



Seeking Approval: International Higher Education Students' Experiences of Applying for Human Research Ethics Clearance in Australia

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Abstract

University human research ethics application procedures can be complicated and daunting, especially for international students unfamiliar with the process and the language. We conducted focus groups and interviews with four research higher degree and 21 Master's coursework international students at an Australian university to gain their views on the human ethics application process. We found the most important influences on their experience were: the time it took to do an application; support from supervisors, peers and others; their own language skills; and their lack of familiarity with research ethics procedures. To improve the experience of international students undertaking research involving human research ethics applications, we recommend universities provide guidance on institutional ethics review processes, concepts and terminology, with translations in a range of languages, together with guidance on how to conduct research ethically within and outside the students' own countries. We also recommend curricula be developed to further students' understanding of the importance of ethical research practice, and that these curricula be embedded in undergraduate and postgraduate degree programs and reflected in course learning outcomes.

Keywords Human research ethics committee · Ethics review · Postgraduate student · Supervisor · Higher education

Introduction

Until the advent of COVID-19, international student mobility had been steadily increasing in many countries (UNESCO Institute of Statistics, 2020). For some countries, income from international students had become a key part of institutional revenue. In 2019 Australia, for example, hosted over 758,000 students from other countries—442,000 in higher

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education (Australian Government Department of Education, Skills & Employment, 2019). Over 37% of international higher education enrolments in Australia were from China. There has been a tendency to view such “sojourning students” (Marginson, 2014, p. 15) from a deficit perspective, in which students struggle to adapt to their new environments and are seen to be in need of acculturation advice (e.g. Warner & Miller, 2015). A more positive viewpoint, however, is to regard them as experiencing “self-formation” (Marginson, 2014, p. 7) and gaining “new values and beliefs” (Marginson, 2014, p. 12) in their new institutional cultures. Such growth allows students to demonstrate graduate attributes such as the ability to work independently (Oliver et al., 2018). One way in which independence may grow and new values can be formed, particularly for postgraduate students, is through conducting research.

Postgraduate students in Australia may conduct research during different programs—as part of a one year honours dissertation following their undergraduate degree; as part of a Master’s degree by coursework; or as part of a research higher degree leading to a research MA, MPhil or PhD. Of course, if drawn from a range of source countries, international postgraduate research students can also contribute to diversity in the research community, helping all students build their abilities and join transnational networks that would enable them to operate in a global environment.

In Australia, universities have responsibility for ensuring that research conducted under their auspices is ethically acceptable, safe and of an appropriate level of quality, and undertaken in accordance with the National Statement on Ethical Conduct in Human Research (National Health & Medical Research Council, 2007, updated 2018). Approval is required when conducting any activity involving human research. The task of reviewing projects falls to Human Research Ethics Committees (HRECs) when the research has a greater than low level of risk; for some categories of research and in some institutions, this responsibility also extends to projects deemed to be low risk (Moore & Richardson, 2013). This puts a significant onus on each HREC to uphold high standards, sometimes leading to accusations that HRECs are overstepping their mark, making their level of control problematic (Israel et al., 2016). In particular, those unfamiliar with the guidelines, policies and procedures followed by HRECs may see the process as one of obstructive red tape. The issues are compounded for international postgraduate students, as their own experiences of ethics application processes are often vastly different from those they need to follow in Australia.

Difficulties in gaining ethics approval are a common experience, but instruction of postgraduate students in research ethics processes and their understanding of the issues involved remain under-researched (Fisher et al., 2009) and “contentious” (Smith, 2016, p. 95). In this study, we seek to add to our understanding of the perspectives of international students in applying for research ethics review in Australia in order to support both students and their institutions in developing responsive review systems and nurturing ethical practice.

