# INTEREST GROUPS, IDEOLOGY and INDIRECT LOBBYING: THE RISE OF PRIVATE HEALTH INSURANCE IN THE UNITED STATES

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#### Abstract

This study examines the rise of private health insurance in the United States in the post-World War II era (1946-1954). We investigate the role of the American Medical Association (AMA) which financed a campaign against National Health Insurance that was directed by the country's first political public relations firm, Whitaker and Baxter (WB). The AMA-WB Campaign had two key components: (1) physician outreach to patients and civic organizations; and (2) mass advertising that tied private insurance to "freedom", "individualism", and "the American way". We bring together archival data from several novel sources documenting Campaign intensity. We find a one standard deviation increase in Campaign exposure explains about 20% of the increase in private health insurance enrollment and a similar decline in public opinion support for legislation enacting National Health Insurance over the time period of our analysis. We also find suggestive evidence that the Campaign altered the narrative for how legislators and pollsters described health insurance. These findings suggest the rise of private health insurance in the U.S. was not solely due to wage freezes, collective bargaining, or favorable tax treatment. Rather, it was also enabled by an interest group financed Campaign that used ideology to influence the behavior and views of ordinary citizens.

**Keywords:** persuasion, health insurance, interest groups, narrative, public relations, ideology **JEL Codes:** 114, 118

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"The United States is almost alone among developed countries in lacking some government-mandated form of comprehensive health coverage for all or nearly all its population. Its divergent path became apparent primarily after World War II when most other countries moved to adopt, restructure, or complete their schemes for protecting most of their population against expenses for medical care."

#### - Institute of Medicine (1993, p.57)

"The immediate objective is the defeat of the Compulsory Health Insurance program in Congress – and there is great urgency in that phase of the problem... The long-term objective is to put a permanent stop to the agitation for Compulsory Health Insurance – and the most vital step in achieving that objective will be an all-out campaign to enroll the American people in Voluntary Health Insurance systems... We want everybody in the health insurance field selling insurance during the next two years as he has never sold it before – knowing that he has the prestige of the American Medical Association, and all its power and facilities, squarely behind him. And we are going to ask the doctors, when they are talking to patients in their offices, who are in need of budget-basis medicine, to take time to encourage them to enroll in a good, sound Voluntary health system."

#### - AMA's Plan of Battle, Clem Whitaker and Leone Baxter (1949)

# I Introduction

America is exceptional on several margins, and one of the most prominent is in its financing and provision of health care.<sup>1</sup> The U.S. relies heavily on the private sector for both functions and spends more on health care and its administration than any other country.<sup>2</sup> Yet health outcomes are often worse on average with substantial variability (Bilinski, Thompson and Emanuel 2023; Chetty et al. 2016; OECD 2023; Papanicolas, Woskie and Jha 2018). Americans also experience higher rates of uninsurance and higher medical debt than citizens of peer nations (Kluender et al. 2021; Osborn et al. 2016; Schneider et al. 2021). This lackluster performance coupled with rising deficits has heightened scrutiny of the current healthcare system, including by leading health economists (*e.g.*, Baicker, Chandra and Shepard 2023; Case and Deaton 2020; Einav and Finkelstein 2023; Ericson and Sydnor 2017).<sup>3</sup> This project steps back from current debates and attempts to shed light on how the U.S. arrived at its present system. We examine a critical period in the development of health insurance in the post-World War II era.

The origins of private insurance for health care in the U.S. trace back to the Great Depression when reduced philanthropic flows to hospitals paved the way for experimentation with pre-payment service plans that would later become Blue Cross.<sup>4</sup> The subsequent take-off in enrollment for medical insurance has typically been attributed to monetary and fiscal policy and the efforts of organized labor. In 1942, the Stabilization Act allowed employers to offer health insurance as part of employee benefits. In 1949, the Supreme

<sup>&</sup>lt;sup>1</sup>Brown and Glied (2020, p.495) write: "Most nations ponder what particularistic accent marks to paint on their broad universalist canvas. The United States wonders how its particular parts can be made to sum to something closer to a universalist whole. The United States is then, as everyone knows, an international outlier, an exceptional case in its reliance on weakly regulated private health insurance as its basic source of basic coverage."

<sup>&</sup>lt;sup>2</sup>The expenditure gap is driven by prices, not quantities (Anderson et al. 2003; Cooper et al. 2019; Reinhardt, Krugman and Frist 2019).

<sup>&</sup>lt;sup>3</sup>Writing before the COVID-19 pandemic, Case and Deaton asked: "How is it then possible that life expectancy at birth has fallen for three years in a row—something that has not happened in other countries and that has not happened in America since the Great Influenza Pandemic of a century ago? The truth is that these horrors are happening not in spite of the American health care system but because of it" (Case and Deaton 2020, p.186). The U.S. recorded the largest drop in life expectancy of any OECD country during the pandemic (OECD 2021).

<sup>&</sup>lt;sup>4</sup>This project focuses not on the early distress-related beginnings of hospital-based plans, which were also seen in Canada and other countries, but rather the increase in enrollment for medical insurance. The relationships between different forms of insurance are discussed in Section II.1 and Appendix Sections E.4 and E.5.

Court declined to review the *Inland Steel Co. v. National Labor Relations Board* decision, which stated that such benefits could be part of collective bargaining. Most consequentially, in 1954, a change to the tax code affirmed nationally that employers could make tax-exempt payments to private health insurers (PHI) on behalf of their employees (Blumenthal 2006; Brown and Glied 2020; Cushing 2017; Eilers 1963; Helms 2008; Thomasson 2002, 2003). Causal evidence on the importance of these events is limited, with Thomasson (2003) – who studies the immediate effects of the 1954 tax policy change – the notable exception.<sup>5</sup> An important but under-appreciated factor in the proliferation of private health insurance in the U.S. may have been the professionalization of American medicine and how it organized resources to oppose National Health Insurance (NHI), the focus of this paper.

The medical profession consolidated in the decades around the 1910 Flexner report, when half of U.S. medical schools closed and state medical boards tightened licensing requirements (Clay et al. 2023). These local and state medical societies were further vertically integrated at the national level into the American Medical Association (AMA). Adding to the profession's authority was improved technology that could save lives but also required specific skills. Physician incomes doubled over a five-year period (1940-1945) with growth driven by specialists who came to dominate AMA membership and leadership. As its membership and the power of its members grew, the AMA embraced the view that government sponsorship of insurance was a threat to the profession's medical and financial sovereignty thus vehemently opposed it.

Coinciding with this trend was the emerging industry of political public relations. The husband-wife team of Clem Whitaker and Leone Baxter started the first political lobbying firm in the U.S.: *Campaigns, Inc.* (Cutlip 1994; Johnson 2016; Lepore 2012). The firm was based out of California, the breeding ground for progressive ideas due to the state's referendum system, and according to Whitaker, also the "burial ground" due to their firm's efforts (Whitaker & Baxter *Campaigns, Inc.* 1945). Whitaker & Baxter (WB) mastered *indirect* lobbying – the persuasion of ordinary citizens through mass media with gimmicks and simple messages. Following the Truman administration's embrace of legislation to establish a national health system, the AMA hired Whitaker & Baxter to direct a Campaign: The objectives were to defeat Congressional efforts in the short-term and to quash demand for NHI in the long-term (Burrow 1963). Towards that end, the Campaign sought to enroll citizens in private (*i.e.*, voluntary) health insurance, including medical plans run by physicians via local or state medical societies (*i.e.*, Blue Shield).

The AMA-WB Campaign was comprised of two main components: physician outreach and mass communications via advertising. First, tens of thousands of physicians were tasked with distributing pamphlets and endorsing private health insurance to their patients, as well as serving as liaisons to civic organizations. Second, a massive newspaper ad buy was conducted and focused on themes of freedom, individualism, and the American way. Policy options were framed in terms of *voluntarism* vs. *compulsion*, not private vs. public.<sup>6</sup> While the public sector was muzzled due to regulatory and budgetary constraints, the AMA spent the equivalent of USD \$18 million augmented by another USD \$250 million (both figures in current terms)

<sup>&</sup>lt;sup>5</sup>There is also an extensive, more recent literature on the relationship between tax policy and private health insurance. See Feldstein and Friedman (1977), Goda (2011), Gruber and Madrian (1997), Gruber and Poterba (1994), Gruber (2002), Gruber (2003), Gruber and Washington (2005), Gruber (2011), Holmer (1984), Madrian (1994), Selden (2009), and Stavrunova and Yerokhin (2014).

<sup>&</sup>lt;sup>6</sup>As noted by Paul Starr (1982, p.286) in *The Social Transformation of American Medicine*, "America is frequently described as a less ideological society than Europe, more given to interest-group than ideological politics. The AMA's battle against health insurance is often cited as a premier case of interest-group political influence. But throughout the debate over health insurance in the United States, the conflict was intensely ideological, much more so than in Europe. The interest groups opposed to health insurance repeatedly found it useful to cast the issue in ideological terms as freedom vs. fairness." Starr further notes that both sides have legitimate claims on some "deeply rooted aspect of American belief." However, there was a vast difference in resources.

of tie-in advertising from industry supporters (Begeman 1950; Means 1950).<sup>7</sup>

This project investigates whether and to what extent the AMA-WB Campaign affected enrollment in private health insurance and views on legislative efforts. We also examine the Campaign's effects on direct lobbying during the 1952 presidential election and the narrative surrounding health insurance more broadly. Our study takes place over the critical period 1946-1954 with 1948 to 1950 being the "failed moment" for NHI, according to political scientists Doherty and Jenkins (2009). We compile data we believe are new to the literature, including internal documents on Campaign strategy and operations recovered from the Whitaker & Baxter firm archives. These sources are combined with data we digitized from various years of the Directory of American Physicians published by the AMA, the Directory of Hospitals by the American Hospital Association (AHA), Ayer & Son's newspaper directory circulation data, and plan level enrollment information from annual reports produced by the AMA's Council on Medical Service (American Medical Association 1942, 1950a; American Hospital Association 1948, 1950, 1952; Aver 1949; Council on Medical Service 1946-1954). We leverage new tools developed for optical character recognition and analyze advertisements from historical newspaper databases (Shen et al. 2021). Lastly, we use standard sources such as Gallup polls and speeches from the Congressional Record to assess whether pollsters and policymakers adopted the language of the Campaign (Berinsky and Schickler 2020; Caughey et al. 2020; United States Congress 1947, 1948, 1949, 1950).

Our primary estimation strategy compares enrollment in PHI and individual citizens' views on NHI before and after the Campaign, across places that differed in its intensity. To construct Campaign exposure we combine mass advertising (per capita Campaign-related ads scaled by local readership) with physician outreach (per capita Campaign-related pamphlets scaled by local AMA members).<sup>8</sup> Historical accounts suggest the Campaign relied on networks of advertising and physicians established years prior, and more recent scholarship has highlighted rising incomes, unionization, and non-profit hospitals as key factors that affected demand for private health insurance (Starr 1982; Thomasson 2002, 2003). Therefore, we include these factors as "design controls" and show that exposure is conditionally as-good-as-randomly assigned. We leverage spatial and temporal variation, allowing us to flexibly control for location and time fixed effects: The former accounts for static features of a location such as frontier experience and the ethos of rugged individualism, while the latter captures secular trends such as advances in medical technology and knowledge (Bazzi, Fiszbein and Gebresilasse 2020; Gross and Sampat 2022, 2023).

Our identifying assumption is that, conditional on these historically motivated controls, there were no shocks to the evolution of potential outcomes correlated with our treatment nor selection into dosage groups.<sup>9</sup> Empirically, we show that Campaign exposure is not correlated with observable features at the individual or state level in the pre-Campaign period, nor do the dynamics of income or unionization change sharply with the Campaign onset, unlike enrollment in PHI. We conduct various tests for pre-trends (*e.g.*, Roth 2022) and adopt recent suggestions regarding continuous treatments (Callaway, Goodman-Bacon and Sant'Anna 2024).

<sup>&</sup>lt;sup>7</sup>As summarized by Griffith (1983) in his article, "The Selling of America: The Advertising Council and American Politics, 1942-1960", many business leaders were shaken by price controls and the popularity of New Deal programs following World War II. Though there was substantial disagreement on international trade and labor relations, preserving the autonomy of the corporate enterprise united these interests.

<sup>&</sup>lt;sup>8</sup>We also estimate a regression with each component separately and fail to reject the null hypothesis of equivalent effects, see Section VI.4.

<sup>&</sup>lt;sup>9</sup>Furthermore, historical accounts point to President Truman's surprise victory in the 1948 presidential election as the impetus for the AMA-WB national campaign, giving the AMA and WB a short time period to respond to Truman's health plan and execute the Campaign. Further details are discussed in Section II.5.

We find that a one standard deviation increase in Campaign exposure explains 2.3 percentage points out of the 10 percentage point gain in the share of the population enrolled in PHI in the post Campaign period. Although public support for NHI was strong in the pre-Campaign period, with approximately 68% of those polled by Gallup in favor, a one standard deviation increase in AMA-WB Campaign exposure led to a five percentage points decline in popular support per survey wave (which happened sometimes more frequently than a year) and explains roughly a quarter of the overall decline in support. We also document a positive relationship between Campaign intensity and civic groups passing resolutions favoring PHI. We view such resolutions as a proxy for group-level sentiment on the issue. Our findings are robust to a battery of checks including controlling for additional covariates, using alternative samples and exposure variables, and employing different types of estimators. We do not find an association between Campaign intensity and anti-Russian sentiment before or after 1948.

We next estimate the effect of *indirect* lobbying on *direct* lobbying, *i.e.*, presidential campaign contributions. The Whitaker & Baxter archives contain microdata on donations to the 1952 Eisenhower and Nixon ticket. The Republican party adopted a firm anti-NHI, pro-PHI stance in their party platform at the nominating convention. We link the donation data by doctor name, place, and license to the 1950 Directory of Physicians with 80% of the physicians in the list of donors uniquely matched to an entry in the Directory. These data also include the physician's location (office or residence) allowing us to define Campaign exposure at the county level. We hypothesize that specialist physicians with greater exposure and greater income would be more likely to contribute to the Republican nominee. Our estimates suggest that specialists experiencing a one standard deviation increase in Campaign exposure were twice as likely to donate to the Eisenhower/Nixon ticket than generalist physicians at the mean of exposure.

Finally, we provide suggestive evidence that the AMA-WB Campaign was associated with a shift in the narrative surrounding health insurance, as evidenced by stark changes in discourse on the Congressional floor (United States Congress 1947, 1948, 1949, 1950). Specifically, usage of "national" fell relative to "compulsory" in debates on health insurance among the legislature following the Campaign. Polling questions on legislation under consideration mirrored this shift.

Our paper relates to several strands of literature. Most broadly, this study contributes to the burgeoning empirical evidence on the economics of culture. Rugged individualism from frontier exposure and pastoralism has been shown to influence a variety of behaviors today (Bazzi, Fiszbein and Gebresilasse 2020; Grosjean 2014). We build on this literature by examining how the individualistic American stereotype was promoted and exploited by public relations and advertising firms. Our setup (which we formalize in a conceptual framework in Section III) builds off Sobbrio (2011) and has two agents (in our case, the public and private sector) vying for citizen support over a policy. Campaign messaging was largely uninformative about the product, leveraging anti-Communist sentiment to tie together the ideas of *price* freedom (for doctors) and *individual political* freedom.<sup>10</sup> In this sense, the tactics used relate to behavioral models of advertising such as Mullainathan, Schwartzstein and Shleifer (2008) whereby advertisers use "objectively useless information" to invoke coarsened beliefs regarding the state.

We also relate to the literature on lobbying. Much of the empirical work seeks to measure and identify the effects of relationships between policymakers and lobbyists (Bombardini and Trebbi 2020; Bertrand et al. 2020; Snyder and Ting 2008) – our project builds on this important literature highlighting indirect lobbying as an additional tool used by advocates to achieve policy aims.<sup>11</sup> A large literature in health and labor

<sup>&</sup>lt;sup>10</sup>See Larreguy, Marshall and Snyder (2018) for an example of informative advertising and recent empirical examples of political propaganda in economic history (*e.g.*, Wang 2021).

<sup>&</sup>lt;sup>11</sup>An important exception is Bertrand et al. (2021) who study the effect of corporate philanthropy on rule commen-

economics studies physician behavior and the economics of occupational licensing. Typically, physician behavior is investigated in the context of clinical decision-making (Chandra, Cutler and Song 2011; Ellis and McGuire 1986), while occupational licensing focuses on the trade-off between encouraging higher quality service and reducing overall supply. We examine physician behavior at the group level instead of at the individual level and assesses how licensing can create monopolies that exert political pressure to further shape the market in their favor (Becker 1983; Stigler 1971). In this regard, our findings contribute to a growing empirical literature on the political theory of the firm (Cowgill, Prat and Valletti 2023) and a relaxation of the assumption that the rules of the game are "exogenously influenced and enforced" (Zingales 2017, p.114).

The paper proceeds as follows: Section II provides historical context and describes the Campaign in greater detail. Section III introduces a conceptual framework to formalize our hypotheses. Section IV describes the data. Section V outlines the empirical strategies. Section VI reports our findings, and the last section concludes.

# II Historical Background on Private Health Insurance in the U.S.

This section describes the origins of private health care plans (see also the Institutional Appendix Section E), the consolidation of medical power in the AMA, the operations of Whitaker & Baxter and the AMA-WB Campaign against National Health Insurance.<sup>12</sup>

## **II.1** Origins of Private Health Insurance

In the early 20th century, the major health-related insurance product available to Americans was life insurance covering burial costs. In the interwar period, groups such as the Association for Labor Legislation (AALL) alongside members of the AMA began to design state-sponsored health insurance plans, but efforts were derailed by life insurance companies due to the inclusion of burial costs (Rubinow 1934). A second opportunity to introduce NHI came in the immediate aftermath of the Great Depression.<sup>13</sup> However, for reasons that may have ranged from the personal to the political, President Franklin Delano Roosevelt (FDR) declined to include health insurance in the Social Security Act of 1935, focusing instead solely on Old Age Insurance (Blumenthal and Morone 2010; Rovit and Couldwell 2001).

During the interwar period, nonprofit hospitals, also hit hard by the Great Depression, experimented with prepaid hospital plans eventually known as Blue Cross (Eilers 1963, p.100). These plans allowed consumers to prepay for room and board at local hospitals, and required special enabling legislation to launch, making it difficult for plans to operate across state lines.<sup>14</sup> To counter potential government encroachment and hospital pressure, state medical societies began their own prepaid medical service plans

tating.

<sup>&</sup>lt;sup>12</sup>We provide a more thorough treatment of the role of unions, establishment of Blue Cross and Blue Shield, equity considerations and the establishment of the Veteran's Administration alongside a formal timeline in the Institutional Appendix.

<sup>&</sup>lt;sup>13</sup>The Great Depression presented an opportunity for and lead to the establishment of various forms of social insurance, accelerating government spending. As Bordo, Goldin and White (1998, p.19) write: "Without the depression, there would not have been a flood of New Deal-style legislation...lacking the catalyst that jarred public attitudes and demanded action, the new economic institutions would have been more modest and different in character".

<sup>&</sup>lt;sup>14</sup>See Appendix Section E.4. Appendix Figure D1 demonstrates the number of prepayment hospital plans at the state level in relation to the timing of the passage of enabling legislation. The data cover 1935 to 1946. Using the IW estimator (Sun and Abraham 2021) or standard estimator, the number of plans rises by one four years following passage.

(*i.e.*, Blue Shield). The first such plan, the California Physicians' Service, was created by the California Medical Association (CMA) in 1939, in response to an attempt to introduce tax-financed health coverage by Democratic Governor Culbert Olson. In the following decade, Republican Governor Earl Warren would attempt multiple times to introduce similar legislation, only to be rebuffed by Whitaker & Baxter.

Spurred on by the Beveridge report in Great Britain and the high rate (more than one-third) of American registrants examined and deemed unfit to fight by the Selective Service, tax-financed health insurance legislation at the federal level gathered traction in the U.S. Congress (Bachman and Meriam 1948; U.S. Selective Service System 1947). The 1943 Wagner-Murray-Dingell (S.1161-HR.2861) bill broadened the Social Security Act to include tax-financed NHI and enjoyed support from organized labor but events in Europe distracted FDR (Corning 1969). An attempt in 1945 to introduce the same bill led the AMA House of Delegates to shift its position from merely endorsing medical insurance to encouraging all state and local medical societies to develop their own plans "as promptly as possible" (Board of Trustees of Mississippi State Medical Association 1965, p.12). Appendix Figure A1 demonstrates there was a sharp increase in the number of plans immediately following the 1945 directive.

During his January 1944 State of the Union address, FDR appeared finally ready to embrace NHI and included a right to adequate medical care in his Second Bill of Rights. His death shortly after winning the November 1944 election stunned the nation. After only a few months as vice president, Harry Truman assumed the presidency with an unknown agenda. Truman quickly revealed himself, however, to be a staunch supporter of NHI giving the first-ever presidential address on health care within months of assuming the office of the presidency (Corning 1969). Nonetheless, Truman was working with a Republican-led Congress and had little hope of getting legislation passed during the remaining term. This changed with Truman's upset victory over Dewey in the 1948 presidential election. As described by Doherty and Jenkins (2009, p.5), the election, "catapulted national health insurance from a longshot idea to a viable possibility almost overnight." Truman worked with members of Congress to craft a comprehensive national health plan, posing the most serious attempt the country had made to having a universal, tax-financed health insurance system.

#### II.2 Medical Authority, Specialization, and the AMA

The AMA famously opposed the passage of Medicare, but its role in the earlier "critical" period of NHI is less widely known nor, to our knowledge, has it been evaluated empirically. Truman, however, alluded to the subject in his memoir: "I have had some bitter disappointments as President but one that has troubled me most, in a personal way, has been the failure to defeat organized opposition to a national compulsory health insurance program" (Corning 1969).<sup>15</sup> The AMA was not always so firmly opposed to NHI. Indeed, as mentioned above, in 1916, AMA established a Committee on Social Insurance to cooperate with the AALL regarding state-sponsored health insurance plans. Yet as the wealth and prestige of the profession grew, so too did its opposition to NHI (Institute of Medicine 1993; Markel 2015).<sup>16</sup>

Several factors accounted for the increasing specialization and growth of incomes among physicians over this time. The Flexner Report of 1910 highlighted massive problems in medical education and practice.

<sup>&</sup>lt;sup>15</sup>See also Poen (1996) *Harry S. Truman versus the Medical Lobby*.

<sup>&</sup>lt;sup>16</sup>As summarized by Starr (1982, p.232), "the advent of antibiotics and other advances gave physicians increased mastery of disease and confirmed confidence in their judgment and skill. The chief threat to the sovereignty of the profession was the result of this success. So valuable did medical care appear that to withhold it seemed deeply unjust. Yet as the felt need for medical care rose, so did its cost, beyond what families could afford. Some agency to spread cost was unavoidable. It would have to be a third party, and yet this was exactly what physicians feared."

This movement led to the closure of over half of all medical colleges in the U.S. by 1930 (Clay et al. 2023). The result was a slight overall decline in per capita doctors (Appendix Figure A2).<sup>17</sup> Simultaneously, state medical boards established and/or tightened license requirements as specialties emerged to master the post-War technologies (Moehling et al. 2020). Occupational licensing in turn might have further increased the incomes and stabilized the membership of AMA (Stigler 1971).

Data we entered from the Medical Directories (Appendix Figure A3) demonstrate that, over the period 1920 to 1950, AMA membership grew by 10.8 percentage points (from 60.6 to 71.4 percent of all US physicians) while the share of physicians who were specialists grew by 21.8 percentage points (from 10.6 to 32.4 percent).<sup>18</sup> Physician incomes also increased from \$7,500 to \$12,000 in 1950 USD with most of the growth occurring between 1940 and 1945 (Appendix Figure A6). Then as now, specialists earned significantly more than generalists (about twice as much) and both earned much more than the average American household (see Appendix Figure A7). The high status of specialists was reflected in the leadership of the AMA – presidents were increasingly drawn from a specialist pool of "grassroots practitioners" as opposed to the more academically oriented individual or generalist (Anderson 1968; see Appendix Figure A8). The vertical structure used to enforce professional norms and raise incomes was peaking at the time Truman sought to enact NHI. These resources were deployed to defeat the government plan.

## **II.3** Other Factors Hypothesized to Affect Enrollment in Private Health Insurance

To summarize the above, America's modern private health insurance system was founded by non-profit hospitals and state medical societies at different times and for different reasons. The former were financially strained and the latter were seeing their finances and power grow. Eventually, these two initiatives (Blue Cross and Blue Shield, respectively) would merge, but over much of the period of this analysis, their major connections were two-fold: First, Blue Cross had started slightly earlier and thus built up administrative expertise in billing that some state physician groups' leveraged. Second, the earliest medical services covered included surgical, obstetric, and anesthetic services, thus proximity to hospitals made insurance for medical services more relevant (though the plans quickly expanded to include outpatient services as well).

