

Push, Not Peace: Reconsidering the Drivers of Refugee Return

Mae MacDonald*

May 6, 2026

Abstract

When do refugees return to their countries of origin? A core premise of the international refugee regime is that refugees should remain in asylum while conflict continues at home and repatriate once peace is restored. Drawing on a new global dataset covering 293 origin-asylum dyads from 1980 to 2023, I show that the opposite pattern prevails: most returns occur during ongoing conflict, while many refugees remain in asylum long after war has ended. I argue that return is driven less by peace in origin countries than by push factors in asylum countries, especially host-country conflict and forced return policies. By contrast, peace often fails to produce repatriation because the costs of uprooting established lives are high, expected quality of life in asylum often exceeds that in origin countries, and repression continues after war. I test this argument with panel models that exploit within-dyad variation, translate the estimates into predicted return rates at the dyad and global levels, and trace the mechanisms through a qualitative case study. I also document substantial inaccuracies in UN refugee data and introduce corrected annual measures of refugee stocks and returns, along with new indicators of forced return policies, camp settlement, and UN refugee funding. The findings challenge a foundational premise of the refugee regime: although voluntary repatriation is its preferred durable solution, much return appears to be driven by coercion rather than peace.

*I am grateful to James D. Fearon, Jeremy Weinstein, Jens Hainmueller, Michael Allen, and Judith Goldstein for their invaluable advising and feedback. I thank Idean Salehyan, Perisa Davutoglu, participants in the Online Peace Science Colloquium, and participants in the Stanford IPE Workshop for helpful comments. I thank Andrew Shaver and the research assistants of the Political Violence Lab for their help in constructing the Global Refugee Return dataset: Samantha Terriquez, Franklin Huang, David Hsueh, Joeb Stout, Evan Richardson, Caroline Robbins, Kianna Victor, Citlali Hernandez Pulido, Jade Gomez-Castro, Thomas Lobaton, Zex Liu, Jennifer Lara, Kev Young, Maria Fernanda Bello, Marium Fatima Agha, Ryder Stoddard, Stephanie Udeze, Toros Pinar, Abigail McMurry, Anvi Gaikwad, Ceyda Akkus, Damara Gomez, and Ulysses Trejo Vasquez. I also thank Georgia Sasso, Suha Choi, and Jelena Hertzler for their research assistance. Finally, I thank the UNHCR archives team for hosting me in their archives.

1 Introduction

When do refugees return? The conventional view is that refugees repatriate at the end of war. This expectation reflects a core premise of the international refugee regime: refugees should be protected in asylum while they face conflict in their countries of origin, and should return once there is peace. UNHCR identifies voluntary repatriation as the preferred “durable solution” to refugee crises, and one of its core mandates is to facilitate return after conflict ends (Barnett and Finnemore, 2004).¹ Existing studies support this account, finding that refugees’ intentions to return are shaped primarily by security conditions in the country of origin (e.g., Alrababah et al., 2023; Ghosn et al., 2021; Beaman, Onder and Onder, 2022; Koser, 1997; Adema et al., 2025).

In this paper, I show that observed patterns of return do not align with conventional expectations. I introduce the Global Refugee Return (GRR) dataset, which provides corrected measures of refugee stocks and returns for 293 origin–asylum dyads from 1980 to 2023, hand-coded from qualitative archival records. These global data show that, rather than returning after peace, most refugees return during ongoing conflict, while many remain in asylum long after conflict ends. These patterns contradict both the core assumptions of the refugee regime and the security-based explanations that dominate the literature.

To explain these puzzling patterns, I argue that they reflect two overlooked features of refugees’ lives. First, much return during conflict is not voluntary but driven by “push” factors in the asylum country, particularly forced return policies and host-country conflict. Using GRR, I show that three-quarters of all returns occur in years with either a forced return policy or conflict in the asylum country. Second, refugees often remain in asylum after conflict ends when the costs of return are high, and political and economic conditions in exile exceed those in the country of origin. GRR shows that, among refugees whose origin-country conflict has ended, three-quarters live in asylum countries that are richer than their countries of origin, and four-fifths come from origin countries that remain authoritarian or repressive. Together, these dynamics generate the observed aggregate pattern: return during conflict and persistence after peace.

The cases of South Sudan and Afghanistan illustrate the logic. By 2022, over 2.3 million South Sudanese—more than 20 percent of the population—were living as refugees. In 2023, a large wave of returns occurred not because of peace in South Sudan but because refugees were forced to flee Sudan, their primary host country, when civil war broke out. Nearly three-quarters of South Sudanese refugees in Sudan returned within two years, while those in Uganda, Ethiopia, and Kenya largely remained. A similar dynamic unfolded in Afghanistan during the 1990s: although conflict continued after the fall of the Soviet-backed regime in 1992, more than 4.5 million Afghans returned, driven by mounting pressure from Iran and Pakistan, which employed coercive measures including mass forced return, non-renewal of residence permits, school closures, and cuts to food aid.

I formalize the argument in a simple model of refugee return and test its implications using the GRR dataset. Using panel methods to examine within-dyad variation, I show that return is driven primarily by forced return policies and asylum-country conflict, rather than conditions in the origin country, and is less likely when transition costs are high, when quality of life in asylum exceeds that at home, and when political repression is ongoing. Examining global descriptive patterns shows why most return occurs during ongoing conflict, while peace alone rarely generates large-scale repatriation: asylum-country push factors are common, asylum countries are often richer than origin countries, transition costs are substantial, and post-conflict repression frequently persists. I use the model to generate predicted return rates at both the dyadic and global levels. Counterfactually removing

¹The other two “durable solutions” are local integration and third-country resettlement. Local integration refers to incorporation into the economic, social, and legal institutions of the host country, while third-country resettlement transfers refugees to another state, typically under limited quotas.

asylum-country conflict and forced return policies would have reduced global returns during 1980–2023 by 36.1 percent and 26.9 percent, respectively. By contrast, ending all origin-country wars would have produced essentially no aggregate increase in return, holding all other factors constant, while closing the host-origin economic gap and improving civil liberties would have raised returns by 86.3 and 53.9 percent, respectively. I complement the analysis with a case study of Ethiopian refugees to illustrate the underlying mechanisms.

This research makes three contributions. First, despite the centrality of return to the international refugee regime, it has been remarkably understudied at the macro level. This is the first study to examine global patterns using improved data, and it challenges both the regime’s foundational principles and prevailing security-based accounts. I show that most historical returns were not voluntary decisions but responses to coercive pressures. Existing research has missed this pattern for two reasons: it has focused largely on Syrian return and on settings in which refugees have a meaningful choice to remain, and it has examined return intentions more often than realized return (e.g., Ghosn et al., 2021; Alrababah et al., 2021; Adema et al., 2025).

Second, the findings contribute to broader debates on international cooperation by documenting widespread violations of international refugee law. Many host states have adopted forced return policies in direct contravention of *non-refoulement*—the core principle of the 1951 Refugee Convention—underscoring the limited capacity of UNHCR and the broader regime to prevent such practices. Third, the article makes a significant data contribution: it identifies inaccuracies in UNHCR’s global stock and return data, and provides corrected annual measures of refugee stocks and returns, multiple new measures of *de facto* refugee conditions (such as forced return policies and camp residence), and new data on UNHCR financing.

The article proceeds as follows. I first document the empirical puzzle—return during conflict and stasis after peace—then develop the theoretical framework and formalize it in a simple model. I next introduce the GRR dataset, outline the empirical strategy, and present the panel results and predicted return rates. I then provide descriptive evidence on the prevalence of push factors, relative quality of life, and transition costs to explain aggregate patterns, followed by a case study of Ethiopia that traces the mechanisms. The article concludes with implications for durable solutions and directions for future research.

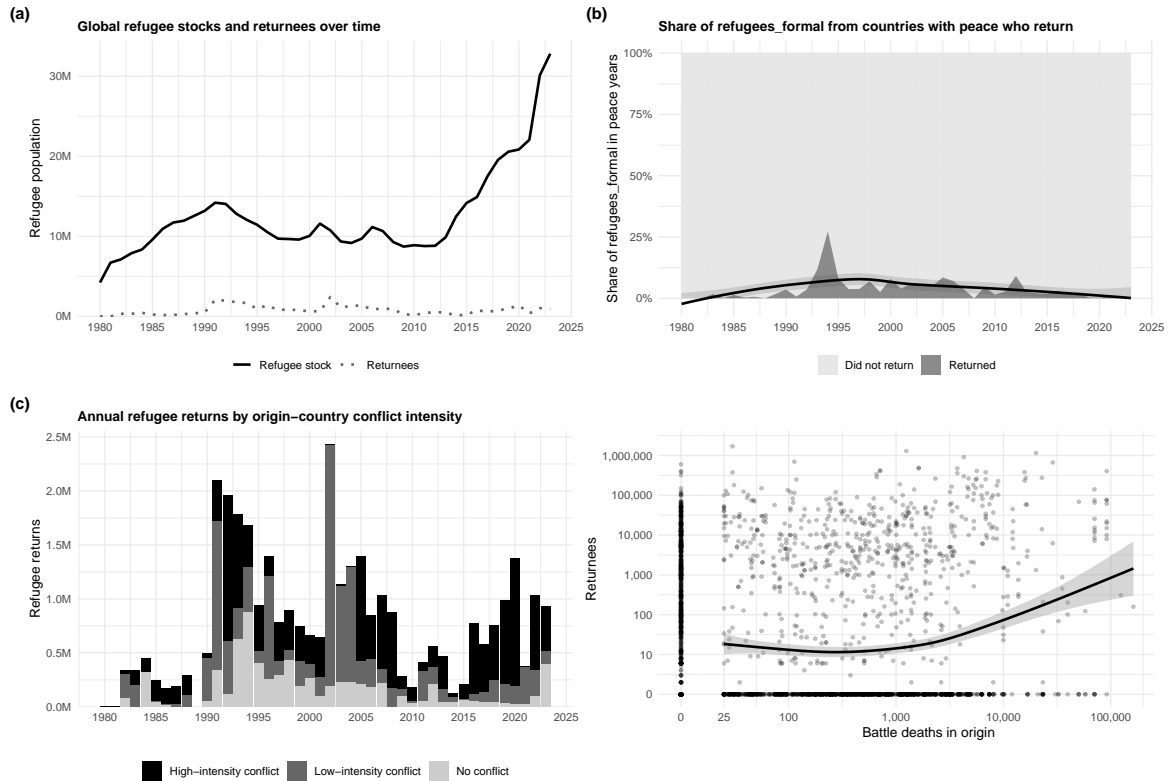
2 Puzzling Patterns of Refugee Return

Prevailing theories of refugee return center on security conditions in the country of origin. This view follows from the core logic of the refugee regime: refugees flee war, are protected in asylum under the principle of *non-refoulement*, and return when there is peace. On this account, repatriation depends primarily on whether conflict has ended at home.

