

## Alternative Assessment: Exploring the Effectiveness of Self-Assessment Practice among Engineering Students

### Penilaian Alternatif: Meneroka Keberkesanan Penilaian Kendiri dalam Kalangan Pelajar Jurusan Kejuruteraan

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#### ABSTRACT

*There are numerous ways available for lecturers to assess their students' learning progress and one practical way is through self-assessment. Instructors should not under-estimate their students' capability and interest in assessing themselves. Instead they should be given the opportunity to be involved in the assessment process. One salient advantage of this practice is to enable students to identify their own strengths and weaknesses in order improve themselves. The main purpose of this article is to investigate the implementation of self-assessment as a classroom assessment tool among engineering students in Universiti Kuala Lumpur British Malaysian Institute. Specifically, this study intends to investigate the accuracy of engineering students when assessing their own writing skill and the students' and lecturers' reactions with regard to the use of self-assessment as one of the classroom tools for assessment in a university language course. The subjects of this study were 137 diploma students from several engineering courses. Data in the form of written assignments were collected throughout the study and analysed via students' own analyses and lecturers' evaluation. The findings revealed that majority of the students, most of whom were Malays, would under-rate themselves. With regard to the use of self-assessment in the classroom, most of the students remarked that self-assessment is something positive and most of them viewed the procedure as a meaningful assessing experience.*

*Keywords: Interview; metacognitive; self-assessment; self-efficacy; students' feedback*

#### ABSTRAK

*Terdapat banyak kaedah yang disediakan untuk para pensyarah menilai kemajuan pembelajaran para pelajar dan salah satu kaedah yang praktikal adalah melalui penilaian sendiri. Sehubungan dengan itu, para pensyarah sepatutnya mempertimbangkan kebolehan serta minat pelajar untuk menilai kebolehan sendiri. Mereka perlu diberi peluang untuk melibatkan diri dalam proses penilaian. Antara kelebihan penilaian sendiri adalah kebolehan pelajar untuk mengenal pasti kekuatan serta kelemahan mereka, seterusnya memperbaiki kelemahan tersebut. Tujuan utama kajian ini adalah untuk menyiasat pelaksanaan penilaian sendiri sebagai alat penilaian dalam kelas di kalangan pelajar kejuruteraan di Universiti Kuala Lumpur British Malaysian Institute. Secara khusus, kajian ini bertujuan untuk menyiasat ketepatan pelajar fakulti kejuruteraan apabila menilai kemahiran penulisan mereka dan mengetahui reaksi pelajar dan pensyarah berhubung penggunaan penilaian sendiri sebagai salah satu kaedah penilaian di dalam bilik darjah untuk kursus bahasa Inggeris di universiti ini. Subjek kajian ini terdiri daripada 137 pelajar diploma yang dipilih daripada beberapa kursus kejuruteraan. Data dalam bentuk tugas bertulis yang dikumpul sepanjang kajian dan dianalisis melalui penilaian sendiri di kalangan pelajar dan juga penilaian pensyarah. Hasil kajian telah menunjukkan bahawa majoriti pelajar, yang kebanyakannya terdiri daripada pelajar Melayu, didapati kurang berkeyakinan dalam proses penilaian sendiri. Untuk penggunaan sebagai penilaian sendiri di dalam bilik darjah secara menyeluruh, sebahagian besar daripada mereka berpendapat penilaian sendiri itu sendiri adalah sesuatu yang positif dan kebanyakan mereka melihat prosedur ini sebagai pengalaman yang bernilai serta bermakna.*

*Kata kunci: Temubual; metakognitif; penilaian sendiri; efikasi sendiri; maklum balas pelajar*

## INTRODUCTION

A shift of teaching approaches from teacher-centered to student-centered is now a global phenomenon that occurs both in schools and universities. The traditional way of learning using instruction paradigm has given way to self-discovery of knowledge. The learning process does not necessarily come from the transfer of knowledge from the teacher (Barr & Tagg 1995). In line with this significant paradigm change, methods of assessing students have also evolved to become more students-centered. Student-centered approach and self-regulated language learning are seen to have a direct link with the use of alternative assessment (Dickinson 1987; Nunan 1998). Self-regulated learning matches alternative assessment as it offers learners more control and autonomy over the process and outcome of their own learning (Cameron 2001).