A separate question, and the subject of interest herein, is what led to enrollment growth after plans were established? Several factors have been hypothesized to have played a role. First, there was a rise in income that increased demand for all normal goods, including medical care (Thomasson 2002, p.234). Second, massive war-time public investment spurred medical advances that made doctors' services and hospitalization more valuable (Gross and Sampat 2023). Third, anti-Communist sentiment dampened demand for all "compulsory" labeled goods. Fourth, efforts to curb inflation played a part. The Stabilization Act of 1942 froze wages but did not prohibit offering benefits. In the late 1940s, it was clarified that unions could include benefits in collective bargaining agreements (Thomasson 2002; Brown and Glied 2020; Blue Cross Blue Shield Association 1997). Thomasson (2003) notes, however, the most significant change came in 1954 when the IRS tax act was changed to allow contributions for health insurance to be treated as tax exempt.

For these and other reasons related to data quality (commercial insurers garner an increasing market share after the tax change and granular data from these entities does not, to our knowledge, exist), we end our analysis in 1954. Yet by that time, many non-elderly White Americans were already enrolled in some

<sup>&</sup>lt;sup>17</sup>According to data from Perrott and Pennell (1957), the number of physicians grew from 1923 to 1949 (145,966 and 193,205), respectively.

<sup>&</sup>lt;sup>18</sup>Appendix Figure A4 demonstrates that nearly all the growth between 1942 and 1950 among physicians was among the specialists. Specialists were much more likely to be AMA members than generalists (91.6% vs. 55.9%, see Appendix Figure A5).

form of private health insurance.<sup>19</sup> We return to these factors that shaped demand for insurance and the distribution of the Campaign when discussing identification and our empirical approach (see Section V).

#### II.4 Origin of Political Public Relations: Whitaker & Baxter's Campaigns Inc.

When faced with a credible legislative threat, the AMA turned to Clem Whitaker and Leone Baxter, the husband-wife founders of *Campaigns Inc.* for assistance. The duo are credited with revolutionizing political campaigns through their "rules" (Cutlip 1994; Johnson 2016). First and foremost: Simplify. Whitaker & Baxter remarked, "a wall goes up, when you try to make Mr. and Mrs. Average American Citizen *work or think....* The average American doesn't want to be educated; he doesn't want to improve his mind; he doesn't even want to work, consciously, at being a good citizen. But there are two ways you can interest him in a campaign that we have ever found successful. You can put on a fight... or you can put on a show" (Johnson 2016, p.26).<sup>20</sup>

The firm, founded in 1933, was initially based in Sacramento, California, a state that allows citizens to affect policy outcomes through direct democracy (*e.g.*, initiatives, referendums) (Johnson 2016). In such a circumstance, indirect lobbying, or persuading the American citizen via campaigns, was particularly valuable. As Whitaker stated: "California has been the testing ground for a great many visionary schemes and phony movements – but it has also become the burial ground for most of them", taking credit for their demise (Whitaker & Baxter *Campaigns, Inc.* 1945).

In 1945, California Governor Warren endorsed AB 800 – a health insurance bill designed to provide for California's working people, after Warren suffered a kidney infection and became concerned about the high cost of medical care (Johnson 2016, p.32).<sup>21</sup> The bill mandated a payroll tax on all employers and employees that received unemployment insurance (Dimmitt 2007, p.13). In response, WB were hired by the CMA and launched the California Campaign. Key strategies of the California Campaign, that would be replicated later included labeling the effort an "educational" initiative and focusing on *voluntarism*.<sup>22</sup> The goal of the California Campaign was to "secure public action informally through mass persuasion rather than through force of law" (Whitaker & Baxter *Campaigns, Inc.* 1945).

In an April 1947 letter to the president of the CMA, Whitaker & Baxter reported on their progress to date: Governor Warren's 1947 proposal garnered much less support than the 1945 proposal, and supporters of state health insurance went on the defensive (Whitaker & Baxter *Campaigns, Inc.* 1945). The duo went on to found a magazine entitled *CMA Public Relations News* which publicized defeating Warren. The magazine was sent to the offices of state medical societies and to the headquarters of the AMA (Appendix Figure B1).

#### **II.5** The National Campaign

The AMA had tried to influence public perception in the past: Its in-house lobbying arm – the National Physicians' Committee for the Extension of Medical Service (NPC) – launched a newspaper cartoon contest attacking state-sponsored insurance as early as 1946 and went onto deploy other tactics (Burrow 1963; Knoblauch 2014; National Physicians' Committee for the Extension of Medical Service 1947-1949; Wehrle

<sup>&</sup>lt;sup>19</sup>According to survey data used in Thomasson (2003), by 1952, 63% of the households surveyed had some form of insurance for medical expenses. These surveys tended to sample White urban populations.

<sup>&</sup>lt;sup>20</sup>This quote is reminiscent of the description of persuasive ideas in Acemoglu and Johnson (2023, p.65): "All else equal, an idea is more likely to spread if it is simple, is backed by a nice story, and has a ring of truth to it."

<sup>&</sup>lt;sup>21</sup>AB 800 was similar to the 1939 proposal of Governor Olson that had initially spurred the CMA to start the CPS as per above.

<sup>&</sup>lt;sup>22</sup>For further details on the California Campaign see Appendix Section E.3.

1993). While campaigning for the presidency in 1948, Truman embraced a national health plan crafted by his Federal Security Agency (FSA) Administrator, Oscar Ewing. Truman's shocking victory in November sparked an "Armageddon" mentality at the AMA and a desire to amplify its anti-NHI efforts – launching two special assessments and hiring Whitaker & Baxter.<sup>23</sup> The firm's mandate was to once and for all end "agitation" for NHI by rebranding and expanding AMA's efforts as the National Education Campaign (NEC). The Campaign consisted of two main components: Physician outreach and mass communications via newspaper advertising.

Building off the earlier activities of the NPC, the physician component involved sending pamphlets and other materials to doctors. Physicians were instructed to warn their patients about the dangers of "socialized medicine" and encourage their enrollment in private plans. In addition, physicians served as liaisons to local civic organizations, pushing them to pass resolutions against NHI and then send copies of these resolutions to local officials. The support of such organizations would be "a vital step in broadening the campaign into a public crusade."<sup>24</sup> Figure 1 shows examples of pamphlets designed by the Campaign for distribution to patients by their physician, with the most popular pamphlet entitled *The Voluntary Way is the American Way*. Note that most of these brochures and ads provide little if any information on insurance – who can be covered, what is covered, its cost, and so on.<sup>25</sup> As can be seen from the word cloud in Figure 2, the messaging tied together health and medical care with America, freedom, and individual choice (*i.e.*, the voluntary way).

Lockwood-Shackleford, an ad agency based out of California, executed the newspaper advertising component. Specifically, Lockwood-Shackelford decided which newspapers to advertise in, aiming to reach every "bona fide daily and weekly" (Begeman 1950). Based on our analysis of their invoices, the agency in fact advertised in about half of all potential outlets (about 9,000 compared to 20,000 unique newspapers in the Newspaper Directory (Ayer 1949)). As shown in Appendix Tables D1 and D2, we find few systematic differences in newspapers with and without Campaign ads. Figure 1 Panel C displays an excerpt of the ad they ran.<sup>26</sup> It was large – taking up 980 lines of print (roughly an entire page) depicting a bald eagle with large print asking "Who Runs America? the Congress? the President? OR YOU AND THE MAN NEXT DOOR?" The accompanying text emphasized that "in much of the world today, people have resigned from running their own countries, following the false promise of 'security.'" The tagline in the doctors' pamphlets is repeated: "THE VOLUNTARY WAY IS THE AMERICAN WAY!" The citizen-consumer of these materials was instructed to "Ask your doctor" for more information on signing up for private health insurance.

The AMA also tapped allies in industry for tie-in advertising to be scheduled simultaneously with the main ad (Begeman 1950). The AMA directly reached out to approximately 23,000 corporations and 7,000 members of the National Retail Dry Goods Association to elicit support. These firms, trade, and interest

<sup>&</sup>lt;sup>23</sup>As described by Poen (1996, p.141), "Stunned by the president's reelection, the AMA Board of Trustees vowed to exhaust the association's treasury if need be, to prevent passage of Truman's health insurance scheme".

<sup>&</sup>lt;sup>24</sup>Medical societies mailed template resolutions and encouraged local civic organizations to pass and then send signed resolutions to their elected representatives. "Letters, memorials, memos, and petitions expressing outrage flowed into Washington" (Blumenthal and Morone 2010, p.91). Appendix Figure B2 shows an example of one such resolution signed by the *Federation of Women's Clubs*. The Campaign also explicitly called upon doctors' wives to be involved and noted they have important roles to play via auxiliary clubs. "Women are reluctant to take direction from other women, but they love to do things for their menfolk... Women have ingenuity and can help you, if they are guided" (Craig 1950, p.13).

<sup>&</sup>lt;sup>25</sup>Some materials were simply inaccurate. For instance, the pamphlet entitled *The Voluntary Way is the American Way* falsely attributed a quote to Lenin, claiming he said, "Socialized medicine is the keystone to the arch of the Socialist State." According to Blumenthal and Morone (2010, p.93), "Senator Murray asked the Library of Congress to track down the quote, and, as expected, they found nothing like it."

<sup>&</sup>lt;sup>26</sup>For the full advertisement piece see Appendix Figure B3.

groups spent another \$20 million in 1950 dollars, or approximately \$250 million in 2023 dollars (Begeman 1950). Examples of these tie-in ads are shown in Figure 3 Panels A, B, and C. Approximately 60% of all newspapers with a main ad included tie-in ads, with an average of three per issue (Panels D and E). The ads were across various industries: the largest share (about 40%) were near in product space to the medical industry (*e.g.*, pharmaceutical interests, see Figure 3 Panel F) but some were much farther away (*e.g.*, clothing). The use of such ads has implications for our conceptual framework: Consumers may have been unaware of the coordination among the AMA and other trade groups (see Section III).

To be sure, the Truman administration sought their own campaign for NHI. Zilpha Franklin, the FSA Director of Information, set out an unprecedented, ambitious program, advising a "state of emergency" for the FSA, and estimated that the plan would need a relatively large team of eight or ten top FSA workers and interagency cooperation (Poen 1996, p.81). However, in part due to concerns about executive lobbying and interagency politics with the Surgeon General, her plan was never realized (Poen 1996, p.82).

The Committee for the Nation's Health (CNH) also attempted to sway voters in favor of NHI, and was less restricted as a non-governmental body. However, they were vastly out-resourced. According to Poen (1996, p.152), CNH took in \$104,000 in 1949 with nearly \$100,000 spent on its working budget and "like the AMA, the CNH....published and distributed pamphlets, but not in nearly so large a number." Furthermore, the content was quite dry: According to Poen (1996, p.152), "the CNH's pamphlets included *Are Blue Shield Plans Satisfactory?* In which it was argued that they were not; *Restrictions on Free Enterprise in Medicine*, in which the AMA stood accused of monopolizing health services through its control over insurance plans; and *Record of the American Medical Association*, which chronicled the AMA's shifting attitude on the legitimacy of government and private health insurance since the early part of the century." Unions too were limited in their financing of political campaigns following passage of the Taft-Harley Act of 1947 (Kallenbach 1948).

Figure 1: Campaign Pamphlets Distributed by Physicians and Excerpt for Main Campaign Ad



(a) Pamphlet 1

(b) Pamphlet 14

(c) Excerpt of Main Ad



Notes: Exhibit shows examples of materials distributed during the Campaign. Panels A and B show the covers of The Voluntary Way is the American Way and A Threat to Health: A Threat to Freedom!, respectively (Whitaker & Baxter Campaigns, Inc. 1933-1974). Panel C shows an excerpt of the standard template for the main Campaign advertisement. The size and content were constant across newspapers. For the full advertisement piece see Appendix Figure B3. Example taken from page 16 of Athens Alabama Courier (American Medical Association 1950c).

Figure 2: Word Cloud of Campaign Pamphlets and Ads

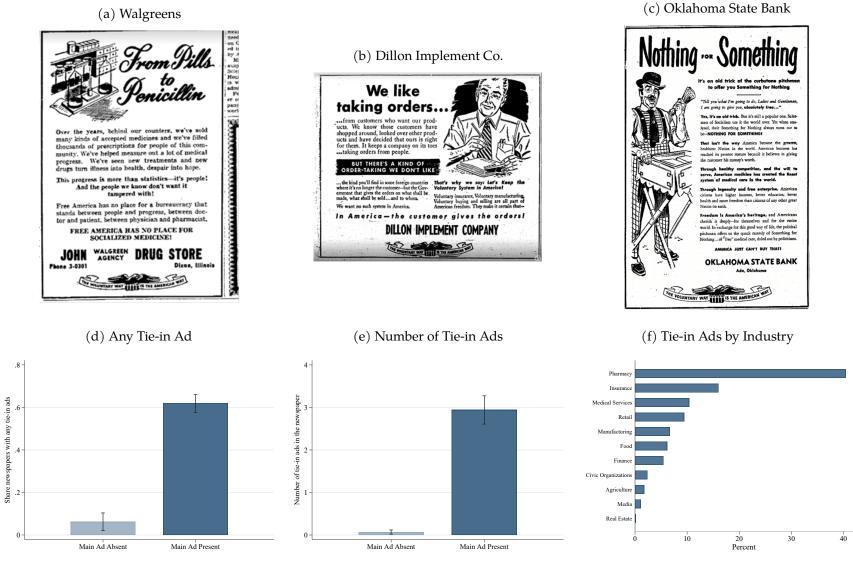
(a) Campaign Pamphlets

(b) Campaign Ads



*Notes:* Panel A shows a word cloud made from texts in Campaign pamphlets. Panel B shows a word cloud of newspaper of main ads and tie-in ads from *Newspaper Archives*. The top five most frequent words are shown in red (bold) font.

# Figure 3: Campaign Tie-in Ads



*Notes:* Panels A, B, and C show tie-in advertisements sponsored by three different companies. While the size and content of tie-in advertisements vary across newspapers and sponsors, the slogan "The Voluntary Way is the American Way" appears in most ads. The examples in Panels A, B, and C are from the October 11, 1950 issues of the *Dillon Daily Tribune*, the *Laredo Times*, and the *Ada Evening News*, respectively. Panels D and E plot the share of newspapers with any tie-in ads and the number of tie-in ads, separated by whether the newspaper has a main Campaign ad. Panel F plots the distribution of tie-in ads by industry (NewspaperArchive 2023). See Appendix Section F.2 for details.

## II.6 National Professional Committee for Eisenhower

During the presidential election year of 1952, AMA focused attention on direct lobbying. To do so, the AMA created a separate lobbying arm called the National Professional Committee for Eisenhower for President (NPCE) because, as noted by Clem Whitaker, "the American Medical Association cannot either legally or ethically, support or oppose candidates for public office" (Whitaker & Baxter *Campaigns, Inc.* 1950b, p.21).

The NPCE could directly steer campaign contributions. Whitaker was named Director, Baxter was named General Manager, and former AMA President, Dr. Elmer Henderson, was the Chairman. Details of which particular doctors contributed to this fund, the amounts, and their identifying information were stored in the *Campaigns Inc.* archives. The NPCE raised approximately \$1,463,016 of funds in 2023 dollars for the Eisenhower campaign (Whitaker & Baxter *Campaigns, Inc.* 1952*b*). The Republican plank officially adopted at the convention nominating Eisenhower read: "We are opposed to federal compulsory health insurance with its crushing cost, wasteful inefficiency, bureaucratic dead weight, and debased standards of medical care" (Whitaker & Baxter *Campaigns, Inc.* 1952*a*).

# III Conceptual Framework

This section formalizes predictions regarding the effects of the Campaign – to do so we adapt the Sobbrio (2011) model of indirect lobbying. The setup is as follows: Legislators must decide whether to pass the NHI policy P = 1 or keep the status quo, P = 0. Since this is a model of indirect lobbying, legislators care about the public's views and enact the policy preferred by the median voter. Voter utility is represented as a quadratic loss function between the legislative policy choice and voter's policy preference:

$$U_i(P, d_i) = -(P - d_i)^2$$
(1)

The voter's policy preference  $d_i$  is a combination of his private valuation of the NHI policy,  $x_i \sim U[0, 1]$  as well as his state-dependent social benefit of the NHI policy, I. Specifically,  $d(x_i, I) = x_i + I(s)$ , where  $s = \{s_0, s_1\}$  denotes two mutually exclusive and exhaustive states of the world.  $s_1$  represents a state whereby policy enactment (*i.e.*, P = 1) yields net positive social surplus whereas  $s_0$  represents a state where it yields net negative social surplus. I takes on the following values:

$$I = \begin{cases} -\delta, & \text{if } s = s_0. \\ \delta, & \text{if } s = s_1. \end{cases}$$
(2)

with  $\delta \in (0, 1/2]$ .

Let  $\pi$  be the voter's prior probability on  $s_0$ , which we assume is uniform over [0, 1].<sup>27</sup> A private sector and a public sector advocate are sending signals regarding the state of the world with the former interpreting and sending signals that  $s = s_0$ , and the latter sending  $s = s_1$ .<sup>28</sup> Applying Bayes' theorem, the posterior

<sup>&</sup>lt;sup>27</sup>This is equivalent to assuming  $\pi \sim \text{Beta}(1, 1)$ .

<sup>&</sup>lt;sup>28</sup>This bifurcation in signal sending could arise for example from different objective functions or different welfare weights on consumer vs. producer surplus, where the former is the sum of private valuations of the policy and the latter is profit from enrolling citizens in a private alternative to the policy. Another possibility is that nature moves and determines the true state – sending a signal to the advocates, which is interpreted through heterogeneous and strong perceptions with little scope for updating (Alesina, Miano and Stantcheva 2020). With few notable exceptions (*e.g.*, Mullainathan, Schwartzstein and Shleifer 2008; Bertrand et al. 2010; Schwartzstein and Sunderam 2021), we follow most of the literature by side-stepping what makes a signal persuasive.

belief on  $s_0$  is  $\pi | (M = m) \sim \text{Beta}(\alpha + m_0, \beta + m_1)$ . The advocates send signals based on their level of resources r. We posit a straightforward influence function – where the number of messages sent is related to the level of resources:  $m_j = r_j$  for  $j \in \{0, 1\}$  and  $M = m_0 + m_1$  (Becker 1985). Messaging by the private advocate specifically encourages enrollment in PHI (or more generally, consumption of a private good), which we assume indirectly decreases the private benefit of NHI (the public good), *i.e.*,  $\frac{\partial x_i}{\partial m_0} < 0$  (see also Kremer and Willis 2016). The updated payoff structure is:

$$U_i(x_i, m | P, s) = \mathbb{E}[\pi | m] \times \left( -[P - (x_i - \delta)]^2 \right) + (1 - \mathbb{E}[\pi | m]) \times \left( -[P - (x_i + \delta)]^2 \right)$$
(3)

The difference in utility between adopting the policy and maintaining the status quo is  $D_i = U_i(x_i, m)_{|P=1} - U_i(x_i, m)_{|P=0}$ . Substituting the idiosyncratic individual preferences  $x_i$  with  $x_v$ , the median voter's preferences, and differentiating yields the following proposition:<sup>29</sup>

#### **Proposition 1.**

- a.  $\frac{\partial D_v}{\partial m_0} < 0$  the greater the number of messages by the private sector advocate the less inclined the median voter is to support NHI due to:
  - i. a higher posterior probability of  $s = s_0$ ,
  - ii. a lower private valuation of the policy.
- b.  $\frac{\partial D_v}{\partial m_1} > 0$  the greater the number of messages by the public sector, the lower the median voter's perceived probability of  $s = s_0$ , and the more inclined the median voter is to support NHI.

We can empirically verify or historically motivate many of the assumptions in the model. Given the tight legislative window and limited budget, there was very little scope for strategic responses on the part of the government. Regarding the assumption that consumers had flat priors, health insurance was still relatively new and just being introduced and expanded throughout the world (Corning 1969). Regarding incentives and naivete of the voter, it would have been difficult for the average citizen to be aware of the coordination across industries and the financial motivation for the advertising. Lastly, doctors were likely assumed to be a credible source of health-related information.

# IV Data

This section summarizes the archival sources, directories, and administrative data we used in this project. Campaign exposure construction and our empirical strategy are delineated in Section V.

# **IV.1** Campaign Components

We first describe the data used to construct the two major components of the Campaign: Physician outreach and newspaper advertising.

#### **IV.1.1** Component 1: Physician Outreach

Physicians were the "field workers" of the Campaign, serving as liaisons to other civic organizations and passing out pamphlets deriding NHI. Overall, nearly 50 million pieces were sent to physicians including mailing stickers, cartoons, posters, and pamphlets. Some were brochures targeting doctors themselves, such

<sup>&</sup>lt;sup>29</sup>Proofs can be found in the Model Appendix Section G.

as information on antitrust activity against the AMA. Most pamphlets, however, were intended for patients, and we extract data on the distribution of the four most popular from the "State-by-State Report Covering Distribution of Campaign Pamphlets Posters Stickers Etc" (Whitaker & Baxter Campaigns, Inc. 1933-1974); see Figure 1.

- The Voluntary Way is the American Way
- Your Medical Program: Compulsory or Voluntary?
  It's Your Crusade, too!
- A Threat to Health: A Threat to Freedom!

We combine data on the distribution of the pamphlets at the state level (the finest level available) with detailed information on the location of AMA physicians that we obtain by digitizing the 1950 AMA Medical Directories (see Section V for further information).

AMA Medical Directories. The AMA Medical Directory was and remains the most comprehensive database of physicians in the United States.<sup>30</sup> During our period of interest, the directory was published in large multi-volume books in 1940, 1942, 1950, and 1956. We digitize and OCR the entire 1950 Directory and extract several useful pieces of biographical information on each physician (American Medical Association 1950a). Appendix Figure B4 displays a typical entry – small symbols in the book indicate memberships and other important career milestones. We use this information to construct a dataset including physician name, year of birth, specialty, office and home address, and the status of AMA membership for the universe of physicians in the U.S. circa 1950. The final dataset contains 167,373 observations from 48 states (see Appendix Figure A9). The aggregated number of physicians by state from digitized microdata is consistent with the tables published by the AMA (see Appendix Figure A10). For constructing exposure to pamphlets distributed by physicians, we use the 1950 share of doctors that belong to the AMA at the relevant geographic level (see Section V.1 below for further details.)

#### IV.1.2 Component 2: Mass Communications via Advertising

The Campaigns Inc. Archives contained invoices from the Lockwood-Shackelford Advertising Company (Whitaker & Baxter Campaigns, Inc. 1950a; see Appendix Figure B5) which include several relevant pieces of information. First, they are invoiced to the AMA. Second, they provide the exact amount of the ad buy (which did not vary across all newspaper outlets) at 980 lines. Third, they describe the exact date at which the ad should appear, as well as the state, municipality, newspaper name, whether the newspaper is a daily or a weekly, and its circulation and line rate. We combine these data with data on tie-in advertisements obtained from Newspaper Archive described below to create the advertising exposure.

Newspaper Directory. We hand-entered the Ayer (1949) Directory in order to obtain important characteristics on the newspapers Lockwood-Shackelford took out ads in, as well as those it did not.<sup>31</sup> These data include, for each weekly and daily newspaper, its total circulation, political leaning, frequency, subscription price, year of establishment, and formatting information (number of columns, widths, and depth).<sup>32</sup> Appendix Figure A11 shows that 93.8% of the newspapers from the Directory were founded at least five years prior to the Campaign.

Newspaper Archive. There are several potential newspaper archives in the U.S. (see Beach and Hanlon 2023 for a summary). We use Newspaper Archive, which is available from Harvard Library. We found over 900

<sup>&</sup>lt;sup>30</sup>Today, commonly known as the AMA Masterfile and distributed electronically through third-party vendors.

<sup>&</sup>lt;sup>31</sup>OCR tools did not work well for this exercise given the irregular spacing and text.

<sup>&</sup>lt;sup>32</sup>We exclude publications entitled with "magazine" or "group" as well as those with a circulation number greater than 500,000 and based in New York City, which we identify as national publications.

newspapers with at least one issue in 1950, and 751 had at least one issue in October 1950. After merging with the Ayer & Son's newspaper directory data, we are left with 628 newspapers of which 540 have the ad shown in Appendix Figure B3.<sup>33</sup> Political leaning and circulation are not different on average across newspapers with and without Campaign ads (see Appendix Tables D1 and D2). One concern might be that we are mis-specifying our exposure variable if tie-in ads were taken out in newspapers other than those with Campaign ads. We show in Figure 3 Panel D that the vast majority of tie-in ads were placed in newspapers that also had the main Campaign ad. Panel E shows there were on average three tie-in ads per paper, thereby magnifying the effect of the Campaign substantially.

