

Making College English Meaningful: Learning Diagnosis, Pedagogical Intervention, and Student Engagement in a Chinese Vocational Undergraduate EFL Classroom

Xipeng Liu

School of Foreign Languages and Business, Shenzhen Polytechnic University, Shenzhen, China

| Article Detail: | Abstract |
|--|---|
| <p>Received: 25 May 2026; Received in revised form: 21 Jun 2026; Accepted: 26 Jun 2026; Available online: 30 Jun 2026</p> <p>©2026 The Author(s). Published by International Journal of English Language, Education and Literature Studies (IJEEL). This is an open access article under the CC BY license (https://creativecommons.org/licenses/by/4.0/).</p> <p>Keywords – College English; EFL teaching; vocational undergraduate education; learner engagement; learning diagnosis</p> | <p><i>This paper reports a qualitative classroom-based case study of College English teaching in a Chinese vocational undergraduate EFL classroom. It responds to a recurring pedagogical problem: students often appear reluctant to participate in English learning, but such reluctance may be rooted in accumulated negative learning experiences, examination-oriented expectations, and uncertainty about the value of English in the age of artificial intelligence. Drawing on teaching slides, reflective teaching scripts, classroom interaction records, student responses, student notes, knowledge-management sheets, teacher comments, peer-evaluation materials, and student artefacts, the study examines how learning diagnosis was translated into a three-stage pedagogical intervention. The intervention included low-threshold pre-class English sharing to rebuild confidence, connected in-class language tasks to stimulate exploration and meaningful output, and post-class knowledge organisation, peer assessment, and learning-state evaluation to make learning gains visible. The findings suggest that students' engagement became more observable when English tasks were linked to their prior experiences, disciplinary interests, professional imagination, and opportunities for evaluation. The study argues that meaningful College English teaching in vocational undergraduate education requires teachers to move beyond asking students to participate and instead design conditions in which students can experience competence, connection, and visible growth.</i></p> |

I. INTRODUCTION

Student engagement has long been a central concern in English as a foreign language (EFL) classrooms. In College English courses for non-English-major students in China, the issue is often described in practical terms: students do not speak,

do not participate, only care about examinations, or doubt whether English is still useful when artificial intelligence can translate. These observations are familiar to many university English teachers, but they are sometimes interpreted too quickly as evidence of laziness, low ability, or weak self-discipline. Such explanations may overlook the

historical, emotional, and institutional conditions through which students' attitudes toward English have been formed.

This paper reports a classroom-based case study conducted in a Chinese vocational undergraduate College English course. The study focuses on language teaching rather than on general curriculum reform. It asks how a teacher can diagnose students' learning barriers and translate that diagnosis into concrete pedagogical interventions that support English learning engagement, meaningful language output, knowledge organisation, and formative peer assessment. The central argument is that students' reluctance should not be treated as a problem to be corrected through exhortation. Instead, it can be treated as a pedagogical signal that requires teachers to redesign classroom experiences.

The study is situated in the context of vocational undergraduate education in China. Vocational undergraduate institutions are expected to cultivate high-level technical and skilled professionals while also providing students with public foundation courses such as College English. In such institutions, College English cannot be reduced to grammar, vocabulary, translation practice, or test preparation. It must still develop language competence, but it also needs to help students use English to express ideas, organise knowledge, explain processes, participate in evaluation, and connect language learning with academic, professional, and personal development. This orientation is consistent with the broader positioning of College English as a public foundation course supporting language ability, intercultural awareness, autonomous learning, and wider educational development.

The classroom problem addressed in this study emerged from three recurring student statements: "I am not good at English," "Will this be tested?" and "If AI can translate, why should I still learn English?" These statements were interpreted as three diagnostic categories. The first indicates past learning wounds: many students associate English with mechanical memorisation, repeated drills, error correction, examination anxiety, and failure. The second indicates present instrumentalism: students judge classroom content primarily through its perceived usefulness for examinations such as CET-4/6. The third indicates future value anxiety:

students doubt the necessity of English learning when digital tools can perform many language tasks.

The pedagogical question, therefore, is not simply how to make a class more entertaining. It is how to make English learning meaningful enough for students to enter, persist, and produce visible evidence of growth. This paper addresses the following research questions:

1. What learning barriers were identified in a Chinese vocational undergraduate EFL classroom?
2. How were these diagnostic findings translated into pedagogical interventions?
3. What forms of student engagement and language-learning development became visible through these interventions?