According to Birenbaum and Dochy (1996), there are numerous ways in which authentic assessment can be implemented in tertiary education but a lot of attention has been given to alternative assessment in the last decade. Some instances of alternative assessments include self, peer, co-assessments, portfolio assessments and performance assessments. The traditional way of assessing the students is no longer viewed as the only way to assess students' understanding and performance. Nowadays, assessment is seen more as a learning tool rather than as an assessment tool (Arter 1996; Dochy & McDowell 1997).

According to Huba and Freed (2000), this includes learning centered assessment as suggested by Boud and Falchikov (1989) who define self-assessment as the involvement of learners in making judgments about their own learning particularly about their achievements and the outcomes of learning. Self-assessment or sometimes labeled as self-evaluation involves learners discovering what they know and what they feel in terms of what they are able to do (Boud 1995). Self-assessment is now considered as part of the learning process. According to Dickinson (1987:151) it is partly a "process of learning how to learn". Sluijsmans, Dochy and Moekerke (1998) however disagree with some educationists such as Froyd and Simpson (2010) as they claimed that self-assessment is mostly used for formative assessment in order to foster reflection on one's own learning processes and results.

Past studies have revealed that self-assessment can be carried out in various forms. Listing of abilities and Likert scale were approaches used by Harrington (1995). In 1994, Gentle introduced electronic interactive device, and audiotaped self-assessment instrument (Anderson & Freiberg 1995). Despite the advantages as well as the variety of ways in which self-assessment could be applied, self-assessment received less attention by educators and it is also the least preferred type of learning-centered assessment. Self-assessment is also not widely used because of several reasons namely due to issues such as impartiality, validity and reliability (Froyd & Simpson 2010). Furthermore, it is widely known that students are prone to overrate themselves as shown in Hosking et al.'s (2012) study.

Studies on self-assessment in Malaysia are rather limited in number, although there many studies on it in other parts of the world. However, several major local studies have been identified such as by Tiew (2010) who focused on peer assessment particularly with regard to class participation and self-evaluation of students from business faculty. In another study, Noraini and Noraiha (2012) investigated learners' acceptance level of self-assessment. Another related study was by Mohd Sallehudin and Ruzy Suliza (2005) who investigated self-assessment practices of Malaysian students of different ethnic groups in which they found that non-Malay students were more accurate in reflecting their language abilities compared to Malay students. Yet no similar study has been done to seek engineering students' accuracy in assessing their own work especially in language learning.

Educationists in Malaysia rarely consider self-assessment as one of the options in their classroom assessment practices. They generally agree that time constraint is one issue that needs to be addressed first before one could contemplate implementing self-assessment as a tool for evaluation purposes. Another factor relates to the teaching workload and it is not uncommon in this country to see instructors overburdened with workload which sometimes require them teaching twenty or more credit hours per week and having classes with up to 40-80 students in each class. This scenario holds true for lecturers in Universiti Kuala Lumpur British Malaysian Institute (UNiKL BMI) as they have to handle large number of students per class and it is not infrequent to see them teaching multiple subjects every semester.

Obviously, it would be a daunting and a difficult process for the lecturers to read and respond to the students' written tasks. Hence, the use of self-assessment can be considered as a practical way to overcome large classes and in situations where lecturers are given heavy workload. Due to the concerns raised on these issues, it is crucial to carry out a study to investigate whether self-assessment could be used as an assessment tool for evaluation in a language course at an engineering faculty. Specifically, the objectives of this study are:

- 1) To investigate whether engineering students have the ability to fairly evaluate themselves in writing
- 2) To find out the reactions of the students and the lecturers with regard to the use of self-evaluation as a classroom assessment tool.