Literature Review

The intricacies and frustrations of the ethics application procedure, especially for qualitative researchers, are acknowledged by many academics in a range of different countries and institutions. In Canada, Petillion et al. (2017) argued frustrations were likely to be heightened among students who “often feel quite lost in tackling their first ethics application” (2017, p. 142). Brindley et al.’s (2020) study of seven doctoral level trainee clinical

psychologists in two British universities was particularly jarring—all described the experiences that they and their peers had had with ethics review as generally negative, expressed by one participant as “horror stories” (p. 99).

A perceived lack of transparency around the specific steps involved and a lack of policy-based decision-making by HRECs can lead candidates to believe they have no means of anticipating areas within their application which are likely to need further development. This points to a need for capacity building for both reviewers and applicants in working through the ethics application process. This is an important point—the problem is a shared one and institutions do need to create an appropriate ethical framework where one does not exist at a national level, and provide professional development and appropriate guidelines for all those with a stake in research ethics review.

While Australia is one of the few countries to have a national statement that covers ethical conduct in all human research (Israel, 2015), the availability of resources designed to help postgraduate students engage with the ethics of research, and to do so in a way that would inform their engagement with the National Statement and with HRECs, varies markedly between institutions. A lack of institutional attention to this (and this is far from just an Australian issue, see for example Hyytinen and Löfström (2017) on Finland) can lead students to view the ethics review process as one of following rules or ‘jumping through hoops’ rather than developing the ethical imagination to work effectively as a researcher. Of course, the hoops are important, and throughout the literature there is a reported lack of knowledge about the inner workings of HRECs, particularly their evaluation processes, and even of processes deliberately designed by universities to meet the needs of students undertaking research within coursework (Wynn, 2015).

However, the ethics review process cannot in itself promote the development of researchers who are capable of responding to ethical challenges as they arise in their research. As part of her work on the difficulties faced by student researchers in obtaining ethics approval for human research, Wynn (2015) interviewed 40 ethics administrators, HREC chairs and members, and researchers drawn from 14 Australian universities. She found most interviewees believed “it’s not ethics review that produces ethical research practice, but rather the process of reflecting on ethical research practice, combined with good supervision for students. Thus, some argued, institutions needed to re-orient themselves away from a punitive, policing approach to ethics review to an approach that builds capacity for ethical thinking” (n.p.).

The possibility that international postgraduate students will have engaged with concepts of ethical research in their previous studies will vary between countries, institutions and disciplines. We ought to be wary of overgeneralising between institutions, let alone between countries, as the development of regulatory oversight and its relationship with local ethical traditions may contrast markedly. Macfarlane and Saitoh (2008, p. 185), for example, noted that in Japan, research ethics was a “relatively new concept” for many of their 13 interviewees, all of whom were academic staff members. Jordan and Gray (2013) found that only half the academics that they approached in disciplines that conducted human research at the University of Hong Kong were even “somewhat familiar” with key research ethics principles (p. 132). In China and Indonesia, the two countries most represented by students in our own study, there are likely to be no human research ethics committee procedures for social research undertaken by university students. Students from countries with a less developed research ethics tradition may therefore face challenges when undertaking coursework that assumes knowledge, skills or attributes relating to ethical practice in research.

Cultural norms may also have a bearing on students' understanding of the ethics approval process. Participant consent, for example, requires participants to make informed and voluntary decisions. Consent is sought in a way that protects individual autonomy. However, individual autonomy is constructed differently according to various cultural norms. For example, Chinese culture is often characterised as valuing collectivist and hierarchical relationships more and offering less individual autonomy than Western cultures (Katyal, 2011; Zhai, 2009). As a result, international students' views about who needs to consent to research and on what basis might vary from those of the HREC. For instance, an Indonesian government education official might be used to directing teachers and students to undertake particular activities and find the requirement that each be allowed to make their own decision about participating in research to be quite novel. Students may therefore encounter difficulties adapting to differing cultural expectations. Indeed, we cannot take education in ethics for granted among Australian graduates either. Although Australian universities generally value graduate attributes such as global citizenship and the need for ethical and inclusive engagement with communities, cultures and nations (Oliver et al., 2018), institution-wide attributes are often pitched at a high level of abstraction. Even when the need for application of ethical principles is specifically identified as a graduate attribute, research is rarely identified explicitly as a context within which ethics needs to be applied (e.g. Charles Sturt University, 2021). Conversely, where universities have published graduate attributes specific to postgraduate research students, attention to research ethics may be more explicit (e.g. James Cook University, 2020).