# **IV.2** Outcomes

The AMA-WB Campaign sought to suppress demand for NHI by increasing enrollment in a private alternative and shaping public opinion: These two outcomes are therefore our main outcomes of interest. We also are interested, qualitatively, in understanding how the Campaign may have influenced the national discourse among pollsters and policymakers. Lastly, we use the Campaign to explore the relationship between indirect and direct lobbying.

# **IV.2.1** Private Health Insurance Enrollment

We compile data on PHI enrollment from annual reports published by the Council on Medical Service and Public Relations and the Bureau of Medical Economics of the AMA, "Voluntary Prepayment Medical Care Plans" (Council on Medical Service 1946-1954). These reports are the main source of enrollment data. The first edition was published in 1946 and is the first year of this analysis. We hand enter number of enrollees from plans covering 48 states between 1946 and 1954.<sup>34</sup> We aggregate enrollment to the state level and divide by state population to construct shares Haines (2010).

The largest provider of prepaid hospital services was Blue Cross, as discussed in Section II.1. The Blue Cross Commission enrollment numbers by state from 1936 to 1947 were collated and published by the Federal Security Agency (FSA) (Reed 1947). The Health Insurance Council (HIC), comprised of representatives from the commercial life and accident insurance companies, provided state-level enrollment figures starting in 1952 (The Survey Committee of the Health Insurance Council 1949-1965). Yet industry estimates of state-level figures were believed to be inflated, and the FSA took pains to deflate them and adjust for double counting (Reed 1947). Further, they are not available to our knowledge before 1952. Due to these data limitations, and because the AMA was keen on enrolling patients in medical service plans mostly owned by state medical societies, we focus on Blue Shield plans. However, Appendix Figure A13 shows the HIC enrollment numbers reported in 1952 are highly correlated with CMS hospital (dominated by Blue Cross) and CMS medical service (dominated by Blue Shield) enrollment numbers (Correlation of 0.902, and 0.924, respectively).

Infants, older people, the indigent, women who were unmarried and pregnant, or women who were married but became pregnant within 10 months were not eligible for coverage. Most plans charged higher rates for women than men. Regarding catchment area, most plans operated statewide since most were run by state medical societies and needed to comply with legislation varying at the state level. One exception was New Hampshire and Vermont, which combined areas to provide a single plan. Over time, plans were extended to dependents of the policyholder and made adjustments to the services covered.

<sup>&</sup>lt;sup>33</sup>Details on detecting Campaign main and tie-in ads are in Appendix Section F.3.

<sup>&</sup>lt;sup>34</sup>The growth in enrollment in plans over time is shown in Appendix Figure A12.

#### IV.2.2 Public Perceptions of National Health Insurance: Individual and Aggregate Views

To determine whether the Campaign was successful in changing the views of individuals and communities, we use two sources of data. Our first source is the Gallup Public Opinion polls (Gallup Organization 1945, 1946, 1949, 1950). The second is data from the Archives of *Campaigns Inc.* that record the name and location of all civic organizations that were "on record against compulsory health insurance," which serves as a proxy for passing a pro-PHI resolutions (Whitaker & Baxter *Campaigns, Inc.* 1951) as shown in Appendix Figure B2.

Gallup surveys included questions on policies related to NHI in the November 1945, April 1946, May 1949, November 1949, October 1950, and November 1950 waves. The questions varied over time (see Appendix Table A1).<sup>35</sup> After 1948, Gallup began using the term "compulsory" almost exclusively to describe the policy (see Appendix Figure A14). Notably, Gallup surveys were sponsored by local newspapers (see Appendix Figure B6). Advertisers might have influenced *how* questions were asked, as found in work by Reuter and Zitzewitz (2006). For this reason, we caution against interpreting coefficients on wave fixed effects or the post indicator as causal. Gallup data include information on sex, race, age, state of residence, phone ownership, political leaning, employment, and (for most waves) union status, which we include in our preferred specification.<sup>36</sup>

Unfortunately, there is not a comprehensive census of civic organizations in the U.S. We therefore normalize total resolutions passed by civic organizations by the total number of churches in a given area or by total population.

# IV.2.3 Direct Lobbying and the Political Narrative

We digitize the list of individuals who contributed to the National Professional Committee for Eisenhower in 1952 (Whitaker & Baxter *Campaigns, Inc.* 1933-1974). These records include the donor's name, address, medical degree (*e.g.,* M.D. and D.D.S.), and amount contributed (see Appendix Figure B7 for example). We exclude entries without an M.D. degree (953 or 32.4%, 219 of which are DDS) before linking to the American Medical Directory.<sup>37</sup> Given the richness of these data, we are able to link approximately 80% of all physician donors and create an indicator for whether a doctor donated as well as the amount he contributed as political outcomes of interest. In Appendix Section C, we explore voting in House of Representative elections over time. For a more nuanced measure of policymaker preferences, we explore the Congressional Record, which is "the official record of the proceedings and debates of the United States Congress". We use the Congressional Record to capture how legislators described state-sponsored insurance before vs. after the Campaign (United States Congress 1947, 1948, 1949, 1950).

# **IV.3** Additional Data

We bring in additional variables to serve as important, historically-motivated design controls including union data from Farber et al. (2021), income per capita from the Bureau of Economic Analysis (2023), war

<sup>&</sup>lt;sup>35</sup>Some of the questions are conditional on having heard of the bill, yet we find no effect of Campaign exposure on knowledge of specific legislation, which further suggests that the Campaign was not designed to be informative.

<sup>&</sup>lt;sup>36</sup>We use phone ownership as a proxy for income and confirm that phone ownership is a strong predictor of income using the 1960 census 5% sample (the oldest sample we could locate with both variables) – having a phone is associated with \$3539 greater total family income (Ruggles et al. 2023). In April 1946, union status was not asked, so we include a missing indicator for those who were employed in that wave.

<sup>&</sup>lt;sup>37</sup>Further details on the linkage are provided in the Appendix Section F.4.

bonds purchases from the United States Census Bureau (2012), television, radio and demographic information from the 1950 Census (United States Census Bureau 1953; Haines 2010). We also digitize hospital location and attributes from the American Hospital Directory (American Hospital Association 1948, 1950, 1952).

# V Empirical Approach

In this section, we define Campaign exposure and describe the specifications used in the analysis.

## V.1 Campaign Exposure

Campaign exposure is defined at the geographic level j – where j varies by outcome (*i.e.*, for enrollment it is state, for Gallup it is state-by-urbanicity, and for donations it is doctors' county of residence). As noted above, the campaign had two key components: physician outreach and mass communications via advertising. Each component can be further disaggregated into propaganda material and the propagating factor, where the former includes the persuasive content (*i.e.*, pamphlets and ads) and the latter is the diffusion channel (*i.e.*, doctors and readership). We combine the two components as follows:

$$Campaign Exposure_{j} = MD_{j} + Ad_{j}$$
(4)

where MD<sub>j</sub> represents per capita pamphlets distributed by physicians with links to the AMA:  $\left(\frac{P_s^{\text{Camp.}}}{N_s}\right) \times \left(\frac{D_j^{\text{AMA}}}{D_j}\right)$ , and Ad<sub>j</sub> reflects per capita advertising circulation targeting local newspaper readers:  $\left(\frac{C_j^{\text{Camp.}}}{N_j}\right) \times \left(\frac{N_j^{\text{Educ.}>5\,\text{yr}}}{N_j^{\text{Adult}}}\right)$ . We proxy for readership using the share of adults with more than five years of schooling.<sup>38</sup>

The pamphlet data are from *Campaigns Inc.* and the finest unit available is at the state level, s.<sup>39</sup> For Gallup and lobbying outcomes, we replace ecological measures with individual indicators for AMA membership and educational attainment while controlling for individual measures of the same. Following Kling, Liebman and Katz (2007), we standardize both summands in Equation 4, giving each equal weight, and the resultant for ease of interpreting the coefficients (a map of the Campaign exposure at the state level is shown in Figure 4 and at the county level is shown in Appendix Figure A15). The raw correlation between the two components is 0.120 (*p*-value = 0.423).

## V.2 Identification

Identification requires that, conditional on a limited set of historically motivated controls, the intensity of the Campaign was uncorrelated with the evolution of potential outcomes, ruling out selection-on-gains into a particular dose group (Callaway, Goodman-Bacon and Sant'Anna 2024, p.13). Our main estimating equations (Equations 5 and 6 below) are event studies that leverage both spatial variation in Campaign intensity as well as the timing of the Campaign. The Campaign strategy emphasized leveraging existing networks

<sup>&</sup>lt;sup>38</sup>We find similar results using an exposure variable constructed with only the propaganda material, per capita Campaign pamphlets and per capita circulation of Campaign ads, though the estimates are slightly noisier for some outcomes (see Section VI.4).

<sup>&</sup>lt;sup>39</sup>The geographic distribution of AMA doctors is shown in Appendix Figure A9. Nevada's MD component is winsorized as the amount of pamphlets sent to the state is an outlier relative to its small population size. Results are stronger without winsorization.

so as to quickly respond to this unexpectedly viable legislative threat. These networks included AMA doctors and a third party advertising agency Whitaker & Baxter had worked with in California: Lockwood-Shackelford. We therefore include variables that could influence the distribution of AMA physicians, newspaper readers, and demand for health insurance: Income, hospitals, and union membership.

Tables in Figure 4 show that Campaign exposure is not generally correlated with the outcome or other observables in the pre-Campaign period conditional on stratification variables or design controls. Furthermore, income and unionization do not change discontinuously after the Campaign (Appendix Figure D2 Panels A and B).<sup>40</sup> In our analysis, we adopt procedures recommended by Roth (2022), Roth et al. (2023), and Rambachan and Roth (2023) regarding pre-trends and counterfactual trends and use a non-parametric estimator recommended by Callaway, Goodman-Bacon and Sant'Anna (2024). These and additional robustness checks are discussed in Section VI.4. When estimating event studies, in addition to the design controls, we include time fixed effects that capture broad secular changes in technology or national sentiment as well as location fixed effects that capture slowly evolving cultural attributes.

#### V.3 Estimating Equations

*Enrollment in Private Health Insurance:* As noted above, the vast majority of plans operated at the state level for legal and organizational reasons. We therefore estimate number enrolled E per total 1950 population N at the state level, though we use other denominators in the Appendix. These data are available annually, allowing us to estimate for state s and year t:

$$\frac{E_{st}}{N_s} = \alpha + \sum_{k \neq -1} \beta_k \cdot \left( I_t^k \times \text{Campaign Exposure}_s \right) + \sum_{k \neq -1} \delta_k \cdot I_t^k + X_{st}' \Omega + \mu_s + \epsilon_{st}$$
(5)

where  $X_{st}$  includes the time-varying design controls noted above in the balance tables and discussed in Section II.3 (*i.e.*, number of hospitals, log income per capita and unionization), and  $\mu$  represents state fixed effects.<sup>41</sup> Standard errors are clustered at the state level.

*Public Perceptions:* We include two variables to capture public perceptions: (1) Gallup opinion polls at various years on support for National Health Insurance, and (2) cross-sectional evidence from resolutions passed by civic organizations at the county level.

Gallup opinion poll data are at the individual level and are repeated cross-sections of the following years: 1945, 1946, and two waves in 1949 and in 1950. The outcome is an indicator for support of NHI-related legislation, and the finest geographic unit is the state-by-urban level, s. Survey weights used are those calibrated to voters, given the theory described in Section III. The flexible specification for individual i in state s during wave t is as follows:

$$I_{ist}^{\text{Support NHI}} = \alpha + \sum_{k \neq -1} \beta_k \cdot \left( I_t^k \times \text{Campaign Exposure}_{is} \right) + \sum_{k \neq -1} \delta_k \cdot I_t^k + X_i' \Gamma + X_{st}' \Omega + \mu_s + \epsilon_{ist}$$
(6)

where  $X_i$  include a set of indicators for female, Black, age group, phone ownership as a proxy for income, partisan leaning, employment status, union membership, job class, urbanicity, education, and the main effect

<sup>&</sup>lt;sup>40</sup>The hospital stock is fairly constant over this time period. There appears to be an anomalous value in the raw state union data of Farber et al. (2021), which may be due to the much smaller survey sample that year and explains the peak in the event study circa 1951 (Appendix Figure A16). However, excluding this variable from the analysis does not affect the results.

<sup>&</sup>lt;sup>41</sup>The number of plans was fairly constant over this time period, see Appendix Figure A1.

of the Campaign.  $X_{st}$  represents the state-level time-varying design controls, and  $\mu$  represents state fixed effects. Standard errors are clustered at the state-urbanicity level.

For the civic organization resolutions, our estimating equation is given by:

$$\frac{O_c}{N_c} = \alpha + \beta \cdot \text{Campaign Exposure}_c + X'_{cs}\Gamma + \mu_r + \epsilon_c$$
(7)

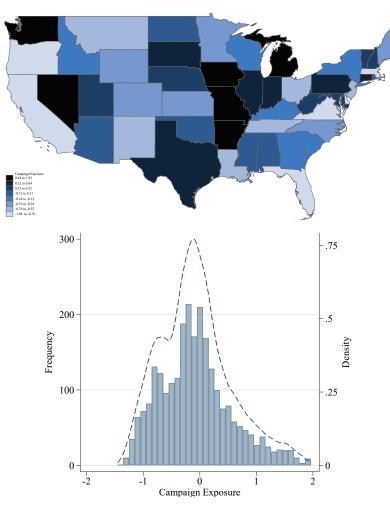
where  $O_c$  is the number of civic organizations at the county level that are on record against legislation for NHI and  $N_c$  is the number of churches at the county level.  $X_c$  includes the design controls of county-level log income per capita and number of hospitals,  $X_s$  includes the design control of share of unionized households at the state level.  $\mu_r$  indicates region fixed effects.

*Direct Lobbying* In this doctor-level specification, our main outcome of interest is an indicator for whether a given physician donated to the Eisenhower/Nixon Campaign in 1952. For doctor *i* in county of residence *c* and state *s* we estimate:

$$I_{ics}^{\text{Donated}} = \alpha + \theta \cdot \text{Campaign Exposure}_{c} + \rho \cdot I_{i}^{\text{Specialist}} + \beta \cdot \text{Campaign Exposure}_{c} \times I_{i}^{\text{Specialist}} + X_{ics}' \Gamma + \mu_{c} + e_{ics}$$

$$(8)$$

where  $X_i$  includes AMA memebrship, clinically active status, former military physician, and physician age.  $X_{cs}$  includes the design controls. Standard errors are clustered at the county level. The coefficient of interest is  $\beta$ , the interaction between specialist indicator and Campaign exposure. The main effect on individual specialist status,  $\rho$ , serves to benchmark the magnitude.



	(1)	(2)	(3)	
	Overall Mean	Coefficient	SE	
Panel A: State Level				
Mean PHI Share Enrolled 1945-1948	0.034	-0.012	(0.015)	
Mean Share Republican Vote 1940-1948	0.409	0.005	(0.017)	
Mean Voter Turnout 1940-1948	0.566	0.005	(0.023)	
Share Female 1940	0.494	-0.004	(0.003)	
Share Black 1940	0.094	-0.014	(0.015)	
Share Employed 1940	0.336	-0.003	(0.004)	
Share Urban 1940	0.474	-0.035	(0.022)	
<i>F-</i> Stat		0.770		
F-Test p-value		0.61	6	
Observations		47		
Design Controls		√		
Panel B: Individual Level - Gallup Data				
Approved Truman Health Plan, 1945-6	0.490	0.023	(0.020)	
Female	0.464	-0.024*	(0.013)	
Age	43.203	0.123	(0.424)	
Have a Phone	0.688	-0.027	(0.019)	
Voted Republican, 1944	0.548	0.031	(0.022)	
Unemployed	0.017	0.002	(0.006)	
Union Household	0.190	0.012	(0.010)	
F-Stat		1.112		
F-Test p-value		0.364		
Observations		1193		
Design Controls		$\checkmark$		
Panel C: Individual Level - Lobbying Dat	a			
Former Military	0.015	0.002	(0.004)	
General Practitioner	0.636	0.003	(0.005)	
Surgery	0.152	0.000	(0.002)	
Internal Medicine	0.086	-0.002	(0.003)	
Other Specialty	0.126	-0.001	(0.002)	
Age	47.467	0.240*	(0.132)	
<i>F-</i> Stat		1.890		
<i>F-</i> Test <i>p-</i> value		0.093		
Observations		166634		
Design Controls		✓		

*Notes:* Map shows the distribution of the state-level Campaign exposure variable, residualized by 1948 design controls of log income per capita (Bureau of Economic Analysis 2023), number of hospitals (American Hospital Association 1948), and unionization rates (Farber et al. 2021). A pdf of the Campaign exposure variable at the county level is shown below the map. Table Panels A and B report balance tests for Campaign exposure in the pre-period, and Panel C reports a cross-sectional balance test for Campaign exposure. Column 1 reports the sample mean, and Column 2 reports estimates from an OLS regression of variables listed on the Campaign exposure. Column 3 reports the associated robust standard errors. *F*-stat and *p*-value are for an *F*-test of the joint significance of the variables listed. All panels include the design controls of log per capita income, number of hospitals, and state union share, Panel A reports balance at the state level for data used in the insurance enrollment regressions. Panel B reports results at the individual level using Gallup poll data, where indicators for education and urbanicity are included as stratifying variables. Weights calibrated to voting-eligible populations are applied. Panel C reports results at the county level for data used in the lobbying regressions and controls for whether the physician is an AMA member. The *F*-Test *p*-value without including age as a covariate is 0.8790. \*, \*\*, \*\*\* refer to statistical significance at the 10, 5, and 1 percent level, respectively. Demographics data are from 1940 Census (Haines 2010), turnout data from U.S. Census Bureau (1948), insurance data from Council on Medical Service (1946-1954), and individual data from Gallup Organization (1945, 1946, 1949, 1950).

Figure 4: Campaign Exposure Distribution and Balance

# **VI** Results

We report findings for PHI enrollment, then move to supporting evidence on opinions and donations.

# VI.1 Private Health Insurance Enrollment

Figure 5 plots event study coefficients of Campaign exposure on PHI enrollment between 1946 and 1954. There is an increase in enrollment post-Campaign that appears markedly different from prior years (p-value for F-test on pre-trend = 0.932; expected pre-trend in Appendix Figure D3). PHI enrollment remains elevated until 1954 with increasing magnitude, mirroring increases in dependent coverage available through plans and the collapse of a viable public option. Due to changes in the tax code and the increasing presence of corporate insurers, we stop our analysis in 1954. Appendix Figure D4 plots the coefficients on year indicators. Again there is a sharp break in enrollment coinciding with Campaign onset.

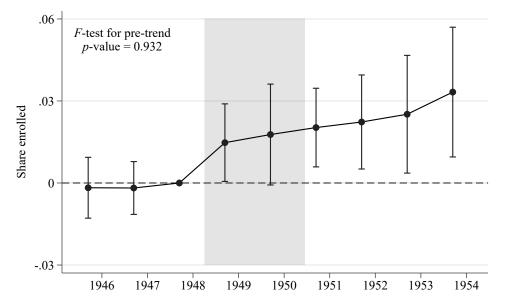


Figure 5: Effect of Campaign on Private Health Insurance Enrollment

*Notes:* Figure plots  $\beta$  coefficients from Equation 5, and associated 95% confidence intervals using cluster-robust standard errors. The outcome is share enrolled in private health insurance. Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1. Sample includes the years 1946-1954. Design controls include log income per capita (Bureau of Economic Analysis 2023), number of hospitals (American Hospital Association 1948, 1950, 1952), and share unionized (Farber et al. 2021). State and year fixed effects are included.

Summary measures of the effect of Campaign exposure on enrollment are provided in Table 1. The main effect of Campaign exposure in the pre-period is not statistically significant and the causal estimates of interest appear stable across specifications beginning in Column 1 with no controls. Column 4 is our preferred specification and includes design controls as well as state and year fixed effects. A one standard deviation increase in Campaign exposure is associated with a 2.3 percentage point increase in share enrolled, accounting for approximately 20% of the overall post-Campaign increase in PHI.<sup>42</sup>

	(1)	(2)	(3)	(4)
Campaign Exposure $\times I^{Post}$	0.023***	0.023***	0.025***	0.023***
	(0.008)	(0.008)	(0.008)	(0.008)
Campaign Exposure	0.007			
	(0.007)			
$I^{\mathrm{Post}}$	0.102***	0.102***	0.030***	
	(0.008)	(0.008)	(0.006)	
Dependent Mean	0.034	0.034	0.034	0.034
Observations	423	423	423	423
State FE		$\checkmark$	$\checkmark$	$\checkmark$
Design Controls			$\checkmark$	$\checkmark$
Year FE				✓

Table 1: Effect of Campaign on Private Health Insurance Enrollment

*Notes:* Table reports results from a regression of share enrolled in private health insurance on the interaction of Campaign Exposure and  $I^{\text{Post}}$ . Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1.  $I^{\text{Post}}$  is an indicator for post-Campaign. The sample includes 48 states from the years 1946-1954, where we collapsed Vermont and New Hampshire (see Section IV). Dependent Mean is the unconditional mean of the dependent variable in the pre-period. Design controls include log income per capita (Bureau of Economic Analysis 2023), number of hospitals (American Hospital Association 1948, 1950, 1952), and share unionized (Farber et al. 2021). Robust standard errors clustered at the state level are in parentheses. \*, \*\*, \*\*\* refer to statistical significance at the 10, 5, and 1 percent level, respectively.

<sup>&</sup>lt;sup>42</sup>See Appendix Section F.1 for comparisons with findings from Thomasson (2003).

## VI.2 Public Perceptions of National Health Insurance

We next turn to how the Campaign affected views regarding NHI. Figure 6 presents the event study estimates from Gallup data using Equation 6. There is not a significant pre-trend (*p*-value for *F*-test = 0.112) and, if anything, approval for NHI was high (68%) and trending upwards (Appendix Figure D5). Although the survey waves are not evenly spaced, there is an abrupt decline in support for NHI of about five percentage points per wave post-Campaign.

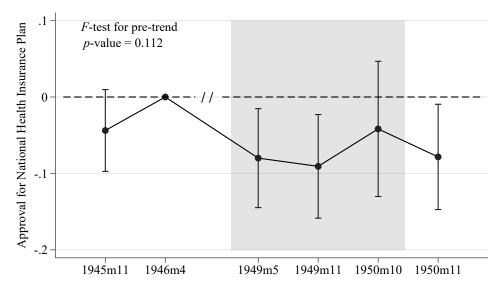


Figure 6: Effect of Campaign on Approval of National Health Insurance Legislation

*Notes:* Figure plots  $\beta$  coefficients from Equation 6 and associated 95% confidence intervals using cluster-robust standard errors. The outcome is an indicator for approval of legislation establishing National Health Insurance. Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1. The sample includes Gallup polls from November 1945, April 1946, May 1949, November 1949, October 1950, and November 1950. Individual level controls include a set of indicators for female, Black, age group, education, having a phone, voted Republican in the last election, employment status, union membership, job class, and urbanicity. Design controls include log income per capita (Bureau of Economic Analysis 2023), hospital count (American Hospital Association 1948, 1950, 1952), and share unionized (Farber et al. 2021). State fixed effects are included. Sampling weights calibrated to the voting-eligible population are applied.

Table 2 provides a summary measure of the Campaign's effect on public opinion. The main effect is again not statistically significant in the pre-period. The interaction of the Campaign and post is negative and significant and indicates that a one standard deviation increase in Campaign exposure reduced support by five to seven percentage points. The post indicator is also negative though as mentioned in Section IV this could reflect changes in how the question was asked.