## METHOD

### PARTICIPANTS

This study involved the participation of 137 first semester diploma students who were taking various engineering courses such as Electrical Engineering, Electronic Engineering, Medical Engineering and Telecommunication at UniKL. The subjects chosen for this study were 96 male and 41 female students whose ages ranged from 18-20 years. They were chosen based on purposive sampling with pre-determined characteristics such as being the first year diploma students, registered for Foundation English courses, and easy access. This was important since the students met the lecturers twice a week for three hours and all of them did not have any prior experience with self-assessment. Hence, the participants of this study represented the population of diploma students of Universiti Kuala Lumpur British Malaysian Institute (UniKL BMI), Gombak. The Gombak campus was chosen because it is a campus with the highest number of diploma students enrolling each semester. The participants were well-informed about the research and they also agreed to be part of this study as participants and were willing to cooperate in any way possible. The participants also totally understood their contribution in this study as their written assignments were the primary data source and the questionnaires passed to them were the secondary data needed by the researchers for data collection.

Apart from the students, three English lecturers also took part in the study as second raters and interviewees. Purposive sampling was again used in choosing them. This group of lecturers was chosen because of four reasons namely: 1) all of them were very experienced English lecturers (with minimum 5 years of teaching experience), 2) they have taught the Foundation English course for at least 5 years, 3) their experience and familiarity with the course especially in terms of running the course including its assessment procedures and lastly 4) they understood and knew the concept of self-assessment. One of them was a senior lecturer; two held a Bachelor's degree and one obtained a Master's degree in English language studies. The only lecturer with the Master's degree is currently pursuing her Ph.D in Language Testing and Evaluation. These lecturers were also active in organizing English-related events and activities with students outside the classroom. Nevertheless, the lecturers were all female as there were no available male lecturers teaching the course when the data needed for the research was collected. Consent was also obtained from all of them and they agreed to be interviewed. In line with the ethics of doing research, the identities of the lecturers involved were kept confidential and should remain anonymous.

### MATERIALS

This research employed a number of materials which included:

*Written Assignments* Written assignments in the form of "Journal entries" were given to the participants. They were required to write several journal entries on a multitude of topics. The coordinator of this course was given the responsibility of constructing all the three different journal entries. In constructing the tasks, attention was paid to content validity as suggested by Henning (2013). Therefore, all three different topics given to students were based on the Malaysian context. This is to ensure that the students could write based on their personal experiences and backgrounds. The three topics assigned to them were i) Journal One: "Describe your feelings as a university student. How does it change your life as a person now? ii) Journal two: If you could change one thing about Universiti Kuala Lumpur British Malaysian Institute, what would it be? Why would

*you make these changes?* and lastly iii) Journal three: *There are dictionaries, thesaurus, reference books, BESTA, Google translate and others. How have these tools helped you in learning English?*

**Rating Scale** In order to assist the students in evaluating their written assignments, they were provided with a rating scale well as a detailed explanation by their respective lecturers. The rating scale consists of five levels of grade ranging from 0 to 20 for poor writing, 21 to 40 for satisfactory, 41 to 60 for moderate, 61 to 80 for good and the highest is 81 to 100 for high level of understanding and excellent journal. The students could also write their comments in the space provided. Two limitations of this rating scale are the range which is too big for each category and the explanations for each level of grade being too general and broad. Unfortunately, none of the lecturers including the coordinator of this course could change or revise the rating scale as this was adopted and practiced for this centralized course. If changes were to be made, the decision had to come from the higher authority. This would take a very long time and involve a lot of paper works as the assessments and rating scales are used throughout all UniKL campuses around Malaysia. Moreover, students who registered for this course are between 200 to 300 and sometimes could reach up to 350 students. Therefore, the committee believed that using holistic marking is the best method especially in reducing the burden of the teachers who need to read and mark hundreds of writing scripts. Perhaps changes should be made soon in order to improve both the assessments as well as the rating scale.

