Student-related factors of academic performance: A case of non-accounting students in accounting module

Rodrigo M. Velasco

Abstract
This paper evaluated the student-related factors associated with the academic performance of the non-accounting Omani students in their first undergraduate accounting module. Qualitative research method was employed through a self-made survey tool. The tabular data were integrated with percentages to supplement the analysis. The students’ academic performance can be attributed to learning approach and study habits not prior learning. Students prefer surface learning approaches which do not fit the demands of the accounting module while the positive study habits mainly focus on passing the assessments rather than building knowledge and skills. There is a strong need for a student-centered classroom which are focused on knowledge acquisition than assessments. A pre-requisite module to basic accounting can be considered as a bridging program. The teachers are also expected to employ methodologies such as formative assessments to enhance the students’ learning and entice effective habits. This study has various statistical and scope limitations. For this, other student-related factors such as demographic profile, performance in other modules and commitment to learning should also be considered in the future studies. Moreover, the actual module performance of the students can be statistically correlated to their prior knowledge, study habits and learning approach.

Keywords:
factors for academic performance, accounting, student-related factors, case study of Omani students

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About the author:
Lecturer, Faculty of Business and Management Studies, Gulf College, Sultanate of Oman
1. Introduction

In most of the business programs, accounting is regarded as highly challenging than any other business modules due to its global phenomenon of high failure rate (Alanzi, 2015; Borges, Santos, Abbas, Marques & Tonin, 2014; Fakoya, 2014). The most common identified student-related factors associated with academic performance include students’ individual characteristics (Bean, Bush, McKenry & Wilson, 2003), personal responsibility of the learners (Gracia & Jenkins, 2002), commitment and procrastination (Borges, Santos, Abbas, Marques & Tonin, 2014), attendance (Duve, 2016; Alanzi, 2015; Jameel & Hamdan, 2015), prior knowledge (Nayebzadeh, Aldin, & Heirany, 2011; Al-Mutairi, 2011; De Villiers & Farrington, 2017), motivation and determination (Xiang & Hinchliffe, 2019) and learning techniques (Ozpeynirci, Yucenur, Duman & Apak, 2013). Moreover, studies conducted in English as Second Language (ESL) countries, academic performance is mostly associated with knowledge of English (Sebrina, Serly & Taqwa, 2018; De Villiers & Farrington, 2017) and surprisingly, nationality (Al-Mutairi, 2011). This holds true of the Arab countries where English was lately adapted as a medium of instruction in most of the higher education institutions. Studies focused on accounting performance identified English (Andrade, 2006; Al-Sohbani & Muthanna, 2013; Bowen, 2011) and educational culture (Ghazal, 2019; Shafei, 2018) as main causes of academic failure. In fact, Khadijah AlHaddad, Mohamed and Musa AlHabshi (2004) and Almajed and Hamdam (2015) noted the relationship in the academic performance and English language proficiency of the limited-English-proficient accounting students. The same observation of Rivero-Menendez, Urquia-Grande, Lopez-Sanchez and Camacho-Minano (2018) that proficiency in the English language improved students’ comprehension of the accounting concepts and terminologies. However, there is an uprising of the higher education in the Arab region (Martin & Hassan, 2019).

While several studies focused on the academic performance in accounting, only few of which pertains to the non-accounting students. In the few studies conducted, there is even higher rate of poor performance. This is probably an effect of the underlying ‘accounting stigma’ among non-accounting majors. Most of them perceive the module with more maths and less communication (Meixner, Bline, Lowe & Nouri, 2009). Non-accounting students mostly have poor performance (Muda, Hussin, Johari, Sapari & Jamil, 2012) primarily because
of their math anxiety (Joyce, Hassall, Arquero-Montano & Donosoanes, 2006). Owusu, Bekoe, Okyere and Welbeck (2019) states that non-accounting students are largely motivated by extrinsic not self-interest.

