

# [Private blogging in paramedic science education essay](https://assignbuster.com/private-blogging-in-paramedic-science-education-essay/)

## Abstract

Reflection on clinical practice and sharing of declarative knowledge is a foundation for which the Bachelor of Paramedic Science program was developed. The overall scope of the project was to trial Evernote as a private reflective blogging service and also the opportunity to gain experience (both staff and students) with using Evernote with a view of it becoming a potential tool for reflection and assessment on clinical placement, informing not only Paramedic Science but other clinical based health programs.

Ultimately this project was about improving the engagement of distance students online, and encourage reflection on their own declarative knowledge. The scope of the project was to also improve formative feedback between students and the academics and finally to evaluate the technology for appropriateness as a private blogging service in a clinical setting for reflection.

The educational motivation towards student engagement is high on the agenda of tertiary institutions and this study is one representation of how social media concepts can improve this engagement. The findings of this study identified that students interact better with SMS combined with online forums within a learning management system.

## Key Words

Blogging

Reflective Practice

Student Engagement

Learning Management Systems

## Key Points

The use of private blogging aims to improve engagement of distance students online, and encourage reflection on their studies within the course.

The use of private blogging aims to improve formative feedback between student paramedics and lecturers

Evaluation of technology and the use of social media are high on the agenda of tertiary institutions

Private blogging aims to enhance clinical reasoning by students.

Formative feedback provided to students through their own self discovery of new concepts introduced during the course as well as self-regulated learning by the students is important in paramedic education.

## Introduction

Reflection on and sharing of clinical information amongst student paramedics is a practice that has been introduced across all paramedic specific courses on offer in the Bachelor of Paramedic Science at CQUniversity. The aim of the study- private blogging in paramedic foundations was designed to improve the engagement of distance education students online and encourage reflection on their studies within the course. The objective was to also improve formative feedback and evaluate the technology for appropriateness as a private blogging service in a clinical setting. The overall scope of the project was to trial Evernote as a private reflective blogging service and also the opportunity to gain experience (both staff and students) with using Evernote with a view of it becoming a potential tool for reflection and assessment on clinical placement, informing not only Paramedic Science but other clinical based medical and health programs on offer at CQUniversity.

## Background

The study commenced during term for a course within the Bachelor of Paramedic Science at CQUniversity 2011. Nineteen students were enrolled in the course and had the opportunity to engage with the course lecturer/s through set weekly tutorial questions in which all students were to respond to through their private blog enhancing engagement by students. These blogs were then summarised by the course coordinator and put online through the weekly forum in Moodle. Students were also to consider the clinical judgement aspects of the course reflecting on their clinical practices such as history taking and patient assessment. The introduction of private blogging into the course was intended to improve formative feedback provided to students through their own self discovery of new concepts introduced during the course as well as self regulated learning by the students performing set tasks on family and friends as a way of skills development and competency. The use of private blogging was hoped to improve engagement with distance education students and also to seek improvements in competent and reflective paramedic practice to be used throughout the program especially for work integrated learning.

## Blogging to improve student interaction

Prior to the commencement of this study the course was offered in term one with approximately 70 students enrolled. Online weekly tutorials consisted of weekly problem solving and clinical judgement questions that required a response from the student. These questions ranged from problem solving exercises to case management exercises and general case studies requiring question and answer responses.

The interaction for these weekly formative tutorial sessions was low with a 12% (n= 8) students per week responding. The below table identifies the average response rate for all term 1 2011 courses and for the paramedic course within the Moodle learning management system.

## Table 1. Files, messages, clicks and discussions for 70 students in term 1, 2011 PMSC11001 paramedic course compared to the average for all term 1 2011 courses in the university.

## Course

## Files uploaded

## Messages

## Clicks

## Discussion hits

## Discussion posts

## Discussion replies

Paramedic Course

128

113

32380

4135

77

36

Average all T1 2011 courses

15

109

13359

2879

40

68

Due to the limited amount of discussion replies (36 versus 68) it was difficult to ascertain what the students learned during the lectures. In turn it was then difficult to predict if what they learned in theory was going to be put into practice at their residential school simulation laboratory sessions. An article by Wetmore et al. (2010) identified that writing about what was learnt theoretically is an effective strategy to promote reflective learning leading to the development of critical thinking. In other words if a student effectively reflects on the declarative knowledge of their studies, this reflection will in turn improve the procedural knowledge and skills application required for proficient practice. Overwhelming evidence is in support of reflective learning practices through effective student-teacher interaction being included in clinical education paradigms (Wetmore et al. 2010).

