

A Study on Accounting Curricular and Future Accounting Graduates

Halil Paino
Mohd Soffi Puteh
Faculty of Accounting
Universiti Teknologi MARA (UiTM), Malaysia
Email: halil@pahang.uitm.edu.my
Email: sopiuitm@pahang.uitm.edu.my

ABSTRACT

The Faculty of Accountancy plays an important role in the education of accountants beyond the baccalaureate degree. Looking at the advertisements in the newspapers and the way the accounting graduates are being readily absorbed into the job market, one gets the feeling that there is a big demand for accounting graduates and accountants. In addition, the employers want and expect their new – entry professionals to be equipped with all relevant skills and knowledge. In view of the current rapid development in business and technology around the world, an assessment on accounting programmes in this country is needed. This research was, therefore, undertaken to address the current state of accounting education and to find out the perceptions of students, academics, employers and practitioners on the matters reflecting the needs in enhancing accounting education. The findings suggest a combination of intellectual, personal attributes and future competencies needed by all accounting graduates to be included in the curriculum.

Keywords: *accounting curricular, education, graduates*

Introduction

The development of accounting education in Malaysia was spearheaded by the formation of the Malaysian Institute of Accountants (MIA) in

1967. MIA is the country's earliest accounting body regulating the accounting practice under the Accountant's Act 1967. The membership of this body is based on membership of recognised professional accounting body and qualification of a Bachelor of Accountancy as listed in Schedule 1 of the Accountant's Act (1967). The formation of the Malaysian Association of Certified Public Accountants, now known as MICPA, provides local alternatives to aspiring students who wish to obtain a professional qualification. The Accountants Act (1967) specifies that only degrees from Schedule 1 universities and selected professional qualifications are recognised by MIA and allow the members to use the designation of 'accountant'.

To date, aspiring students can pursue their accounting education either in Schedule 1 universities, enrol in professional programmes (ACCA, CIMA, CPA (Australia)), or take the MIA qualifying examination upon completion of their accounting programme from institutions that are not recognised by MIA.

The structure of most programmes are generally similar; covering all aspects of accounting such as Financial Accounting, Managerial Accounting, Auditing, Financial Management, Public Sector Accounting, Computerized Accounting or Accounting Information System, Business and Company Law, Company Secretarial Practice and Taxation. Some of them include industrial trainings as partial requirement to complete the course. This may give a comparative advantage against other programmes in the sense that the graduates have already experienced the real situations in the profession and they are ready to get involved with such situations.

Literature Review

The issue of communication skills has long been discussed when it comes to the ability of graduates to enter the job market. According to Siegel and Kulesza (2001), new recruits now need better communication skills and a better understanding of the business process. They must be able to explain the implications of the financial data and how the data will impact alternative courses of action available to the company. Siegel and Kulesza further stated that the role of corporate accountants today, who often work on cross-functional teams, requires excellent communication and interpersonal skills, understanding of all phases of business and appreciation for interrelatedness of financial function with other functions in corporations.

Foster and Bolt-Lee (2002) have elaborated in detail the first component of the “Core Competency Framework for Entry into the Accounting Profession” which was published by the American Institute of Certified Public Accountants (AICPA) in 1999 for educators to develop a curriculum of broad-based accounting education. It focuses on the needs of the future professional accountants. Three categories of competencies are delineated; functional, personal and broad-business perspective.

Over the years, there have been so many proposals made to change the system of accounting education so as to cater for the new requirements in the changing business environment. For example, Dr. Juhari Samidi (1991), the Deputy Dean of School of Accountancy of ITM then, had suggested several subjects to be included in the degree level accounting programmes to cope with the changes in the accounting environment in those days. It included Accounting Theory, History of Accounting, communication skills, computerised accounting, ethics and a third language.

On the other hand, Ronald (2002) suggested that the first accounting course should be reorganised to attract students to major in accounting. The Accounting Education Change Commissions (AECC) agreed with the suggestion put forward by Ronald (2002) and has recommended that the first accounting course be a broad introduction to accounting taught from the user’s perspective, rather than introductory accounting for future preparers.

Another important aspect of discussion, is how to prepare students to meet the requirements of future accounting practice. As mentioned by Bruce (2002), if we are still using rote learning and memorisation directed toward preparing students for a certifying exam, the accounting education will fail in preparing its students for the future.

