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FIRST YEAR NURSING STUDENTS USE OF SOCIAL MEDIA WITHIN EDUCATION: RESULTS OF A SURVEY

Abstract

Introduction – Social media rapidly disseminates information but is a controversial learning platform in nurse education. This study aimed to explore how students viewed the use of Twitter, and other social media, in their first year of a nursing degree.

Aim - The aim of this study was to evaluate first year student nurses' use of social media, before and after commencing a pre-registration programme, where Twitter was used in a module

Methodology – A cross-sectional approach using a descriptive survey was completed.

Methods – An online survey, that included Likert scale and open questions, was open for one month in 2016

Sample – All students on Nursing Undergraduate Degrees, in Adult, Child and Mental Health, who were in the first year of their programme were eligible to participate. 121 students took part with a response rate of 32%.

Results –Most students were positive about using social media as they found it an engaging way to promote discussion and share information. Students use of Twitter changed in the first year with 19.8% using it once or more per week on commencement of the programme which increased to 45.5%; other social media platforms remained static. Most students (57.8%) understood the purpose of using Twitter although 14% reported that it was not used within their module; thus, not all students gained experience of using the social media. 81% of students said that using Twitter had been beneficial to increase awareness of nursing issues within their course. However, there were areas that students found difficult such as time, and not knowing what to say.

Conclusion –The study suggests that teaching about social media, and incorporating it into learning activities, may be beneficial for students. However, more research into the subject using an experimental design to assess changes over time would be useful.

Key words – student nurses, social media, teaching, Twitter, nurse education, pre-registration.

Introduction

Social media has become a tool to rapidly disseminate information and enable debate (Booth 2015). It has been seen as a tool for peer support, peer learning and increasing student engagement with online learning (Tower et al 2015) and Jones et al (2016) said that students found engagement with the platform worthwhile. The use of social media within nursing is controversial due to concerns about inappropriate professional use, such as breaching confidentiality (Ross 2012); however, the Nursing and Midwifery Council has offered guidance (NMC 2016). Educators can help student nurses use social media effectively, also reflecting the use of professional standards (NMC 2015) and university policies (Jones et al 2016).

Within the authors university social media has been incorporated into teaching and Twitter was introduced to first year students studying the nursing programme. Students were given the opportunity to attend a training session on Twitter (which was optional) and asked to engage with activities where use of Twitter was an option. Training sessions provided an overview of Twitter, explained its purpose, highlighted professional boundaries and gave students opportunity to set up an account. Students were then encouraged to contribute to a discussion, using Twitter, within one nursing module. The aim of this study was to evaluate whether nursing students self reported use of social media had changed since starting the nursing course and examine their experiences of using social media within the educational context.

Literature Review

The use of social media has grown rapidly over the last 5 years. Twitter states that, in early 2016, it had 310 million users with 83% of these being active users, although the number who are active in the UK is unclear (Rose McGrory 2015). Facebook is still viewed as the leading social media site but numbers of users across most platforms seem to be stabilising (Rose McGrory 2015). People use social media for a variety of reasons, often for communication with friends or for news, but using social media within nurse education is in its infancy.

Twitter is a relatively new teaching and learning tool in higher education and evidence supporting its use is limited. Innovative adaptations in the UK healthcare education context demonstrate Twitter's potential usefulness for diverse learning goals, when underpinned by appropriate planning and technical support. For example, Mistry (2011) reports using Twitter to deepen student learning in critical care training, whilst Sinclair et al. (2015) utilised a planned Twitter chat to capture student voices around the experience of clinical placement. These two pilot programmes were limited in scope and focused on a specific task but both describe positive outcomes.

