We explore the effect of economic hardship on the identification with a disadvantaged ethnic minority using longitudinal data on 10,000 adolescents in Hungary. Fixed-effects and first-differenced panel models show that adolescents having Roma descent are more likely to identify as Roma when their families experience economic hardship, an effect strongest among adolescents with mixed-ethnicity parents. Adolescents who identify as Roma are substantially less prejudiced against the Roma and less supportive of exclusionary policies than those with Roma descent but not identifying as Roma. These findings support self-perception-based theories of ethnic identification and imply that changes in ethnic identity can reinforce stereotypes.

Ethnic identities play a central role in the politics of multietnic societies (Cederman and Girardin 2007; Habyarimana et al. 2007), but we know little about why individuals identify with ethnic groups and how such identities change in time. Constructivist theories of ethnicity (e.g., Chandra 2012) posit that rather than being hardwired, ethnic identities are responsive to the social and political context. Consistent with this claim, recent research shows that, on the aggregate, macro-level factors, such as elections, exert a substantial influence on ethnic identities (Eifert, Miguel, and Posner 2010; Michelitch 2015). In this article, we expand this line of research and examine how individual circumstances affect ethnic identity and its intergenerational transmission in families.

Our theoretical argument is based on a constructivist approach that implies that ethnic identity is determined jointly by descent- and non-descent-based attributes. The set of ethnic identities people possess is constrained by their descent, but the identity that individuals actually embrace at a given time depends on how similar they see themselves to the “typical member” of an ethnic group (Shayo 2009; Turner et al. 1987). Among attributes possibly associated with ethnic groups, we focus on poverty because in many societies ethnic minorities are characterized by economic marginalization (Laitin 1995). Therefore, the central prediction that we set out to test is that individuals are more likely to identify with marginalized ethnic groups when they themselves experience economic hardship.

Our study focuses on Hungary, a country whose ethnic landscape makes it appropriate for our analysis. The vast majority of the country’s population identifies as ethnic Hungarian only, and this ethnic majority coexists with a small (5%–10%) Roma minority, many of whom identify both as Roma and Hungarian. The Roma have lived in Hungary for more than 500 years, have settled completely, speak Hungarian, share the dominant Christian religion of the country, and mostly live in ethnically mixed neighborhoods. At the same time, most of them live in long-term poverty and face severe discrimination and prejudice. For instance, recent surveys found that 60% of the Hungarian population believed that “the inclination to criminality is in the blood of gypsies” (Bernat et al. 2013).

To test the hypothesis that impoverishment leads to the activation of Roma identity, we use data from the Hungarian Life Course Survey (HLCS), a multi-investigator panel survey that followed a representative sample of 10,000 adolescents for six years. The HLCS includes repeated measures of the ethnic identity of all subjects, allows for the measure-
ment of their ethnic descent based on separate interviews with their parents, and provides repeated measures of the economic circumstances of the sampled families. In sum, the data set we use is in many ways better suited for micro-level research on ethnic identity than those previously used, and it is unique in that it allows for a longitudinal analysis of ethnic identity informed by detailed data on the ethnic descent of the sampled individuals.

Our core empirical finding is that adolescents of Roma descent became 12% more likely to identify as Roma when their families experienced economic hardship (a 6% point effect added to a 50% baseline). This result is corroborated by numerous robustness checks, both in terms of measurement and analytical strategies. We also find that the effect of economic hardship on Roma identity was the strongest for individuals with only one parent of Roma descent and was weaker in ethnically homogenous families.

In one of the waves, we also included measures of the adolescents' political attitudes about ethnic issues to see if ethnic identity, as measured in our survey, is related to political preferences. Using these data, we demonstrate that ethnic identity is in fact strongly linked to political attitudes. Comparing individuals of Roma descent, we find that those who did not identify as Roma were more prejudiced against the Roma minority and more supportive of exclusionary policies directed at them, often displaying similar attitudes to those without Roma descent. While this last set of evidence is only correlational, it suggests that ethnic identities, as expressed in surveys, have political significance over and beyond descent-based membership in ethnic groups.

Our finding, revealing that economic hardship can trigger the identification with a marginalized ethnic group, supports a more complex view of the relationship between cleavages based on ethnicity and class (see Shayo 2009). In particular, the results reported here demonstrate that the very processes that shape identification with ethnic groups can reinforce economic inequality between those groups (see Penner and Saperstein 2008). Moreover, the tendency that ethnic groups become more and more homogeneous in terms of class can contribute to the intensification of ethnic conflict in diverse societies.