	(1)	(2)	(3)	(4)
Campaign Exposure $\times I^{\text{Post}}$	-0.061***	-0.071***	-0.060***	-0.047***
	(0.018)	(0.018)	(0.017)	(0.017)
Campaign Exposure	-0.016	-0.006	-0.015	0.021
	(0.021)	(0.023)	(0.020)	(0.014)
I <sup>Post</sup>	-0.263***	-0.109***		
	(0.026)	(0.041)		
Dependent Mean	0.684	0.684	0.684	0.684
Observations	5062	5062	5062	5062
State FE		$\checkmark$	$\checkmark$	$\checkmark$
Design Controls		$\checkmark$	$\checkmark$	$\checkmark$
Wave FE			$\checkmark$	$\checkmark$
Individual Characteristics				$\checkmark$

Table 2: Effect of Campaign on Approval of National Health Insurance Legislation

*Notes:* Table reports a regression of approval for legislation establishing National Health Insurance on the interaction of Campaign Exposure and *I*<sup>Post</sup>. Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1. *I*<sup>Post</sup> is an indicator for post-Campaign. The outcome is an indicator for approval (see Appendix Table A1). The sample includes Gallup polls from November 1945, April 1946, May 1949, November 1949, October 1950, and November 1950 (Gallup Organization 1945, 1946, 1949, 1950). Dependent Mean is the unconditional mean of the dependent variable in the pre-period. Individual Characteristics include a set of indicators for female, Black, age group, education, having a phone, voted Republican in the last election, employment status, union membership, job class, and urbanicity. Design controls include log income per capita (Bureau of Economic Analysis 2023), hospital count (American Hospital Association 1948, 1950, 1952), and share unionized (Farber et al. 2021). State fixed effects are included. Sampling weights calibrated to the voting-eligible population are applied. Robust standard errors clustered at state-by-urbanicity level are in parentheses. \*, \*\*, \*\*\* refer to statistical significance at the 10, 5, and 1 percent level, respectively. Figure 7 examines heterogeneous effects according to individual characteristics. Treatment effects are similar across different socioeconomic and demographic strata, with the exception being Republican voters, who tend to be more responsive to Campaign exposure. This is consistent with more recent evidence of how party affiliation may influence health insurance take-up (Lerman, Sadin and Trachtman 2017; Bursztyn et al. 2022).

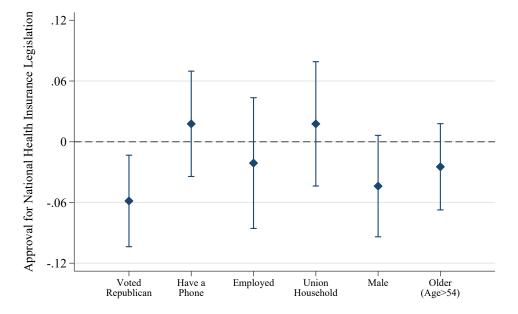


Figure 7: Effects of Campaign on Approval of NHI Legislation by Individual Characteristics

*Notes:* Figure plots the coefficient on the triple interaction of Campaign Exposure,  $I^{Post}$ , and the variable listed from a regression of the outcome of approval for National Health Insurance legislation. All controls listed in Column 4 of Table 2 are included. Weights calibrated to the voting-eligible population are applied. Error bars and associated 95% confidence intervals using cluster-robust standard errors are shown.

Table 3 reports results from Equation 7. The number of civic organizations passing resolutions is normalized by churches, and Appendix Table D3 includes normalization by population. Column 1 includes no controls, and though the coefficient drops when adding fixed effects (Column 2) estimates stays fairly stable as we add design controls. The table also includes tests for selection on unobservables suggesting (Altonji, Elder and Taber 2005; Oster 2019). In our preferred specification (Column 4) a one standard deviation increase in Campaign exposure is associated with 2.3 more civic organizations signing resolutions in support of PHI per 100 churches per county.

	(1)	(2)	(3)	(4)
Campaign Exposure	0.032***	0.021***	0.029*** (0.004)	0.023***
	(0.001)	. ,	. ,	. ,
Oster $\delta$ for $\beta = 0$ $R^2$	0.028	1.633 0.053	7.013 0.050	4.568 0.062
Dependent Mean	0.068	0.068	0.068	0.068
Observations	3059	3059	3059	3059
Region FE		$\checkmark$		$\checkmark$
Design Controls			$\checkmark$	$\checkmark$

Table 3: Effects of Campaign on Civic Organizations Supporting Private Health Insurance

*Notes:* Table reports results of Equation 7 for the outcome of civic organizations on record supporting voluntary (private) health insurance from (Whitaker & Baxter *Campaigns, Inc.* 1951). All columns are normalized by the number of churches within a county. Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1. Design controls include county-level log median income per capita (United States Census Bureau 2012), number of hospitals per county (American Hospital Association 1948, 1950, 1952), and state share of unionized households (Farber et al. 2021). Other controls include the county-level share of Blue Cross hospitals (American Hospital Association 1948, 1950, 1952). Dependent mean is the unconditional mean of the dependent variable. A parameter representing the scope for selection-on-unobservables is reported in columns 2-4 (Oster 2019). Standard errors are in parentheses. \*, \*\*, \*\*\* refer to statistical significance at the 10, 5, and 1 percent level, respectively.

# VI.3 Direct Lobbying and the Political Narrative

*Results on Campaign Donations.* Table 4 reports the estimates of Equation 8. About 0.1 percent of all generalist physicians are listed as donors to Eisenhower in the data. Based on estimates in Column 4, being a specialist increased this by approximately 0.2 percentage points. Interacting specialist with the Campaign further increases this by 0.1 percentage points per standard deviation of exposure, or approximately one-half of the overall effect of being a specialist (similar results are obtained using amount donated; see Appendix Table D4). We also plot the donation rate by specializations in Appendix Figure A17. Specialists in general were about twice as likely to donate than generalists. Within specialists, the donation rate was higher for surgeons than most other groups.

	(1)	(2)	(3)	(4)
Campaign Exposure $ imes$ I <sup>Specialist</sup>	0.001***	0.001***	0.001***	0.001***
	(0.000)	(0.000)	(0.000)	(0.000)
Campaign Exposure	-0.000	-0.000	-0.000	-0.000
	(0.000)	(0.001)	(0.000)	(0.000)
I <sup>Specialist</sup>	0.003***	0.003***	0.002***	0.002***
	(0.001)	(0.001)	(0.001)	(0.001)
Dependent Mean	0.001	0.001	0.001	0.001
Observations	167373	167222	166634	166634
County FE		$\checkmark$		
Design Controls			$\checkmark$	$\checkmark$
Individual Characteristics				$\checkmark$

# Table 4: Effect of the Campaign on Donating to Eisenhower-Nixon Campaign

*Notes:* Table reports a regression of physician donation on the interaction of Campaign Exposure and *I*<sup>Specialist</sup> as in Equation 8. The outcome is an indicator for whether the physician had donated to Eisenhower's Presidential Campaign (Whitaker & Baxter *Campaigns, Inc.* 1933-1974). Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1. *I*<sup>Specialist</sup> is an indicator for whether the physician was a specialist. All regressions control for whether the physician is an AMA member. Individual physician characteristics include age, an indicator for having served as a physician in the military, and an indicator for currently being in practice (American Medical Association 1950*a*). Design controls include county-level log income per capita (Bureau of Economic Analysis 2023), number of hospitals (American Hospital Association 1948, 1950, 1952), and state-level share unionized (Farber et al. 2021). Dependent mean is the unconditional mean of the dependent variable for non-specialists. Robust standard errors clustered at the county level are in parentheses. \*, \*\*, \*\*\* refer to statistical significance at the 10, 5, and 1 percent level, respectively.

*Results from the Congressional Record.* The Campaign also appeared to influence debate on the Congressional floor of the Senate and House: comparing pre-post means, we find an increase in the usage of the term "compulsory" and a corresponding decline in the word "national" when describing health insurance (see Figure 8). We interpret this as suggestive evidence of a change in the narrative surrounding NHI. Consistent with this shift in the Congressional narrative, we find that the Campaign appeared to benefit House Republicans in the 1950 and 1952 elections, detailed in Appendix Section C.

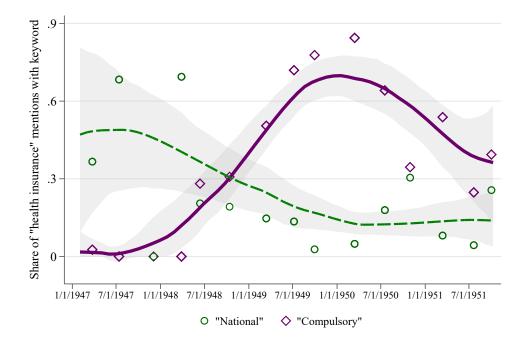


Figure 8: Terms Used to Describe National Health Insurance in the Congressional Record, 1947-1951

*Notes:* Figure plots the time trend of terms used for National Health Insurance in the Congressional Record (United States Congress 1947, 1948, 1949, 1950). Green circles are shares of the term "National Health Insurance" used over total mentions of "health insurance" in a given part of the record, whereas purple diamonds are shares of the term "compulsory health insurance" used over total mentions of "health insurance" used over total mentions of 120-day bins. The curves are fitted using the raw data by kernel-weighted local linear regressions, and the shaded areas are the associated 95% confidence intervals obtained from a bootstrapping procedure with 500 repetitions.

#### VI.4 Robustness Checks

We perform several tests to address possible threats to identification. To address concerns regarding Campaign exposure exogeneity, we show robustness to potentially confounding variables. Appendix Tables D5, D6, and D7 include controls for war bond penetration, which has been linked to Republican electoral success in the 1950s (Brunet, Hilt and Jaremski 2023), unit-year pre-trends, the share of Blue Cross hospitals, the passage of enabling legislation, and trends in the 1950 share specialist physicians.<sup>43</sup> We also control for linear trends in the share of AMA members and share of the adult population with at least five years of schooling in Appendix Table D8 and find very similar effects. Estimates also remain stable when including radio and television penetration controls (Appendix Table D9), as anticipated given that these outlets were not major components of the Campaign.

<sup>&</sup>lt;sup>43</sup>As noted by Lee and Solon (2011) and summarized by Goodman-Bacon (2021, p.2561), unit-specific linear time trends "cannot distinguish between time-varying treatment effects and preexisting trends." We follow Goodman-Bacon (2021) and omit these, given that time-varying treatment effects are demonstrated in Figure 5, and instead per Miller (2023), estimate unit-specific pre-trends in Column 1 of Appendix Tables D5 and D6.

Second, we verify that our results are not sensitive to precisely how we define the exposure or outcome: Using a dichotomous treatment for above and below median produces similar conclusions (Column 6 of Appendix Tables D5 and D6, and Column 7 of Appendix Table D7). Constructing the exposure with propaganda materials only leads to comparable estimates, albeit noisier for the NHI approval outcome (Appendix Figures D6 and D7; Column 10 of Appendix Tables D5 and D6, and Column 8 of Appendix Table D7). Placing each Campaign component in separately yields coefficients that are indistinguishable from each other and similar in magnitude for the main outcomes of PHI enrollment and Gallup opinion (compare Column 1 with Column 4 of Appendix Tables D10 and D11). The estimates obtained from multiplicative form specifications suggest complementarity for PHI enrollment (Appendix Table D10 Columns 5 and 6) and show no strong patterns for NHI approval (Appendix Table D11 Columns 5 and 6). Enrollment in PHI benefited from the interaction of messaging from the supply and demand side of health care, whereas for shifting public opinion on policy, the two factors seemed more substitutable. We also estimate and plot the effect of Campaign nonparametrically and find dose response behavior in PHI enrollment and NHI approval (see Appendix Figures D8 and D9). For the outcome of PHI enrollment, we consider an alternate denominator: Total White working-age male population instead of total population (Appendix Table D5 Column 9), results are predictably larger but otherwise similar.

To further examine our identification strategy, we compute the *F*-test on pre-trends in all our main analyses. In addition, we follow Roth (2022) and generate a counterfactual evolution for each outcome: Appendix Figures D3 and D5 demonstrate a stark deviation. We also perform sensitivity analyses as proposed by Rambachan and Roth (2023) allowing for potential parallel trends violations (Column 7 of Appendix Tables D5, D6), and estimates remain stable. Per Callaway, Goodman-Bacon and Sant'Anna (2024), we provide non-parametric estimates of the average causal response which adjust for the TWFE weighting schemes (Appendix Table D12): Results are similar to our main estimates in Table 1.

Lastly, we investigate the role of McCarthyism, which grew to full strength on the heels of the AMA-WB Campaign but nevertheless could be a concern. Appendix Table D13 shows that augmenting WB-AMA Campaign ads (both the main and tie-in ads) with a random sample of other ads in the same newspaper demonstrates a very low rate of Socialist or Communist-related terms among regular ads, less than one percent. About 90 percent of AMA-WB related ads contained such terms (Columns 1 and 2) and on average each AMA-WB ad contained five such words (Columns 3 and 4). In addition, Column 8 of Appendix Tables D5 and D6 and Column 6 of Appendix Table D7 show similar estimates when dropping California, where Hollywood was a major target of the Red Scare (Humphries 2008). Appendix Figure D10 further shows that the disapproval of the Communist Russian government in Gallup Polls is not correlated with Campaign exposure, while NHI approval is negatively associated with exposure in the post-Campaign period, suggesting that our results can not be explained by movements in anti-Communist sentiment.

# VII Conclusion

Our analyses demonstrate that the rise of private health insurance in the U.S. can in part be attributed to a coordinated campaign against a universal, tax-financed health system. At this critical juncture, when support for NHI was high, had the commitment of the executive branch, a Democratic legislative branch, and was being implemented in peer nations worldwide, efforts to derail implementation succeeded by using the rhetoric of freedom and providing a private alternative that would persist. The Campaign increased enrollment in PHI, reduced support for NHI, and suggestively altered the framing Congressional representatives used when debating health insurance legislation. Although beyond the scope of our analysis, the

Campaign is also credited with coining terms for NHI that are still used today (Lepore 2012). Furthermore, interest and trade group influence is still present: In 2023, four out of the top ten lobbyists by amount spent are affiliated with the healthcare industry (see Appendix Figure A18; Open Secrets 2023). These findings speak to the role of interest groups and indirect lobbying in shaping the trajectory of health policy in the U.S. Per the conceptual framework outlined in Section III, when private resources vastly overpower public resources and can dominate the narrative, the ability to pass legislation that diminishes market power may be challenging.

The Campaign may have affected the current U.S. healthcare landscape in other ways not included in our analyses. For example, the growth of private health insurance, and particularly group enrollment through employment, left many retirees aged 65 and above without insurance previously obtained through their employer and may have contributed to the establishment of Medicare (McClellan and Skinner 2006). Future work may elucidate whether the Campaign had effects on other forms of social insurance or wider repercussions for U.S. policy-making.

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# Appendix

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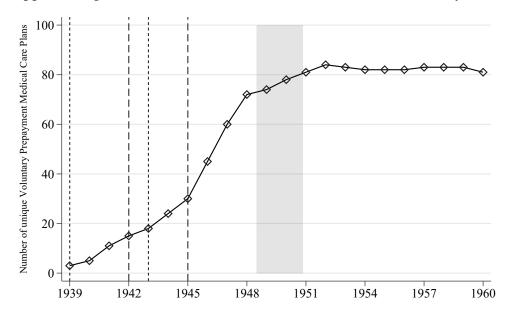
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## **A** Descriptive Tables and Figures

Year	Question Text
Nov 1945	Have you heard or read about President Truman's proposal for hav- ing a compulsory health insurance plan in this country? If yes: Do you approve or disapprove of Truman's plan for health insurance in this country?
Apr 1946	Have you heard or read about the Wagner-Murray-Dingell health in- surance bill which would require weekly pay deductions from every worker and employer for medical, dental and hospital insurance? If yes: What do you think of this bill?
May 1949 <sup>1</sup>	Should the U.S. Congress pass the government's compulsory health insurance program which would require wage or salary deductions from all employed persons to provide medical and hospital care for them and their families? <i>Or:</i> The Truman administration has proposed a compulsory medical and hospital insurance program to benefit all employed persons and their families. The cost would be paid by requiring every employed person to pay \$15 on every thousand dollars earned UP TO the first \$4800, and the employer would match this by paying an equal amount. Would you favor or oppose such a bill?
Nov 1949	Have you heard or read about the Truman administration's plan for compulsory health insurance? If yes: What is your own opinion about it – are you for the Administration's plan, or not?
Oct 1950	Have you heard or read anything about the Truman Administration's Compulsory Health Insurance Plan? If yes: Do you approve or dis- approve of this plan?
Nov 1950	Have you heard or read about the Truman administration's plan for compulsory health insurance? If yes: What is your own opinion about it – are you for the Administration's plan, or not?

Appendix Table A1: Gallup Questions on National Health Insurance

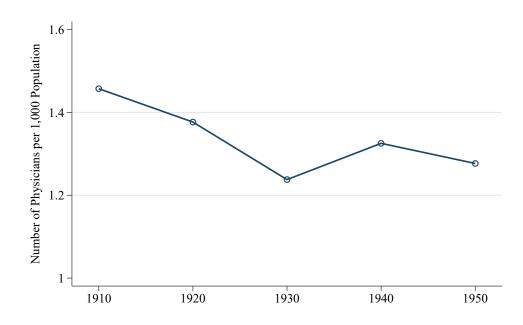
*Notes:* Table reports the questions Gallup Organization asked respondents over the time period of the analysis (Gallup Organization 1945, 1946, 1949, 1950). <sup>1</sup>In the May 1949 Gallup wave, the question on approval for NHI was asked in two different ways, shown above, as part of a Gallup experiment.



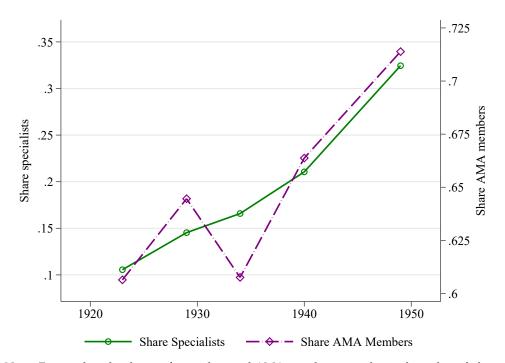
Appendix Figure A1: Number of Blue Shield Medical Service Plans by Year

*Notes:* Figure shows the total number of unique voluntary prepayment medical care plans each year. 1939 marks the formation of the California Physicians Service, the first Blue Shield plan, and California Governor Olson's support of AB 2172 (Board of Trustees of Mississippi State Medical Association 1965; Dimmitt 2007; Morrisey 2013). 1942 marks the AMA House of Delegates' approval of medical service plans when sponsored by a state or county medical society (Board of Trustees of Mississippi State Medical Association 1965). 1943 marks the first introduction of the Wagner-Murray-Dingell bill for centralized medical services at the national level (Palmer 1999; Corning 1969). 1945 marks the death of President Roosevelt, President Truman's call for public health insurance, the introduction of Senate Bill 1606 by Senators Wagner and Murray to provide for a national health program, and the AMA House of Delegates' decision to promote and develop prepayment medical plans sponsored by medical societies.

Appendix Figure A2: Number of Physicians per 1,000 Population, 1910-1950

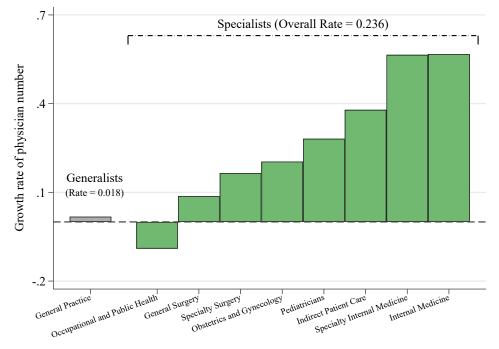


*Notes:* Figure plots the number of physicians per 1,000 population. Physician data are from the AMA House of Delegates Proceedings (American Medical Association 1910, 1920, 1923, 1929, 1930, 1934, 1940, 1950*b*). Population data are from the 1910, 1920, 1930, 1940, and 1950 Census (Haines 2010).



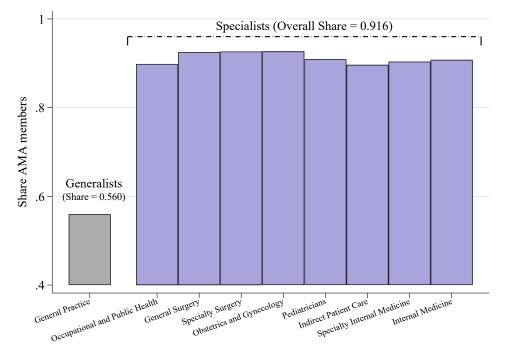
Appendix Figure A3: Shares of Specialists and AMA Members, 1923–1949

*Notes:* Figure plots the shares of specialists and AMA members over the total number of physicians in the years 1923, 1929, 1934, 1940, and 1949. Only years with available data on both specialists and AMA membership are included. Data on the number of specialists are from Perrott and Pennell (1957). Data on AMA members are from the AMA House of Delegates Proceedings as well as the American Medical Directory (American Medical Association 1910, 1920, 1923, 1929, 1930, 1934, 1940, 1950*b*, 1942, 1950*a*).



Appendix Figure A4: Growth Rate of Physicians by Specialty from 1942 to 1950

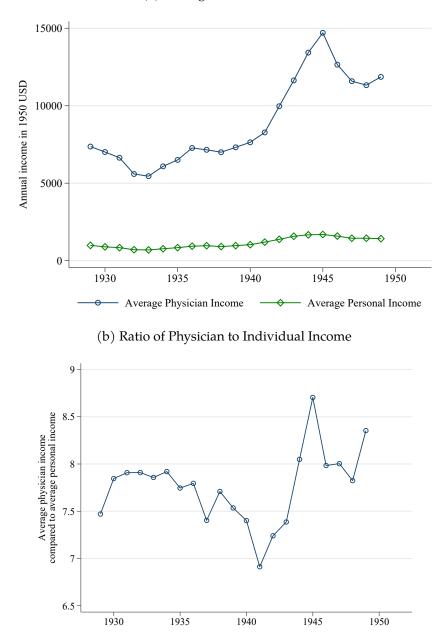
*Notes:* Figure plots the growth rates in the number of physicians by specialty from 1942 to 1950. The growth rate is computed as the difference between the number of physicians in 1950 and the number of physicians in 1942 divided by the number of physicians in 1942. Data are from the American Medical Directory (American Medical Association 1942, 1950*a*).



Appendix Figure A5: Share AMA Members by Physician Specialty in 1950

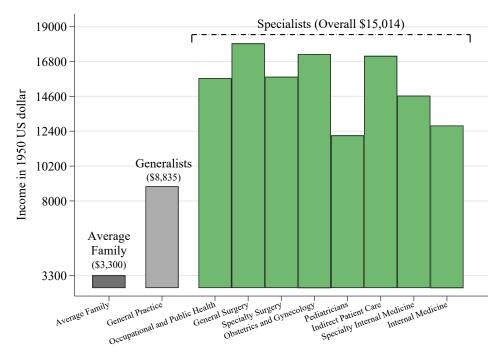
*Notes:* Figure plots the share of physicians who are AMA members by specialty. Data are from the 1950 American Medical Directory (American Medical Association 1950*a*).

Appendix Figure A6: Physician Income Growth, 1929–1949



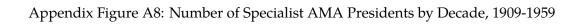
(a) Average Annual Income

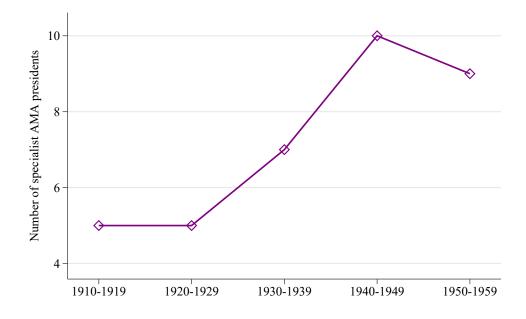
*Notes:* Figure plots time trends for the average income of physicians from 1929 to 1949. Panel A plots the average income for physicians and all Americans. Incomes are adjusted to 1950 U.S. dollars. Panel B plots the ratio of average physician income to average personal income in the same year. Physician income data are from the Survey of Current Business (Weinfeld 1951), and national income data from Bureau of Economic Analysis (2023).



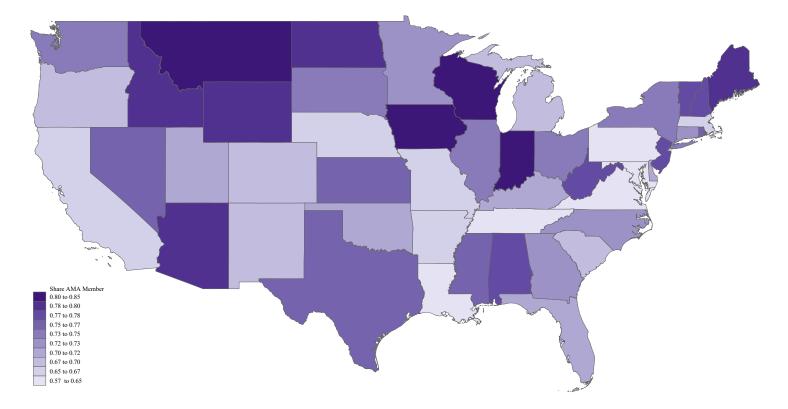
Appendix Figure A7: Average Physician Annual Income by Specialty, 1949

*Notes:* Figure plots the average annual income for physicians by specialty in 1949 and average annual family income in 1950. Incomes are adjusted to 1950 U.S. dollars. In 2023 dollars, the average family annual income in 1950 is \$42,040.9, the average annual income for generalists in 1949 is \$112,555.0, and is \$191,273.3 for specialists. Physician income data are from the Survey of Current Business published by the Bureau of Economic Analysis (Weinfeld 1951). Family income data are from the Population Report published by the Census Bureau (Peel 1952).