Jones et al. (2016) evaluated a three-phased pilot programme incorporating Twitter-based learning as an assessed element on a first-year nursing curriculum. The rationale for this approach was to improve digital literacy and professional practice. The assessments required students to actively use Twitter, including following at least 30 nursing or health related accounts, and tweeting on topics or contributing to web forums. It is unclear how students were directed to high quality sources of information related to nursing. Students were assessed on their engagement with Twitter and marks were assigned to this activity; although an alternative assessment was offered it is not stated how many students took the alternative option. Jones et al (2016) note that there was more engagement with social media when students were assessed and felt that using the platform enabled students to increase social media skills, enable facilitation of peer-to-peer support, and increased engagement with the wider online public, such as patient groups. Jones et al (2016) research has some limitations as the groups surveyed had different levels of voluntary or compulsory and the methods of engagement were different between cohorts so making comparison amongst groups difficult (Burau 2007).

Younger generations are commonly considered to be comfortable using all types of social media, but Usher et al (2014) study suggests that a minority of the current generation of healthcare students actively use Twitter for professional or personal purposes. According to a Finnish study (Tuominen et al. 2014), nursing students rarely used blogging for educational activities, although some used it in their free time and students named Facebook as an application to be added to nursing studies. In contrast, there is growing use of Twitter by UK healthcare professionals (Jones et al. 2016).

A north American based study in a health-care education setting found that using Twitter for informal, educationally relevant communications improved contact between instructor and student, promoted active learning, provided an avenue for prompt feedback, and maximized time on task (Junco, Heiberger and Loken 2011). However, social media may also pose practical challenges in a traditional learning environment (such as availability of mobile devices) and, as Smith & Lambert (2014) noted in their systematic review, is most useful as part of a blended learning approach. Mistry (2011) used Twitter as a way to promote discussion in groups with qualified and preregistration students and the concise nature of Tweets meant students felt it helped to summarise their understanding. Mistry's study was small, with only 24 students in total, and was used as a formative strategy for learning. In contrast, Fox & Varadarajan (2011) found that the majority of students reported that Twitter distracted them from class discussions and prevented effective note taking, although this was a pharmacy course and the discussion elements may be more beneficial in nursing curricula. Students in both Mistry (2011) and Fox & Varadarajan's (2011) studies indicated that Twitter increased sharing of ideas in class and that it facilitated the expression of different opinions. However, Epstein & Ray (2014) found that blogging in the classroom distracted nursing students and this may also apply to microblogging using a Twitter platform.

Concerns reported around the use of Twitter centre around issues of privacy and confidentiality, the boundaries between professional and personal, the inherent limitations of the Twitter format with regard to self-expression, as well as lack of skills and motivation (Mistry 2011, Jones et al. 2016). The papers raised concerns over the potential abuse of professional boundaries in social media, but no specific examples of this happening in learning contexts have been detailed. However, using social media may develop professional communication skills, understanding of patient privacy, ethics and policy issues, (Schmitt et al 2012).

Some students may lack skills and interest in using any social media as part of learning (Tuominen et al. 2014). Balakrishnan (2014) notes that there are both incentives and barriers that influence the use of social media and ease of use was important to students who found it academically beneficial. Learning activities involving social media could be included in nursing education to develop digital professionalism, as Jones et al (2016) suggest.

<u>Aim</u>

The aim of this study was to evaluate first year student nurses' use of social media, before and after commencing a pre-registration programme. Specific objectives were:

- To identity students experience of the use of social media through nurse education.
- To evaluate the benefits and limitations of the use of social media in nursing education

Methodology

A descriptive survey, at one point in time, was employed as it enables the exploration of phenomena to describe what exists, outline frequency and aid categorisation (Burns & Grove 2003). De Vaus (2014) notes that surveys can be distinguished by the fact that they collect a structured and systematic set of data with the data collected in the same way from each participant allowing the findings to be comparable. A cross sectional survey, as in this case, collects information at one time point with the focus being on gaining the participants thoughts and experiences of the phenomenon of interest.

