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Identifying disability-related barriers to academic employment

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ABSTRACT

This study sought to increase understanding on barriers to securing academic employment met by people with disabilities. Lindsay and Fuentes [2022. "It is Time to Address Ableism in Academia: A Systematic Review of the Experiences and Impact of Ableism among Faculty and Staff." *Disabilities* 2 (2): 178–203] pointed out the paucity of research on disability in academia. We surveyed over 5,000 authors of scholarly articles with 'disab' in the title and with UK or USA academic email addresses. People with disabilities were asked to describe barriers they met, and people without disabilities to describe barriers they believed that people with disabilities faced. The responses were classified according to the category of barrier. We found examples of 11 categories of barrier, indicating that a wide range of factors contribute to barriers to academic employment. The most common categories of barrier in responses by people with disabilities were attitudinal barriers, inadequate provision of reasonable adjustment, and excessive workload. Moreover, the frequencies of categories of barrier vary greatly with impairment. We consider the possible ramifications of our study for addressing the barriers to academic employment, the understanding of the nature of disability and methodology. Our study is the first investigation of the relative frequencies of barriers to academic employment.

Introduction

This article investigates barriers to securing employment in academia faced by people with disabilities in the USA and the UK. It addresses the following research questions: (1) What are the common categories of barrier to academic employment experienced by people with disabilities? and (2) To what extent do the frequencies of the categories of barrier vary with the type of impairment? It provides data on the relative frequencies of barriers to academic employment as well as clarity on the most prevalent barriers and contributes to the understanding of the effects of the barriers.

Our findings can enable higher education institutes to identify ways in which they can reduce barriers to their employment of people with disabilities. We suggest in the Conclusion some specific actions that higher education institutions can take in this matter.

The low level of disability inclusion in employment is illustrated by the employment gap between people with and without disabilities. For example, in 2019 in the UK, the percentages in employment for people of working age were 52.4% for disabled women and 54.3% for disabled men, compared to

77.4% for non-disabled women and 86.0% for non-disabled men (Office for National Statistics 2019a). However, levels of disability inclusiveness are even lower than these percentages suggest, as they include people who acquired disability whilst in their current employment and, therefore, did not face the challenge of obtaining employment whilst affected by disability. The situation seems no different in academia.

There are several possible reasons for academia's low level of disability inclusiveness. One reason could be the low level of disability inclusiveness of society in general, leading to a smaller pool of suitably qualified disabled applicants (Office for National Statistics 2019b). Another reason could be the relatively low emphasis that equality initiatives currently place on disability. This paper focuses on a reason that seems more rapidly addressable: The limited understanding of how to reduce the barriers faced by staff with disabilities in academia.

Lindsay and Fuentes (2022), in their review of 33 studies on disability-related barriers in academia, pointed out that the focus of research was usually on students with disabilities rather than on academic staff with disabilities. In order to learn more about disability in academia, we conducted a survey on the authors of recent scholarly articles with 'disab' in the title. A limitation of this method is that articles on disability do not always contain 'disab' in their title. However, this selection method systematically provided a large sample of authors of articles that were associated with disability. Although many of the corresponding authors of an article with 'disab' in the title are likely to be experts on disability, the level of expertise is likely to vary greatly between respondents to the survey. Of the 858 survey respondents, 235 classified themselves as having a disability.

Because of word limits, we present descriptive data about respondents and additional details of the responses of non-disabled respondents online via links from the project's home page (http://cybermetrics.wlv.ac.uk/disabilitysurvey.html). The survey was addressed both to people with disabilities and to people who did not indicate that they had disabilities but were knowledgeable about at least one aspect of disability. The people with disabilities were asked to describe the disability-related barriers to academic employment or conducting research that they have experienced. The others were asked to describe what they suppose are barriers to academic employment or conducting research experienced by people with disabilities. In this paper, we analyse the responses on barriers to securing academic employment. A subsequent paper will report our analysis of barriers to conducting research.

Literature review

Many previous studies have investigated disability-related barriers to obtaining or sustaining employment. This review focuses primarily on research on barriers to employment in academia and summarizes them by type of disability. Some of the categories of barrier have been loosely defined in published research. The methodology part of this paper attempts to define these categories more precisely.

