EXPLORING ONLINE RESEARCH METHODS
IN A VIRTUAL TRAINING ENVIRONMENT

Online research ethics module: Print version

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University of Leicester
E·S·R·C ECONOMIC & SOCIAL RESEARCH COUNCIL
Research Methods
an ESRC research programme

Aims and learning outcomes

Aims

1. To explore the complexity of the ethical issues associated with online research;
2. To outline key ethical issues associated with online research including informed consent, confidentiality, privacy, debriefing and netiquette;
3. To identify practical issues that might have an ethical component including online libel, spam, viruses and copyright issues;
4. To explore international inequalities and the digital divide which might have ethical implications, including language issues and online power relations;
5. To introduce key ethical guidelines for online research;
6. To describe key terms, definitions and terminology in relation to online research ethics;
7. To provide links to additional resources, frequently asked questions and print versions.

Learning outcomes

At the end of this module, you will be able to:

1. Identify some of the key ethical issues associated with online research;
2. Apply this knowledge in the design and implementation of online research projects, bearing in mind issues of informed consent, confidentiality, privacy, debriefing and netiquette;
3. Consider issues of international and online inequality that might have an ethical bearing on your use of online research methods;
4. Use the correct terminology when communicating about online research ethics;
5. Collect information about sources of help when thinking about and applying online research ethics.

Introduction: Ethical guidelines for online research

Ethical dilemmas in online research

Jones (2004, 179) suggests that: 'At present for most internet researchers it is likely that gaining access is the least difficult aspect of the research process…What has become more difficult is determining how to ensure ethical use is made of texts, sounds and pictures that are accessed for study.' Additionally, as Mann and Stewart (2000, 8) so aptly recognise: 'Because online research practice is still in its infancy, the critical researcher will be confronted by quandaries at almost every point in the research process.' Thus the debate surrounding online research ethics is a 'work in progress' and the ethical challenges are not simple. Indeed, it is clear that many solutions/nuances to this debate will evolve as online research becomes a more mainstream and sophisticated methodology. To date, some guidelines for online research ethics have been produced and there is a growing consensus as to what ethical research practice online might entail (Ess 2004). Equally, however, due to the variety of online research methods available and the great range of research topics and disciplines that might be involved in online research, it is recognized that there is a considerable diversity of views regarding ethical practice and therefore flexibility must be a feature of any guidelines produced.

In the rest of the module some key ethical issues that are commonly raised in the literature with respect to online research are discussed. Some issues closely reflect the basic ethical principals of onsite research which according to Warnock (1971) involves four core values: non-deception, non-discrimination, non-maleficence and beneficence. But in other instances specific issues arise from conducting research via the internet. It must be reiterated that many of the ethical issues discussed below are still under discussion and appropriate procedures for addressing them are still to be compiled: online research practice is above all else a living process so new ethical problems and issues continually arise. As Johns et al. (2004, 109) correctly observe, the lack of commonly agreed guidelines reflects that several key controversial issues are still to be resolved and there are still wide spread difference of opinion as to what constitutes appropriate online ethical conduct.

The discussion below begins with a presumption that researchers do indeed seek to be ethical, honest and inclusive (cf Schrum 1997, 120) and this involves from the outset respect for the interests and values of the research participants: an ethics of care (cf Capurro and Pingel 2002).

Do we need a new set of ethical guidelines for online research?

Is there anything special about the online research environment that necessitates the development of a set of ethical guidelines specifically pertaining to virtual venues? Or can we directly translate ethical principles from onsite research? It has been suggested that online research ethics raise many interesting debates as the computer stands 'betwixt and between' normal categories of alive/not alive, public/private, published/non-published, writing/speech, interpersonal/mass communication and identified/anonymous (cf Bruckman 2004; Turkle 1984). These categories, of course, are not simply dichotomies, but the boundaries between them are blurred and fuzzy. It is the blurring of these boundaries that complicates the application of onsite ethical conventions to online research. For example, there is still no agreement as to whether online messages constitute private correspondence or published public texts or whether lurking is a defensible online research technique or if seeking consent is required in all virtual venues. According to the Association of Internet Researchers (AoIR) ethics working committee (quoted by Ess 2002a, 180), online research can entail greater risk to individual privacy and confidentiality, greater challenges to a researcher in gaining informed consent and more difficulty in ascertaining participants' identities. This results in a greater difficulty in determining ethically correct approaches because of the greater diversity of research venues and because of the global research of the media involved. As Hine (2005, 5) summarises: 'Online research is marked as a special category in which the institutionalised understandings of the ethics of research must be re-examined', supporting the argument that at minimum we do indeed require discussion about ethical codes specifically pertaining to the online environment.

This development of guidelines has long been considered important for social science researchers and forms the backbone of some ethical endeavours: Ethics involves '…the study of standards of right and wrong, or the part of science involving moral conduct, duty and judgment…a concern about explicitly developing guidelines to aid in determining appropriate conduct in a given research situation' (Mitchell and Draper (1982, 3), quoted by Kearns et al. (1998, 298), emphasis added). According to Frankel (1989), a profession acts as a moral community and a code of ethics can act as an anchor for that community. Indeed, DeLorme et al. (2001, 273) suggest that codes of research ethics have several benefits for research communities and society at large: they can protect research participants from harm, provide a consistent set of expectations regarding the actions of researchers, encourage ethical behaviour, provide guidance in making decisions, protect researchers against legal and moral problems and support the institutions of social science. Hall et al. (2004, 240) concur, proposing that 'trial and error' approaches do not enhance our understanding of online ethics, nor do they eliminate distress as a result of ethical misconduct. As this suggests, some sort of ethical guidelines for online research might be useful to researchers and society alike.

Current guidelines

To date, some guidelines for online research ethics have been produced. Earlier work shows little common agreement on ethical issues (Cavanah 1999; DeLorme et al. 2001; Elgesem 1996; Eysenbach and Till 2001; Szabo and Frenkl 1996; Schrum 1997; Sharf 1999). Indeed the forum on ethics of fair practice for the collection of social science data in cyberspace (Thomas 1996) illustrates the variety of positions on ethical issues for online social science research (see Allen 1996; Boehlefeld 1996; King 1996; Reid 1996). However, more recently there have been moves towards a growing consensus as to what ethical research practice online might entail (Ess 2004; Mann and Stewart 2000) and greater recognition of the similarities between online and offline research ethics (Ess 2002a; Thomas 2004). This has culminated in the Association of Internet Researchers (Ess and the AoIR Ethics Working Committee 2002) making recommendations to inform

and support researchers, organizations and academic societies responsible for making decisions about the ethics of internet research. Their document stresses ethical pluralism, cross-cultural awareness and guidelines not recipes (see www.aoir.org/reports/ethics.pdf).

This flexibility in ethical recommendations is essential because of the variety of online research methods available and the great range of research topics and disciplines that can be involved in online research. Moreover, the variety of venues in which internet mediated research can occur and the expectation of the research subjects in those venues will further influence any ethical research practice. As Bailey (2001) correctly observes, research ethics are relational and contextual, suggesting that different online methods will produce different research relationships and so research ethics will vary with methodology as well as research context. It is recognized therefore that ethical guidelines are goals on which the research should focus rather than a prescriptive set of rules (cf Johns et al. 2004, 108). Moreover, it is clear that there are different ethical philosophical frameworks (deontological, utilitarian, virtue - see description below).

According to Thomas (1996, 108-109), deontological positions are based on 'rule following' and precede from formally specified precepts that guide how we ought to behave. On the other hand, teleological (sometimes called consequentialist and associated with utilitarianism) perspectives operate from the premise that ethical behaviour is determined by the consequences of an act, which on balance will result in the greatest social good, or the least social harm. Ess (2002a, 179, 182) suggests that the EU follows deontological approaches, whereby the rights of individuals are protected whatever the consequences, whereas the United States broadly follows utilitarian approaches, whereby possible benefits gained (e.g. to society) at the cost of compromising those rights might be considered. Ess (2004, 254) also identifies virtue ethics as classical, Western, feminist and Confucian, emphasising the importance of pursuing human excellence (virtue) in choices and actions.

Thus, as Ess and the AoIR Ethics Working Committee (2002, 4) so correctly observe, there is more than one ethically defensible response to an ethical dilemma: ambiguity, uncertainty and disagreement are inevitable. Thus Ess (2002a, 181-184) argues that while we are witnessing a convergence in general approaches to online research ethics, this is simultaneously augmented by an 'ethical pluralism' in which there is a continuum of legitimate ethical choices available to the online researcher. So while shared agreements on the basic norms and values of ethical guidelines are emerging, the actual practice or application of these will depend on precedents of previous researchers, personal choice, disciplinary background, institutional context, ideological position and specific cultural interpretations and laws.

Some ethical questions: a checklist

According to Eysenbach and Till (2001), the following issues should be discussed before studying an internet community:

1. Intrusiveness. Discuss the extent to which the research is intrusive (will it involve passive analysis of internet postings or more active involvement in the community by participating?);
2. Perceived privacy. Discuss (preferably in consultation with members of the community) the level of perceived privacy of the community (Is it a closed group requiring registration? What is its membership size? What are the group norms?);
3. Vulnerability. Discuss how vulnerable the community is (for example, a mailing list for victims of sexual abuse or HIV/AIDS may be a vulnerable community);
4. Potential harm. As a result of the above, discuss whether the intrusion of the researcher or publication of the results has potential to harm individuals or the community as a whole;
5. Informed consent. Discuss whether informed consent is required and how it will be obtained;
6. Confidentiality. How can the anonymity of participants be protected?;
7. Intellectual property rights. In some cases participants may not seek anonymity, but publicity, so the use of postings without attribution may not be appropriate.

Clearly, there are many other issues, dependent on the particular research project but this list is a good starting point.

Learning activity: Background reading

Instructions:

Carry out the following reading activity to explore models of ethics.

Most discussions of online ethics usually start with the presumption of the human subject ethical model, rooted in medical and social science approaches. Recent work by Bruckman (2002b) suggests that this is not the only model from which to consider online ethics. Other models, such as the humanities approach, might radically alter the analysis of ethical enquiry (see Bassett and O'Riordan 2002 and White 2002, for example). As Ess (2002a, 179) explains, the human subjects model makes the analogy of persons (=human subjects) in space. This leads to very different ethical enquiries than a humanitarian model in which analogies of textuality and persons as authors emerge. Indeed, Bassett and O'Riordan (2002) argue we need to move towards a 'hybrid' model of relational ethics that incorporates text, space and bodies. To explore the nuances of the debate, read the papers below and decide what is the most appropriate ethical model for you to use in your research.

Ethics and Information Technology (2002), 4, 3, 177-188. Special Issue on Internet Research Ethics. See articles by Bruckman, Bassett and O'Riordan, Ess and White.