The same scenario exists in most of the colleges and universities in Oman where compulsory accounting course in various business programs are offered. While there are less studies of non-accounting students’ academic performance in accounting, there is even less study conducted in the Oman setting. A study conducted by Khan & Al Mamari (2019) on the perception of the non-accounting Omani students towards basic accounting found that they lack knowledge of application, formulae usage and decision making. On testing the causes of poor academic performance of Omani students, Alami (2016) took the case of students in a higher college of technology. Student-related factors, teacher-related factors, family-related factors and some other personal factors were the macro-groups of factors affecting poor performance. There was no study conducted on the academic performance of non-accounting students in accounting modules. Thus, the current study fills this gap.

The point of inquiry emerged from the results of the Focus Group Discussion (FGD) of the 14 accounting and finance teachers conducted every end of the semester that the academic performance of the students in the introductory accounting is mainly caused by lack of prior knowledge and other personal factors such as skills and capabilities, study habits and learning approach. This introductory accounting module is offered for Business Management, Marketing and Economics students. It covers basic accounting concepts, bookkeeping, preparation of financial statements and basic managerial accounting concepts and calculations. There are two examination assessments which contain both theories and calculations. The module has been a concern for the longest period due to its lowest pass rate among other modules. Statistical data available at the end of the AY 2017 – 2018 posed an upsurge to 50% failure percentage in the module. Of the 352 students of the 2nd semester AY 2017 – 2018, 32% failed the mid-term test while 43% failed in the final examination. Two batches with majority of repeaters have the highest failure of 67% and 61%. Of the total repeaters from the 1st semester AY 2017-2018, 63% failed again while 23% need to re-sit either midterm/final or both. There was high number of repeaters for second and third attempts as well. As this module is compulsory and common for most of the specializations, there were numerous cases of exit awards due to failure. Relative to the results of the FGD, this study presumes that the academic
performance of the students is highly influenced by the three student-related factors as prior knowledge in accounting, study habits and learning approach.

2. Literature Review

2.1. Theoretical background

2.1.1. Dynamic Skills Theory

The factors identified in the FGD are congruent with the Dynamic Skills Theory as popularized by Kurt W. Fischer (1980). This theory postulates that skills develop through levels of complexity which includes external, internal and interpersonal contexts. As the results refer mostly to the student-related factors, the internal world, referring to self, is the main focus of this study. Relative to the age-range of the respondents is the adulthood level of development which refers to the abstraction forming the principled tier.

According to Sobat (2003) new knowledge is founded on prior experience which enhances ability of the students to apply in real situations. Application of this theory in teaching suggests that students take active position in the classroom, lessons be in real-life scenarios, collaborative learning is encouraged and ample resources are provided (Liu & Zhang, 2014). In higher education, it can be applied in problem-based learning as suggested by Hendry, Frommer & Walker (1999) as teaching supports reflection, provides sufficient independent learning and provides formative and summative feedback. Pereira and Sithole (2019) also stated that the teaching of accounting results to an improved system of knowledge acquisition.

As this theory propel that support is essential (King & Van Hecke, 2006), the current study presumes that development of the students is a product of previous knowledge and experience in accounting. Thus the skills and capabilities are founded on the constructivist theory (Bruner, 1983). Constructivism explains how learner acquires knowledge through their previous experiences. The current study applied constructivism theory to determine the prior accounting knowledge of the students. This is fundamental to test any significant relationship with the learning approaches and teaching methodologies as applied in the accounting classes. Since the introductory accounting is taught at the level 4 with no pre-requisite accounting-based module, the previous accounting subjects in schools or other colleges as well as the other accounting-related experiences are taken.

