Enfranchisement, Political Participation and Political Competition: Evidence from Colonial and Independent India*

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Abstract
We examine how political participation and political competition are shaped by two class-based extensions of the franchise in 20th-century India. Creating a new dataset of district level political outcomes between 1921 and 1957, we find that both the partial franchise extension of 1935 and the universal suffrage reform of 1950 led to limited increases in citizen participation as voters or candidates, and neither reform had a significant effect on measures of political competition. Despite the limited effects on political outcomes, districts with greater enfranchisement increases experienced higher education provision by provincial governments.

JEL Codes: D72, N45, P16

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1. Introduction

The consequences of political enfranchisement have long been of interest to philosophers and political scientists (Tocqueville, 1835). While cross-country studies have shown that democratization has important economic consequences (Papaioannou and Siourounis, 2008; Acemoglu et al., 2019), franchise and the right to vote are a necessary but not sufficient condition for countries to be democratic. In this paper, we study how enfranchisement reforms in India changed different facets of democracy including citizen participation and political competition, as well as public good provision.

We analyze two major enfranchisement reforms in 20th century India, a setting that enables us to examine enfranchisement in a relatively poor country. The first is the 1935 Government of India Act, which took place under colonial rule. While provincial elections in colonial India began in the 1920s, several of these were marred by limited participation and electoral boycotts. The 1935 Act lowered the property thresholds for voter eligibility and thereby extended the right to vote to approximately 12% of all citizens, with considerable variation across geographic areas. We analyze data from the 1937 elections following this reform, which saw widespread participation.

The second reform is the implementation of universal adult suffrage by the post-independence 1950 constitution of India, which raised the population share of enfranchised people to 48%. Our paper is thus one of the first to study the consequences of enfranchisement in a colonial setting, and our unique data allows a comparison with the post-colonial setting. We address a range of questions: Does enfranchisement lead to increased citizen participation in a context where elections do not have a long history? How does enfranchisement affect political competition and does it result in a change in the identities of persons and parties that get elected? Does class-based suffrage extension result in better government effort to benefit the newly enfranchised classes, who are poorer and less educated?

Building a novel dataset on electoral results from 1921 to 1957, we track stable geographical units over time (administrative districts) to see how political participation and political competition in those units are affected by these enfranchisement reforms. We relate changes in these outcomes to the district-specific increases in enfranchisement engendered by these reforms, using first-differenced and difference-in-
differences specifications. This methodology allows to separate the effect of enfranchisement change (which varied geographically), net of any changes in the nationwide institutional setting.

We find that the 1935 and 1950 reforms had similar effects. Both led to an increase in the share of voters in the total population. This increase in the proportion of voters is smaller than the increase in enfranchisement itself: a 10-percentage point increase in enfranchisement increases the voter share of the population by only 4.1 percentage points after the 1935 reform, and by 3 percentage points after the 1950 reform. This means that voter turnout, measured as the share of registered voters who exercised their franchise, shows a significant decline in places that experienced a larger increase in enfranchisement. Our results are consistent with prior literature in finding a decline in turnout following franchise extensions. Our effect sizes are also similar to those in previous studies. For instance, Berlinski and Dewan (2011) analyze the impact of the U.K.’s Second Reform Act of 1867 and find that a one standard deviation increase in enfranchisement led to a 3.23 percentage point decline in voter turnout. Larcinese (2017)’s analysis of Italy’s 1912 enfranchisement reform documents a 2.86 percentage point reduction in voter turnout for a similar one standard deviation increase in enfranchisement. In comparison, we find a 2.27 percentage point decline for the India 1935 reform and a 3.36 percentage point decline for the India 1950 reform.

In a similar vein, while the number of candidates increased after each of these reforms, we find that this increase is less than proportional to the enfranchisement increase, so that the number of candidates as a share of all registered voters shows a decline in places where enfranchisement increased by a larger amount. Therefore, a substantial fraction of the population did not exert its political rights after enfranchisement had been enlarged, both in colonial and in independent India.

We use our data to construct several measures of political competition: the number of candidates per seat, the fraction of incumbents who win re-election, the fraction of uncontested races and the Congress Party’s winner share. None of these measures show any statistically significant increases with enfranchisement increases, both for the 1935 reform or for the 1950 reform; if anything, we find that the 1950 reform increases the fraction of incumbents who get re-elected. In sum, our results indicate that, in
both democratic and non-democratic contexts, political enfranchisement leads to similar effects: a less than proportional increase in political participation of the population.

In terms of policy, we find that both the 1935 and the 1950 result in increased policy attention to primary education but not to other levels of education. We face significant data constraints in examining these policy consequences e.g. we are able to only measure education spending in the colonial period (but not actual access to schools), while the post-colonial period has data on the number of schools but not the level of spending; both of these are only available for a subset of provinces rather than nationwide. Nevertheless, we find a positive and significant association between greater enfranchisement and more primary school spending and/or access. Given that the enfranchised population is on average much poorer and less literate, we posit that investment in primary schooling (as opposed to higher levels of education) is aligned with the interests of the newly enfranchised population. In contrast, we find no significant relationship between enfranchisement and health expenditures or access to health facilities, consistent with the idea that rich and poor may have similar preferences with regard to public health policies directed towards infectious diseases that were a major cause of deaths during the period of analysis.

Our study contributes to three distinct literatures in political economy. An extensive literature has studied both individual and institutional determinants of voter turnout, as well as the effects of many contemporary policy interventions.1 Previous papers on the effects of historical enfranchisement reforms have focused on countries like the U.K. (Berlinski and Dewan, 2011 and 2014), the U.S. (Corvalan et al., 2017) or Italy (Larcinese, 2017). All of these were considerably richer than India when suffrage extensions were enacted: India’s GDP per capita in 1950 equaled only 40% of UK’s GDP per capita in 1867, 53% of Italy’s in 1912 and 50% of the USA in 1850 (Maddison Project, see Bolt et al., 2018). We contribute to this

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1 This literature on voter turnout is too large to summarize here. See, among others, recent work on both developing and developed countries (Green and Gerber, 2015; Cheema et al., 2022; Cantoni and Pons, 2022), as well as the literature review in Stockemer (2017).
historical literature by contrasting the effects of enfranchisement between a colonial and a post-colonial setting, and also by focusing on a much poorer setting.\(^2\)

Second, we contribute to the literature that examines the determinants of political competition and vote choices; most prior studies focus on consolidated democracies with strong party systems.\(^3\) We expand this literature by studying an emerging democracy with nascent parties, and using candidate-level competition measures in addition to party-level ones. Prior studies on enfranchisement have found differing effects on political competition. Berlinski and Dewan (2011) find that franchise extension led to significant increases in the candidate-seat ratio, and a significant decline in the fraction of uncontested seats and the share of incumbents standing for re-election. However, Larcinese (2017) finds no increase in the Herfindahl-Hirshman index of vote shares.\(^4\) Our results are similar to the latter paper in finding no significant increases in several different measures of political competition (candidate-seat ratio, fraction of incumbents winning re-election, share of uncontested seats) following the enfranchisement reforms. Our finding of no significant relationship between enfranchisement reforms and the Congress party’s seat share mirrors these prior papers: while Berlinski and Dewan (2011) document increased candidacy by Liberal party candidates and Larcinese (2017) finds more left-wing votes after enfranchisement, neither finds an increase in the actual seats won by these opposition parties.

Third, we add to the literature on enfranchisement and redistributive politics. Many prior papers have examined the consequences of enfranchisement on aggregate government spending, finding widely varying results.\(^5\) A few studies have examined human development outcomes, finding that greater

\(^2\) Many modern-day autocracies hold elections, motivated by the goals of co-opting elites or opposition members, dividing opposing forces or identifying bases of support or opposition (Gandhi and Lust-Ober, 2009). Such motivations may also be at play in colonial contexts. However, one key difference is that the analysis of political competition in autocracies often focuses on contrasting regime-supported candidates and opposition ones, a distinction that was not relevant in the Indian colonial setting. Meng et al. (2023) highlight that authoritarian elections may not have any political or policy consequences, since authoritarians often use various measures to nullify these consequences. The consequences of elections in the colonial context are thus ambiguous ex-ante.

\(^3\) See Cyr and Work (2020) for a brief review of the role played by electoral institutions and societal preferences.

\(^4\) In terms of candidate profiles, all these prior studies (Berlinski et al., 2014; Corvalan et al., 2017; Larcinese, 2017) find that the probability of electing aristocrats or wealthy citizens does not change with enfranchisement. Our data are not detailed enough to permit analysis of candidate backgrounds.

