



An Ethnographic Investigation into Postgraduate Researchers' Experience

University of Birmingham's Library Services

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An Ethnographic Investigation in to Postgraduate Researchers' Experience: A Case Study from the University of Birmingham's Library Services

Executive Summary

This report is the work of the Birmingham Undergraduate Internship Programme (BUIP) Intern in Library Services during the summer of 2019. This report seeks to explore the experience of postgraduate researchers at the University of Birmingham. The holistic approach used is wide ranging, yet also allowed a degree of focus on key postgraduate researcher focal points within Library Services: the Research Reserve, Research Skills, and the Researchers' Suite. The report explores themes such as work life balance, the library's online presence, and researcher's awareness of library resources. The most prominent themes to emerge were lack of knowledge about our services and the inaccessibility of the University intranet (when searching for information on these services). A final series of recommendations is made on page 31 of this report that could help Library Services enhance the user experience for postgraduate researchers.

Introduction

The purpose of this study is to more fully understand how postgraduate researchers' (PGRs) experience life at the University of Birmingham. Whilst this study was conducted with improving PGRs experience in the library in mind, a holistic approach has been adopted to understand the PGR experience more broadly. It is the nature of ethnographic work to be broad, based in grounded theory (Mellon, 1986). This study has attempted to let the participants guide the research for the most part. The exception has been when a key element of our services does not naturally arise; interviewers target these with specific questions. Ethnographic studies give researchers invaluable information on how services are being used – going beyond statistics and providing a fuller picture of a group's experience. Given (2006, p. 382) highlights that quantitative research can give you information on the characteristics of usage, but not the 'why' behind these statistics. Ethnography allows the researcher to understand the 'why' behind these numbers more fully.

This study focuses on postgraduate researchers, a group that have been relatively understudied in terms of library UX. Selected participants are in their first year of a research doctorate, as previous studies in the UK have indicated that this is the period where most researchers feel out of their depth (Petch et al., 2016). Postgraduate researchers' experience is incredibly diverse; the University of Birmingham has international students from different academic backgrounds, home students who have had a break from higher education, those who are distance researchers, and those that are heavily involved on campus, disabled researchers and researchers from different economic backgrounds.

Studies such as these that focus on specific user groups are incredibly important – only 59% of PGRs at the University of Birmingham think that "my institution values and responds to my feedback from research degree students" (UGS, 2017). By selecting this specific user group, the participants and broader researcher community will hopefully feel that their concerns are being listened to.

Literature Review

In the last decade, User Experience (or UX) and its various methodologies has slowly made its way in to academic libraries in the UK. UX in libraries originates from the United States, with the first ethnographically focused studies emerging in the 1990s (Mellon, 1990. Fidel, 1993. Julien and Duggan, 2000). Following this, academic libraries began to take on ethnographic projects: for example, in 2004 the University of Rochester began their research project, which focused on undergraduate students' use of technology and the study strategies they were using (Foster and Gibbons, 2007). Following this, the Library Study at Fresno State addressed students' approaches to research (Delcore et al, 2009). Similarly, the Ethnographic Research in Illinois Academic Libraries (ERIAL) Project followed the process of how students did assignments (Duke and Asher, 2012). These projects revealed UX's ability to develop actionable insights, which led many other institutions to carry out their own studies.

It should be noted that not all of these studies have been published; they may remain in grey literature, or not be written up in any kind of report. However, this is not necessarily a bad thing. The overwhelming majority of those who practice UX in libraries want staff members to become more aware, to observe and evaluate as they go, and bring UX in to mainstream thought; Lanclos (2016) has labelled this the 'ethnographic agenda'. In the era of increasing marketization of higher education, the student has become the customer and surveys such as the NSS and league tables are being imbued with greater importance than ever before (Molesworth, Nixon and Scullion, 2009). UX allows libraries to anticipate areas for

improvements and use rapid prototyping to continually improve services – to try and prevent dips in these surveys or league tables from happening.

The purpose of UX is to understand the user – for academic librarians, this is usually the student or researcher – in order to create the best possible experience for them. UX places the user at the centre of analysis, to understand the nuances of how they use a service or resource. This information in turn informs service development and delivery. Priestner and Borg (2016, p.2) have defined UX as "ethnography, usability and service design". This is therefore "ethnography pursued with the purpose of uncovering, understanding and addressing social problems" (Asher and Miller, 2011).

The core idea at the centre of UX, and specifically ethnography, is observation. Inspired by their anthropological backgrounds, UX pioneers such as Donna Lanclos, Andy Priestner and Margaret Westbury have used ethnography to challenge pre-conceived ideas about their users. One example of this is Westbury's small scale investigation of the computer room in a Cambridge College (Westbury, 2016). She, along with her colleagues, assumed that students worked on their laptops and that the computer room space could be utilised in a better way. However, her study found that the students were using this room because the computers had large monitors which were more comfortable to work at than their laptops, and a significant amount of students could not afford to buy, or replace, a laptop. This highlights the importance of pausing before making changes, to assess the usability of space or service, to make sure that the changes are benefitting the student — not what we *think* will benefit the student (Emary, 2016).

From within the UK, UX in libraries has been spearheaded by two library ethnographers at Cambridge University – Andy Priestner and David Marshall – with their 'FutureLibs' programme, starting in 2012 (Marshall and Priestner, 2016). The programme sought to understand the totality of student experience at Cambridge, in order to identify ways that the libraries could improve their learning environment; this broad, non-library centred approach is what this study will emulate.

In recent years, there have been some contributions to the study of postgraduate researchers' use of academic libraries (Delaney and Bates, 2018. Petch et al, 2016.). There was, however, a notable lacuna in the literature preceding these (Petch et al, 2016, p. 275). This is because researchers are rarely treated as a discrete group, with needs differing to that of postgraduate taught students and the wider student population as a whole (Bates and Delaney, 2018, p. 63). Furthermore, Catalano (2013) has shown that research has only examined the information seeking behaviours of PGRs – there is no literature on how PGRs respond to library spaces, usually a key element of a great deal of UX work. In addition, the

broad, user-led ethnographic method that this study has used does not appear explicitly in the literature on PGRs. Spezi (2016) has updated the state of the literature from 2010-2015, which mainly demonstrates that PGRs are becoming more reliant on the internet for research.

The studies of PGRs in university libraries raise many points about the understanding of the role of the library and librarian, some of which were raised in the data for this study. Rempel (2010) suggests that doctoral students, for example, do not engage with library services because they do not believe that librarians are experts in their field. Further to this, they do not want to appear inept to supervisors or other researchers (Rempel, 2010). Postgraduate researchers tend to stop communicating with the library on entrance in to doctoral study (Fleming-May and Yuro, 2009). This is a worrying finding for the services at university libraries. The PGR is in a position where they are more distant than ever from their host department and are distancing themselves from the library – it begs the question, where are they getting support from? The importance of the supervisor increases with the shift from masters study to postgraduate (George et al., 2006), which can propagate the narrative of 'information literacy through osmosis' – that students need to learn themselves and not seek help (Bury, 2011).

The shift from physical to digital research is reflected in most of the literature (Carpenter, 2012. Vezzosi, 2009. Bates and Delaney, 2018. Boyum and Aabo, 2015). Interestingly, at Ulster University there appeared to be a lack of understanding that the library was responsible for the universities online resources – the library ranked as the sixth most important service to doctoral students, whereas the e-journals ranked first (Bates and Delaney, 2018, p. 65). This misinterpretation or lack of understanding is not for a lack of trying; Jubb and MacColl (2011) have argued that PGRs are the most difficult group to communicate with. The issues that the literature raises highlight one overriding difficulty: communication – both with researchers and with academics giving researchers the right information. This study seeks to begin to fill the researcher gap by using a wide ranging ethnography to understand the experience and needs of PGRs as a discrete group.

Methodology

We decided to run an interactive workshop to find our data. The workshop context allowed us to look at participants engagement with library services from many different angles, giving us more in depth insights. Moreover, working with participants for a longer duration in a more intimate setting meant that they were more likely to be forthcoming with their actual opinion.