However, Bruce (2002) added that this proposal may seem a bit too drastic; it may lead to a declining number of undergraduates in accounting. He felt that the accounting students should be encouraged to combine other majors with accounting such as finance, information system, marketing, and international business, giving them an edge in the employment market.

The International Accounting Education Standards 3, i.e Professional Skills (IES 3), meanwhile, lists the professional skills that are needed for a professional accountant. These are intellectual skills, technical and functional, personal, interpersonal and communication, and organisational and business management skills. In relation to this, IES 1 (Entry Requirements to a Program of Professional Accounting Education) states

that an individual needs to bring to a programme of professional accounting education an appropriate level of prior education and learning to provide the foundation necessary to acquire the professional knowledge, skills and values, ethics and attitudes needed to become a professional accountant.

The Study

As time changes, the scope of work of accountants differs. This has brought us into a new scope in auditing – auditing in a computerised environment. Globalisation and the K-Economy have brought about many drastic changes in the business world today. The Asian Free Trade Agreement (AFTA), for example, has brought Malaysian industries into a new level of competition where they can no longer rely on government's intervention and protection against outside competitors. Accounting practices, therefore, should also move forward accordingly to adapt with these changes in the business world. The question is, however, are our accounting graduates ready to face these new challenges when they first enter to the job market?

This research was, therefore, undertaken to address the current state of accounting education and to find out the perceptions of students, academics, employers and practitioners on the matters reflecting the needs in enhancing accounting education.

Research Objectives

The research objectives are to find out:

- students' own perception of their course of study in preparing them for an accounting career and its usefulness and relevance to their future job.
- practitioners' and employers' perception of the usefulness and relevance of university's education via performance evaluation of the local accounting graduates.
- practitioners' and academics' recommendations for changes in the accounting curriculum in universities based on their experience.

Research Methodology

The researchers have developed a set of survey instruments based on a study by Boh et al. (1991), to assess the accounting curricula of all universities in Malaysia that offer accounting courses. The survey instruments were divided into three different scopes; namely, students of the accounting courses, academics for the accounting courses and employers or practitioners for the related fields. The questionnaires consisted of self-assessment and open ended questions.

The questionnaires were distributed by hand on 'there and there' basis for the students and academics, whereas for the employers and practitioners by postal service. The researchers spent time at several local universities; namely, Universiti Teknologi MARA, Universiti Putra Malaysia, Universiti Kebangsaan Malaysia, Universiti Malaya, Multimedia University, Universiti Sains Malaysia, Universiti Utara Malaysia and Universiti Islam Antarabangsa Malaysia. For employers, this study chose accounting practitioners whose firms are registered and listed by Malaysian Institute of Accountants (MIA) as per January 2004.

Two sets of questionnaires were prepared; set 1 for practitioners and lecturers and set 2 for students. Set 1 questionnaire contained three main parts. Part A asked questions on demographic profile of the respondents, part B on assessment on current accounting curriculum, and part C on competencies needed for future accounting graduates. Similarly, set 2 questionnaire contained 3 main parts. They were demographic profile, assessment on current curriculum and recommendations.

A total of 500 questionnaires were sent out: 200 to accounting students who were in their final year in the first semester of 2004 (May-November), 100 to academics and another 200 to employers and practitioners who were selected randomly from the MIA's list. The response rates were 60% for students, 55% for academics, and only 18% for practitioners.

Geographically, the scope of survey only covered all universities in Peninsular Malaysia. It did not include Sabah (Universiti Malaysia Sabah) and Sarawak (Universiti Malaysia Sarawak).

Analysis of Data

The analysis of data referred to the rating given by respondents and the best usage for that was mean response and the percentage of response. Besides, the manipulation of data such as ANOVA was also considered useful in arriving at the specified objectives of this study.

Findings and Discussion

Students

Students were selected from various local universities and they represented the final year students i.e. year 4 or Parts 07 and 08. Table 1: Panel A presents descriptive analysis on the exposure of courses offered to students whereas Table 1: Panel B presents analysis on the contents of courses from the students' view.

