)*, 15(1), 167–179. <https://doi.org/10.26877/eternal.v15i1.373>
- Ambawani, S. (2014). Grammatical Errors on Indonesian–English Translation by Google Translate.
- Arba, N., Widyasari, W., Efendi, Y., & Syaputri, W. (2023). Analisa Hasil Terjemahan Google Translate Dalam Lirik Lagu “To The Bone” Oleh Pamungkas. *Jurnal Pembahsi (Pembelajaran Bahasa Dan Sastra Indonesia)*, 13(1), 55–67. <https://doi.org/10.31851/pembahsi.v13i1.11874>
- Azmi, M. F., & Asmarani, R. (2021). Grammatical Analysis on Abstract Translation Indonesian to English.
- Bahrudin. (2023). Accuracy Unveiled: A Closer Look at Google Translate and DeepL. *Proceeding of Conference on English Language Teaching (CELTl 2023)*. 3 (2808-0874).
- Baker, M. (1992). In *Other Words. A Coursebook on Translation*. London: Routledge.
- Cambedda, G., Di Nunzio, G. M., & Nosilia, V. (2021). A Study on Automatic Machine Translation Tools: A Comparative Error Analysis Between DeepL and Yandex for Russian-Italian Medical Translation. *Umanistica Digitale*, 139- 163 Pages. <https://doi.org/10.6092/ISSN.2532-8816/12631>
- Catford, J. C. (n.d.). *A Linguistic Theory of Translation*.
- Chomsky, Noam. (1965). *Aspects of the Theory Of Syntax*. Massachusetts Institute of Technology Cambridge, Massachusetts.
- Creswell, J. W., & Creswell, J. D. (n.d.). *Research Design: Qualitative, Quantitative, and Mixed Methods Approaches*.
- Esperança-Rodier, E., & Frankowski, D. (n.d.). DeepL vs Google Translate: Who's the best at translating MWEs from French into Polish? A multidisciplinary approach to corpora creation and quality translation of MWEs.

- Fitria, T. N. (2018). Translation Techniques Found in English to Indonesian Abstract Translation of Journal Edunomika 2018. 05(02).
- Fitria, T. N. (2020). Translation Technique of English to Indonesian Subtitle in “Crazy Rich Asian” Movie. *ELS Journal on Interdisciplinary Studies in Humanities*, 3(1), 51–65. <https://doi.org/10.34050/els-jish.v3i1.8415>
- Fitria, T. N. (2023). Performance of Google Translate, Microsoft Translator, and DeepL Translator: Error Analysis of Translation Result. *Al-Lisan*, 8(2), 115–138. <https://doi.org/10.30603/al.v8i2.3442>
- Herdawan, D. (2020). An Analysis on Indonesian-English Abstract Translation by Google Translate. *English Education*, 13.
- Hidalgo-Ternero, C. M. (2021a). Google Translate vs. DeepL: Analysing neural machine translation performance under the challenge of phraseological variation. *MonTI. Monografías de Traducción e Interpretación*, 154–177. <https://doi.org/10.6035/MonTI.2020.ne6.5>
- Hidalgo-Ternero, C. M. (2021b). Google Translate vs. DeepL: Analysing neural machine translation performance under the challenge of phraseological variation. *MonTI. Monografías de Traducción e Interpretación*, 154–177. <https://doi.org/10.6035/MonTI.2020.ne6.5>
- Hisyam, M. K., & Sujatmiko, S. (2022). The Study of Abstract Translation of Non- English Department Student at UPY. *JEdu: Journal of English Education*, 2(2), 108–117. <https://doi.org/10.30998/jedu.v2i2.6561>
- I Gusti Ayu Mahatma Agung, Putu Gede Budiarta, Ni Wayan Suryani. (2024). Translation Performance of Google Translate and DeepL In Translating Indonesian Short Stories Into English. <https://e-journal.unmas.ac.id/index.php/literates/issue/view/402>
- I.A. Made Friska Setiawati, I.B Putra Yadnya, I Nyoman Aryawibawa. (2020). A Comparison of Translation Readability Between Google Translate and Human Translator in The Medical Book Entitled ‘Medical-Surgical Nursing. 27(2). 2599 – 2678.
- Irawati Br Munthe, Kammer Sipayung, Febrika Dwi Lestari. (2023). Comparing The Translation Accuracy Between Google Translate and Professional Translator. *Innovative: Journal of Social Science Research*.

(3) 890-903.