Lindsay and Fuentes (2022) conducted a literature review on ableism in academia. They stated that 64% of the studies they reviewed reported negative attitudes towards people with disabilities and 12% that travelling and attending conferences were often difficult or impossible for people with disabilities. Nario-Redmond (2020) defined ableism as prejudice and discrimination toward individuals simply because they are regarded as disabled. Several studies referred to universities often framing disability as a medical problem and an individual responsibility and several suggested that the 'one-size-fits-all' approach to performance metrics could negatively impact career development. In addition, some studies mentioned that institutional ableism can create career-related barriers for university staff with disabilities.

Research on barriers to hearing-impaired people has identified technological barriers (Woodcock, Rohan, and Campbell 2007), fear of disclosure and social barriers (Smith and Andrews 2015) and communication barriers (Woodcock, Rohan, and Campbell 2007 and Gibson 1996). Technological barriers included reliance on inaccurate software, according to Woodcock, Rohan, and Campbell

(2007), whilst Smith and Andrews (2015) found social and professional isolation, as well as fear of disclosure, to account for the social barriers faced by hearing impaired people. Both Gibson (1996) and Woodcock, Rohan, and Campbell (2007) found a lack of British Sign Language (BSL) interpreters, the need for more academic communication training and a lack of qualified interpreters accounted for the communication barriers faced by this community. Woodcock, Rohan, and Campbell (2007), and Smith and Andrews (2015) referred to barriers that could be addressed through adjustment (e.g. lack of support for conferences; lack of inclusion in meetings and for career progress). Gibson (1996) drew on the author's first-hand experience of deafness in the UK, Woodcock, Rohan, and Campbell (2007) on deafness in Australia and Canada, and Smith and Andrews on deafness in the UK and North America.

An investigation of visually impaired people aged 25–45 (O'Day 1999) found that the barriers reported by the participants included the disability itself; deficits in skills or education, the lack of work experience, individual characteristics (e.g. the lack of information, motivation or job preparation skills; and deficits in social interaction skills). O'Day (1999) also found that of 20 participants, 16 reported negative public attitudes toward blindness and 12 that they had been discriminated against in hiring or job promotion. These reported negative public attitudes included limited expectations, stereotypes, and misunderstanding, as a major barrier to finding and keeping jobs. More than 20 years after O'Day's (1999) investigation, attitudinal barriers are still an important barrier: Martin's (2021) qualitative investigation of 12 UK academics with autism singles out attitudes as a barrier.

Gold (2003) and Inckle (2018) investigated barriers to people with mobility impairment. Gold discusses the limitations of research themes and fieldwork possibilities for disabled researchers, whilst Inckle refers to possible adjustments to barriers such as proper accommodation and room access. Gold (2003) and Inckle (2018) focused on their own experiences of mobility impairment in Canada and the UK, respectively.

Barriers to physically impaired people include technological barriers (Honey 2008) and social barriers (Mavin and Williams 2015). Honey (2008) refers to parking difficulties, fear of disclosure and feeling of discrimination. Both Honey (2008) and Mavin and Williams (2015) mentioned a lack of peer rapport and networking constraints as social barriers. Both sets of authors identified a lack of adjustment and that barriers could often be addressed through accommodations. Honey (2008) investigated 15 physically impaired staff at Higher Education Institutes (HEI) in the UK, and Mavin and Williams (2015) investigated eight physically impaired academics in the country.

Dolan (2021) investigated 16 North American academics with disabilities that were not visible and found that most of the study participants believed that tenure makes the professorial experience of individuals with disabilities less stressful financially. Dolan (2021) added that tenured faculty who reveal disabilities are unlikely to lose their jobs. However, the results of Swenor, Munoz, and Meeks (2020) indicate that the grant success rates of Principal Investigators (PIs) reporting disabilities were significantly lower than PIs not reporting a disability. In addition, Saltes (2022), an academic with a disability, suggested that when people do not detect disability, they can forget or even reject the presence of disability. A study of academics with mental health disabilities (Price 2017) discussed accommodations and access. They wrote that individuals must disclose a disability in order to obtain accommodations, which limits access in practice due to a reluctance to (repeatedly) disclose conditions. They added that access is not specific to an individual person with a disability but should be considered as a wider principle.