An online self-report questionnaire was developed by the research team. Questions included demographic data, pre-course use of social media, teaching on social media, changes in usage since starting the programme and perceptions of social media in nurse education. The questionnaire included Likert scale responses and open questions on the use of Twitter and social media in students' nurse education. The questionnaire was advertised to students via the Virtual Learning Environment and email, and opportunities to complete the survey during university days were offered. Data collection took place over a one-month period from 6th May to 6th June 2016. The questionnaire was distributed using the Bristol Online Survey (BOS) system and responses were anonymous.

<u>Setting</u>

The study took place within one University in the South East of England, which has nursing students based on two campuses. All the participants took part in a compulsory module where Twitter was an optional component. Twitter was one method used within this first year module to discuss 'What is nursing?'

Ethical Approval

Ethical approval was gained from the Faculty of Health and Wellbeing Ethics committee reference number 16/FHWB/16001

Students were sent information sheets prior to opportunities to complete the survey and participation in the online survey was considered as consent.

<u>Sample</u>

Students from adult, child and mental health nursing, who were in their first year of study at the university were invited to participate. A total of 374 students were eligible to participate; 284 adult nursing, 38 child nursing and 52 mental health nursing students from two cohorts starting in September 2015 and April 2016. 121 students responded to the survey (see Figure 1)

There are a number of factors that may have impacted on student engagement with the survey; such as level of digital literacy, lecturer promoting Twitter, placement activity and student motivation.

Data Analysis

Data analysis utilised SPSS version 22 to provide descriptive statistics (Burns & Grove 2009). The open questions produced very short answers and were themed using content analysis by the research team (Green 2013)

<u>Results</u>

121 students replied to the survey which was a response rate of 32%. The April cohort had a higher response rate at 44.1% compared to the September cohort at 25.9%; this may be because the April cohort were in university during the data collection period whilst the September group were on placement.

Response rates per pathway (see Figure 1) were Adult nursing 29.1%, Child Nursing 52.6% and Mental Health Nursing 30.7%. Child nursing is the smallest pathway, with adult nursing being the largest, and the child students were in University at the time of the survey which may explain the higher response rate for this group.

Table1 shows the age demographics of the students with 53.7% being under 30 years old, the spread of ages reflects the nursing demographics at this university. Only three males (2.5%) responded to the survey, 90.9% respondents were female and 6.6% preferred not to say; however, there is a higher proportion of females within nursing at this university.

Social Media use change when Commencing Nursing Programme

Prior to commencing the pre-registration nursing programme 95.9% of participants used social media for social activities and 18.2% stating they used it for educational purposes. Use of social media varied prior to university with 77.7% % of participants stated that they used Facebook most days, whilst Twitter was 12.4% and Instagram 33.9% (See Table 2). 39.7% of participants stated that they had never used Twitter and 41.3% had never used Instagram but only 5.8% had never used Facebook.

Participants were asked if they had been taught how to use Twitter within university and 52.1% said 'yes' and 44.6% said 'No' (see Table 5). Participants were also asked if they understood the purpose of using Twitter within the nursing session and 57.8% said they had fully or partially understood but 27.2% said they had little or no understanding of the purpose (see Table 6). 14% of participants stated that Twitter was not used in their session.

Participants were asked if they continued to use Twitter for nursing information after the session and 38% said 'yes', 38.8% said 'No' and 20.7% said that they had never started using Twitter (see Table 7). However, when asked which social media they used since starting university on most days, Facebook remained static at 80.2%, Twitter increased to 21.5%, and Instagram remained static at 31.4% (see Table 8). Also, those using Twitter once a week increased from 7.4% pre course to 24% after starting university. This demonstrates that there was an increase in use of Twitter by 27.9% after commencing university, although the frequency of interactions varied.

When examining the data by pathway it was noted that more adult nursing students continued to use Twitter after the introductory session (see Table 9) compared to other pathways. The reason for this is unclear. However, participants noted that positive influences on their use of social media were lecturer support (59.5%) and peer support (55.3%) (see Table 10) with family/friend being less influential at 45.5%.

