

Dual fragility in motion: Rethinking brain migration through the Uganda–Türkiye higher education corridor

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Abstract

This study explores higher education mobility between Uganda and Türkiye as a case of South–South academic exchange between structurally fragile systems. Framed by four theoretical strands educational diplomacy, brain circulation, South–South cooperation, and the novel concept of dual-fragility brain migration the study investigates whether Ugandan students in Türkiye experience brain drain, gain, or circulation. Using a mixed-methods approach, data were drawn from 95 survey responses, interviews with Ugandan PhD returnees, and institutional statistics. Findings reveal that while most students remain in Türkiye during study, the majority of graduates particularly PhD holders return to Uganda and reintegrate into academia. However, reintegration challenges and limited post-study collaboration constrain long-term developmental impact. The study concludes that dual-fragility partnerships demand tailored policy design to avoid replicating Global North migration outcomes. It recommends co-managed reintegration frameworks, bilateral alumni networks, and collaborative research platforms to foster sustainable academic mobility and South–South human capital exchange.

Keywords: Uganda, Türkiye, Brain migration, Higher education, Educational diplomacy, South–South cooperation

Introduction

In the global landscape of academic mobility, attention has traditionally focused on student migration from developing countries to the Global North, often framed in terms of brain drain and asymmetrical knowledge flows (Docquier, 2006; Dodani & LaPorte, 2005). However, recent trends reveal an emergent dynamic: the increasing movement of students and scholars within the Global South. One such case is the growing academic relationship between Uganda, a low-income and fragile state, and Türkiye, a developing and semi-peripheral country. This evolving partnership raises important questions about how educational diplomacy, brain drain, and institutional capacity intersect outside traditional North–South paradigms.

Since the early 2000s, Türkiye has implemented an “Africa Opening” strategy that includes a significant educational component. Through the Presidency for Turks Abroad and Related Communities (YTB), Türkiye has offered thousands of government-funded scholarships to students across Sub-Saharan Africa, including an estimated 500 Ugandan students to date (Council of Higher Education [YÖK], 2024). While modest in scale, this initiative reflects Türkiye’s growing use of higher education as a soft power instrument, a practice increasingly theorized under the concept of educational diplomacy (Knight, 2007; Melissen, 2011).

At the same time, both countries face serious challenges with talent retention. Uganda continues to lose skilled professionals, including university faculty and health workers, to international labor markets (Hassan & Macha, 2020; Kasper & Bajunirwe, 2012). Türkiye, despite its regional aspirations and expanding higher education sector, is also experiencing a

rise in outward migration of its educated youth, particularly in STEM and ICT fields (TÜİK, 2024; Kahya, 2022). This bilateral mobility thus introduces a complex scenario: an academic migration pathway between two countries simultaneously affected by brain drain—a phenomenon we refer to in this study as dual-fragility brain migration.

Despite the relevance of this case, scholarly engagement with South–South academic mobility remains limited (Alemu, 2020; Rozhenkova, 2021). Existing literature often overlooks how non-Western countries are reshaping global student flows and how source countries like Uganda experience the long-term impacts of these movements. Most importantly, there is a need for empirical studies that examine the lived experiences of students, return patterns, and institutional strategies from both ends of the migration corridor.

This study aims to address this gap by exploring the academic mobility dynamics between Uganda and Türkiye, using a mixed-methods design based on survey responses from 95 Ugandan students and alumni, interviews with four Ugandan PhD graduates from Türkiye, and expert insights from higher education leaders in Uganda. These data are complemented by official statistics on student levels, fields of study, scholarship patterns, and return rates. Through this multi-layered analysis, we examine whether academic mobility in this context contributes to brain drain, brain gain, or the more nuanced phenomenon of brain circulation. By doing so, we contribute to a growing body of work on educational diplomacy, brain migration, and South–South cooperation in higher education.

Theoretical Framework

This study is guided by four interrelated theoretical strands that collectively offer a nuanced lens for interpreting academic mobility and brain migration between Türkiye and Uganda: educational diplomacy and soft power, brain drain and brain circulation, South–South cooperation in higher education, and a newly proposed framework—dual-fragility brain migration. Each of these perspectives contributes to understanding the dynamics, implications, and strategic relevance of student flows between a less developed and a developing country.