Table 1: Panel A Perceived Exposure on the Courses of Study

Exposure	Mean	SD
1. Give a better idea of accountant's works	3.21	1.11
2. Increase interest in accountancy career	3.34	1.19
3. Provide a sound basis for early work/job	2.39	0.82
4. Impart awareness of social and ethical responsibilities	2.27	0.80

Notes: Exposure was scored on a scale 1 to 4, where:
1 = not at all; 2 = a little; 3 = moderately; and 4 = substantially

Table 1: Panel B Perceived Contents on the Course of Study

Contents	Mean	SD
1 Writing of case studies	3.25	1.21
2 Analysis of case	3.21	1.19
3 Fieldwork	2.16	0.8

Notes: Contents was scored on a scale 1 to 4, where:
1 = none; 2 = few courses; 3 = some courses; and 4 = most courses

Students were asked to give their opinion on the courses undertaken during their study by looking at the exposure derived from the courses and the perceived contents on the courses of study. Four areas of exposures were tested as indicated in Table 1: Panel A, in which, these have a significant exposure on accounting and accountancy field during study. The highest mean score was on the exposure on the increased interest of students on accountancy as a career whereas the highest mean score on contents of courses was writing case studies. The perception expressed by respondents in this study are generally inline with the new IES 2 on Content of Professional Accounting Education Programs, which prescribes that knowledge and competencies can be increased and gained by writing case studies and increased interest in accountancy as a career.

Table 2 demonstrates the importance of both theoretical and practical experience in the study of accounting courses.

Table 2: Emphasis on Studies

Emphasis on	%
1. Theoretical	12.5
2. Practical	35.5
3. Both	54

As can be seen from Table 2, 54% of the respondents saw the importance of the practical experience along side the theoretical knowledge in studying accounting. This is consistent with the IES 3's view that professional skills are needed in accounting education, and IES 5 (Practical Experience Requirements) which stressed upon practical experience requirements (in which their main aim is to ensure that candidates or students have the necessary practical experience to become a professional accountant).

Table 3 demonstrates the analysis of variance between the students' response to exposure from the courses and demographic variables. The analysis indicates that Age, University origin and Reason for choosing accountancy as the main programme could increase the interest in accountancy as a future career. These variables have few significant variance and relations on imparting awareness of social and ethical responsibilities.

Table 3: Students’ Response to Exposure of Courses versus Demographic Variables

Exposure	Age (F-value)	University (F-value)	*Reason (F-value)
1. Give a better idea on accountant’s work	0.397	0.986	0.609
2. Increase interest in accountancy as career	0.434	0.710	0.950
3. Provide sound basis for early work/job	0.225	0.655	0.88
4. Impart awareness of social and ethics	0.216	0.512	0.772

p < 0.05

*Reason – why students choose accountancy as main program Academics

Academics

Academics were selected from the various local universities mentioned earlier. Subjects covered during the course of study were evaluated by the academics in terms of their relevance to the application in job field or working environment. This is shown in Table 4 below.

Table 4: Relevance of Subjects to Job Application: Academics’ Views

	Subject not covered (%)	Not Relevant (%)	Moderately Relevant (%)	Very Relevant (%)
Financial/Accounting	-	-	12	88
Auditing	-	-	16	84
Taxation	-	5	20	75
Commercial & Company Law	-	10	35	55
Management Accounting	-	12	34	54
Accounting Information System	2	15	24	59
Accounting Theory & Practice	2	13	28	57
Computer Programming & Processing	5	19	35	41
Finance	1	15	40	44
Economics	3	12	32	53
Public Sector Accounting	-	-	35	65
Management	1	12	28	59

As can be seen from the table, 80% of the respondents considered financial accounting and auditing taxation as very relevant to job application. In addition, 75% of the respondents rated taxing as very relevant. 41% to 65% of the respondents rated other courses as relevant.

Apart from specific subjects covered, the academics were also asked on whether theoretical knowledge or practical experience or both should be given greater emphasis. As expected, a majority of the respondents (85%) attested that both aspects should be given due emphasis in accounting education. This is consistent with the view from students (refer Table 2) and the newly effective IES 3 and IES 5. Between theoretical knowledge and practical experience, a higher percentage of the respondents (12%) stated that the latter aspect should be given greater emphasis. Only 3% of the respondents favoured the former.

Table 5 reported the academics' view on the improvement they would like to see in the accounting curriculum.

As shown in Table 5, more than 80% of the respondents strongly agreed on improving communication skills and analytical skills. On specific academic subjects or courses, 70% agreed on increasing computer content and practical aspects of auditing. With respect to management, legal and taxation subjects or courses, less than 40% strongly agreed to increase their content. It is interesting to note that 18% of the respondents strongly agreed and 30% moderately agreed to reduce accounting theory in the accounting programme but a high percentage (52%) strongly disagreed that financial accounting subjects or courses should be reduced. In addition, 28% disagreed to give greater emphasis on social responsibilities and topics on ethics reflecting practical oriented studies, attitudes and approaches to work tasks. In addition, a large number of respondents (>70%) were in agreement that economics subjects or courses should be decreased. This is consistent with their response on the value of economics subjects or courses to their work. A large percentage of the respondents (77%) strongly agreed for vacation training (industrial or practical training) to be made compulsory as stressed by IES 5 on Practical Experience.