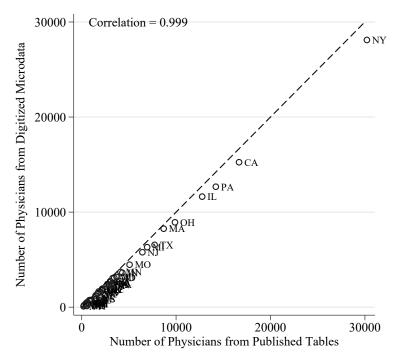
*Notes:* Figure plots the number of specialists among AMA presidents by decade from 1909 to 1959.



Appendix Figure A9: AMA Share of Physicians

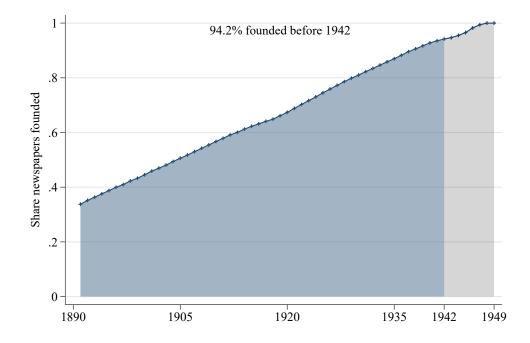
*Notes:* Exhibit shows the share of total physicians that are members of the AMA as of 1950 by deciles. Data are from American Medical Association (1950*a*).

# Appendix Figure A10: Number of Physicians by State from Published Table and Aggregated Microdata

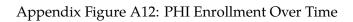


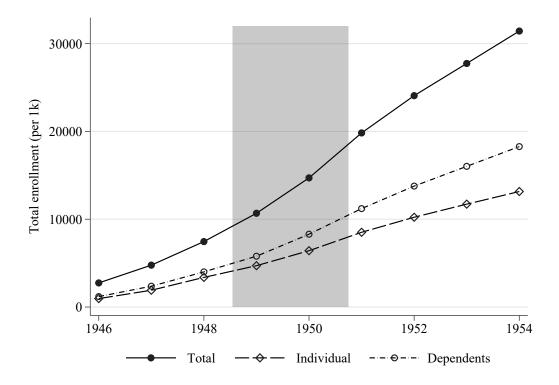
*Notes:* Figure plots the total number of physicians by state, where the y-axis represents the numbers from Tables published in American Medical Association (1950*a*), and the x-axis represents the number aggregated from the microdata digitized from individual records in the 1950 American Medical Directory (American Medical Association 1950*a*). The dashed line is the 45-degree line.

## Appendix Figure A11: Share Newspapers Founded by Year

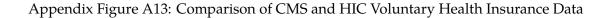


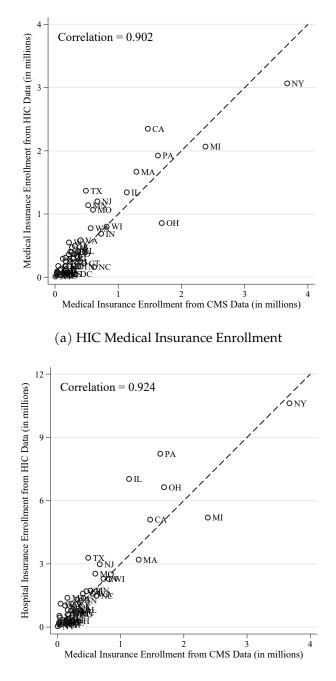
*Notes:* Figure plots the CDF of the share of newspapers founded by year. Data are from Ayer (1949).

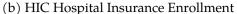




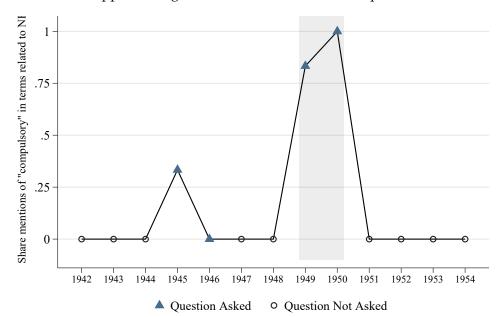
*Notes:* Exhibit plots voluntary (private) health insurance enrollment over time. Data from Council on Medical Service (1946-1954)





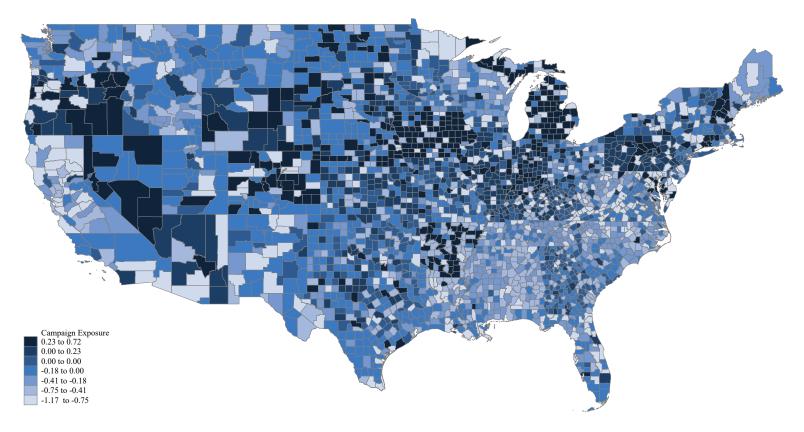


*Notes:* Figure plots the total number of enrollees. CMS indicates counts from the Council on Medical Service - American Medical Association (Council on Medical Service 1946-1954). HIC indicates counts from the Health Insurance Council (The Survey Committee of the Health Insurance Council 1949-1965). Panel A plots the correlation between HIC medical insurance enrollment and CMS medical enrollment, and Panel B plots the correlation between HIC hospital enrollment and CMS medical enrollment.



Appendix Figure A14: Terms Used in Gallup Polls

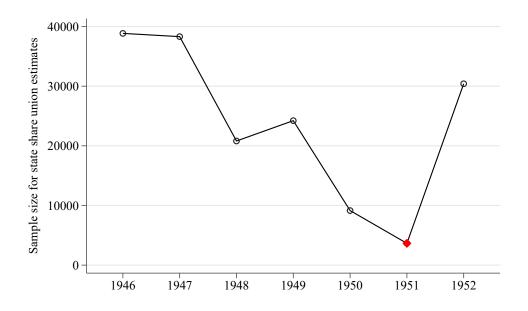
*Notes:* Figure plots the share of "compulsory" among terms referring to NHI in Gallup poll questions in Appendix Table A1. The numerator is total mentions of "compulsory" in a given questions, and the denominator is the sum of total mentions of "compulsory", "government", "national", and "state". Triangles represent years where Gallup polls asked questions about NHI. The share is coded as 0 for April 1946 as both the numerator and the denominator are 0. Circles represent years where Gallup polls did not ask questions about NHI. Shaded area indicates the Campaign period.



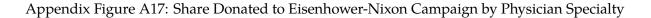
### Appendix Figure A15: Geographical Distribution of Campaign Exposure County level

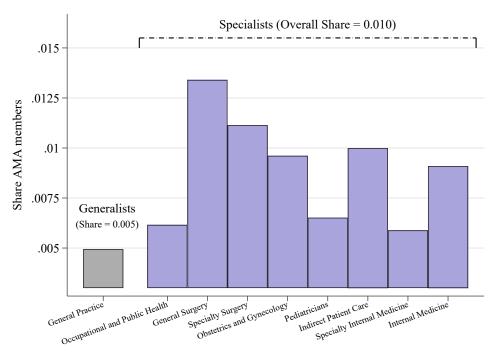
*Notes:* Map shows the distribution of the county-level Campaign exposure variable for data used in the lobbying regressions, residualized by design controls: county level log income per capita (Bureau of Economic Analysis 2023), county level number of hospitals (American Hospital Association 1948, 1950, 1952), and state level share of unionized households Farber et al. (2021).

## Appendix Figure A16: Sample Size for State Share Union Household Estimates

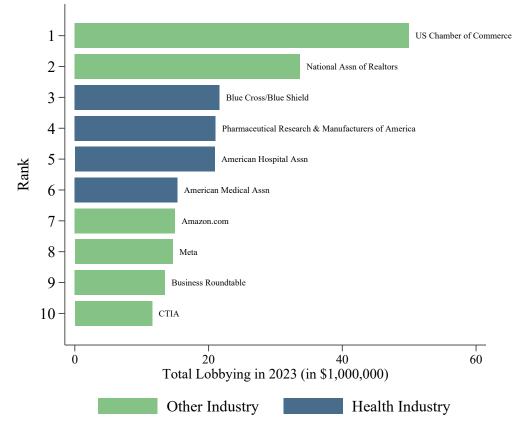


*Notes:* Figure plots the sample size used for state share union household estimates. Data are from Farber et al. (2021).





*Notes:* Figure plots the donation rate of physicians by specialty. Each bar represents the share donated within each specialization. The overall share for specialists is computed using all specialists who donated divided by the total number of specialists. Specialty data are from the American Medical Directory (American Medical Association 1950*a*), and donation data are from the National Physicians' Committee for the Extension of Medical Service (1947-1949).



Appendix Figure A18: Top 10 Lobbying Organizations in 2023

*Notes:* Figure plots the total lobbying amount of the top 10 organizations in 2023 (Open Secrets 2023). Green bars represent organizations from other industries, and blue bars represent organizations from the health industry.

## **B** Primary Source Exhibits

ROY T. RAGATZ C. H. CROWNHART The STATE MEDICAL SOCIETY of WISCONSIN 917 TENNEY BUILDING Madison (3) January 12, 1948 Mr. Clem Whitaker, Public Relations Director California Medical Association 1605-6-7 DeYoung Building San Francisco, California Dear Mr. Whitaker: Thank you very much for sending the first two issues of the CMA Public Relations News. We find it extremely interesting, so interesting, in fact, that we would like nine additional copies of either issue. This would give each of the members of our committee on Medical Service and Public Relations an idea of what you are doing.

Appendix Figure B1: *CMA Public Relations News* Sent to the State Medical Society of Wisconsin

*Notes:* Evidence of outreach by Whitaker & Baxter to national, state and local medical societies (Whitaker & Baxter *Campaigns, Inc.* 1933-1974).

#### Appendix Figure B2: Example Resolution Letter and Passed Resolution against National Health Insurance

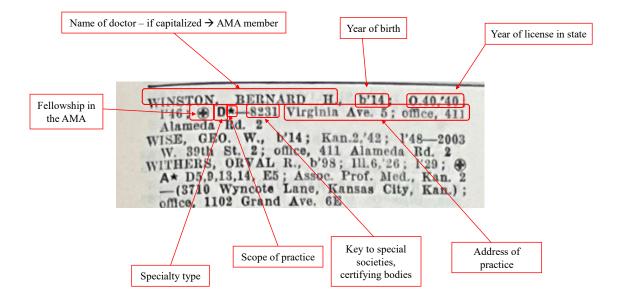
ONE HUNDREDTH ANNUAL SESSION, PI	HILADELPHIA. OCTOBER 15-10, 1980 NAROLD B. GARDNER, M. D PRESIDENT-ELECT	
ROGER BANUEL, M. D PRESIDENT 108 N. HIGKORY ST., MT. CARWEL	121 University PLACE, PITTERURAN (18)	
ALTER F. DONALDOON, M. D SECRETARY-TREASURER BIO4 JONNING ARCADE, FITTASURAM (Sa)	LESTER N. PENY EXECUTIVE BECRETARY BOD Grave Breat, Manustrus	
P.1	* 41	
February 23, 1950		
Dear Deputy Commander:		
We know you will be interested in the word N. Craig when he spoke to the Conference Washington, D.C. on December 8, 1949.	of County Medical Society officers in	
"The American Legion is opposed to it would stunt the growth and geniu because it would add another link to	is of the medical profession, and	
"The American Legion recognizes advancement of the Nation's health s be joined by the doctors of the count adjustments.	ervices. We want to join with and	
"In the promotion of these purposes, ally than the nearest American Leg medical practitioners and Legionnai home towns for objectives such as th that the Nation's doctors will accept	gion Post. A team composed of res working side by side in their nese would be hard to beat. I hope	
Following the suggestion by National Con defeat Compulsory Health Insurance, we a from all American Legion Posts under y increase the effectiveness of the resolutio American Legion.	sk your assistance in securing resolutions your jurisdiction. Such endorsements	
We are enclosing five copies of a letter early action. We would appreciate it if yo one of the Posts under your jurisdiction re more copies we will be glad to supply you.	ou will be kind enough to see that each eccives one of these letters. If you need	
These endorsements are most vital in th thinking of the members of one of the most	e campaign because they reflect the timportant organizations in this country.	
Sincerely		
E. Roger Demuel	and the second	
E. Roger Samuel, M.D., President The Medical Society of the State of Pennsy 230 State Street, Harrisburg, Pennsylvani	Ivania a	
Enclosures	and the second	

Description of the provided of th

(a) Resolution letter

(b) Resolution text

*Notes:* Panel A shows a request to pass local resolutions against NHI from the Medical Society of Pennsylvania. Panel B shows a local resolution against NHI passed by the General Federation of Women's Clubs (Whitaker & Baxter *Campaigns, Inc.* 1933-1974).



Appendix Figure B4: Example Records from the American Medical Directory

*Notes:* Exhibit shows example records from the American Medical Directory (American Medical Association 1950*a*, p.339).

Appendix Figure B3: Main Campaign Newspaper Ad (Ad Component)



**RUNNING AMERICA** is the joint job of 150,000,000 people. It's the biggest job in the world today -keeping it running for liberty and for freedom. And the whole world's watching to see whether Americans can do it!

IN MUCH OF THE WORLD today, the people have resigned from running their own countries. Others have been quick to step in\_first with promises of "security"—and then with whips and guns\_to run things their way. The evidence is on every front page in the world, every day.

FREEDOM COMES UNDER ATTACK. The reality of war has made every American think hard about the things he's willing to work and fight for—and freedom leads the list.

But that freedom has been attacked here recently—just as it has been attacked in other parts of the world. One of the most serious threats to individual freedom has been the threat of Government-dominated Compulsory Health Insurance, falsely presented as a new guarantee of health "security" for everybody.

THE PEOPLE WEIGH THE FACTS. In the American manner, the people studied the case for Socialized Medicine—and the case against it.

They found that Government domination of the people's medical affairs under Compulsory Health Insurance means lower standards of medical care, higher payroll taxes, loss of incentive, damage to research, penalties for the provident, rewards for the improvident.

They found that no country on earth can surpass America's leadership in medical care and progress. They found that able doctors, teachers, nurses and scientists —working in laboratories where Science, not Politics, is master—are blazing dramatic new trails to health for Americans—and for the world.

THE "GRASS ROOTS" SIGNALS CONGRESS. In every community in the Nation, people stood up to be counted on this important issue. Thousands of local women's clubs, civic groups, farm, business, religious, taxpayer, medical, educational and paritotic organ izations spoke out-giving the great United States Congress its unmistakable Grass Roots signal from home!

And ever watchful, ever sensitive to an alert people, The Congress saw that signal, and heard the people speak out, loud and plain. That's democracy in action. That's the American way!

Today among the 10,000 great organizations on militant public record against "Compulsory Health Insurance" are:

General Federation of Women's Clubs American Farm Bureau Federation National Grange Veterans of Foreign Wars National Conference of Catholis Charities American Protestant Hospital Association

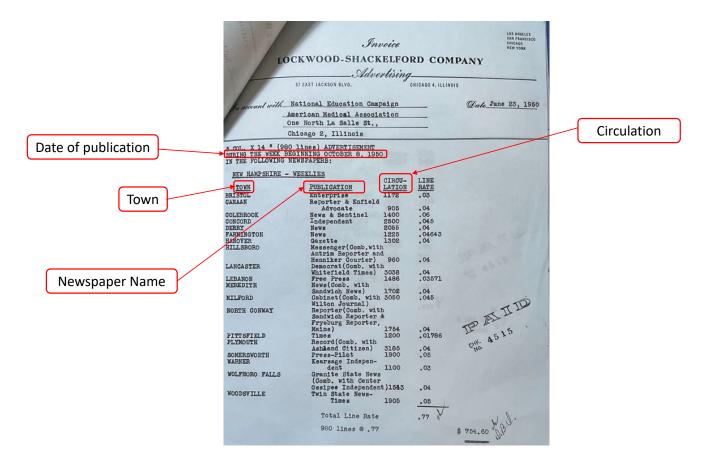
American Legion National Association of Small Business Men United States Chamber of Commerce National Association of Retail Grocers National Retail Dry Goods Association American Bar Association

• Doctors of this Nation are grateful that the people refused to be wooed by the fantastic promises of this un-American excursion into State Socialism. • Doctors of America are dedicated to serve their fellow citizens at home and their comrades in uniform, wherever service to this Nation may take them. • And the thing they stand ready to fight for-to sarifice for-to die for-is not the alien way of life of Socialism, but the prideful security of a free and self-reliant people!



PHYSICIANS OF THIS COMMUNITY PARTICIPATED IN PAYING FOR THIS SPACE AMERICAN MEDICAL ASSOCIATION • NATIONAL EDUCATION CAMPAIGN ONE NORTH LA SALLE STREET, CHICAGO, ILLINOIS

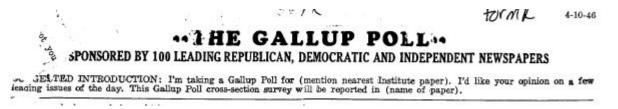
*Notes:* Exhibit shows the standard template for the main Campaign advertisement which circulated in October 1950. The size and content were constant across newspapers. Example taken from page 16 of the *Athens Alabama Courier* published on October 12, 1950 (American Medical Association 1950c).



#### Appendix Figure B5: Lockwood-Shackelford Advertising Agency Invoice

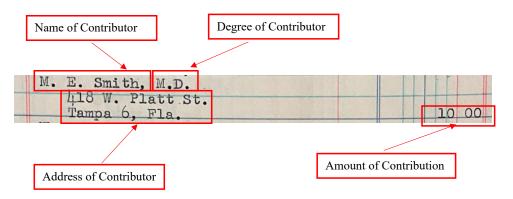
*Notes:* Exhibit shows an invoice from the Lockwood-Shackelford Advertising Company, outlining the data extracted in red. The 980 line advertisement referenced is the main Campaign ad shown in Appendix Figure B3.

Appendix Figure B6: Gallup Sponsor and Recruitment Instructions



*Notes:* Exhibit shows Gallup Poll instructions for recruitment and sponsorship. Example taken from page 16 of the study documentation for Gallup Poll # 1946-0369 (Gallup Organization 1946).

### Appendix Figure B7: Example Record from National Professional Committee for Eisenhower for President



*Notes:* Exhibit shows an example record from the National Professional Committee for Eisenhower for President (Whitaker & Baxter *Campaigns, Inc.* 1933-1974).

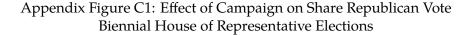
## C Elections Analysis

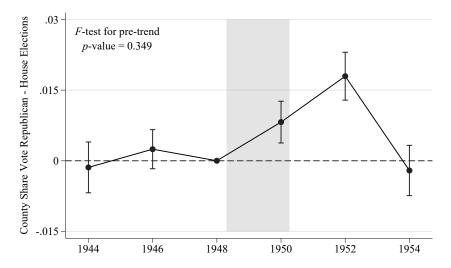
The Campaign may have affected voting behavior, as NHI legislation was associated with members of the Democratic party and major ads were run before the 1950 midterms. Therefore we use the share of votes for Republican House of Representative candidates as our outcome of interest (Inter-university Consortium for Political and Social Research 1999). We focus on elections in the House of Representatives data as there are fewer Senate elections due to the six-year terms. Several considerations are important to bear in mind when using such data. First is that redistricting affected House seats in 16 states (U.S. Census Bureau 1950) – motivating our use of county-level data. Second, in 1948, the States' Rights Democratic Party (also known as the "Dixiecrats") formed as an offshoot of the Democratic party in the South, opposing civil rights reforms supported by Truman and the Democratic platform (Webb 2013). Therefore, in our preferred specification, we include region-year fixed effects to adjust for the region-specific shocks over time. Lastly, candidates could have shifted their positions on issues even though they did not change party.

The estimating equation for elections is similar to Equation 5, however the outcome is  $\frac{V^{\text{Repub}_{ct}}}{V_{ct}}$ , the share of votes for Republican candidates for the House of Representatives over total votes. These data are county-level votes for biennial elections spanning the period 1944 to 1954. Therefore, county fixed effects and region-year fixed effects are included in addition to the usual time-varying state-level design controls.

The AMA-WB Campaign appeared to benefit House Republicans, at least in the subsequent 1950 midterm election and 1952 Presidential election (Appendix Figure C1, *p*-value on *F*-test for pre-trend = 0.395).<sup>44</sup> The results are short-lived and dissipate by 1954. There are several potential reasons for the decay that are beyond the scope of our analysis, but, by that time, NHI was not on the agenda. The average effect in the post-Campaign period shown in Appendix Table C1 demonstrates that one standard deviation increase in Campaign exposure increased the Republican share of the House vote by about 1 percentage point. These findings are sensitive to the exclusion of region-year fixed effects, which we attribute to the Southern Democrats' (Dixiecrats) ascension in 1948. Indeed, when we exclude the South, the event study is robust across a range of specifications. The findings are also robust to specifications that adjust for county-year pre-trends, include controls for war bonds, drop California, use a binary exposure variable, control for the county-level share of Blue Cross hospitals, and use a binary outcome (see Appendix Table C2).

<sup>&</sup>lt;sup>44</sup>Although we don't examine Senate races due to their relative infrequency, the Campaign took credit for defeating two prominent advocates of NHI, Senators Claude Pepper of Florida and Frank Graham of North Carolina, among others (Corning 1969).





*Notes:* Figure plots  $\beta$  coefficients from a regression similar to Equation 5, and associated 95% confidence intervals using cluster robust standard errors. The outcome is Republican vote share. Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1. The sample includes the years 1944, 1946, 1948, 1950, and 1954, where 1948 is taken as the base period. Design controls include county-level log income per capita (Bureau of Economic Analysis 2023), county-level number of hospitals (American Hospital Association 1948, 1950, 1952), and state-level share of unionized hospitals (Farber et al. 2021). Election controls include the lagged share of presidential Republican votes Inter-university Consortium for Political and Social Research (1999).

	(1)	(2)	(3)	(4)
Campaign Exposure $\times I^{\text{Post}}$	0.008***	0.007***	0.008***	0.008***
	(0.002)	(0.002)	(0.002)	(0.002)
Campaign Exposure	0.018***	0.002	0.000	
	(0.004)	(0.002)	(0.002)	
Dependent Mean	0.404	0.406	0.404	0.404
Observations	16404	16644	16404	16404
Region $\times$ Year FE	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$
Design Controls	$\checkmark$		$\checkmark$	$\checkmark$
Election Controls		$\checkmark$	$\checkmark$	$\checkmark$
County FE				$\checkmark$

#### Appendix Table C1: Effect of Campaign on Share Republican Vote Biennial House of Representative Elections

*Notes:* Table reports a regression of county-level Republican vote share on the interaction of Campaign Exposure and  $I^{\text{Post}}$  (Inter-university Consortium for Political and Social Research 1999). Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1.  $I^{\text{Post}}$  is an indicator for post-Campaign. The sample includes years 1944, 1946, 1948, 1950, 1952, and 1954. Dependent mean is the unconditional mean of the dependent variable for the pre-period. Election controls include the lagged county share Republican vote in the most recent presidential election (Inter-university Consortium for Political and Social Research 1999). Design controls include county-level log income per capita (Bureau of Economic Analysis 2023), county-level number of hospitals (American Hospital Association 1948, 1950, 1952), and state share unionized (Farber et al. 2021). Robust standard errors clustered at the county level are in parentheses. \*, \*\*, \*\*\* refer to statistical significance at the 10, 5, and 1 percent level, respectively.