## Methods

Data presented in this paper are drawn from an exploratory survey conducted at the completion of a three day residential school for a first year baccalaureate paramedic program. The course they attended was Foundations of Paramedics Science which is a first year course of the three year Bachelor of Paramedic Science program. The students in the course were distance education students.

The aim of the study was to evaluate Evernote as a blogging service for students. The purpose of Evernote is to:

Improve engagement of distance students online, and encourage reflection on their studies within the course.

Improve formative feedback from teachers

Evaluate Evernote as a private blogging service in a clinical setting

The overall scope of the project was to trial Evernote as a private reflective blogging service and also the opportunity to gain experience (both staff and students) with using Evernote with a view to it becoming a potential tool for reflection and assessment on clinical placement, informing not only Paramedic Science, but other clinical based programs such as Medical Sciences and Sonography.

Evernote is a technology that assists users with organising various types of information from several different sources into one, central, web-based location. The product also allows users to clip web pages and archive them for later reference, store screen shots, photos, audio memos and text notes, all within a customizable storage system. Evernote can organize notes chronologically and share them between multiple users. In the context of this research students would share their notes (blog posts) only with their teachers in the course, thus creating a private blogging environment.

The students had tutorials and on-line blog activities during which they were required to enter their responses and other relevant information into the Evernote program.   The activities were located in their resource manuals and were identified by a ‘ blog sign’. They were informed that they will be required to input information into ‘ EVERNOTE’ which only the lecturers will see, and that this information will be summarised and feedback provided to all students.

The students were initially provided step by step guidance on how to access Evernote and begin their blogging campaign.

The lecturers were provided training sessions leading up to the commencement of term and the students were also given online training videos to assist in using Evernote.

The authors conducted a survey after a three day residential school in January 2012. The survey was distributed and received back by a non-teaching staff member. The questionnaire consisted of five sections. Section one contained demographic information related to the participants. Section two contained questionnaires based around their knowledge and capabilities of blogging with section three following on from this and contained 13 questions with a seven-point Likert scale identifying the student’s beliefs about blogging in the course. The fourth section discussed the students’ feeling about the blogging process and identified any alternative methods for their engagement with the lecturers. The final section attempted to identify their clinical reasoning by allowing the students to reflect on actual paramedic practice and the use of evidence based practice in paramedicine and whether blogging assisted them in improving clinical reasoning and judgement.

Data used in the analyses came from a student paramedic-based e survey of blogging. Data collected by the questionnaire were stored on a Microsoft Access database that resided on CQUniversity’s computer server. Survey data were coded and transferred from the Access database to an SPSS 18. 0 (SPSS, 2010) statistical package software program.

Ethical approval was acquired by CQUniversity Human Ethics Committee. Ethics approval (H11/11-163) was granted from 5 December 2011 to 30 June 2012 and was considered under the low risk review process.

## Results

Eleven students out of 19 (58%) completed the survey with only 19 out of 27 students attending the residential school.

The intent of the blogging exercise was to assess the student’s engagement with information extracted from the Evernote data base through the weekly tutorial sessions with questions uploaded by lecturers and answers provided by the students. Unfortunately out of a potential 190 blogs required there were only 14. 1% of responses from students (n = 27) which did not reflect an accurate account of engagement and was only a two percent improvement on the previous engagement strategy through the Moodle online forum.

Their engagement through blogging in Evernote was not a formal graded assessment which kept with the consistency in the previous tutorial sessions through on line forums to ascertain if blogging improved engagement.

## Demographics

Demographic data was gathered for comparison only, and a frequency distribution of gender, age, highest level of education, state of residence and current employment/student status was undertaken. Information is noted in tables 1 and 2. Of the participants who completed this survey there was an almost equal division of gender with 55 percent (n= 6) female. Fifty percent were in the age group of 20-29 (mean 23 years ) (range 19-37) (table 2).

Based on the ANOVA analysis, P values indicated that there is no significant difference between genders and amongst age groups with regard to their thoughts on blogging (P value threshold set at P <0. 5).

