

Non-refereed articles

Mental Illness within Higher Education: Risk Factors, Barriers to Help Seeking and Pressures on Counselling Centres.

Patrick O'Keeffe
Student Liaison Officer
RMIT University

Abstract

Mental illness impacts upon a significant percentage of tertiary students in Australia and the United States. The number of students with mental illness is increasing, as is the number of students experiencing serious psychological difficulties. The first onset of mental illness frequently occurring for people aged 18 to 24, which, coupled with the stress created by study and life pressures for graduate university students, ensures that students can be considered as a group which is at high risk of developing mental illness. However, the willingness of students with mental illness to voluntarily seek help remains low. Amongst other barriers, the fear of stigmatisation, and resulting self concealment of mental illness, ensures that many students with mental illness do not seek professional help. This paper contends that the provision of information on mental illness, information on campus based treatment opportunities and the creation of an open environment where mental illness can be discussed, are critical to the improvement of help seeking behaviour. However, this paper refers to data on counsellor to student ratios in Australia, as compared to the United States, which indicates that counselling centres within Australian universities may not be effectively resourced to cope with an increase in demand for counselling services.

Introduction

The mental health of university students is a matter of great concern. According to a 2010 study of 6,479 tertiary students in Australia, "The estimated prevalence for mental health problems was 19.2% with 67.4% reporting subsyndromal symptoms (Stallman 2010, p.249)." As stated by Stallman (2010, p.249) the incidences of mental health problems amongst tertiary students included in the study "were significantly higher than the general population." Similar figures can be observed in a study of 1,622 college students from four universities in the United States (Mackenzie et al., 2011, p.101). Utilising the Beck Depression Inventory, amongst other means, Mackenzie et al. (2011, p.101) found that from the sample, 25 % of men and 26 % of women exhibited strong signs of depression. Key indicators for depression amongst the sample included "Tobacco use, emotional abuse, and unwanted sexual encounters (Mackenzie et al., 2011, p.101)". Stallman (2010) identified the key challenges faced by university students in Australia as "anxiety, stress, depression, academic, and relationship problems (p.253)." She reports that these are similar findings to previous studies conducted by Jackson and Connelley (2009) and Ryan, Shochet, and Stallman (2010).

Further studies have sought to gauge the level of stress experienced by students. A 1999 study of 350,000 college freshmen, conducted by the University of California, Los Angeles (UCLA) found that 30.2 % of students "frequently felt overwhelmed by what they had to do (UCLA Higher Education Research Institute 2000)." Haas (2003, p.1228) refers to the National College Health Association (Shea, 2002), which reported heightened stress levels amongst students, with 76% of respondents stating that they felt "overwhelmed" while 22% of students declared that they were so depressed at times that they were unable to function. The relationship between depression and incapacitation amongst students is also raised by Clay (2012, p.1) who reported that 44% of students stated that they were unable to function, at times, due to depression.

Mental health of students can vary depending on the program of enrolment. Hillis et al. (2010, p.188) demonstrated that the mental health of prospective medical students matched that of the general student population. However as medical students progress through their studies, their psychological well being declines markedly in relation to that of the general student body (Hillis et al., 2010, p.188). As stated by Hillis et al. (2010, p.188), "Within the first year alone, there is a significant increase from baseline in the prevalence of stress, depression and burnout."

Students aged 18 to 24 an ‘at risk’ population

The stress encountered by students due to the intensity of their studies can be placing students at risk of developing a mental illness. However, factors external to study, such as the transition to living away from home, the need to develop new skills and the challenges associated with exploring their identity ensure that the experience of tertiary education can be particularly stressful (Mackenzie et al. 2011, p.102). Furthermore, the development of a mental illness in a person is often likely to occur during adolescence and young adulthood - regardless of whether that person is enrolled in tertiary study or not (Zisook et al., 2012, p.2; Stallman 2012, p.249; Massie 2008, p.632). For people coping with lifelong mental illnesses, in 75% of cases, the first onset was experienced before the age of 24 (Kessler et al., 2005). The intensity of mental illness when experienced through these earlier years is often particularly acute (Zisook et al., 2012, p.2). Specifically, Zisook et al. (2012, p.2) state that “In addition to depression, bipolar disorders, anxiety disorders, eating disorders, and schizophrenia often first manifest themselves during college years and are associated with an increased risk of suicide.”