Given the unfamiliarity that students may have with research culture in general and ethics applications in particular, supervisors play a key role in helping students become confident researchers and navigate the demands of a thesis. Students' assumptions of what supervisory relationships offer include feedback on academic progress (Warner & Miller, 2015), emotional support (Devine & Hunter, 2017) and the facilitation of student research projects that retain authentic interests (Kenny & Fluck, 2018). Griebing et al. (2009) at the University of Cincinnati noted that the level of esteem with which a supervisor holds the ethics approval process can have a significant impact on shaping student attitudes. However, there is no consensus on the standards of supervisors and the expectations that students may have of them (Johnson et al., 2000), and the variation may be particularly noticeable when it comes to international students (Jin & Cortazzi, 2006). As a result, it is difficult to trace what support supervisors actually offer their students in the ethics process, whether this meets international students' expectations, and whether these expectations are legitimate.

In addition to supervisors, peers can play a vital role in the student research experience. Stracke and Kumar (2014), for example, highlight how peers can not only provide emotional support but also motivate others to work more independently. More specifically, Brindley et al. (2020) point to peer support during the research ethics application process as being generally empowering.

Even with support in the application process, however, the time it takes to gain HREC approval can delay data collection. This can be particularly troubling for international postgraduate students under pressure to complete due to the timeline for their course or restrictions on their visa or scholarship. The study that formed the basis for Monaghan et al.'s (2013) work at the University of Limerick in Ireland, for example, was delayed due to a prolonged ethics approval process, causing emotional distress to the researcher, who risked losing the trust of her proposed participants. Griebing et al. (2009) also found that academics at a university in the United States expressed concern over the amount of time taken to gain ethics approval, and the impact this could have on student research projects.

Another issue for students from any background relates to language. Academic language uses a specific style, and the language used when writing an ethics application is a specialised sub-set of this. Technical phrases such as 'incidental findings', 'disclosure policy', 'burden of risk', 'publicly-available data', 'pseudonymised data' and 'distress protocols', even when explained in an ethics form, present a challenge to researchers writing an application. To be blunt, some of these phrases used by ethics bureaucracies are so arcane that they tax even those (like the fourth author) who specialise in research ethics. To understand and use the quasi-legal style seemingly required by such forms can test the skills of any novice researcher, especially those for whom English is an additional language. This can be particularly challenging for students whose first language may not have a vocabulary that matches the ethical terms used in research ethics. It is thus important to provide students with training and advice on both the need for ethical research conduct and the nitty-gritty of writing an application.

Research Problems

Three major problems therefore exist for international students when faced with human research ethics applications in the Australian university context. First, they face challenges in the ethics application process due to their unfamiliarity with the process and the time it can take. Secondly, they may have unrealistic expectations of supervisors' support when writing human research ethics applications. Thirdly, they may experience difficulty in completing the human research ethics application form due to language issues.

In order to address these problems, this project brought together the empirical work of two Master's coursework students to explore international postgraduate students' experiences of the ethics application process in an Australian university, including issues relating to time; how supervisory and peer relationships affect international postgraduate students when applying for ethics approval during their study in Australia; and, finally, what the impact of formal education, particularly in relation to specialised terminology, might be on a candidate's avoidance or completion of the process of ethics review.

Methodology

The study used a grounded theory approach. Four interviews and three focus groups were conducted with students at an Australian university undertaking Master's degrees by coursework ($n=21$) and research higher degrees ($n=4$) in order to gain insight into their experiences of the human research ethics approval process in 2019 (see Table 1).

