

EXPLORING THE POTENTIAL OF ONLINE GROUP COUNSELING : A CASE-STUDY FOR MAURITIAN STUDENTS PRESENTING THE INTERNET ADDICTION DISORDER SYNDROME

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Abstract

Investigating the prevalence of Internet addiction disorder among Mauritian students at tertiary level seems to be appropriate, especially at a time when Internet access cost is becoming cheaper and number of user is, consequently, growing. This research, structured with an initial preliminary investigation about online behaviors of tertiary students and the psychological features associated with Internet addiction, explores the design and implementation of online counseling. A random sample of more than eighty participants completed a web-based questionnaire, which was used to assess the usage, influence and depth of penetration of Internet in students' life at the University of Mauritius. Backup with a critical literature review, this research study used a methodological framework to setup online counseling session for treating Internet Addiction disorder (IAD). The design and implementation process was developed and analyzed after a group of nine counselees completed online group counseling sessions for IAD, by extensive use of discussion forum for communication purpose. The three months long program ended with a feedback questionnaire, where participants responded to a series of open and closed-ended type questions pertaining to whether they found the counseling sessions to be helpful, useful and meaningful. Moreover, the best features of the online platform and areas which needs improvement were also queried. From a compilation of advantages of using a virtual environment, benefits of online counseling were deduced and the whole implementation process was presented as a model which can be used to screen counselee for online counseling program to handle IAD and provide remedial solutions via a computer-mediated platform, if needed.

Keywords: Internet Addiction Disorder (IAD), online counseling, computer-mediated communication, University students.

Introduction

Mauritius, despite being a developing country and island, is not spared from the invasion of Internet. In most, if not all, tertiary institution of the island, on-campus computer with internet connection is provided to students. Students go online for various reasons, not only for academic purposes. Apart from on-campus computers, students also access the internet from other public places and for many at home, as well.

Nowadays, news headlines are updated by the minute, not just daily. A user can easily connect with literally hundreds of people on social networking sites like Facebook, or Twitter. Email, online chat and message boards allow for both public and anonymous

communication about almost any topic imaginable, down to the smallest detail. Most of us enjoy the benefits of the Internet, some find it is an indispensable tool for work as well.

The growth of the Internet has been accompanied by a growing concern that excessive use is related to the development of a disorder which is commonly known as "Internet addiction," and more scientifically as "pathological Internet use" or "Internet Addiction Disorder, (IAD)". In South-East Asia in particular it has become a serious concern. In a March 5, 2010 article entitled "Girl Starved to Death While Parents Raised Virtual Child in Online Game," The Guardian reported that a Korean couple left their baby to starve while immersed in an online role-playing game for up to 12 hours at a time. With the soaring number of Internet users world-wide, and by extension in the local context, the problem of Internet addiction should attract the attention of policy makers, educators, administrators, psychiatrists/counselors and the public in general. The Internet has helped us communicate, learn, work and even entertain ourselves in way never thought a few decades ago. We can use this medium, which is become more popular, to help those who find help in finding a balance in life. Technically speaking, online counseling refers to the *provision of professional mental health counseling services* concerns via the Internet (Wikipedia). Till date (as at August, 2012), there is absolutely no record of study, done in Mauritius and on people living in the country, about online behavior relative to the phenomenon of Internet Addiction Disorder. This investigation can help to give an insight of online activities of the students at post-secondary level, Univeristy of Mauritius' students and consequently deduce whether there is a tendency or prevalence to IAD. This research investigated into the design issues and consequently proposed an internet-based framework for implementing online counseling. The literature review will help in setting the theoretical foundation, and prior research findings, used to treat Internet addiction and understand how online counseling work. Finally, the evidence-based recommendation will expose key issues for a successful implementation of a computer-mediated platform for online counseling.

The Internet Addiction Disorder Syndrome

To be able to diagnose a person for Internet Addiction Disorder, certain criteria, as prescribed by the American Psychiatric Association (www.apa.org), should be met. And also three or more of these criteria must be present at any time during a twelve month period. Young (1996) developed a brief eight-item questionnaire which modified criteria for pathological gambling to provide a screening instrument for addictive Internet use.

Internet Addiction is a broad term covering a wide-variety of online behaviors. In a survey based on 13 Qualitative results, Young et al. (2000) suggest that five specific sub-types of Internet addiction could be categorized:

- Cybersexual Addiction - compulsive use of adult web sites for cybersex and cyberporn.
- Cyber-relationship Addiction – over-involvement in online relationships.
- Net Compulsions - obsessive online gambling, shopping, or online trading.
- Information Overload - compulsive web surfing or database searches.
- Computer Addiction - obsessive computer game playing (e.g., Doom, Myst, or Solitaire).