- Ismailia, T. (2023). Analysis of Machine Translation Performance on Translating Informative Text from English into Indonesian. *EBONY: Journal of English Language Teaching, Linguistics, and Literature*, 3(2), 129–138. <https://doi.org/10.37304/ebony.v3i2.9809>
- Kartika, Dewi. (2017). Analysis of Google Translate's Quality In Employing Translation Techniques. (Skripsi Semarang State University).
- Kurniasih, I. (n.d.). An Analysis of Grammatical Errors of Using Google Translate From Indonesia To English In Writing Undergraduate Thesis Abstract Among The Students' English Department of Iain Metro In The Academic Year 2016/2017.
- Li, H., Graesser, A. C., & Cai, Z. (n.d.). Comparison of Google Translation with Human Translation.
- Masdhalifa, M. (n.d.). Submitted in Partial Fulfillment of the Requirements for the Degree of Sarjana Pendidikan (S. Pd) English Education Program.
- Moorkens, J., Castilho, S., Gaspari, F., & Doherty, S. (Eds.). (2018). Translation Quality Assessment: From Principles to Practice (Vol. 1). Springer International Publishing. <https://doi.org/10.1007/978-3-319-91241-7>
- Mulyadi, M., & Hidayati, D. (2021). Application Of Google Translate for Writing Thesis Abstract in English (Grammar Error Analysis). *Akademika*, 10(02), 349–360. <https://doi.org/10.34005/akademika.v10i02.1584>
- Nadhianti, M. (n.d.). Presented in Partial Fulfillment of the Requirements for the Attainment of a Sarjana Sastra Degree in English Language and Literature.
- Nisaa', K. (n.d.). Submitted as A Partial Requirements for the degree of Sarjana.
- Rasyid, Fathor. (2022) *Metodologi Penelitian Kualitatif Dan Kuantitatif Teori, Metode, Dan Praktek*. IAIN Kediri Press.
- Sarwono, Jonathan. (2006). *Metode Penelitian Kuantitatif Dan Kualitatif*. Graha Ilmu.
- Sebo, P., & De Lucia, S. (2024). Performance of machine translators in

- translating French medical research abstracts to English: A comparative study of DeepL, Google Translate, and CUBBITT. *PLOS ONE*, 19(2), e0297183. <https://doi.org/10.1371/journal.pone.0297183>
- Sidiq, F. A. (2024). Students' Perception of Using DeepL for Translating English Text. 12(1).
- Sinambela, Meri Eka Safitri. (2020). An Analysis of Grammatical Errors in Translating Text from Indonesian into English. (Skripsi Universitas Islam Riau).
- Sipayung, K. T., Sianturi, N. M., Arta, I. M. D., Rohayati, Y., & Indah, D. (2021). Comparison of Translation Techniques by Google Translate and U-Dictionary: How Differently Does Both Machine Translation Tools Perform in Translating? *Elsya : Journal of English Language Studies*, 3(3), 236–245. <https://doi.org/10.31849/elsya.v3i3.7517>
- Sujarwati, I., & Lorenza, O. M. (2022). A Grammatical Error Analysis Produced by Google Translate. *English Education: Jurnal Tadris Bahasa Inggris*, 15(2), 296–307. <https://doi.org/10.24042/ee-jtbi.v15i2.13853>
- Suryani, N. Y., & Fitria, T. N. (n.d.). Error Analysis of Abstract Translation in Scientific Writing by Using Google Translate.
- Takakusagi, Y., Oike, T., Shirai, K., Sato, H., Kano, K., Shima, S., Tsuchida, K., Mizoguchi, N., Serizawa, I., Yoshida, D., Kamada, T., & Katoh, H. (2021). Validation of the Reliability of Machine Translation for a Medical Article From Japanese to English Using DeepL Translator. *Cureus*. <https://doi.org/10.7759/cureus.17778>
- Ulfah, M. (2015). Islamic Education and Teacher Training Faculty Walisongo State Islamic University Semarang. *Machine Translation*, 23(1).
- Universitas Kristen Satya Wacana, Indonesia, Murtisari, E. T., Widiningrum, R., Branata, J., & Susanto, R. D. (2019). Google Translate in Language Learning: Indonesian EFL Students' Attitudes. *The Journal of Asia TEFL*, 16(3), 978–986. <https://doi.org/10.18823/asiatefl.2019.16.3.14.978>
- Utomo, Galih Satrio. (2016). An Analysis of Grammatical Errors In Translation Texts of Sixth-Semester English Department Students of Fbba In The Academic Year of 2012/2013. (Skripsi Universitas Muhammadiyah

Semarang).

- Varela Salinas, M.-J., & Burbat, R. (2023). Google Translate and DeepL: Breaking taboos in translator training: Observational study and analysis. *Ibérica*, 45, 243–266. <https://doi.org/10.17398/2340-2784.45.243>
- Vilar, D., Xu, J., D'Haro, L. F., & Ney, H. (n.d.). Error Analysis of Statistical Machine Translation Output.
- Yin, R. K. (2016). *Qualitative research from start to finish* (Second edition). The Guilford Press.
- Yulianto, A., & Supriatnaningsih, R. (2021). Google Translate vs. DeepL: A quantitative evaluation of close-language pair translation (French to English).

APPENDIXES

Appendix 1. Source Language of Abstract Articles

Abstract#1

Profil pemahaman guru terhadap PISA: cross sectional survey. Pemerintah sedang menyiapkan program untuk meningkatkan kualitas pendidikan tingkat menengah untuk menghadapi PISA (Programme for International Student Assesment). Di sisi lain, Pandemi Covid19 dalam beberapa tahun terakhir mempengaruhi pola dan sistem pembelajaran di setiap satuan pendidikan. Tujuan penelitian ini adalah untuk menganalisis pengetahuan guru IPA tingkat Madrasah Tsanawiyah tentang asesmen internasioanl PISA. Desain penelitian yang digunakan adalah cross sectional survey design dengan data kepada sampel pada satu waktu. Populasi dan sampel adalah guru IPA SMP/Madrasah yang mengikuti workshop pembelajaran IPA secara daring yang berjumlah 287 orang. Teknik pengambilan sampel secara convenience sampling. Data dianalisis secara statistik deskriptif menggunakan program Microsoft excel. Hasil penelitian menunjukkan pemahaman guru terkait PISA masih tergolong rendah dengan skor rata-rata 59%. Metode pembelajaran tipe campuran dengan dominansi penggunaan synchronous lebih banyak digunakan guru yaitu sebesar 38%. Mayoritas guru belum mengetahui soal-soal sesuai dengan standar PISA. Hal ini mengindikasikan pentingnya penguatan keterampilan guru madrasah tentang asesmen PISA untuk peningkatan kualitas pembelajaran. ([252-Article Text-2732-1-10-20240515.pdf](#))

Table 1.