Educational Diplomacy and Soft Power: Educational diplomacy refers to the strategic use of international education to foster political influence, economic cooperation, and cultural connection between states (Knight, 2007; Melissen, 2011). In recent decades, states have increasingly invested in academic exchange programs, scholarships, and bilateral higher education partnerships as tools of soft power (Nye, 2004). Türkiye's scholarship programs through the Presidency for Turks Abroad and Related Communities (YTB) exemplify this practice. By providing higher education opportunities to students from Sub-Saharan Africa including Uganda - Türkiye seeks to expand its diplomatic influence, establish intercultural ties, and reposition itself as an alternative educational hub within the Global South (Altunişik, 2022; Yavuz, 2018). From this perspective, student mobility is not just a matter of individual educational choice but a tool embedded in foreign policy and national branding. Educational diplomacy thus helps explain Türkiye's motivations in supporting South–South academic exchanges and frames Ugandan students' experiences within a broader geopolitical context.

Brain Drain, Brain Gain, and Brain Circulation: The classic concept of brain drain highlights the loss of highly skilled individuals from developing countries to more developed economies, often resulting in weakened human capital, academic capacity, and innovation potential at home (Docquier, 2006; Iravani, 2011). Uganda's chronic challenges with retaining trained professionals in health, science, and academia align closely with this model (Kizito et al., 2015; Kasper & Bajunirwe, 2012). However, more recent scholarship has introduced the idea of brain gain and brain circulation (Lowell & Findlay, 2001; Saxenian, 2005). These frameworks suggest that student mobility can also lead to positive outcomes for the country of origin, particularly when graduates return with enhanced skills or engage transnationally through research networks, remittances, or virtual collaborations.

This study draws from these competing frameworks to assess the experiences and trajectories of Ugandan students in Türkiye. The survey and interviews explore whether this South–South academic migration results in permanent relocation (drain), temporary skill acquisition (gain), or ongoing multidirectional flows (circulation).

South–South Cooperation in Higher Education: South–South cooperation, originally rooted in political solidarity among postcolonial states, now encompasses a wide range of

development initiatives—including higher education (Alemu, 2020). In contrast to traditional North–South academic partnerships, South–South educational exchanges are often framed as more equitable and culturally resonant, particularly when they bypass colonial legacies and linguistic barriers (Rozhenkova, 2021). The Türkiye–Uganda case aligns with this paradigm. Türkiye's rise as a non-Western provider of higher education reflects a broader shift in global academic flows. The mutual interest between Turkish institutions seeking internationalization and Ugandan students seeking accessible, funded education creates an opportunity for reciprocal development. However, South–South mobility also presents unique risks when both countries face resource limitations and institutional fragility.

Dual-Fragility Brain Migration: Based on the empirical findings and gaps in existing literature, this study introduces the concept of *dual-fragility brain migration*, extending emerging South–South migration frameworks that challenge conventional brain drain paradigms (Campillo & Docquier, 2013). This framework describes student and scholar mobility between two states that are both grappling with internal challenges of brain drain, limited academic infrastructure, and constrained capacity to retain or reintegrate skilled professionals (Momeni et al. 2022; Teferra, 2014). In contrast to dominant models that presume one “strong” and one “weak” country in brain drain scenarios, dual-fragility recognizes that South–South academic exchanges often occur between equally vulnerable systems (Campillo & Docquier, 2013; Tikly, 2016). In the case of Türkiye and Uganda, both nations face domestic outflows of skilled graduates (TÜİK, 2024; World Bank, 2024) and are experimenting with internationalization strategies as both a solution and a risk factor. This concept allows for a more symmetrical, less hierarchical analysis of mobility and emphasizes the importance of context-specific policy design. Rather than replicating Global North pathways, dual-fragility partnerships require new strategies—such as joint reintegration programs, diaspora engagement platforms, and co-developed academic initiatives—to ensure that mobility leads to sustainable development outcomes.

Literature Review

Academic mobility between developing countries often referred to as South–South mobility has gained scholarly attention as a strategic tool for mutual capacity building and sustainable development (Alemu, 2020). Unlike traditional South–North migration patterns, South–South academic exchanges are viewed as mechanisms for more equitable knowledge production and less extractive engagement. However, this ideal often clashes with the reality that even among Global South countries, disparities in development and institutional capacity can produce asymmetric outcomes including unintended brain drain (Nabawanuka, 2011).

Classic models of brain migration typically depict mobility as a unidirectional loss of talent from weaker to stronger states (Docquier, 2006; Iravani, 2011). Yet, more recent perspectives advocate for the concept of brain circulation, in which mobility results not in permanent loss but in knowledge transfer, remittances, and sustained transnational

engagement (Saxenian, 2005). Whether such circulation leads to long-term developmental impact, however, depends heavily on return conditions such as employment opportunities, political stability, and institutional reintegration—factors that are often lacking in fragile contexts like Uganda (Kasper & Bajunirwe, 2012).