In the same Qualitative analysis, Young et al. (2000) indicated that a leading factor underlying pathological or compulsive use of the Internet was the anonymity of electronic transactions. Specifically, anonymity was associated with four general areas of dysfunction:

1. Encouraged deviant, deceptive, and even criminal acts such as viewing and downloading obscene images (e.g., pedophilia, urination, or bondage fantasies) or illegal images (e.g., child pornography) widely available on adult web sites. It should be noted that the evidence indicates that clients who entertained deviant sexual fantasies involving children

and adolescents did not attempt to contact children or adolescents beyond the Internet. Observations noted suggested that the existence of deviant behaviours and fantasies did not necessarily equate to sexual molestation of children or vulnerable ones. Generally, the behavior began out of curiosity and developed to an obsession.

2. Shielding shy or self-conscious individuals, with a virtual context, to allow interaction in a socially safe and secure environment, over-dependence upon on-line relationships resulted. Accompanied with significant problems with real life interpersonal and occupational functioning, in such cases, CBT and interpersonal psychotherapy techniques were applied in to reduce avoidant behavior and to enhance social skills.

3. Moreover, Interactive components of online communication facilitated cyber-affairs/Extramarital relationships to develop on-line, impacting negatively on marital or family stability, primarily leading to separation and divorce. Individual, marital therapy and family therapy was used when couples' worked towards reconciliation after the online infidelity.

4. With ease to develop alternative online personas, dependent upon a user's mood or desires, Young et al. (2000), suggests that the virtual environment can provide a subjective escape from emotional difficulties (e.g., stress, depression, anxiety) or problematic situations or personal hardships (e.g., job burnout, academic troubles, sudden unemployment, marital discord). This immediate psychological escape found within the on-line environment served as a primary reinforcement for the compulsive behavior and development of a fantasy virtual world. Underlying mood disorders and psychosocial issues can be treated with psychotherapy and pharmacological interventions as appropriate.

Egger (1996) posted a questionnaire to the Web designed to determine Internet behavior and addiction. Most of the replies came from Switzerland, 450 valid responses were received, and a throughout statistical analysis of this data was available for review. Egger did not advertise for Internet Addicts to take his survey, but instead asked all respondents to self-identify as addicted or dependent. There were 10.6% of the respondents who endorsed this item as being addicted/dependent. Thompson (1996) posted a survey called the "McSurvey", composed of questions designed to determine the kinds of disruptions experienced by people that self-identified as Internet Addicts. From the respondents, of those, 72% reported an addiction or dependency to the Internet, and 33% stated their Internet use had negative effect on their lives. In testing to see if a perceived deficit in real life personal relations was correlated to the reporting of Internet Addiction, Thompson reports mixed results.

A review of the Internet addiction research published in 2009 (Byun et al., 2009) demonstrated significant, multiple flaws in most studies in this area. Young (1996) points out that one area that clearly has not been addressed at the level it deserves is the use of, and addiction to, on-line pornography and interpersonal cybersex. Anything that can safely, quickly, and completely satisfy such a basic human desire is bound to be addictive to some. King (1996) stipulates that technological advancements in communication tools have opened a new domain in social interactivity. King (1996) states that IAD "*is not like other forms of behavioral addiction because it involves interaction with others in the context of this new, scarcely researched medium*". This is a categorically different form of human interaction, one that is too recent and still changing too fast, for its implications to be fully cognizant to even the oldest members of online virtual communities.

Online Counseling

Online therapy is nothing new in the field of experimental research. Eliza was launched in 1966 and developed by Weizenbaum to study 'natural language 'communication between a computer and a human, based on Rogerian therapy (<http://en.wikipedia.org/wiki/ELIZA>).

Eliza was not developed to be utilized in the role of a counselor. However she was readily available to anyone who wanted to have dialogue with her. Eliza convinced clients to voice out, believing that a person, and not software, was responding to them. Dr Eliza is still available online at <http://www.pandi.20m.com/games/elizav2.html>.

“Fee-based mental health services offered to the public began to appear on the Internet in mid-1995” Martha (1995). Most were of the "mental health advice" type, offering to answer one question for a small fee. The earliest was Leonard Holmes, who offered "Shareware Psychological Consultation" (<http://www.leonardholmes.com>) answering questions on a "pay if it helps" basis. Holmes reports that as soon as he set up a website advertising his practice, he began to receive e-mail from people asking for help; it was apparent that people were ready to reach out to psychotherapists via the Internet. "Help Net" and "Shrink Link" were two other fee-based mental health advice websites available in the fall of 1995 (neither is still online).

According to Martha (1995), David Sommers can be considered the primary pioneer of "e-therapy." He was the first to establish a fee-based Internet service in which, more than answering a single question, he sought to establish longer-term, ongoing helping relationships, communicating only via the Internet. From 1995 through 1998, Sommers worked with over 300 persons in his online practice, spanning the globe from the Arctic Circle to Kuwait. Sommers employed several consumer-level Internet technologies for e-therapy, primarily e-mail with encryption but also real-time chat and videoconferencing.