Five publications focused on barriers to samples of people with a range of disabilities, including mobility or physical impairment. A lack of appropriate technology and equipment was identified as a technological barrier by Kirkham (2016). Sang (2017) discussed difficulties in networking as a social barrier, whilst Emira (2016) added fear of disclosure as another social barrier. Corlett and Williams (2011) and Waterfield, Beagan, and Weinberg (2018) identified adequate parking as an issue in their study. The lack of accommodations, accessible courses, and access to services and inaccessible buildings were issues that could be addressed through appropriate adjustment according to Corlett

and Williams (2011), Kirkham et al. (2016), and Sang (2017). Waterfield, Beagan, and Weinberg (2018) investigated five disabled academics in Canada, whilst the other authors interviewed disabled academics in the UK. Corlett and Williams (2011) included eight disabled academics in the UK, Kirkham (2016) 10 talked to disabled postgrad students, Emira et al. (2016) investigated nine disabled academics in the UK, and Sang's (2017) sample comprised 64 people, mostly in the UK.

Four publications on barriers did not specify the types of disability. Merchant (2020) and Olsen et al. (2020) refer to barriers addressable by reasonable adjustment and Dali (2018) to fear of disclosure. Crooks et al. (2011), alongside the above-mentioned authors, referred to barriers that could be addressed through adjustment (poorly established accommodation policies; resistance to accommodation; difficulties/non-inclusive conferences). Crooks et al. (2011) investigated 33 human resources staff at academic institutions in Canada, whilst Dali (2018) focused on secondary data analysis, in North America and in the UK, respectively.

Three studies identified categories of barrier to employment in people with disabilities (Lindsay 2011; Shier, Graham, and Jones 2009 and Cramm 2013). Shier, Graham, and Jones's (2009) investigation of disabled people in Canada found that the reported barriers included both individual and societal conditions (e.g. inadequate transportation, lack of support networks and low self-esteem). Lindsay's (2011) investigation of disabled people aged 15–24 in Canada revealed the following barriers to employment: information about jobs not being accessible, worry about being isolated by others, discrimination, inadequate training, and inaccessible transportation. Cramm et al.'s (2013) investigation of people with disabilities in South Africa aged 20–24 found that unemployment was associated significantly with a lack of skills, social attitudes, and poor health.

The types of barrier varied with the types of impairment. For example, an investigation of visually impaired university staff in the UK referred to technological barriers (French 1998). An article on geographers, who were predominantly mental health impaired, mentioned problems in disclosing disability and to fieldwork not being inclusive (Horton and Tucker 2014). Finally, an investigation of academics in Canada affected by multiple sclerosis referred to scheduling problems, resistance from administration and problems with disclosure and institutional support for seeking accommodations (Stone, Crooks, and Owen 2013).

Societal change, such as the growth in remote work since the outreach to COVID-19, can help reduce disability-related barriers to employment. For example, the Chartered Institute for Personnel and Development (CIPD) informed a UK government committee that flexible working will make work more accessible and sustainable, particularly for people with some disabilities. In addition, the Good Things Foundation, a digital and social inclusion charity, informed the same committee that for some disabled people remote working has had a positive impact (House of Commons Committee on Work and Pensions 2021). Moreover, Atay, Vaid, and Clayton (2021) found that working from home has helped disabled people arrange their days around their health or care needs.

Although remote work can reduce barriers for some people with disabilities, it can increase barriers for other disabled people. For example, the CIPD has reported that accessing and using digital technology is a significant barrier to remote working for some disabled people. In addition, the Good Things Foundation also informed the committee that inaccessible websites and devices and financial constraints resulted in people with disabilities missing out on employment opportunities and options for remote-working (House of Commons Committee on Work and Pensions 2021). Moreover, Lloyds Bank (2020) found that disabled people received the necessary digital skills for work substantially less frequently than non-disabled people (38% compared to 52%). In summary, although many papers have investigated barriers to academic employment, there are still gaps in the literature.