Micro-level studies of return intentions support this view, consistently finding that safety at home dominates economic considerations in explaining who plans to return (Alrababah et al., 2023; Ghosn et al., 2021; Al Husein and Wagner, 2023; Adema et al., 2025; Beaman, Onder and Onder, 2022; Zakirova and Buzurukov, 2021). For example, the “threshold model” developed by Alrababah et al. (2023) argues that refugees consider return only once a minimum level of safety in the origin country has been achieved. Below this threshold, deteriorating conditions in asylum should not induce return; only after peace is restored do refugees weigh quality-of-life considerations across origin and asylum. This framework yields two clear empirical implications. First, return should increase when there is peace in the origin country. Second, return should be rare during active conflict.

Drawing on the Global Refugee Returns (GRR) dataset, a new dataset described in Section 4.1, Figure

Figure 1: Return during conflict and non-return during peace



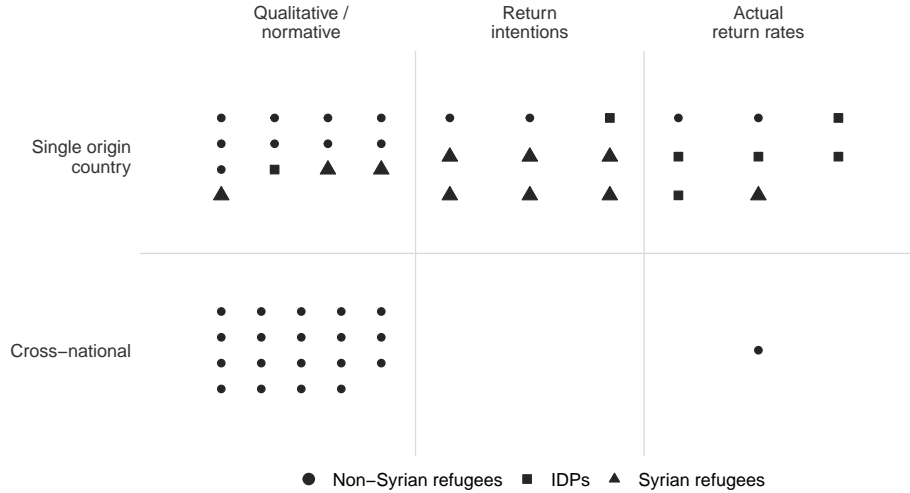
Note: Panel (a) plots the global refugee stock (solid line) and total recorded returns (dotted line) for each year from the Global Refugee Return dataset. Panel (b) subsets the sample to refugees who originally fled war rather than non-conflict forms of persecution and restricts the sample to dyad-years in which the country of origin (COO) is at peace, showing the share of refugees who returned versus did not return in each year; the black line is a LOESS smoother of the return share. Panel (c) decomposes total annual returns by the conflict status of the COO, distinguishing no conflict, low-intensity conflict (≥ 25 battle deaths), and high-intensity conflict ($\geq 1,000$ battle deaths) using UCDP thresholds. Panel (d) plots the relationship between conflict severity in the COO and refugee return by showing dyad-year observations of log battle deaths in the origin country and log returnees; the black line is a LOESS smoother. The year 1989 is omitted across all panels due to missing return data. *Source:* Refugee data from the Global Refugee Return dataset; conflict data from the UCDP/PRIO Armed Conflict Dataset.

1 shows that observed patterns are inconsistent with both implications. Panel (a) plots global refugee stocks and return flows since 1980, illustrating that return is rare relative to the size of displaced populations. GRR shows that, across dyad-years with more than 1,000 refugees, the median return rate is zero and the mean is 5.31 percent; in 89 percent of dyad-years, fewer than 5 percent of refugees return. One interpretation is that low return reflects the persistence of conflict, but this explanation is incomplete: almost as many of the world’s refugees originate from countries now at peace as those in high-intensity conflict (30.1 percent versus 38.8 percent), and Panel (b) reflects that, even when there is no conflict in the origin country, the average return rate is only 3.42 percent.² Extending the window to the first three post-conflict years yields a cumulative return share of just 6.8 percent. In general, peace alone does not produce large-scale repatriation.

On the contrary, Panel (c) shows that most returns occur during war, not after it. Decomposing annual returns by origin-country conflict status shows that most return occurs during conflict. Between 1980 and 2023, more than three-quarters of all recorded returns took place while conflict was ongoing. Roughly two-fifths occurred during high-intensity conflict, over a third during low-intensity conflict,

²Restricted to origin-year dyads where refugees generally fled war rather than broader non-conflict persecution.

Figure 2: Geographic and methodological concentration in the refugee return literature



Note: Each point represents a study identified through a systematic journal search (2006–2026) of: (1) 12 leading political science journals (APSR, AJPS, JOP, CPS, BJPS, WP, IO, ISQ, JPR, JCR, PSRM, PNAS); (2) 5 leading migration and refugee studies journals (Journal of Refugee Studies, IMR, JEMS, International Migration, Comparative Migration Studies); (3) 2 leading development economics journals (World Development, Journal of Development Economics); and (4) the leading area studies journal for each of four principal refugee-producing regions (African Affairs, IJMES, Journal of Asian Studies, Latin American Research Review). Supplemented with citation tracing from key articles and books, and recent working papers on contemporary cases. Triangles denote studies of Syrian refugees; squares denote studies of IDPs; circles denote other populations. List of studies detailed in Appendix Table 15.

and only one-fifth during peace. Panel (d) reinforces this pattern at the dyad-year level. Plotting conflict severity against returnees reveals a positive relationship: higher battle deaths are associated with more, not fewer, returns.

These patterns are difficult to reconcile with security-based theories. If improved safety at home were the dominant driver, we would observe concentrated return after conflict termination and minimal return during war. Instead, most returns occur during conflict, and most post-conflict settings do not produce large-scale repatriation. This yields two central puzzles: why do refugees return during conflict, and why do they not return when conflict ends?

Existing studies have missed these patterns because the literature is dominated by micro-level, single-country analyses of return intentions—particularly of Syrian refugees—rather than cross-national studies of realized return (Figure 2).³ This focus has produced three limitations. First, it emphasizes within-group variation—what distinguishes individuals who intend to return from those who do not—while most variation in return occurs at the group level. Return episodes are concentrated and episodic, with the top 5 percent of dyad-years accounting for 93.7 percent of all returns (GRR). Second, because existing research has focused on specific cases, it overlooks common factors among host countries in unexamined contexts. Third, it analyzes intentions rather than realized behavior; when return is observed, it often diverges from these expectations.⁴

³The exception is Zakirova and Buzurukov (2021). See Appendix Table 15 for a full list of studies.

⁴For example, in the case studied by Alrababah et al. (2023) (Syrian return from Lebanon in 2020), GRR shows that roughly 21,000 Syrians returned despite ongoing conflict, driven in large part by coercive policies and facilitated repatriation. This contradicts the threshold model’s prediction that refugees return only when conditions are safe.

3 Theory

Why do refugees return during ongoing conflict, yet often remain in asylum even after peace? I argue that both patterns reflect the same underlying mechanism: refugees often prefer to remain in asylum in both war and peacetime, and large-scale return most often occurs not because conditions at home improve, but because conditions in the asylum country deteriorate. The ideal case is one in which war and persecution ends, refugees wish to return, and they have the resources to do so. In practice, however, this scenario represents a minority of cases.

3.1 When Refugees Return

A key assumption of security-based accounts is that once refugees reach asylum, they remain protected until conflict ends in their country of origin. In practice, this assumption often fails. Most refugees (67 percent) reside in neighboring countries, which means they remain in conflict-prone regions even after fleeing immediate violence (UNHCR, 2025). States bordering conflict zones face elevated risks of war, both because neighboring countries become involved in fighting and because structural risk factors for conflict cluster geographically (Fearon and Laitin, 2003; Collier and Hoeffler, 2004; Gleditsch, 2007). Refugees thus face a substantial risk that conflict will emerge in their country of asylum (Lischer, 2005). Living close to the border and absent resources for onward migration, many refugees return to their country. Take, for example, the Democratic Republic of the Congo in 1996–1997:

“In October, an outbreak of civil war in Zaire, which engulfed Rwandan refugee camps there, produced what UNHCR described as the ‘largest and swiftest’ repatriation in memory. About a half-million Rwandan refugees returned home during a four-day period in mid-November. Most returnees repatriated on foot, jamming the main Rwandan highway from the border. The sea of humanity stretched nearly 100 miles during the height of the return.” (*WRS, Zaire, 1997*)

Even absent conflict, asylum-country governments may force refugees to leave before peace has been achieved at home. Despite the prohibition on forced return under the 1951 Refugee Convention, many states circumvent or ignore *non-refoulement* (Schwartz, 2025).⁵ Governments that have not ratified the Convention face no formal legal constraint, while signatories often rely on indirect coercion, including withdrawal of residence permits, closure of schools and markets, and termination of food aid, to induce ostensibly “voluntary” repatriation. This echoes scholarship documenting how repatriation has been facilitated under conditions of coercion, shaped by political pressures from asylum states and donor governments (Chimni, 2004; Harrell-Bond, 1989; Long, 2013; Stein and Cuny, 1994). Michael Barnett’s work, in particular, documents how UNHCR has aided repatriation programs that fall short of the voluntariness standard it formally upholds (Barnett, 2001*a,b*; Barnett and Finnemore, 2004).

Iran’s treatment of Afghan refugees during the 1990s illustrates this pattern. Despite ongoing conflict in Afghanistan, Iranian authorities pursued a series of measures designed to induce return without formally violating *non-refoulement*. Afghans who had arrived in 1992 were reclassified as “illegal immigrants,” new registrations were curtailed, and refugee status was replaced with six-month temporary permits. Work-permit renewals were refused, worksite raids were conducted, and those without valid papers were deported. In March 1995, Iran announced that all refugees would be required to leave by March 1997. A 1999 law mandated the deportation of foreign workers without authorization, a category that encompassed the vast majority of Afghans in the country. Though framed as voluntary, these measures made continued residence in Iran untenable for many refugees and generated substantial return flows during periods when conditions in Afghanistan remained unsafe.