Ed Needham, established his "Cyberpsych" IRC chat service (www.win.net/cyberpsych) in August 1995, and was the first to focus exclusively on e-therapy interaction via real-time chat. The development of hospital- and clinic-based telemedicine-the use of sophisticated videoconferencing hookups to allow physicians to work with patients in remote locations-has been well-documented elsewhere. In the fall of 1995, Martha (1995) found twelve e-therapists practicing on the Internet. His database has now grown to include over 300 private-practice Web sites where e-therapists offer services and "e-clinics" which represent, collectively, more than 500 more e-therapists. The formation of the International Society for Mental Health Online (or ISMHO, <http://www.ismho.org>) was a milestone in the development of e-therapy. ISMHO is a nonprofit society formed in 1997 to promote the understanding, use and development of online communication, information and technology for the international mental health community.

Methodology

This study was carried out to investigate mainly into the student's internet usage, with focus on psychological characteristics that can identify existence of Internet Addiction Disorder (IAD). A look at the characteristics of student preferred activities, proportions of time spend by student on online activities and its relationship, if any, with Internet addiction disorder, were among questions set, in a web-based survey.

The main research questions were:

1. What is the online activities of student and nature of browsing?
2. Do students have IAD, based on Young (1996) screening's criteria?
3. What are the perceptions of students towards the influence of Internet?
4. Does Internet Addiction Disorder (IAD) affect tertiary students in Mauritius?

The main research objective is to understand the online behavior of students and to find the psychological features of Internet Addict among a student population, at University level.

A web-based survey questionnaire, administered to a tertiary student's population was used as a tool to collect data, of a qualitative nature, particularly helping to collect data which was used in analyzing the need of connecting to Internet, describing the means and ways

available to students to construct their online presence, establishing an online presence and relationship with social realities. Also it was investigated about the experience with the development of a strong craving (addiction) for an online presence, denoted by a need to connect even when they are on campus.

Moreover, the quantitative aspect will be complementary in knowing the proportion of regular internet user, frequency and duration of online presence. The quantitative aspect will find give insights in extent to which students are affected, whether adversely or positive. The relative significant of these various factors will also be analyzed to find how they are correlated.

This quantitative research method is designed to ensure objectivity and reliability. Participants (students) will be selected randomly from the study population in an unbiased manner. Anyone who enters the computer laboratory during the period of data collection will have access to the standardized web-based questionnaire. The statistical methods used to test predetermined hypotheses regarding the relationships between specific variables, covers ways in which quantitative research take place and the results are expected to be replicable no matter who conducts the research.

An online platform was identified to provide group counseling. Open-source software hosted on a web-based server, at Virtual Centre for Innovative Learning Technologies (VCILT), a department of University of Mauritius, provided the necessary space for creating an online group counseling therapy.

The main hypothesis that was being tested was to see whether students' online presence and behavior can be controlled to a socially acceptable level by the use of online group counseling. Preliminary data was collected at the computer laboratories of University of Mauritius (UOM), more specifically at Centre for Information Technology and Systems (CITS). The participants consisted mainly of full-time undergraduate students having access to CITS computer laboratories. The sample size will be about 100 students from a student population of about 1000 students from the Faculty of Engineering, Computer science and a total on-campus student population of about 9000 (as at January, 2010). The survey, at the computer laboratories of the University of Mauritius yielded in the participation of 107 students during an 8 days period (October 2009- November 2009). 83 valid responses collected were taken into consideration. The rest were partially incomplete attempt in replying to the questionnaire. The valid feedbacks were processed. Reports and graphs generated helped during the data analysis stage.

Further to the preliminary study, a batch of 10 full-time students was retained for the experiment on online counseling. They were chosen from the student population of about 1000 students who were enrolled on at least one online module. The subjects were volunteers who felt they were addicted to the Internet, responding to printed poster advertisement, stuck on various faculties' notice board. The final selections of the participants for the study were based on a further screening done by the researcher using the instrument developed by Young (1996).

A weekly counseling plan was devised. The counseling Intervention was divided into 10 sessions lasting about 12 weeks. On average, one session last for one week, however there can be two weeks log session also. A description of weekly counseling intervention which was used is provided below:

Table 1: Planning of counseling session

Session	Objective	Procedure
1	Introduce online tools, group members, group rules and set goal	<ul style="list-style-type: none"> ❖ Ice-breaking: Help members to introduce themselves and one reason they are in the group. ❖ Discuss purpose of the group. ❖ Complete the Internet Addiction Screening.
2	Getting to know about IAD	<ul style="list-style-type: none"> ❖ Briefly restate the purpose and rules of the group. ❖ Explore the factors of the Internet addiction.
3	Understanding Choice theory	<ul style="list-style-type: none"> ❖ Help to explore choice theory as a guided principle to overcome IAD. ❖ Homework assignment: Summary of Choice theory and discussion. ❖ Follow up on the homework assignment.
4	Develop principles to guide treatment process	<ul style="list-style-type: none"> ❖ Encourage to develop own principles using choice theory as guided principle to overcome IAD ❖ Homework assignment: Summary of Choice theory and discussion ❖ Follow up on the homework assignment
5	Personalizing theory into practical guiding principles	<ul style="list-style-type: none"> ❖ Build up principles to be more personal to overcome IAD using previously develop principles. ❖ Homework assignment: Personalized Choice theory and discussion. ❖ Follow up on the homework assignment.
	Applying personalized principles	<ul style="list-style-type: none"> ❖ Request members to use the personalized principles in everyday life. ❖ Homework assignment: Forum discussion on how the applied principles work. ❖ Follow up on the homework assignment.
6	Reflection about own IAD and triggers	<ul style="list-style-type: none"> ❖ Ponder feelings of members when heading for the computer and share Internet addiction triggers. ❖ Identify usage pattern with some question: What days of the week do you typically log online? What time of day do you usually begin? How long do you stay on during a typical session? Where do you usually use the computer? ❖ Forum discussion and review posting.
7	Make own contract	<ul style="list-style-type: none"> ❖ Make a self-contract. ❖ Encourage the group to commit to plans. ❖ Homework assignment and remind the group of only two more session.
8	Use positive reminder card	<ul style="list-style-type: none"> ❖ Develop the concept of positive reminder cards and encourage the group to use in their real life. ❖ Homework assignment: Apply positive reminder ❖ Forum Discussion: Internet excessive use and major benefit of reducing online time. ❖ Remind the group that the next session will be the last session.
9	Significant accomplishment	<ul style="list-style-type: none"> ❖ Follow up on the homework assignment. ❖ Review significant accomplishments of the group members.
10	Thank you	<ul style="list-style-type: none"> ❖ Thank the group for the effort they invested and participation. ❖ Complete a group evaluation sheet.

Strengths and Limitations of the methodology

The need to determine whether there is a form of Internet addiction, among students, prior to starting online group counseling is necessary for two reasons. First and foremost, Internet addiction is in itself “a relatively new phenomenon” (Young, 1996) and Internet addiction is not yet a DSM IV diagnosis, but its definition has been derived from DSM IV

criteria for addiction and obsession. However, the draft of the new edition (DSM V), which represents a decade of work by the APA in reviewing and revising the DSM (www.dsm5.org) will be further refined before the APA conducts 3 phases of field trials to test some of the proposed diagnostic criteria in real-world settings before the final version is published in May 2013. The work group is recommending Internet addiction be placed in the DSM-V appendix to stimulate future research. The preliminary investigation used in this study can give some light on online behaviors of tertiary students.

Secondly, it will be a difficult, and unethical, to help a counselee into recovering from a deviant behavior unless there is some understanding on what the deviant behavior is, its persistence and how it influences the individual. This understanding is essential for the counselor to guide the counselee in achieving the aim of striking a balance and control Internet addiction. Qualifying the presence and associated aspects of online behavior, consequently Internet addiction disorder if ever present is most likely determined by the preliminary investigation done.

Moreover, this research, in the preliminary investigation, does indeed demonstrate that an Internet addiction exists and some students do not always perceive that they can control their Internet usage. This shows that Internet addiction counseling might be needed for curative purposes and preventive mechanisms for those who are susceptible to this condition. Further research into structuring treatment options can be based on the online group counseling model which is set-up in this work.

The reliability of the study depends heavily upon the use of valid fact and appropriate methods of data capture. The selection of reliable information and theoretical foundation is achieved through selectively screening the information available on Internet addiction. Examples of screening are in dismissing first- person accounts of personal experiences with Internet addiction and advertisement for treatment where data might be commercial biased. The methodology used, within the perspective taken towards counseling for Internet addiction, is based on providing an online platform for counseling. This approach seems to fit this study because of four main reasons:

1. The behavior of Internet addict predisposes the counselee to have Internet access and is available to communicate online.
2. The platform caters for group activities like debate and both synchronous and asynchronous communication, which can be an advantage as compared to traditional group counseling with only synchronous live meeting.
3. The counselor can personalize and make visible or invisible features on the platform depending on need of the group. Moreover, the setup is reusable with an unlimited number of groups.
4. Asynchronous debate in discussion forum has the potential of making the frequency and availability of treatment much more readily available to counselee.

This study also presents a few limitations. A review of the Internet addiction research Byun et al., 2009 demonstrated significant, multiple flaws in most studies in this area. "The analysis showed that previous studies have utilized inconsistent criteria to define Internet addicts, applied recruiting methods that may cause serious sampling bias, and examined data using primarily exploratory rather than confirmatory data analysis techniques to investigate the degree of association rather than causal relationships among variables." This suggests that much of the prior research done on this issue had technical limitations to a significant extent. The following limitation has to be signaled with respect to the current study. This is the fact that it is a single research work with a relatively small group, about ten counsees, is not sufficient to produce a significant generalization of the issues which will be faced with large number of participants in online group counseling.