In relation to the competence needed by our future accounting graduates, the majority (>90%) of the respondents agreed to functional competence be inclusive of decision making/modeling, risk analysis, measurement, reporting and technology. Whereas under functional competence, the majority (>80%) disagreed that this competence should not be included. As for personal competence, most of the respondents (>90%) agreed that these competence should be equipped to our

Table 5: Recommendations for Improvement of the Accounting Curriculum

	Strongly Agree (%)	Moderately Agree (%)	Disagree (%)	Not Relevant Nowadays (%)
Improve communication skills	82	9	9	-
Improve ability at writing business reports	87	12	1	-
Improve analytical skills	91	8	1	-
Improve problem solving ability	87	11	1	1
Improve ability to work independently	73	24	4	-
Increase ICT contents	78	22	-	-
Include other general subjects	18	58	23	1
Increase management subjects	28	58	14	-
Increase financial management/finance subjects	44	47	9	-
Decrease financial accounting subjects	-	2	46	52
Decrease accounting theory subject	18	30	29	23
Emphasise legal subjects	32	56	12	-
Emphasise topics on social responsibilities /ethics	18	54	28	-
Increase practical auditing	79	18	3	-
Decrease theoretical content & increase practical aspects in all courses	49	35	15	1
Decrease economics subject	24	51	21	4
Make industrial training compulsory	77	13	9	1

accounting graduates. These competence include professional demeanor, problem solving, interaction, leadership, communication, project management and technology.

Table 6 describes the last competence being asked - the broad business competence. More than 75% of the respondents contended that our graduates should be ready and equipped with strategic and critical thinking, industry perspective, marketing and technology. However, most of the respondents (54% - 67%) disagreed that our future accounting graduates should be equipped with resource management competency and legal and regulatory competency under broad business competence. These findings are shown in the Table 6.

Table 6: Competence Needed by Future Accounting Graduates

Competencies:	Agree (%)	Disagree (%)
1. Functional Competencies:		
Decision making/modeling	98	2
Risk analysis	97.5	2.5
Measurement	99	1
Reporting	100	-
Research	11	89
Technology	99	1
2. Personal Competencies:		
Professional Demeanor	98	2
Problem solving	99	1
Interaction	99	1
Leadership	99	1
Communication	99	1
Project management	97	3
Technology	97	3
3. Broad Business Competencies:		
Strategic & critical thinking	90	10
Industry perspective	92	8
International perspective	75	25
Resource management	46	54
Legal & regulatory perspective	33	67
Marketing	78	22
Technology	90	10

Practitioners / Employers

Expertise for accountancy education and training comes from various sources. These include universities and other institutes of higher education, professional bodies, accountancy firms and accounting department in commerce, industry and government. Their combined efforts should lead to integrated programmes based on the common objectives.

Practitioners can contribute ideas that will bring education into the real world and to the changing nature of profession and employer needs, thus, helping students learn in ways that reflect the ethos and practice of the community. It is the main reason why researchers choose practitioners and employers as the last part of their analysis of research.

Table 7 shows the results from practitioners’ and employers’ opinion regarding the relevance of subjects or courses being taught to the working environment. Apart from the specific subjects or courses covered, the practitioners and employers were also asked to what extent these subjects and courses are useful to their work. Most respondents rated the courses as very or moderately useful to their work. This could be an area where greater attention can be directed to in the future review of university curriculum.

Table 7: Relevance of Subjects to Job Application (Employers’ Views)

Subjects	Not Covered	Not Relevant	Moderately Relevant	Subjects Relevant
Financial Accounting	-	-	23	77
Auditing	1	1	23	75
Taxation	-	3	31	66
Commercial & Company Law	-	2	52	46
Management Accounting	-	1	65	34
Accounting Information System	1	2	63	34
Accounting Theory & Practices	-	12	60	28
Computer Prog. & Processing	1	10	60	29
Finance	-	3	70	27
Economics	-	19	71	10
Public Sector Accounting	14	33	44	8

Graduate respondents were asked whether they had had any difficulty in handling various aspects of their jobs. As far as understanding the objectives of the job, carrying it out as well as completing it are concerned, more than 80% of the respondents claimed that they had only little to moderate difficulty. This also applies to planning the job, applying technical knowledge to it as well as communicating and reporting results. It is also noted that more than 80% of the respondents had little difficulty in cooperating with fellow workers. The results are shown in Table 8.

