Journal of Educational Psychology and Pedagogical Sciences (JEPPS)

ISSN:2791-0393 (Print) eISSN: 2791-0407 Vol. 3, No. 1, (Jan-June 2023): 1-12 https://jepps.su.edu.pk/article/22 DOI: https://doi.org/ 10.52587/jepps.v3i1.55

An Examination of Prevailing Conditions of Unemployed PhD Graduates: A Qualitative Study

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Abstract

In recent years, many PhD graduates in Pakistan have protested against the government due to the lack of job opportunities and it has received much attention in the academia. This study aimed to explore the experiences of unemployed Pakistani PhD graduates and attempts to investigate how the government addresses their situation. Twelve jobless PhD graduates (both male and female) participated and they were selected through snowball sampling. Employing qualitative approach, the researchers used open-ended questions in the form of semi-structured interviews to collect data. They used the Interpretative Phenomenological Analysis (IPA) approach to analyze the data in five stages, as outlined by Smith and Osborn (2008). The results revealed five main themes related to the experiences of unemployed PhD graduates: employment demand and supply, favoritism and politics, financial crisis and job mismatch, academic career requirements, and societal pressure and financial rights. Despite high hopes for a promising career, newly qualified PhD graduates struggled to find employment opportunities in Pakistan. The study reveals an imbalance between the demand for and supply of PhD graduates in the job market. This study is assumed to contribute to the existing literature and provides support mechanisms for jobless PhD graduates and policy-makers.

Keywords: Higher Education, Demand and Supply, Academic Career, Interpretative Phenomenological Analysis (IPA) approach, Pakistan.

1. Introduction

Unemployment is a socioeconomic situation in which some productive and active laborers are unemployed (Mirislavovna, 2019). Unemployed people are looking for work but need help finding employment. People who are employed temporarily but do not have a permanent position that is suitable for them are likewise affected by unemployment (Canuto et al., 2015).

The highest academic degree is the Doctor of Philosophy (Ph.D.). A Ph.D. degree proves that the holder is an accomplished researcher, an expert in their field of study with considerable knowledge, and a skilled professional. Doctors with PhDs are vital contributors to advancing knowledge and the economy, a driving force behind reforms as needed, and a source of growth

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and innovation for society. These individuals can materialize society by offering others' knowledge, filling responsibilities that serve a nation, applying newly learned talents to research projects, boosting coworkers' productivity, and generating scientific breakthroughs (Confait, 2018). The completion of a PhD program offers numerous benefits to society. For instance, individuals in society can take advantage of the specialized skills and knowledge possessed by these graduates, which can enhance their productivity. Additionally, the presence of PhD graduates in a society can contribute to the society's overall productivity. This is because the graduates possess a diverse set of skills that can benefit others. Moreover, they provide valuable input that can lead to improvements and innovations in the education system (Casey, 2009). To summarize, PhD graduates have a positive impact on society by sharing their expertise and contributing to its growth.

Unfortunately, the issue of unemployment among PhD graduates persists in many countries, including India. Upon completing their PhD degree, scholars often face challenges such as a lack of suitable job opportunities, low salaries, and limited job openings. This has resulted in many industry managers being unwilling to hire PhD graduates for appropriate roles (Sood, 2019). Therefore, it's crucial to consider the employment prospects before enrolling in a PhD program, especially in India, where there are few job opportunities. Private companies are also reluctant to employ PhD graduates, and if they do, it may be at a lower salary (Sibani, 2017). In Malaysia, for instance, an unemployed PhD graduate has resorted to delivering grab food to make ends meet (Reneshara, 2019).

Even in developed countries like the United States, joblessness affects PhD graduates. For instance, in the engineering field, only 12.8% of PhD scholars secure academic jobs because the academic job market is already saturated, and the rate of producing new PhD graduates is very high. This results in stiff competition among applicants for jobs in their relevant academic fields (Larson et al., 2014). Similarly, in the fields of science, engineering, and health sciences in the United States, there were an estimated 805,500 PhD graduates in 2014, which was 6.2% more than in 2008. However, the production of PhD graduates exceeds the available job opportunities, resulting in an unemployment rate of 2.4% in 2010, up from 1.7% in 2008 (Milesi et al., 2014). In South Africa, the graduate and postgraduate workforce in the banking sector is growing fast, but unfortunately, joblessness among PhD graduates is increasing at a higher rate than overall employment rates (Greylinget et al., 2015).