**Questionnaire** Sets of questionnaires titled "Students' View on Self-Assessment" adapted from Brindley and Scofield (1998) were also used and distributed to the students. Items in the questionnaire were fully adapted without any modification. The main aim of the questionnaire was to elicit their personal opinions and views with the regard to the use of self-assessment among students as one of the tools of classroom assessment. The students were asked to choose their desired responses based on a Likert scale, ranging from 1 denoted as Strongly disagree to the scale of 5 indicating Strongly agree.

**Interview** Interview sessions were also conducted to obtain lecturers' opinions and reactions to the implementation of self-assessment.

Participants' consent was obtained a few days before the interview sessions were conducted to avoid any unethical issues. There were nine questions and the interview sessions were conducted on August 4, 2015. All the questions were evaluated, checked and validated by a content expert from Universiti Kebangsaan Malaysia, Bangi.

**The Assessment Procedures** There were four phases involved in the assessment procedure. Throughout the process, the lecturers served more as a facilitator in guiding and assisting the students. The students were methodically monitored by the lecturers even though they were given 'carte blanche' to assess their own essays. Nevertheless, the lecturers still assessed and graded the written assignments as the second assessor. The researchers then compared both scores of the first and second assessor for all the three written assignments. Next is to group the written assignments into three categories, namely: overrated, accurately rated and underrated. These terms were used extensively across various studies on self-assessment (Boud & Falchiko 1989; Gentle 1994; Suzuki 2009; Nakai & Usui 2012; Hoskins et al. 2012). Accurately rated refers to assignments which are awarded the same exact marks by the first and second assessors, or the one within two points from one another. Meanwhile, scores with the difference greater than two, either extra three marks and above or less 3 marks and more, than the written assignments should be categorized as overrated or underrated. This is the basis on how the written assignments were rated and the same process was repeated for all 411 written assignments.

The following are the four phases of self-assessment procedures employed in this study:

**First Phase** In the first week, a topic was assigned to the students so that they could complete their first written assignment. Next, they were introduced to the concept of self-assessment and given detailed explanation of their involvement in this collaborative self-assessment. Then, the lecturers enlightened them on how to assess and score their own written assignments based on the rating scale provided. The students were trained to read, assess and score their written assignments in more or less 30 minutes. Later, the lecturers who were also the second raters evaluated and graded the written assignment based on the same marking scheme given to the students. Since this was only



a trial phase with the purpose of familiarizing the students with assessing and grading procedures and also to prepare them for the upcoming stages, marks and grades were still awarded. However, they were not entered into the online database system.

*Second Phase* In the second week, six classes of 137 students were again given a briefing and training for 30 minutes on how to use the rating scale by their lecturers. After the training, they were allocated approximately half an hour to evaluate their written assignments and were officially allowed to score and grade their essays as the first assessors. Upon completion, they were notified that the second raters would also assess they written assignments and that feedback would be provided by the lecturers. The second written assignment was then given to the students as their next task.

*Third Phase* In the third stage, the students were given both the scores and comments of their first written assignments. Permission was given for them to look at the score as well as the comments given by the lecturers. The next step was explaining and discussing the strengths and weaknesses of their written assignments by the lecturers. The written assignments were assessed based on language, content and creativity. This was done to elucidate and establish 'standards' on how the written assignments were assessed and evaluated. Unlike the first and second stages where about 30 minutes were allocated for the participants to grade their written assignments, in this phase there was no time limitation given to the students to evaluate their own writing. It was only carried out based on the students' readiness and understanding of the whole process. The last procedure for the third phase was the distribution of the third and final journal written assignment which needed to be completed over the weekend.

*Fourth Phase* In week 4 which was the last phase of the self-assessment procedure, the students repeated the same measures as they did

in stage three. It was the last assignment to be evaluated and graded by the students as first raters. A set of questionnaire was then distributed and completed by the students. The last step involved the second rater evaluating and grading the scripts at their own time outside the class.