In one of the few empirical studies on intra-African student mobility, Amutuhair (2024) highlights the complex rationales driving student movement in East Africa. Her mixed-methods research reveals that colonial legacies, economic pressures, and social class dynamics all influence international study decisions. While student mobility offers individual opportunity, it often reproduces inequality and faces systemic barriers, including restrictive immigration policies and limited institutional support—particularly in contexts with fragile higher education infrastructure.

Similarly, Momeni et al. (2022) find that international academic mobility enhances scientific productivity and social capital, particularly for researchers at advanced career stages. However, structural inequalities based on region, gender, and discipline affect access to such mobility. Researchers from Sub-Saharan Africa, for example, face significant limitations in joining global academic networks, further reinforcing existing gaps in scholarly impact and recognition.

From a regional perspective, El-Ouahy et al. (2020) show that mobility within the MENA region—including Türkiye—is shaped not only by opportunity structures but also by historical and cultural ties. Their study of scientific migration patterns uncovers demographic and institutional trends that influence who migrates, where, and with what outcomes. These flows, while potentially enriching, also reflect broader disparities in the institutional environments of sending and receiving countries.

Türkiye's expanding role in educational diplomacy underscores these dynamics. Through initiatives such as the Türkiye Scholarships program and the Maarif Foundation, Türkiye has positioned itself as a key player in South–South academic exchange (YTB, 2025; Daily Sabah, 2021). These efforts align with Türkiye's broader geopolitical strategy of fostering soft power and cultivating elite networks across Africa (Kavas, 2020). Full scholarships, English-medium instruction, and shared religious or cultural affinities have made Türkiye an increasingly attractive destination for East African students, particularly as traditional Western destinations become less accessible (ICEF Monitor, 2025).

Nevertheless, evidence on the long-term impact of this mobility remains mixed. A recent report by the Afrika Foundation (Busuulwa, 2024) found that Ugandan graduates of Turkish universities face significant challenges upon return, including limited employment opportunities and inadequate reintegration pathways. These challenges are consistent with earlier findings from Tansel and Güngör (2003), who demonstrated that Turkish students studying abroad often choose not to return, citing domestic economic instability and underdeveloped professional environments.

The potential benefits of mobility such as brain gain through return migration or transnational collaboration—depend

heavily on state capacity and policy design. Batista et al. (2025) argue that while high-skilled emigration may reduce domestic human capital in the short term, it can also lead to long-term development gains if governments create the right conditions to harness diaspora expertise and returning talent.

Against this backdrop, the concept of dual-fragility brain migration offers a new framework for understanding academic mobility between states like Uganda and Türkiye both of which face internal brain drain, limited institutional capacity, and uneven reintegration mechanisms. As Campillo and Docquier (2013) argue, South–South migration must be analyzed on its own terms, not through models developed for North–South flows. Likewise, Teferra (2014) and Tikly (2004) caution against the wholesale adoption of Global North paradigms, calling instead for context-specific strategies that account for historical inequities and localized policy constraints.

Context: Uganda–Türkiye Relations and the Higher Education Mobility Landscape

Uganda and Türkiye have steadily expanded their bilateral relations over the past two decades—establishing embassies in each other's capitals, engaging in high-level diplomatic visits, and cultivating educational diplomacy through initiatives such as Türkiye Scholarships, which has granted over 365 scholarships to Ugandan students (Republic of Türkiye Ministry of Foreign Affairs, 2023). While economic ties remain modest, both countries continue to foster strategic cooperation in infrastructure, defense, and human capital development.

Formal educational cooperation between Uganda and Türkiye was preceded by the launch of Türkiye's state-run scholarship program, Türkiye Scholarships, administered by the Presidency for Turks Abroad and Related Communities (YTB), which began offering scholarships to international students—including Ugandans—in 2010. These scholarships initially focused on undergraduate and graduate education and expanded steadily over the decade as part of Türkiye's broader educational diplomacy strategy. A significant milestone in bilateral relations occurred in June 2016, when President Recep Tayyip Erdoğan became the first Turkish head of state to visit Uganda, during which multiple Memoranda of Understanding (MoUs) were signed, including those aimed at enhancing cooperation in higher education, academic exchanges, and cultural collaboration (Republic of Turkey Ministry of Foreign Affairs, 2023). This visit institutionalized Türkiye's visibility within Uganda's higher education landscape and deepened strategic ties between the two countries.