II. LITERATURE REVIEW

2.1 EFL Motivation, Emotion, and Engagement

Motivation has been widely recognised as a key factor in second and foreign language learning. Dörnyei (2005) shows that language learning motivation is not a fixed personal trait but a dynamic construct shaped by learner beliefs, goals, experiences, and contexts. Ryan and Deci's (2000) self-determination theory further suggests that sustained motivation is supported when learners experience autonomy, competence, and relatedness. These concepts are useful for understanding why students may withdraw from English learning when they feel incompetent, controlled by examinations, or disconnected from classroom content.

Students' emotions also influence learning participation. Pekrun's (2006) control-value theory argues that achievement emotions are shaped by learners' perceived control over learning and the value they attach to learning tasks. If students believe that they have little control over English success, or that classroom content has little personal or future value, they may experience anxiety, boredom, or resistance. This is especially relevant in EFL contexts where students' prior schooling experiences may have produced learned helplessness, score anxiety, or fear of public errors.

Engagement provides a broader lens for examining participation. Fredricks et al. (2004) conceptualise engagement as behavioural, emotional,

and cognitive. Behavioural engagement refers to participation and effort; emotional engagement refers to interest, belonging, or affective response; cognitive engagement refers to investment in understanding, strategy use, and self-regulation. This multidimensional view is important because a student may appear quiet but still be cognitively engaged, while another may appear active without deep learning. Therefore, classroom engagement should not be measured only by visible excitement or frequency of speaking. It should also include students' willingness to organise knowledge, evaluate ideas, revise work, and identify difficulties.

2.2 Meaningful Output and Task-Supported Language Teaching

A central issue in College English teaching is how to move students from receptive knowledge to meaningful language output. Swain's (1985) output hypothesis argues that language production pushes learners to process language more deeply, notice gaps in their knowledge, test hypotheses, and reflect on language form and meaning. For students who are used to memorising words and completing written exercises, structured output opportunities are essential.

Task-based language teaching also supports the design of meaningful classroom activities. Ellis (2003) argues that tasks can encourage learners to use language for communicative purposes while focusing attention on meaning, form, and outcome. In the present study, tasks were not understood as isolated classroom activities but as structured opportunities for students to connect English with personal experience, disciplinary concepts, professional imagination, and peer evaluation.

Meaningful output is particularly important in vocational undergraduate classrooms. Students need to use English not only to pass tests but also to explain processes, describe problems, present ideas, justify choices, and communicate across academic or professional contexts. Therefore, language teaching needs to provide tasks that are accessible enough for students to enter, structured enough to support success, and meaningful enough to show the value of English beyond examination performance.

2.3 Formative Assessment, Peer Assessment, and Feedback Literacy

Assessment plays a powerful role in shaping students' learning behaviour. Black and Wiliam (1998) argue that formative assessment can improve learning when assessment evidence is used to adapt teaching and support learners' next steps. Nicol and Macfarlane-Dick (2006) further propose that good feedback should help students understand standards, compare current performance with desired performance, and take action to close the gap.

Peer assessment can extend this process by repositioning students as evaluators. Topping (1998) defines peer assessment as an arrangement in which students consider and specify the level, value, or quality of a peer's work. When properly scaffolded, peer assessment can help students internalise criteria, develop evaluative judgement, and become more reflective learners. Carless and Boud (2018) use the concept of student feedback literacy to describe the understandings, capacities, and dispositions needed for students to make sense of feedback and use it for improvement.

These ideas are especially relevant to the present study. If students only receive teacher judgement, they may remain dependent on external evaluation. If they are guided to evaluate answers, notes, learning processes, difficulties, and improvement strategies, they can begin to understand learning standards more actively. This movement from being evaluated to participating in evaluation is one of the central pedagogical interventions examined in this case.

2.4 Self-Regulated Learning and Knowledge Organisation

Engagement also depends on students' ability to manage their own learning. Zimmerman (2002) describes self-regulated learning as an active process in which learners set goals, monitor progress, use strategies, and reflect on outcomes. In College English classrooms, students may have difficulty self-regulating because their notes are fragmented, their understanding of vocabulary remains isolated, and they lack tools for judging the level of their own knowledge.