Stallman argues that the “extremely high prevalence” of mental health issues experienced by students provides sufficient evidence to suggest that this is an “at-risk” population (Stallman 2010, p.249). This indicates that young people studying in a higher education institution are highly susceptible to developing mental illness, which may persist throughout their lifetimes. The urgency of the mental health challenges faced by Australian universities is heightened by the intention of the Australian Government to ensure that increasing numbers of young people are enrolled in a bachelor degree within the Australian tertiary education system (Stallman 2012, p.249; Australian Government, 2009).

Increasing severity of mental illness among student population

The number of students seeking help for serious psychological problems is increasing in Australia and the United States, as is the number of students seeking support from campus based counselling centres (Kitzrow 2003, p.168; Stallman 2012, p.252). Eisen et al. (2009, p.455) state the in the United States, “more than 80% of counselling centre directors have consistently reported an increase over the previous 5 years in the number of students seen with serious psychological problems.” Gallagher (2009) provides further evidence to support this trend in the United States, while Stallman (2012, p.251) found that 87.5% of counselling directors within Australian universities have observed an increase in the number of students seeking help for severe psychological problems. The types of support that are being sought by students are also changing, with Kitzrow (2003, p.168) referring to studies such as those by Gallagher, Sysko and Zhang (2001) and Gallagher, Gill and Sysko (2000), stating that this shift is from “more benign developmental and informational needs, to more severe psychological problems.” Kitzrow (2003, p.168) refers to Pledge et al. (1998, p.387), who state that students are consistently presenting with concerns that include “suicidality, substance abuse, history of psychiatric treatment or hospitalisation, depression and anxiety.” Furthermore, Stallman (2012, p.252) found that 75% of counselling directors had noticed an increase in the number of clients experiencing crises.

Depression and suicidal ideation within higher education are closely related. As mentioned by Garlow et al. (2008, p.482) “there is a strong relationship between severity of depressive symptoms and suicidal ideation in college students, and that suicidal feelings and actions are relatively common in this group.” For people aged between 18 and 24 in the United States, suicide is the second most common cause of death, behind accidents (Haas et al., 2003, p.1228). According to Westefeld et al. (2005, p.643), 24% of a sample of students from within the United States had “thought about attempting suicide while in college.” These are not isolated findings, with Drum et al. (2009) conducting a study which showed 18% of undergraduate students experiencing suicidal ideation, while 6% of students had seriously thought about suicide in the past year (Drum et al.,

2009). Furthermore, Mackenzie et al. found that 13% of male students, and 10% of female students experienced suicidal thoughts (2011, p.101).

According to Garlow et al. (2008, p.482) the onus is on the higher education institution “to provide effective mental health outreach and treatment services to this vulnerable population.” Russell, Van Campen, Hoefle and Boor (2011) have found that the student groups most at risk of experiencing suicidal ideation include:

- commuter students
- gay, lesbian, bisexual, and transgender students
- international students

Russell et al. (2011) contend that the higher risk of suicidal ideation within these groups can be attributed to the provision of services to these groups, which are less adequate than that provided to the general student population. In terms of the risk of suicide to students of a particular age group, a seminal study conducted by Silverman, Meyer, Sloane, Raffel and Pratt (1997) found that the highest number of suicides were experienced by students in the 20 to 24 year old age group, while graduate students were most vulnerable to suicide. The behaviours or feelings closely related to suicide and suicide ideation among students have been cited as perfectionism (Hamilton and Schweitzer 2000, p.834) and hopelessness (Range and Penton 1994, p.456). The significant relationship between hopelessness, perfectionism, depression and subsequent suicide ideation has been highlighted by Chang and Rand (2000) and Rice, Leever, Christopher and Porter (2006), with the latter study finding this relationship present among a study of high achieving students.

