FEDERAL SUBSIDIZATION OF HEALTH INSURANCE: THE “CADILLAC TAX” AND TAX CREDITS IN THE AFFORDABLE CARE ACT AND BEYOND

David Goodman
Franklin and Marshall College
Department of Economics
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Faculty Advisor: Sean Flaherty
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Abstract: The Affordable Care Act (ACA) was enacted with two broad goals: increasing health insurance coverage and slowing the rise of health care costs. This paper examines the benefits and costs of two particular ACA policies: one, the introduction of tax credits in 2014 to subsidize the purchase of health insurance by Americans of limited means; and two, the implementation (in 2020) of a “Cadillac Tax” imposed on “excessively generous” employer-sponsored health insurance plans, designed both to generate revenue for ACA spending provisions and to promote greater cost consciousness among those insured via such plans. I find that the tax credits have been effective at lowering the uninsurance rate. I find further that the “Cadillac Tax” will induce employers to shift their total compensation packages away from health insurance benefits and toward higher wages; but my research suggests that the tax exclusion thresholds are set too high to be wholly effective in inducing consumers to become more cost-conscious in their spending for medical care services. I conclude by analyzing the potential benefits and costs of repealing and replacing the ACA with the American Health Care Act (AHCA).

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INTRODUCTION

Compared to the rest of the developed world, the United States is unique when it comes to its health care system, particularly so in the way that Americans obtain their health insurance coverage. In 2015, about 177 million Americans—roughly 55% of the total U.S. population—received their health insurance through coverage organized by an employer, whereby all workers in a given company and their dependents constitute a “group” for purpose of purchasing health insurance. The other 45% of Americans receive their health insurance through coverage organized by the government, such as Medicare and Medicaid, through coverage obtained individually in the non-group market, or through no coverage at all (Figure 1).

In contrast, citizens in most other developed nations receive their health insurance through the government, often in the form of a single-payer system (e.g., France and U.K.). In France, citizens pay about 21% of their income into the national health care system, but they bear little additional cost when they seek medical care. In the U.S., citizens pay taxes that support Medicare and Medicaid, but most working-age Americans effectively purchase ‘private’ insurance; employees in large companies make that “purchase” in the form of reduced wages and salaries within a total compensation package; workers in companies that do not provide health insurance and those who are ‘self-employed’ purchase their health insurance, if at all, in the “non-group market.”

The largely private system of coverage in the U.S., combined with other distinctive features, makes the U.S. system very expensive. For example, as of 2014, the U.S. was spending a considerably larger share of its GDP on health care (17.1%) than France (11.5%). At the same time, 10.4% of Americans had no health insurance coverage in 2014, compared to just 1.0% in
Finally, the average life expectancy of Americans falls three years short of that for the French (i.e., 79 vs. 82).

These data suggest that the U.S. health care system is inefficient in having both high costs and limited coverage. According to standard economic theory, if the status quo yields inefficient outcomes, government can step in and act to reduce if not entirely eliminate such inefficiencies. Many health economists argue that the tax excludability of employer-sponsored health insurance benefits contribute to the high cost of American health care. The Affordable Care Act’s (ACA) “Cadillac Tax” represents an attempt to move away from the tax code’s treatment of health insurance benefits as entirely tax-free. Additionally, the ACA’s provision of tax credits to low-income Americans represents an attempt to make health insurance affordable for those who must buy their coverage in the non-group market. These two elements of the ACA represent then a partial solution to resolving the inefficiencies inherent in the U.S. health care system.

In this paper, I perform an in-depth analysis of the ACA’s Cadillac Tax. I argue that there are four problems concerning the tax excludability of employer-sponsored health insurance benefits: 1) it weakens consumer cost consciousness for spending on medical care, which drives up health care costs; 2) it disproportionately benefits higher-income employees; 3) it distorts an employee’s decision where to work; 4) it results in a substantial amount of lost tax revenue. Next, I argue that the Cadillac Tax represents a partial solution to resolving problems with the tax exclusion. In particular, an increasing amount of revenue will be generated over time as plan premiums exceed tax thresholds because such thresholds are indexed to CPI, which rise at a slower rate than medical inflation. However, most revenue will be generated over the long run as employers shift their total compensation packages away from health insurance fringe benefits and toward higher wages. The projected amount of revenue from the Cadillac Tax will not meet total
ACA spending needs because its tax thresholds are higher than originally planned and implementation date pushed back, which are the by-product of compromises made by the Obama administration to secure enough political support to pass the ACA. As such, some economists like Alain Enthoven claim the Cadillac Tax could be more effective if tax thresholds were set at 80% of the average premium level in a region. For this reason, I was surprised to learn that the Republican plan to replace the ACA will keep the Cadillac Tax, but further delay its implementation.

In this paper, I also perform an in-depth analysis of the ACA’s tax credits. I argue that, in the existence of a community rating requirement as under the ACA, the healthy must be compelled by an individual mandate or incentivized with tax credits to purchase health insurance in order for premiums to remain at affordable levels. Next, I argue that income-based tax credits such as the ACA’s would work better than age-based credits at lowering the number of uninsured, which is comprised largely of low-income people. The ACA’s tax credits, in combination with the individual mandate, were largely responsible for the drop in uninsurance rate from 10.4% in 2014 to 8.8% in 2016. The ACA’s tax credits also improved affordability of health insurance by cutting larger amounts off premiums every year. However, the ACA’s tax credits could be improved upon. I argue that income-based tax credits create a small disincentive to pursue employment. In addition, I argue that premiums before taking into account tax credits have risen every year since the ACA was implemented.

The final few sections of this paper touch on current discussion concerning repealing and replacing the ACA. I argue that repealing tax credits alone would result in employment losses both within and beyond the health care industry. Furthermore, repealing the combination of tax credits, the individual mandate, and Medicaid expansion would result in three unfavorable outcomes: 1)
higher premiums; 2) more uninsured people; 3) fewer participating insurers in exchanges. Should the American Health Care Act (AHCA) replace the ACA, I argue that new tax credits would provide greater financial assistance to the well-off than to the poor. In addition, the AHCA would lower the federal deficit and lower premiums in the long run. Despite its cost-control measures, I argue that the AHCA never received full support from Moderate Republicans because of the projected increase in number of uninsured under the plan. Conservative Republicans did not support the AHCA because they thought it did not go far enough to repeal ACA policies.

HISTORY OF U.S. HEALTH CARE REFORM AND THE RISE OF EMPLOYER-SPONSORED INSURANCE

The tax system in the United States extends favorable tax treatment to individuals who acquire their health insurance through employment, by excluding from federal income and payroll taxes the fringe benefits that employers provide as health insurance. It is ironic and problematic, as will be explained later, that the United States Treasury department did not fully consider the economic implications of tethering health insurance to employment when it issued the tax exclusion in 1954; when Louisiana Senator Russell Long inquired about the projected budgetary implication of the exclusion, Under Secretary of the Treasury Marion Folsom replied, “We haven’t any estimate on that.” Instead, today's employer-provided system of health insurance is largely the product of federal government actions whose primary focus was on labor relations and wage controls. Below is a brief history describing how our current health insurance system came to be.

Before the 1930s, only 2 million out of 123 million Americans (or roughly 1.6% of the population) had some form of health insurance. Low coverage was, in part, due to limited supply. Insurance companies were concerned that administrative costs would be too high, and they were
also concerned about adverse selection, a situation where sick and debilitated individuals would disproportionately enroll and increase the cost of coverage. Also, low coverage was, in part, due to limited demand. At the time, lost wages constituted the largest cost associated with illness, rather than the cost of medical care; a 1919 State of Illinois study found that lost wages were, on average, four times larger than medical expenditures per “sick” event. Therefore, many people purchased sickness insurance - which is similar to disability insurance today - instead of health insurance.

Hospitals rose to prominence as the primary treatment centers during the late 1920s/early 1930s as cities expanded, medical technology improved, and changing family dynamics left less time to care for sick relatives at home. The rise in demand for hospital services increased medical care costs to unaffordable levels for most Americans paying out-of-pocket, resulting in large uncompensated care costs. In 1929, Baylor University Hospital in Dallas, Texas created for Dallas-area schoolteachers the first pre-paid hospital insurance plan. This plan required teachers to contribute $6 of their yearly salary into a fund that would be used solely for paying off medical expenses for 21 days of hospital stay.

Enrollment in similar plans had jumped from 1,300 people in 1929 to 3 million by 1939. The American Hospital Association officially designated such hospital insurance plans with the Blue Cross and Blue Shield symbols. The increase of insured people during the 1930s can be attributed to the success of Blue Cross plans in generating both a greater supply of and encouraging growing demand for health insurance. Insurance companies were more willing to participate in the private marketplace for several reasons: 1) employers could provide a large enough pool of workers that would spread out risk and reduce the possibility of adverse selection; 2) employers provided a ready-made group of people that could limit the costs of overhead; 3) Americans were more willing to demand health insurance because hospital costs rose steeply and made out-of-
pocket spending unaffordable; and 4) a stable source of benefits appeared attractive during an unstable economic era. For these reasons, the Blue Cross prepaid hospital insurance plans served as an important precursor to modern health insurance in the United States.

Federal policies instituted during the World War 2 era further encouraged the establishment of private, employer-based health insurance. Labor was in short supply with millions of Americans fighting overseas; in order to attract more workers, employers were willing to pay higher wages. However, President Roosevelt implemented the Stabilization Act of 1942, which decreed that prices and wages would remain fixed at their September 15, 1942 levels. According to this Act: “No increase in wage rates, granted as a result of voluntary agreement, collective bargaining, conciliation, arbitration, or otherwise, and no decrease in wage rates, shall be authorized unless notice of such increases or decreases shall have been filed with the National War Labor Board, and unless the National War Labor Board has approved such increases or decreases.”

But to accommodate workers demanding higher compensation and employers seeking more labor, the Stabilization Act did not subject health insurance to the limitations imposed on wages or salaries: “Salaries and wages under this Order shall include all forms of direct or indirect remuneration to an employee or officer for work or personal services performed for an employer or corporation, including but not limited to, bonuses, additional compensation, gifts, commissions, and any other remuneration in any form or medium whatsoever (excluding insurance and pension benefits in a reasonable amount as determined by the director).”

Three rulings after 1942 firmly established the employer-provided health insurance model in the United States. First, before the war ended in 1945, the National War Labor Board announced that employers were bound to include health insurance, in addition to salaries and wages, as part of collective bargaining negotiations with employees. Second, in 1949, the Supreme
Court upheld a decision by the National Labor Relations Board in Inland Steel Co. vs. NLRB that companies had to bargain in good faith other fringe benefits, such as health insurance, during contract negotiations. This ruling had considerable effects, such that by 1954 nearly 30 million union workers and their families possessed employer-provided health insurance, compared to only 600,000 workers in 1946.\textsuperscript{13} The third ruling, issued in 1954 by the Internal Revenue Service (IRS), was that employer-provided health insurance would not be defined as part of a worker’s taxable income, meaning that health insurance benefits are excluded from income or payroll taxes.

Fifteen years later, President Nixon was battling unfavorable approval ratings - partly as a result of the Watergate scandal and partly due to opposition from Democratic Senator Kennedy, who was traveling the country raising awareness of the importance of health insurance coverage. To win back public approval, Nixon assigned Caspar Weinberger, his Secretary of Health, Education, and Welfare, the responsibility for developing a Comprehensive Health Insurance Plan aimed at achieving universal health care coverage.\textsuperscript{14}

The plan called for an employer mandate, which would have required employers with at least ten employees to pay three fourths of health insurance premiums for workers and their families. A public program would then cover everyone else who was not insured via employment. Weinberger proposed financing the plan by treating employer-provided health insurance as taxable income, effectively rescinding the 1954 IRS rule. However, Nixon rejected this idea on grounds that unions would disapprove removing the tax exclusion. Although Nixon’s health care plan was never enacted, Weinberger’s idea of taxing employer-sponsored health insurance plans would set the stage for future policy proposals.

When stagflation hit the U.S. economy in the mid-1970s, President Jimmy Carter gave more attention to controlling health care costs rather than expanding coverage. In 1979, Carter
issued a health care plan similar to Nixon’s, including an employer mandate for workers and their families, and a government program for everyone else not covered through work.\textsuperscript{14} This plan differed from Nixon’s, though, in requiring employers only to provide catastrophic, rather than comprehensive, coverage.

A catastrophic plan functions as a safety net to protect against the high costs of medical care in the event of serious injury or illness. It typically covers a minimal range of services, including emergency services, but not primary or preventative care.\textsuperscript{15} Due to its low premiums, high deductibles, and a narrow scope of coverage, such a plan discourages a kind of “moral hazard,” which occurs when generous insurance benefits promotes the overconsumption of medical care and therefore raises total medical spending.