At the same time, the end of conflict does not automatically generate return. Most refugees spend at least a decade in asylum.⁶ Over time, they build new lives: they find work, start businesses, learn the

⁵This echoes a broader pattern of mass immigrant expulsions in Africa documented in Adida (2014).

⁶Approximately three-quarters of the world’s refugees live in protracted displacement, defined as exile lasting more

local language, raise children who have never been “home,” and develop social and economic networks in their host communities. In this sense, they become long-term migrants, and, as with migrants more broadly, the longer they remain abroad, the less likely they are to return (Borjas and Bratsberg, 1996; Van Hook and Zhang, 2011). This is especially the case when refugees are integrated in urban areas rather than camps; 60.8 percent of dyad-years in the sample. Asylum countries are also typically wealthier than origin countries: most refugees are hosted in the safer and more prosperous countries within low- and middle-income regions.

In addition, war does not mean the end of repression and broader conditions that would make refugees’ living conditions poor upon return. Civil wars often end in authoritarianism rather than democracy, and the human rights environment of a post-conflict state led by pro-government militias can be worse than the pre-conflict baseline (Karreth, Sullivan and Dezfuli, 2020; Carey and González, 2021). Refugees are often automatically granted refugee status on the basis of widespread conflict, known as *prima facie* recognition, and may not have qualified on the basis of fleeing an authoritarian regime alone (Hathaway and Foster, 2014). The grounds for their original status can thus dissolve with the end of war even as the repressive conditions that would deter return persist. Refugee scholars have made a parallel point, arguing that durable return requires more than the cessation of fighting, but also safe political and economic conditions for the refugee group (Bradley, 2013; Long, 2013).

Even when refugees would prefer to return, they may lack the means to do so. Relocating, rebuilding housing, and re-establishing livelihoods in a post-conflict economy carries substantial costs, which refugees who have spent years in asylum may lack the resources to cover. International assistance can offset these costs: UNHCR sometimes provides cash grants, transport, and reintegration packages to returnees. The repatriation of Sierra Leonean refugees from Guinea in the early 2000s illustrates the scale of support involved:

“About half of the returning refugees received assistance from UNHCR and other agencies in the form of transportation, cooked meals, and medical care during the journey home. . . Returnees received blankets, cooking utensils, shelter materials, and a two-month food supply. UNHCR appealed for a nine-fold increase in its budget, to \$18 million, to support reintegration programs including schools, health clinics, and livelihood programs.” (*Guinea & Sierra Leone, WRS, 2002–2004*)

When war ends, return requires uprooting established lives and moving back to a country with a damaged post-conflict economy and potential ongoing repression and future insecurity. Peace removes the immediate security barrier, but it does not eliminate the economic, social, and psychological costs of relocation. In the absence of strong push factors from the asylum country, refugees may choose to stay. Taken together, these dynamics suggest that refugee return should be modeled not as an automatic response to peace at home, but as a choice shaped by relative security and economic conditions in origin and asylum, coercive pressure from the host country, and the costs of relocation.

3.2 Formalization

I formalize the argument using a simple utility framework in which refugees choose between remaining in the asylum country (a) or returning to their country of origin (o). Expected welfare in each location depends on quality of life, which itself is a function of security, economic conditions, and political repression, and on any coercive push factors imposed by the host country. Return additionally requires the refugee to pay a one-time transition cost.

than five years without a durable solution (UNHCR, 2021). The mean conflict duration among protracted situations in the data is 13.3 years, and Devictor and Do (2016) show that refugees in protracted situations live in asylum for an average of 21 years.

Expected welfare from remaining in asylum is:

$$W_a = v_a(s_a, e_a) - \phi(p)$$

where s_a indexes security conditions in the asylum country, e_a indexes economic conditions (labor market access, wages, right to work, access to services), and v_a is strictly increasing in both arguments, capturing baseline quality of life in asylum. The term $\phi(p) \geq 0$ represents the additional welfare loss imposed by coercive host-country policies p aimed at inducing return, such as forced relocation, revocation of residence permits, closure of schools, or withdrawal of food aid. I treat ϕ as conceptually distinct from v_a because these policies are deliberate state actions targeting refugees for removal, rather than general conditions in the host country.

Expected welfare from returning to the origin country is:

$$W_o = v_o(s_o, e_o, \rho_o) - \tau$$

where s_o indexes security conditions in the origin country, e_o indexes economic conditions, and ρ_o indexes political repression, including restrictions on civil liberties and political persecution directed at the refugee's group. v_o is strictly increasing in s_o and e_o and strictly decreasing in ρ_o , and $\tau \geq 0$ is the one-time transition cost of returning, capturing lost livelihoods, disrupted schooling, and the psychological cost of uprooting.

A refugee returns if and only if two conditions hold. First, return is welfare-improving:

$$W_o > W_a \iff v_o(s_o, e_o, \rho_o) - v_a(s_a, e_a) + \phi(p) > \tau.$$

Second, the refugee can afford the transition cost:

$$r \geq \tau.$$

Refugees for whom the first holds but not the second are stranded: they would prefer to return but cannot afford to do so.

This formulation differs from the security-based accounts, such as the Alrababah et al. (2023) threshold model, in four ways. First, I remove the assumption that refugees consider return only once insecurity in the origin country falls below a safety threshold. Instead, return depends on a comparison of welfare across origin and asylum, allowing return to occur during ongoing origin-country conflict if remaining in asylum becomes sufficiently worse. Second, I allow quality of life in each location to depend not only on economic conditions but also on insecurity, reflecting that refugees' return decisions are shaped by safety as well as economic opportunity. Third, I separate political repression from active conflict, since post-war regimes can remain highly repressive even after violence subsides and these conditions can deter return on their own. Fourth, I introduce a transition cost and a feasibility constraint, which together explain why peace does not automatically generate large-scale repatriation and why repatriation assistance can meaningfully shift return behavior.

3.3 Hypotheses

The model yields four predictions. The first follows from $\phi(p)$ and the dependence of v_a on s_a . Both coercive host-country policies and armed conflict in the asylum country reduce W_a , narrowing the gap that justifies remaining.

H1 (Host-Country Push). The probability of return increases when the host country imposes coercive return policies or experiences armed conflict.

Table 1: Expected Patterns of Refugee Return

		Host-country push	
		Yes ($p > 0$ or s_a low)	No ($p = 0$ and s_a high)
Conflict ends	Yes (s_o high)	Return most likely (push + peace)	$v_a > v_o - \tau$ or $r < \tau \Rightarrow$ Stay $v_a < v_o - \tau$ and $r \geq \tau \Rightarrow$ Return
	No (s_o low)	Return likely (push only)	Stay

The second follows from v_a . Higher security and economic conditions in asylum raise the welfare cost of leaving.

H2 (Asylum Quality of Life). The probability of return decreases as quality of life in asylum rises relative to the origin country.

The third follows from v_o . Improvements in origin-country conditions, whether through declining violence, reduced state repression, or economic opportunity, raise the welfare value of return, though, as discussed below, the magnitude of this effect is bounded by the size of τ .

H3 (Origin-Country Conditions). The probability of return increases as origin-country security and quality of life improves.

The fourth follows from τ and the feasibility constraint $r \geq \tau$. Long displacement and urban integration raise transition costs, while repatriation assistance relaxes the feasibility constraint by transferring resources to refugees.

H4 (Transition Costs). The probability of return decreases with transition costs and increases with repatriation assistance.

Table 1 summarizes the expected patterns across combinations of host-country push and origin-country conflict. Return is most likely when push factors coincide with peace at home and remains likely when push factors are present during ongoing conflict. Absent push factors, refugees return only if origin-country conditions become substantially better than those in asylum, net of transition costs.

The model also generates a prediction about aggregate patterns. Because push factors are widespread, $v_a > v_o$ typically holds, and transition costs are generally high, most global return should occur during ongoing conflict rather than after its termination. I provide descriptive evidence for these conditions in Section 5.5.

4 Data and Empirical Strategy

4.1 The Global Refugee Return (GRR) Dataset

To test the theory, I introduce the Global Refugee Return (GRR) dataset, which covers all protracted refugee situations at the origin–asylum dyad–year level from 1980 to 2023. The dataset includes origin countries with at least 25,000 refugees in exile in any year, consistent with UNHCR’s definition of a protracted refugee situation. For each origin country, I include all asylum countries accounting for at least 75 percent of the total refugee population.⁷ The resulting sample comprises 293 dyads across 87

⁷The 75 percent threshold is calculated using UNHCR data, supplemented with Palestinian refugees under UNRWA and Mozambican refugees in South Africa, listed as “Unknown” in UNHCR data.

origin and 93 asylum countries.

GRR makes two contributions. First, it corrects systematic measurement error in UNHCR data on refugee stocks and returns. UNHCR records only voluntary repatriations, excluding forced returns,⁸ and captures spontaneous returns incompletely, since refugees who return without UNHCR assistance may not be recorded. Stock figures often reflect “planning estimates” negotiated with host governments rather than actual counts, omit large unregistered populations, and are not revised retroactively when more accurate censuses become available. These problems are compounded by political incentives: host governments may overstate stocks to sustain aid flows, while origin governments may overstate returns to signal post-conflict stability. UNHCR, which depends on the cooperation of these governments, may adopt government figures rather than risk losing access.

Rather than relying on official statistics, GRR reconstructs stocks and returns using qualitative assessments from experts in each context. The primary source is the *World Refugee Survey* (WRS), published annually from 1980 to 2008, which reports on stocks, forced and spontaneous returns, and unregistered populations, as well as providing a qualitative assessment of the reliability of official data. The WRS draws on consultations with governments, international organizations, and field-based sources, and is widely regarded as an authoritative account of refugee conditions (USCRI, 2008). Since reports are organized by host country rather than by return event, they capture smaller return movements as well as large or highly salient episodes. For 2009–2023, I draw on the U.S. Department of State’s *Country Reports on Human Rights Practices*. Because these reports less frequently include stock and return statistics, for these years I use UNHCR data as a baseline and supplement with information on unregistered populations and forced returns.