Generative learning theory provides another useful perspective. Fiorella and Mayer (2015) argue that learners understand more deeply when they

actively select, organise, integrate, explain, visualise, and apply knowledge. This implies that note-taking should not be treated as passive copying. It can become a learning strategy when students classify knowledge, compare related forms, explain processes, and identify when and why a language item should be used.

The present study therefore treats knowledge management as part of language pedagogy. The goal was not merely to help students produce neat notes, but to make knowledge construction visible and discussable.

III. METHODOLOGY

3.1 Research Design

This study adopts a qualitative classroom-based case study design. A case study approach is suitable when the research aim is to understand a pedagogical phenomenon in its real classroom context rather than to isolate variables under experimental conditions. The study does not claim statistically measurable improvement in students' English proficiency. Instead, it examines how learning diagnosis informed classroom intervention and what kinds of engagement and learning evidence became visible through the intervention.

The case was conducted in a College English course taught to first-year students in a Chinese vocational undergraduate university. The students were mainly from engineering-related programmes. The class was relatively large, and the students showed diverse learning foundations. Many students had acceptable reading comprehension but limited confidence in spoken or written English output. Some students were strongly oriented toward CET-4/6 preparation; others questioned the value of English learning in the age of AI translation tools.

3.2 Data Sources

The data consisted of naturally occurring teaching and learning materials collected from routine classroom practice. These included:

1. teaching slides and reflective teaching scripts;
2. classroom interaction records and online student responses;

3. pre-class English sharing tasks and speaking frames;
4. student notes and knowledge-management sheets;
5. teacher comments on student notes;
6. peer-evaluation materials and student assessment records;
7. student artefacts, including language tasks and interdisciplinary expression tasks;
8. teacher reflective notes and classroom observation materials.

The study also drew on process materials such as observation sheets, student learning records, classroom screenshots, and examples of student-produced knowledge organisation. These materials were used to identify how students participated, how tasks were scaffolded, and how learning became visible.

3.3 Analytical Procedure

The analysis followed a qualitative thematic approach. First, teaching and reflection materials were reviewed to identify the teacher's diagnostic categories. Three recurring categories were identified: past learning wounds, present instrumentalism, and future value anxiety. Second, teaching activities were mapped against these diagnostic categories to examine how each intervention responded to a specific learning barrier. Third, student responses, notes, peer-evaluation materials, and classroom artefacts were examined for evidence of engagement, language output, knowledge organisation, and evaluative participation.

The analysis was interpretive and pedagogical rather than statistical. It sought to establish a transparent chain from diagnosis to intervention to visible learning evidence. To avoid overclaiming, the findings are presented as classroom-level indications of pedagogical affordances rather than proof of causal effectiveness.

3.4 Ethical Considerations

Before formal publication, all student names, student numbers, avatars, and other identifying information should be removed from screenshots, notes, and artefacts. If student work or classroom interaction screenshots are reproduced as figures,

students' informed consent and institutional ethical approval should be obtained or confirmed according to local requirements. In this manuscript, student examples are described in anonymised and generalised terms.

IV. FINDINGS

4.1 Learning Diagnosis Reframed Student Reluctance as Pedagogically Meaningful

The first finding concerns the value of learning diagnosis. Students' reluctance to engage in English learning was not treated as a simple matter of unwillingness. Instead, it was reframed as a meaningful signal of prior experience, current pressure, and future uncertainty.

The first barrier was past learning wounds. Many students associated English with mechanical memorisation, repeated drills, grammar correction, examination failure, and teacher-centred evaluation. As a result, they entered the university classroom with a sense that English was something they were not good at and did not enjoy. This diagnosis changed the teacher's response. Rather than asking students to immediately perform at a high level, the teacher introduced low-threshold output tasks designed to create early experiences of competence. For example, students were given structured pre-class English sharing tasks with limited time, manageable content density, and clear speaking frames. The aim was not perfect fluency but the experience of preparing, speaking, being heard, and receiving constructive recognition.

The second barrier was present instrumentalism. Students frequently judged classroom content by asking whether it would be tested. This was interpreted not as a moral weakness but as a rational response to years of assessment pressure. The intervention therefore did not reject examination needs. Instead, test-related concerns were connected to broader language abilities, such as selecting appropriate expressions, generalising meanings, describing processes, and organising ideas logically.

