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Never Forget the First Time: The Persistent Effect of Corruption and the Rise of Populism in Italy

Arnstein Aassve[a], Gianmarco Daniele[b,*], Marco Le Moglie[a]

[a] *Bocconi University (DONDENA Center for Research on Social Dynamics and Public Policy)*
[b] *Bocconi University (Baffi Carefin)*

Abstract

The paper studies the long term impact of corruption on trust towards institutions. Previous studies have demonstrated that exposure to corruption may lower institutional trust in the short run. Whether those short term effects translate into a persistent effect is not known. We study the onset of a corruption shock that took place in Italy between 1992 and 1994. Using recent data from the Trustlab project, coordinated by the OECD, we find that young first time voters exposed to the corruption scandal still today, 25 years later, exert significantly lower institutional trust. A follow up survey reveals that their exposure to corruption also affected their current voting preferences. In particular, those young first time voters exposed to the corruption were more likely to prefer populist parties at the 2018 national elections.

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[*] Corresponding author.

Email addresses: arnstein.aassve@unibocconi.it (Arnstein Aassve), gianmarco.daniele@unibocconi.it (Gianmarco Daniele), marco.lemoglie@unibocconi.it (Marco Le Moglie)

"There's a reason for the lack of trust in government: corruption"

Christine Lagarde
Managing Director at IMF
The Guardian, March 4th, 2018

1. Introduction

Populist political parties appear to enjoy ever greater support throughout the Western World - a trend manifested by anti-establishment attitudes, and in many cases, a drift towards authoritarian rule (Mudde, 2007).[1] At the same time, a host of indicators suggest that trust to the "establishment" and its institutions, are in decline, and for many nations, the decline has been profound and long lasting. Some argue that Liberal Democracy is facing a severe crisis, and that the old Western order potentially stands to fall. Unsurprisingly, academics and experts alike, now ask why we are seeing such a broad attitudinal shift. Many possible explanations are put on the table. Globalization is one. International trade disrupted traditional industries in the Western World (Colantone and Stanig, 2017; Rodrik, 2018), a trend that many associate with greater social inequality (Dotti Sani and Magistro, 2016). Under this landscape, many populists leveraged on the steady increase of migration flows (Brunner and Kuhn, 2018; Halla et al., 2017; Barone et al., 2016; Hainmueler and Hischox, 2010), in part generated by the refugee crisis triggered by the conflict in Syria (Dustmann et al., 2018; Vertier and Viskanic, 2018). Others have argued that there is a backlash against cosmopolitan values, typically associated with the establishment and an elite class (Inglehart and Norris, 2016). However, this backlash cannot be considered in isolation of recent economic events. Following the financial crisis in 2007, and the ensuing economic recession in Europe, combined with austerity in the countries hit hardest by the crisis, unemployment rose to unprecedented levels (Algan et al., 2017). Moreover, the economic recession and its austerity measures were accompanied by labour market reforms, implying weaker protection for many European workers and an increasing degree of economic insecurity

[1] For instance by looking at the Authoritarian Populism Index produced by the think tank Timbro for 2017, available at Timbro Authoritarian Populism Index 2017.

(Guiso et al., 2017). Consequently, the onset of austerity would quite naturally be interpreted as institutional failure (Guiso et al., 2018), and therefore bring about a worsening of the public's perception of politicians' abilities, both in terms managing public finances (Daniele et al., 2018) and their loyalty (Di Tella and Rotemberg, 2018). In a similar vein, Armingeon and Guthmann (2014) argue that the economic crisis made voters realize that their own institutions were no longer effectively protecting them, which must have lead to a decline in trust (Armingeon and Ceka, 2014).

These arguments bear resemblance to an older claim, namely that perceived corruption (which is perhaps the most common indicator of government performance), brings down institutional trust (e.g. see Figures A.1 and A.2 for the trends in Online Appendix A.1). In the current scenario, this reasoning implies that perceived corruption might be a determinant of the increasing resentment against the establishment and representative democracy. This would not be so unexpected, since there are several excellent examples of political leaders (e.g. Trump in the US), political arenas (e.g. the recent political crisis in Brazil) and political parties (e.g. Podemos in Spain and the Five Star Movement in Italy), in which the anti-establishment view draws a picture of a "corrupt political elite" that ought to be stopped. However, measurement errors and endogeneity make it difficult to establish causal estimates of corruption on populist voting, and might explain why scholars have paid limited attention to the role of corruption in explaining the ongoing wave of populism.[2] In this paper, we exploit the differential effects of a big corruption scandal across different cohorts and type of voters to assess the persistent effects of corruption on support for democratic institutions and moderate parties.

An extensive literature argues that corruption is detrimental for the legitimacy of

[2]The 2018 Brazilian election is a telling example of how difficult it is to assess the electoral effects of corruption. On the one hand, Bolsonaro, the winning populist and extreme right candidate, ran an anti-corruption platform against the previous government, which was widely perceived as being corrupt (https://www.reuters.com/article/us-brazil-election/far-right-bolsonaro-rides-anti-corruption-rage-to-brazil-presidency-idUSKCN1N203K); and this is in line with survey evidence showing that corruption is often the most salient issue among the Brazilians public (Datafolha, 2015). On the other hand, a recent study by Claudio Ferraz (https://www.nexojornal.com.br/colunistas/2018/O-que-causou-o-furac%C3%A3o-da-extrema-direita-nas-elei%C3%A7%C3%B5es?utm_source=socialbttns&utm_medium=article_share&utm_campaign=self) does not find any effect of corruption on voting for Jair Bolsonaro. Even in a context, in which corruption appears a crucial electoral topic, measurement errors restrict ones capacity to estimate to what extent this is really the case.

representative democracy, through its negative effect on attitudes towards institutions (Ares and Hernández, 2017; Solé-Ollé and Sorribas-Navarro, 2017; Morris and Klesner, 2010; Bowler and Karp, 2004; Anderson and Tverdova, 2003; Della Porta and Vannucci, 1997), electoral outcomes (De Vries and Solaz, 2017; Cobb and Taylor, 2015; Chong et al., 2015; Nannicini et al., 2013; Stockemer et al., 2013; Costas-Pérez et al., 2012; Hirano and Snyder Jr, 2012; Ferraz and Finan, 2008) and quality of politicians (Cavalcanti et al., 2018; Bernheim and Kartik, 2014). However, these studies only demonstrate short run effects, or, less frequently, medium term effects. Whether corruption has long term effects is largely unknown. In so far corruption affects attitudes and beliefs in the short run, those effects may either fade as individuals adapt to new regimes of corruption, or they may persist.

Whereas there are no empirical studies showing that corruption can have a long term impact on trust and political behaviors, there are good theoretical arguments for why this may indeed happen: our reasoning is based on the idea that corruption might differently affect individuals' beliefs depending on their age at the time of the corruption scandal. Specifically, we focus on young individuals, as they have more malleable attitudes: the discovery of a widespread-corruption scandal is more likely to affect their beliefs about this phenomenon, as those are still not fully shaped. The idea that youngsters tend to be more impressionable than elders has strong support in psychology, where the phenomenon is referred to as the "sensitive age hypothesis" (Lau and Redlawsk, 2008; Borghans et al., 2008; Sears and Funk, 1999; Sears and Valentino, 1997; Krosnick and Alwin, 1989). Moreover, among young individuals, we focus on first time voters, which are likely to be the most sensitive to failures of the institutional and political system, as in the case of corruption. This is due to their first time eligibility to vote, which entails an unprecedented exposure to politics and political news (Zeglovits and Aichholzer, 2014; Bhatti and Hansen, 2014; Dinas, 2012; Wagner et al., 2012; Franklin and Hobolt, 2011).

By permanently affecting individuals' attitudes, the effect of youth exposure to corruption might eventually extend to individuals' current voting preferences. In so far mainstream moderate parties hold the political power, lower institutional trust will necessarily be harmful to them, whereas those advocating skepticism towards representative democracies might benefit, thereby reaping a larger share of the votes (Algan et al., 2017). By focusing on voting, we aim at establishing a long term effect, in which youth exposure to corruption might permanently drive voters' disaffection toward democratic institutions and moderate parties.

We consider a natural experiment manifested through an unprecedented corruption scandal in Italy that took place in the years 1992 to 1994. The so called "Clean Hands" scandal completely disrupted the Italian political system, leading to the dissolution of the main incumbent parties, and gave rise to corruption charges for about 23% of national parliamentarians. Importantly, it sparked an unprecedented electoral campaign in 1994, which focused heavily on the corruption of the political elite. Using a recent survey launched in 2017 (Trustlab, OECD), which includes a broad set of trust measures, we focus in on the cohort of first time voters when this corruption scandal broke. By comparing this particular cohort with the other cohorts, we find robust evidence that being made aware of corruption has a long-term impact on individuals' trust in government, parliament and bureaucracy. The effect is also substantial, as they have between 15 to 26 percent standard deviation lower trust in such institutions.

These findings are robust to a wide range of specifications and alternative explanations. Moreover, consistent with the established long term effect of the corruption scandal, we find that the same cohort had less favourable attitudes towards institutions both in the short and medium run, a feature we are able to uncover by exploiting alternative surveys undertaken in 1996 and 2001 respectively.

Our original survey does not include data on voting preferences. However, immediately after the Italian 2018 national election, we collected a follow-up survey on the Trustlab sample for Italy, which reached a good take up rate (around 60% of the original sample). We find that first time voters at the time of the "Clean Hands" scandal are more likely to vote for populist parties, especially those at the right side of the political spectrum. This effect has to be interpreted in the light of the Italian political arena, in which populist-right wing parties have successfully gathered the consensus lost by mainstream-moderate parties. The probability of voting for a populist party at the 2018 elections is 9% higher for those being first time voters when the Clean Hands scandal erupted. Therefore, youth exposure to corruption seems to affect also current political preferences, as measured by current voting choice.

In the next section we describe our framework, the natural experiment, the data and the methodology. In Section 3 we report our main findings on institutional trust and we analyze the effect of corruption in the short and medium term. Section 4 focuses on the effect on voting preferences in 2018. Finally, Section 5 concludes.

2. A Natural Experiment for First-Time voters

2.1. The Natural Experiment

At the beginning of the 90s' the "Clean Hands" investigation revealed the biggest corruption scandal in Italian modern history, consisting in a vast and established corruption scheme, in which public procurement were systematically assigned in exchange for illegal contributions to political parties (Newell, 2000). About 23% of the Italian parliamentarians were charged with corruption or other related crimes and national politicians were charged in 19 out of 20 regions (Figure 1, panel (a) shows the increase in charges compared to previous electoral terms). The two incumbent parties, the Christian Democrats (DC) and the Italian Socialist Party (PSI) were particularly exposed and hard hit (i.e. around 75% of the MPs were involved in the corruption scheme, see Figure A.3). The scandal lead in fact to the dissolution of both parties. The Christian Democrat party had ruled Italy since 1948, and historians refer to this event as the end of the Italian First Republic (Gundle and Parker, 1996). It was also a scandal that was extensively covered by all the main media outlets at the national and at the local level, as shown in Figure 1. Figure 1, panel (b) shows the number of front pages of the most read Italian newspaper (*Corriere della Sera*) devoted to corruption from 1990 to 1997. During the peak of the scandal in 1993, almost 90% of all front pages covered the "Clean Hands" scandal. To put it into perspective, Panel (c) compares the share of Italian books mentioning corruption (*Corruzione*) and football (*Calcio*), by far the most popular sport in Italy. Here the popularity of corruption as a topic, clearly outweighs that of football during the height of the corruption scandal. Finally, panel (d) includes the daily number of minutes devoted to political corruption on Italian Public TV and radio channels (i.e. RAI) from 1985 to 2015. Importantly, RAI was the main TV broadcaster in this period. The figure shows a striking pattern: political corruption was completely missing on Italian TV up until the "Clean Hands" scandal. For the first time, corruption became, not only an important topic, but the most salient topic in the media. Over the following years, and even up until the current time, political corruption has remained a salient topic, although it has never again reached the same popularity as during the "Clean Hands" period. In our setting, this scandal represents an ideal natural experiment, since the likelihood to be a first-time voter just at the time of the scandal, which corresponds to our treatment, depends exclusively on the year of birth and the age requirement to be eligible to vote.

2.2. Hypothesis

Our reasoning is based on two ideas which provide a possible source of exogenous variation at individual level both in the sensitivity and the exposure to the scandal. The "sensitive age hypothesis" argues that the propensity of beliefs and attitudes to change, differs according to age, highlighting the potential long lasting impact of specific events experienced during childhood or young adulthood.[3] Several studies have validated this theory in different contexts, showing that patterns of beliefs may be distinctive across generations due to cohort-specific differences in economic, social and institutional environment (Roth and Wohlfart, 2018; Alison et al., 2018; Giuliano and Spilimbergo, 2014; Dinas, 2013; Madestam and Yanagizawa-Drott, 2012; Schuman and Corning, 2012; Erikson and Stoker, 2011; Osborne et al., 2011; Firebaugh and Chen, 1995; Russell et al., 1992). In the political context, Bartels and Jackman (2013) provide a theoretical framework in which the political attitudes and beliefs of specific birth cohorts may vary, and change differently across time, due to the interaction of age-specific weights with period-specific shocks.

Secondly, the "first time voter hypothesis" makes a similar argument. Individuals participating in their first election, receives an informational political shock, making them more exposed to important political events occurring at that time, and in particular in the pre-electoral period (Ohme et al., 2017; Zeglovits and Aichholzer, 2014; Bhatti and Hansen, 2014; Wagner et al., 2012).[4] Indeed, early studies show that first-time voters are more likely to learn and be influenced by campaign-related information than voters who have already participated in election in the past (O'Keefe and Liu, 1980; Colwell Quarles, 1979; Winick, 1978). In line with this view, recent studies also show that, the younger the first-time voters are, the higher is their participation to vote (Bhatti and Hansen, 2014; Bhatti et al., 2012), thus possibly increasing even further their degree of responsiveness to political news during the electoral campaign.