#### ANALYSIS OF DATA

##### *Self-Assessment of Students' Written Assignments*

All three written assignments rated by the first and second raters were analyzed by the researchers using a computer software. In this study, the Statistical Package for the Social Science (SPSS) software version 21 was utilized. Raw data of overvalued, underrated as well as accurately rated journal were keyed in and processed using SPSS 21. Another important factor was the discrepancies between the scores. The scores or percentages were then transferred into the computer for tabulation purposes.

#### ANALYSIS OF THE QUESTIONNAIRE

The questionnaire which comprises of 12 questions was collected and also analyzed using SPSS software version 21. Each item was analysed thoroughly and the results were then transferred into tables for data presentation purposes.

#### INTERVIEW

The three lecturers who taught Foundation English were interviewed by the researcher. A semi- guided type of interview was employed in this study. Their interview sessions were recorded then transcribed manually by the lead researcher. At this stage, the transcribed data were then described and classified into several categories. Data was then coded for qualitative content analysis (Krippendorff 2013) using NVivo 10. Qualitative content analysis involves the process of recontextualizing or reinterpreting the meaning of data repeatedly until certain or satisfactory interpretation is reached. Next, salient patterns or findings were identified as shown in Table 1.

TABLE 1. Number of students who accurately evaluated their essays

	Overrated	Accurately rated	Underrated
Assignment One	27%	20%	53%
Assignment Two	11%	11%	78%
Assignment Three	12%	15%	73%

## RESULTS AND DISCUSSION

### STUDENTS' ACCURACY IN EVALUATING THEIR WRITTEN ASSIGNMENTS

Table 1 shows the results of the students' assessments of their written assignments. As for written assignment one, 53% or 72 students of the total number of students (137) underrated themselves. The scores of between 50 to 65 were given by most of them. They graded their written assignments with low marks despite the instructors awarding higher marks. Nevertheless, there were 37 students or 27% of them who over-rated their assessments. They over-awarded themselves by giving scores of around 85 to 96 marks upon 100. Only the remaining 20% or 28 students rated their written assignments quite accurately.

The results are more or less similar for written Assignment Two as a large number of students (78%) still under-rated themselves. However, the

range of marks given by the students were slightly higher compared to written Assignment One. In general, the marks awarded by the students for their essays ranged between 60 to 75 marks. The percentage of both students who overrated and accurately rated their essays is around 11% each.

A total of 73% of the third written assignments were also underrated and dominated the overall results. As expected, only as small number of the students (12%) over-rated themselves and the number of students who were still able to grade their written assignments as accurate as the lecturers did were around 15%. It is obvious that majority of the students under-rated themselves in all three written assignments. In contrast, the number of students who over-rated themselves declined from written Assignment One to Three and the percentage of students who managed to accurately rate themselves fluctuate from one written assignment to another.

TABLE 2. Students' Perceptions of Their Participation in Self-Assessment Procedures

	Agree	Neither agree nor disagree	Disagree
Increases individual drive in the classroom	50	28	5
Increases personal motivation	45	31	14

### STUDENTS' REACTIONS TOWARDS THE USE OF SELF-ASSESSMENT

Table 2 indicates the percentage of respondents who were convinced that their participation in the self-assessment procedure raises their individual drive in the classroom and half of respondents (50%) agreed with this statement. The remaining 28% and 5% of the students chose not to pick any side and didn't agree with the statement. This concludes that most of the students agreed

that their individual drive in the classroom is somehow raised as they immersed themselves in the evaluation process. As for students' personal motivation, a total of 45% of the students agreed that their personal motivation towards both the assignment and the subject increased because they were well aware of their involvement in the assessment process. Nevertheless, 14% disagreed with this idea and the other 31% mentioned that they were not affected by it.

TABLE 3. Relationship between Self-evaluation and Participation

	Agree	Neither agree nor disagree	Disagree
Self-evaluation drives students to participate more	40%	43%	12%

Results in Table 3 reveals that a total of 43% of the participants neither agree nor disagree that self-evaluation drives them to participate more. Even though most of them reserved their comments,

there were 40% who disclosed that they would participate more since they knew they were evaluating themselves and only as small as 12% chose not to agree with the statement.