The student researchers used participant interviews and focus groups to gather data.¹ Open-ended interview questions based on an analysis of the relevant literature and the researchers' own experiences were shared between researchers and enabled answers to be compared across interviews to promote integrity within data analysis. Focus groups were used for the coursework Master's students as these participants were completing their first research project in Australia and it was hoped a group environment of their peers might make it easier for them to share negative experiences or disclose confusion related to the

¹ Link to FigShare for interview and focus group questions: <https://doi.org/10.25909/14233910>.

Table 1 Demographic information for 25 interview and focus group participants in a study on international students' experiences of the ethics application process at an Australian university

Home country	Academic Program	Number of participants
Indonesia	Master's coursework	7
Myanmar	Master's coursework	3
China	Master's coursework	9
Sri Lanka	Master's coursework	1
Vietnam	Master's coursework	1
Russia	Research higher degree	2
New Zealand	Research higher degree	1
Uganda	Research higher degree	1

process. All interviews and focus groups were conducted in English, except those for the nine Chinese Master's students, whose sessions were conducted in Mandarin, a language spoken by one of the researchers on the team.

Data Analysis

Following transcription of participant interviews and focus group sessions, NVivo was used to collate the results of manual coding. An initial set of data-driven codes was assigned to the participants' responses. These codes were descriptive, thematic and analytic in nature. At the completion of initial coding, data within each node were queried to identify frequently occurring word patterns to inform the formation of themes. After the interview content was arranged beneath nodes, the most significant themes were analysed in more detail.

Results

Themes that emerged from interview transcripts are presented in order of their frequency of occurrence.

Time

The majority of respondents who explained factors that would prompt them to avoid pursuing a project dependent on HREC approval cited time as a contributing factor. Three coursework Master's students, for example, commented:

Participant 5 (Coursework Master's, Indonesia) – Yes, absolutely. I think so because firstly because of anxiety that I won't get approval from the university and then secondly that I won't receive the approval in time, that's also another consideration.

Participant 8 (Coursework Master's, Indonesia) – There are a lot of steps to follow and we need to wait for our ethics to be approved before we can commence our study . . . If I had a shorter time then I might avoid research that requires ethics approval.

Participant 11 (Coursework Master's, China) – I would have included more schools as my research cohort but then I would have had more rounds of ethics approval amendments, I was concerned that I could not finish in time.

One RHD student even changed their research design in order to get HREC approval more quickly:

Participant 6 (RHD, New Zealand) – I've been dealing with an external health boards ethics process too so once I got the ethics from the external place, it has actually been easier to get through the university's ethics board process. But actually, I have had to change the ways that I have approached things just to make it easier to get through.

Participants within our study admitted that they had been told before they started their research how long it would take to receive ethics approval. Nevertheless, some participants misinterpreted this information as an exaggeration meant to highlight that it would be a lengthy process. As a result, they were underprepared when the advice turned out to be accurate.

If it were possible to direct support or instruction towards one or more aspects affecting candidate ability to successfully navigate these forms without having to revise and resubmit, we might increase the possibility that RHD students can start data collection earlier in their candidature. This, in turn, might improve the likelihood that international students complete their studies within the period covered by scholarships and visas. Given full-time doctoral students in Australia are expected by their universities to complete within four years, and that Australian Government research training funding is normally only available for up to four years (Australian Government Department of Education, Skills & Employment, 2020), "timely completion is imperative" (Mason et al., 2020, p. 246).

Supervisor Support

The *Australian Code for the Responsible Conduct of Research* (National Health & Medical Research Council, 2018) places responsibility on RHD supervisors to mentor their students on responsible research conduct (Responsibility 15). The guide supporting the Code on RHD supervision is more explicit in relation to research ethics:

Supervisors are responsible for overseeing research proposals developed by those whom they supervise, including providing any necessary advice regarding steps that could be taken to maximise the likelihood that proposed research will be assessed as having academic or scientific merit and as being ethically appropriate. (National Health & Medical Research Council, 2019, p. 4)

Not surprisingly, then, the second theme most frequently mentioned by students was supervisor support. In Griebing et al.'s (2009) Cincinnati study, interaction with a supervisor was referenced across the entirety of a project: initiating the research ethics paperwork process; providing feedback throughout the drafting of paperwork; correcting misconceptions; and providing advice based on prior experience.