CONCEPTUAL OVERVIEW AND RELATED LITERATURE

Our approach to generating hypotheses about how and why ethnic identities change is grounded in the theoretical distinction between nominal and activated ethnic identities (Chandra 2012). Nominal ethnic identities are defined as categories in which individuals are eligible for membership based on their descent, while activated ethnic identities are those in which they claim membership (Chandra 2012). The key question is what can activate or deactivate nominal ethnic identities that individuals possess.

Our proposed answer to this question is based on self-categorization theory (Turner et al. 1987): individuals are more likely to categorize themselves as members of a group if they perceive themselves as more similar to the other members of that group (Huddy 2001; Shayo 2009). We therefore expect that changes in individual attributes that are thought of as typical of ethnic groups can contribute to changes in ethnic identification. This short-term mechanism can work in addition to hypothesized long-run effects of macro-level social and political processes that shape the boundaries between ethnic groups (e.g., Laitin 1995).

In this study, we focus on economic hardship, an individual attribute that is often associated with marginalized ethnic groups in many societies (Hale 2004; Laitin 1995). While the mapping between ethnicity and affluence can be rather stable on the macro level, individuals may experience rapid changes in their own economic status. Our expectation is thus that, in societies where an ethnic group is closely associated with poverty, individuals are more likely to identify with that group when they experience economic hardship.

Our study seeks to contribute to the empirical literature on why individuals identify with particular ethnic groups. While there exists research that examines the individual-level correlates of ethnic and racial identity (Davenport 2016; Schwartzman 2007), these studies are cross sectional and only establish correlations between ethnic identity and its proposed predictors. Also, the conclusions of these studies with regard to the intergenerational transmission of ethnic and racial identities remain tentative because the ethnic descent of respondents is based on self-reports rather than independent measures based on interviews with family members of different generations.

To our knowledge, Saperstein and Penner (2008) is the only study that analyzes longitudinal variation in ethnic/racial identification. Using a long panel from the National Longitudinal Survey of Youth, they show that changes in the way interviewers classify respondents are associated with important life events, such as incarceration and im-

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1. Schwartzman (2007) uses Brazilian census data to show that parents of higher social status are more likely to identify their children as white than low-status parents of the same race. Davenport (2016) uses a cross-sectional survey of US college freshmen to show how various demographic variables influence ethnic identity among multiracial adolescents.

2. This is important because unobserved differences might make some individuals less likely to identify as a minority and also to classify their children or parents as minorities.
poverishment. While their focus is on classification, they report similar results on changes in identification, using data from the two survey waves (1979 and 2002) in which self-reported race was measured.3

Our study is also related to the literature focusing on how macro-level factors influence the importance of ethnic identity vis-à-vis national or political identity (Eifert et al. 2010; Michelitch 2015; Robinson 2014) and how the salience of such identities influence political attitudes (Margalit and Kuo 2012; Roccas and Brewer 2002; Shayo 2009). Our approach differs from these studies not only in our interest in micro-level determinants of identity but also in that we focus on changes in ethnic identification in and of itself and not its salience relative to other group attachments. This is important because individuals may identify with many groups (Roccas and Brewer 2002), and the complexity of such group attachments can be consequential in itself.

THE POLITICS OF ROMA IDENTITY IN HUNGARY
The Roma people are one of Europe’s largest ethnic minorities.4 While the size of the Roma population is hard to assess, partly because of the differences in the way censuses measure ethnic identities, the number of Roma was estimated to be over 4 million in Central and Eastern Europe in the early 1990s (Bárány 2002) and around about a half million (5%–6%) in Hungary in the 2000s (Kemény and Janky 2006).

Ethnicity and class are tightly intertwined in Hungary. The Roma of Hungary are characterized by widespread poverty, low formal employment, low education, poor health, and social exclusion (Milcher 2006; O’Higgins and Ivanov 2006; UNDP 2002). Janky (2005) estimates that two-thirds of the Hungarian Roma belong to the poorest 10% of the society. Wide ethnic gaps emerge already in childhood (in terms of birth weight, height, test scores, and academic achievement; see Kertesi and Kézdi 2011), and schools are characterized by high levels of ethnic segregation (Kertesi and Kézdi 2013).

Ethnic tensions have been present in Hungary for a long time, and they intensified with the economic downturn of the late 2000s, leading to several highly publicized cases of ethnic violence. In 2006, following a minor car accident, a non-Roma driver was beaten to death by a group of Roma people. In 2007, Jobbik, a far-right party, founded a paramilitary organization that held marches in villages intimidating Roma inhabitants. Between 2008 and 2009, a gang of white supremacists committed a series of racially targeted attacks of Roma families, leading to the death of six people. These events have apparently shaped national party politics: in the general election of 2010, Jobbik obtained 17% of the popular vote after an explicitly racist campaign, and it received 20% in the latest election in 2014.