While Carter’s proposal appeared as a promising policy to control rising health care costs, it ultimately died after failing to receive an endorsement from Senator Ted Kennedy, who at the time anticipated running for the Democratic nomination in the 1980 presidential election. According to Carter in a 2010 CBS News interview, “It [health care legislation] could have been a major step forward at that time, which unfortunately did not happen. Kennedy considered himself the inevitable next president and maybe he wanted to have his, I’d say, gold plated comprehensive plan put into effect under his own administration.”\textsuperscript{16}

Little progress was made in the 1980s in designing a universal health care plan that could also control rising costs. But the Clinton Administration proposed a bold new plan in 1993, called “pay or play,” which would have required employers to either provide their workers with health insurance, or to pay a 9\% payroll tax into a public health insurance program.\textsuperscript{14} The purpose of this hefty payroll tax was to deter employers from dumping their sickest and most expensive workers
into the public program. However, Republicans were fiercely opposed to the payroll tax and so the “pay or play” plan was never enacted.

An alternative to the “pay or play” plan, called managed competition, was proposed by Clinton’s chief health care policy advisor, Ira Magaziner. The term “managed competition” means “choice among health plans,” implying that employees would have the freedom to choose whatever type of health insurance they want. This policy, similar to Nixon’s, included an employer mandate for comprehensive health insurance coverage. But, this plan’s main feature was a requirement for employers to pay 80% of premiums for the average-cost plan in a region. Additionally, the tax exclusion would only be applied up to the premium level of the lowest-cost plan in a region. If employees preferred a more expensive plan than the lowest-cost one, then they would have to use their own after-tax dollars to meet the additional cost.

Here is an example of how this would work: suppose the average plan’s monthly premium in a region is $1,000. The employer is required to pay 80% of $1,000, or $800, no matter what type of plan an employee chooses. If an employee prefers a low-cost plan containing $800 in premiums, then the employer would pay the full $800 and the employee would owe nothing out of pocket. If instead, an employee chooses the average-cost plan, then they would owe $200 out-of-pocket. Lastly, if an employee prefers a high-cost plan containing $1,200 in premiums, then the employee would owe $400 out of pocket.

Unlike “pay or play,” the managed competition plan had no payroll tax; and more importantly, it included a mechanism for generating price competition. By limiting the tax exclusion of employer-provided health insurance to the premium level of the lowest-cost plan, employees who chose a more expensive plan would be responsible for paying the cost of all additional benefits.
Despite the promise of managed competition, the policy was never enacted. Republicans were fervently opposed to any legislation proposed by a Democratic president, and there was not enough support for Clinton’s plan from Democrats in Congress. Additionally, the “Harry and Louise” ads sponsored by the Health Insurance Association of America depicted Clinton’s plan as government over-reach and deterred many Americans from supporting it. The reasons that halted health care reform efforts in this instance were almost the same as those that prevented passage of health care legislation under Nixon and Carter. For health care legislation to be enacted, the political and economic conditions of the time must be favorable. Thus, to this day, the United States has an employer-sponsored system of health insurance that looks in many respects much as it did decades ago following the IRS tax exemption.

**CURRENT TAX EXCLUSION: PROS AND CONS**

Employers today attract workers by providing them with a given total compensation package, which includes in part wages and health insurance benefits. For each additional dollar of gross compensation earned as wage or salary income, the employee will get to keep roughly 60-70 cents after taxes. But, under the present tax treatment of excluding employer-sponsored health insurance benefits from taxable income, every $1 worth of health insurance provided by an employer is equal to $1 worth of health insurance received by the employee. This is one big tax subsidy. In effect, it is a tax deduction since it lowers the employee’s taxable income. The marginal cost of obtaining health care services is lowered when compensation is shifted away from wages toward health insurance. Since rational decision-makers base their purchasing decisions on
marginal cost, a compensation package of a given total value will appear more attractive if it contains fewer taxable wages and more generous health insurance benefits.

In addition to the tax exclusion, there are several other reasons why it is advantageous for consumers to receive health insurance benefits as part of a given total compensation package offered by their employer. One, consumers don’t have to worry about navigating the health insurance market by themselves. Instead, the employer acts as a sponsor and performs all of the administrative work, such as finding an insurance carrier and negotiating for rates. In the non-group market, it may require a lot of time and effort searching through the choices of insurance carriers and plan structures. This is a transaction cost that can deter individuals from purchasing health insurance altogether. Two, large employers offer insurance companies a big enough pool of workers so they can spread out risk and eliminate adverse selection. As such, employers are able to negotiate lower health insurance premiums for their workers than those workers would get as individuals purchasing insurance by themselves.

These examples demonstrate that, for most consumers, it would be rational to purchase health insurance in the form of lower wages if offered as part of an employers’ given total compensation package. However, the tax exclusion is responsible for several inefficiencies and inequities, which are described below.

First, the tax exclusion weakens consumer cost consciousness for spending on medical care. This makes the health care system less efficient, as health care costs are driven up. Coverage benefits of “generous” plans may include “non-essential” health services such as a chiropractor, acupuncture, and bariatric surgery, some of which can cost thousands of dollars (e.g., the average cost of gastric bypass surgery is $20,000-$25,000 today). An employee who has such health care services covered by insurance does not face the same costs borne by someone with less generous
insurance or no insurance at all. Thus, the employee is more likely to utilize these non-essential health services, and the resulting rise in demand will increase prices for medical care. This phenomenon, when overly generous insurance promotes the overconsumption of medical care and raises total medical costs, is an example of what’s known as moral hazard. This is what Jimmy Carter attempted to prevent when he promoted catastrophic, rather than comprehensive, coverage.

Economists David Powell and Dana Goldman offers an example of moral hazard in their study, “Disentangling Moral Hazard and Adverse Selection in Private Health Insurance.” They use administrative claims data from a large U.S. manufacturing firm, which only offered one health insurance plan to employees in 2005. In 2006, the firm increased its offering of health insurance plans to three; the least-generous plan had a $800 deductible, a 20% co-pay, and a $4,000 out-of-pocket cap, while the most-generous plan had a $250 deductible, a 10% co-pay, and a $1,250 out-of-pocket cap. Powell and Goldman found that average medical expenditures were $3,969 greater in the more-generous plan compared to the least-generous plan in 2007. After accounting for confounding variables such as employee age, race, and adverse selection, Powell and Goldman concluded that $2,117, or 53%, of the $3,969 difference in medical spending between plans could be attributed to moral hazard.

The second major problem with the tax exclusion is that it is less beneficial to low-income employees than to higher-income employees. There are couple of explanations to account for why the tax exclusion differs with respect to income. One, lower-income workers are less likely to be offered health insurance through their employers, and for those offered coverage, fewer of them choose to enroll. Therefore, lower-income workers are less likely to benefit from the tax exclusion. This is supported by findings from the Kaiser Family Foundation. In 2014, 83% of non-elderly full-time workers in the >400% FPL category were offered health insurance through their
employers, while this was only the case for 37% of workers in the <100% FPL category (Figure 2). Furthermore, 83% of non-elderly full-time workers in the >400% FPL category enrolled in employer-sponsored health insurance, while only 12% of workers in the <100% FPL category did so (Figure 3).

Additionally, lower-income employees who enroll in employer-sponsored coverage receive a smaller tax break compared to higher-income employees because the subsidy’s value rises for employee’s in higher income tax brackets. As an example, the Joint Committee on Taxation (JCT) reported in a 2009 study that households earning $200,000–$499,999 per year received an average of $4,728 in tax subsidies as a result of the exclusion, while households earning $10,000–$29,999 only received about $1,952.22

While the tax exclusion offers a larger tax break to higher-income employees, who in turn request greater health insurance benefits, it is in fact lower-income employees who need the most help for purchasing health insurance.23 In 2015, the national nonelderly uninsured population was 28.5 million people. Of this number, 81% were from low-to-moderate-income families (below 400% FPL). Additionally, 85% of the uninsured had at least one worker in their family, which further validates the point that lower-income employees are less likely to be offered health insurance through their employers. These data indicate that poor families are in greater need of financial assistance to subsidize the cost of health insurance.

Another problem with the tax exclusion is that it distorts an individual’s choice in the labor market as to which firm to work for or whether or not to exit the labor force, leading to what economists call “job lock.”24 Because there are advantages to receiving health insurance benefits through one’s employment, people might resist wanting to leave one job for another if their current job offers more generous health insurance benefits.
The last, and probably most often voiced criticism of the present tax exclusion is directed at its financial repercussions for the federal budget – it is the single largest tax break in the United States. As mentioned previously, revenue considerations were not really a factor in the IRS decision to implement the exclusion. In 2013, about $250 billion in tax revenue would have been collected by the government if not for this exemption. The CBO projects that this exclusion will lower federal revenue by $3.6 trillion over the next decade.

These inefficiencies and inequities linked to the tax excludability of employer-sponsored health insurance demonstrate that there is a need to improve the system. According to standard economic theory, if the status quo yields inefficient outcomes, government can step in and act to reduce if not entirely eliminate such inefficiencies.

One measure might be to completely remove the tax excludability of employer-sponsored health insurance benefits. This approach may work the best at controlling health care costs, since it completely removes all of the inefficiencies associated with the tax exclusion. However, this approach is almost politically impractical due to the sure condemnation it would garner from labor unions and employers who benefit from the exclusion. Additionally, government policy changes in the United States materialize slowly and in little steps – a process called incrementalism – and a measure as large as completely removing the tax exclusion would violate this change-making process.

A second-best approach is to limit (not completely remove) the amount up to which employer-sponsored health insurance benefits are exempt from taxation. This is the approach the Obama administration took with passage of the Affordable Care Act, which includes a so-called “Cadillac Tax” on high-cost employer-sponsored health insurance.
Notice both of these approaches would have the effect of lessening (or in the case of the first approach to completely do away with) the subsidization of health insurance obtained through employment. The main issue arising from this approach is: at what level of premium support should the tax exclusion be set to for employer-sponsored health insurance benefits, and how should this level be adjusted for differences such as age and geography?

The next section of this paper will address the issue of limiting the tax exclusion. More specifically, I will analyze the Cadillac Tax in terms of its financial strengths and weaknesses, as well as its support and opposition from key interest groups. I will also analyze alternative policies to the Cadillac Tax, such as those proposed by Alain Enthoven and in Republican plans to replace the ACA. As will be mentioned in the next section, the very idea of a Cadillac Tax prompted plentiful negative attention, and it took adept policy maneuvering to implement a limit on (never mind total replacement of) the tax exclusion.

LEGISLATIVE DEVELOPMENT OF THE CADILLAC TAX

The process of designing and implementing a tax on employer-sponsored health insurance benefits was arduous to say the least; disagreement between economists, politicians, and interest groups occurred over months of closed-door meetings and multiple “Call for Action” reports. For this reason, the Cadillac Tax has been likened to a “political hand grenade.”

After Barack Obama won the Presidency in 2008, there were several attempts by Democrats to obtain broad, bipartisan support for limiting the tax exclusion on employer-sponsored health insurance benefits. For example, Senate Finance Committee chairman Max Baucus issued a “Call to Action” White Paper that proposed the following ideas: 1) set a fixed
limit on the value of health insurance benefits provided by employers, above which any additional benefit would be considered taxable income; 2) set an income cap, below which all employer-sponsored health insurance benefits would be excluded from taxation, and above which the exclusion would phase out with rising income. According to the Congressional Budget Office (CBO), these proposals were projected to bring in around $300 billion over 10 years, which alone could have financed the Affordable Care Act’s spending programs without adding to the budget deficit.29 However, Baucus’s White Paper was received with mixed reviews, as outlined below.

When President Obama took office, he assigned two different teams to work on designing a health care plan that could both expand coverage and control rising health care costs. The economic team, which included Larry Summers, Peter Orszag and Dr. Ezekiel Emanuel, focused on the spending and cost side of the equation. They were in favor of Baucus’s proposal because of its promise to finance the Affordable Care Act’s spending programs without adding to the budget deficit. On the other side, the political team, whose main focus was on extending health insurance coverage, disapproved of Baucus’s proposal, citing probable political opposition from labor unions and other Obama supporters. President Obama initially sided with the political team, because he had campaigned to enact health care reform without raising taxes and was not willing at this point to break his promise. With expanding coverage his main objective, he set aside the financing issue aside for later consideration.

Not deterred by Obama’s opposition to removing the tax exclusion, both the Senate Finance Committee and White House economic team searched for ways to modify Baucus’s plan. A solution was to tax employers (not employees as specified in the Baucus plan) on any health insurance benefits they offered above a certain level. This difference is important for several reasons. First, avoiding a tax to be paid by employees would seemingly fulfill Obama’s campaign
promise. Second, employers would feel pressure to offer less generous health insurance plans to avoid paying the tax, and insurance companies would eventually feel pressure to design less generous plans. The result would ultimately be to place more of the cost-burden on employees (e.g., via higher out-of-pocket expenses, such as deductibles and co-pays that would come with plans that offered lower premiums). In turn, employees would now face pressure to limit their health care spending.