Findings

1. Preliminary Study

Thinking about Internet

While 65% of the student’s population often thinks about what’s happening on the internet, there is 8 % who are always thinking about it and an equal proportion never thinking about it. This issue about feeling preoccupied with the Internet (think about previous on-line activity or anticipate next on-line session) is listed as criterial in the eight-item questionnaire of Young (1996), in the diagnosis of Internet addiction disorder. Based on this criterion, there is about 73 %, those who either “often” or “always” thinks about happening on Internet, satisfying one of Young (1996) criteria for screening Internet addiction disorder.

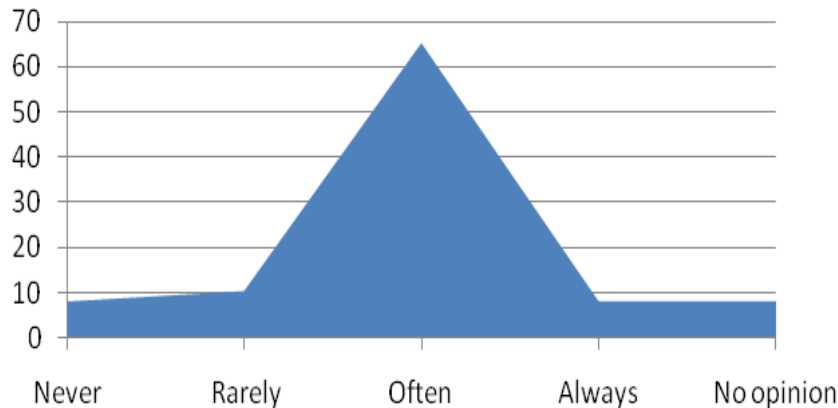


Figure 1 Thinking about happening on Internet

Internet usage control

About 86 % of the student population made unsuccessful efforts to control Internet use, meeting criteria 3 of Young (1996). Out of which, some 35% often try to control their use of Internet, while 8 % are always trying to control their internet use and a significant 43% of the students rarely do it.

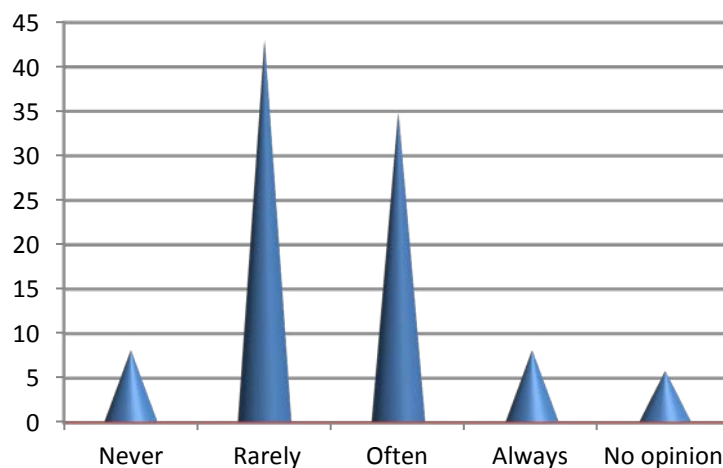


Figure 2 Controlling excessive uses of Internet

Coupled with the above figures, around 43% of the student population admit that often lose tract of amount of time spend online (Figure 3) and stay on-line longer than originally intended, meeting criteria 5 of Young (1996) for screening IAD.

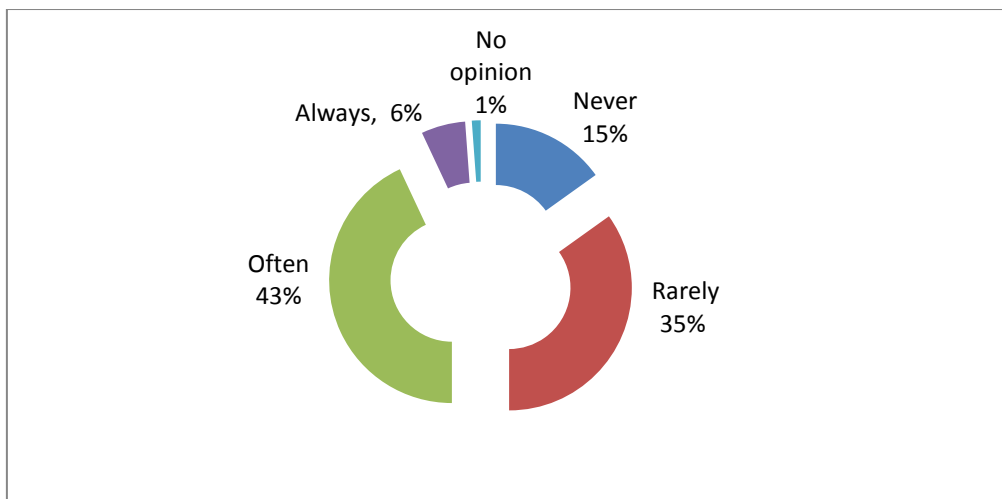


Figure 3 Losing track of internet usage

Duration of online activity per day

Distribution of time that student spends online follows a normal curve, with a mode of between 1 hour and 2 hours. Around 42% of the students’ population stays online on average between one and two hours.

