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Far-Right Mass Protests and Their Effects on Internal Migration

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Abstract

We study how far-right mass rallies affect people's views about a city and thus location choices of nationals. To this end, we first exploit that the city of Dresden (Germany) unexpectedly experienced such rallies at the turn of the year 2014/15. Results from dyadic difference-in-differences and Synthetic Control analyses suggest that the number of (young) German adults who moved from another region to Dresden declined by around 10% due to the far-right mass protests. We complement our first analysis with a conjoint experiment where participants decide between two hypothetical cities. This experiment confirms that far-right rallies have a dissuasive effect and shows that left-wing people react stronger than right-wing people. It also reveals that far-right protests cause security concerns and concerns about finding like-minded people. The latter reaction is only observed for people that do not support the far right.

Keywords: far-right movements, location decisions, internal migration, political protest, populism, regional competition for talent, reputation of cities, university students

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1 Introduction

Following the seminal contributions by Hicks (1932, 1963) and Sjaastad (1962), economists have long been interested in the causes and consequences of internal migration. A key insight of the literature at hand is that people's location choices depend on multiple factors (Jia et al., 2023). More specifically, plenty of research exists emphasizing the role of economic factors (e.g. wages, taxes, and living costs) and local amenities (e.g. security, cultural offerings, and environmental quality). By contrast, surprisingly little is known about how political factors shape migration within a county. We help to close this research gap. Our starting point is that the world experienced an unprecedented number of mass rallies in the last two decades (Brannen et al., 2020, Cantoni et al., 2024). The vast majority of them took place in cities. We thus study whether mass protests, in particular those organized by far-right movements[1], affect what people from outside think about a city and, as a result, the influx from other regions.

Political economist describe protesting as a measure by which interest groups attempt to shape political choices and thus economic outcomes (Battaglini, 2017, Lohmann, 1994).[2] We study whether this form of signaling political preferences affect the migration behavior of nationals. In line with the adjusted Rosen-Roback framework by Gao et al. (2023), we argue that information plays a major role in how far-right mass protests influence internal migration. Specifically, we ask how people change their attitudes toward a city upon learning (e.g. from the press or social media) that it has experienced such rallies. We also examine whether such protest-induced shifts in attitudes and expectations can actually change people's location choices.

Addressing how far-right mass protests affect the reputation of a city and thus the number of people who move there is of importance for at least three reasons. First, the influx of (young and high-skilled) people is essential for local economic development (see e.g. Moretti, 2012). Identifying which factors play a role in the regional competition for talent is thus not only an objective of many labor and urban economists but also of great relevance for policy makers. Second, in many countries, transfers to municipalities are largely determined by population figures

[1]Following Mudde (2019), far-right movements are defined as movements that aim *to (re)create a monocultural state by closing the boarder to immigrants and giving 'aliens' a choice between assimilation or repatriation.* This definition does not imply that far-right movements fully agree on the scope of assimilation. Put differently, *some believe that only 'related' ethnic groups can assimilate [...], while others mainly hold that Islam is incompatible with their nation, meaning that Muslims cannot assimilate into 'western' societies* (Mudde, 2019).

[2]The basic idea behind this view is that attending a rally is a costly action and thus credibly signals private preferences to politicians and other voters, who then in turn might change their behavior.

(Foremny et al., 2017). Protest-induced declines in the number of new residents therefore have direct budgetary effects for local governments. Third, without the influx from other regions, extremist attitudes are more likely to persist (Cantoni et al., 2020, Voigtländer and Voth, 2012). Consequently, if far-right mass rallies discourage liberal-minded people from moving to a specific place, they intensify political segregation and its adverse effects.

We proceed in two steps to investigate how far-right mass protests shape the reputation of a city and thus location decisions. In the first step, we consider a specific series of mass protests and study its consequences. More specifically, we examine how far-right mass demonstrations that began in late autumn 2014 and took place in the city of Dresden (Germany) influenced the influx to this city in the following years. For several reasons, we believe that these mass protests are ideal for our purpose. First, the media coverage was substantial. We can therefore expect that people from outside recognized these protests. Second, the grassroots movement (known as Pegida[3]) that organized the vast majority of the rallies just emerged in late October 2014, while none of its founders had any experience in professional politics. The a-priori probability that this movement will be able to organize multiple protests with thousands of participants was thus close to zero. Third, in Germany, the far right only received little support and attention until 2014. It is thus unlikely that people precisely knew in fall 2014 how widespread extremist thinking was in a particular city. Put differently, at that time, far-right mass protests provided new information about a city (and its residents) and thus had the chance to shape people's attitudes.

We make use of multiple data sets and different empirical approaches to study whether fewer people moved to Dresden due to the far-right mass protests. Our main data set is based on the German register of residents and covers all cross-municipality moves in Germany. We exploit this data to build annual migration matrices. Applying a dyadic difference-in-differences approach where we use other big German cities (>200,000 residents) as control destinations, we show that the number of Germans who moved from another German state to Dresden declined considerably after the emergence of the far-right mass demonstrations. We further illustrate that mainly the influx of young German adults decreased. Both findings are confirmed with a Synthetic Control analysis. For the period from 10/2014 to 09/2019, our point estimates imply that, per year on average, almost 900 young German adults did not move to Dresden following the emergence of the far-right mass rallies.[4] To examine which type of young people adjusted their residential

[3]Pegida is an acronym, standing for ***P****atriotische* ***E****uropäer* ***g****egen die* ***I****slamisierung* ***d****es* ***A****bendlandes* (engl.: *Patriotic European against the Islamisation of the Occident*).

[4]In the four years prior to the outbreak of the far-right mass protests, the average number of

choices, we exploit the German Student Register and highlight that a substantial share of them gained the highest school exit qualification. Furthermore, to show that the decrease in the number of in-migrating people can be attributed to the far-right protests, we make use of media data. In particular, we present evidence implying that Dresden received more public attention from fall 2014 onwards due to the far-right mass protests but not because of other events. Finally, exploiting information about far-right rallies and counterprotests in all major German cities, we find that protests organized by the far right have no effect on the influx from other regions if they are accompanied by larger counterdemonstrations.

In the second part of our project, we conduct a conjoint experiment in which participants (≈3000 Germans, aged between 18 and 45) make location decisions between two fictitious cities. These cities differ in a set of characteristics (for a similar approach, see Arntz et al., 2023). One of them is the frequency of protests against the admission of migrants and refugees. Our motivation for running the conjoint experiment is threefold. The first is to confirm in an alternative setting that people take into account far-right rallies when making location choices. Put differently, with our experiment, we can alleviate concerns regarding the external validity of the effects that we observe for the protests in Dresden. The second is to obtain an understanding of how far-right protests influence people's attitudes towards a city. Knowing how people's views and expectations about a city change due to such protests is of great practical relevance because it helps policy makers in affected places to design measures that mitigate the adverse effects on the influx from other regions. Finally, the experiment reveals how people's reactions to far-right rallies depend on their own political views.

Our stated-preference experiment produces three key results. First, it confirms that people care about far-right protests when making location choices and that they reduce the attractiveness of a city. Second, independently of their political stance, people consider a place as less attractive if far-right protests take place. However, effects are considerably stronger for voters of left-wing parties. Finally, because of far-right rallies, a city is perceived as less secure. People who do not support the far right are also more concerned about finding new friends and have worse expectations about the medium-run economic development of a city if far-right protests occur.

Germans who moved per year from another state to Dresden was around 10,000. 50% – 60% of them were young adults (i.e. aged between 18 and 29).

Related literature

Our paper contributes to various strands of literature in economics and political science. One is the literature on internal migration (for a review, see Jia et al., 2023). In this strand of literature, various studies examine the role of economic factors such as income, taxes, and public goods (see Diamond, 2016, Hilber and Lyytikäinen, 2017, Kennan and Walker, 2010, Kleven et al., 2020, Wilson, 2022, Zabel, 2012). Other important factors are crime (see Bayer et al., 2016, Bishop and Murphy, 2011) and environmental quality (see Banzhaf and Walsh, 2008). By contrast, only a few studies examine how political factors affect location choices. Gimpel and Hui (2015) and Shafranek (2021) conduct experiments to show that people in the US prefer to have copartisans as neighbors or roommates.[5] Downey and Liu (2023) report that college graduates in the US are less likely to move to states whose governor is a Republican. Pickard et al. (2022) study how the Brexit referendum affects internal migration in the UK and observe that people who are aligned with the Brexit preferences of their district are less inclined to move to another district. They also find that individuals who decide to move and do not share the majority opinion in their district of origin tend to choose a district as their new place of residence where they agree with the majority. Also using data from the UK, Efthyvoulou et al. (2023) show that migration flows between two districts are determined by their political similarity. Our project provides further evidence for the importance of political factors for internal migration. However, it differs in three notable ways from the existing studies: first, we consider protests instead of voting, second, we combine a survey experiment with an analysis of a natural experiment, and third, in the latter analysis, we use administrative data including the universe of moves rather than data from a survey.

Our paper also speaks to the literature on political protests (for a review, see Cantoni et al., 2024). Existing empirical studies show how protests influence the decisions of policy makers and voters (see e.g. Aidt and Franck, 2015, Caprettini et al., 2024, Eady et al., 2023, Ellinas and Lamprianou, 2024, Fabel et al., 2022, Madestam et al., 2013, Mazumder, 2018, Wasow, 2020). Our new insight is that protests also influence people's location choices and thus decisions that are not primarily of political nature but have great economic and political consequences. Furthermore, our results suggest that protest movements do not necessarily have to convince policy makers or other voters from their views to reach an objective. Put differently, we document a novel channel through which protests can shape economies and societies. Finally, we second Lagios et al. (2025) who show (in a

[5]Mummolo and Nall (2017) argue that the preferences stated by US people in such experiments do not fit together with their actual moving behavior.

different context) that protesting against the far right can pay off.

In addition, our study adds to the literature on right-wing populism and far-right movements (for a recent review, see Guriev and Papaioannou, 2022). While various studies investigate the causes of the latest rise of the far right[6], causal evidence on its consequences is scarce. Funke et al. (2023) conclude that populist leaders are detrimental for economic performance. Abou-Chadi and Krause (2020) and Bursztyn et al. (2020) show that the rise of the far right has an effect on the program of mainstream parties and social norms. Bracco et al. (2018) and Doerr et al. (2021) find that foreigners are less likely to move to a municipality if this place is governed by a far-right mayor. Slotwinski and Stutzer (2019) report that Swiss municipalities whose residents expressed strong support for an anti-minaret initiative experienced afterwards declines in the number of foreign incomers.[7] We complement the aforementioned papers in three ways. First, we point out that not only foreigners but also nationals avoid places where the far right receives great support. Second, we establish that not only electoral successes of far-right parties affect location decisions but also far-right protests. This is noteworthy because it implies that the far right does not need to implement anti-migration policies to reduce immigration. Third, we are the first study that provides evidence on how people change their attitudes towards a place if locals express support for the far right.

With our study, we also contribute to the literature in education economics. In particular, we complement studies that investigate how young people choose their place of study. Existing studies mainly illustrate the importance of economic and social factors, including the distance to the family, living costs, tuition fees, the quality of the university, and the strength of the local labor market (see e.g. Alm and Winters, 2009, Beine et al., 2014, Dwenger et al., 2012, Koenings et al., 2020, Long, 2004, Spiess and Wrohlich, 2010, Winters, 2012). We are not aware of any study that documents a causal effect of political factors on the location choices of students. Our paper fills this gap.

Finally, we establish changes in people's expectations as the main channel via which far-right mass protests affect location decisions. This channel can also be found in studies that investigate the economic effects of "news shocks" (see e.g. Arezki et al., 2017, Beaudry and Portier, 2014, Ramey, 2011). In contrast to us,

[6]Established drivers of right-wing populist voting are exposure to immigration (see e.g. Barone et al., 2016, Dinas et al., 2019, Dustmann et al., 2019, Halla et al., 2017, Hangartner et al., 2019, Steinmayr, 2021), international trade (see e.g. Autor et al., 2020, Colantone and Stanig, 2018, Dippel et al., 2022, Rodrik, 2021), austerity (see e.g. Fetzer, 2019), and economic crises (see e.g. Funke et al., 2016, Margalit, 2019).

[7]In addition, Pan (2023) suggests that fewer inventors move to a country that is governed by a populist leader.

most of these studies have a macroeconomic focus. A notable exemption in this regard is Besley et al. (2024) who show how news about terror attacks influence location choices of tourists. Similarly, Wilson (2021) suggests that news about job opportunities affect migration decisions of workers.

2 Conceptual considerations

People choose their residence based on three main factors: wages, costs of living, and amenities (see e.g. Greenwood, 1975, 1997, Roback, 1982, Rosen, 1979).[8] The purpose of this paper is to show that protests (and especially those of far-right movements) affect peoples' expected level of amenities and thus their residential decisions.

Figure 1 shows the channel via which far-right mass protests are presumed to affect location choices. Our starting point is the political economy literature on protest (for a recent review, see Cantoni et al., 2024). This literature states that attending a protest is a costly action and thus a credible signal of private policy preferences (see e.g. Battaglini, 2017, Lohmann, 1993, 1994, Opp, 2009, 2019). In line with the adjusted Rosen-Roback model by Gao et al. (2023), we argue that people use this signal to update their expectations about the level of amenities in the city where the far-right protests happened. However, such a process can only occur if two conditions hold. First, individuals do not have complete information about the city that experienced the far-right rallies. Typically, this is the case for people who do not live in (or near to) this place. Second, individuals must know about the protests, even if they live elsewhere. Examples of channels that spread such information to distant regions are the press and social media. The ultimate effect of the protest-induced adjustment of the expected level of amenities is that people take different decisions when searching for a new place of residence.

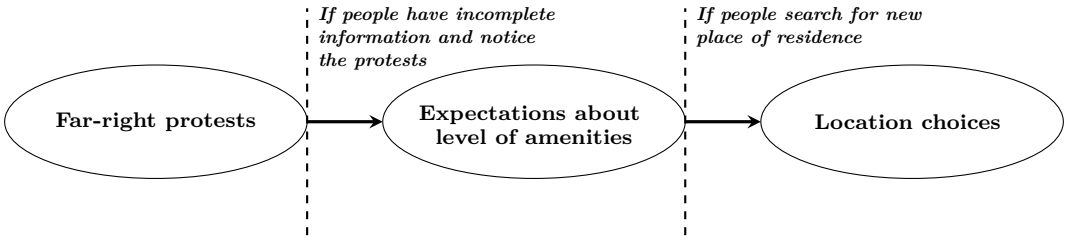
In theory, far-right protests can affect people's expectations regarding a large number of amenities.[9] Below, we focus on two aspects (which we choose due to anecdotal evidence and related studies). First, people may associate rallies of the far right with crime and violence.[10] As a consequence, they may update security

[8]The literature suggests that the quality of life has multiple components. Examples include the risk of crime (see e.g. Bayer et al., 2016, Bishop and Murphy, 2011), the environmental quality (see e.g. Banzhaf and Walsh, 2008), the political environment (see e.g. McCartney et al., 2024), and the provision of public goods (see e.g. Tiebout, 1956).

[9]Far-right protests may also influence people's wage expectation. For instance, they may think that investors react to such demonstrations or that far-right protests induce policy changes. In Section 4, we come back to this issue.

[10]People may have different concerns. More specifically, some people may be concerned about the protesters or that the protests provoke violence (for evidence that far-right protests can cause

Figure 1 Supposed channel though which far-right protests affect location decisions.



expectations. Second, far-right demonstrations may influence expectations about the political attitudes of the locals. As a result, people may change expectations about the likelihood of getting in touch with persons who share their views and interests. Whether the posterior probability is higher or lower than the prior may depend on the political stance of an individual.

3 The far-right mass rallies in Dresden and their effects on migration towards Dresden

We proceed in two steps to examine how far-right mass protests affect location choices. First, in this section, we exploit far-right protests which (unexpectedly) occurred in the city of Dresden (Germany). Using a revealed preference approach, we illustrate that these rallies decreased the influx to Dresden in a considerable manner.[11] Second, in Section 4, we conduct a survey experiment to shed light on how far-right protests shape expectations about the level of amenities.

3.1 Institutional background (Pegida protests)[12]

In fall 2014, many European cities experienced small rallies that aim to express solidarity with the Kurdish resistance against the terror group *Isis* in Syria and Northern Iraq. The city of Dresden was not an exception here. Among others, a solidarity rally was held in Dresden on 10 October 2014. About 300 people were

hate crime, see Sardoschau and Casanueva, 2024). Others may interpret the protests as signal that a city has security problems due to incoming migrants or asylum seekers. In Section 4, we present results suggesting that different types of concerns are likely to exist.

[11] The revealed preference approach is widely used in the field of urban economics to value non-market amenities (see e.g. Bauer et al., 2017, Chen and Rosenthal, 2008, Han et al., 2024, Kahn, 1995). The basic idea is to link variation in some amenity with changes in location choices or housing prices to measure the value of the amenity. The approach is also used in other fields including labor economics (see e.g. Sorkin, 2018) or education economics (see e.g. Jacob and Lefgren, 2007).

[12] Since 2014, several books and articles have been written that describe the emergence and the development of the Pegida protests. The following overview is based on Dostal (2015), Geiges et al. (2015), Patzelt and Klose (2016), Virchow (2016), and Vorländer et al. (2015, 2018).

attending. Accidently, this event was witnessed by Lutz Bachmann, a man with criminal record who ran a tiny PR agency at that time and lived in a suburb of Dresden. He made a short video of the rally and uploaded it on youtube. In the caption of this video, Bachmann complains about both the rally and the public authority that approved the event. One day later, he also opened the Facebook group ***P**atriotische **E**uropäer **g**egen die **I**slamisierung **d**es **A**bendlandes* (*Patriotic Europeans against the Islamisation of the Occident*) and invited some like-minded people to join his group. Among the 12 initial members, none had experience in professional politics. However, two of them posted xenophobic statements in the internet on a regular basis before joining this group. In their internal chats, the group members soon developed the idea of organizing protests against migration from the Arabic and Muslim world. The first Pegida rally was held on 20 October 2014 and had around 300 participants. Also in the next two weeks, participation remained rather low.[13]

Surprisingly for many and even for the organizers themselves, the support for Pegida grew remarkably in November 2014.[14] More specifically, while only about 1,000 people participated in the rally on 3 November 2014, the total number of participants was more than five times larger on 24 November 2014. In the next weeks, the participation figures increased even further. Triggered by the Charlie Hebdo shooting in France, the record high was reached on 12 January 2014 as roughly 25,000 people joined the Pegida rally (for a detailed illustration of the development of the Pegida demonstrations, see Figure B.1).[15]

At the turn of the year 2014/2015, Pegida offshoots were founded in various German cities and some even abroad, but none of these offshoots was nearly as successful in mobilizing people as the original Pegida. In addition, in most other cities, civil society groups immediately organized counterdemonstrations (with a much higher attendance). Most Pegida offshoots thus disappeared rather quickly. Counterrallies were also organized in Dresden, but not right from the beginning. Furthermore, in Dresden, the rallies against Pegida were typically not larger than the Pegida protests (for more details about Pegida rallies in other cities and the

[13]To avoid a stigmatization, the organizers strategically announced their first events as evening stroll of concerned citizens rather than as rallies against immigration.

[14]In an interview with Germany's best selling newspaper (*Bild*) on 1 December 2014, Bachmann acknowledged that he did not expect at all that his rallies will receive so much support. The interview can be accessed via: https://www.bild.de/regional/dresden/demonstrationen/pegida-erfinder-im-interview-38780422.bild.html

[15]On 10 December 2014, the Pegida organizers published a program. The main demand was a substantial reform of the migration laws. Over time, the tone of the Pegida supporters also became more and more nationalistic. For instance, since November 2014, it was common that politicians were insulted as 'traitors of the people' and that the media was called 'lying press'. Both phrases belonged to the standard vocabulary of Hitler's Nazi Party.

counterdemonstrations, see Appendix A.1).

Pegida received great media attention, not only in Germany but also in other countries. For example, the New York Times published roughly a dozen articles about this far-right movement. In Germany, the public debate was also fueled by statements of leading politicians. For instance, Chancellor Merkel and President Gauck warned implicitly but unmistakably against supporting Pegida in their TV speeches on Christmas and New Year's Eve (Gauck, 2014, Merkel, 2014). Other German politicians labeled the leaders of Pegida as 'pinstriped Nazis' and 'Pied Piper.' Besides the public interest, there was also scientific interest in Pegida as sociologists and political scientists wanted to understand who participates in the Pegida rallies. The results of these studies suggest that most Pegida supporters were male, middle-aged, and employed. Their mean level of education was above average and they predominantly lived in Dresden and its surrounding places. In short, most protesters were local middle-class people.

On 21 January 2015, a self-portrait became public where Pegida leader Lutz Bachmann poses as Adolf Hitler. At the same day, it came out that the Public Prosecutor Office investigates against him because of internet posts in which he insulted refugees.[16] As a consequence, Bachmann stepped down. However, he still wanted to remain the unofficial leader of Pegida. Dissatisfied with this idea, six (relatively moderate) members of Pegida's organization team withdrew. Another immediate effect of these releases was that the support for Pegida dropped. For instance, only about 2,000 people attended the rally on 9 February 2015. Besides specific events such as the speech of the popular Dutch far-right populist Geert Wilders in mid-April 2015, the attendance figures oscillated around at this level until the end of the summer.

Due to the European migrant crisis, a second wave of Pegida demonstrations emerged in autumn 2015. The largest rally of the second wave occurred in mid-October 2015 as 15,000 people attended. Since then, the support for Pegida has declined slowly but continuously (see Figure B.1). The last time that the Pegida movement received great attention was in October 2016 as the city of Dresden hosted the celebrations honoring the Day of German Unity. Some supporters of Pegida strongly disturbed this festive event.

In Appendix A, we offer a plenty of further information about our institutional setting. First, we inform about Pegida protests in other major German cities and rallies against Pegida. Second, we describe three far-right protests that were not directly related to Pegida but occurred in or near Dresden between October 2014 and September 2019 (our post-treatment period) and received non-negligible public

[16]Because of these insults, Bachmann was convicted of inciting racial hatred in May 2016.

attention. Third, we sketch how Dresden developed prior to the rise of Pegida and point out why Dresden had a good reputation until then. Fourth, we describe how the far right has developed in Germany, Saxony, as well as Dresden. Finally, we give information about the *Alternative for Germany* (AfD) which is currently the strongest far-right party in Germany.

3.2 Data

3.2.1 German register of residents

To receive data about migration in Germany, we use an administrative dataset provided by the Research Data Centers (RDCs) of the Statistical Offices of the Federation and the Federal States. This dataset is based on the German register of residents and covers all registered cases where a person moved from one place to another.[17] For each move, we know the place of origin and destination as well as when it took place. We also have a few information about the person that moved (e.g. age, gender, civil status, nationality). Variables that can be used as proxy for people's income, education level, or political attitudes are unavailable. Because of the German data protection laws, we cannot track individuals over time. In total, the dataset includes more than 40,000,000 moves for the period from 01/2000 to 12/2019.[18] However, in our empirical analyses, we mainly study moves made by Germans between 10/2006 and 09/2019 and where the destination was a city with more than 200,000 residents (for details, see next paragraph and Section 3.3).[19]

We prepare the raw data in two ways to facilitate empirical analyses. First, we produce migration matrices that indicate how many people moved within a year from a specific place of origin (either a county, district, or state) to a particular major German city. Thereby, we define *year* as period from October to September rather than as period from January to December. The advantage of this approach is that we can clearly differentiate between pre- and post-treatment years. When generating our matrices, we also exploit the available personal characteristics, for instance to create separate matrices for men and women or migration matrices for specific age cohorts. The second way of how we prepare the raw data is that we create time series indicating how many individuals moved to a particular city in

[17] In Germany, all people are legally required to visit a registration office within two weeks after moving to a new place.

[18] Details about the data can be found in RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2006, 2007, 2008b, 2009b, 2010b, 2011b, 2012b, 2013b, 2014b, 2015b, 2016b, 2017b, 2018b).

[19] In a supplementary analysis, we also consider non-German EU citizens. We do not study other foreigners since we want to make sure that we focus on people who can make their location decisions without facing legal constraints.

a particular year.

3.2.2 German student register

In our analysis, we also make use of the German student register, another rich administrative dataset provided by the RDCs. It contains information about all tertiary students enrolled in Germany.[20] Our access to this non-public dataset is limited to the academic years 2007/08 until 2018/19.[21] Merging this dataset with the dataset described in the previous section is prohibited due to data protection reasons.

In our main analysis, we focus on two groups of students. The first group are *German first-year undergraduates*. To trace back the migration behavior of these students, we exploit the institution at which they study and the county in which they completed their high school.[22] The second group includes *German advanced first-year students*. Students are assigned to this group if they are in the first year of their program but enrolled for at least three years.[23] To identify how advanced first-year students move around, we exploit that we do not only know the current place of study but also the university where a student was enrolled in the previous semester.[24] For both groups of students, we build a city-specific time series.[25]

[20] Details about the data can be found in RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2008a, 2009a, 2010a, 2011a, 2012a, 2013a, 2014a, 2015a, 2016a, 2017a, 2018a).

[21] In Germany, academic years typically last from October till September.

[22] We acknowledge that our approach is imperfect because people do not necessarily begin their tertiary education directly after finishing high school. Thus, it happens that first-year undergraduates had moved to a place a while before they started to study there. However, we are convinced that such cases are relatively rare and unrelated to our treatment.

[23] In Germany, undergraduate programs are typically designed as three-year programs. We thus choose three years as our threshold. We are aware that some of the students that we capture with our definition might not be in an advanced program. For instance, some students begin a second undergraduate program after completing their first one. It is also possible that we miss some advanced first-year students because some students finish their undergraduate studies in less than three years. In general, we think that the measurement error that results from these issues is minor.

[24] In contrast to the variable showing the county of high school graduation, missing information is a notable problem when using the variable that reflects the institution where a student was enrolled in the last semester. The reasons for the missing information are unclear. We find no evidence suggesting that the missing information is a specific issue for institutions located in Dresden.

[25] In a supplementary analysis, we also consider *international first-year students*. Three types of students are comprised in this group: (i) non-German first-year undergraduates who received their high-school degree outside of Germany, (ii) non-German first-year graduates who neither did their high school nor undergraduate program in Germany, and (iii) non-German exchange and guest students.

3.2.3 Media data

As explained in Section 2, receiving media attention is a prerequisite for far-right mass protests to affect location decisions. To illustrate that the rallies in Dresden indeed obtained considerable attention, we exploit nine supraregional newspapers included in the online database *GBI-Genios wiso* (for a list, see Table C.3).[26] More specifically, for each city with more than 200,000 inhabitants and the period from 10/2012 to 6/2019, we first count on a quarterly basis the number of reports that name the city. In a next step, we use a keyword approach to quantify how many articles are related to protests (for the keyword list and details about the quering process, see Table C.4). Third, we define the number of non-protest-related (other) articles as the residual between the total number of articles and the number of protest-related articles.

3.3 Empirical approaches

3.3.1 Dyadic difference-in-differences approach

We apply two different approaches to investigate how the far-right mass rallies in Dresden shaped the influx to Dresden. The first is a dyadic difference-in-differences approach (for a similar strategy, see e.g. Besley et al., 2024). More specifically, we estimate the regression model:

$$\ln Y_{ijt} = \mu_{ij} + \beta \cdot \left(DD_{ij} \times \mathbb{I}_{t \geq 10/2014} \right) + \alpha \cdot X_{jt} + \xi_{it} + \nu_{r_j t} + \varepsilon_{ijt} \quad (1)$$

where Y reflects how many people moved from origin i to destination j in year t (defined as period from October till September). DD is a dummy variable that is equal to 1 for all origin-destination-pairs where Dresden is the destination. $\mathbb{I}$ is a post-treatment dummy and equal to 1 for the years 2014/15 onwards. β is the parameter of interest. Negative estimates of β suggest that fewer people moved to Dresden due to the far-right protests.