Students were asked if the School of Nursing should develop its use of social media and 65.5% said 'yes'. Reasons most frequently cited were the 'enjoyment of this platform' and 'shared learning'. However, students thought it should be a choice rather than compulsory and tutors needed to be engaged. Small numbers commented that it was time consuming, distracting and potentially 'dangerous'.

The themed qualitative comments (see Table 11) highlighted that accessing and sharing information were key uses of Twitter in nursing with communication and offering inspiration also present.

However, a small number of participants were unsure of the purpose with comments such as feeling overwhelmed. Thus, it seems that the use of social media within a nursing course is viewed as an enjoyable way to gain information but is assisted by support networks.

Students' perceptions of social media

Students were asked whether they thought use of social media was beneficial for nursing in a number of areas and responded within a range from 'very beneficial' to 'no benefit', Table 12 outlines the results. 47.1% of students saw social media as very beneficial to 'increase awareness of nursing issues' with 36.4% thinking it 'increased confidence in sharing ideas'. Combining the 'very beneficial' and 'some benefit' ratings the category 'expanded knowledge' also scored highly with 78.5%. Categories that scored high in the 'unsure' category were 'contributed to study skills' (25.6%), 'aided professional development' (16.5%). Students identified that they engaged with a variety of forums including professional organisations, the University School of Nursing and specialist areas, although the engagement varied between following and tweeting.

Students were asked to rate aspects affecting their use of social media from 'large limitation' to 'no limitation'. Table 13 outlines the results and shows that the biggest inhibitor of using social media was time with 57% saying this had a large or some effect. Other key issues were 'not clear how to use social media effectively' (42.1%) and 'difficulty using the platform' (34.7%). A number of participants identified 'don't know what to say' as either a large or some limitation plus 24.8% who were unsure, which may reflect the students' novice state as first year students. Approximately 41.3% of students found little or no limitations to accessing mobile devices whilst a similar number reported some or a large limitation (36.3%), this may reflect that many students now have smartphones or that the university provides computer stations for student use.

Discussion

This study suggests that social media can be used as a medium to access knowledge and increase awareness of nursing issues. Social media has the facility to follow particular organisations and people that are of interest to the nursing community (WeCommunities no date). This may contribute to students' ability to keep up-to-date with changes and information relevant to practice. This study suggests that students benefited from being able to communicate and share ideas with others; this may also aid discussion across geographical boundaries (Kung & Oh 2014) to gain a global perspective. West et al's (2015) review found a number of pedagogical benefits to incorporating use of Twitter into learning environments; these included timely updating of course information, a sense of social engagement by students and enhanced motivation.

Tur et al (2017) noted that student either use it for accessing information or can be more participatory engaging in discussions; our study was mainly focused on accessing information and this could be because students were unfamiliar with using social media in education and would need support to engage in online chats, for example. A constructivist approach is suggested by Flynn et al (2015) when using social media within education. Their study suggests that new students may need guidance about how to filter information effectively and lecturers may need to address this. However, Sinclair et al (2015) noted the dilemma academics face with the informal nature of Twitter discussions and taking a more constructivist approach may address this (Balakrishnan 2014). Utilising social media as a way to engage in debates and discussion may indirectly improve students' ability to critique in other settings and further research into this aspect is needed.

Most students within this study engaged with social media but a minority did not use it nor see it as beneficial. The fact that technology is freely available may mean that the students were familiar

with different learning strategies and social media did not add to their learning. In Jones et al (2016) study students were not forced to use the social media platform, but this could create disparity amongst student when used in assessment. If social media is being incorporated into healthcare practice, it may be desirable for all students to have an understanding of its uses.

The name 'social media' gives the impression that it is a leisure, rather than professional, activity and the link between these two areas are seen as blurred in academia (Hsu & Ching 2012). Social media is being explored for use with patients and healthcare organisations, such as for health promotion (Park et al 2016), so the interface between academia and practice may need exploration. One challenge for nurse education may be to keep abreast of the developments in social media and its use within the practice setting. Some students in this study were aware of the dangers associated with social media, and the incorporation of professional and university guidance is needed. Huby & Smith (2016) highlight that nurses are aware of the need to maintain professional boundaries and need to be careful about comments shared to adhere to the NMC Code (2015).