PROFIL PEMAHAMAN GURU TERHADAP PISA: CROSS SECTIONAL SURVEY

Google Translate	DeepL
<p>Profile of teachers understanding of PISA: cross-sectional survey. The government prepared a program to improve the quality of secondary-level education to face PISA (Program for International Student Assessment). On the other hand, the COVID-19 pandemic in recent years has affected learning patterns and systems in every educational unit. The aim of this research is to analyze the knowledge of science teachers at the Madrasah Tsanawiyah level regarding the PISA international assessment. The research design used is a cross-sectional survey design with data for the sample at one time. The population and sample were 287 junior high school/madrasah science teachers who took part in online science learning workshops. The sampling technique is convenience sampling. Data were analyzed descriptively statistically using the Microsoft Excel program. The research results show that teachers understanding of PISA is still relatively low with an average score of 59%. Mixed type learning methods with the dominant use of synchronous are more widely used by teachers, namely 38%. The majority of teachers do not know the questions according to PISA standards. This indicates the importance of strengthening madrasah teachers skills regarding PISA assessment to improve the quality of learning.</p>	<p>Profile of teachers' understanding of PISA: a cross sectional survey. The government is preparing a program to improve the quality of secondary education to face PISA (Program for International Student Assessment). On the other hand, the Covid19 pandemic in recent years has affected the pattern and learning system in each educational unit. The purpose of this study was to analyze the knowledge of science teachers at the Madrasah Tsanawiyah level about the PISA international assessment. The research design used is a cross sectional survey design with data to the sample at one time. The population and sample were junior high school science teachers who participated in online science learning workshops totaling 287 people. The sampling technique was convenience sampling. Data were analyzed descriptively using Microsoft excel program. The results showed that teachers' understanding of PISA was still relatively low with an average score of 59%. Mixed-type learning methods with the dominance of synchronous use are more widely used by teachers, namely 38%. The majority of teachers do not know the questions in accordance with PISA standards. This indicates the importance of strengthening madrasah teachers' skills on PISA assessment to improve learning quality.</p>

Abstract#2

Penerapan Model Project Based Learning Untuk Meningkatkan Hasil Belajar Peserta Didik Kelas VII. Model Pembelajaran berbasis proyek (PJBL) adalah model pembelajaran memiliki tahapan bermakna untuk mengembangkan kognitif

dan pemikiran mendalam peserta didik untuk menentukan tujuan, mencari informasi, dan menuntaskan proyek. Berdasarkan pengamatan awal yang telah dilakukan di UPT SMPN 1 Suppa, ditemukan hasil pembelajaran peserta didik termasuk ke dalam kategori cukup dengan menggunakan metode ceramah. Tujuan penelitian ini untuk mendeskripsikan hasil pembelajaran peserta didik melalui model pembelajaran berbasis proyek. Jenis penelitian yang digunakan yaitu penelitian tindakan kelas yang terdiri dari 3 siklus dengan menggunakan model penelitian campuran. Setiap siklus terdiri dari 4 tahapan yaitu perencanaan, pelaksanaan, pengamatan, dan refleksi. Subjek penelitian ini adalah peserta didik kelas VII-A sebanyak 32 orang. Terjadi peningkatan persentase keaktifan belajar dan rata-rata hasil belajar peserta didik dengan penerapan model pembelajaran berbasis proyek. ([336-Article Text-2733-1-10-20240515.pdf](#))

Table 2.

**PENERAPAN MODEL PROJECT BASED LEARNING UNTUK
MENINGKATKAN HASIL BELAJAR PESERTA DIDIK KELAS VII**

Google Translate	DeepL
<p>Application of the Project-Based Learning Model to Improve the Learning Outcomes of Class VII Students. The project-based learning model (PJBL) is a learning model that has meaningful stages to develop students' cognitive and in-depth thinking to determine goals, search for information, and complete projects. Based on initial observations carried out at UPT SMPN 1 Suppa, it was found that students' learning outcomes fell into the sufficient category using the lecture method. The aim of this research is to describe student learning outcomes through a project-based learning model. The type of research used is classroom action research which consists of 3 cycles using a mixed research model. Each cycle consists of 4 stages, namely planning, implementation, observation,</p>	<p>Application of Project-Based Learning Model to Improve Learning Outcomes of Class VII Learners. Project-based learning model (PJBL) is a learning model that has meaningful stages to develop cognitive and in-depth thinking of students to determine goals, seek information, and complete projects. Based on initial observations that have been made at UPT SMPN 1 Suppa, it is found that the learning outcomes of students are included in the sufficient category using the lecture method. The purpose of this study was to describe the learning outcomes of students through a project-based learning model. The type of research used is classroom action research consisting of 3 cycles using a mixed research model. Each cycle consists of 4 stages, namely planning, implementation, observation, and reflection.</p>

reflection. The subjects of this research was 32 class VII-A students. There was an increase in the percentage of active learning and the average learning outcomes of students by implementing the project-based learning model.	The subjects of this research were students of class VII-A as many as 32 people. There was an increase in the percentage of learning activeness and the average learning outcomes of students with the application of project- based learning models
---	--

Abstract#3

Efektivitas Pengaplikasian Experiential Learning Menggunakan Alat Peraga PhET dengan Alat Peraga Sederhana pada Materi Energi dan Perubahannya.