2.1.2. Self-concept theory
To assess the study habits, the self-concept theory (Rogers, 1959) is applied. This theory postulates that self-concept includes cognitive and affective judgments in multidimensional aspects. According to Marsh, Xu & Martin (2012), it is an important mediating factor to choice behavior, persistence and achievements. As applied to higher education, the academic self-concept suggests that an individual develops and maintains a positive self-image (Eccles & Wigfield, 2002). According to Osborne & Jones (2011), the experience of higher education is strongly associated to self-concept. Rodriguez (2009) adds that the academic self relates to the fear of failure which is regarded as the negative self. Faye & Sharpe (2008) note that the ‘academic self’ motivates students to have certain behaviours. Since there are assessments which evaluate students’ academic performance, it is a key to develop and maintain a positive self-concept. These behaviors towards their academic journey are reflected in their study habits. According to Gbore (2006), study habits combine study method and study skill which is closely connected to academic success.

With the presumption that habits become the personality trait overtime, the study anchored on the self-esteem and personality trait dimensions of the self-concept theory. The students’ self-concept affects their study behavior and motivation in accounting module. It is characterized by their positive self-concept (positive study habits) and negative self-concept (negative study habits). This study upholds that knowing oneself determines behavior and responses to academic challenges thus reflecting in the actions towards these challenges. The theory was used to analyse the study habits of the respondents through which it determines the self-concepts of the students.

2.1.3. Kolb’s Learning style

The last theory is Kolb’s learning style (Kolb, 1985) which is used to analyse the applicability of the learning approaches of the respondents. Kolb and Kolb (2006) explain that learning style differs as well the various academic performances. In this theory, there are four prevalent learning styles emerging from genetics, experiences and effects of the environment. It also viewed learning as a four-stage cycle which includes concrete experience, reflective observation, abstract conceptualization and active experimentation. According to McLeod (2017), the concrete experience of students formed as a basis of future situations where students learn new experiences. The theory postulates the four learning styles: converger (abstract conceptualization and active experimentation); diverger (concrete experience and
reflective observation); assimilator (abstract conceptualization and reflective observation) and accommodator (concrete experience and active experimentation). According to Kolb & Kolb (2006), diverging prefers to watch than do, works in groups and openly receives feedback while assimilating involves logical approach, prefers reading, lectures and critical thinking. Meanwhile, converging prefers technical tasks, experiments new ideas and works with practical applications. Lastly, accommodating takes on practical and experiential approach.

According to Williams, Brown & Etherington (2013) students’ academic performance in the university is positively linked to their learning styles. Needles (2018) adds that diversity in assessment approaches is necessary because of multiple learning styles. In the context of Arab students, Chermahini, Ghanbari & Talab (2013) conclude in their study that learning styles are good predictor of any second language academic performance.

The use of Kolb’s learning style assumes that non-accounting students’ learning approaches affect their ability to pass the two major assessments of the accounting module. This will assess whether the preferred learning approach of the students is applicable to the study of the module as well as the strategies imposed by the teachers. The results of the study were mapped with the outcome of the cited relevant studies to critically analyse the assessment of the learning approaches.

2.2. Related Studies

2.2.1. Prior knowledge

Background knowledge acts as a foundation and building block of content and skill knowledge. In the context of student development, accumulation of prior knowledge helps skills and capabilities building. For a more effective teaching and learning, an assessment of prior knowledge ensures applicability of strategies and approaches. According to Zambrano, Kirschner, Sweller & Kirschner (2019), it benefits both the collaborative and individual learning. It also affects academic performance (Kamal & Ahuja, 2019). As Ambrose, Bridges, DiPietro, Lovett & Norman (2010) clearly put it ‘prior knowledge can help or hinder learning’.

On the test of relationship between prior knowledge and academic performance, several researchers applied the concept in the study of accounting students. In an Irish University, Byrne & Flood (2008) found significant association among prior academic achievement, prior knowledge of accounting, and students’ academic performance. Similarly, Mei Tan & Laswad
(2015) in New Zealand yielded the same results. On a much broader context, Alfan & Othman (2005) identified that prior knowledge of economics, mathematics and accounting is beneficial in entering both business and accounting programmes in Malaysia. Meanwhile, Bein, Trzewik & Maril (2019) and Xiang & Hinchliffe (2019) provided contrasting generalizations on the prior knowledge of repeating students in accounting. Similar to other studies, the former found a continuous influence of prior knowledge on learning but repeating students are more likely with prior high school accounting education.

