

# Managing International Students Attendance with consideration of Completion and Satisfaction

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## Abstract

Internationalization is one of the many expectations of TEC, as per the TEC Strategy (2007). This includes having a noticeable level of students from overseas, is covered in our institute's business plan and is reported our annual report (2008). Servicing these students is guided by the Code of Practice for the Pastoral care of International Students (2003), amongst other things. This paper reports our experiences when the institution tightened up attendance habits of international students for their visa requirements. At the end of the year we revisited our actions, looked at attendance statistics and also considered data about related matters of completion and student satisfaction. We noticed several students attending less than 80% required for their visas, relationship between attendance and module pass rates and nothing specific re student satisfaction. There were some idiosyncrasies with student satisfaction measurement worthwhile noting. We also experienced several problems with our information systems, such as functionality shortcomings for our growing population sub-groups and mismatch between these systems. Further study might include experiences with relevant information systems elsewhere in the institution and rest of the sector. More formal research can and should now be planned, including the use of our pilot use of an online attendance system from 2008. We believe our insights and process would be useful to others even though it does not sit in the framework of ICT teaching contents proposed by Simon (2007) and used by Simon et al (2008) when profiling NACCQ conference papers 2000-2007.

**Keywords:** Computing education, International students, Pass rates, Attendance, Satisfaction.

## 1 Introduction

The Graduate Diploma in IT (GradDipIT) at XXXXX-IITP is open for students already holding a degree in any field. During the 2008 academic year student numbers grew dramatically, and students were almost exclusively from India. During the second semester we tightened attendance monitoring for visa requirements which quickly showed patterns of poor class attendance. We intervened, kept monitoring closely and also followed up with corporate functions. At the end of the year we looked at overall attendance patterns and also consider possible similar pattern with module pass rates and associations with student satisfaction.

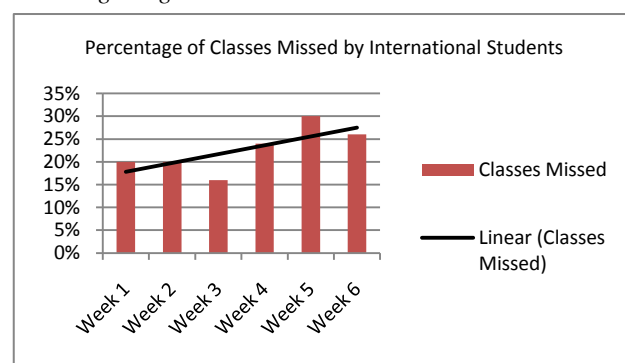
This is only part of the institute's plan for increasing retention of students who are currently in their first year of study (2008).

## 2 Attendance/Absence

On 29 Aug 2008, the Head of School received a preliminary report from the Programme Manager of GradDipIT (extracts provided below).

Table 1: Extracts from report from Programme Manager

*I am concerned about the level of attendance by International students in the first six weeks of semester 2, 2008. They are required to attend not less than 80% of their classes as a condition of their student visa. The graph below shows that international students, as a group, are attending only 70% - 84% of their classes each week – that is, they are missing 16% - 30%, and the trend is getting worse.*



*...if they fail in large numbers, we have contributed to that failure...*

The Programme Manager then took action as undertaken but feedback from meetings did not provide specific useful information for changes to our practices. Students were also contacted by phone to express the institute's care and commitment to help them.

At the end of the semester we conducted a report on International student attendance for the institute's International unit. This showed that over the semester, two in five students were absent more than the target level maximum one 20% of the classes. Maximum absence was 42% with two more students slightly lower.

This is obviously of significant concern. These students were formally contacted to remind them of Visa requirements and stricter monitoring with action in future.

### 3 Association with academic success

At the end of the year we looked at pass rates with consideration of class attendance during the second semester, for BinfoTech and GradDip IT International students. Of the data recorded for 50 students, 22 of them (44%) failed to attend for the minimum of 80% of classes as required by their student visas.

There was some relationship between this and their success rates – in percentage terms, 86% of those with good (ie, over 80%) attendance passed all modules that they enrolled in, compared with 41% of the poor attendees.