Methodology

The ethics committee of a large UK university granted ethical approval for this study on the 11th of December 2019. Informed consent was obtained from respondents through information on the first survey page. Our survey sample is a subset of the authors of Web of Science (WoS) indexed

articles published since 2010 with 'disab' in the title. The subset consists of the authors of articles who provided contact email addresses ending in either an '.edu' or '.ac.uk'. Email addresses ending in '.edu' are allocated to US university staff and email addresses ending in '.ac.uk' are allocated to UK university staff. These criteria were used to enable comparisons between US and UK academics.

The sampling method was chosen as a practical way to identify a large sample of academics with disabilities and/or with an interest in disability. It is probably a biased sampling method because not all academics with disabilities publish research on disability (e.g. the first author published exclusively non-disability research in his first 13 years as a publishing academic; one of our disabled former team members during her entire career wrote nothing about disability) but there does not seem to be a practical alternative. The survey was sent via Survey Monkey to all authors at their '.edu' or '.ac.uk' WoS-listed email addresses. The anonymity of the respondents was protected by selecting the Survey Monkey setting that excluded personal data from the responses. The survey consisted of both closed and open questions.

We emailed the invitation to participate to 5909 email addresses, and 183 bounced. Of the 5726 that did not bounce, 858 responded, a response rate of 15.0%.

The first question listed nine types of impairment and asked respondents to indicate on the basis of the list whether they considered that they had a disability. Respondents who replied 'Yes' were taken to the part of the survey for people with disability. Respondents who replied 'No' or 'Prefer not to answer' were taken to the part for people who did not indicate that they had disability.

Respondents were asked several closed questions about themselves. Some of these questions (e.g. specifying all disabilities they experienced) were addressed only to respondents with disabilities. Other questions (e.g. the respondents' gender and age group) were addressed to all respondents. The responses are analysed in the 'Survey respondents' section.

We used the same types of impairment as those used in the UK government's annual Family Resources Survey conducted immediately prior to our applying for ethical approval. According to this survey's web site (https://www.gov.uk/government/collections/family-resources-survey–2, paragraph 1), the survey 'provides facts and figures about the incomes and living circumstances of households and families in the UK'. The survey was accessible to people with all types of impairment, as for each type of impairment at least ten respondents indicated that they had that type of impairment.

The respondents who indicated that they had disabilities were asked to specify their main type of disability from a list of nine types of disability and 'Other'. This information was used in the analysis of the responses from people with different disabilities. The respondents were also asked to indicate the barriers they met to securing academic employment.

The respondents who did not indicate that they had disabilities were asked to indicate the barriers that they consider that people with disabilities face to securing academic employment.

The free text responses were each categorized reflecting a type of barrier. These categories were selected after reading all the responses. They were designed to align with barriers found in previous studies as far as possible, so that new types of barriers would be easier to detect. Every response was then classified into exactly one category.

The classification of each response involved two people. One person classified every response and notified the other person of all responses in which they were not sure of the classification. Whenever the classifications of a response differed between classifiers or a classifier was unsure of the classification, the response was discussed by the classifiers until they agreed on the classification. Any responses regarded as fitting into more than one category were classified as 'More than one category.'

Categories of barrier

Text from the responses fell into the following categories:

- Attitudinal barriers: Johner (2013) contended that attitudinal barriers are discriminatory attitudes that can derive from stigmas and may result in a disabled person experiencing a feeling of rejection, isolation, or exclusion.
- Communication barriers: non-inclusive ways of informing and creating dialogue with disabled people (Lewis, Gaffney, and Wilson 2017). The effects of communication barriers can be felt by a delay in, or ineffective, communication (Woodcock & Tregaskis, 2008). Communication barriers can result in a disabled person misinterpreting what other people intended, e.g. due to the disabled person having autism. They can also result in non-disabled people misinterpreting what a disabled person intended, e.g. due to the disabled person having a speech impediment.
- Educational barriers: Education can be adversely affected by numerous factors, including discrimination and failure to make reasonable adjustments. Genova (2015) found that people with disabilities between 18 and 30 years in Greece, Spain and Lithuania considered lack of physical accessibility to be the main obstacle to education.
- Environmental barriers: obstacles due to the inaccessibility of physical locations. They tend to affect particularly mobility-impaired people. Environmental barriers can be indoors, e.g. stairs in buildings (Pivikm 2002). But they can also be outdoors, e.g. being unable to park close to the interview location.
- Policy barriers: hurdles due to rules and regulations. They are frequently related to a lack of awareness or enforcement of existing laws and regulations that require programmes and activities to be accessible to people with disabilities (Centers for Disease Control and Prevention 2020). Kenny and Power (2018) identified a disconnect between policies and the life experiences of people with disabilities. An example of a policy barrier is that a small allocation of paid sick leave can be an impediment for a person who is often ill.
- Psychological barriers: obstacles associated with the perspective of the person with disabilities. Psychological barriers are described in Rimmer (2004) and Joshi and Thomas (2020). Rimmer et al. found that psychological barriers for people with disabilities included fear of the unknown, concerns about needing and requesting assistance and fear of failure. Joshi and Thomas found that psychological barriers could adversely affect the ability to work with colleagues without disability, participation in events conducted by the organization, and adjusting to a newly assigned job or role in the organization.
- Technological barriers: problems preventing people with disabilities from effectively using equipment, including apparatus, machinery, and computers. They can be caused by technology usually being tailored to abled-bodied people (Gregor, Sloan, and Newell 2005). An example of a technological barrier for a visually impaired person is the use of online application forms that do not allow the user to enlarge the font size.
- Transport barriers: obstacles due to problems with transport. Park and Chowdhury (2018) divided barriers for a journey on public transport into barriers on the public transport itself and barriers to or from the public transport. An example of a barrier on public transport is a bus that is not accessible by wheelchair. An example of a barrier to or from public transport is failure to provide a safe crossing for a visually impaired person to reach the bus stop.
- Inadequate provision of reasonable adjustment: obstacles that seem addressable through relatively small concessions by the employer. An example is a visually impaired person being given application material in electronic as opposed to printed format.
- Fear of disclosure: barriers due to people feeling the need to deliberately hide their disabilities. For example, some job applicants hid their disabilities during interviews, fearing that disclosure would adversely affect their prospects of being employed. We considered incorporating 'Fear of disclosure' into the Psychological barrier category, but decided against this as fear of disclosure need not be psychological.
- Excessive workload: barriers to the employment of people with disabilities due to an excessive workload. An example is the large number of fixed deadlines and milestones that may need to be met to obtain permanent academic employment. Although this category seems most

applicable to problems encountered at work, it was mentioned by respondents as an issue faced whilst securing employment. It would be relevant to securing employment in the sense of transitioning from temporary to permanent (e.g. tenured). A person with a disability (or substantial caring responsibilities) may be unable to be flexible with their job by 'borrowing' time from their personal lives to meet deadlines when necessary (e.g. health implications of stress or time-consuming disability-related daily requirements).

Findings

Quantitative data on the survey's respondents can be accessed from the project's home page (http://cybermetrics.wlv.ac.uk/disabilitysurvey.html). The data indicate that over 72% of the respondents with disabilities indicated that they had their disabilities for over 5 years.

Barriers to securing employment described by people with disabilities

We classified text within the responses into categories of barrier and, when we identified sub-categories, we named them. We present the categories, sub-categories and illustrative examples:

- Attitudinal barriers: We identified four sub-categories: negative preconceptions, negative expectations, hostility and limits on career progression. An example of a negative preconception is the assumption that the interviewee is committed to advocacy for disability rights. An example of a negative expectation is the assumption that blind people would not be able to carry out essential parts of their jobs. An example of hostility is micro-aggressions in the form of provocative comments. Finally, an example of limits on career progression is a glass ceiling for disabled employees.
- Communication barriers: We did not identify any sub-categories. The communication barriers we found affected comprehension. An example of this category is difficulty in understanding social cues and subtleties of inter and social contact.
- Environmental barriers: We identified two sub-categories: limits on the use of workplaces and limits on the use of amenities. An example of the limits on workplaces is inaccessible buildings. An example of inaccessible amenities is that the parking was located far the workplace.
- Fear of disclosure: We did not identify any sub-categories. The barriers we found in this category resulted in postponing disclosure of disability. An example is delaying disclosure of disabilities until after being appointed to a job.
- Policy barriers: We did not identify any sub-categories. An example of this category is not taking into account the mental health conditions of people with disability.
- Psychological barriers: We did not identify any sub-categories. Barriers in this category can result in stress or anxiety. An example is increased stress in the job search process due to social anxiety.
- Inadequate provision of reasonable adjustment: We identified three sub-categories: barriers stemming from inflexibility, from changes in scheduling and from resistance to adjustments. An example of inflexibility is not allowing time-off for essential physical therapy. An example of changes of scheduling is not considering a disability when changing the schedule of an interview at very short notice. An example of resistance to adjustment is for the person with disabilities to have to fight for all required adjustments.
- Technological barriers: We did not identify any sub-categories. Responses in this category focus on accessibility. An example is the provision of equipment without adequate training.
- Transport barriers: We did not identify any sub-categories. Transport barriers can make it harder for employees to access their place of work. An example is not considering the transport needs of people with visual impairment.
- Excessive workload: We identified two subcategories: excessive quantity of scheduling. An example of excessive workload is the expectation that work more than 40 h a week. An example of an excessive workload due to scheduling is demanding schedules.