Experiential learning dapat membantu proses pembelajaran dan memberikan sentuhan yang unik dalam proses pembelajaran sehingga bisa meningkatkan minat dan motivasi siswa dalam pembelajaran terutama dalam pelajaran IPA materi fisika. Penerapan model experiential learning ini dapat menggunakan media yang membantu siswa dalam menemukan konsep yang ada dalam materi pembelajaran. Terdapat dua media yang akan dianalisis keefektifannya pada model experiential learning yaitu, alat peraga sederhana dan alat peraga PhET pada materi energi dan perubahannya. Penelitian ini menggunakan jenis pendekatan semi kualitatif dengan metode DBR (Design Based Research), yang bertujuan untuk memecahkan suatu masalah yang kompleks dan mengembangkan pengetahuan tentang suatu karakteristik dari produk yang terkait, dengan menggunakan pendekatan semi kualitatif. Instrumen pengumpulan data dalam penelitian ini menggunakan Teknik observasi, kuesioner, dan teknik analisis data. Dari teknik analisis data tersebut dihasilkan uji kelayakan dari validator dengan respon sangat layak diperoleh rata-rata persentase 93% alat peraga sederhana dan 92% alat peraga PhET. Sedangkan penggunaan alat peraga sederhana mendapatkan respon baik dari siswa serta diperoleh rata-rata 83% alat peraga sederhana dan 79% alat peraga PhET. Dapat disimpulkan lebih efektif penerapan penggunaan alat peraga sederhana dibandingkan alat peraga PhET. Saran untuk penelitian selanjutnya yang perlu diperhatikan yaitu dalam proses pembuatan alat, ketersediaan air di sekolah, dan manajemen waktu. ([364-Article Text-2734-1-10-20240515.pdf](#)).

Table 3.

**EFEKTIVITAS PENGAPLIKASIAN EXPERIENTIAL LEARNING
MENGUNAKAN ALAT PERAGA PHET DENGAN ALAT PERAGA
SEDERHANA PADA MATERI ENERGI DAN PERUBAHANNYA.**

Google Translate	DeepL
<p>Effectiveness of the Application of Experiential Learning Using PhET Teaching Aids with Simple Teaching Aids on Energy Materials and Their Changes. Experiential learning can help the learning process and provide a unique touch to the learning process so that it can increase students' interest and motivation in learning, especially in science lessons, physics material. The application of these experiential learning models can use media that helps students discover concepts in the learning material. There are two media whose effectiveness will be analyzed in the experiential learning model, namely, simple teaching aids and PhET teaching aids on energy and its changes. This research uses a semi-qualitative approach with the DBR (Design Based Research) method, which aims to solve a complex problem and develop knowledge about the characteristics of the related product, using a semi-qualitative approach. Data collection instruments in this research used observation techniques, questionnaires and data analysis techniques. From this data analysis technique, a feasibility test was produced from the validator with a very feasible response obtained with an average percentage of 93% for simple teaching aids and 92% for PhET teaching aids. Meanwhile, the use of simple teaching aids received a good response from students and obtained an average of 83% simple teaching aids and 79% PhET teaching aids. It can be concluded that the use of simple teaching aids is more effective than PhET teaching aids.</p>	<p>Effectiveness of Experiential Learning Application Using PhET Props with Simple Props on Energy and Its Changes. Experiential learning can help the learning process and provide a unique touch in the learning process so that it can increase students' interest and motivation in learning, especially in science lessons in physics. The application of this experiential learning model can use media that helps students find concepts in learning materials. There are two media that will be analyzed for their effectiveness in experiential learning models, namely, simple props and PhET props on energy and its changes. This research uses a type of semi qualitative approach with the DBR (Design Based Research) method, which aims to solve a complex problem and develop knowledge about a characteristic of a related product, using a semi qualitative approach. Data collection instruments in this study used observation techniques, questionnaires, and data analysis techniques. From the data analysis technique, the result of the feasibility test from the validator with a very feasible response obtained an average percentage of 93% simple props and 92% PhET props. While the use of simple props get a good response from students and obtained an average of 83% simple props and 79% PhET props. It can be concluded that the application of the use of simple props is more effective than PhET props.</p>

Suggestions for further research that need to be considered are the process of making tools, water availability in schools, and time management.	Suggestions for further research that need to be considered are in the process of making tools, water availability in schools, and time management.
--	---

Abstract#4

Kajian Literatur: pembelajaran berdiferensiasi dalam pembelajaran IPA di madrasah. Keberagaman peserta didik agar dapat belajar sesuai dengan minat dan gaya belajarnya dapat diatasi menggunakan pembelajaran berdiferensiasi sehingga mendapatkan hasil yang maksimal. Pada praktiknya pembelajaran berdiferensiasi belum banyak dilakukan di madrasah khususnya pada pelajaran IPA. Tujuan kajian literatur ini untuk mendeskripsikan pembelajaran berdiferensiasi pada pembelajaran IPA yang diterapkan di Madrasah. Metode penelitian yang digunakan dalam penulisan artikel ini adalah kajian literatur. Kajian literatur diperoleh dari artikel tahun 2020 hingga 2023. Pencarian literatur difokuskan pada kata kunci “Pembelajaran IPA berdiferensiasi” sehingga total artikel yang diperoleh sebanyak 2260 artikel, untuk penelitian pada jenjang SD, SMP dan SMA, yang diakses menggunakan google scholar. Berdasarkan kajian literatur dapat disimpulkan penelitian pembelajaran diferensiasi yang terintergrasi dengan Al-Qur’an belum dilaksanakan di madrasah khususnya pada pelajaran IPA jenjang MTs. ([409-Article Text-2735-1-10-20240515.pdf](#))

Table 4.