Ethnic tensions are amplified by the stereotypical coverage of the Roma in the news media, focusing on poverty and crime (Bernath and Messing 2003) and the political discourse that often highlights the strong correlation between ethnicity and social status. While the parties on the various ends of the political spectrum offer different explanations and propose different solutions, all agree that the “Roma-issue” is a problem of economic hardship and social marginalization. The extreme right often characterizes certain social issues as ethnic ones, while the liberals seek to recast ethnic conflict as based on economic cleavages.5

EMPIRICAL APPROACH
Sample
We use the Hungarian Life Course Survey (HLCS), a six-wave panel survey that was administered annually between 2006 and 2012.6 A sample of 10,022 respondents was drawn from the population of eighth-grade students who completed the National Assessment of Basic Competences (NABC), a standard national competence test in Hungary. In order to secure a large enough sample of respondents of Roma descent, the survey oversampled students with low test scores (the NABC data do not contain information on ethnicity). Throughout the analysis, we use sampling weights to restore the representative nature of the sample. We provide more details about our data (including the recruitment of

3. While they show that changes in identification are also associated with important life events, their data put important limitations on their analysis of identification. First, the format of the relevant survey instrument differed across waves. Second, because of the length of time elapsed between the two waves (23 years), it is unclear whether changes in the way respondents identified reflects genuine differences in the categories they used or changes in the meanings attached to these categories.

4. See Bárány (2002) for an extensive description of the history and current situation of the Roma in Hungary and Eastern Europe.

5. The social and political importance of Roma ethnic identification initiated significant research into the sources of Roma identity (Ahmed, Feliciano, and Emigh 2007; Csepeli and Simon 2004; Formoso 1986; Ladányi and Szélényi 2001; Prieto-Flores 2009). Unfortunately, the designs of these studies were not suitable for drawing strong conclusions about the dynamics of ethnic identification or the effect of social status on ethnic identification. Existing research has relied on cross-sectional samples without longitudinal or intergenerational elements, preventing it from focusing on groups with Roma descent and identifying effects from longitudinal variation.

6. The HLCS was a multi-investigator study designed by Gábor Kertesi and Gábor Kézdi. Face-to-face interviews were conducted by the TÁRKI Research Institute. The survey was conducted with the full consent of the legal minors and their parents.
subjects, sampling, attrition, and missing data) in appendix A (appendices A–C are available online).

Similarly to other cohort-based samples that have been used in the political socialization literature (e.g., Erikson and Stoker 2011; Jennings and Markus 1984), our sampling approach offers some advantages that compensate for the lack of representation of older age groups. First, changes in the material well-being of adolescents are outside of their control, which helps to rule out reverse causality between changes in identification and economic hardship. Second, because virtually all of our subjects lived with their parents in the first two survey waves, we were able to measure their ethnic identity through conducted interviews with their parents.

These advantages notwithstanding, our cohort-based sample in general, and our focus on adolescents in particular, limit the generalizability of our findings. It is possible that ethnic identities are less responsive to individual circumstances in adulthood. Then, our findings may overstate the relationship of ethnic identity with economic hardship in the population. However, even in that case, individual circumstances influencing identities during the adolescence might have persistent effects.7

Measures

Ethnic identity. In four survey waves, adolescents were asked the following two questions: “In our country, people belong to different ethnic groups. What is the ethnic group that you primarily identify with? What other ethnic group do you identify with?” By asking two questions, HLCS allowed respondents to indicate two ethnic identities in every survey wave.8 We operationalized Roma identification (i.e., activated ethnic identity) as an indicator variable that takes a value of one if an adolescent answered “Roma” to either of the two survey questions in a given wave. Importantly, we were able to record the ethnic identification of almost all individuals who were successfully interviewed in a given wave: the number of “don’t knows” and refusals amount only to 46 out of over 31,622 interviews.

Ethnic descent. We determined adolescents’ ethnic descent based on separate interviews with their parents that took place in the first two survey waves. The wording of the questions about ethnic identity was the same as in the case of adolescent respondents. We also asked parents if they had Roma individuals among their own parents, grandparents, or other relatives. We defined an indicator for Roma descent, taking a value of one if at least one of the adolescent’s parents identified as Roma or reported to have Roma members among their relatives in either of the two waves we measured this variable.9 The rationale behind this approach is that the full set of ethnic identities that are available for an individual comprises all ethnic identities that their ancestors have professed.