Despite high rates of depression, suicide ideation and suicide within student populations, there is clear evidence to demonstrate that students at risk of suicide do not often voluntarily seek help. This is exemplified by a study conducted by Garlow et al. (2008, p.487), which found that:

Despite the potential to reduce suicide risk through treatment, there is a disconcerting lack of utilization of treatment resources by those students with suicidal ideation and depression. Remarkably, 84 % of the students with suicidal ideation and 85 % of the moderately severe to severely depressed students were not receiving any form of psychiatric treatment. The lack of engagement of psychiatric treatment is most obvious for the students with more severe symptoms of depression.

This finding is supported by Drum et al. (2009) and Kisch, Leino and Silverman (2005). Givens and Tjia (2002) found that nearly one quarter of medical students were depressed and 26% of students had suicidal ideation; yet mental health service usage from these students remained low.

Student help seeking

The reluctance of young people coping with mental illness to seek professional help is cause for concern. In a 1994 study of young people in Australia, Rickwood and Braithwaite (1994, p.569) found that 27% of the population sampled were experiencing either moderate or severe distress. Of those experiencing distress, 23% sought no help, while only 17% sought professional help (Rickwood and Braithwaite 1994, p.569). Douglass and Islam (2007, p.7) reported similar findings, stating that while 27% of students identified themselves as suffering from anxiety and 23% of students reported to be suffering from depression, 8.5% of participants sought help from the university counsellor. The reluctance of students to seek help is highlighted by Douglass and Islam (2007, p.7), who found that 40% of students sampled reported a need for assistance in coping with emotional issues, though stated an unwillingness to seek this assistance.

Mackenzie et al. (2011, pp.102-103) refer to Garlow, Rosenberg and Moore (2008), who found that of students experiencing suicidal thoughts, only 16% were receiving treatment, while 14% of students experiencing depression were receiving treatment. Similar figures are reported by the National Centre for the Prevention of Youth Suicide (2012, p.1), who refer to findings from Drum et al. (2009) that professional help was never sought by the majority of students who had completed

suicide. This is supported by Kirsch, Leino and Silverman (2005), who contend that approximately 80% of students who had completed suicide never sought help from services provided on campus.

This presents a significant problem, as delays in seeking treatment for mental illness can have seriously adverse consequences. As Bovasso (2001, p.48) found, the longer that anxiety and depression is left untreated, the more likely a person is to develop further, new symptoms related to anxiety and depression. The urgency of seeking treatment is underscored by Eisenberg et al. (2009, p.523), who state that with mental illness developing under the age of 24 having serious long term impacts for many people, “timely and effective treatment” is highly desirable. This clearly indicates that the fostering of an environment where help seeking is encouraged is critical, not only in preventing students from developing long term mental illness, but also in ensuring that students do not develop additional symptoms. This may involve developing greater mental health literacy amongst students and faculty members; however this may also involve addressing issues which undermine help seeking.

Barriers to help seeking amongst students

The reluctance of students to seek help for mental illness indicates the presence of numerous barriers that prevent good help seeking behaviour. Rickwood, Deane, Wilson and Ciarrochi (2005, p.1) found that limited emotional competence, negative attitudes towards help seeking and fear of stigma were among the greatest barriers to help seeking behaviour among students. Gulliver et al. (2010, p.2) also referred to negative attitudes to help seeking to be a considerable barrier, as were concerns regarding confidentiality. Furthermore, research by Ryan, Shochet and Stallman (2010, p.73) indicates that the more distressed a student is, the less likely that they are to seek help. Referring to Hogan (2003), Eisenberg et al. (2009, p.523) states that stigma associated with mental illness has a considerably limiting impact on help seeking behaviour and the use of mental health services in the United States.