However, there are differences in perception relating to the ability of the graduates in this area. As shown in Table 9, employers and practitioners generally did not feel that the majority of graduates were able to plan and complete their jobs and assignment satisfactorily. They

Table 8: Ability to Handle Jobs Immediately after Graduation
(Graduates' Views)

When you first joined this organisation, were you able to..	Not Applicable	Little Difficulty	Moderate Difficulty	Great Difficulty
understand the objectives of the job/assignment	-	48	51	1
plan the job/assignment	-	30	63	7
carrying out the job/assignment	-	38	60	2
applying technical knowledge to the job/assignment	-	34	64	2
completing the job/assignment on time	-	39	60	1
communicating and reporting the results	-	33	66	1
cooperating with fellow workers	-	86	13	1
supervising and managing subordinates	42	30	26	1

also felt that a majority of the graduates were unable to apply technical knowledge to the job and communicating the results. However, employers and practitioners shared the same view (as shown in Table 8) on the cooperation with fellow workers.

Table 10 shows that a high percentage of the employers felt that the majority of graduates had good analytical skills (53%), and good communication skills (written and oral) in English (40%). As far as computer literacy and decision making ability are concerned, a high percentage of employers (73% and 50% respectively) were of the view that the majority of the graduates were only average in these areas. In addition, 60% of practitioners and employers claimed that the majority of the graduates had average ability in relating and dealing with clients or customers. On the other hand, 50% of employers and practitioners stated that the graduates' accounting (technical) knowledge was good. This reflects the significance of the heavy emphasis placed on accounting technical knowledge in the university curriculum.

Table 9: Ability to Handle Jobs Immediately After Graduation
(Employers' Views)

When they first joined the organisation, how many of them were able to...	All of them	Majority of them	A few of them	None of them
understand the objectives of the job/assignment	11	64	18	7
plan their job /assignment	3	68	22	7
carrying out their job/assignment	14	54	25	7
applying technical knowledge to the job/assignment	4	71	21	4
completing the job/assignment satisfactorily	4	61	14	21
communicating and reporting the results	7	59	22	11
cooperating with fellow workers	29	71	-	-

Table 10: Performance Evaluation by Employers on the New Graduates/Staff

For the majority of them, how would you rate their competence/capability in their first year of employment	Very Good	Good	Average	Poor
Analytical skills	7	53	33	7
Communication skills – English written and oral communication	3	40	53	4
Computer literacy	-	10	73	17
Ability to make decisions/exercise judgment	-	37	50	13
Ability to relate to and deal with clients/customers	-	30	60	10
Technical knowledge in accounting	7	50	40	3

The employers and practitioners were also asked to give suggestions on changes that should be made to the accounting curriculum (refer to Table 5). Most of them strongly agreed that changes should be made on improving communication skills, problem solving skills, analytical skills and emphasise on writing business report. On the other hand, some employers disagreed that some subjects or courses like philosophy or humanities should be included in accounting curricula. This signaled the employers' tendency to emphasise on technical and practical aspects of accounting.

Table 11 : Skills Needed Before Entering Accounting Profession
(Employers' Views)

Do you agree that before entering the accounting profession, the graduates should...	Strongly Agree	Moderately Agree	Disagree	Not Relevant Nowadays
be equipped with strong theoretical knowledge	82	18	-	-
have undergone industrial training program	95	5	-	-
have undergone at least four years of education in the university	50	43	7	-
obtained more extensive computer knowledge and skills	61	36	3	-
be proficient in English in addition to Bahasa Malaysia	93	7	-	-

Table 11 shows that most of the employers and practitioners strongly agreed that the graduates should be equipped with strong theoretical knowledge. A high percentage of employers also strongly agreed that they should have undergone industrial or practical training programme (95%), obtained more extensive computer knowledge and skills (61%) and be proficient in English (93%). However, only half of them strongly agreed that graduates should undergo at least four years of study in the university. In addition, the employers and practitioners agreed that the graduates should be equipped with the functional competence such as decision making, risk analysis, measurement and reporting under the new curriculum. As for the personal competence, professional demeanor,

problem solving, interaction, leadership and communication were agreed upon. Last but not least, on the broad business competence, most of them agreed that future graduates should be equipped with knowledge on strategic and critical thinking, industry and international perspective, resource management and regulatory or legal perspective.