KAJIAN LITERATUR: PEMBELAJARAN BERDIFERENSIASI DALAM PEMBELAJARAN IPA DI MADRASAH.

Google Translate	DeepL
-------------------------	--------------

<p>Literature Review: differentiated learning in science learning in madrasas. The diversity of students so that they can learn according to their interests and learning styles can be addressed using differentiated learning so as to get maximum results. In practice, differentiated learning is not widely practiced in madrasas, especially in science lessons. The aim of this literature review is to describe differentiated learning in science learning implemented in Madrasas. The research method used in writing this article is literature review. The literature review was obtained from articles from 2020 to 2023. The literature search focused on the keyword "Differentiated science learning" so that a total of 2260 articles were obtained, for research at elementary, middle and high school levels, which were accessed using Google Scholar. Based on the literature review, it could be concluded that research on differentiated learning integrated with the Al-Qur'an has not been implemented at madrasas, especially in science lessons at MTs level.</p>	<p>Literature review: differentiated learning in science learning in madrasah. The diversity of students in order to learn according to their interests and learning styles can be overcome using differentiated learning so as to get maximum results. In practice, differentiated learning has not been widely practiced in madrasah, especially in science lessons. The purpose of this literature review is to describe differentiated learning in science learning applied in Madrasah. The research method used in writing this article is a literature review. The literature review was obtained from articles from 2020 to 2023. The literature search focused on the keyword "Differentiated Science Learning" so that the total articles obtained were 2260 articles, for research at the elementary, junior high and high school levels, which were accessed using Google Scholar. Based on the literature review, it can be concluded that differentiated learning research integrated with the Qur'an has not been implemented in madrasah, especially in science lessons at the MTs level.</p>
--	---

Abstract#5

Pengembangan Modul Digital Bermuatan Cerita Pendek Berbasis Kearifan Lokal Pada Materi Pokok Asam Basa. Ketidakefektifan penerapan teknologi yang informatif, inovatif, serta menarik dalam pembelajaran kimia menyebabkan kurangnya pemahaman materi peserta didik. Terlebih lagi dampak kemajuan teknologi membuat eksistensi budaya lokal dalam diri peserta didik semakin tergerus. Tujuan penelitian ini adalah mengembangkan modul digital bermuatan cerita pendek berbasis kearifan lokal Kota Semarang pada materi asam basa di SMA Negeri 5 Semarang dengan model pengembangan ADDIE. Konten kearifan lokal yang diangkat dalam modul digital yaitu mengenai minuman jamu

(jamu kunyit asam dan jamu brotowali) yang ada di Kampung Jamu, pohon asam jawa, tradisi peningset dalam adat pernikahan Semarang, dan Kampung Batik Semarang. Pengembangan media pembelajaran ini diharapkan mampu menjadikan peserta didik lebih termotivasi dan semangat dalam belajar. Hal tersebut dapat terjadi karena setiap peserta didik dapat mengeksplor materi kimia yaitu asam basa melalui bentuk penyampaian yang unik yaitu disajikan dalam bentuk modul digital bermuatan cerita pendek. Teknik pengumpulan data dilakukan melalui metode wawancara, dokumentasi, studi pustaka, serta angket. Hasil validasi 3 ahli media dan 3 ahli materi mendapatkan hasil dengan nilai validitas sebesar 0,85 (sangat valid) dan 0,87 (sangat valid). Penilaian kepraktisan modul digital oleh 2 guru kimia mendapatkan hasil sangat praktis dengan persentase 96% dan penilaian kepraktisan oleh 30 peserta didik mendapatkan hasil sangat praktis dengan persentase 86,57%. Hasil penelitian menunjukkan bahwa modul digital bermuatan cerita pendek berbasis kearifan lokal pada materi pokok asam basa dinyatakan layak dan praktis digunakan sebagai media belajar. ([356-Article Text-2767-1-10-20240528.pdf](#))

Table 5.