TABLE 4. Students' Capability in Self-assessment

	Strongly agree	Agree	Neither agree nor disagree	Disagree	Strongly Disagree
I do not feel sufficiently capable in marking my own essays.	18%	37%	29%	10%	1%

Table 4 indicates that a total 37% of the respondents agree and 18% strongly agree that they did not feel sufficiently capable of marking their own essays. A total of 29% of them did not agree or disagree while only a small percentage of them (10%) disagree and 1% strongly disagree that they were not capable of self-assessing their essays. This proves that Malaysian students are low in self-confidence. They did not believe in their own strengths and ability to assess their own work.

#### LECTURERS' REACTIONS TOWARDS THE IMPLEMENTATION OF SELF-ASSESSMENT

It is found out that all of them were very familiar with self-assessment as they have read and learned about either from their colleagues or the training that they have had. They were also able to define self-assessment as a process whereby an individual assesses his own work. When asked about their opinion on the value of self-assessment, Lecturer 1 claimed that "*self-assessment creates and brings sense of awareness to the students*". Lecturer 2 said that she believed "*by assessing themselves, they can try to improve...*" Lecturer 3 mentioned that "*direct involvement in the assessment process and exposure given on how their work are assessed and rated by others bring good insights*".

In terms of learning opportunities or benefits obtained from practicing self-assessment, several responses were recorded. Lecturer 1 and 2 claimed their students were more careful in writing their essays after they judged their work for the first time. They too worked harder to improve themselves in both ways. They even tried to find the loopholes. It is because they were able to set the parameter to get better scores in the future. Self-assessment has helped the students to improve themselves better for instance in the writing skill. It is also good in developing students' self-confidence through assessing their own work according to Lecturer 3.

The lecturers were asked whether they would agree if self-assessment was implemented officially as a major assessment tool. All of them came to an agreement that it is a wise idea to implement

self-assessment as another option for classroom assessment particularly at the tertiary level. However, they emphasised that all lecturers must be trained and well-informed and be fully prepared for the assessment. Moreover, one of the objectives of using self-assessment is assessing students' work and they must be clear of the procedure so that students' future is not at stake. One of the lecturers (Lecturer 1) highlighted that "*clear objectives and guidelines must be provided to all academics. To ensure it becomes a standardized tool, I am not sure as it is time consuming and can only be done in class*". Lecturer 2 was also somewhat pessimistic when she said "*honestly I am not sure if we are ready for it but it's good. Maybe because we have some egos that we don't believe in our own students as they might take advantage on marking procedures and misuse the authority given to them*".

All the lecturers strongly believed that high self-confidence among some of the students were the main factor for overestimating their work. However, one of the lecturers stated the downside of the students who were overestimating and overrating their work by saying "*this is also dangerous because it might imply that they think they are doing it the right way but actually there are many more different things they need to learn*". On the other hand, they all agreed that students who underestimated and underrated their work were those with low self-confidence. Lecturer 1 said that "*it is because they are Malays and they tried to be humble as well as underestimating themselves. They also have low self-confidence and they believe they should not overrate themselves*". This indicates that the students' demographic background did influence their accuracy in assessing their own work.

It is also agreed by all the lecturers that the students only considered two elements when assessing and marking their own written assignments. They were believed to only consider the element of creativity and paid more attention to the content and little attention was given in terms of language and grammar. However, the students had

the tendency to improve their writing since they were more aware of what they wrote because they were involved in self-assessment more frequently. Lecturer 2 stated that *“if the first and second rater marks are more similar then we can depend on them giving marks on their own, so it means that we don't have to go on details in giving marks”*.

Without doubt, all the lecturers agreed that exposing the assessment tools to the students was very helpful in both ways. The students understood better on what basis their works were assessed by the lecturers, and then they could set personal parameters each time they wrote the essay. This helped them so much in the learning process. The rating scale too helped in making sure that the students keep track and not be out of context when writing. The scale also guided them well in assessing their own tasks since they were inexperience assessors.