As the workshop took place over 3-4 hours, we also could see links across the activities and notice trends emerging.

Our approach to this workshop, and the project more broadly, was to be very holistic. Using open coding and grounded theory meant that the participants views and experiences drove our analysis. This user driven aproach ensures that we are directly responding to PGRs actual needs, rather than our perception of what their needs are. However, we did want to explore specifics as well. Using activities that start with a question or topic started our discussions off in a focused manner, but then gradually the participants controlled more and more of the conversation, leading it in the direction of their concerns.

This user driven approach was aided by the use of NVivo software; it enables us to code our data more effectively by theme. The auto-coding function is useful to see how the data appears organically, rather than having a selectivist approach. Nvivo helped to maintain the user driven integrity of the project.

Workshop Task 1: Pin Voting

The pin voting exercise consisted of six questions displayed on boards, with images of answers that the participants could pick. They could only pick one picture per board and voted with a drawing pin.



Source of Truth	Pins
Supervisor	2
Friends and Non-PGRs	
Westmere (UGS)	
PG Handbook	
Library	
Fellow PGRs	5

Figure 1, *Picture of Pin board and Results Table*

After this, the team discussed possible questions to start with in the follow up later on in the workshop. The pin boards allowed us to guide the participants to specific areas of interest,

but also gave them the freedom to direct the conversations from this point. the boards and participants responses were used as a basis conversations within the group.

Workshop Task 2: Love Letters and Break Up Letters

We asked the participants to write a love letter or a break up letter to the library. We made sure to highlight that the library was not just the physical building, but also the services we offer as well such as research skills. They had twenty minutes to write either a positive love letter or a critical break up letter. All of the participants chose a love letter, however one PGR wrote a half positive and half negative letter. This activity allowed the PGRs to write creatively and emotively about their relationship with the library.

Workshop Task 3: Cognitive Mapping

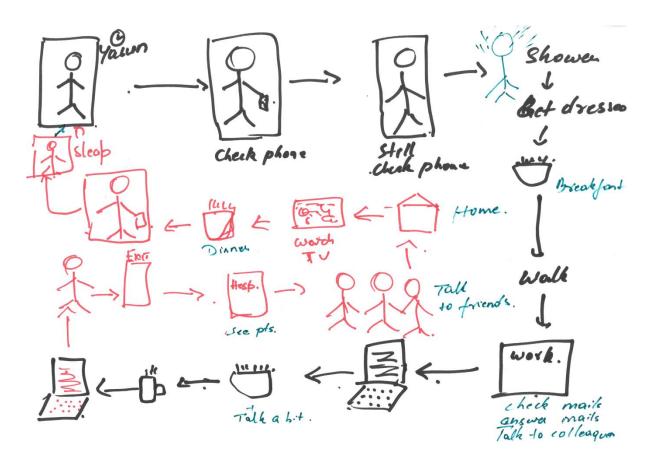


Figure 2, Participant D's Cognitive Map

Cognitive maps are designed to reveal more about a user's experience than simply questioning them and getting answers. They can show us how the PGRs use the library in their day to day lives,



but also how they interact with other areas – at home, with friends, at other places within the university. Cognitive maps are effective because they reveal information about the participant that they may not have mentioned in conversation. We asked our participants to draw a 'Day in the Life as a PGR'. The map, however, is just a starting point. Follow up interviews were conducted to delve deeper in to what the map represents, which raises new questions and conversations in response.

Our participants had six minutes to draw their maps, changing the colour of their pen every two minutes. Changing colours tells us the order in which the participant draws, which in turn tells us their first, second and third thoughts. For example, in participant D's cognitive map (Fig. 2), 'work' is represented by his laptop. He then moves on to the rest of his day, without developing what 'work' entails. However, the change to the green pen shows us that he develops what 'work' means to him. Participant D said in the discussion afterwards that 'work' is done on his desktop whereas 'study' is done on his laptop (study meaning his PhD research).

Workshop Task 4: Touchstone Tours

The last activity from the workshop was the touchstone tours. A touchstone tour is when a user, in our case a PGR, gives a member of staff a tour of the library as if they were a new researcher at the University. These types of tours revealed what the priorities of the researchers were and what resources they knew existed. We conducted three tours, giving the PGRs thirty minutes each to tour the whole Main Library. We gave them complete freedom with the tours, including where they started and ended.

Findings and Recommendations

Intranet and the Digital Library

The university's intranet posed a problem to the researchers in the study in three distinct ways. Firstly, the intranet has a staff and student split – users are asked to log in as one or the other, and it dictates the material they can access on the intranet. The PGRs that were in the workshop were a combination of the two profiles and needed access to pages from each side of the intranet. This was an issue across the workshop and the Research Reserve Engagement study. Participant 1 said:

Sometimes I can't find things... whenever I try to get to some bits of the intranet it doesn't open... I don't understand why I don't have access this content.

The intranet's staff and student split does not take in to account the diverse needs of research students. Further to this, the IT Department are introducing a new Service Desk, which will be 'personalised' – starting with the binary categories of staff and student. This will cause significant issues; for example, when requesting hardware or software – this will be done through the new Service Desk. Participant D mentioned that his research team all requested laptops through IT services – under the new system, PGRs within the 'student' bracket wouldn't be able to perform these requests. This question of researcher identity and categorisation was also raised by participant F:

The website and intranet are not useable at all. I go out of the website to Google and then search and go back in. Also on the intranet stuff is divided between information for staff and information for students – and which one are we?

This quotation also highlights the second issue; that the search function does not bring up the correct pages. Participant B stated that "the search function is pants" as she typed in the exact name of a course, and did not get any results - she was sure that this page existed. All of the participants agreed that the search function was ineffective and that the intranet was not user friendly.

Clutter is the third issue with the intranet – there is a great deal of material on the website, not just in library services but across the whole platform. Participant D highlighted a specific issue with a Research Skills page, which is discussed in the 'Research Skills' section of this report, that regarded the placement of information. It is known that users are navigating the intranet by using Google, but an important consequence of this is that they can arrive on a page within a landing page – at this point, they are not able to work their way backwards to the main landing page of the section, where key information is often presented.

Recommendations

Due the failure of the search function (within the intranet) to return results, PGRs often use Google to look for services. This means that users are not following the menu path as planned by Library Services, and can appear at a page within the web without the ability to return to a higher level page (e.g. the Research Skills landing page).

Looping links would go some way to solving the accessibility problem with the intranet. A looping link essentially allows a user who arrives on a page to find their way back to the main landing page for the section. This is a simple change, but it would make the intranet far more user friendly. Kim-Wu and Lanclos (2011) have noted that "digital spaces such as library websites are operational spaces where information has been organised according to

principles that are likely to be unfamiliar with non-expert users." The looping links and cross-referencing seeks to rectify this for the 'non-expert' user.

Currently, the intranet is extremely cluttered, as participant A noted in the pin board discussions. Information should be streamlined further, or deemed necessary, the key change that needs to be made, then, is usability. If the information is easier to navigate, the amount of information becomes less of an issue.

Stress

A postgraduate researcher faces a lot of stress during their time in university, which is unsurprising as they often have to balance many different roles. Participant D, for example, said that he spend half of his day studying for his PhD, and the other half of his day in the hospital practising his clinical skills. Similarly, participant B volunteers her time doing physio to keep her clinical skills up. Participant E said that she needed to work part time teaching language lessons, as she is self-funding her PhD. All of these participants have multiple roles to fulfil as part of their research, or to contribute towards it. However, there was variety amongst the study group. Participants A, C and F did not have to work alongside their PhD, aside from infrequent teaching.

Whilst the group had different responsibilities, stress regarding time management and a lack of time featured heavily; during the pin voting session, the votes were split evenly between 'pace of study' and 'lack of time' as the main source of worry. Most of the participants reported that time management was an issue, as they take on work and do not always understand how long this work will take.