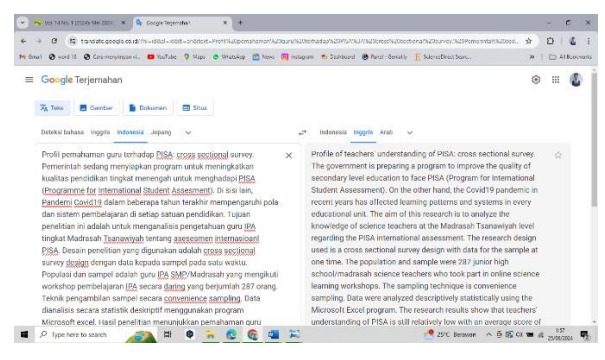
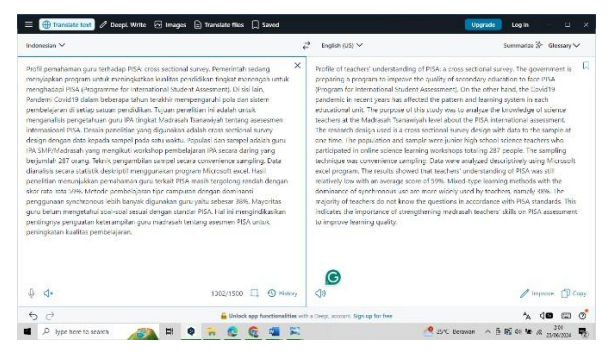
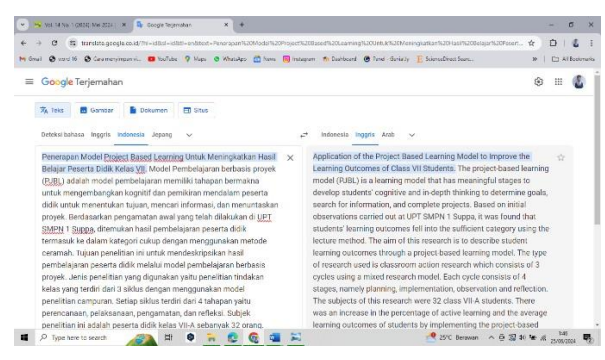
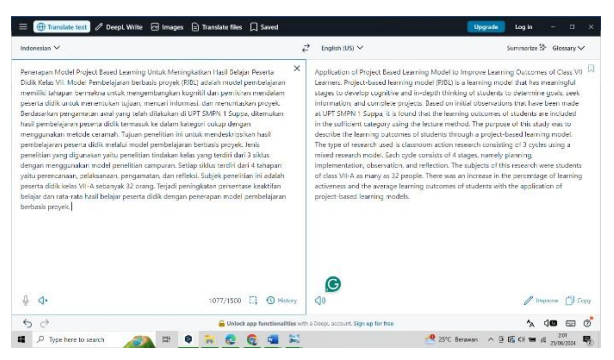
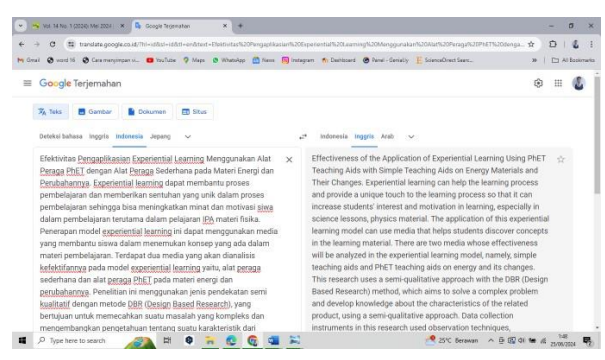
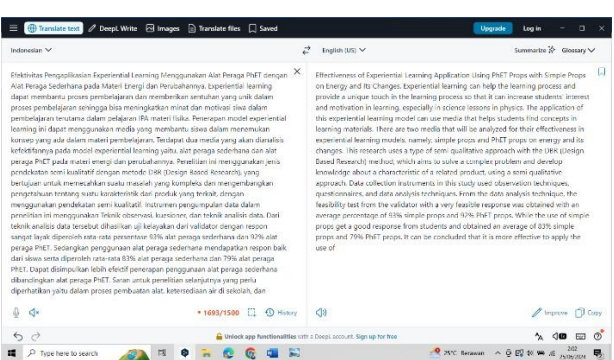
PENGEMBANGAN MODUL DIGITAL BERMUATAN CERITA PENDEK BERBASIS KEARIFAN LOKAL PADA MATERI POKOK ASAM BASA.

Google Translate	DeepL
Development of a Digital Module Containing Short Stories Based on Local Wisdom on the Main Material of Acids and Bases. The non-optimal application of informative, innovative and interesting technology in chemistry learning causes a lack of students' understanding of the material. Moreover, the impact of technological advances has made the existence of local culture within students increasingly eroded. The aim of this research is to develop a digital module containing short stories based on the local	Development of Digital Module with Short Story Based on Local Wisdom on Acid-Base Subject Matter. The non-optimization of the application of technology that is informative, innovative, and interesting in learning chemistry causes a lack of understanding of student material. Moreover, the impact of technological advances makes the existence of local culture in students increasingly eroded. The purpose of this research is to develop a digital module with short stories based on local wisdom