There are few studies on the prior knowledge of non-accounting majors. Two studies conducted in UK and USA by Lane & Porch (2002) and Kaighobadi & Allen (2008), respectively focused on business students’ performance in core accounting modules. Fundamental results found that prior knowledge in the previous semester’s core courses is strongest predictor of academic success (Kaighobadi & Allen, 2008) and non-specialist academic performance was heavily influenced by high school academic achievement. Studies in the Arab context found similar results. The study of Yousef (2019) on Emirati students in undergraduate Statistics found that high school performance has significant relationship in their academic performance. Same results were found by Alanzi & Alfraih (2017) in the cost accounting students in Kuwait. Alanzi (2015) concluded that previous knowledge in accounting motivates students to perform better and improves their self-confidence.

### 2.2.2. Study habits

Previous studies show that study habits greatly affect students’ academic performance in all levels of studies. It keeps them focused on their academic goals and make intelligent use of their learning styles. There are many factors in study habits including learning plan, strategies, and motivational techniques. These factors include activities done by the students inside and out of the classrooms including their independent learning hours. There are a number of studies focused on the relationship between the different aspects of study habits and academic performance. Ahinful, Tauringana, Bansah & Essuman (2019) include motivation and engagement as factors while Icekson, Kaplan & Slobodin (2019) believe on optimism and its positive effect on academic performance.

Studies focused on the study habits of accounting students identified various variables such as self-efficacy (Byrne, Flood & Griffin, 2014), attendance (Paisey & Paisey, 2004; Schmulian & Coetzee, 2011) and communication apprehension (Gardner, Milne, Stringer &
Whiting, 2005). In a study among first year accounting students, Byrne, Flood & Griffin (2014) found that students lack self-efficacy to participate in academic activity which also affects their independent learning. Davies & Lee (2012) also found that the undergraduates in New Zealand who major on math skills had higher math self-concept which justifies their choice of faculty based on their skills and capabilities. However, Chilca (2017) on the study of basic mathematics students in Peru showed that self-esteem does not significantly impact academic performance, but study habits do influence academic performance. This also impacts on the students’ communication which Gardner, Milne, Stringer & Whiting (2005) found in the study of accounting students in New Zealand. As there is association with communication apprehension and academic performance, the higher levels of communication apprehension in the earlier levels affect their performance in accounting. Moreover, Erer & Hazir (2017) found in the introductory accounting in Turkey that instruction language is also a predictor of academic success but this is not the case in Oman even if the 2015 Arab Youth Survey stated that in the Gulf Cooperating Countries 56% used English more than Arabic.

The studies of Paisey & Paisey (2004) and Schmulian & Coetzee (2011) in two different Scottish universities found positive relationship between class attendance and academic performance which is, interestingly, affected by culture and ethnicity. In both the UK and the US, class attendance has effects on academic performance (Andrietti, 2014; Dey, 2018). This suggests that attending class has a positive and significant effect on exam performance. The business students have lower self-efficacy according to Ali & Narayan (2019) and Gebka (2014). The low self-efficacy and culturally unresponsive pedagogical practices negatively affect the students of Pasifika (Ali & Narayan, 2019) while Gebka (2014) take self-esteem as the root to high academic performance in British university business statistics.

The other factors of study habits were the focus of other studies and showed relationship with academic performance. Martinez, Morgan, Chambel and Pinto (2019) focused on engagement and psychological capital resources in Spain and Portugal while Gracia and Jenkins (2002) on control, responsibility and participation in UK and De la Fuente and Elawar (2009) on emotion style in Spain. It was found that academically engaged students have higher levels of psychological resources (Martinez, Morgan, Chambel & Pinto, 2019). The levels of control, personal responsibility for learning and patterns of participation are excellent
predictors of students susceptible to academic failure (Gracia & Jenkins, 2002). Meanwhile, action–emotion style is a predictor for explaining students' individual differences in motivation and learning outcomes (De la Fuente & Elawar, 2009).