Seven candidates, from both the coursework Master's and RHD cohorts, reported positive supervisor interactions in relation to completing the HREC application. One coursework Master's student, for example, had weekly supervisor meetings at which feedback on the application was provided. Those from the RHD cohort demonstrated more independence throughout the process, with two completing their own first drafts before sending them to their supervisors for modification:

Participant 2 (Coursework Master's, Indonesia) – After filling in the form I would take it to my supervisor to edit and provide feedback. I did this every week.

Participant 4 (RHD, Russia) – After finishing my first draft I sent it to my supervisor and he helped me to modify some things.

Participant 6 (RHD, New Zealand) – I just followed the instructions and once I had finished it I gave it to my PhD supervisor. She tweaked it a little bit.

A source of this disparity may arise at the supervisor level. It may be unclear who is responsible for helping students write an HREC application and where the boundaries between supervisor and student responsibility lie. At many institutions, including the site where our research was conducted, doctoral candidates are required to attend workshops that provide instruction on a range of processes involved within research, including the ethics review process. However, not all students felt supported by their supervisors, and it is perhaps this kind of gap that the 2019 Guide on Supervision is seeking to address.

Peer Support

Within the early stages of a research career, the foundations of academic identity are seeded within peer groups. This may be particularly important within international groups of students who have developed rapport through shared experiences of studying in a new educational context. Peer influences had mixed consequences and were seen by students as both positive and negative. Some peers warned their fellow students not to undertake research that required ethics review. This should be of significant concern to Australian universities, as it threatens the ability of cohorts of international students to achieve graduate learning outcomes, distorts the research agenda pursued at graduate level and ill-equips future generations of researchers in some disciplines to undertake empirical research of value to their home countries:

Participant 9 (Coursework Master's, Vietnam) – At the beginning when I was about to find a topic to work on for my dissertation, I was a little confused about whether I should look for a topic that would require ethics approval. This was because a lot of my friends recommended for me not to choose the one which will deal with the ethics approval. They said that it would be very tiring and time consuming and that it would be better to work with secondary sources of data.

Participant 5 (Coursework Master's, Indonesia) – Maybe someday I'll see what others do and then maybe waiting will give me the confidence to try. Because one of my friends has waited 2 or 3 months to receive approval. Other people's experiences with the process has had a big impact on me.

Some participants were asked if they would share their own insights of the approval process with future students. One student in particular thought this would be beneficial:

Participant 3 (Coursework Master's, Indonesia) – I think that's why sometimes our friends that enrolled the semester after us, if they are planning to do the ethics then they will come and ask us for help, now that we have completed the process.

One respondent explained:

Participant 2 (Coursework Master's, Indonesia) – I must tell them that I have been through this process, but they will see that it was so long and so difficult.

These comments indicate peer influence could discourage others from undertaking research requiring research ethics review.

The type of support sought from peer groups was primarily emotional or linguistic, differing from the nature of the advice given by supervisors, which was predominantly feedback on content. However, the ability of peer networks to provide support was limited; to exchange insights, peers needed to be experiencing similar challenges with the HREC approval process and have the same language as the student seeking help. The participants did not see friends in general as a source of emotional support in completing ethics review:

Participant 2 (Coursework Master's, Indonesia) – I only had discussions with my friends who were also completing the ethics applications at the time. We would discuss things that we both had trouble understanding. If I spoke to a friend who was not completing the forms they would just say 'I don't know,' instead of trying to help figure it out.

Participant 3 (Coursework Master's, Indonesia) – Maybe, also because you and that friend speak the same dialect, so it's easier for us to say what we mean to say.