\(^5\) Studies that find no effect of enfranchisement on total government spending include Peltzman (1980) who analyses the U.K., Canada and the U.S., Corvalan et al. (2017) on the U.S., and Profeta et al. (2013)’s study of developing
enfranchisement led to better adult heights (Batinti et al., 2019) and reduced child mortality (Miller, 2008). A larger literature examines the impact of democratization (more broadly defined than enfranchisement) on education provision. While many cross-country econometric analyses find a positive effect on education spending (Stasavage, 2005; Gallego, 2010), some also document a negative effect (Aghion et al., 2019). A key question is whether enfranchisement alone leads to policy changes, as would be predicted by a “median voter” model (Downs, 1957; Meltzer and Richard, 1981), or whether such policy changes would occur only if enfranchisement led to greater political competition or a change in the identity of elected officials, as would be predicted by “citizen-candidate” models (Osborne and Slivinski, 1996; Besley and Coate, 1997). We contribute to this literature by examining both political and development outcomes, which only a few prior studies do. Corvalan et al. (2017) find that government spending changes only when candidate eligibility rules changed in the U.S. and fewer elites were elected to the Senate; Naidu (2012) finds that Black disenfranchisement increased the vote share of the Democratic party and reduced resources to Black schools; Fujiwara (2015) finds that de facto enfranchisement in Brazil increases the seat share of left-wing parties and public health spending. In contrast, our results show that policy outcomes change towards the interests of the newly enfranchised, despite there being no significant effects on political competition or the identity of persons or parties elected to power.

Our paper also speaks to the literature that examines India’s specific democratic trajectory. Several authors have highlighted continuity, arguing that a reason for independent India’s democratic resilience is...
progressive enfranchisement during the late colonial period (Weiner, 1989; Jaffrelot, 1998; Varshney, 1998). Others, such as Shani (2017), posit a fundamental rupture at independence, arguing that it was the move to universal adult franchise with the enactment of the constitution in 1950 which rooted democracy in India. Other aspects of the political context also changed over time. In particular, the power granted to elected representatives was carefully limited throughout the colonial period, and participation in elections and in government was often questioned by the independence movement. Our finding of similar results across the reforms of 1935 and 1950, on both political and policy outcomes, strongly suggests a role for continuity rather than any specific rupture at independence.

The rest of the paper is organized as follows: Section 2 describes the process of enfranchisement in colonial and post-colonial India, Section 3 describes our data sources and Section 4 outlines our empirical strategy. Sections 5, 6 and 7 document the results of our empirical analysis and Section 8 concludes.

2. Franchise Extensions in 20th Century India

2.1. The Government of India Act of 1919

The British empire in India lasted almost 200 years, beginning with the annexation of Bengal by the East India Company in 1757. Following the massive uprising of Indian soldiers against their British officers (the “Sepoy Mutiny” of 1857), the British crown took over the administration of the colony in 1858, and very gradual reforms were undertaken to include more representation of Indians in policymaking (see Appendices B.1 and B.2 for details of these early developments). Direct elections to provincial councils were first provided by the Government of India Act of 1919, also called the Montagu-Chelmsford reforms. This Act also demarcated specific policy areas (such as education and health) to be under the control of

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9 Weiner (1989) points out that “an impressive number of erstwhile British colonies… have maintained British style democratic institutions for all or most of their post-independence history… not a single former Dutch, Belgian or French colony currently has democratic institutions.” Varshney (1998) makes the subtle argument that “It was not the British legacy per se, but rather the strategic interactions that took place between the British authorities and national-movement leaders that laid the foundations of democracy.”
these elected provincial councils, while other areas such as land revenue, finance and law and order remained under the control of the Governors.

Suffrage under the 1919 Act was limited to men above a certain level of income or property. Our data indicate that only 2.5% of the population were eligible to vote in the first direct elections of 1921 (Table 1, panel A). All citizens who were eligible to vote were also eligible to contest the election as candidates. An earlier 1909 policy of separate electorates and separate representation on the basis of religion was retained. This policy meant that there were separate Muslim (and Sikh) electoral constituencies, and these religious groups could only become candidates and vote in these reserved constituencies. Appendix B.3 provides further details on the 1919 reform.

Our analysis will focus on the eight major provinces of British India where provincial councils were set up by the reforms of 1919: Assam, Bengal, Bihar & Orissa, Bombay, Central Provinces & Berar, Madras, Punjab and the United Provinces. Provincial council elections were held in 1920, 1923, 1926 and 1930. However, several of these were affected by political parties’ boycotts. The Indian National Congress declined to participate in the 1920 elections, since Mohandas Gandhi had launched a non-cooperation movement in August of that year. In 1923, after a fierce internal dispute over whether to boycott or not, many Congressmen participated under the banner of the Swaraj Party, with the aim of undermining the working of the ministries from within. The Swarajists did win a considerable number of seats on the provincial councils, and continued to participate in the 1926 elections despite experiencing some internal splits. In 1930, Gandhi launched a second Civil Disobedience movement six months before the elections were conducted, and Congress again boycotted these elections, leading to low voter turnout and a high fraction of uncontested seats. In light of this, most of our analysis of the 1935 enfranchisement reform

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10 The 1919 Act did not grant voting rights to women. Provinces were allowed to amend this provision, and by 1930, all provinces extended the franchise to women under the same income or property requirements as men. Since few women had income or property in their name, the ratio of women to men in the electorate was 1:20.

11 Elections were held in Punjab and Bengal provinces in 1929, while other provinces held elections in autumn of 1930 after the publication of the Indian Statutory Commission report in summer of 1930. The civil disobedience movement began in March 1930.
will compare the 1926 election to that of 1937, omitting the 1930 election. We show that results are similar when comparing the 1937 election to 1930.

2.2. The Government of India Act of 1935: Partial Franchise Extension

Through the 1920s, many political parties and prominent Indian individuals provided their own reports and views about constitutional changes, and two Round Table Conferences were held by the Viceroy to consult with Indian representatives. After much negotiation, the principle of federation was agreed upon, as well as continued separate communal representation for Muslims and Sikhs. Representation for lower caste Hindus was to be ensured by setting aside seats for them, but without any provision for separate electorates. All of these provisions were finally codified in the Government of India Act of 1935.

The Act of 1935 conferred full policy autonomy on provincial councils, in contrast to prior reforms that had reserved some subjects to the sole control of the Governor. The Governor was now obliged to act on the advice of the ministers, except in matters of “grave menace to peace or tranquillity” or “safeguarding the interests of minorities.” The provincial legislative councils were expanded (and renamed Legislative Assemblies) and the bigger provinces were provided bicameral legislatures.

The franchise was considerably expanded in several ways. First, in most provinces, the property thresholds were lowered considerably (see Appendix Table A1 for details of suffrage requirements in the 1919 and 1935 Acts). For instance, the minimum thresholds for voter eligibility in Bengal under the 1919 Act included at least Rs 1-8-0 in municipal taxes and fees, Rs 1 in public works cess, Rs 2 in chaukidari tax or occupying a house valued at Rs 150. These thresholds were reduced considerably in the 1935 Act to 8 annas, 8 annas, 6 annas and Rs 42 respectively. Given that there was little net inflation over this period, this amounted to reductions of more than 50% in the asset thresholds required for voter eligibility. Second, suffrage was also extended in some provinces to educated persons or literate women. Third, women who were wives or widows of qualified male voters (with higher property thresholds than required for male

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12 Monetary amounts expressed as rupees, annas and paisa. There were 16 annas to a rupee and 4 paisa to an anna.
voting) were also allowed to vote, effectively granting voting rights to more women than before.\textsuperscript{13} The 1935 reform therefore changed drastically the electorate towards a much poorer and somewhat more feminine one; we expect that these societal groups are less likely to be educated or literate.

As a result of all these changes, the nationwide fraction of enfranchised electors increased to 11.7\% in the provincial elections of 1937, though the figures varied considerably across provinces and across districts within the same province (see the map in Figure 1). Such variation is driven both by differences in the voting requirements across provinces, and by differences in the distribution of assets, incomes and education levels across districts.

2.3 Post-1935 Political Developments

There was widespread participation by voters and political parties in the provincial elections of 1936-37. The Indian National Congress formed governments in eight out of 11 provinces. However, all the Congress ministries resigned in October 1939, in protest against Viceroy Linlithgow’s announcement of India’s entry into World War II without any consultation from Indian representatives. This extremely short tenure of the representatives elected after franchise extension makes it difficult for us to examine the policy consequences of the 1935 reform. However, there is evidence that the short-lived Congress ministries formed after the 1936-37 elections made concerted efforts in implementing their policy agendas. Education stood out as one of the main areas where the efforts of the ministries were concentrated. In Bombay, the government passed a bill that made provisions for the “better management and control of primary schools,” instituted a board of education to deal with the problem of adult illiteracy in the province and provided special educational grants to disadvantaged groups. In Bihar, a mass literacy movement was initiated that “made good progress with the help of about 14,000 volunteers drawn from the intelligentsia of the province.” The government in United Provinces financed the construction of “a network of 960 adult schools, 760 circulating libraries and 3000 reading rooms”. The Orissa government provided funds for a literacy campaign and library movement across all villages, and also abolished fees in public primary

\footnote{13 The share of women in the electorate was expected to increase from 5\% of the electorate to 20\% (Eddy and Lawton, 1938).}
schools (Indian National Congress, 1939). We will therefore conduct an analysis of education spending as a key policy outcome.

The demands for Indian independence continued, with the Congress launching the “Quit India” movement in 1942; many Congress leaders were jailed for their participation in this event. After the end of World War II, it was clear to many that India would not remain a British colony for much longer. Elections to provincial and central legislatures were held in December 1945-January 1946, with all major parties participating.