Table 1. Barriers to securing academic employment by impairment for the 73 respondents with a disability that listed one barrier.

Type of impairment	Text in the survey	Barriers in multiple responses	Other barriers	People
Dexterity	Dexterity (for example lifting and carrying objects, using a keyboard)	Inadequate provision of reasonable adjustment (2)	Attitudinal barrier Environmental barrier	4
Hearing	Hearing (for example deafness or partial hearing)		Attitudinal barrier Fear of disclosure Inadequate provision of reasonable adjustment	3
Learning	Learning or understanding or concentrating	Inadequate provision of reasonable adjustment (5) Excessive workload (3) Attitudinal barrier (2) Technological barrier (2)	Communication barrier	13
Memory	Memory		Policy barrier	1
Mental health	Mental Health	Excessive workload (6) Attitudinal barrier (3) Fear of disclosure (2) Inadequate provision of reasonable adjustment (2)	Communication barrier Policy barrier Psychological barrier	16
Mobility	Mobility (for example, walking short distances or climbing stairs)	Attitudinal barrier (5) Environmental barrier (3) Inadequate provision of reasonable adjustment (2)	Fear of disclosure	11
Social and behavioural	Socially or behaviourally (for example associated with autism, attention deficit disorder or Asperger's syndrome)	Attitudinal barrier (4) Communication barrier (2)	Psychological barrier	7
Stamina	Stamina or breathing or fatigue	Excessive workload (3) Attitudinal barrier (2) Inadequate provision of reasonable adjustment (2)	Fear of disclosure	8
Visual	Vision (for example blindness or partial sight)	Attitudinal barrier (2) Inadequate provision of reasonable adjustment (2)	Transport barrier	5
Other	Other impairment	Attitudinal barrier (3)	Communication barrier Inadequate provision of reasonable adjustment	5
Sum				73

Of the 205 respondents with disabilities, 73 specified exactly one category of barrier (Table 1). The respondents who indicated that they regarded themselves as disabled were asked to select their main impairment from a list of impairments. Some of these impairments were amplified, but they were not provided with formal definitions of the impairments, as they were presented in a survey question. The wording of the impairments is the same as that used in the UK government's annual Family Resources Survey (https://www.gov.uk/government/collections/family-resources-survey–2), and presented in Column 2 of Table 1.

Table 1 indicates that over two-thirds of the 73 responses were in three categories of barrier: 'Attitudinal barrier' (23), 'Inadequate provision of reasonable adjustment' (17), and 'Excessive workload' (12), whereas none of the responses was classified as 'Educational barrier'. The remaining 21 responses were spread over seven categories of barrier, and none of these categories had more than 5 responses.

Some categories of barrier were concentrated in particular types of impairment. For example, 4 of the 7 barriers for Social and behavioural were classified as Attitudinal, whereas only 2 of the 13 barriers for Learning were regarded as Attitudinal. Moreover, all 12 examples of 'Excessive workload' were in just three types of impairment (Learning, Mental health and Stamina). Learning contained only 2 examples of Technological barrier. In addition, all 4 examples of Environmental barriers were in physical impairments (Dexterity and Mobility).