There was certainly a difference between international and EU students' work-life balance.. The 'Day in Your Life as a PGR' cognitive mapping activity was particularly revealing in this respect, as it demonstrated the time that the PGRs spent doing different activities. Participant D, for example, only had a small section of his map that was dedicated to something other than work (which was going on his phone). When asked about socialising, he said that he went for drinks with his friends once a month or so. He also said that in India, there was no such thing as an eight hour day – "only a 17 hour or 36 hour day". The cultural impact on work-life balance was also observed in participant F – she said that she would always prioritise meeting friends over her PhD work. Participant F is from Sweden, and she stated that she would not work over 36 hours in a week, in order to be able to have a good work-life balance.

Another area of stress that came up within the study was crime. Both participants C and E mentioned fear of crime – participant C said:

I felt worried before I came as I was at Durham before in a tiny village where nothing ever happened and it was very safe, and then I was coming to Birmingham and read things and felt a little worried, so I decided to live close to campus. I do feel safe on campus.

This worry dictated the participants working habits – she does not carry around her laptop, and prefers to work on the PCs in the Researcher's Suite, as she has heard about the muggings in Selly Oak. Participant E does not work late in to the evenings because she does not want to walk home (close to the city centre) in the dark. Participant C lived near the University South Gate in order to avoid Selly Oak, which means that their accommodation is expensive. It should be noted that worry about crime was probed within the cognitive mapping discussions, and therefore may not have been mentioned naturally by the participants. Essentially, stress stems from two main areas for PGRs – their work-life balance and their time management, as well as local crime.

Lack of Awareness of Library Services

An unfortunate theme that emerged from the workshop was a general lack of awareness amongst the participants. During the touchstone tours especially, the gaps in library knowledge of the PGRs was apparent. Participants did not know about the Research Reserve or the Cadbury Research Library. This could possibly be attributed to their disciplines – medicine, language and linguistics, and international development. It would be a great deal more concerning to see a history or literature student have this knowledge gap. However, it would be ideal for all PGRs to know about the resources on offer to them within Library Services.

Basic information, such as how long term loans worked and the opening hours of the library, were unknown to participant F. Moreover, despite using the Researcher's Suite, she could not remember if it was on the second or the third floor (it is on the first floor). Participant A did not know how to book a PC, and none of the participants during the touchstone tours knew what the UBWell Area was, despite two of them walking through it on their tour. This lack of awareness can be attributed to the fact that all bar one of the participants had an office on campus where they were based. This lack of physical engagement with the library as a space may mean that this vital information is not being conveyed to PGRs.

Recommendations

¹ Cadbury Research Library https://intranet.birmingham.ac.uk/as/specialcollections/index.aspx
Research Reserve https://intranet.birmingham.ac.uk/as/specialcollections/index.aspx
https://intranet.birmingham.ac.uk/as/libraryservices/library/libraries-and-opening-hours/libraries/mainlibrary/research-reserve.aspx

A possible way to combat this lack of knowledge is to make further appearances within induction events. The PREs report of 2017 did highlight that amongst some Colleges; there was a need for further exposure – especially within Engineering and Physical Sciences and the Medical and Dental school (UGS, 2017). Engineering and Physical Sciences wanted a better advertising of the library services, whilst the Medical school wanted their 'support mechanisms' to be sign posted better – one of which is library services. This finding of the PREs report does correlate to our findings from the workshop; therefore pursuing a more targeted broadcasting of our services to these colleges would be very useful.

This report proposes that a PGR Library Handbook would be beneficial to highlight the essential information for PGRs. There is already a pre-existing leaflet page from the Research Skills team, which does contain a lot of useful information. However, it could be developed across two pages to contain some more basic information. Currently, the leaflet contains information about the PGR Focal points mentioned in this report. However, the more basic information such as opening times and loan periods are not included. Whilst this may seem too basic to include, the lack of knowledge demonstrated within the workshop does indicate that this is needed. For researchers that have not studied or researched at Birmingham previously may feel out of their depth, and that they as if they should know these things. This 'knowing by doing attitude' had been observed by Bury (2011) – PGRs don't ask about the basics because they feel it is something they should just know. Making the back page of the Research Support leaflet an 'Introduction to the Library' section containing this information would give the PGRs the information they need, without them needing to ask simple questions.

Colleagues in the Office as a 'Source of Truth'

The importance of offices to the participants was very clear – it not only acted as a study space, but also a space to socialise with other PGRs or academics. Participant B noted that her office allowed her the flexibility to simply ask the people around her about her work, but also about menial things – such as what to wear to an APR. Participant B explained that she does not want to bother her supervisor with these kinds of issues, and most of the other participants agreed. Participant A was the only exception, saying that he felt comfortable enough with his supervisor to ask these things. There was an unexpected result from the pin board discussions – five of the PGRs said that other PGRs were their 'Source of Truth' whilst only one chose their supervisor. This directly contradicted the findings of George et al. (2006), who found that the supervisor was the key point of contact for PGRs. Our workshop demonstrated that there was not a reliance on the supervisor as a source of truth for most of our participants – the offices that many PGRs are given facilitate useful friendships amongst other PGRs and colleagues that have done a PhD.

The participants noted that the office's lack light – participant B noted that their team had a plant, which did not stay alive for very long. They did appreciate the Researcher's Suite as a change of environment from their offices, as it provided a contrast. For those who studied in the Researcher's Suite, they commented on the benefits of the silent space, the beautiful view and the light in the room. Participant A said he often came to the Researcher's Suite to give himself new ideas and to admire the Green Heart. For the one participant who did not have an office, the key issue was that she needed a stable desktop for her work, and coming in to the Researcher's Suite very early was the only way she could secure a computer.

Recommendations

There are two main recommendations to be drawn from these findings. Firstly, it is apparent that supervisors are not the only, or even the most popular, source of truth for researchers. Library Services has been keen to get supervisors to signpost our services, but this suggests that this may not be the most effective way to communicate with PGRs. This workshop has found that supervisors are seen as authorities in their field of study, but not on how to be a PGR. Therefore, the information that PGRs need should not just be communicated via supervisors. This makes the usability of the intranet even more important for PGRs – there is a reliance on the digital library to provide the essential information for PGRs.

Westmere PGR Hub

Westmere received a great deal of praise from the participants in the study.² They enjoyed the inductions at the start of their courses, with participant E stating that she met her friends there, as well as that she would be going back to the next one to make more friends. Everyone agreed that Westmere was a good source of support and friendship. However, the physical distance from the main campus was an issue for many participants. Participants B, C, D and F made the point that Westmere is too far from where they are based. Participant C, who previously stated how important having her own desk is to her, said she would not be using the Westmere desk she will get in her second year, as it was too far.

The physical distance of Westmere cannot be changed, but the continued use of Facebook events could increase engagement. Participant D highlighted that the events being advertised online made him more likely to attend, as he could see who is interested and attending. Westmere is a valuable social and learning space for researchers, but the physical distance is hindering use. Continuing to utilise online media such as Facebook groups and events should help to bridge this gap and increase engagement.

² Westmere

Support from the Library

Library staffs were praised across the whole study, both in the workshop and in the Research Reserve Engagement study, for their helpfulness, knowledge and kindness – especially within the love letters exercise:

I wanted to tell you how much it means to know that you are always there for me, should I need you. (Participant B)

Finally, I would like to say that I feel like if I have any questions, you are always there to help me. Every time I did ask someone at the front desk you responded quickly and very nicely which makes me want to return to you and also telling other students how great you are.(Participant F)

Whilst UX is geared towards finding ways to improve services, it does also afford the opportunity to reflect on what works very well. Clearly, researchers are pleased with the human element of the library and the dedication library staff on show.

PGR Focal Points beyond the Workshop

Whilst designing this study, library staff highlighted specific areas of the PGR experience that they wanted to be investigated, that may not have been covered by the participant-led, holistic nature of our study. As these areas should form a significant part of the PGRs experience with the library, we undertook smaller, self-contained studies to further understand how PGRs are interacting with our services. The studies below detail PGR interaction with the Researcher's Suite, the Research Reserve and the Research Skills Team. They also contain findings from the workshop that were pertinent to these areas.