We add three types of fixed effects to our baseline regression model. First, the dyadic fixed effects μ control for all time-invariant factors that affect migration between i and j. This includes (e.g.) geographical distance as well as events that occurred before the period considered in our analysis (October 2010 – September

[26] *GBI-Genios wiso* is an online database including digitized articles from more than 200 German newspapers (with different coverage periods). The nine newspapers listed in Table C.3 are the only supraregional newspapers that are constantly available in our period of interest. In one of our supplementary analysis, we also exploit 107 local newspapers included in *GBI-Genios wiso* (for details, see Section 3.5.6).

2019).[27] Second, the origin-by-year fixed effects ξ capture any factor that has an impact on how many individuals move away from a particular place of origin i. Examples in this regard are the spike in the number of high school graduates that various German places experienced between 2007 and 2016 because of state-level school reforms that reduced the number of school years (for related studies, see Marcus and Zambre, 2019 or Marcus et al., 2020) and changes in the real estate transfer rate (for a related study, see Dolls et al., 2025). Finally, with the region-of-destination-by-year fixed effects ν, we control for all time-varying factors that influence attitudes towards a region.[28] Among others, these fixed effects rule out that our estimates of β are biased due to a generally increasing aversion against living in Eastern Germany.[29]

We complement our fixed effects with several time-varying destination-specific covariates to control for well-known drivers of internal migration and established causes of far-right populism (for a full list, see Table C.8). More specifically, we account for local economic shocks and labor market differences by controlling for GDP, business tax revenues, firm insolvencies, unemployment, short-time work as well as mini jobs. In addition, we capture demographic differences by adding the share of male, young people (<18), and elderly people (>65) as controls to our regression model. We also control for the presence of refugees. Finally, we include dummy variables that account for exceptional effects. In particular, they reflect whether a place (i) raises a tax on secondary homes[30], (ii) has a university that received the label *university of excellence* from the German government, (iii) has public higher education institutions where students need to pay tuition fees, and (iv) experiences a reform-induced spike in the number of high-school graduates. In

[27] This includes in particular the Neo-Nazi remembrance marches in February 2009 and 2010 as well as the rallies against them (for details, see Appendix A.4).

[28] In line with Dauth et al. (2014), we differentiate between four regions: *East*, *North*, *West* and *South*. Using state-of-destination-by-year fixed effects is not possible. The reason is that we use other German cities with more than 200,000 residents as control destinations (more details below) and that several states only have one city above this population threshold.

[29] While controlling for many potential confounders, a concern against using a rich set of fixed effects might be that they exclude alternative channels through which far-right protests affect internal migration. For instance, when adding region-of-destination-by-year fixed effects to the regression model, we neglect the fact that people's attitudes towards East Germany in general could change due to the protests in Dresden. Similarly, by using origin-year fixed effects, we disregard that the Pegida rallies in Dresden could affect the places of origin and thus people's migration behavior. In our baseline analysis, we still include all these fixed effects because we want to verify the channel described in Section 2. However, in Section 3.4.1, we also show how our estimates change if we remove these fixed effects.

[30] Our migration data only covers moves where individuals change their primary residence. Rich anecdotal evidence exists that a second home tax increases the number of primary residents registrations. The reason is that people register as primary rather than secondary resident to avoid the tax. Dresden introduced a second home tax in 2006, while several control cities did so between 2010 and 2019.

supplementary analyses, we also control for far-right voting in EU, national, state, and local elections.[31] For all covariates, we illustrate in Table C.8 how Dresden differed in the pre-treatment period from other German cities (in East Germany) with more than 200,000 inhabitants

When estimating (1), the standard assumptions of the difference-in-differences approach need to be satisfied. The most important of them is the parallel trend assumption, which requires that migration to Dresden would have developed in the same way as the migration to other places in absence of the far-right rallies. To increase the likelihood that this key assumption holds, we restrict the set of destinations to the 40 cities with more than 200,000 inhabitants (for a list, see Table C.1). Furthermore, based on a dynamic version of our baseline model, we provide some evidence in Section 3.4.1 that is consistent with the parallel trend assumption. Lastly, in Section 3.5.2, we exploit our media data to show that the existence of a confounding event is unlikely.

To interpret β as the protest-induced decline in the number of individuals who moved to Dresden, we either require (in addition to parallel trends) that the effect of the rallies is homogeneous across origin-destination pairs[32] or must weight the origin-destination pairs depending on how much they contributed to the overall influx to Dresden prior to the protests. In our baseline analysis, we use the latter approach. The weight (ω_{ij}) assigned to each origin-destination pair is:

$$\omega_{ij} = \frac{\sum_t Y_{ijt}}{\sum_t \sum_i Y_{ijt}} \quad \text{with} \quad t \in \{2010/11, 2011/12, 2012/13\}. \tag{2}$$

As robustness check, we also present results of unweighted regressions.

Another challenge when analyzing migration matrices is the presence of origin-destination pairs between which no or virtually no moves happen. We can largely avoid this problem when using the 16 German states as origins and the 40 places with at least 200,000 inhabitants as destinations. However, to allay the potential concerns such as that the state-level aggregation is too coarse or that origins and destinations are defined at different administrative levels, we also run analyses in which we use the 38 NUTS2 regions or the 401 counties (NUTS3) as the places of origins. Our basic approach to deal with pairs without moves is to use $\ln(Y + 1)$ as the dependent variable. In a robustness check, we also make use of the *asinh-*

[31] In our main analyses, we do not use these control since they are likely to be bad controls. In particular, Bischof (2021) provides evidence suggesting that the Pegida rallies affected election results.

[32] An alternative condition would be that migration to Dresden was equally distributed across all origins prior to Pegida protests. However, in our data, we can see that this conditions is not satisfied in our case.

transformation (Burbidge et al., 1988, MacKinnon and Magee, 1990).

3.3.2 Synthetic Control approach

We complement our first procedure with a Synthetic Control (SC) analysis. The SC approach is appropriate for our case since it facilitates the analysis of cases where an aggregate unit (here: a city) experienced a treatment/shock, while the other units did not. The basic idea of the SC approach is to produce a synthetic unit that consists of untreated units and closely resembles the treated unit in the pre-treatment periods. Afterwards, the post-treatment development of the treated and synthetic unit are compared (see Abadie et al., 2015, Abadie, 2021).

Formally, the SC procedure can be described as follows. Let l_0 denotes a city (here: Dresden) in which far-right mass protests occur in period t_0. In the other cities $(l_1, \ldots, l_m)$, such protests do not take place (here: all other German cities with more than 200,000 inhabitants). As common, we refer to $\mathcal{D} = \{l_1, \ldots, l_m\}$ as *donor pool*. Our main objective is to identify how the far-right mass rallies affect an observable outcome $(Y_{l_0,\tau})$, such as the total number of new residents. Put differently, we want to estimate:

$$\beta_\tau \;=\; Y^I_{l_0,\tau} \;-\; Y^N_{l_0,\tau} \qquad \forall\, \tau \;\geq\; t_0 \tag{3}$$

where $Y^I_{l_0,\tau}$ reflects the outcome if the far-right mass protests occur and $Y^N_{l_0,\tau}$ the outcome if such rallies do not happen (Abadie, 2021, Abadie et al., 2010). A key challenge in this regard is that $Y^N_{l_0,\tau}$ is not observable. To address this issue, the SC method produces the proxy:

$$\hat{Y}^N_{l_0,\tau} \;=\; \sum_{j \,\in\, \mathcal{D}} \omega_j \cdot Y_{j,\tau} \tag{4}$$

where $\omega = (\omega_{l_1}, \ldots, \omega_{l_m})$ are non-negative weights. These weights are obtained by solving:

$$\arg\min_{\omega} \; \sqrt{(X_{l_0} \;-\; X_{\mathcal{D}}\omega)' V (X_{l_0} \;-\; X_{\mathcal{D}}\omega)} \tag{5}$$

where X_{l_0} and $X_{\mathcal{D}} \equiv [X_{l_1}, \ldots, X_{l_m}]$ denote vectors of predictors. V is a diagonal matrix with non-negative elements that indicate the importance of the different predictors. As predictors, we use all pre-treatment outcomes but no covariates. We refrain from using covariates to allay concerns of specification searching (Ferman et al., 2020) and allow weights to vary across outcomes. The diagonal matrix V is computed based on a data-driven procedure that minimizes the root mean square prediction error in the pre-treatment period (Abadie et al., 2010).

The SC procedure produces unbiased estimates of β_τ if three conditions hold. First, the match in the outcome variable between the treated and synthetic unit is sufficiently in the pre-treatment period. In the next sections, we provide some graphical evidence suggesting that this condition is met. Second, no other events exist that differently influenced the treated and untreated units during the post-treatment period (for supporting evidence, see e.g. Section 3.5.2). Third, units in the donor pool must be unaffected by the treatment. A potential concern in this regard is that the far-right mass protests in Dresden affected people's attitudes towards nearby places, such as Chemnitz or Leipzig. To alleviate this concern, we show robustness checks in the following sections where we drop such cities from the donor pool.

3.4 Main results

3.4.1 Dyadic difference-in-differences approach

Table 1 presents the results of six dyadic difference-in-differences analyses. These analyses have six features in common. The first is that we use annual migration matrices that are defined at the state-city-level. Second, we restrict the pool of destinations to the 40 German cities with more than 200,000 residents. Third, the sample period lasts from October 2010 to September 2019. Fourth, we focus on German citizens. Fifth, we drop all origin-destination-pairs that capture within-state migration.[33] We make this restriction because, in Section 2, we argue that far-right mass protests influence the attitudes and decisions of people who have little knowledge about the place that experienced the rallies. For people who live in the same state, this condition is unlikely to hold (especially in our case since Dresden is the capital city of the state of Saxony).[34] Lastly, the regression models include origin-destination fixed effects, region-of-destination-by-year fixed effects, origin-by-year fixed effects, and some time-varying destination controls (for details about the fixed effects and control variables, see Section 3.3.1). Hence, we exploit over-time variation within a dyad that can neither be explained by time-varying origin- or region-of-destination-specific idiosyncrasies nor by our set of destination-level covariates. The key difference between the six columns concerns the group of people that we study.

Our dyadic difference-in-differences estimations suggest that the far-right mass protests significantly reduced the number of Germans who moved (from another

[33] In our sample of destinations, around 50% of the incomers lived before in the same state. For Dresden, this share is close to the average.

[34] In Section 3.5.5, we highlight that within-state migration is indeed not affected.

Table 1 The far-right protests in Dresden and their effect on the location choices of Germans (main table, dyadic DiD).

	(1)	(2)	(3)	(4)	(5)	(6)
$DD \times \mathbb{I}_{t \geq 10/2014}$	-0.093**	-0.106***	-0.115**	-0.068	-0.105**	-0.118**
	(0.0293)	(0.0310)	(0.0420)	(0.0412)	(0.0427)	(0.0465)
Observations	5,400	5,400	5,400	5,400	5,400	5,400
Age cohort	All	18 – 64	18 – 29	30 – 64	18 – 29	18 – 29
Gender	All	All	All	All	Male	Female
Investigation period	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19

Notes: This table shows estimates of Eq. (1). The outcome is the total number of Germans (of a particular type) who moved from the origin to the destination. The origins are the 16 federal states and the destinations the 40 largest German cities (for a list, see Table C.1). Standard errors are clustered at two levels: origin-destination-pair and year. Origin-destination pairs are weighted according to their relevance in the pre-treatment years (for details, see Section 3.3.1). Within-state moves are excluded. All regressions include origin-destination fixed effects, origin-by-year fixed effects, region-of-destination-by-year fixed effects, and time-varying destination-specific controls (for a list, see Panel A of Table C.8). Summary statistics for the outcome variables are presented in Table C.7. $^{*}p < 0.10$, $^{**}p < 0.05$, $^{***}p < 0.01$.

state) to Dresden. We also find that this decline is sizable. More specifically, our estimates imply a decrease of around 9 percent (see Column 1). In the four years prior to the rise of the mass protests, the average number of German adults who moved per year from another state to Dresden was around 10,000. As shown in Column 2, the magnitude of our estimate is even slightly larger if we focus on the working-age population. We also observe that the overall decline is primarily driven by young adults (see Columns 3 and 4). However, we do not find notable differences between young German men and women (see Columns 5 and 6).

For producing unbiased estimates, our dyadic difference-in-differences approach requires that the parallel trend assumption holds. A common way to assess the plausibility of this assumption is to check whether the treated and control units developed differently in the pre-treatment period (Roth, 2022, Roth et al., 2023). To run this test, we use a dynamic version of our basic regression model. Figure B.4 presents the results for two of our outcome variables: (a) the total number of German incomers from another state and (b) the total number of young adult German incomers from another state. Reassuringly, we do not detect statistically significant differences in the pre-treatment period.

We perform several tests to verify the robustness of the estimates presented in Table 1. The results of these robustness checks are reported in Table C.9. More specifically, Panel A – C show how our estimates change if we run our regression without origin-by-year and/or region-of-destination-by-year fixed effects. Panel D drops the time-varying destination controls. In Panel E, we use asinh(Y) as the outcome variable. Panel F presents results from non-weighted regressions. In Panel G & H, we use districts (NUTS2) and counties (NUTS3) as origins rather than states (NUTS1). Panel I extends the sample of destinations to all cities with more than 150,000 inhabitants, while we consider cities with more than 300,000 and less than

800,000 inhabitants as destinations in Panel J.[35] Overall, we detect similar results across the different model specifications. For instance, the estimate for the protest-induced decline in the number of young German adults who moved from another state to Dresden varies between 0.096 and 0.142 (see Column 3 of Table C.9). In Table C.10, we incorporate distance into our analysis.[36] We observe that the far-right protests had no effect on the influx from people whose migration distance is less than 150km. We also detect that the protests had a slightly stronger effect on people who lived more than 300km away than on those who lived between 150km and 300km away.

3.4.2 Synthetic control approach

The dyadic difference-in-differences estimates reported in the last section provide some first evidence for the hypothesis that far-right mass protests affect people's migration behavior. In this section, we use the SC approach to substantiate this result.[37] In particular, Figure B.6 shows SC analyses for two outcome variables: the number of German incomers from another state and the number of young adult German incomers from another state. The evaluation period is October 2006 till September 2019.[38] Synthetic Dresden (*Syn-Dresden*) is constructed based on the full pre-treatment history of the outcome variable and without covariates. Details about the composition of SynDresden can be found in the notes supplementing Figure B.6.

As evident in Figures B.6a and B.6c, only minor differences exist between Dresden (solid line) and SynDresden (dashed line) prior to the emergence of the far-right mass protests in fall 2014. The overlap is reassuring as it suggests that the key

[35] Because of data availability, we run the analysis presented in Panel I without time-varying destination-specific controls. In Panel J, we drop the region-of-destination-by-year fixed effects since there remain only two places of destination in two of the four regions.

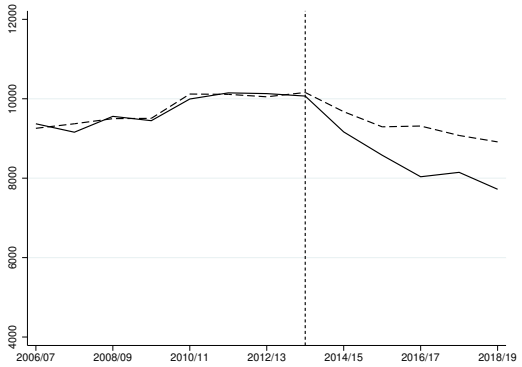
[36] In this analysis, we use counties as places of origin. The distance between a particular county and a particular place of destination is calculated based on the capital city of the county.

[37] From a methodological point of view, we think that the SC approach nicely complements the dyadic difference-in-differences approach. While the latter imposes a linear functional form and requires that (conditional on the fixed effects and time-varying destination-specific covariates) Dresden and the control cities would have followed parallel trends in the absence of the far-right protests, the SC approach constructs the counterfactual for Dresden based on the entire pre-treatment trajectory of the outcome variable and without relying on covariates or a parametric specification.

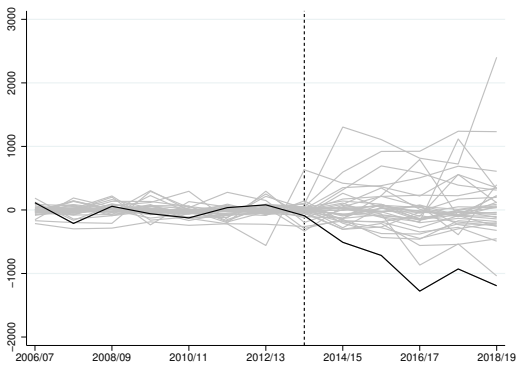
[38] We use a longer pre-treatment period in our SC analysis (eight years) than in our dyadic difference-in-differences analysis (four years) for multiple reasons. On the one hand, using only four pre-treatment periods is not enough to produce reliable estimates with the SC approach (see Abadie, 2021). On the other hand, extending the number of pre-treatment years in our dyadic difference-in-differences analysis is not possible due to the availability of our control variables. Furthermore, starting the period of investigation in October 2010 has the advantage that our fixed effects capture the Neo-Nazi remembrance marches in February 2009 & 2010 (for more details, see Appendix A.4).

Figure 2 The far-right protests in Dresden and their effect on the location choices of Germans (main analysis, SC approach).

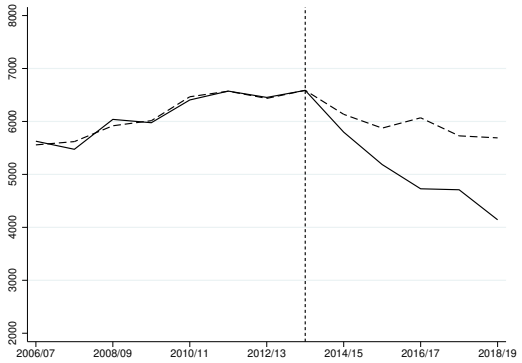
(a) All Germans (treatment graph).



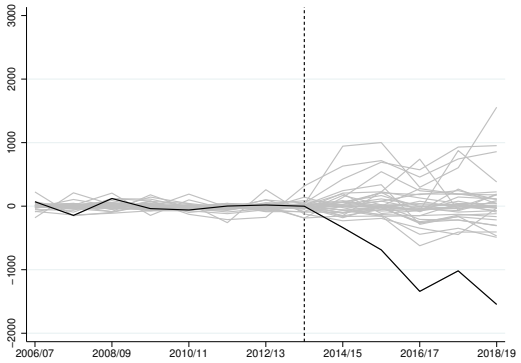
(b) All Germans (placebo graph).



(c) Young adult Germans (treatment graph).



(d) Young adult Germans (placebo graph).



Notes: This figure presents results of SC analyses. In the treatment graphs, we compare the development of Dresden (solid line) and SynDresden (dashed line). The placebo graphs plot for each of the 40 German cities with more than 200,000 residents the differences between the development of the city and the development of its doppelganger. The black line is Dresden. In Panel (a) and (b), we use the number of German incomers who previously lived in another state as outcome variable. In Panel (c) and (d), we consider the number of German incomers aged between 18 and 29 who previously lived in another state. SynDresden consists of Berlin (0.044), Halle (0.092), Hanover (0.12), Leipzig (0.103), Mainz (0.604), and Munich (0.038) in the upper part; and of Berlin (0.088), Cologne (0.041), Essen (0.306), Leipzig (0.164), and Mainz (0.402) in the lower part. To determine these weights, we use all pre-treatment outcomes and no covariates.

prerequisite of the SC methods is satisfied in our setting. Figures B.6a and B.6c also illustrate that Dresden and SynDresden developed differently after the rise of the far-right mass protests. More specifically, we observe that Dresden lost about 500 German incomers from other states (compared to SynDresden) in the period from October 2014 to September 2015. The vast majority of them are young adults. In the next year, the gap increased to around 750 people. In the last three years of our evaluation period, the discrepancy was about 1,000 people. The two placebo graphs indicate that no other German place with more than 200,000 inhabitants experienced such a notable decline in the total number of (young adult) German incomers from another state (see Figures B.6b and B.6d). Regarding effect sizes, it is also worth mentioning that the SC approach produces very similar results as the

dyadic difference-in-differences approach (see Section 3.4.1).

We perform a series of robustness checks to show that the results presented in Figure B.6 are credible. First, as proposed by Abadie (2021), we conduct a leave-one- out analysis where we exclude any particular city with positive weight from the donor pool (Figure B.6). Second, we drop Saxon and East German cities from the donor pool because of potential spillover effects (Figure B.5). Third, we compute SynDresden without taking into account the last pre-treatment year (Figure B.7). Fourth, following Alabrese et al. (2024), we randomly permute subgroups of cities within the donor pool and average out the different estimates (Figure B.8). Fifth, applying an approach proposed by Sun et al. (2025), we hold the composition of SynDresden constant for both outcomes (Figure B.9). Lastly, we use the Synthetic difference-in-differences approach by Arkhangelsky et al. (2021) instead of the SC approach (Figure B.10).

3.5 Additional Results

3.5.1 German university students

A key result of the analyses presented in Section 3.4 is that the total number of young German adults who moved from another state to Dresden decreased in a notable manner because of the far-right mass protests. In this section, we study whether students constitute a substantial part of the young people who changed their migration behavior.[39]

We divide our analysis into two parts. In the first part, we consider first-year undergraduates from Germany. We observe that the far-right mass rallies had a negative effect on the number of German first-year undergraduates who finished high school in another state. In particular, our SC analysis suggests that Dresden lost about 400 first-year undergraduates per year due to the far-right mass rallies (Figure B.12, upper part).

The second part of the analysis is devoted to advanced first-year students from Germany. In our SC analysis, we observe that the number of advanced students that previously studied in another state is lower for Dresden than for its synthetic doppelganger in each year after the rise of the far-right mass rallies (Figure B.12, lower part). The gap is around 200 students per year.

In sum, the results shown in this section indicate that fewer German students

[39]Students are a relevant group to study for three key reasons. First, they are relatively liberal-minded (Majer, 2016). Second, a large share of them stays after graduating from university (Conzelmann et al., 2023, Haussen and Uebelmesser, 2018, Winters, 2020). Third, attracting tertiary students is conducive for local economic growth (Andrews, 2023, Carneiro et al., 2023, Lehnert et al., 2020).

enrolled at higher education institutions in Dresden due to the far-right protests. When comparing the SC results reported in this section with those presented in Section 3.4.2, we conclude that a large share of the young German adults that did not move to Dresden due to these rallies are tertiary students. However, we also think that the residual between the reported figures (on average about 300 people per year) is large enough to draw the conclusion that not only students changed their migration behavior.[40]

3.5.2 Media attention

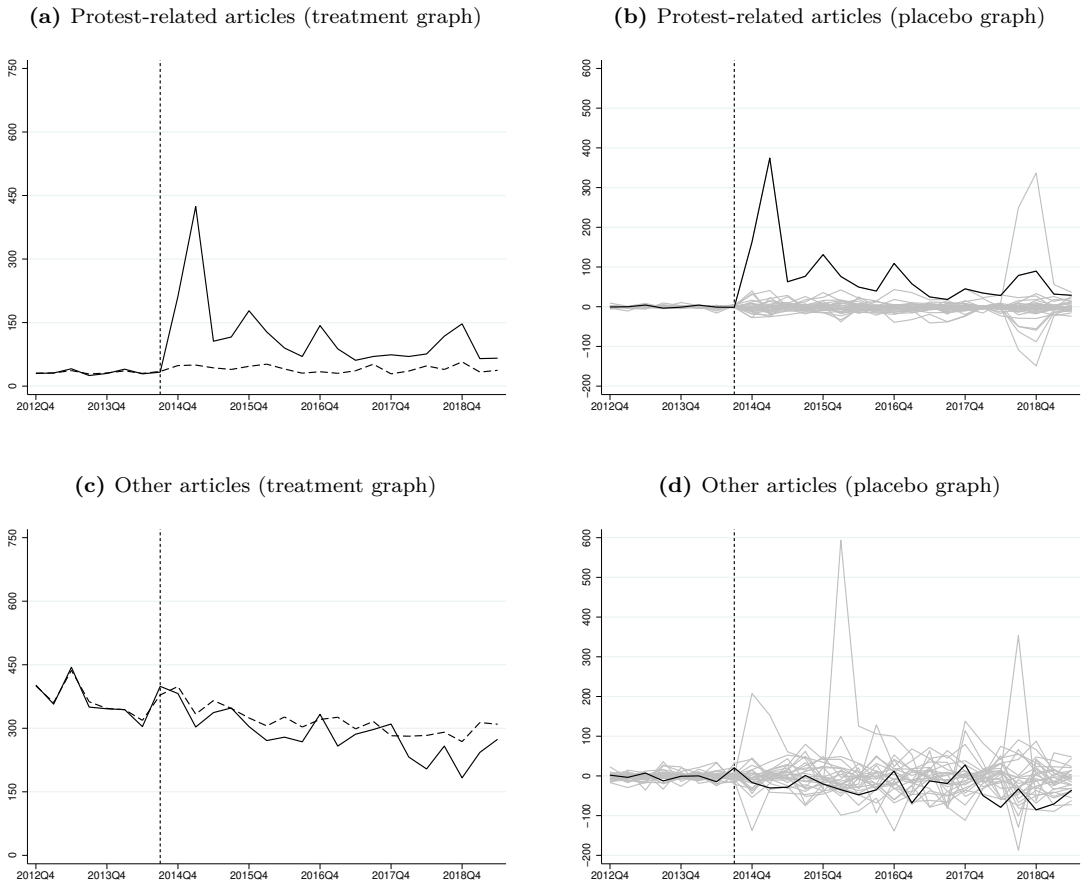
In this section, we analyze the media data that we compiled from different supra-regional newspapers (for details, see Section 3.2.3). The purpose is twofold. First, since we argue in Section 2 that people must get aware of the protests to change their expectations and decisions, we want to illustrate that the far-right rallies in Dresden received enough attention to be recognized by people living elsewhere in Germany. Second, the results reported in Section 3.4 are based on the assumption that no confounding events occurred. We want to substantiate this assumption by distinguishing reports protest-related articles from other articles. If Dresden had more media coverage from fall 2014 onwards and if this additional attention only results from protest-related articles, it is unlikely that our estimates are biased due to a confounding event.

Figure B.13 indicates how the reporting about Dresden developed between fall 2012 and late summer 2019. More specifically, the black solid line reflects on a quarterly basis the number of protest-related articles printed in our supraregional newspapers. The gray dashed line reflects the number of other articles in which Dresden is mentioned. The latter shows only small fluctuations over time. This pattern is reassuring since it suggests that the presence of confounding events is unlikely. Concerning the protest-related articles, we observe that their number is negligibly small in the two years before the outbreak of the far-right mass rallies. Thus, these protests could hardly be anticipated and had the potential to reveal information about Dresden (and its residents) that individuals from outside were hitherto not aware. For the period from October 2014 onwards, we find a notable and lasting rise in the number of protest-related articles, while the spikes nicely correspond with major protest events.[41]

[40] As described in Section 3.2.2, we are likely to make some measurement errors when using the German student register to capture the migration behavior of tertiary students. While these measurement errors may explain the residuals to a certain extent, we doubt that they can be fully responsible for them.

[41] For comparison, Figure B.14 shows on an aggregated level the development of protest-related and non-protest-related articles for the other major German cities.

Figure 3 Synthetic Control analysis (media data).



Notes: This figure presents results of SC analyses. In the treatment graphs, we compare the development of Dresden (solid line) and SynDresden (dashed line). The placebo graphs plot for each German city with more than 200,000 residents (besides Essen and Halle) the differences between the development of the city and the development of its doppelganger. The black line is Dresden. In Panel (a) and (b), we use the total number of protest-related articles as outcome variable. In Panel (c) and (d), we consider total number of articles that are not related to protest. Protest-related articles are identified based on the keywords listed in Table C.4. The number of non-protest-related (other) articles is the residual between the total number of articles that name a city and the number of protest-related articles. SynDresden consists of Brauschweig (0.019), Cologne (0.029), Erfurt (0.313), Hamburg (0.045), Hanover (0.061), Magdeburg (0.478), and Munich (0.054) in the upper part; and of Bielefeld (0.477), Bremen (0.114), Dortmund (0.011), Erfurt (0.369), Hamburg (0.022), Munich (0.002), and Stuttgart (0.004) in the lower part. To determine the weights, we use all pre-treatment outcomes and no covariates.