All the lecturers would not consider implementing self-assessment for other subjects and skills. They claimed that they were not ready because there were many aspects to consider before they could actually implement it. They gave the same responses which were basically *“maybe yes but not now.....”* and *“I think no harm to try and we will see how it goes from now”* said Lecturer 3.

The lecturers provided several different responses in terms of the negative aspects of self-assessment. Lecturer 1 stated that the only negative aspect she sees is that the students did not really know when they were assessing and most of them were not even honest to themselves. Whereas Lecturer 2 believed that the students might take advantage of this self-assessment and use it as a strategy to get better marks and good grades as they could ‘play around’ with the figures. Lastly, Lecturer 3 agreed with Lecturer 2 that the tendency for the students to take advantage and misuse the ‘authority’ given to them is likely very high. She was also concerned about time as self-assessment practice is time consuming since it could only be done in class and during class time. Letting the students to self-assess their work could also jeopardize their marks and grades if not properly managed and supervised by their respective instructors.

## DISCUSSION

The extent of UniKL British Malaysian Institute School of engineering students’ ability to accurately evaluate and grade their own writing is the major findings of this study. The Malay students were rather unreliable at assessing their own work is the salient finding established by the researchers. Almost all of them under-rated their capability in all the three journal entries in determining the factor which categorized them as inaccurate assessors. The result follows previous self-assessment study (Suzuki 2009). The findings of this study were that students tend to underestimate text changes during self-assessment but awarded slightly higher grades during peer-assessment. Almost all of them under-rated their capabilities to self-evaluate and grade their own writing in all three journal entries. For this reason, these students are categorized as inaccurate assessors. This is supported by previous study on self-assessment done by Suzuki (2009) which also found students who prone to underestimate themselves during self-assessment practice but not during peer-assessment. Another study which are in agreement with this present study is by Lim (2007) involving Brazilians and Korean students who were also asked to self-assess their own writing turned out to have similar results since the students under-value their own work. The students did not have the confidence to assess their own work especially in evaluating the grammatical mistakes they did. This proves that the inability to personally evaluate their own tasks did not only happen among the Malay students but also other non-native speakers of English in general. Meanwhile, those students who turned up to be reliable and accurate assessors represented the minority group. Result of this study is also supported by one of the most important theories in language learning, the metacognitive theory. Majority of the students underrated themselves and their writing assignments as a result of self-awareness, one of three aspects of metacognition (Brown 1987). Awareness is one aspect of metacognition (Brown 1987) which was detected through students’ self-awareness when majority of the students underrated themselves and their



writing assignments. It is obvious that these students were aware of their proficiency levels especially their capability to write good English essays. Metacognitive was indirectly adopted in this study as the students monitored their own learning progress via self-assessment of their own writing tasks. Nemoto (2014) used self-assessment to give students the opportunity to better plan their projects and engaged closely because she wanted the students to take charge of their own learning.

Findings of this study is found to be similar with another local study done by Mohd Sallehudin and Ruzy Suliza (2005) in which the Malay students also tend to underrate their assessment of their language ability compared to students from other ethnic groups. In contrast, a group of Japanese researchers also found Japanese students who overvalued and gave relatively high scores than they truly deserve (Hoskins et al. 2012). Yet another study by Griffiee (1995) showed all of his research respondents rated themselves lower at the beginning of the school year and higher as the semester progressed. Apart from focusing on the students' ability to be accurate and reliable assessors throughout the self-assessment process, this study also looks at another perspective which is students' level of self-esteem. As for Malaysians, particularly the Malays, their self-esteem is very low that most of the students underrated their own writing even if they were actually good and deserved higher marks. This scenario is observed to be happening here in UniKL British Malaysian Institute since the population of Malay students is the largest. They gave low marks to their journal writings and obviously did not trust their own ability to assess their writings. Brown's (2000) theory of task self-esteem supports the results of this study. The task of self-assessment requires individuals to assess their own work based on specific tasks and situation. This group of UniKL British Malaysian Institute students has shown that their low self-esteem in language learning domain had affected and hindered the language learning process using self-assessment. On the other hand, that is not how Malaysian students are portrayed in a study by Vijchulata and Lee (1985). They claimed that Malaysian university students proved to be both interactively and instrumentally motivated to learn English. Therefore, the motivation to learn the language and the important things they learnt from the entire process of self-assessing their own assignments are far greater than focusing on a

group of participants who were found to underrate their own writing skills as well as their low self-esteem.