Researcher's Suite

In order to better understand the utilisation of work spaces in the library for PGRs, we decided to observe the use of the Research Suite. The Researchers' Suite is a dedicated study space for PGRs, consisting of a Silent Study area and a more social area.



Figure 3, the Researchers' Suite

This brief, 2 hour study sought to update our understanding of how researchers are using the space. There is already a great deal of feedback from the Research Suite, as displayed on a board in the suite itself (see Fig. 3). Some positives that were highlighted were the large desks, the tea point area and the amount of light in the room – a feature that was also

addressed in last year's report by Luke Hilton (2018, p. 24). The Research Suite has undergone an observation previously; as a result changes were made to the furnishings.

The observation study consisted of 2, 1 hour sessions: the first at 11am to noon and the second at 2:30pm to 3:30pm. These times were chosen because it was assumed they would be the most active times of the day. We started with a blank map of the Researcher's Suite which also featured the furniture and from there we developed our key. Pink circles indicate researchers that were present and sat at the start of observation, whilst pink lines indicate their movement. Yellow circles indicate new arrivals and where they chose to sit, with the yellow lines indicating their movement. Blue circles are where we sat at various points in the study.



Figure 4, Heat Map of Session 1, 11:00am-12:00pm

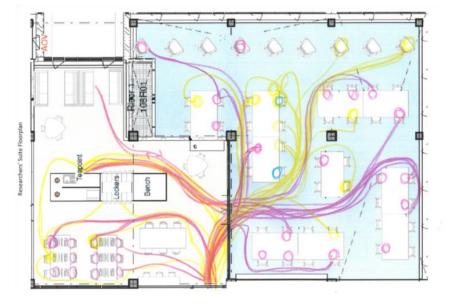


Figure 5, Heat Map of Session 2, 2:30-3:30pm

Observation Findings and Recommendations

Social Space

The first session saw heavy use of the computer cluster, with only one computer free during the whole study. In the second session, this was also the case – only one computer was ever free at one time. Other than the computer cluster, the first room was only used to access lockers and the tea point. No one in either study sat on the tables to the left by the entrance. The social tables, with three chairs each, were only sat at in the 11am session by one researcher, to eat their lunch. The sofa section, in the far left corner of the social space, was used only once during both sessions, by two researchers who whispered a conversation - this was barely audible. A sign was displayed on the nearest three-seater table, saying "Quiet Area: Please respect others and keep noise to a minimum."



Figure 6, 'Quiet Area' sign in the Researchers' Suite

It is not entirely clear to researchers if this space is social, or purely for work. I did inform the two researchers conversing that they were allowed to talk, but they did not know that this was the case. Initially, they thought I was there to tell them to stop talking. They were utilising the sofas to be social, but felt pressured by the silence in the rest of the room. Having the computers, the most popular area, situated in the social space may be contributing to this. In the silent study space, in the later session, two sets of researchers were having audible conversations. It seemed rather strange that the intended 'social' space was quieter than the silent study space.

Another area which was not being used was the bench, beside the lockers. Throughout both observation periods, no one sat or placed anything on it. I sat on it briefly; it was not very comfortable, I could see why it wasn't being used. The bench takes up a lot of space, which could be used for more desks.

Silent Study Area

Seeing as the computer clusters is so popular, they could be introduced in to the silent study space as well. In both sessions, the high backed chairs were only ever at a maximum half full, with 4/9 chairs in use. Reducing the amount of chairs, perhaps to the far left of the row, and replacing them with computers could make better use of the space. At an estimate, eight more computers could be added. I observed a researcher using the computer in the social space and noticed she had a laptop bag as well. I asked why she preferred the computer; she said that the computer monitor helped her maintain better posture – another researcher overheard this and agreed.

A lot of people had books spread out across the whole table, which is in line with the feedback that the researchers appreciated the bigger desks. This is also probably why researchers were not using the desks immediately on the left, as they were not as big.

Workshop Feedback

During the workshop, the Researcher's Suite was highly used by participant C, who did not have a campus office. Participant D, however, had not heard about it; on his touchstone tour he did not take the 'new researcher' to the Researcher's Suite. The other participants used the Researcher's Suite on occasion – they all had an office on campus apart from participant C. Participant A wrote in his love letter:

The postgraduate research suite is also amazing, I occasionally come to work there when I need a new idea which often comes from a change in working environment.

He also said in earlier discussions that the view of the Green Heart is relaxing for him, as he can people watch. Similarly, participants C and E praised the space:

I am very glad and grateful that you provide a nice research suite for me where I can study peacefully and feel like at home. Also, I have met a lot of nice researchers there and some of them become my good friends. I am really appreciated. (C)

What impressed me most at the beginning is the researcher suite, with some big French windows showing the most amazing views of the campus. Oh! And those comfortable sofas, perfectly amazing for taking a rest. Those (just two, honestly) sweet dreams on that sofa is kind of the best. (E)

Participant C's letter shows that she values the space as a social one as well as one to study in, as she has met people there who later became her friends. Participant E also sees the room as a relaxation space as well as a study space, having taken a nap there before.

Others in the group, however, value the Suite as purely a study space. Participant F

Research Suite Suggestions

- The tables immediately by the entrance could have the walls removed to make them appear more like a collaborative workspace, rather than individual stations, if the intention is to continue the use of the space as a social one.
- Perhaps having clearer signage about what the spaces are to be used for should be introduced; there is no sign saying that the first room is a social space, yet half of it is laid out as such. In addition, the silent study area only has one small sign, which apparently a few researchers did not notice. There was an obvious want for a social space: three sets of researchers had conversations, whispering, across the two hours. Clearer separation between the Silent Study area and the social space is needed.
- The sofa section is not being used by many to increase its appearance as a place to relax and talk, we could add a few cushions to make it seem more social.
- A divider wall could be added between the computer cluster in the social space and the sofa/kitchen area. This could be a good pilot method, to see if the space is utilised more when there is a barrier between the two areas. Researchers may be more likely to talk in there, without fearing that they will disturb those working on the PCs.
- Alternatively, more PCs could be introduced in the Silent Study area, so those
 who want silence can work in there. This would be a more expensive measure
 than the temporary divider wall, so if the wall is effective this may be a good next
 step.

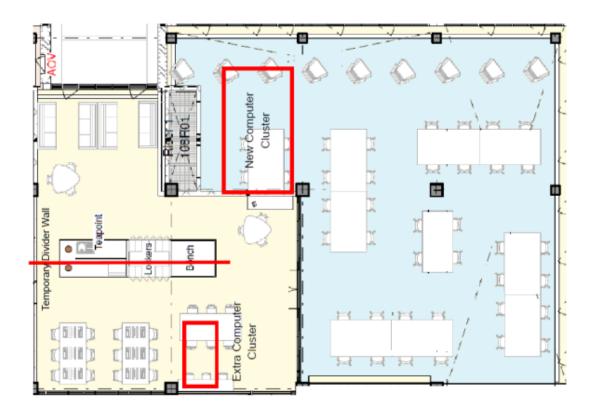


Figure 7, Researcher's Suite Changes

The suggestions above are targeted at utilising the first room as a social area. However, if most students respond negatively to some of the pilot changes above, it may be time to reconsider the intended function of the room. If the researcher's want more PCs and large desks and the Research Suite as a whole to be silent, we should try to adapt to suit their needs. After all, as Lanclos (2016) argues, students as consumers should be co-creators of their study space. At the moment, there is still evidence that researchers want some kind of social space within the suite, from the whispered conversations, so a final push towards creating this space is recommended.

The Research Reserve

The Browsing Access service was one particular area that staff wanted to be investigated, so I did a mini-study with two participants.³ They were both users of the requests service prior to this study; it would be useful to conduct a similar study again, but with more varied participants, such as non-users. The study involved preliminary and debriefing interviews, with an observational session in the Research Reserve in between. The participants were asked to find some research material in the Research Reserve.