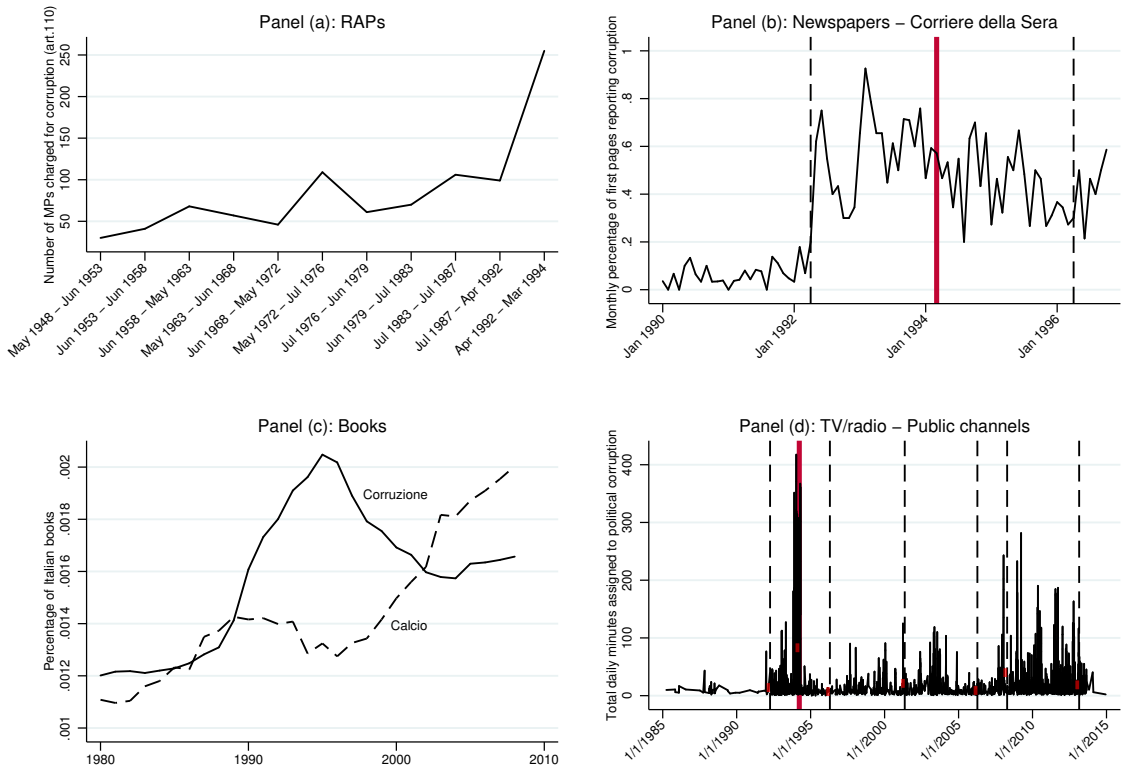
The combination of these two ideas leads to our expectation that the "Clean Hands" scandal might permanently affect first-time voters at the 1994 election by depressing

[3]Those effects can extend across generations: this is the case when collective reputation generate historical path dependence in the incentives affecting the members of a group, leading new members to possibly suffer from bad behaviors of their older peers long after these lasts are gone (Tirole, 1996).

[4]In Section 3.2, we provide some evidence in line with this assumption showing that first-time voters at the time of the scandal are more likely to be interested in politics and informed about it.

their support for liberal institutions. This is the case as, among young individuals, i.e. those with the most impressionable beliefs, first-time voters are the most likely to be exposed to the scandal through political news. Importantly, we are not assuming that the scandal only affected first-time voters, as the effects might have extended to the entire population, but rather that they were the most affected and therefore more likely to persistently change their attitudes towards institutions accordingly.

Figure 1: Media Coverage of Corruption in Italy



Note: Panel (a) shows the number of *Requests for the Authorization to Proceed (RAPs)* regarding cases of corruption submitted to the vote of Parliament by the judicial authority in each of the first eleven legislative terms of the Italian Parliament. Panel (b) shows the monthly percentage of articles about corruption appearing in the first page of *Corriere della Sera* during the period 1990-1996. The red vertical line signals the date of the national election following the discovery of the scandal, while the other two vertical black-dashed lines indicate the times of the other electoral dates within the period 1992-1996. Using information drawn from digitized books by *Google*, panel (c) shows the yearly percentage of Italian books mentioning "Corruzione" (i.e. Corruption, the continuous line) and "Calcio" (i.e. soccer, the dashed line) for the period 1985-2008. Panel (d) shows the total daily minutes assigned to political corruption within the broadcasts of Italian public television and radio channels (i.e. RAI) during the period 1985-2014. The red vertical line represents the date of the national election following the onset of the scandal, while the vertical black-dashed lines all the other electoral dates within the period 1992-2014. The short red horizontal lines provide the average number of minutes assigned to political corruption by public TV/radio broadcasts within 90 days before each national electoral date.

2.3. Data

Our empirical analysis relies on the Trustlab dataset. Trustlab is a coordinated effort by OECD to collect nationally representative data of trust and political beliefs in a comparative setting. It relies on a web platform, which includes a battery of survey questions concerning trust and other attitudes (for details see Figure A.4 in Online Appendix A.2). The first round of data collection was done for France, Korea, US, Germany, Slovenia, UK and Italy. For this analysis, we use the Italian sample of 1458 respondents, which was surveyed in 2017. This dataset contains several key advantages for our analysis: i) it was run 25 years after the beginning of "Clean Hands", allowing us to assess if the scandal has long terms consequences; ii) it includes a representative sample of the Italian population for different age groups; iii) it provides a wide set of variables capturing attitudes towards institutions and political beliefs (see the next section) and a comprehensive set of control variables, many of which are not typically available in surveys measuring trust (e.g. personality traits); iv) it allows testing the robustness of our findings since similar surveys are available for other OECD countries that did not experience a corruption scandal. Moreover, a follow-up survey of the Italian sample was undertaken in March 2018, immediately after the Italian election, which led to the coalition government between the two populist parties, the Five Star Movement, and the Lega. Taking advantage of the electoral timing, the follow-up survey collects self-reported data on voting at this election, which allows testing the effect of corruption on political behaviors. We provide more details on this survey in Section 4, whereas the upper part of Table 1 show the summaries for the entire Trustlab sample (i.e. including also the follow up survey).

Finally, since the Trustlab survey was conducted in 2017, and hence enables a test for long term consequences, a crucial test is to see if the cohort of first time voters during the corruption scandal also had lower trust in the short and the medium terms. For this purpose we additionally use data from the Italian National Election Studies in 1996 and 2001. Details of these surveys are provided in the Online Appendix A.3, while summary statistics for both surveys are presented in the bottom part of Table 1.

Table 1: Summary Statistics

	Obs.	Mean	Std. Dev.	Min	Max	Other coh.	T coh.	Diff.	t-test (P-val.)
TRUSTLAB									
Trust Parl.	1,450	3.23	2.25	0	10	3.25	3.04	-0.21	0.277
Trust Gov.	1,449	3.32	2.36	0	10	3.37	2.90	-0.47	0.021
Trust Civ. Serv.	1,447	4.27	2.21	0	10	4.30	4.02	-0.28	0.140
Inst. efficiency	1,444	4.05	2.29	0	10	4.10	3.66	-0.43	0.029
Inst. forward-looking	1,366	4.36	2.29	0	10	4.41	3.92	-0.49	0.018
Inst. integrity	1,412	3.99	2.25	0	10	4.03	3.61	-0.43	0.032
Inst. transparency	1,419	3.47	2.24	0	10	3.51	3.11	-0.41	0.039
Turnout	886	0.85	0.36	0	1	0.85	0.85	0.00	0.945
Populist parties	715	0.65	0.48	0	1	0.64	0.76	0.12	0.042
Female	1,458	0.66	0.47	0	1	0.65	0.68	0.03	0.532
Catholic	1,458	0.75	0.43	0	1	0.74	0.80	0.06	0.133
Income (quintiles)	1,458	2.74	1.52	1	5	2.73	2.85	0.12	0.351
Education	1,458	2.26	0.59	1	3	2.26	2.26	0.00	0.989
N. children	1,458	0.82	0.99	0	8	0.79	1.15	0.37	0.000
Employed	1,458	0.55	0.50	0	1	0.54	0.63	0.09	0.030
Emp. priv. sec.	1,458	0.48	0.50	0	1	0.47	0.55	0.08	0.070
Married	1,458	0.54	0.50	0	1	0.52	0.73	0.21	0.000
Agreableness	1,457	3.90	0.68	1	5	3.90	3.93	0.02	0.678
Consciousness	1,456	3.79	0.67	1	5	3.79	3.83	0.04	0.492
Extroversion	1,457	2.95	0.82	1	5	2.94	3.05	0.11	0.127
Openness	1,455	3.62	0.77	1	5	3.63	3.55	-0.08	0.230
Neuroticism	1,457	3.14	0.85	1	5	3.14	3.11	-0.03	0.653
ITANES									
Distrust in democracy	2,450	0.10	0.30	0	1	0.09	0.18	0.09	0.000
Read news on politics	2,501	0.73	0.45	0	1	0.72	0.79	0.06	0.090
Interest in politics	2,498	0.48	0.50	0	1	0.48	0.50	0.03	0.557
Trust Parl.	2,691	0.48	0.50	0	1	0.49	0.44	-0.05	0.200
Lega is the closest party	1,928	0.07	0.26	0	1	0.07	0.05	-0.02	0.438
Vote for Lega at 1994 el.	2,329	0.07	0.25	0	1	0.07	0.05	-0.02	0.295
Vote for Lega at 1996 el.	2,062	0.08	0.27	0	1	0.08	0.06	-0.02	0.504
Opinion on Umberto Bossi	2,450	3.33	2.53	1	10	3.35	3.13	-0.22	0.305

Note: The table shows the summary statistics for both the Trustlab sample and ITANES sample. In particular for each dependent and independent variable it provides the general mean, the standard deviation, the minimum, the maximum, the mean for the T cohort, the mean for the other cohorts, the difference between the two means and the p-value of a t-test on such difference.

2.4. Estimation

The treatment group for our analysis is the cohort of those individuals who were first time voters during the "Clean Hands" corruption scandal. Importantly for our estimation, two national elections took place in this period, one right at the beginning of "Clean Hands" scandal, when its consequences were still inconceivable (on 5th April 1992), and another at the peak of the scandal on 27th March 1994. Specifically, as explained in Section 2.1, the scandal started in February 1992. However, the impact of the scandal was negligible before the 1992 elections, which took place at the beginning of April. This pattern is clearly visible looking at the media coverage of the scandal in Figure 1. This trend is also well documented by Giglioli (1996), who reports that corruption coverage was extremely low in Italian newspapers in February and March 1992, implicitly assigning a very limited relevance to these events. We therefore exploit this window to test whether the scandal affects the political beliefs of first-time voters at the 1994 national election. Our main set of outcomes includes three dependent variables, measuring individuals trust towards liberal institutions. Specifically, we consider individuals self-declared levels of trust in the National Parliament, in the National Government and towards Civil Servants. The scale of these variables runs from 0 (lowest trust) to 10 (highest trust). Online Appendix A.2 contains further details on the exact wording of each of these variables.

In the main specification, we run a linear regression model to estimate via OLS the following equation:

$$Y_i = \alpha + \beta T_i + \nu \mathbf{X}_i + u_i \tag{1}$$

where Y is one of the three dependent variables for individual i, $\boldsymbol{X}$ is a set of control variables which are listed in Table 1. T is our variable of interest, a binary variable that equals 1 for all individual born in 1974, 1975 or 1976, who were 18, 19 or 20 years old in 1994, at the time of the first national election after the discovery of the corruption wave.[5] Note that this is the only cohort of first-time voters affected by the scandal, as the scandal exploded after the 1992 national election and almost ended after the 1994 elections. Given the unavailability of the individuals' actual birth date we inferred their year of birth from the age they have at the time of the survey (i.e. October 2017). This might eventually leads to an underestimation of our effect, as we include in T, both some

[5]In particular these cohorts together represent 10% of the sample, including 150 individuals.

individuals born in 1974 who were already first-time voter at the previous elections in 1992 (those born between January and March 1974) and some others born in 1976 who were still not eligible for the 1994 elections (those born between April and September 1976).[6]

Since our treatment group is defined by age, we cannot control for this variable in our specifications. Conversely, we can control for generational effects: we introduce a variable *Generation*, which takes the same value for individuals born in the same decade. This is in line with the idea that attitudes tend to change across generations rather than within them. Different definitions of this control variable (or its exclusion) do not affect our findings however.

Figure 2 reports the density distribution of the dependent variables for T and for the other cohorts. A quick look at these distributions already reveals a general higher tendency towards lower levels of institutional trust for our cohort of reference (i.e. T) with respect to all the others.

We complement the above estimation with the one proposed in Equation 2, in which we introduce a vector of binary variables gathering individuals based on the first election e in which they were eligible to vote. This design allows to compare individuals who were exposed to different electoral campaigns during their first vote.

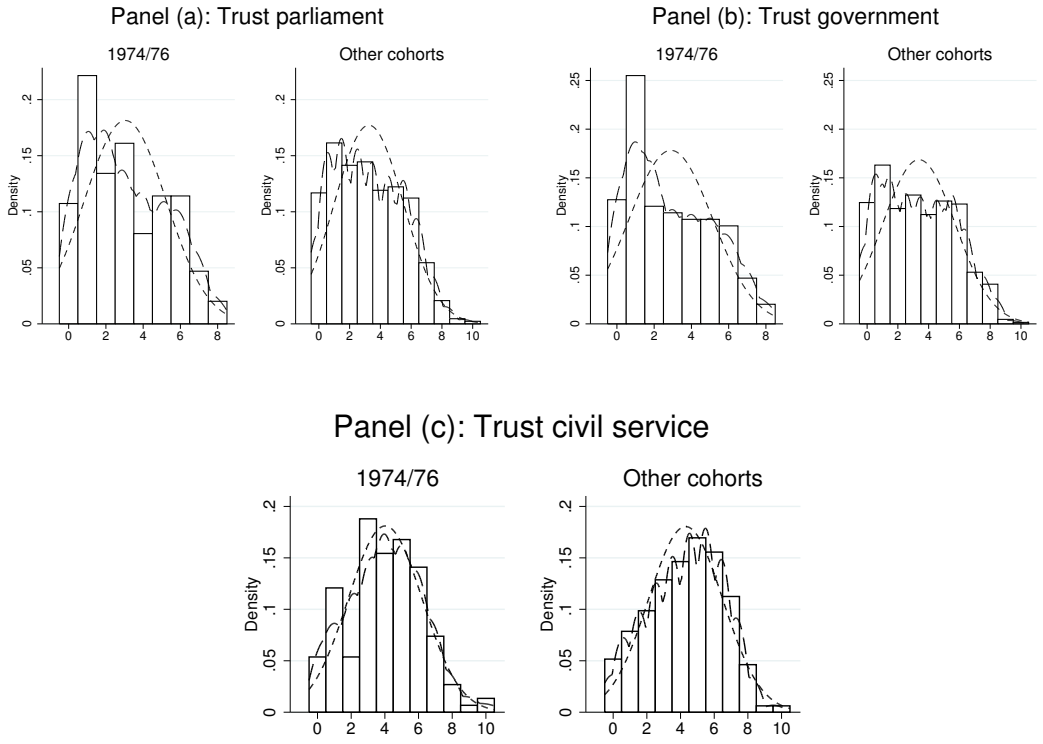
$$Y_i = \alpha + \beta \mathbf{First\ Time}_i^e + \nu \mathbf{X}_i + u_i \tag{2}$$

Also in this case, the unavailability of the actual birth date and the occurrence of elections in the middle of the year, force an assumption about the definition of first-time voters at each election. Here we consider as first-time voters at the 1994 elections only those born in 1975 or 1976 and we construct all the other groups consequently.[7] In turn, the reference category includes first-time voters at the election before the scandal, i.e. individuals born in the period 1970-1974 who went voting for the first time in 1992. This means that in this specification we are including individuals born in 1974 within the control group although some of them were actually first time voters at the 1994 elections, while we are still considering as treated those born in 1976, who instead became in part

[6]The bias does not extend to individuals born between October and December 1976 as the survey took place in October, and age was collected referring to individuals' age at the time of the survey.