There was a stronger relationship between the eight worst attending students (attended less than 70% of all classes) and their results. One of these students passed everything but the other 7 failed at least 2 modules each. Repeating these modules will cost them over \$4000.

The graph below shows the figures overall:

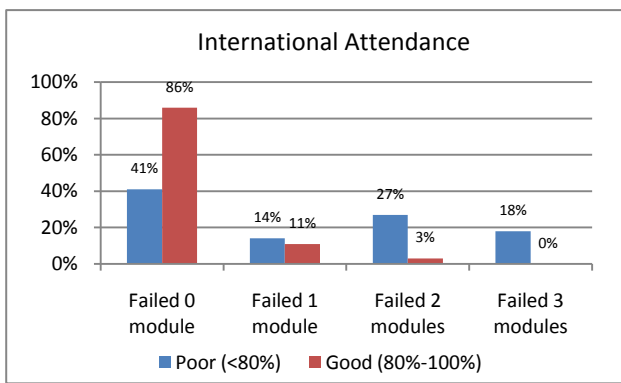


Figure 1: Attendance vs Modules failed

We are not claiming a causal relationship, namely that attendance determines qualification completion, ie. that lower attendance results in worse completions or that higher attendance results in more completions. It is in theory possible that students not attending were also already not coping academically or had other personal problems.

We do however have the duty to follow up on poor attendance in order to help students, and we are therefore participating in a new institution-wide initiative from 2009. Also, we are sharing these statistics with students for positively influencing them regarding their continued engagement with their studies. This would be in line with general practice in education.

Overall student outcome of International students on GradDip IT is not a radical problem, as reported in an internal report by Ferguson and Potgieter (2009): “International Student Success: Completion and Retention”. Since 2001, programme completion in one year varied between 60 and 80% - above NZ-wide trends and the institution average. It is also increasing along with increase in International proportion, which implies (but not prove!) that International students are likely to be doing well.

### 4 Student satisfaction

Programme surveys are done each semester for all programmes in the institution. Question is whether these

standard information systems will expose some reasons for poor attendance.

We feel it is important to consider the trend in order to understand the historical situation for a particular semester, so we looked at the last three years.

Unfortunately the institute’s student satisfaction surveys do not report on International students specifically. However, the proportion of International students exceed 40% across these two qualifications, exceeding 90% on GradDip IT. It is also still growing, so one might argue that it could be reflecting the view of International students to large extend.

“Setmaps” are completed based on a 5-point likert scale, where 1 = strongly disagree (ie, negative response) and 5 = strongly agree (ie, positive response). The numbers of students who scored against each individual point on the scale are multiplied by the corresponding number (1 – 5) and this figure is divided by the total number of students completing the survey, giving a mean score.

There are arguments against this methodology, since it is difficult to conclude objectively that someone strongly disagreeing should be weighted 5 times less positively than someone strongly agreeing. The numbers are merely reflecting a sequence of priority, and the intervals between the numbers should not necessarily be constant. For example, the numbers 1, 2, 3, 4 and 5 could be replaced with 1, 1.5, 2, 3 and 4. However, if the trends from one year to the next are observed, conclusions drawn from them should still be valid.

For a programme perspective, we averaged the results of modules for which surveys were done. This is a manual process that is very time consuming and in need of improvement to enhance management practices for improving student experience.

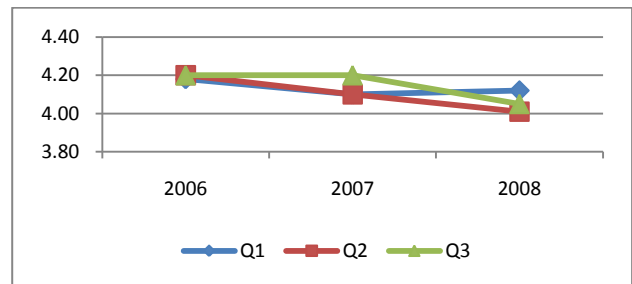


Figure 2: Questions 1-3

Question 1: Clear and detailed information about this module was made available.