In South Africa, the unemployment rate for graduates and postgraduates increased from 5.4% to 7.0% between 1995 and 2012. At the University of Toronto, the number of PhD graduates in various fields of study doubled from 2000 to 2015, with a large increase in physical and life sciences, and many remained without employment opportunities. The International Labor Organization (ILO) predicted that by 2020, two million people aged 15-24 would be unemployed, which is an increase from 2018 when the number of unemployed youth was 172 million. Oman and Saudi Arabia have a mismatch between the education system and labor market needs, which has led to a rise in unemployment rates to 9% and 12%, respectively. There is also a significant gap in Pakistan between the skills and qualifications of the workforce and the needs of the growing economy (Abbas & Ashiq, 2017; Ashiq et al., 2020). In Togo, which is a Western African country, the unemployment of young people is a major concern, and many university graduates have resorted to working as motorcycle taxi drivers, which is a shocking situation for the government.

The problem of unemployment among PhD holders is causing distress and dissatisfaction not only among them but also among young graduates in Pakistan. If this issue is not resolved, it may discourage future enrollment in doctoral programs and cause skilled professionals to seek employment abroad, depriving Pakistan of their valuable contributions. This could hinder the growth of a knowledge-based economy and development in Pakistan. Thus, it is crucial to understand the experiences of unemployed PhD graduates in Pakistan and how they can be supported in securing permanent employment for a more secure future. Therefore, the main objective of this study was to explore the experiences of unemployed PhD graduates in Pakistan.

2. Research Questions

Following were the research questions;

- 1. What are the main causes of unemployment among PhD graduates in the country?
- 2. What is the impact of unemployment on PhD graduates in terms of their financial stability, career prospects, and personal well-being?
- 3. What are the experiences of unemployed PhD graduates in the country including their job search strategies, coping mechanisms, and perceptions of the job market?

3. Significance of this study

This research could be significant in understanding the issue of joblessness among PhD graduates in Pakistan. Given the lack of relevant literature on the subject, this study could fill a critical gap in the country's knowledge base. Moreover, the findings of this research may help illuminate the current job market landscape for academics and other professional opportunities for PhD graduates in Pakistan. The implications of the study's findings may also be useful for unemployed PhD graduates, university administrators, the Higher Education Commission (HEC), new doctoral students, and the Pakistani government, particularly the Ministry of Education, in devising future plans to address this problem.

4. Research Methodology

The main aim of this research was to explore the experiences of jobless PhD graduates and how they coped with their situations in Pakistan. The study focused on understanding their thoughts, feelings, and perceptions regarding their unemployment. While both quantitative and qualitative research methods have been used in the past to study unemployment, the former has dominated in the last 15 years. However, quantitative research may not provide in-depth knowledge about unemployment-related issues for a long time (Pernice, 2011). On the other hand, qualitative research is crucial in educational studies, especially when addressing research questions about "how" and "why," as it helps to understand experiences, contexts, and phenomena in depth (Cleland, 2017). Therefore, to obtain a deeper understanding of this important research area, a qualitative research approach was used. The data were transcribed and analyzed using five steps: repeated reading of transcribed data, initial notations, identifying emergent themes, connecting themes, and examining patterns across cases (Osborn et al., 2008).

5. Selection of Participants

In qualitative research, the purpose of sampling is to gather specific cases or events that provide a deeper understanding of the phenomenon being studied. Researchers aim to find data analysis units that add to existing knowledge about a phenomenon or social life. If researchers are exploring a new field, they search for cases that can help them gain initial insights. To achieve this goal, qualitative researchers use non-probability sampling techniques such as accidental, quota, purposive, or snowball sampling. In this study, since unemployed PhDs are located throughout Pakistan, snowball sampling was used to select participants specifically from the Punjab province to collect data. The participants of this study were 12 (8 male and 4 female) jobless PhD graduates.