[7]How the people are grouped, as well as the distribution of individuals across each groups, are showed in Table A.1 in the Online Appendix

Figure 2: Density Distribution of the Outcome Variables



Note: The figure shows the density distribution of trust in parliament (Panel (a)), trust in government (Panel (b)) and trust in civil servants (Panel (c)) within the T cohort (i.e. left side of each panel) and the other cohorts (i.e. right side of each panel).

first-time voters only at the 1996 elections. In other words, for each election, we are including as first-time voters all individuals born in that specific electoral year.

This choice is motivated by two considerations. First, the combination of the sensitive age hypothesis and the first-time voter hypothesis naturally points towards a general decreasing size of the impact of first-time voting with respect to the age at which the individuals vote for the first time (Bhatti and Hansen, 2014; Bhatti et al., 2012). Second, individuals born between April and September 1976[8], who were not eligible at the 1994 elections, represent a cohort that could be influenced by the "Clean Hands" scandal. Indeed, they might have been exposed to the 1994 electoral campaign through several channels, such as peer-effects at school (Ajilore and Alberda, 2017; Campos et al., 2016)[9]. Conversely, individuals born between April and September 1974 might have been already exposed to the 1992 electoral campaign through the same channels, so partially narrowing their differential exposure to the scandal as first-time voters at the 1994 elections. In line with the relevance of peer-effects, survey data show that first time voters at the 1994 elections had a very high propensity of discussing politics with their peers.[10] Nonetheless, we test the robustness of the main results of our analysis with respect to several alternative definitions of both the treated and the control group.

Given what said so far, a causal interpretation of our findings would rely on a set of assumptions. First, we can quite safely assume the exogeneity of the scandal with respect to first-time voters at the time of the scandal. Second, based on our theory, we expect the shock to have a differential but persistent shift in attitudes towards institutions for the cohort of first-time voters at the time of the scandal. Third, we assume that any effect on this cohort would be due to this scandal, which took place 25 years earlier. To validate this hypothesis we will show that the effects are traceable over time, immediately after the scandal and in the medium run. We also assess whether other events could have affected this cohort. While we directly control in our specification for generational

[8]As explained above, those born after October are not considered as born in 1976 because we record their age at the time of the survey, which took place in October.

[9]For a review on political peer-effects among young individuals, check Settle et al. (2011).

[10]Those data have been collected in the 1996 wave of the Italian National Election Studies. Specifically, we consider a question asking whether individuals discuss politics with other people. Among individuals in our treated cohort, 50% reply to primarily discuss politics with their friends. This is the most selected answer (other selected answers are: 26% discuss politics with their relatives and 23% with their colleagues).

effects, we will empirically test for the most likely alternative events (see the Online Appendix A.4).

3. The Long-Term Effect of Corruption on Institutional Attitudes

3.1. Main Results

Table 2 shows the estimates of Equation 1, which includes the complete set of controls and province fixed effects.[11] Columns 1 to 3 show that first-time voters during "Clean Hands" have substantially less trust towards institutions 25 years after the scandal. The effect is sizable, going from 15% of a standard deviation for trust in parliament to 26% of a standard deviation for trust in government.

Figure 3 shows the estimated coefficients of Equation 2 for each of the cohort of first-time voters in our dataset. The reference category is the cohort of individuals who were at the polls for the first time in 1992. Panels (a) (trust in parliament), (b) (trust in government), (c) (trust in civil servants) show in a rather striking way that the individuals within the treatment cohort (i.e. those born in 1975-1976) are outliers compared to those who went to vote for the first time in 1992 (i.e. those born in 1970-1974), and to most of the preceding and following cohorts. Overall, these findings strongly suggest that "Clean Hands" represents a breaking point for the generation of first-time voters at the time of the scandal, permanently depressing institutional trust.

While in the next section we focus on the effects of the scandal in the short and in the medium run, Online Appendix section A.4 complements the main analysis with several robustness tests.

First, given the usual occurrence of the Italian national elections in the middle of the calendar year, and the unavailability of the actual birth date for each individual, we run a set of different versions of the specification with leads and lags presented in the Equation 2 to test the sensitivity of our definition of treated and control cohorts. In particular, instead of grouping individual according to their first-time vote, we group them by: i) three-years birth cohorts, starting from our treated cohort (1974-76); ii) groups of first-time voters, considering as first-timers in each election only those whose became eligible to vote at most the year before the elections took place: this implies

[11] Including or not province fixed effects in the regressions leaves almost unaffected both the estimates and the conclusions of our study. Thus, for the sake of brevity, we avoid to show the estimates produced without their inclusion.

considering as treated, only individuals born in 1974 and 1975. We show the results of these tests in Panels (a)-(c) of Figures A.5 and A.6. Although more noisy in some specifications, possibly because of the reasons described in the previous section, all the coefficients are in line with those presented in the main analysis.

Second, we incorporate additional Trustlab samples from France, Korea, US, UK, Germany, and Slovenia and re-estimate Equation 2. In this case, while our treated group is unchanged, we can now precisely control for age, considering individuals born in 1975-1976 in other countries. Our main findings are confirmed for trust in the Parliament and in the National Government, while we do not find an effect on trust towards Civil Servants. (Figure A.7).[12]

Third, in Table A.2 and Figure A.8, we find similar results when looking at alternative measures of institutional attitudes, i.e. opinions towards institutions' efficiency, objectiveness, integrity and transparency. Importantly, we find a negative effect on institutional integrity, a proxy of institutional corruption, closely linked to our theory. Conversely, as a Placebo test, we do not find any effect on trust towards other institutions not immediately related to the "Clean Hands" scandal (Table A.3), such as the media, the financial institutions and other individuals (social trust).

Fourth, we discard alternative explanations of our main findings. The empirical analysis provided in Online Appendix A.5 rules out the effect of two other important events taking place in Italy during this period and overlapping the "Clean Hands" investigation: several terrorist attacks perpetrated by the mafia and a period of a severe economic crisis. In addition to that, the 1994 national elections saw both the collapse of the parties (e.g. DC), which ruled Italy up to the "Clean Hands" scandal and the entry of Sivlio Berlusconi in the political arena. One could argue that our findings might be linked to these events. The disruptive and sudden reshape of the political party system and the presence within the political scenario of an "ambiguous" individual as Berlusconi, in terms of corruption attitude, might then have led to lower institutional trust. While we do not neglect the importance of these hypothesis, we consider them part of our argument, since the collapse of the DC and the entry of Berlusconi in politics were essentially driven by the "Clean Hands" scandal. As such, we might have estimated the overall effect of a large corruption scandal and its broader implications. Moreover, while the collapse

[12]In this case we cannot control for regional fixed effects since this information is available only for Italy, thus we control only for country fixed effects.

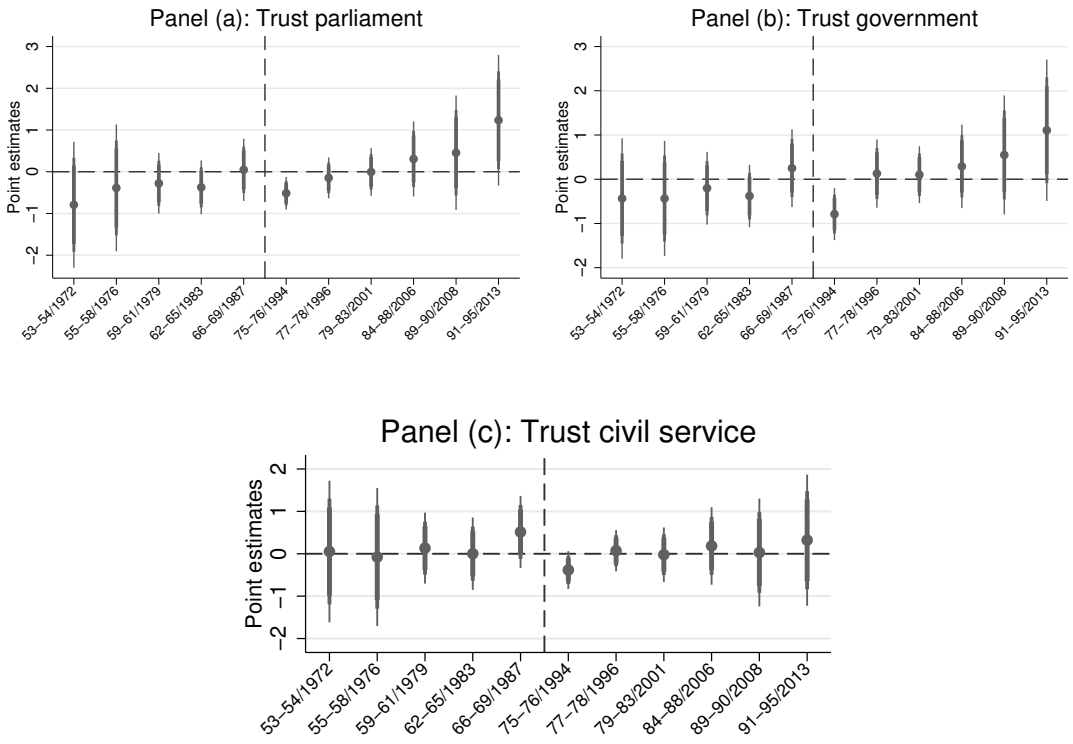
of the incumbent parties might have represented a shock for Italians used to vote them for decades, this reasoning is less relevant for first-time voters, who never casted a vote. Finally, someone could argue that exposure to Berlusconi's TV during the 1990s is a crucial mechanism explaining long term changes in institutional trust. Although we do not neglect either this mechanism, as shown by Durante et al. (2018), we consider that this channel should generally affect young individuals at the time of the scandal and not specifically only those born in 1975-1976, as suggested by our theory.

Table 2: The Impact of "Clean Hands"

	(1) Parl.	(2) Gov.	(3) Civ. Serv.
1974/76	-0.340*	-0.628**	-0.456***
	(0.182)	(0.235)	(0.105)
Contr.	YES	YES	YES
Prov. FE	YES	YES	YES
Obs.	1,438	1,437	1,435
R^2	0.105	0.111	0.152

Dependent variable: Trust in parliament (col. (1)), trust in government (col. (2)) and trust in civil servants (col. (3)). The main independent variable *1974/76* is a dummy taking the value 1 for individuals born in 1974, 1975 or 1976 and 0 otherwise. All columns use an Ordinary Least Square (OLS) regression model to estimate Equation 1. All columns include time-varying controls and provincial fixed effect. The controls are gender, decade of birth, religion, education, income, personality traits, marital status, number of children, labor force status, if the individual works in the private sector and if the individual belongs to the boosted sample. Standard errors are robust to heteroskedasticity and clustered at the year of birth level. *, **, *** indicate statistical significance at the 10%, 5%, and 1% levels, respectively.

Figure 3: The Effect of "Clean Hands" by Groups of First-Time Voters



Note: The figure shows the point estimates and the confidence intervals at 90% (i.e. least-wide spikes), at 95% (i.e. medium-wide spikes) and at 99% (i.e. widest spikes) for each group of first-time voters specified in Equation 2. The dependent variables are trust in parliament (Panel (a)), trust in government (Panel (b)) and trust in civil servants (Panel (c)).

3.2. Short-term dynamics

Our hypothesis concerns the long term consequences of corruption. If there are long terms effects, it would indeed be intuitive that there are both short run and medium run effects for this cohort as well. In other words, it would be implausible if the long run effect is not preceded by short and medium run effects. To get insight into this aspect, we use data from the Italian National Election Studies, which included questions on trust towards institutions in 1996 and 2001 on a representative sample of Italians. We provide more details on this survey in Online Appendix A.3.

In this case, we focus on the most similar outcomes available in the 1996 edition of this survey, i.e. opinion toward democracy, and trust in parliament, which is available in the 2001 edition. An important aspect when considering the short run however, is that any negative effect of corruption tend to capture a broader set of individuals than those who are first time voters in the 1994 elections. Table 3 and Figure 4 report the results. As expected, when looking at these outcomes, we find comparable coefficients in terms of size but not limited to T: the effects are broader in the sense that also other cohorts close to T react to the scandal. We find that right after "Clean Hands", young people are more likely to retain dictatorship to be sometimes better than democracy (i.e. Panel (a)). Moreover, the results from the 2001 edition (i.e. Panel (b)) show that young individuals are less likely to trust the national parliament.

Still using the data from ITANES, we also provide a quantitative assessment of our main working hypothesis, that is the higher degree of exposure to politics experienced by young first-time voters. Indeed, according to the last two columns of Table 3, and the bottom panels in Figure 4, first time voters at the time of the scandal were indeed more interested in politics (i.e. Panel (c)) and read more about political news (i.e. Panel (d)).[13]

Overall, all these findings show that for T, we are capturing a long lasting change in institutional trust, which arose right after the scandal and persisted over time. Conversely, "Clean Hands" had only a transitory effect on the cohorts close to T. The fact that the long term effects persist only for T corroborates our theory that young individuals were exposed to the shock but to a lesser extent compared to young individuals belonging to the first-time voters group.