Interestingly, the relative majority (about 49%) of our respondents of Roma descent identified as Roma in some of the interviews but not in others. The rest were evenly split between those expressing a Roma identity in each of the four survey waves (27%) and those who did not identify themselves as Roma in any of the survey waves (24%). This suggests that changes in the identification of our respondents eligible for membership in the Roma ethnic group were quite prevalent.

Economic hardship. Our measure of economic hardship is constructed from parents’ answers to questions on whether the household experienced running out of money for food, inability to pay bills, or inability to afford heating in the year prior to the interview. We created a binary indicator variable from these answers based on whether the household has experienced any of these kinds of hardship.10 This measure is likely to have substantially smaller measurement error compared to other potential proxies of poverty, such as income, because it is easier to recall instances of hardship than adding up income from various sources. Minimizing the measurement error in our explanatory variable is important to avoid severe attenuation bias in panel regression models (Angrist and Pischke 2008).

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7. Given that longitudinal studies on ethnic identity are virtually nonexistent for either adolescents or adults, it is hard to even sign the bias that our approach introduces compared to a hypothetical study on a sample of adults.

8. This is important in the context of Roma identity: 83% of individuals who chose Roma as their identity in a survey wave also identified as Hungarian, and 99.8% of those who ever chose Roma as their identity identified as Hungarian at some point. Moreover, 55% of the times an individual chose the Roma answer, she chose it as a “secondary identity.” While some respondents expressed other ethnic identities (e.g., German or Romanian), they constitute a minority: 4.1 percent of the adolescents in our sample identified with an ethnic group other than Hungarian or Roma in any of the survey waves (compared to 9.0% as Roma and 99.9% as Hungarian).

9. We include stepparents in this measure as well, because stepparents are likely to have the same ethnic identity as the corresponding biological parents with unknown identification. Results of our analysis are very similar if we restrict the definition of Roma descent to biological parents.

10. In a series of robustness checks, we analyzed other measures, including ones that use information on the frequency and kinds of such hardship experiences, or simply family income, entered in various functional forms.
and use politics. We remain agnostic about the source of these changes: an idiosyncratic change in the survey context or national prevalence of Roma identification. At the same time, it is also possible that the spike in Roma identification questions increased the rates of Roma identification in that wave. At the same time, it is also possible that the spike in Roma identification was triggered by the 2010 election campaign or some other national political event.

Table 1. Measures of Ethnic Identity and Economic Hardship in the Survey Waves

<table>
<thead>
<tr>
<th>Wave</th>
<th>Year</th>
<th>N</th>
<th>Median Age of Adolescent</th>
<th>Whose Identity Is Measured</th>
<th>Identifying as Roma</th>
<th>Experiencing Hardship</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>2006</td>
<td>10,022</td>
<td>15</td>
<td>Parents</td>
<td>4.5</td>
<td>18</td>
</tr>
<tr>
<td>B</td>
<td>2007</td>
<td>9,000</td>
<td>16</td>
<td>Parents, Adolescent</td>
<td></td>
<td></td>
</tr>
<tr>
<td>C</td>
<td>2008</td>
<td>8,648</td>
<td>17</td>
<td></td>
<td>4.5</td>
<td>19</td>
</tr>
<tr>
<td>D</td>
<td>2010</td>
<td>8,100</td>
<td>18</td>
<td>Adolescent</td>
<td>6.1</td>
<td>22</td>
</tr>
<tr>
<td>E</td>
<td>2011</td>
<td>7,621</td>
<td>19</td>
<td>Adolescent</td>
<td>5.4</td>
<td>23</td>
</tr>
<tr>
<td>F</td>
<td>2012</td>
<td>6,974</td>
<td>20</td>
<td>Adolescent</td>
<td>5.6</td>
<td>23</td>
</tr>
</tbody>
</table>

Note. Weighted by sampling weights.

Control variables. The richness of the longitudinal survey data we use allows us to control for many time-varying covariates. Some of them are related to the composition and the location of the household: whether the adolescent respondent lives with his or her parents (separate indicator variables for living with one’s mother and father), the size of the household, and whether the household of the adolescent lives under a new address. Further control variables include indicators for having children, being enrolled in school, cohabitating, the latter broken down by the ethnicity of the partner (measured by questions answered by the partner; the rather common unknown ethnicity answer entered as separate category).