In terms of the study habits of Omani students, Puma-at & Hamed (2016) determined that business students in Gulf College frequently study at home, prepare their assignments, prioritize their college works, study before the examination day, spend more time studying, and do advance readings. These findings were in contrast with the identified factors affecting failure in the study of Alami (2016) among the Omani students taking English course. The identified study habits that affected their academic performance include: not studying/reviewing at home (16.50%); absenteeism (15.04%); finding subject difficult (6.79%); no focus during lecture (6.31%); coming late (5.58%); don’t do homework (5.09%); laziness (4.61%); dislike to study (4.36%) and language barrier (3.64%).

2.2.3. Learning approach

In a study conducted by Duff and McKinstry (2007), it was found that accounting students were effective learners with high deep learning approach whereas business economics were ineffective learners because of their high surface approach. The same results were obtained with the learning approaches of accounting students and arts, education and science students in Australia (Booth, Luckett & Mladenovic, 1999). On the contrary, Ballantine, Duff and Larres (2008), found that learning approach was not associated with the degree program of accounting and business undergraduates in Ireland which both manifested surface approach to learning. Duff, Boyle, Dunleavy & Ferguson (2004) conclude that approach to learning is a subset of personality that affects university students in Scotland. Wilding & Andrews (2006) found that deep approach is associated with altruistic life goals while surface approach to wealth and status life goals. Everaert, Opdecam & Maussen (2017) argue that high intrinsic motivation and extrinsic motivation have a significant positive influence on deep learning which leads to higher academic performance. However, Sikkema & Sauerwein (2015) insisted that there are culture-specific learning styles. In the study of Donald & Jackling (2007) comparing the first year undergraduate accounting program in Australia, it was found that there were no significant differences in the use of surface and deep learning strategies by the Chinese and Australian students. It refuted the claim that Asian students rely on rote memorisation and reproduction of factual information.
In the study of study skills inventory of auditing students in South Africa, Barac, Kirstein, Kunz and Beukes (2016), it was found that senior students were more inclined to adopt a surface approach as influenced by gender and race. These cultural factors were tested by Boland, Sugahara, Opdecam and Everaert (2011) through the learning style preferences of Japanese, Australian and Belgian undergraduate accounting students. It was found that Australia and Belgium students learn by individual doing while Japanese students learn by watching. On a more specific learning approaches, cooperative learning and seminar-based approach in undergraduate accounting improve problem solving and analytical skills (Baird & Munir, 2015). On the other hand, visualization is less preferred by undergraduate and postgraduate accounting students (Bracci, Tallaki & Castellini, 2019).

The learning approach of non-accounting students in their accounting modules shows varied results. Through Kolb’s learning style inventory, Loo (2002) found moderate difference in the learning style preferences of business students as compared to accounting, finance, and marketing majors. In the study of Novin, Arjomand & Jourdan (2003), business students were predominantly Assimilators or Convergers who have higher assessment performance that Diverger and Accommodators which is the same with the study of Cekiso, Arends & Mkabile (2015) in South Africa where accounting students were mostly Convergers and in Mei Tan & Laswad (2015) assessment of the business students in introductory accounting that students with ‘assimilating’ learning style perform better in their assessments than ‘diverging’ or ‘accommodating’. Meanwhile, the Thai business students have adaptive learning styles (Sandman, 2014).

3. Methodology

3.1. Research design and strategy

Descriptive qualitative method of research was utilized in this study. The open-ended survey was the data collection strategy. The assessment of the three student-related factors was supplemented by quantitative measurements. The use of numbers in qualitative research is supported by Maxwell (2010) as ‘legitimate and valuable strategy’. As the purpose of the numerical values was to complement the results generated, the expressed percentages in the results and findings depict logical representation of the samples. Chivanga (2017) asserts that numbers are necessary following the qualitative methodology.
3.2. **Instrumentation**

The main tool for gathering data was an open-ended questionnaire which assessed the three factors prior knowledge in accounting, study habits and the learning approach. The tool was written in English with Arabic translation.