6. Data Collection

To gather data from unemployed PhD graduates in Pakistan, a semi-structured interview guide was utilized. The interview questions were developed based on literature related to unemployment among PhD graduates. It consisted of two parts. The first part had four openended questions to explore the experiences of jobless PhD graduates in Pakistan. The second part had three questions to investigate how their experiences were addressed in the country. Each transcript was analyzed to identify emergent themes. Member-checking was performed by presenting these themes to participants to verify the accuracy of the information provided, ensuring the reliability of the study.

7. Data Analysis

In qualitative research, data analysis involves organizing and examining interview transcripts, notes, and other collected materials to uncover meaningful findings (Bogdan & Biklen, 1998). The current study utilized Interpretative Phenomenological Analysis (IPA) method for data analysis. The data were transcribed and analyzed using five steps: repeated reading of transcribed data, initial notations, identifying emergent themes, connecting themes, and examining patterns across cases (Osborn et al., 2008).

8. Results of the Study

i. Employment demand and supply

The interviews revealed that there is an imbalance between the number of PhD graduates produced in Pakistan and the demand for their skills. Participants agreed that the Higher Education Commission (HEC) of Pakistan disregards the actual need for PhD graduates in different fields when approving admission seats for universities. Despite this oversupply of PhDs, there are limited vacancies available, leading to a high number of unemployed graduates. Participant "A" spent a considerable amount of money on job applications but was unsuccessful in finding a job. Some universities, such as Air University, receive applications but fail to call applicants for interviews. The government of Pakistan and HEC lack a clear plan on where to employ the growing number of PhD graduates. As participant "B" noted, there are few vacant positions in both the public and private sectors, and many PhD graduates remain jobless for months, even after completing their degree. Participant "E" observed that there is a saturation of PhDs in Pakistan, with universities producing a large number of PhD graduates without considering the demand. This oversupply is contributing to the increasing number of unemployed PhD graduates.

Participant "F" expressed that there is a significant disparity between the number of PhD graduates produced in education and the available job opportunities in universities. They commented that it appears that the only job prospects for these graduates in the future may be in schools. The participant likened the situation to a shoe factory, with universities churning out PhDs without considering supply and demand. Similarly, participant "G" noted that despite the high number of social science (Education) PhDs being produced, there are not enough job openings in institutions.

In fields such as curriculum, administration, leadership, Islamic education, and science education, a PhD degree holder in any specialized field of education is typically appointed due to the lack of job posts. Morning and evening classes are being conducted to produce more PhDs, despite the shortage of available positions.

ii. Favoritism and politics

Participant "A" stated that there are few job opportunities for newly qualified PhD graduates in Pakistan due to various factors. Although the Higher Education Commission in Pakistan has identified a need for 25,000 PhD graduates in different positions and areas, job vacancies are not being advertised. The participant identified selection criteria by the selection board in institutions of Pakistan and favoritism and politics in universities as contributing factors to joblessness. Although private universities offer some job opportunities, these positions are few and unsecured and also subject to politics and favoritism. Participant "A" applied for jobs in both public and private universities of Pakistan but did not receive any interview calls, without any reason being given. The participant also observed that the selection board in universities often ignores merit policies and follows biasness, favoritism, and politics. Participant "C" also noted that in some cases, universities do not have a merit-based selection criteria and nominated applicants are given favor during interviews, similar to Punjab Public Service Commission and Federal Public Service Commission (PPSC & FPSC).

Additionally, it appears that having good relations with university management is a requirement for obtaining a job. One participant shared that their junior PhD fellow was appointed as a lecturer before completing their degree simply because they had a good relationship with the selection board director. In some cases, job advertisements are merely a formality and money is collected in the process. Another participant shared their experience of being informed about an already selected candidate before the appointment process. The selection board tends to select those individuals with whom they feel comfortable, and there is a culture of commendation in universities. Unemployed PhDs are in a large number and experienced M. Phil applicants are preferred in some universities to save money. Visiting placement may be a source of employment, but jobless PhDs are at a disadvantage as supervisors tend to help those who do their office work. According to another participant, it is impossible to get a job in any institute without a strong reference. They had applied to eight to ten universities without any strong reference, but were unsuccessful.