Only 18.2% of participants had previously used social media for educational purposes prior to commencing the nursing programmes. Social media is not always promoted in schools and workplaces as a professional or educational tool due to a lack of understanding of the platform and concern for retribution if things go wrong (Ferguson 2013). Thus, when introducing social media into teaching and learning there needs to be consideration about the students' skills. It is still unclear what aspects motivate a student to engage with the use of social media as a teaching modality, but contributing factors may be that participants are happy with their current use, are unable to see the benefits of using it as a learning tool or those participants were influenced by the session itself. The enthusiasm and engagement of the individual lecturer in their promotion of social media may also be important (Booth 2014) and their role may need further research.

New nursing students have many demands being placed upon them (Van Der Relt et al 2015) in different ways and social media may be used to aid this transition (Ferguson et al 2016). The students' engagement with Twitter was not formally assessed as part of a module assignment which, as Jones et al (2016) notes, can contribute to low levels of use of social media for professional purposes.

A number of strategies have been identified by West et al (2015) for Twitter to be used, such as an introduction for students that sets the scene and builds on students' confidence in communicating in this way. Mistry (2011) suggested use of uniform resource locator (URL) shorteners (e.g. http://bit.ly) to assist with the 140 character limit for tweets. Understanding the range of interactions available, such as real time news feeds, could be introduced to enhance use of Twitter as a teaching tool. Links to useful Twitter pages could be made within the reference or reading lists and including searching social media within library training could be considered. Revisiting the use of hashtags may also be beneficial in assisting students to access specific information.

West et al (2015) conclude that adoption of three main strategies will positively impact student outcome - Twitter should be a mandatory element of a course, integrated in educationally relevant ways and for lecturers to engage with students via Twitter demonstrating the value of this as a learning experience; although this study suggests students did not think it should be compulsory. Cheston et al (2013) systematic review suggests that a strong faculty presence is required on social media platform which may have resource implications about who will monitor this. Use of live Twitter with tweets on the screen, particularly in small group work, may support students to provide their feedback in an interactive way which can then be responded to by the lecturer to develop discussion. The potential for using social media is huge but further research and exploration about how to build this productively into nurse education is needed.

Limitations

Undertaking a pre/post type approach may have been more accurate in detailing differences in student views between the start of the course and after the Twitter sessions. The students self-reported their abilities, which may have been inaccurate, and accessing data on their engagement with social media may be more useful. A study design that enabled triangulation of data may have further increased the usefulness and reliability of the findings.

Conclusion

Social media is a growing area within nursing practice and students can find its use engaging in the educational setting. Teaching Twitter can increase its' use and the support of lecturers and peers can help to promote the potential benefits. Further work on the different social media platforms and strategies for use within teaching, learning and assessment, considering different learner styles is needed to ensure it enhances learning and professional development.

References

Balakrishnan, V. (2014) 'Using social networks to enhance teaching and learning experiences in higher learning institutes'. *Innovations in Education and Teaching International*. 51 (6): 595-606 DOI:10.1080/14703297.2013.863735

Booth, R.G. (2015) 'Happiness, stress, a bit of vulgarity, and lots of discursive conversation: A pilot study examining nursing students' tweets about nursing education'. *Nurse Education Today*. 35: 322-327 DOI: <u>http://dx.doi.org/10.1016/j.nedt.2014.10.012</u>

Burau, V. (2007) 'Comparative Health Research'. In: Saks, M. & Allsop, J. (Eds) *Researching Health: qualitative, quantitative and mixed methods.* London: Sage Publications Ltd. pp368-383

Burns, N. & Grove, S.K. (2003) *Understanding Nursing Research*. 3rd edition. Philadelphia: W.B. Saunders Company

Chester, C.C.; Flickinger, T.E Chisolm, M.S. (2013) Social Media Use in Medical Education: A Systematic Review. *Academic Medicine*. 88 (6):893-901 DOI: 10.1097/ACM.0b013e31828ffc23 Chinn, T. (2014) Social Media: Unlocking the potential. *Independent Nurse*. Available at: <u>http://www.independentnurse.co.uk/professional-article/social-media-unlocking-the-</u> <u>potential/64631/</u> (accessed 20th May 2016)

De Vaus. D. (2014) Surveys in Social research. London: Routledge.

