

**INSTITUTE OF TECHNOLOGY
TALLAGHT**

**Bachelor of Science
Bachelor of Science (Honours)**

**Computing
Information Technology**

Full Time and ACCS

Semester Seven : January 2015

Information Management

Internal Examiners

Barry Feeney

External Examiners

Nigel Whyte

Day	Saturday
Date	17th January, 2015
Time	12:30 - 14:30

Instructions to Candidates

Answer Question 1 (50 marks) and two other questions (25 marks each).

QUESTION 1 (50 Marks)

Explain how the Balanced Scorecard approach can be used to impact on a business or organisation. (10)

Taking an organisation you have studied, for each of the perspectives in the balanced scorecard outline a typical objective, measure, target and initiative. (15)

Differentiate between what is a good metric and what is a poor metric, indicating why poor quality metrics are often adopted. (9)

ComFinReg is an agency of the government with law enforcement duties. It receives various regulatory filings, conducts investigation into crimes and refers persons to the DPP for prosecution. A ComFinReg goal is to more easily integrate information collected at different times and by different sources within the Agency. Discuss which of the following measures would best indicate IT's progress toward this goal?

1. Number of systems compliant with ComFinReg metadata standards
2. Time required to complete information request
3. Number of analyst tools available for use in consolidating data
4. Time to complete complaint / filing

(16)

QUESTION 2 (25Marks)

Explain what is meant by portfolio management as applied to the IT investment an organisation makes. (5)

An enterprise is considering the deployment of mobile devices for its entire sales force. Discuss which of the following **BEST** ensures the approval of the project? (12)

- A. Increase the IT budget with an estimated amount for software, hardware, training and devices.
- B. Make a presentation to the chief information officer (CIO) about the new idea.
- C. Prepare a business case focusing on the business need, opportunities and threats.
- D. Select a suitable project management methodology to ensure successful implementation.

Distinguish between 'Payback Period' and 'Discounted Payback Period' and how they are used to assess project investments.

Calculate the Payback Period and the Discounted Payback Period for each of the projects in the table below, indicating which would be approved given a discount rate of 10% and payback period of three years.

<i>Cash Flows</i>	<i>Project One</i>	<i>Project Two</i>	<i>Project Three</i>	<i>Project Four</i>
<i>Initial cost</i>	\$10,000	\$15,000	\$8,000	\$18,000
<i>Year One</i>	\$4,000	\$7,000	\$3,000	\$10,000
<i>Year Two</i>	\$4,000	\$5,500	\$3,500	\$11,000
<i>Year Three</i>	\$4,000	\$4,000	\$4,000	\$0

(8)

B. Interview with Andy Lottle, IT Director, City University Tallaght College

I: Hi, Andy. We would like to discuss the role of IT at City University Tallaght Campus.

Andy Lottle (AL): I have been with Tallaght College for nine years. I was hired just before Big City University was created and Tallaght College was merged into the organisation.

I: How would you describe the current state of your IT organisation?

AL: When I first joined Tallaght College, the student systems were old and inefficient. One of the advantages of the merger was access to investment money. The board of trustees and beneficiary donors made significant investments into our IT infrastructure. I have long been a proponent of integrated systems. We partnered with four other Colleges in other cities to develop a portfolio of applications. We knew it would take time, so we built an IT architecture with a vendor based on the technology in 2009 and 2010.

We then prioritised the applications required to operate a student facility. We decided that the business operations would be excluded from the initiative since there were other vendors that had already built such systems. We focused on student grants, student records, alumni, e-learning and remote labs. We then prioritised the development in the order I just mentioned, but left student records last. It is lucky that we did because we were able to make use of mobile technologies to allow in class recording of student activity. We also are prepared for new student record requirements mandated by the government.

I: We met with Bill Sayre. We noted that Big City University College is using older technology and has not been a part of your portfolio initiative. Can you identify any reason for this?

AL: Bill has not had a high regard for City University Tallaght College. He attempted to bring all the IT units together. He called it a 'conference', but it was a lecture. He told us what he wanted to do. He remembers us as the poor acquired College, not the modern facility we have become.

I: Since the investment has been large, why has the board of trustees or other City University Partners management not monitored these projects and brought Big City University College into the process?