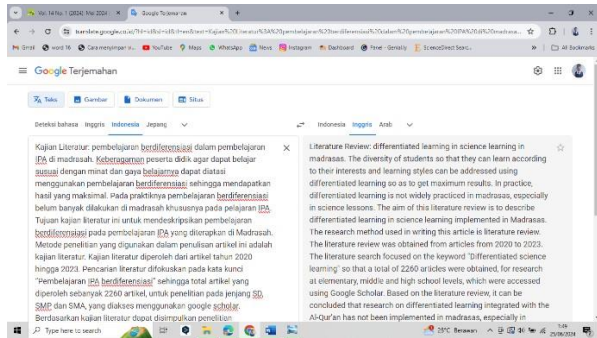
<p>wisdom of Semarang City on acid and base material at SMA Negeri 5 Semarang using the ADDIE development model. The local wisdom content highlighted in the digital module is about herbal drinks (turmeric tamarind herbal medicine and brotowali herbal medicine) found in Jamu Village, tamarind trees, the peningset tradition in Semarangan wedding customs, and Semarang Batik Village. It is hoped that the development of learning media will be able to make students more motivated and enthusiastic about learning. This can happen because each student can explore chemical material, namely acids and bases, through a unique form of delivery, namely presented in the form of a digital module containing short stories. Data collection techniques were carried out through interviews, documentation, literature studies and questionnaires. The validation results of 3 media experts and 3 material experts obtained results with validity values of 0.85 (very valid) and 0.87 (very valid). The practicality assessment of the digital module by 2 chemistry teachers got very practical results with a percentage of 96% and the practicality assessment by 30 students got very practical results with a percentage of 86.57%. The research results showed that the digital module containing short stories based on local wisdom on the main topic of acid and base was declared feasible and practical to use as the learning medium.</p>	<p>of Semarang City on acid-base material at SMA Negeri 5 Semarang with ADDIE development model. The local wisdom content raised in the digital module is about herbal drinks (jamu kunyit asam and jamu brotowali) in Kampung Jamu, tamarind trees, peningset tradition in Semarangan wedding customs, and Kampung Batik Semarang. The development of this learning media is expected to be able to make students more motivated and enthusiastic in learning. This can happen because each student can explore chemical material, namely acid-base through a unique form of delivery, which is presented in the form of a digital module with short stories. Data collection techniques were carried out through interviews, documentation, literature studies, and questionnaires. The validation results of 3 media experts and 3 material experts obtained results with a validity value of 0.85 (very valid) and 0.87 (very valid). The practicality assessment of the digital module by 2 chemistry teachers got very practical results with a percentage of 96% and the practicality assessment by 30 students got very practical results with a percentage of 86.57%. The research results showed that the digital module containing short stories based on local wisdom on the main topic of acid and base was declared feasible and practical to use as a learning medium.</p>
--	---