In Figure 3, we use the SC approach to show how Dresden's media coverage developed compared to other major German cities. The upper part of this figure depicts the results for the protest-related articles, while the lower part shows the results for the other articles. As in Section 3.4.2, we show treatment and placebo graphs. For both types of articles, we detect a close match between Dresden and SynDresden in the period prior to the far-right mass rallies. For the articles not related to protests, we detect the same pattern for the period from October 2014 onwards. By contrast, the number of protest-related articles about Dresden largely exceeded the number of protest-related articles about SynDresden in this period. The placebo graph indicates that no other major city in Germany experienced a

comparable increase in the number of protest-related articles.[42]

3.5.3 Pegida protests in other cities and counterprotests

As stated in Section 3.1 and described in more detail in Appendix A.2, Pegida offshoots were founded in several German cities. While none of the offshoots was nearly as popular as the original Pegida movement in Dresden, a question might still be whether the protests organized by Pegida offshoots also affected people's migration behavior.[43] To address this question, we use data compiled by Vüllers and Hellmeier (2022) who analyzed more than 100 local newspapers to create a database on Pegida protests in major German cities. More specifically, based on their database, we classify the 40 cities with more than 200,000 inhabitants into three groups: (1) cities with at most 1 rally, (2) cities with 2 – 9 rallies, and (3) cities with at least 10 rallies (for details, see Table C.2). In our empirical analysis, we estimate our baseline regression model (see Eq. 1) but replace the dummy DD with an ordinal variable that distinguishes the three aforementioned groups. The results are presented in Columns 1 and 3 of Table C.11. Compared with the cities that experienced no or virtually no rallies, we find no evidence for a decline in the number of German incomers from another state for cities with a few protests. For cities with many protests, we detect negative estimates. However, these estimates are not statistically significant at conventional levels. Together with the findings reported in Section 3.4, this finding suggests that not all cities with many Pegida protests experienced the same decrease in the influx from other German states.

An explanation for why the effect of experiencing many far-right rallies might differ is that individuals when hearing about far-right protests in a particular city also receive other information and that these additional information alleviate the concerns caused by the far-right rallies. We verify this hypothesis by investigating whether the consequences of far-right protests depend on the (relative) size of the counterprotests.[44] To this end, we use the data on anti-Pegida rallies provided by Vüllers and Hellmeier (2022) and categorize the 40 major German cities depending on whether attendance in the rallies against Pegida was typically larger than the

[42] In Figure 3, we see another notable spike in the number of protest-related articles apart from the spikes caused by the protests in Dresden. This spikes is in the third and fourth quarter of 2018 and results from mass rallies by and against the far right in Chemnitz, respectively. For two reasons, we are not concerned about these rallies: first, they happened at the end of our investigation period, and second, the weight of Chemnitz in SynDresden is 0 in the SC analyses presented in Section 3.4.2.

[43] In particular, a concern might be that the Stable Unit Treatment Value Assumption (SUTVA) is violated.

[44] Exploiting rallies in France, Lagios et al. (2025) suggest that protests against the far right can reduce the support for far-right policies and candidates.

participation in the Pegida protests (for details, see Table C.2). In our regression analysis, we add this dummy as interaction term. Columns 2 and 4 of Table C.11 suggest that many far-right rallies only reduce the influx from other states if (as only in Dresden) the counterprotests are not larger than the far-right rallies.[45]

3.5.4 Far-right voting

Our dyadic difference-in-differences model includes a range of destination-specific time-varying covariates to control for well-known drivers of internal migration and established causes of far-right populism that are not captured by our fixed effects. A concern in this regard might be that we do not account for political differences. The reason for why our baseline model includes no political variables is the large number of studies reporting that protests affect election results (for a review, see Cantoni et al., 2024).[46] Put differently, we want to keep the risk that bad controls distort our estimates as small as possible. In Table C.12, we show how our results change if we control for far-right voting. More specifically, we add controls to our model that reflect the vote share of far-right parties in European, national, state, and local elections, respectively.[47] Our estimates only marginally decrease due to this model extension.

Our second approach to address potential concerns regarding far-right voting in general and the rise of the AfD in particular (for details, see Section A.4 and A.5) is to study whether the influx to Erfurt has notably changed since fall 2014. We believe that Erfurt's development is informative since it is the capital of another state in East German (Thuringia). Furthermore, both Saxony and Thuringia held state elections in fall 2014. In these elections, the AfD received similar vote shares (Saxony: 9.7%, Thuringia: 10.6%). The support for the AfD in Erfurt and Dresden was also comparable (Dresden: 8.2%, Erfurt: 9.5%). Thus, if people reacted to the elections rather than the far-right mass protests, we should observe that the two cities experienced a similar decline in the influx from other regions. However, for Erfurt, we find no evidence for a decrease (see Figure B.15).

[45] An implicit assumption behind our explanation is that people become aware of the counter-protests. We believe that this assumption holds since the press typically reported about such rallies when informing about the far-right rallies. For instance, when reporting about the first Legida protest in Leipzig on 12 January 2015 ($\approx$ 5,000 participants), newspapers usually stated that a much larger counterprotest ($\approx$ 30,000 participants) happened at the same time (see e.g. Beitzer, 2015).

[46] In particular, using street-level data from Dresden, Bischof (2021) suggests that the Pegida protests had an impact on people's voting decisions.

[47] We add up the vote shares of several far-right parties, including (e.g.) the AfD, the NPD, the Republicans, and the DVU.

3.5.5 Within-state migration

In our main analysis, we exclude within-state moves. The primary reason for this exclusion is that we argue in our conceptional considerations (see Section 2) that far-right protests shape the expectations and decisions of people who have little knowledge about the city where the rallies occurred. We think that this condition is unlikely to hold for people that live in the same state, especially in our specific case where Dresden is the state capital of a relatively small state. Consistent with our reasoning are the results presented in Table C.13 where we show that within-state migration is indeed not affected by the far-right protests.

3.5.6 Differences in regional media exposure

In Section 3.5.2, we illustrate that the far-right mass protests in Dresden received considerable attention in the national media. We are thus convinced that a large proportion of the population in Germany recognized these rallies. However, many people rely on regional rather than national news to get information. A question might thus be whether regional news differ in the extent to which they reported about the far-right mass rallies in Dresden and (if so) whether people from high-exposure regions were more likely to change their location choices. To answer the first question, we exploit 107 local newspapers included in GBI-Genios wiso. More specifically, we assign each newspapers that is available in the two years after the rise of Pegida to a district (NUTS2) and calculate for each district the share of articles that mention both *Pegida* and *Dresden*.[48] Figure B.17 shows that there indeed existed regional differences in reporting intensity. As a next step, we thus investigate whether the protest-induced decrease in the influx to Dresden differs between districts with high and low exposure. Table C.14 suggests that this is not the case. An explanation for this lack of effect heterogeneity is that the far-right rallies in Dresden were very salient and intensively debated all over Germany after their outbreak. People were thus well aware of them even if the local newspapers reported relatively scarcely.[49]

[48] We exploit the city where the chief editorial office is based for the assignment to the districts. Since GBI-genios wiso does not include a local newspaper for each district in our period of interest, our measure is only available for 28 out of 38 districts.

[49] For this reason, we also believe that our results do not contradict with Besley et al. (2024) who find that tourists' reaction to violence and terror depends on the extent of media coverage in their home country. In particular, they show that people from countries with no or low media coverage react much less to such events than people coming from a country where the media reports extensively. In our case, there is no region without or very little media coverage. Put differently, the regional differences in reporting about the far-right protests created variation among places that were already highly exposed due to the coverage in the national media. The implicit assumption behind our line of reasoning is that there are saturation effects regarding news consumption.

3.5.7 Out-migration

Our main analysis suggests that the far-right mass rallies affected the number of individuals who moved to Dresden. A question that may arise from this result is whether the protests also influenced the number of people who moved away from Dresden. Addressing this question is challenging since the total outflow is partly determined by the inflow in previous years. Put differently, due to the fact that fewer moved to Dresden in year t because of the protests, there will mechanically be less people moving out in year $t + s$ ($s \geq 1$). To ensure that we abstract from this mechanic effect, we require information about when people started to live in the city from which they move out. Unfortunately, such a variable is not available in our migration data. Our alternative is to exploit our student data and to study whether the location choices of high school graduates from Dresden changed after the begin of the rallies. Figure B.16 (upper part) suggests that this is unlikely to be the case since, in the post-treatment period, Dresden did not have more high school graduates that began to study in another city than SynDresden.[50] In other words, we find no evidence for a protest-induced outflow of Germans.[51]

3.5.8 Non-Germans

In this section, we investigate whether non-Germans also changed their residential decisions due to the far-right protests in Dresden. In general, foreigners are only responsible for a small fraction of the moves where a person moved from another state in Germany to one of the 40 largest German cities (≈17%). For the major cities in East Germany, this share is even lower (≈10%). Furthermore, among the non-German internal movers are many refugees and asylum seekers whose choices are restricted. Unfortunately, we cannot identify who has such a status. To make sure that we consider foreigners who face no legal constrains when taking location decisions, we focus on the small group of non-German EU citizens.[52] Table C.15 shows how these people reacted to the far-right rallies in Dresden. Similar to our

[50] If anything, we observe an opposite effect because the number of high school graduates that began to study elsewhere is slightly smaller in Dresden than in SynDresen in the years after the rise of the Pegida rallies. An explanation for such an effect could be that locals received study places which would without the far-right protests be filled by more qualified externals. However, we think that one needs to be cautious with this interpretation since the discrepancy between Dresden and SynDresden completely results from the gradual increase in SynDresden.

[51] An implicit assumption behind our analysis is that the total number of high school graduates that start to study is not affected by the far-right protests. In Figure B.16 (lower part), we support this assumption. The reason for the decreasing trend in the pre-treatment years is the substantial fertility decline following the German reunification.

[52] On average, non-German EU citizens are only responsible for 5% of the moves where a person moves from another federal state to one of our 40 destinations. For the major cities in East Germany, this share is even lower (≈2.5%).

results for Germans, we see a significant decline in the influx of young adult EU foreigners.

An alternative approach to gain some insights on the reactions of foreigners to far-right protests is to consider international university students. In Figure B.11, we thus present results from a SC analysis that examines how the far-right mass protests in Dresden affected the number of international first-year students.[53] In the years prior to the outbreak of the protests, we only observe minor differences between Dresden and Syn-Dresden. By contrast, in the post-treatment period, we detect, on average, a gap of around 400 international first-year students per year. Compared to the last year before the protests, this is a decline of more than 20 percent.

3.6 Qualitative evidence for mechanism

As outlined in Section 2, our hypothesis is that far-right protests influence what individuals think about a city and thus their location choices. An objection against the analyses shown so far might be that they only produce reduced-form evidence. Put differently, we lack results indicating that people perceived Dresden differently before and after the protests. Unfortunately, no data exists that allows to address this issue in a sophisticated manner. To our knowledge, the best available data set is a survey (named *Brandmeyer Stadtmarken-Monitor*) in which a representative sample of Germans evaluates major German cities. One question in the survey is whether people think — on a scale from 1 (do absolutely not agree) to 10 (do absolutely agree) — that a city has a *good reputation*. Studying young adults (18 – 29) and comparing Dresden's rating in 2010 and 2020, we find a decrease by 0.5. The mean rating of the other 33 cities evaluated in both surveys increased by 0.3. Therefore, Dresden felt from rank 12 to 24 (see also Figure B.18). Similarly, if we consider the question whether people consider a city as *sympathetic*, we see that Dresden's rank decreased by 8 positions. With respect to other questions such as whether a city has an *attractive city center* (2010: #7, 2020: #5) or is *worth to visit as tourist* (2010: #5, 2020: #5), we do not detect that Dresden is differently perceived by young adults before and after the rise of the far-right rallies. In the ranking that reflects whether young people consider a city as *economically strong*, Dresden's rank even improved slightly (2010: #23, 2020: #21). However, this also

[53]The analysis in Figure B.11 differs from all previous analyses because it studies international rather than internal migration. We still think that this group of foreigners is interesting since attracting international tertiary students is conducive for the local labor market (Beine et al., 2023). In addition, the residential decisions of international students are likely to be similarly shaped as the choices of young (highly) skilled international workers (Beine et al., 2014).

applies to most other East German cities.[54] Finally, with regard to the question whether a city is perceived as *secure*, we see for young adults that Dresden ranks 39th out 50 cities in 2020 (#29 out of the 34 cities that were evaluated in 2010). Unfortunately, no security-related question was asked in 2010.[55]

Also in media reports, we find anecdotal evidence, suggesting that the far-right mass demonstrations in Dresden had an effect on the reputation of this city and thereby influenced people's migration decisions. For example, in March 2016, the *Frankfurter Allgemeine Zeitung* released an article, in which the spokesman of a semiconductor manufacturer acknowledges that these protests discouraged people from accepting job offers (Beeger, 2016). This article also includes a statement of the then-rector of the Dresden University of Technology (hereafter: TU Dresden), suggesting that the far-right mass protests complicated hiring processes.[56] In line with our theory is also an article that was published by the *Sächsische Zeitung* in 2020. More specifically, this article quotes the then-rector of the Carl Maria von Weber College of Music with a statement, indicating that these rallies still raise concerns, in particular among the German applicants (Vollmer and Weller, 2020). This view fits well together with the experience of Bernhard Kelz who owns an advertisement agency in Dresden and states in a radio report by *Deutschlandfunk Kultur* that some aspirants rejected his job offer as they do not want to live in a city where thousands of people are willing to join demonstrations organized by the far right (Gerlach, 2021).

Finally, using a lexical approach, we analyze the more than 2,200 protest-related articles that mention Dresden and were published between October 2014 and June 2019 in the supraregional newspapers listed in Table C.3 (for details about how we identify protest-related articles, see Section 3.2.3) to find out which information is conveyed in these articles. We first examine whether these articles touch upon security issues. To this end, we count how many of them include the word *Gewalt* (violence). These are 17.5% of the articles. Second, we investigate whether articles frame narratives around right-wing extremism and find that 6.4% of them contain this word. Lastly, we study whether the articles associate Dresden with far-right attitudes. To address this issue, we examine how many of the articles mention the

[54] In the 2015 survey which was conducted in early 2015 and thus during the first phase of the Pegida protests, Dresden's position in this specific ranking was a bit better (#16).

[55] The survey run in 2015 includes a question related to security. Among young adults, Dresden ranks 13th out 50 cities (#10 out of the 34 cities also evaluated in 2010). However, this question differs from the question in 2020 since it asks whether a city is perceived as *secure and clean* rather than focusing on security only.

[56] In January 2022, we were invited by the rectorate of the TU Dresden to present our study. In the following discussion, members of the rectorate confirmed that job candidates rejected an offer due to the far-right mass protests.

AfD. We observe that this is the case for 37.9% of the articles.[57]

4 Experimental evidence on the role of far-right protests for location decisions

In the second part of this project, we use a conjoint experiment to improve our understanding about how far-right protests affect people's location choices. Our motivation is threefold. First, we want to highlight in a more general environment that far-right rallies influences individual location decisions. The experiment thus allays the concern that the results presented in Section 3 lack external validity. Second, we want to study how reactions to far-right protests vary depending on people's political views. Third, in Section 2, we argue that far-right rallies have an effect on how people perceive a city. For data availability reasons, we could only present qualitative evidence for this hypothesis in the previous section. We aim to address this issue with the experiment. In particular, we want to illustrate some concerns that arise when people recognize that a city experiences far-right mass protests.

4.1 Design

Building upon Arntz et al. (2023), we apply a conjoint design to experimentally study how non-pecuniary factors shape location choices.[58] More specifically, our experiment has two main parts. Both parts have in common that they consist of seven rounds. In each round, participants must choose between two hypothetical cities based on six different characteristics. Four of these characteristics are well established determinants of location choices and appear in a similar way in the experiment conducted by Arntz et al. (2023). These characteristics are: (i) amount of cultural offerings, (ii) extent of social diversity, (iii) number of leisure offers for children, families, and teenager, and (iv) quality of the public infrastructure. In addition, our list of characteristics includes two political factors: (v) the extent of environmental activism and (vi) the frequency of far-right demonstrations. In the experiment, we label the latter as *asylum- and migration-critical rallies* to avoid stigmatization. Following Arntz et al. (2023), we allow each characteristic to vary between three different levels (low, medium, high). The profiles of the two places

[57] We repeat our analysis with the 1,635 articles that mention Pegida and Dresden. The results are very similar: 17.9% include the German word for violence and 7.0% the German word for right-wing extremism, while the AfD is mentioned in 44.3% of the articles.

[58] We preregistered our experiment in the AEA RCT Registry (ID: AEARCTR-0012661).

that participants compare in a specific round are randomly chosen. However, we make sure that the two profiles are not identical.

The first and the second part of the experiment differ in two aspects from each other. In the first part, people need to decide which of the cities they prefer as a place of residents. This part is completed by all participants. For the second part, participants are randomly allocated into four groups. Groups differ with regard to the decision that they have to make at the end of each round. People assigned to subgroup 1 need to indicate in which of the two cities they expect to feel more secure. People in subgroup 2 have to state where they expect less difficulties in finding people with similar interests and views. In subgroup 3, people are asked which city they expect to develop economically better in the medium-run. People in subgroup 4 need to state where they expect to find more parks and green areas. The idea of the last question is to have an outcome that is quite unrelated to far-right protests.

Appendix D provides more details about the design of our experiment. More specifically, this supplementary section shows screenshots including the different components of the experiment. In Section D.1, we present the actual experiment where all descriptions are in German. For the sake of transparency, we provide a translated version in Section D.2.

4.2 Implementation

We conducted our experiment in December 2023 in cooperation with *Bilendi & respondi*, a well-known survey company in Germany (see Grewenig et al., 2021 and Dertwinkel-Kalt et al., 2025 for other studies that collaborate with this firm). In Germany, *Bilendi & respondi* has about 300,000 panelists which are recruited via several online measures (e.g. public relations, ads, panelist referral programs, and email campaigns). To be eligible for our experiment, people need to have a German citizenship and have to be between 18 and 45 years old. As the results in Section 3 show that especially fewer young German adults moved to Dresden due to the far-right rallies, we defined that two-thirds of the participants must be born after 1993. We also made sure that the number of men and women is balanced and that our sample is representative regarding the number of participants who live in Eastern and Western Germany.

In total, we have 3,067 individuals who completed the experiment. The median duration is 6.5 minutes. We exclude people from our sample if they finished the experiment in less than 3 minutes or more than 30 minutes.[59] Table C.16 presents

[59]We admit that the two thresholds are arbitrary. However, our results are robust to alternative

sample characteristics for the 2,821 participants that we take into account in our analysis.

4.3 Regression model

As suggested by Hainmueller et al. (2014), we use the following model to analyze how information about far-right protests shaped peoples' choices in our conjoint experiment:

$$Y_{irc} = \beta_1 Prot^m_{irc} + \beta_2 Prot^h_{irc} + \sum_{j \in \{1,\ldots,5\}} \sum_{k \in \{m,h\}} \gamma_{j,k} X^{j,k}_{irc} + \xi_i + \varepsilon_{irc}, \quad (6)$$

where i denotes an individual, $r \in \{1, \ldots, 7\}$ a round, and $c \in \{A, B\}$ a city. The dependent variable (Y) is a dummy that is equal to 1 if a city is selected in a particular round by a particular participant. $Prot^m$ and $Prot^h$ are also binary variables indicating whether a city is characterized by a medium (m) or high (h) number of far-right protests. Finally, our regression model includes variables (X) reflecting which of the other characteristics have a medium or a high level and individual fixed effects (ξ). The parameters of interest are β_1 and β_2. They show whether the likelihood to be chosen depends on whether a place occasionally or frequently experiences far-right protests rather than as good as never.

4.4 Results

4.4.1 Preferred place of residence

As described in Section 4.1, participants need to decide in the first part of our experiment which of the two hypothetical cities they prefer as place of residence. Table 2 illustrates how this decision is affected by the information provided with regard to the frequency of far-right protests. More specifically, in Column 1, we present estimates of Eq. (6) for our full sample of participants. We observe that individuals take into account far-right protests when making location choices. In particular, people are less likely to choose a city as preferred place of residence if such rallies happen. We also find that the negative effect is much stronger if the far-right rallies occur frequently rather than occasionally.[60] Taken together, these

choices (not reported).

[60] In Table C.17, we present how the estimates differ by individual characteristics. We detect only small difference with regard to people's place of living (East/West Germany) and their level of education. We also find that the estimates are similar for people with and without migration background. Regarding gender, we see that women consider far-right rallies as more negative than men. From our perspective, this finding does not contradict with the results reported in Table 1 where we found similar effects for men and women. The reason is that the group of

Table 2 The effect of far-right rallies on location choices (main analysis, conjoint experiment).

	(1)	(2)	(3)	(4)
Frequency of far-right protests (occasionally)	-0.052*** (0.0078)	-0.054** (0.0223)	-0.028* (0.0153)	-0.082*** (0.0127)
Frequency of far-right protests (frequently)	-0.276*** (0.0094)	-0.214*** (0.0294)	-0.224*** (0.0179)	-0.344*** (0.0152)
Observations	39,494	5,866	10,108	13,230
Individuals	2,821	419	722	945
Participants considered in regression analysis	Main sample of participants	Supports of far-right parties	Supports of center-right parties	Supports of left-wing parties

Notes: This table shows estimates of Eq. (6), using different samples. The outcome variable is a dummy that reflects whether a city was selected as preferred place of residents. Individual fixed effects are included in all regressions. As common for Germany, we classify the AfD as a far-right party, CDU/CSU and FDP as center-right parties, and SPD, Alliance 90/The Greens, and The Left as left-wing parties. Standard errors clustered at the participant-level are reported in parentheses. $^{*}p < 0.10$, $^{**}p < 0.05$, $^{***}p < 0.01$.

results are consistent with the findings presented in Section 3.[61]

A major reason for conducting our conjoint experiment is to get an idea about how people's reactions to far-right protests depend on their political attitudes. To address this question, we ask participants about their party preferences. As this information is sensible, we allow them to give no answer. About 25 percent of the participants made use of this opportunity. The other participants are assigned to one out of three groups: (a) supporters of the far-rights, (b) supporters of center-right parties, and (c) supporters of left-wing parties. In Columns 2, 3, and 4 of Table 2, we report how the location decisions of these three groups of people are affected by far-right protests. We see for each group that such protests lower the likelihood that a city is selected as preferred place of residence. However, we also find that supporters of left-wing parties show a much stronger reaction. Somehow surprising is the fairly small difference between the supporters of the far right and the supporters of the center-right. We still conclude that personal political views influence the extent to which people adjust their location choices due to far-right rallies.[62]

people who move to another state is not a representative subsample of the German population. More specifically, we believe that these people are more cosmopolitan and progressive. If we examine gender differences among left-wing people (which are likely to be more cosmopolitan and progressive than the average German), we get similar estimates for men and women (not reported).

[61] In Figure B.19, we present the coefficients for the other five variables. We find that the effect of frequent far-right protests exceeds that of all other variables. For leisure opportunities and public infrastructure, we observe estimates of similar magnitude. Arntz et al. (2023) also detect that both aspects are of high and similar importance for people when choosing a location. For frequent environmental activism, we also detect a negative effect. However, this effect is much smaller than for frequent far-right protests.

[62] With respect to green activism, we also observe that reactions depend on people's political preferences. While supporters of the far right and those of center-right parties consider such activism as negative, we find small positive effects for left-wing people (not reported).

4.4.2 Specific expectations

The key objective of the second part of our experiment is to get a more detailed understanding of what happens in people's mind if they recognize that far-right protests occur in a particular city. As outlined in detail in Section 4.1, we thus randomly divided our participants into four groups and asked them about specific expectations rather than their preferred place of residence. In Figure 4, we report the results related to this part of our experiment. In contrast to Table 2, we only show estimates reflecting the effects of frequent far-right protests.[63]

Figure 4 consists of four graphs, while each graph is related to one of the four questions that we raised in the second part of our experiment. As in Table 2, we present estimates four four different samples in every graph. The first estimates report the average reaction of all participants that had to answer the respective question. The other estimates show how individual reactions depend on people's party preferences.

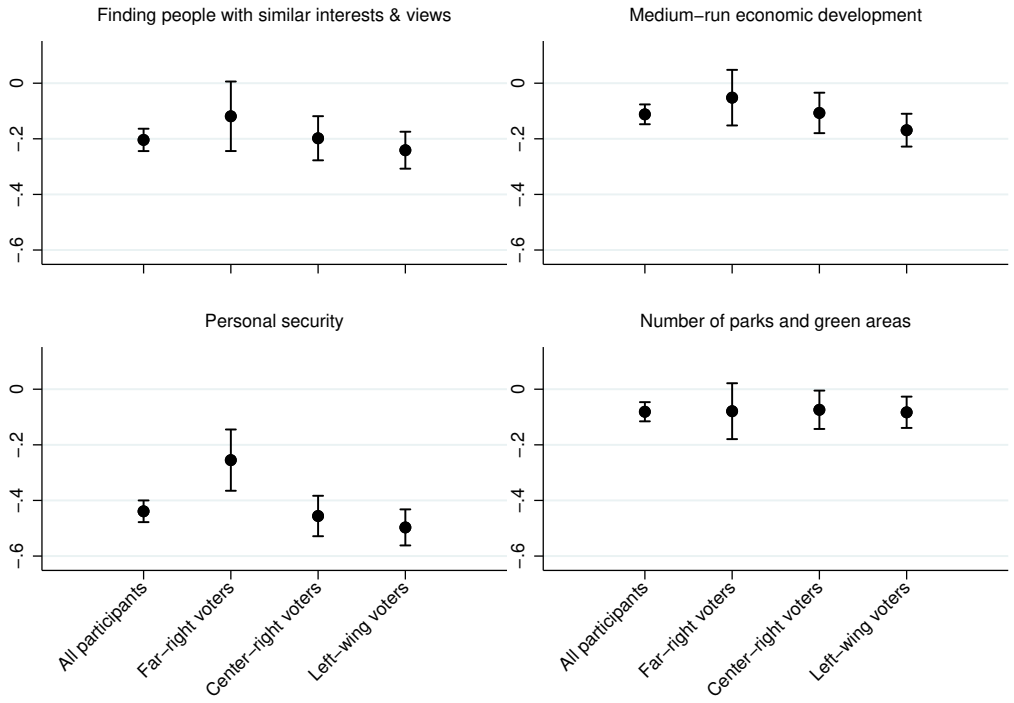
Among the four aspects that we consider in our experiment, we observe that far-right rallies are most likely to cause security concerns. More specifically, our estimates imply that the likelihood of being chosen as securer city decreases, on average, by 40 percent. We also find that security concerns arise irrespectively of people's political stance. However, estimates are twice as large for supporters of left-wing and center-right parties compared to supporters of the far-right.

Another aspect for which we find that people's expectations are considerably shaped by far-right protests is the likelihood of finding people with similar views and interests. On average, we observe that far-right rallies make individuals less optimistic on this matter. When differentiating individuals based on their party preferences, we see that the estimates are only statistically significant from 0 for people who do not support the far right. With respect to medium-run economic development, we detect the same pattern, despite that the point estimates are a bit smaller.

Against our expectation, we also observe in our baseline analysis that people expect a lower quality of parks and green areas if far-right rallies frequently take place. However, compared to the other three groups, the estimate reflecting the average reaction is smaller. Furthermore, we do not find that reactions differ by people's political views.

[63] Figure B.24 shows how people's expectations change if a city occasionally experiences far-right demonstrations. For the sake of brevity, we do not describe this figure in the reminder of this section.

Figure 4 The effect of frequent far-right rallies on location choices (mechanism analysis, conjoint experiment).



Notes: This figure shows estimates of Eq. (6), using different samples. The outcome variable is a dummy that reflects whether a city was selected instead of the alternative city. Individual fixed effects are included in all regressions. As common for Germany, we classify the AfD as a far-right party, CDU/CSU and FDP as center-right parties, and SPD, Alliance 90/The Greens, and The Left as left-wing parties. The standard errors are clustered at the individual-level. Whiskers show 95 percent confidence intervals. For the full-sample analyses, we show in Figures B.20 – B.23 how the estimates for frequent far-right protests differ from the estimates for the other attributes.