3.3. **Population and sampling**

There were 300 respondents chosen as samples from the registered students in the basic accounting module in both semesters of the Academic Year 2017-2018. There were 411 registered students in the first semester and 352 in the second semester. While some of the repeaters from the first semester were also enrolled in the second semester, a total of 150 respondents gathered from each semester accounted for sample sizes of 36.49% and 42.61%, respectively. Of the average five batches in the morning and evening sessions, the three batches of students were visited in each semester for the actual conduct of survey. Each batch has an approximate average number of 55 students. Quota sampling was utilized in the selection of respondents to equally get 50 student-respondents in each batch.

3.4. **Data collection process**

There were two phases of data gathering. The first survey was conducted in December 2017, first semester of the AY 2017 – 2018 while the second survey was conducted in May 2018, second semester of the same academic year. The data gathering was personally administered by the author after the mid-term test in both semesters. The data were sorted and tabulated only after the second phase of the data gathering.

3.5. **Data analysis**

Thematic analysis was used to analyze data. Through the use of open-ended survey, student-respondents provided a more comprehensive evaluation of their personal qualities. These raw data were examined to identify patterns or themes. Subsequently, themes were grouped into categories. The entire thematic analysis involve six key stages: data familiarization, initial coding, identifying themes, reviewing themes, naming themes and the final report. To supplement the proper analysis and evaluation, the percentage of the responses were added for each category.

4. **Results and Discussion**
The majority of the business students have prior knowledge of accounting as shown in Table 1. Most of the students have taken accounting course in their senior high school as reflected by 63%. Other than their high school, they also have family members teach them accounting (31.33%), readings on accounting (29.33%), work-related seminars and trainings (19.67%), accounting course from other college (18%) and work in accounting department (7%). Of the 300 business students surveyed, only 32% do not have prior knowledge of the module. Since the majority of the students have background of accounting, this study finds that the teachers’ supposition on the students’ lack of prior knowledge in accounting as the primary cause of poor academic performance is incorrect. This clearly asserts Ambrose, Bridges, DiPietro, Lovett and Norman (2010) findings that prior knowledge can either help the students pass the module or hinder due to other factors inconsistent with the prior knowledge attained.

Prior knowledge does not assure a passed accounting module at it does not predict academic performance. It partly refutes Byrne and Flood (2008), Mei Tan and Laswad (2015) and Alfan and Othman (2005), Yousef (2019), Alanzi & Alfraih (2017) and Alanzi (2015) on the positive association of prior knowledge and academic performance. Although students have prior knowledge of accounting, Alfan & Othman (2005) and Xiang & Hinchcliffe (2019) believe on the need for a prerequisite related module to improve academic performance. As the tested introductory accounting module has no pre-requisite, there is limited knowledge of core contents of the module. Furthermore, the explorations of Kaighobadi & Allen (2008) on prior

Table 1
The students’ prior knowledge of accounting

| Theme          | Category                              | %   |
|----------------|---------------------------------------|-----|
| Academic       | High school accounting               | 63% |
|                | Readings on accounting               | 29.33% |
|                | Accounting from other college        | 18% |
| Work           | Seminars/training                     | 19.67% |
|                | Work in accounting department        | 7%  |
| Relational     | Family members teach accounting      | 31.33% |
| No prior knowledge | No background             | 32% |
semesters’ core courses and Lane & Porch (2002) on high school academic achievement form a related argument on the issue.