Appendix 2. Documentation of Translation Machines

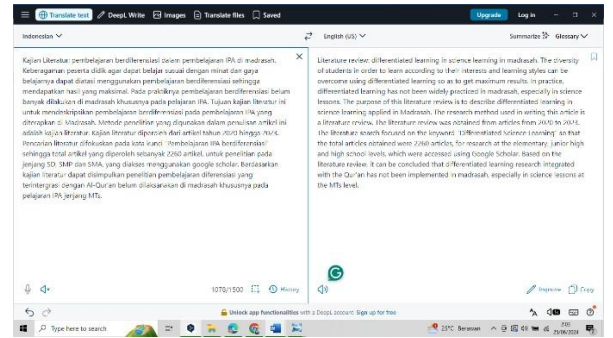
Table 1. Google Translate and DeepL

<h3>Google Translate</h3>	<h3>DeepL</h3>
<h4>Screenshot#1</h4>  <p>Profil pemahaman guru terhadap PISA: cross sectional survey. Pemerintah sedang menyiapkan program untuk meningkatkan kualitas pendidikan tingkat menengah untuk menghadapi PISA (Programme for International Student Assessment) di sisi lain. Pandemi Covid-19 dalam beberapa tahun terakhir mempengaruhi pola dan sistem pembelajaran di setiap satuan pendidikan. Tujuan penelitian ini adalah menganalisis pengetahuan guru (G) tingkat Madrasah Tsanawiyah tentang asesmen internasional PISA. Desain penelitian yang digunakan adalah cross sectional survey dengan data kepada sampel pada satu waktu. Populasi dan sampel adalah guru IPA SMP/ Madrasah yang mengikuti workshop pembelajaran IPA secara daring yang berjumlah 207 orang. Teknik pengambilan sampel secara convenience sampling. Data dianalisis secara statistik deskriptif menggunakan program Microsoft excel. Hasil penelitian menunjukkan pemahaman guru</p>	<h4>Screenshot#1</h4>  <p>Profile of teachers' understanding of PISA: cross sectional survey. The government is preparing a program to improve the quality of secondary level education to face PISA (Programme for International Student Assessment). On the other hand, the Covid-19 pandemic in recent years has affected learning patterns and systems in every educational unit. The aim of this research is to analyze the knowledge of science teachers at the Madrasah Tsanawiyah level regarding the PISA international assessment. The research design used is a cross sectional survey design with data for the sample at one time. The population and sample were junior high school science teachers who took part in online science learning workshops totaling 207 people. The sampling technique was convenience sampling. Data were analyzed descriptively statistically using Microsoft excel program. The research results show that teachers' understanding of PISA is still relatively low with an average score of</p>
<h4>Screenshot#2</h4>  <p>Penelitian Model Project Based Learning Untuk Meningkatkan Hasil Belajar Peserta Didik Kelas VII. Model Pembelajaran berbasis proyek (PBL) adalah model pembelajaran memiliki tahapan bermula untuk mengembangkan kognitif dan pemikiran mendalam peserta didik untuk menemukan tujuan, mencari informasi, dan menuntaskan proyek. Berdasarkan pengamatan awal yang telah dilakukan di UPT SMPN 1 Stepa, ditemukan hasil pembelajaran peserta didik termasuk ke dalam kategori cukup dengan menggunakan metode ceramah. Tujuan penelitian ini untuk mendeskripsikan hasil pembelajaran peserta didik melalui model pembelajaran berbasis proyek. Jenis penelitian yang digunakan yaitu penelitian tindakan kelas yang terdiri dari 3 siklus dengan menggunakan model penelitian campuran. Seriap siklus terdiri dari 4 tahapan yaitu perencanaan, pelaksanaan, pengamatan, dan refleksi. Subjek penelitian ini adalah peserta didik kelas VII-A sebanyak 32 orang.</p>	<h4>Screenshot#2</h4>  <p>Application of the Project Based Learning Model to Improve the Learning Outcomes of Class VII Students. Project-based learning model (PBL) is a learning model that has meaningful stages to develop cognitive and in-depth thinking of students to determine goals, search for information, and complete projects. Based on initial observations carried out at UPT SMPN 1 Stepa, it was found that students' learning outcomes fell into the sufficient category using the lecture method. The aim of this research is to describe student learning outcomes through a project-based learning model. The type of research used is classroom action research which consists of 3 cycles using a mixed research model. Each cycle consists of 4 stages, namely planning, implementation, observation and reflection. The subjects of this research were 32 class VII A students. There was an increase in the percentage of active learning and the average learning outcomes of students by the application of project-based learning models.</p>
<h4>Screenshot#3</h4>  <p>Efektifitas Penerapan Experiential Learning Menggunakan Alat Peraga PNET dengan Materi Energi dan Perubahannya pada Materi Energi dan Perubahannya. Experiential learning dapat membantu proses pembelajaran dan memberikan sentuhan yang unik dalam proses pembelajaran sehingga bisa meningkatkan minat dan motivasi siswa dalam pembelajaran terutama dalam pelajaran IPA materi fisika. Penerapan model experiential learning ini dapat menggunakan media yang membantu siswa dalam menemukan konsep yang ada dalam materi pembelajaran. Terdapat dua media yang akan dianalisis keefektifannya pada model experiential learning yaitu alat peraga sederhana dan alat peraga PNET pada materi energi dan perubahannya. Penelitian ini menggunakan jenis pendekatan semi kualitatif dengan metode DBR (Design Based Research), yang bertujuan untuk memecahkan suatu masalah yang kompleks dan mengembangkan pengetahuan tentang suatu karakteristik dari</p>	<h4>Screenshot#3</h4>  <p>Effectiveness of Experiential Learning Application Using PNET Props with Simple Props on Energy and Its Changes. Experiential learning can help the learning process and provide a unique touch to the learning process so that it can increase students' interest and motivation in learning, especially in science lessons, physics material. The application of this experiential learning model can use media that helps students find concepts in learning materials. There are two media that will be analyzed for effectiveness in experiential learning models, namely simple props and PNET props on energy and its changes. This research uses a type of semi-qualitative approach with the DBR (Design Based Research) method, which aims to solve a complex problem and develop knowledge about a characteristic of a related product, using a semi-qualitative approach. Data collection instruments in this study used observation techniques, questionnaires, and data analysis techniques. First the data analysis technique, the feasibility test from the validator with a very feasible response was obtained with an average percentage of 65% simple props and 64% PNET props. While the use of simple props got a good response from students and obtained an average of 62% simple props and 75% PNET props. It can be concluded that it is more effective to apply the use of</p>

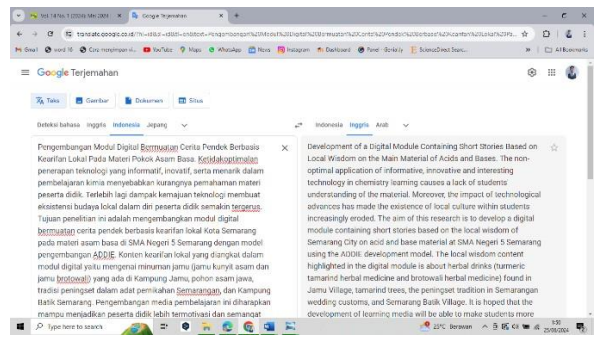
Screenshot#4



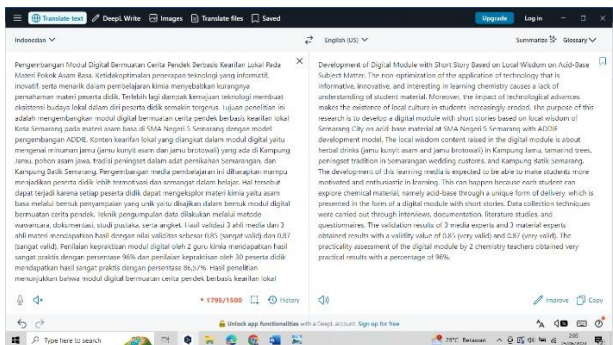
Screenshot#4



Screenshot#5



Screenshot#5



Appendix 3. Curriculum Vitae



Name : Prendi Setiawan

Date of Birth : Oku Timur, 07 January 2000

Gender : Man

Religion : Islam

Address : Pandan Jaya, Kec. Madang Suku II, Kab. Oku Timur, Sumatera Selatan

Phone's Number : 081541533404

E-mail Address : frendisetiawan22@gmail.com

Education Detail : 2006-2012 SDN PANDAN JAYA, Pandan Jaya
2012-2015 SMP DIPONEGORO, Tekorejo
2015-2018 MA SUBULUSSALAM, Sriwangi
2018-2019 BASIC ENGLISH COURSE(BEC), Kediri

Experiences : 2019 Teaching at SMPN 1 Sidayu, Gresik
2019 Teaching at MTs Kalijogo Tulung Agung
2022 Teaching at MTs Kalijogo Tulung Agung
2022 Teaching at MTsN 24 Jakarta
2023 Teaching at MTsN 4 Jakarta