In the broader East African context, Uganda occupies a middle position in terms of outbound student mobility to Türkiye. According to data compiled from the Council of Higher Education (YÖK), Uganda sent a total of 339 students to Türkiye in 2023, compared to 8872 from Somalia, 1163 from Ethiopia, and 715 from Kenya. While Uganda trails behind Somalia, which dominates due to deep diplomatic and religious ties with Türkiye, it surpasses countries like Rwanda and Burundi in student numbers. The vast majority of Ugandan students in Türkiye are enrolled in public universities

(271 out of 339), indicating a preference for tuition-free or state-subsidized education (YÖK, 2024).

Türkiye's own brain drain dynamics further contextualize this study. Recent data from the Turkish Statistical Institute (TÜİK) show that 2.0% of Turkish university graduates migrated abroad between 2021 and 2023, particularly in fields such as information technology, engineering, and sciences (TÜİK, 2024). This has sparked public debate on Türkiye's capacity to retain talent, even as it positions itself as a magnet for international students. The dual reality—being both a sender and receiver of academic talent—makes Türkiye an interesting case of what this study terms “dual-fragility brain migration.”

Uganda, on the other hand, faces a persistent and well-documented skills flight, especially in the health and academic sectors (Kizito et al., 2015). The country's Human Flight and Brain Drain Index score was 7.6/10 in 2023, compared to Türkiye's 5.3/10, according to the Global Economy database (TheGlobalEconomy.com, 2023). High youth unemployment (estimated at 83% among university graduates), limited research funding, and underdeveloped reintegration structures create push factors that drive students to pursue education and employment opportunities abroad (WENR, 2020).

Economically, Türkiye is a significantly larger player. In 2023, Türkiye's GDP stood at approximately \$905 billion, while Uganda's GDP was \$50 billion (World Bank, 2023). Türkiye has over 200 universities, including more than 75 private institutions, whereas Uganda has 11 public and 44 private universities, most of which suffer from infrastructural and financial limitations (Hassan & Macha, 2020). The Turkish academic system has diversified significantly in terms of language of instruction, global rankings, and research funding—factors that make it increasingly attractive for students from developing nations.

This widening asymmetry in economic size and academic infrastructure situates Uganda–Türkiye student mobility within a South–South axis marked by unequal capacity. Unlike classical North–South migration flows, which are often driven by postcolonial linkages, South–South academic mobility—such as that between Uganda and Türkiye—is shaped by new geopolitical alignments and educational soft power strategies. Türkiye's investment in East African students through YTB scholarships and the Maarif Foundation schools is indicative of this strategic reorientation (Kavas, 2020).

Taken together, these dynamics underscore the relevance of analyzing whether Ugandan student migration to Türkiye leads to permanent relocation (brain drain), productive return (brain gain), or ongoing transnational engagement (brain circulation). It also situates both countries within a broader landscape of educational diplomacy and competitive capacity-building in the Global South.

Methodology

Research Design

This study employs an embedded mixed-methods design, with a qualitative core supported by quantitative data. Given the limited prior research on South–South academic mobility

between Uganda and Türkiye, the study takes an exploratory and interpretive approach, aiming to uncover patterns, meanings, and institutional dynamics rather than to test hypotheses.

The qualitative strand, centered on semi-structured interviews, was designed to capture the lived experiences of Ugandan students, their return pathways, and perceptions of educational diplomacy. This was complemented by descriptive quantitative analysis, drawn from survey responses and institutional datasets, to contextualize trends and triangulate findings (Creswell & Plano Clark, 2018). Qualitative methods are particularly suitable for studying nuanced issues such as brain migration, return motivations, and institutional fragility (Merriam & Tisdell, 2015).

Case Selection

The Uganda–Türkiye dyad was selected through purposive sampling, based on its strategic and underexplored relevance. Both countries experience ongoing brain drain, but also engage actively in regional educational diplomacy. This reciprocal vulnerability, framed as dual-fragility brain migration, makes this case unique. While existing literature often examines unidirectional flows from the Global South to North, this study focuses on South–South mobility between two structurally constrained systems (Alemu, 2020; Docquier, 2006).

Türkiye's positioning as a semi-peripheral state with expanding educational outreach in Africa—especially via the Türkiye Scholarships (YTB)—and Uganda's critical need for academic capacity building form a dynamic case for understanding postcolonial educational cooperation (Kavas, 2020; Melissen, 2011).

Sample

The target population of this study includes all Ugandan students who have either graduated from or are currently enrolled in Turkish higher education institutions. According to administrative data obtained from the Council of Higher Education (YÖK) and the Presidency for Turks Abroad and Related Communities (YTB), the number of Ugandan students currently enrolled in Türkiye is 339. When considering historical graduation data—averaging 20 to 30 students per year over the past decade—the total population (universe) is estimated to range between 500 and 600 individuals.