2.4. Party Politics in the Colonial Period

Prior to the 1935 Reform Act, electoral candidates were predominantly social and economic elites who used their personal influence to obtain votes for themselves as opposed to subscribing to a political party’s platform (Jaffrelot, 1998). Political parties were not well organized and the largest one, the Indian National Congress, had boycotted some elections in the 1920s. Narrative accounts emphasize that candidates nominated themselves and personally ran their campaigns rather than relying on (barely existing) party machinery. The main issues emphasized were “…of personality, community and local influence [rather] than of party or programme” (Indian Statutory Commission, 1930, pp 199). Other accounts concur that voting was on the basis of individual personality and status rather than policy issues.14 The relative weakness of political parties means that we need to think of political competition as being among individuals rather than across parties. We therefore use the number of candidates contesting as well as whether the incumbent manages to retain his seat as measures of political competition in this period.

By the 1937 elections, political parties, especially the Congress, were much better organized for political activity. The parties set up provincial committees and provincial parliamentary boards to recruit candidates, helped candidates with filing nominations, provided (some) campaign funding and coordinated campaign messages. The issues emphasized were national in nature rather than focused on local interests,

14 “No political issues were at stake in these elections and personal considerations counted a great deal.” (Jha, 1976).
“Manifestoes in these elections of the 1920s were as important for the names of the supporters [of candidates]…as they were for the actual ideas, if any, expressed about political and economic matters.” (Reeves et al., 1975, pp ixiv)
including the question of independence from colonial rule; the rising support for the Muslim League also brought religious divisions to the forefront. However, the role of parties was not fully institutionalized. For instance, nomination forms in the United Provinces did not ask the candidate to specify his party affiliation (Reeves et al., 1975; pp li). By 1945, the Muslim League had emerged as a dominant political force in Muslim-majority areas. The issue of Pakistan and the partition of the subcontinent took centre stage during the 1945 election campaigns, with the Congress strongly opposing partition and the Muslim League championing the cause of a separate Pakistan (Azad, 1988; Zaidi, 1970).

It is important to note that even though parties became important vehicles of political mobilization in the post-1935 era, this did not mean that political competition between different individual candidates went away. For instance, individuals could choose whether to become candidates of the dominant Congress party, or those representing other sectional or regional interests such as the Unionist and National Agriculturist Parties (who represented landowners in Punjab and UP respectively) or Dr Ambedkar’s Independent Labour Party in Bombay (which championed the cause of lower castes). Inter-candidate political competition persisted within the Congress party, as the party changed its criteria for choosing candidates over time (Chiriyankandath, 1992, p. 55-56). Our main measure of political competition—change in the fraction of incumbents who get re-elected—is well placed to track both these types of inter-candidate electoral competition both before and after the 1935 Reform Act. We also compute the fraction of winners from the Congress party as a partial measure of cross-party competition. This is possible only for years 1937 and later.

2.5. The Indian Constitution of 1950: Universal Adult Suffrage

In 1947, India ceased to be a British colony and was partitioned into the two new nations of India and Pakistan. Partition resulted in one of the largest, most rapid and most violent migrations in human history (Khwaja, Mian and Bharadwaj, 2008). The first provincial elections in independent India were held in 1951,
following the adoption of a new constitution in 1950. This constitution established India as a secular democratic republic, and universal suffrage for all citizens aged 21 or older was secured under Article 326. Consequently, the ratio of registered voters to total population increased dramatically to 48.2% in the provincial elections of 1951 and 1952 (Table 1, panel A). Reserved seats were retained for members of the Scheduled Castes and Scheduled Tribes, but there were no more reservations for women under the new constitution. There were also no provisions for separate electorates on any basis. In 1989, the minimum age to vote was reduced to 18 years by the 61st Amendment to the Indian constitution.

Emerging from colonial rule, the Congress Party transformed itself from a broad-based nationalist movement into the dominant political party of the nation, winning a national legislative majority in the 1951 elections and also becoming the largest party in every state legislature. In most states, Congress remained “the largest party—in terms of both votes and seats—for the first 30 post-independence years” (Ziegfeld and Tudor, 2017). Given this dominance in the pre- and post-Independence period beginning with the 1937 elections, we track two measures of party-level political competition in the post-1950 period, namely the share of winners from Congress and the number of parties that nominate candidates for each seat. We continue to track the fraction of incumbents who get re-elected as a measure of inter-candidate political competition, and we also track the fraction of incumbents who run for re-election.

3. Data and Construction of Key Variables

3.1. Data Sources

15 Direct elections were held to provincial assemblies in the early 1950s in Pakistan, but the country was affected by several interventions by the military in the political process, culminating in a military coup in 1958. Owing to these political uncertainties, our analysis excludes electoral data from Pakistan after 1947.

16 The Scheduled Castes are communities that have historically been at the bottom of the Hindu caste hierarchy. Scheduled Tribes include communities traditionally outside the Hindu caste system. These communities were provided with a variety of affirmative action policies in the 1950 constitution.

17 A constitutional amendment in 1993 introduced reservations for women in district and village level councils.

18 Several factors contributed to Congress’s dominance of politics during this period, including its role in the anticolonial nationalist movement, ideologically centrist positioning as the party of national consensus, incorporation of broad swathes of society into its ranks, recruitment of local notables, and strategic use of patronage (see, among others, Bayly (1975), Chandra (2004), Kothari (1976), Tudor (2013), Sisson (1972) and Weiner (1967)).
We collected and digitized archival data on enfranchisement and election outcomes from the “Returns Showing the Results of Elections in India” published after each election during the colonial era. (India Office, 1921, 1924, 1927, 1931 and 1937; Government of India, 1948). These reports cover the elections to provincial assemblies in the colonial period, namely those of 1920, 1923, 1926, 1930, 1937 and 1945. Data for the post-colonial state assembly elections of 1951, 1955 and 1957 were obtained from the official election reports of the Election Commission of India for elections in the 1950s.\(^{19}\)

The election reports are somewhat inconsistent in the variables they report. All of them report the number of registered voters, the number of votes cast and the number of candidates in each constituency. Colonial era reports often do not report names of non-winning candidates or party affiliations, and data on winner names is also incomplete. We used several supplementary sources of information to create a full panel of election winners’ names over time, including the “Who’s Who” publication from Times of India yearbook, and regional specific accounts (see Appendix C.1 for a detailed list of sources). Vote shares and vote margins are consistently available only in the post-colonial data. Only 10-12% of candidate names from the colonial period mention education or occupation and the fraction varies considerably across provinces and years. The extent of missing data on this precludes systematic analysis on the characteristics of candidates. Even such partial data is not available in the post-colonial election reports.

3.2. Data Aggregation to District Level

To track political outcomes over time, we face the issue of constructing geographically stable units over time. Electoral constituency boundaries changed over time, and both the enfranchisement reforms we examine greatly expanded the number of elected representatives. As a consequence, we created district-level aggregate variables, since these administrative district boundaries remained relatively stable over time. In the few cases in which new districts were created, we aggregate them back to their previous boundaries. We consistently perform our analysis at the level of the 1921 district boundaries. Details of this aggregation procedure are provided in Appendix C.2.

\(^{19}\) We thank Francesca Jensenius for sharing these digitized data with us.
3.3. Measures of Enfranchisement

Our main explanatory variable is the enfranchisement rate, which is defined as the number of registered electors in the district divided by its total population. Data on the number of registered voters is available even if the election is uncontested, since these figures are compiled prior to the election taking place. The district level number of registered voters is obtained by aggregating constituency-level figures, using the procedures described in Appendix C.2. For district-level population data, we use the censuses of 1921, 1931 and 1951 (the 1941 census quality and coverage were compromised by the constraints of wartime), assigning the previous census-year population to each election year. Using this measure, we find that only 3% of a district population was eligible to vote in 1926, and this fraction increased to 11.7% in the 1937 election (Table 1, panel A). The introduction of universal adult franchise in 1950 also had a huge impact, raising the average fraction of enfranchised population in a district to 48% in the 1951 elections.

We construct enfranchisement measures using two alternative population estimates. The first is an interpolated population figure in the denominator of the enfranchisement measure. For districts that experienced abnormal increases or decreases in population due to the 1947 partition, such extrapolated population figures for 1957 can be erroneous. The second is an age-adjusted population figure. While the best measure would be to use the population aged 21 or older, we face several data constraints in doing so.20 Despite the measurement constraints, we find that both of these alternative measures show similar four-fold increases in enfranchisement rates after both the 1935 and 1950 reforms (Table 1, panel A).