Table 1 summarizes the most important details by individual survey waves: it reports the timing of the waves, respective sample sizes, the measures of ethnic identity, and the economic hardship measures contained in each interview. The proportion of families experiencing financial hardship started increasing after 2008, reflecting the effect of the great recession. There is also a noticeable spike in the average prevalence of Roma identification in 2010, which could reflect an idiosyncratic change in the survey context or national politics. We remain agnostic about the source of these changes and use fixed effects for survey years in our panel analysis.11

Estimation strategy

We estimate the effect of economic hardship on Roma identity using linear probability models specified as first-differenced and fixed-effects regressions.12 In both cases, the identification is based on longitudinal variation. As a result, it is not confounded by time-invariant factors that may be related to identification as well as economic hardship. The dependent variable in these regressions is Roma identification, and the independent variable of interest is the binary indicator variable of hardship (or the changes in these variables across waves, in the case of first-differenced regressions).

The use of individual fixed effects or differencing may not in itself eliminate concerns of reverse causality and omitted time-varying variables. However, reverse causality is unlikely in our case: it would require that changes in the ethnic identification of adolescents affect the income of their families to the extent that it would cause or prevent severe economic hardship. Indeed, the implausibility of adolescents’ ethnic identity affecting the economic hardship faced by their families is one of the main advantages of our research design. The richness of our data allows us to control for the most important time-varying variables that may affect both adolescents’ identification and family income, such as changes in family composition or residence, as well as dropping out of school, cohabitation with a partner, or giving birth to a child.

In our main analysis, we focus on adolescent respondents of Roma descent.13 Furthermore, we restrict our anal-

11. In 2010, before answering the identification questions, respondents were asked repeatedly whether members of their social networks were Roma. It is possible that these questions increased the rates of Roma identification in that wave. At the same time, it is also possible that the spike in Roma identification was triggered by the 2010 election campaign or some other national political event.

12. We prefer linear probability models to nonlinear ones, because they are more flexible with fixed effects and they allow for using sampling weights, an important issue due to unequal sampling probabilities in our case (see, e.g., Wooldridge 2010). Among our robustness checks, we show that our results are similar if estimated by nonlinear probability models. We report estimates from conditional (i.e., fixed-effects) logit models and correlated random effects probit models in appendix B and discuss these results along with our other robustness checks.

13. One concern with our approach is that we define ethnic descent empirically as a predetermined and fixed variable. If parents’ identification
changes through time, then we may misclassify some adolescents as not having Roma descent, because while their parents did not identify as Roma in our interviews, they did so at some other time. Then, some adolescents that we did not include in our final sample (because we classified them as not having Roma descent) might have "obtained" Roma descent later on, and they might have identified as Roma. As it turns out, this measurement error is of limited importance: 1% identified as Roma in either of the waves among the adolescents that we had classified as not having Roma descent, and Roma identification was unrelated to experienced economic hardship for this group.

14 Even though attrition of the survey does not appear to be systematic, the balanced sample is likely to produce more reliable results than the unbalanced one. Of the survey waves with information on ethnic identification of the adolescent respondents, the earlier ones are further apart from each other. Moreover, because of the great recession, a larger share of households experienced severe hardship in the later years, resulting in larger signal to noise ratio in our hardship measures in these waves. These two phenomena—a smaller distance between observations and a stronger signal—are expected to result in more reliable estimates of the panel regression coefficients in the later survey wave than the earlier ones. The unbalanced sample is likely to produce less reliable estimates because it has a disproportionate share of the observations from those earlier survey waves.

Table 2 reports summary statistics on the variables and their changes. Table A2 in the online appendix contains the corresponding statistics for those subset of respondents whom we classified as having Roma descent. We also report the corresponding statistics for those without Roma descent for comparison. Importantly, adolescents of Roma descent were 150% more likely to experience economic hardship, corroborating our argument that hardship is indeed a circumstance characteristic of the Roma.

RESULTS

Table 3 reports the estimated effect of economic hardship on Roma identification among those of Roma descent. The

Note. Weighted by sampling weights.

<table>
<thead>
<tr>
<th>Variable</th>
<th>Roma Descent (%)</th>
<th>Without Roma Descent (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Identified as Roma</td>
<td>52</td>
<td>1</td>
</tr>
<tr>
<td>Experienced economic hardship</td>
<td>49</td>
<td>19</td>
</tr>
<tr>
<td>Age</td>
<td>19</td>
<td>19</td>
</tr>
<tr>
<td>Lives without mother</td>
<td>11</td>
<td>5</td>
</tr>
<tr>
<td>Lives without father</td>
<td>26</td>
<td>24</td>
</tr>
<tr>
<td>Lives at new address</td>
<td>14</td>
<td>10</td>
</tr>
<tr>
<td>Household size</td>
<td>5</td>
<td>4</td>
</tr>
<tr>
<td>Enrolled in school</td>
<td>57</td>
<td>85</td>
</tr>
<tr>
<td>Has child</td>
<td>14</td>
<td>1</td>
</tr>
<tr>
<td>Lives with Roma partner</td>
<td>3</td>
<td>0</td>
</tr>
<tr>
<td>Lives with non-Roma partner</td>
<td>3</td>
<td>1</td>
</tr>
<tr>
<td>Lives with partner of unknown ethnicity</td>
<td>10</td>
<td>1</td>
</tr>
<tr>
<td>Number of observations</td>
<td>2,600</td>
<td>21,908</td>
</tr>
<tr>
<td>Number of respondents</td>
<td>650</td>
<td>5,477</td>
</tr>
</tbody>
</table>