4.5 Discussion

4.5.1 Methodological issues

In total, people made 14 decisions in our experiment. A concern might be that participants lost attention over time. Put differently, late choices might not be as reliable as early choices. For two reasons, we doubt that this issue is severe in our case. First, Bansak et al. (2018) show that declines in quality response are minor even if individuals have to make 30 choices in a conjoint experiment. Second, as reported in Table C.18, our estimates hardly change independently of whether we study the first two rounds, the last two rounds, the middle round, or two random rounds. Furthermore, in Table C.19, we present our results with three alternative clustering approaches (robust, at the round level, and two-way at the round and participant level) to alleviate concerns in this regard.[64]

[64] Another methodological concern might be that we lack sufficient statistical power. For several reasons, we think that this is unlikely. First, as stated by Stantcheva (2023), due to fact that people evaluate multiple scenarios, conjoint designs typically have a high statistically power.

As mentioned above, we use Arntz et al. (2023) as role model for our conjoint experiment. However, a major difference concerns the list of city characteristics since they do not take into account political factors. While providing information about political aspects is not a unique feature of our experiment (see e.g. Gimpel and Hui, 2015), our novelty is that we do not use partisan composition. Thus, a concern might be that people consider it as striking that we use the frequency of far-right rallies to characterize a city. As a consequence, participants might have anticipated that this is the city characteristic of interest and could have adjusted their behavior accordingly. For two reasons, we think that it is unlikely that this actually happened. One reason is that our list of city characteristics also includes the extent of environmental activism and thus another political factor. A second reason is that local protests in favor or against migration regularly took place in Germany in late 2023. Put differently, at that time, far-right rallies were neither an extraordinary phenomena nor the key topic of the public debate. As the same applies to actions demanding more climate protection, we are also not concerned that an imbalance exists in this regard between our two political factors.[65]

4.5.2 In-depth analysis on security concerns

A key result of Section 4.4.2 is that people perceive a city as less secure due to far-right rallies. Interestingly, such a reaction cannot only be observed for people supporting a left-wing or a center-right party but also for supporters of the far right. For the former, a likely explanation is that they consider individuals who attend far-right protests as potentially violent. However, some doubts may arise whether this explanation also applies for far-right voters. An alternative may be that they interpret the rallies as signal that a city experiences problems due to incoming migrants or asylum seekers. Put differently, supporters of the far right might not be concerned about the protesters, but rather the (presumed) cause of the protests. If this logic applies, we should observe for far-right voters that their reactions to far-right protests depend on the extent of social diversity. Table C.20 shows that this is the case. More specifically, we find for supporters of far-right parties that they have greater security concerns due to frequent far-right protests

Second, compared with other studies that run conjoint experiments, we have a relatively large number of participants. For instance, Arntz et al. (2023), which is the analysis closest to our experiment, had much less participants. The number of choices per person is the same in both experiments. Finally, when apply standard power calculation approaches, we observe that our sample sizes are sufficiently far away from being worrisome.

[65] Another difference between our experiment and Arntz et al. (2023) is the absence of incentives. Thus, concern might arise with regard to demand effects. We think it is unlikely that demand effects drive our results since we find fairly similar results for the four characteristics that we took over from Arntz et al. (2023).

if there is high social diversity. By contrast, for voters of left-wing or center-right parties, we do not see that the reactions to far-right rallies depends on the level of social diversity.

5 Conclusion

In this paper, we examine how far-right mass protests affect location decisions of nationals. To answer this question, we proceed in two steps. In the first step, we exploit a series of far-right mass rallies that unexpectedly emerged in the city of Dresden at the turn of the year 2014/2015. Using administrative data and two different empirical approaches, we show that these protests caused a substantial short- and medium-run decline in the total number of young German adults who moved from another state to Dresden. Many of the people that do not move to Dresden anymore seems to be liberal-minded and to have high intellectual skills.[66] Furthermore, as a second step, we run a conjoint experiment where participants need to choose between two hypothetical cities based on a set of characteristics. Our experiment confirms that far-right rallies influence people's location choices and show that individual reactions depend on people's political stance. With the experiment, we can also provide some insights on how people update their beliefs about a city if they recognize that far-right protests happen. More specifically, we observe that far-right protests raise security concerns. Among people who do not support the far right, we also find more pessimistic expectations with regard to future economic development and that they expect greater difficulties in finding people with similar views and interests.

In sum, our paper implies that far-right mass protests have an impact on what people think about a city and thus their location decisions. More generally, we conclude from our analysis that widespread far-right attitudes constitute a great disadvantage in the regional competition for talented people. However, we also find some evidence suggesting that civic engagement against the far right can prevent detrimental economic consequences.

[66] A question that might arise from our results is where the people that did not move to Dresden due to the far-right protests went to instead. Answering this question is difficult due to the large number of alternative cities where people can go to. We carefully checked whether another big East German city experienced a rise in the influx from other regions that mirrors (at least to some extent) the decline found for Dresden. It turned out that this is not the case. Therefore, we think that it is more likely that the "missing" people moved to various places all over Germany rather than to a particular place.

References

Abadie, A. (2021). Using synthetic controls: Feasibility, data requirements, and methodological aspects. *Journal of Economic Literature*, 59(2):391–425.

Abadie, A., Diamond, A., and Hainmueller, J. (2010). Synthetic control methods for comparative case studies: Estimating the effect of California's tobacco control program. *Journal of the American Statistical Association*, 105(490):493–505.

Abadie, A., Diamond, A., and Hainmueller, J. (2015). Comparative politics and the synthetic control method. *American Journal of Political Science*, 59(2):495–510.

Abou-Chadi, T. and Krause, W. (2020). The causal effect of radical right success on mainstream parties' policy positions: A regression discontinuity approach. *British Journal of Political Science*, 50(3):829–847.

Aidt, T. S. and Franck, R. (2015). Democratization under the threat of revolution: Evidence from the Great Reform Act of 1832. *Econometrica*, 83(2):505–547.

Alabrese, E., Edenhofer, J., Fetzer, T., and Wang, S. (2024). Levelling up by levelling down: The economic and political cost of Brexit. *Working paper*.

Alm, J. and Winters, J. V. (2009). Distance and intrastate college student migration. *Economics of Education Review*, 28(6):728–738.

Andrews, M. J. (2023). How do institutions of higher education affect local invention? Evidence from the establishment of US colleges. *American Economic Journal: Economic Policy*, 15(2):1–41.

Arezki, R., Ramey, V. A., and Sheng, L. (2017). News shocks in open economies: Evidence from giant oil discoveries. *Quarterly Journal of Economics*, 132(1):103–155.

Arkhangelsky, D., Athey, S., Hirshberg, D. A., Imbens, G. W., and Wager, S. (2021). Synthetic difference-in-differences. *American Economic Review*, 111(12):4088–4118.

Arntz, M., Brüll, E., and Lipowski, C. (2023). Do preferences for urban amenities really differ by skill? *Journal of Economic Geography*, 23(1):541–576.

Arzheimer, K. (2015). The AfD: Finally a successful right-wing populist Eurosceptic party for Germany? *West European Politics*, 38(3):535–556.

Autor, D., Dorn, D., Hanson, G., and Majlesi, K. (2020). Importing political polarization? The electoral consequences of rising trade exposure. *American Economic Review*, 110(10):3139–83.

Bansak, K., Hainmueller, J., Hopkins, D. J., and Yamamoto, T. (2018). The number of choice tasks and survey satisficing in conjoint experiments. *Political Analysis*, 26(1):112–119.

Banzhaf, H. S. and Walsh, R. P. (2008). Do people vote with their feet? An empirical test of Tiebout. *American Economic Review*, 98(3):843–63.

Barone, G., D'Ignazio, A., de Blasio, G., and Naticchioni, P. (2016). Mr. Rossi, Mr. Hu and politics. The role of immigration in shaping natives' voting behavior. *Journal of Public Economics*, 136:1–13.

Battaglini, M. (2017). Public protests and policy making. *Quarterly Journal of Economics*,

132(1):485–549.

Bauer, T. K., Braun, S. T., and Kvasnicka, M. (2017). Nuclear power plant closures and local housing values: Evidence from Fukushima and the German housing market. *Journal of Urban Economics*, 99:94–106.

Bayer, P., McMillan, R., Murphy, A., and Timmins, C. (2016). A dynamic model of demand for houses and neighborhoods. *Econometrica*, 84(3):893–942.

Beaudry, P. and Portier, F. (2014). News-driven business cycles: Insights and challenges. *Journal of Economic Literature*, 52(4):993–1074.

Beeger, B. (2016). Wie Pegida Dresden schadet. *Frankfurter Allgemeine Zeitung*. Accessed via: *www.faz.net*.

Beine, M., Noël, R., and Ragot, L. (2014). Determinants of the international mobility of students. *Economics of Education Review*, 41(1):40–54.

Beine, M., Peri, G., and Raux, M. (2023). International college students' impact on the US skilled labor supply. *Journal of Public Economics*, 223(1):104917.

Beitzer, H. (2015). Nolegida vs Legida: 30 000 Gegendemonstranten. `https://www.sueddeutsche.de/politik/nolegida-in-leipzig-gegen-das-dagegen-1.2301726`.

Berger, R., Poppe, S., and Schuh, M. (2016). Everything counts in large amounts. In *PEGIDA: Rechtspopulismus zwischen Fremdenangst und Wende-Enttäuschung?* Transcript.

Besley, T., Fetzer, T., and Mueller, H. (2024). How big is the media multiplier? Evidence from dyadic news data. *Review of Economics and Statistics*, forthcoming.

Bischof, D. (2021). Does exposure to radical right rallies affect political behavior and preferences – Evidence from the far right Pegida movement in Germany. *mimeo*.

Bishop, K. C. and Murphy, A. D. (2011). Estimating the willingness to pay to avoid violent crime: A dynamic approach. *American Economic Review*, 101(3):625–29.

Bracco, E., De Paola, M., Green, C. P., and Scoppa, V. (2018). The effect of far right parties on the location choice of immigrants: Evidence from Lega Nord mayors. *Journal of Public Economics*, 166(1):12–26.

Brannen, S., Haig, C., and Schmidt, K. (2020). The age of mass protests: Understanding an escalating global trend. *CSIS Report*.

Burbidge, J. B., Magee, L., and Robb, A. L. (1988). Alternative transformations to handle extreme values of the dependent variable. *Journal of the American statistical Association*, 83(401):123–127.

Bursztyn, L., Egorov, G., and Fiorin, S. (2020). From extreme to mainstream: The erosion of social norms. *American Economic Review*, 110(11):3522–48.

Cantoni, D., Hagemeister, F., and Westcott, M. (2020). Persistence and activation of right-wing political ideology. *Working paper*.

Cantoni, D., Kao, A., Yang, D. Y., and Yuchtman, N. (2024). Protests. *Annual Review of Economics*, 31(3):519–543.

Caprettini, B., Caesmann, M., Voth, H.-J., and Yanagizawa-Drott, D. (2024). Going viral:

Propaganda, persuasion and polarization in 1932 Hamburg. *Working paper*.

Carneiro, P., Liu, K., and Salvanes, K. G. (2023). The supply of skill and endogenous technical change: Evidence from a college expansion reform. *Journal of the European Economic Association*, 21(1):48–92.

Chen, Y. and Rosenthal, S. S. (2008). Local amenities and life-cycle migration: Do people move for jobs or fun? *Journal of Urban Economics*, 64(3):519–537.

Colantone, I. and Stanig, P. (2018). The trade origins of economic nationalism: Import competition and voting behavior in Western Europe. *American Journal of Political Science*, 62(4):936–953.

Conzelmann, J. G., Hemelt, S. W., Hershbein, B. J., Martin, S., Simon, A., and Stange, K. M. (2023). Grads on the go: Measuring college-specific labor markets for graduates. *Journal of Policy Analysis and Management*.

Dauth, W., Findeisen, S., and Suedekum, J. (2014). The rise of the East and the Far East: German labor markets and trade integration. *Journal of the European Economic Association*, 12(6):1643–1675.

Dertwinkel-Kalt, M., Feldhaus, C., Ockenfels, A., and Sutter, M. (2025). The illusion of moral superiority: Evidence from the energy crisis. *European Economic Review*, 178(1):105093.

Diamond, R. (2016). The determinants and welfare implications of us workers' diverging location choices by skill: 1980-2000. *American Economic Review*, 106(3):479–524.

Dinas, E., Matakos, K., Xefteris, D., and Hangartner, D. (2019). Waking up the Golden Dawn: Does exposure to the refugee crisis increase support for extreme-right parties? *Political analysis*, 27(2):244–254.

Dippel, C., Gold, R., Heblich, S., and Pinto, R. (2022). The effect of trade on workers and voters. *Economic Journal*, 132(641):199–217.

Doerr, L., Potrafke, N., and Roesel, F. (2021). Populists in power. *CESifo Working Paper*.

Dolls, M., Fuest, C., Krolage, C., and Neumeier, F. (2025). Who bears the burden of real estate transfer taxes? Evidence from the German housing market. *Journal of Urban Economics*, 145:103717.

Dostal, J. M. (2015). The pegida movement and german political culture: Is right-wing populism here to stay? *Political Quarterly*, 86(4):523–531.

Downey, M. and Liu, J. (2023). Political preferences and migration of college-educated workers. Working paper.

Dustmann, C., Vasiljeva, K., and Piil Damm, A. (2019). Refugee migration and electoral outcomes. *Review of Economic Studies*, 86(5):2035–2091.

Dwenger, N., Storck, J., and Wrohlich, K. (2012). Do tuition fees affect the mobility of university applicants? Evidence from a natural experiment. *Economics of Education Review*, 31(1):155–167.

Eady, G., Hjorth, F., and Dinesen, P. T. (2023). Do violent protests affect expressions of party identity? Evidence from the Capitol insurrection. *American Political Science Review*, 117(3):1151–1157.

Efthyvoulou, G., Bove, V., and Pickard, H. (2023). Micromotives and macromoves: Political preferences and internal migration in England and Wales. *Journal of Economic Geography*, 23(5):1145–1167.

Ellinas, A. A. and Lamprianou, I. (2024). Movement versus party: The electoral effects of anti-far right protests in Greece. *American Political Science Review*, 118(2):687–705.

Fabel, M., Flückiger, M., Ludwig, M., Waldinger, M., Wichert, S., and Rainer, H. (2022). The power of youth: Did the "Fridays for Future" climate movement trickle-up to influence voters, politicians, and the media? *CESifo Working Paper*.

Ferman, B., Pinto, C., and Possebom, V. (2020). Cherry picking with synthetic controls. *Journal of Policy Analysis and Management*, 39(2):510–532.

Fetzer, T. (2019). Did austerity cause brexit? *American Economic Review*, 109(11):3849–86.

Foremny, D., Jofre-Monseny, J., and Solé-Ollé, A. (2017). 'Ghost citizens': Using notches to identify manipulation of population-based grants. *Journal of Public Economics*, 154(1):49–66.

Funke, M., Schularick, M., and Trebesch, C. (2016). Going to extremes: Politics after financial crises, 1870–2014. *European Economic Review*, 88(1):227–260.

Funke, M., Schularick, M., and Trebesch, C. (2023). Populist leaders and the economy. *American Economic Review*, 12(113):3249–3288.

Gao, X., Song, R., and Timmins, C. (2023). Information, migration, and the value of clean air. *Journal of Development Economics*, 163(1):103079.

Gauck, J. (2014). Christmas Speech of the German President. Downloaded from: *www.bundespraesident.de*.

Geiges, L., Marg, S., and Walter, F. (2015). *Pegida: die schmutzige Seite der Zivilgesellschaft?* transcript Verlag.

Gerlach, A. (2021). Für Weltoffenheit und ein besseres Image. *Deutschlandfunk Kultur*. Accessed via: *www.deutschlandfunkkultur.de*.

Gimpel, J. G. and Hui, I. S. (2015). Seeking politically compatible neighbors? The role of neighborhood partisan composition in residential sorting. *Political Geography*, 48(1):130–142.

Greenwood, M. J. (1975). Research on internal migration in the united states: A survey. *Journal of Economic Literature*, 12(2):397–433.

Greenwood, M. J. (1997). Internal migration in developed countries. *Handbook of population and family economics*, 1(1):647–720.

Grewenig, E., Lergetporer, P., Werner, K., Woessmann, L., and Zierow, L. (2021). Covid-19 and educational inequality: How school closures affect low-and high-achieving students. *European economic review*, 140:103920.

Guriev, S. and Papaioannou, E. (2022). The political economy of populism. *Journal of Economic Literature*, 60(3):753–832.

Hainmueller, J., Hopkins, D. J., and Yamamoto, T. (2014). Causal inference in conjoint analysis: Understanding multidimensional choices via stated preference experiments.

Political analysis, 22(1):1–30.

Halla, M., Wagner, A. F., and Zweimüller, J. (2017). Immigration and voting for the far right. *Journal of the European Economic Association*, 15(6):1341–1385.

Han, L., Heblich, S., Timmins, C., and Zylberberg, Y. (2024). Cool cities: The value of urban trees. Technical report, National Bureau of Economic Research.

Hangartner, D., Dinas, E., Marbach, M., Matakos, K., and Xefteris, D. (2019). Does exposure to the refugee crisis make natives more hostile? *American Political Science Review*, 113(2):442–455.

Häusler, A., Teubert, H., and Roeser, R. (2016). *Die Alternative für Deutschland*. Springer.

Haussen, T. and Uebelmesser, S. (2018). No place like home? Graduate migration in Germany. *Growth and Change*, 49(3):442–472.

Hicks, J. (1932). *The theory of wages*. MacMillan.

Hicks, J. (1963). *The theory of wages*. Springer.

Hilber, C. A. and Lyytikäinen, T. (2017). Transfer taxes and household mobility: Distortion on the housing or labor market? *Journal of Urban Economics*, 101:57–73.

Jacob, B. A. and Lefgren, L. (2007). What do parents value in education? an empirical investigation of parents' revealed preferences for teachers. *The Quarterly Journal of Economics*, 122(4):1603–1637.

Jia, N., Molloy, R., Smith, C., and Wozniak, A. (2023). The economics of internal migration: Advances and policy questions. *Journal of Economic Literature*, 61(1):144–180.

Kahn, M. E. (1995). A revealed preference approach to ranking city quality of life. *Journal of Urban Economics*, 38(2):221–235.

Kennan, J. and Walker, J. R. (2010). Wages, welfare benefits and migration. *Journal of Econometrics*, 156(1):229–238.

Kleven, H., Landais, C., Munoz, M., and Stantcheva, S. (2020). Taxation and migration: Evidence and policy implications. *Journal of Economic Perspectives*, 34(2):119–42.

Koenings, F., Di Meo, G., and Uebelmesser, S. (2020). University rankings as information source: Do they play a different role for domestic and international students? *Applied Economics*, 52(59):6432–6447.

Lagios, N., Méon, P.-G., and Tojerow, I. (2025). Media, spillovers and social norms: The electoral impact of anti-far-right protests in the 2002 French election. *Economic Journal*, 135(669):1575–1608.

Lehnert, P., Pfister, C., and Backes-Gellner, U. (2020). Employment of R&D personnel after an educational supply shock: Effects of the introduction of universities of applied sciences in Switzerland. *Labour Economics*, 66(1):101883.

Lohmann, S. (1993). A signaling model of informative and manipulative political action. *American Political Science Review*, 87(2):319–333.

Lohmann, S. (1994). Information aggregation through costly political action. *American Economic Review*, 84(3):518–530.

Long, B. T. (2004). How have college decisions changed over time? An application of the conditional logistic choice model. *Journal of Econometrics*, 121(1-2):271–296.

MacKinnon, J. G. and Magee, L. (1990). Transforming the dependent variable in regression models. *International Economic Review*, pages 315–339.

Madestam, A., Shoag, D., Veuger, S., and Yanagizawa-Drott, D. (2013). Do political protests matter? Evidence from the Tea Party movement. *Quarterly Journal of Economics*, 128(4):1633–1685.

Majer, S. (2016). Haltung von Studierenden über Zuwanderung und Fluchtursachen. *Kurzbeiträge der Arbeitsgruppe Hochschulforschung*.

Marcus, J., Reif, S., Wuppermann, A., and Rouche, A. (2020). The effect of increasing education efficiency on university enrollment evidence from administrative data and an unusual schooling reform in Germany. *Journal of Health Economics*, 70(1):102256.

Marcus, J. and Zambre, V. (2019). The effect of increasing education efficiency on university enrollment evidence from administrative data and an unusual schooling reform in Germany. *Journal of Human Resources*, 54(2):468–502.

Margalit, Y. (2019). Political responses to economic shocks. *Annual Review of Political Science*, 22(1):277–295.

Mazumder, S. (2018). The persistent effect of US civil rights protests on political attitudes. *American Journal of Political Science*, 62(4):922–935.

McCartney, W. B., Orellana-Li, J., and Zhang, C. (2024). Political polarization affects households' financial decisions: Evidence from home sales. *The Journal of Finance*, 79(2):795–841.

Merkel, A. (2014). New Year's Speech of the German Chancellor. Downloaded from: *www.bundeskanzlerin.de*.

Moretti, E. (2012). *The new geography of jobs*. Houghton Mifflin Harcourt.

Mudde, C. (2019). *The far right today*. John Wiley & Sons.

Mummolo, J. and Nall, C. (2017). Why partisans do not sort: The constraints on political segregation. *Journal of Politics*, 79(1):45–59.

Opp, K.-D. (2009). *Theories of political protest and social movements: A multidisciplinary introduction, critique, and synthesis*. Routledge.

Opp, K.-D. (2019). *The rationality of political protest: A comparative analysis of rational choice theory*. Routledge.

Pan, W.-F. (2023). The effect of populism on high-skilled migration: Evidence from inventors. *European Journal of Political Economy*, 79(1):102447.

Patzelt, W. J. and Klose, J. (2016). *PEGIDA: Warnsignale aus Dresden*. Thelem.

Pickard, H., Bove, V., and Efthyvoulou, G. (2022). You (Br)exit, I stay: The effect of the Brexit vote on internal migration. *Political Geography*, 95(1):102576.

Ramey, V. A. (2011). Identifying government spending shocks: It's all in the timing. *Quarterly Journal of Economics*, 126(1):1–50.

RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2006). Wanderungsstatistik. DOI: 10.21242/12711.2006.00.00.1.1.0, own calculation.

RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2007). Wanderungsstatistik. DOI: 10.21242/12711.2007.00.00.1.1.0, own calculation.

RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2008a). Statistik der studierenden. DOI: 10.21242/21311.2008.12.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2008b). Wanderungsstatistik. DOI: 10.21242/12711.2008.00.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2009a). Statistik der studierenden. DOI: 10.21242/21311.2009.12.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2009b). Wanderungsstatistik. DOI: 10.21242/12711.2009.00.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2010a). Statistik der studierenden. DOI: 10.21242/21311.2010.12.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2010b). Wanderungsstatistik. DOI: 10.21242/12711.2010.00.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2011a). Statistik der studierenden. DOI: 10.21242/21311.2011.12.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2011b). Wanderungsstatistik. DOI: 10.21242/12711.2011.00.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2012a). Statistik der studierenden. DOI: 10.21242/21311.2012.12.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2012b). Wanderungsstatistik. DOI: 10.21242/12711.2012.00.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2013a). Statistik der studierenden. DOI: 10.21242/21311.2013.12.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2013b). Wanderungsstatistik. DOI: 10.21242/12711.2013.00.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2014a). Statistik der studierenden. DOI: 10.21242/21311.2014.12.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2014b). Wanderungsstatistik. DOI: 10.21242/12711.2014.00.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2015a). Statistik der studierenden. DOI: 10.21242/21311.2015.12.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2015b). Wanderungsstatistik. DOI: 10.21242/12711.2015.00.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2016a). Statistik der studierenden. DOI: 10.21242/21311.2016.12.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2016b). Wanderungsstatistik. DOI: 10.21242/12711.2016.00.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2017a). Statistik der studierenden. DOI: 10.21242/21311.2017.12.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2017b). Wanderungsstatistik. DOI: 10.21242/12711.2017.00.00.1.1.0, own calculation.
RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2018a).

Statistik der studierenden. DOI: 10.21242/21311.2018.12.00.1.1.0, own calculation.

RDC of the Federal Statistical Office and Statistical Offices of the Federal States (2018b). Wanderungsstatistik. DOI: 10.21242/12711.2018.00.00.1.1.0, own calculation.

Roback, J. (1982). Wages, rents, and the quality of life. *Journal of Political Economy*, 90(6):1257–1278.

Rodrik, D. (2021). Why does globalization fuel populism? Economics, culture, and the rise of right-wing populism. *Annual Review of Economics*, 13(1):133–170.

Rosen, S. (1979). Wage-based indexes of urban quality of life.

Roth, J. (2022). Pretest with caution: Event-study estimates after testing for parallel trends. *American Economic Review: Insights*, 4(3):305–322.

Roth, J., Sant'Anna, P. H., Bilinski, A., and Poe, J. (2023). What's trending in difference-in-differences? A synthesis of the recent econometrics literature. *Journal of Econometrics*, 235(2):2218–2244.

Sardoschau, S. and Casanueva, A. (2024). Public signal and private action: right-wing protest and hate crimes against refugees.

Shafranek, R. M. (2021). Political considerations in nonpolitical decisions: A conjoint analysis of roommate choice. *Political Behavior*, 43(1):271–300.

Sjaastad, L. A. (1962). The costs and returns of human migration. *Journal of Political Economy*, 70(5/2):80–93.

Slotwinski, M. and Stutzer, A. (2019). The deterrent effect of an anti-minaret vote on foreigners' location choices. *Journal of Population Economics*, 32(3):1043–1095.

Sorkin, I. (2018). Ranking firms using revealed preference. *The quarterly journal of economics*, 133(3):1331–1393.

Spiess, C. K. and Wrohlich, K. (2010). Does distance determine who attends a university in Germany? *Economics of Education Review*, 29(3):470–479.

Stantcheva, S. (2023). How to run surveys: A guide to creating your own identifying variation and revealing the invisible. *Annual Review of Economics*, 15(1):205–234.

Steinmayr, A. (2021). Contact versus exposure: Refugee presence and voting for the far-right. *Review of Economics and Statistics*, 103(2):310–327.

Sun, L., Ben-Michael, E., and Feller, A. (2025). Using multiple outcomes to improve the synthetic control method. *Review of Economics and Statistics*, forthcoming.

Tiebout, C. M. (1956). A pure theory of local expenditures. *Journal of political economy*, 64(5):416–424.

Ulrich, A., Kramer, O., and Till, D. (2022). Populism and the rise of the AfD in Germany. In *Populist Rhetorics: Case Studies and a Minimalist Definition*. Springer.

Virchow, F. (2016). PEGIDA: Understanding the emergence and essence of nativist protest in Dresden. *Journal of Intercultural Studies*, 37(6):541–555.

Voigtländer, N. and Voth, H.-J. (2012). Persecution perpetuated: The medieval origins of anti-Semitic violence in Nazi Germany. *Quarterly Journal of Economics*, 127(3):1339–1392.

Vollmer, J. and Weller, A. (2020). Nazis und Pegida: Was sind die Folgen für Dresden?

Sächsische Zeitung. Accessed via: *www.saechsische.de*.

Vorländer, H., Herold, M., and Schäller, S. (2015). *PEGIDA: Entwicklung, Zusammensetzung und Deutung einer Empörungsbewegung*. Springer.

Vorländer, H., Herold, M., and Schäller, S. (2018). *PEGIDA and new right-wing populism in Germany*. Springer.

Vüllers, J. and Hellmeier, S. (2022). Does counter-mobilization contain right-wing populist movements? Evidence from Germany. *European Journal of Political Research*, 61(1):21–45.

Wasow, O. (2020). Agenda seeding: How 1960s black protests moved elites, public opinion and voting. *American Political Science Review*, 114(3):638–659.

Wilson, R. (2021). Moving to jobs: The role of information in migration decisions. *Journal of Labor Economics*, 39(4):1083–1128.

Wilson, R. (2022). Moving to economic opportunity: The migration response to the fracking boom. *Journal of Human Resources*, 57(3):918–955.

Winters, J. V. (2012). Cohort crowding and nonresident college enrollment. *Economics of Education Review*, 31(3):30–40.