Informed consent including withdrawal and deception

Informed consent

Informed consent with conventional onsite research methods involves treating the participants of social research with respect, using clearly easily understood language to inform them of the nature of the research, the time needed to be involved, the methods to be used and the use to be made of any findings, before gaining their consent to take part (cf Mann and Stewart 2000; Vujakovic and Bullard 2001). Any potential physical, economic or psychological risks (for example, distress, embarrassment, loss of esteem) must be explained and attempts made to mitigate against these. If this is not possible, the research should be abandoned for these risks should be no greater than those encountered in normal daily activity for the research participants. According to Matthews et al. (1988, 316) this should also involve 'cultural safety' (cf Dyck and Kearns 1995) '…whereby those taking part in a project should not feel threatened or challenged by the researcher who, through inadequate preparation, insensitivity or simple ignorance, may comment unwisely on implicit cultural, ethnic or religious beliefs.' Similarly, any benefits or compensation should be clearly explained, both to the individual and also in terms of a 'greater social good'. Particular care must be taken with informed consent if the research includes potential vulnerable individuals such as children. Permission must be obtained from parents or guardians for individuals under 18 years old. Gaining consent should never involve coercion. All participants should be made aware of the complaints procedure and be able to withdraw from the research at any point.

Clearly these principles should also apply in the online environment. Participants must be made fully aware of the purpose of the research project. Generally written information about the aims of the project, the roles of the participants and any potential risks should be provided, either as an email, on a dedicated website or bulletin board, or by conventional mail. If gaining consent virtually a consent form can be provided as an email attachment or on the website but getting the participants to sign it may not be straightforward. Ideally the consent form would be downloaded electronically and the signed form returned via surface mail or fax to the researcher. In practice this may discourage respondents so an alternative consists of including a tick box ('I accept') in an email that the respondent can return online to the researcher or on a web page that introduces the questionnaire or interview. Alternatively, participants could be emailed with a password which is then required in order to take part in the research. This strategy can also ameliorate problems with potential hackers. However, without written signed consent any project formally contravenes European data

protection legislation (Mann and Stewart 2000, 49). Moreover, some concerns have been raised about verifying the identity of consenting participants in cyberspace. For example, it has been suggested that gaining informed consent online can be more problematic than for onsite research because it is potentially easier for participant to deceive the researcher, particularly regarding their age. In the virtual anonymous realm, how can the researcher verify the participants' identity? In practice, however, according Hewson et al. (2003, 52), this type of fraudulence is both rare and easily detected. Moreover, these issues are also present in onsite research (Johns et al. 2004, 117). Overall, Bruckman (2002a) concludes that the manner in which consent is gained varies with the nature of the research project. She suggests that consent may be obtained electronically if the risks to subjects are low but otherwise consent must be obtained by a signature on paper returned by surface mail or fax.

The above points relate largely to gaining consent for online questionnaires. The situation with respect to online interviewing is more straightforward. When using chat facilities or conferencing facilities for virtual interviews, it is likely that the interviewees have been through some sort of process of self-selection and so informed consent can be gained during this process (as detailed above). Indeed, consent should not be left until the actual interview is going to occur as it requires some prior thought from the participants, the form may take some time to download and time is required for the researcher to receive the written signed form (if considered necessary).

Withdrawal from the research

The ability to withdraw from the research at any time is a central tenet of informed consent. Withdrawal from an online questionnaire can be made available by locating an exit button next to the submit button. Withdrawal from a virtual interview can be achieved by locating a withdraw button available at all times in the chat window. But during virtual interviews sudden withdrawal of a participant can be met with confusion: does the interviewee no longer wish to participate? Is there a technical problem with internet connection? How should the interviewer follow this withdrawal up to find out? How many follow up emails to find out where the participant has gone would be considered spamming and intrusive? These are issues still to be decided upon. However, as Johns et al. (2004, 116) suggest, withdrawal is also significant in onsite research and in fact, a participant may feel freer to withdraw from an online project as there are fewer face-to-face social pressures.

Deception

So while the issue of informed consent shows many similarities to onsite research, there also some differences in the virtual realm. This is a particularly thorny issue regarding *not* gaining informed consent for participant observation in the online environment. Deception involves researchers deliberately concealing the purpose of their study. In theory any research should not involve deception but in practice there is a contested debate over the issue. Some researchers, for example Denzin (1999), argue that postings on bulletin boards are public so there is no need to proceed without disclosing research activity while Glaser et al. (2002) contend that there are occasions when disclosing research activity would jeopardise the research aims. Similarly Hudson and Bruckman (2004) conducted a research project on the potential for harm when conducting research in IRC chatrooms on the ICQ network. In 63% of the chatrooms where they posted a message informing the members of the chatroom that they were recording them, they were asked to leave. In contrast, only 29% of the chatrooms asked them to leave when they posted no message. They concluded that a waiver of consent is appropriate in most cases of chatroom research as obtaining consent is impracticable. Similarly, Langer and Beckman (2005) argue for the legitimacy of covert internet research on sensitive topics, suggesting that existing ethical guidelines with regard to informed consent may need to be revised. Chen et al. (2004, 164) further argue for the importance of 'lurking' as a research act prior to gaining informed consent, in order to understand the topics and tone of exchanges in a mailing list or newsgroup before becoming involved. But although 'lurking' as socialisation into the online culture of a group was considered an important prerequisite for research, Chen et al. (2004, 164) also found that moderators and group leaders generally disapproved of lurking as a data collection method, so that observation without participation was generally considered unethical research practice. Eysenbach and Till (2001) support this view, contending that researchers 'lurking' in online communities might be perceived as intruders and may in fact damage some communities. They therefore suggest that the online research must tread very carefully here in order to respect their participants lives.

Guidelines on informed consent

Clearly informed consent is high on the ethics agenda for online researchers. Overall while there is still much debate, there is an emerging consensus regarding informed consent. For private or semi-private sources (mail, closed chat rooms) informed consent is considered essential whereas in open access forum (newsgroups/bulletin boards), it is suggested that informed consent is not essential. Ess and the AoIR Ethics Working Committee (2002, 5) recommend that the greater the acknowledged publicity of the venue, the less obligation there may be to protect individual privacy, confidentiality and the right to informed consent.

Examples of good practice in gaining consent

Penny Cholmondeley (University of Alberta)

The study consisted of a survey evaluating the 'WISEST (Women in Scholarship, Engineering, Science and Technology)' Resource Network. An extensive project information page was provided covering key ethical issues. The survey itself was followed by a consent form which participants were requested to signal their agreement to by selecting the submit button.

Project information page

Study Purpose
Participation in this research project provides an opportunity to evaluate the usability of a resource network designed with the needs of women in science, engineering and technology (SET) related fields in mind. Information gained from this study will be used to improve the functions and features of the resource network, and may benefit participants by offering a better understanding of the professional networking advantages offered by a computer-mediated, web-based resource network. This study is being conducted by Penny Cholmondeley in partial fulfillment of the requirements of the University of Alberta's MACT graduate degree in collaboration with members of the WISEST research team. For more information, you may contact her directly using the following contact details at any time:

Project Coordinator: Penny Cholmondeley BA MACT Cohort 2002 University of Alberta Phone: 604-736-0053 Email: pac3@ualberta.ca	Graduate Supervisor: Helen M. Madill PhD CPsych Professor & Graduate Programs Coordinator Centre for Health Promotion Studies Phone: 780-492-8661 Email: Helen.madill@ualberta.ca

Data Usage
Data from this study will be used to make improvements to the network and to inform future developments and additions. Survey responses will be used to evaluate how effective the resource network is in terms of usability and accessibility. A final report be presented to the WISEST membership and University community, and the results submitted for publication.

Participant Requirements
As a participant in this research project, you will be asked to evaluate the resource network via a secure online web-survey. Survey questions are designed to collect data on behaviours, attitudes, beliefs, opinions and expectations related to user interaction with the prototype resource network. You may complete the survey at any time during the study period which runs from May 6th through July 31st. It is expected that the survey will take 20 minutes of your time. Participation in this study is voluntary, and you may choose to withdraw at any time without any consequences or adverse effects by either clicking the "Clear Survey" button or simply closing your browser window.

How to Participate

1. Visit the prototype resource network at: http://www.wisest.ualberta.ca/ua-wise.cfm Take as much or as little time as you feel necessary exploring the site and its components

2. To participate in the online survey, visit: http://www.wisest.ualberta.ca/nav02.cfm?nav02=35632&nav01=33374 Once the page loads, read the Online Consent Agreement. If you agree to participate, fill out the survey and click the "Submit Survey" button at the bottom of the page. You may choose to withdraw at any time without any consequences or adverse effects by either clicking the "Clear Survey" or closing your browser window. Clicking the "Submit Survey" button implies consent. Please note that the survey must be completed in one online session. To obtain a copy of the final project report generated from the findings of this study email Penny Cholmondeley at pac3@ualberta.ca

Privacy
Responses to the web survey will be anonymous. Identifying information will include age, year and program of study. Individual participants will not be identifiable within the final report. Survey data will only be available to the 508 project researcher and members of the original research team. Records pertaining to the final report will be stored in WISEST's locked storage facilities in Civil Engineering at the University of Alberta. Certain responses may be quoted in the final report, but participants will not be identified in any manner beyond selected field of interest and educational status. There are no known risks or adverse effects to participating in this study. Any personal information you provide will be used only for the purpose(s) for which it is collected, and not in any other way without your consent.

Risks and Benefits
Participants will have the opportunity to share their opinions and provide valuable feedback that will aid in any further developments of the resource network. Risks associated with completing the web based survey are minimal. The University of Alberta logs http requests to its server. These logs capture computer information, navigation and clickstream data. While we will not be tracking or recording information about specific individuals and their visit, please be aware that captured information identifies the following:

1. The internet domain and IP address from which you access the resource network;
2. Browser type and operating system;
3. Screen resolution;
4. The date and time of access;
5. Visited pages.

This information is used to determine the number of visitors to the resource network, and to monitor traffic patterns and the types of technology used by visitors. The University of Alberta Privacy Policy may be viewed in its entirety at http://www.uofaweb.ualberta.ca/privacy/

Security
For site security purposes, the University of Alberta employs software programs to monitor network traffic that identifies unauthorized attempts to upload or change information, or otherwise cause damage. Except for authorized law enforcement investigations, no other attempts are made to identify individual users or their usage habits.