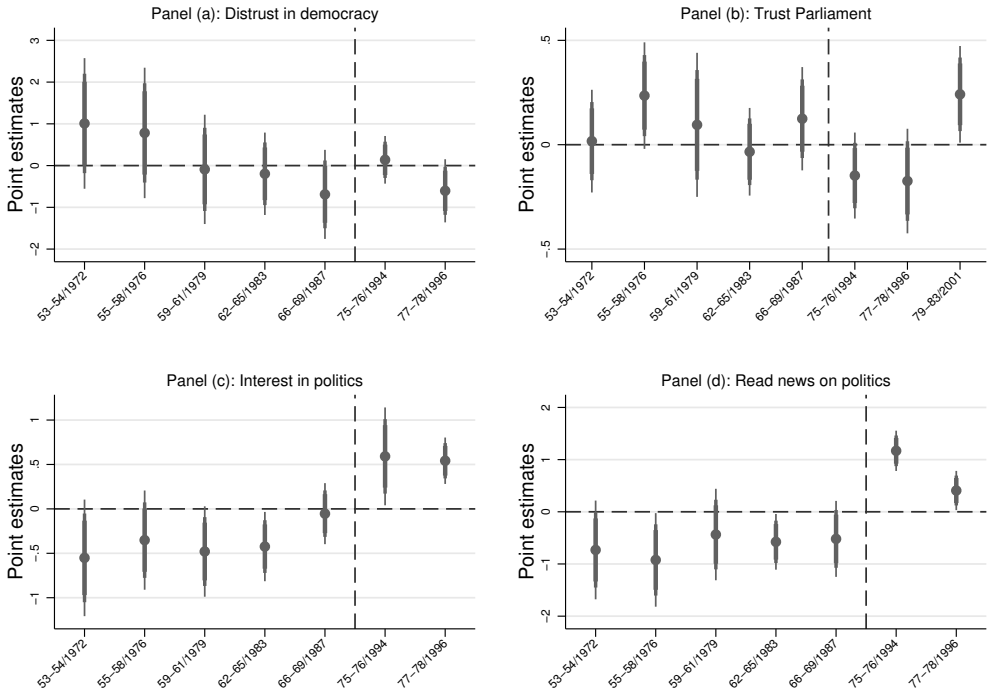
[13]Since the dependent variables of Panel (a), (c) and (d) are dichotomous, the results for these specifications are obtained by using Logit estimation instead of OLS.

Table 3: Short-Term Effect of "Clean Hands"

	(1) Distrust Dem.	(2) Trust Parl.	(3) Pol. Int.	(4) Pol. News
1974/76	0.475*	-0.163***	0.408	0.830**
	(0.255)	(0.029)	(0.251)	(0.391)
Wave	1996	2001	1996	1996
Contr.	YES	YES	YES	YES
Region FE	YES	YES	YES	YES
Obs.	1,850	2,048	1,882	1,883

Dependent variable: Sometimes/always dictatorship is better then democracy (col. (1)), Trust the Parliament (col (2)), Interested in politics (col. (3)), read news about politics during the last election campaign (col. (4)). The results showed in columns (1),(3) and (4) rely on the 1996-wave of ITANES, while column (2) on the 2001-wave. *1974/76* is a dummy taking the value 1 for individuals born in 1974, 1975 or 1976 and 0 otherwise. Columns (1), (3) and (4) use a Logit regression model to estimate 1 while column (2) uses Ordinary Least Square (OLS). All columns include time-varying controls and regional fixed effect. Among the set of controls there are gender, decade of birth, religion, education, social class, marital status, number of children and the labor force status. Standard errors are robust to heteroskedasticity and clustered at the year of birth level. *, **, *** indicate statistical significance at the 10%, 5%, and 1% levels, respectively.

Figure 4: The Effect of "Clean Hands" in the Short and Medium Run by Groups of First-Time Voters



Note: The figure shows the point estimates and the confidence intervals at 90% (i.e. least-wide spikes), at 95% (i.e. medium-wide spikes) and at 99% (i.e. widest spikes) for each group of first-time voters specified in Equation 2. The dependent variables are Sometimes/always dictatorship is better then democracy (Panel (a)) and trust in Parliament (Panel (b)), interest in politics (Panel (c)), if individuals read news about politics (Panel (d))

4. Institutional Distrust and the Vote for Populist Parties

As explained in the introduction, the effects of "Clean Hands", undermining institutional trust might extend to distrust and ailing support for mainstream political parties. In this Section we investigate whether the first-time voters at the time of the scandal are currently more likely to vote for populist parties. We use the information from the follow-up survey conducted on the Italian Trustlab sample after the national electoral round in March 2018. The survey asks the respondents whether they voted or not, and for which party they voted for, at the national election, which took place only a few days before the follow-up survey was conducted. From this information, we construct a dummy which is equal to 1 if the individual voted at the election and 0 otherwise.

In addition, we construct a further dummy capturing whether an individual voted for a populist party in general. To distinguish between populist and mainstream parties we rely on the Chapel Hill Expert Survey of 2017.[14] Unfortunately, the Chapel Hill Expert Survey does not cover all parties running at the 2018 elections. We have thus classified the remaining parties based on electoral platforms available on their websites.[15] Finally, for each of the seven most voted parties, we construct another dummy variable which equals 1 if an individual reported to have voted for that party and 0 otherwise[16].

Although the take up rate of the follow-up survey was quietly high (around 60%)[17], the representativeness of the sample might no longer hold. To check whether this is the case, we compare people who responded to the follow-up survey with those who did not. Specifically, we run a set of t-tests on the difference in each covariate between the two groups. The results of this check are presented in Table 4, and show very few significant differences between the two groups. Specifically, our treated group is not disproportionately represented in the follow up, as well as most of the covariates. Individuals are somewhat older in the follow up[18], in turn more likely to be married, and show a lower degree of both openness and employment in the private sector.

By using the dummies previously introduced as dependent variables, we run a set

[14]In particular, we use the information coded in the "People vs. Elite" question, which asks the experts to evaluate the parties' position on direct vs. representative democracy issue on a scale going from 0 (i.e. *Elected office holders should make the most important decisions*) to 10 (i.e. *"The people", not politicians, should make the most important decisions*). We consider as populist all the parties scoring equal or higher than 6, that is *Lega*, *Movimento 5 Stelle*, *Fratelli d'Italia*, *Casapound*, *Potere al Popolo* and *Il Popolo della Famiglia*.

[15]These parties are: *+Europa*, *Civica Popolare*, *Italia Europa Insieme*, *Liberi ed Uguali*, *Potere al Popolo*, *Casapound* and *Popolo della Famiglia*. For their classification see Online Appendix A.3.

[16]Our choice to only focus on the most voted parties is driven by the absence of a sufficient number of observations (i.e. less than 10) to properly run the regressions on minor parties. Among the most voted parties there are *Liberi ed Uguali*, *Partito Democratico*, *Movimento 5 Stelle*, *Lega*, *Forza Italia*, *Fratelli d'Italia* and *+Europa*

[17]In fact, the original take up rate was above 70%. Unfortunately, 10% has been dropped due to inconsistencies in the identity of the respondent across the two rounds of collection. Such inconsistencies may eventually depend to human mistakes in compiling the questionnaire, and/or actual changes in the identity of the respondents.

[18]This is not a concern as the difference is driven by an under-representation of the youngest cohorts, which are far from our treated group.

of Logit regressions including the same control variables of Equation 1.[19] The results of these estimations are presented in Table 5, while Figure 5 graphically reports the coefficients for each group of first-time voters with respect to the vote for populist parties. In both cases, we expressed the coefficients in terms of odds ratio to make easier their interpretation, and in the middle part of Table 5 we also calculate the average marginal effect for our treated cohort.[20]

Concerning individual turnout in column 1 of Table 5, we do not find any effect. Conversely, according to column 2, our cohort of first time voters, displays a higher probability of voting for a populist party. We find a 9% higher probability of voting for populists for those born in the period 1974-1976 than for the other cohorts. This finding is confirmed by Figure 5, in which the treated cohort (i.e. 1975-76) is the only statistically significant one.

Lastly, the analysis presented from columns 3 to 9 aims to identify which populist party received more votes from the treatment cohort. At the same time, we also look at which of the mainstream parties lost more in terms of the share of votes. Table 5 reports the vote for populist parties in columns 5, 6 and 8 while that for mainstream parties in columns 3, 4, 7 and 9. The effect is partly driven by the populist right party, *Lega*, which was among the winners of the 2018 elections. Among the mainstream ones, the one representing the incumbent government at the time of 2018 elections, i.e. *Partito Democratico*, is the one that was most negatively affected with a decrease in support from the treated cohort or around 6%.[21] The support for right-populist parties reflects the current Italian political scenario, in which *Lega* gathered a substantial share of voters shifting away from moderate ruling parties.[22]

Interestingly, we do not find an effect on voting for the *Five Star Movement* (*Movimento Cinque Stelle*). This is surprising since it was the fiercest party in terms of

[19]Given the reduced number of observations available for these estimations, we decided to control for region fixed effects instead of province fixed effects.

[20]Figures A.5 and A.6 (bottom right panels) report the same robustness tests on the definition of first-time voters shown for institutional trust but using the populist dummy as a dependent variable: the findings are unaffected.

[21]In Table A.4 we replicate the results presented in Table 5 but using a Multinomial regression model instead of a separated Logit regression for each party.

[22]Interestingly, *Lega* is not a new born party as other populists ones. Matteo Salvini, the *Lega* national secretary since 2013, undertook a complete re-branding of the party, which changed it from a secessionist to nationalist-populist one (Albertazzi et al., 2018).

emphasizing and attacking the corrupt political elite (Franzosi et al., 2015). This might partially be due to the fact that the two main populist parties, *Five Star Movement* and *Lega*, differed in terms of their electoral bases at the 2018 elections. The *Five Star Movement* was more popular in the South of Italy (collecting about 50% of votes across several regions). The *Lega*, in contrast, was more popular in Northern Italy. In Table 6, we look at this heterogeneity by interacting T with a dummy equals to one for individuals from Southern regions. We find an interesting geographical pattern, in which first-time voters are attracted by the main populist player in their area: first-time voters from the South voted more for *Five Star Movement*, while those from the North voted more *Lega*.[23]

Table 4: Summary Statistics: Respondents vs No Respondents

Covariates	N. respondents	Mean res.	N. drops	Mean dr.	Diff
1974/76	886	0.10	572	0.10	0.002
Female	886	0.67	572	0.63	0.04
Age	886	41.22	572	37.76	3.458***
Catholic	886	0.75	572	0.75	0.002
Boost	886	0.30	572	0.31	-0.005
Income (quintiles)	886	2.71	572	2.79	-0.077
Education	886	2.26	572	2.27	-0.011
N. children	886	0.84	572	0.80	0.041
Employed	886	0.54	572	0.56	-0.015
Employed in private sector	886	0.46	572	0.50	-0.044*
Married	886	0.57	572	0.50	0.073***
Agreableness	885	3.90	572	3.91	-0.013
Consciousness	884	3.81	572	3.77	0.044
Extroversion	885	2.93	572	2.99	-0.055
Openness	884	3.59	571	3.67	-0.083**
Neuroticism	885	3.16	572	3.11	0.051

Note: The table shows the summary statistics for the group of people who respond both to the main and follow-up survey and for those responding only to the former. In particular for each variable and for each group it provides the number of observations and the mean, together with the difference between the two means. A t-test is run on this latter and *, **, *** indicate statistical significance of such difference at the 10%, 5%, and 1% levels, respectively.

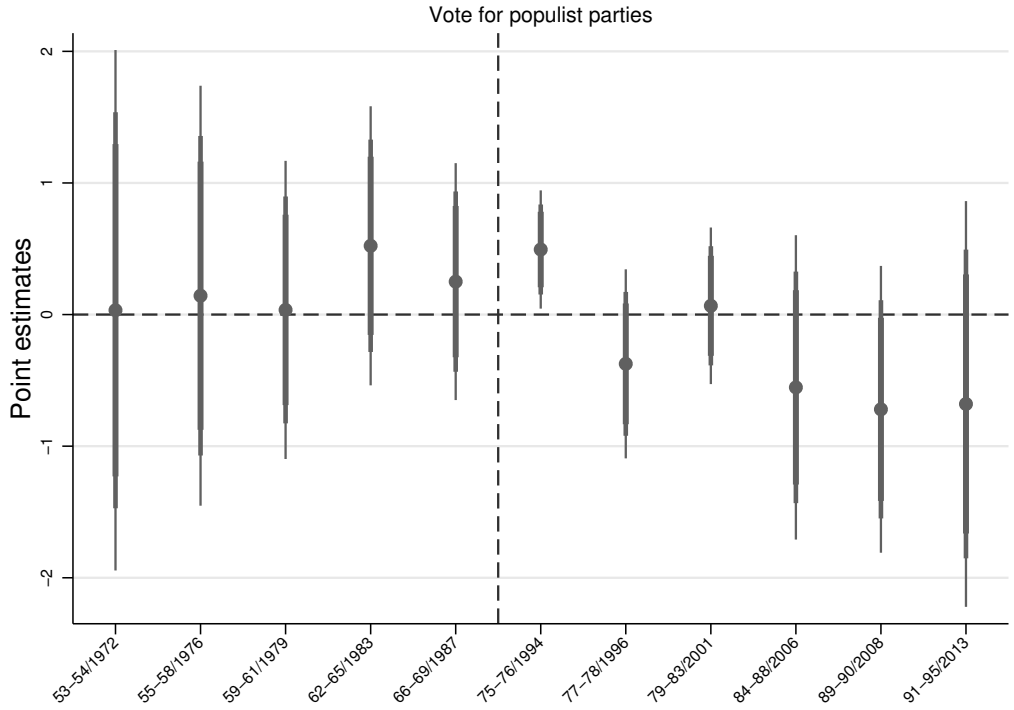
[23]In appendix A.6, we carefully address the relevance of alternative explanations for these results. Specifically, we try to rule out that the increasing share of votes received by *Lega* could be due to persistence in party identification and/or political ideology.

Table 5: Effect of "Clean Hands" on the 2018 Vote

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)
	Turnout	Pop. Parties	LEU	PD	M5S	LEGA	FI	FDI	+Europa
1974/76	0.825	1.559***	0.66	0.614*	0.891	1.791***	0.75	1.394	0.758
	(0.354)	(0.257)	(0.399)	(0.161)	(0.176)	(0.387)	(0.152)	(0.685)	(0.429)
$\delta Y/\delta T$	-0.024	0.090***	-0.023	-0.061**	-0.026	0.086***	-0.017	0.014	-0.012
	(0.057)	(0.033)	(0.029)	(0.030)	(0.044)	(0.032)	(0.012)	(0.023)	(0.023)
Contr.	YES	YES	YES	YES	YES	YES	YES	YES	YES
Region FE	YES	YES	YES	YES	YES	YES	YES	YES	YES
Obs.	882	712	615	700	716	649	688	622	427

Dependent variable: Individual turnout (col. (1)), vote for populist parties (col. (2)), vote for *Liberi ed Uguali* (col. (3)), *Partito Democratico* (col. (4)), *Movimento 5 Stelle* (col. (5)), *Lega* (col. (6)), *Forza Italia* (col. (7)), *Fratelli d'Italia* (col. (8)), +*Europa* (col. (9)), The vote refers to the national Italian electoral round of 2018. Among populist parties we include *Movimento 5 Stelle*, *Lega*, *Fratelli d'Italia*, *Casapound*, *Potere al Popolo*, *Popolo della Famiglia*. The main independent variable *1974/76* is a dummy taking the value 1 for individuals born in 1974, 1975 or 1976 and 0 otherwise. All columns use a Logit regression model to estimate Equation 1. All columns include time-varying controls and provincial fixed effect. Among the set of controls there are gender, decade of birth, religion, education, income, personality traits, marital status, number of children, labor force status, if the individual works in the private sector and if the individual belongs to the boosted sample. $\delta Y/\delta T$ calculates the average marginal effect for the treated cohort. All the coefficients *1974/76* are expressed in terms of odds ratio. Standard errors are robust to heteroskedasticity and clustered at the year of birth level. *, **, *** indicate statistical significance at the 10%, 5%, and 1% levels, respectively.