Winters, J. V. (2020). In-state college enrollment and later life location decisions. *Journal of Human Resources*, 55(4):1400–1426.

Zabel, J. E. (2012). Migration, housing market, and labor market responses to employment shocks. *Journal of Urban Economics*, 72(2-3):267–284.

Appendix for online publication

A Further background information

A.1 Counterprotests and Pegida offshoots[1]

In December 2014 and January 2015, offshoots of Pegida were founded in several major German cities. Many of them used a slightly different acronym (e.g. Legida in Leipzig, Dügida in Düsseldorf, Kagida in Kassel). Most of the Pegida offshoots received fairly little support (less than 500 people) and disappeared after one or a few rallies. Ten or more protests only took place in seven cities (besides Dresden). However, only four rallies in these cities had more than 1,000 participants (3× in Leipzig, 1× in Munich). Outside Dresden, the only rally with more than 10,000 participants occurred in Leipzig on 21 January 2015.[2]

In Dresden, protests against Pegida started in early November 2014 and thus already a few weeks after the emergence of Pegida. In the beginning, only a few hundred people participated. In the following weeks attention increased to a few thousand participants. Typically, Pegida and anti-Pegida rallies in Dresdesn took place at the same day. An exemption was the anti-Pegida protest on 26 January 2015 which was combined with a public festival. With more than 20,000 people participating, this rally was (by far) the largest anti-Pegida protest in Dresden. At the regular protest days, participation was usually lower in the anti-Pegida rallies than in the Pegida protests during the first wave of Pegida protests. During the second wave in fall 2015, Pegida and anti-Pegida rallies had similar attendance figures.

Protests against Pegida occurred not only in Dresden but also in various other German cities (sometimes even if no Pegida offshoot existed). These anti-Pegida rallies were usually much larger than the protests run by the Pegida offshoots. For instance, in Leipzig, the first Legida rally on 12 January 2015 attracted between 2,000 and 3,000, while the counterdemonstration had 30,000 participants. On 21 January 2015, around 20,000 people attended the anti-Legida rally. Similarly, in Munich on 12 January 2015, about 1,500 Pegida supporters faced roughly 20,000 Pegida opponents.

[1] In addition to sources mentioned in Section 3.1, this section is based on Vüllers and Hellmeier (2022) who analyzed around 100 newspapers to build a dataset on pro- and anti-Pegida rallies in major German cities. In this section, we focus on cities with more than 200,000 inhabitants because, in our analysis, we usually compare Dresden's development with the development of cities above this population threshold.

[2] Notable disagreement exist on the number of people that participated in this Legida rally. For instance, Berger et al. (2016) reports that the number of participants was at most 5,000.

In Table C.2, we summarize to what extent major German cities experienced rallies of Pegida or its offshoots. Thereby, we differentiate between three levels of intensity: (a) 0 – 1 rally, (b) 2 – 9 rallies, (c) 10 or more rallies. We also show in which major German cities the counterprotests had, on average, more participants than the rallies organized by Pegida or its offshoots.

A.2 Other far-right rallies in Dresden

With more than 100 demonstrations, Pegida was responsible for most of the far-right rallies that occurred in Dresden between October 2014 and September 2019. Among the few others, three rallies are notable since they received supra-regional attention. They all emerged due to openings of refugees centers and happened in summer 2015. Below, we provide some information about these events.

A.2.1 NPD rally on 24 July 2015

On 24 July 2015, the local branch of the National Democratic Party of Germany (NPD) organized a rally in the inner-city of Dresden. The key reasons were the opening of a refugee center and the planned arrival of about 500 Syrian refugees. Roughly 200 NPD supporters attended this demonstration. Compared with the Pegida protests, this was a fairly low number. Nevertheless, the rally of the NPD received great public attention for two major reasons. First, the NPD supporters physically attacked a group of about 350 counterdemonstrators. Second, several people that supported the construction of the refugee camp reported that NPD followers considerably hindered their work in the past days. The chairman of the German Red Cross in Saxony, Rüdiger Unger, told journalists that he had never heard about such actions before.

A.2.2 Protests in Freital and Heidenau

Far-right demonstrations also happened in some of Dresden's small neighboring towns. Especially notable in this regard are the rallies in Freital and Heidenaun. Below, we briefly describe both events. We think that mentioning these cases is important because the media typically characterized these towns as places near Dresden. Therefore, it is possible that people updated their beliefs regarding the city of Dresden when hearing about far-right rallies in Freital or Heidenau.

In summer 2015, people with far-right attitudes often met in front of refugee centers and welcomed the arriving refugees with insults and threats. Among the various places in Germany in which such events happened, Freital and Heidenau

became particularly well known (Vorländer et al., 2018). Freital got more public attention than many other places since the protests in front of the local refugee center lasted for several weeks and happened on a daily basis from 22 June 2015 onward. In Heidenau, the NPD protested on 21 August 2015 to signal opposition against a new refugee center. Over the course of the rally, protesters threw stones, bottles, and fireworks at the police. At the end of the day, about 30 policemen were injured. Only one day later, supporters of the NPD launched an attack on policemen who guarded a rally in Heidenau that was held to express solidarity with refugees. As a reaction to the two events, both Vice-Chancellor Gabriel and Chancellor Merkel visited Heidenau (independently from each other) in the next week. During their visits, they were severely insulted by local protesters.

A.3 Dresden's reputation and development before October 2014

In the years prior to the rise of Pegida, Dresden was a prospering place. Between 2010 and 2014, Dresden's population growth was the seventh highest among all German cities with more than 200,000 inhabitants (see Figure B.2 for the details about the population size of Dresden since 2000). At the same time, the number of unemployed people decreased by 20 percent and the GDP grew by around 13 percent, despite an extreme flooding in May/June 2013. In 2012, the TU Dresden belonged to the eleven German universities that were awarded as "University of Excellence" by the federal government. With this award, Dresden's status as the leading research location in East Germany was further consolidated. For students, Dresden was also an attractive place due to the relatively low rental fees and the absence of tuition fees. Finally, because of its wide range of cultural offerings, its baroque city center, and its Christmas market, Dresden was a very popular place among tourists from Germany and abroad.

Before the far-right mass protests started, Dresden had a high reputation. To substantiate this claim, we exploit the Brandmeyer Stadtmarken-Monitor 2010, a representative survey that evaluates the attractiveness of large German cities. In the overall ranking, Dresden reached the fourth place (out of 34 cities). Also in the subcategories that are of great importance for our study, Dresden performed extremely well in 2010. For instance, Dresden ranked third when Germans were asked whether a place has a good reputation.

A.4 The far right in Germany, Saxony, and Dresden before 2014.

In contrast to other Central European states (such as Austria, France, and the Netherlands), far-right movements received quite little support and attention in Germany until the early-2010s (see e.g. Arzheimer, 2015). Hence, we believe that only two aspects from this time are crucial to note. The first is that the Saxon parliament was one of the few state parliaments in which a right-wing extremist party occupied a few seats. However, the National Democratic Party of Germany (NPD) was entering the Saxon parliament in 2004 and 2009 mainly due to the relatively strong support in rural regions. In Dresden, the vote share of the NPD was below average ($\approx 4\%$) and similar as in other major East German cities (see Table C.5 for a detailed comparison of far-right vote shares since 2009). Second, in every year in February, extremist-right movements organize a march through Dresden's inner city. The occasion is the anniversary of the bombing of Dresden in WWII. The largest marches took place in 2009 and 2010 with more than 6,000 Nazis.[3] Both marches were accompanied by counter events. In 2010, the extremist-right groups even had to stop their march due to a sit-down blockade. In the same year, the city council (together with other local players) began to organize human chains against the marches. The human chains in 2010 consisted of 10,000 people. Apparently, the countermeasures were successful as the participation in the Nazi marches dropped considerably in the next years (see Figure B.3). For instance, in 2014, only around 500 people followed the call of the extremist right, while 11,000 people formed the human chain. In subsequent years, participation numbers were similar.

A.5 The Alternative for Germany[4]

Beginning in early 2013, the German party landscape has changed in a notable manner over the last years because of the rise of the *Alternative für Deutschland* (*Alternative for Germany, AfD*). Originally, the AfD was established as a special issue party whose only goal was to oppose the policy measures that the German government implemented to fight the Euro crisis.[5] With this policy agenda, the

[3]Participants came from all over Germany to Dresden to attend the marches. This is a crucial difference to the protests organized by Pegida where most attendees were from Dresden or its surrounding area (see e.g. Vorländer et al., 2015, 2018).

[4]We only provide a very brief overview about the development of this party (for details, see e.g. Häusler et al., 2016 and Ulrich et al., 2022).

[5]The initial party manifesto explicitly stated that the party does not take stance on any other policy issue rather than the Euro crisis and the bailout of Greece.

AfD received 4.7 percent of the votes in 2013 German federal election (and thus only marginally failed to enter the parliament) and 7.1 percent in the European election in May 2014. In late summer 2014, the AfD entered the first three state parliaments because it won about 10 percent of the votes in three German state elections (Brandenburg, Saxony, Thuringia). The AFD vote share in Dresden was below average (8.2 percent) and similar as in Leipzig (7.3 percent), Potsdam (9.4 percent), Chemnitz (9.2 percent) and Erfurt (9.5 percent).[6] Table C.6 reports for each election between 2013 and 2019 how the AfD vote share in Dresden differed from the vote share in other East German cities with at least 200,000 residents.

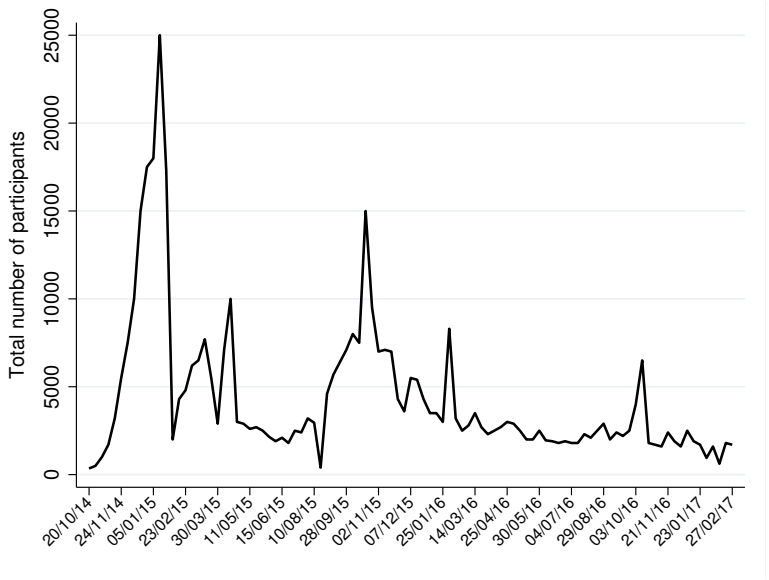
From late 2014 onward, the AfD gradually moved from an anti-Euro to an anti-migration party. The Pegida rallies played a remarkable role in this development since AfD's party leaders disagreed on how to react to these mass rallies. While the party leader, Bernd Lucke, and its supporters dissociated themselves from the Pegida movements and its goals, other prominent members of the AfD called for close collaboration and publicly announced that they share the objectives of the Pegida organizers and supporters. This internal conflict stopped in July 2015 as Bernd Lucke was voted out as party leader and Frauke Petry, a popular figure of the national-conservative wing, became the chairwoman. As a consequence, Lucke and most of his supporters left the AfD. Since then, the AfD is predominantly an anti-migration party. In 2017, AfD entered the German parliament as the largest opposition party. Today, the party holds seats in 14 out of 16 state parliaments.[7] However, in the east, the AfD is much more popular. Until now, the AfD has had no governmental power at the federal or state level. At the local level, the power of the AfD is also small since currently only two mayors exist who are affiliated with the AfD (as of May 2024). Both got elected in 2023.

[6] Leipzig and Chemnitz are the two other major cities in Saxony, while Potsdam and Erfurt are the state capitals of Brandenburg and Thuringia.

[7] The only state parliaments where the AfD is currently not present are the state parliaments of Schleswig-Holstein and Bremen. However, AfD members occupied seats in these parliaments in previous legislative periods.

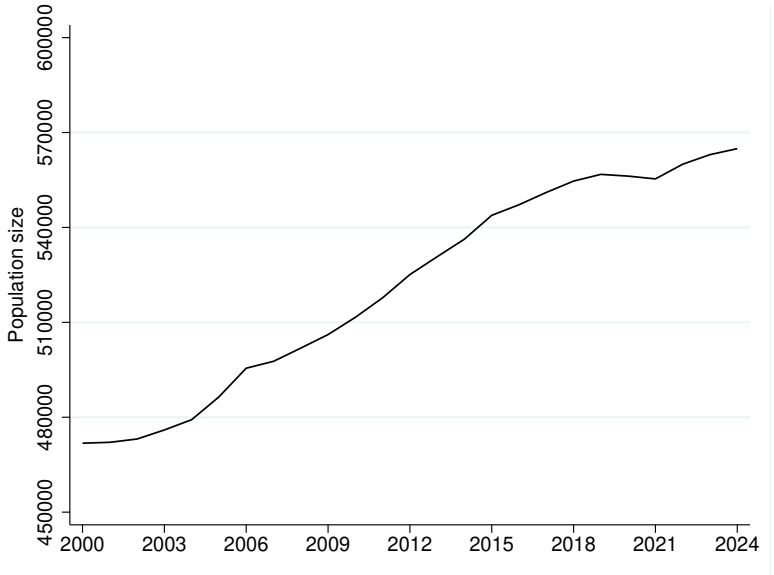
B Additional figures

Figure B.1 Participation in Pegida demonstrations in Dresden



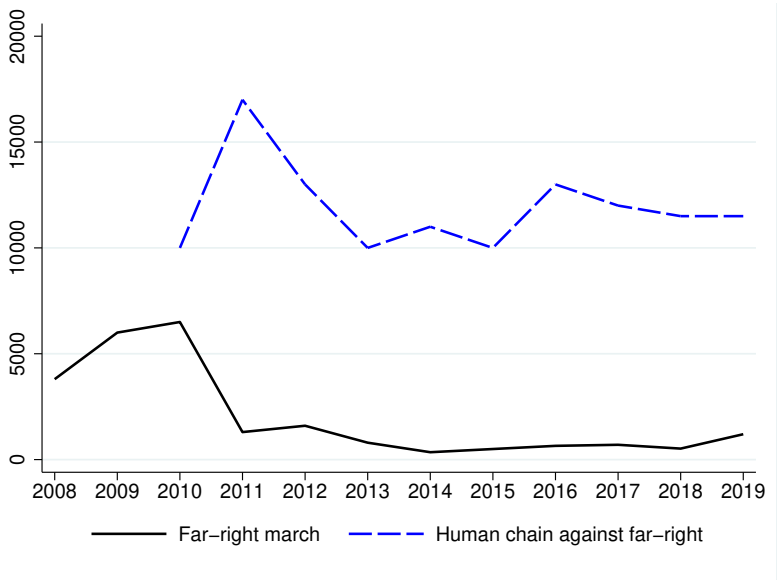
Notes: The figure illustrates the number of participants in the Pegida rallies in Dresden. Data source: Berger et al. (2016).

Figure B.2 Population size of Dresden (2000 – 2019).



Notes: Using data from INKAR, this figure illustrates how Dresden's number of inhabitants developed between 2000 and 2024.

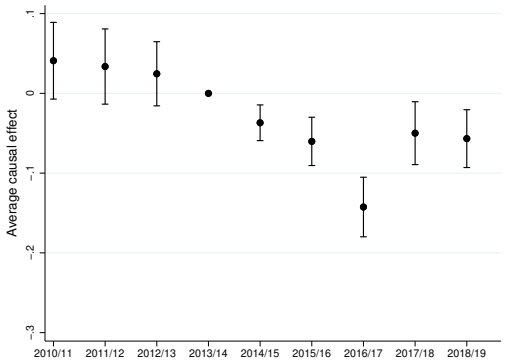
Figure B.3 Neo-Nazi remembrance marches and counter protests (2008 – 2019).



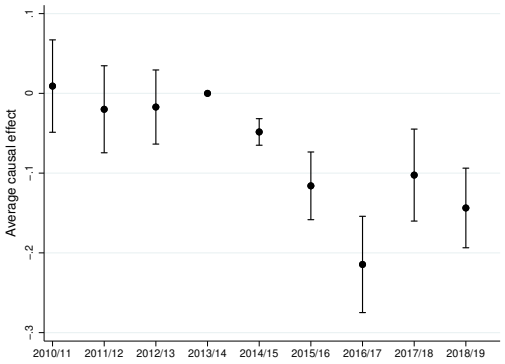
Notes: The figure illustrates the number of participants in (1) the far-right marches that occur every February in Dresden to remember the bombing of the city during World War II and (2) the human chain against the far right. We collect the data from various newspaper articles.

Figure B.4 The far-right protests in Dresden and their effect on the location choices of Germans (event-study plots, dyadic DiD).

(a) All Germans



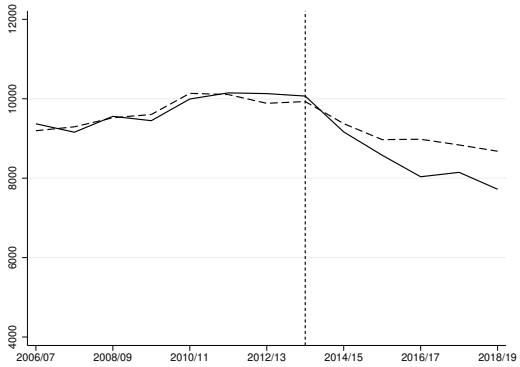
(b) Young adult Germans



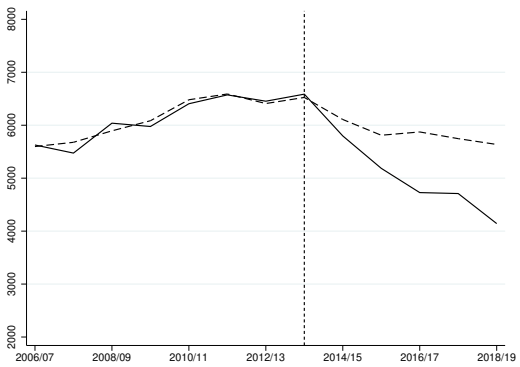
Notes: This table shows estimates of a dynamic version of Eq. (1). In Figure 4a (4b), the outcome is the total number of Germans (aged 18 to 29) who moved from the origin to the destination. The origins are the 16 federal states and the destinations the 40 largest German cities (for a list, see Table C.1). Standard errors are clustered at two levels: origin-destination-pair and year. Origin-destination pairs are weighted according to their relevance in the pre-treatment years (for details, see Section 3.3.1). Within-state moves are excluded. All regressions include origin-destination fixed effects, origin-by-year fixed effects, region-of-destination-by-year fixed effects, and time-varying destination-specific controls (for a list, see Panel A of Table C.8). Summary statistics for the outcome variables are presented in Table C.7. Whiskers show 95 percent confidence intervals.

Figure B.5 The far-right protests in Dresden and their effect on the location choices of Germans (restricted donor pool, SC approach).

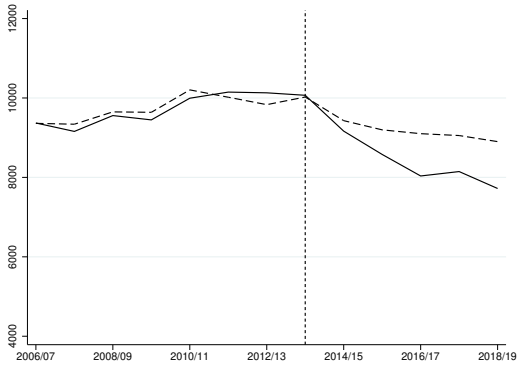
(a) All Germans (without Saxon cities).



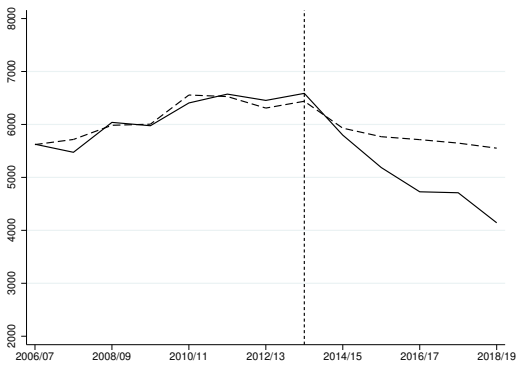
(b) Young adult Germans (without Saxon cities).



(c) All Germans (without East German cities).



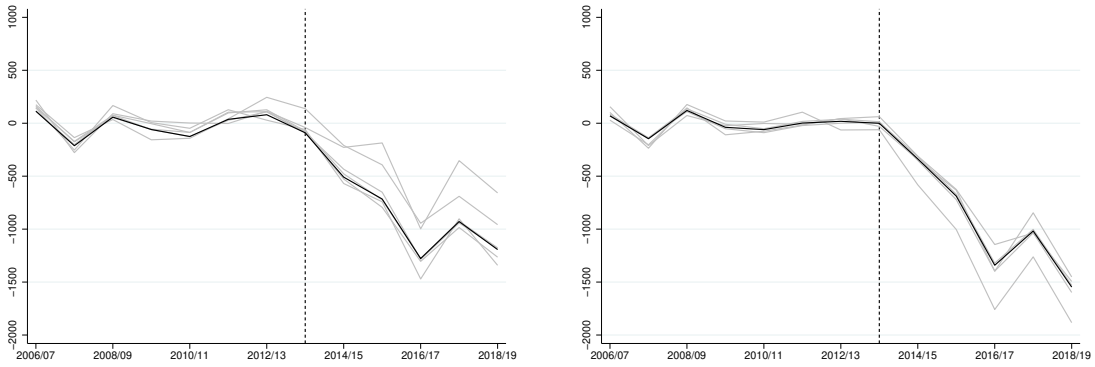
(d) Young adult Germans (without East German cities).



Notes: This figure presents results of SC analyses. In each treatment graph, we compare the development of Dresden (solid line) and SynDresden (dashed line). In Panels (a) and (c), we use the number of German incomers who previously lived in another state as outcome variable. In Panel (b) and (d), we consider the number of German incomers aged between 18 and 29 who previously lived in another state. The difference to Figure B.6 is that we exclude cities from Saxony (upper panels) and East Germany (lower panels) from the donor pool. SynDresden consists of Berlin (0.08), Halle (0.244), Mainz (0.643), and Munich (0.033) in Panel (a); of Aachen (0.044), Berlin (0.079), Cologne (0.215), Halle (0.274), and Mainz (0.389) in Panel (b); of Berlin (0.07) and Mainz (0.913) in Panel (c); and of Aachen (0.348), Berlin (0.113), Mainz (0.481), and Münster (0.058) in Panel (d). To determine the weights, we use all pre-treatment outcomes and no covariates.

Figure B.6 The far-right protests in Dresden and their effect on the location choices of Germans (leave-one-out graphs, SC approach).

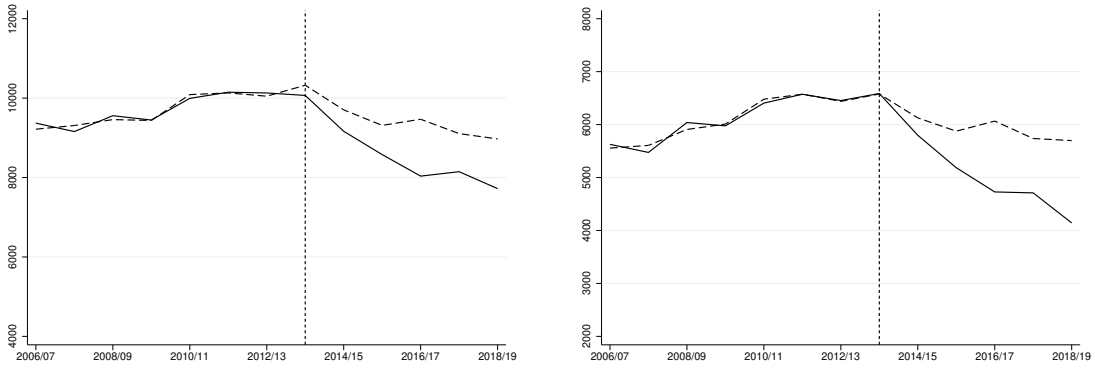
(a) All Germans. **(b)** Young adult Germans.



Notes: This figure supplements Figure B.6 by showing how the differences between Dresden and SynDresden change if we drop cities with positive weights from the donor pool. The grey lines reflect how the differences between Dresden and SynDresden look like if a particular city is not part of the donor pool. The black lines show the differences found in the original analyses.

Figure B.7 The far-right protests in Dresden and their effect on the location choices of Germans (2013/14 not used for calculation of weights, SC approach).

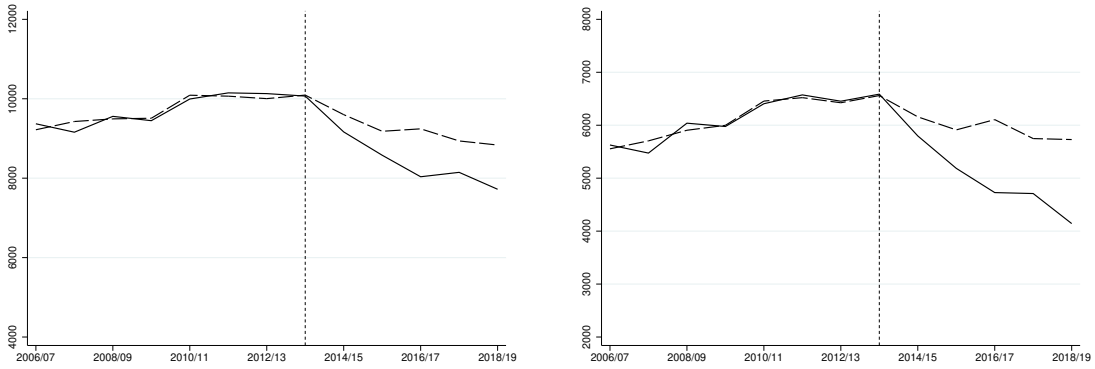
(a) All Germans. **(b)** Young adult Germans.



Notes: This figure presents results of SC analyses. In each treatment graph, we compare the development of Dresden (solid line) and SynDresden (dashed line). In Panel (a), we use the number of German incomers who previously lived in another state as outcome variable and, in Panel (b), the number of German incomers aged between 18 and 29 who previously lived in another state. The difference to Figure B.6 is that we construct SynDresden without the last pre-treatment year (2013/14). SynDresden consists of Berlin (0.048), Essen (0.207), Hanover (0.009), Leipzig (0.177), Mainz (0.503), and Munich (0.056) in Panel (a); and of Berlin (0.090), Cologne (0.021), Essen (0.291), Leipzig (0.162), and Mainz (0.436) in Panel (b). To determine the weights, we use all pre-treatment outcomes and no covariates.

Figure B.8 The far-right protests in Dresden and their effect on the location choices of Germans (alternative approach for constructing doppelganger, SC approach).

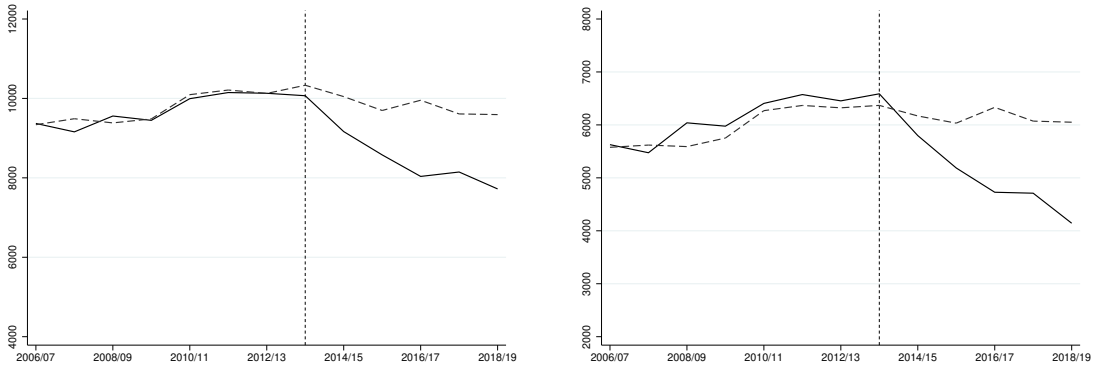
(a) All Germans. **(b)** Young adult Germans.