A potential source of mismeasurement in our data arises from the possibility that not all eligible voters may be actually registered to vote. An electoral roll was prepared for every constituency on which the names of all persons appearing to be entitled to be registered as electors was to be entered. Once

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20 For the censuses of 1921 and 1931, we have population aged 20 and older rather than 21. The 1951 census only has district-level population above the age of 24. It also has the single-age-specific population distribution for 10% of the population, which we can extrapolate to create the population above age 21. Enfranchisement measures using these slightly different age-specific variables for 1951 have a correlation of 0.99; our analysis uses the latter measure. We should note that age data is likely to be very poorly recorded amongst a largely illiterate population without good birth records, and in fact, these estimated populations above age 21 or 24 turn out to be lower than the total number of registered voters for many districts in 1951.
prepared, the roll was to be published in the constituency together with a notice specifying the mode and
time period within which any claims by individuals who felt that they should be included in the roll (or any
persons feeling they should be excluded from the roll) were to be submitted to the revising authorities. The
responsibilities for the preparation of the roll, the timing of its publication, the procedure for addressing
claims regarding the electoral roll and the constitution of the revising authorities were all left to district
administration officials. These officials were officially required to be non-partisan, being mostly career
bureaucrats from the Indian Civil Service (ICS) and related provincial civil services. ICS officers were also
rotated across districts quite frequently (Potter, 1996); we expect this to limit both the district officials’
ability and their incentives to skew electoral rolls in favor of specific candidates in a given area. Such
mismeasurement can lead to bias in our estimates if district level registration rates are correlated with other
unobservable district-specific trends that also drive the outcome. This could be the case, for instance, if
districts that experienced lower (or more) political competition for any reason also promoted greater rates
of registration and therefore record higher enfranchisement figures. We therefore control explicitly for such
pre-reform trends as a robustness check in our estimation.

3.4. Measures of Political Participation

We track citizen political participation as voters and as candidates. Our main measure of voter participation
is simply the number of citizens who voted divided by the total population. Note that if none of the newly
enfranchised voters exercise their right to vote, this measure would not change with enfranchisement. On
the other hand, if all of them chose to vote, then this measure would increase exactly as much as the
enfranchisement measure. We face some measurement challenges in computing this variable: we do not
observe the population of each constituency (but that of the more aggregated district) and we do not know
the number of voters in a constituency when the election is unopposed in that constituency. As a
consequence, we cannot distinguish if an increase in the ratio of voters to population is due to a decrease in
the number of uncontested seats in that district or to a genuine increase in the number of voters, holding the
number of uncontested seats constant. We address this concern by tracking two supplementary measures,
namely the fraction of uncontested seats in the constituency and the voter turnout, defined as the ratio of
total votes cast in a specific election to the total number of registered voters (this explicitly excludes the uncontested seats).

We see that the population share of voters did increase after each reform, rising to 5.5% in 1937 from 0.5% in 1930, and from 4.5% to 22.2% between 1945 and 1951 (Table 1, panel B). Some of this increase could potentially be driven by the steep decline in the share of uncontested elections in both 1937 and 1951 (Table 1, panel C). For 1930, voter share of the population could be further affected by the calls for widespread boycott. Tracking voter turnout, as a share of registered voters, we see that this rises from 51% in 1926 to 57% in 1937 (with a big drop in 1930). In contrast, voter turnout declined slightly from 49% in 1945 to 46% in 1951, the first election after the institution of universal adult suffrage in 1950.

We measure the candidate participation of citizens as the number of candidates per 1000 registered voters in the district. Since the eligibility criteria were the same for voting and for candidacy, this measures what fraction of the potential candidate pool actually become candidates. As with voters, the newly eligible candidate pool may not translate into actual candidacy if there are significant informational, financial or societal barriers to becoming candidates. We also track a supplementary measure, namely the candidate-population ratio.

Both measures of candidate participation declined considerably between 1926 and 1930, reflecting the impact of the Congress-led boycott (Table 1, panels B and C). In contrast, after the franchise extension of 1935, the candidate share of the population almost tripled between 1930 and 1937 reflecting the expansion of the potential candidate pool, but the share of registered voters who became candidates actually fell from 0.27 per 1000 registered voters in 1926 to 0.14 in 1937. This suggests that the expansion of the candidate pool did not translate to a proportionate expansion in the number of actual candidates. In a similar manner, the number of candidates per 100,000 population increased more than three-fold after the franchise extension of 1950, but the share of registered voters that become candidates fell from 0.091 per 1000 voters in 1945 to 0.077 in 1951.

3.5. Measures of Political Competition
We compute three main measures of political competition: the number of candidates per seat in the district (which reflects the extent of opposition faced by those standing for election), the incumbent re-election rate and the fraction of seats won by Congress (as a measure of party competition). Data limitations prevent us from computing other measures of political competition such as the effective number of parties or the winning margin. The incumbent re-election rate is computed as the fraction of incumbent politicians who get re-elected in the next election. So “fraction of incumbents re-elected 1923” refers to the fraction of incumbent politicians (i.e. those who got elected to the provincial legislature from that district in 1921) that win re-election in 1923. Tracking specific politicians across election years is conducted via fuzzy matching combined with manual checking (see Appendix C.3 for details). For the elections of 1937 and later, which provide data on all candidates’ names (not just the winners), we can compute a supplementary measure of incumbency advantage as the percentage of incumbents who run for re-election. We are also able to track the fraction of uncontested elections over time.

We see that the average candidate-seat ratio increased after both the franchise extensions, from 2.27 in 1926 to 2.60 in 1937 (as expected, the boycott in 1930 resulted in an unusually low candidate-seat ratio of 1.83), and from 2.22 in 1945 to 4.51 in 1951 (Table 1, panel B). The fraction of incumbents who got re-elected fell from 35% in 1926 to 13% in 1937 (note that the boycott in 1930 leads to a large increase in incumbency advantage), and from 25% in 1945 to 16% in 1951. Some of the decline can be attributed to incumbents not running for re-election: only 22% of previous winners run for re-election in 1951 (after franchise extension), compared to 31% in 1945 (panel C). The share of uncontested elections also decreased drastically after each reform, from 15% in 1926 to 6% in 1937, and from 26% in 1945 to 0.2% in 1951 (panel C). Turning to party-level competition, we find that the fraction of Congress winners increased from 64% in 1945 to 74% in 1951, consistent with the narrative of Congress establishing a nationwide dominance after Indian independence. This dominance is also reflected in the fact that the number of parties that

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21 When we track incumbent performance directly from 1926 to 1937, we find that 15% of 1926 incumbents are re-elected in 1937, very similar to the earlier figure of 13% of 1930 incumbents who get re-elected in 1937.
nominate candidates for a given seat barely increased after enfranchisement, and that the Congress winners’ share increased despite a decline in the Congress candidates’ share.

4. Empirical Strategy

4.1. First-differenced Regressions

We examine whether districts with larger enfranchisement increases experience larger changes in measures of political participation and competition compared to districts with smaller increases in enfranchisement. Our main regression is a first-differenced specification:

\[ \Delta Y_d = \alpha + \gamma \Delta Enfranchisement_d + X_d'\delta + e_d \]  

(1)

where \( \Delta Y_d \) is the measured change in political participation or competition in district \( d \), \( \Delta Enfranchisement_d \) is a measure of the change in enfranchisement in district \( d \), and \( X_d \) is a vector of district level covariates such as total population, population growth between censuses, urbanization rates, gender ratios, literacy rates, and religious mix; \( e_d \) is an error term. Due to concerns about electoral boycotts, we will compute changes between 1937 and 1926 in order to measure the impact of the 1935 reform, and show the change between 1930 and 1937 as a robustness check. For the 1950 reform, we compute the change between 1945 and 1951, and we also include the fraction of refugees in the population as an additional control in order to account for the direct effects of partition and displacement on political outcomes.

This first-differenced specification compares districts whose enfranchisement increased a lot (i.e. places that were most affected by the reform) to those whose enfranchisement increased less (i.e. places that were less affected), before and after the reforms. When using data from two periods, the coefficients from (1) are identical to those from a difference-in-difference specification with district fixed effects and a time dummy. Since we are comparing each district to itself before and after enfranchisement, we are in effect controlling for any time-invariant characteristics of districts such as geography, prior history, length of colonial rule, land tenure systems or other institutional characteristics. Any changes induced by the
reforms that are common to all districts, such as national changes in political environment or increases in the total number of representatives, are captured by the constant term $\alpha$.

The key identification assumption in any difference-in-difference analysis is that areas that were more or less affected by enfranchisement would have experienced similar changes in the outcome variable before and after the reform in the absence of this enfranchisement reform (the “parallel trends” assumption). While this assumption is not directly testable (we cannot observe what affected areas would look like in the absence of reform), this would be violated if changes in enfranchisement rates happen to be correlated with other characteristics of the district (time-varying or time-invariant) that lead to divergent growth in the outcome variables over time. This assumption would plausibly be violated if we observed more vs less affected areas to be trending differently even before the reform took place (differential pre-trends). Not observing differential pre-trends would suggest that this assumption is reasonable.

We examine and control for these possibilities in several ways. First, we include several district level observable characteristics $X_d$ in our regression. Controlling for these characteristics in a first-difference specification means that we are controlling for differential trends based on these characteristics. Second, we directly control for pre-reform trends in the outcome variable. Third, we run an event-study specification (details below) to check for the existence of differential pre-trends in the data. Finally, we run a difference-in-difference specification with district-specific trends to control for any source of linear trends that are not captured by observable characteristics.