Figure 5: Effect of "Clean Hands" on the 2018 Vote for Populist Parties by Groups of First-Time Voters



Note: The figure shows the point estimates and the confidence intervals at 90% (i.e. least-wide spikes), at 95% (i.e. medium-wide spikes) and at 99% (i.e. widest spikes) for each group of first-time voters specified in Equation 2. The dependent variable is Vote for populist parties at the Italian national electoral round of 2018.

Table 6: Effect of "Clean Hands" on the 2018 Vote: North vs South

	(1) M5S	(2) LEGA
1975/76	0.652**	2.516***
	(0.135)	(0.542)
South	3.105***	0.132***
	(0.767)	(0.059)
1975/76* South	1.556**	0.538*
	(0.296)	(0.202)
Region FE	YES	YES
Contr.	YES	YES
Obs.	716	649

Dependent variable: Vote for *Movimento 5 Stelle* (col. (1)) and vote for *Lega* (col. (2)). The main independent variable *1974/76* is a dummy taking the value 1 for individuals born in 1974, 1975 or 1976 and 0 otherwise. *South* is a dummy variable equal to 1 if the individual spent his childhood in a Southern Italian regions (i.e. Sicily, Sardinia, Apulia, Calabria, Basilicata, Molise, Campania, Lazio, Abruzzo), and 0 otherwise. All columns use a Logit regression model to estimate the coefficients. All columns include time-varying controls. Among the set of controls there are gender, decade of birth, religion, education, income, personality traits, marital status, number of children, labor force status, if the individual works in the private sector and if the individual belongs to the boosted sample. All the coefficients *1974/76* are expressed in terms of odds ratio. Standard errors are robust to heteroskedasticity and clustered at the year of birth level. *, **, *** indicate statistical significance at the 10%, 5%, and 1% levels, respectively.

5. Conclusions

The paper has established that corruption has a long term scarring effect. Those more exposed to corrupt behaviour exert lower trust. Compared to the short run effects of corruption, where its impact typically hits a broader strata of the population, age matters for potential long term effects. We find here a substantial scarring effect for the younger individuals, i.e. those going through important formative years, a finding that is consistent with the "sensitive age hypothesis". In particular, young first time voters exposed to a corruption scandal react through exerting lower trust - a change

that appears permanent. The fact that corruption can have a permanent impact on trust is an important finding, which enriches our perspective on how state regimes and institutions, as well as their failures, affect beliefs and attitudes (e.g. (Becker et al., 2016; Nunn and Wantchekon, 2011; Grosjean and Senik, 2011; Alesina and Fuchs-Schündeln, 2007)). A second important finding is that the loss in trust induced by corruption may also affect current voting preferences, and in particular, contributing to the rise and perhaps even entrenchment of populism. Our study provides convincing evidence that memories of past corruption scandals among individuals, eventually reactivated by the recent economic crisis, may have partially contributed to the rise of populism in Italy.

Admittedly, the effects of this corruption scandal might have generally affected the entire Italian population. While we cannot test whether this is the case, our contribution relies in identifying the causal effect of the corruption scandal at least for a narrow cohort of individuals, i.e. the first time voters during the corruption scandal. Moreover, this cohort represents today the median voter in terms of age, and thus their influence is not necessarily small.

In terms of policy, the results presented in this work have at least two important normative implications. On the one hand, our findings shade light on the possible negative spillovers that massive anti-corruption investigations may have on voters' attitudes and beliefs, eventually generating path dependency in the long run. On the other hand, our work raises concerns about the efficacy of public policy in fighting against corruption. Clearly, greater transparency in governance is the number one remedy of corruption, but this study cast doubt as to whether improvements in transparency is sufficient. Even if improvements are made in terms of transparency, the scarring effect does not go away - at least for those exposed to corruption at an early age.

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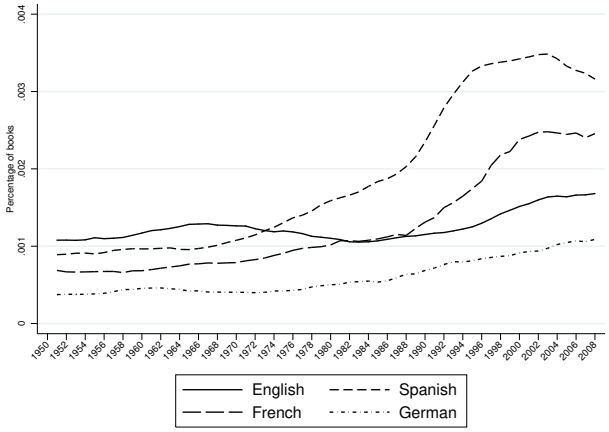
Online Appendix

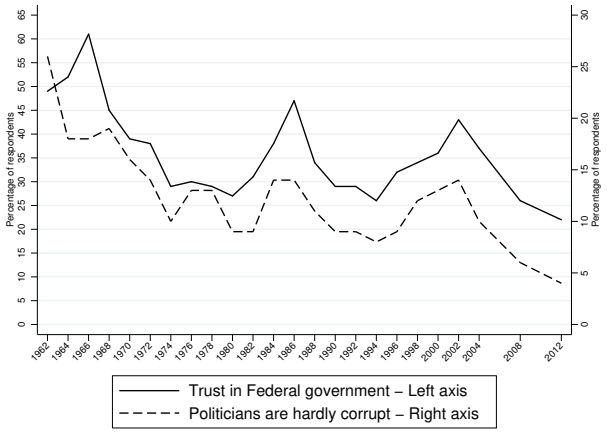
A.1. Qualitative evidence

Figure A.1: Long Term increase in Corruption Perceptions (Google Books)



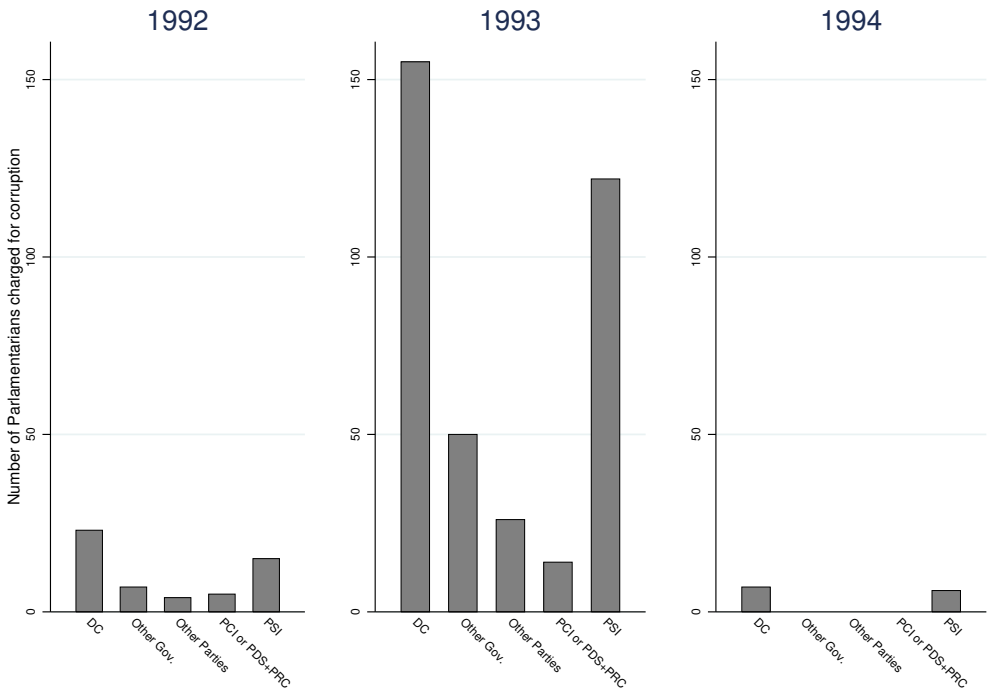
Note: The figure shows the yearly percentage of English, Spanish, French and German books digitalized by *Google* and talking about corruption during the period 1950-2008.

Figure A.2: Long Term decline in Trust in Institutions and increase in Corruption perceptions (US)



Note: The figure shows the trend of trust in federal government and corruption perception in US during the period 1958-2012. Corruption perception is represented by the percentage of respondents thinking that politicians are hardly corrupt. Source: American National Election Studies.

Figure A.3: Charged Parliamentarians by Year and Party Affiliation



Note: The figure reports the number of national parliamentarians charged with corruption (or corruption-related offences by year and party affiliation. Own calculation based on data from Ceron and Mainenti (2015).

A.2. The Trustlab Database

Figure A.4: The Trustlab Questionnaire

[SCREEN 29 – TRUST IN INSTITUTIONS]

When answering the following questions, please think about [enter country here] institutions. How much trust do you have in the following?

	I don't trust them at all						I completely trust them					
The government	0	1	2	3	4	5	6	7	8	9	10	DK
The civil service	0	1	2	3	4	5	6	7	8	9	10	DK
The parliament	0	1	2	3	4	5	6	7	8	9	10	DK

Note: The figure shows the screens appearing online to the respondents of the Trustlab survey and containing the questions about institutional trust.

A.3. A complete list of all variables

Our analysis relies on two main sources of data. The first one is the Trustlab database, while the second one is Italian National Election Studies survey (ITANES). In this Online Appendix we provide a list of all variables employed in this work from each source, together with a brief description of information used to build them up.

TrustLab Database

- Trust in parliament: To what extent an individual trusts the national Parliament on a 0-10 scale.
- Trust in government: To what extent an individual trusts the national Government on a 0-10 scale.
- Trust in civil servants: To what extent an individual trusts civil servants in own country on a 0-10 scale.
- Trust in media: To what extent an individual trusts media in own country on a 0-10 scale.
- Trust in financial institutions: To what extent an individual trusts financial institutions (e.g. banks) in own country on a 0-10 scale.
- Generalized trust: To what extent an individual trusts the others on a 0-10 scale.
- Efficiency: To what extent an individual thinks that public institutions are efficient on a 0-10 scale.
- Forward-Looking: To what extent an individual thinks that public institutions are forward-looking on a 0-10 scale.
- Integrity: To what extent an individual thinks that public institutions are integer and not corrupt on a 0-10 scale.
- Transparency: To what extent an individual thinks that public institutions are transparent on a 0-10 scale.
- Turnout: A dummy variable equal to 1 if an individual voted at the 2018 election and 0 otherwise. The information for constructing the variable is collected by the follow-up survey on the Italian Trustlab sample.

- LEU: A dummy variable equal to 1 if an individual voted for *Liberi e Uguali* at the national electoral round of 2018 and 0 otherwise. The information for constructing the variable is collected by the follow-up survey on the Italian Trustlab sample.

- PD: A dummy variable equal to 1 if an individual voted for *Partito Democratico* at the national electoral round of 2018 and 0 otherwise. The information for constructing the variable is collected by the follow-up survey on the Italian Trustlab sample.

- M5S: A dummy variable equal to 1 if an individual voted for *Movimento 5 Stelle* at the national electoral round of 2018 and 0 otherwise. The information for constructing the variable is collected by the follow-up survey on the Italian Trustlab sample.

- LEGA: A dummy variable equal to 1 if an individual voted for *Lega* at the national electoral round of 2018 and 0 otherwise. The information for constructing the variable is collected by the follow-up survey on the Italian Trustlab sample.

- FI: A dummy variable equal to 1 if an individual voted for *Forza Italia* at the national electoral round of 2018 and 0 otherwise. The information for constructing the variable is collected by the follow-up survey on the Italian Trustlab sample.

- FDI: A dummy variable equal to 1 if an individual voted for *Fratelli d'Italia* at the national electoral round of 2018 and 0 otherwise. The information for constructing the variable is collected by the follow-up survey on the Italian Trustlab sample.

- +Europa: A dummy variable equal to 1 if an individual voted for *+Europa* at the national electoral round of 2018 and 0 otherwise. The information for constructing the variable is collected by the follow-up survey on the Italian Trustlab sample.

- Populist: A dummy variable equal to 1 if an individual voted for a populist party at the national electoral round of 2018 and 0 otherwise. Among populist parties we include *Lega*, *Movimento 5 Stelle*, *Fratelli d'Italia*, *Casapound*, *Potere al Popolo* and *Il Popolo della Famiglia*. Among mainstream parties we include *Partito Democratico*, *Liberi ed Uguali*, *Forza Italia*, *+Europa*, *Civica Popolare* and *Italia Europa Unita*. The information for constructing the variable is collected by the follow-up survey on the Italian Trustlab sample.

- Female: A dummy variable equal to 1 if an individual is woman and 0 otherwise.
- Catholic: A dummy variable equal to 1 if an individual is catholic and 0 otherwise.
- Income: Quintile of distribution of total gross income which individuals belong to
- Education: The highest level of education achieved by individuals. It equals 1 for those having no education or only primary school, 2 for those with secondary school degree and 3 for people completing tertiary education.
- Convicted: A dummy equals to 1 (0, otherwise) for individuals in districts above the median in terms of the share of national deputies charged during Clean Hands in a specific district with respect to the total number of convicted ones at the national level.
- Not educated: A dummy variable equal to 1 if an individual achieved less than secondary education and 0 otherwise.
- Number of children: Total number of own children. Information for constructing this variable is provided only within the Italian sample of Trustlab.
- Employed: A dummy variable equal to 1 if an individual is currently employed and 0 otherwise.
- Employed in private sector: A dummy variable equal to 1 if an individual is currently employed in the private sector and 0 otherwise.
- Married: A dummy variable equal to 1 if an individual is currently married and 0 otherwise. Information for constructing this variable is provided only within the Italian sample of Trustlab.
- Agreeableness: One of the five trait of individual personality. The score for this trait is calculated as the average of the answers to the questions about individual's rudeness, forgiveness and empathy with the others. The answers are provided along a 1-7 scale where 1 indicates complete disagreement and 7 complete agreement. Given the negative sense of the question on rudeness with respect to the other two elements, we revert the order of the responses to this question before taking the average. Information for constructing this variable is provided only within the Italian sample of Trustlab.