Notes: This figure presents results of SC analyses. In each treatment graph, we compare the development of Dresden (solid line) and SynDresden (dashed line). In Panel (a), we use the number of German incomers who previously lived in another state as outcome variable and, in Panel (b), the number of German incomers aged between 18 and 29 who previously lived in another state. The difference to Figure B.6 concerns the construction of SynDresden. In particular, following Alabrese et al. (2024), we use a four-stage procedure to construct SynDredsen: First, we select four different donor pool sizes: $N \in \{20, 25, 30, 35\}$. Second, for each N, we randomly sample 10 subsets of size N from the full donor pool. Third, out of each of the 4×10 donor pool subsets, we construct a synthetic control for Dresden, resulting in 40 separate treatment effect estimates. Thereby, we always use all pre-treatment outcomes and no covariates to determine the weights. Finally, we average the estimates obtained across all 40 permutations to obtain the doppelganger.

Figure B.9 The far-right protests in Dresden and their effect on the location choices of Germans (constant weights, SC approach).

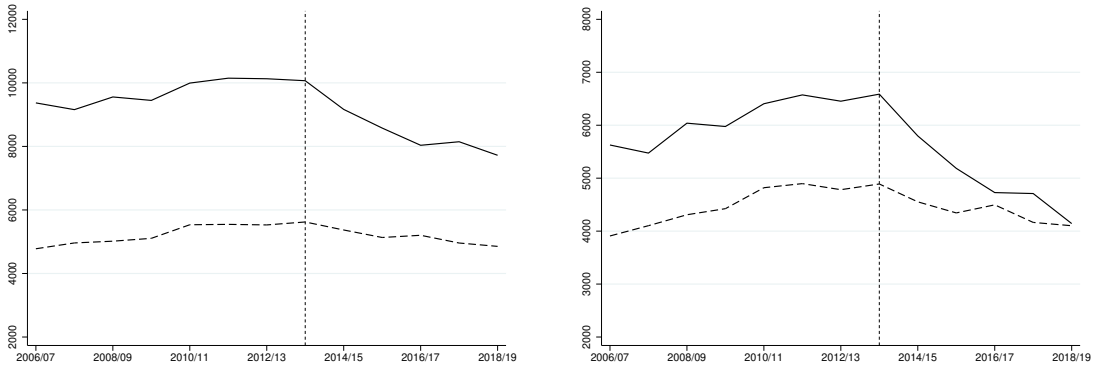
(a) All Germans. **(b)** Young adult Germans.



Notes: This figure presents results of SC analyses. In each treatment graph, we compare the development of Dresden (solid line) and SynDresden (dashed line). In Panel (a), we use the number of German incomers who previously lived in another state as outcome variable and, in Panel (b), the number of German incomers aged between 18 and 29 who previously lived in another state. The difference to Figure B.6 is that the composition of SynDresden is the same for both outcome variables: To create SynDresden, we follow Sun et al. (2025). More specifically, we choose the synthetic weights such that they minimize the imbalance in the concatenated pre-treatment series for both outcomes. In both graphs, SynDresden consists of Hamburg (0.098), Mainz (0.635), Halle (0.097), and Leipzig (0.169).

Figure B.10 The far-right protests in Dresden and their effect on the location choices of Germans (Synthetic DiD).

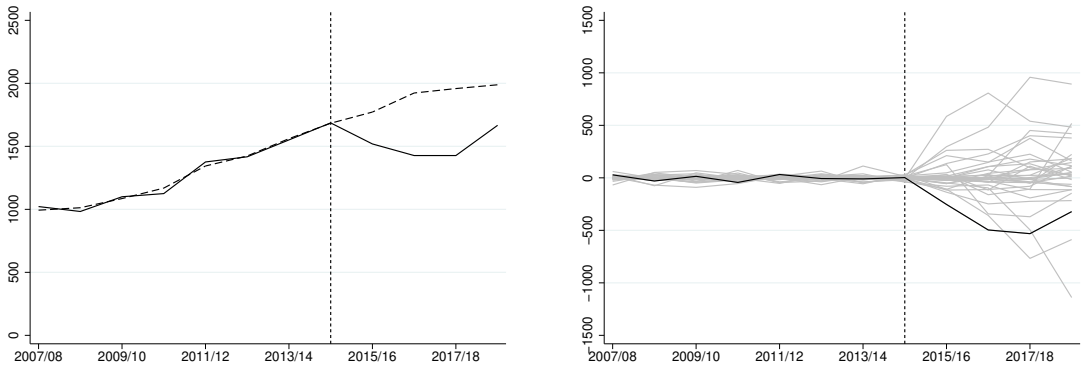
(a) All Germans. **(b)** Young adult Germans.



Notes: This figure reports results of Synthetic difference-in-differences analyses. In each treatment graph, we compare the development of Dresden (solid line) and SynDresden (dashed line). In Panel (a), we use the number of German incomers who previously lived in another state as outcome variable and, in Panel (b), the number of German incomers aged between 18 and 29 who previously lived in another state. To construct SynDresden, we use all pre-treatment outcomes and no covariates.

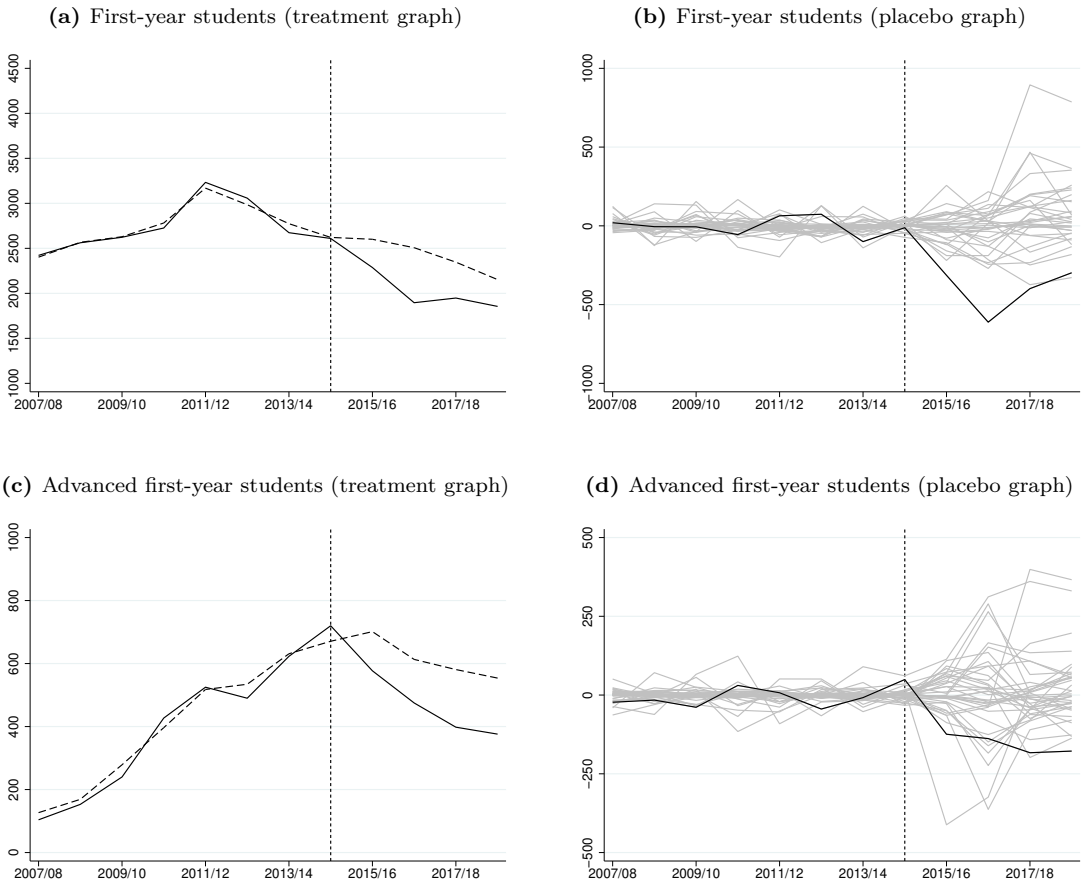
Figure B.11 The far-right protests in Dresden and their effect on the location choices of international students (SC approach).

(a) International first-year students (treatment graph) **(b)** International first-year students (placebo graph)



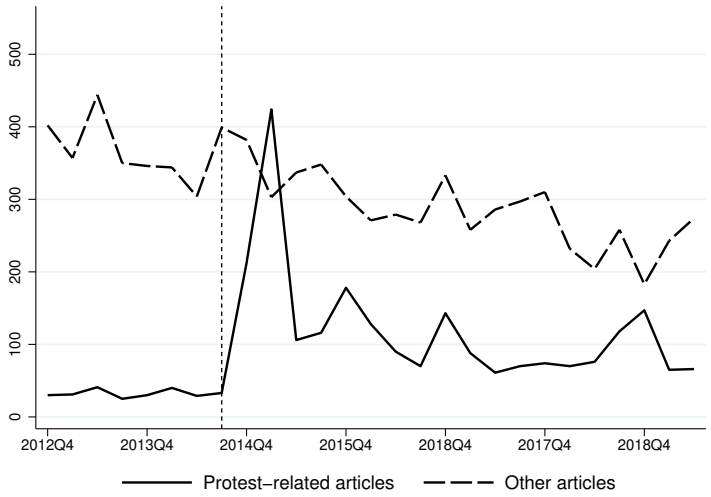
Notes: This figure presents results of SC analyses. In the treatment graphs, we compare the development of Dresden (solid line) and SynDresden (dashed line). The placebo graphs plot for all German cities with more than 200,000 residents (besides Oberhausen and Duisburg) the differences between the development of the city and the development of its doppelganger. The black line is Dresden. As outcome variable, we use the total number of international first-year students. SynDresden consists of Aachen (0.132), Berlin (0.062), Bremen (0.340), Dortmund (0.126), Essen (0.101), Freiburg (0.205), and Munich (0.034). To determine these weights, we use all pre-treatment outcomes and no covariates. .

Figure B.12 The far-right protests in Dresden and their effect on the location choices of German students (SC approach).



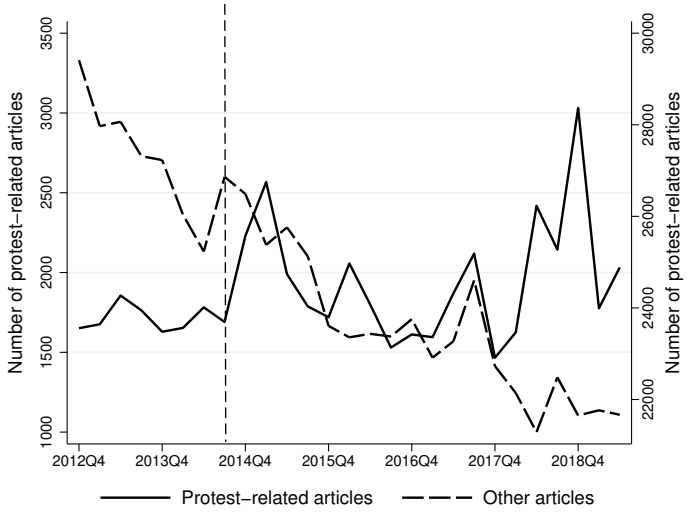
Notes: This figure presents results of SC analyses. In the treatment graphs, we compare the development of Dresden (solid line) and SynDresden (dashed line). The placebo graphs plot for all German cities with more than 200,000 residents (besides Oberhausen and Duisburg) the differences between the development of the city and the development of its doppelganger. The black line is Dresden. In Panel (a) and (b), we use the total number of German first-year undergraduates that finished high-school in another state as outcome variable. In Panel (c) and (d), we consider the total number of German first-year graduates who previously studied in another state. SynDresden consists of Berlin (0.038), Bremen (0.072), Chemnitz (0.367), Hamburg (0.265), and Munich (0.258). in the upper part; and of Berlin (0.128), Magdeburg (0.578), and Munich (0.294) in the lower part. To determine these weights, we use all pre-treatment outcomes and no covariates.

Figure B.13 Dresden's media attention (01/2013 – 12/2019)



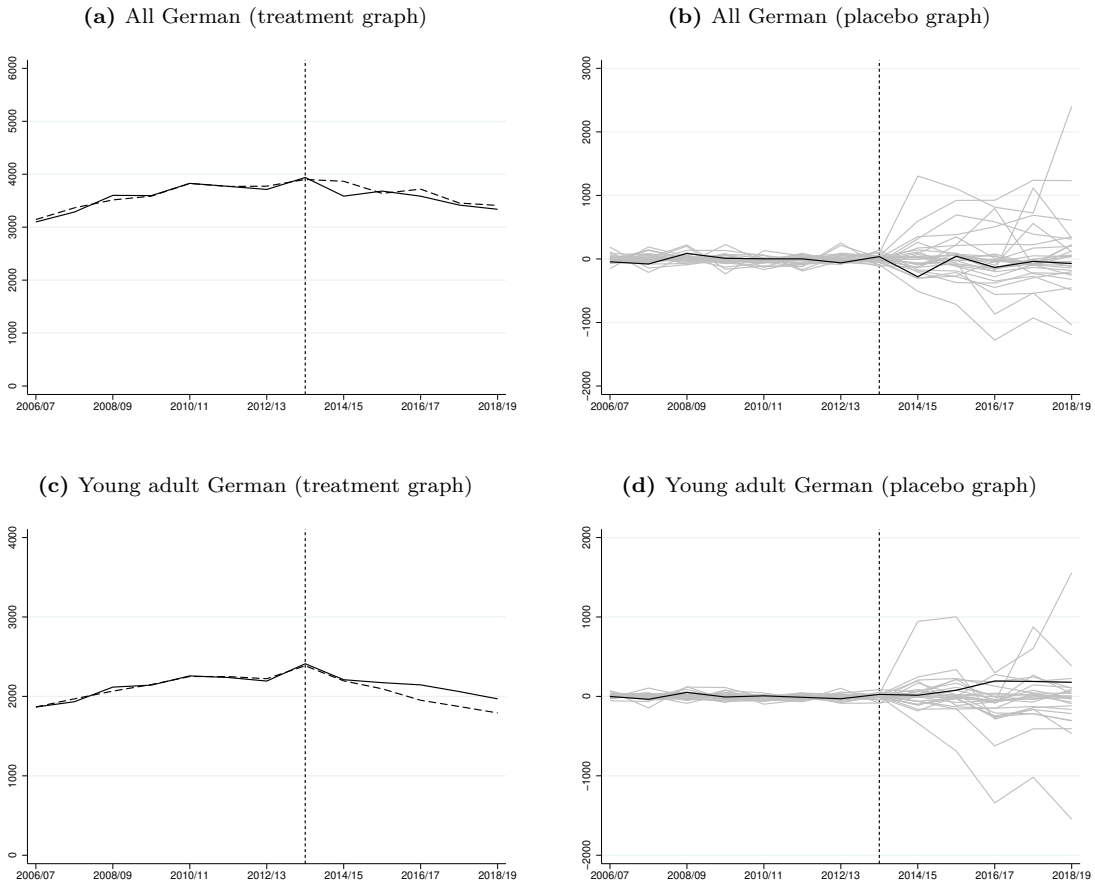
Notes: This figure shows for the city of Dresden on a quarterly basis how the number of protest-related and non-protest-related (other) articles printed in the nine supraregional newspapers included in *GBI-Genios wiso* (for a list, see Table C.3) developed between October 2012 and July 2019. Protest-related articles are identified based on the keywords listed in Table C.4. The number of non-protest-related (other) articles is the residual between the total number of articles that name a city and the number of protest-related articles.

Figure B.14 Media attention for other major German cities than Dresden (01/2013 – 12/2019)



Notes: This figure shows for all major cities in Germany (excluding Dresden) on a quarterly basis how the number of protest-related and non-protest-related (other) articles printed in the nine supraregional newspapers included in *GBI-Genios wiso* (for a list, see Table C.3) developed between October 2012 and July 2019. Protest-related articles are identified based on the keywords listed in Table C.4. The number of non-protest-related (other) articles is the residual between the total number of articles that name a city and the number of protest-related articles.

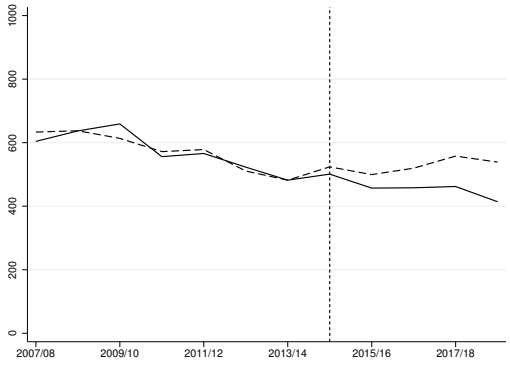
Figure B.15 Far-right voting and its effect on the location decisions of Germans (Erfurt, SC approach).



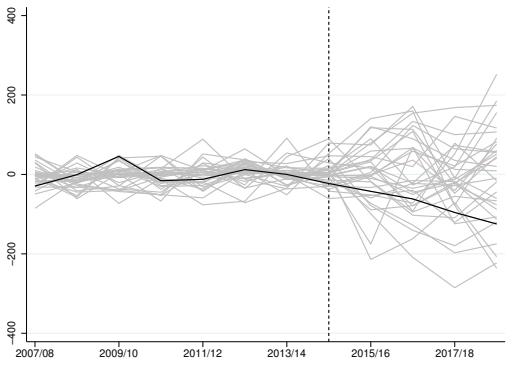
Notes: This figure presents results of SC analyses. In the treatment graphs, we compare the development of Erfurt (solid line) and SynErfurt (dashed line). The placebo graphs plot for each of the 40 German cities with more than 200,000 residents the differences between the development of the city and the development of its doppelganger. The black line is Erfurt. In Panel (a) and (b), we use the number of German incomers who previously lived in another state as outcome variable. In Panel (c) and (d), we consider the number of German incomers aged between 18 and 29 who previously lived in another state. SynDresden consists of Braunschweig (0.042), Kassel (0.332), Leipzig (0.114), Magdeburg (0.005), Mönchengladbach (0.479), and Münster (0.028) in the upper part; and of Aachen (0.142), Bochum (0.174), Braunschweig (0.256), Kassel (0.074), Magdeburg (0.315), Münster (0.029), and Oberhausen (0.01) in the lower part. To determine these weights, we use all pre-treatment outcomes and no covariates.

Figure B.16 The far-right protests in Dresden and their effect on out-migration (high school graduates, SC approach).

(a) High school graduates that start studying elsewhere (treatment graph).

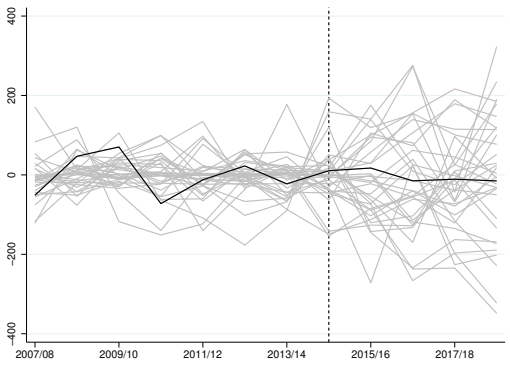


(b) High school graduates that start studying elsewhere (placebo graph)



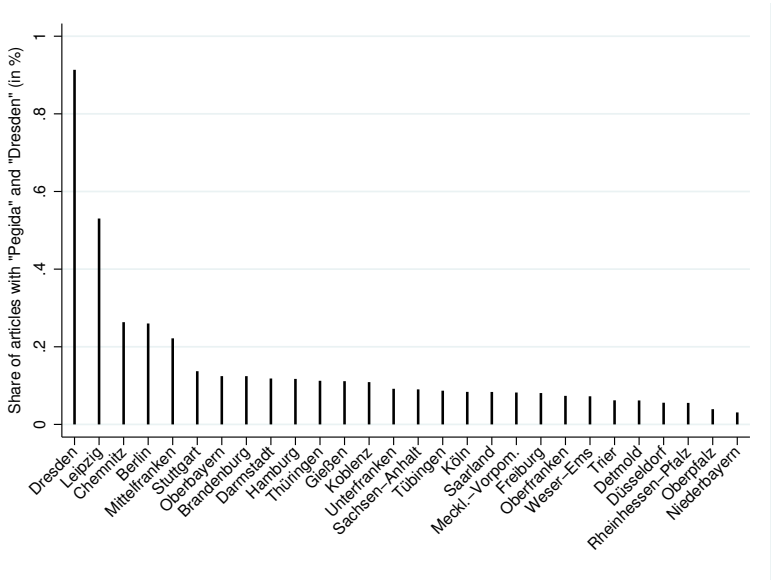
(c) High school graduates that start studying (treatment graph).

(d) High school graduates that start studying (placebo graph).



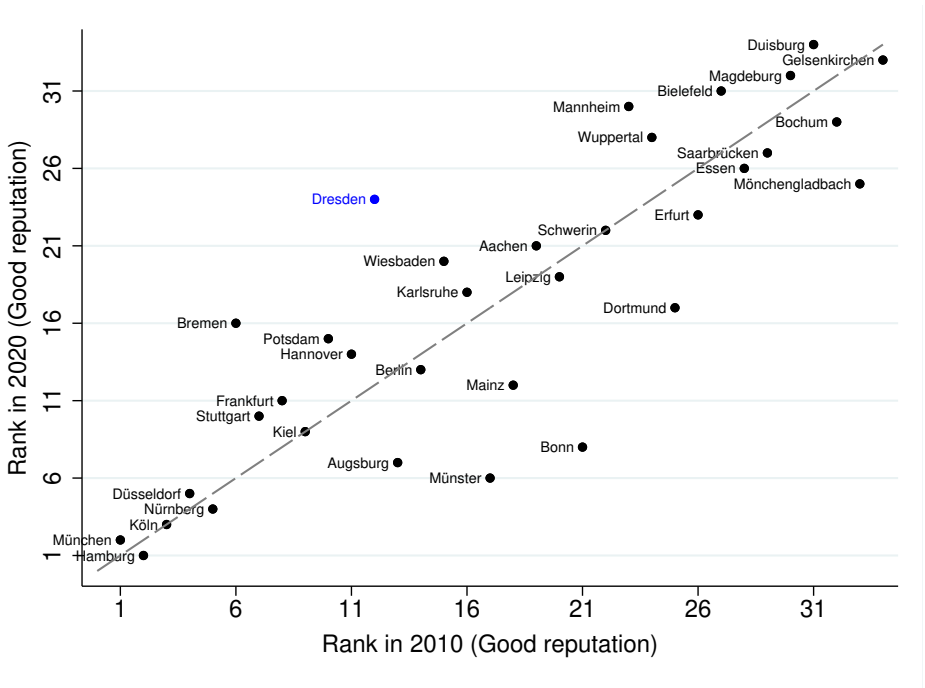
Notes: This figure presents results of SC analyses. In the treatment graphs, we compare the development of Dresden (solid line) and SynDresden (dashed line). The placebo graphs plot for each of the 40 German cities with more than 200,000 residents the differences between the development of the city and the development of its doppelganger. The black line is Dresden. In Panel (a) and (b), we use the number of high school graduates that begin to study in another city as outcome variable. In Panel (c) and (d), we consider the number of high school graduates that begin to study. SynDresden consists of Berlin (0.017), Dortmund (0.019), and Leipzig (0.964) in the upper part; and of Berlin (0.039), Leipzig (0.784), and Magdeburg (0.177) in the lower part. To determine these weights, we make use of all pre-treatment outcomes and no covariates.

Figure B.17 Regional differences in reporting about Pegida protests in Dresden.



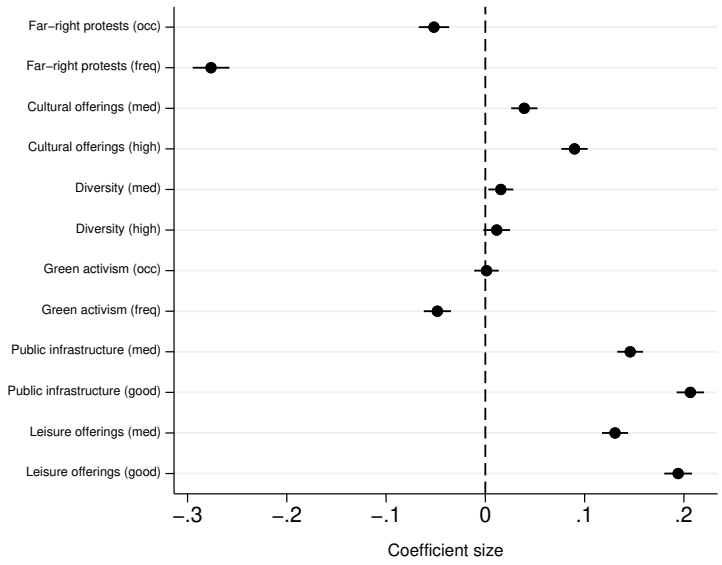
Notes: Exploiting 107 local newspapers, this figures illustrates regional differences in reporting about the Pegida protests in Dresden in the first two years after the rise of Pegida. The bars indicate the share of articles that mention both "Dresden" and "Pegida". Local newspapers are assigned to NUTS2 districts based on the place where the editorial board is located.

Figure B.18 City ranking "good reputation" (young adults).



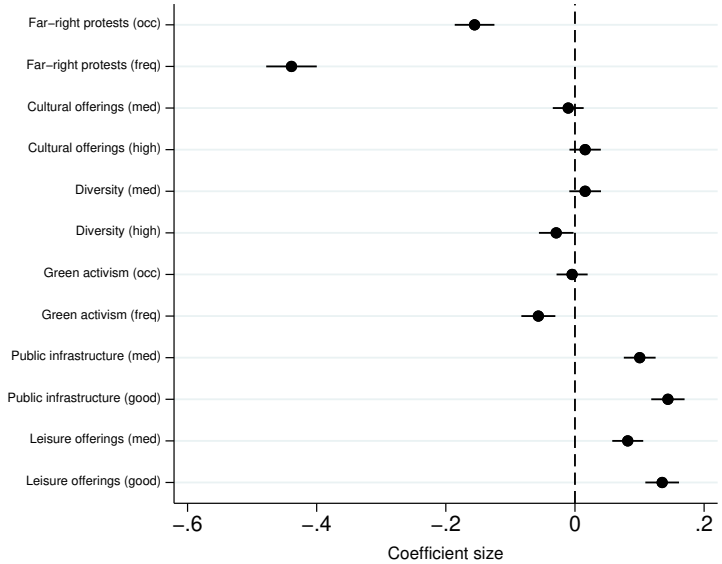
Notes: Focusing on young adults (18 – 29 years), this figure shows results from the Brandmeyer Stadtmarken-Monitor 2010 and 2020 for the dimension "good reputation". A higher rank indicates a worse reputation.

Figure B.19 Comparison of effect sizes (main analysis, place of residence, conjoint experiment).



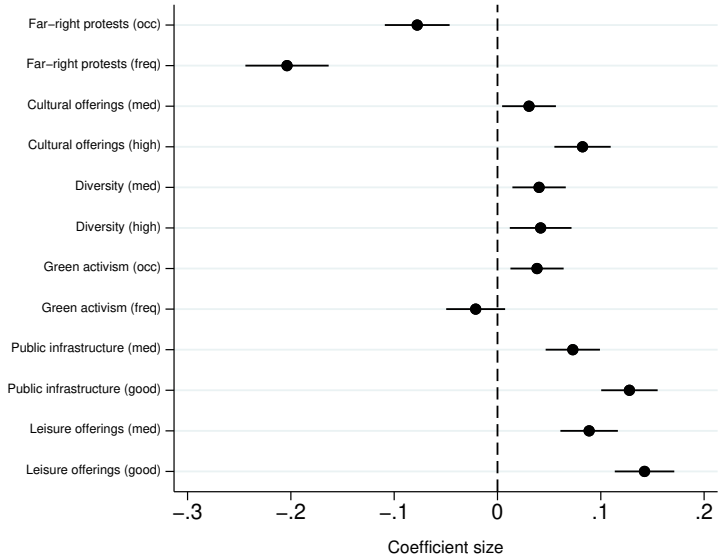
Notes: This table shows estimates of Eq. (6), taking into account all participants. The outcome variable is a dummy that reflects whether a city was selected as preferred place of residents. Individual fixed effects are included in all regressions. Standard errors are clustered at the participant-level. Whiskers show 95 percent confidence intervals.