Another important area which is highlighted and put forward by the research is students' responses on self-assessment. Interestingly, the students who were involved in the self-assessment procedure embraced and viewed it positively despite the large number of them under-rating themselves consistently in all of the three journal entries. This finding is similar with another study done by Noraini and Noraiha (2012), in which they found that a group of Universiti Sains Malaysia students showed high level of acceptance towards self-assessment when it was fostered among novice learners. The students were also confident and found that involving themselves in classroom assessment such as self-assessment boosts their interest in language learning. This is also supported by the result from a local study which stated that intrinsic and extrinsic factors drive and strongly inspire Malaysian students to learn foreign language (Ainol Madziah & Isarji Sarudin 2009). Freshman of private university students in Japan also mentioned that the experience they gained from self-assessment has made them determined to work harder to get better scores. Moreover students felt appreciated from the trust given by the instructors and the opportunity to trust in their own judgment as raters (Hale 2015). This has confirmed that self-assessment is more than just an alternative assessing tool since it stimulates a person to reflect on his work, nurtures his learning skills and abilities as well as encourages students to be more responsible of their own learning (Sluijsmans, Dochy & Moerkerke 1999; Nurul Hadani et al. 2015).

In addition, from the psychological aspect, students' positive feedback on self-assessment practice in the class shows their judgments, abilities and how well they perform class-related tasks (Bandura 1986). In other words, not only does self-assessment promotes and introduces assessment procedure to students but also increases their self-efficacy. Students' motivation is observed to have increased from their feedback. This is in line with McMillan and Workman's (1998) finding which claimed that the use of both authentic assessment tasks and feedbacks given to students after or before assessment process takes place boost their interest and drive in learning. Self-assessment practice in class also provides a medium for

students to improve themselves by learning from their mistakes as well as from feedbacks. As can be expected, several features of self-assessment such as the ownership of learning process which students gain, students' ability to monitor and chart their own progress and the opportunity to improve themselves before they receive final grades are linked to student's motivation (Geeslin 2003). Moreover, significant findings from Bullock (2010) has proven that self-assessment is more than just a type of classroom assessment since it triggers curricular innovation as well as promoting learner-centered approach in assessment.

### CONCLUSION

In conclusion, this study reveals that Malay students are less capable and less reliable in assessing their own work because they tend to underrate themselves. These findings also signify that students' ability towards self-assessment practice is closely related to their level of self-esteem. Nevertheless, their positive feedback shows that self-assessment can be implemented in our context.

This study has provided evidence on the applicability of self-assessment practice in Malaysian classrooms judging from teachers' and students' receptions. However, additional research needs to be conducted to examine other contributing factors. The present study mainly focuses on a group of engineering students and most of them were Malay students. Therefore, future research should be done to investigate non-engineering students' ability to self-evaluate their own work. Non-Malay students should also be considered as subjects of future studies since they also represent the population of second-language learners of English in Malaysia. Written assignments were the only tools used to evaluate students' ability in self-assessing their language learning. Thus, it is highly recommended that other language skills such as reading, listening and speaking skills should also be considered to find out the possibility of integrating self-assessment practice within these skills. The number of participants in this study was limited. Only 137 students and 3 lecturers were involved. Since this study was only confined to one university, the findings could not be generalized as a response of all Malay engineering students and lecturers who teach English in Malaysia. It

is suggested that in the future, similar research studies should be done on a bigger scale to include students from various courses and ethnicities.

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