	(1)	(2)	(3)	(4)	(5)	(6)
Specification:	Unit-Specific	War Bond	Without	Binary	Blue Cross	Binary
	Pre-Trend	Control	California	Treatment	Control	Outcome
Campaign Exposure $\times I^{\text{Post}}$	0.008***	0.007***	0.009***	0.006*	0.008***	0.009
	(0.002)	(0.002)	(0.002)	(0.003)	(0.002)	(0.005)
Dependent Mean	0.404	0.403	0.409	0.404	0.404	0.481
Observations	16404	13670	16068	16404	16404	16404
County FE Design Controls Election Controls	√ √ √	√ √ √	√ √ √	√ √ √	√ √	$\checkmark$
Region $\times$ Year FE	<b>√</b>	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$

### Appendix Table C2: Effect of Campaign on Share Republican Vote Biennial House of Representative Elections Robustness Tests

*Notes:* Table reports specification checks for the outcome of Republican vote share in House of Representatives elections (Inter-university Consortium for Political and Social Research 1999). Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1. The sample includes years 1944, 1946, 1948, 1950, 1952, and 1954. *I*<sup>Post</sup> is an indicator for the post-Campaign period. Column 1 reports regression results controlling for unit-specific pre-trends following Miller (2023). Column 2 reports regression results controlling for war bond purchases (United States Census Bureau 2012; Council on Medical Service 1946-1954). Column 3 reports results excluding California. Column 4 reports results where treatment is dichotomized at the 50th percentile of Campaign exposure. Column 5 reports results replacing hospital count in the Design Controls with the share of Blue Cross hospitals (American Hospital Association 1948, 1950, 1952). Column 6 reports regression results where the outcome is an indicator that equals 1 if the Republican vote share is greater than 0.5. Dependent mean is the unconditional mean of the dependent variable for the pre-period. Design controls include county log income per capita (Bureau of Economic Analysis 2023), number of hospitals at the county level (American Hospital Association 1948, 1950, 1952), and state share unionized (Farber et al. 2021). Election controls include the lagged county share Republican vote in the most recent presidential election. Robust standard errors clustered at the county level are in parentheses. \*, \*\*, \*\*\* refer to statistical significance at the 10, 5, and 1 percent level, respectively.

# **D** Additional Analyses

#### D.1 Newspaper Analyses

Newspapers	Newspapers Matched in October 1950									
	(1)	(2)	(3)							
	Overall Mean	Difference	SE							
Log Circulation	8.247	-0.308	(0.184)							
Urban	0.709	-0.122	(0.068)							
Weekly	0.604	-0.094	(0.041)							
Established before 1945	0.990	0.003	(0.014)							
Leans Republican	0.226	0.092	(0.062)							
Railways Crossed	0.994	-0.007	(0.006)							
F-Stat		1.76	7							
<i>F</i> -Test <i>p</i> -Value		0.32	6							
Observations	628									
Region FE	on FE 🗸 🗸									

# Appendix Table D1: Balance Test Whether Newspaper Contains Main Campaign Ad Newspapers Matched in October 1950

*Notes:* Table reports balance tests for having the main Campaign ad shown in Appendix Figure B3. The newspaper sample is from *NewspaperArchive* and includes all newspapers with issues in October 1950 merged to the Ayer & Son's data as described in Section IV. Column 1 reports the unconditional mean for the full sample. Column 2 reports a regression of newspaper characteristics on an indicator for having the ad, and Column 3 reports the associated robust standard errors. *F*-stat and *p*-value are for an *F*-test of the joint significance of the variables listed. Region fixed effects are included in all regressions. \*, \*\*, \*\*\* refer to statistical significance at the 10, 5, and 1 percent level, respectively. Newspaper characteristics data are from Ayer (1949), and Campaign ads data are from Whitaker & Baxter *Campaigns, Inc.* (1933-1974).

	(1)	(2)	(3)		
	Overall Mean	Difference	SE		
Log Circulation	6.812	-0.005	(0.027)		
Urban	0.639	-0.183**	(0.040)		
Weekly	0.846	-0.045	(0.028)		
Health Related	0.016	-0.006	(0.008)		
Lean Republican	0.165	0.046	(0.042)		
Lean Democrat	0.169	0.089	(0.101)		
Railways Crossed	0.993	0.001	(0.003)		
F-Stat		0.771			
<i>F</i> -Test <i>p</i> -Value		0.582			
Observations		1444	4		

# Appendix Table D2: Balance Test Whether Newspaper Contains Main Campaign Ad Lockwood-Shackelford & Ayer's Directory

*Notes:* Table reports Balance test for having the main Campaign ad shown in Appendix Figure B3. The sample includes a fuzzy merge between Lockwood & Shackelford records and the Ayer & Son's data as described in Section IV. Column 1 reports the unconditional mean for the full sample. Column 2 reports a regression of newspaper characteristics on an indicator for having the ad, and Column 3 reports the associated robust standard errors. *F*-stat and *p*-value are for an *F*-test of the joint significance of the variables listed. \*, \*\*, \*\*\* refer to statistical significance at the 10, 5, and 1 percent level, respectively. Newspaper characteristics data are from Ayer (1949), and Campaign ads data are from Whitaker & Baxter *Campaigns, Inc.* (1933-1974).

## **D.2** Robustness Tables

	(1)	(2)	(3)	(4)
Campaign Exposure	0.081*** (0.010)	0.057*** (0.008)	0.078*** (0.010)	0.060*** (0.008)
Oster $\delta$ for $\beta = 0$		3.115	11.825	7.996
$R^2$	0.034	0.060	0.049	0.068
Dependent Mean	0.138	0.138	0.138	0.138
Observations	3059	3059	3059	3059
Region FE		$\checkmark$		$\checkmark$
Design Controls			$\checkmark$	$\checkmark$

Appendix Table D3: Effects of Campaign on Civic Organizations Supporting Private Health Insurance Total Population Denominator

*Notes:* Table reports results of Equation 7 for the outcome of civic organizations on record supporting voluntary (private) health insurance from (Whitaker & Baxter *Campaigns, Inc.* 1951). All columns are normalized by county population, and the outcome is multiplied by 1,000 for readability. Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1. Design controls include county-level log income per capita (United States Census Bureau 2012), number of hospitals per county (American Hospital Association 1948, 1950, 1952), and state share of unionized household (Farber et al. 2021). Other controls include the county-level share of Blue Cross hospitals (American Hospital Association 1948, 1950, 1952). Dependent mean is the unconditional mean of the dependent variable. A parameter representing the scope for selection-on-unobservables is reported in columns 2-4 (Oster 2019). Standard errors are in parentheses. \*, \*\*, \*\*\* refer to statistical significance at the 10, 5, and 1 percent level, respectively.

	(1)	(2)	(3)	(4)
Campaign Exposure $\times I^{\text{Specialist}}$	0.004***	0.004***	0.004***	0.004***
	(0.001)	(0.001)	(0.001)	(0.001)
Campaign Exposure	-0.001	-0.000	-0.001	-0.001
	(0.001)	(0.002)	(0.001)	(0.001)
I <sup>Specialist</sup>	0.009***	0.011***	0.009***	0.009***
	(0.002)	(0.002)	(0.002)	(0.002)
Dependent Mean	0.004	0.004	0.004	0.004
Observations	167373	167222	166634	166634
County FE		$\checkmark$		
Design Controls			$\checkmark$	$\checkmark$
Individual Characteristics				$\checkmark$

## Appendix Table D4: Effect of the Campaign on Donating to Eisenhower-Nixon Campaign Continuous Outcome

*Notes:* Table reports specification checks for the outcome of physician donation on the interaction of Campaign Exposure and *I*<sup>Specialist</sup> as in Equation 8. The outcome is an inverse hyperbolic sine transformation of the dollar amount each physician donated to Eisenhower's Presidential Campaign (Whitaker & Baxter *Campaigns, Inc.* 1933-1974). Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1. *I*<sup>Specialist</sup> is an indicator for whether a physician was a specialist. All regressions control for whether the physician is an AMA member. Individual physician characteristics include age, an indicator for having served in the military, and an indicator for being in practice (American Medical Association 1950*a*). Design controls include county-level log income per capita (Bureau of Economic Analysis 2023), number of hospitals at the county level (American Hospital Association 1948, 1950, 1952), and state-level share unionized (Farber et al. 2021). Dependent mean is the unconditional mean of the dependent variable for non-specialists. Robust standard errors clustered at the county level are in parentheses. \*, \*\*, \*\*\* refer to statistical significance at the 10, 5, and 1 percent level, respectively.

# Appendix Table D5: Effect of Campaign on Private Health Insurance Enrollment Robustness Tests

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)
		Additional and Alternative Controls					Design d Inference	Alternative Sample, Outcome, and Exposure		
Specification:	Unit-Specific Pre-Trend	War Bond Control	Blue Cross Control	Enabling Legislation	Specialist Control	Binary Treatment	Potential Trends Violations	Without Alternative California Denominator		Alternative Exposure
Campaign Exposure $\times$ $I^{\text{Post}}$	0.025*** (0.007)	0.020*** (0.005)	0.022*** (0.005)	0.021*** (0.005)	0.020*** (0.004)	0.024** (0.009)	0.020** [0.005,0.039]	0.023*** (0.005)	0.057*** (0.018)	0.023*** (0.005)
Dependent Mean Observations	0.034 423	0.034 423	0.034 423	0.034 423	0.034 423	0.034 423	0.034 423	0.033 414	0.135 423	0.034 423
State FE Design Controls	√ √	√ √	~	√ √	$\checkmark$	√ √	$\checkmark$	√ √	√ √	√ √
Year FE	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$

*Notes:* Table reports specification checks for the outcome of private health insurance enrollment. Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1. *I*<sup>Post</sup> is an indicator for post-Campaign. The sample includes 48 states from the years 1946-1954, where we collapsed Vermont and New Hampshire (see Section IV) (Council on Medical Service 1946-1954). Column 1 reports regression results controlling for unit-specific pre-trends following Miller (2023). Column 2 reports regression results controlling for war bonds purchased (United States Census Bureau 2012). Column 3 reports results replacing hospital count in the Design Controls with the share of Blue Cross hospitals (American Hospital Association 1948, 1950, 1952). Column 4 reports results controlling for an indicator for enabling legislation. Column 5 reports results controlling for Share specialists interacted with a time trend. Column 6 reports results where treatment is dichotomized at the 50th percentile of Campaign exposure. Column 7 reports the Campaign effect in the first year after the Campaign completed (1951) and the associated 95% robust confidence interval computed following the procedure recommended by Rambachan and Roth (2023), which bounds the worst-case post-Campaign difference in trends by the equivalent maximum in the pre-Campaign periods. Column 8 reports results excluding California. Column 9 reports results using total enrollment denominated by the number of White employed males. Column 10 reports results using only Campaign materials (per capita Campaign pamphlets and per capita circulation of Campaign ads) as the Campaign exposure. Design Controls include log income per capita (Bureau of Economic Analysis 2023), number of hospitals (American Hospital Association 1948, 1950, 1952), and share unionized (Farber et al. 2021). Dependent Mean is the unconditional mean of the dependent variable in the pre-period. Robust standard errors clustered at the state level are in parentheses

## Appendix Table D6: Effect of Campaign on Approval of National Health Insurance Legislation Robustness Tests

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)
		Additional and Alternative Controls					Design 1 Inference	Alternative Sample, Weights, and Exposure		
Specification:	Unit-Specific Pre-Trend	War Bond Control	Blue Cross Control	Enabling Legislation	Specialist Control	Binary Treatment	Potential Trends Violations	Without California	Alternative Weights	Alternative Exposure
Campaign Exposure $\times I^{\text{Post}}$	-0.041** (0.016)	-0.050*** (0.017)	-0.050*** (0.017)	-0.048*** (0.017)	-0.051*** (0.017)	-0.121** (0.051)	-0.080** [-0.220, -0.010]	-0.051*** (0.014)	-0.045** (0.018)	-0.026 (0.019)
Dependent Mean Observations	0.684 4931	0.684 5062	0.684 5062	0.684 5062	0.684 5062	0.684 5062	0.684 5062	0.698 4654	0.684 5062	0.684 5062
State FE Design Controls Individual Characteristics	4 4	۲ ۲	۰ ۲	4 4	1 1	۲ ۲	√ √ √	4 4	√ √	√ √
Wave FE	v √	<b>√</b>	<b>√</b>	<b>√</b>	<b>√</b>	v √	v ✓	<b>√</b>	<b>√</b>	v √

Notes: Table reports specification checks for the outcome of approval for legislation establishing National Health Insurance. Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1. *I*<sup>Post</sup> is an indicator for post-Campaign. The outcome is an indicator for approval (see Appendix Table A1). Column 1 reports regression results controlling for unit-specific pre-trends following Miller (2023). Column 2 reports the results of a regression controlling for war bond purchases (United States Census Bureau 2012). Column 3 reports results replacing hospital count in the Design Controls with the share of Blue Cross hospitals (American Hospital Association 1948, 1950, 1952). Column 4 reports results controlling for an indicator for enabling legislation. Column 5 reports results controlling for share specialists interacted with a time trend. Column 6 reports results where treatment is dichotomized at the 50th percentile of Campaign exposure. Column 7 reports the Campaign effect in the post Campaign survey wave and the associated 95% robust confidence interval computed following the procedure recommended by Rambachan and Roth (2023), which bounds the worst-case post-Campaign difference in trends by the equivalent maximum in the pre-Campaign periods. Column 8 reports results excluding California. Column 9 reports results with sampling weights calibrated to the voting-age population (Gallup Organization 1945, 1946, 1949, 1950). The sample includes Gallup polls from November 1945, April 1946, May 1949, November 1949, October 1950, and November 1950 (Gallup Organization 1945, 1946, 1949, 1950). Column 10 reports results using only Campaign materials (per capita Campaign pamphlets and per capita circulation of Campaign ads) as the Campaign exposure. Dependent Mean is the unconditional mean of the dependent variable in the pre-period. Individual Characteristics include a set of indicators for female, Black, age group, having a phone, voted Republican in the last election, employment status, union membership, job class, urbanicity, and education. Sampling weights calibrated to the voting-eligible population are applied all columns except for Column 9 (Gallup Organization 1945, 1946, 1949, 1950). Design controls include log income per capita (Bureau of Economic Analysis 2023), number of hospitals (American Hospital Association 1948, 1950, 1952), and share unionized (Farber et al. 2021). Robust standard errors clustered at state  $\times$  urbanicity level are in parentheses. \*, \*\*, \*\*\* refer to statistical significance at the 10, 5, and 1 percent level, respectively.

## Appendix Table D7: Association between Campaign and Civic Organizations Supporting Private Health Insurance Robustness Tests

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
		Additiona	l and Alternativ	e Controls		Alternativ	ve Sample an	d Exposure
Specification:	War Bond	Blue Cross	Demographic	Enabling	Specialist	Without	Binary	Alternative
	Control	Control	Controls	Legislation	Control	California	Treatment	Exposure
Campaign Exposure	0.025***	0.026***	0.027***	0.023***	0.026***	0.025***	0.043***	0.015***
	(0.003)	(0.003)	(0.003)	(0.003)	(0.003)	(0.003)	(0.005)	(0.002)
Dependent Mean	0.068	0.068	0.068	0.068	0.068	0.069	0.068	0.068
Observations	3059	3059	3059	3059	3059	3002	3059	3059
Region FE	√	$\checkmark$	√	√	√	√	√	√
Design Controls	√		√	√	√	√	√	√

*Notes:* Table reports results of Equation 7 for the outcome of civic organizations on record supporting voluntary (private) health insurance from (Whitaker & Baxter *Campaigns, Inc.* 1951). The outcome is normalized by number of churches within a county. Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1. Column 1 reports regression results controlling for 1944 per capita war bond purchases at the county level (United States Census Bureau 2012). Column 2 reports results replacing county-level hospital count in the Design Controls with the share of Blue Cross hospitals (American Hospital Association 1948, 1950, 1952). Column 3 reports results controlling for county shares of Black, female, employed, and urban populations (Haines 2010). Column 4 reports results controlling for an indicator for enabling legislation. Column 5 reports results controlling for share specialists interacted with a time trend. Column 6 reports results excluding California. Column 8 reports results where treatment is dichotomized at the 50th percentile of Campaign exposure. Column 8 reports results using only Campaign materials (per capita Campaign pamphlets and per capita (Bureau of Economic Analysis 2023), number of hospitals (American Hospital Association 1948, 1950, 1952), and share unionized (Farber et al. 2021). Dependent mean is the unconditional mean of the dependent variable. Robust standard errors are in parentheses. \*, \*\*, \*\*\* refer to statistical significance at the 10, 5, and 1 percent level, respectively.

	(1)	(2)	(3)	(4)
	PHI	NHI	Civic	Share
Dependent Variable:	Enrollment	Approval	Orgs.	Rep. Vote
	Panel A	: Share AM	A Trend C	Control
Effect of Campaign	0.023**	-0.046***	0.024***	0.008***
1 0	(0.009)	(0.017)	(0.004)	(0.002)
	Panel B: S	Share Educa	ted Trend	Control
Effect of Campaign	0.021**	-0.049***	0.022***	0.007***
1 0	(0.011)	(0.017)	(0.003)	(0.002)
Dependent Mean	0.034	0.689	0.068	0.404
Observations	423	5103	3059	16404
Design Controls	√	$\checkmark$	$\checkmark$	$\checkmark$
Additional Controls	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$

## Appendix Table D8: Effect of Campaign Controlling for Trends in Share AMA and Share Educated

Notes: Table reports effects of campaign for the outcomes of private health insurance enrollment, approval for legislation establishing National Health Insur-ance, civic organizations on record supporting voluntary (private) health insurance from (Whitaker & Baxter *Campaigns, Inc.* 1951), and share vote Republican (Interuniversity Consortium for Political and Social Research 1999). Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1. Column 1 reports a regression similar to Column 4 of Table 1, additionally controlling for trends in share AMA members (Panel A) and share educated (Panel B). Share educated is defined as the share of adults with more than five years of schooling. Trend in share AMA members is estimated using share AMA members interacted with a time trend. Trend in share educated is estimated using share educated linearly interpolated with 1940 and 1950 census data for each state. Column 2 reports a regression similar to Column 4 of Table 2, additionally controlling for trends in share AMA members (Panel A) and share educated (Panel B). Column 3 reports a regression similar to Column 4 of Table 3 with the additional controls for the share of physicians who were AMA members (Panel A) and the share ed-ucated (Panel B). Column 4 reports a regression similar to Column 4 of Appendix Table C1, additionally controlling for trends in share AMA members (Panel  $\hat{A}$ ) and share educated (Panel B). Design controls include log income per capita (Bureau of Economic Analysis 2023), number of hospitals (American Hospital Association 1948, 1950, 1952), and share unionized (Farber et al. 2021). Dependent Mean is the unconditional mean of the dependent variable in the pre-period. Robust standard errors are in parentheses. \*, \*\*, \*\*\* refer to statistical significance at the 10, 5, and 1 percent level, respectively.

	(1)	(2)	(3)	(4)				
	PHI	NHI	Civic	Share				
Dependent Variable:	Enrollment	Approval	Orgs.	Rep. Vote				
	Panel A: Sha	are HH. Ow	ning a Rad	lio Trend Control				
Effect of Campaign	0.023**	-0.051***	0.025***	0.008***				
1 0	(0.009)	(0.017)	(0.004)	(0.002)				
	Panel B: Share HH. Owning a TV Trend Control							
Effect of Campaign	0.021**	-0.049***	0.025***	0.008***				
	(0.009)	(0.018)	(0.003)	(0.002)				
Dependent Mean	0.034	0.689	0.068	0.404				
Observations	423	5103	3059	16404				
Design Controls	~	$\checkmark$	$\checkmark$	$\checkmark$				
Additional Controls	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$				

### Appendix Table D9: Effect of Campaign Controlling for Trends in Radio and Television Penetration

Notes: Table reports effects of campaign for the outcomes of private health insurance enrollment, approval for legislation establishing National Health Insurance, civic organizations on record supporting voluntary (private) health insurance from (Whitaker & Baxter *Campaigns, Inc.* 1951), and share vote Republican (Interuniversity Consortium for Political and Social Research 1999). Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1. Column 1 reports a regression similar to Column 4 of Table 1, additionally controlling for trends in share households owning a radio (Panel A) and share households owning a TV (Panel B) (United States Census Bureau 1953). Trend in each share is estimated using the share interacted with a time trend. Column 2 reports a regression similar to Column 4 of Table 2, additionally controlling for trends in share households owning a radio (Panel A) and share households owning a TV (Panel B). Column 3 reports a regression similar to Column 4 of Table 3 with the additional controls for share households owning a radio (Panel A) and share households owning a TV (Panel B). Column 4 reports a regression similar to Column 4 of Appendix Table C1, additionally controlling for trends in share households owning a radio (Panel A) and share households owning a TV (Panel B). Design controls include log income per capita (Bureau of Economic Analysis 2023), number of hospitals (American Hospital Association 1948, 1950, 1952), and share unionized (Farber et al. 2021). Dependent Mean is the unconditional mean of the dependent variable in the pre-period. Robust standard errors are in parentheses. \*, \*\*, \*\*\* refer to statistical significance at the 10, 5, and 1 percent level, respectively.

	(1)	(2)	(3)	(4)	(5)	(6)
Baseline	0.023***					
Post	(0.008)					
$\mathrm{Ad}  imes I^{\mathrm{Post}}$		0.021**		0.020*		-0.003
Dest		(0.010)		(0.010)		(0.018)
$MD \times I^{Post}$			0.013	0.011		-0.013
			(0.012)	(0.009)		(0.011)
$\mathrm{Ad}  imes \mathrm{MD}  imes I^{\mathrm{Post}}$					0.027***	0.038*
					(0.007)	(0.020)
<i>p</i> -value Ad $\times I^{\text{Post}} = \text{MD} \times I^{\text{Post}}$				0.567		0.410
Dependent Mean	0.034	0.034	0.034	0.034	0.034	0.034
Observations	423	423	423	423	423	423
Design Controls	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$
Additional Controls	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$

Appendix Table D10: Effect of Campaign on Private Health Insurance Enrollment Individual Campaign Components and Interaction

*Notes:* Table reports results from a regression of share enrolled in private health insurance on the interaction of Campaign Exposure components and  $I^{\text{Post}}$ .  $I^{\text{Post}}$  is an indicator for post-Campaign. All controls in Table 1 Column 4 are included. Ad and MD components in all regressions are standardized. Interaction in Columns 5 and 6 is the standardized product of non-standardized Ad and MD components. Column 1 reports results from Table 1 Column 4. Column 2 reports results from a regression on the interaction of Ad component and an indicator for post-Campaign period. Column 3 reports results from a regression on the interaction of MD component and an indicator for post-Campaign period. Column 4 reports a regression on all regressors in Columns 2 and 3. Column 5 reports results from a regression on the interaction of Ad and MD components and an indicator for post-Campaign period. Column 6 reports results from a regression on all regressors in Columns 4 and 5. Dependent Mean is the unconditional mean of the dependent variable in the pre-period. Robust standard errors clustered at the state level are in parentheses. \*, \*\*, \*\*\* refer to statistical significance at the 10, 5, and 1 percent level, respectively.

	(1)	(2)	(3)	(4)	(5)	(6)
Baseline	-0.047*** (0.017)					
$Ad \times I^{Post}$	(0.017)	-0.022		-0.024		-0.035
$MD \times I^{Post}$		(0.029)	-0.037***	(0.029) -0.038***		(0.029) -0.042***
$Ad \times MD \times I^{Post}$			(0.007)	(0.007)	-0.014	(0.009) 0.025
$AU \times MD \times I$					(0.014)	(0.023)
<i>p</i> -value Ad $\times$ $I^{\text{Post}} = \text{MD} \times I^{\text{Post}}$				0.612		0.794
Dependent Mean	0.684	0.684	0.684	0.684	0.684	0.684
Observations	5062	5062	5062	5062	5062	5062
Design Controls	√	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$
Additional Controls	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$

Appendix Table D11: Effect of Campaign on Approval of National Health Insurance Legislation Individual Campaign Components and Interaction

*Notes:* Table reports results from a regression of f approval for legislation establishing National Health Insurance on the interaction of Campaign Exposure components and *I*<sup>Post</sup>. *I*<sup>Post</sup> is an indicator for post-Campaign. All controls in Table 2 Column 4 are included. Interaction in Columns 5 and 6 is the standardized product of non-standardized Ad and MD components. Column 1 reports results from Table 2 Column 4. Column 2 reports results from a regression on the interaction of Ad component and an indicator for post-Campaign period. Column 3 reports results from a regression on the interaction of MD component and an indicator for post-Campaign period. Column 4 reports a regression on all regressors in Columns 2 and 3. Column 5 reports results from a regression on the interaction of Ad and MD components and an indicator for post-Campaign period. Column 6 reports results from a regression on all regressors in Columns 4 and 5. Interaction in Columns 5 and 6 is the standardized product of non-standardized Ad and MD components. Dependent Mean is the unconditional mean of the dependent variable in the pre-period. Robust standard errors clustered at state by urban level are in parentheses. \*, \*\*, \*\*\* refer to statistical significance at the 10, 5, and 1 percent level, respectively.