Epstein, I., & Ray, A. (2014). Nursing students' experiences on blogging in the classroom: Linking between ethics and pedagogy. *Journal of Nursing Education and Practice*, 4(4), 37-44.

Ferguson, C. (2013) 'It's time for the nursing profession to leverage social media'. *Journal of Advanced Nursing*, 69(4): 745-747.

Ferguson, C.; DiGiacomo, M.; Saliba, B.; Green, J.; Moorley, C.; Wyllie, A.; Jackson, D. (2016) 'First year nursing students' experiences of social media during the transition to university: a focus group study'. *Contemporary Nurse*. [online] DOI: 10.1080/10376178.2016.1205458 (accessed 14.10.2016)

Flynn, L.; Jalali, A.; Moreau, K.A. (2015) 'Learning theory and its application to the use of social media in medical education'. *Postgraduate Medicine Journal*. 91: 556-560 DOI: 10.1136/postgradmedj-2015-133358

Folley, A. and Ferry, B.A. (2012) 'Technology for people, not disabilities. Ensuring access and inclusion.' *Journal of Research In Special Educational Needs.* 12 (4), pp192-200.

Fox, B. & Varadarajan, R. (2011). 'Use of Twitter to encourage interaction in a multi-campus pharmacy management course'. *American Journal of Pharmaceutical Education*, 75(5): 88.

Green, J. (2013) 'The use of focus groups in research into health.' In: Saks, M. & Allsop, J. (Eds) *Researching Health: qualitative, quantitative and mixed methods.* London: Sage Publications Ltd. pp 128-147

Hsu, Y.C. & Ching, Y.H. (2012) 'mobile microblogging: using twitter and mobile devices in an online course to promote learning in authentic contexts'. *International Review of Research in Open and Distance Learning* 13 (4): 211-227

Huby, K. & Smith, J. (2016) 'Relevance of social media to nurse and helaathcare: "to tweet or not to tweet". *Evidence Based Nursing* 19 (4): 105-6 DOI: 10.1136/eb-2016-102476

Instagram (2016) What is Instagram? Available at: <u>https://www.instagram.com/about/faq</u> (accessed 5th October 2016)

Jones, R., Kelsey, J., Nelmes, P., Chinn, N., Chinn, T., & Proctor-Childs, T. (2016). Introducing Twitter as an assessed component of the undergraduate nursing curriculum: case study. *Journal of Advanced Nursing*, 0(0): 1-16, DOI: 10.1111/jan.12935

Junco, R. ; Heiberger, G. ; Loken, E. (2011) 'The Effect of Twitter on College Student Engagement and Grades'. *Journal of Computer Assisted Learning*. 27(2): 119-132 doi: 10.1111/j.1365-2729.2010.00387.x

Kaplan, A.M. & Haenlein, M. (2010) Users of the world unite! The challenges and opportunities of social media. *Business Horizons* 53(1), 59–68.

Kung, Y.M. & Oh, S. (2014) 'Characteristics of nurses who use social media'. *CIN: Computers, Informatics, Nursing.* 32 (2): 64-72 DOI: 10.1097/CIN.00000000000033

Mistry, V. (2011). Critical care training: using Twitter as a teaching tool. *British Journal of Nursing*, *20*(20).

Moorley, C.R. and Chinn, T. (2013) Nursing and twitter; creating an online community using hashtags *Collegian* 21, pp. 103-109

Moorley, C. and Chinn, T. (2015) 'Developing nursing leadership in social media.' *Journal of Advanced Nursing*. 72(3), pp 514-520.