Second, GRR complements existing *de jure* datasets such as DWRAP by introducing two measures of refugees’ *de facto* conditions in asylum: forced return practices and the share of each refugee population living in camps (Blair, Grossman and Weinstein, 2022).⁹ Additionally, GRR includes new data on UNHCR financing, measuring both overall funding per refugee within each asylum country and funding per refugee allocated specifically to repatriation.

The dataset was constructed through detailed coding of archival reports. I hand-coded the 25 largest refugee-producing countries and their primary asylum destinations (83 dyads); smaller cases were coded by trained research assistants using a standardized protocol and subsequently reviewed. I cross-validated major discrepancies between GRR and UNHCR figures and assessed internal consistency through desk research. Additional details, including dyad-level plots comparing GRR and UNHCR data, are provided in the Appendix.

The value of these corrections is illustrated by the example of Ethiopian and Eritrean refugees in the Horn of Africa. UNHCR data record 2 million Ethiopian refugees in Somalia in 1980, falling to 700,000 in 1981 and remaining around that figure until 1988; GRR records 700,000 throughout the early 1980s, declining to 350,000 by 1988. The WRS indicates that the decline in official statistics reflected “more accurate counting” rather than large-scale return (Somalia, 1982), and that the Somali government’s later figure of 840,000 was “arbitrarily agreed upon by the government and UNHCR” and “always considered far too high” by others (WRS, Somalia, 1989). UNHCR data also miss the pushed return that followed: as the Somali civil war engulfed refugee-hosting areas in 1990–1991, large numbers of Ethiopian refugees fled back to Ethiopia, yet UNHCR records no repatriations because its personnel had been evacuated. The reverse problem appears in Sudan, where UNHCR data show

⁸Note that such repatriations often include returns that are coerced in practice but classified as voluntary.

⁹Existing data on camp residence are insufficient for this purpose: UNHCR accommodation data tend to undercount camp populations, while Zhou and Shaver’s (2021) refugee site data do not identify which refugee groups occupy each site or what share of each group lives in camps, limiting their use for studying variation across groups facing different conditions within the same country.

a sharp drop in the Eritrean refugee stock after the fall of the Mengistu regime in 1991, but GRR records no comparable decline because large-scale repatriation was delayed by funding disputes; only “some 10,000 Eritreans returned by their own means” in the year of independence (WRS, Sudan, 1992). This case is discussed in more detail in Section 7.

GRR has several limitations. Because the WRS reports only on countries hosting large refugee populations, the sample is biased toward major cases and excludes smaller dyads. This focus on major cases is defensible, as most refugee stocks and returns are concentrated in the settings where reporting is richest. Coverage in high-income asylum countries is also weaker, as WRS and USHR reports often discuss refugee treatment in aggregate rather than by origin group. Stock and return figures rely on expert assessments and may be imprecise, particularly where governments restrict access, though triangulation across multiple in-country sources likely improves on UNHCR statistics that depend on operational presence. The forced return measure requires subjective coding of severity, but underlying quotations are provided to allow independent evaluation. The transition from WRS to U.S. State Department reports in 2009 may introduce measurement discontinuities, and both sources reflect a U.S. perspective. To reduce these concerns, I review every dyad in the dataset, investigate apparent inconsistencies through desk research, prioritize consistency within dyads given the two-way fixed-effects design, and conduct robustness checks using alternative samples. While GRR is not free from measurement error, it provides a more internally consistent account of refugee stocks and returns than existing alternatives.

4.2 Specification

To understand which factors predict return within dyads, I estimate Poisson pseudo-maximum likelihood (PPML) models with dyad and year fixed effects.¹⁰ The unit of analysis is the directed dyad-year. The dependent variable is the count of refugees in dyad i (from origin o hosted in asylum a) who returned in year t . I include the log of the previous year’s refugee stock so that estimated coefficients describe proportional changes in the return rate rather than in the absolute level of returns. I restrict the estimation sample to dyad-years with more than 1,000 refugees in the previous year, which reduces the risk of small-denominator observations producing unstable return rate estimates. Identification comes from within-dyad variation over time; dyad fixed effects absorb all time-invariant dyad characteristics and year fixed effects account for common temporal shocks. Standard errors are clustered at the dyad level.

The baseline specification takes the following form:

$$E[Y_{it} \mid \mathbf{X}_{it}] = \exp(\beta' \mathbf{X}_{it} + \alpha_i + \gamma_t + \ln S_{it-1}) \quad (1)$$

where Y_{it} is the count of returnees from dyad i in year t ; \mathbf{X}_{it} is a vector of covariates; α_i and γ_t denote dyad and year fixed effects; and $\ln S_{it-1}$ is the log of the lagged refugee stock. Continuous covariates are standardized to facilitate comparison of effect sizes.

To interpret the substantive magnitude of the estimated effects, I compute predicted return rates under theoretically motivated scenarios using the main PPML model. For each scenario, I set the variables of interest to specified values while holding all other covariates at their observed levels, then average predicted return rates across all dyad-years in the estimation sample. I use these predictions in three ways: to examine the interaction between origin-country conflict and asylum-country push factors, to isolate the role of relative quality of life and transition costs in the absence of push factors,

¹⁰The PPML estimator is well suited to this setting: the dependent variable (refugee return counts) is non-negative and highly right-skewed with a mass of observations at or near zero. PPML handles this distributional feature while remaining consistent under heteroskedasticity, unlike log-linearized OLS which requires dropping zero-valued observations.

and to conduct a counterfactual simulation that quantifies each factor’s contribution to the aggregate returns observed in the data.

4.3 Independent Variables

The theory highlights four sets of determinants: asylum-country push factors, asylum-country quality of life, origin-country conditions, and transition costs. For asylum-country push factors (H1), *Conflict in COA* is coded using UCDP data as 0 (no conflict), 1 (low-intensity, 25–999 battle deaths), or 2 (high-intensity, 1,000+ battle deaths) (UCDP, 2024), and entered as indicator variables with no conflict as the reference category. *Forced Return* is an ordinal measure of coercive return policies at the asylum–origin dyad level, hand-coded from the World Refugee Survey and USHR archival records. It takes values 0 (none), 1 (moderate), and 2 (severe), and is entered as indicator variables with no forced return as the reference category. *Moderate* captures threats, encouragement, or attempts to induce return without policy implementation, or implemented policies targeting fewer than 10 percent of the refugee stock; *severe* captures implemented policies intended or expected to affect at least 10 percent. Coding reflects the policy itself, not realized return. Table 6 in the Appendix provides examples.

For asylum quality of life (H2), *GDP (COA)* is the log of GDP per capita (?), and *Education (COA)* is mean years of schooling for the population aged 20–24, drawn from the Wittgenstein Centre Human Capital Data Explorer (SSP2 reconstruction) and linearly interpolated from five-year to annual frequency (?). *Refugee Rights* is the DWRAP index of legal rights afforded to refugees in the asylum country, standardized on the estimation sample (Blair, Grossman and Weinstein, 2022). For origin-country conditions (H3), *Conflict in COO* is coded analogously to *Conflict in COA*. To capture non-violent state repression, I include *Civil Liberties Restrictions (COO)*, the Freedom House civil liberties index (1 = most free, 7 = least free), standardized on the estimation sample (?). *GDP (COO)* and *Education (COO)* are constructed analogously to their asylum-country counterparts.

For transition costs (H4), *Conflict Duration* is the log of cumulative years of conflict in the origin country. *Urban* is an ordinal measure of settlement type, coded 3 if the vast majority of refugees reside in non-camp settings, 2 if most do, and 1 if most reside in camps; it is hand-coded from the World Refugee Survey and UNHCR archival records and standardized on the estimation sample. *Repatriation Assistance* is the log of UNHCR repatriation funding per member of the origin country’s global refugee population, standardized across the sample. Funding is hand-coded from UNHCR Executive Committee documents (1980–2009) and UNHCR Yearbooks (2010–2023) and is available for a smaller subset of dyad-years; it is therefore tested in a separate specification. Section 6 assesses whether the results are robust to a wide range of alternative measures of conflict, broader persecution, welfare, and transition costs.

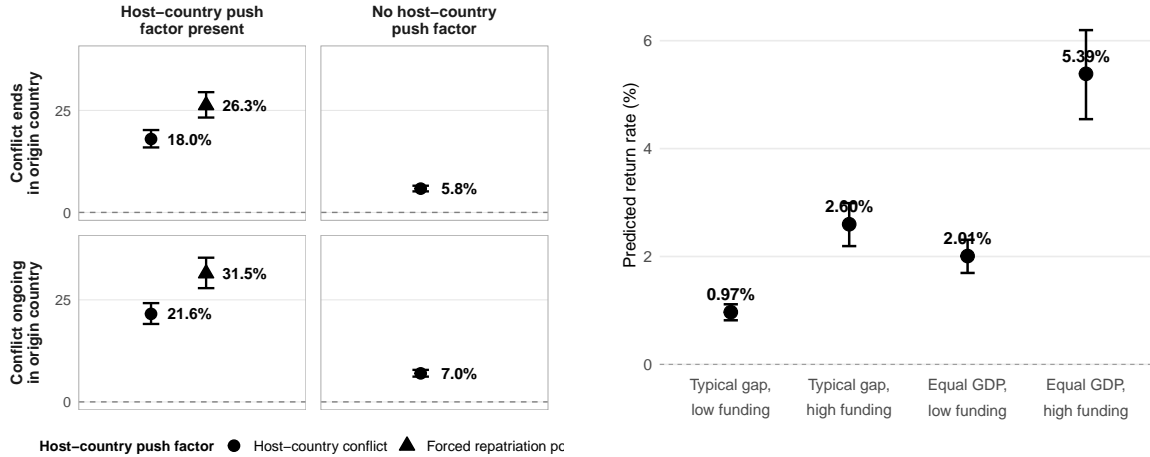
5 Results

Table 2 presents the main PPML results on refugee return. The dependent variable is the annual return rate with a mean of 11.0 percent on the Model 2 estimation sample.¹¹ Model 1 includes the core independent variables on security and push factors for H1 and H3; Model 2 adds the quality-of-life variables in origin and asylum; Model 3 adds repatriation assistance, which I test separately because it is available for only a subset of observations; Model 4 runs Model 2 on the sample of dyad-years for which there is no asylum-country conflict or severe forced return policies. I focus on Model 2 below. For each hypothesis, I report coefficient estimates and predicted return rates. Section 5.5 then turns

¹¹The regression sample is smaller than the broader filtered sample reported in Table 7 of the Appendix (mean 5.3 percent) because PPML with fixed effects drops dyads without within-dyad variation in returns. Percentage-point translations below are anchored to the regression-sample mean of 11.0 percent.