From this estimated population, a sample of 95 participants was selected. Of these, 42 are graduates, and 53 are currently enrolled students. This sample was recruited through alumni networks and student associations, using a combination of purposive and snowball sampling. The sample is sufficiently diverse in academic level and background to provide valuable insights into the mobility experiences and outcomes of Ugandan students in Türkiye.

Data Collection and Sources

Administrative Data: Descriptive statistical data were sourced from the Council of Higher Education in Türkiye (YÖK) and the Presidency for Turks Abroad and Related Communities (YTB). These institutional records provided data on Ugandan student enrollment by year, gender, program level, and university

type. Additional contextual data were gathered from the World Bank, TÜİK, and Ugandan national education reports to compare country profiles on GDP, higher education capacity, and brain drain indices.

Survey Instrument: An online survey was distributed to Ugandan students and alumni who studied in Türkiye between 2010 and 2024. The instrument included both closed- and open-ended items on demographics, academic background, funding source, post-study outcomes, and return intentions. A total of 95 responses were collected via alumni networks and social media platforms. It offers a valuable snapshot of a hard-to-reach population, consistent with exploratory research norms.

Qualitative Interviews: Semi-structured interviews were conducted with two target four Ugandan PhD graduates from Turkish universities. Participants were selected using snowball sampling, which is appropriate for dispersed populations (Atkinson & Flint, 2001). Interviews, conducted online, lasted 45–60 minutes and explored themes such as return motivations, career outcomes, reintegration barriers, and perspectives on Türkiye’s educational diplomacy. All interviews were transcribed and thematically coded.

Ethical Considerations

The research was approved by the Human and Social Sciences Ethics Committee of Istanbul Medeniyet University (IMU). All participants gave informed consent, and confidentiality was strictly maintained. Data were anonymized, and participation was voluntary. The study followed ethical principles outlined in the Declaration of Helsinki and qualitative research ethics guidelines (Orb et al., 2001).

Findings

This section presents key insights derived from the analysis of three distinct data sources: administrative data, survey responses, and qualitative interviews. The administrative data provided an overview of trends in academic mobility and return rates among Ugandan PhD holders who studied in Türkiye. The survey captured broader perspectives from a wider group of Ugandan postgraduate alumni in Türkiye, offering quantifiable insights into motivations, return intentions, and reintegration challenges. Finally, the qualitative component based on in-depth interviews with four Ugandan PhD graduates explored individual lived experiences and nuanced perspectives regarding return decisions, reintegration processes, and the implications for brain drain, brain gain, and brain circulation.

In this section, the findings from the qualitative interviews and the survey data are presented in thematic categories that align with the study’s core focus. The administrative data served primarily to contextualize and support interpretation, and is referred to where relevant. A comprehensive analysis and integration of all findings from the three data sources is provided in the Discussion section.

Qualitative Findings

Return Motivation and Commitment to Uganda

All four respondents returned to Uganda after completing their doctoral programs, citing both institutional obligations

and personal commitment. Two participants were formally bonded by Makerere University, which continued to pay their salaries during their studies abroad. Others described a strong sense of duty to contribute to national development and a desire to implement what they had learned.

“Several factors motivated me to return after my PhD. First of all, I was bonded by my job. While we are studying, Makerere keeps paying our salaries, so we have to come back and serve the university” (P1).

These findings suggest that brain drain is mitigated in part by institutional mechanisms such as bonding and salary retention, as well as intrinsic motivation among scholars to contribute to their home institutions.

Employment and Professional Advancement Post-Return

Upon returning to Uganda, all four graduates were absorbed into academic or institutional leadership roles. Their PhD credentials from Türkiye directly led to promotions, departmental leadership, and expanded teaching responsibilities. For example, P2 noted that her degree led to multiple career advancements at Makerere University.

“As soon as I came back from Turkey, I was promoted from assistant lecturer to lecturer. I now coordinate the Center for Communication Skills under the Institute of Gender and Development Studies”.

Such patterns indicate evidence of brain gain, where international education enhances domestic academic systems through increased qualifications and expertise.

Academic and Professional Networks

While most respondents expressed gratitude for the education received in Türkiye, ongoing collaboration with Turkish academic institutions was limited. Only one participant reported an attempted formal collaboration between Marmara University and Makerere University, though it was not sustained. “I inquired from my supervisor whether there was any opening for collaboration between Marmara and Makerere, but he wasn’t very helpful”.

However, informal networks and alumni associations, such as the Uganda–Türkiye Alumni Association (*Uganda Türkiye Mezunları Derneği*), have emerged as alternative platforms for academic engagement, suggesting a modest form of brain circulation is beginning to take root.