Table 2: Average time student spend online per day

Time spend online per day	< 30 mins	30 min -1hr	1 - 2 hrs	2 - 3 hrs	3- 4 hrs	> 5 hrs
Proportion(%)	8	17	42	9	8	15

At least 15 % of students, that is 13 out of 86 students, admit that they spend more than 5 hours per day on the Internet. Taking into account that students are normally on campus averaging 6 hrs per day, excluding travelling time to-and-fro their residence, 5 hours per day on Internet, for purposes other than academic, might be detrimental for the student growth. A simple mathematical calculation, taking into account sleeping time of about a minimum of 6 a day, plus the number of hours a student is not at home, either on campus or travelling, and of about 5 hours online, the student has about 3 hours left for other activities.

Online activities

The student’s population, under study, seems to spend most of their online time in activities such as browsing website (19%), online dating (19%), social networking (19%), chatting on messenger (17%) and finding notes (14%). The proportion of time spend online in other online activities, such as E-learning, Discussion Forum, Online Gaming and pornography sites, are relatively insignificant.

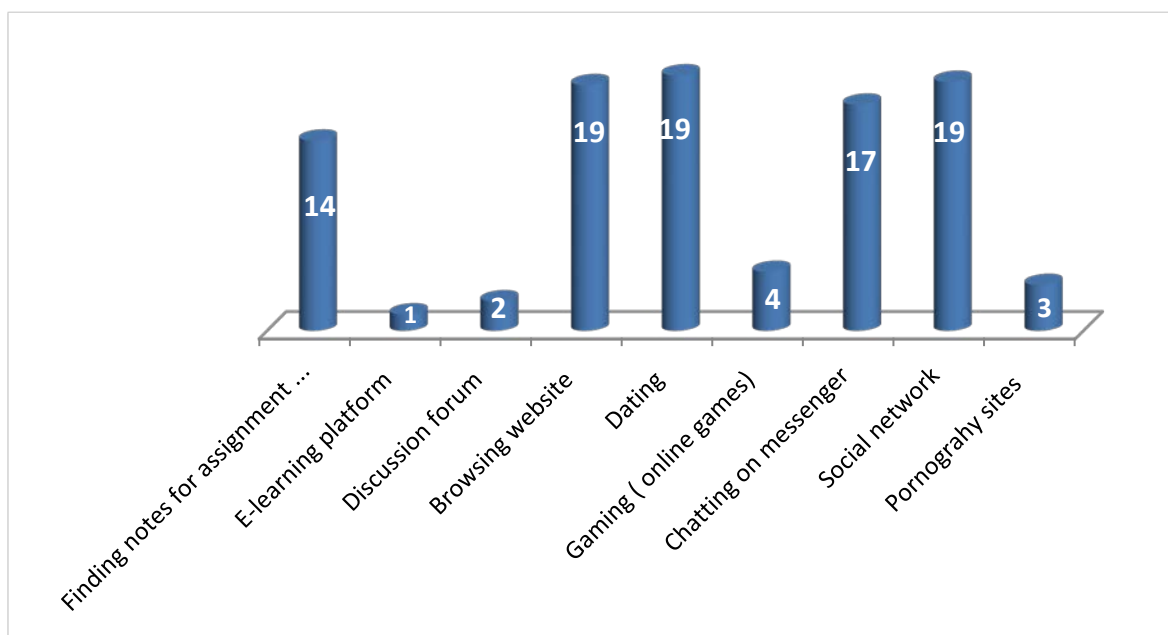


Figure 4: Panoply of online activities

Students' use of the computer lab, on the University campus, can be broadly be categorized as:

- (1) Information search (33%) - Browsing website (19%) & Finding notes (14%)
- (2) Online communication (55%) - Online Dating (19%), social networking (19%) and chatting on messenger (17%)

A relatively high proportion, approximately 55% of time spend online, are mainly for online communication, with a major portion devoted to an online presence for dating, networking or chatting.

2. Counseling Sessions

Lifespan of participant

The poster advertisement on various faculties' notice board at the University of Mauritius attracted 11 participants who showed interest about online group counseling for IAD. Five of them emailed their interest while others send text message via their mobile phone.

During the screening process, ten participants responded to the invitation for a screening test. The screening tool was developed using all elements from Young (1996) eight item criteria to determine prevalence of IAD. The results qualified all of them for the online group counseling session. This qualification is in concordance with prescription by the APA (American Psychiatric Association) who identifies the eight criteria of Young (1996) as valid screening's instrument for addictive Internet use.