## Table 2 – Participants Gender

Gender

N

Percentage

Female

Male

6

5

55

45

Total

11

100

## Table 3- age of participants

Descriptor

N

Percentage

19

20

22

27

29

32

37

missing

2

1

2

1

1

2

1

1

18. 2

9. 1

18. 2

9. 1

9. 1

18. 2

9. 1

9. 1

Total

11

100

The second part of the survey asked participants if they have blogged before. Of the 11 respondents, only one had previous blogging experience and that person’s experience was over 12 months previous to this survey. To ascertain if students had concerns with blogging based on past experiences of themselves or family/friends, a second question asked do you know of any bloggers who have gotten in trouble with friends or family for things they posted on blogs? There was an overwhelming response of no for this response (n= 11, 100%). The final question within this section asked for a comment on blogging and what the participants would like to know about blogging, of the responses received three out of eleven (27%) participants advised that they did not enjoy the blogging experience and therefore did not want any further information provided to them.

The third section of the questionnaire was aimed at gathering information about the participant’s beliefs of blogging in the course PMSC11001. They were advised there were no right or wrong answers and the researcher were only interested in their general opinions about the participant’s beliefs and thoughts of blogging within the course PMSC11001. This section was assessed using a 13 item, seven-point Likert-type scale anchored by the use of bipolar adjectives (i. e. pairs of opposites) from “ Strongly agree” = 1 to “ Strongly disagree” = 7.

## Table 4- Questionnaire Mean Scores (n= 11)

Question

Mean

Standard Deviation

How confident were you that your writing in your blog was private

3. 18

1. 47

How often did you consider something was too personal to blog

5. 18

1. 40

How often did you look at the log of the lecturers responses

Would you take lesser care with what you wrote if it was open to the public

4. 30

3. 72

2. 00

2. 19

How much did the comment the lecturers wrote on your blog affect future entries

4. 63

1. 12

Would it bother you if the things you publish on our blog could be available to other students

Do you believe things you publish on your blog affect your grading

Do you believe lecturers would feel negative towards you based on your blog

Do you believe your peers would feel negative towards you based on your blog

5. 09

5. 09

5. 00

4. 82

1. 58

1. 22

1. 34

1. 25

How did you find the process of enrolling in Evernote

Did you find using Evernote program easy for your weekly blog entries

Were you able to find responses from your lecturers easily through the Evernote program

Were you able to publish your blogs easily through Evernote

4. 73

4. 82

5. 00

5. 00

1. 49

1. 33

1. 09

1. 61

Although most students did not engage with Evernote blogging as part of their weekly tutorial and as identified below students did not want to engage with lecturers through blogging there was a slightly positive inference about their confidence in their blogs being private (M = 3. 18, SD = 1. 47) and they identified that they would take more care if they knew the blogs were available in the public domain (M= 3. 72, SD= 2. 19). A majority of the respondents indicated a negative response to their experience with the Evernote blogging system and especially if it had negative impact on their grades (M= 5. 09, SD= 1. 22) and they also believed that lecturers would think adverse of them (M= 5. 00, SD= 1. 34). In relation to reading posts and publishing blogs in Evernote, again the students had a negative impression of this suggesting that it was slightly difficult to enroll in Evernote M= 4. 73, SD= 1. 49) despite the step by step guide offered to them. They also found it slightly difficult to use (M= 4. 82, SD= 1. 33) and found it difficult to find the lecturers responses (M= 5. 00, SD= 1. 61).

The fourth section asks the students about their feelings towards Evernote blogging and then continued to ask about other social media concepts for engagement with their lecturers. Students were able to give more than one response for this answer

## Table 5 – Social Media Concepts for Engagement

## Moodle Online Forums

## Skype

## Blogging

## Facebook

## Twitter

## SMS

## Participants

45%

0%

0%

0%

0%

90%

There were five responses (45%) to using the Moodle online forums with the majority of students (90%, n= 10/11) advising that engagement by the lecturers was best through SMS contact. Two students advised that they “ liked to be contacted by SMS and then would look immediately at the online forum site if requested to”.

Of the questions have your blogging habits changed since the use of Evernote and would you blog again in another course, all the respondents (100%) answered no with 27% (n= 3) advising that they did not enjoy the experience and would not like to use blogging again within another course.

## Discussion

CQUniversity’s ten year strategic plan states:

‘ CQUniversity will attract and retain more students, helping them to achieve their educational goals regardless of their cultural and family background or their country of origin. We will offer a range of ways for students to access higher education and reach their educational potential. We will provide a stimulating environment that promotes and supports learner engagement utilizing appropriate technology and infrastructure’ (CQUniversity 2012).