- Consciousness: One of the five trait of individual personality. The score for this trait is calculated as the average of the answers to the questions about individual's laziness, efficiency at work and if she is a thorough worker. The answers are provided along a 1-7 scale where 1 indicates complete disagreement and 7 complete agreement. Given the negative sense of the question on laziness with respect to the other two elements, we revert the order of the responses to this question before taking the average. Information for constructing this variable is provided only within the Italian sample of Trustlab.

- Extroversion: One of the five trait of individual personality. The score for this trait is calculated as the average of the answers to the questions about individual's talkativeness, discretion and sociability. The answers are provided along a 1-7 scale where 1 indicates complete disagreement and 7 complete agreement. Given the negative sense of the question on discretion with respect to the other two elements, we revert the order of the responses to this question before taking the average. Information for constructing this variable is provided only within the Italian sample of Trustlab.

- Openness: One of the five trait of individual personality. The score for this trait is calculated as the average of the answers to the questions about individual's artistic view, imagination and originality. The answers are provided along a 1-7 scale where 1 indicates complete disagreement and 7 complete agreement. Information for constructing this variable is provided only within the Italian sample of Trustlab.

- Neuroticism: One of the five trait of individual personality. The score for this trait is calculated as the average of the answers to the questions about individual's neuroticism, wariness and capacity to relax. The answers are provided along a 1-7 scale where 1 indicates complete disagreement and 7 complete agreement. Given the positive sense of the question on the capacity to relax with respect to the other two elements, we revert the order of the responses to this question before taking the average. Information for constructing this variable is provided only within the Italian sample of Trustlab.

- Province of residence: The Italian province where the individuals currently reside (2017).

- Region of childhood: The Italian region where the individuals lived up to 16 years old. Such information is collected in the follow-up survey for the Italian TrustLab.
- South: A dummy equal to 1 if the region where the individuals lived up to 16 years old is in Southern Italy and 0 otherwise. We consider Southern regions Sicily, Sardinia, Apulia, Calabria, Basilicata, Molise, Campania, Lazio and Abruzzo.

Italian National Election Studies

- Interest in politics: A dummy variable equal to 1 if an individual declares to be generally interested in politics and 0 otherwise. This variable is provided only within the 1996-wave of ITANES.

- Read news on politics: A dummy variable equal to 1 if an individual read news on politics during the last national electoral campaign and 0 otherwise. This variable is provided only within the 1996-wave of ITANES.

- Distrust in democracy: A dummy variable equal to 1 if an individual declares that sometimes or always dictatorship is better than democracy and 0 otherwise. This variable is provided only within the 1996-wave of ITANES.

- Trust in Parliament: A dummy variable equal to 1 if an individual trusts the national Parliament and 0 otherwise. This variable is provided only within the 2001-wave of ITANES.

- Closeness to *Lega*: A dummy variable equal to 1 if an individual feels *Lega* as the ideologically closest party to him and 0 otherwise. This variable is provided within the 1996-wave of ITANES.

- Vote for *Lega* 1994: A dummy variable equal to 1 if an individual voted for *Lega* at the 1994 national election and 0 otherwise. This variable is provided within the 1996-wave of ITANES.

- Vote for *Lega* 1996: A dummy variable equal to 1 if an individual voted for *Lega* at the 1996 national election and 0 otherwise. This variable is provided within the 1996-wave of ITANES.

- Opinion on Bossi: To what extent an individual retains Umberto Bossi, the former *Lega*'s secretary, was doing well as political leader from 1 to 10. This variable is provided within the 1996-wave of ITANES.

- Closeness to *Alleanza Nazionale/Movimento Sociale Italiano*: A dummy variable equal to 1 if an individual feels *Alleanza Nazionale/Movimento Sociale Italiano* as the ideologically closest party to him and 0 otherwise. This variable is provided within the 1996-wave of ITANES.

- Vote for *Alleanza Nazionale/Movimento Sociale Italiano* 1994: A dummy variable equal to 1 if an individual voted for *Alleanza Nazionale/Movimento sociale Italiano* at the 1994 national election and 0 otherwise. This variable is provided within the 1996-wave of ITANES.

- Vote for *Alleanza Nazionale/Movimento Sociale Italiano* 1996: A dummy variable equal to 1 if an individual voted for *Alleanza Nazionale/Movimento Sociale Italiano* at the 1996 national election and 0 otherwise. This variable is provided within the 1996-wave of ITANES.

- Opinion on Fini: To what extent an individual retains Gianfranco Fini, the former *Alleanza Nazionale/Movimento Sociale Italiano*'s secretary, was doing well as political leader from 1 to 10. This variable is provided within the 1996-wave of ITANES.

- Female: A dummy variable equal to 1 if an individual is woman and 0 otherwise.

- Catholic: A dummy variable equal to 1 if an individual is catholic and 0 otherwise.

- Social class: The social class which the individuals (or their household in the case of not working individuals) belong to. It is differentiated in urban middle-class, agrarian middle-class and working-class.

- Education: The highest level of education achieved by individuals. It goes from 1 (i.e. Never went to school) to 7 (i.e. having an university degree).

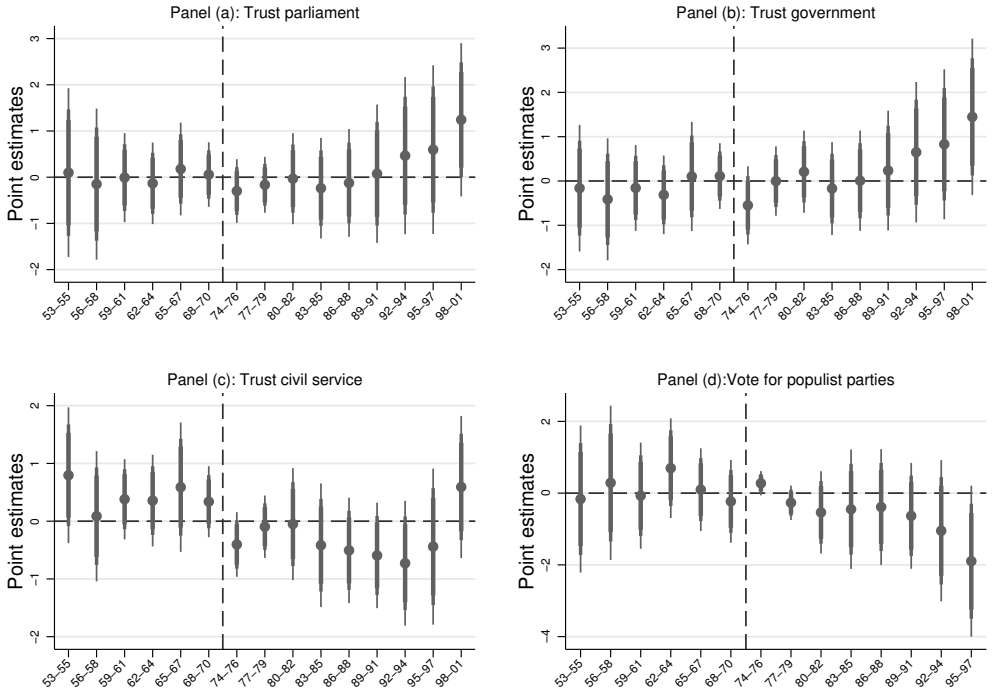
- Employed: A dummy variable equal to 1 if an individual is currently employed and 0 otherwise.

- Number of children: Total number of own children.

- Married: A dummy variable equal to 1 if an individual is currently married and 0 otherwise.

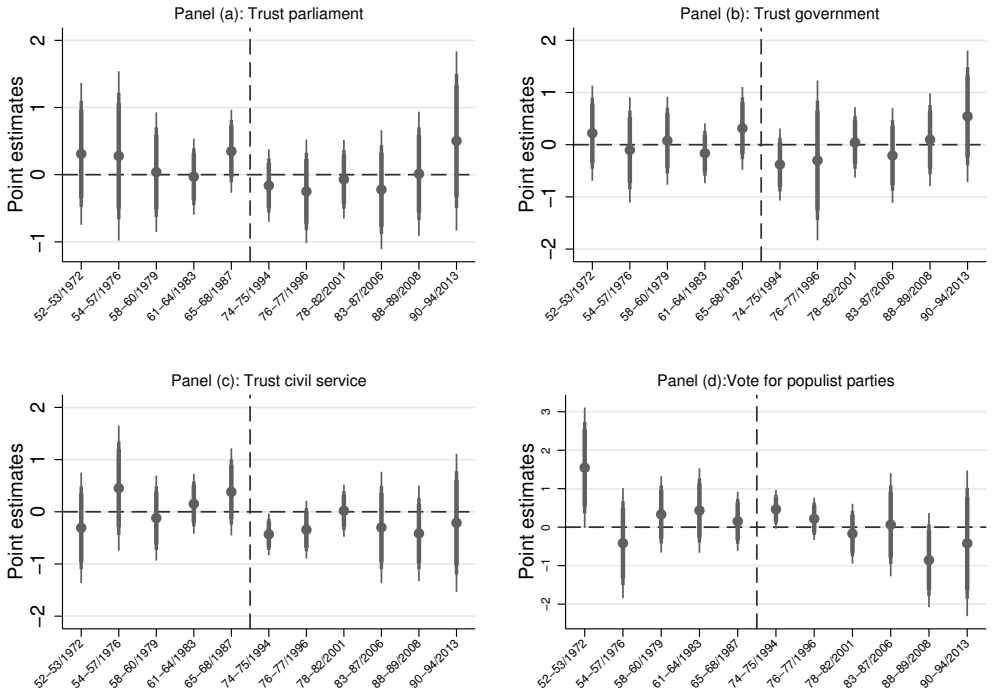
A.4. Robustness Tests

Figure A.5: Main results: The Effect of the Scandal by Three-year Birth Cohorts



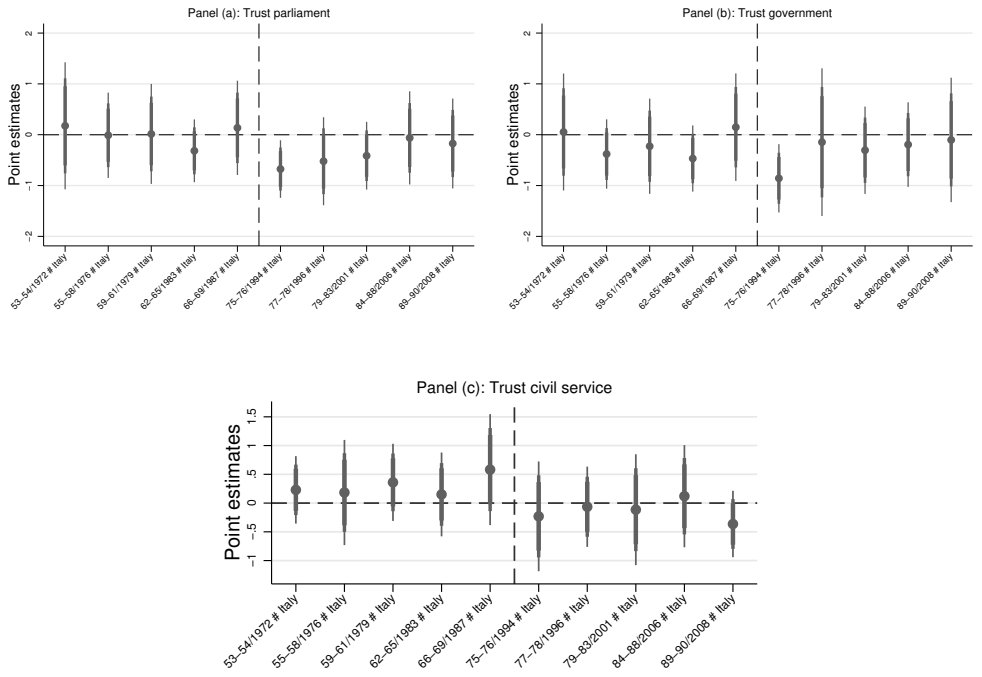
Note: The figure shows the point estimates and the confidence intervals at 90% (i.e. least-wide spikes), at 95% (i.e. medium-wide spikes) and at 99% (i.e. widest spikes) for each group of first-time voters specified in Equation 2. The dependent variables are trust in parliament (Panel (a)), trust in government (Panel (b)), trust in civil servants (Panel (c)) and vote for populist party at the 2018 elections (Panel (d)). Panel (a)-(c) use OLS regression while Panel (d) employs a Logit model.

Figure A.6: The Effect of the Scandal by Groups of First-Time Voters - Alternative definition



Note: The figure shows the point estimates and the confidence intervals at 90% (i.e. least-wide spikes), at 95% (i.e. medium-wide spikes) and at 99% (i.e. widest spikes) for each group of first-time voters specified in Equation 2. The dependent variables are trust in parliament (Panel (a)), trust in government (Panel (b)), trust in civil servants (Panel (c)) and vote for populist party at the 2018 elections (Panel (d)). Panel (a)-(c) use OLS regression while Panel (d) employs a Logit model.

Figure A.7: The Effect of the Scandal by Groups of First-Time Voters - Cross-Country Comparison



Note: The figure shows the point estimates and the confidence intervals at 90% (i.e. least-wide spikes), at 95% (i.e. medium-wide spikes) and at 99% (i.e. widest spikes) for each group of first-time voters specified in Equation 2. The dependent variables are trust in parliament (Panel (a)), trust in government (Panel (b)), trust in civil servants (Panel (c)).

Table A.1: Sample Distribution of First-Time Voters

Cohort/1st Elec.	Freq.	Percent	Cum.
53-54/1972	25	1.82	1.82
55-58/1976	67	4.87	6.68
59-61/1979	86	6.25	12.93
62-65/1983	102	7.41	20.33
66-69/1987	111	8.06	28.4
70-74/1992	193	14.02	42.41
75-76/1994	90	6.54	48.95
77-78/1996	75	5.45	54.39
79-83/2001	197	14.31	68.7
84-88/2006	192	13.94	82.64
89-90/2008	66	4.79	87.44
91-95/2013	173	12.56	100
Total	1,377	100	

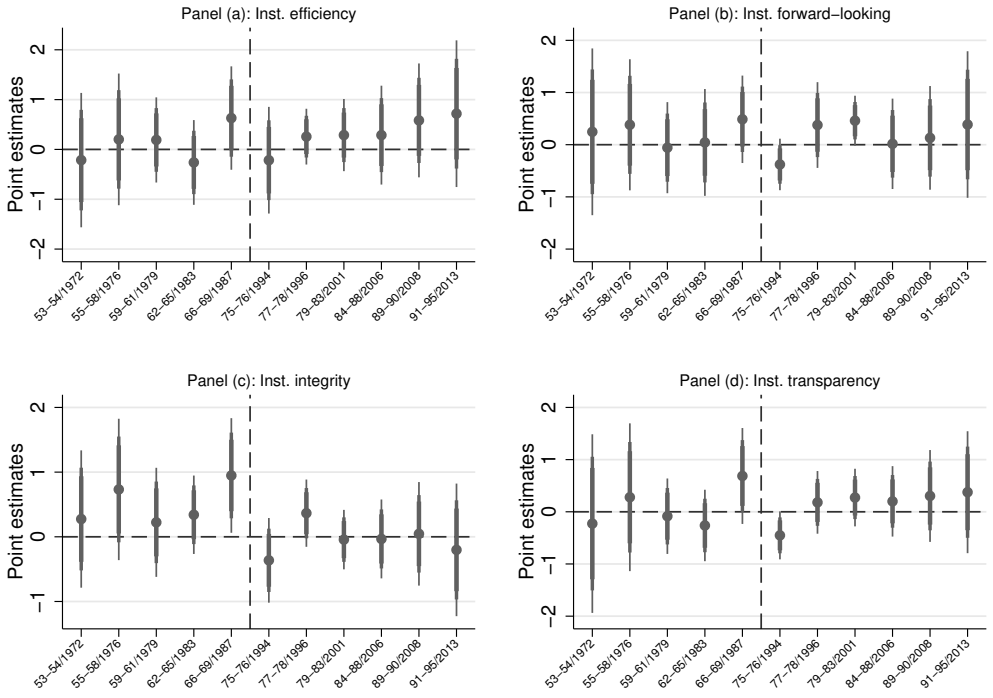
Note: The Table shows the groups of first-time voters included in the analysis, the number of individuals for each group, and the relative size of each group with respect to the entire sample.