However, there is one respondent who did not give any reply despite being accepted and offered a seat in the online group. Nine participants showed online presence in the various discussion forums and consequently completed the program. During the various counseling sessions, lasting about 3 months, the participants posted their views/opinions/feedback in respective discussion forum and also submit homework assignment on the online platform

At the last counseling session, a feedback questionnaire, with both closed & open-ended type of questions, was sent to all participants. Within one week, all the participants submitted the feedback questionnaire via email. This demonstrates that the participants were active till the end.

Feedback from participants

An online questionnaire, was developed to gather feedback from participant and also used as a tool for assessing the online group counseling session, infrastructure and tools used. The questionnaire was divided into two segments with first part being closed-ended type questions, testing mostly about the experience of the participant's, with a focus on satisfaction of goal being met and the counseling process carried out to their expectation. Open-ended question, forming the second segment, provide more room for participant to express their views about best features and what need to be changed about the program, and how counselor can improve. Last question was of an open-ended type, providing space to participants for any further comment, with an invitation to use additional pages.

For Question one to nine, most of them either "strongly agree" or simply "agree", while the rest (a minority ranging from 11% to 22%, depending on question set) being on neither side of the likert scale. The psychometric scale used was a typical five-level Likert item ranging from "strongly agree" to "strongly disagree". Questions 10 to 14 was answered with a "yes" or "no", instead of the five-category response set. This simplified understanding whether the counseling sessions were helpful, useful, meaningful, and whether the counselee would like to keep in touch with the counselor for IAD & other issues. All the participants were unanimous that the sessions were helpful, useful and meaningful. However, only 5 out of 9 would like an additional counseling session. This is a sign that at least 4 were fully satisfied and most probably the rest felt that the program should have lasted longer. The last question of the closed-ended type showed that nearly 80 % of the participant would not like the counselor to call them back. This might arise from a privacy issue where participants would not like their dears to know that they attended counseling session.

Being open-ended type questions, forming segment 2, questions 15 to 18 encouraged the participants to explain their answers and reactions to the question with a sentence, a paragraph, or even a page or more. A persistent observation was that many of the participants commented lengthier on the best features and what need to be changed rather on how the counselor can improve. Counseling being relative a new concept that participant preferred not to comment on it and technicalities of the counselor skills/know-how might be unknown to many. Some of the participants commented on that fact that they were proud to have been able to communicate exclusively online and were eager to have more online communication.

Complaints about what could be changed were addressed to layout and design of the platform which had the feeling an environment related to e-learning rather than a counseling services to deal with an issue that is not academic. Some considered forums should have been much more animated. Many complained about too much assignment and lengthy notes with theory. Accessibility problem to the platform was also evoked. "When we connect to the platform, it is slow and sometime not reachable" was among replies of what should be changed. On a more positive note, forum participation was also considered very useful and enjoyable to interact. However, there is a concern about online chat which was missing. There was a felt need for synchronous interaction, with a general request for video chat.

Discussion

Reports and graphs generated during the data analysis stage of the preliminary investigation, conducted with about a hundred students, focusing mainly on online behavior showed clearly that 65% of the student's population often thinks about what's happening on the internet. Only about two out of ten student declared that they have never lied about their involvement with the Internet. While about 86 % of the student population made unsuccessful efforts to control Internet, around 43% of the student population admits that they often lose tract of amount of time spend online and stay on-line longer than originally intended. Students' use of the computer lab, on the University campus, was broadly categorized into (i)

Information search (33%) –Browsing website & Finding notes (ii) Online communication (55%) - Online Dating, social networking and chatting on messenger. At least five out of ten students have a firm belief that the internet is “always” beneficial to their studies. In the same line of thought, more than six out of ten students, have a flat refusal that the Internet has “never” influence their life in a negative way. This shows clearly the high esteem that the student population, at tertiary level, has in favor of the Internet. This preliminary study was used as the basis in the formulation of online activities for, online group counseling, promoting counselee ability to understand IAD, grasps theoretical understanding to empower themselves in achieving their goal and maintaining healthy online behaviors.

By combining critical literature review, the preliminary investigation and a methodological framework, online group counseling was offered for about three months to a batch of nine participants. A feedback questionnaire provided insights into issues that were a success and areas of the counseling program that need to be addressed. On the overall, participants were unanimous that the sessions were helpful, useful and meaningful. However eight out of ten participants showed a preference that the counseling sessions remain anonymous.