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³ For more detail about this study, please refer to the 'Research Reserve Engagement Report'.

Both of the participants were very positive about the member of staff who inducted them. Participant 1 said: "Definitely I was well received, and there was very courteous - but beyond courtesy they were also very knowledgeable about what they were doing, so if I am supposed to give a rating that's a top rating." They also linked the excellent service in the physical Research Reserve to the fetching service – "I have also seen (this) in terms of research reserve requests - I think I was contacted personally two times when something was difficult to locate and I think the person who contacted me let me know we are looking for it, we will contact you as soon as we locate it.". Participant 2 was also quick to point out the impact that "an experienced person" leading the induction has: "the fact that she remembers every bit that is important that contributes to the final good understanding of how to use the Research Reserve."

In terms of finding specific literature, participant 1 noted that "the person conducting the orientation was absolutely listening to what I was saying" and enabled her to find material she wouldn't have found otherwise – in this case, it was the wealth of French DVDs. In the observation of participant 2's induction, the member of staff continually referred to a printed map of the space, so that the participant understood where they were at any given time. The length of the orientation was mentioned by participant 2, he commented that the induction was quite long, but added that he "didn't think that it was it was so long that (he) got bored or anything or uncomfortable or something."

It was also noted that the filing system based on size and type of material "made sense" to the participants. It was previously assumed that the fact that the material was not organised by theme or topic would be an impediment for browsers. However, the study has shown that this really isn't an issue – the researchers have a specific area that they are using, and are directed there in the induction by library staff. Participant 2 said that the process was pretty straightforward – "I think it's just a matter of getting used to it… and they describe to me how it works so it's not really hard or anything it's just follow the procedure and find the place."

The observation and interview sessions highlighted significant positives of Browsing Access:

- Inductions by very knowledgeable staff members who targeted the research needs of the participant.
- Navigation of the material was not as difficult for researchers as initially thought.

However, some areas that could be improved were also identified:

- Publicity of the Browsing Access service.
- Length of the induction and tour to suit the researcher's needs.

Workshop Findings

Unfortunately, there was not a great deal of information gathered from the workshop about the Research Reserve, as most of the participants did not know what it was or its purpose. During the pin board discussions when presented with a picture of the Research Reserve, participant A asked what it was —no one else knew what it was ('Research Reserve' was written underneath the photo as well). Eventually, participant E remembered that they had requested a book from the Research Reserve, but she did not understand its role or purpose. Participant A queried what the Allport Room was; he had gone downstairs to try and find a study space, to be told that he could not study in the Allport Room, yet he still did not know what it was. The touchstone tours were another activity in which the Research Reserve did not feature heavily. Participant D's tour did not mention or walk near the Research Reserve and participant F stood directly in front of it without mentioning it.

During the debriefing for the touchstone tours, participant D showed some confusion about the difference between the Research Reserve and the Researcher's Suite – he had never heard of either of them this morning, and did not retain the information we had given him earlier in the day. Amongst the workshop participants there was hardly any understanding about the Research Reserve.

Key Findings and Recommendations

The observational study and workshop have revealed some elements of the Research Reserve and Browsing Access which could be developed:

- Participants 1 and 2 did not know about the existence of the Browsing Service prior to their invitation to participate in the study. Advertising the service more effectively would certainly increase physical engagement. For example:
 - Rebranding of the name of the service, from Browsing Access to perhaps: Browselt or Access @ the RR.
 - Moving the Browsing Access tab on the Research Reserve's Intranet page from the bottom, to further up above 'Allport Room facilities'. Alternatively, Browsing Access can be linked on the 'Services' tab within the Library intranet page.
 - The lobby space outside of the Allport Room could be used to advertise Browsing Access to those who are consulting in the Allport Room. Maps could also be displayed there so researchers can see what is in the Research Reserve.
 - Targeted mentions of the Browsing Service at inductions in departments.

- Hosting specific department inductions in the Research Reserve; department orientated inductions could increase engagement, as has been the case with the Music Department
- 2. Targeting the orientation to the researcher's area of interest from earlier in the induction to Browsing Access.
- 3. Signposting the Research Reserve and it's services more visibly online and physically. Currently, the 'Research Reserve' signage on the gold panelling of the lift is too discrete perhaps placing a background to the lettering would increase the contrast and the visibility of the writing. In the lobby outside the Research Reserve and Allport room, more general information about the Research Reserve and what it does would inform students and researchers about its function and purpose. The Learning Academic Engagement team could increase awareness within key departments of the Research Reserve and Browsing Access.

These recommendations have been made with the intention of increasing engagement with Browsing Access and the Research Reserve by making the Research Reserve more user friendly; however this calls in to question the intended purpose of the Reserve: either as a store, or as a browse able section of the library, or as a fusion of the two. This report has made every effort to suggest ways for both functions to coexist – measures that aid usability but do not interfere with the work of the Stock and Circulation Team. However, it is not entirely clear why there is a drive towards physical engagement when the use of the requests service is so seamless and effective. The way that the Research Reserves' content is integrated within FindIt is clear and the feedback about waiting times is largely positive. If increasing physical engagement is still desired, the above recommendations should help with this.

Research Skills

The Research Skills team provide training for PGRs on a variety of topics, from 'Raising Your Research Profile' to the 'Summer Writing School'. Utilising this service would improve the experience for PGRs, as they can increase the quality of their research. The workshop revealed that most participants had engaged with the Research Skills team; the pin voting showed that 4/5 participants attended a Research Ethics, Research Data Management *and*

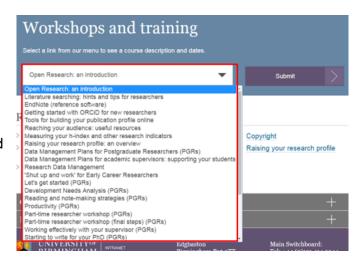


Figure 8, Research Skills Drop down List

EndNote training session. However, access to the workshops could be improved. Participant D specifically said during the pin voting discussion that he had not seen the Copyright course in the drop down menu, because if he had he would have attended.

Research Data Management (RDM) was a popular course for the participants, with four out of six attending. However, participant C said that by the time she was advised to attend a RDM session, the session had already passed so she could not get the training. Participant C could not get on to the June training – she started her PhD in January and had only just missed the date. Participant B and F also agreed that more RDM sessions were needed throughout the year, as the stages of research vary greatly between PhDs and depends on the start date of their research. A gap in the training offered was identified by participant C in her love letter:

As a new researcher, I don't have enough statistical background. As you know such background is really vital for a PhD researcher. If it is possible, could you please try your best to provide more statistical training for the researchers?

As the love letters were read after the workshop, due to time constraints, we were not able to enquire about the nature of this desired statistical training. Participant E also wanted more training available on computer programmes:

I must admit that I sometimes miss the opportunity to actually learn more about programmes, such as SPSS, R or SAS. Maybe this is something we could work on together in the future.

Another area where training could be developed is in relation to the Annual Progress Review. A large proportion of the discussion about training revolved around this issue. It has been understood that the APR takes place in order to judge the quality of the research that has taken place so far in a PhD and to make sure that researchers are on track with their research goals. The participants had very different levels of support from their departments about the APR. Participant D had little to no guidance about the format and purpose of his APR, which was coming up. He said that he learned more about it during our workshop, through the other PGRs, than from his supervisor or department. There were also ambiguities about the APR from the other participants in the medical school – participants B and F. Participant B had already completed hers, so was a source of information to the group. The other participants felt that they were able to discuss 'silly' questions to PGRs, but not to their supervisors; questions regarding what to wear, tone and so on. Participant A said that he felt like he was able to ask his supervisor questions like this, whereas others did not.

Participant D wanted more support and guidance throughout the process, whereas participant F retorted that as researchers, they should work these things out for themselves.