Table A.2: Opinions Towards Institutions

	(1) Efficiency	(2) Forward-looking	(3) Integrity	(4) Transparency
1974/76	-0.589**	-0.625***	-0.572***	-0.586***
	(0.222)	(0.098)	(0.140)	(0.093)
Contr.	YES	YES	YES	YES
Prov. FE	YES	YES	YES	YES
Observations	1,440	1,362	1,409	1,415
R^2	0.129	0.116	0.141	0.146

Dependent variable: Opinions towards institutions' efficiency (col. (1)), opinions towards institutions' objectiveness (col. (2)), opinions towards institutions' integrity (col. (3)) and opinions towards institutions' transparency (col. (4)). The main independent variable *1974/76* is a dummy taking the value 1 for individuals born in 1974, 1975 or 1976 and 0 otherwise. All columns use an Ordinary Least Square (OLS) regression model to estimate Equation 1. All columns include time-varying controls and provincial fixed effect. Among the set of controls there are gender, decade of birth, religion, education, income, personality traits, marital status, number of children, labor force status, if the individual works in the private sector and if the individual belongs to the boosted sample. Standard errors are robust to heteroskedasticity and clustered at the year of birth level. *, **, *** indicate statistical significance at the 10%, 5%, and 1% levels, respectively.

Figure A.8: Opinions Towards Institutions by Groups of First-Time Voters



Note: The figure shows the point estimates and the confidence intervals at 90% (i.e. least-wide spikes), at 95% (i.e. medium-wide spikes) and at 99% (i.e. widest spikes) for each group of first-time voters specified in Equation 2. The dependent variables are opinions on institutional efficiency (Panel (a)), opinions on institutional forward-looking (Panel (b)), opinions on institutional integrity (i.e. no corruption) (Panel (c)) and opinions on institutional transparency (Panel (d)).

Table A.3: Trust in Non-Political Institutions

	(1)	(2)	(3)
	Media	Fin.Inst.	Gen. Trust
1974/76	-0.176	-0.374	-0.252
	(0.156)	(0.266)	(0.215)
Contr.	YES	YES	YES
Prov. FE	YES	YES	YES
Obs.	1,446	1,446	1,446
R^2	0.104	0.119	0.183

Dependent variable: Trust in media (col. (1)), trust in financial institutions (col. (2)) and generalized social trust (col. (3)). The main independent variable *1974/76* is a dummy taking the value 1 for individuals born in 1974, 1975 or 1976 and 0 otherwise. All columns use an Ordinary Least Square (OLS) regression model to estimate Equation 1. All columns include time-varying controls and provincial fixed effect. Among the set of controls there are gender, decade of birth, religion, education, income, personality traits, marital status, number of children, labor force status, if the individual works in the private sector and if the individual belongs to the boosted sample. Standard errors are robust to heteroskedasticity and clustered at the year of birth level. *, **, *** indicate statistical significance at the 10%, 5%, and 1% levels, respectively.

Table A.4: Effect of "Clean Hands" on the 2018 Vote: Multinomial Logit Regression Model

	(1)	(2)	(3)	(4)	(5)	(6)	(7)
	LEU	PD	M5S	LEGA	FI	FDI	+Europa
1974/76	-0.018	-0.066**	-0.012	0.079***	-0.013	0.016	0.017
	(0.024)	(0.033)	(0.042)	(0.026)	(0.011)	(0.017)	(0.020)
South FE.	YES	YES	YES	YES	YES	YES	YES
Contr.	YES	YES	YES	YES	YES	YES	YES
Obs.	698	698	698	698	698	698	698

Note: The table shows the marginal effect of being born in 1974, 1975 or 1976 on the probability to vote for *Liberi ed Uguali* (col. (1)), *Partito Democratico* (col. (2)), *Movimento 5 Stelle* (col. (3)), *Lega* (col. (4)), *Forza Italia* (col. (5)), *Fratelli d'Italia* (col. (6)), +*Europa* (col. (7)). The vote refers to the national Italian electoral round of 2018. Marginal effect are calculated starting from a Multinomial Logit regression model in which the dependent variable is a categorical variable recording the party voted at such election. The model includes time-varying controls. Among the set of controls there are gender, decade of birth, religion, education, income, personality traits, marital status, number of children, labor force status, if the individual works in the private sector and if the individual belongs to the boosted sample. Standard errors of the Multinomial Logit are robust to heteroskedasticity and clustered at the year of birth level, while the standard errors of the marginal effects are obtained by Delta-method. *, **, *** indicate statistical significance at the 10%, 5%, and 1% levels, respectively.

A.5. Alternative Explanations

In this section, we discuss two alternative scenarios which could potentially affect our findings. Contemporaneously with "Clean Hands" two other important events took place in Italy which were not related to the scandal: several terrorist attacks perpetrated by the mafia, among which the murder of two leading Italian prosecutors (Paolo Borsellino and Giovanni Falcone), and, a period of severe economic crisis. Both events might have led to a permanent change in institutional trust, and especially so among young individuals, again because of the sensitive age hypothesis.

In order to assess these possibilities, we start by looking at the degree of media coverage of the economic crisis and mafia during the same period. Figures A.9 and A.10 show that compared to other events, the corruption scandal is by far the most important one. Figure A.9, Panel (a), shows that exposure to mafia on TV and radio was strongly limited to the days after the attacks. Moreover, the graphical analysis suggests that the news about the mafia, was quickly taken over by news about corruption. Panel (b) suggests that economic crisis was in fact a salient topic before the 1994 election, even though it received definitively less coverage by public TV and radio channels compared to the "Clean Hands" scandal. Figure A.10, instead, focuses on the front pages of the *Corriere della Sera*. Here, we can directly compare the share of front pages devoted to the three different topics, again highlighting the strong prevalence of "Clean Hands" over the other two main events.

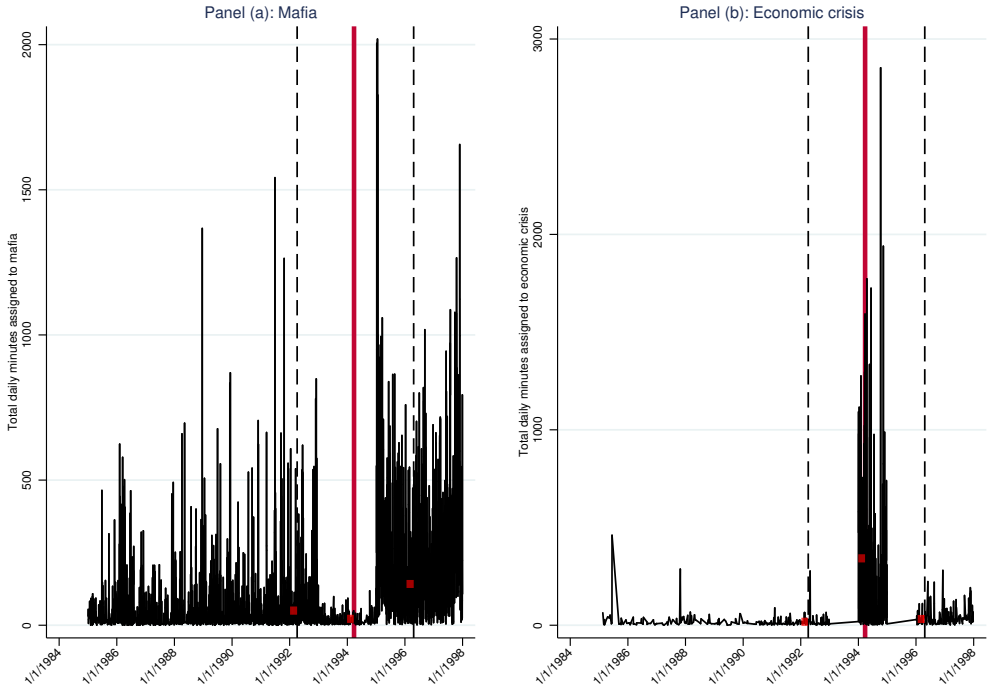
A final piece of qualitative evidence is that, while the 1994 electoral campaign was the only one in which corruption was the most salient topic, there were two other elections immediately after recession years, like in 1994, i.e. the national elections in 1976 and 2013. In these cases, as shown by our main findings, we do not observe any attitudes' change among first-time voters.

As a further test, we explore whether first-time voters who were more exposed to local news regarding such events, are also more likely to change their institutional attitudes. Italian public TV (RAI) provides daily local news at the regional level, representing a key resource of local news. We code the daily number of news devoted to mafia and economic crisis on the local public news in each Italian region during the period 1992-1996. Then, we matched such information with that on the province in which individuals spent their childhood.[A.1] After that, concerning mafia, in Table A.5, we

[A.1] For childhood is meant the province in which someone lived at 16 years old.

interact our treated group with the logarithm of the number of local TV news on mafia, while regarding the economic crisis, in Table A.6, we interact the coefficient of interest with the logarithm of the number of local TV news on economic crisis.[A.2] In all cases we do not find a stronger decrease in institutional trust for first-time voters that are more exposed to these events through local TV news, a feature which weakens the relevance of these alternative explanations.

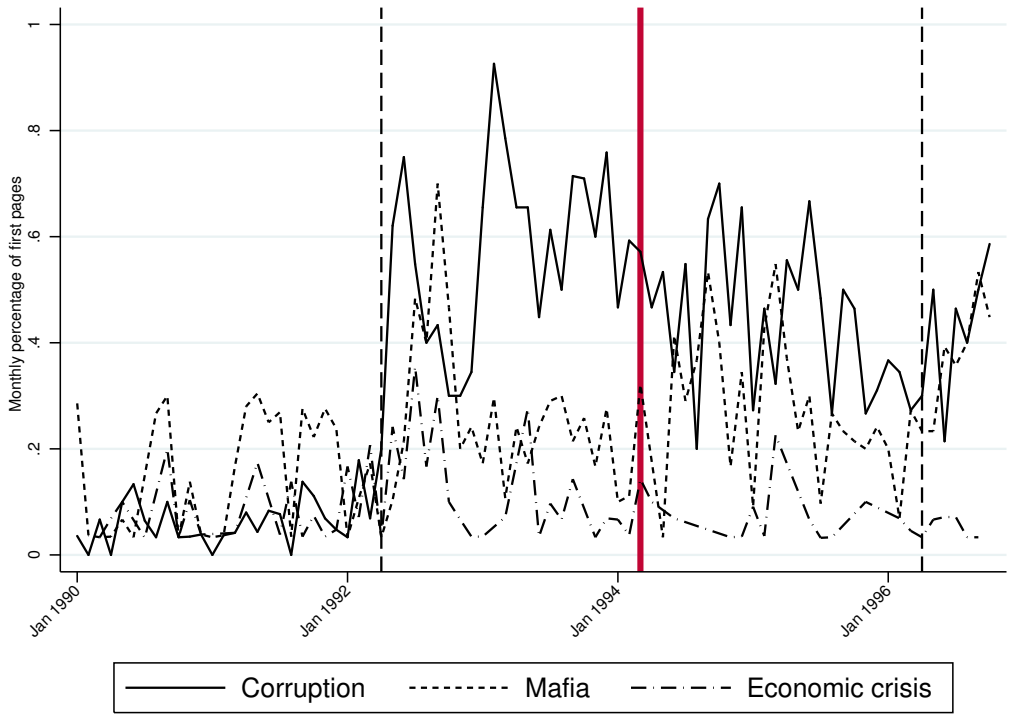
Figure A.9: Alternative explanations: TV/Radio coverage of Mafia and Economic Crisis



Note: The figure shows the total daily minutes assigned to mafia (Panel (a)) and economic crisis (Panel (b)) within the broadcasts of Italian public TV and radio channels (i.e. RAI) during the period 1985-1997. The red vertical line represents the date of the national election following the discovery of the scandal, while the vertical black-dashed lines all the other electoral dates within the period 1992-1997. The short red horizontal lines provide the average number of minutes assigned to each topic by public TV/radio broadcasts within 90 days before each national electoral date.

[A.2]Data on childhood are available only for the follow up respondents, and the models do not include province fixed effects but only regional fixed effects, given the reduced number of observation available in the follow up survey.

Figure A.10: Alternative explanations: Newspapers coverage of Mafia and Economic Crisis



Note: shows the monthly percentage of articles about corruption, mafia and economic crisis appearing in the first page of *Corriere della Sera* during the period 1990-1996. The red vertical line represents the date of the national election following the discovery of the scandal, while the vertical black-dashed lines all the other electoral dates within the period 1992-1997.

Table A.5: Alternative explanations: Mafia

	(1) Parl.	(2) Gov.	(3) Civ. Serv.
1974/76	-0.251	-0.854	-1.198**
	(0.995)	(1.046)	(0.459)
Coverage Mafia	-0.055	0.018	-0.061
	(0.133)	(0.126)	(0.137)
1974/76*Coverage Mafia	-0.030	0.045	0.100
	(0.234)	(0.243)	(0.135)
Contr.	YES	YES	YES
Region FE	YES	YES	YES
Obs.	857	857	855
R^2	0.077	0.094	0.153

Dependent variable: Trust in parliament (col. (1)), trust in government (col. (2)) and trust in civil servants (col. (3)). *1974/76* is a dummy taking the value 1 for individuals born in 1974, 1975 or 1976 and 0 otherwise. *Coverage Mafia* records the logarithm of the number local TV news about mafia in each region during the period 1992-1996. All columns use an Ordinary Least Square (OLS) regression model to estimate Equation 1. All columns include time-varying controls. Among the set of controls there are gender, decade of birth, religion, education, income, personality traits, marital status, number of children, labor force status, if the individual works in the private sector and if the individual belongs to the boosted sample. Standard errors are robust to heteroskedasticity and clustered at the year of birth level. *, **, *** indicate statistical significance at the 10%, 5%, and 1% levels, respectively.