Figure 3: Predicted Repatriation Rates

(a) By origin-country conflict and asylum-country push
 (b) By relative quality of life and repatriation funding push



Note: Panel (a) shows predicted repatriation rates computed by setting the relevant indicators and averaging predicted values over all dyad-years in the estimation sample. The left column varies origin-country conflict, holding asylum-country push factors at one; the right column varies origin-country conflict, holding host-country push factors at zero. Panel (b) shows predicted repatriation rates under no host-country push factor and peace in the origin country. The “typical gap” columns hold origin and asylum GDP at their respective sample medians; the “equal GDP” columns set both to the pooled midpoint. Low and high funding correspond, respectively, to no UNHCR repatriation funding and the 90th percentile of funding per capita. Using Model 3 in Table 2. Error bars are bootstrapped 95 percent confidence intervals (500 replications).

to the aggregate pattern (H5).

5.1 Hypothesis 1: Host-Country Push Factors Drive Return

H1 predicts that return rises when the host country imposes coercive policies or when security conditions in the asylum country deteriorate. The results strongly support this prediction. A shift from no forced return policy to severe forced return is associated with an approximately 34 percentage point increase in the return rate (1.408, $p < 0.001$)—roughly three times the sample mean and the largest effect in the model. High-intensity asylum-country conflict produces the next-largest effect, raising the return rate by approximately 15 percentage points (0.844, $p < 0.01$). Low-intensity asylum-country conflict and moderate forced return produce smaller but still positive effects, on the order of 5 to 6 percentage points each (0.457, $p < 0.10$ and 0.354, $p < 0.10$, respectively). The two largest push-factor effects are far larger than any origin-side coefficient discussed below.

Figure 3a translates these estimates into predicted return rates, mirroring the 2×2 typology in Table 1. When there is no host-country push and origin-country conflict has ended, the predicted return rate is 5.8 percent. The presence of a host-country push factor produces substantially higher rates: host-country conflict yields 18.0 percent under origin-country peace and 21.6 percent under ongoing origin conflict, while forced return policy yields 26.3 and 31.5 percent, respectively. Push factors thus generate substantial return even when conflict is ongoing at home, consistent with the key prediction of H1 that return may occur during origin-country conflict when asylum conditions deteriorate sufficiently.

5.2 Hypothesis 2: Asylum Quality of Life Reduces Return

H2 predicts that return becomes less likely as quality of life in asylum improves. I capture asylum quality of life with three variables: GDP per capita in the host country, average years of education

Table 2: Poisson Pseudo-Maximum Likelihood Estimates of Refugee Return

Dependent Variable: Model:	(1)	Total Repatriation		
		(2)	(3)	(4)
Variables				
<i>H1: Asylum-country push</i>				
Conflict in COA: High	1.058*** (0.3041)	0.8444** (0.2840)	1.127** (0.3796)	
Conflict in COA: Low	0.4685† (0.2762)	0.4574† (0.2372)	0.9039* (0.3966)	
Forced Return: Severe	1.410*** (0.2698)	1.408*** (0.2587)	1.505*** (0.2732)	
Forced Return: Moderate	0.4979* (0.2461)	0.3539† (0.2009)	0.2941 (0.2660)	
<i>H2: Asylum quality of life</i>				
GDP (COA)		-0.6088† (0.3515)	-0.3654 (0.4568)	-0.9564* (0.3990)
Education (COA)		-0.0580 (0.3688)	-0.0176 (0.3827)	-0.6659 (0.5623)
Refugee Rights		0.0608 (0.1668)	-0.0885 (0.2215)	-0.4737* (0.1896)
<i>H3: Origin-country conditions</i>				
Conflict in COO: High	-0.1816 (0.3453)	0.0630 (0.2896)	0.1813 (0.3553)	0.3959 (0.5906)
Conflict in COO: Low	0.1904 (0.3214)	0.0442 (0.2119)	0.0827 (0.2497)	-0.1200 (0.4407)
Civil Liberties Restrictions (COO)	-0.3897 (0.2475)	-0.5748*** (0.1456)	-0.2523 (0.2864)	-0.5748† (0.3182)
GDP (COO)		0.5129† (0.2845)	0.6353 (0.4482)	1.061*** (0.2923)
Education (COO)		0.0483 (0.2305)	0.8472† (0.4984)	-0.4462 (0.4881)
<i>H4: Transition costs</i>				
Conflict Duration		-0.0268 (0.0969)	-0.1414 (0.1329)	0.0904 (0.1443)
Urban		0.0018 (0.1417)	0.0767 (0.2332)	0.0278 (0.1067)
Repatriation Assistance			0.3970** (0.1222)	
Dyad & Year FE	Yes	Yes	Yes	Yes
Sample	Full	Full	Full	No-push
Observations	2,616	2,177	1,287	1,107
Squared Correlation	0.52120	0.83692	0.87708	0.82274
Pseudo R ²	0.70120	0.75721	0.77669	0.74822

Clustered (Dyad) standard-errors in parentheses
*Signif. Codes: ***: 0.001, **: 0.01, *: 0.05, †: 0.1*

Notes: COO = country of origin; COA = country of asylum. Model 1 includes the three core push predictors. Model 2 adds covariates capturing relative quality of life and origin-country conditions. Model 3 adds UNHCR repatriation assistance, available for a smaller subset of dyad-years. Model 4 restricts the sample to dyad-years without push factors—no COA conflict at either intensity and no severe forced return. All models are Poisson pseudo-maximum likelihood with dyad and year fixed effects and the log of the lagged refugee stock included as an offset. Standard errors are clustered at the dyad level and shown in parentheses. Significance levels: *** $p < 0.001$, ** $p < 0.01$, * $p < 0.05$, † $p < 0.10$.

for young people in the host country, and a measure of refugee rights. In the full-sample specification (Model 2), these effects are weak. A one-standard-deviation increase in asylum-country GDP is associated with an approximately 5 percentage point reduction in the return rate (-0.609 , $p < 0.10$); the coefficients on education (-0.058) and refugee rights (0.061) are not statistically distinguishable from zero.

In the no-push sample (Model 4), asylum quality of life matters more. A one-standard-deviation increase in asylum-country GDP is associated with a 60 percent reduction in the return rate (-0.956 , $p < 0.05$), and a one-standard-deviation increase in refugee rights produces a 38 percent reduction (-0.474 , $p < 0.05$). In the absence of coercive push factors, refugees are less likely to return when host-country incomes are higher and when their legal status in asylum is more secure. Formal interaction tests confirm this conditional pattern, but only for the economic dimension: the asylum-country GDP effect roughly doubles in magnitude when push factors are absent, but there is no interaction effect for refugee rights (Section 6).

5.3 Hypothesis 3: Origin-Country Repression Predicts Return more than Security

H3 predicts that return rises as origin-country security and quality of life improve. The results support the quality-of-life component of this prediction, but not the expectation that improved security increases return. Neither high- nor low-intensity origin-country conflict is statistically distinguishable from zero, with coefficients of 0.063 and 0.044 , respectively. On the basis of the PPML estimates alone, we cannot reject the null that origin-country conflict has any effect on return (see robustness checks).

Other origin-country conditions, however, matter substantially. A one-standard-deviation increase in civil liberties restrictions is associated with a 5 percentage point reduction in the return rate—a 44 percent reduction relative to the sample mean (-0.575 , $p < 0.001$). Origin-country GDP has the expected positive sign and a slightly larger magnitude, though it is less precisely estimated: a one-standard-deviation increase raises the return rate by approximately 7 percentage points (0.513 , $p < 0.10$). Both effects are substantially smaller than the severe-forced-return and high-intensity asylum-conflict effects in H1.

The predicted probabilities in Figure 3a reinforce this reading. Within each push category, the shifts between ongoing and ended origin-country conflict are small in magnitude—on the order of 1 to 5 percentage points—and not in the direction H3 anticipated. They are dwarfed by the across-column differences, which reflect the presence or absence of a host-country push factor and rest on more precisely estimated coefficients. Combined with the strongly negative civil liberties coefficient, the overall pattern reveals an asymmetry within H3 itself: refugees respond to political and economic conditions in the origin country, but not to the security environment per se.

5.4 Hypothesis 4: Transition Costs Reduce Return

H4 predicts that return falls as the cost of moving increases and rises when resources to cover repatriation are available. Of the three variables capturing transition costs, only repatriation assistance is significantly associated with return. Urban integration (0.002 , n.s.) and conflict duration (-0.027 , n.s.) are statistically and substantively indistinguishable from zero, suggesting that—at least in this dyadic, cross-national setting—neither settlement type nor accumulated time in asylum systematically predicts return.

Repatriation assistance, available for the smaller subset of dyad-years in Model 3, is strongly associated with higher return. A one-standard-deviation increase in UNHCR repatriation funding per capita is

Table 3: Counterfactual decomposition

Counterfactual	Δ returns
GDP parity (host = origin)	+86.3%
Origin civil liberties at midpoint (FH = 4)	+53.9%
No repatriation funding	-45.1%
No asylum-country conflict	-36.1%
No forced repatriation policy	-26.9%
No origin-country conflict	-8.5%

Note: Change in predicted returns when each factor is shifted to a benchmark value, summed over the Model 4 estimation sample (dyad-years with non-missing repatriation funding). GDP parity sets origin and asylum log GDP to the pooled midpoint; civil liberties to FH = 4; repatriation funding to zero; conflict and forced-return counterfactuals zero out both intensity dummies.

associated with an approximately 5 percentage point increase in the return rate—a 49 percent increase relative to the sample mean (0.397, $p < 0.01$). This effect is similar in magnitude to the civil liberties effect in H3 and the asylum-country GDP effect in H2, but considerably smaller than the severe-forced-return and high-intensity asylum-conflict effects in H1.

Figure 3b shows how quality of life and repatriation funding interact when origin-country conflict has ended and push factors are absent. At a typical GDP gap, raising funding from zero to its 90th-percentile value lifts the predicted rate from 0.97 to 2.60 percent; with origin and asylum GDP equalized, the same funding shift moves the rate from 2.01 to 5.39 percent—a roughly fivefold range across the four scenarios. Both factors jointly shape return, but even their combined effect leaves the predicted rate well below the 18–32 percent rates produced by host-country push factors in Figure 3a. In the absence of push, pull factors and external resources generate only modest return.