Question 2: The workload for this module is realistic.

Question 3: Assessment requirements relate closely to the topics and content of the module.

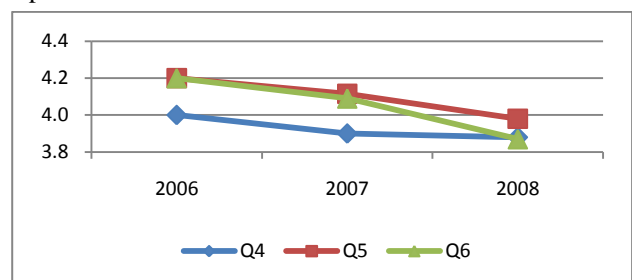


Figure 3: Questions 4-6

Question 4: Students on this module received prompt and regular feedback on their progress.

Question 5: Teaching and learning resources for this module assisted my learning.

Question 6: The module is well-organised and administered.

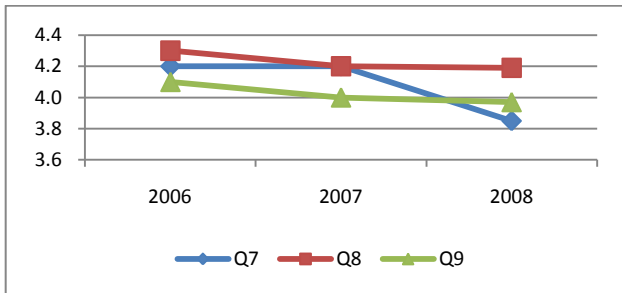


Figure 3: Questions 7-9

Question 7: The module is well-planned and taught.

Question 8: The learning environment is culturally appropriate.

Question 9: There is a good balance between laboratories and lectures.

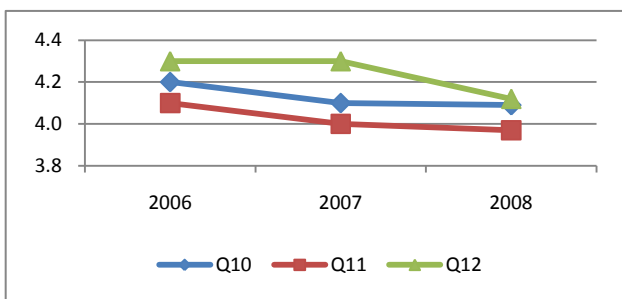


Figure 4: Questions 10-12

Question 10: The time allowed for completing assignments is adequate.

Question 11: The assignments in the module are useful learning experiences.

Question 12: Computer resources were adequate.

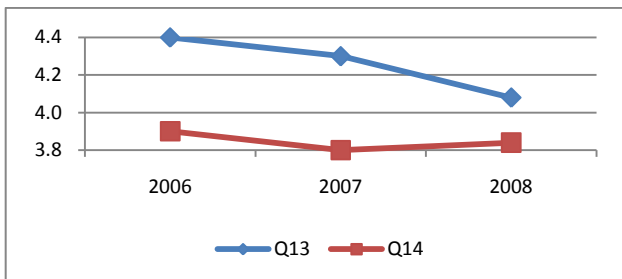


Figure 5: Questions 13-14

Question 13: Equipment was in good working order.

Question 14: The prescribed textbook was useful.

With few exceptions the trend in all questions is a downward one. Analysis is needed to find out why this might be and to plan a way to reverse the trend.

We observed that during this period, staffing levels were lowered several times and overall staff workload increased, with more class contact hours. This impacted on staff's ability to maintain service quality and

obviously on staff morale. In particular were there some mid-semester hand-overs between tutors which impacted on students.

The proportion of International students also increased, with substantial shift from China to India. We are of the informal view that there are cultural differences relating to psychological contracting, their view of satisfaction surveys and how that impact on each response, that could cause above shift to occur.

Then there are the usual contradictions, for example satisfaction with equipment sufficiency and its operational levels. Before classes started in 2008, several PC labs were actually upgraded with the newest equipment and problems. One would have expected satisfaction to increase, but the opposite happened.