For questions or comments regarding this policy, or for additional information about the administration of the Freedom of Information and Protection of Privacy Act, contact the University of Alberta Information and Privacy Office at (780) 492-9419 or visit the Univesity's FOIPP home page at http://www.ualberta.ca/FOIPP/

This study has been reviewed and approved by the Faculties of Education and Extension Research Ethics Board (REB) at the University of Alberta. Questions regarding participant rights and ethical conduct of research, contact the Chair of the REB using the following contact information:

Dr. Marco Adria
Associate Professor & Graduate Program Coodinator, Faculty of Extension
University Extension Centre
Edmonton, AB T6G 2T4
Phone: 780-492-2254
Fax: 780-492-1857/9439
Email: marco.adria@ualberta.ca

Consent form

Online Consent Agreement for Research Participation

By selecting the "Submit Survey" button, I hereby give my consent to participate as a subject in the survey entitled Design and Usability Evaluation of a Web-based Resource Network. I acknowledge that I have read the Project Information [http://www.wisest.ualberta.ca/survey.cfm] page and am aware that I am free not to participate and to withdraw from the project at anytime without penalty should I so choose. I also acknowledge that I am of the age of majority. Any personal information provided via this web survey is collected in compliance with the *Freedom of Information and Protection of Privacy (FOIP) Act.* The use and disclosure of your personal information is limited by the privacy protection provisions of the FOIP Act. For further information, contact: FOIPP Officer, Faculty of Extension, University Extension Centre University of Alberta, Edmonton , AB T6G 2T4 , Phone (780) 492-5047

There is no risk, threat or harm to participants. Data and other information related to participants will only be available to the 508 project researcher and members of the original research team. The University of Alberta takes the confidentiality and privacy of personal information very seriously. Various measures have been taken to protect the site and your privacy. Web applications deployed by the University use encryption technology and security procedures to protect your personal information. Information will not be used by WISEST or UA-WiSE for recruitment or solicitation purposes.

If you choose not to participate, select the "Clear Survey" or the "Refresh" button on your browser, or simply close this browser window and you will be withdrawn. Should you agree to participate and then choose to withdraw once you have begun the survey, you may exit either by clicking the exit button at the top of the page, hitting the "Clear Survey" button or by closing your browser window. This page may be printed for your records by using the print command function on your web browser. If you would prefer to submit your survey in another format, or have any other questions to direct to the research team, contact Penny Cholmondeley at pac3@ualberta.ca or by phone at 604-736-0053.

To submit your survey, click "Submit Survey"

To clear the survey or withdraw your consent, click "Clear Survey"

Confidentiality issues including data security and subject anonymity

Confidentiality and subject anonymity

Clearly online researchers, like onsite researchers, should aim to ensure the confidentiality of participants. However, online research adds additional issues of concern with respect to confidentiality. This concerns whether information is securely stored and if participants' identities are protected.

Subject anonymity is an issue closely related to confidentiality. Prior to the start of the project the researcher must decide whether the subject's identity is to be disguised, and to what degree. According to Bruckman (2002a), subject confidentiality can range from no disguise, light disguise, moderate disguise to complete disguise. In no disguise pseudonyms and real names can be used with the permission of the individual and the individual's claim to copyright over their words is respected. In contrast, complete disguise involves no naming of groups, pseudonyms and other identifying features are changed (such as places, institutions, user names, domain names), verbatim quotes are not used if search mechanisms could link these quotes to the person in question and some false details might be introduced deliberately so that a subject might not recognize themselves. In this way someone seeking a subject's identity would be unable to do so. Clearly the level of disguise depends on the research project, recommendations from ethical committees and the researcher's ethical philosophical position. In some instances following these procedures might ensure more thorough protection of research participants than is available through face-to-face means (cf Johns et al. 2004, 119), particularly owing to the added anonymity of the virtual realm.

AoIR (Ess and the AoIR Ethics Working Committee (2002, 7) have produced some general guidelines on the issue of informant confidentiality, stressing that this varies with the nature of the research venue. It is suggested that generally if internet participants are understood as subjects (e.g. chatrooms, MUDs), then a greater sense of confidentiality is required. If the participants are understood as authors (weblogs, webpages, emails to large listservs) then there is less obligation to confidentiality. Indeed, authors of websites/webpages may not want subject confidentiality and not to refer to material by direct quotation and specific name would be considered infringement of copyright. Thus in order to respect individuals who share their ideas on public lists, the names of these participants should be properly attributed (cf Barnes 2004, 212). Bassett and O'Riordan (2002) explore this through a case study of an online lesbian activist site, and suggest that 'protecting' participants through subject anonymity may well work to reinforce broader social marginalization of the lesbian community.

Data security

Issues of data security may arise when using online research methods. For example, errors may mean that email questionnaire responses are sent to the wrong address or mistakenly sent to all on a mailing list. Messages posted to a bulletin board or a chat room can be copied and distributed without the knowledge of the writer, and the content of messages easily altered. Online questionnaire software may contain bugs or viruses while guessable passwords for synchronous interviews might compromise data security. Also, despite efforts to protect anonymity of internet communication, for example though encryption, according to O'Dochartaigh (2002, 82) it is still possible for security agencies and governments to trace most forms of internet communication back to an individual. Emails may also be stored on servers for many years. Hackers may also potentially be able to access project computer files with responses, which is of particular significance if conducting studies dealing with sensitive, personal or illegal subjects.

In these cases data security can be enhanced either by the use of web-based questionnaires rather than email questionnaires, or by encouraging the respondent to complete the questionnaire on an anonymous machine in a library or internet café and then to print it off and post it to the researcher. But this is clearly not possible in the case of synchronous virtual interviews and particular care must be paid regarding confidentiality if the researcher uses this method. Encryption can ensure email messages can only be encrypted by the intended recipient but equally it may complicate a research project because all participants must use email software that shares the same encryption capability and the researcher and participants must have the technology in order to use the software. Additionally, encryption is illegal in some countries and may be viewed suspiciously by some governments. These issues may all act as a disincentive on participation levels (Mann and Stewart 2000, 43). A further general way to increase data security is to regularly back up research data and store it in the most secure location possible.

These problems with data security lead Mann and Stewart (2000, 43) to argue that although researchers can promise confidentiality in the way that they use data, they cannot promise that electronic information will not be accessed and used by others. Care should therefore be taken in making promises about confidentiality but equally researchers should be confident that if all reasonable precautions are taken to secure data, this should be sufficient in most cases.

Learning activity: confidentiality issues and online research

Instructions:

Read the following article from Coomber (1997) to explore some of the nuances of the debate about confidentiality and online research.

Coomber's (1997) research was with drug dealers. Respondents were concerned that through the research they might be traced and be subject to criminal investigation. The researcher was concerned that he might be required by law to hand over email addresses of those who had contributed to this survey to the police. In reality this did not occur and Coomber was able to protect the identity of respondents through hiding the origin of responses. Read the article and explore the ways in which the confidentiality of the respondents was ensured.

Coomber, R. (1997) Using the Internet for survey research, *Sociological Research Online*, 2, 2.
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Privacy

The public/private debate

According to Spinello (2001, 140): ' Privacy is under siege as never before thanks to the power of digital technology.' Thus Thurlow et al. (2004) suggest that privacy is the most important ethical issue for online researchers. On the internet there is no clear agreement as to what is public and what is private in '…conception, experience, label or substance' (Waskul and Douglass, 1996, quoted by Bruckman 2004, 101). Of course, as in physical space, this in not a simple binary division but a question of degree (Bruckman 2004, 101) but the issue revolves around the distinction between public and private internet space. Is a researcher ethically justified in using publicly available information as data for a research project, even if this was provided by the internet user for private consumption? Should a researcher be able to 'data mine' from newsgroup postings and individual webpages? There is much debate over this issue but Hewson et al. (2003, 53) suggest that data that have been made deliberately and voluntarily available in the public internet domain (including on the WWW and newsgroups) should be accessible to researchers providing anonymity is ensured. Hacking into individual's files or email accounts is unacceptable.

But this issue is not clear-cut. Chen et al.'s (2004) research on using mailing lists and newsgroups for research purposes elicited responses from a variety of sensitive/controversial mailing lists. Many of the responses included animosity towards the 'research paparazzi' in cyberspace. A member of a miscarriage support group for example stated: 'We are bereaved, frequently openly grieving, and therefore fragile. Just asking questions about our current situation or experience can reopen wounds to a significant extent' (quoted in Chen et al. 2004, 160). Another response from the 'devilbunnies' newsgroup reported: 'Such endeavors are almost universally seen as an intrusion into the world we've created…' (quoted in Chen et al. 2004, 161). Other responses about online researchers were more welcome. For example, the owner of a mailing list for women who are second wives responded: 'I have a positive feeling towards researchers and journalists- I believe the second wife/second family situation is a serious one and needs as much support/exposure as it can get' (quoted in Chen et al. 2004, 164). So it is important to remember that the specific venue of research is important when considering the privacy issue. Cyberspace should be viewed as differentiated and heterogeneous space (Madge and O'Connor 2005).

Expectations of privacy

Expectations of privacy is the important issue and different venues may have different expectations. Barnes (2004, 206) argues that many social messages exchanged through the internet can foster the illusion of privacy. This is because correspondents do not see the numerous people reading their messages, including lurkers to sites, so individuals often believe they are communicating with a small group rather than a large audience. She cites various examples: many people corresponding in public chatrooms or discussion groups perceive their conversations to be taking place in a private setting; in contrast, public lists, such as academic discussion groups, require proper citation to be given to materials used in their discussions (Barnes 2004, 220). So a key issue facing the online researcher is whether the individual or group considers their correspondence to be public or private. According to Ess and the AoIR Ethics Working Committee (2002, 7) if the participants of the research believe that their communications are made in private, or if they are understood as subjects participating in private exchanges via chatrooms/MUDs or MOOs, then there may be a greater obligation for the researcher to protect individual privacy. But if the research focuses on publicly accessible archives and inter/actions by authors/agents are public and performative, (for example e-mail postings to large listservs or USENET groups, production of web logs and home pages), then there may be less obligation to protect individual privacy. According to Barnes (2004, 219), the situation for discussion lists is complicated- they may be considered both public and private and here she cautions that the researcher must respect the specific privacy guidelines for the online group. Indeed, many discussion groups now state their privacy or citation policy when you join them and the online researcher should check the welcome message of public discussion lists for guidelines on how to properly cite email messages.

Alienation or privacy?

The privacy debate has recently moved on with Bakardjieva and Feenberg (2001) arguing that 'alienation' not privacy is the core ethical problem of online research. For these researchers (2001, 236) alienation is the '...appropriation of the products of somebody's actions for purposes never intended or foreseen by the actor herself, drawing these products into a system of relations over which the producer has no knowledge or control'. Berry (2004) explores the issue in more depth, arguing that privacy is in fact a misleading and confusing concept to apply to the internet, with non-alienation being more resourceful in addressing ethical issues. On this basis he argues for the principles of 'open source ethics', which includes a participatory and democratic research method.

Case study: Privacy and *thirdspace* in the research of gay online communities (James Barker)

Privacy and thirdspace in the research of gay online communities - James Barker (Institute of Geography and Earth Sciences, University of Wales, Aberystwyth)

As we have seen in the section above, one of the ethical difficulties in undertaking online research is when we are faced with the difficulty of personal privacy. Arguably, these problems associated with privacy in online research can be exacerbated when research is being undertaken into something as personal and intimate as sexuality. This has been reflected in my own research experience (Barker, 2005). My undergraduate dissertation was originally centred on rural experiences of 'gay' sexual identity. Online discourse formed two strands of the research thread. Firstly, I was using the internet as a tool to interact with informants. Secondly, it became apparent that the internet was an outlet through which rural gay males could freely express an identity. Two main issues surrounding privacy arose during the course of my research and these shall be discussed in turn. However, these are linked through the description of online 'communities' as operating in *thirdspace* (cf. Soja 1996), that is a blurry, liminal existence that is difficult to place.