5.5 Aggregate Patterns

The regression estimates show which factors drive return *within* dyads. To explain why most return occurs during conflict *globally*, I use a counterfactual simulation to assess the aggregate magnitude of each factor’s contribution. For each counterfactual, I set the relevant predictor to zero (or, for GDP, to the value corresponding to equal GDP per capita across host and origin; for civil liberties, to the sample midpoint score of 5.3), recompute predicted returns for every dyad-year in the estimation sample, and sum across the full panel.

The largest counterfactual effect comes from closing the economic gap between host and origin: setting GDP to parity would have increased predicted returns by 86.3 percent. The next-largest single factor is origin-country repression: improving civil liberties to the sample midpoint (a Freedom House score of 4) would have raised predicted returns by 53.9 percent—reinforcing the H3 finding that repression, rather than conflict, is the origin condition that most shapes return. Three further factors contribute substantially: withdrawing UNHCR repatriation funding entirely would have reduced predicted returns by 45.1 percent, eliminating asylum-country conflict by 36.1 percent, and removing forced repatriation policies by 26.9 percent. By contrast, removing origin-country conflict has only a small aggregate effect, and one that runs against H3’s predicted direction: predicted returns fall by 8.5 percent. This pattern echoes the regression evidence: it is repression and economic conditions, not war-ending, that drive the origin-side share of aggregate return.

These aggregate effects depend not only on the magnitude of each factor’s impact, but also on how frequently these conditions occur. I document four descriptive facts about their distribution. First,

asylum-country push factors are widespread. Figure 4 shows that among the largest refugee-hosting dyads, 82.5 percent experienced asylum-country conflict and 72.5 percent had a forced return policy at some point. Across the full sample, 20.2 percent of dyad-years involve asylum-country conflict, comparable to the 28.0 percent with origin-country conflict. Consistent with the theory, 77.5 percent of returns occur in years with at least one asylum-country push factor.

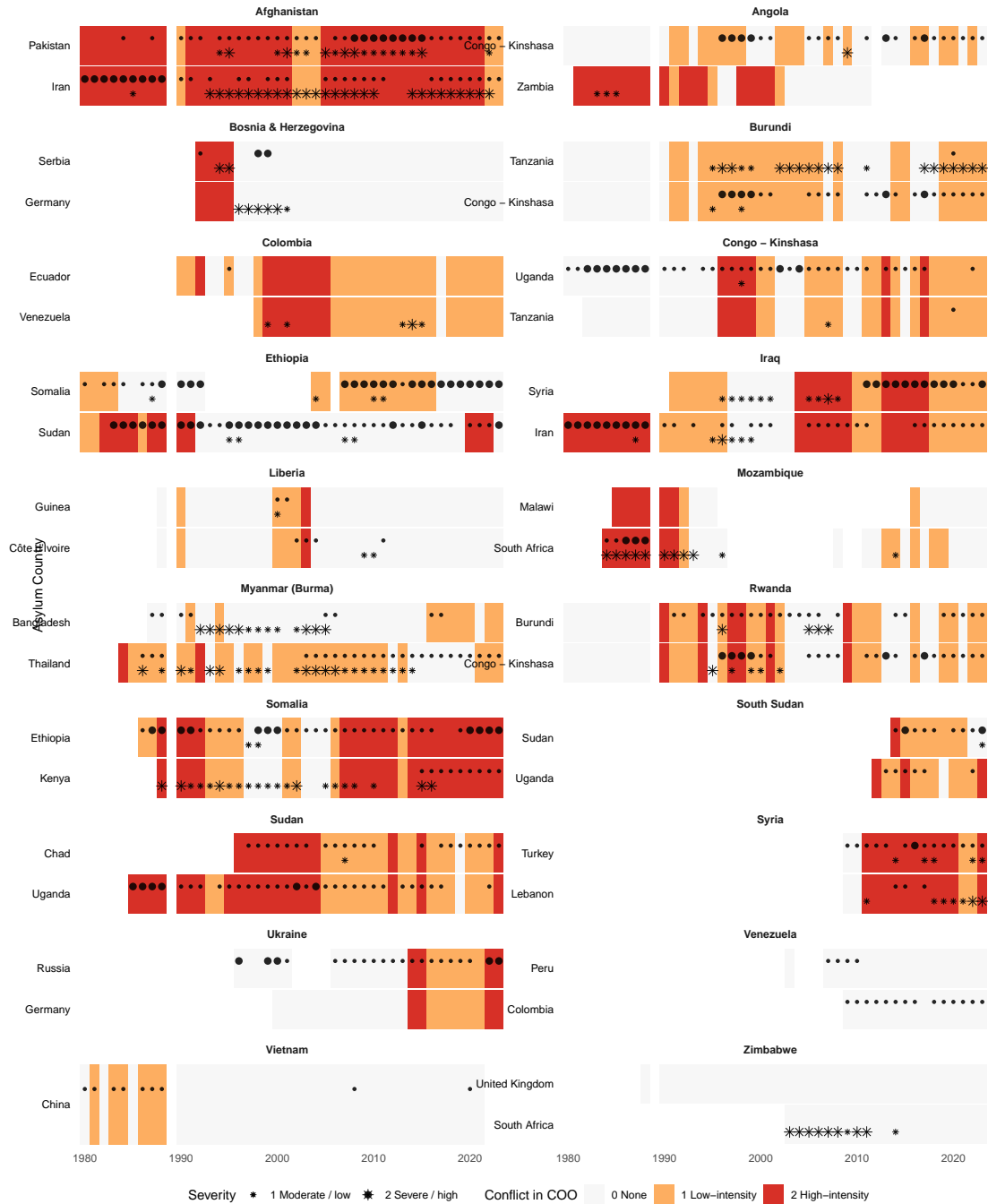
Second, quality of life in asylum typically exceeds that in the origin country: outside Europe and North America, GDP per capita is higher in asylum than origin countries on average (\$2,752 vs. \$1,040). In origin-peace years without push factors, origin-richer dyads host only 24 percent of refugees yet account for 43 percent of returns, confirming that return is disproportionately concentrated where the origin country offers better economic prospects. Third, transition costs are high. Repatriation funding is typically modest in scale: even among origin-country-years that received any UNHCR repatriation funding, 27 percent were allocated less than \$100 per returnee, with a median of \$265. The distribution is highly skewed: a small number of generously funded operations pull the mean to \$889 per returnee, while most returns take place with far less international support.

Fourth, origin-country repression continues beyond conflict. Among origin countries that experienced both peace and conflict during the sample period, 88 percent of refugees come from “Not Free” countries in years of high-intensity war; this falls only modestly, to 82 percent, when the same origins are at peace.¹²

These conditions explain the aggregate patterns in Section 2. Because asylum-country shocks are frequent, much of global return is driven by host-country push during ongoing conflict. The end of armed conflict, by contrast, rarely produces large-scale repatriation: repression continues after war ends, quality of life in asylum typically exceeds that at home, and transition costs remain high.

¹²The corresponding origin-country-year shares are 79 percent during high-intensity conflict and 54 percent during peace.

Figure 4: Origin-Country Conflict and Asylum-Country Push in Major Refugee Situations



Note: The 20 largest refugee-producing origin countries and their two largest asylum countries. Each tile represents a dyad-year. Background color indicates origin-country conflict intensity. Circles denote asylum-country conflict; stars indicate forced return policies.

6 Alternative Explanations and Robustness

I address the main alternative explanations here; full results are reported in Appendix Tables 8–19 and Figure 5. The main concern is that UCDP conflict measures may not capture the kind of definitive war termination that refugee return requires. I re-estimate the model using Fearon’s (2017) civil war coding (which dates discrete war episodes rather than annual conflict thresholds), logged battle deaths, lagged origin-country conflict, a de-escalation indicator, an indicator for peace agreements, and broader political violence (PITF). Origin-country conflict is generally null, with the expected negative sign emerging only in the Fearon specification and with a smaller magnitude than asylum-side push factors.

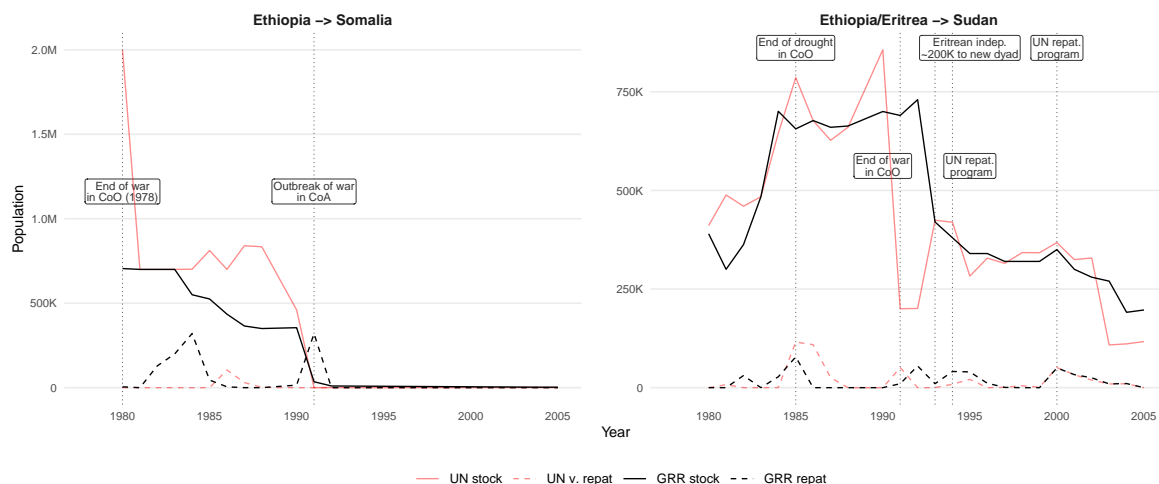
I conduct a range of additional measurement and sample checks. I examine a wider set of repression measures: ethnic exclusion (EPR), political terror (PTS), and genocide or politicide. The EPR analysis finds that members of dominant ethnic groups are more likely to return. I use voluntary returns and a three-year moving average as alternative dependent variables; replace continuous GDP with quartile dummies to relax linearity assumptions; add UNHCR per-refugee funding as a proxy for repatriation funding; exclude unregistered refugees from the stock in the offset; and restrict the sample to the WRS period (1980–2008), to only refugees who originally fled armed conflict rather than other forms of persecution, to the top three asylum countries per origin, and to dyads with asylum countries outside Europe and North America. To address potential reverse causality — the concern that large refugee populations may themselves contribute to host-state conflict — I lag all independent variables by one year and exclude dyads associated with the “refugee warrior” hypothesis (Zolberg, Suhrke and Aguayo, 1989; Salehyan and Gleditsch, 2006).