	(1)	(2)	(3)	(4)
	Baseline	Nonpara	metric Esti	mator
Method:	TWFE	Polynomial	B-Spline	Spline
Effect of Campaign	0.023*** (0.009)	0.024*** (0.007)	0.022*** (0.009)	0.022*** (0.009)
Observations	423	423	423	423

#### Appendix Table D12: Effect of Campaign Nonparametric ACR Estimates

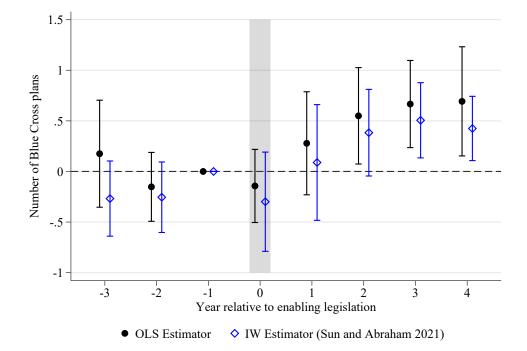
*Notes:* Table reports effects of campaign for the outcome of private health insurance enrollment. Column 1 reports the baseline estimate from Table 1 Column 4. Columns 2-4 report results obtained by implementing the nonparametric estimation procedure proposed in Callaway, Goodman-Bacon and Sant'Anna (2024). Column 2 adopted a polynomial transformation of the Campaign exposure, and Columns 3 and 4 adopted a b-spline and a natural spline, respectively. See Section 4 of Callaway, Goodman-Bacon and Sant'Anna (2024) for details. Robust standard errors are in parentheses. \*, \*\*, \*\*\* refer to statistical significance at the 10, 5, and 1 percent level, respectively.

	(1)	(2)	(3)	(4)
Dependent Variable:	Any Ke	eyword	Number o	of Keywords
I <sup>Campaign Ad</sup>	0.887*** (0.010)	0.897*** (0.010)	4.842*** (0.170)	5.953*** (0.201)
Dependent Mean Observations	0.008 5108	0.008 5108	0.012 5108	0.012 5108
Newspaper FE		$\checkmark$		$\checkmark$

Appendix Table D13: Socialism-Related Terms in Ads

*Notes:* Table reports a regression of mentions of socialism-related terms in newspaper advertisements on an indicator for whether the advertisement is a Campaign ad. The outcome is either an indicator for containing any keyword (columns 1 and 2) or the number of keywords (columns 3 and 4). The list of keywords includes "socialism," "socialist," "communism," "communist," "American way," "freedom," and "tyranny." The dependent mean is the unconditional mean of the dependent variable for the non-Campaign ads. Campaign ads include both the main ad (see Figure 1 Panel C) and tie-in ads (see Figure 3), which circulated in October-November 1950. Non-Campaign ads are randomly sampled from the same set of newspapers published one month before the introduction of the Campaign ads (September 1950). Advertisement texts are from NewspaperArchive.com. Information on the Campaign ads is from the Campaign archives (Whitaker & Baxter *Campaigns, Inc.* 1933-1974). Robust standard errors clustered at the newspaper level are in parentheses. \*, \*\*, \*\*\* refer to statistical significance at the 10, 5, and 1 percent level, respectively.

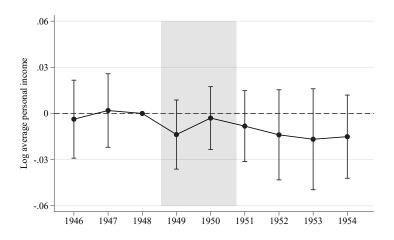
# **D.3** Supplementary Figures



Appendix Figure D1: Effects of Enabling Legislation on Number of Prepayment Plans

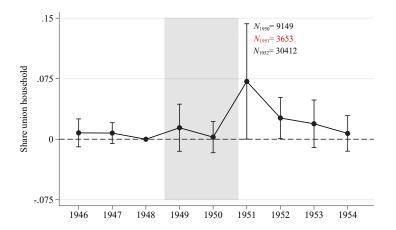
*Notes:* Figure plots the effect of enabling legislation on the number of prepayment plans (Council on Medical Service 1946-1954), and associated 95% confidence intervals. Prepayment plans included are Blue Cross plans, as available data on enabling legislation is generally regarding Blue Cross. State and year fixed effects and log average personal income (Bureau of Economic Analysis 2023) are included. IW estimates are computed according to Sun and Abraham (2021).

## Appendix Figure D2: Event Study Plots for Log Average Personal Income and Share Union Households



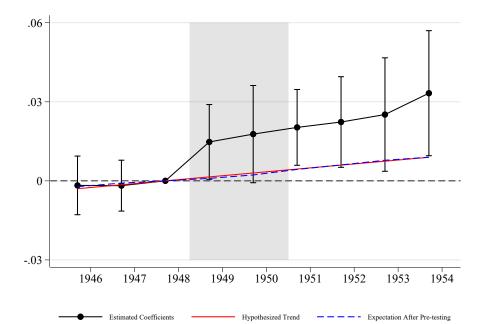
(a) Log Average Personal Income

(b) Share Union Households

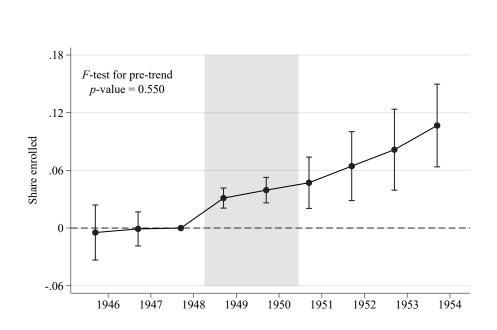


*Notes:* Figures plot the  $\beta$  coefficients from a regression similar to Equation 5, and associated 95% confidence intervals. The outcome in Panel A is the logged personal income per capita and the outcome in Panel B is the share union households. Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1. State characteristics include the number of hospitals and the share of union households for Panel A and logged personal income per capita for Panel B. Union data are obtained from Farber et al. (2021) which is based on Gallup samples which differed over time. The sample size decreased from 9149 in 1950 to 3653 in 1951. Income data are from Bureau of Economic Analysis (2023).

## Appendix Figure D3: Effect of Campaign on Private Health Insurance Enrollment: Pretrend Test



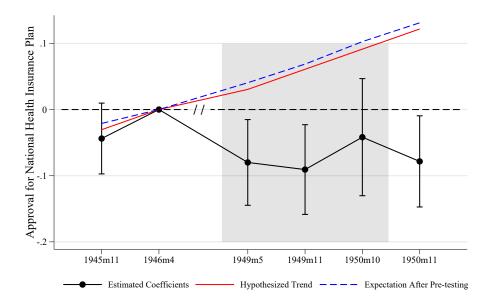
*Notes:* Figure plots potential violations of parallel trends based on methods proposed in Roth (2022). The coefficients on the interactions are estimated in an event study regression given by Equation 5, and the error bars represent the associated 95% confidence intervals. The red solid line represents the conjectured linear violation of parallel trends with 80% power. The blue dashed line represents the expected values of event study coefficients if the violation were present but undetectable using standard techniques. The outcome is the share enrolled. Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1. Design controls include log income per capita (Bureau of Economic Analysis 2023), number of hospitals (American Hospital Association 1948, 1950, 1952), and share unionized (Farber et al. 2021).



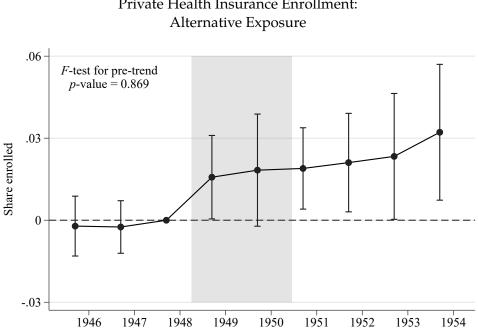
Appendix Figure D4: Dynamic Effect of Campaign on Private Health Insurance Enrollment: Coefficients on Year Indicators

*Notes:* Figure plots  $\delta$  coefficients from Equation 5, and associated 95% confidence intervals. The outcome is share enrolled in private health insurance. Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1. The sample includes the years 1946-1954. Design controls include log income per capita (Bureau of Economic Analysis 2023), number hospitals (American Hospital Association 1948, 1950, 1952), and share unionized (Farber et al. 2021).

Appendix Figure D5: Effect of Campaign on Approval of National Health Insurance Legislation

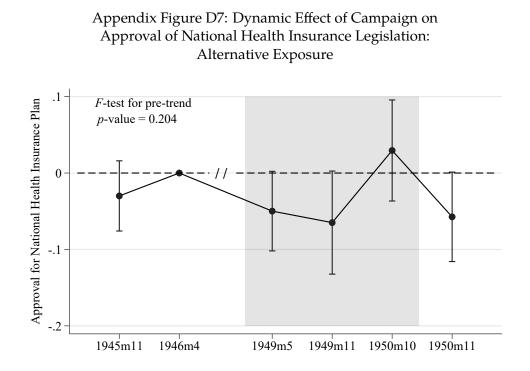


*Notes:* Figure plots potential violations of parallel trends based on methods proposed in Roth (2022). The coefficients on the interactions are estimated in an event study regression given by Equation 6, and the error bars represent the associated 95% confidence intervals. The red solid line represents the conjectured linear violation of parallel trends with 80% power. The blue dashed line represents the expected values of event study coefficients if the violation were present but undetectable using standard techniques. The outcome is an indicator for approval of legislation establishing National Health Insurance. Campaign Exposure is constructed as in Equation 4 and standardized to a mean of 0 and a standard deviation of 1. The sample includes Gallup polls from November 1945, April 1946, May 1949, November 1949, October 1950, and November 1950. Individual level controls include a set of indicators for female, Black, age, education, having a phone, vote Republican, employment status, union membership, and urbanicity, respectively. Design controls include log income per capita (Bureau of Economic Analysis 2023), number of hospitals (American Hospital Association 1948, 1950, 1952), and share unionized (Farber et al. 2021). State fixed effects are included. Sampling weights calibrated to the voting-eligible population are applied.

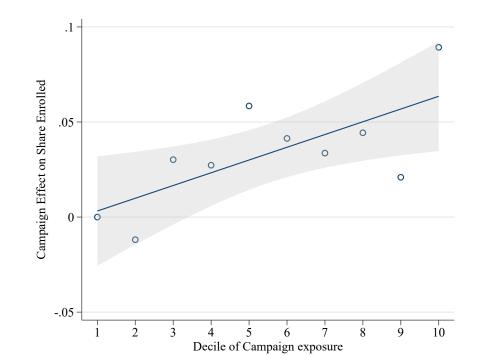


# Appendix Figure D6: Dynamic Effect of Campaign on Private Health Insurance Enrollment:

*Notes:* Figure plots  $\beta$  coefficients from Equation 5 and associated 95% confidence intervals using cluster-robust standard errors. Campaign exposure is constructed as the standardized sum of standardized per capita Campaign pamphlets and standardized per capita circulation of Campaign ads. All controls in Figure 5 are included.



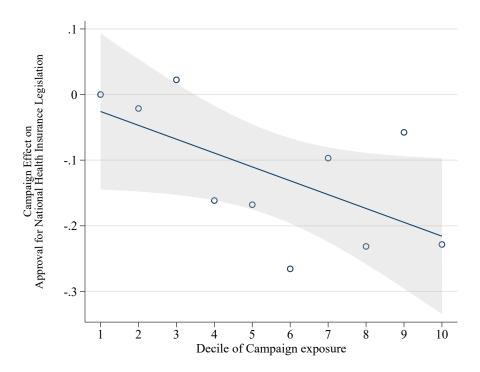
*Notes:* Figure plots  $\beta$  coefficients from Equation 6 and associated 95% confidence intervals using cluster-robust standard errors. Campaign exposure is constructed as the standardized sum of standardized per capita Campaign pamphlets and standardized per capita circulation of Campaign ads. All controls in Figure 6 are included. Sampling weights calibrated to the voting-eligible population are applied.



Appendix Figure D8: Private Health Insurance Enrollment by Exposure Deciles

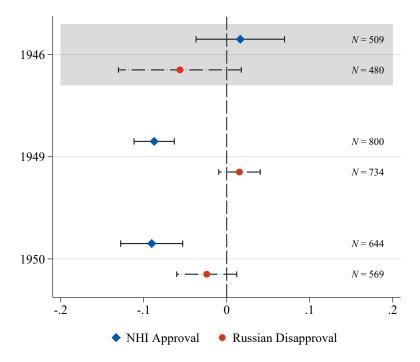
*Notes:* Figure plots the effect sizes of Campaign from a regression substituting Campaign Exposure in Table 1 Column 4 with a set of indicators for deciles of the exposure variable. The full set of controls is included. Dots represent the point estimates of coefficients on the interaction of decile indicators and  $I^{\text{Post}}$ . The solid lines are fitted linear trends, and the shaded areas are associated 95% confidence intervals.

Appendix Figure D9: Approval of National Health Insurance by Exposure Deciles



*Notes:* Figure plots the effect sizes of Campaign from a regression substituting Campaign Exposure in Table 2 Column 4 with a set of indicators for deciles of the exposure variable. The full set of controls is included. Dots represent the point estimates of coefficients on the interaction of decile indicators and  $I^{\text{Post}}$ . The solid lines are fitted linear trends, and the shaded areas are associated 95% confidence intervals.

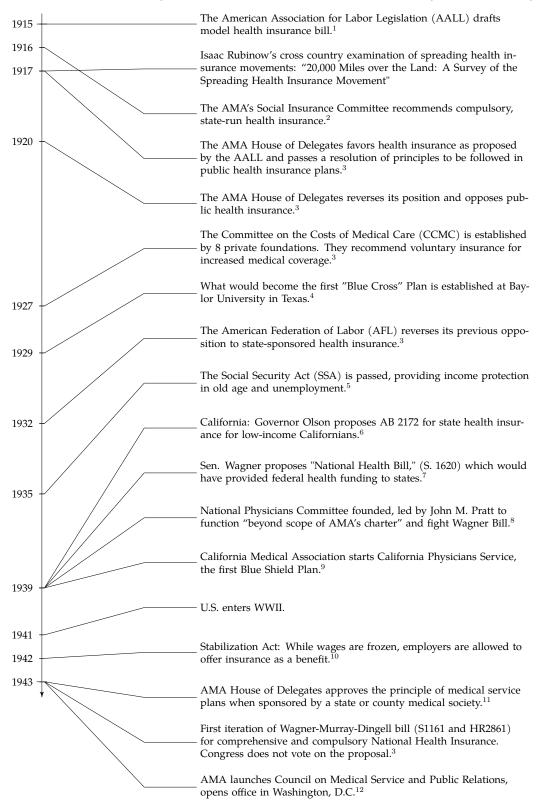


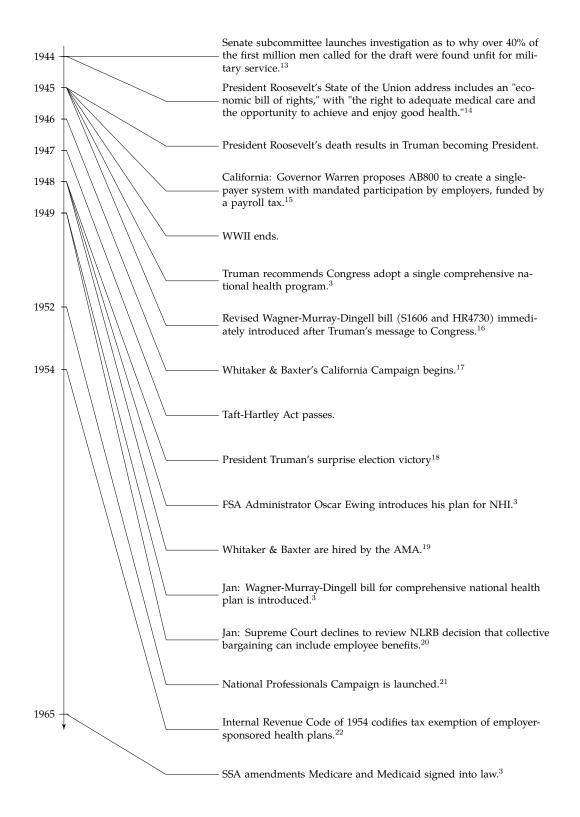


*Notes:* Figure plots the coefficients from regressing anti-Russian sentiment or NHI approval from Gallup polls (Gallup Organization 1945, 1946, 1949, 1950) on Campaign exposure. Questions related to Russian disapproval are as follows: "Do you think Russia will cooperate with us in world affairs?", "Do you believe Russia is trying to build herself up to be the ruling power of the world?", and "Do you think the government of Russia wants a war with the United States?". The y-axis indicates the year of the survey wave, with the shaded area representing the pre-Campaign period. Diamonds and solid error bars represent the estimates and the associated 95% confidence intervals for the outcome of NHI approval, whereas circles and dashed error bars represent the estimates and the associated 95% confidence intervals for the outcome of Russian disapproval. The sample size is provided on the right side of the figure.

# **E** Institutional Appendix

# E.1 Timeline: A Brief History of U.S. Health Insurance in the Early 20th Century





*Notes:* <sup>1</sup>The draft legislation provided broad hospital and medical benefits to low-income workers and their dependents. The AMA supported the AALL's proposal, and by 1916 the AMA board established a committee to work with the AALL (Corning 1969; Palmer 1999). <sup>2</sup>Corning (1969). <sup>3</sup>Corning (1969); Palmer (1999). <sup>4</sup> A University official introduced the plan, which guaranteed teachers 21 days of hospital care for six dollars a year, and became popular among other employers in Dallas, garnering national attention (Blue Cross Blue Shield Association 1997). <sup>5</sup>Starr (1982).<sup>6</sup> AB 2172 would have established compulsory health insurance that was integrated into unemployment insurance for workers and their families below a given income (Dimmitt 2007, p.11-12). <sup>7</sup>The bill was "an omnibus five-point program, which would have amended the Social Security Act and provided federal funds for a litany of services – from basic hospital care and disability benefits to aid for child care – with states acting as the administrators" (Doherty and Jenkins 2009, p.3). <sup>8</sup>Corning (1969); Doherty and Jenkins (2009). <sup>9</sup>Board of Trustees of Mississippi State Medical Association (1965); Morrisey (2013). <sup>10</sup> (Thomasson 2002). <sup>11</sup>The resolution approved "that principle of medical service plans on a service basis when sponsored by a constituent state medical association or a component county medical society in accordance with recommendations relating to medical Association (2023). <sup>13</sup>Poen (1996); New York Times (1944, 1945). <sup>14</sup>Corning (1969). <sup>15</sup>Dimmitt (2007); Corning (1969). <sup>16</sup>The bill would have amended the Social Security Act of 1935. It proposed grants and loans for hospital and health center construction, grants to states for maternal, child, and public health services, grants to states for public assistance, and anational social insurance system (Smith 1945; Corning 1969). <sup>17</sup>Whitaker & Baxter *Campaigns, Inc.* (1945). <sup>18</sup>Truman Library (2023). <sup>19</sup>Whitaker & Baxter *Campaigns, Inc.* (1933-1974); Johnson (2016). <sup>20</sup>Inla

#### E.2 Health Insurance Prior to World War II

This section heavily draws from the Federal Security Agency *Report on Blue Cross and Medical Service Plans* (Reed 1947) and the *Social Transformation of American Medicine* by Starr (1982), and the *Wages of Sickness* by Hoffman (2001).

Serious movements for state-sponsored health insurance began in the early 1900s with the American Association for Labor Legislation founded by progressive economists John R. Commons and Richard Ely of the University of Wisconsin (Hoffman 2001, p.25). As described by Hoffman, the AALL leaders believed in a "security state" that was engaged in regulation and prevention more than direct relief which it thought encouraged pauperism and dependency. According to Hoffman "Compulsory health insurance also opened another avenue for AALL's belief in the prevention of social ills. Just as workmen's compensation created a material incentive for employers to improve safety, health insurance, reformers thought, would place a monetary value on sickness prevention in the workplace" (Hoffman 2001, p.28).<sup>45</sup> Several elements derailed any legislation from passing – most significantly the First World War allowed those in opposition (including some elements of organized labor under Sam Gompers, some physicians, and the powerful life insurance industry) to defeat all such proposals (Hammonds 2003).<sup>46</sup>

Despite the demise of the Progressive movement and with it plans for state-sponsored health insurance, medical costs continued to rise as technology improved. This, alongside the Great Depression of 1929, inspired a handful of non-profit hospitals to experiment with pre-payment schemes – which eventually became known as the Blue Cross System. The system started as community hospitals pulling together and offering services for employed individuals on a pre-paid basis, but community plans often then consolidated and operated on a state-wide basis. There were very few that crossed state boundaries as the plans required state-specific enabling legislation to operate – as the plans were typically not actually deemed insurance but rather service products that would operate as non-profits.

FDR's New Deal afforded another opportunity for the potential incorporation of health insurance into the landmark Social Security Act of 1935. In 1934, Roosevelt appointed a Committee on Economic Security to study the issues of social insurance, including old-age, unemployment measures, and health insurance, chaired by Secretary of Labor Frances Perkins. Committee members, despite generally being in favor of health insurance, anticipated strong opposition to its inclusion in the Act, noting that it would "spell defeat for the entire bill" (Starr 1982, p.269). Agreeing with this sentiment, President Roosevelt commissioned a private report on health insurance and followed Secretary Perkins' recommendation that it not be made public until the Social Security Act was passed. The Committee's report supported a program that would be optional at the state level, but compulsory for residents in those states where adopted (Starr 1982). While politically contentious, a national health program may have also been personally contentious: President Roosevelt's son was married to Dr. Harvey Cushing's daughter, and Dr. Cushing's opposition to the policy is thought to have influenced Roosevelt's inaction on the proposal at the time (Blumenthal and Morone 2010;

<sup>&</sup>lt;sup>45</sup>Hoffman writes: "AALL leaders never spoke explicitly about excluding Black workers from the health insurance plan. The reformers likely shared the racial assumptions of most Whites of their era – they had no qualms about appointing scientific racist Frederick Hoffman to the Social Insurance Committee" (Hoffman 2001, p.31). Note that Frederick Hoffman was the leading actuary of the time, a German immigrant and vice-president of the Prudential Insurance Company. Along with Metropolitan Life, Prudential had been extremely profitable selling life insurance to blue collar workers during the early 20th century (Starr 1982, p.243). According to Starr, "the fear of a pauper burial was so great that Americans bought \$ 183 million of such insurance in 1911 – about as much as Germany spent on its entire social insurance system." Hoffman's book on *The Race Traits and Tendencies of the American Negro* was published by the *American Economic Review* and is today widely viewed as a racist tome predicting the extinction of Black and Native American populations.

<sup>&</sup>lt;sup>46</sup>Issac Rubinow, a physician and economist from Belarus and the leading authority on social insurance for the time, remarked that including a funeral benefit was a "grave tactical error because of the implied threat to the gigantic structure of industrial life insurance" (Starr 1982, p.255). Rubinow dubbed accidents, illness, old age, and loss of a job, the four horsemen of the apocalypse. "These are the Four Horsemen that ride roughshod over lives and fortunes of millions of wage workers of every modern industrial community" (Rubinow 1934, p.20). Rubinow also noted *who* was more targeted by said insecurity: "the ride of the Four Horsemen carries more economic devastation in our era of individualistic family life; and in addition the Horsemen have an uncanny habit of riding with a particular fury through the narrow side-streets and lanes in which the working masses and not the upper classes reside" (Rubinow 1934, p.21).

Rovit and Couldwell 2001).

While not included in the Social Security Act of 1935, support for health insurance legislation within the Roosevelt administration continued. In 1935, the Interdepartmental Committee to Coordinate Health and Welfare Activities was formed. In 1937, it established a Technical Committee on Medical Care, which was authorized to develop a national health program. The Technical Committee's proposal mirrored that of the Committee on Economic Security's, proposing state-level health programs. President Roosevelt made public part of the committee's report and convened a National Health Conference in 1938 to discuss the national health program, where delegates largely supported the Technical Committee's program. With this support, President Roosevelt first planned to make health insurance an issue in the 1938 midterm elections, later deciding to wait for the 1940 elections. However, with Democrats losing control of Congress in 1938 and the advent of World War II, reform became less feasible. Before his abrupt death, President Roosevelt planned to push for health insurance when the war ended and asked Congress to affirm an "economic bill of rights," including medical care (Starr 1982, p.280). In January 1945, FDR stated in his State of the Union about an expanded social security program that would include health. Later that year, the Journal of American Medical Association would write: "No other year has seen such a demand for compulsory health insurance" (Poen 1996, p.50). Yet in April 1945, FDR died and was succeeded by Harry S. Truman, portrayed as a "bewildered little man with thick glasses" (Poen 1996, p.51).