The first issue arose because of the way I was using data that was posted on message boards on various gay men's social and support sites. As has been alluded to previously, if somebody has placed a message on a site, there is the question of whether this communication is now in the public domain and therefore freely available for citation. Alternatively, given the unique blurring of the public and private on the internet, are we wrong to use this communication because of the personal nature of much internet discourse and the risk of taking any statement out of context? For example, in my research there were messageboards with intimate accounts of coming out. The personal nature of the content aside, there is the ethical question of whether it is written for broad consumption or just for those in the community – those in 'the know'. By using comments in academic research, we open up the discourse to a wider outside audience which can transgress the privacy of online communities.

The second issue of privacy and *thirdspace* is perhaps slightly more pertinent. It seems to me that the creation of communities in the blurry world of *thirdspace* is in part in order to create a sense of intimacy that would not be possible because of people's actual geographical locations. So with regard to sexuality and living in rural places, the *thirdspace* nature of the internet facilitates a close, open discourse that may not be possible in the 'real' world because of the physical distance between the rural and the urban, the heart of the male gay 'scene'. Therefore, the issue arises as to the need to respect the value of privacy within this context. The right of a researcher to reveal these intimate online worlds must be continually assessed in order to ensure that personal privacy is not jeopardised. In the case of my research, it became apparent that the function of these online communities could potentially be disrupted by my presence as a researcher, for it did not fit in with the actual purpose of the community. Further, I did not feel that I had the right to reveal this hidden online *thirdspace* world because its unique nature meant that I could not offer a comprehensive report on the various voices being offered a place to be heard within this online environment. I therefore changed my research focus to concentrate on the difficulties of online research that I have described.

In sum, the unique blurring of the public and the private in the liminal world of the online *thirdspace*, as demonstrated though my research into sexuality, means that issues of privacy can become even thornier than in 'traditional' research because of the confusing spatiality of the research environment and the uneasy blurring of the public-private binary.

References:

Barker, J. (2005) *Reflexivity and positionality in the research of Human Geography on the internet with specific reference to sexual identity*. Unpublished undergraduate dissertation, University of Wales, Aberystwyth

Soja, E. (1996) *Thirdspace: Journies to Los Angeles and other real-and-imagined places*. London: Verso.

Debriefing and feedback procedures

Debriefing

Onsite ethical guidelines generally expect the researcher to debrief the participants after the research process. In onsite research this might involve a face-to-face meeting or a written report to explain the results of the study and to invite comment and queries. At this point the researcher can determine whether the participant has suffered any harm from the research process and can take measures to address this. In internet-mediated research this debriefing might involve an email to all participants or the setting up of a dedicated website to locate any published materials, including a contact address and invitation for comment. But there is no guarantee that the participant will read the email or visit the website. However, lack of participant involvement in the debriefing process is not confined to online research. This debriefing situation is complicated in cross-national research projects. Distance is likely to restrict face-to-face debriefing and this may be picked up by ethical committees. Anders (2000, quoted by Mann and Stewart 2000), for example, was required by her ethics committee to make sure she could organize counselling in the state and country of her research participants if necessary. Moreover, debriefing must be sensitive to the cultural make up of the online research venue and its participants.

Feedback procedures

Chen et al. (2004, 171) go further, arguing that this debriefing should also include the sharing of research results, so that the online community is made aware of the information that has been gathered from them. This sharing of research results can promote more egalitarian research relationships and can result in corrections to the researcher's analysis and interpretation of data. In this manner, sharing research results can 'repel the feeling of being used by the researcher for selfish gains' (Chen et al. 2004, 172). As Breuder (personal communication, 2005) so aptly observes, since the amount of online research conducted is increasing rapidly, often too little is done to build a long-term positive research environment. Many researchers are far more concerned with 'harvesting' cheap participants than with providing an equitable research environment. As Breuder (personal communication, 2005) suggests: 'Apart from things that should be standard, like a thorough debriefing and the possibility for the participant to provide feedback, one way to go seems to be to provide detailed individual feedback, e.g. on questionnaire results. This has its own ethical problems and, unfortunately, ethics committees at this stage are often reluctant to agree to it. Still, apart from monetary reward, it seems to me nearly the only way to achieve what is ethically prescribed: equal gains on both sides of the research process.'

Case study: Participatory research and internet activism (Jenny Pickerill, Department of Geography, University of Leicester)

My research has tended to focus on examining how activists involved in environmental and social change politics utilise the internet – their internet activism (Pickerill 2003). It is often the more radical activists who have been most inventive and exploratory in their use of the internet and thus it has been these groups who I have sought to engage in my research. These choices, however, were also influenced by my own politics and my broader participation and commitment to environmental and social change activism. Thus I have sought to combine good reflexive methodological practice (through participatory research and in-depth interviews) with action-orientated research that seeks to 'change the landscape' rather than just survey and map it.

I was interested in what opportunities and tensions the internet offered to activists. What was of interest was less what they posted on-line, or discussions they had on-line, but the role that the internet played in the broader dynamics of activism and activists everyday lives. I did this through interviews and participant observation. In some cases actually writing parts of the groups' websites myself - using my research as a way to aid the campaigns and thus directly interfering in the dynamics I was exploring.

This involvement facilitates access to the people I was interested in but also complicates the researchers' positionality. This involvement brings with it an ethics of commitment and a responsibility not only for fair representation, and confidentiality, but also for action. Thus there is a responsibility to present your work in a constructive way, not simply a critique or deconstruction of somebody else's hard work. Moreover, there is a culture within such radical activism that can serve to smooth over internal dissent – the ideology that doing something is better than nothing and that you should not criticise unless you are prepared to change things yourself. Thus academic work too must help such movements move forward.

Crucial to such research then are the moments of debriefing and feedback. In all of this work I sought to develop a feedback loop whereby drafts of my work were returned to interviewees and groups and their comments fed into the final pieces. Drafts and final pieces were posted on-line and distributed via summary hardcopy booklets. Thus such research becomes about honesty, responsibility, and sharing; being honest about one's position and what you intend to use the research for: A responsibility to look after data collected, seek permission for its use, to take action through our research and to write in such a way that is useful and constructive to participants involved; and sharing everything you have learned during the process and your outcomes with those who took part.

References:

Pickerill, J. (2003) *Cyberprotest: Environmental Activism On-Line.* Manchester University Press. Manchester.
(For more details see **http://www.jennypickerill.info/book.html**)

Sydney media lab, 2001. Part of a broader activist space which enabled free use of computing.

Netiquette including flaming and online harassment

What is netiquette?

According to Hall et al. (2004, 243), research etiquette on the internet requires special consideration, raising some different concerns to more conventional research approaches. Netiquette is the term used to describe the code of conduct between those communicating on the internet. It is concerned with internet courtesy and protocols. It is directed at preventing aggressive and insulting behaviour. It includes often unspoken rules about what is considered appropriate and polite and respectful behaviour online. Netiquette is inevitably flexible, as different types of online venues will have different rules and conventions. Some examples of netiquette can be found in Mann and Stewart (2000), Rinaldi (1996) and Scheuermann and Taylor (1997).

Guidelines for netiquette

According to Denscombe (2003, 50) netiquette includes:

- Private messages expected not to be abusive or contain bad language (swearing);
- Private message should not be made public unless prior permission has been obtained from the sender;
- Emoticons – symbols to depict an emotion or feeling to replace body language and facial features not visible in online interactions (see ‘design' section in online interviews module);
- Sensitivity towards communicating with people from various countries and cultures- as English may be a second language and humour may be different to that of the sender;
- Messages should be succinct and relevant as online time has financial costs.;
- Spamming- unsolicited mass mailing should be avoided;
- If netiquette is not followed then sender may be ‘flamed' and errors pointed out to them or they may be excluded from chat rooms etc.

O'Dochartaigh (2002, 81-82) also warns that care must be taken owing to the instantaneous nature of internet communication and recommends simple guidelines for good practice:

- Think twice. Never send a message without re-reading it to check content and spelling;
- Think of tone. It is easy to sound abrupt and unfriendly so ensure your communications are polite. In particular, avoid capitals as it annoys people and ensure that you sign your messages;
- Be careful about what you write. The WWW is a global open access system so be mindful of the fact your communications may be read by others including authorities at your institution, intelligence agencies etc.

Implications for online researchers

Such guidelines for netiquette have implications for online researchers. Hewson et al. (2003, 116) suggest that netiquette demands that postings to a newsgroup or discussion forum should be relevant- but most researchers' invitations to join a research project will not be relevant to the intended discussion. This raises ethical issues for the online researcher. The best practice is to approach the moderator of the list or newsgroup or discussion forum directly to get permission for the invitation posting but to be sensitive to the fact that such an invitation may be considered spamming and unacceptable.

Based on their research with newsgroups, Hall et al. (2004, 244-247) recognize 6 further issues of importance where netiquette is concerned.

1. The importance of the subject header used in any posting to a newsgroup, to assure no misunderstandings between the researcher and newsgroup members occur;
2. Self-identification and self-presentation of the researcher are critical, as readers will form their evaluations about the credibility of the research and the researcher based on this. A

formal verifiable, disclosed identity of the researcher, for example through a link to an institutional website, can increase the credibility of the researchers claimed identity (see Madge and O'Connor 2002) and shows respect and courtesy to members of the newsgroup;

3. The researcher must be familiar with the common language used on the specific newsgroup, including jargon, abbreviations, acronyms, emoticons and common grammatical rules. The ability to 'speak' the newsgroups 'language' shows respect to the rules and conventions of the group;
4. The researcher should always ask appropriate questions, not ones that could have been answered by a library or archive search, and to do this the researcher must acquaint themselves on the subject matter before asking for help;
5. The specific culture of the newsgroup should be attained through online acclimation or reading FAQs and archives, prior to 'jumping in' in order to understand the nuances of group interactions;
6. The researcher has an obligation to be 'up front' about the purpose, nature, procedures and risks of the research.

Flaming and online harassment

In addition to netiquette online research also raises issues with respect to flaming and online harassment. Flames are hostile and aggressive interactions online. This can include vicious verbal attacks and derogatory, obscene and inappropriate language. Verbal disagreement can escalate to mutual abuse, threats of violence and 'flame wars'. According to Thompsen and Foulger (1996), a message becomes a flame when a clear tension is detected. Overall O'Sullivan and Flanigan (2003) suggest that flaming is extremely complex because the expectations and experiences about what is acceptable and normal behaviour varies between individuals, culture, geographic location and with time. They argue for the need to contextualize flames and suggest a typology of flaming ranging from a newbie flame, a failed flame, a missed flame and a true flame. Trolls are individuals who deliberately post provocative messages intending to incite a reaction from the readers of the message. According to O'Dochartaigh (2002, 83) it is best to ignore such messages. There is varied opinion as to whether online interactions exhibit more flaming than face-to-face interactions. According to Siegal et al. (1986) this is the case but Walther (1992) only found this to be so when participants were under time pressure. Group forums are more prone to flaming than emails (Thurlow et al. 2004, 71). If a researcher acts inappropriately or unethically, they may find themselves subject to flaming. Also online researchers must ensure that their research project never incites flaming because flaming is not just aggressive but it may also be potentially libelous. However, since cyberspace is not governed by national boundaries, international law has been slow to catch up with the implications of cyber libel, data protection and intellectual property concerns.