The third barrier was future value anxiety. Students' doubts about English in the age of AI translation were taken seriously. The teacher reframed English learning as a means of developing human capacities that AI tools do not automatically

replace: questioning, judging, organising, explaining, and using tools critically. This reframing helped shift the question from "Can AI translate faster than me?" to "Can I use English to express my judgement and organise my thinking?"

These diagnostic categories became the basis for intervention. The teacher did not attempt to persuade students abstractly that English was useful. Instead, the classroom was redesigned to let students experience confidence, exploration, and visible gain.

4.2 Low-Threshold Output Created Conditions for Confidence and Participation

The second finding concerns the role of low-threshold English output. For students with negative learning memories, a direct demand for sophisticated English performance may intensify anxiety. The pre-class English sharing task therefore used manageable requirements: short duration, clear structure, limited information density, and a predictable sequence of presentation, interaction, and summary.

This structure supported behavioural and emotional engagement. Students knew what kind of output was expected and could prepare within a controlled frame. The activity reduced the risk of public failure and allowed students to experience small successes. These early successes were important because students who believe "I am not good at English" often need evidence that they can still participate.

The task also created a bridge between personal experience and classroom language use. Students could select topics related to their interests, majors, industries, technologies, or social issues. In doing so, they were not simply completing a speaking exercise. They were using English to introduce something meaningful to themselves and potentially relevant to their peers.

The significance of this intervention lies in its modesty. It did not claim to transform students' English proficiency immediately. Rather, it created a repeatable classroom routine through which students could experience readiness, expression, recognition, and revision. In this sense, confidence was not built through persuasion but through repeated, achievable output.

4.3 Connected In-Class Tasks Shifted English Learning from Memorisation to Meaning-Making

The third finding concerns the effect of connected classroom tasks. Students were more willing to engage when English was linked with familiar experience, disciplinary knowledge, or professional imagination.

One example was the use of daily-life processes to support process language. Students were first invited to describe how to prepare a local dish or roast duck/goose legs. This familiar task helped them generate a sequence such as selecting ingredients, processing, cooking, and finishing. The teacher then connected this sequence to engineering process expressions in a reading unit, such as selecting, splitting, drying, and binding. The point was not to make the lesson entertaining through a popular topic. The point was to use familiar procedural knowledge as a scaffold for English process description.

Another example was the use of engineering-related questions. Classroom interaction records showed that students could respond to prompts about engineering thinking, including stages such as defining a problem, designing a solution, implementing the design, and testing or iterating. The answers were not always identical, but they demonstrated that students were beginning to organise professional ideas through English or English-supported conceptual language.

Language points were also turned into conceptual bridges. The word formula was connected with Descartes, analytic geometry, variable relationships, and logical explanation. The phrase career path was connected with function graphs, allowing students to represent professional development as linear growth, staged transitions, fluctuations, recovery, or accelerated growth. The term falsification was connected with scientific spirit, evidence, critical rationality, and truth-seeking. These examples show that language learning can remain language-centred while still connecting to students' wider knowledge world.

This type of task design supported cognitive engagement. Students were not only memorising vocabulary; they were using language to explain relationships, compare processes, and express judgement.

4.4 Knowledge-Management Notes Made Learning Processes Visible

The fourth finding concerns knowledge organisation. Students were guided to use a knowledge-management framework that distinguished declarative, procedural, and strategic knowledge. Declarative knowledge answered "What is it?" Procedural knowledge answered "How is it done?" Strategic knowledge answered "When and why should it be used?" Students were also encouraged to mark their level of mastery.

This framework helped transform note-taking from copying into learning diagnosis. For example, when students recorded related forms such as emergent, emerging, and emergency, they could be guided to distinguish word class, meaning, context, collocation, and common errors. Teacher comments encouraged students to reorganise knowledge instead of accumulating isolated words.

The value of this intervention was twofold. For students, the framework made their own understanding visible. They could see whether they merely recognised a word, understood its use, or could apply it in context. For the teacher, the notes revealed where students' understanding was fragmented or unstable. This allowed feedback to be more specific.

Knowledge management also supported self-regulated learning. Students were invited to monitor not only whether they had written something down but also whether they had understood what type of knowledge it was and how it could be used. This moved the classroom from "Did you take notes?" to "What kind of understanding does your note show?"