Dr. Ezekiel Emanuel was a big proponent of removing the exclusion because it would be, he argued, “the single-most effective instrument the President possessed to control and reduce private-sector health costs.”13 MIT economist Jonathan Gruber, another proponent of the plan, said that removing the exclusion “would reduce the incentives for employers to provide excessively generous insurance, leading to more cost-conscious use of health care and, ultimately, lower spending.”31 Furthermore, adopting this plan was projected to bring in about $110 billion over 10 years to help finance the Affordable Care Act’s spending programs.29 However, it was not the $300 billion that Baucus’s plan would have provided.

At this point in time, Obama was still not ready to approve limiting the tax exclusion. Unions and other skeptics disapproved of the resulting increase in out-of-pocket expenses that would ensue, arguing that they could become clinically inefficient in the long run. Some workers, especially those who are poor or have serious illnesses, would not be able to afford the greater cost burden for health care. This could lead to the avoidance of or a delay in people getting essential health care services, which could result in worse health outcomes and higher costs in the long run as an increasing proportion of the population use more expensive emergency services and forgo preventative care.32 This effect would be opposite of what the Cadillac Tax is trying to achieve: to slow the rate at which health care costs are growing in the economy.
The potential effect of worsening health outcomes could also have serious ramifications for the economy’s productive capacity. According to an October 2012 Bloomberg BNA report, when generous benefits are taxed, "Employers will quickly lose the ability to tailor their plans to meet the unique needs of their populations. If a self-funded plan does not address specific issues within the employer's population, the effectiveness of the benefit program will decrease and metrics of effectiveness, such as employee absenteeism and productivity, will begin to erode."33

As the Summer of 2009 arrived, President Obama had made no progress on one of his largest campaign pledges: to deliver expanded, affordable health insurance coverage. Feeling pressure from the public, he needed to act … and fast. To solidify his thinking about how to finance such an expansion, Obama met with the economic team over several weeks to narrow down two solutions: (1) eliminating the exclusion for families with incomes of $250,000 or more per year; (2) taxing health insurance benefits when they reach some threshold. President Obama ultimately sided with the second option.

As the White House was creating its own health-care bill, there was no guarantee that it would pass both the Senate and House of Representatives. There was also no guarantee that the Senate and House of Representatives would approve of one another’s bills. The emerging House bill called for higher income taxes on individuals earning more than $500,000 and couples earning more than $1 million in order to raise funds for the bill’s proposed spending programs.14 The Senate, on the other hand, proposed what became known as the Cadillac Tax on high-cost health insurance plans. Because three different entities had developed separate bills, compromise was necessary before reform would happen.

Baucus had devised his plan with an intention to draw bipartisan support, but by late 2009 it was clear that Republicans had no interest in supporting any health care plan promoted by a
Democratic president. Thus, the Democrats were moving forward solo. At the time, the House of Representatives had a significant Democratic majority. If Senate Democrats could garner the necessary 60 seats to defeat a filibuster, then pieces from all proposed bills could be blended into one bill that the House and Senate could each pass without a single Republican vote. This course of action began on December 24, 2009 with the successful passage of the Senate’s bill, called the Patient Protection and Affordable Care Act (PPACA), after approval from all 58 Democrats plus Independent Senators Joe Lieberman and Bernie Sanders.34

But before the House of Representatives could vote on the Senate bill, Republican Scott Brown defeated Democrat Martha Coakley in a special Massachusetts Senate election on January 19, 2010, which left the Democratic majority one seat short of being ‘filibuster-proof.’ Scrambling to find a way to pass legislation acceptable to both the House and Senate, Democrats came up with a solution that didn’t require 60 Senate votes. Through a measure called reconciliation, the House first approved the Senate’s bill on February 25, which was then signed into law by President Obama on March 23. Following this, the House passed its own bill, called the Health Care and Education Reconciliation Act (HCERA), which made some budgetary revisions to the PPACA. Because the House bill made only budgetary revisions to the PPACA, it could pass the Senate via the reconciliation process with only a simple majority.14

The HCERA was signed into law by President Obama on March 30, 2010. It changed the senate bill by raising the exclusion thresholds, delaying the Cadillac Tax’s implementation date, and adding additional tax revenue mechanisms. These and other features of the Cadillac Tax will be described in the following section.
WHAT IS THE CADILLAC TAX?

Title IX, Subtitle A, Sec. 9001 of the Affordable Care Act (ACA) is the official designation of an excise tax on high cost employer-sponsored health insurance coverage. While this section comprises just 6 pages out of a lengthy 906 page-long bill, the details regarding who will be taxed, how much, and under what circumstances are numerous and, in some cases, very complex. The following is a summary of the Cadillac Tax’s features.

According to the ACA, a tax shall be imposed when (1) “an employee is covered under any applicable employer-sponsored coverage of an employer at any time during a taxable period,” and (2) “there is any excess benefit with respect to the coverage.” In other words, employer-provided health insurance will become taxable if the coverage is “too generous,” but will remain untaxed if the coverage is less than “too generous.”

The definition of an “excess benefit” has changed multiple times since the ACA was passed in 2010. In 2013, when the tax was originally supposed to kick in, any premium total paid by employers exceeding $8,500 for individual coverage or $23,000 for family coverage would have been considered an “excess benefit.” But only one week after passing the ACA, Congress took steps to lessen the tax’s immediate impact by delaying the implementation date from 2013 to 2018. In 2015, Congress further delayed the implementation date to 2020. Thresholds have increased as well. In 2020, annual limitations will be $10,200 (rather than $8,500) for an individual plan and $27,500 (rather than $23,000) for a group plan. Thresholds would continue to increase beyond 2020 because they are indexed to CPI, which is a cost-of-living formula that accounts for inflation but typically rises more slowly than medical inflation. The implications of the decision to index annual thresholds to CPI will be discussed later in this paper.
These annual limitations are not uniform for employees of all ages and across all industries. Older workers require more generous health insurance plans owing to their likelihood of having a greater number of health problems. Workers in “high-risk” professions also require health insurance plans with more generous coverage as compensation for the added risk they assume. If employers are going to be taxed for providing excessive health insurance fringe benefits, then it is only fair to adjust for the extra costs for which they assume responsibility. Compensatory adjustments were originally set at $1,350 for individual plans and $3,000 for group plans; however, they have been raised to $1,650 for individual plans and $3,450 for group plans. Hence, any individual who is either (1) “a qualified retiree,” or (2) “participates in a plan sponsored by an employer where the majority of employees are engaged in a high-risk profession,” may have non-taxable health insurance benefits of up to $11,850 for individual coverage (rather than $10,200) and $30,950 for family coverage (rather than $27,500).

The ACA is very particular in defining what constitutes a “qualified retiree” and what firms employ workers in a “high risk profession.” A qualified retiree is (1) retired from employment, (2) at least 55 years old, and (3) either is not eligible to enroll in Medicare or is not entitled to Medicare benefits. The majority of qualified retirees are people between 55 and 65 years old who are not yet old enough to enroll in Medicare, while the minority of qualified retirees are above age 65, but not entitled to Medicare benefits because they are (1) not a U.S. citizen or a permanent legal resident who has lived in the U.S. for at least five years, or (2) have not worked long enough to receive social security benefits. High-risk professions are fire protection services, law enforcement, electrical/telecommunication line repair technicians, fishing, forestry, mining, construction, agriculture (not including food processing), and out-of-hospital emergency medical care (such as paramedics, first-responders, and emergency medical technicians).
State-by-state differences in health care costs - owing to demographics, cost-of-living, and industry make-up - are another factor the law accounts for, but not well enough, according to some who claim the adjustments are not sufficient to account for the higher cost of insurance in certain states. The ACA put into place short-term adjustments to compensate employers in “high-cost” states, where a “high-cost” state is classified by the Secretary of Health and Human Services as any of the 17 states with the highest average premiums for employer-sponsored health insurance. The annual tax threshold for all employer-sponsored health insurance plans in these states would have been higher by 20% in 2013, 10% in 2014, and 5% in 2015. Congress has yet to determine how much the tax threshold should be adjusted if for all for employers in high-cost states in 2020. One idea President Obama offered in his fiscal year 2017 budget proposal would be to set the tax threshold at the level of an average “gold” premium for any state whose health insurance marketplace has an average gold premium that is higher than the standard Cadillac Tax threshold. But, because this is only a proposal and there is no current adjustment in place, workers who live in a more expensive region may have plans that are more likely to hit the tax threshold first.

Having just described the conditions under which a tax shall be levied, I now turn to the tax penalty itself: what specifically is the tax and who has to pay it? The Cadillac Tax is a 40% excise tax on the value of health insurance premiums above the applicable threshold. An excise tax is typically a governmental effort to decrease the consumption of a particular good (e.g., tanning salons, cigarettes, alcohol). In fact, one of the goals of the Cadillac Tax is to decrease the overconsumption of health care services and to put a damper on rising health care costs. The Cadillac Tax is an “ad valorem” tax, which means that it levies the tax as a certain percentage of the good’s sale price.
To see how much in taxes an employer would owe, take a 25-year old individual, whose plan threshold will be $10,200 in 2020. If the employer provides, say, an $11,700 health insurance plan, then the $1,500 ($11,700 - $10,200) excess in premiums would be subject to a $600 ($1,500 x 0.40) excise tax. The 40% tax rate remains the same for all plans.

There are many different types of employer-sponsored health insurance plans in the marketplace. The law goes into detail describing which plans are subject to taxation and which are not.36 Fully-insured and self-insured group health plans, Health Flexible Spending Accounts (FSA), Health Savings Accounts (HSA), Health Reimbursement Accounts (HRA), and Archer Medical Savings Accounts (MSA) are all subject to taxation. Other applicable types of coverage include the Federal Employees Health Benefits Program (FEHB) for government employees, hospital indemnity insurance, multi-employer (Taft-Hartley) plans, and pre-tax coverage for a specified disease or illness. Health insurance plans that are not subject to taxation include free-standing vision and dental care, worker’s compensation, government-sponsored insurance for the armed services, coverage for accident-only or disability income insurance, employee assistance programs, automobile medical payment insurance, liability insurance, and credit-only insurance.

The term “employer-sponsored health insurance plan” has been used throughout this paper to describe the type of plan subject to taxation. However, employers have the option of setting up different group plan structures, which in turn affects who is liable for paying the tax penalty. In a fully-insured health plan, employers pay a fixed per-employee premium to their insurance carrier for coverage of selected benefits. The insurance carrier is liable for paying the tax because they accept financial responsibility for employees' health costs.40 In a self-insured health plan, employers directly pay their employee’s claims to health care providers using money that they would have otherwise paid an insurance company for this service. Employers are liable for paying
the tax because they accept the financial responsibility for their employees’ health care bills. Employers also pay the tax for any contributions both they and their employees make toward Health Flexible Spending Accounts (FSA), Health Savings Accounts (HSA), Health Reimbursement Accounts (HRA), or Archer Medical Savings Accounts (MSA) they sponsor.

That, in a nutshell, is the Cadillac Tax. Six pages out of a 906 page-long bill describe the limitations above which a tax kicks in, who pays, how much, what plans are affected, and exceptions to these rules. While the details are numerous and complex, the IRS and Treasury department have argued that certain aspects of the tax still remain unclear, such as (1) how does an employer determine that the majority of its employees are engaged in a high-risk profession? And (2) why were tax thresholds originally adjusted for only 17 of the highest-cost states? Furthermore, many employers and unions are opposed to tax thresholds being indexed to CPI, and they believe that tax thresholds need improved adjustment for age, profession, and geographic region.

In the next section of this paper, I discuss the Cadillac Tax’s success in terms of solving the tax exclusion’s inefficiencies and inequities; I also discuss which of the tax’s features can be improved upon to better serve its goals.

ECONOMIC IMPLICATIONS OF THE CADILLAC TAX

On October 1, 2015, 101 economists signed a letter urging Congress “to take no action to weaken, delay, or reduce the Cadillac Tax.” The following day in a New York Times op-ed, Dr. Ezekiel Emanuel declared that eliminating or postponing the Cadillac Tax would be a “big mistake.” In another New York Times op-ed later that month, economist Larry Summers said on
behalf of his colleagues - “We agree on one thing: The excise tax on high-cost health care plans, the so-called Cadillac Tax, is good policy.”

What made the Cadillac Tax so appealing to these authors? Arguments in favor of the tax consistently cite its two main goals: (1) to finance spending for expanding health insurance coverage under the Affordable Care Act (ACA), and (2) to slow the rate at which health care costs are growing in the economy. But there two less significant goals as well: (1) to more evenly provide financial assistance between high-income consumers and low-income consumers (who need more assistance affording health insurance), and (2) to weaken the incidence and strength of job lock.

As mentioned previously, the health insurance tax exclusion is the single largest tax break in the United States. A removal of the exclusion for high-cost “Cadillac” plans will generate revenue that can be used to finance the ACA’s spending programs. Here are some numbers to put this into context.