Figure B.20 Comparison of effect sizes (mechanism analysis, security expectation, conjoint experiment).



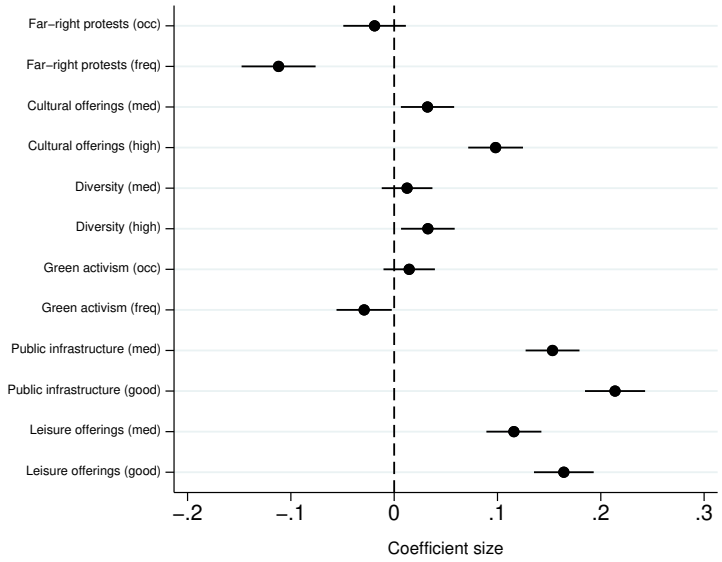
Notes: This table shows estimates of Eq. (6), taking into account all participants. The outcome variable is a dummy that reflect whether a city is considered to be more secure than the alternative city. Individual fixed effects are included in all regressions. Standard errors are clustered at the participant-level. Whiskers show 95 percent confidence intervals.

Figure B.21 Comparison of effect sizes (mechanism analysis, like-minded individuals, conjoint experiment).



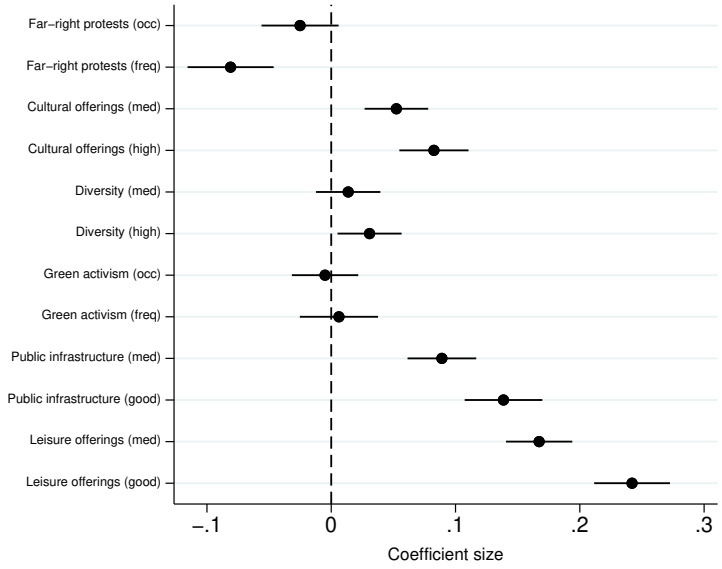
Notes: This table shows estimates of Eq. (6), taking into account all participants. The outcome variable is a dummy that reflect whether people think that they will find like-minded people more quickly than in the alternative city. Individual fixed effects are included in all regressions. Standard errors are clustered at the participant-level. Whiskers show 95 percent confidence intervals.

Figure B.22 Comparison of effect sizes (mechanism analysis, economic development, conjoint experiment).



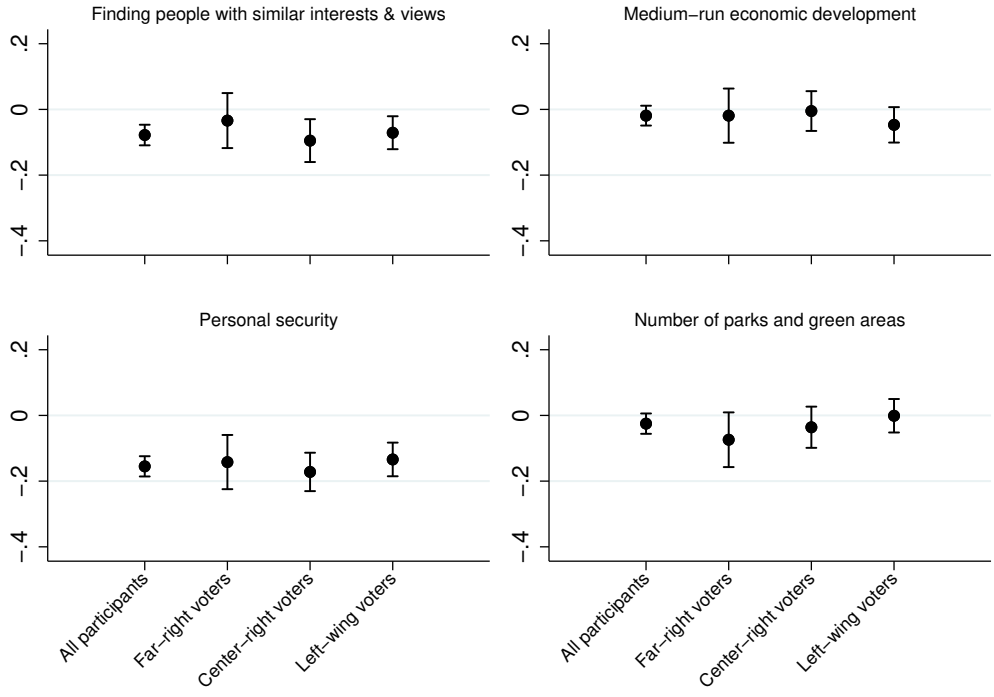
Notes: This table shows estimates of Eq. (6), taking into account all participants. The outcome variable is a dummy that reflect whether people think that this city will develop better in the medium-run than the alternative city. Individual fixed effects are included in all regressions. Standard errors are clustered at the participant-level. Whiskers show 95 percent confidence intervals.

Figure B.23 Comparison of effect sizes (mechanism analysis, parks and green areas, conjoint experiment).



Notes: This table shows estimates of Eq. (6), taking into account all participants. The outcome variable is a dummy that reflect whether people think that this city has more parks and green areas than the alternative city. Individual fixed effects are included in all regressions. Standard errors are clustered at the participant-level. Whiskers show 95 percent confidence intervals.

Figure B.24 The effect of occasional far-right rallies on location choices (mechanism analysis, conjoint experiment).



Notes: This figure shows estimates of Eq. (6), using different samples. The outcome variable is a dummy that reflects whether a city was selected instead of the alternative city. Individual fixed effects are included in all regressions. As common for Germany, we classify the AfD as a far-right party, CDU/CSU and FDP as center-right parties, and SPD, Alliance 90/The Greens, and The Left as left-wing parties. The standard errors are clustered at the individual-level. Whiskers show 95 percent confidence intervals. For the full-sample analyses, we show in Figures B.20 – B.23 how the estimates for occasional far-right protests differ from the estimates for the other attributes.

C Additional tables

Table C.1 List of German cities with more than 200,000 inhabitants.

City	City	City	City
Berlin	Bremen	Karlsruhe	Halle
Hamburg	Dresden	Mannheim	Magdeburg
Munich	Hanover	Augsburg	Freiburg
Cologne	Nürnberg	Wiesbaden	Krefeld
Frankfurt	Duisburg	Mönchengladbach	Mainz
Stuttgart	Bochum	Gelsenkirchen	Lübeck
Düsseldorf	Wuppertal	Braunschweig	Erfurt
Leipzig	Bielefeld	Aachen	Oberhausen
Dortmund	Bonn	Kiel	Rostock
Essen	Münster	Chemnitz	Kassel

Table C.2 Pegida protests and counterprotests in cities with more than 200,000 inhabitants.

	No/virtually no Pegida protests (0 – 1)	A small number of Pegida protests (2 – 9)	A large number of Pegida protests (10+)
Anti-pegida protests not larger than Pegida protests	Augsburg, Bochum, Essen, Gelsenkirchen, Kiel, Krefeld, Lübeck, Oberhausen	Chemnitz, Erfurt, Halle	Dresden
Anti-pegida protests larger than Pegida protests	Aachen, Bremen, Dortmund, Freiburg, Hamburg, Mainz, Mannheim, Münster, Wiesbaden Wuppertal	Bielefeld, Bonn, Braunschweig, Cologne, Düsseldorf, Hanover, Kassel, Magdeburg, Mönchengladbach, Rostock, Stuttgart	Berlin, Duisburg, Frankfurt, Karlsruhe, Leipzig, München, Nürnberg

Notes: Based on Vüllers and Hellmeier (2022), this table shows the frequency of protests by Pegida (or its offshoots) in German cities with more than 200,000 inhabitants and whether couterrallies were typically larger than the Pegida protests.

Table C.3 List of supraregional newspapers included in *GBI-Genios wiso*.

Newspaper	Newspaper	Newspaper
Börsen-Zeitung	Der SPIEGEL	Der Tagesspiegel
Die WELT	Die Zeit	FOCUS
Handelsblatt	Tageszeitung (taz)	WELT am Sonntag

Table C.4 List of protest-related keywords.

Keyword	Keyword	Keyword
Pegida	Demo (*demo*)	Demos (*demos*)
Demonstrationen (*demonstrations*)	demonstrieren (demonstrate)	demonstrierten (demonstrated)
Kundgebung (*rally*)	Kundgebungen (rallies)	Protest (protest)
Proteste (protests)	protestieren (protest)	protestierten (protested)

Notes: This table lists the keywords that we use to identify protest-related articles. In parentheses, we report the English translation. A newspaper article is counted as a protest-related article if it includes at least one of the 12 keywords.

Table C.5 Vote share of far-right parties in Dresden and other major East German cities.

Election	Dresden	Chemnitz	Leipzig	Erfurt	Magdeburg	Halle
EU parliament 2009	3.3%	4.1%	2.9%	2.7%	2.0%	1.7%
Local parliament 2009	3.7%	7.0%	2.9%	2.6%	2.0%	2.0%
State election 2009	5.4%	4.1%	4.9%	3.7%	-	-
German parliament 2009	2.8%	3.1%	2.9%	2.8%	1.6%	1.7%
State election 2011	-	-	-	-	3.2%	3.2%
German parliament 2013	9.5%	8.8%	7.6%	8.9%	6.0%	5.7%
EU parliament 2014	12.4%	13.3%	11.2%	10.5%	8.7%	9.0%
Local parliament 2014	9.7%	13.3%	8.8%	6.9%	5.1%	5.8%
State election 2014	11.6%	13.4%	10.8%	12.0%	-	-
State election 2016	-	-	-	-	19.3%	21.3%
German parliament 2017	23.2%	25.1%	18.9%	19.2%	16.3%	17.6%
EU parliament 2019	20.6%	24.6%	16.3%	17.8%	17.0%	16.9%
Local parliament 2019	17.7%	25.6%	14.9%	15.4%	14.4%	14.2%
State election 2019	21.3%	25.7%	17.9%	18.1%	-	-

Notes: For each election between 2009 and 2019, this table reports the share of votes that far-right parties (including the AfD) received in East German cities with more than 200,000 inhabitants.

Table C.6 Vote share of AfD in Dresden and other major East German cities.

Election	Dresden	Chemnitz	Leipzig	Erfurt	Magdeburg	Halle
German parliament 2013	6.9%	6.1%	5.6%	6.4%	4.3%	4.1%
EU parliament 2014	9.5%	9.7%	8.4%	7.2%	6.9%	7.1%
Local parliament 2014	7.0%	5.7%	6.4%	4.5%	4.8%	4.6%
State election 2014	8.2%	9.2%	7.3%	9.5%	-	-
State election 2016	-	-	-	-	18.0%	19.5%
German parliament 2017	22.5%	24.3%	18.3%	18.5%	15.7%	17.1%
EU parliament 2019	19.8%	23.5%	15.5%	16.8%	16.1%	16.1%
Local parliament 2019	17.1%	17.9%	14.9%	14.9%	14.4%	14.0%
State election 2019	20.7%	25.0%	17.3%	17.8%	-	-

Notes: For each election between 2013 and 2019, this table reports the share of votes that the AfD received in East German cities with more than 200,000 inhabitants.

Table C.7 Summary statistics for outcome variables (dyadic DiD).

Outcome	Observations	Mean	Std. Deviation
Panel A: States as places of origin.			
German incomers from other states	5,400	543.7687	1404.497
German incomers from other states aged 18 to 64	5,400	476.8978	1206.417
German incomers from other states aged 18 to 29	5,400	302.3919	740.3841
German incomers from other states aged 30 to 64	5,400	174.5059	473.3311
German incomers from other states aged 18 to 29 (male)	5,400	138.5102	341.3223
German incomers from other states aged 18 to 29 (female)	5,400	163.8817	400.1398
Non-German EU incomers from other states	5,400	43.10185	101.4762
Non-German EU incomers from other states aged 18 to 64	5,400	39.53019	93.01538
Non-German EU incomers from other states aged 18 to 29	5,400	15.59481	37.37214
Non-German EU incomers from other states aged 30 to 64	5,400	23.93537	56.1375
Non-German EU incomers from other states aged 18 to 29 (male)	5,400	8.148333	19.05869
Non-German EU incomers from other states aged 18 to 29 (female)	5,400	7.446481	18.63457
Panel B: NUTS2 districts as origins.			
German incomers from other states	12,300	238.1469	776.0482
German incomers from other states aged 18 to 64	12,300	208.8603	656.1278
German incomers from other states aged 18 to 29	12,300	132.4344	394.5256
German incomers from other states aged 30 to 64	12,300	76.42595	265.708
German incomers from other states aged 18 to 29 (male)	12,300	60.66139	184.1422
German incomers from other states aged 18 to 29 (female)	12,300	71.77299	210.9826
Panel C: Counties as origins.			
German incomers from other states	130,005	22.58645	97.28294
German incomers from other states aged 18 to 64	130,005	19.80884	83.16175
German incomers from other states aged 18 to 29	130,005	12.56041	47.19996
German incomers from other states aged 30 to 64	130,005	7.248429	37.06205
German incomers from other states aged 18 to 29 (male)	130,005	5.753279	21.57124
German incomers from other states aged 18 to 29 (female)	130,005	6.80713	25.85593

Table C.8 Comparison of Dresden with other major German cities (pre-treatment period).

Variable	Dresden	Other cities (all)		Other cities (East)	
		Mean	*Difference*	*Mean*	*Difference*
Panel A: Basic time-varying destination-specific controls.					
Share of male population	0.495	0.488	0.007	0.487	0.008
Share of elderly people (65+)	0.157	0.155	0.002	0.147	0.010
Share of young people (<18)	0.218	0.203	0.015	0.229	-0.011
Share of asylum seekers	0.190	0.155	0.035	0.254	-0.064
Number of unemployed people (log)	9.993	9.758	0.235	9.932	0.061
Share of short-time workers	0.579	0.704	-0.125	0.527	0.052
Share of mini jobs	0.122	0.179	-0.057	0.135	-0.013
GDP (log)	17.412	17.619	-0.207	17.337	0.075
Number of firm insolvencies (log)	1.836	1.960	-0.124	1.900	-0.064
Business tax revenues (log)	19.326	19.319	0.007	18.885	0.441
Second home tax	1	0.782	0.218	1	0
University of excellence	0.800	0.179	0.621	0.317	0.483
Tuition fees	0.000	0.172	-0.172	0.000	0
Two cohorts of high-school graduates	0.000	0.085	-0.085	0.017	-0.017
Panel B: Political support for far-right parties.					
Vote share far-right parties (EU parliament)	0.079	0.048	0.031	0.065	0.014
Vote share far-right parties (German parliament)	0.062	0.034	0.028	0.046	0.016
Vote share far-right parties (state parliament)	0.075	0.040	0.025	0.056	0.019
Vote share far-right parties (city council)	0.027	0.026	0.001	0.027	0

Notes: This table lists the time-varying destination-specific control variables that we use in our dyadic difference-in-differences analyses. For each of these variables, the table also shows how Dresden differed from other German cities (in East Germany) with more than 200,000 inhabitants in the four years before the rise of Pegida.

Table C.9 The far-right rallies in Dresden and their effect on the location choices of Germans (robustness checks, dyadic DiD).

	(1)	(2)	(3)	(4)	(5)	(6)
	Panel A: No origin-by-year and region-of-destination-by-year fixed effects.					
$DD \times \mathbb{I}_{t \geq 10/2014}$	-0.065**	-0.078**	-0.105**	-0.005	-0.101**	-0.104**
	(0.0270)	(0.0301)	(0.0341)	(0.0432)	(0.0387)	(0.0364)
Observations	5,400	5,400	5,400	5,400	5,400	5,400
	Panel B: No region-of-destination-by-year fixed effects.					
$DD \times \mathbb{I}_{t \geq 10/2014}$	-0.087**	-0.097**	-0.110**	-0.050	-0.102**	-0.113*
	(0.0274)	(0.0297)	(0.0429)	(0.0370)	(0.0396)	(0.0507)
Observations	5,400	5,400	5,400	5,400	5,400	5,400
	Panel C: No origin-by-year fixed effects.					
$DD \times \mathbb{I}_{t \geq 10/2014}$	-0.099***	-0.116**	-0.134***	-0.063	-0.129**	-0.132***
	(0.0298)	(0.0327)	(0.0389)	(0.0397)	(0.0449)	(0.0389)
Observations	5,400	5,400	5,400	5,400	5,400	5,400
	Panel D: No time-varying destination controls.					
$DD \times \mathbb{I}_{t \geq 10/2014}$	-0.084***	-0.101***	-0.113**	-0.048	-0.111**	-0.110**
	(0.0241)	(0.0263)	(0.0419)	(0.0350)	(0.0428)	(0.0436)
Observations	5,400	5,400	5,400	5,400	5,400	5,400
	Panel E: *asinh* transformation.					
$DD \times \mathbb{I}_{t \geq 10/2014}$	-0.093**	-0.107***	-0.116**	-0.071	-0.106**	-0.120**
	(0.0297)	(0.0315)	(0.0433)	(0.0419)	(0.0452)	(0.0484)
Observations	5,400	5,400	5,400	5,400	5,400	5,400
	Panel F: No weights.					
$DD \times \mathbb{I}_{t \geq 10/2014}$	-0.066**	-0.075***	-0.096***	-0.035	-0.099**	-0.084*
	(0.0266)	(0.0222)	(0.0283)	(0.0459)	(0.0399)	(0.0382)
Observations	5,400	5,400	5,400	5,400	5,400	5,400
	Panel G: NUTS2 districts as origins.					
$DD \times \mathbb{I}_{t \geq 10/2014}$	-0.091**	-0.104***	-0.115**	-0.064	-0.105**	-0.120**
	(0.0280)	(0.0294)	(0.0391)	(0.0402)	(0.0411)	(0.0426)
Observations	12,330	12,330	12,330	12,330	12,330	12,330
	Panel H: Counties as origins.					
$DD \times \mathbb{I}_{t \geq 10/2014}$	-0.079***	-0.090***	-0.099**	-0.040	-0.096***	-0.102**
	(0.0234)	(0.0242)	(0.0303)	(0.0347)	(0.0285)	(0.0333)
Observations	130,005	130,005	130,005	130,005	130,005	130,005
	Panel I: Cities with more than 150,000 inhabitants as destinations.					
$DD \times \mathbb{I}_{t \geq 10/2014}$	-0.105**	-0.122***	-0.133**	-0.064	-0.135**	-0.127**
	(0.0320)	(0.0346)	(0.0505)	(0.0366)	(0.0525)	(0.0497)
Observations	7,290	7,290	7,290	7,290	7,290	7,290
	Panel J: Cities with more than 300,000 and less than 800,000 inhabitants as destinations.					
$DD \times \mathbb{I}_{t \geq 10/2014}$	-0.106**	-0.111**	-0.142*	-0.016	-0.161*	-0.125
	(0.0419)	(0.0451)	(0.0745)	(0.0450)	(0.0761)	(0.0777)
Observations	2,430	2,430	2,430	2,430	2,430	2,430
Cohorts	All	18 – 64	18 – 29	30 – 64	18 – 29	18 – 29
Gender	All	All	All	All	Male	Female
Investigation period	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19

Notes: This table shows how changes in the model specification affect the results presented in Table 1. The captions of the different panels indicate how the regressions used in this analysis differs from the baseline model. Summary statistics for the outcome variables are reported in Table C.7. $^{*}\, p < 0.10$, $^{**}\, p < 0.05$, $^{***}\, p < 0.01$.

Table C.10 The far-right rallies in Dresden and their effect on the location choices of Germans (heterogeneity by distance, dyadic DiD).

	(1)	(2)	(3)	(4)	(5)	(6)
$DD \times \mathbb{I}_{t \geq 10/2014}$	0.030	0.012	0.023	-0.029	-0.057	0.047
	(0.0321)	(0.0313)	(0.0433)	(0.0375)	(0.0340)	(0.0550)
$DD \times \mathbb{I}_{t \geq 10/2014}$	-0.088*	-0.080*	-0.112*	-0.008	-0.005	-0.147**
$\times \mathbb{I}_{dist \in (150km, 300km]}$	(0.0385)	(0.0407)	(0.0529)	(0.0343)	(0.0589)	(0.0487)
$DD \times \mathbb{I}_{t \geq 10/2014}$	-0.137***	-0.128***	-0.189***	-0.015	-0.087*	-0.215***
$\times \mathbb{I}_{dist \geq 300km}$	(0.0341)	(0.0351)	(0.0404)	(0.0302)	(0.0434)	(0.0460)
Observations	130,005	130,005	130,005	130,005	130,005	130,005
Cohorts	All	18 – 64	18 – 29	30 – 64	18 – 29	18 – 29
Gender	All	All	All	All	Male	Female
Investigation period	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19

Notes: This table shows estimates of a variant of Eq. (1). The outcome is the total number of German (of a particular type) who moved from the origin to the destination. The origins are the 401 German counties and the destinations the 40 largest German cities (for a list, see Table C.1). Standard errors are clustered at two levels: origin-destination-pair and year. Origin-destination pairs are weighted according to their relevance in the pre-treatment years (for details, see Section 3.3.1). Within-state moves are excluded from the analysis. All regressions include origin-destination fixed effects, origin-by-year fixed effects, region-of-destination-by-year fixed effects and several time-varying destination-specific controls (for a list, see Table C.8). Summary statistics for the outcome variables are reported in Table C.7. $\times \mathbb{I}_{dist \in (150km, 300km]}$ and $\times \mathbb{I}_{dist \geq 300km}$ are dummies reflecting the distance between the capital city of the origin county and the destination. $^{*}\, p < 0.10$, $^{**}\, p < 0.05$, $^{***}\, p < 0.01$.

Table C.11 Pro- and Anti-Pegida protests and their effect on the location choices of Germans (dyadic DiD).

	(1)	(2)	(3)	(4)
$SomeProt \times \mathbb{I}_{t \geq 10/2014}$	0.027	0.030	0.024	0.035
	(0.0152)	(0.0287)	(0.0183)	(0.0408)
$SomeProt \times \mathbb{I}_{t \geq 10/2014} \times LargerCounterp$		-0.005		-0.018
		(0.0251)		(0.0356)
$ManyProt \times \mathbb{I}_{t \geq 10/2014}$	-0.019	-0.087*	-0.034	-0.098*
	(0.0215)	(0.0397)	(0.0248)	(0.0470)
$ManyProt \times \mathbb{I}_{t \geq 10/2014} \times LargerCounter$		0.071*		0.075*
		(0.0307)		(0.0405)
Observations	5,400	5,400	5,400	5,400
Cohorts	All	All	18 – 29	18 – 29
Gender	All	All	All	All
Investigation period	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19

Notes: This table shows estimates of a variant of Eq. (1). The outcome is the total number of Germans (of a particular type) who moved from the origin to the destination. The origins are the 16 federal states and the destinations the 40 largest German cities (for a list, see Table C.1). Standard errors are clustered at two levels: origin-destination-pair and year. Origin-destination pairs are weighted according to their relevance in the pre-treatment years (for details, see Section 3.3.1). Within-state moves are excluded from the analysis. All regressions include origin-destination fixed effects, origin-by-year fixed effects, region-of-destination-by-year fixed effects and several time-varying destination-specific controls (for a list, see Table C.8). Summary statistics for the outcome variables are reported in Table C.7. *SomeProt*, *ManyProt*, and *LargerCounterpro* are dummies that reflect the number of rallies by Pegida (offshoots) and whether the counterprotests had more participants (for details, see Table C.2). $^{*}\, p < 0.10$, $^{**}\, p < 0.05$, $^{***}\, p < 0.01$.

Table C.12 The far-right rallies in Dresden and their effect on the location choices of Germans (controlling for far-right voting, dyadic DiD).

	(1)	(2)	(3)	(4)	(5)	(6)
$DD \times \mathbb{I}_{t \geq 10/2014}$	-0.094**	-0.105**	-0.103*	-0.073	-0.099*	-0.099*
	(0.0329)	(0.0337)	(0.0454)	(0.0396)	(0.0452)	(0.0500)
Observations	5,400	5,400	5,400	5,400	5,400	5,400
Cohorts	All	18 – 64	18 – 29	30 – 64	18 – 29	18 – 29
Gender	All	All	All	All	Male	Female
Investigation period	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19

Notes: This table shows estimates of Eq. (1). The outcome is the total number of Germans (of a particular type) who moved from the origin to the destination. The origins are the 16 federal states and the destinations the 40 largest German cities (for a list, see Table C.1). Standard errors are clustered at two levels: origin-destination-pair and year. Origin-destination pairs are weighted according to their relevance in the pre-treatment years (for details, see Section 3.3.1). Within-state moves are excluded. All regressions include origin-destination fixed effects, origin-by-year fixed effects, region-of-destination-by-year fixed effects, and time-varying destination-specific controls (for a list, see Panel A & B of Table C.8). Summary statistics for the outcome variables are presented in Table C.7. $^{*}\, p < 0.10$, $^{**}\, p < 0.05$, $^{***}\, p < 0.01$.

Table C.13 The far-right rallies in Dresden and their effect on the location choices of Germans (within-state migration, dyadic DiD).

	(1)	(2)	(3)	(4)	(5)	(6)
$DD \times \mathbb{I}_{t \geq 10/2014}$	-.0.004	-0.017	-0.019	0.021	-0.046	0.011
	(0.0231)	(0.0250)	(0.0380)	(0.0279)	(0.0377)	(0.0378)
Observations	306	306	306	306	306	306
Cohorts	All	18 – 64	18 – 29	30 – 64	18 – 29	18 – 29
Gender	All	All	All	All	Male	Female
Investigation period	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19

Notes: This table shows estimates of Eq. (1). The outcome is the total number of Germans (of a particular type) who moved from the origin to the destination. The origins are the 16 federal states and the destinations the 40 largest German cities (for a list, see Table C.1). Standard errors are clustered at two levels: origin-destination-pair and year. Origin-destination pairs are weighted according to their relevance in the pre-treatment years (for details, see Section 3.3.1). Across-state moves are excluded. All regressions include origin-destination fixed effects, origin-by-year fixed effects, region-of-destination-by-year fixed effects, and time-varying destination-specific controls (for a list, see Panel A of Table C.8). $^{*}\, p < 0.10$, $^{**}\, p < 0.05$, $^{***}\, p < 0.01$.

Table C.14 The far-right rallies in Dresden and their effect on the location choices of Germans (heterogeneity by local media exposure dyadic DiD).