And finally should it be noted that physical renewal has been ongoing for other areas of the institute that could put the School in disadvantaged position. For example, the brand new student hub with its many most modern PCs for all students, while the School's facilities in older style environments. Also, online services such as the sophisticated student portal, a new student enrolment centre and several brand new classrooms used by peers. As recently observed by a member of Exec, these new environments are in contrast with some older areas of the institute.

The institution also conducts a student satisfaction survey per programme. These are similar to the module "Setmaps" but with different questions and done at the end of the year only. Parameters are assessed with one question only for each of Teaching, Facilities Resources, Programme Content, Management & Organization, Student Support Services and Overall experience. Sample size per programme varied between 8% and 40%, with GradDip IT at about 31%.

The table below shows consolidated results for the School, manually processed by the authors from the standard reports provided by Quality and Academic Unit.

Table 2: Comparison of programmes

	NCC3	CCIT	DipICTL5	DipICTL6	BInfoTech	GradDip	School
Teaching	82%	100%	77%	33%	26%	82%	61%
Facilities/Resources	82%	100%	82%	50%	62%	82%	75%
Programme Content	82%	100%	69%	17%	63%	82%	69%
Management & Org	87%	100%	42%	33%	62%	91%	62%
Student Supp Serv	69%	100%	77%	67%	53%	73%	67%
Overall	75%	100%	69%	33%	63%	64%	66%

Areas shaded dark (red) have satisfaction below 50%, while those light shaded (yellow) exceeds but are still below institutional target of 80%. Overall students of this programme actually appears more satisfied than those of other programmes in the School.

However, notice that Overall satisfaction is only 64% while none of the questions are below 80% (average is 82%). This is of significant concern is it might mean the survey instrument is not sufficient. This view is supported by an observation that several of the free-text comments provided by students on several programmes, refer to services outside the School.

It should also be noted that this was the first time that this survey was conducted online, ie. with students sitting at

computers in our PC labs. The possible effect of this have not formally been considered but there were several anomalies in the data for consideration elsewhere.

In effect the satisfaction surveys for programmes did not shed any light on the situation and actually raises more questions. Also, the interpretation of satisfaction data is therefore complex and probably not conclusive regarding causality.

## 5 Integration

Student attendance practices for the second semester of 2008 are of concern from perspective of Visa requirements and possible academic achievement. The institute's implementation of closer attendance monitoring (including a new online system) with follow-up by a central support group, will make a contribution to attempt improvements in this regard.

Poor attendance correlates with module failure but we cannot (yet) isolate that as a causal relationship. In particular do we need to study the possible effect that prior qualifications in IT might have. Also, our informal observation of the financial situation of International students leading to most of them taking some form of part-time employment. And finally the temptations of part time employment in NZ and the IOCT sector where demand for staff has been high for several years.

Student satisfaction has been declining several years and data has some environmental constraints and population influences that make the identification of any particular causal relationship problematic. Again the matter of holding previous qualifications in IT might have an influence and should be studied. We have noticed comments by students re some tutor skills/capabilities, so this is also probably worth following up, albeit with consideration of the increased workload and new work assignments they were tasked with.

## 6 Conclusion

As academic and management, we are concerned about attendance practices of International students, a possible link with student learning outcomes, possible hidden (unknown) student dissatisfaction causing the above and the unexplored effect of prior qualifications in IT. Some institutional actions are now in place to more close manage attendance practices for Visa requirements and the possible links with course completion rates.

It also seems important for the institution to review sufficiency of current student satisfaction survey practices for International students. Tutors always found servicing International students more challenging in regards to especially resource needs, yet institutional resourcing practices do not seem to reflect this. It seems appropriate to revisit some of those management practices.

We would have preferred to have high accuracy for a scientific engineering approach to manage student experience. This would, however, require all information systems to be aligned appropriately, and will hold high priority for the future. In the mean time we can report on what our experience in the real world of ITP organizational systems being challenged with the complexities of TEC expectations.

More formal research should now be planned following this explorative pilot study.

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