On November 19, 1945 Truman made history by having the "first presidential message devoted exclusively to the subject of health" (Poen 1996, p.64). He first outlined unmet needs and the misallocation of healthcare resources before proposing solutions such as expanded research and training programs, federal funds for hospital construction, and a comprehensive pre-paid medical service plan financed through payroll taxes. This marked the beginning of making a National Health Insurance program a central component of the Truman Administration(Truman Library 2023).

#### E.3 California Campaign

The renewal of interest in state-sponsored health insurance led the CMA to hire Whitaker & Baxter in 1945 to direct an intensive public relations and ad campaign. The California Campaign was laid out in a *Campaigns Inc.* document dated April 8, 1945 – the backbone was an "aggressive affirmative campaign throughout this year and next to develop and expand California Physicians Service, and all other acceptable voluntary medical and hospital systems, as well as private health insurance company programs – to the end that the majority of the people, who need pre-paid health coverage, will have it before our campaign is ended" (Whitaker & Baxter *Campaigns, Inc.* 1945). The document went on to call out every potential constituency and how they could be persuaded to see their interests as aligned with those of the doctors – including those that could have potentially benefited from a steady stream of income linked to health care, like charitable hospitals run by religious organizations or rural medical professionals.

There were two key pieces of the California Campaign. The first was a series of "Voluntary Health Insurance weeks" which occurred from April of 1946 to March of 1948, covering 53 counties in the state and were designed to raise awareness of voluntary insurance. Mayors were encouraged to declare voluntary insurance weeks and to urge public observance of the week, and public meetings were held with chambers of commerce and other civic groups. Over the course of the campaign, 120 mayors chaired the Voluntary Health Insurance weeks in their counties (Whitaker & Baxter *Campaigns, Inc.* 1933-1974).

Another component was a newspaper advertising campaign to promote both the Voluntary Health Insurance weeks and the California Caravan radio program, covering every county where Voluntary Health Insurance weeks were observed, in 420 papers. The campaign paid for 37,800 inches of display advertising in total, and an additional 8,000 inches were donated by businesses and other organizations.

#### E.4 Blue Cross Hospital Service Plans

This section heavily draws from the *Federal Security Agency Report on Blue Cross and Medical Service Plans* (Reed 1947).

By 1947, several organizations were providing medical care on a "prepayment basis." First in importance

was the Blue Cross Hospital service plans sold in non-profit hospitals.<sup>47</sup> The hospital prepayment service plans started in Grinnell Iowa with farmers in 1909. Then during the Great Depression, hospitals were experimenting with approaches to improve their stream of income. White school teachers in Texas approached Baylor University hospital for coverage (possibly wanting maternity care, as "there [was] no mention in the pamphlet of any maternity waiting period" (Reed 1947, p.10). According to the FSA report, the teachers were considered a "bad risk" – fees were increased and insurance was extended to other groups. However, the precedent was set and many other hospitals followed suit in creating community-based plans (so that the hospitals would not compete within a given catchment area for patients). "In this way, the unethical and unsound features attending solicitation of patients by individual plans would be eliminated and subscribers would retain freedom of choice as to the hospital they desired" (Reed 1947, p.10).

As noted in Section II, the hospitals took the lead on starting the plans, and there were several important facilitating features that the analysis controls for, as noted by the FSA: "Generally the plans have been started by the voluntary hospitals of the area and it is these hospitals which have been identified with and have supported the plans." These are typically places with a "high degree of urbanization and industrialization, and relatively high per capita income" (Reed 1947, p.28). We control for unionization, income, and the number of hospitals in all preferred specifications and for the share Blue Cross hospitals as a robustness check.

*Enabling Legislation:* Concerning the prepaid hospital and medical service plans, many required enabling legislation as they were deemed not to constitute formal insurance. "When the attorney-generals or departments of insurance had requested a ruling, they had ruled that group hospitalization constituted the sale of service rather than insurance, and that as such these plans could incorporate under the general incorporation laws and were exempt from the regulations covering stock and mutual insurance companies. This exemption was important since it meant that the plans would not need to make their subscribers liable for assessments, and could start without the sizable capital required of stock companies" (Reed 1947, p.11). Most states followed the legislative template provided by New York in 1934 which specified that group hospital services were not insurance but must be considered a charitable organization (therefore tax exempt) and abide by certain rules in terms of structure (*e.g.*, trustees must include hospital administrators), including some oversight of the rates charged to subscribers by the insurance department.

*Enrollment in Blue Cross:* According to the FSA, "The enrollment methods of Blue Cross plans are designed to secure the largest possible enrollment at the least possible expense and to assure actuarial soundness. The last consideration dictates that either enrollment should be through groups, with a sufficient percentage of the members of each group joining so as to assure that those enrolled will comprise a fair selection of risks, or that enrollment of persons on an individual basis should be conducted under methods which will avoid adverse selection of risks. The main method of enrollment is through groups of employed persons at their place of employment [p.59]." Typically this would be done via insurance men coming to factories and making presentations or speaking with employees one by one. Sign-ups were high if there was employer or union support (or both). In addition, plans experimented with community campaigns of enrollment, enlisting medical professionals and local civic groups, and advertising in newspapers. This would be a way for individuals to sign up in a given period of time, and by limiting the period of enrollment it guaranteed people did not enroll simply when they needed hospital services. Individuals could sign up as long as there were enough of them in the community who did so at the same time and/or it could be still tied to their employment [p.62-63].

*Blue Cross Competition with Private Insurance Plans:* Intense competition started between Blue Cross and commercial insurance plans by the mid-1940s – especially since the latter was not limited in geography and could offer uniform benefits across states for large employers. This only accelerated after the tax code change in 1954.

#### E.5 Blue Shield Medical Service Plans

Medical service plans started around the same time as Hospital Service plans but grew out of logging communities in the Pacific Northwest and were generally met with skepticism by physicians, who eschewed the

<sup>&</sup>lt;sup>47</sup>By 1947, 28.18% of all hospitals were nonprofit, and 74.94% of Blue Cross hospitals were nonprofit.

idea of contract work (Reed 1947, p.137). An inflection point came in 1938 when Governor Culbert Olson of California – the first Democrat elected in the state in four decades – introduced AB 2172 (Rosenthal) which provided for compulsory health insurance that was integrated into unemployment insurance for workers (and their families) below a given income (Dimmitt 2007, p.11-12). "These two factors" (the growing popularity of prepayment hospital service plans and the Governor's bill) "were primarily responsible for the establishment in 1939 of the California Physicians' Service by the California Medical Association" (Reed 1947, p.137). The CPS started by offering two plans, a comprehensive plan and a two-visit deductible plan. The more generous plan proved a disaster and almost derailed the entire experiment as fees paid to doctors' dropped and many resigned from the plan. The limited plan made several changes to increase solvency and appease physicians. "In 1945, numerous bills for compulsory health insurance were introduced in the State legislature. All of these developments caused the profession to give staunch backing to CPS and to encourage aggressive enrollment efforts" (Reed 1947, p.139).

The other plan that started in 1939 – the Michigan Medical Plan – was aided by the Ford Motor Company seeking catastrophic health coverage for its employees. Although Ford eventually moved to a commercial provider, the medical service plan was born in conjunction with a hospital service plan. Many of the other plans that started in the 1940s were aided by the earlier hospital service plan movement – being included as riders or borrowing Blue Cross administrative organization for purposes of enrollment and billing. By 1947 there were already 35 plans (Appendix Figure A1). They mainly covered surgical and obstetric services provided in the hospital (3.8 million) though some covered medical cases in the hospital (1.7 million) and fewer covered outpatient care (513,000).

As discussed in Section II.1, the AMA was somewhat undecided about insurance in the early 20th century. This was also noted by the FSA: The attitude of the American Medical Association toward prepayment medical service plans was rather definitely and firmly crystallized by passage of a resolution in the House of Delegates in December 1945 which instructed the Board of Trustees and the Council on Medical Service and Public Relations: "to proceed as promptly as possible with the development of a specific national health program with its emphasis upon the nation-wide organization of locally administered prepayment plans sponsored by medical societies" (Reed 1947, p.147). Out of this was formed the Associated Medical Care Plans Inc., to perform the same duties of coordination as the Blue Cross Commission. The Blue Shield Seal of Acceptance was established in 1946. The medical plans were more likely to be state-wide than the hospital plans as they were not tied to hospitals.

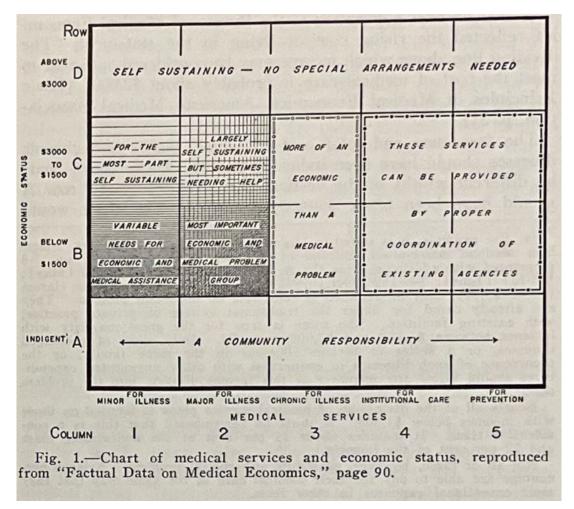
Among the many different factors influencing the formation and the growth of these "Blue" plans, was state-level policy that enabled the plans to operate as nonprofits, thereby allowing them to circumvent the usual regulations imposed on commercial insurance. The stated rationale for this legislation was that "Blue Cross plans were considered to be in society's best interest since they often provided benefits to low-income individuals" (Thomasson 2003, p.238).<sup>48</sup>

## E.6 Equity Considerations

How did advocates for private health insurance foresee the care for the indigent and for non-White individuals? To gain some insight into this question we consider two sources. The Director of the Bureau of Medical Research for the AMA, Frank Dickinson, referred to an exhibit first published in 1939 when dismissing the notion of the "medically indigent." The figure divided the population by income and divided medical care into mutually exclusive categories: minor illness, major illness, chronic illness, institutional care, and prevention (Dickinson 1949). The chart is shown in Appendix Figure E11 and demonstrates that the indigent sick were designated as a "community responsibility." Institutional care (which would include mental health, convalescence or nursing home care) as well as preventive care were designated to be "provided by local resources". The conclusion of the figure is that there is no need for insurance for the poor, for preventive services or for mental health.

The National Association for the Advancement of Colored Persons (NAACP) supported the notion of National Health Insurance as did the National Medical Association (NMA). The NMA consisted of Black physicians as they were de facto barred from membership in the AMA. The NMA supported the initial

<sup>&</sup>lt;sup>48</sup>However, see discussion of equity considerations in Section E.6.



Appendix Figure E11: Chart of Medical Services and Economic Status

*Notes:* Exhibit shows a chart of medical services and economic status internally reproduced by Council on Medical Service (1946-1954).

Wagner-Murray-Dingell bill. Eventually, however, the AMA invited the NMA to its meetings, and NMA members began to flip their views in favor of PHI. The NAACP felt betrayed by this change. As noted by Poen (1996, p.161-162), "Beginning in April [1949], important lobbies fell into line against the president's proposal for national health insurance....In August, even the National Medical Association, composed of the nation's Black physicians, balked on the issue. Despite their incoming president's warning that 'if you support the stand against Truman, you will receive a pat on the back from the AMA, but condemnation from ten million Negroes and the NAACP,' delegates to the association's 1949 convention refused to renew the NMA's earlier endorsement. This rising tide of opposition can be attributed mostly to the effectiveness of the AMA's Whitaker and Baxter campaign to associate the president's program with socialism."

# E.7 Role of Organized Labor in National Health Insurance

Labor unions and other organized labor movements in the early 20th century did not fully embrace the idea of comprehensive public insurance legislation. Most prominently, Samuel Gompers, the first president of the American Federation of Labor (AFL) rejected the concept in the 1910s, citing the workers' capability to independently self-organize insurance plans that were paid by union dues (Derickson 1994, p.1337). His aversion to a government-run plan reflected his belief that workers' problems could be solved by bargaining between unions and businesses, without the government's intervention (Schlabach 1969; Yellowitz 1989,

p.31).<sup>49</sup> Gompers's death in 1924, the Great Depression, and the subsequent New Deal all laid the ground-work for unions to back governmental involvement in health insurance. In 1935, the AFL officially endorsed "the enactment of socially constructive health insurance legislation through Congress and the individual States" (Derickson 1994, p.1337).

During the 1948 Presidential election, many union groups contributed to President Truman's campaign due to his stance against the Taft-Hartley Act, which the unions wanted to repeal (Leeds 1950, p.213-214). Yet, Section 304 of the Taft-Hartley Law forbade contributions to federal political campaigns by unions. Therefore, the AFL legally bypassed this restriction by creating a new body, "Labor's League for Political Education" (LLPE), financed by AFL members (Leeds 1950, p.208). LLPE disseminated information on the voting records of candidates (Leeds 1950, p.209). AFL also hired a public relations firm to try and influence public opinion. The total amount spent by LLPE was \$319,000 for this effort(Leeds 1950, p.211). The "Labor's League for the Election of Truman and Barkley" spent \$32,535 (Chang 1953, p.566).

Despite its defeat in Congress in 1948-1950, organized labor continued to advocate for NHI. The Congress of Industrial Organizations (CIO, which would merge later to become AFL-CIO in 1955) held its 14th annual convention in 1952 (Shister 1956, p.454). Simultaneously, unions also started to negotiate for PHI through employers (Derickson 1994, p.1334). An example is the landmark "Reuther's Treaty of Detroit" negotiated between the United Automobile Workers (UAW) and General Motors (GM) in 1950, which included company-paid healthcare (Harbison 1950, p.405). Other large companies and union groups followed suit.

#### E.8 Relationship between the AMA and the Department of Veterans Affairs (VA)

The AMA's opposition to government provision of healthcare included opposition to the VA after its establishment in 1930. The consolidation of the former Veterans Bureau into a federal Administration under President Hoover was threatening to the AMA, who feared veterans' care would extend to non-servicerelated sickness (the VA's care was initially restricted to service-related illnesses) and the construction of VA hospitals (Kendall 1995, pp. 518-519). In the early 1930s, AMA delegates lobbied against the provision of veterans' care in Congress and proposed that veterans be offered cash to seek a private, fee-for-service doctor. Unsuccessful, the AMA became more concerned with the growing sentiment in Washington in favor of extending the Social Security Act of 1935 (American Medical Association 1972, p.195). After WWII and the advent of Truman's NHI plan, the AMA continued to oppose government involvement in healthcare (Kendall 1995, p.519; Croatman 1953, p.128).

How did veterans themselves perceive NHI? In the Gallup data, we observe whether male respondents are veterans of WWII in the November 1945 and April 1946 waves, or only before the Campaign begins. Although we are not able to observe Campaign treatment effect heterogeneity on this dimension due to this limitation, veterans of WWII are nine percentage points more likely to support NHI than non-veterans in the pre-Campaign period, though this relationship becomes weaker and not significant when conditioning on full demographic and design controls. In our lobbying data, we do not observe that veteran physicians differentially donated to the Eisenhower campaign.

<sup>&</sup>lt;sup>49</sup>Gompers was also known for his racist actions and comments. As the AFL's president, he openly supported the policy of southern unions that refused to admit Black workers (Mandel 1955, p.54).

# F Methods Appendix

# F.1 Comparison Calculations

In this section we seek to compare our finding of an approximately 14 million increase in enrolled individuals due to the Campaign to that of Thomasson (2003). In her analysis of the 1954 tax subsidy for employer-sponsored health insurance and its effect on demand for insurance, Thomasson estimates that a ten percentage point increase in the marginal income tax rate corresponds to an increase in access to insurance by five percent in 1957 (Thomasson 2003). From this estimate, we calculate that a one standard deviation increase in the marginal tax rate – based on the contemporary distribution of family incomes – corresponds with an increase in access to group health insurance coverage for approximately 650,000 - 1.1 million households or 2.2 - 3.7 million individuals. This assumes that every individual in the household is insured and using the average 1957 household size of 3.4 reported by Thomasson.

# F.2 Categorizing Tie-in Ads by Industry

We used key words or strings in company names, seen in Appendix Table F14 below, to categorize tie-in ads by industry. Among the 2114 companies with tie-in ads, 1778 were categorized into an industry.

Industry	Keywords
Insurance	"Insur", "Casualty", "Mutual", "Accident", "Bounds", "Ins.", "As- surance", "Plan", "Agent", "Blue Cross"
Pharmacy	"Drug", "Pharm", "Rexall", "Pharmacy"
Medical Services	"M.D.", "Hospital", "Dentist", "Dr.", "Medical", "Physician", "Den- tal", "Optician", "Prescription", "O. D.", "D. D.", "Clinic", "Nurs- ery", "Surgical", "Doctor", "D.D.S.", "O.D."
Finance	"Bank", "Saving", "Reserve", "Cash", "Trust", "Bonds"
Food	"Dair", "Food", "Cafe", "Milk", "Coffee", "Beverage", "Bakery", "Chicken", "Restaurant", "Creamery", "Package", "Ice Cream"
Manufacturing	"Motor", "Power", "Elec", "Machine", "Garage", "Factory", "En- gineer", "Ford", "Metal", "Gas", "Manufacture", "Oil", "Glass", "Audi", "Buick", "Coal", "Auto", "Chevrolet", "Paint"
Retail	"Home", "Utilit", "Stores", "Appliance", "Hardware", "Shop", "Clean", "Repair", "Grocery", "Cloth", "Furn", "Dress", "Shoe", "Store", "Jewel", "Optical", "Super", "Market", "Sport", "Gulf", "Bi- cycle", "Beauty", "Laundr", "Radio", "Service", "Wear", "Plumb", "Mercantile", "Gold", "Auction", "Cemetery", "Towel", "J.C. Pen- ney", "Floor Covering", "Refrigeration", "Wallpaper"
Real Estate	"Real Estate", "Construction", "Hotel"
Civic Orgs.	"Chamber of Commerce", "Association", "Veteran", "Public", "So- ciety", "Federation", "Congress", "Representative", "Committee", "Auxiliary", "Implement"
Agriculture	"Lumber", "Forest", "Mill", "Farm", "Greenshouse", "Hatchery", "Animal Trap", "City", "Seed", "Cottage"
Media	"The Independent", "Doyle Post", "The Progress", "The Vogue", "Book", "Mail", "Tribune", "The Norwich Sun", "Herald", "Tele- graph", "Journal", "News"

#### Appendix Table F14: Keywords for Industry Categories

Notes: Table reports the keywords used to categorize tie-in ads into industries.

# F.3 Identifying Campaign Ads, Merges, and Representativeness of Newspapers

We draw on two archival sources of newspapers data: the Lockwood-Shackelford Advertising Company (LS) data from the *Campaigns Inc.* Archives (Whitaker & Baxter *Campaigns, Inc.* 1933-1974) and the Newspaper Directory (Ayer 1949), as well as one publicly available source: NewspaperArchive (2023). We describe below the process of locating the Campaign ads, linking newspaper level data, and creating Appendix Tables D1 and D2.

*Identifying Campaign Ads.* Appendix Figure B3 shows the main Campaign newspaper advertisement published during the week of October 12th 1950, with the specific publication date during that week differing between newspapers. We use direct template matching methods to locate the advertisement in each newspaper, where the template we use is the heading of the ad containing an image of an eagle, and the matching tool is the match\_template function in the skimage package in Python. To identify and classify tie-in advertisements, Harvard students were employed to search for key Campaign phrases in the full sample of newspapers available in October 1950 (648 newspapers).

*Linking Newspapers*. To test representativeness, we separately matched two sets of newspapers to the Ayer & Son's Newspaper Directory: newspapers from LS invoices and newspapers from the NewspaperArchive. The data linkage can be summarized as follows:

- 1. Compute the Levenshtein distance similarity ratio between newspaper names from both datasets.
- 2. Keep the potential matches with a ratio greater than 0.9.
- 3. For observations with multiple potential matches, look for the pair with the highest ratio.

*Creating Newspapers Exhibits.* All newspapers from the NewspaperArchive with at least one issue available in October 1950 were matched to the Newspaper Directory. We kept only the newspapers with all characteristics recorded in the Newspaper Directory non-missing, and the final sample consists of 628 newspapers. These data were used for Table D1, which shows that the newspapers having a Campaign ad on average were not different from those that did not.

We restrict the sample to newspapers with all relevant characteristics recorded in the Newspaper Directory as non-missing. This sample includes 2506 newspapers, where 336 of them are linked to the LS invoices. We used these data to create Appendix Table D2, which shows that the newspapers appearing in the invoices on average were not differ from those that did not.

# F.4 Linkage of American Medical Directory to Lobbying Data

The data linkage procedure for the 1950 American Medical Directory (American Medical Association 1950*a*) and the list of donors who contributed to the National Professional Committee for Eisenhower for President (Whitaker & Baxter *Campaigns, Inc.* 1933-1974) is similar to Abramitzky et al. (2021) and can be summarized as follows:

- 1. Restrict to individuals with an M.D. degree in the donor list. Clean names in both datasets to remove any non-alphabetic characters and account for common abbreviations and nicknames (*e.g.*, so that Chas. and Charles would be considered the same name).
- 2. Split the AMD dataset into two folds by whether have a middle name
  - (a) For physicians with a middle name, look for individuals residing in the same state that match on last name, first initial, middle initial.
  - (b) For physicians without a middle name, look for individuals residing in the same state that match on last name and first initial.
- 3. For the remaining records in the AMD dataset, we match on residing town and last name.

Among the donors with an M.D. degree (N = 1441), 1160 of them were linked to at least one record in the AMD dataset, and 1153 (80%) matched pairs are unique. We dropped the observations that have multiple potential matches and only kept the unique matches.

# G Model Appendix

#### G.1 Model Details

Recall that  $\pi | m \sim \mathcal{B}(1 + m_0, 1 + m_1)$ , the closed form expression of the updated payoff is then:

$$U_{i}(x_{i},m) = \left(\frac{1+m_{0}}{2+m_{0}+m_{1}}\right) \left[-(P-(x_{i}-\delta))^{2}\right] + \left(\frac{1+m_{1}}{2+m_{0}+m_{1}}\right) \left[-(P-(x_{i}+\delta))^{2}\right]$$
(9)

We further assume that  $m_0$  and  $m_1$  are independent and  $m_0, m_1 > 0$ . Now the utility gain from adopting the policy  $D_i \equiv U_i(x_i, m)_{|P=1} - U_i(x_i, m)_{|P=0}$  is given by:

$$D_{i} = 2x_{i} + 2\delta \left(1 - 2\mathbb{E}[\pi|m]\right) - 1$$
(10)

Note that the FOC of  $U_i$  with respect to  $x_i$  is characterized by

FOC: 
$$x_i + \delta (1 - 2\mathbb{E}[\pi|m]) > \frac{1}{2} \iff D_i > 0$$
 (11)

## G.2 Proofs

*Proof of Proposition 1.* Note that  $m_0, m_1$  are independent and  $m_0, m_1 > 0$ , then

$$\frac{\partial}{\partial m_0} \mathbb{E}[\pi|m] = \frac{\partial}{\partial m_0} \left( \frac{1+m_0}{2+m_0+m_1} \right) = \frac{1+m_1}{(2+m_0+m_1)^2} > 0$$

$$\frac{\partial}{\partial m_1} \mathbb{E}[\pi|m] = \frac{\partial}{\partial m_1} \left( \frac{1+m_0}{2+m_0+m_1} \right) = \frac{-(1+m_0)}{(2+m_0+m_1)^2} < 0$$
(12)

With  $\frac{\partial x_v}{\partial m_0} < 0$ , it follows that

$$\frac{\partial D_v}{\partial m_0} = 2\frac{\partial x_v}{\partial m_0} - 4\delta \frac{\partial}{\partial m_0} \mathbb{E}[\pi|m] < 0$$

$$\frac{\partial D_v}{\partial D_v} = \frac{\partial}{\partial m_0} \frac{\partial}{\partial m_0} \mathbb{E}[\pi|m] < 0$$
(13)

$$\frac{\partial D_v}{\partial m_1} = -4\delta \frac{\partial}{\partial m_1} \mathbb{E}[\pi|m] > 0 \tag{(4)}$$