There are two valuable points on this matter: contents and retention. Although assumed that module contents were same regardless of levels, the area of concentration and manner of delivery tell all the difference. In addition, the amount of knowledge retained, having no accounting-related pre-requisite module is another factor. The prior knowledge obtained by the students was weak compared with the demands of the introductory accounting module. The study of Zambrano, Kirschner, Sweller & Kirschner (2019) formed a related analysis on the study habits and learning style. The degree of influence on the study habits of the students is relatively high due to the pre-conceived notion of prior knowledge. The reliance on prior knowledge to pass the assessment tends to decrease the drive to further acquire additional knowledge on the module. Although prior knowledge has no direct effect on academic performance, it has indirect impact on study habits and learning styles.

In Table 2, the study habits were grouped accordingly as positive or negative. The enumerated study habits were mostly personal positive habits with assessment-related habits on top with 62.835%. There were 40.67% students who have negative study habits on procrastination and poor management during assessment periods while some have tendency not to work with peers (20.5%). The good personal study habits include preparation for assessments, attendance and class participation, use of independent learning and study plan. It could be inferred from the statistics that majority of the students are mainly focused on the assessments and not on knowledge and skills building. While almost 60% of the students have good relations with their classmates and teachers, still the collaborative learning habit is not enhanced. While majority put studies on top priority, there were still 40.67% of the students who have limited time for their studies. These data strongly show that there is strong tendency for the students to develop negative study habits.
Table 2

*The students’ study habits in introductory accounting*

| Theme                | Category                | %    |
|----------------------|-------------------------|------|
| Positive - personal  | Assessment-related      | 62.84% |
|                      | Attendance and participation | 61.56% |
|                      | Independent learning    | 43.75% |
|                      | Study plan/management   | 52.22% |
| Positive - relational| Consult peers           | 50%  |
|                      | Consult teacher         | 59.33% |
| Negative             | Personal habits         | 40.67% |
|                      | Relational              | 20.5% |

The identified study habits were similar to the findings of Puma-at & Hamed (2016) which itemized good study habits of Omani business students in a private college. These habits were also focused on the assessment readiness and not on knowledge and skills building. However, the negative habits were similar to the study of Alami (2016) on the factors affecting failure of Omani students in English module. Although these cited studies were different in nature and modules, the same study habits of the Omani students in the private colleges were obtained. This is a clear indication that there are lapses on the study habits of the Omani undergraduate students.

The focus on assessments and not knowledge and skills-building might have affected the academic performance of the students. The limited habit on independent learning is similar to the findings of Byrne, Flood & Griffin (2014) and the findings of Gardner, Milne, Stringer & Whiting (2005) on communication apprehension. However, there are no traces of language barrier in the study habits as identified by Erer & Hazir (2017) in the Arab students in Turkey. Since majority of the students have high regard on class attendance, the findings of Andrietti (2014) and Dey (2018) were invalidated. Class attendance is not associated with assessment performance. Meanwhile, the studies of Ali & Narayan (2019) and Gebka (2014) on self-efficacy can only be measured through the positive study habits of the students. Since students have complete control over their study habits, their positive personal habits reflect higher self-efficacy.
Generally, the business students have healthy learning habits. However, the focus on assessments rather than knowledge acquisition is a highly significant element. Accounting module requires more than rote memorization of pertinent concepts and rules but rather a complete understanding of the sequential procedures. Understanding to complete a puzzle is totally different from knowing how to solve it. As accounting does not only require a wider comprehension, a complete gist of the concepts is necessary. In this scenario, a positive study habits is not an assurance of a higher academic performance but a mere reflection of academic focus. Students tend to neglect the importance of skills and knowledge building by focusing more on the contents and structure of the two assessments.