The CBO originally projected the ACA to cost more than $900 billion between 2010 – 2019. This estimate was later revised to $1.4 trillion between 2017 - 2026. As for the Cadillac Tax, the CBO had originally estimated the tax to bring in $32 billion of revenue between 2010 – 2019, assuming the tax would be implemented in 2013. When the implementation date was later pushed back to 2018, the CBO’s May 2013 report estimated projected revenue of $80 billion between 2013 – 2023, and in its March 2015 report estimated projected revenue of $87 billion between 2016 – 2025. A more recent March 2016 CBO report, accounting for the further delay in implementation until 2020, estimates $78 billion of projected revenue between 2017 – 2026.

These numbers indicate that the Cadillac Tax will indeed provide billions of dollars in revenue that can be used to help finance the ACA’s spending programs. These numbers also indicate, however, that the expected revenue from the tax is not nearly enough to entirely finance
the ACA. This point provides a great illustration as to how limiting the tax exclusion is not nearly as effective as completely removing the exclusion for generating revenue, and moreover how delaying the tax’s implementation date and raising the tax thresholds yielded a less-effective policy for generating revenue. For example, completely removing the tax exclusion would have brought in revenue of $266 billion in 2016 and $3.6 trillion over the next decade. Additionally, the earlier version of the Cadillac Tax drafted by the Senate Finance Committee and White House economic team had been expected to bring in $110 billion in revenue.

There are several mechanisms by which the tax will generate revenue – both directly and indirectly, and in both the short-run and the long-run. The most direct way for generating tax revenue will be from employers who pay insurance premiums that exceed the annual threshold. In the short run, the revenue accumulation from this source is not expected to be high, because premiums for the majority of employer-sponsored plans are below the initial tax threshold. In fact, the Treasury Department’s Office of Tax Analysis (OTA) estimates that only 7% of plans will be subject to the tax in 2020, assuming employers will not adjust their plans to avoid paying the tax between now and then.

In the long run, however, the revenue generated from the tax is expected to be much higher because the tax thresholds are adjusted yearly by the consumer price index (CPI), which normally rises at a slower rate than medical inflation. To put this into perspective, the CBO projects CPI to grow at a rate of 2.4% per year beginning in 2019, while health insurance premiums are expected to grow between 4 and 7%. Therefore, an increasing percentage of plans will have premiums that exceed the threshold each year. Economists find this feature of the Cadillac Tax - adjusting by CPI - appealing because it will generate more revenue to finance the ACA’s spending programs than what otherwise would be generated if adjusting by the medical services inflation rate.
In contrast, skeptics oppose adjusting the Cadillac Tax by CPI. Their argument can be summed up with the following quote - “The ‘Cadillac’ Tax could become a ‘Chevy’ tax over time.”

“Cadillac” health plans have been so-named for the very generous benefits that typically highly-paid workers enjoy as a part of their fringe benefits. However, as medical care inflation proceeds apace, more and more plans will reach the tax threshold every year. The CBO projects that 31 million workers’ plans will be subject to taxation within 3 years of the Cadillac Tax’s implementation, and the Joint Committee on Taxation (JCT) projects that plans for one fifth of all households earning $50,000 - $75,000 annually will be subject to taxation within six years of its implementation; these households can hardly be deemed wealthy. With time, millions of middle-class policyholders’ plans will become subject to taxation, even while their benefits are not as generous as those enjoyed by more generously compensated workers.

While removing the tax exclusion will directly generate revenue from the Cadillac Tax itself – less than 18%, according to the JCT - economists believe that most of the revenue will be generated over the long run as employers shift their total compensation packages away from health insurance fringe benefits and toward higher wages. Economists expect resulting wage increases to be sizable. According to Jason Furman, Chairman of Obama’s Council of Economic Advisors, total wages are expected to increase by $45 billion per year by 2025. In a separate report, the CBO estimates total wages to increase by $50 billion per year by 2026. This impact is double the value of what the CBO predicts if the minimum wage were to increase from $7.25 to $10.10 per hour by 2025. And, of course, as wages increase, greater tax revenue will be generated via additional income and payroll taxes.

This focus on the long run is important. Many employers do not yet know what they will eventually do when the tax is implemented. If they do respond by reducing health insurance
benefits, will it be that they pocket the savings rather than keep total compensation the same in the form of higher wages? According to most economists, this is highly unlikely because labor compensation is set via supply and demand in the long run. Any employer who attempts to pay workers less than the market price of their labor will have trouble retaining high-quality workers and finding new ones to take their place.

Employers may not be as eager as economists predict to offer higher wages. As Larry Cohen, president of the Communications Workers of America notes, “In the real world, companies cut costs and they pocket the money. Executives tell shareholders: ‘Hey, higher profits without any revenue growth. Great!’” Additionally, a Mercer survey of 465 employers who sponsor health insurance plans found that only 16% say they would pass on savings from a reduction in health benefits toward higher wages.

On an additional note, critics find the Cadillac Tax flawed because of uncertainty concerning if, and by how much, employers will raise wages when they cut health insurance benefits. If wages do not increase by the amount projected by the CBO and JCT, then there will be lower than expected tax revenue to finance the ACA’s spending programs and employees will receive smaller total compensation packages. Even if wages increase by the same amount as health insurance benefits decrease, employees will receive smaller total compensation packages because a greater proportion of their earnings will be subject to taxation. Only time will tell to see how readily employers will respond to switch their forms of compensation.

The other main objective of the Cadillac Tax is to make the health care system more efficient, that is, to reduce the system’s exceedingly high costs. If the traditional tax exclusion encourages greater demand for comprehensive health insurance benefits and promotes the overconsumption of medical care, then a tax on “excessively generous” benefits may induce
consumers to be more cost-conscious in deciding to purchase medical care. When employers switch to sponsoring less generous health insurance plans to avoid paying the tax, employees will experience higher out-of-pocket costs for their medical care.

While the Cadillac Tax should induce consumers to be more cost conscious with their decisions to purchase health insurance, the tax thresholds are not set at levels to which this effect would be strongest. According to Alain Enthoven, Emeritus Professor of Economics at Stanford University, the limit on tax-free employer-sponsored health insurance benefits should be set at 80% of the average premium level in a region. As explained earlier in relation to Clinton’s managed competition proposal, a tax threshold set at this level would translate into the exclusion being applicable only up to the premium level of a basic plan in a region.

How do the Cadillac Tax thresholds compare to the thresholds proposed by Enthoven? The CBO has estimated that the average premiums among all employment-sponsored plans will be around $10,000 for single coverage and around $24,500 for family coverage in the year 2025. If Enthoven’s 80% threshold is applied to these premiums, then the amount of tax-free benefits should be $8,000 for individual coverage and $19,600 for family coverage. However, in 2020, the Cadillac Tax thresholds will be $10,200 for individual coverage and $27,500 for family coverage. By 2025, these thresholds should be even higher after adjustments by CPI. Therefore, the Cadillac Tax allows employees to receive a greater amount of tax-free benefits than what they otherwise would under Enthoven’s proposed efficiency criteria.

To conclude, the Cadillac Tax will create a more-equal system of distributing the tax burden between rich and poor. With the elimination of the tax exclusion on high-cost plans, high-income workers will one way or another end up paying higher taxes on their earnings; this may either be through their receiving a greater share of earnings as taxable income or lower wages and
salaries because their employers are now bearing additional cost of providing overly generous health insurance coverage. Finally, the Cadillac Tax may weaken the incidence and strength of job lock.

The Cadillac Tax solves to a limited extent the inefficiencies and inequities associated with the existing tax exclusion. But the Cadillac Tax could be even more successful at obtaining its objectives, and there are certain features like adjustments to CPI that are strongly disliked by certain interest groups. Several Republican proposals to replace the ACA include policies similar to the Cadillac Tax. In fact, the House Ways and Means Committee’s recently unveiled “American Health Care Act” (AHCA) would retain the Cadillac Tax, but delay its implementation date. What will the tax exclusion look like under this plan?

A “CADILLAC TAX” IN REPUBLICAN REPLACEMENT PLAN PROPOSALS

Few legislative efforts in U.S. history have ever created more partisan division than the ACA. Not only did it pass while receiving zero Republican votes; Republicans have pledged to repeal and replace the ACA ever since. Numerous competing plans to replace the ACA have been proposed, both during Barack Obama’s presidency and during the new Trump presidency. Comparing these plans offers an opportunity to learn about differences in Republican’s opinions regarding how to limit the tax exclusion of health insurance benefits. Because it would be lengthy and somewhat redundant to analyze proposed limitations on the tax exclusion in every Republican replacement plan, this section examines only the American Health Care Act (AHCA), which almost came to vote in the House, as well as two others that have also gained some attention and support.
When Georgia Representative Tom Price became the new HHS Secretary in the Trump administration, it was widely thought that an eventual Republican-endorsed ACA replacement plan would include policies from Price’s plan. Proposed in May 2015, Price’s “Empowering Patients First Act,” called for the repeal of the ACA’s Cadillac Tax.\textsuperscript{59} In its place, the tax exclusion on employer-sponsored health insurance benefits would be capped at $8,000 for individual coverage and $20,000 for family coverage. These annual limitations would be indexed by CPI and would not be adjusted for age or geography.

A different plan proposed in January 2017 by the House Republican Study Committee - a group of 172 conservative House Republicans – was even more likely to contain policies that would be in an eventual Republican-endorsed ACA replacement plan. Named the “American Health Care Reform Act (AHCRA),” this plan also called for an entire repeal of the ACA’s Cadillac Tax.\textsuperscript{60} In its place, the tax exclusion on employer-sponsored health insurance benefits would be capped at $7,500 for individual coverage and $20,500 for family coverage. These annual limitations would also be indexed to CPI, and would not be adjusted for age or geography. This new tax exclusion limit would have been termed the name, “standard deduction for health insurance (SDHI).”

In each of these plans, the annual limitations would be lower than those set by the Cadillac Tax. This would imply that these policies might better solve inefficiencies associated with the tax exclusion;\textsuperscript{61} that is, (1) greater government revenue would be collected, as either more plans exceed the annual limitations or employers reallocate total compensation toward wages and away from health insurance, and/or (2) consumers might become more cost-conscious when purchasing health insurance. The adjustment of limitation caps by CPI would be the same as for the Cadillac Tax. From a public opinion standpoint, this feature would remain unpopular as an increasing
number of plans (whose benefits don’t change) would become subject to taxation every year. Annual limitations that are not adjusted for the average age of an employer’s workforce would contradict those for the Cadillac Tax. This would likely garner public backlash because age adjustment is a popular Cadillac Tax provision. The failure to adjust caps for regional cost-of-living differences would mimic the ACA’s Cadillac Tax and would remain an unpopular policy.

So, what eventually became the Republican replacement plan that emerged from the House Ways and Means Committee? The American Health Care Act (AHCA) brought to the floor of the House on March 6, 2017 quickly became endorsed by Tom Price, Speaker of the House Paul Ryan, and President Trump.\(^6^2\) In a dramatic shift from previous Republican proposals, the AHCA would not have repealed the ACA’s Cadillac Tax. Rather, it would only have changed the tax’s implementation date from 2020 to 2025.

That Republicans would keep a tax on high-value employer-sponsored health insurance benefits suggest broad support for this policy, at least in Congress if not among the general public. The AHCA’s adoption of the Cadillac Tax specifications in the ACA demonstrates this policy may have been better designed than previously thought. At the same time, though, delaying implementation of the Cadillac Tax even farther into the future would delay the increased government revenue to be expected from the tax and also delay its cost-control benefits as well.

**A NEED FOR TAX CREDITS**

The present subsidization of employer-sponsored health insurance in the United States is through a tax exclusion that possesses several inefficiencies and inequities; that is, it weakens consumer cost consciousness, benefits the rich more than the poor, reinforces job lock, and costs
the government a lot of lost revenue. This suggests that it would be beneficial to move toward a
different method of subsidizing health insurance. To pursue this change in a politically feasible
way would require establishing two complementary policies. The first would be to establish a
policy, like the Cadillac Tax, which serves to transition away from the wholesale tax excludability
of health insurance. The second would be to establish tax credits to help people purchase health
insurance in the non-group market.

The reasoning for establishing tax credits is more economics-driven than for establishing
the tax exclusion, which was largely driven by labor relations and wage controls. When insurance
companies cannot charge differential premiums based on health status, yet people are neither
required by the government to purchase health insurance nor provided with government subsidies
to help them afford it, the health insurance market breaks down as a result of minimal enrollment
and extremely high premiums.

For example, prior to the Affordable Care Act, insurance companies in most states could
charge higher premiums to people who were deemed having a pre-existing condition because they
are more expensive to cover. However, Chapter 501 of the Laws of 1992 required insurance
companies in New York state to charge all enrollees the same premium price regardless of how
sick or healthy they were, called community rating. Also, the New York law did not require
citizens to purchase health insurance, and for those who did, the state did not provide any income-
related tax credits. The result: premiums skyrocketed. In 2009, they reached an average cost of
$6,630, more than $1,000 higher than any other state in the country. Additionally, the 2009
uninsured rate was roughly 13%, or 2.2 million New Yorkers.