Cultural Integration and Perceptions of Türkiye

Respondents reported overwhelmingly positive perceptions of Türkiye’s higher education system, citing interdisciplinary exposure, resilience training, and a diverse student body as transformative aspects of their experience. “Studying in Turkey was like becoming a member of the United Nations... We had students from every part of the world. That made me appreciate Turkish culture and the way they teach”.

These experiences were often tied to Türkiye’s educational diplomacy goals. Participants linked their academic journeys with Türkiye’s efforts to expand cultural influence through language programs, inclusive environments, and scholarship diplomacy. They viewed Türkiye as actively enhancing its soft power through educational investments in Africa.

Reintegration Challenges and Gaps

Despite the success in returning and finding employment, participants also highlighted barriers to reintegration. These included difficulties in publishing during their studies due to language barriers, limited collaboration upon return, and a lack of institutional mechanisms for utilizing foreign-trained scholars. “It was not easy to get a journal in which to publish, especially with the language barrier. I had to translate my article from Turkish to English”.

These gaps suggest that while brain drain may be avoided, the full potential of brain circulation is still limited by systemic constraints in both the home and host countries.

The interview data reveal that academic mobility to Türkiye has not resulted in traditional brain drain among Ugandan PhD students. Instead, it reflects a hybrid outcome brain gain through professional advancement and national service, with incipient brain circulation developing through alumni networks and international exposure. However, institutional support structures for collaboration and reintegration remain limited, and the sustainability of these outcomes depends on continued policy attention from both Uganda and Türkiye.

Quantitative Findings

Demographic Profile of Respondents

The survey captured responses from 95 Ugandan students and graduates who studied in Türkiye between 2011 and 2025. As shown in Table 1, the majority of participants were male (73.7%), with females comprising 26.3% of the sample. Most respondents arrived in Türkiye between 2016–2020 (41.1%), indicating a sharp recent increase in academic mobility between Uganda and Türkiye.

Table 1. Demographic and Academic Profile of Respondents

Categories	Subcategories	N	%
Gender	Male	70	73,7
	Female	25	26,3
Arrival Year Group	2007–2010	4	4,21
	2011–2015	35	36,8
	2016–2020	39	41,1
	2021–2025	17	17,9
Department	STEM	22	23,2
	Business administration	21	22,1
	Theology	17	17,9
	Social studies	15	15,8
	Health sciences	8	8,42
	High school	7	7,37
	Education	5	5,26
Educational Level	PhD	10	10,5
	Master Degree	22	23,2
	Undergraduate	56	58,9
	High school	7	7,37
Graduation Status	Graduated	42	44,2
	Currently student	53	55,8
Current Residence	TÜRKİYE	62	65,3
	UGANDA	33	34,7
	Currently student	53	55,8

Employment Status	Employed in Uganda	19	20
	Unemployed	10	10,5
	Employed in Turkey	13	13,7
Funding Source	Self-Funded	51	53,7
	TR Government	33	34,7
	UG Government or	11	11,6
	Other		

Respondents represented a diverse range of disciplines, including theology, international relations, engineering, public health, and education. Nearly half (55.8%) were still enrolled in their programs, while 44.2% had graduated. In terms of current location, 64.2% of respondents still resided in Türkiye, while 34.7% had returned to Uganda.

Employment outcomes revealed that 45.3% were still students, 36.9% were employed, and 17.9% were unemployed at the time of the survey. Regarding financial support, most respondents were either self-funded (53.7%) or supported by Türkiye government scholarships (34.7%), with very few (5.3%) receiving support from Ugandan institutions.

Statistical Analysis of Return and Employment Patterns

The demographic and academic profile of the 95 respondents reveals key insights into the structure and outcomes of Ugandan student mobility to Türkiye. A majority of respondents were male (73.7%), while female participants accounted for 26.3% of the sample. Participants arrived in Türkiye across a wide range of years, with the largest cohorts arriving between 2011–2015 (36.8%) and 2016–2020 (41.1%). Academically, respondents were enrolled in or had completed programs across diverse fields. The most common disciplines included STEM (23.2%), Business Administration (22.1%), and Theology (17.9%), followed by fields such as social sciences, health, and education. In terms of educational level, the majority were pursuing or had completed undergraduate degrees (58.9%), while 23.2% had earned or were pursuing master’s degrees, and 10.5% were at the PhD level.