Table 3
The learning approach of the students

| Theme          | Category                  | %    |
|----------------|---------------------------|------|
| Accommodating  | Practice tests/Quizzes    | 54%  |
|                | Small group discussion    | 51%  |
|                | Roleplaying               | 23%  |
| Diverging      | Pair activities           | 51.67%|
|                | Peer discussion           | 30.67%|
|                | One to one instruction    | 39%  |
| Converging     | Individual presentation   | 30%  |
|                | Board works               | 19%  |
| Assimilating   | Lecture/Discussion        | 65.67%|
|                | Case analysis             | 25.33%|

The learning approaches of the students were categorized according to Kolb’s learning style as shown in Table 3. The business students were mostly assimilating, accommodating and diverging. The majority of the students still prefer the lecture/discussion style as reflected by the highest stat of 65.67% (assimilating). This is seconded by preference to practice tests/quizzes with 54% (accommodating). The lowest approach is board works with 19% (converging).
Framing within the Kolb’s learning style inventory, the results of the current study partly agrees with the studies of Novin, Arjomand & Jourdan (2003) and Mei Tan & Laswad (2015) that business students are predominantly assimilators. However, it contrasts the results of Cekiso, Arends & Mkabile (2015) wherein accounting students in Africa were convergers. As Duff & McKinstry (2007) argue that effective learners have high deep approach, the majority of the business students in the current study prefer watching and thinking equating to surface approach to learning. This upholds the study of Ballantine, Duff & McCourt Larres (2008) with the surface approach of Irish business and accounting students. As Duff & McKinstry (2007) and Booth, Luckett & Mladenovic (1999) noted that effective learners have high deep learning approach, this proves that the learning approach of the Omani business students does not match with this type of module. As Wilding & Andrews (2006) argued that surface approach is associated to wealth and status life goals, the profile and status of the Omani business students matter. As these students are mostly working adults with fixed income, their learning style is not for challenging situations. Further, as Sikkema & Sauerwein (2015) insisted on culture-specific learning styles and Donald & Jackling (2007) on rote memorization of Asian students, the Omani learning styles were mostly characterized by the traditional watching and thinking.

The results on the learning style of Omani students clearly emphasize suitability and methodology. It clearly reflects that the Omani learning approach does not suit the demands of the accounting module. As the surface approach focuses mainly on comprehension of rules and concepts with or without application and critical analysis, the module requires more critical analysis and application of theories to calculations. As majority of the students prefer lecture/discussion, which was also confirmed by the teachers in FGD, the approach is not sufficient for students to master the concepts and procedural approach of accounting. Critical thinking and mathematical skills are necessary since the assessments contain both theories and calculation. Knowledge and skills building are more importance than plain comprehension through series of lectures.

5. Conclusion and Recommendation

This paper evaluated the student-related factors associated with the academic performance of the non-accounting Omani students in their first undergraduate accounting
module. Qualitative research method was employed through a self-made survey tool. To supplement the gathered themes and categories, percentages were integrated in the tabular presentation.

The analysis of the three student-related factors showed that there was high inclination on the learning approach as the key variable associated with the students’ performance. There was strong bargain on the mismatch between the module demands and the learning approach of the students. The preference to surface learning approaches does not fit the demands of the accounting module. Since Omani students are highly challenged on the accounting terms and concepts caused by the English comprehension; the preference of lecture/discussion as teaching and learning methodology does not equip them with the necessary basic comprehension skills. There was also indication that the study habits of the students contribute to their academic performance. However, there was no strong direct link between these variables because majority of the students still showed positive study habits that are mainly focused on passing the assessments than building knowledge and skills. This, however, strongly shows that the students are more immersed with the assessments rather than learning the basics of accounting concepts.

There is a strong need for a student-centered classroom which are focused on knowledge acquisition than assessments. As a bridging strategy, the curriculum can include a pre-requisite module to introduce basic accounting concepts. This will aid in the knowledge accumulation of the struggling Omani students. The teachers are also expected to employ methodologies that will enhance the students’ learning and entice effective habits. Formative assessments will play a vital role in this context. There are two ways to form: guided learning and independent learning. Focus on knowledge and skills building activities during the guided learning and utilize the independent learning hours of the students.

This study has various statistical and scope limitations. For this, other student-related factors such as demographic profile, performance in other modules and commitment to learning should also be considered in the future studies. Moreover, the actual module performance of the students can be statistically correlated to their prior knowledge, study habits and learning approach.

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