Note. Parameter estimates are from linear probability models, Standard errors in parentheses are clustered at the individual level. FE: panel regressions including person fixed-effects. FD: panel regressions estimated in first differences (all variables entered as changes). Wave fixed effects are included in all specifications. Table A2 in the online appendix contains the summary statistics on the variables and their changes.

* Significant at the 5% level.
coefficient of interest is the economic hardship variable; it is our estimate of the impact of experiencing economic hardship on Roma identification. The first two columns report fixed-effect regressions with and without covariates, while the third and fourth columns report first-differenced linear regressions, again with and without covariates.

The results imply that, among respondents of Roma descent, experiencing economic hardship increases the likelihood of Roma identification by about 6% points, which is a 12% increase from the baseline of 50%. Some of the time-varying variables are also related to Roma identification, even after controlling for individual fixed effects. In particular, we find that being enrolled in school reduces the likelihood of Roma identification, as does moving in with a spouse or a partner who does not identify as Roma himself or herself (and the opposite is true for moving in with a Roma spouse or partner). While these findings are also consistent with our expectations, they should not be interpreted as causal effects: all are related to choices of the respondents, and thus one cannot rule out reverse causality.

We carried out numerous robustness checks using alternative functional forms (fixed effects logit or correlated random effects probit), alternative operationalization of our main variables, different sample restrictions, and estimating each of our models both with and without sampling weights. The results, which are reported in tables B1–B4 in the online appendix, are similar to those presented above across a range of specifications. In additional analyses (tables B5–B7), we found that the effect of material conditions were broadly symmetric in that not only increasing hardship led to a higher likelihood of Roma identification but also improving material conditions led to a decrease thereof. We also found that changes in economic hardship were associated with only “secondary” but not “primary” ethnic identity.

**Heterogeneous effects by the ethnic composition of family**

In the analysis presented above, we did not differentiate among adolescents living in families with different ethnic composition. However, changes in economic circumstances may affect individuals to a different extent depending on the strength of their Roma heritage. Although our simple theory has no separate prediction for the children of common-ethnicity parents versus mixed-ethnicity parents, it is intuitively compelling to expect stronger effects for the latter. Adolescents living with two parents of Roma descent may have more pronounced Roma phenotypes or sociocultural characteristics distinct to the Roma. In contrast, the ethnic identity of individuals with one Roma and one non-Roma parent might be more contingent on economic circumstances because their descent constrains their identity to a lesser extent.15

In order to test this expectation, we broke down our sample to three subgroups based on the ethnic descent of our respondents’ parents. The first group consists of respondents who are of Roma descent through both parents. The second group comprises respondents who live with two parents and are of Roma descent via one parent but not the other. The third group includes respondents who live with a single parent and are of Roma descent via that parent (the identity and ancestry of the other parent remained unknown). Table 4 replicated our preferred specification (with individual and survey year fixed effects, as in col. 1 of table 3) on these three subgroups.

The effect of economic hardship on Roma identification was the greatest among respondents with ethnically mixed parents. In this group, the effect size amounted to a stunning 67% of the baseline probability (Roma identification without economic hardship). The influence of hardship was much smaller, and statistically insignificant, in the case of adolescents with two Roma parents. In between these two are the effects for individuals living with a single Roma parent.16 In sum, the effect of economic hardship was greater for individuals with a smaller baseline probability of Roma identification (see the second row in table 4). These results suggest that the ethnic composition of families indeed exerts an important moderating effect on the influence of economic hardship on ethnic identification.

**THE POLITICAL SIGNIFICANCE OF ETHNIC IDENTIFICATION**

One important question that our results raise is whether changes in ethnic identification are politically relevant. While there is ample evidence showing that identity is indeed consequential for political preferences (Citrin, Reingold, and Green 1990; Klar 2013; Transue 2007), it is unclear how changes in ethnic identity map to political preferences that are thought to be rooted in those identities. Even though we found substantial longitudinal variation in ethnic identification, and some of this variation appears to be systematic, political attitudes, conditional on descent, could still be unrelated to these fluctuations.