4.5 Participatory Assessment Moved Students from Answer-Givers to Evaluators

The fifth finding concerns student participation in assessment. The classroom did not rely only on teacher evaluation. Instead, students were encouraged to participate in evaluating answers, notes, processes, enthusiasm, difficulties, and improvement suggestions.

One strategy was dynamic grouping. Students were grouped according to language foundation, cultural knowledge, academic performance, and learning goals. However, the groups were not named A, B, and C, which could create deficit labels. Instead,

they were named “breakthrough group,” “specialised group,” and “comprehensive group.” The breakthrough group could answer first to check basic understanding; the specialised group evaluated the response and considered application; the comprehensive group added comments on accuracy, completeness, transfer, and expression quality.

This arrangement created differentiated participation without publicly ranking students. Students at different levels had meaningful roles. Some tested understanding, some evaluated use, and some extended the answer. This helped students see that assessment was not only about being judged but also about learning how to judge.

Peer assessment was also extended beyond classroom answers. Students could evaluate classroom notes, learning processes, learning enthusiasm, difficulties, task completion, and improvement plans. Cross-class question design was also proposed: one class could design questions for another class based on lesson content or CET-related skills. In this process, students moved from test-takers to question designers. They had to consider what knowledge point was being tested, what ability was required, where the difficulty lay, and why an answer was valid.

This shift supported feedback literacy. Students began to engage with standards, evidence, and improvement rather than merely waiting for teacher scores.

V. DISCUSSION

5.1 Engagement Should Be Designed, Not Demanded

The findings suggest that student engagement in EFL classrooms should be designed rather than demanded. If students are told to participate without being given safe, meaningful, and structured opportunities to do so, participation may remain superficial. In this case, engagement became more visible when the teacher first diagnosed students’ learning barriers and then designed tasks that responded to those barriers.

This point contributes to EFL motivation research by showing how motivation can be treated as a design problem. The teacher did not simply

attempt to increase motivation through encouragement. Instead, the classroom created experiences of competence, connection, and gain. This aligns with self-determination theory, which emphasises the importance of competence, autonomy, and relatedness. It also resonates with engagement research that sees engagement as responsive to context and classroom environment.

5.2 Meaningful English Learning Can Remain Language-Centred

A second implication concerns the relationship between English teaching and wider knowledge. Connecting English with professional or personal topics does not mean abandoning language teaching. In this case, language remained central. Students practised speaking, process description, vocabulary distinction, explanation, and evaluation. However, these language activities were embedded in meaningful contexts.

The examples of formula, career path, and falsification show that language points can be used as entrances into meaning-making. Students learned vocabulary, but they also used vocabulary to organise thinking. This is important because EFL classrooms sometimes separate language accuracy from meaningful expression too sharply. The case suggests that students may engage more deeply when language forms are linked with ideas, problems, and communicative purposes.

5.3 Formative Assessment Can Mobilise Students as Co-Constructors of Learning

A third implication concerns assessment. Teacher feedback is important, but it is insufficient if students remain passive recipients. When students evaluate answers, notes, processes, and questions, they begin to internalise learning standards. They also become more aware of their own difficulties and next steps.

This finding extends formative assessment research into the specific context of vocational undergraduate College English. It suggests that peer assessment should not be limited to rating final products. It can include evaluating learning enthusiasm, classroom notes, learning processes, knowledge use, difficulties, and improvement plans. In this way, assessment becomes a shared learning process rather than a terminal judgement.

5.4 Local EFL Practice and International Relevance

Although the study is locally situated in a Chinese vocational undergraduate classroom, its relevance is not limited to China. Many EFL contexts face similar problems: students may have negative prior experiences, strong examination pressure, and doubts about the future value of English. The case offers a transferable principle rather than a fixed model: teachers can begin with learning diagnosis, design low-threshold but meaningful output, connect English tasks with learners' worlds, and make growth visible through participatory assessment.

At the same time, the local context matters. The importance of CET-4/6, the emerging identity of vocational undergraduate education, and students' AI-related doubts shape the specific classroom problem. International readers should therefore understand the case as an example of how EFL pedagogy can respond to local pressures while contributing to broader discussions of engagement, feedback, and meaningful language learning.

VI. CONCLUSION

This paper has presented a qualitative classroom-based case study of College English teaching in a Chinese vocational undergraduate EFL classroom. The study examined how learning diagnosis was translated into pedagogical intervention and how student engagement became visible through low-threshold output, connected language tasks, knowledge-management notes, and participatory assessment.