The participant "F" shared that despite being an old student of a university, he was overlooked for the position of assistant professor due to favoritism. The university preferred a female candidate over him. Similarly, respondent "G" also faced rejection by a private university selection board due to the absence of a strong reference.

The participant "D" faced several institutional barriers during the recruitment process for the position of associate professor in a university. He was given only a few hours to prepare his demonstration lecture on a complex topic, while the near and dear ones of the selection board were given many days to prepare their lectures on simple topics. Despite performing well in his demonstration, having a good academic score, and impressing all the selection board members, he was not selected due to bias. He later learned from a reliable source that the Dean had said, "I will ensure that my teaching team is strong by appointing my near and dear ones in my department". I selected the same subjects as she had, worked hard, prayed.

iii. Financial crisis and job misfit

Participant "A" highlighted the issue of unemployment for PhD graduates in Pakistan due to the limited number of public universities (145) and the economic crisis leading to the scarcity of job opportunities. Moreover, personal subject skills in the relevant field of study are also a significant factor in determining employability. Participant "B" was rejected by an institute due to insufficient skills in their field of study. Respondent "A" completed their PhD in agriculture from the USA in 2018, but due to the limited number of agriculture institutions in Pakistan, job opportunities in their field of study were scarce. Participant "G" faced criticism from interview panels in two private universities for having a soft-spoken voice and being perceived as unfit for a teaching job.

iv. Academic career and requirement

Participant "C" noted that they were often overlooked during the recruitment process due to their poor academic record from matriculation to master's degree. According to them, "To impress the selection board for an assistant professor job, a minimum of 15 published articles and a good relationship with a professor from a university is required." Similarly, Participant "D" shared that they were deemed unsuitable for a job in a university because they did not have two articles in Y category and one article in X category.

Participant "G" applied to both public and private institutions and had satisfactory interviews, but unfortunately did not receive any job offers. They missed an opportunity for a lecturer post in PPSC due to a low academic score. Participant "A" expressed their observation that in Pakistan, older individuals with outdated ideas are often preferred for the position of HOD in their field of study. However, fresh PhD graduates with new ideas are not given the chance to replace them in their respective departments. Although the ratio of publications in Pakistan is high, the quality of research work is not up to par. In contrast, Participant "A" noted that in the US, young and energetic PhD graduates are appointed as HODs in their field of study because they bring fresh and innovative ideas. Highly skilled and competent individuals are required in Pakistan to impress stakeholders and secure a job.

v. Societal Pressure and Financial rights

Participant "H" shared her experience of getting a job in a private university, but upon finding out the salary, she realized it was very low. She was told by another assistant professor at the university that the salary is low and there is a delay in receiving it. As she had a family to support, she felt that this job was not suitable for her, as the salary barely covered her traveling expenses. She declined another job offer from a different private university for the same reason. Respondent "I" explained that universities in Pakistan offer visiting placements with low salaries for demanding work. The process of obtaining such placements has become

complex and challenging, with the Higher Education Commission announcing interim placements once a year.

Participant "I" shared that he faced pressure from his family to not take a substandard and low-paying job, despite being jobless. His family emphasized that, as a PhD holder, he should not join a low scale or private job as it would affect their family's honor and status. His family members stopped him saying" We will never allow to you join a private or low scale job as you are a PhD doctor now. It is the matter of our honor and family status".

9. Discussion

Regarding the theme of "Employment demand and supply," the study discovered that the main reasons for the unemployment of PhD graduates are a lack of balance between employment demand and supply, an overproduction of PhDs annually, and a shortage of available positions, particularly at the university level. More and more PhDs are being produced without taking into account their demand in different workplaces, resulting in a rise in the number of unemployed PhD graduates each year. Previous research has also revealed similar findings on the "Employment demand and supply" theme of objective

Jung (2018) stated that while doctoral education programs in South Korea have improved, there are still issues regarding the balance between the demand and supply of doctorates in different fields, lack of diversity in overseas experience, and differences in job opportunities between domestic and overseas doctorates. A survey conducted in the United States to assess the demand and supply of PhDs in the public affairs and administration sector found a significant gap between the production and demand of PhDs in universities (Rahm et al., 2015). Due to a saturated workforce, PhD graduates are also experiencing increased competition in the labor market. To avoid future joblessness, individuals considering doctoral studies should take into account the interests, needs, and demands of the labor market for the best future career (Leser, et al., 2018).