The above effects can hardly be surprising, because they are the result of individuals
behaving as rational decision makers. The decision to purchase health insurance involves weighing
the benefits of possessing it against the costs of acquiring it. A rational decision maker would purchase health insurance if its benefits outweigh its costs, such as if one is sick and expecting large medical costs during the year. On the contrary, if someone is relatively healthy and expects few or no medical costs, it would be rational for them to choose to forgo insurance.

Without tax credits or an individual mandate to incentivize or compel the healthy to sign up, adverse selection occurs, when many healthy people choose to forgo insurance. Thus, insurance companies are left with covering a sicker and hence more expensive population. When there is a community rating requirement, insurance companies must charge higher premiums to everybody to cover the high costs of the sicker enrollees. This can eventually lead to a “death spiral,” where higher premiums lead more healthy people to cancel their coverage, causing premiums to rise further.

The absence of an individual mandate or tax credits may also exacerbate what economists call the “free-rider problem.” Because emergency medical care in the United States is characterized by the inability to exclude nonpayers, called non-excludability, hospitals are required to treat anyone who comes to the emergency room. If patients become seriously ill quickly and cannot afford to pay out-of-pocket for all of the costs of care, they can get a “free ride” for some of the services they receive. This problem is evident in the fact that since 2000 hospitals have provided more than $538 billion in uncompensated care to their patients.

These problems demonstrate that, in the existence of a community rating requirement, the healthy must be compelled or incentivized by the government to purchase health insurance in order for premiums to remain at affordable levels. In 2014, a nation-wide community rating requirement was implemented under the Affordable Care Act (ACA). The ACA also enacted an individual mandate, which requires anyone who chooses to forgo purchasing health insurance to pay a tax
penalty for whichever is greater of 2.5% of household income or $695 per year (indexed by inflation).\(^6^9\) Lastly, the ACA established tax credits to help people purchase health insurance in the non-group market.

In the next part of this paper, I will analyze the Affordable Care Act’s tax credit as to its effects on insurance premiums and coverage. I will also discuss the economic implications of repealing and replacing the Affordable Care Act’s tax credit, which is a discussion that has gained significant press ever since the election of President Trump. But before I talk about consequences of tax credits in the Affordable Care Act and in Republican replacement proposals, it will be useful to provide a general outline of the different forms that such tax credits may assume, which in turn have different implications concerning whose health insurance is subsidized and to what extent.

**FEATURES OF TAX CREDITS**

First, tax credits can either be advanceable or non-advanceable. An advanceable tax credit can be collected by the policyholder before taxes are filed at year’s end; non-advanceable tax credits can only be collected at tax filing. The advantage of an advanceable tax credit is that enrollees receive it when they need it most; it encourages the participation of those who may not be able to pay for insurance up front.\(^7^0\) This feature of tax credits has been popular with the public. For example, 85% of enrollees with tax credit subsidies in 2014 reported that they would not have been able to afford their insurance premiums without advanceable tax credits.\(^7^1\) A drawback of an advanceable tax credit, however, is that the calculation of its proper amount is highly subject to error, which imposes significant costs on both the IRS and to enrollees. Here is how this works.\(^7^2\)
An enrollee submits a form to the IRS at the beginning of the year indicating his/her projected yearly income. The IRS then notifies the enrollee of his/her tax credit eligibility and the enrollee informs the IRS his/her choice of insurer, after which the IRS pays the tax credit to the insurer. If at year’s end the enrollee earned more than initially estimated, then he/she would be responsible to pay the difference to the IRS. If instead at year’s end the enrollee earned less than estimated, then he/she would receive a refund of the difference. This process, where payments are made at year’s end to account for tax credit calculation errors is called reconciliation.

Data from 2014 show that 92% of enrollees who received advanceable tax credits did not receive the correct amount.\(^73\) 50% took more than they were eligible for, with an average repayment of $860 per year; 41% took less than they were eligible for, with an average refund of $640 per year.\(^74\) Only 8% of enrollees received just the right amount and so were not required to make a repayment or entitled to a refund. This implies that it is challenging to make an accurate prediction of income, which is somewhat to be expected because people eligible for tax credits are often self-employed, work part-time, or have seasonal jobs. Income from these types of jobs is unpredictable and likely to change during the year.\(^73\)

Another challenge is that employees are obliged to report changes in income within 30 days of such changes. However, surveys indicate some enrollees may not be aware of this requirement; Enroll America in 2015 reported that 40% of enrollees were initially unaware that they would have to report income changes and thus could become subject to repayment or a refund.\(^75\) Additionally, there are transactions costs associated with reconciliation - mainly time and inconvenience - as enrollees might have to wait for weeks for the IRS to process their information.

Given the threat of having to make a repayment and the transactions costs associated with reconciliation, why don’t more enrollees choose to receive some of their tax credit in advance and
the remaining amount at year’s end? This approach would likely result in more accurate tax credit payments compared to receiving one full lump sum in advance. The field of behavioral economics offers an explanation as to how consumers use biases and rules of thumb, called heuristics, to make decisions concerning distribution of their tax credit – decisions which may deviate from rational behavior.73

First is a heuristic called “status quo bias,” which is a preference for accepting the default choice.73 In most exchanges, including the federal exchange, the full amount of an enrollee’s tax credit is applied to a plan in advance by default.76 Enrollees are allowed to change this amount, but most opt to not do so. Why is this the case? Human decision-making is divided between two systems.77 System I is automatic, intuitive, and unconscious thinking. It uses heuristics to make decisions quickly and is what we use to make decisions most of the time. System II more closely resembles the rational decision-maker: slow, effortful, conscious thinking that weighs all information available before making a decision. System II requires higher cognitive resources, so we use System II infrequently.78 Because enrollees must use system II thinking to request anything but the full value of tax credit, enrollees are more likely to stick with the default full value of tax credit.

Another issue is raised by “prospect theory,” which says that people are risk-seeking when faced with losses.73 The decision to designate one’s tax credit as advanceable or not can be thought of as a choice between two alternatives: 1) taking less than one’s projected full credit involves an expected loss each month; 2) taking the full amount of the projected credit involves a risk of “losing” a lump sum amount at year’s end in the form of reconciliation repayments. Prospect theory says that most people will prefer the latter choice;77 that is, most enrollees would prefer to
receive the full amount of their tax credit in advance, even though they run the risk of having to make a repayment in the future.

Risk-seeking behavior can also be explained by framing choice of tax credits in terms of rewards instead of losses.\textsuperscript{73} The heuristic called hyperbolic discounting says that people overvalue immediate rewards and undervalue future rewards.\textsuperscript{79} In other words, enrollees are likely to place a higher value on receiving a given tax credit in advance rather than waiting to receive it at year’s end, even though reconciliation ensures the amount of tax credit is equal in both circumstances.

A final explanation of enrollees’ preference for advance tax credits is that the application process can lead to decision fatigue.\textsuperscript{73} For instance, choosing the amount of the tax credit to take in advance is the last decision a consumer makes on his/her application, after having chosen an insurance plan. In 2014, consumers were offered an average of 30 health plans from three insurers, where each plan varied by benefits coverage, network, premiums, deductibles, etc.\textsuperscript{80} While greater information and a high number of choices may seem to benefit enrollees’ decision-making, it can also decrease social welfare by overwhelming enrollees.

Given consumers’ preferences for advanceable tax credits, there are a couple policy options that can eliminate the negative consequences of reconciliation.\textsuperscript{73} This would be desirable to improve consumers’ experience with the exchanges and ultimately increase health insurance coverage. One policy is to calculate tax credits using current income, rather than projected income, and adjust amounts throughout the year as income changes. This would be like how eligibility is determined for the SNAP and Medicaid programs. Reconciliation would be eliminated because enrollees would know their income at the time tax credits are calculated. The only downside is that enrollees would have to report even slight changes in income, which is a burdensome task for those with jobs that have variable hours, such as seasonal workers.
Another policy is to calculate the tax credit using the enrollee’s income from the previous year. Medicare uses a similar method for determining eligibility. This policy would be most ideal for eliminating the transactions costs associated with reconciliation. However, enrollees whose income falls would receive smaller tax credits than what their current income calls for.

If not eliminating reconciliation altogether, measures can be taken to reduce the burdens of having to make a repayment at the end of the year. This is the approach the ACA has taken, by setting a cap on the amount of reconciliation for households with incomes below a certain threshold. When the ACA was originally drafted, these caps were set at $250 for singles and $400 for families for all households with incomes up to 500% FPL. But, these caps and the income threshold were deemed too “generous,” as they created an incentive for households to intentionally underestimate their incomes so that they would be able to retain some unwarranted advanced credits. Currently, these caps are set at higher values on a scaled-income structure, and the income threshold is lower as well (Table 1). In 2014, 463,000 enrollees - 1/4 quarter of those who had overestimated their income - reached a repayment cap. The caps prevented repayment of $394 million back to the federal government, which was an average of $851 per enrollee who reached a cap.

Because the ACA allows enrollees to retain some excess credit beyond what their actual income qualifies them for, these tax credits are referred to as refundable tax credits. In contrast, a non-refundable tax credit requires enrollees to pay back to the federal government any and all excess amounts.

Tax credits for buying health insurance may be income-based or age-based. An income-based tax credit means that enrollees making very little income would receive a large tax credit amount, which would decrease as their income rises. Once income hits a certain level, an enrollee...
would not be eligible for any amount of tax credit. The idea behind this is that government financial assistance should be allocated to enrollees who have lower incomes and are least able to afford health insurance. In contrast, an age-based tax credit means that younger enrollees receive smaller tax credits, while older enrollees receive larger ones. The idea behind this is that older people tend to have higher medical bills, which insurers make up for by charging them higher premiums. Older people, then, require greater financial assistance to afford higher premiums.

Both income-based tax credits and age-based tax credits have the goal of making health insurance coverage more affordable and ultimately decreasing the number of uninsured. But, the two tax credits differ with respect to aiding different subsets of the population. In order to say which type of tax credit is better targeted at reducing the number of uninsured, it is necessary to know the makeup of the uninsured population.

Recent data indicate that a larger proportion of younger people than older people are uninsured (Table 2). For instance, in 2015, 17.9% of Americans between 26-34 years of age were uninsured, while this was the case for only 8.8% of Americans between 45-64 years of age. There are a couple of explanation for why this is the case. One, younger people may purposefully choose to forgo insurance, thinking that they are healthy and will have fewer medical costs. Two, younger people may occupy more entry level jobs that offer low incomes and/or do not sponsor health insurance, and so cannot afford to purchase health insurance on their own. This suggests that a tax credit policy targeted toward younger people could be more effective at lowering the uninsured rate.

Recent data also indicate that a larger proportion of lower-income people are uninsured compared to higher-income people (Table 3). For instance, in 2015, 9.8% of Americans in the 200-299% FPL category were uninsured, while this was the case for only 4.5% of Americans in
the 400% and above FPL category. This suggests that an income-based tax credit that provides greater financial assistance to lower-income people could be a more effective policy at lowering the uninsurance rate.

If income-based tax credits seem like a better policy to reduce the uninsurance rate, then what would be advantages of moving toward an age-based tax credit? For one, if the tax credit is refundable, reconciliation burdens would be greatly reduced if not eliminated. With an income adjustment, enrollment becomes burdensome and complicated. But with an age adjustment, administration becomes a whole lot simpler.82

Furthermore, income-adjusted tax credits create a small, but significant, disincentive to work.86 If someone is at a certain level of income and earns just a few dollars more, their net benefits may actually go down if those few dollars are less than the amount they would have qualified for in tax credits. It would be in this person’s best interest to work less and earn less income, which would qualify them for the more generous subsidy. Harvard University health economist Kate Baicker, who was a member of President George W. Bush's Council of Economic Advisers from 2005 to 2007, refers to this phenomenon the following way: “when you expand a program where eligibility is based on income, that means if people increase their income, they could lose eligibility. That may create a disincentive to find a job.”86 Alain Enthoven offers another explanation to account for this: “as you phase out the subsidy with rising income, it becomes a very high implicit marginal tax rate. We refer to this as a poverty trap.”87

Some economic studies have found evidence of work disincentives related to income-based compensation programs. One study conducted by health economist Craig Garthwaite of Northwestern University's Kellogg School of Business, looked at the employment effects of Tennessee’s having ended Medicaid coverage for 170,000 low-income adults in 2005.88
Garthwaite found that Google searches for "job openings" increased in Tennessee, the state’s employment rate began to rise, and people were looking for jobs that are more likely to provide health insurance benefits. According to Garthwaite, "We find that about half of these people enter the labor force and enter it in a way where they're working more than 20 hours a week. This suggests they were looking for health insurance." But, according to labor economist Tom DeLeire at Georgetown University, “while studies suggest there's at least some people whose primary motivation to get a job is health insurance, none show conclusively that losing coverage is the reason people are entering the labor force.” That is because it is tough to determine how many people keep their jobs solely for the health insurance benefits they provide, or how many would leave their jobs only if they had access to affordable health coverage elsewhere.