Additionally, a small minority of people are also involved in systematic sexual, racial or homophobic abuse online. As with offline interactions, such harassment is totally unacceptable and online harassment is subject to the same laws as elsewhere, with ultimately law courts having the potential to deal with the matter (O'Dochartaigh 2002, 83). The online researcher has an ethical obligation not to collude with online harassment for the purpose of the research project. Cyberstalking is also an uncommon but significant (for those victims of it) feature of online interactions. Here, too, the researcher will have to consider several controversial ethical issues. What is the moral responsibility of the researcher to inform victims (and perpetrators) of cyberstalking? What can a researcher do if they become subject to cyberstalking? (see Tavani and Grodzinsky 2002, for details).

Practical issues including online libel, spam, viruses and copyright issues

Online libel

According to Jones (2004, 184), ethical issues are concerned with values while legal issues are concerned with human or financial issues. Ethical issues are connected to legal issues for the online researcher. Although the internet is becoming subject to legislation, many of the laws covering online research are still at present customary rather than legally enshrined. According to Mann and Stewart (2000, 39), many areas still require legal definition including jurisdiction, intellectual property, security (including personal security from virtual assault, harassment and stalking), encryption, signatures and certification (see Thomas 1988 for further detail). However, in the meantime, Mann and Stewart (2000, 45) suggest that open discussion of contentious and provocative subject matter may be problematic. As electronic communication is considered to be in the public arena, participants and service providers may be held legally responsible for online messages. The Electronics Communications Privacy Act became law in 1988 and since then many bulletin boards have started to post disclaimers citing this law. Furthermore, care must taken as any legal jurisdiction under which online research falls will vary with different nation states. And this complicates the picture for the online researcher who is conducting cross-national research. According to Ess and the AoIR Ethics Working Committee (2002, 6), a researcher should consider how far existing legal requirements and ethical guidelines in your discipline 'cover' your research and how far existing legal requirements in the countries implicated in your research apply? A few key sources are available, which discuss morality and law in cyberspace (see Murray 2003, Spinello 2003; 2004 and links below). Moreover, data should be collected, stored and used in accord with data protection legislation.

Spam and viruses

Spam is junk email, usually advertisements, for example promoting medicines, banking facilities or computer equipment. Spam mail can be reported to the postmaster in charge of the email or to the managers of the server who can try and forward the complaint to the address of the spam mail (O'Dochartaigh 2002, 84). Filters can also be set up to redirect the spam into a folder which can be deleted once the spam mail has been checked for genuine messages. The online researcher must ensure that their invitations to join the research project are not considered spam mail and Bruckman (2002a) cautions that the process of requesting consent must not disrupt normal group activity. Viruses can also be transmitted by email, word documents and Excel files but can be picked up by anti-virus software. Thus the online researcher must ensure that they never forward any viruses with their emails or attachments. Indeed Hewson et al. (2003, 117) note that a researcher using attachments can become a 'global pariah' and it is best to refrain from using attachments all together and stick to text-based messaging. But there are also risks to researchers from viruses picked up during online research. To avoid this, researchers should also install anti-virus software on their computer and ensure that it is kept up to date.

Online copyright

Copyright is a very important issue to be considered by the online researcher and usually conventions follow those of offline sources. The use of text and images from the internet must follow copyright legislation including intellectual property rights and trade-marks. It is not acceptable, for example, to copy large chunks of other people's work from the internet and put it on your site or research project without asking. According to O'Dochartaigh (2002, 248), you can copy and paste a limited amount under 'fair use' guidelines. The rough guide is that you can quote up to 300 words from a book or 150 words from a newspaper or journal article, where the excerpt is less than 20% of the original work. However, there are a lot of ambiguities and grey areas in 'fair use' legislation and the online researcher must be very careful, especially if there is a likelihood of eventual publication for financial gain. But generally when using sources other than your own you must give credit to the author and publisher, citing the original document fully (O'Dochartaigh 2002, 248). Images must not be copied from other sites or photos scanned into your site/research project unless express permission has been given. If you are linking to documents on someone else's site you should also link to their home page as a matter of courtesy so the source is clear. Proper credit must always be given for intellectual property through clear citation of internet sources. This should include the author, title of publication, site accessed, date accessed, page or section (if relevant) and URL.

However, in many cases the situation is not clear-cut. Who 'owns' a message posted to a chat room discussion? Is it 'fair use' to publish a collection of discussion 'threads' from a discussion forum? In sending a message is there not an 'implied license'' for others to read the information it contains? Some guidelines exist here. According to Bruckman (2002a), you may freely quote and analyse online information if it is officially and publicly archived, no password is required for archive access, no site policy prohibits it and if the topic is not highly sensitive.

Useful links

Cyber-Rights and Cyber-Liberties
http://www.cyber-rights.org/
A non-profit civil liberties organisation which aims to promote free speech and privacy on the internet.

Internet Law and Policy Reform:
http://www.ilpf.org/
An international nonprofit organization dedicated to the sustainable global development of the internet through legal and public policy initiatives.

Lawrence Lessig (Stanford Law School)
http://www.lessig.org/
Home page of the author of Code and Other Laws of Cyberspace. Contains news on issues such as copyright on the internet of relevance to Lessig's work.

Legal Data Base:
http://www.legal-database.com/copyright-laws-internet-law.htm
A summary of copyright law on the internet.

The Council of Europe. Convention on Cybercrime
http://conventions.coe.int/ Treaty/Commun/ ListeTraites.asp? MA=49&CM=7&CL=ENG
Provides the full text of the Council of Europe's convention on cybercrime, alongside explanatory reports and summaries.

UK Information commissioner's site:
http://www.informationcommissioner.gov.uk/
Website of the independent official appointed by the Crown to oversee the Data Protection Act 1998 and the Freedom of Information Act 2000. Contains a range of information about UK legislation on these issues.

European Commission Privacy on the Internet- An Integrated EU Approach to On-Line data Protection:
http://www.europa.eu.int/comm/justice_home/fsj/privacy/
A general site by the European Commission that deals with data protection issues.

Joint Information Systems Committee (JISC): Data protection webpages
http://www.jisc.ac.uk/index.cfm? name=issue_data_protection
A range of data protection resources including a code of practice and a briefing paper.

The University of Essex: Data protection webpages
http://www2.essex.ac.uk/rm/dp/text_index.shtm
Comprehensive information about the University's data protection policies, including background information and links.

Lancaster University: Data Protection Project 2000-01
http://www.dpa.lancs.ac.uk/
A website aiming to provide a guide to Higher Education Institutions in the UK in complying with the Data Protection Act 1998.

International inequalities

Digital divide

One difficulty in writing about the digital divide is the rapid pace of change in internet use may soon render any discussion obsolete. Additionally care must be taken that any discussion surrounding the digital divide does not become embedded in notions of technological backwardness or deficiency based on deep set notions of cultural and racial difference for which externally generated solutions must be devised. However, it is still broadly agreed that a major limitation with the use of online research methods is that the 'digital divide' means that some regions of the world and some social groups are less 'connected' than others. This is because some individuals, by virtue of their circumstances (nationality, income, age, ethnicity, gender), may not have access to computer equipment, software and literacy or internet connections (Janelle and Hodge 2000). Internet-mediated research may well then involve sample bias and be non-representative of large swathes of the global population. As Jankowski and van Selm (2005, 203) correctly observe 'most research on the internet is centred in Anglo-American cultural contexts'.

For example, there are stark inequalities at the global scale with respect to technical infrastructure, computer facilities and training, speed, bandwidth and cost. It is estimated by the United Nations Development Programme (UNDP 2001) that 90% of internet use occurs in rich countries, accounting for only 15% of the global population. Indeed, according to Thurlow et al. (2004, 83) only 1% of the world's population are part of the so-called 'knowledge economy', with half the world's population not having even made a phone call. This is partly because access to communications technologies comes at a cost. According to the United National Development Programme (2001) citizens in the US pay 1.2 percent of their average monthly income for internet access. This income is equivalent to 614 percent of a worker's annual income in Malaysia, 278 percent in Nepal, 191 in percent Bangladesh and 60 percent in Sri Lanka. Moreover, even where there is internet access, the technology may be inappropriate to local needs and lifestyles (Mann and Stewart 2000, 33).

Therefore a key ethical issue that the online researcher must address is who one can communicate with online. So despite the suggestion that online research methods have the possibility of increasing the scope and range of social science research, the digital divide ensures that in reality these online research methods are very geographically specific, limiting who can we 'speak' to and whose lives we can engage with. The potential to be involved in a study using online research methods is therefore partial, so any grand claims of the utility of such methods for internationalizing research must be treated with some caution.

Censorship

Censorship is a further ethical issue worthy of mention in relation to international inequalities. The online researcher cannot assume everyone has the ability to speak freely on the internet. Online censorship has proliferated as use of the internet has grown and is often aimed at protecting children. It does also mean that sometimes contentious and unsavoury sources may be censored for adult use on the internet. However, one must not fall into the trap of regarding the internet as a particularly dangerous source of scandalous material. It must be remembered that onsite researchers can get access to extreme and deviant publications via archives, special library collections and public sources. Moreover, censorship is also a significant issue with regard to the potential reach and internationalization of online research. Particular governments are involved in internet censorship which means that access to the internet is itself restricted. For example, in Singapore, all websites and discussion groups are controlled by the Singapore Broadcasting Authority (Rodriguez 2000) while government controlled censorship is also practiced in China and the Gulf states (Grossman 1997). In Namibia the government has tried to quash internet use and Syria has agonized over whether to introduce it (Mann and Stewart 2000, 33). Hence, issues of censorship take different forms in different countries and will therefore influence the possibilities of online research viability.

Language issues

Digital space is still largely characterised by ethnocentrism, in terms of the dominance of the English language. Additionally, the 'newbie snobbery' of netiquette, acronyms and emoticons can produce an 'unwelcome terrain' for marginalized cultures and erect barriers to membership. English currently predominates as the language of the internet and the majority of webpage content is also in English (84%),

although some changes are apparent. In 1996, 80% of users were English speaking but by 2000 this had fallen to 54%, with 7.1% Japanese, 5.4 % Chinese, 5.0% German, 4.7% Spanish, 3.9% French (Thurlow et al. 2004, 121). Recent figures (2004) suggest that non-English speakers now predominate (63.5%) in accessing the internet and the greatest growth in internet languages is predicted to be in Japanese, Korean and Chinese (Thurlow et al. 2004, 121). But this raises ethical issues for online researchers. What languages are we going to use to communicate? Who can we speak to? Do we have an ethical compulsion to communicate our online questionnaires and virtual interviews in a multilingual format? Online research methods are at present characterized by ethnocentrism, in terms of the dominance of the English language, so decolonization of language is another key ethical issue.