I re-estimate under OLS on logged returns, two-way clustering by origin and asylum, and negative binomial (which relaxes the Poisson equidispersion assumption). I also add origin-by-year fixed effects, which absorb all time-varying origin-country confounders and identify asylum-side variables from variation across hosts within the same origin-year. Because returns are highly concentrated in a small number of canonical episodes, I assess whether the estimates are carried by those cases by dropping the top dyads and dyad-years and, separately, restricting the sample to the top ten dyads alone. A pooled PPML specification omits dyad fixed effects to exploit cross-case variation across the full panel rather than the smaller within-dyad sample, and an interaction model lets pull-factor coefficients vary by whether asylum-country push is present, testing whether push and pull operate conditionally rather than independently. Finally, leave-one-out analyses iteratively exclude each origin country, asylum country, and region; severe forced return policies are stable across every exclusion, with no single unit driving the result.

The asylum-side push channels remain the most robust predictors of return: severe forced return is significant in nearly all specifications, and asylum-country conflict and origin-country repression retain their signs throughout, though precision varies. Origin-country conflict is generally null, with the expected negative sign emerging in the aforementioned Fearon specification, the lagged IV model, and when the top 5 percent of dyad-years are dropped; even where significant, the magnitudes remain smaller than those of the push factors. The interaction model further shows that origin-country GDP becomes a stronger predictor of return when asylum-side push is absent, consistent with pull factors operating conditionally rather than uniformly.

7 Case Study: Ethiopian Refugees in Somalia and Sudan

Figure 5: Returns of Ethiopian/Eritrean refugees from Somalia and Sudan (1980–2005)



Note: The 1993 drop in refugee stock in the Ethiopia/Eritrea → Sudan panel reflects splitting of this dyad into Ethiopia and Eritrea at Eritrean independence; approximately 200,000 refugees previously recorded under Ethiopia were reassigned to the new dyad. In the Ethiopia → Somalia panel, civil war broke out in Somalia in 1991, but UCDP begins coding the conflict as severe from 1988. *Source:* GRR and WRS archives.

The statistical analysis above identifies which factors predict return within dyads and presents descriptive patterns to understand global trends across all protracted refugee situations. To trace the theory’s mechanisms in a specific context, I examine two dyads from the same origin country that together illustrate the core mechanisms. Ethiopian displacement produced two major refugee populations during the Cold War: ethnic Somalis who fled the Ogaden War into Somalia, and Tigrayans and Eritreans who fled the civil war into Sudan. Figure 5 plots refugee stocks and returns for both dyads and overlays UNHCR data on the GRR estimates, demonstrating the substantial data discrepancies described for this case in Section 4.1.

Ethiopia → Somalia: Push-Driven Return

An estimated 700,000 Ethiopians were displaced into Somalia by the Ogaden War in 1977–78. In the early 1980s, the end of active fighting in the Ogaden, combined with a UNHCR repatriation program providing cash grants and six months of food rations, generated substantial return among refugees. The transition costs for these refugees were comparatively low: most were living in camps in poor conditions rather than integrated into Somali communities, and had been in asylum for only a few years.¹³ Yet more than half chose to stay. As conditions in the camps improved and a local settlement program allowed refugees to cultivate land, expected quality of life in Somalia came to exceed what many anticipated at home, even after insecurity in the origin country had fallen.¹⁴

By 1990–1991, a new wave of Ethiopian refugees, largely Oromos displaced by forced villagization, had joined the remaining Ogaden refugees. Ethiopia remained insecure. Yet mass return occurred,

¹³Initial camp conditions were severe: “Problems of water supply, firewood stripped from an almost bare landscape, disease and starvation face refugees and relief officials daily” (WRS, Somalia, 1981).

¹⁴By the mid-1980s, conditions had improved to the point where local Somalis obtained food in the camps, “where conditions are often better than in the surrounding desert” (WRS, Somalia, 1985).

effectively ending the protracted situation. The driver was not improving conditions at home but the collapse of conditions in asylum:

“Beginning in December 1990, as fighting in the Somali civil war intensified in areas where the refugees lived, UNHCR personnel were evacuated from Somalia, and assistance programs for the refugees stopped. Large numbers of Ethiopian refugees began fleeing Somalia and returning to Ethiopia. . . Only some 35,000 Ethiopians who were trapped at Qoryoley refugee camp or who fled from various camps to Mogadishu expecting to find help there stayed in Somalia.” (*WRS, Somalia, 1991–1992*)

This episode illustrates Hypothesis 1: when insecurity in asylum rises sufficiently, refugees return even when the origin country remains insecure. It corresponds to the lower-left cell of Table 1, where origin-country conflict is ongoing but there is a host-country push present, so refugees return.

Ethiopia/Eritrea → Sudan: Non-Return Despite Peace

The second dyad tells a contrasting story. An estimated 700,000 Tigrayans and Eritreans fled Ethiopia’s civil war into Sudan beginning in the 1960s. This case illustrates that the end of conflict is not sufficient to prompt return when transition costs are high and quality of life in asylum exceeds that at home (Hypotheses 2 and 4).

In May 1991, the Mengistu regime fell and the EPLF took control of Eritrea, ending the conflict. Under conventional accounts, this should have triggered large-scale repatriation. Instead, only about 10,000 returned in the year of independence. A dispute between the Eritrean government and UNHCR over repatriation funding prevented the launch of a return program; Eritrea demanded more rehabilitation assistance than donors were willing to provide. Without adequate support to reduce transition costs, the return condition remained unsatisfied for most refugees even though the origin country was at peace.

A repatriation program began in 1994 and generated some return, approximately 81,000 over two years, but roughly 320,000 remained. The stalled return was attributed to “financial disputes over the scope of the repatriation program, and deteriorating relations between the governments of Sudan and Eritrea” (*WRS, Sudan, 1997*), alongside insecurity at the border. When a second program launched around 2000, providing transportation, reintegration grants, and housing, return accelerated: approximately 130,000 repatriated over five years, consistent with Hypothesis 4’s prediction that reducing transition costs increases return. Yet even then, approximately 200,000 refugees chose to remain. In 2002, UNHCR invoked the cessation clause, revoking Eritreans’ refugee status and requiring them to “repatriate, file individualized asylum claims to remain in Sudan as refugees, or take steps to become permanent legal residents of Sudan” (*WRS, Sudan, 2003*). Only 20,000 repatriated; the vast majority stayed.

The archival evidence points to quality-of-life considerations as the primary explanation. On the origin side, a survey found that roughly 85 percent of refugee households indicated that assistance levels in Eritrea would be a major determinant of their return decision (*WRS, Sudan, 1997*). On the asylum side, refugees had built substantial lives over decades. By the early 1990s, half lived in camps with access to food aid, health and education programs, and technical training, often among relatives or co-ethnics and renting agricultural land, while the other half lived in urban areas.¹⁵ When encouraged to return in 2001, for example, many chose to remain longer to harvest their crops.¹⁶ For

¹⁵“Eritrean refugees who had lived for decades in settlements in the east among relatives or members of similar ethnic groups were able to farm and graze their livestock” (*WRS, Sudan, 2005*). Camp residents “received food aid, health and education programs, literacy and technical training, and special aid for women and children from UNHCR and other assistance groups. About 12,000 children attended 30 refugee schools in the camps” (*WRS, Sudan, 1999*).

¹⁶“Many other would-be returnees chose to remain longer in Sudan to harvest their crops” (*WRS, Sudan, 2002*). This

this population, the quality of life built over decades of exile exceeded what they expected in Eritrea, and they opted to stay even after conflict had ended and transition costs had been reduced.

8 Conclusion

This paper revisits a foundational assumption in the study of refugee repatriation: that refugees return when peace is restored in their countries of origin. Using the new Global Refugee Return dataset, covering all protracted refugee situations from 1980 to 2023, I show that this account is incomplete. Most large-scale returns occur not after peace agreements but when refugees are pushed out of asylum by host-country conflict or forced return policies, frequently while war continues at home. When conflict ends, refugees often remain because repression in their origin country continues, their expected quality of life in asylum exceeds what they would gain from returning, and because the costs of uprooting lives built over years or decades of exile are high. This challenges not only existing micro-level studies of return, but also a core premise of the international refugee regime: that refugees flee conflict, receive protection in asylum, and return once the conditions that caused their displacement have ended.

The analysis proceeds in three steps. First, descriptive patterns document the core empirical puzzle: returns are rare in most dyad-years, concentrated in a small number of episodes, and disproportionately occur while conflict persists in the country of origin. Second, panel models show that asylum-country push factors—forced return policies and host-country conflict—and civil liberties in the origin country are stronger predictors of return than origin-country conditions, and that in the absence of push factors, return depends on relative quality of life and transition costs. Predicted return rates under theoretically motivated scenarios map directly onto the formal model: asylum-country push factors generate high levels of return regardless of whether conflict has ended at home, while return remains low in their absence, especially when quality of life in asylum is comparatively high and resources for return are scarce. Third, an archival case study of Ethiopian refugees in Somalia and Sudan traces these mechanisms in practice, showing how the collapse of conditions in asylum drove mass return to ongoing conflict in one case, while high transition costs and favorable conditions in exile sustained non-return despite peace in another.

These findings have three implications. First, they challenge the foundations of repatriation as a “durable solution” and underscore the fragility of the principle of *non-refoulement*. In principle, voluntary return after peace remains the preferred outcome: when conflict ends, conditions at home improve, and refugees have the resources to return safely, repatriation can be a welfare-improving solution. Such cases do occur, but the evidence presented here suggests they arise less frequently than commonly assumed. If most historical returns instead reflect forced return policies or war in asylum, then counting repatriations as refugees having achieved a “solution” may obscure substantial welfare losses. The decline in global refugee numbers in 2023 illustrates this tension: the reduction was driven largely by South Sudanese fleeing war in Sudan rather than voluntary return. More broadly, these findings raise normative questions about what host states owe refugees when the war that gave rise to their refugee status has ended, but refugees prefer to remain in asylum, particularly when return would mean living under a repressive regime. Even if states have met their core legal obligations by providing protection during conflict, the legitimacy of policies that induce return under these conditions warrants closer attention.