Is it a bad thing for those in the labor market to either cut back their hours or drop out altogether if doing so makes them eligible for more generous tax credits or for Medicaid? According to Garthwaite, “Economists don't like the idea of the labor force shrinking because of the risk of slower economic growth. However, many economists don't like the idea of tethering insurance access to employment either; it's pretty bizarre to have a product where employment is a precondition for purchase. I’d say people exiting the labor force reflects their preferences, and we're removing an inefficiency that stood in the way.” DeLeire offers a related opinion: "If workers are choosing to work less because they're getting health insurance from Medicaid or the exchanges, it likely means they're better off doing that."

This wraps up my discussion of the different features of tax credits. They can either be advanceable or non-advanceable, which introduces a conflict between payment accuracy and exchange participation. They can either be refundable or non-refundable, which presents varying degrees of reconciliation burdens. And they can either be age-based or income-based, which have
different implications regarding health insurance coverage and employment. As will be mentioned in the following section, tax credits have evolved throughout the years of U.S. health care reform toward a structure that is advanceable, refundable, and based on income.

**PREVIOUS FORMS OF TAX CREDITS**

The idea of providing tax credits to subsidize the purchase of health insurance was not new to the Affordable Care Act. Several calls for tax credits have been proposed throughout the past in debates over how to reform the U.S. health care system. This section describes some of those proposals.

The American Medical Association (AMA) proposed a health plan to Congress in 1971 (which was never enacted). This plan, termed “Medicredit,” called for the government to provide a sliding-scale tax credit based on income, but available only for purchasing catastrophic health insurance. Interestingly, the rich would have been eligible for this tax credit; 10% of the premium for such coverage would have been subsidized for everyone with a tax liability of $891 (in 1971 dollars) or greater. As people’s tax liability decreased, they would become eligible for larger subsidies.

The Omnibus Budget Reconciliation Act of 1990 enacted a flat (non-sliding scale), non-advanceable, refundable Health Insurance Tax Credit (HITC) to the already-in-place Earned Income Tax Credit (EITC). Those eligible for HITC included EITC-eligible households (based on household income and qualifying children) who purchased health insurance plans for themselves and their children. This credit, worth $428 in 1991, could be used in both the employer-
sponsored market and the private nongroup market. But, there was little participation in this program. Therefore, the 1993 Omnibus Budget Reconciliation Act repealed this tax credit.

President George W. Bush oversaw the development of two major health insurance tax subsidies. The first, called a Health Care Tax Credit (HCTC), was implemented as part of the Trade Act of 2002. Eligibility for the HCTC was limited to two categories of people: (1) past-workers in the manufacturing, service, and public agency sectors who had lost their jobs due to foreign trade and were eligible for Trade Adjustment Assistance (TAA), and (2) retirees (individuals aged 55-64) whose pension plans were taken over by the Pension Benefit Guaranty Corporation (PBGC) due to financial distress. The HCTC was advanceable and refundable. Additionally, the HCTC could only be applied to qualified health insurance plans. The original value of the HCTC was set at a flat rate covering 65% of premium costs, but Public Law 112-40 in October 2011 raised its value to cover 72.5% of premium costs. On January 1, 2014, the HCTC was terminated due to lack of participation; fewer than 30,000 persons had utilized this program out of hundreds of thousands of eligible persons.

During his State of the Union address in 2007, Bush proposed a tax deduction worth $7,500 for individuals and $15,000 for families that would replace the tax-free limit on employer-sponsored health insurance benefits. This tax deduction would apply to the non-group market as well. The goal was to equalize benefits, in terms of tax breaks, between those purchasing health insurance in the employer and non-group markets. Another feature of this tax deduction was that it could be used by individuals and families at all income levels; an individual making $85,000 would receive the same $7,500 tax deduction as someone making $40,000. One last feature of this tax deduction was that it would still be deductible in full even if individuals spent less to purchase
his/her health insurance plan (e.g., if an individual’s health insurance plan cost $5,000 in premiums, he/she could still take the $7,500 deduction).

While Bush’s proposal was never enacted, it set the tone for the discussion about health insurance tax subsidies during the 2008 Presidential election. Republican nominee John McCain proposed a flat, refundable tax credit worth $2,500 per individual and $5,000 per family, indexed annually to inflation. Similar to Bush’s tax deduction, individuals and families of all incomes would have been eligible for this tax credit. And also like Bush’s tax deduction, McCain’s tax credit would have applied to both the private nongroup market as well as the employer market, thus replacing the tax exclusion.

In contrast, Democratic presidential nominee Barack Obama campaigned to enact health care without establishing new taxes (which eliminating the tax exclusion would have done so). In fact, Obama spent over $100 million on advertisements attacking John McCain for his proposal. Obama also criticized McCain’s tax credits for not being as generous as they should be. On this note, Obama proposed the advanced premium tax credit (APTC) that is currently in the ACA. The next section of this paper details what the APTC looks like.

**TAX CREDITS IN THE ACA**

Title I, Subtitle E, Part I (pg. 95-119) of the ACA entails the official designation of an advanced premium tax credit (APTC). This section is quite a bit longer than that for the Cadillac Tax, comprising roughly 25 pages out of the 906-page bill. The following is a summary of the APTC’s features.
The APTC may only be applied to health insurance plans offered through an “exchange,” a government sponsored market for health insurance, originally introduced by Massachusetts in 2006. The ACA established exchanges in all 50 states where people, now mandated to have health insurance, can shop for and enroll in such coverage. In 2017, 11 states plus the District of Columbia operate their own exchanges, while the federal government operates an exchange for the remaining 39 states. By logging onto health care.gov, potential enrollees can view all of the health insurers, plans offered, benefits covered, and plan expenses specific to their geographic area; information is specifically tailored to the individual after he/she enters basic information such as age, income, employment status, etc. Lisa Kaplan Howe, the policy director for New Hampshire Voices for Health, describes the exchange site as follows: “I’ve heard people compare it to Expedia or Travelocity. You can do an apples to apples comparison of premiums and benefits, and for the first time have all the information laid out in one place to purchase something to suit your needs.” In each exchange, plans are separated into four “metallic” levels – Bronze, Silver, Gold, and Platinum – based on their coverage benefits, premiums, and projected out-of-pocket costs. Bronze plans have the least generous benefits, lowest premiums, and highest out-of-pocket costs, while platinum plans are the exact opposite.

To become eligible for a tax credit, a marketplace enrollee must satisfy several criteria. One, the enrollee must not have access to affordable, minimum-value coverage sponsored by an employer. In the original version of the ACA, the definition of affordable coverage meant that an employee’s contribution could not exceed 9.80% of household income. The IRS, which has since adjusted this value, set it at 9.69% for the 2017 plan year. The ACA defines a minimum-value plan as having an actuarial value of 60% or greater, meaning that the plan must cover at least 60% of expected total allowed costs for covered benefits; such coverage is equivalent to a Bronze plan.
An employee whose employer-sponsored plan requires a contribution exceeding 9.69% of household income and/or covers less than 60% of expected total allowed costs for covered benefits is eligible for a tax credit.

The second criteria for determining APTC eligibility is that an enrollee must not be eligible for other qualifying forms of health insurance coverage, like Medicare and Medicaid. Third, if an enrollee is married, he/she must file taxes jointly rather than separately. The enrollee also cannot not be claimed as a dependent by another person. Fourth, the enrollee must be a U.S. citizen or an immigrant lawfully present in the United States whose household income must be no greater than 100% of the federal poverty level (FPL) and who is not eligible for Medicaid.

Finally, households with modified adjusted gross income (MAGI) at or above 100% FPL and at or below 400% FPL may qualify for APTC. Eligibility is determined using projected income, rather than current or past year’s income. MAGI is equal to adjusted gross income (e.g., wages, salaries, ordinary dividends, capital gain) plus any excluded income (e.g., nontaxable Social Security benefits, foreign earned income, tax-exempt interest). Income levels vary per FPL category according to household size. For example, in 2017, 100% FPL for a one-person household is $11,880; for a family of four it is $24,300. The upper limit (400% FPL) for a one-person household is $47,550; for a family of four it is $97,200. Table 4 displays income levels for determining FPL categories for several household sizes.

To calculate the tax credit a household receives, the ACA sets a percentage of income limit on households, called expected contribution, for spending on the monthly premium of a “benchmark” plan. Expected contributions are quantified on a sliding scale based on FPL category, shown in Table 5 for the 2016 and 2017 plan years; as income grows, the expected contribution (as a percentage of income) grows along with it. The “benchmark” plan is the second-
lowest cost Silver plan available in the local exchange, whether it be state-or-federally-run. If the cost of the second-lowest cost Silver plan is greater than a household’s total expected contribution, then the household is entitled to a credit that makes up the difference (i.e. $\text{APTC} = \text{Second Lowest Cost Silver Plan Premium} - \text{Household Expected Contribution}$). Therefore, the amount of APTC a household is eligible for depends on three factors: 1) Household size, (2) household income, and (3) the average price of the second-lowest cost Silver plan in a household’s exchange.

For example, suppose a family of five meets all of the APTC eligibility criteria mentioned above. Their projected household income in 2017 is $71,100, which puts them at 250% FPL. This means that their expected contribution is 8.21% of income, or about $486 per month (calculated as $71,100 income x 0.0821 x 1/12 months). If the cost of the second-lowest Silver plan in their exchange is $550 per month, then this household would be eligible for a tax credit of up to $64 per month. Since APTC is an advanceable tax credit, the family could take the $64 credit toward payment of each of the monthly premiums or they could choose to collect ($64 x 12 months) as a refund when filing tax returns at year’s end.

The next section of this paper analyzes the effects the ACA’s tax credits have had on the health insurance market, as well as the economic implications of eliminating them.

**EFFECTS OF ACA TAX CREDITS**

The APTC was carefully designed to include features so that tax credits would be utilized by millions of Americans to purchase “affordable” health insurance. After four years of data on how they have worked, there is wide consensus among policy experts that the tax credit system
has lived up to expectations. Below is a discussion of the APTC’s impact on the health insurance market.

In the first year of the ACA’s implementation, a total of 4,242,000 people nationwide enrolled in health insurance through the exchanges.\textsuperscript{104} Of this number, roughly 3,472,000 people (or 83\%) received some tax credit, ranging from as low as 35\% of enrollees in Hawaii to as high as 93\% in Mississippi. This value was the highest in Mississippi because it was one of the poorest states in 2014; about 53\% of its population had income between 200\% FPL and 400\% FPL.\textsuperscript{105}

For the 3,472,000 enrollees who got tax credits, the average value of financial assistance was $241 per month.\textsuperscript{104} There was a wide range of pay-outs on a state-by-state basis; the lowest average pay-out was $148 per month in Utah, while the highest average pay-out was $415 per month in Wyoming.\textsuperscript{104} Since APTC’s value depends on the second-lowest cost Silver plan in a Exchange, these discrepancies can be partly accounted for by varying premium levels across states. In Utah, the average second-lowest-cost Silver premium (before accounting for tax credits) was $243 per month, which was the lowest out of all states in the federally-run exchange in 2014. In contrast, in Wyoming, the average second-lowest cost Silver premium (before accounting for tax credits) was $536 per month, which was the highest out of all states in the federally-run exchange.\textsuperscript{106}

With almost 3.5 million enrollees receiving an average credit of about $240 per month, the federal government paid out approximately $10 billion in federal subsidies.\textsuperscript{104} Over half of this amount went to enrollees in five states – California, Florida, New York, North Carolina, and Texas – which had the largest number of enrollees.\textsuperscript{104}
These data demonstrate that the APTC instantly became a substantial program, with millions of people receiving billions of dollars-worth of subsidies. Interestingly, between March 1 and March 31 of 2014 (the final month of open enrollment, for which the statistics above do not account), an additional 3.8 million people enrolled in health insurance coverage through the exchanges; these ‘late’ enrollees accounted for 47% of the total of 8 million enrollees in the first open enrollment period. This last-minute enrollment surge occurred because people would not be allowed to enroll in the exchange and receive APTC benefits outside of the open enrollment period unless they had a qualifying event that allowed for special enrollment, such as changes in one’s household (e.g., having a child or getting married) or loss of employer or government sponsored health insurance. Former HHS Secretary Kathleen Sebelius claims that these late enrollments more accurately reflected enrollment trends than earlier enrollment because of the federal exchange’s initially problematic implementation.

Data for the entire open enrollment period indicate that 85% of the 8 million newly insured enrollees received some amount of tax credit. This figure suggests that the APTC had a substantial impact in reducing the uninsurance rate. In other words, many enrollees probably based their decisions to purchase health insurance only because of the financial assistance they now had access to. If this general hypothesis is valid, then how strong is the link between the availability of tax credits and the decision to purchase insurance?

The uninsurance rate was approximately 16% at the time the ACA passed in 2010. During the next several years, the uninsurance rate slowly and steadily declined, hitting 13.3% in 2013. In 2014, which was the first year of major reform implementation, the uninsurance rate dropped sharply to 10.4%, with 11,594,000 people becoming newly insured (Figure 1). This was
largely due to additional people purchasing private plans in the non-group market along with the expansion of Medicaid.