Stigmatisation of mental illness has been found to exist within university settings. In a study conducted by Hillis et al. (2010, p.189), 55% of medical students sampled either agreed or strongly agreed “that there was a stigma attached to being a medical student undergoing stress and distress.” Furthermore, in Hillis et al. (2010, p.189) 72% “agreed or strongly agreed that there was a stigma attached to being a medical student diagnosed with a mental health condition.” The student group found to be most susceptible to perceiving stigmatisation were international, male students (Hillis et al., 2010, p.189). In a key study of mental health help seeking within higher education in the United States, Eisenberg et al. (2009) found that stigmatisation of mental illness constituted a considerable barrier to treatment. The study was informed by 5,555 students from 13 higher education institutions (Eisenberg et al., 2009).

Stigma can come from many different sources and be experienced in a range of different ways. As mentioned by Masuda et al. (2009, p.169) “Stigma toward those diagnosed with a psychological disorder may be defined as a multi-dimensional negative attitude toward a group of people who are construed to be lacking appropriate skills or abilities. As a result, such stigmatized individuals are viewed as incompetent, unpredictable, or threatening (Kurzban and Leary, 2001).” In their 2007 study, Vogel, Wage and Hackler (2007) studied the relationship between stigmatisation and individual counselling, finding that both having a mental illness and seeking help are stigmatised, which causes those with mental illness to refrain from seeking help for fear of being considered a part of a stigmatised group.

Self-concealment is a considerable factor in the minimisation of help seeking behaviour (Masuda and Boone 2011, p.267; Kessler et al., 2001). Referring to Cramer and Barry (1999) and Larson and Chastain (1990), Masuda and Boone (2011, p.267) state that “self-concealment is a behavioural tendency to keep distressing and potentially embarrassing personal information hidden from others.” Self-concealment has been cited by Schomerus et al. (2009, p.303) as the most popular method deployed by those with depression, as a means to avoid stigmatisation.

Furthermore Ben-Porath (2002) found that a person with depression who sought help for their mental illness was judged as being more emotionally unstable than a person with a depression who did not seek help. This indicates that disclosure of mental health challenges had an impact upon how a person was perceived, indicating the stigmatisation of those seeking help. Similarly, Schwenk (2010, p.1188) found that “Compared with students with low self identified depression, students with high scores more frequently agreed that the opinions of depressed medical students would be less respected, that the coping skills of depressed medical students would be viewed as less adequate, that they would be viewed as less able to handle their responsibilities by faculty members.” Schwenk (2010, p.1188) found that as a result of these observations, students felt that there was a degree of risk associated with visiting a counsellor to seek help for depression.

Schwenk (2010, p.1181) referred to Givens and Tjia (2002), Chew-Graham, Rogers and Yassin (2003) and Rosal et al. (1997), who found that students were concerned that revealing their mental illness might have a negative impact upon their education. Stevenson (2010, p.41) contends that “students (with psychiatric disabilities) frequently do not want to make their conditions public for fear of being regarded as ‘different’ or even ‘difficult’”. As stated by Stevenson, (2010, p.41) this can be attributed to the “persistent stigma” attached to psychiatric disabilities.

Promoting open discussion on mental illness

Hillis et al. (2010, p.189) provide a clear outline of how the issue of stigmatisation of mental illness can be addressed in a university setting:

Medical schools should actively counter the perception of stigma associated with mental health issues. Three methods of doing so have been identified - education, protest, and contact. Examples of these in the medical school setting include informing medical students about the reality of mental health issues within the profession; countering beliefs that bolster stigma, such as resultant academic jeopardy (the belief that seeking support will adversely affect academic standing and references); and facilitating medical students hearing of the experiences of senior colleagues who had undergone stress or had a mental health experience.

Referring to their finding that 55% of medical students surveyed contended that students who sought help were subject to stigmatisation, Hillis (2010, p.189) proposes that decisive action must be taken from university faculties to address this issue. According to Hillis et al., (2010, p.189), education, protest and contact are three key methods that can be adopted to address stigmatisation. According to Hillis et al., (2010, p.189), “Examples of these in the medical school setting include informing medical students about the reality of mental health issues within the profession; countering beliefs that bolster stigma, such as resultant academic jeopardy (the belief that seeking support will adversely affect academic standing and references); and facilitating medical students hearing of the experiences of senior colleagues who had undergone stress or had a mental health experience.”