In contrast, the 17 examples of Inadequate provision of reasonable adjustment between them were in eight of the 10 types of impairment. Similarly, the five examples of 'Fear of disclosure' were in four types of impairment and the five examples of Communication barrier were also in four types of impairment.

Barriers described by people without disabilities

Of the 469 responses from non-disabled people, 281 suggested exactly one category of barrier (Table 2): 40.6% of these responses were classified as Inadequate provision of reasonable adjustment, 29.9% as Attitudinal barriers, and 9.3% as Environmental barriers. The remaining 20.3% were spread over 7 categories of barrier.

Discussion

A limitation of this study is that for some impairments (e.g. Visual) the number of responses was as small as 10. Another limitation is that the respondents with disabilities were drawn from a subset of all academics with disabilities, i.e. only those authors of articles with 'disab' in the title. Nonetheless, the findings are based on responses from over 200 academics with disabilities and over 450 academics without a disability.

Another limitation is that some of the survey questions could have been clearer. For example, the large number of responses by people with disabilities in the 'Already employed' category may stem from the survey not clarifying that it was looking for barriers to being an academic and not solely barriers to obtaining academic employment.

The findings first focus on the barriers to securing employment met by people with disabilities. An interesting result is that although the responses spanned 11 categories of barrier, over 70% of the single-category responses fell into only three categories (Attitudinal barrier, Inadequate provision of reasonable adjustment, and Excessive workload). The latter indicates that it may be worth paying particular attention to addressing these three categories of barriers.

Some categories of barrier were associated with specific types of impairment. For example, the 12 examples of 'Excessive workload' were confined to only three of the 10 categories of barrier. An implication is that when seeking to address barriers it seems worth taking into account that a category of barrier which is very prevalent in one type of impairment can be far less prevalent in another.

Table 2. Categories of barrier to securing academic employment for disabled people, as suggested by non-disabled respondents.

Category of barrier	Frequency
Attitudinal barrier	114
Inadequate provision of reasonable adjustment	84
Environmental barrier	26
Policy barrier	16
Educational barrier	14
Excessive workload	11
Communication barrier	9
Psychological barrier	3
Technological barrier	3
Fear of disclosure	1

The findings then focus on the barriers to employment that people without disabilities considered that disabled people faced. There were considerable similarities between their responses and those of people with disabilities. For example, both for respondents with disabilities and for respondents without disabilities, Attitudinal barrier was the most frequent category. In addition, Inadequate provision of reasonable adjustment was the second or third most frequent category of barrier mentioned. It seems interesting that both people with disabilities and those without frequently mentioned these barriers.

The prevalence of Attitudinal barriers is in keeping with an investigation of visually impaired people aged 25–45: O'Day (1999) found that 80% of the 20 participants reported negative public attitudes toward blindness and 60% reported that they had been discriminated against in hiring or job promotion. These higher percentages than in our study may reflect a reduction in prejudice against visual impairment in the two decades since the publication of the article by O'Day.

Conclusion

Understanding on the frequency and nature of disability-related barriers to academic employment can contribute to the creation of new policies and procedures that can help people with disabilities to find employment. Specifically, this study can contribute to reducing disability-related barriers to academic employment. There are many low-cost actions in which higher education institutions can take to help increase the employment of people with disabilities. For example, higher education can:

1. Conduct frequent dialogues between their institution and representatives of staff with disabilities, especially on matters relating to disability, to ensure that people with disabilities are not disadvantaged by policy changes.
2. Consult regularly with staff with disabilities to routinely identify and remove barriers to them working effectively, especially towards tenure.
3. Facilitate staff with disabilities attending interviews and recruitment events, by providing in the advertisement of all events information on how to obtain accommodations.
4. Showcase high achievements by staff with disabilities, to help provide role models for applicants with disabilities. This needs to be done in a non-patronising way, focusing on exceptional achievements.
5. Make sure that the provision of reasonable adjustments is ongoing (i.e. not just one-off), and build towards a 'culture of access' (Brewer, Selfe, and Yergeau 2014; Price 2017) in which thought is routinely given to accessibility in advance of specific requests and collective responsibility is taken for the welfare of all. This is particularly important for recruitment, when applicants may be reluctant to request adjustments.

Disclosure statement

No potential conflict of interest was reported by the author(s).

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