Implications for online ethical practice

AoIR ethical recommendations recognise that a central goal of their document 'is to present internet research ethics that are intentionally pluralistic…..to preserve and foster the often diverse ethical insights of the world's cultures' (Ess and the AoIR Ethics Working Committee 2002, 2). It welcomes suggestions and additions from national cultures and in languages not well represented in the current literature. It also draws attention to the ethical traditions of researchers' and participants' culture and country as this may be significant when considering risks to subjects, including violation to basic human rights, self-determination, privacy, informed consent and the benefits of the researcher (Ess and the AoIR Ethics Working Committee 2002, 8). Following from this, a special conference organised at Lancaster University December 2001 on Computer Ethics: Philosophical Enquires, attempted to '…articulate values and guidelines for internet research that are genuinely global in their validity (as required for a global medium) while acknowledging important cultural and national differences in values that might require specific ethical codes and guidelines for distinctive cultural groups' (Ess 2002a, 177).

As Ess (2002a, 185-186) summarises in relation to online ethics, '… the literatures, laws, polices and discussions still represent a limited framework- i.e., that of the North. …. To further expand these frameworks into genuinely global ones clearly requires new dialogue and engagement with the traditions and value systems of Central and Southern America, Middle- and eastern European, Francophone countries, the Middle East, the Islamic world, Africa, Asia, and the many indigenous peoples of First World nations who have survived the colonization of recent centuries- especially as these domains represent the most rapid growth of CMC and thus some of the most interesting domains for internet research.' This is a goal of genuinely encompassing global perspectives into internet research ethics. From the relative paucity of published work on this topic, clearly much remains to be done.

There are, however, moves in this direction. For example, some attempts have been made to explore the cultural diversity in use of communication and technology (Ess 2002b; Ess and Sudweeks 2001; 2002), in the use of cross-cultural research teams (Foot et al. 2003) and non Anglo-American centred research (see, for example, The World Internet Project, Bridges.org and Digital Divide Network). Indeed, Jankowski and van Selm (2005, 206), in summarising a future agenda for methodological innovation in online research note the importance of developing cross-national studies, preferably longitudinal in nature which involve ‘designs of engagement’ whereby '…researchers take an active role in the formulation of policy and action within concrete settings', including action research and participatory forms of inquiry.

Learning activity

Instructions:

The activity that follows provides guided further reading on inequalities in internet use and the digital divide.

International inequalities in internet use

Although Northern users have dominated internet usage, this is changing. In 1995, 70 percent of internet users were based in US but this had fallen to 50 percent in 1999 and 33 percent in 2002. The greatest recent increase in internet users has been in the Far East/Pacific regions (Thurlow et al. 2004, 122).

Visit Internet World Statistics (http://www.internetworldstats.com /stats.htm) to determine the current geographical variation in online users. What are the key geographical features that are apparent? How and why does this vary with your perceptions of internet use?

The digital divide

Read the following texts and account for international inequalities underlying the digital divide. How and why do the perspectives on the digital divide vary in the two documents? What can be done to overcome the digital divide?

Bridges.org (2001) Spanning the digital divide: Understanding and tackling the issues (http://www.bridges.org/ spanning/summary.html)

United National Development Programme (2001) Making New Technologies work for human development (http://www.undp.org/hdr2001)

Online power inequalities

The racial ravine

Of course international inequalities go much deeper than rather banal lists of statistics surrounding the digital divide and language usage. These global inequalities are also played out in terms of online power inequalities. It is important to note that the digital divide is alive in kicking in northern countries. According to Silver (2000, 27), in America, this divide is fast becoming a 'racial ravine'. In the US only 5% of users are African-American and Latino households are even less likely to use the internet (Thurlow et al. 2004, 87). According to Hacker and Steiner (2002) white people are also more likely to benefit from internet use. In terms of website design, issues of race are also often designed out by omission (Nakamura 2002). Racist practices also proliferate in some online venues and while the Council for Europe's Convention on cyber crime encourages European countries to address such online race hate distributing racist ideas and xenophobic materials and ideas, the online researcher may have to confront such issues in very direct ways when using online research methods to avoid concurring with and also in resisting racism, while also remembering than any virtual research participants has the right to be treated fairly and sensitively. Online inequality in power relations, be they based on race, sexuality, age, class or gender, do not go away in the anonymity of internet-mediated research, precisely because online and onsite lives are mutually dyadic (Madge and O'Connor 2005). However, at present there is little legal redress for anyone with negative experiences while participating in (or conducting) online research but Mann and Stewart (2000, 45) make some sensible practical suggestions to afford some sort of protection. For example, where a researcher sets up a private discussion site then incoming messages that might alienate or insult participants can be excluded, or a 'hate filter' may be deployed to filter out messages from extremist groups.

Gender and sexual parity in online use?

Moreover, despite recent moves towards gender parity in online access, some gender divisions in internet use remain, as do digital gaps across educational level and occupational labour (Losh 2004). Ono and Zavodny (2003), for example, show that once men and women are online, women tend to use the internet less frequently and less intensely than men. Studies have shown how online discourses and practices continue to reflect and reinforce the unequal gender power relations present in onsite institutions and social conventions (Hocks 1999; Josok et al. 2003) and sexist practices abound (Cunneen and Stubbs 2000). Moreover, while the gender gap with regard to internet use is narrowing, the majority of women on the internet still continue to be white academic professionals (Travers 2003). The majority of participants on bulletin boards and listservs are also still men and men also dominate participation volumes and agenda setting even in feminist and mixed-gender cyberspaces (Gurak 2001). Recent studies suggest that effective use of the internet to increase women's empowerment may be overshadowed by its commercialization (Shade 2003) and its role in affirming norms of femininity and consumerism (Pitts 2004). Differences have also been explored to some degree on internet use according to sexual identity. This has largely focused on representation online and the use of the internet as a medium for community, information exchange and the expression of identity (Alexander 2002a; Alexander 2002b; Groom and Pennebaker 2005; Snyder 2002; Yang 2000). This research suggests that issues of sexuality will also need to be considered by the online researcher.

Lifespan and economic background

Access to the internet is also dependent on household income and education levels (Mann and Stewart 2000, 33). A number of studies have attempted to explore the factors influencing the use of the internet, many focusing on internet use in North America. Wasserman and Richmond-Abbott's (2005) study found that those who were more knowledgeable in the use of the internet were also more likely to use it more frequently while Mills and Whitacre's (2003) attempt to explain the gap between internet use in urban and rural areas in the USA found that factors related to education, income and other household attributes were likely to be of more importance than issues of infrastructure and access to internet technology. They found that factors likely to increase internet use included education and income (with internet use expected to be higher in households with higher levels of education and disposable income), age (with younger households more likely to use the internet), marital status (with households headed by married couples more likely to use the internet) and number of children (with more internet use in households with more children). Heung's (2003) study of international travellers also found that those who made use of the internet for online purchase of travel products were likely to be those from Western countries with higher education levels and higher annual household income. Thus access to and use of the internet is clearly skewed.

Cultural differences

A further key issue is the way in which cultural differences are played out through internet communication. The online researcher has the potential to cross, sometimes unwittingly, geographical, cultural and linguistic boundaries. This raises many unanswered questions surrounding how ethnocentricity might be avoided, and quite simply there is a lack of research to draw on. How can the online researcher communicate across difference in the anonymous scenario? How can the development of dialogue be established without visible paralinguistic cues? Can emoticons replace the empathy of a smile or a tear? If a researcher is unfamiliar with the cultural field how will they know what questions to ask and how to interpret responses? Essentially, can online research methods ever replace 'being there'? As Paccagnella (1997) suggests, obtaining information about someone's life through online communication although seemingly easy and convenient, is always a hazardous and uncertain procedure. That said, in some instances the anonymity of internet mediated research may be useful. Ma (1996) has documented the way in which the anonymity of the internet enabled East Asian participants to be less bound by face-to-face cultural rules or be overshadowed by the American host culture. The computer-mediated communication thus enabled more direct communication and greater self-disclosure as there was less fear of rejection or disagreement in the virtual venue. Moreover, if participants are communicating in a second language then maybe written language might be more suitable than speech, especially with asynchronous communication (cf Mann and Stewart 2000, 200). But this too raises ethical issues. Of course, this issue of ethnocentrism and communicating across difference is equally applicable to onsite research but '…it is yet to be seen whether the technology which allows people to speak across cultural boundaries will also allow them to understand each other' (Mann and Stewart 2000, 201). So another key ethical issue is the development of a critical online reflexivity.

Critical online reflexivity

According to (Hine 2005, 9): 'New technologies might…provide an opportunity for interrogating and understanding our methodological commitments. In the moments of innovation and anxiety which surround the research methods there are opportunities for reflexivity. Seizing these moments for reflexivity depends, however, on not taking the radical capacities of the new technologies for granted, nor treating them as poor substitutes for a face-to-face gold standard'. Evidence of such reflexivity exists. Hall et al. (2004), for example, propose the use of a feminist communitarian approach which prioritises the online community, roots the research in neighbourliness (care and understanding), is participant driven, ensures accurate and sufficient interpretation of data and above all, is conceived of as an online community service. Madge (in progress) further suggests that online research methods do hold some postcolonial potential which involves internationalising these methods to work towards 'inclusions beyond the mainstream'. This approach would both embrace differences and expand access to privilege and power, through involving participants from the outset through the production of bottom up theory and by sensitive and ongoing online reflexivity which respects the dignity of participants. Finally, postcolonial online methods would aim towards contributing to society and human well-being through global ethics of care and fair distribution of the benefits of the research (Madge, in progress). Here, Thomas' (2004, 198) view would be endorsed that internet research ethics cannot be separated from the broader social and political milieu. Hence, a global, rather than a

parochial, view of the problems must be taken in an attempt to 'think outside of the ethical box' (Thomas 2004, 198).

A concluding caution

Given the growth and impact of the internet in recent years, the ability to utilise online research methods is both timely and of utmost significance to many social scientists. Their use, however, must be carefully considered. As Denscombe (2003, 41) suggests: 'A decision on whether it is appropriate to use 'e-research' should be based on an …evaluation of the respective advantages and disadvantages in relation to the specific topic that is to be investigated.' Indeed, although the data collected by online methods can be rich and valuable to the researcher, the potential of online research should not be exaggerated: many of the issues and problems of conventional research methods still apply in the virtual venue. As Smith (1997, 4) concludes: 'The new technology offers a spate of problems layered over the old.' This is surely true for consideration of ethical issues. It must be remembered that ethical issues are often superficially considered by more conventional onsite researchers so care must be taken not to inflate ethical issues in the virtual venue. We should not have higher expectations for online researchers than we do for onsite researchers! As Thomas (2004, 200) so rightfully reminds us 'ethical conundrums are never easily solved, and dialogue, critique, constant vigilance, and accountability seem far preferable to more rules and increased oversight.' Indeed, if online/offline worlds are mutually constituted, and we carry our real-world assumptions, norms and behaviours into cyberspace, then we can clearly draw on onsite ethical guidelines (see support for this viewpoint form Boehlefeld 1996; Jones 2004; Thomas 2004). But, further than this, if there is a dialectical relationship between cyberspace and geographical space, then what does a consideration of online ethics have to offer conventional onsite understandings of ethics? This is the future for online ethical research enquiries.