AL: I am embarrassed to say that for all the good things we have been doing at City University Tallaght College, Big City University College management has been dysfunctional. David Stow has changed the direction of Big City University, and Jim Foley is certainly looking to fix these problems. The nature of your involvement alone is a testament to his thinking.

I: Have you considered revisiting Big City University College participation in your IT systems?

AL: In our distributed organisation, I am not in a position to tell Big City University College what to do. I hope your study will force the issue. I would rather not comment personally on any of the players.

I: Has Jim Foley shared his vision for IT integration, better control over IT projects and asset accountability?

AL: He has shared it with me. It makes sense. I don't see why we don't go to a shared service environment and bring all the student facilities onto one system. One of my guiding principles is to provide value in our IT development. If I cannot improve the benefits derived from the systems or create new opportunities, I do not believe that I am anything except a cost to the College and its beneficiaries.

I: Is that a different perspective from that of previous management?

AL: I have had a difficult time, but I see the light at the end of the tunnel. I almost left the College several times, but my wife kept saying 'stay with it...they will see the light'.

I: What is the current status of the electronic student records project?

AL: It is done. We implemented it at the beginning of this year.

I: How did the initiative perform against budget?

AL: I would lie to you if I told you that it went perfectly. We were over budget and late in some areas and under budget in others. We implemented about eight months later than planned. The partner Colleges worked well. It forced all participants to implement project management and work closely with the vendor.

I: During the initiative, did you regularly report the status of the project to management?

AL: City University Tallaght College management was involved from the start and were aware of all issues. We reported quarterly. I would have liked to have had an IT auditor monitoring some of our decisions.

Interview with Bill Sayre, IT Director, Big City University College

I: Bill, thank you for taking the time to meet with us.

Bill Sayre (BS): I am glad to give you my perspective on the organisation. I have been here for 14 years and have seen CIOs come and go and organisations reshuffle, and somehow, we end up back where we started.

I: How would you describe the current state of your IT organisation?

BS: I believe that we have come a long way. We are the largest Campus in the group, with 15500 students. Since we are the biggest, we act as the big brother to the other Colleges. City University Tallaght College was a mess when we acquired them. I rarely talk with Andy Lottle, my counterpart at City University Tallaght College. He tends to be going in all directions. I have tried to organise City University Partners IT committees; we have one or two organising meetings and then the process seems to dry up.

I: Can you identify any reason for this?

BS: Not really. I have developed structured agendas and provided descriptions on how we do things. After our first discussion, it goes nowhere.

I: Could you tell me about your software portfolio?

BS: Our applications are fairly sophisticated. We developed them internally throughout the '90s. At the time, I was responsible for systems development, until I was promoted to IT director. We had proposed that City University Tallaght College convert to our systems when they were acquired. They insisted that they had better systems. I always felt that their solutions would not scale up to our volume, which is approximately three times their volume. We have the following applications: student administration, student management, e-learning and remote lab. They are not interconnected, so we go from screen to screen for each student. We are currently preparing specifications to build our own integrated electronic student system.

I: Have you considered revisiting the City University Tallaght College systems?

BS: I really would not consider it. We are the lead College and should be providing the services to the others.

I: Has Jim Foley shared his vision for IT integration, including better control over IT projects and asset accountability?

BS: He has shared it with me, but I do not think it is practical considering the very different organisational characters. I will be candid with you: I have seen this before; it always blows over—whether due to a CIO replacement or an override by the president of the Big City University.

I: Is there an analysis of the risk to the organisation from executing the project or postponing it? I am including foregone opportunity costs, inability to achieve stated objectives, etc.

BS: We are still a relatively small organisation. This level of formality seems like overkill. We are analysing everything to death, and nothing gets accomplished.

I: Going back to the electronic student records project, what is the current status of the project?

BS: We completed a prototype, but needed to tweak some areas.

I: What happened to the process that required 'tweaking'?

BS: We found that the integration of our existing applications would take too much time, so we basically have to start over.

I: What will the cost overrun be?

BS: We have not reported these costs to management yet, so I would rather not share them.

I: Are you required to report this information?

BS: Luckily, no. Management really doesn't monitor our project status very well. I will get the college finance director to bury it.

I: Do you have any other observations that you would like to share?

BS: I don't understand why Big City University has not adopted all of our applications. I feel that this is a waste of budget money that could be used to support our operation.