Conclusion

The nature of accounting is such that professional skills and proficiency cannot be attained solely or largely through formal accounting courses without practical training as stressed by IES 5 on practical experience. This study at large gives strong support to the IES in context and the practicalities of it. Looking at the advertisements in the newspapers and the way the accounting graduates are being readily absorbed in the job market, it can be inferred that there is a big demand for accountants and universities should keep pace by ensuring that accounting curriculum should be able to mould the future accountants.

With the government's desire and intention of turning this country into a leading financial centre throughout Asia and achieving a developed nation status within this decade, the researchers are confident in suggesting that the demand for accountants will continue to grow in the foreseeable future. Accounting curriculum should also embrace these dreams. However, while the university curriculum has given due emphasis to the accounting disciplines, it appears that not much attention has been paid to the analytical and practical aspects of accounting education. These aspects were also highlighted by the employers in their evaluation of the performance of their entry-level professionals to the profession or of recent graduates.

Employers' opinions regarding graduates ability to plan and complete the jobs satisfactorily are not unexpected. The nature of accounting is such that professional skills and proficiency cannot be attained solely or largely through formal accounting courses without practical training. This study yields the results on the importance of practical training to the accounting students during their four years of education at the university.

It is also perceptible that employers consider proficiency in English is important with the expansion of international trade, Asia Free Trade Agreement and influx of more foreign investors into the country and accounting being the language of business. However, the decline in the

standard of the English language in this country is not a matter which can be rectified within a short term and is beyond the scope of the accounting curriculum at the university level.

Overall, the majority of students, graduates and employers found the accounting course very useful and relevant to the market and jobs requirements. This would support the researchers' view that current accounting curriculum would be able to sustain the changing business environment. However, there is still room for improvement. A revision of the university's accounting curriculum should take place in accordance with the changes in the market or jobs field on accounting practices takes place. This is to ensure the effectiveness and success of accounting curriculum in moulding the future accountants.

The graduate respondents felt that some specific skills such as intellectual and communication skills are important to be included in the curriculum to prepare them for the world of work. This is inline with Halil's (2000) finding that effective skills such as communication skills were needed to fulfil job expectations.

On the other hand, practitioners and employers attested that all entry-level professionals should not rely on the firms to provide them with the needed professional development programmes to help them perform their duties successfully. New hires are expected to have all the effective skills prior to their employment. Since this study has shown that our university's current accounting curriculum lacks some essential humanities skills, ethical consideration, legal and regulatory perspective and other new courses or subjects, the inclusion of these courses should be considered.

In the future, as the three-year to four-year accounting programmes become the norm, faculty or school or department of accountancy of the university needs to improve the curriculum – graduates have a bigger chance to be employed if they have all the skills needed to face the challenge in fulfilling the job expectations.

References

- Accounting Education Change Commission (AECC). (1990). Objectives of education for accountants, *Position Statement No 1*. Available at: <http://www.ifac.org/education>. Sept 20, 2004.

- Bruce, H.N. (2002, October). A radical proposal for Accounting Education. *CPA Journal*, 33-44.
- Foster, S. et al. (2002, January). New competencies for Accounting students. *CPA Journal*, 72-84.
- Halil Paino. (2000). *Connecting Accounting and Communication Skills*. Master Thesis. Universiti Teknologi MARA.
- Halil Paino. (2001). Communication skills needed for Accounting graduates. *GADING*, 6(1 & 2), 1-15.
- International Accounting Education Standards (IES). (2004). *Proceedings for Forum on IES*, Istana Hotel, Kuala Lumpur.
- International Federation of Accountants. (1984, Nov). *Proceedings on Asia Pasific Conference on Accounting Education for Development*.
- Juhari Samidi. (1991). The impact of changing business trends and technology on Accounting curriculum. *ACCAMADIA*, 10(1), 14-33.
- Kulesza, C.S. & Gary, S. (2001). Encouraging change in accounting education. *Management Accounting Journal*, 62-73.
- Ooi Soon Kiam. (1988, October/November). New dimension of accounting educations at the crossroads. *Malaysian Accountants*. pp.132-157.
- Ronald, J.H. (2002, October). Redesigning the first Accounting course. *CPA Journal*, 13-21.