Nursing and Midwifery Council (NMC) (2015) *The Code: professional standards of practice and behaviour for nurses and midwives*. Available at:

https://www.nmc.org.uk/globalassets/sitedocuments/nmc-publications/nmc-code.pdf (accessed 20th May 2016)

Nursing and Midwifery Council (NMC) (2016) *Guidance on using social media responsibly*. Available at: <u>https://www.nmc.org.uk/standards/guidance/social-media-guidance/</u> (accessed 6th May 2016)

Park, H.; Reber, B.H.; Chon, M.G. (2016) 'Tweeting as health communications: health organizations' use of Twitter for health promotion and public engagement'. *Journal of Health Communication*. 21 (2): 188-198 DOI: 10.1080/10810730.2015.1058435

Rose McGrory Social Media Ltd (2015) *UK Social Media in 2016*. Available at: <u>http://www.rosemcgrory.co.uk/2016/01/04/social-media-statistics-2016/</u> (accessed 6th May 2016)

Ross, J. (2012) Social Networking: Possible risks to nurses. *Journal of PeriAnesthesia Nursing*. 27 (3): 212-3 <u>doi:10.1016/j.jopan.2012.03.002</u>

Schmitt, T. L., Sims-Giddens, S. S., & Booth, R. G. (2012). Social media use in nursing education. *The Online Journal of Issues in Nursing*, 17(3), DOI: 10.3912/OJIN.Vol17No03Man02

Sinclair, W., McLoughlin, M., & Warne, T. (2015). To Twitter to Woo: Harnessing the power of social media (SoMe) in nurse education to enhance the student's experience. *Nurse Education in Practice*, *15*(6), 507-511.

Smith, T., & Lambert, R. (2014). A systematic review investigating the use of Twitter and Facebook in university-based healthcare education. *Health Education*, *114*(5), 347-366.

Tess, P. A. (2013). The role of social media in higher education classes (real and virtual)–A literature review. *Computers in Human Behavior*, 29(5), A60-A68.

Tower, M.; Blackloack, E.; Watson, B.; Heffernan, C.; Tronoff, G. (2015) Using social media as a strategy to address 'sophomore slump' in second year nursing students: a qualitative study. *Nurse Education Today*. 35: 1130-1134 DOI: <u>http://dx.doi.org/10.1016/j.nedt.2015.06.011</u>

Tuominen, R., Stolt, M., & Salminen, L. (2014). Social Media in Nursing Education: The View of the Students. *Education Research International* (2014), 1-16, http://dx.doi.org/10.1155/2014/929245 Twitter (2016) Twitter Usage/Company Facts. Available at: <u>https://about.twitter.com/company</u> (accessed 5th October 2016)

Tur, G., Marin-Juarros, V. & Carpenter, J. (2017). Using Twitter in Higher Education in Spain and the USA [Uso de Twitter en Educación Superior en España y Estados Unidos]. Comunicar, 51. <u>https://doi.org/10.3916/C51-2017-02</u> Usher, K., Woods, C., Casella, E., Glass, N., Wilson, R., Mayner, L., Jackson, D.; Brown, J.; Duffy, E.; Mather, C.; & Cummings, E. (2014). Australian health professions student use of social media. *Collegian*, 21(2), 95-101

van Der Riet, P.; Rossiter, R.; Kirby, D.; Dluzewska, T.; Harmon, C. (2015) 'Piloting a stress management and mindfulness program for undergraduate nursing students: Student feedback and lessons learned' *Nurse Education Today*, 35(1): 44-49

We Communities (no date) 'About' Available at: <u>http://www.wecommunities.org/about</u> (accessed 11.10.2016)

West, B.; Moore, H.; Barry, B. (2015) 'Beyond the Tweet: Using Twitter to Enhance Engagement, Learning, and Success Among First-Year Students'. *Journal of Marketing Education*. 37(3): 160–170 doi: 10.1177/0273475315586061