This again highlights an issue that was discussed previously; the difference in ability to adjust to UK Higher Education compared to home universities for international students. Participant D, being from India, was used to more structured and guided research. Participants F was from Denmark and was also used to more guidance, yet thought that it was her responsibility to seek out information. Some schools have made efforts to educate their researchers about the APR; participant A said that College of Social Sciences had created a Canvas course for them which he felt was very good. In sum, the APR was a predominant area of unease for the participants and they would benefit from further training and knowledge.

The workshop identified that there was a lot of confusion about where training was coming from. Even in the earlier Research Reserve Engagement study, where guestions about the PGR study were trialled, this confusion was observed. When asked if they had engaged with the Research Skills team, they said that they had not. However, they later remembered receiving training from a specific member of staff, who was in fact a member of the Research Skills team. As this training took place in Westmere, participant 1 was confused as to which body provided it. Similarly, participant F attended some writing training at the medical school, but couldn't tell who was providing the training. As individual schools have their own research skills groups, such as the 'Research and Knowledge Team' in Medical and Dental Sciences, or the Academic Writing Advisory Service in the College of Arts and Law, there is another layer of confusion for researchers – training could be coming from the Library, Westmere, or their College. Arguably, it may not matter that researchers do not know who provides the training, as they are still receiving the training. However, if they found the training useful, they may want to attend more sessions and without understanding who provided these sessions they cannot find them. Moreover, when it comes to evaluations such as the PREs reports, it is important that students know who delivered their training so future feedback becomes more visible for those who delivered it. Increasing visibility and exposure is certainly a priority.

Whilst improvements can be made in light of the evidence from the workshop, there was also a great deal of praise for the Research Skills team; most notably in the love letters:

I actually did not expect that you would support me in the various IT programmes, such as EndNote, which I need for my research...Through your support I not only learned working with certain IT programmes but also to successfully communicate with my supervisors... During the activities/seminars, I also had the opportunity to

meet other PGRs which makes you not only a friendly and supportive space but also another hub where I can meet other PGRs.

Participant F was particularly passionate about Research Skills, illustrated above. However, the first line does indicate further the exposure issue; she "did not expect" support in IT programmes. Overall, however, her experience was overwhelmingly positive. In the touchstone tours, participant F spent a lot of time talking about the training suite and the training that she had received. Participant D also factored the training suite in to his tour. Perhaps this was due to the fact that the Training Suite was where we were based for the day, in participant D's case this seems likely as he was pressed for time. Participant F however genuinely seemed to want to talk about Research Skills; this was also reflected in the pin voting discussion earlier. The social benefit of the training was highlighted by all of those in the workshop who had attended training. Participant D said that the courses were important to hear from other PGRs as well as the person leading the session. This was also brought up in the pin voting discussion in relation to the inductions in departments – PGRs view these interactions as opportunities to make friends outside of their houses or Westmere.

Key Findings and Recommendations

Exposure and visibility is the most notable improvement that can be made in Research Skills. One specific example highlighted previously was that users cannot see the full range of workshops on offer due to the drop down menu's layout. On the Research support homepage, the 'Workshops and training' blue box is very well placed, however there are so many courses in the drop down list that PGRs do not read them all. Using the same space on the Research support homepage, a link could be provided to a page which has a list of the courses, with a 'Tick Box' option next to the course title and brief description (suggested layout pictured below).

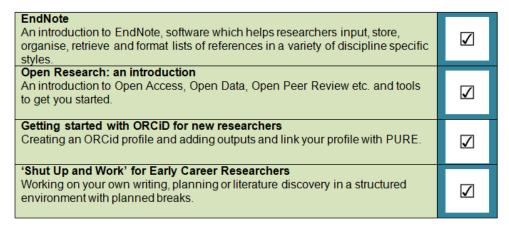
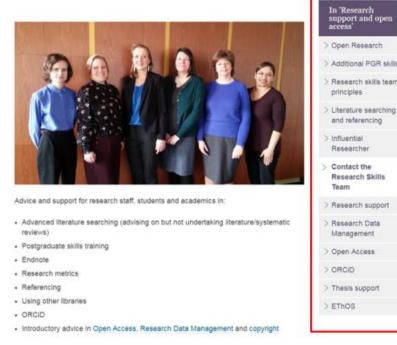


Figure 9, Tick Box Research Skills Workshop List

Further to this, we now understand that library users use a combination of google and the intranet to get results, so if a user searched 'Research Skills UoB' they are taken directly to 'Meet the Research Skills Team' rather than the Research support homepage. Placing a link to the 'Workshops and Training' section in the task bar to the right will make booking a session a lot more accessible. This is just one example of the need to provide looping links links that take users backwards to the landing page as well as to other sections below the landing page. Whilst the landing page, in this example 'Research Support and Open Access', is accessible through the navigation bar, it could be more user friendly to make the purple bar a link back to the landing page as well.

Figure 10, 'Meet the Research Skills Team' Navigation Bar



principles

and referencing

Research Skills

Management

Researcher

The other area where improvements could be made is in the frequency and expansion of courses. As previously noted, participants would appreciate more opportunities to have training in Research Data Management. RDM training four times a year was generally agreed upon within the group as the most suitable amount of sessions, as it should cover new PGR intakes throughout the year. Participants C and E wanted more statistical and software training, perhaps in the long term research skills could eventually provide these sessions, but in the meantime it could be possible to highlight on the Research Skills intranet page other avenues to get training in statistics and specific programmes.

One course that everyone in the workshop would have liked to see is an Annual Progress Review session. As there is such differentiation between departments, guidance about the APR may be suited to a centralised training session within Research Skills. This would be a large undertaking, so if it is not possible to hold these sessions – that from the response in the workshop would be very popular – perhaps a Canvas course could be introduced instead. As the College of Social Sciences already has one, it could be used as a model.

Challenges of Ethnography

Whilst the study has revealed a great deal about PGR experience, there were a few challenges that we faced. Due to the nature of running a workshop with multiple participants at a time, it was not possible to record and then transcribe the discussions about the pin boards and the cognitive mapping sessions. Instead, for the pin voting we had three members of the team making notes, whilst one questioned and guided the discussion. In the cognitive mapping sessions, when divided in to two groups of three, each group had a note taker and a discussion leader. The information that we collected was slightly abstracted, yet the essence was still the same and the lack of a recorder did mean that discussion flowed more freely in the more relaxed environment. Moreover, we did get more varied data, as each group's conversation went in different directions. Another issue that we faced in the workshop was the domination of discussions by a few participants; mainly participants B, D and F. As these participants were all based in the medical school, the data does lean towards these disciplines. The separation in to two groups was very effective during the cognitive mapping discussion, so this could be emulated in further studies that involve group work.

Recruitment is almost always difficult for library studies, especially during the summer months when researchers are on leave or are simply not on campus. As Hilton (2018, p. 25) has noted previously, recruitment for a similar study on PGT students was very difficult due to the nature of the research. It was far more in depth and over a period of 10 days. This year's study was shorter, taking place over a four hour period. However, we also faced recruitment difficulties. We initially had ten participants, with a distance learner offering to email us answers for the love letter/break up letter. However, only six turned up on the day and the distance learner has dropped out of the study. The participants that did come were very forthcoming with their opinions for the most part, which gave us useable data.

In the Research Reserve Engagement study, however, participant 2 did not engage with the activities well – he had very short answers and was needed to be probed with leading questions, rather than guiding his own responses. As has been noted, the findings were user driven, which meant that this participant's attitude did not correlate with those of the other participants. In future research, a face to face with participants prior to the workshop days would be useful to find ideal participants.

As this study involved processing qualitative data from participants, the Ethics Committee had to give the project approval. This was a very long process of backwards and forwards tying up phrasing within the participant's documents, ensuring participant's data would be anonymised, among other things. This was an issue also presented in Hilton's (2018, p. 10). Whilst we had learned from the previous year that more time was needed for ethical approval to be granted, we still underestimated how long this process would take. In future studies, ethical approval should be sought a great deal earlier.