Just over half of the participants (55.8%) were still enrolled as students, while 44.2% had already graduated. A majority of respondents (65.3%) continued to reside in Türkiye, whereas 34.7% had returned to Uganda. These residence patterns suggest that many students remain in Türkiye either to complete their studies or to seek post-study opportunities. Employment status further reflects these dynamics: 55.8% were still students at the time of the survey, 20% were employed in Uganda, 13.7% were employed in Türkiye, and 10.5% reported being unemployed. These figures suggest that while many students remain in academic pathways, a notable segment has transitioned into the labor force—particularly in Uganda.

In terms of funding, 53.7% of respondents were self-funded, 34.7% received Türkiye government scholarships, and only 11.6% were supported by the Ugandan government or other sources. This distribution underscores Türkiye’s growing role in educational diplomacy and highlights the limited financial support mechanisms available from Ugandan institutions.

Overall, the findings suggest that while Türkiye has become a significant destination for Ugandan students, challenges remain in terms of gender balance, institutional support, and post-graduation employment pathways.

Discussion

The aim of this study was to explore the dynamics of academic mobility between Uganda and Türkiye, with a focus on whether such movements contribute to brain drain, brain gain, or brain circulation. Framed within the broader contexts of educational diplomacy and South–South cooperation, the research adopted a mixed-methods approach combining survey data from 95 Ugandan students and alumni, semi-structured interviews with PhD graduates and academic leaders, and institutional data from Türkiye and Uganda. The methodology allowed for an in-depth examination of both the structural conditions shaping educational migration and the lived experiences of mobile scholars. This discussion interprets the findings in light of theoretical concepts such as soft power, dual-fragility brain migration, and academic return, and relates them to regional patterns and policy implications.

Türkiye’s expanding role in Africa’s higher education landscape exemplifies a growing trend in South–South educational diplomacy. Rather than positioning itself solely as a donor or development partner, Türkiye has constructed an image of a knowledge partner through its Türkiye Scholarships (YTB), the Maarif Foundation schools, and bilateral agreements (Kavas, 2020). Uganda, while not the largest recipient of these initiatives in East Africa, represents a strategic partner in Türkiye’s efforts to extend its soft power in the region. The surge in Ugandan student mobility to Türkiye over the past decade reflects the effectiveness of this strategy, particularly when contrasted with traditional North–South flows that are often more restrictive and exclusive (Knight, 2016; Melissen, 2011). Türkiye’s role is also reflective of a post-Western turn in international higher education. As Western countries tighten immigration and scholarship opportunities, alternative hubs like Türkiye provide relatively affordable and accessible academic opportunities, especially to countries like Uganda that lack robust domestic capacity (ICEF Monitor, 2025). This reshaping of global academic hierarchies places Türkiye in a transitional role—simultaneously a receiver and sender of academic talent.

The findings challenge the traditional “brain drain” narrative. While 60% of Ugandan survey respondents remain in Türkiye at the time of data collection, this is largely due to their enrollment status. In contrast, most PhD and Master’s degree holders returned to Uganda, often citing institutional commitments and personal motivations. These patterns support a brain gain framework, wherein returned graduates are absorbed into academic and leadership roles, particularly in public universities. However, not all return is seamless. Interview narratives reveal barriers to reintegration, such as bureaucratic stagnation, lack of publication support, and minimal recognition of foreign-earned credentials. These findings resonate with Saxenian’s (2005) observation that return does not automatically equal reintegration, and

highlight the need to distinguish between return mobility and productive reintegration.

This study contributes to the emerging concept of “dual-fragility brain migration”, where both the sending and receiving countries face systemic vulnerabilities. Uganda struggles with underfunded universities, high youth unemployment, and limited reintegration infrastructure (WENR, 2020). Türkiye, while actively attracting foreign students, simultaneously faces a growing exodus of its own educated youth, particularly in STEM fields (TÜİK, 2024). This dual fragility creates an uncertain migratory corridor in which retention and circulation outcomes are more unpredictable than in classical South–North models. Unlike Global North destinations that typically offer permanent residency and labor integration pipelines, Türkiye’s visa and employment structures often restrict long-term stay. This creates a circulation bottleneck, especially for non-PhD holders. Yet, it also opens room for intermittent or network-based circulation, such as joint publications, virtual academic networks, and alumni organizations (Docquier, 2006; Saxenian, 2005).

The quantitative findings underscore the determinants of return. Graduation status was significantly associated with return; most students who had completed their studies returned to Uganda, while current students remained in Türkiye. Funding source also mattered: Ugandan government-funded students were significantly more likely to return, while those funded by Türkiye or self-financed were more likely to stay. These results confirm prior research showing that home-country sponsorship correlates positively with return intentions (Kizito et al., 2015; Iravani, 2011). Türkiye’s scholarships, while generous, are not structured to mandate return, unlike many North American or European state-funded programs. This reflects a tension in Türkiye’s diplomacy—balancing influence-building with development outcomes.