4.2. Event Study Approach and Difference-in-difference Regression

The event study specification compares changes in the outcome variables across different time periods, and across high-vs-low enfranchisement areas.

$$Y_{dt} = \lambda_d + \sum \beta_t + \sum \gamma_t^* \Delta \text{Enfranchisement}_d + X_{dt}' \delta + u_{dt}$$

(2)

where $Y_{dt}$ is the outcome for district $d$ in year $t$, $\lambda_d$ is a dummy (fixed effect) for district $d$, $\beta_t$ is a series of time dummies for each election year $t$, $\Delta \text{Enfranchisement}_d$ is as defined earlier (measuring whether a district is more or less affected by the reform), and $\gamma_t$ is the election-year-specific impact of the change in
enfranchisement. For the 1935 reforms, the election years included are 1921, 1923, 1926, 1930, 1937 and 1945. 1921 will be the omitted category so that the $\gamma_t$ coefficients represent the impact of 1935-reform enfranchisement on the outcome in year $t$. The corresponding specification for the 1950 reform would include elections years 1937, 1945, 1951 and 1957, with the year 1937 being the omitted category.

This specification directly allows us to assess the possibility of differential pre-trends: if our identification strategy is sound, the increase in enfranchisement should affect outcomes only after it is implemented and not before. This also provides a partial check for the possibility of reverse causality: if franchise changes are endogenous to the outcome variables, we may see a differential change in outcomes across more vs less affected areas prior to the reform. This event study approach also allows to see if and how the impact of the reform persists over time. Note, however, that the event study specification is more demanding in terms of degrees of freedom in statistical analysis, since several coefficients need to be estimated. It is also less straightforward to interpret since it provides several coefficients for the impact of the reform.

Our results (Figures 1 and 2) indicate that there are no differential pre-trends prior to the reform, and that the reform appears to have a one-time level effect on the outcomes. Based on this observation, we can run a more parsimonious difference-in-difference regression as follows, grouping all pre-reform years and post-reform years into two categories:

$$ Y_{dt} = \lambda_d + \sum \beta_t + \gamma Post_t \Delta Enfranchisement_d + X_{dt}' \delta + u_{dt}. $$

(3)

The variables are the same as in equation (2), and $Post_t$ is an indicator for post-reform years. For the 1935 reform, election years 1937 and 1945 would take on values of one for the $Post$ dummy, while election years 1921-1930 would have a zero value. For the 1950 reform, election years 1951 and 1957 would have $Post = 1$, while years 1937 and 1945 would have $Post = 0$. The advantage of this specification is that it is less demanding econometrically and easier to interpret, because it produces only one coefficient of interest. Another advantage of this specification is that we can include district-specific time trends in the set of control variables $X_{dt}$, so that we are controlling for any linearly evolving district unobservables. It comes at
a cost of assuming a homogeneous treatment effect over time. To adjust for outcomes being correlated over time within the same district, we cluster our standard errors at the district level in specifications (2) and (3).

5. Impact of the Partial Franchise Extension of 1935 on Political Participation and Competition

5.1. Main Results

We find that increasing enfranchisement does not lead to equally large increases in citizen participation as voters or candidates. Table 2 shows the results of running specification (1) for the 1935 reforms, comparing the 1937 elections to that of 1926 (as the 1930 election was affected by boycotts). Our preferred specification is in column (3), where we include the district demographic controls mentioned earlier and exclude four districts that are outliers in terms of the enfranchisement variable.22 We find that increasing the population share of enfranchised citizens by 10 percentage points increases the voter share of the population by 4.1 percentage points. If we make the (somewhat extreme) assumption that all of the previously enfranchised voters continue to vote, this would mean that only 41% (i.e. less than half) of the newly enfranchised voters are exercising their right to vote. Similarly, a 10 percentage point increase in enfranchisement results in a statistically significant decline of 0.14 candidates per 1000 registered voters (Table 2, panel B, column 3). Note that such reduced citizen participation is not an obvious consequence of poorer voters becoming enfranchised, since poor citizens’ voter turnout is higher in many post-independence Indian elections (Kumar, 2009). Therefore, the less than proportional increase in turnout may be caused either by the newly enfranchised population voting less, or by the previously enfranchised population voting less following franchise extension.23 Unfortunately, our data does not enable us to distinguish between these two mechanisms.

22 These are statistical outliers i.e. very far from the main body of our data. Almora and Ramnad districts show declines in enfranchisement between 1926 and 1937, which is very unlikely since all provinces reduced property thresholds for voting. Bombay and Ahmedabad, on the other hand, show increases in enfranchisement that are much greater than the average in the sample. The corresponding outlier districts for the 1950 reform are Dinajpur and Narsinghpur, which show very minimal enfranchisement increases between 1945 and 1951.
23 Suryanarayan (2019) documents changes in voting patterns of high-caste voters after the announcement of an affirmative action policy for lower castes in 1990.
We verify that these patterns are not driven by pre-existing trends in these political outcome variables that just happen to coincide with high versus low enfranchisement (Table 2, panels A and B, columns 4 and 5). We show that the estimated coefficients remain similar in size and statistical significance when we directly control for pre-reform changes in the outcomes (i.e. the change between 1923 and 1926), as well as when we use a difference-in-difference specification with district-specific linear time trends as in specification (3).

We examine the medium-term effects of the 1935 reforms by examining the changes between 1937 and 1945. In particular, if we think that the relatively muted effects on citizen participation result from a lack of familiarity with the electoral system, we would expect the participation outcomes to show increases over time as citizens acquire political knowledge and experience. We find, however, that this is not the case: places with greater increases in enfranchisement due to the 1935 reform actually exhibit a statistically smaller growth in the voter share of population between 1937 and 1945. While these places do show a larger increase in the candidates per 1000 voters, the coefficient is roughly one-third as large as the original negative coefficient suggesting that the subsequent increase in candidacy is not enough to offset the original decline (Table 2, panels A and B, column 6).

A similar pattern can be observed in the graphical representation of the election-year-specific impact of enfranchisement, obtained from running specification (2). Figure 2A shows that the voter share of the population did not increase prior to the reform, and increases sharply thereafter. Figure 2B shows a slight decreasing trend for candidates per 1000 voters prior to 1935, but a much bigger decline in the 1937 elections with some recovery in the 1945 election. Note that the points on this graph represent how much outcomes change with respect to 1921 as the omitted year, so that the main effects in Table 2 (column 3) would be equivalent to taking the difference between the point estimate for 1937 and the point estimate for 1926 on this graph. Similarly, the medium-term effect would be the difference between the point estimate for 1945 and that for 1937.

Turning to measures of political competition, we find that enfranchisement does not have any statistically significant impact. A 10 percentage point increase in enfranchisement results in 0.21 additional
candidates per seat and a 1.5 percentage point decline in the fraction of incumbents getting re-elected (Table 2, panels C and D, column 3). Not surprisingly, these remain statistically insignificant when controlling for the pre-reform change in outcomes or controlling for district-specific trends (columns 4 and 5). Interestingly, we see decreases in political competition when we consider the medium-term effects: places that experienced greater increases in enfranchisement show a bigger decline in the candidate-seat ratio between 1937 and 1945, and a larger increase in the fraction of incumbents getting re-elected (column 6). The event-study graph in Figure 2D shows that this is mainly because the point estimate for 1937 is negative (in line with our main estimate of Table 2, column 3) and there is an increase in incumbency advantage in 1945, bringing it back to 1923 levels.

5.2. Robustness Checks

We conduct several robustness checks for our results, shown in Appendix Table A3. First, we show that our results remain similar in size and significance when we use the interpolated census population to calculate enfranchisement rates rather than the previous census population (column 1). Our results also remain statistically significant when we use the age-specific population as the denominator to calculate enfranchisement rates (column 2). In fact, with this measure of enfranchisement, we also see a marginally significant increase in the number of candidates per seat. The magnitudes of these coefficients are similar to our main measure: a one standard deviation change in our original enfranchisement measure results in a 1.27 percentage point increase in the voter share of the population and a decline of 0.044 candidates per 1000 registered voters; the corresponding magnitudes for a one standard deviation change in the age-specific enfranchisement measure are 1.07 and 0.046. Similarly, our results remain similar in size and significance when controlling for the change in the number of seats in each district (column 3), when we examine changes between 1930 and 1937 instead of the changes between 1926 and 1937 (column 4), and when we drop districts that later became part of Pakistan (column 5).

A related concern in our statistical analysis may be the presence of district-specific unobserved characteristics that drive both changes in enfranchisement as well as changes in political participation and competition, despite the fact that we have controlled for several demographic characteristics of the district.
One way to control for such omitted variables problems is to use an instrumental variable, namely something that changes district level enfranchisement but is uncorrelated with district-specific characteristics. In our setting, one key source of variation in enfranchisement rates across districts is the wealth threshold and other rules for enfranchisement chosen by the provincial government, which were usually uniform over the whole province with only a few exceptions (see Appendix Table A1). While this may not be fully uncorrelated with district characteristics, it does provide a somewhat exogenous reason for enfranchisement rates to vary across districts. Accordingly, we reran our empirical specification using province dummies as instruments for district-level enfranchisement changes.\textsuperscript{24} Again, we find the same results as before: a less-than-proportional increase in the voter share of the population, a significant decline in the number of candidates as a share of registered voters and no significant effect on candidate-seat ratios or the fraction of incumbents getting re-elected (Appendix Table A3, column 6).