Knowledge of campus based services

While each of the barriers mentioned above are real and significantly impede help seeking behaviour of students, limited knowledge of the services available may also represent a major barrier to help seeking. Westefeld (2005, p.642) found that only 26% of students were aware of “any resources for dealing with suicide that are available to college students on their campus.” Reflecting a better awareness of services available to university students, Hillis et al., (2010, p.189) found that “only 71% of students were aware of these services.” However students identified promotion of services as being an issue, with less than half of those sampled believing that promotion of services was adequate (Hillis et al., 2010, p.189). This indicates that knowledge of the services which exist to support students could also represent a major barrier to help seeking.

Westefeld et al. (2005, p.643) conducted a study of student perceptions of suicide, which sought to determine the measures the students would most like to see universities adopting to support students at risk of suicide. The preferences included below demonstrate that information provision, openness

on the topic and availability of treatment options are highly rated by students (Westfeld et al., 2005, p.643):

- Provide didactic information on suicide (n=267).
- Provide treatment opportunities (n=222)
- Provide literature about the topic (n=217)
- Create a more open atmosphere about the topic (n=212)
- Have support groups (n=122)
- Have crisis lines (n=108).

The preference for information provision is clear, suggesting that students want to know about the issues relating to suicide, and the treatment opportunities available. However, students in this study also demonstrate a desire for the creation of “a more open atmosphere” on the topic of suicide, supporting the assertion of Hillis et al., (2010) that mental illness amongst student populations needs to be discussed openly, without prejudice, within the university setting. Through the provision of information which de-mystifies mental illness, the provision of campus based treatment and the creation of an open environment where mental illness can be discussed by students without fear of repercussion, the higher education institution is demonstrating a commitment to supporting students with mental illness, normalising mental illness and help seeking, rather than ostracising students for having a mental illness.

Pressure on counselling centres

Highlighting the potentially valuable role played by tertiary institutions, Zivin et al., (2009, p.180) state that “preventing, detecting, and treating mental disorders among college students are promising avenues for addressing the population burden of early-onset mental disorders. Moreover, doing so may have broad benefits given the significant impact that these disorders have on educational, economic, and social outcomes (Andrews et al., 2006; Andrews and Wilding, 2004; Berndt et al., 2000; Kessler et al., 2001; Kessler et al., 1995; Mowbray et al., 2006).” The role played by universities in ameliorating mental illness experienced by tertiary students is demonstrated by Haas et al., (2003, p.1226), who found that although mental illness amongst students is relatively high, the rate of completed suicide is actually lower than for the general population. According to Haas et al., (2003, p.1228) this can be attributed to the availability of affordable, or free, campus based health and mental health services, as well as peer and mentor assistance available within universities; such breadth of support is perhaps not so readily available as within the general community.

However, the rise in the number of students entering higher education with a history of psychological problems, the subsequent rise in the number of students seeking counselling support and the rise in the number of students presenting with serious psychological problems is creating significant pressure on university counselling centres in Australia and the United States (Haas et al. 2003, p.1235; Stallman 2012; Stallman 2010). In particular, evidence suggests that counselling centres on Australian university campuses are significantly under-resourced (Stallman 2012, p.252). The International Student Counsellors Association (Gallagher, 2009) recommends that the counsellor to student ratio on campus should be in the vicinity of 1:1,500 - 1:2,000. Stallman (2012, p.252) found that within Australian universities, the counsellor to student ratio was 1:4,340. This finding is supported by Downs (2008), who reported that this ratio was 1:4,957 in 2008. These figures indicate significant under-staffing of Australian counselling centres on campus, as opposed to the United States, where the counsellor to student ratio is 1:1,527 (Gallagher, 2009). Potentially due to the poor counsellor to student ratios in Australian universities, counsellors devote less sessions toward clients, with the average number of sessions provided to a student at 2.9 within Australia, as opposed to 6.2 sessions per client in the United States (Stallman 2012, p.252). The pressures experienced by counselling services on Australian university campuses impact upon the

waiting time for students to visit a counsellor, which Jackson and Connelley (2009) found was in excess of 5 days, for 50% of students accessing these services. As stated by Stallman (2012, pp.252-253), this ensures that adequate, long term referral sources are needed, as are greater access to psychiatric services from campus based counsellor centres.