Other Support

To construct a complete picture of the participants' attitudes toward education in ethics, we asked students about gaps they had encountered in their knowledge. However, participants found it difficult to be explicit about concepts they felt they were missing—they did not know what they did not know. Some students did not interpret difficulties in engaging with ethics review as a gap in their knowledge of ethics, but rather as a lack of knowledge of the bureaucracy. As a result, they discussed the resources or support that they would have liked to be available, rather than the concepts or practices of ethical research:

Participant 2 (Coursework Master's, Indonesia) – We needed some information about what is actually included within the forms even if it's not specifically the real form. It shouldn't only be about learning what ethics is but also how to actually do that.

Participant 9 (Coursework Master's, Vietnam) – If the school or the lecturers could calm the student down by providing examples or stories about the process which were not scary would help applicant feel more confident through the application process.

Participant 6 (RHD, New Zealand) – The first time around it's a bit of a maze to get through how you are meant to prepare the application and what you are required to consider. The first time I actually completed an ethics application I was actually not at the university so that was probably harder, I had really no direction. So really it was just contacting the ethics committee and really hoping that the contact person was helpful.

Two students highlighted the need for examples and practice:

Participant 7 (RHD, Uganda) – I did the online course from the graduate centre. But I think that the more practical course, I actually attended it after I had submitted my forms. I think that it would have been really helpful before. I had to do quite a number of revisions.

Participant 4 (RHD, Russia) [referring to a forthcoming application] – I will find internet or uni library resources before I begin my application. I will look for examples of the paperwork for the same type of study etc. Approved forms and research papers. It's easier to do something if you have an example or if a person has already done it and you can have it as a base or just as a base for further development.

Five students reported that the education they did receive increased their confidence or ability while completing the HREC application (albeit possibly in relation to compliance rather than ethics), typified by comments such as:

Participant 5 (Masters, Indonesia) – I think yes definitely because previously I never got that kind of knowledge before. So that is why back here I finally get new insight from this university about how to be really careful with our research about using ethics and having knowledge about how to conduct the research by having the ethics approval.

Language

Many universities are poor at writing policies and procedures in ways that can be understood by students. Even when documents are explicitly directed to cover international students or are more likely to be relevant to students for whom English is not a first language, they may be drafted in ways that are hard for most students to comprehend. This issue and the possible value of providing translation is, of course, not limited to Australia (see Taylor and Bicak (2019) on university academic integrity policies in post-secondary institutions in the United States).

In our study, many participants expressed how language barriers affected their ability to complete HREC applications. This was particularly apparent when the interview was conducted in a language other than English. During data collection, the majority of sessions conducted with Chinese participants were conducted in Mandarin at their request. This demonstrates a preference towards using a student's first language when engaging in complex discussions, and perhaps students would be more likely to engage with options for support provided in their first language.

Several participants expressed difficulty in comprehending and responding to ethics application forms in English, and believed that without language support it would be difficult for international students to complete a successful application. Eight Chinese Master's students had difficulty understanding key components in the ethics application form, including 'consent', 'protect the confidentiality of participants' and 'recruitment of participants'. It is revealing that researcher and participants switched to Mandarin in the research interview when they sought to explain why they struggled with English terms:

Participant 10 (Coursework Master's, China) – I found it was difficult to understand some ethics concepts in Chinese context because I could not find precise comparisons.

Participant 16 (Coursework Master's, China) – What does 'consent' mean in Chinese?

Researcher: 'Consent' means zhi qing tong yi.

Participant 16 (Coursework Master's, China) – Is that like signing your name when you have a surgery in the hospital?

Another student highlighted cultural differences as a consideration in the process:

Participant 8 (Coursework Master's, Indonesia) – I think that ethics kind of complex so it can be challenging especially when considering one culture context compared to another cultures

Students also could not understand why ethics forms appeared to be asking the same question multiple times:

Participant 7 (RHD, Uganda) – I found that there is lots of repetition in the form especially around data management. This was quite confusing and frustrating because I was answering the same question more than once.