The number of PhD holders in Australia has increased significantly over the years, from 4000 per year in 2000 to 10,000 per year currently. However, there are not enough academic jobs available to absorb this growing pool of graduates, forcing many to seek employment in other sectors such as private companies and public sectors (McCarthy & Wienk, 2019). Oversupply and a mismatch of skills contribute to the high rates of unemployment among PhD graduates. Policy makers can play a crucial role in creating more job opportunities to manage this issue (Oppong & Sachs, 2015). Similarly, a survey-based study conducted in the United States revealed a severe imbalance between the supply and demand for PhDs in academic institutions (Rahm, et al., 2015). According to a report by the Higher Education Commission (HEC), approximately 4000 PhD graduates are unemployed in Pakistan, with only a small number finding jobs (Amer, 2022). Furthermore, Lin and Hsu (2013) discovered that a higher level of overeducation prolongs the job search process and reduces employment opportunities for graduates at all levels.

The study discovered that favoritism, politics, and institutional barriers are hindering job opportunities for PhDs. The research identified factors such as ignorance of merit policy, biased selection boards, commendation, gender, and grouping culture that affect job prospects for PhDs. It was found that there is no merit-based appointment in universities and nepotism is widespread. In some university departments, there is a strong culture of forming groups and playing politics, which delays job opportunities for PhDs. Furthermore, some PhDs refuse job

opportunities due to low salaries and job insecurity. The Higher Education Commission (HEC) is responsible for supervising universities, offering scholarships and job opportunities, and affiliating private institutions. However, the lack of coordination between the HEC and universities has contributed significantly to the unemployment problem. Addressing the issues of favoritism and corruption in the system is crucial in finding a solution to the problem of unemployment among PhD graduates in Pakistan (Hashmi & Iftekhar, 2019).

Regarding the issue of "financial crisis and job misfit," the study found that the lack of funding for public universities, particularly in the field of agriculture, and personal physical fitness issues are some of the reasons why PhD graduates in Pakistan are unemployed. The global economic crisis has also added to the problem, making it difficult to hire PhD scholars in academia. In the Netherlands, financial constraints have resulted in PhD graduates not being offered long-term research contracts in universities. Additionally, outside academia, PhD graduates are not offered lucrative salaries, mostly because they have a limited number of published papers. This lack of publications can cause them to be rejected at the time of their defense (Schoot & Sonneveld, 2012).

The financial crisis and a shortage of resources, skills, and knowledge are significant factors that contribute to unemployment, particularly among youth (Ahmad & Khan, 2018). Additionally, high population growth, a lack of coordination between education and job opportunities, and negative attitudes towards securing well-paid work are also factors. In contrast, Akter's (2018) panel data analysis revealed that unemployment has an adverse impact on the expansion of the economy. Finally, the inability of local governments to collect sufficient taxes and revenues is a significant cause of educational disparity in metropolitan areas (Tasci & Tansel, 2005).

Several studies have suggested that there could be a mismatch between qualifications and the skills required by the job market (Weligamage & Siengthai, 2003; Farooq, 2011; Nel & Neale-Shutte, 2013). Walker (2015) also found that many university degree programs in South Africa did not adequately prepare students for the practical aspects of work. Dai et al. (2008) further added that higher education courses tend to be overly theoretical, lacking practical skills needed in the working world. Meanwhile, some studies (Griesel & Parker, 2009; MacGregor, 2007) indicate that graduates may not meet the expectations of companies. Graduates often have unrealistic expectations about their first job, assuming it would be high-paying and prestigious. However, they are often surprised to find that many entry-level positions do not meet their expectations. In Pakistan, where the economy is unstable and the unemployment rate is high, students need to be aware of the limited job opportunities available. one of the reasons for unemployment is the poor quality of human resources (Chaudhry & Hameed 1998). For example, Zahir Shah, a mathematician who completed a postdoctoral fellowship in Bangkok in 2019, was unable to secure a tenure-track position at any of Pakistan's 200 universities due to lack of funding (Siddique, 2021).