Conclusion

The existing pressures on counselling centres create a significant conundrum. If help seeking behaviour of students with mental illness were to be improved; through a combination of outreach, information provision and promotion for example, and the subsequent demand for campus based counselling services increased, then it is difficult to imagine how counselling centres already dealing with high counsellor to student ratios will cope with this demand. Help seeking behaviour may not be restricted to visiting a counsellor; as Ryan, Shochet and Stallman (2010) found, anonymous, online resources can be viewed by some students as more preferable, particularly for those students experiencing a high degree of distress. However, if mental illness amongst university students is as high as the research cited in this paper suggests, and help seeking behaviour is as poor as the research indicates, then there is clearly a very high proportion of students with mental illness that is left untreated. Improving the help seeking behaviour of these students is highly desirable, yet questions must be raised as to whether campus based counselling centres are equipped to cope with a potentially great increase in demand for counselling services that would come from a concerted attempt at promoting help seeking.

References

- Australian Government (2009). *Transforming Australia's Higher Education System*. Canberra: Australian Government.
- Ben-Porath, D. (2002). Stigmatization of individuals who receive psychotherapy: An interaction between help-seeking behaviour and the presence of depression. *Journal of Social and Clinical Psychology, 21*, 400-413.
- Bovasso, G. (2001). The long term treatment outcomes of depression and anxiety comorbid with substance abuse. *The Journal of Behavioral Health Services and Research, 28*(1), 42-56.
- Chew-Graham, C., Rogers, A., & Yassin, N. (2003). 'I wouldn't want it on my CV or their records': Medical students' experiences of help-seeking for mental health problems. *Medical Education, 37*(10), 873-880.
- Clay, R., (2012), *Preventing suicide on college campuses*. Substance Abuse and Mental Health Services Administration News. Retrieved from http://www.samhsa.gov/samhsanewsletter/Volume_19_Number_2/PreventSuicideCollegesCampuses.aspx
- Cramer, K., & Barry, J. (1999). Psychometric properties and confirmatory factor analysis of the Self-Concealment Scale. *Personality and Individual Differences, 27*, 629-637.
- Drum, D., Brownson, C., Burton, A., & Smith, S. (2009). New data on the nature of suicidal crises in college students: Shifting the paradigm. *Professional Psychology: Research and Practice, 40*(3), 213-222.
- Eisen, A., Kushner, H., McLeod, M., Queen, E., Gordon, J., & Ford, J. (2009). An integrated approach to addressing addiction and depression in college students. *Journal of American College Health, 57*(4), 455-456.
- Eisenberg, D., Downs, M., Golberstein, E., & Zivin, K. (2009). Stigma and help seeking for mental health among college students. *Medical Care Research and Review, 66*(5), 522-541.
- Givens, J., & Tjia, J. (2002). Depressed medical students' use of mental health services and barriers to use. *Acad Med, 77*(9), 918-921.
- Gallagher, R. (2009). *National Survey of Counselling Centre Directors*. Washington, DC: International Association of Counselling Services Inc.
- Gallagher, R., Gill, A., & Sysko, H. (2000). *National Survey of Counselling Centre Directors*. Alexandria, VA: International Association of Counselling Services Inc.
- Gallagher, R., Sysko, H., & Zhang, B. (2001). *National Survey of Counselling Centre Directors*., Alexandria, VA: International Association of Counselling Services Inc.
- Garlow, S., Rosenberg, J., & Moore, J. (2008). Depression, desperation, and suicidal ideation in college students: Results from the American Foundation for Suicidal Screening Project at Emory University', *Depression and Anxiety, 25*, 482-488.