This student was uncertain whether the form actually was being repetitive or whether they simply were unable to distinguish between two different questions. Our own review of the ethics application form used at the University of Adelaide also noted repetition. Questions 3.6 (What is the participant selection and exclusion criteria?) and 3.7 (Where will participants be recruited or sourced from?) are rather similar, because the information required in 3.7 may be necessary to respond to 3.6 (for example, only teachers at a particular high school will be invited to participate). Again, there appears to be an overlap between the second half of Question 3.8 (What materials will be used to recruit participants and how will they be used?) and 3.9 (How and by whom will initial contact with participants be made?) if recruitment materials are used in the initial contact.

Prior Experience of Ethics Applications

Teaching ethics courses is highly complex due to reliance on culturally constructed notions of ethical behaviours. Education in research ethics often evades this problem by being highly instructive, focused on completing forms and identifying a single correct answer rather than building the capacity to engage in ethical thinking (Allan & Israel, 2018; von Unger, 2016). Even when courses do seek to achieve the latter, the nature of the student body may be such that the course needs to cover a wide variety of disciplines and methodologies, and much of the instruction may not appear to be relevant to any particular student.

Experiences of the education around ethics approval processes received by Master's coursework students in Australia varied significantly:

Participant 2 (Coursework Master's, Indonesia) – All I learnt is that ethics is something that we need to do or complete or get approval for before we do an interview or a questionnaire. I never thought that the form would be like that.

Participant 5 (Masters, Indonesia) – I've known about the ethics approval previously from a course that I have taken previously, that's why it might seem like I am avoiding the ethics stuff, like the ethical approval.

Participant 9 (Coursework Master's, Vietnam) – Through some of my research related courses the lecturer mentioned ethics and the ethics committee. In one course there was a guest speaker that the teacher had invited to come, and she explained about the ethics forms and the committee and what we needed to do for the ethics approval.

Despite these candidates completing several of the same courses, they found the information to have different levels of relevance. Of course, students' development of the knowledge, skills and attributes associated with ethical research could also have reflected their level of attendance, completion of additional readings or activities prior to the lesson, levels of engagement with lesson content, and the fact that the language of instruction was not their first language.

Several participants commented on how the situation in their own countries differed from Australia. In some cases, no ethics review had been required; in others, students were not expected to write the application:

Participant 4 (RHD, Russia) – In Russia, no. We only need to ask a request to the principal.

Participant 7 (RHD, Uganda) – It is a different process. For my Master back in Uganda it was involved with a school who processes the ethics on your behalf as opposed to here where you have to... In Uganda it is truly the principal investigators would take care of that and if it was a student-run project then the faculty would take care of that.

Positive Impacts of the Ethics Application Process

Despite the critical comments provided on various aspects of the process, some participants from both the coursework Master's and RHD cohorts reported that completing the HREC application process for their current project had a positive impact on their research. They developed understanding of applied ethical concepts in relation to research, improved their understanding of data and privacy policy, built conceptual understanding of project design elements, and grew in academic identity and independence.

Participants predominantly commented on elements relating to the feedback which accompanied requests for amendments:

Participant 2 (Coursework Master's, Indonesia) – I really like the way that the feedback from the research committee is given. They only highlight the specific areas that need addressing. And then if we only focus on that aspect, then we can give the feedback amendments back. Sometimes they provide examples within their recommendations which is really helpful too.

Participant 9 (Coursework Master's, Vietnam) – The forms are really comprehensive and the questions that came back were very interesting and made me consider and clarify the project in ways I didn't anticipate.

Some seemed to be developing new values and independence as researchers:

Participant 5 (Coursework Master's, Indonesia) – I think yes definitely because previously I never got that kind of knowledge before. So that is why back here I finally get new insight from this university about how to be really careful with our research about using ethics and having knowledge about how to conduct the research by having the ethics approval.