Returnees, especially at the PhD level, often secured academic employment, yet still encountered institutional inertia. For example, publishing in Turkish journals posed language and access challenges, and attempts to create formal collaboration between Turkish and Ugandan universities were mostly unsuccessful. These barriers mirror findings in Alemu’s (2020) study on South–South academic mobility, which emphasizes the need for institutionalized academic pathways and networking platforms for circulation to occur. Meanwhile, those who remained in Türkiye were disproportionately unemployed or underemployed, underscoring the limits of destination-side labor absorption. This reinforces the idea that without bilateral follow-through mechanisms, scholarships may produce only short-term wins for soft power but not long-term development impact.

Uganda occupies a middle-tier position in East Africa in terms of student flows to Türkiye. Countries like Somalia (8,872 students), Ethiopia (1,163), and Kenya (715) far exceed Uganda’s numbers (339), partly due to stronger religious, historical, or geopolitical ties. However, Uganda’s relatively higher return rate and professional reintegration suggest that its case may serve as a model for sustainable academic

exchange in the region. This unique positioning also means Uganda has the opportunity to strategically leverage Türkiye's educational diplomacy without facing the same dependency risks observed in other bilateral corridors (Altunışık, 2022).

Both Türkiye and Uganda stand to benefit from enhanced institutional collaboration. Türkiye could improve long-term impact by Establishing post-study reintegration tracks or career support services, Creating joint research grants or co-supervised PhDs. Uganda, for its part, could strengthen its reabsorption infrastructure for returnees, formalize bilateral alumni associations to harness brain circulation. Both countries should work toward co-managed academic diplomacy, ensuring that student mobility aligns with national development priorities rather than short-term public diplomacy gains.

Conclusion

This study contributes to a growing body of research on international academic mobility in the Global South by shedding light on the underexamined Uganda–Türkiye higher education corridor. Drawing on empirical evidence, it finds that the mobility of Ugandan students to Türkiye does not conform neatly to a classical brain drain model. Instead, the data suggest a more complex and dynamic process where return, reintegration, and circulation coexist. Many Ugandan graduates return and contribute to local institutions, while others remain abroad, often still in training or navigating labor market barriers. Türkiye's role as both a destination and a sender of talent reveals a dual-fragility scenario, where both ends of the mobility chain are marked by institutional and economic vulnerabilities.

By introducing the concept of dual-fragility brain migration, this study opens a new theoretical lens for understanding mobility between emerging economies. The findings also underscore the need for stronger reintegration mechanisms, bi-national academic partnerships, and more sustainable mobility pathways that go beyond one-directional flows.

Despite its contributions, the study has several limitations. First, the sample size, particularly for in-depth interviews, was limited to a small group of PhD graduates and institutional representatives, which may not capture the full diversity of experiences. Second, the survey had a self-selection bias, and the response rate may not fully reflect all Ugandan students in Türkiye. Additionally, the study focused exclusively on Uganda and Türkiye, limiting broader generalizability. Contextual factors such as political shifts, economic crises, or pandemic-related disruptions were not extensively analyzed but could influence migration decisions.

Future research should consider comparative studies involving multiple East African countries to contextualize Uganda's experiences within regional dynamics. Longitudinal studies following students over time—before, during, and after their studies would also provide richer insights into the evolution of return intentions and career trajectories. Moreover, investigating the role of institutional partnerships, alumni networks, and diaspora organizations could enhance

understanding of how academic mobility translates into long-term development impacts.

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Conflicts of Interest

The authors declare that there are no conflicts of interest related to this research or manuscript.

Author's Responsibilities

The authors are responsible for the integrity of the research and ensuring that the content is accurate, credible, and free from plagiarism. All authors contributed to the conceptualization, data collection, analysis, writing, and proofreading of the manuscript. The first author led the development of the research topic and theoretical framework, and was primarily responsible for data collection, analysis, and reporting. The second author contributed to the literature review, assisted with data collection, and supported the proofreading of the final manuscript.

Ethical Considerations

This research adhered to ethical standards, including respect for participants' rights and confidentiality. The study was ethically approved by the Istanbul Medeniyet University Social and Humanities Ethics Board.

AI Use Disclaimer

The authors disclose the use of AI in the research process, manuscript preparation, and data analysis. Specifically, ChatGPT 4.5 was used as a tool to assist with proof reading of the research. The authors take full responsibility for the accuracy, integrity, and ethical considerations of any AI-generated content included in the manuscript.

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