- Gulliver, A., Griffiths, K., & Christensen, H. (2010). Perceived barriers and facilitators to mental health help-seeking in young people: A systematic review. *BMC Psychiatry, 10*(113), 1-9.
- Haas, A., Hendin, H., & Mann, J. (2003). Suicide in College Students. *American Behavioral Scientist, 46*, 1224-1240.
- Hamilton, T., & Schweitzer, R. (2000). The cost of being perfect: Perfectionism and suicide ideation in university students. *Australian and New Zealand Journal of Psychiatry, 34*, 829-835.
- Hillis, J., Perry, W., Carroll, E., Hibble, B., Davies, M., & Yousef, J. (2010). Painting the Picture: Australasian medical student views on wellbeing teaching and support services. *Medical Journal of Australia, 192*(4), 188-192.
- Hogan, M. (2003). New freedom commission report: the president's new freedom commission: Recommendations to transform mental health care in America. *Psychiatric Services, 54*, 1467.
- International Association of Counselling Services. (2000). *Accreditation standards for university and college counselling centres*. Alexandria, VA: International Association of Counselling Services Inc.
- Jackson, S., & Connelley, J. (2009). *Student perceptions and experiences of counselling*. Brisbane: The University of Queensland.
- Kessler, R., Berglund, P., Borges, G., Nock, M., & Wang, P. (2005). Trends in suicide ideation, plans, gestures, and attempts in the United States, 1990-1992 to 2001-2003. *JAMA, 293*, 2487-2495.
- Kessler, R., Berglund, P., Bruce, M., Koch, J., Laska, E., & Leaf, P. (2001). The prevalence and correlates of untreated serious mental illness. *Health Services Research, 36*(6), 987-1007.
- Kessler, R., Foster, C., Saunders, W., & Stang, P., (1995), Social Consequences of Psychiatric Disorders. *American Journal of Psychiatry, 152*, 1026-1032.
- Kitzrow, M. (2003). The mental health needs of today's college students: Challenges and recommendations. *Journal of Student Affairs Research and Practice, 41*(1), 167-181.
- Kisch J, Leino E., & Silverman M. (2005). Aspects of suicidal behavior, depression, and treatment in college students: Results from the Spring 2000 National College Health Assessment Survey. *Suicide and Life Threatening Behavior, 35*, 3-13.
- Larson, D., & Chastain, R. (1990). Self-Concealment: Conceptualization, measurement, and health implications. *Journal of Social and Clinical Psychology, 9*, 439-455.
- Leong, F. & Zachar, P. (1999). Gender and opinions about mental illness as predictors of attitudes toward seeking professional psychological help. *British Journal of Guidance and Counselling, 25*, 123-132.
- Mackenzie, S., Wiegel, J., Mundt, M., Brown, D., Saewyc, E., Heiligenstein, E., Harahan, B., & Fleming, M. (2011). Depression and suicide ideation among students accessing campus healthcare. *American Journal of Orthopsychiatry, 81*(1), 101-107.
- Massie, A. (2008). Suicide on campus: The appropriate legal responsibility of college personnel. *Marquette Law Review, 91*(3), 627-686.
- Masuda, A., Anderson, P., Twohig, M., Feinstein, A., Chou, Y., Wendell, J., & Stormo, A. (2009). Help-seeking experiences and attitudes among African American, Asian American and European American college students. *International Journal of Advanced Counselling, 31*, 168-180.
- Masuda, A., & Boone, M. (2011). Mental health stigma, self-concealment, and help-seeking attitudes among Asian American and European American college students with no help-seeking experience. *International Journal of Advanced Counselling, 33*, 266-279.
- Mowbray, C., Megivern, D., Mandiberg, J., Strauss, S., Stein, C., Collins, K., & Lett, R. (2006). Campus mental health services: Recommendations for change. *American Journal of Orthopsychiatry, 76*, 226-237.
- National Centre for the Prevention of Youth Suicide. (2012). *Preventing suicidal behavior among college and university students*. Retrieved from http://www.suicidology.org/c/document_library/get_file?folderId=261&name=DLFE-558.pdf
- Pledge, D., Lapan, R., Heppner, P., & Roehlke, H. (1998). Stability and severity of presenting problems at a university counseling center: A 6-year analysis. *Professional Psychology Research and Practice, 29*(4), 386-389.
- Range, L., & Penton, S. (1994). Hope, hopelessness and suicidality in college students. *Psychological Reports, 75*, 456-458.