To get some traction on this issue, we included some items in the fourth wave of the survey to tap into political attitudes, in particular ones concerning ethnic politics and the Roma in general. We analyzed respondents’ opinions

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15. We thank an anonymous reviewer for this suggestion.
16. We suspect that this is because most of the adolescents who live with a single Roma parent are likely to have two Roma biological parents.
about three policies: first, increasing welfare spending targeted to the Roma; second, allowing bars and clubs to exclude Roma customers; and third, forcing the Roma to live in segregated places. Furthermore, we compare attitudes toward the Roma, based on their agreement with three general statements. First, that the growth of the Roma population poses a security threat for Hungary; second, that the Roma raise more children to get more welfare assistance; and third, that the Roma are genetically more likely to become criminals.

To capture differences attributable to ethnic identification over and beyond descent, figure 1 compares three groups in terms of their support for each of the six policies and statements: respondents who identified as Roma in the interview (black bars); respondents who did not identify as Roma but have Roma descent (gray bars); and finally, those who did not identify as Roma and do not have Roma descent (white bars). If changes in ethnic identification have political significance beyond Roma descent, the answers of respondents who did not identify as Roma but have Roma descent (gray bars) should be different from the answers of respondents who did identify as Roma and have Roma descent (black bars).

The patterns observed in the top panels of figure 1 show just that. Those identifying as Roma exhibit substantively different attitudes toward ethnic politics from those who did not identify as Roma but have Roma descent even though these groups are of the same ethnic descent. They are more supportive of government aid to the Roma, and they are more opposed to policies that seek to segregate or discriminate the Roma. These differences not only point to the expected directions, they are also stunningly large. In the case of welfare spending, even among respondents of Roma descent (black bars) versus those who did not identify as Roma but have Roma descent (gray bars), we see substantial differences. The Roma who identified as Roma in the interview were far more supportive of policies that target Roma than the Roma who did not identify as Roma but have Roma descent. This suggests that ethnic identification may be an important factor in shaping attitudes toward policies that target Roma.

17. Opinions about these policies were gauged using 4-point scales, and we use dichotomized versions of them in our analysis (1 is agreement with policies). Question wordings are as follows: "The Roma should get more welfare assistance than the non-Roma"; "It is good that there still are Roma in Hungary"; "The Roma should be separated from the rest of the society because they are unable to coexist with others."

18. Agreement with these statements was measured with the same scale as above. Questions read as follows: "The growth of the Roma population threatens the security of the society"; "The inclination to commit crimes is in the blood of the Roma"; "The reason why Roma families have so many children is that they want to make a living from the welfare assistance they get after them."

19. Among the respondents we classified to have no Roma descent, roughly 98 respondents (1.1%) identified as Roma in this wave. We suspect that is due to measurement error: we simply failed to code these individuals as Roma because their parents had fewer occasions to express such an identity as the respondents themselves or the Roma identification of these individuals is measurement error in itself. In any case, in this analysis, we simply drop this group from the analysis.

Table 4. Economic Hardship and Roma Identification in Three Subsamples: Fixed Effects Linear Probability Models

<table>
<thead>
<tr>
<th></th>
<th>Roma Descent via Both Parents</th>
<th>Roma Descent via One Parent but Not the Other</th>
<th>Roma Descent via One Parent, Other Parent Unknown</th>
</tr>
</thead>
<tbody>
<tr>
<td>Economic hardship</td>
<td>.017</td>
<td>.122*</td>
<td>.067</td>
</tr>
<tr>
<td></td>
<td>(.033)</td>
<td>(.050)</td>
<td>(.048)</td>
</tr>
<tr>
<td>Baseline probability of Roma identification</td>
<td>.62</td>
<td>.18</td>
<td>.45</td>
</tr>
<tr>
<td>$R^2$</td>
<td>.00</td>
<td>.06</td>
<td>.04</td>
</tr>
<tr>
<td>Number of observations</td>
<td>1,504</td>
<td>744</td>
<td>352</td>
</tr>
<tr>
<td>Number of respondents</td>
<td>376</td>
<td>186</td>
<td>88</td>
</tr>
</tbody>
</table>

Note. Parameter estimates are from linear probability models, weighted by sampling weights. Panel regressions include person and wave fixed effects. Overall sample: balanced panel of respondents with at least one parent identified as Roma or reported to have Roma ancestors. Subsamples: col. 1: two parents in wave A or wave B, both identified as Roma or reported to have Roma ancestors; col. 2: two parents in wave A or wave B, one identified as Roma or reported to have Roma ancestors but not the other; col. 3: one parent in wave A and wave B and that parent identified as Roma or reported to have Roma ancestors. Standard errors in parentheses are clustered at the individual level.