The study discovered that having a poor academic record, insufficient publications and not having at least fifteen published articles were obstacles to employment for PhDs in the theme "academic career and requirement". The study also revealed that some senior faculty members at universities, with outdated ideas, were reluctant to hire fresh and innovative PhDs. Additionally, retiring PhDs were being reappointed instead of new PhDs due to improper policies and irresponsible behavior. Corruption and nepotism are rampant in universities, and the quality of education is subpar. Khan (2020) noted that universities are increasing reliant on

visiting professors and lecturers. Mlis (2012) shared his experience of being rejected for a university job due to having only two publications while the university's requirement was a minimum of six publications. Another senior professor cited a lack of experience and stated that there were no openings for new PhDs. The financial crisis in the Netherlands has made it difficult for new PhDs to secure long-term research contracts, leading to rejection during the defense procedure for those with only a few conference presentations and a small number of submitted and accepted papers (Schoot & Sonneveld, 2012).

The study found that low salary, late payment, and laborious work were reducing the job appeal for PhDs. Ignoring the financial rights of PhD degree holders was also contributing to the increase in unemployed PhDs. Some PhDs were resigning from their jobs due to demanding work routine and inadequate financial benefits. Given the uncertain prospects of PhDs, the Higher Education Commission (HEC) should consider limiting the enrollment of new PhD candidates, as there are limited opportunities outside of universities for these scholars. Additionally, some universities hire PhDs as cheap labor for teaching or research work on a temporary basis. The issue of highly qualified individuals with advanced degrees being unemployed or working in low-paying positions is not just limited to Pakistan but is a concern in many developing nations. According to a study published in the TRIBUNE journal, there are 1200 unemployed PhD graduates in Pakistan who are qualified in science fields from top institutions on merit-based scholarships. These individuals have been struggling to find jobs in universities, industries, or other sectors (Amer, 2022).

Boulos (2016) investigated the labor market relevance of PhDs and the challenges faced by graduates of social sciences and humanities in finding suitable employment that matches their qualifications and offers a reasonable salary package. The study highlighted how policies of higher education and academic institutions contribute to the issue of over-skilling and unemployment among PhDs. Haider (2007) and Rizwan et al. (2010) revealed that while prospective salary advantages of public sector jobs are not independent factors for jobless individuals, fringe benefits and working environment are more crucial. Ahmad and Khan (2018) identified several factors that contribute to the problem of youth unemployment, such as high population growth, financial crises, lack of resources, skills and knowledge, attitudes towards securing well-paid work, and coordination gaps between education, poverty, and job opportunities. The issue of societal pressure was also found to be a hindrance to the employment of well-established PhD graduates who are discouraged by their elders from accepting private or low-scale jobs, preferring to remain jobless (Hussain, 2005). Graduates with advanced degrees have limited employment options, despite their knowledge and openness to new opportunities, due to the general decline in job opportunities. This delay hampers the hopes of nations for their graduate students.

10. Conclusion

This research sheds light on the employment issues faced by PhD graduates in Pakistan, which have not been addressed in previous studies. Despite high hopes for a promising career, newly qualified PhD graduates struggle to find employment opportunities in Pakistan. The study reveals an imbalance between the demand for and supply of PhD graduates in the job market. Poor policies of HEC, biases of the selection board, grouping culture, weak references, and poor relationships with management are some of the factors contributing to the employment difficulties of PhD graduates. In addition, there is a shortage of quality research work in PhD-producing organizations, and low salaries, long working hours, and lack of staff facilities in

private institutions make employment unappealing. Societal pressure and family expectations also discourage some graduates from taking private jobs. Some PhD graduates remain unemployed due to a lack of necessary job-related information provided by their institutions and a lack of supportive policies. HEC needs to develop strong planning strategies to provide more job opportunities in Pakistan, as many highly skilled PhD graduates have migrated to other countries. However, some universities are not following HEC's policies, and highly qualified PhD graduates are not given their due rights. Furthermore, job-seeking PhD graduates are not treated fairly by job-giving organizations, and some are required to work for meager pay and perform additional tasks. This study is expected to make significant contributions to existing literature by advocating for a mechanism to support unemployed PhD graduates in Pakistan.

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