5.3. Supplementary Outcomes

Our main conclusions regarding the effect of enfranchisement on political participation and competition do not change when we examine alternative measures. We see that a 10 percentage point increase in enfranchisement results in a statistically significant 7.32 percentage point decline in voter turnout, measured as the share of registered voters who turn out to vote (Appendix Table A4, panel A, column 3). This is consistent with the result that enfranchisement results in a less-than-proportional increase in the voter share of the population. We also see a significant increase in the candidate share of the total population, but the magnitude of this is fairly small: a 10 percentage point increase in enfranchisement (i.e. in the potential candidate pool) results in 0.33 more candidates per 100,000 population (Panel B, column 3). As before, the results are robust to controlling for the pre-reform change in outcomes as well as to the inclusion of district-specific time trends (Panels A and B, columns 4 and 5), and show no significant increase in the medium...

\textsuperscript{24} We find a strong and significant “first stage” for this regression: the F-statistic for the province dummies as predictors of enfranchisement change is 13.58, even after controlling for district demographics and pre-reform changes in political outcomes. We recognize that this instrumental variables strategy is potentially subject to a failure of the “exclusion restriction,” namely that province characteristics may affect political outcomes through channels other than enfranchisement policies. Hence, this is shown only as a robustness check and not as our main specification.
term either (column 6). Our supplementary measure of political competition—the fraction of uncontested seats—shows no signification relationship with our measure of enfranchisement (Appendix Table A4, panel C). This is consistent with the insignificant results on political competition in Table 2.

6. The Impact of 1950 Universal Suffrage Reform on Political Participation and Competition

6.1. Main Results

We examine the impact on political participation and competition of the adoption of the 1950 constitution that granted suffrage to all adult citizens of India. This was a very large expansion of the franchise, increasing the fraction of enfranchised population in a district by 36.3 percentage points on average, compared to the last pre-independence election of 1945 (Table 1, Panel A). In theory, the impact of such a large extension can be quite different from the earlier expansion of 8.8 percentage points, both because of the different characteristics of those enfranchised by each reform and because of the different political contexts in which these franchise extensions took place. Our main regression specification is still based on equation (1), but with changes now being measured between the elections of 1945 and 1951.

The impact of the 1950 reform on political outcomes is strikingly similar to that of the 1935 reform. On citizen participation, we find that the extension of the franchise to all adults results in a statistically significant but less-than-proportional increase in voting and a statistically significant decrease in candidates per 1000 voters. A 10 percentage point increase in enfranchisement due to the 1950 reform results in only a 3 percentage point increase in the voter share of the population, according to our preferred estimates (Table 3, panel A, column 3). A similar calculation suggests that a 10 percentage point increase in enfranchisement results in 0.011 fewer candidates per 1000 registered voters (Panel B, column 3).

These estimates remain similar in size and significance when we control for the pre-reform change in outcomes (i.e. the change from 1937 to 1945), showing that the relationship with enfranchisement cannot be attributed to differential pre-existing trends (Panels A and B, column 4). The estimates also remain similar in size when controlling for district-specific time trends, though the estimate for the candidate-voter ratio loses statistical significance, when we control for district-specific time trends using the difference-in-
difference specification (Panels A and B, column 5). The medium-term effects, namely the change from 1951 to 1957, are not larger than the immediate effects, showing that citizen participation does not pick up over time in heavily enfranchised districts; in fact, the trends in voter participation are somewhat worsened (Table 3, panels A and B, column 6). The event-study graphs in Figure 3A and 3B confirm that our estimates are not confounded by any pre-existing significant differences in outcomes between areas with higher and lower enfranchisement.

Similar to the effects of the 1935 reform, we find that increased enfranchisement does not result in a proportional increase in political competition. A 10 percentage point increase in enfranchisement increases the candidate-seat ratio by a statistically insignificant 0.17, increases the fraction of incumbents getting re-elected by 6 percentage points (statistically significant at the 10% level) and reduces the fraction of Congress winners by an insignificant 1.5 percentage points (Table 3, panels C-E, column 3). There are also no significant effects of enfranchisement on measures of political competition in the medium term (column 6). Our event study graphs in Figures 3C-3E are consistent with this lack of any effect of the enfranchisement reform on political competition.

6.2. Robustness Tests and Supplementary Outcomes

We conduct a number of robustness checks for the relationships documented in Table 3: using alternative measures of enfranchisement (using interpolated census population or estimated age-specific population as the denominator rather than the previous census population), controlling for the increase in the number of seats and dropping the provinces of Punjab and Bengal to avoid any confounding effects of partition-related deaths or displacement.25 The results are shown in Appendix Table A5. We find that our results are mostly robust to these changes in our specifications, with the exception of the change in the candidate-seat ratio which becomes positive and statistically significant when controlling for the change in the number of seats or when we drop Punjab and Bengal. Note that using age-specific population to compute enfranchisement

25 Unlike the case of the 1935 reforms, individual states had no discretion in framing enfranchisement rules since all places were required to have universal adult franchise. The conceptual basis for conducting an instrumental variables estimation based on province fixed effects is therefore much weaker, and the variation it would rely on is much smaller, since it would depend only on initial enfranchisement levels.
produces estimates that are very similar in magnitude: a one standard deviation increase in our main enfranchisement measure results in a 2.10 percentage point increase in the voter share of the population and a decline of 0.0079 candidates per 1000 registered voters; the corresponding estimates for a one standard deviation increase in the age-specific measure are 2.26 and 0.0086.

In Appendix Table A6, we show results for supplementary political outcomes. The results for voter turnout show that areas with higher enfranchisement increases show a bigger decline in voter turnout, which is measured as the fraction of registered voters who actually voted (our preferred estimates are in panel A, column 3). This is completely consistent with our less-than-proportional increase documented earlier for the voter share of the population. Our supplementary variable of candidate participation, namely the number of candidates per 100,000 population shows a significant increase of about 0.75 for every 10 percentage point increase in enfranchisement (Appendix Table A6, panel B, column 3). We should note that this amounts to only 68% of the mean value in 1945, while enfranchisement increased four-fold between 1945 and 1951; it is thus consistent with our finding in Table 3 that candidates as a share of registered voters declined significantly.

Turning to supplementary measures of political competition, we find that enfranchisement led to decreases in some of these measures. Specifically, while we see no impact of enfranchisement on the fraction of uncontested seats (similar to the 1935 reforms), places with bigger increases in enfranchisement have a significant increase in the fraction of incumbents who run for re-election and a significant decline in the average number of parties contesting each seat. A 10 percentage point increase in enfranchisement results in a 9.2 percentage point increase in the fraction of incumbents that run for re-election (Appendix Table A6, panel D, column 3), which is 29% of the 1945 mean value. Table 3 showed that the fraction of incumbents winning increased by 5.92 percentage points for the same 10 percentage point increase in enfranchisement, indicating that about 64% of these re-running incumbents managed to retain their seats. Similarly, a 10 percentage point increase in enfranchisement decreases the number of parties per seat by 0.17 (panel E, column 3), which is 23% of the 1945 mean value. Overall, we find no evidence that
enfranchisement increases political competition, and some evidence that it may increase incumbency advantage both at the individual and the party level.

7. Policy Effects of Enfranchisement

7.1. Education Spending after the 1935 Reform

Delineating the policy effects of the 1935 enfranchisement reform is hampered due to historical events and data limitations. The Congress-led ministries that were elected in 1937 resigned in 1939, in protest against Viceroy Linlithgow’s unilateral announcement of India’s entry into World War II, and policy decisions after 1939 may also be confounded by the effects of wartime constraints. This gives us a relatively short time frame to assess the impact of the 1939 reform. We focus on education, since the narrative evidence suggests that this was prioritized by many of the newly elected provincial governments after 1935, and also because we are able to obtain data for several provinces. Education is a particularly interesting outcome, given that spending on primary vs secondary or middle schooling will benefit different strata of the population. Primary education will disproportionally benefit the poorer strata of the population, from which the newly enfranchised population is drawn, whereas middle and secondary education will benefit the relatively richer, already enfranchised population. We also examine similar data on health spending. We expect a lower preference differentiation between rich and poor voters on health rather than education, since large-scale public health measures (vaccination, sanitation etc) to combat the widespread infectious diseases would be equally available to rich and poor voters. While provincial governments also enacted other policies (e.g. Bombay Trade Disputes Act of 1938, United Provinces Tenancy Bill, 1939), we do not have systematic data on how these measures affected each district.

We conducted a first-difference analysis using data on per capita education and health spending at the district level, which we were able to obtain from the annual issues of the “Report on the Working of District Boards.” We were able to access these reports for the provinces of Assam, Bihar, Central Provinces and United Provinces for the years 1931-1940, though there are some missing years for each provincial series. Using the period 1931-1934 as “pre-enfranchisement” and 1937-1940 as “post-enfranchisement”
years, we calculate the difference in the per capita spending on education and regress it on district level
enfranchisement increases, as in equation (1). We find that districts that experienced larger increases in
enfranchisement also experienced larger increases in per capita education spending, though the effects are
somewhat imprecisely estimated given the limited nature of the data. In particular, we find that districts
with a 10 percentage point increase in enfranchisement had 0.01 rupees per capita higher education
spending, which is 5 percent of the pre-1935 mean. This estimate is computed after controlling for
demographics and removing outliers, and is statistically significant at the 10% level of significance (Table
4, panel A, column 3). Most of this increase is attributable to the increase in primary school spending
rather than middle school spending: while these coefficients are not statistically significant, we see that the
primary school spending coefficient is almost the same size as the overall coefficient while the coefficient
on middle school spending is much smaller and negatively signed (Table 4, panels B and C, column 3).