As the counseling sessions progressed, views and comments about participants own feeling about Internet usage and IAD were discussed in various discussion forum. There have been diverse subsets of dependency identified including Information search, technically known as information overload, and online communications, using messenger, form of Internet addiction. In these respective sub- sections, the following aspects of addiction have been identified: Time spent engaging in the activity, unnecessary pursuit of contact with the activity, disruption of social sphere directly because of the activity, disturbance of academic spheres directly because of the activity. Additional criteria consistent with addiction have also been identified to a lesser extent in respect to Internet addiction in either the gaming or viewing obscene sites, including a feeling of loss of control over their online environment. It is clear that participants struggling with Internet addiction has a compelling need to devote significant amount of time to checking e-mail, participating in online chat rooms or surfing the Web, even though these activities cause them to neglect family, work or school obligations. These problems reflect a user's loss of control over time in Internet use, increasing involvement with the Internet and an inability to stop this involvement in spite of adverse consequences associated with such use.

However, little information was obtained on how the counselor could improve the program, despite that many participants lengthily commented on the best features of the online platform, in response to the feedback questionnaire. The most prominent complaints were about the layout and design of the online platform which was describe as cold and not setting the mood for counseling. Some counselee wished forums should have been much more animated. And participants expected much more input from the counselor rather than assignments and lengthy notes with theoretical foundations.

Conclusion

Computer technology *is* increasingly extending into work, home, family, and community life accompanied by significant benefits and challenges. At the same time, the counseling professions have ventured into the computer-mediated world of online counseling. Counselors who are new to online counseling should not only know the differences faced while working via an online environment but also acquire know-how to work in this new setting. If educators, researchers, and technologists (software developers) are going to implement and make online counseling become more popular, they definitely need more information on patterns of participation, and correlations between various features in the online environment and its effectiveness. To understand the appeal of online counseling, it is

essential that counselors understand client characteristics of those who are most likely to use online counseling services; have a solid understanding of the appealing qualities of computer mediated counseling; and be able to identify the core issues, be it of technology as well as typical nature of online counseling that must be carefully evaluated by counselors contemplating providing counseling delivered/supported by technology. The basic model for setting up an online counseling program is already set in various models, in purely research context and also in a much larger scale, in e-clinics by professional online counselors.

References:

- Byun et al. (2009). Internet Addiction: Metasynthesis of 1996–2006 Quantitative Research. *Cyber Psychology & Behavior*. 12(2). 203-207. [online] <http://www.liebertonline.com/doi/pdfplus/10.1089/cpb.2008.0102> [accessed 10 October 2009]
- Egger, O. & Rauterberg, M. (1996). Internet Behaviors and Addiction: Semester thesis, Swiss Federal Institute of Technology, Zurich. [Online] <http://www.ifap.bepi.ethz.ch/~egger/ibq/res.htm> [Accessed 10 October 2009]
- King, S. A. (1996). Is the Internet Addictive, or Are Addicts Using the Internet?. [online] <http://www.concentric.net/~Astorm/iad.html> [Accessed 10 October 2009]
- Martha, A. (1995). Development of E-Therapy from 1972-2002 ABC's of Internet Therapy Guide. [online] <http://www.metanoia.org/imhs/history.htm#top> [Accessed 13th October 2010]
- Thompson, S. (1996). Internet Connectivity: Addiction and Dependency Study. Masters Thesis. Pennsylvania State University. [online] <http://www.personal.psu.edu/sjt112/iads/thesis.html> [accessed 17-October-2009]
- Young, K. S. (1996). Internet addiction: The emergence of a new clinical disorder. Proceedings of the 104th annual meeting of the American Psychological Association, August 11, 1996, Toronto, Canada, retrieved Online 15-October-2009, available <http://netaddiction.com/>
- Young, K. Molly, P. O'Mara J., Buchanan, J. (2000). Cyber-Disorders: The Mental Health Concern for the New Millennium. *Cyber Psychology & Behavior*. 3(5). 475-479. [online] <http://www.netaddiction.com/articles/cyberdisorders.pdf> [accessed Jan 2009]

Appendix 1: Participant Feedback Questionnaire

For 1-9, please use the rating number along the scale that best represents your counselling experience:

	Not Applicable NA	Strongly Agree 5	Agree 4	Neither Agree or Disagree 3	Disagree 2	Strongly Disagree 1
1.						_____
2.						_____
3.						_____
4.						_____
5.						_____
6.						_____
7.						_____
8.						_____
9.						_____
	I am satisfied with my overall group counseling experience. (If disagree, please explain) _____					

10.	Was the counseling session of help to you? Yes <input type="radio"/> No <input type="radio"/>					
11.	Was the advice you received of use to you? Yes <input type="radio"/> No <input type="radio"/>					
12.	Did the session address the areas of your concern? Yes <input type="radio"/> No <input type="radio"/>					
13.	Are you planning or would you like an additional counseling session? Yes <input type="radio"/> No <input type="radio"/>					
14.	Would you like a counselor to call you to see if you have additional areas of concern? Yes <input type="radio"/> NO <input type="radio"/>					
15.	What were the best features of this online group counselling? _____					

16.	What didn't you like or how might the group be changed? _____					

17.	How could the group counsellor improve? _____					

18.	Further comments on (use additional page if you need more space to write):					