The case suggests that students' reluctance in English learning should not be reduced to lack of ability or discipline. It may reflect past learning wounds, present examination pressures, and future value anxieties. A responsive pedagogy therefore needs to move beyond telling students that English is useful. It needs to design experiences in which students can speak, connect, organise, evaluate, revise, and see evidence of their own growth.

The study makes three contributions. Pedagogically, it proposes a diagnosis-intervention-evidence model for College English teaching. Theoretically, it connects EFL engagement, meaningful output, self-regulated learning, and formative assessment in a vocational undergraduate

classroom. Methodologically, it demonstrates how classroom process materials—slides, student responses, notes, peer assessment, and reflective teaching records—can be used to examine teaching interventions qualitatively.

The study is limited by its single-case design and reliance on naturally occurring classroom materials. It does not provide experimental evidence of proficiency gains. Future research should collect longitudinal student reflections, pre- and post-intervention speaking or writing samples, peer-assessment records, and interview data to examine how such interventions influence language development, learner identity, and engagement over time.

Nevertheless, the case indicates that meaningful College English teaching is possible when teachers do not merely ask students to participate, but build the conditions for participation. When English learning helps students regain confidence, explore connections, organise knowledge, and participate in evaluation, classroom "fun" becomes more than atmosphere. It becomes a pathway toward visible learning and sustained growth.

REFERENCES

- [1] Black, P., & Wiliam, D. (1998). Assessment and classroom learning. *Assessment in Education: Principles, Policy & Practice*, 5(1), 7-74. <https://doi.org/10.1080/0969595980050102>
- [2] Braun, V., & Clarke, V. (2006). Using thematic analysis in psychology. *Qualitative Research in Psychology*, 3(2), 77-101. <https://doi.org/10.1191/1478088706qp063oa>
- [3] Carless, D., & Boud, D. (2018). The development of student feedback literacy: Enabling uptake of feedback. *Assessment & Evaluation in Higher Education*, 43(8), 1315-1325. <https://doi.org/10.1080/02602938.2018.1463354>
- [4] College Foreign Language Teaching Steering Committee under the Ministry of Education. (2020). *大学英语教学指南（2020版）* [Guidelines for College English Teaching (2020 edition)]. Higher Education Press.
- [5] Dörnyei, Z. (2005). *The psychology of the language learner: Individual differences in second language acquisition*. Lawrence Erlbaum Associates.
- [6] Ellis, R. (2003). *Task-based language learning and teaching*. Oxford University Press.

- [7] Fiorella, L., & Mayer, R. E. (2015). *Learning as a generative activity: Eight learning strategies that promote understanding*. Cambridge University Press.
- [8] Fredricks, J. A., Blumenfeld, P. C., & Paris, A. H. (2004). School engagement: Potential of the concept, state of the evidence. *Review of Educational Research*, 74(1), 59-109.
<https://doi.org/10.3102/00346543074001059>
- [9] Nicol, D. J., & Macfarlane-Dick, D. (2006). Formative assessment and self-regulated learning: A model and seven principles of good feedback practice. *Studies in Higher Education*, 31(2), 199-218.
<https://doi.org/10.1080/03075070600572090>
- [10] Pekrun, R. (2006). The control-value theory of achievement emotions: Assumptions, corollaries, and implications for educational research and practice. *Educational Psychology Review*, 18, 315-341.
<https://doi.org/10.1007/s10648-006-9029-9>
- [11] Ryan, R. M., & Deci, E. L. (2000). Self-determination theory and the facilitation of intrinsic motivation, social development, and well-being. *American Psychologist*, 55(1), 68-78.
<https://doi.org/10.1037/0003-066X.55.1.68>
- [12] Swain, M. (1985). Communicative competence: Some roles of comprehensible input and comprehensible output in its development. In S. M. Gass & C. G. Madden (Eds.), *Input in second language acquisition* (pp. 235-253). Newbury House.
- [13] Topping, K. J. (1998). Peer assessment between students in colleges and universities. *Review of Educational Research*, 68(3), 249-276.
<https://doi.org/10.3102/00346543068003249>
- [14] Zimmerman, B. J. (2002). Becoming a self-regulated learner: An overview. *Theory Into Practice*, 41(2), 64-70.
https://doi.org/10.1207/S15430421TIP4102_2