These results are consistent with the narrative evidence of elected provincial councils prioritizing education
as a policy area (see Section 2.3). In contrast, we find no significant increase in health spending directed
towards areas with greater enfranchisement increases (Table 4, panel D), consistent with the idea that rich
and poor voters do not have divergent preferences over public health spending.

7.2. Access to Schools After the 1950 Reform

District-level expenditure data is not available for the post-independence period. To track the progress of
education provision, we therefore track the fraction of villages that had at least one primary school,
obtaining data from the 1951 and 1961 district census handbooks. We are able to obtain these data for the
provinces of Bengal, Bombay, Madras, Punjab and the United Provinces. We also track similarly the
fraction of villages that had a hospital or dispensary; data for this variable is available for a lot fewer districts
than for schools.

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26 Chaudhary (2010) estimates that a 10% increase in 1911 per capita education spending results in a 2.6 percentage
point increase in literacy rates for individuals aged 5-10 years. Based on this, our estimates would mean that a 10
percentage point in enfranchisement could result in a 1.3 percentage point increase in literacy rates. This is quite large,
since 1931 literacy in the 5-10 age group was only 5.9% for males and 2.0% for females.
27 Suryanarayan (2021) finds a decline in land tax collections in anticipation of the 1919 enfranchisement reform.
Our finding of greater expenditure is net of any such revenue declines that may have occurred for the later reform.
As above, we regress the change in the fraction of villages with primary schools or health facilities (between 1951 and 1961) on the change in enfranchisement induced by the 1950 reform. We find a positive and statistically significant relationship between these two variables for education facilities (Table 5, panel A, column 3). Our results thus suggest that increasing enfranchisement does result in better education provision, even though the reform does not increase measures of political competition. Note that this is not simply a continuation of pre-independence trends, since the areas with greater enfranchisement increases after 1950 are the ones that had lower increases in enfranchisement after the 1935 reform. Our post-independence results thus show a shifting of spending priorities across areas based on enfranchisement changes.

Does increased enfranchisement lead to increased provision of all public goods and services, regardless of differences in voter preferences? As for the colonial period, we find only a small and insignificant relationship with enfranchisement increases for health facilities (Table 5, panel B). This is consistent with the idea that public health provision is unlikely to be differential across less and more enfranchised districts, since rich and poor alike benefit from programs such as malaria eradication or vaccination campaigns, and because private provision of such programs is much less feasible than private provision of education. Consistent with this low association with health facilities, we find that while there was an overall reduction in crude death rates between 1951 and 1961, this decline is not differential across districts with greater or lesser enfranchisement increases (Appendix Table A7, panel A, column 3). A similar insignificant effect is obtained for the decline in death rates due to infectious diseases (panel B), which accounted for more than half of the overall decline in death rates. Crude birth rates, which could be affected by population control policies, also show no differential changes between districts with larger or smaller enfranchisement increases (panel C).

7. Conclusions
We study two major extensions of the right to vote in twentieth-century India. Our study differs from prior ones in examining suffrage extensions in both a colonial and a post-colonial setting. Our study is also situated in a much poorer country, compared to previous studies on the U.K., Italy or the U.S.

We create a unique database of provincial election results in India between 1921 and 1957, and document three important findings. First, extending the franchise results in a less-than-proportional increase in citizen participation as voters or candidates. Franchise extension also has no significant effects on measures of electoral competition such as the fraction of incumbents who win re-election, the number of candidates or parties contesting a given seat, the share of uncontested electoral races and the Congress party’s share of winners. Second, despite the small increase in citizen participation and the lack of political competition, districts that had larger increases in enfranchisement also experience greater education provision by provincial governments, which is likely to benefit the newly enfranchised voters more. Third, the results on political participation and competition are similar for the colonial period and the newly independent period. Perhaps this is attributable to the relatively short time between the 1935 and 1950 reforms. Analysis of long-term trends in England show that party-based voting became widespread about three decades after the first Reform Act of 1832 (Cox, 1986; Dewan et al., 2020) and that the extent of political competition significantly affected legislative actions only after the third Reform Act of 1884 (Eggers and Spirling, 2014). Combined with the fact that our short-term results on voter turnout are quantitatively similar to prior studies of much richer and independent countries, this suggests that existing theories of political economy do not necessarily need to account for factors like colonial rule or the stage of economic development, but may need to take into account longer-term changes in political dynamics. Examination of such long run effects in other colonial or developing country contexts will be a great avenue for future research.

References


Tocqueville, Alexis. 1835. *Democracy in America*.


Table 1: Summary Statistics of Key Variables

<table>
<thead>
<tr>
<th></th>
<th>1921</th>
<th>1923</th>
<th>1926</th>
<th>1930</th>
<th>1937</th>
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<th>1957</th>
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<td>167</td>
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<td># seats per district</td>
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<td>2.6</td>
<td>2.6</td>
<td>2.6</td>
<td>6.5</td>
<td>6.5</td>
<td>12.9</td>
<td>13.3</td>
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</table>

**Panel A: Measures of enfranchisement**

- % enfranchised (previous census pop in denominator)  
  - 0.025  
  - 0.027  
  - 0.030  
  - 0.029  
  - 0.117  
  - 0.119  
  - 0.482  
  - 0.535  
- % enfranchised (interpolated pop in denominator)  
  - 0.025  
  - 0.027  
  - 0.028  
  - 0.029  
  - 0.105  
  - 0.126  
  - 0.482  
  - 0.500  
- % enfranchised (age-specific pop in denominator)  
  - 0.047  
  - 0.051  
  - 0.056  
  - 0.059  
  - 0.241  
  - 0.322  
  - 1.063  
  - 1.178

**Panel B: Main outcomes (political participation and competition)**

- Voters as a share of total population  
  - 0.005  
  - 0.009  
  - 0.012  
  - 0.005  
  - 0.055  
  - 0.045  
  - 0.222  
  - 0.247  
- Candidates per 1000 registered voters  
  - 0.361  
  - 0.333  
  - 0.270  
  - 0.191  
  - 0.144  
  - 0.091  
  - 0.077  
  - 0.049  
- Candidate-seat ratio  
  - 2.81  
  - 2.46  
  - 2.27  
  - 1.83  
  - 2.60  
  - 2.22  
  - 4.51  
  - 3.11  
- Fraction of incumbents who get re-elected  
  - 0.234  
  - 0.347  
  - 0.352  
  - 0.129  
  - 0.248  
  - 0.162  
  - 0.314  
  - 0.153  
  - Alternative measure of above (comparing 1937 to 1926)  
  - 0.512  
  - 0.643  
  - 0.741  
  - 0.656  

**Panel C: Supplementary outcomes (political participation and competition)**

- Voter turnout, as a share of registered voters  
  - 0.277  
  - 0.431  
  - 0.512  
  - 0.332  
  - 0.569  
  - 0.492  
  - 0.463  
  - 0.491  
- Candidates per 100,000 population  
  - 0.726  
  - 0.658  
  - 0.585  
  - 0.459  
  - 1.384  
  - 1.098  
  - 3.701  
  - 2.440  
- Fraction of uncontested seats  
  - 0.249  
  - 0.144  
  - 0.149  
  - 0.459  
  - 0.058  
  - 0.258  
  - 0.002  
  - 0.008  
- Fraction of incumbents who ran for re-election  
  - 0.256  
  - 0.310  
  - 0.219  
  - 0.445  
  - 0.234  
- Alternative measure of above (comparing 1937 to 1926)  
  - 0.729  
  - 0.737  
  - 0.495  

Notes: Data for 1951 and 1957 exclude districts that became part of Pakistan after 1947. Voter turnout is undefined for uncontested constituencies. "Age-specific population" refers to population aged 20 and above for years prior to 1947, and to population aged 21 and above for 1951 and 1957 obtained by extrapolation from a 10% single-age sample.
Table 2: Impact of 1935 Reforms on Political Participation and Competition