- Rice, K., Leever, B., Christopher, J., & Porter, D. (2006). Perfectionism, stress and social (dis)connection: A short-term study of hopelessness, depression, and academic adjustment among honours students. *Journal of Counselling Psychology, 53*(4), 524-534.
- Rickwood, D., & Braithwaite, V. (1994). Social-psychological factors affecting help-seeking for emotional problems. *Social Science and Medicine, 39*(4), 563-572.
- Rickwood, D., Deane, F. P., Wilson, C. J., & Ciarrochi, J. (2005). Young people's help-seeking for mental health problems. *Australian e-Journal for the Advancement of Mental Health, 4*, 1-34.
- Ryan, M., Shochet, I., & Stallman, H. (2010). Universal online interventions might engage psychologically distressed university students who are unlikely to seek formal help. *Advances in Mental Health, 9*(1), 73-83.
- Rosal M., Ockene I., Ockene J., Barrett S., Ma Y., & Hebert J. (1997). A longitudinal study of students' depression at one medical school. *Acad Med, 72*(6), 542-546.
- Russell, S., Van Campen, K., Hoefle, J., & Boor, J. (2011). *Suicide risk and lesbian, gay, bisexual, and transgender college students*. In Lamis, D., and Lester, D. (Eds.), *Understanding and preventing college student suicide*. Springfield, IL: C. C. Thomas Publishers.
- Schomerus, G., Matschinger, H., & Angermeyer, M. (2009). The stigma of psychiatric treatment and help-seeking intentions for depression. *European Archives of Psychiatry and Clinical Neuroscience, 259*, 298-306.
- Schwenk, T., Davis, L., & Wimsatt, L. (2010). Depression, stigma, and suicidal ideation in medical students. *Journal of the American Medical Association, 304*(11), 1181-1190.
- Silverman, M., Meyer, P., Sloane, F., Raffel, M., & Pratt, D. (1997). The big ten suicide study: a 10-year study of suicides on Midwestern university campuses. *Suicide and Life-Threatening Behavior, 27*, 285-303.
- Simpson, A., & Ferguson, K. (2012). Mental health and higher education counselling services - responding to shifting student needs. *Journal of the Australia and New Zealand Student Services Association, 39*, 1-9.
- Stallman, H. (2012). University counselling services in Australia and New Zealand: Activities, changes and challenges. *Australian Psychologist, 47*, 249-253.
- Stallman, H. (2010). Psychological distress in university students: A comparison with general population data. *Australian Psychologist, 45*(4), 249-257.
- Stevenson, M. (2010). If they can't stand the heat...: Supporting the academic development of higher education students with anxiety and depression disorders. *The Open Rehabilitation Journal, 3*, 41-46.
- UCLA Higher Education Research Institute. (2000). *The American freshman: National norms for 1999*. Los Angeles: UCLA Graduate School of Education and Information Studies.
- Vogel, D., Wade, N., & Hackler, A. (2007). Perceived public stigma and the willingness to seek counseling: The mediating role of self-stigma and attitudes toward counselling. *Journal of Counseling Psychology, 54*, 40-50.
- Westefeld, J., Homaifar, B., Spotts, J., Furr, S., Range, L., & Weerth, J. (2005). Perceptions concerning college student suicide: Data from four universities. *Suicide and life-Threatening Behaviour, 35*(6), 640-645.
- Zisook, S., Downs, N., Moutier, C., & Clayton, P. (2012). College students and suicide risk: Prevention and the role of academic psychiatry. *Academic Psychiatry, 36*, 1-6.
- Zivin, K., Eisenberg, D., Gollust, S., & Golbertstein, E. (2009). Persistence of mental health problems and needs in a college student population. *Journal of Affective Disorders, 117*, 180-185.

The author may be contacted:

Patrick O'Keeffe
patrick.okeeffe@rmit.edu.au