Borg and Reidsma (2016) note that interviews give us information about people's ideas and attitudes, but this does not necessarily correlate to their actions and behaviour; using other data sources will build a more holistic view of the students' experience. Further to this study, quantitative surveys to determine the extent of the themes presented in this report would be useful to enhance the legitimacy of these findings.

Future Research

This study has investigated PGRs experience at the University of Birmingham using ethnographic methods. Whilst this research project has been successful, it can be developed in many different ways. The biggest area for further investigation is the intranet – a study in to the use of the digital library, and perhaps the intranet as a whole, would illuminate how many different groups utilise the intranet. A cyberethnographic study involving the use of programmes such as HotJar or Google Analytics could indicate ways to adapt the intranet, or suggest an alternative, to make it more user friendly. From 2020, internet pages from public sector bodies, including UK Higher Education institutions, must be completely accessible for users with disabilities – known as the Web Accessibility Directive. Future research could centre on how effective the intranet's webpages meet this standard for disabled students and staff.

Conclusions and Recommendations

This report has investigated the experience of PGRs at the University of Birmingham, in order to fully understand their needs and to then generate appropriate service changes. After conducting a workshop and a smaller scale Research Reserve Browsing Access study, some conclusions became apparent:

 The Intranet is not user friendly; the search function does not work, the staff/student split does not work for researchers, and links are not fully developed which makes it hard to navigate.

- The experience of a PhD varies among PGRs some researchers face immense stress due to time management issues or money worries, whilst others clearly separate their home and work lives.
- PGRs do not always have all the basic information they need about the library, as they may not have studied at the university previously.
- Having an office on campus increases the reliance of PGRs on the intranet for library information.
- The office environment gives PGRs a social hub as well as a source of knowledge about their subject and life as a PGR.
- Westmere is an effective social and academic hub, but its distance from campus means that its social media presence needs to be maintained to draw PGRs in.
- The library provides an excellent human facing service. The friendliness and helpfulness of staff was agreed by all participants.

These broader conclusions draw from the study emerged organically from the activities. Therefore they directly reflect the concerns of the participants. We did want to investigate specific areas of library services – the PGR Focal Points: the Research Reserve, Research Skills and the Researcher's Suite. From these investigations, the following conclusions were drawn:

- Browsing Access is an effective service, but it needs to be broadcast more widely and the space outside of the Allport Room needs to be used to display relevant information.
- The Research Reserve has an 'invisible' quality to researchers it is a seamless part of the FindIt system to request a book, so its purpose and its location is not a concern for the researchers.
- Research Skills workshops and courses are very good sources of information for PGRs, but they do not always know that Research Skills are providing the training.
- Research Skills Intranet pages can be made clearer and more useable with subtle changes.
- PGRs have a lack of guidance surrounding the APR and GRS forms.
- The Researcher's Suite's separate room's purposes aren't completely clear and more computers in both areas would benefit users.

The ethnographic methods used in this report have been very effective; they have drawn out useful and more nuanced insights regarding the PGR user group. Whilst we attempted to have a representative participant pool, limitations in recruitment prevented this. Ethnographic methods give the data a great deal of depth, but they do lack the breadth of information

given by quantitative data. This investigation can be used as a springboard to find further data; a quantitative survey based around the findings of this report would be a useful way of triangulating the conclusions and measuring how representative they are of the wider researcher body.

Master List of Recommendations

- Improve the intranet search function and add looping links and crossreferencing to facilitate navigation and discoverability.
- A 'PGR Library Handbook' could be introduced to give PGRs the essential library information that they need. It would be useful for them to be handed out at induction sessions.
- Communication: Realign focus to communicating with the PGRs directly rather than cascading via supervisors
- In the Researchers' Suite, signage needs to be clearer to differentiate between the social and silent study spaces.
- The Research Reserve needs to been signposted more effectively, both physically and digitally. Consideration should be given to the lobby space outside of the Allport Room to be used to advertise Browsing Access and the purpose of the Research Reserve. Hosting specific department inductions for Browsing Access would be a good way to increase engagement. Changing the Research Reserve sign to be larger and more visible would increase users understanding of where it is, and will likely increase engagement.
- Research Skills could change the layout of their workshop list to make it more
 user friendly, to a tick box list. Yet again, looping links would increase the
 usability of the Research Skills intranet pages.
- More RDM courses would be useful for PGRs that start at unorthodox times of the year. A course on the APR and GRS forms would be really useful to give the PGRs more clarity on the subject.

Appendix

Participant Details

Participant	International	EU	Home	Discipline	Study	Gender
					Break	
Α	Yes			International	Yes	M
				Development		
В			Yes	Medical	Yes	F
С	Yes			Languages		F
D	Yes			Medical	No	M
E	Yes			Linguistics	No	F
F		Yes		Medical	No	F
1	Yes			Languages	Yes	F
2		Yes		Engineering	No	М

Pin Board Results

TRAINING

Since starting your course, have you had training on...?

Training	Pins
Research Ethics	4
Literature Searching	1
Research Data Management	4
Copyright	
Writing	2
EndNote	4
ORCiD	
Raising Your Research Profile	

Working with Your Supervisor	2
	1

COMMUNICATION

Which is your preferred form of communicating with the university?

Communication	Pins
Website (Intranet)	1
Email	4
Supervisor	
Social Media	1

WORRY

Since starting your research, what are you most worried about?

Worry	Pins
Lack of emotional support	2
Living Arrangement	
Money	
Pace of study	2
Time	2
Lack of academic support	

SOURCE OF TRUTH

What is your 'source of truth' on how to be a researcher?

Source of Truth	Pins
Supervisor	2
Friends and Non-PGRs	
Westmere (UGS)	
PG Handbook	
Library	
Fellow PGRs	5

RESEARCH MATERIAL

Where is most of your research material located?

Research Material	Pins
Cadbury Research Library	
Research Reserve	
Online Journals and Databases	5
Library Open Shelves	

PLACE

Place	Pins
Westmere	
Lab	
Campus Office	5
Library	1
Home Office	1

Bibliography

Antell, K. and Engel, D. (2006) 'Conduciveness to Scholarship: The Essence of the Academic Library as Place', *College and Research Libraries*, 67(6), pp. 536–60.

Asher, A. and Lanclos, D. (2016) "Ethnographish": The State of the Ethnography in Libraries' Journal of Library User Experience, 1(5) [online]. Access: https://quod.lib.umich.edu/w/weave/12535642.0001.503/--ethnographish-the-state-of-the-ethnography-in-libraries?rgn=main;view=fulltext

Asher, A. and Miller, S. (2011) 'So You Want to do Anthropology in your library? Or a practical guide to ethnographic research in academic libraries' Accessed: http://www.erialproject.org/

B. G. Glaser and A. L. Strauss. (2000) The Discovery of Grounded Theory: Strategies for Qualitative Research. Aldine Transaction (1st ed)

Badke, W. B. (2012) Teaching research process: the faculty role in the development of skilled student researchers. Oxford, UK: Chandos.

Bailin, A. and Grafstein, A. (2002) From Place to Function: Academic Libraries in 2012. Available:

https://www.academia.edu/227771/From Place to Function Academic Libraries in 2012

Black, C. and Roberts, S. (2006) 'Learning the Social Way: Enhancing Learning in a Traditional Setting', *New Review of Academic Librarianship*, 12(2), pp. 83–93.

Boyum, I., & Aabo, S. (2015) 'The information practices of Business PhD students', *New Library World*, 116(3/4), pp. 187-200.

Bryant, J., Matthews, G. and Walton, G. (2009) 'Academic Libraries and Social and Learning Spaces: A Case Study of Loughborough University Library, UK', *Journal of Librarianship and Information Science*, 41(1), pp. 7-18.

Bryant, J., Matthews, G. and Walton, G. (2009) 'Academic libraries and social and learning space: A case study of Loughborough University Library, UK', *Journal of Librarianship and Information Science*, 41(1), pp. 376-86.

Brydon, K., & Fleming, J. (2011) 'The journey around my PhD: Pitfalls, insights and diamonds', *Social Work Education*, 30(8), pp. 995-1011.