Participant 9 (Coursework Master's, Vietnam) – Yes of course. I think that there is a reason behind why the ethics is so important for researchers here in [Australia]. For me I think that the ethics requirement is for my own sake first and then the sake of the participants.

These students realised the value of being an ethical researcher, in line with Marginson's (2014) view of the importance to students of gaining new values during their overseas study.

Limitations

This research was conducted at only one institution and may not reflect practices implemented at other universities in Australia or elsewhere. Although we attempted to facilitate discussions that allowed participants to accurately explain their views using their first language, or through the support of peers in focus groups, over half the participants relied on English to communicate their experiences. This may have restricted the degree to which some participants could accurately communicate their experiences.

Recommendations

Several factors appear to have an impact on an international student's experience of the HREC approval process within an Australian tertiary context. These factors include time; supervisor, peer and other support; English language skills; and prior experience of research ethics procedures. There were also some positive factors arising from the process. Many of these themes were summed up by a coursework Master's student, who wrote:

Participant 9 (Coursework Master's, Vietnam) – Some of the difficulties were experienced when completing the form. It is so detailed, which required me to understand the question very clearly first... They ask for some protocol but for me I didn't really understand a lot about. The third issue was language used; I didn't realise what form of English was being used. Whether it was British English or Australian. But then I did receive a lot of comments related to this. It was a totally new concept. For example, they asked me about the storage of the data.

Based on our research, we make five recommendations to improve the support available to future student researchers. Universities should:

1. provide international students with a clear and concise guide to research ethics review processes at their institution.
2. develop clear explanations of terminology and concepts associated with ethical research practice. These should be translated into a range of languages used by international students at their institutions to assist with the comprehension of fundamental concepts across different linguistic and cultural backgrounds and be linked to appropriate resources already available in those languages.
3. resource reflective and ethical practice in research in accordance with the National Statement. Students and staff should be informed of, and encouraged to access, the resources and support provided.
4. generate resources to help researchers understand how to conduct research ethically in line with the regulatory expectations of the country where they are enrolled as students, where they are undertaking fieldwork, and where they might intend working on graduation.

5. develop curricula that enable students undertaking human research to further both their understanding of ethical research practice and the skills required to guide applications through research ethics review. This capacity building should occur throughout a student's degree and should be reflected in course learning outcomes.

Conclusions

Students completing their first research project within the Australian higher education context require improved support throughout the research ethics review process and within their education on ethical research practices. These students are also the most likely to mirror the attitudes of peers and supervisors in relation to the HREC process. Our research found student researchers altered their intended research design or data collection methods to try to gain HREC approval more easily, although it was unclear if this was a successful strategy.

Unfamiliarity with human research ethics application procedures in Australia was the major issue for coursework Master's students, and eleven participants expressed concern that they could not understand the language in the research ethics application form or respond in appropriate English. In addition, they were not aware of the functions of the ethics committee.

Students appreciated transparent expectations and realistic descriptions of the application process. They also sought early access to support materials, including those in their first language. The degree to which students needed to be guided through these materials depended on where they were in their research careers. Coursework Master's students required and valued guidance from their supervisors. They sought explicitly taught programs relating to the concepts of research ethics and review, and wanted peer mentoring. By contrast, RHD candidates were satisfied with online policy documents or just-in-time training courses provided on the university's Graduate Centre website. These resources were perceived as easily accessible when required.

Enhanced and more consistent ethical research education should develop graduate outcomes in ethical practice, but should also tackle practical issues in seeking ethics approval by providing access to supporting materials, offering opportunities for feedback prior to application and developing an understanding about research ethics review. If students are to have the freedom to develop as independent researchers not only during their degree programs but as future contributors to global research networks, resources to facilitate this are vital. In this way, as Marginson (2014, p. 15) suggests, "At the end of the sojourn, the student... takes home a transformed self."

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Declarations

Consent for Publication All participants gave written consent for their de-identified information to be used for any future research by any researcher. All authors listed have consented to this publication.

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