Eight million exchange enrollees constituted the bulk of this total newly insured group, and the majority of exchange enrollees received APTC; this shows that the largest proportion of the change in uninsurance rate was made up of people who received APTC. The largest declines in the uninsurance rate were found within APTC-eligible FPL levels: it dropped from 22.6% to 18.1% in the 100-199% FPL bracket, from 15.8% to 11.7% in the 200-299% FPL bracket, and from 10.3% to 8.4% in the 300-399% FPL bracket. In contrast, in non-APTC-eligible FPL brackets, such as at or above 400% FPL, the uninsurance rate had only dropped from 5.6% to 4.8%.

The above data support that the APTC may have had a large role in explaining the sharp decline in the uninsurance rate between 2013 and 2014. However, the individual mandate also began in 2014.

The individual mandate, also called a “Requirement to Maintain Minimum Essential Coverage,” is one of the ACA’s most controversial policies. In fact, a case arguing that the individual mandate is unconstitutional made it all the way to the Supreme Court, where it was upheld in June of 2012. The individual mandate requires all U.S. citizens and legal residents to have qualifying health insurance or to pay a tax penalty in choosing to forgo insurance. This penalty is currently equal to the greater of 2.5% of household income or $695 per year up to a maximum of three times that amount ($2,085) per household. In the first year of its implementation, this penalty was much lower – greater of $95 per year or 1.0% of household income – because it was phased in over three years.
Tax credits work in conjunction with the individual mandate to achieve the two goals of affordable premiums and lower uninsurance rates. Of course, the individual mandate lowers the uninsurance rate by mandating that everyone enroll in health insurance coverage. The individual mandate may also lower premiums by creating a larger risk pool of healthier enrollees. If the government mandates that everybody purchase health insurance, then it is only fair that the government also provides tax credits to those who cannot afford health insurance on their own. Because the APTC and individual mandate were designed to work together to achieve the same goals, it is unclear as to how much of an impact the APTC by itself actually had in reducing the uninsurance rate.

However, it is clear that the APTC achieved its goal of making health insurance more affordable. Using data from the entire first open enrollment period, the Department of Health and Human Services (HHS) estimated APTC’s effects on enrollees’ premiums in the 36 states that used the federally-run exchange. HHS found that premiums after reduction by APTC were, on average, 76% less than premiums paid by enrollees ineligible for tax credits. The tax credits helped many enrollees attain monthly premium levels of $150 or less. For example, 82% of selected plans had a net monthly premium of $150 or less (after APTC), 69% had a net monthly premium of $100 or less, and 46% had a net monthly premium of $50 or less. Compared to the average premium in the federally-run exchange of $346 before reduction by APTC, these premiums are substantially more affordable for low-income people.

This discussion has touched so far on performance standards on which the APTC did well during its first year of implementation. But not everything went well on the first run through. For example, only 21% of all those eligible for credits actually applied for and received them. This low take-up rate could have been because people did not know about APTC since it was a brand-
new program; or if they knew about it, then perhaps they did not know how to enroll. Take-up rates were higher in states that ran their own exchanges, particularly in California, Connecticut, Rhode Island, Vermont, and Washington; in these five states the take-up rate averaged 39%.104 This could have been due to the fact that states running their own exchanges devoted greater resources to advertising, outreach, and customer assistance with the federal grants they received. If all exchanges had enrolled their customers in APTC as well as the five most-successful state exchanges had, then an additional 3.1 million people would have received tax credits in 2014, accounting for an additional $8.6 billion in federal subsidies.104

Moving forward to today, the exchanges’ fourth open enrollment period between November 1, 2016 and January 31, 2017 has just recently closed. Data from this open enrollment period compared to that from the initial open enrollment period allows for an analysis of whether the ACA has continued to make health insurance more affordable and lower the uninsurance rate further.

Approximately 12.2 million people nationwide enrolled in the exchanges, of which 9.2 million registered with the federally-run exchange and 3 million registered in the 12 state-run Exchanges;114 this is a roughly 50% increase compared to enrollment figures from the first open enrollment period. Nearly 10.1 million enrollees (or 83%) received a tax credit.114 While millions more Americans are receiving tax credits today, this ratio is roughly equal to that from 2014. The percentage of enrollees receiving credits varied by state, from as low as 59% in New York to as high as 91% in Nebraska.114

HHS reported additional enrollment information for the federally-run exchanges.114 71% of enrollees (or roughly 6.5 million) had household incomes between 100-250% FPL, and another 17% of enrollees (or roughly 1.5 million) had household incomes between 251-400% FPL. The
proportion of those who received tax credits was 84% (roughly 7.75 million), which was almost identical to the national average. This discrepancy between 84% and the 88% who were within the FPL windows could be because some households with income between 100-138% of the FPL qualified for Medicaid in states that expanded coverage and hence did not enroll in coverage.

The average monthly value of APTC an enrollee received in the federally-run exchange was $383, which is significantly higher than it was in 2014.\textsuperscript{114} This means that APTC is now lowering monthly premiums by a larger amount. But does it mean that APTC is making health insurance more affordable than in previous years? In 2017, the average premium price after accounting for tax credits was $106 per month, which is roughly the same as in 2014.\textsuperscript{114} These data indicate that health insurance in the federally-run exchanges is, on average, about as affordable in 2017 as it was in 2014.

The above data also indicate that there may be some cause for concern going forward. Even though the APTC lowers monthly premiums paid for by enrollees, it does not slow the rate at which premiums are growing. Because the APTC’s value depends on two things – (1) premium prices and (2) income – as long as premiums rise faster than income, the value of APTC paid per enrollee will rise as well. This will put significant strain on the federal budget.

It makes some sense that these problems exist because the ACA’s first goal was to lower the uninsurance rate and to focus on managing the problem of financing health insurance coverage later. In fact, the uninsurance rate has been substantially lowered, having fallen to 8.8% in the first nine months of 2016,\textsuperscript{115} which is a bit more than 50% of what it was when the ACA was enacted in 2010. The Act’s emphasis on “coverage now, costs later” is why the individual mandate and tax credits were implemented in 2014, while the majority of revenue-generating policies, such as the Cadillac Tax, don’t start until 2020.
Rising premiums and growing tax credit obligations have led Republicans to call for “repealing and replacing” the ACA. During his presidential campaign, Donald Trump declared that “The rates are going sky-high. Repealing Obamacare is one of the single most important reasons that we must win on November 8th.” With Republicans now in control of both Congress and the Executive branch, there has been substantial discussion about how to replace the ACA with new legislation. The next section of this paper discusses economic implications of repealing the ACA, while the following section discusses different forms of tax credits that have been proposed in Republican replacement plans.

ECONOMIC IMPLICATIONS OF REPEALING ACA TAX CREDITS

Today, Republicans are in a position that they have sought to be in for years, with a majority in both houses of Congress and a Republican president, a position that should allow them to repeal and replace the ACA. But because Republicans do not have the necessary 60 Senate seats to defeat a potential filibuster, repeal of the ACA would most likely have to occur via the budget reconciliation process, meaning that a simple majority in the Senate can approve a House bill that restricts itself to budgetary matters.

Yet, there is no consensus among Republicans regarding what to replace the ACA with. Thus, in the months following the 2016 Presidential election, a substantial amount of literature emerged analyzing the implications of a policy that would repeal the ACA without replacing it with legislation that provides some kind of tax subsidies for purchasing health insurance. This section of the paper discusses some of that literature.
One approach to examining the implications of ACA repeal is to use, H.R. 3762, as a model. This bill, also called “Restoring Americans’ Health Care Freedom Reconciliation Act,” passed through Congress via the budget reconciliation process in 2015. But, it never became law after being vetoed by President Barack Obama, who insisted that the exchange markets would self-destruct with no replacement plan proposed in conjunction with H.R. 3762. Had this bill become law, it would have become effective in 2018, when the individual mandate would have been immediately eliminated, and with both the APTC and Medicaid expansion eliminated as of 2020.

At the request of Senate Minority Leader Chuck Schumer, who was concerned about the impact of repealing APTC as well as certain other ACA measures, the CBO in January 2017 conducted an analysis of what H.R. 3762’s impacts on the health insurance system would be. The CBO found that the number of uninsured would rise by roughly 18 million people following the first year of H.R. 3762 enactment. Most of this would be attributable to repealing the individual mandate. Due to a sicker and hence more expensive risk pool of enrollees, some insurance companies would charge higher premiums; the CBO estimates that average premiums in the exchanges would increase by roughly 20-25%. Additionally, some insurance companies would leave the exchanges altogether because H.R. 3762 would leave in place ACA insurance market reforms, such as a requirement to not deny enrollees based on pre-existing conditions, which limit an insurer’s ability to make up for higher costs by charging higher premiums; the CBO expects that 10% of the nation’s population would become occupants in a region where there is no insurer participating in the exchanges.

An additional 9 million people would become uninsured following the first year of eliminating APTC and Medicaid expansion, according to the CBO. Average premiums in the
exchanges would rise by 25% more than they did prior to 2020, and almost half of the nation’s population would be living in a region where there is no insurer participating in the local exchange. In short, the CBO’s analysis shows that repealing the ACA without a replacement would destabilize the health insurance system resulting in fewer insurers, higher premiums, and reduced enrollment. It is important to note, however, that these effects are not fully attributable to repealing only the APTC; they are the result of repealing everything eliminated by H.R. 3762, including Medicaid expansion and the individual mandate.

Another approach to examining the implications of ACA repeal is to look at its effects on economic activity, such as employment and GDP, rather than at its more-narrow effects with regards to premiums and uninsurance rates. Economist Leighton Ku’s January 2017 report, “Repealing Federal Health Reform: Economic and Employment Consequences for States,” does just this.122

Ku finds that repealing the APTC with no replacement would result in the loss of billions of dollars of federal spending. An estimated $61 billion in federal spending cuts would occur in 2023 alone, while in 2021, even more federal spending ($74.8 billion) would be cut. In total, $341 billion in federal spending cuts would occur between 2019-2023.

While repealing the tax credits would save the federal government a substantial amount of money, Ku projects that it would result in more negative consequences, such as losses in GDP, tax revenue, and employment (Figure 4).122 For example, roughly $623 billion of GDP would be lost between 2019-2023. Moreover, about $21 billion of state and local tax revenues would be lost between 2019-2023. Finally, an estimated 1.1-1.2 million jobs would be lost between 2019-2023; 370,000-380,000 jobs would be lost in the health care industry together with the remainder in industries such as construction, retail trade, and finance. These employment effects of a repeal are
doubly important because most workers who lose their job will probably lose their health insurance coverage along with it.

Professor Ku offers an explanation as to how federal funding for the APTC stimulates the economy. First, there are “direct effects” of federal funding where tax credits flow to health insurers who, after covering overhead costs, reimburse health care providers such as hospitals and clinics. Then, there are “indirect effects” whereby health care providers use their increased revenue to hire additional employees as well as to purchase goods and services like office equipment and such. Finally, there are “induced effects” whereby health care industry employees use their incomes to pay for goods and services, which supports jobs and incomes of workers in the overall economy.

In short, an outright repeal of the ACA would lead to a significant number of people becoming uninsured and rising premiums for those still insured. Moreover, there would be a substantial impact on economic activity, with employment dropping both within and beyond the health care sector. All of these findings suggest that it would be unwise to repeal the ACA without replacing it. What then, might a replacement look like? The next and final section of this paper discusses different forms of tax credits that have been proposed in Republican replacement plans.

TAX CREDITS IN REPUBLICAN REPLACEMENT PLAN PROPOSALS

Tom Price’s “Empowering Patients First” proposal included a tax credit with features both similar to and different from the APTC. Like the ACA’s, this tax credit could only be used to purchase health insurance in an exchange. Likewise, it would be advanceable and refundable. But in contrast to the APTC, excess credit beyond one’s income qualification may only be retained on
condition that it is dispensed into a health savings account. The largest departure from the APTC is that this tax credit is adjusted by age rather than by income. Values (per year) would rise with increasing age: as of 2016, children would have received $900, those aged 18-34 would have received $1,200, those aged 35-49 would have received $2,100, and those aged 50 and higher would have received $3,000; each of these values would be adjusted by CPI over time.

The American Health Care Reform Act (AHCRA) included an advanceable, refundable tax subsidy for the exchanges that was radically different from both the APTC and Tom Price’s tax credits. Rather than a tax credit, this subsidy would have been in the form of a tax deduction: a standard deduction for individually purchased health insurance (SDHI) equal to the tax-free thresholds set for employer-sponsored health insurance. Starting in 2018, these values could not exceed $7,500 for individuals and $20,500 for families. These values would be adjusted by CPI, but not for age or cost-of-living differences. Also, these values would be affected by income, as the tax deduction amount could not exceed income for the year.