Despite limited research into the efficacy of social network technology in paramedic education, this pilot study has identified that to achieve the strategic goals of the university and in particular utilizing appropriate technology, students in this program have identified SMS as an engaging way of helping them achieve their goals. Paulus et al. (2009) identified that new technologies assists teaching and learning methods by providing a way of not stagnating the education of students through traditional methods and now supports the student’s construction of new knowledge. It has also been identified in the literature that academics need to keep abreast of the technological changes and the needs of the current generation of students. There is the potential for a division between students and faculty if they are struggling with new technology (Liu 2010). Liu (2010) also identified that through the Horizon Report 2009 several challenges had arisen and ‘ one of them is the growing gap in technology use between students and faculty even though technology use in academia is becoming more and more popular’ (p. 102).

Additionally it has been identified in literature that blogging or journaling is an effective strategy to improve the education of students (Wetmore et al. 2010) “ where educators in various health and medical related programs have implemented blogs and reported benefits for student success when interacting with blogging exercises and activities (p. 1339). Within this pilot study it was clearly identified by all students non-dependant of age or gender that blogging was not a preferred method of engagement with the lecturers with the preference being SMS in combination with online forums, despite previous evidence suggesting students do not engage with online Moodle forums. This is despite overwhelming evidence identified in the paper published by Ladyshewsky and Gardner (2008) where they stated that there is a growing body of literature to support the use of web based discussions to form student centred learning. They also identified that students come literately prepared for university through their knowledge of email, SMS and handheld devices including iPad (Ladyshewsky and Gardner 2008).

In an online article by Becka(2012) it was identified that “ Recent research into how students use mobile devices has highlighted how frequently they access SMS and therefore this aspect is crucial to ensuring we engage effectively with them at key times and about key issues”. In another article it was clearly identified SMS was the best technology used to support learning through engaging students in formative assessment objective questions with feedback, as well as SMS-based collaborative learning tasks (Brett 2011). Evidence that students within the Bachelor of Paramedic Science program at CQUniversity have engaged with lecturers through SMS is evident in the course evaluation surveys completed at the end of every term. During term one 2011 the course evaluation response was 78% with a rating of 4 out of a maximum score of 5 for the course, this was improved in term three 2011 with an 89% response rate and a score of 4. 1/5 for the evaluation. Finally for term one 2012 the response rate was 97% with an overall satisfaction rating of 4. 7/5.

## Limitations and Recommendations

The respondents to this survey were not randomly selected but were enrolled in the paramedic specific course and provided with the opportunity to trial the Evernote system as part of this course.

The relatively small number of students available in this pilot study and the number of responses made it difficult to apply some statistical tests. Although the results here were overwhelming against blogging with support of SMS social concept for engagement and also online forums through the existing Moodle LMS, future research should utilise a larger sample across all years and courses of the paramedic program in order to enable a more accurate analysis and more precise calculations. Although the results of the survey indicated that students overwhelmingly preferred the use of SMS, given the technical constraints on the number of characters in an SMS, it does have limitations as a tool for reflection.

The educational motivation towards student engagement is high on the agenda of tertiary institutions and this study is one representation of how social media concepts can improve this engagement. Future research with a qualitative component would enable effective evaluation of student’s thoughts on social concepts for engagement. With the availability of diverse and large amounts of technology, tertiary institutions should be looking at areas of social concepts for engagement and interaction which are easily accessible, are user friendly and usable by all students. In other words hardware and software that is in line with the next generation of students is recommended. A schematic of how future SMS integration into teaching and learning is shown in the chart below.

Ask questions related to lectures through SMS

1

2

STUDENT

LECTURER

3

Students notified of questions in LMS via SMS

2

1

4

Answers provided in online forum

3

PROVIDE CONTINUOUS FEEDBACK

And summarise findings into Moodle LMS

## Conclusion

This study has provided a picture of student engagement techniques which are of value and enjoyment for baccalaureate students. Findings indicate a clear association between SMS and online Moodle forums on improving student engagement with these techniques being both valued and enjoyed by students. This engagement will allow academics to further explore perceptions of students within their courses and value of the course content through the SMS and forums. Interactivity and active participation seems to lead to a new learning and teaching behaviour. By using modern technologies, students’ knowledge and engagement in course material can be implemented even to large lecture rooms. Sharing and collaborating different pieces of content as well as communication over different channels allows rethinking didactical approaches. Both students and academic staff will report a great potential for engaging with large class sizes.

## Conflicts of Interest

None

## Ethical Approval

Ethic approval was gained through CQUniversity’s Human Ethics Committee