A.6. Alternative Explanations for Voting Effects

In this section, we try to rule out that the increasing share of votes received by *Lega* from the treated cohort at the 2018 election could be due to persistence in party identification (Dinas, 2014; Kaplan and Mukand, 2011; Mullainathan and Washington, 2009; Goren, 2005; Schickler and Green, 1997; Green and Palmquist, 1994; Miller, 1991; Green and Palmquist, 1990) and/or political ideology (Mason, 2018; Kinder and Kalmoe, 2017; Kinder, 2006), rather than to a switch in current voting preferences induced by the long-term effect of the scandal on institutional trust. In other words, first-time voters during the scandal might have started to vote more for *Lega* already in the 1994 election, for then to stick with this voting behaviour until the present day (regardless of their level of trust towards institutions). Similarly, they might have shifted political views towards the right side of the political spectrum immediately after the scandal and persistently voted for right political parties.

In Figure A.11, still using data from the 1996 wave of ITANES, we test whether our treated cohort had a higher probability to vote for *Lega* at the 1994 and 1996 elections, and if it felt ideologically close to *Lega* or had a more favorable opinion of the leader

Table A.6: Alternative explanations: Economic Crisis

	(1) Parl.	(2) Gov.	(3) Civ. Serv.
1974/76	-0.483	-1.031	-1.616***
	(0.615)	(0.628)	(0.295)
Coverage Crisis	0.013	0.063	-0.064
	(0.115)	(0.116)	(0.127)
1974/76*Coverage Crisis	0.023	0.109	0.248*
	(0.221)	(0.217)	(0.127)
Contr.	YES	YES	YES
Region FE	YES	YES	YES
Obs.	857	857	855
R^2	0.077	0.094	0.154

Dependent variable: Trust in parliament (col. (1)), trust in government (col. (2)) and trust in civil servants (col. (3)). *1974/76* is a dummy taking the value 1 for individuals born in 1974, 1975 or 1976 and 0 otherwise. *Coverage Crisis* records the logarithm of the number local TV news about economic crisis in each region during the period 1992-1996. All columns use an Ordinary Least Square (OLS) regression model to estimate Equation 1. All columns include time-varying controls. Among the set of controls there are gender, decade of birth, religion, education, income, personality traits, marital status, number of children, labor force status, if the individual works in the private sector and if the individual belongs to the boosted sample. Standard errors are robust to heteroskedasticity and clustered at the year of birth level. *, **, *** indicate statistical significance at the 10%, 5%, and 1% levels, respectively.

of *Lega* at that time (Umberto Bossi).[A.3] All these tests do not show any significant difference in the political preferences towards *Lega* at the time of the scandal between the treated cohort and either all the others or all the other groups of first-time voters, thus suggesting that the current vote for *Lega* is not driven by persistent party or ideologically identification with this party.

Finally, in Figure A.12, we look at another right-wing party running at the elections in 1994 in 1996, i.e. *Alleanza Nazionale/Movimento Sociale Italiano*. We do it in order to test whether there was an ideological shift towards the right side of the political spectrum after the scandal, that goes beyond voting for *Lega*. In Figure A.12 we focus on the self-declared voting for this party at the two electoral rounds right after the scandal, on the ideological closeness to this party, and on the opinion toward its leader Gianfranco Fini. Again, we do not find any significant difference in the political preferences towards *AN/MSI* at the time of the scandal by those born in the period 1975-1976.

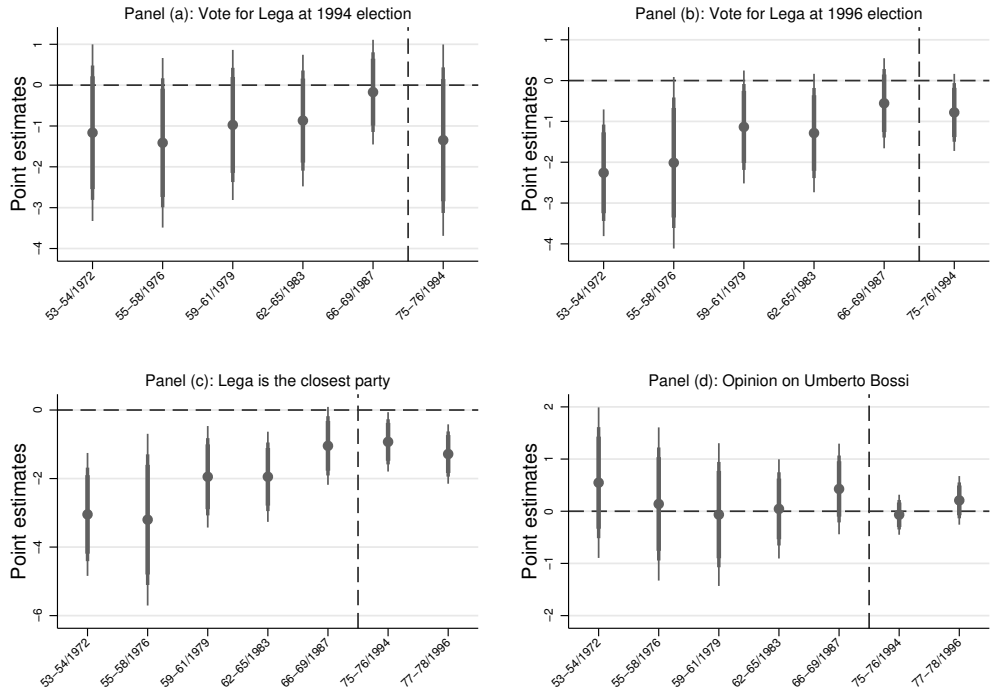
[A.3]Here, given the unavailability of information about the individuals' province of residence we can control only for fixed effects at the regional level.

Our findings show that, while the scandal has an impact on trust in the short, the medium and in the long run, the effects on voting behaviors appear visible only twenty-five years later. There might be two complementary explanations of this result. First, the supply of anti-establishment populist parties is a new phenomenon. Although popular populist politicians have been running for office also in the other elections following the scandal (e.g. Berlusconi), they have never embraced such an extreme anti-establishment view as the *Lega* and the *Five Star Movement* did. Second, the scandal in 1992-1994 might represent a seed factor that shifts voting behaviors only when current events reactivate past memories. Italy experienced a severe economic crisis after 2008 and many Italians blamed the political elite for not having adequately coped with it. Indeed, the Great Crisis is considered an important determinant of populist voting (Algan et al., 2017; Armingeon and Guthmann, 2014; Guiso et al., 2017). For our treated cohort, the unfit political elite during the Great Crisis might represent the triggering factor reactivating memories of the scandal. A similar case has been recently studied by Fouka and Voth (2013): they exploit the recent Greek Debt Crisis, in which conflicts erupted between the German and Greek governments. They show that, during the Debt Crisis, in Greece, German car sales decline especially in areas where German troops committed massacres during World War II: a reactivation effect taking place several decades later. To check whether this is also the case for the cohort of first-time voters during the "Clean-Hands" scandal, in Figure A.13 we plot the predicted probability to have voted for populist parties at the 2018 election, for the treated and control cohorts, and by different degree of change in employment during the period 2006-2013 at the individuals' province of residence level.[A.4] It is straightforward from the comparison of the two lines showed in the graph that the positive effect of the investigation on the vote for populists do have been triggered by the worsening of the economic conditions during the great recession. Conversely, any statistical difference between treated and control cohorts completely disappears when first-time voters at the time of the scandal live in provinces which did not experience a significant negative change in employment due to the great

[A.4] The predicted probabilities are calculated from the estimates obtained by running a sightly modified version of the Logit model presented in Equation 1, in which we interact our treatment dummy T with the percentage change in employment within the province of residence of each individual during the period 2006-2013. Data on employment at the Italian provincial level are retrieved from Eurostat. For the sake of brevity, we do not report the table with raw estimates but they are available upon request.

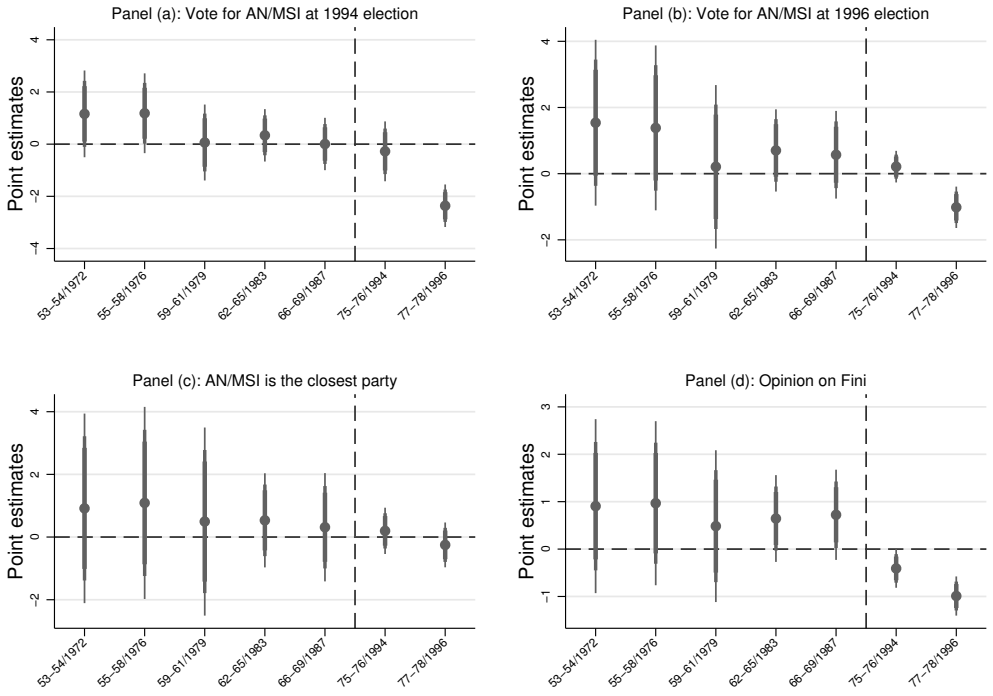
recession. This ultimately provides a supportive evidence in favor of the explanation of our results on vote regarding the possible existence of long-last memories of past corruption scandals which can been reactivated by current economic, social and political triggers.

Figure A.11: Effect of "Clean Hands" on the Partisanship for *Lega* at the Time of the Scandal by Groups of First-Time Voters



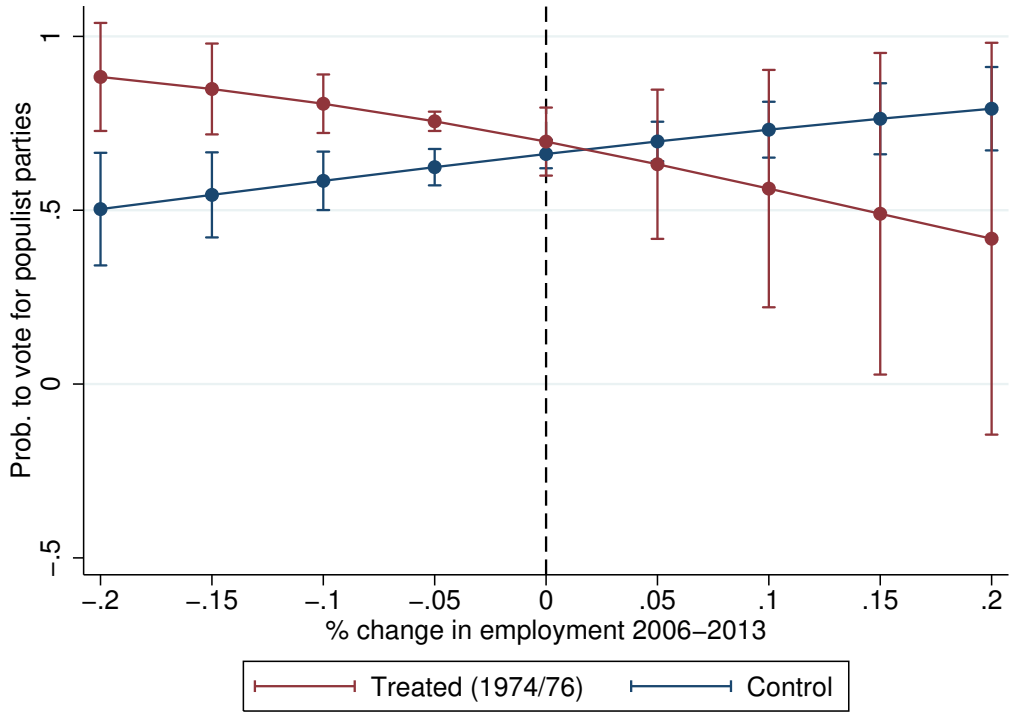
Note: The figure shows the point estimates and the confidence intervals at 90% (i.e. least-wide spikes), at 95% (i.e. medium-wide spikes) and at 99% (i.e. widest spikes) for each group of first-time voters specified in Equation 2. Panel (a)-(c) use a Logit regression model while Panel (d) OLS regression. The dependent variables are being ideologically close to *Lega* (Panel (a)), vote for *Lega* at 1994 election (Panel (b)), vote for *Lega* at 1996 election (Panel (c)) and opinion toward Umberto Bossi (Panel (d)).

Figure A.12: Effect of "Clean Hands" on the Partisanship for *Alleanza Nazionale/Movimento Sociale Italiano* at the Time of the Scandal by Groups of First-Time Voters



Note: The figure shows the point estimates and the confidence intervals at 90% (i.e. least-wide spikes), at 95% (i.e. medium-wide spikes) and at 99% (i.e. widest spikes) for each group of first-time voters specified in Equation 2. Panel (a)-(c) use a Logit regression model while Panel (d) OLS regression. The dependent variables are being ideologically close to *AN/MSI* (Panel (a)), vote for *AN/MSI* at 1994 election (Panel (b)), vote for *AN/MSI* at 1996 election (Panel (c)) and opinion toward Gianfranco Fini (Panel (d)).

Figure A.13: Effect of "Clean Hands" on the 2018 Vote by Change in Employment in the period 2006-2013



Note: The figure shows the predicted probability, and the 95%-confidence intervals, to vote for a populist party at the 2018 elections, for our treated cohort (1974/1976, red line) and the control group (blue line), and by different level of percentage change in employment during the period 2006-2013 within individuals' province of residence.