Second, the results have implications for how donor governments and international organizations allocate resources in repatriation contexts. UNHCR often directs funding toward helping refugees return and rebuild their lives, and this study provides evidence that such efforts can be effective:

is supported by the fact that the largest annual returns of this population was not after conflict but during it: in 1985, 78,000 refugees returned following the resumption of rains in Ethiopia (WRS, Sudan, 1986), despite ongoing conflict.

reducing transition costs and improving quality of life in the origin country are both associated with higher return rates. However, the findings also suggest an important reorientation. Information campaigns promoting return typically emphasize improving security conditions in the country of origin. This paper shows that refugees are highly sensitive to non-security conditions, so emphasizing, and creating, broader freedoms and economic opportunities in post-conflict societies may be at least as important as communicating that the war is over. This raises a challenge not only for UNHCR but for private industry and development actors: encouraging return may require investment in post-conflict economic rebuilding rather than simply reaffirming that peace has been achieved. At the same time, continued efforts to secure permanent residency and local integration for refugees that want to remain in host countries may better serve their welfare than promoting return.

Third, this research raises questions about the reliability of existing refugee data. The discrepancies between UNHCR figures and the corrected estimates in the GRR dataset suggest that prior findings based on official statistics may warrant revisiting. UNHCR data often exclude unregistered populations, whose formal refugee status is frequently revoked precisely to facilitate deportation, and omit spontaneous and forced returns from repatriation counts. Incorporating archival and expert sources, as this study does, offers one way to address these gaps.

Future research should examine several questions that emerge from this analysis. What explains cross-national and temporal variation in the adoption of forced return policies? Under what conditions do international organizations successfully constrain host-country coercion? And what are the welfare consequences of return for refugees who repatriate under pressure, particularly those who return to ongoing conflict? This analysis has focused on the forced repatriation of refugees already residing within the territory of an asylum country, but two related dynamics outside its scope remain poorly measured: maritime pushbacks and other non-arrival policies in high-income countries, and circular movements between origin and asylum that fall outside a simple refugee–returnee binary (FitzGerald, 2019; Goodwin-Gill, 2011; Masterson and Vidarte, 2026).

Taken together, the evidence presented here implies a reframing of refugee return. Repatriation should be analyzed as a political process structured by host-country choices and regional dynamics, rather than viewed primarily as the downstream effect of conflict termination in origin countries. Understanding why refugees return, and whether such returns serve their interests, requires attention to the conditions of asylum, not only the prospects for peace at home.

References

- Adema, Joop Age Harm, Lasha Chargaziia, Yvonne Giesing, Sarah Necker and Panu Poutvaara. 2025. “What Drives Refugees’ Return After Conflict?” (12118). CESifo Working Paper No. 12118.
URL: <https://www.ifo.de/DocDL/cesifo1wp12118.pdf>
- Adida, Claire L. 2014. *Immigrant Exclusion and Insecurity in Africa: Coethnic Strangers*. Cambridge: Cambridge University Press.
- Al Husein, Nawras and Natascha Wagner. 2023. “Determinants of intended return migration among refugees: A comparison of Syrian refugees in Germany and Turkey.” *International Migration Review* 57(4):1771–1805.
- Arababab, Ala, Daniel Masterson, Marine Casalis, Dominik Hangartner and Jeremy Weinstein. 2023. “The dynamics of refugee return: Syrian refugees and their migration intentions.” *British Journal of Political Science* 53(4):1108–1131.
- Arababab, Ala, Andrea Dillon, Scott Williamson, Jens Hainmueller, Dominik Hangartner and Jeremy Weinstein. 2021. “Attitudes toward migrants in a highly impacted economy: Evidence from the Syrian refugee crisis in Jordan.” *Comparative Political Studies* 54(1):33–76.
- Barnett, Michael. 2001a. “Humanitarianism with a Sovereign Face: UNHCR in the Global Undertow.” *International Migration Review* 35(1):244–277.
- Barnett, Michael. 2001b. “UNHCR and the Ethics of Repatriation.” *Forced Migration Review* 10:31–34.
- Barnett, Michael N. and Martha Finnemore. 2004. *Rules for the World: International Organizations in Global Politics*. Ithaca, NY: Cornell University Press.
- Beaman, Lori, Harun Onder and Stefanie Onder. 2022. “When do refugees return home? Evidence from Syrian displacement in Mashreq.” *Journal of Development Economics* 155:102802.
- Blair, Christopher W, Guy Grossman and Jeremy M Weinstein. 2022. “Forced displacement and asylum policy in the developing world.” *International Organization* 76(2):337–378.
- Borjas, George J. and Bernt Bratsberg. 1996. “Who Leaves? The Outmigration of the Foreign-Born.” *The Review of Economics and Statistics* 78(1):165–176.
URL: <https://www.jstor.org/stable/2109856>
- Bradley, Megan. 2013. *Refugee Repatriation: Justice, Responsibility and Redress*. Cambridge: Cambridge University Press.
- Carey, Sabine C. and Belén González. 2021. “The Legacy of War: The Effect of Militias on Postwar Repression.” *Conflict Management and Peace Science* 38(3):247–269.
- Chimni, B. S. 2004. “From Resettlement to Involuntary Repatriation: Towards a Critical History of Durable Solutions to Refugee Problems.” *Refugee Survey Quarterly* 23(3):55–73.
- Collier, Paul and Anke Hoefler. 2004. “Greed and Grievance in Civil War.” *Oxford Economic Papers* 56(4):563–595.
- Devictor, Xavier and Quy-Toan Do. 2016. How Many Years Have Refugees Been in Exile? Policy Research Working Paper 7810 World Bank.
URL: <https://documents1.worldbank.org/curated/en/549261472764700982/pdf/WPS7810.pdf>
- Fearon, James D. 2017. “Civil War & the Current International System.” *Daedalus* 146(4):18–32.
- Fearon, James D. and David D. Laitin. 2003. “Ethnicity, Insurgency, and Civil War.” *American Political Science Review* 97(1):75–90.

- FitzGerald, David Scott. 2019. *Refuge beyond Reach: How Rich Democracies Repel Asylum Seekers*. New York: Oxford University Press.
- Ghosn, Faten, Tiffany S Chu, Miranda Simon, Alex Braithwaite, Michael Frith and Joanna Jandali. 2021. “The journey home: Violence, anchoring, and refugee decisions to return.” *American Political Science Review* 115(3):982–998.
- Gleditsch, Kristian Skrede. 2007. “Transnational Dimensions of Civil War.” *Journal of Peace Research* 44(3):293–309.
- Goodwin-Gill, Guy S. 2011. “The Right to Seek Asylum: Interception at Sea and the Principle of Non-Refoulement.” *International Journal of Refugee Law* 23(3):443–457.
- Harrell-Bond, Barbara E. 1989. “Repatriation: Under What Conditions Is It the Most Desirable Solution for Refugees? An Agenda for Research.” *African Studies Review* 32(1):41–69.
- Hathaway, James C. and Michelle Foster. 2014. *The Law of Refugee Status*. 2 ed. Cambridge: Cambridge University Press.
- Karreth, Johannes, Patricia Lynne Sullivan and Ghazal Dezfuli. 2020. “Explaining How Human Rights Protections Change After Internal Armed Conflicts.” *Journal of Global Security Studies* 5(2):248–264.
- Koser, Khalid. 1997. “Information and repatriation: the case of Mozambican refugees in Malawi.” *Journal of refugee studies* 10(1):1–17.
- Lischer, Sarah Kenyon. 2005. *Dangerous Sanctuaries: Refugee Camps, Civil War, and the Dilemmas of Humanitarian Aid*. Ithaca, NY: Cornell University Press.
- Long, Katy. 2013. *The Point of No Return: Refugees, Rights, and Repatriation*. Oxford: Oxford University Press.
- Masterson, Daniel and Rosa Vidarte. 2026. “Circular Refugee Migration: Understanding Protracted Displacement Beyond a Refugee–Returnee Binary.” *International Migration Review* . Online first.
- Salehyan, Idean and Kristian Skrede Gleditsch. 2006. “Refugees and the spread of civil war.” *International organization* 60(2):335–366.
- Schwartz, Stephanie. 2025. “Refugee Return without Refoulement: Rethinking State Strategies to Evade Asylum Norms.” *International Migration Review* .
- Stein, Barry N. and Frederick C. Cuny. 1994. “Refugee Repatriation during Conflict: Protection and Post-Return Assistance.” *Development in Practice* 4(3):173–187.
- UCDP. 2024. “UCDP Dyadic Dataset, version 24.1.” <https://ucdp.uu.se/downloads/>. Version 24.1 covering 1946–2023. Accessed 23 Sep 2025.
- UNHCR. 2025. Global Trends: Forced Displacement in 2024. Technical report United Nations High Commissioner for Refugees Geneva: .
URL: <https://www.unhcr.org/global-trends>
- USCRI. 2008. “The World Refugee Survey: an Authoritative Source—A partial compendium.”. Archived at the Internet Archive (Wayback Machine). Original URL: <http://www.refugees.org/uploadedFiles/WRS%20as%20Authoritative.pdf>.
URL: <https://web.archive.org/web/20100217085241/http://www.refugees.org/uploadedFiles/WRS%20as%20Authoritative.pdf>
- Van Hook, Jennifer and Weiwei Zhang. 2011. “Who Stays? Who Goes? Selective Emigration Among the Foreign-Born.” *Population Research and Policy Review* 30(1):1–24.
URL: <https://link.springer.com/article/10.1007/s11113-010-9183-0>

- Zakirova, Komila and Bilol Buzurukov. 2021. "The road back home is never long: Refugee return migration." *Journal of Refugee Studies* 34(4):4456–4478.
- Zhou, Yang-Yang and Andrew Shaver. 2021. "Reexamining the effect of refugees on civil conflict: a global subnational analysis." *American Political Science Review* 115(4):1175–1196.
- Zolberg, Aristide R, Astri Suhrke and Sergio Aguayo. 1989. *Escape from violence: Conflict and the refugee crisis in the developing world*. Oxford University Press.