Bunzl, M. (2004) 'Boas, Foucault, and the 'Native Anthropologist': Notes toward a Neo-Boasian Anthropology', *American Anthropologist*, 106(3), pp. 435-42.

Bury, S. (2011) 'Faculty attitudes, perceptions and experiences of information literacy: A study across multiple disciplines at York University, Canada', *Journal of Information Literacy*, 5(1), pp. 45-64.

Bussel, H., Hagman, J., & Guder, C. S. (2015) 'Mixin' it up: Using a mixed methods approach to understanding graduate research needs', *Proceedings of the American College & Research Libraries Conference*, pp. 554-565) Available:

http://www.ala.org/acrl/sites/ala.org.acrl/files/content/conferences/confsandpreconfs/2015/Bussell_Hagman_Guder.pdf

Carpenter, J. (2012) 'Researchers of Tomorrow: The research behaviour of generation Y doctoral students', *Information Services and Use*, 3(2), pp. 3-17.

Catalano, A. (2013) 'Patterns of Graduate Students' Information Seeking Behaviour: A Metathesis of the Literature', *Journal of Documentation*, 69(2), pp. 243-274.

Delaney, G., and Bates, J. (2018) 'How Can the University Library Better Meet the Information Needs of Research Students? Experiences from Ulster University', *New Review of Academic Librarianship*, 24(1), pp. 63-89.

Delcore, H.D., Mullooly, J. and Scroggins, M. (2009) 'The Library Study at Fresno State', Institute of Public Anthropology, CA Fresno.

Duke, L. M., and Asher, A. D. (eds.). (2012) *College libraries and student culture: What we now know.* Chicago: American Library Association.

Ellis, C., Adams, T. E. and Bochner, A. P., (2010) 'Autoethnography: An Overview', *Forum Qualitative Sozialforschung/Forum: Qualitative Sozial Research*, 12(1), pp. 345-57.

Fetterman, D. M. (1998) Ethnography: Step by Step. London: Sage.

Fidel, R. (1993) 'Qualitative methods in information retrieval research', *Library and Information Science Research*, 15(3), pp. 219–247.

Fleming-May, R., and Yuro, L. (2009) 'From student to scholar: The academic library and social sciences PhD students' transformation', *Libraries and the Academy*, 9(2), pp. 199-221.

Foster, N. F. and Gibbons, S. (eds.) (2007) *Studying Students: the Undergraduate Research Project at the University of Rochester.* Chicago: Association of College and Research Libraries.

Gaver, B., Dunne, T. and Pacenti, E. (1999) 'Design: Cultural Probes', *Interactions*, 6(1), pp. 21-9.

George, C., Bright, A, Hurlbert, T., Linke, E. C., St Clair, G., & Stein, J. (2006) 'Scholarly use of information: Graduate students' information seeking behaviour', *Information Research*, 11(4), 272.

Given, L., (2006) Qualitative Research in Evidence Based Practice: A Valuable Partnership, *Library High Tech*, 24(3), pp. 376-86.

Green, R., & Macauley, P. (2007) 'Doctoral students' engagement with information: An American Australian perspective', *Libraries and The Academy*, 7(3), pp. 317-332.

Harrington, M. R. (2009) 'Information literacy and research intensive graduate students: Enhancing the role of the research librarians', *Behavioural and Social Sciences Librarian*, 28(4), pp. 179-201.

Housewright, R., Schonfeld, R. C., & Wulfson, K. (2013). Ithaka S+R, Kisc an RLUK: UK Survey of Academics, 2012.

Howitt, D., & Cramer, D. (2011) *Introduction to research methods in psychology*. 3rd edn. Harlow, England: Prentice Hall.

Jubb, M. and MacColl, J. (2011) 'Supporting Research: Libraries, administration, and environments'. Dublin, OH: OCLC Research.

Julien, H., & Duggan, L. (2000) 'A longitudinal analysis of the information needs and uses literature', *Library & Information Science Research*, 22(3), pp. 291–309. http://doi.org/10.1016/S0740-8188(99)00057-2

Kim Wu, S., and Lanclos, D. (2011) 'Re-imagining the user's experience', *Reference Services Review*, 39(3), pp. 369-389.

Law, E. L. C., Roto, V., Hassenzahl, M., Vermeeren, A. P. and Kort, J., (2009) 'Understanding, scoping and defining user experience: A survey in approach' in *Proceedings* of the SIGCHIC Conference on Human Factors in Computing Systems. New York: ACM, pp. 719-28. Liu, G., & Winn, D. (2009) 'Chinese graduate students and the Canadian academic library: A user study at the University of Windsor', Journal of Academic Librarianship, 35(6), pp. 565-573.

Mantai, L. (2017) 'Feeling like a researcher: Experiences of early doctoral students in Australia', *Studies in Higher Education*, 42(4), pp. 636-650.

Marshall, D. and Priestner, A. (2016) Futurelib original concepts document. *Futurelib original concepts document*, pp. 1-47. Accessed:

https://www.repository.cam.ac.uk/handle/1810/263868

Mellon, C. A. (1986) 'Library anxiety: grounded theory and its development', *College & Research Libraries*, 47(2), pp. 160-5.

Mellon, C. A. (1990) *Naturalistic inquiry for library science: Methods and applications for research, evaluation, and teaching.* New York: Greenwood Press.

Mental Health Taskforce to the NHS in England. (2016) 'The Five Year Forward View for Mental Health' Available at: https://www.england.nhs.uk/wp-content/uploads/2016/02/Mental-Health-Taskforce-FYFV-final.pdf#page=10 (Accessed: 08/08/19)

Mewburn, I. (2011) 'Troubling talk: Assembling the PhD candidate', *Studies in Continuing Education*, 33(3), pp. 321-332.

Molesworth, M., Nixon, E., and Scullion, R. (2009) 'Having, being and higher education. The marketization of the university and the transformation of the student in to consumer.' *Teaching in Higher Education*, 14(3), pp. 277-287.

Patterson, A. (2009) 'A needs analysis in information literacy provision research: A case study in UCD', *Journal of Information Literacy*, 3(1), pp. 5-18.

Petch, M., Fraser, K., Rush, N., Cope, A., and Lowe, J. (2016) 'Improving Communication Between Postgraduate Researchers and the University Library: A Case Study at De Montfort University Library and Learning Space', *New Review of Academic Librarianship*, 22(2), pp. 268-281.

Phillips, E. M., & Pugh, D. S. (2000) *How to get a PhD: A handbook for students and their supervisors*. Buckingham, England: Open University Press.

Priestner, A., & Borg, M. (2016) User Experience in Libraries: Applying Ethnography and Human Centred Design. 1st edn. Abingdon: Routledge.

Rempel, H. (2010) 'A longitudinal assessment of graduate student research behaviour and the impact of attending a library literature review workshop', *College and Research Libraries*, 71(6), pp. 532-547.

Rock, P. (2001) 'Symbolic Interactionism and Ethnography' in P. Atkinson, A. Coffey, S. Delamont, J. Lofland and L. Lofland (eds.) *Handbook of Ethnography*. Thousand Oaks, CA: Sage.

Silver, I. D. (2014) 'Outreach activities for librarian liaisons', *Reference & User Services Quarterly*, 54(2), pp. 8-14.

Spezi, V. (2016) 'Is information-seeking behaviour of doctoral students changing?: A review of the literature (2010-2015)', *New Review of Academic Librarianship*, 22(1), pp. 78-106.

University of Birmingham. (2015) 'Making Important Things Happen: Strategic Framework 2015-2020'Available at: https://www.birmingham.ac.uk/strategic-framework/index.aspx (Accessed: 16/07/19)

University of Birmingham. (2019) 'Birmingham 2026' Available at: https://www.birmingham.ac.uk/strategic-framework/Overview/birmingham-2026.aspx (Accessed: 16/07/19)

Vezzosi, M. (2009) 'Doctoral students' information behaviour: An exploratory study at the University of Parma (Italy)', *New Library World*, 110(1/2), pp. 65-80.