Case study: Social Exclusion and the internet in Tanzania (Claire Mercer, Department of Geography, University of Leicester)

In order to understand who is using the Internet in rural Tanzania, I spent two months at the country's first donor-funded Sengerema Multipurpose Community Telecentre (MCT), in rural Mwanza in 2003 (Mercer 2006). Research methods included an open-ended questionnaire of MCT users (265 responses), semi-structured interviews and focus group discussions with users and non-users, and a town survey (299 responses) which collected basic socio-economic data about households and livelihoods in the town.

Key findings of the MCT user survey show the following axes of exclusion:

Gender and age: The largest user group was young males (under 30), who comprised 59% of the total customers over the research period. Overall men comprised 74% of all users. Half of the users were under 25 years old, and 86% overall were under 35.

Education: 75% of users have been educated beyond primary school. This compares with 4% of the adult population of Mwanza Region having completed secondary school, and 5% nationally (NBS 2002).

Occupation: Employment profiles of users revealed a wide range of activities. The most common were: Students (34%), teachers (17%), farmers (14%), businessmen (13%), businesswomen (2%), doctors (2%) and nurses (1%).

The majority of users of the Internet cafe at the MCT represent what might be termed a local elite. Education, occupation, knowledge of English, and financial position are all key factors affecting an individual's ability to use the MCT. There are a reasonable number of farmers making use of the cafe; but if we compare this against the regional occupational profile, which shows that in rural Mwanza, 79% of activity is classed as farming, fishing or livestock (NBS 2002), we can see that this group is relatively under-represented amongst MCT users. This is an important finding, given the project donors' assumption that rural farmers will be one of the key beneficiaries of the MCT. Moreover, a half-hour computer session costs 500 Tsh (US$0.45); the mean monthly income for a household in Mwanza region is 17,566 Tsh/- and the median monthly household income is just 6,108 Tsh/ (NBS, 2002). We might then question the need for, and sustainability of, an expensive and technology-dependent project being placed in a poor rural area where access to education is relatively low, and incomes are below the national average and dependent upon rain-fed agriculture.

The qualitative research revealed these exclusions in more detail. For many residents in the town, the MCT was associated with 'development' and was therefore not a place for people of little education and low income;

"People here are afraid to use the MCT, they don't believe it is for them. Most people are afraid of computers, they think it's difficult to learn. Even I used to feel this way. Most women feel this way" (Female nurse, 28).

This feeling of exclusion was compounded by a discourse of inclusion common among MCT users;

"It's a good place, but the people living around the MCT don't know its importance. They are not educated. It's only the workers here in the town, who are educated, they are the ones who know the importance of the MCT" (male accountant).

Indeed, a number of informants claimed that 'local people' were not using the MCT, due to 'poverty' and 'ignorance'. Rather, the MCT was being used by the employees and students resident in the town, who have come from elsewhere in Tanzania.

Summary

The introduction of the Internet in Tanzania has been met with much enthusiasm, particularly among young people eager to follow global trends and news stories. However, claims that the Internet is the latest technology which will speed up the development process, should be treated with caution. Certainly, the Internet is new to Tanzania, and the problem of lack of local content, particularly in Swahili, will hopefully become less of a barrier to widespread use with time. Nevertheless, at present, the Internet is seen as a leisure pursuit rather than a source of information and education (on, for example, health or farming topics). This should come as no surprise, since it mirrors experiences with the Internet in societies around the world. This does not mean that the Internet cannot have developmental benefits in the future, but it does suggest that policy makers and development planners need to be realistic about the contribution which Internet projects can make to the development process overall.

Of more concern is the apparent exclusion of certain groups from Internet cafes in urban and rural areas. Education and English are key here. People who have not even seen a computer automatically exclude themselves from Internet cafes because they do not feel 'educated enough' to use them. The under-representation of women is a further cause for concern. Issues of gender relations, and women's access to cash income, may be significant here. Poverty is the other major barrier to Internet usage for the majority of Tanzanians. Given the realities of most peoples' daily lives, especially in rural areas, the Internet is a luxury that few can afford.

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Training session at the Multipurpose Community Telecentre (MCT)

Frequently Asked Questions & Glossary

FAQs

Can I use existing ethical guidelines or do I need to refer to ethical guidelines that specifically refer to online research?

There is much debate over this issue. Some argue that because online/offline worlds are mutually constituted, and we carry our real-world assumptions, norms and behaviours into cyberspace, then we can clearly draw on onsite ethical guidelines while others suggest that there is something special about the online research environment that necessitates the development of a set of ethical guidelines specifically pertaining to the virtual venue. According to the Association of Internet Researchers (AoIR) ethics working committee (quoted by Ess 2002a, 180), online research can entail greater risk to individual privacy and confidentiality, greater challenges to a researcher in gaining informed consent and more difficulty in ascertaining participants' identities. This results in increased difficulty in ascertaining ethically correct approaches because of the greater diversity of research venues and because of the global reach of the media involved.

What ethical guidelines exist for online research?

There are many but the following are a useful starting point:

Ess, C. and AoIR Ethics Working Committee (2002) Ethical decision-making and internet research: recommendations form the AoIR ethics working committee. (http://www.aoir.org/reports/ethics.pdf).

Bruckman, A. (2002a) Ethical Guidelines for Research online (http://www.cc.gatech.edu/~asb/ethics/).

American Association for the Advancement of Science Ethical and Legal Aspects of Human Subjects Research in Cyberspace (http://www.aaas.org/spp/sfrl/projects/intres/main.htm)

John Suler (2000) Ethics in cyberspace research (http://www.rider.edu/~suler/psycyber/ethics.html)

See also the 'Further resources' section of the 'Ethics' module for other examples.

Do I need to get informed consent when conducting research in chat rooms and bulletin boards?

There is some debate over this issue but generally speaking for private or semi-private sources (mail, closed chat rooms) informed consent is considered essential, whereas in open access forum (newsgroups/bulletin boards), it is suggested that informed consent may not be so essential. Ess and the AoIR Ethics Working Committee (2002, 5) recommend that the greater the acknowledged publicity of the venue, the less obligation there may be to protect individual privacy, confidentiality and the right to informed consent.

How can I improve data security issues when researching online?

Data security can be improved by the use of web-based questionnaires rather than email questionnaires, or the respondent can be encouraged to complete the questionnaire on an anonymous machine in a library or internet café and then print it off and post it to the researcher. Encryption can ensure email messages can only be encrypted by the intended recipient but equally it may complicate a project because all participants must use email software that shares the same encryption capability and the researcher and participants must have the technology in order to use the software. Additionally, encryption is illegal in some countries and may be viewed suspiciously by governments. Also a general way to increase data security is to regularly back up research data and store it in the most secure location possible.

Are participants' expectations of privacy important?

Yes! Expectations of privacy are the important issue and different venues may have different expectations. Many social messages exchanged through the internet can foster the illusion of privacy because

correspondents do not see the numerous people reading their messages, including lurkers to sites, so individuals often believe they are communicating with a small group rather than a large audience. So a key issue facing the online researcher is whether the individual or group considers their correspondence to be public or private. According to Ess and the AoIR Ethics Working Committee (2002, 7) if the participants of the research believe that their communications are made in private, or if they are understood as subjects participating in private exchanges via chatrooms/MUDs or MOOs, then there may be a greater obligation for the researcher to protect individual privacy. But if the research focuses on publicly accessible archives and if inter/actions by authors/agents are public and performative (for example e-mail postings to large listserves or USENET groups, or production of web logs and home pages), then there may be less obligation to protect individual privacy.

Should I give the participants feedback on outcomes/results of the research?

Generally, yes, although this will of course depend on the underlying methodological approach to the research and the research topic. Chen et al. (2004, 171) argue that debriefing should include the sharing of research results, so that the online community is made aware of the information that has been gathered from them. This sharing of research results can promote more egalitarian research relationships and can result in corrections to the researcher's analysis and interpretation of data. In this manner, sharing research results ''repel the feeling of being used by the researcher for selfish gains' (Chen et al. 2004, 172).

How and why is netiquette important to the online researcher?

Based on their research with newsgroups, Hall et al. (2004, 244-247) recognize 6 issues of importance where netiquette is concerned.

1. The importance of the subject header used in any posting to a newsgroup, to assure no misunderstandings between the researcher and newsgroup members occur.
2. Self-identification and self-presentation of the researcher are critical, as readers will form their evaluations about the credibility of the research and the researcher based on this. A formal verifiable, disclosed identity of the researcher, for example through a link to an institutional website, can increase the credibility of the researchers claimed identity see (Madge and O'Connor 2002) and shows respect and courtesy to members of the newsgroup.
3. The researcher must be familiar with the common language used on the specific newsgroup, including jargon, abbreviations, acronyms, emoticons and common grammatical rules. The ability to 'speak' the newsgroups 'language' shows respect to the rules and conventions of the group.
4. The researcher should always ask appropriate questions, not ones that could have been answered by a library or archive search, and to do this the researcher should acquaint themselves on the subject matter before asking for help.
5. The specific culture of the newsgroup should be absorbed through online acclimation or reading FAQs and archives prior to 'jumping in', in order to understand the nuances of group interactions.
6. The researcher has an obligation to be 'up front' about the purpose, nature, procedures and risks of the research.

What organizations can I contact if I am interested in finding out more about the digital divide?

The following are a good starting point but there are many more:

Digital Divide Network
http://www.digitaldivide.org/
The Digital Divide Network is the internet's largest community for educators, activists, policy makers and concerned citizens working to bridge the digital divide. At DDN, you can build your own online community, publish a blog, share documents and discussions with colleagues, and post news, events and articles.

Bridges.org
http://www.bridges.org/
An international non-profit organisation that promotes the effective use of ICT in the developing world to reduce poverty and improve people's lives.

The World Internet Project
http://www.worldinternetproject.net
A project which originated at the University of California, Los Angeles Center for Communication Policy and which has set out to investigate and document the impact of the spread of internet usage.

Postcolonial Feminists Meet Internet Research
http://cyberdiva.typepad.com/postcolonialaoir/.
A discussion space which started in relation to the Association of Internet Researchers (AOIR) precon (Toronto 2003) on Postcolonial Feminists meet Internet Research.