<table>
<thead>
<tr>
<th></th>
<th>1926 to 1937</th>
<th>Controls</th>
<th>Remove Outliers</th>
<th>Control for pre-reform change in outcome</th>
<th>Control for district-specific trends</th>
<th>Medium term effect 1937 to 1945</th>
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<tr>
<td><strong>Panel A: Change in voter share of total population</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
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<td></td>
</tr>
<tr>
<td>Change in % enfranchised</td>
<td>0.245***</td>
<td>0.294***</td>
<td>0.411***</td>
<td>0.416***</td>
<td>0.359***</td>
<td>-0.137**</td>
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<tr>
<td></td>
<td>(0.058)</td>
<td>(0.059)</td>
<td>(0.034)</td>
<td>(0.033)</td>
<td>(0.069)</td>
<td>(0.063)</td>
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<td>198</td>
<td>198</td>
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<td>198</td>
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<tr>
<td>R-squared</td>
<td>0.245</td>
<td>0.354</td>
<td>0.479</td>
<td>0.518</td>
<td>0.887</td>
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<td><strong>Panel B: Change in candidates per 1000 registered voters</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Change in % enfranchised</td>
<td>-0.858**</td>
<td>-1.391***</td>
<td>-1.423***</td>
<td>-1.401***</td>
<td>-1.876***</td>
<td>0.494***</td>
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<td></td>
<td>(0.343)</td>
<td>(0.441)</td>
<td>(0.522)</td>
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<td>202</td>
<td>198</td>
<td>198</td>
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<td>198</td>
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<tr>
<td>R-squared</td>
<td>0.027</td>
<td>0.093</td>
<td>0.106</td>
<td>0.113</td>
<td>0.781</td>
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<td><strong>Panel C: Change in candidate-seat ratio</strong></td>
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<tr>
<td>Change in % enfranchised</td>
<td>-1.242</td>
<td>0.692</td>
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<td>0.111</td>
<td>0.101</td>
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<td>0.316</td>
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<td><strong>Panel D: Change in fraction of incumbents who get re-elected</strong></td>
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<td>Change in % enfranchised</td>
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<td>Y</td>
<td>Y</td>
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<td>Y</td>
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</table>

Notes: Robust standard errors in parentheses. *** indicates statistical significance at 1%, ** at 5%, * at 10%. Controls include district population, literacy, urbanization, gender ratio, fraction of Hindus and Christians, and fraction of population employed in agriculture in 1921, and population growth rates between 1921 and 1931. Difference-in-difference estimates based on specification (2) in the paper.
Table 3: Impact of 1950 Reforms on Political Participation and Competition

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<td>(6)</td>
</tr>
<tr>
<td><strong>Panel A: Change in voter share of total population</strong></td>
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<td></td>
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<tr>
<td>Change in % enfranchised</td>
<td>0.269***</td>
<td>0.312***</td>
<td>0.296***</td>
<td>0.298***</td>
<td>0.268***</td>
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<td></td>
<td>(0.044)</td>
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<td>167</td>
<td>165</td>
<td>165</td>
<td>660</td>
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<tr>
<td>R-squared</td>
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<td><strong>Panel B: Change in candidates per 1000 registered voters</strong></td>
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<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Change in % enfranchised</td>
<td>-0.102***</td>
<td>-0.091***</td>
<td>-0.112***</td>
<td>-0.097***</td>
<td>-0.101</td>
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<td>(0.046)</td>
<td>(0.086)</td>
<td>(0.026)</td>
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<td>167</td>
<td>165</td>
<td>165</td>
<td>660</td>
<td>165</td>
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<tr>
<td>R-squared</td>
<td>0.037</td>
<td>0.203</td>
<td>0.206</td>
<td>0.229</td>
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<td>0.384</td>
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<td><strong>Panel C: Change in candidate-seat ratio</strong></td>
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<tr>
<td>Change in % enfranchised</td>
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<td></td>
<td>(1.465)</td>
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<td>(1.299)</td>
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<td>165</td>
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<td>0.322</td>
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<td><strong>Panel D: Change in fraction of incumbents who get re-elected</strong></td>
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<td></td>
<td></td>
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<tr>
<td>Change in % enfranchised</td>
<td>0.733***</td>
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<td>(0.317)</td>
<td>(0.297)</td>
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<td>R-squared</td>
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<td><strong>Panel E: Change in fraction of Congress winners</strong></td>
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<tr>
<td>Change in % enfranchised</td>
<td>-0.242</td>
<td>-0.195</td>
<td>-0.146</td>
<td>-0.139</td>
<td>-0.131</td>
<td>-0.013</td>
</tr>
<tr>
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<td>(0.365)</td>
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<td>(0.395)</td>
<td>(0.576)</td>
<td>(0.314)</td>
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<td>165</td>
<td>660</td>
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<tr>
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<td>Y</td>
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Notes: Robust standard errors in parentheses. *** indicates statistical significance at 1%, ** at 5%, * at 10%. Controls include district population, literacy, urbanization, gender ratio, fraction of Hindus and Christians, and fraction of population employed in agriculture in 1931, population growth rates between 1931 and 1951 and the fraction of refugees in 1951. Difference-in-difference estimates based on specification (2) in the paper.
Table 4: Impact of 1935 Reforms on Education and Health Spending

**Dep var:** Change in per capita spending between pre-1937 (1931-1934) and post-1937 (1937-1940)**

<table>
<thead>
<tr>
<th>Panel A: Change in Total Education Spending per Capita</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mean of spending variable over 1931-1934 (rupees)</td>
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<tr>
<td>Change in % enfranchised</td>
</tr>
<tr>
<td>0.198</td>
</tr>
<tr>
<td>(0.074)</td>
</tr>
<tr>
<td>Observations</td>
</tr>
<tr>
<td>R-squared</td>
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<table>
<thead>
<tr>
<th>Panel B: Change in Primary School Spending per Capita</th>
</tr>
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<tbody>
<tr>
<td>Mean of spending variable over 1931-1934 (rupees)</td>
</tr>
<tr>
<td>Change in % enfranchised</td>
</tr>
<tr>
<td>0.136</td>
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<td>(0.054)</td>
</tr>
<tr>
<td>Observations</td>
</tr>
<tr>
<td>R-squared</td>
</tr>
</tbody>
</table>

<table>
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<tr>
<th>Panel C: Change in Middle School Spending per Capita</th>
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</thead>
<tbody>
<tr>
<td>Mean of spending variable over 1931-1934 (rupees)</td>
</tr>
<tr>
<td>Change in % enfranchised</td>
</tr>
<tr>
<td>0.038</td>
</tr>
<tr>
<td>(0.035)</td>
</tr>
<tr>
<td>Observations</td>
</tr>
<tr>
<td>R-squared</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Panel D: Change in Total Health Spending per Capita</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mean of spending variable over 1931-1934 (rupees)</td>
</tr>
<tr>
<td>Change in % enfranchised</td>
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<tr>
<td>0.043</td>
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<td>(0.041)</td>
</tr>
<tr>
<td>Observations</td>
</tr>
<tr>
<td>R-squared</td>
</tr>
</tbody>
</table>

| Controls                                              | N       | Y       | Y       |
| Remove outliers                                       | N       | N       | Y       |

Notes: Robust standard errors in parentheses. *** indicates statistical significance at 1%, ** at 5%, * at 10%. Controls include district population, literacy, urbanization, gender ratio, fraction of Hindus and Christians, and fraction of population employed in agriculture in 1921, and population growth rates between 1921 and 1931.
Table 5: Impact of 1951 Reforms on Access to Primary Schools and Health Facilities

<table>
<thead>
<tr>
<th></th>
<th>Mean of primary school/health facility access in 1951</th>
<th>Controls</th>
<th>Remove outliers</th>
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</thead>
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<td></td>
<td>(1)</td>
<td>(2)</td>
<td>(3)</td>
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</tbody>
</table>

**Panel A: Change in fraction of villages with access to primary schools (1951 to 1961)**

<p>| | | | |</p>
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<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Change in % enfranchised</td>
<td>0.417</td>
<td>0.716</td>
<td>0.809*</td>
</tr>
<tr>
<td></td>
<td>(0.487)</td>
<td>(0.409)</td>
<td>(0.349)</td>
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<tr>
<td>Observations</td>
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<td>107</td>
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<td>R-squared</td>
<td>0.027</td>
<td>0.448</td>
<td>0.129</td>
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</table>

**Panel B: Change in fraction of villages with access to hospitals and dispensaries (1951 to 1961)**

<p>| | | | |</p>
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<th></th>
<th></th>
<th></th>
<th></th>
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</thead>
<tbody>
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<td>Change in % enfranchised</td>
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<td>(0.092)</td>
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<td>Remove outliers</td>
<td>N</td>
<td>N</td>
<td>Y</td>
</tr>
</tbody>
</table>

Notes: Robust standard errors in parentheses. ***indicates statistical significance at 1%, **at 5%, *at 10%. Controls include district population, literacy, urbanization, gender ratio, fraction of Hindus and Christians, and fraction of population employed in agriculture in 1931, population growth rates between 1931 and 1951 and the fraction of refugees in 1951.
Figure 1: Changes in Enfranchisement Caused by the 1935 and 1950 Reforms

Notes: Enfranchisement is measured as the number of registered voters divided by the population of the district. Maps show the change in this measure due to the reforms of 1935 and 1950.
Figure 2: Event Study Estimates of 1935 Reform Impact

Notes: Points denote estimates obtained from the event-study specification in equation (3) in the paper. Vertical lines denote the 95% confidence intervals, based on standard errors clustered at the district level.
Figure 3: Event Study Estimates of 1950 Reform Impact

Notes: Points denote estimates obtained from the event-study specification in equation (3) in the paper. Vertical lines denote the 95% confidence intervals, based on standard errors clustered at the district level.