	(1)	(2)	(3)	(4)	(5)	(6)
$DD \times \mathbb{I}_{t \geq 10/2014}$	-0.095**	-0.101**	-0.114*	-0.050	-0.104	-0.114*
	(0.0386)	(0.0419)	(0.0569)	(0.0487)	(0.0625)	(0.0526)
$DD \times \mathbb{I}_{t \geq 10/2014}$	0.007	-0.003	0.010	-0.032	0.004	0.014
$\times \mathbb{I}_{high\ reporting}$	(0.0339)	(0.0357)	(0.0572)	(0.0294)	(0.0675)	(0.0548)
Observations	9,171	9,171	9,171	9,171	9,171	9,171
Cohorts	All	18 – 64	18 – 29	30 – 64	18 – 29	18 – 29
Gender	All	All	All	All	Male	Female
Investigation period	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19

Notes: This table shows estimates of a variant of Eq. (1). The outcome is the total number of Germans (of a particular type) who moved from the origin to the destination. The origins are the 28 NUTS2 districts and the destinations the 40 largest German cities (for a list, see Table C.1). Standard errors are clustered at two levels: origin-destination-pair and year. Origin-destination pairs are weighted according to their relevance in the pre-treatment years (for details, see Section 3.3.1). Within-state moves are excluded from the analysis. All regressions include origin-destination fixed effects, origin-by-year fixed effects, region-of-destination-by-year fixed effects and several time-varying destination-specific controls (for a list, see Table C.8). Summary statistics for the outcome variables are reported in Table C.7. $\mathbb{I}_{high\ reporting}$ is a dummy that is equal to 1 for districts where reporting was above the median in the first two years after the rise of Pegida (for details, see Figure B.17). $^{*}\, p < 0.10$, $^{**}\, p < 0.05$, $^{***}\, p < 0.01$.

Table C.15 The far-right rallies in Dresden and their effect on the location choices of internal EU foreigners (dyadic DiD).

	(1)	(2)	(3)	(4)	(5)	(6)
$DD \times \mathbb{I}_{t \geq 10/2014}$	-0.099	-0.118	-0.171**	-0.029	-0.246**	-0.042
	(0.0807)	(0.0820)	(0.0703)	(0.1223)	(0.0733)	(0.1016)
Observations	5,400	5,400	5,400	5,400	5,400	5,400
Cohorts	All	18 – 64	18 – 29	30 – 64	18 – 29	18 – 29
Gender	All	All	All	All	Male	Female
Investigation period	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19	10/10 – 09/19

Notes: This table shows estimates of Eq. (1). The outcome is the number of EU foreigners (of a particular type) who moved from the origin to the destination. The origins are the 16 federal states and the destinations the 40 largest German cities (for a list, see Table C.1). Standard errors are clustered at two levels: origin-destination-pair and year. Origin-destination pairs are weighted according to their relevance in the pre-treatment years (for details, see Section 3.3.1). Within-state moves are excluded. All regressions include origin-destination fixed effects, origin-by-year fixed effects, region-of-destination-by-year fixed effects, and time-varying destination-specific controls (for a list, see Panel A of Table C.8). Summary statistics for the outcome variables are presented in Table C.7. $^{*}p < 0.10$, $^{**}p < 0.05$, $^{***}p < 0.01$.

Table C.16 Background characteristics of survey participants (final sample).

	Mean	**Std. Dev.**	**Min.**	**Max.**
Age	29.09	7.3827	18	45
Female	0.513	0.4998	0	1
Lives in East Germany	0.230	0.4211	0	1
Migration background	0.291	0.4540	0	1
At least high school degree	0.684	0.4650	0	1
Supporter of left-wing party	0.335	0.4720	0	1
Supporter of center-right party	0.256	0.4364	0	1
Supporter of far-right party	0.149	0.3557	0	1

Notes: Our final sample includes 2,821 individuls. According to our coding, a person has a migration background if he/she was born in another county or has a parent or grandparent that was born abroad. As common for Germany, we classify the AfD as a far-right party, CDU/CSU and FDP as center-right parties, and SPD, Alliance 90/The Greens, and The Left as left-wing parties. The share of migrants in our sample is close to the population average (≈30%) and political affiliations resemble poll results in late 2023. The share of people with a high school diploma in our sample is much higher than the population average (≈37%). However, this discrepancy was largely expected since the share of people with a high school diploma is much higher among younger cohorts.

Table C.17 The effect of far-right rallies on location choices (heterogeneity analysis, conjoint experiment).

	(1)	(2)	(3)	(4)
Frequency of far-right protests (occasionally)	-0.034** (0.0168)	-0.057*** (0.0088)	-0.040*** (0.0112)	-0.063*** (0.0109)
Frequency of far-right protests (frequently)	-0.282*** (0.0198)	-0.275*** (0.0107)	-0.214*** (0.0139)	-0.335*** (0.0126)
Observations	9,100	30,394	19,026	20,244
Individuals	646	2,149	1,344	1,435
Sample	East German	West German	Men	Women
	(5)	(6)	(7)	(8)
Frequency of far-right protests (occasionally)	-0.075*** (0.0145)	-0.044*** (0.0093)	-0.050*** (0.0093)	-0.052*** (0.0147)
Frequency of far-right protests (frequently)	-0.302*** (0.0178)	-0.267*** (0.0093)	-0.270*** (0.0115)	-0.291*** (0.0166)
Observations	12,236	27,006	27,762	11,368
Individuals	874	1,929	1,983	812
Sample	No high school degree	At least high school degree	No migration background	With migration background

Notes: This table shows estimates of Eq. (6), using different samples. The outcome variable is a dummy that reflects whether a city was selected as preferred place of residents. Individual fixed effects are included in all regressions. Standard errors clustered at the participant-level are reported in parentheses. $^{*}\, p < 0.10$, $^{**}\, p < 0.05$, $^{***}\, p < 0.01$.

Table C.18 The effect of far-right rallies on location choices (robustness checks, part 1, conjoint experiment).

	(1)	(2)	(3)	(4)
	Panel A: Preferred place of residence			
Frequency of far-right protests (occasionally)	-0.030** (0.0149)	-0.074*** (0.0151)	-0.077*** (0.0147)	-0.069*** (0.0246)
Frequency of far-right protests (frequently)	-0.309*** (0.0153)	-0.308*** (0.0156)	-0.317*** (0.0153)	-0.352*** (0.0241)
Observations	11,284	11,284	11,284	5,642
Individuals	2,821	2,821	2,821	2,821
	Panel B: Finding people with similar interests & views.			
Frequency of far-right protests (occasionally)	-0.074** (0.0321)	-0.063* (0.0320)	-0.092*** (0.0317)	-0.082 (0.0503)
Frequency of far-right protests (frequently)	-0.225*** (0.0333)	-0.194*** (0.0338)	-0.233*** (0.3367)	-0.337*** (0.0488)
Observations	2,804	2,804	2,804	1,402
Individuals	711	711	711	711
	Panel C: Medium-run economic development.			
Frequency of far-right protests (occasionally)	-0.024 (0.0309)	0.003 (0.0307)	0.006 (0.0312)	0.026 (0.0495)
Frequency of far-right protests (frequently)	-0.091*** (0.0315)	-0.166*** (0.0314)	-0.088*** (0.0322)	-0.121** (0.0500)
Observations	2,920	2,920	2,920	1,460
Individuals	730	730	730	730
	Panel D: Personal security.			
Frequency of far-right protests (occasionally)	-0.223*** (0.0299)	-0.151*** (0.0295)	-0.143*** (0.0306)	- 0.219*** (0.0477)
Frequency of far-right protests (frequently)	-0.482*** (0.0318)	-0.481*** (0.0310)	-0.437*** (0.0311)	-0.573*** (0.0465)
Observations	2,836	2,836	2,836	1,418
Individuals	709	709	709	709
	Panel E: Number of parks and green areas.			
Frequency of far-right protests (occasionally)	0.034 (0.0320)	-0.006 (0.0319)	-0.058* (0.0313)	-0.125** (0.0513)
Frequency of far-right protests (frequently)	-0.089*** (0.0316)	-0.042 (0.0327)	-0.084*** (0.0315)	-0.152** (0.0518)
Observations	2,724	2,724	2,724	1,362
Individuals	681	681	681	681
Round(s)	1st & 2nd	6th & 7th	Two random	4th

Notes: This table shows estimates of Eq. (6), using different samples. The outcome variable is a dummy that reflects whether a city was selected instead of the alternative city. Individual fixed effects are included in all regressions. Standard errors clustered at the participant-level are reported in parentheses. $^{*}\, p < 0.10$, $^{**}\, p < 0.05$, $^{***}\, p < 0.01$.

Table C.19 The effect of far-right rallies on location choices (robustness checks, part 2, conjoint experiment).

	(1)	(2)	(3)
	Panel A: Preferred place of residence		
Frequency of far-right protests (occasionally)	-0.052*** (0.0084)	-0.052*** (0.0062)	-0.052*** (0.0081)
Frequency of far-right protests (frequently)	-0.276*** (0.0090)	-0.276*** (0.0061)	-0.276*** (0.0063)
Observations	39,494	39,494	39,494
Individuals	2,821	2,821	2,821
	Panel B: Finding people with similar interests & views.		
Frequency of far-right protests (occasionally)	-0.078*** (0.0143)	-0.078*** (0.0128)	-0.078*** (0.0138)
Frequency of far-right protests (frequently)	-0.204*** (0.0240)	-0.204*** (0.0126)	-0.204*** (0.0194)
Observations	9,814	9,814	9,814
Individuals	701	701	701
	Panel C: Medium-run economic development.		
Frequency of far-right protests (occasionally)	-0.019 (0.0131)	-0.019 (0.0124)	-0.019 (0.0126)
Frequency of far-right protests (frequently)	-0.112*** (0.0200)	-0.112*** (0.0124)	-0.112*** (0.0168)
Observations	10,220	10,220	10,220
Individuals	730	730	730
	Panel D: Personal security.		
Frequency of far-right protests (occasionally)	-0.155*** (0.0210)	-0.155*** (0.1222)	-0.155*** (0.207)
Frequency of far-right protests (frequently)	-0.439*** (0.0180)	-0.439*** (0.0116)	-0.439*** (0.0093)
Observations	9,926	9,926	9,926
Individuals	709	709	709
	Panel E: Number of parks and green areas.		
Frequency of far-right protests (occasionally)	-0.025 (0.0267)	-0.025 (0.0129)	-0.025 (0.0274)
Frequency of far-right protests (frequently)	-0.081*** (0.0181)	-0.081*** (0.0128)	-0.081*** (0.0160)
Observations	9,534	9,534	9,534
Individuals	681	681	681
Cluster	Participant & Round	Robust	Round

Notes: This table shows estimates of Eq. (6), using different samples. The outcome variable is a dummy that reflects whether a city was selected instead of the alternative city. Individual fixed effects are included in all regressions. Standard errors are clustered at different levels and reported in parentheses. $^{*}p < 0.10$, $^{**}p < 0.05$, $^{***}p < 0.01$.

Table C.20 Far-right protests, social diversity and security concerns (conjoint experiment).

	(1)	(2)	(3)
Frequency of far-right protests (frequently)	-0.164**	-0.435***	-0.481***
	(0.0771)	(0.0506)	(0.0405)
× Social diversity (medium)	-0.069	-0.080	0.0045
	(0.0819)	(0.0550)	(0.0431)
× Social diversity (high)	-0.210***	0.010	-0.052
	(0.0779)	(0.0512)	(0.0444)
Observations	1,470	2,590	3,290
Individuals	105	185	235
Participants considered in regression analysis	Supports of far-right parties	Supports of center-right parties	Supports of left-wing parties

Notes: This table shows estimates of Eq. (6), using different samples. The outcome variable is a dummy that reflects whether a city is considered to be more secure than the alternative city. Individual fixed effects are included in all regressions. As common for Germany, we classify the AfD as a far-right party, CDU/CSU and FDP as center-right parties, and SPD, Alliance 90/The Greens, and The Left as left-wing parties. Standard errors clustered at the participant-level are reported in parentheses. $^{*}\, p < 0.10$, $^{**}\, p < 0.05$, $^{***}\, p < 0.01$.

D Supplementary material for experiment

D.1 German version (original)

Herzlich Willkommen!

Die Beantwortung des Fragebogens wird ca. **10 Minuten** Ihrer Zeit beansprochen.

In Auftrag gegeben wurde diese Umfrage vom **ZEW - Leibniz-Zentrum für Europäische Wirtschaftsforschung**.

Ihre Angaben werden selbstverständlich **anonym** ausgewertet. Es werden keine Angaben zu Ihrer Person an Dritte weitergegeben.

Sollten Sie mittels eines Smartphones an dieser Befragung teilnehmen, kann es hilfreich sein, dieses im Querformat zu benutzen.

Vielen Dank für Ihre Unterstützung und viel Spaß beim Ausfüllen des Fragebogens.

Bitte beantworten Sie, bevor wir beginnen, folgende Fragen:

Sind Sie ... ?

- ○ Männlich
- ○ Weiblich
- ○ Divers
- ○ Kein Eintrag im Personenregister

In welchem Jahr wurden Sie geboren?

_____

Besitzen Sie die deutsche Staatsbürgerschaft?

- ○ Ja
- ○ Nein

In welchem Bundesland befindet sich Ihr Hauptwohnsitz?

- ○ Baden-Württemberg
- ○ Bayern
- ○ Berlin
- ○ Brandenburg
- ○ Bremen
- ○ Hamburg
- ○ Hessen
- ○ Mecklenburg-Vorpommern
- ○ Niedersachsen
- ○ Nordrhein-Westfalen
- ○ Rheinland-Pfalz
- ○ Saarland
- ○ Sachsen
- ○ Sachsen-Anhalt
- ○ Schleswig-Holstein
- ○ Thüringen

Wir möchten im **ersten Teil** dieses Experiments mehr über Ihre Vorlieben bei der **Wahl von Wohnorten** erfahren.

Stellen Sie sich vor, Sie ziehen um und müssen **zwischen zwei Städten entscheiden**. Dabei handelt es sich um **fiktive** Städte mit mindestens 100.000 Einwohnern, die anhand der nachfolgenden Aspekte unterschieden werden können.

Vielfalt des kulturellen Angebots: Wie viele Kultureinrichtungen (d.h. Museen, Theater, Kunstausstellungen, Konzerthallen etc.) gibt es im Stadtgebiet?
Mögliche Ausprägungen: *gering - mäßig - groß*

Gesellschaftliche Vielfalt: Wie groß ist die Diversität im Stadtgebiet in Bezug auf Herkunft, Religion und sexuelle Orientierung?
Mögliche Ausprägungen: *gering - mäßig - groß*

Migrations- und asylkritische Proteste: Wie oft finden im Stadtgebiet Demonstrationen von Gruppen statt, die sich gegen Migration, Asylsuchende oder Geflüchtete aussprechen?
Mögliche Ausprägungen: *nie - vereinzelt - häufig*

Umwelt- und klimapolitischer Aktivismus: Wie oft sind klimaaktivistische Gruppen im Stadtgebiet aktiv?
Mögliche Ausprägungen: *nie - vereinzelt - häufig*

Zustand der öffentlichen Infrastruktur: In welchem Zustand befindet sich die Verkehrs- und Bildungsinfrastruktur der Stadt?
Mögliche Ausprägungen: *schlecht - mittel - gut*

Angebote für Familien, Kinder und Jugendliche: Wie ausgeprägt ist das Angebot an Sport- und Musikvereinen, öffentlichen Spielplätzen, Schwimmbädern usw.?
Mögliche Ausprägungen: *schlecht - mittel - gut*

In allen anderen Aspekten, die die Attraktivität von Städten beeinflussen können, unterscheiden sich die beiden Orte **nicht** wesentlich voneinander. Dies gilt insbesondere auch für ihre aktuelle wirtschaftliche Situation sowie die in den Städten gegenwärtig anfallenden Lebenserhaltungskosten.

Im Folgenden legen wir Ihnen **sieben Situationen** vor, in denen Sie sich jeweils zwischen zwei Städten entscheiden sollen. Nehmen Sie sich Zeit, die Stadtprofile sorgfältig durchzulesen und entscheiden Sie nach den Kriterien, die Ihnen persönlich am wichtigsten sind. Wir bitten Sie, auch wenn Sie sich unsicher sind, sich für eine der beiden Städte zu entscheiden.

Bitte beachten Sie, dass Sie nach Abgabe einer Antwort nicht mehr zurückspringen können,

um Ihre Entscheidung zu korrigieren. Darüber hinaus möchten wir Sie bitten, die sieben nachfolgenden Entscheidungssituationen möglichst ohne Unterbrechung zu betrachten.

Start of Block: Experiment Teil1

	Stadt A	Stadt B
Vielfalt des kulturellen Angebots		
Gesellschaftliche Vielfalt		
Migrations- und asylkritische Proteste		
Umwelt- und klimapolitischer Aktivismus		
Zustand der öffentlichen Infrastruktur		
Angebote für Familien, Kinder und Jugendliche		

In welche Stadt würden Sie lieber ziehen?

Stadt A ◯ **Stadt B** ◯

Sie befinden sich nun im **zweiten Teil** des Experiments. Dieser Teil ist in seinem grundsätzlichen Aufbau mit dem ersten Teil des Experiments identisch. Lediglich ihre Aufgabe ändert sich etwas, denn wir fragen Sie nun nach spezifischen Erwartungen, die Sie hinsichtlich der Städte haben.

	Stadt A	Stadt B
Vielfalt des kulturellen Angebots		
Gesellschaftliche Vielfalt		
Migrations- und asylkritische Proteste		
Umwelt- und klimapolitischer Aktivismus		
Zustand der öffentlichen Infrastruktur		
Angebote für Familien, Kinder und Jugendliche		

Von welcher Stadt erwarten Sie, dass Sie sich in ihr sicherer fühlen?

Stadt A ◯ **Stadt B** ◯

	Stadt A	Stadt B
Vielfalt des kulturellen Angebots		
Gesellschaftliche Vielfalt		
Migrations- und asylkritische Proteste		
Umwelt- und klimapolitischer Aktivismus		
Zustand der öffentlichen Infrastruktur		
Angebote für Familien, Kinder und Jugendliche		

Von welcher Stadt erwarten Sie, dass Sie im Alltag häufiger auf Menschen mit ähnlichen Interessen und Ansichten treffen würden?

Stadt A ◯ **Stadt B** ◯

	Stadt A	Stadt B
Vielfalt des kulturellen Angebots		
Gesellschaftliche Vielfalt		
Migrations- und asylkritische Proteste		
Umwelt- und klimapolitischer Aktivismus		
Zustand der öffentlichen Infrastruktur		
Angebote für Familien, Kinder und Jugendliche		

Von welcher Stadt erwarten Sie, dass Sie sich mittelfristig wirtschaftlich besser entwickeln wird?

Stadt A ◯ **Stadt B** ◯

	Stadt A	Stadt B
Vielfalt des kulturellen Angebots		
Gesellschaftliche Vielfalt		
Migrations- und asylkritische Proteste		
Umwelt- und klimapolitischer Aktivismus		
Zustand der öffentlichen Infrastruktur		
Angebote für Familien, Kinder und Jugendliche		

Von welcher Stadt erwarten Sie, dass es in ihr mehr Grünflächen und Parkanlagen gibt?

Stadt A ◯ **Stadt B** ◯

Wie wichtig sind Ihnen im Allgemeinen die folgenden Aspekte bei der Wahl eines Wohnortes von 0 (überhaupt nicht wichtig) bis 10 (sehr wichtig)?

Abschließend stellen wir Ihnen noch einige weitere Fragen zu Ihrer Person.

Wie lautet die Postleitzahl Ihres Wohnorts (Hauptwohnsitz)?

_____

Was ist Ihr höchster Schulabschluss?

- ○ Haupt- oder Volksschulabschluss
- ○ Mittlere Reife oder Abschluss der polytechnischen Oberschule
- ○ Abitur, Fachhochschulreife
- ○ Schulausbildung noch nicht abgeschlossen
- ○ Schule ohne Abschluss verlassen
- ○ Möchte nicht antworten

Studium Haben Sie ein abgeschlossenes Hochschul- oder Fachhochschulstudium?

- ○ Ja
- ○ Nein
- ○ Noch im Studium
- ○ Möchte nicht antworten

Geburtsland Wurden Sie in Deutschland geboren?

- ○ Ja
- ○ Nein
- ○ Möchte nicht antworten

Wurden alle Ihre Elternteile in Deutschland geboren?

- ○ Ja
- ○ Nein
- ○ Möchte nicht antworten

Wurden alle Ihre Großeltern in Deutschland geboren?

- ○ Ja
- ○ Nein
- ○ Möchte nicht antworten

Wie oft haben Sie freundschaftlichen Kontakt zu Personen, die von rassistischer Diskriminierung betroffen sind bzw. sein könnten?

- ○ Täglich
- ○ Regelmäßig
- ○ Gelegentlich
- ○ Selten
- ○ Nie
- ○ Möchte nicht antworten

Welcher Partei stehen Sie am nächsten?

- ○ Linkspartei
- ○ Bündnis 90/Die Grünen
- ○ SPD
- ○ FDP
- ○ CDU/CSU
- ○ AfD
- ○ Möchte nicht antworten

Haben Sie Feedback?

_____

D.2 English version (translation)

Welcome!

Answering the questionnaire will take about **10 minutes** of your time.

This survey was commissioned by the **ZEW - Leibniz Center for European Economic Research**.

Your data will of course be evaluated **anonymously**. No personal data will be passed on to third parties.

If you are taking part in this survey using a smartphone, it may be helpful to use it in landscape format.

Thank you for your support and have fun filling out the questionnaire.

Please answer the following questions before we begin:

Are you ... ?

- ○ Male
- ○ Female
- ○ Divers
- ○ No entry in the civil status register

In which year were you born?

_____

Do you have German citizenship?

- ○ Yes
- ○ No

In which federal state is your main residence?

- ○ Baden-Württemberg
- ○ Bavaria
- ○ Berlin
- ○ Brandenburg
- ○ Bremen
- ○ Hamburg
- ○ Hesse
- ○ Mecklenburg-Western Pomerania
- ○ Lower Saxony
- ○ North Rhine-Westphalia
- ○ Rhineland-Palatinate
- ○ Saarland
- ○ Saxony
- ○ Saxony-Anhalt
- ○ Schleswig-Holstein
- ○ Thuringia

In the **first part** of this experiment, we would like to find out more about your preferences when choosing a place to live.

Imagine you are moving and have to choose between **two cities**. These are **fictitious** cities with at least 100,000 inhabitants, which can be differentiated on the basis of the following aspects.

Diversity of cultural offerings: How large is the number of cultural institutions (i.e. museums, theaters, art exhibitions, concert halls, etc.) in the city?
Possible characteristics: *low - medium - high*

Social diversification: How diverse is the urban area in terms of origin, religion and sexual orientation?
Possible characteristics: *low - medium - high*

Anti-immigration and anti-asylum protests: How often do demonstrations against migration, asylum seekers or refugees take place in the city?
Possible characteristics: *never - occasionally - frequently*

Environmental and climate policy activism: How often are climate activist groups active in the city?
Possible characteristics: *never - occasionally - frequently*

State of public infrastructure: What is the state of the city's transport and education infrastructure?
Possible characteristics: *bad - medium - good*

Offers for families, children and young people: How extensive is the range of sports and music clubs, public playgrounds, swimming pools, etc.?
Possible characteristics: *bad - medium - good*

In all other aspects that can influence the attractiveness of cities, the two locations **do not differ** significantly from one another. This also applies in particular to their current economic situation and the cost of living currently incurred in the cities.

Below are **seven situations** in which you are asked to choose between two cities. Take your time to read the city profiles carefully and make your decision based on the criteria that are most important to you personally. We ask you to choose one of the two cities, even if you are unsure.

Please note that once you have submitted an answer, you cannot go back to correct your decision. In addition, we would like to ask you to consider the seven following decision situations without interruption if possible.

	City A	City B
Diversity of cultural offerings		
Social diversification		
Anti-immigration and anti-asylum protests		
Environmental and climate policy activism		
State of public infrastructure		
Offers for families, children and young people		

Which city would you rather move to?

City A ◯ **City B** ◯

You are now in the **second part** of the experiment. The basic structure of this part is identical to the first part of the experiment. Only your task has changed slightly, as we are now asking you about specific expectations you have regarding the cities.

	City A	City B
Diversity of cultural offerings		
Social diversification		
Anti-immigration and anti-asylum protests		
Environmental and climate policy activism		
State of public infrastructure		
Offers for families, children and young people		

From which city do you expect to feel safer in?

City A ◯ **City B** ◯

	City A	City B
Diversity of cultural offerings		
Social diversification		
Anti-immigration and anti-asylum protests		
Environmental and climate policy activism		
State of public infrastructure		
Offers for families, children and young people		

From which city would you expect to meet people with similar interests and views more often in everyday life?

City A ◯ **City B** ◯

	City A	City B
Diversity of cultural offerings		
Social diversification		
Anti-immigration and anti-asylum protests		
Environmental and climate policy activism		
State of public infrastructure		
Offers for families, children and young people		

Which city do you expect to develop better economically in the medium term?

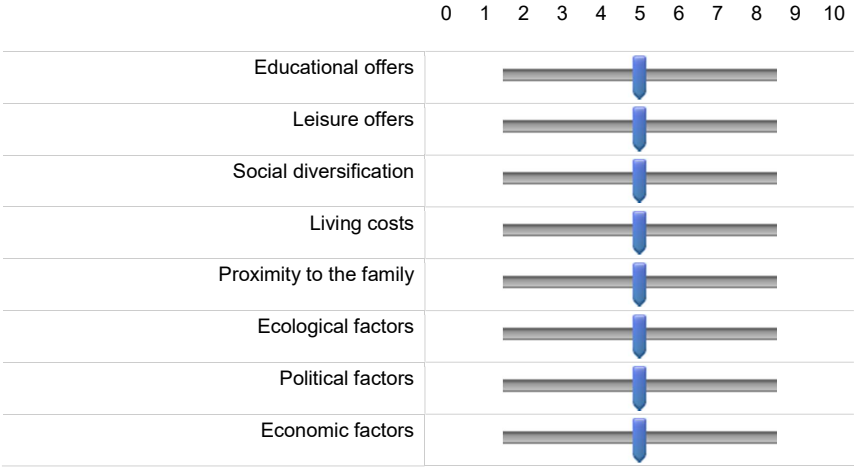
City A ◯ **City B** ◯

	City A	City B
Diversity of cultural offerings		
Social diversification		
Anti-immigration and anti-asylum protests		
Environmental and climate policy activism		
State of public infrastructure		
Offers for families, children and young people		

Which city do you expect to have more green spaces and parks?

City A ◯ **City B** ◯

In general, how important are the following aspects to you when choosing a place to live, from 0 (not at all important) to 10 (very important)?



Finally, we will ask you a few more questions about yourself.

What is the zip code of your place of residence (primary residence)?

_____

What is your highest school-leaving qualification?

- ○ Elementary school certificate
- ○ Secondary school certificate
- ○ A-levels
- ○ School education not yet completed
- ○ Left school without a qualification
- ○ Prefer not to answer

Do you have a degree from a university or university of applied sciences?

- ○ Yes
- ○ No
- ○ Studies not yet completed
- ○ Prefer not to answer

Were you born in Germany

- ○ Yes
- ○ No
- ○ Prefer not to answer

Were all your parents born in Germany?

- ○ Yes
- ○ No
- ○ Prefer not to answer

Were all your grandparents born in Germany?

- ○ Yes
- ○ No
- ○ Prefer not to answer

How often do you have friendly contact with people who are or could be affected by racist discrimination?

- ○ Daily
- ○ Regularly
- ○ Occasionally
- ○ Rarely
- ○ Never
- ○ Prefer not to answer

Which of the following parties do you prefer most?

- ○ The Left
- ○ Alliance 90/The Greens
- ○ Social Democratic Party
- ○ Free Democratic Party
- ○ Union parties
- ○ Alternative for Germany
- ○ Prefer not to answer

Do you have any feedback?

_____

Download ZEW Discussion Papers:

https://www.zew.de/en/publications/zew-discussion-papers

or see:

https://www.ssrn.com/link/ZEW-Ctr-Euro-Econ-Research.html
https://ideas.repec.org/s/zbw/zewdip.html

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