World Summit on the Information Society
http://www.itu.int/wsis/.
Website reporting on the World Summit on the Information Society (WSIS), the first phase of which took place in Geneva hosted by the Government of Switzerland from 10 to 12 December 2003. The second phase took place in Tunis hosted by the Government of Tunisia, from 16 to 18 November 2005.

id21 viewpoints: World Summit on the Information Society. What did it achieve for ICTs and Development? What did it ignore?
http://www.id21.org/ viewpoints/ WSISNov05.html.
Reflections from Richard Heeks of the University of Manchester on the 2005 World Summit on the Information Society (WSIS).

See the 'Further resources' section of the 'Ethics' module for other examples.

Glossary

Cookie

A small file that a web site stores on a user's computer in order to identify that user. Commonly, cookies are used to 'remember' site visitors so that if the visitor has chosen particular options, these are restored on return to the site. For example, this site uses cookies to remember selections added to the personal references list as a visitor moves from page to page.

Digital divide

Term used to describe the situation whereby some regions of the world and some social groups are less 'connected' than others by virtue of their circumstances (nationality, income, age, ethnicity, gender) as some individuals may not have access to computer equipment, software and literacy or internet connections.

Ethics

Broadly speaking, ethics refers to the standards established within a profession or academic discipline regarding the conduct of its members and is strongly linked to the concept of responsibility (cf Vujakovic and Bullard 2001).

Netiquette

Term used to describe the code of conduct between those communicating on the internet. It is concerned with internet courtesy and protocols and is directed at preventing aggressive and insulting behaviour. It is frequently flexible and includes often unspoken rules about what is considered appropriate and polite and respectful behaviour online.

Racial ravine

Term coined to describe the divide in the use of the internet in the USA, where only 5% of users are African-America and Latino households are even less likely to use the internet (Thurlow et al. 2004, 87).

Spamming

Sending the same unsolicited message to a large group of people via or email or by posting to a discussion list.

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Further resources

Online codes of conduct

Many academic and professional research organisations publish codes of conduct which cover key points of legislation.

Some examples include:

American Psychological Association.
http://www.apa.org/ethics/.

American Political Science Association.
http://www.apsanet.org/section_513.cfm.

Association for Computing Machinery (US).
http://www.acm.org/constitution/code.html.

Association for Practical and Professional Ethics (US).
http://www.indiana.edu/~appe/.

British Educational Research Association.
http://www.bera.ac.uk/guidelines.html.

British Medical Association.
http://www.bma.org.uk/ap.nsf/Content/Hubethics.

British Psychological Society.
http://www.bps.org.uk/the-society/ ethics-rules-charter-code-of-conduct/ code-of-conduct/ code-of-conduct_home.cfm.

British Computer Society: Handbook of Ethics for Health Informatics Professionals.
http://www.bcs.org/BCS/ Products/Publications/ Books/BySeries/ Other/ethics.htm.

Economic and Social Data Service: Ethical and legal considerations.
http://www.esds.ac.uk/ aandp/create/ethical.asp.

Economic and Social Research Council: Research Ethics Framework (pdf).
http://www.esrcsocietytoday.ac.uk/ ESRCInfoCentre/Images/ ESRC_Re_Ethics_Frame_tcm6-11291.pdf.

The RESPECT project. Funded by the European Commission's Information Society Technologies (IST) Programme to draw up professional and ethical guidelines for the conduct of socio-economic research.
http://www.respectproject.org/main/index.php.

The Center for the Study of Ethics in the Professions at Illinois Institute of Technology also has vast collection of codes of ethics, organized by professional category. Many of the categories include examples from places other than the UK and US.
http://ethics.iit.edu/codes/index.html.

Ethical guidelines for online research

Bruckman, A. (2002a) Ethical Guidelines for Research online.
http://www.cc.gatech.edu/~asb/ethics/.

Ess, C. and AoIR Ethics Working Committee (2002) Ethical decision-making and internet research: recommendations form the AoIR ethics working committee.
http://www.aoir.org/reports/ethics.pdf.

National Committee for Research Ethics in the Social sciences and the Humanities (NESH), Norway. Research ethics guidelines for internet research.
http://www.etikkom.no/ Engelsk/ Publications/ internet03/.

American Association for the Advancement of Science. Ethical and Legal Aspects of Human Subjects Research in Cyberspace.
http://www.aaas.org/spp/sfrl/projects/intres/main.htm.

Suler, J. (2000) Ethics in cyberspace research.
http://www.rider.edu/~suler/psycyber/ethics.html.

Internet research ethics. Papers from a panel presentation organized for the Computer Ethics: Philosophical Enquiries (CEPE) conference held at Lancaster University, December 14-16, 2001.
http://www.nyu.edu/ projects/nissenbaum/ projects_ethics.html.

Hill M. L., King, C. B., Eckert-Denver, C., Gibson, E., Pankoff, B. and Rice, T. (2004) The Ethics of Online Research: Issues, Guidelines and Practical Solutions.
http://home.oise.utoronto.ca /~scottlab/colin.pdf.

Useful resources for online research ethics

Online Research Methods Ethics Mailing List.
To subscribe email majordomo@cc.gatech.edu and place in the message body 'subscribe online-research-ethics'.

The Association of Internet Researchers -A(o)IR - Ethics Working Group.
http://www.cddc.vt.edu/aoir/ethics/index.html.
Webspace of the AOIR Working Group established to formulate a set of values that all internet researchers should uphold when research involves humans.

The Information Ethics Group, Oxford University Computing Laboratory.
http://web.comlab.ox.ac.uk/oucl/research/ areas/ieg/.
Webspace of a research group focusing on the Philosophy of Information and, in particular, the conceptual foundations of Computer Ethics.

The International Center for Information Ethics.
http://icie.zkm.de/.
An academic website set up as a platform for exchanging information about worldwide teaching and research in information ethics.

MediaMOO Symposium: The Ethics of Research in Virtual Communities.
http://www.cc.gatech.edu/fac/Amy.Bruckman/MediaMOO/ethics-symposium-97.html.
Log of the symposium held on January 20th, 1997, as part of MediaMOO's fourth birthday celebration to discuss ethical issues raised by doing research in virtual communities.

The Confidentiality And PRIvacy group (CAPRI).
http://www.ccsr.ac.uk/capri/.
Webspace of CAPRI, University of Manchester, UK - a multidisciplinary team of researchers set up to investigate the confidentiality and privacy issues that arise from the collection, dissemination and analysis of data.

The ETHICS website.
http://www.prs-ltsn.leeds.ac.uk/ethics/.
Web pages produced by the ETHICS Project, a one year initiative funded by the LTSN (now the Higher Education Academy). Aims to provide a useful resource for new teachers of ethics looking for ideas on course development, and also for experienced ethicists for whom it provides a 'snapshot' of current teaching and learning priorities.

Resources from an international perspective

Digital Divide Network.
http://www.digitaldividenetwork.org/.
An online community for educators, activists, policy makers and concerned citizens working to bridge the digital divide. Users can build their own online community, publish a blog, share documents and discussions with colleagues, and post news, events and articles.

Bridges.org.
http://www.bridges.org/.
An international non-profit organisation that promotes the effective use of ICT in the developing world to reduce poverty and improve people's lives.

The World Internet Project.
http://www.worldinternetproject.net.
A project which originated at the University of California, Los Angeles Center for Communication Policy and which has set out to investigate and document the impact of the spread of internet usage.

Connect-World.
http://Connect-World.com.
A series of magazines in which decision makers in the telecommunications and information technology sectors discuss their opinions about the impact of these technologies upon Global and regional development.

BBC News: Special report on the digital divide.
http://news.bbc.co.uk/1/hi/special_report/1999/10/99/information_rich_information_poor/466651.stm.
Series of news articles and related links from 1999. Includes case studies about Burkina Faso, Mongolia, Morocco and the United States.

Postcolonial Feminists Meet Internet Research
http://cyberdiva.typepad.com/postcolonialaoir/.
A discussion space which started in relation to the Association of Internet Researchers (AOIR) precon (Toronto 2003) on Postcolonial Feminists meet Internet Research.

World Summit on the Information Society
http://www.itu.int/wsis/.
Website reporting on the World Summit on the Information Society (WSIS), the first phase of which took place in Geneva hosted by the Government of Switzerland from 10 to 12 December 2003. The second phase took place in Tunis hosted by the Government of Tunisia, from 16 to 18 November 2005.

id21 viewpoints: World Summit on the Information Society. What did it achieve for ICTs and Development? What did it ignore?
http://www.id21.org/ viewpoints/ WSISNov05.html.
Reflections from Richard Heeks of the University of Manchester on the 2005 World Summit on the Information Society (WSIS).

Useful resources for copyright, data protection and internet law

Cyber-Rights and Cyber-Liberties
http://www.cyber-rights.org/
A non-profit civil liberties organisation which aims to promote free speech and privacy on the internet.

Internet Law and Policy Reform:
http://www.ilpf.org/
An international nonprofit organization dedicated to the sustainable global development of the internet through legal and public policy initiatives.

Lawrence Lessig (Stanford Law School)
http://www.lessig.org/
Home page of the author of Code and Other Laws of Cyberspace. Contains news on issues such as copyright on the internet of relevance to Lessig's work.

Legal Data Base:
http://www.legal-database.com/copyright-laws-internet-law.htm
A summary of copyright law on the internet.

The Council of Europe. Convention on Cybercrime
http://conventions.coe.int/ Treaty/Commun/ ListeTraites.asp? MA=49&CM=7&CL=ENG
Provides the full text of the Council of Europe's convention on cybercrime, alongside explanatory reports and summaries.

UK Information commissioner's site:
http://www.informationcommissioner.gov.uk/
Website of the independent official appointed by the Crown to oversee the Data Protection Act 1998 and the Freedom of Information Act 2000. Contains a range of information about UK legislation on these issues.

European Commission Privacy on the Internet- An Integrated EU Approach to online data Protection:
http://www.europa.eu.int/comm/justice_home/fsj/privacy/
A general site by the European Commission that deals with data protection issues.

Joint Information Systems Committee (JISC): Data protection webpages
http://www.jisc.ac.uk/index.cfm? name=issue_data_protection
A range of data protection resources including a code of practice and a briefing paper.

The University of Essex: Data protection webpages
http://www2.essex.ac.uk/rm/dp/text_index.shtm
Comprehensive information about the University's data protection policies, including background information and links.

Lancaster University: Data Protection Project 2000-01
http://www.dpa.lancs.ac.uk/
A website aiming to provide a guide to Higher Education Institutions in the UK in complying with the Data Protection Act 1998.

Key books

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Hamelink, C. J. (2000) *The Ethics of Cyberspace.* London. Sage.

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(See associated website (http://www.jbpub.com/cyberethics/) for links, student exercises and sample syllabuses for instructors).

Spinello, R. (2004) *Readings in Cyberethics*. London. Jones and Bartlett.
(Focuses on four key issues of free speech, intellectual property, privacy and security/crime. Also includes professional ethics and codes of conduct).

Special Journal Issues

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