* Significant at the 5% level.
descent, the majority of those who did not identify with that ethnic group were opposed to increasing welfare spending targeted toward the Roma (21.6% supported the policy), while the majority of respondents identifying as Roma supported it (56.9%).

The responses to the items related to prejudice and perceived threat reveal the same patterns. Most of the respondents without Roma descent hold strong anti-Roma attitudes: more than two-thirds think that the growing Roma population poses a threat to the ethnic majority, that the Roma are genetically predisposed to crime, and that the high fertility of Roma mothers reflects instrumental calculations. In the case of each of these attitudes, respondents who do not identify as Roma but have Roma descent are just as far from those who identify as Roma as those who do not have Roma descent to begin with. Hence, it appears to be the case that ethnic identity, as measured in surveys, has important political ramifications, even if one takes ethnic ancestry into account.

These results are consistent with the idea that changes in ethnic identity influence political preferences, even conditional on descent. However, lacking repeated measures of our outcome of interest, we are unable to identify the effect of identity on political preferences from within-person variation. It is possible that this pattern is simply due to unobserved differences related to both ethnic identification and political attitudes. Still, we can capitalize on the panel nature of our data to probe the robustness of our finding.

In particular, we estimated multivariate regressions predicting political attitudes with Roma identification among respondents of Roma descent after adjusting for their identification in the previous wave. The results (reported in appendix C) confirm that respondents of Roma descent not identifying as Roma were more likely to hold prejudiced and exclusionary attitudes against the Roma even after conditioning on their reported identity in the previous wave. This suggests that the association between ethnic identification and expressed policy preferences in one wave is not a

Figure 1. Descent, identification and political attitudes. Shaded areas correspond to percentages agreeing with the statement in groups defined based on descent (no Roma ancestors vs. some Roma ancestors) and ethnic identification. Proportions are based on the sample of respondents with nonmissing responses in wave D. Sampling weights are used.
simple artifact of differences in the baseline likelihood of Roma identification.

CONCLUSION
Our article provides several empirical findings that have important implications for the study of ethnicity and its role in politics. First we found that the ethnic identities individuals claim vary over time, even in the absence of macro-level political events such as elections. This reinforces the constructivist understandings of ethnicity (Chandra 2012) that permits identity change even in the short run. Thus, research theorizing and explaining ethnic identity should broaden its focus to include individual-level factors beyond the study of how political elites can influence the groups that people identify with. In particular, a more complete understanding of ethnic identity would need research on how other types of experiences (e.g., changes in the composition of one’s family, neighborhood or broader social network) shape the way individuals identify themselves.

Second, our results show strong evidence of the micro-level dynamics that connect ethnic identity and social class. We found that individuals experiencing economic hardship become more likely to identify with a marginalized ethnic minority, while those who manage to escape poverty tend to leave their minority identity behind. This finding is crucial as the “sorting” of individuals to ethnic groups based on class can potentially aggravate economic and political inequality between these groups and renders stereotypes based on ethnicity self-fulfilling.

Third, our results demonstrate that the dynamics of ethnic identification are not mere reflections of situational factors or straightforward consequences of conscious choices based on rational calculations. Instead, it seems that changes in embraced identities are rooted in the dynamics of self-perception. We also found that these changes are associated with genuine differences in political preferences and beliefs. Overall, this implies a view of ethnicity as a category that condenses changing individual attributes and whose applicability depends on the congruence of one’s ethnic identity with these attributes.

Our analyses focus on a single ethnic minority in a single country. However, we believe that our core results are likely to travel across borders. Many ethnic and national minorities over the world are associated with social exclusion and poverty, similarly to the Roma in Hungary. Also, while they lack the causal validity of our research design, some research has produced results consistent with the “money whitens” effect (e.g., Davenport 2016; Schwartzman 2007) in other contexts. That being said, a host of institutional, social, and individual-level factors might condition the relationship of ethnic identity with social status.

Moreover, while our study addresses the substantive question of ethnic identity, our theoretical argument about the influence of individual circumstances on identity is not at all specific to identification with ethnic groups. The decades-old idea that individuals tend to identify with groups that they perceive similar could and should be applied to national and political identity as well. Future research thus should seek to find suitable data and credible research designs to examine both the commonalities and differences of this phenomenon across different settings.

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REFERENCES