It turned out that the American Health Care Act’s (AHCA) tax credit did not closely resemble those outlined in either of these other Republican plans. First, the AHCA would have kept the APTC for plan years 2018 and 2019, but with some modifications. One, APTC-eligible plans would have expanded to include off-exchange plans that do not satisfy the ACA-established minimum creditable coverage, such as “catastrophic-only” plans. (However, the advance payment option would not be available for such off-exchange plans). Two, the APTC would become non-refundable, as enrollees would be required to repay the entire excess amount of APTC, regardless of income. Three, households’ expected contributions are modified to account for age, as well as income. The AHCA’s household expected contributions are displayed in Figure 5.
For plan years 2020 and beyond, the APTC would have been entirely repealed and replaced with a tax credit that contains some similar features, such as being advanceable and refundable.\(^{124}\) This tax credit could only be used in the exchanges. The biggest change from the APTC is that this tax credit would have been adjusted by age, rather than income or premium levels. Values (per year) would rise with increasing age: $2,000 for ages under 30, $2,500 for ages 30-39, $3,000 for ages 40-49, $3,500 for ages 50-59, and $4,000 for ages 60 and higher; these values would grow over time by the CPI rate of inflation plus 1%. These tax credits would have been available in full to individuals with income of up to $75,000 per year, or for married joint filers with a combined income of up to $150,000 per year; for incomes above these thresholds, the tax credit would decrease by $100 for every $1,000 in additional income. Lastly, these tax credits would aggregate for all members of a household and would be limited to a maximum of $14,000 per household.

The AHCA also adopts a profoundly different stance from the ACA regarding the individual mandate, which it would have been eliminated as of 2018. Starting in 2020, a new continuous coverage requirement would kick in.\(^{124}\) This provision would incentivize people to maintain health insurance coverage in the following way: anyone who does not maintain creditable coverage for at least 63 straight days during the prior 12 months would be subject to up to 30% higher premiums than what they would normally qualify for during the subsequent 12-month period. This continuous coverage requirement is different from the ACA’s individual mandate in that it penalizes the uninsured when they decide to purchase health insurance, rather than penalizing an individual simply for not having insurance. The idea is that individuals would be incentivized to purchase health insurance even if they don’t feel the need for it so as to avoid having to pay higher premiums when the time comes that they do feel the need.
Shortly after the AHCA was first proposed, the CBO conducted an analysis of the AHCA to determine its likely impacts on premiums, health insurance coverage, the federal budget, and how this “replacement” legislation would compare to the ACA. One might argue that the fate of the AHCA depended upon this CBO report because it provided information that was used by many undecided Republican lawmakers to make their decision. The report found that the AHCA would maintain the stability of private health insurance markets, reduce the federal deficit, increase the nation’s uninsurance rate, and increase premiums in the short-run but decrease premiums in the long run. Described below are the report’s findings regarding the impacts of the proposed tax credit and continuous coverage requirement.

The CBO estimated that the entire AHCA program would reduce the federal deficit by $337 billion over its first decade (2017-2026), most significantly owing to the elimination of Medicaid expansion. The elimination of the ACA’s tax credits would yield the second-largest savings for the program (Figure 6). By comparing the projected savings from what the APTC would have cost ($673 billion) to the projected costs of the AHCA’s new tax credit ($361 billion), one can see that the AHCA’s tax credit would cost the federal government roughly 54% less than the APTC between 2017-2026. This was a selling point to undecided Republicans. In some ways, this makes sense because the AHCA’s tax credit would be adjusted by the CPI calculated rate of inflation plus 1%, which would be a slower increase in tax credits than under the ACA.

The CBO estimated that retaining the modified version of the APTC for 2018 and 2019 would have positive, but small, effects on coverage. With APTC-eligibility expanding to include off-exchange plans, about 2 million additional people would receive tax credits in buying health insurance outside of the exchanges. The adjustment of household expected contributions by age as
well as income would lead approximately 1 million more people to enroll in health insurance through the exchanges.

While retaining a modified version of the APTC would have a positive, but small, effect on coverage, the AHTC’s overall effect on coverage would be an increase of 14 million uninsured people in 2018 (compared to the ACA). This would mean that the total uninsured population (below age 65) would be 41 million people rather than 26 million, an uninsurance rate of 15% rather than 9.5%. In 2019, an additional 2 million more people would become uninsured (compared to the ACA). The CBO’s estimated effects on health insurance coverage under the AHCA are presented in Figure 7.

Most of the increase in uninsured between would be the result of repealing the individual mandate penalties. There are two likely reasons for this. One, some people would drop coverage simply because they wouldn’t be penalized for doing so. Two, others would drop coverage because premiums would be higher, since the remaining enrollees would be older and in worse health; the CBO estimated that average premiums in the exchanges would be 15-20% higher than under the ACA between 2018-2019. Premium increases associated with eliminating the individual mandate would be partly offset, though, by net premium reductions associated with modifying the APTC formula to yield subsidies that are somewhat more generous for younger enrollees of a given income status. For example, using the ACA’s APTC formula, any-aged individual in the 200-250% FPL bracket would have an expected contribution between 6.43-8.21% (Table 5). However, using the AHCA’s modified APTC, the expected contribution for a 30-39-year old would be between 5.3-5.9%, while for a 50-59-year old would be between 7.3-9% (Figure 5).

In 2020 and beyond, the composition of exchange enrollees would change more radically with respect to the ACA; some low-income enrollees will drop coverage while some high-income
enrollees will gain coverage. This would be due in part to differences in tax credits. Figure 8 compares would-be tax credit values for the ACA versus the AHCA as of 2026.

For low-income enrollees (175% FPL): a 21-year old would receive a $3,400 credit under the ACA vs. a $2,450 credit under the AHCA; a 40-year old would receive a $4,800 credit under the ACA vs. a $3,650 credit under the AHCA; and a 64-year old would receive a $13,600 credit under the ACA vs. a $4,900 credit under the AHCA. This shows that all age groups who are considered low-income would receive smaller tax credits under the AHCA. Additionally, as one ages, they would receive disproportionately smaller tax credits. For higher income enrollees (≥ 450% FPL) the ACA would provide no tax credits at all. But under the AHCA, a 21-year old would receive a $2,450 credit, a 40-year old would receive a $3,650 credit, and a 64-year old would receive a $4,900 credit.

One more thing to note is that gross premiums under the ACA are almost 3 times higher for 64-year old enrollees than for 21-year old enrollees; this maximum premium difference by age is called the age-rating ratio. The AHCA would have changed the age-rating ratio to 5-to-1, which is evident in Figure 8 where gross premiums (before tax credit) are $3,900 for 21-year old enrollees and $19,500 for 64-year old enrollees of all incomes. Because the AHCA only sets tax credit amounts twice as high for older enrollees as for younger enrollees, older enrollees would have to pay substantially higher net premiums (after tax credit) compared to younger enrollees. As is displayed in Figure 8, at 175% FPL under the AHCA, the after-credit premium is $1,450 for a 21-year old and $14,600 for a 64-year old. But at 175% FPL under the ACA, the after-credit premium is the same ($1,700) for a 21-year old as for a 64-year old.

The total effect of the AHCA on health insurance coverage in 2020 would be an increase of 5 million more uninsured people (from the previous year), resulting in a total uninsured
population of 48 million people. Compared to what the projected uninsured population under the ACA, 27 million, this is a 21 million-person difference. By 2026, the number of additional uninsured individuals under the AHCA (compared to the ACA) would be 24 million. But note that the CBO report attributes 14 million of this difference to cuts in the Medicaid program (Figure 9).

In sum, the AHCA would significantly increase the number of uninsured. This is the primary reason why the AHCA is estimated to reduce the federal deficit below what it would be under the ACA. The majority of additions to the uninsured population would occur during the beginning years of AHCA’s enactment. Following major reform implementation in 2020, further additions to the uninsured population under the AHCA would rise at a more comparable rate to the ACA. In fact, enrollment in the exchanges is projected to increase by 7 million people between 2020-2026, as people begin to utilize the new tax credit and are subject to the continuous coverage requirement. This suggests that the AHCA’s impact on the growth in the uninsured population would dissipate over time.

The CBO estimates that average premiums would fall every year after 2020, owing to a larger proportion of younger people purchasing insurance, a result of the AHCA’s tax credit and the new continuous coverage requirement for all enrollees, regardless of income. By 2026, average premiums in the exchanges would be roughly 10 percent lower than under the ACA; they would be 20-25% lower for a 21-year-old, 8-10% lower for a 40-year-old, but 20-25% higher for a 64-year-old. In sum, the AHCA would increase average premiums in the exchanges relative to the ACA before 2020, and decrease average premiums afterwards.

One of the Republicans’ goals for health care reform is to ensure the stability of the individual insurance market. The CBO predicts that the AHCA would meet this goal, finding that “the combination of subsidies to purchase nongroup insurance and rules regulating the market
would result in a relatively stable nongroup market. That is, most areas of the country would have insurers participating in the nongroup market, and the market would not be subject to an unsustainable spiral of rising premiums.\textsuperscript{125} This is partly because, according to the report, “a substantial number of relatively healthy (mostly young) people would continue to purchase insurance in the nongroup market because of the availability of government subsidies,”\textsuperscript{125} even though the subsidies would be less generous for low-income individuals than under the ACA. At the same time, because the AHCA’s tax credit would not be tied to premiums, enrollees would have a greater incentive to choose less-generous insurance, which could serve to keep medical costs down.

As we now know, the AHCA never received full support from congressional Republicans, along with zero support from Democrats. Some moderate Republicans opposed the bill because of the projected increase in the uninsured population;\textsuperscript{126} it could have been politically costly to support the bill because many people would object to losing their health insurance. Some conservative and libertarian Republicans, such as those in the Freedom Caucus, opposed the bill because it did not go far enough to repeal ACA policies.\textsuperscript{127} As of now, the ACA remains the law of the land, and it does not seem likely that Republicans will come up with another viable replacement plan anytime soon.

\section*{CONCLUSION}

The Affordable Care Act (ACA) will always be recognized as having achieved several accomplishments. First, it overcame significant political barriers that had halted prior national health care legislation from becoming enacted. Second, it improved upon several problems that
plagued the nation’s health care system, such as by lowering the uninsurance rate and lowering premiums for people with pre-existing conditions. Finally, it established a precedent of federal government involvement to ensure that health insurance is affordable to all citizens.

This paper examined three new responsibilities bestowed upon the federal government under the ACA. One, the government can impose a tax penalty upon individuals who do not enroll in health insurance - the so-called individual mandate. Two, the long-standing tax exclusion on employer-sponsored health insurance will become restricted, starting in 2020, by the Cadillac Tax. Three, the government issues tax credits to individuals purchasing health insurance on their own within marketplaces called exchanges.

It is most likely that the government will retain these responsibilities if the ACA were to be repealed and replaced by Republicans, as evident by the fact that the most-recent replacement proposal – The American Health Care Act (AHCA) – kept these policies albeit with some modifications. However, opposition to the AHCA among different factions of the Republican party suggests that there is disagreement concerning what these modifications should be.
APPENDIX

Figure 1. U.S. health insurance coverage by type, 2013-2015

<table>
<thead>
<tr>
<th>Coverage type</th>
<th>2013</th>
<th>2014</th>
<th>2015</th>
<th>Change</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Number</td>
<td>MOEa</td>
<td>Rate (a)</td>
<td>Number</td>
</tr>
<tr>
<td>Any health plan</td>
<td>271,609</td>
<td>935</td>
<td>86.7</td>
<td>263,306</td>
</tr>
<tr>
<td>Any private plan</td>
<td>201,038</td>
<td>614</td>
<td>64.1</td>
<td>205,660</td>
</tr>
<tr>
<td>Employment-based</td>
<td>174,418</td>
<td>1,159</td>
<td>55.7</td>
<td>175,027</td>
</tr>
<tr>
<td>Direct-purchase</td>
<td>35,755</td>
<td>615</td>
<td>11.4</td>
<td>46,165</td>
</tr>
<tr>
<td>Any government plan</td>
<td>108,297</td>
<td>1,115</td>
<td>34.8</td>
<td>115,470</td>
</tr>
<tr>
<td>Medicare</td>
<td>49,020</td>
<td>377</td>
<td>15.6</td>
<td>50,546</td>
</tr>
<tr>
<td>Medicaid</td>
<td>54,919</td>
<td>999</td>
<td>17.5</td>
<td>61,650</td>
</tr>
<tr>
<td>Military health care</td>
<td>14,016</td>
<td>595</td>
<td>4.0</td>
<td>14,143</td>
</tr>
<tr>
<td>Uninsured</td>
<td>41,795</td>
<td>614</td>
<td>13.3</td>
<td>32,968</td>
</tr>
</tbody>
</table>


Figure 2. Percent of the Nonelderly Population Offered Employer-Sponsored Coverage by Household Poverty Level, 1999-2014

**Figure 3.** Percent of the Nonelderly Population Enrolled in Employer-Sponsored Coverage by Household Poverty Level, 2014

![Bar chart showing percent of the nonelderly population enrolled in employer-sponsored coverage by household poverty level, 2014.](chart)


**Figure 4.** Estimated economic impacts of repealing APTC, 2019-2023

<table>
<thead>
<tr>
<th>Category</th>
<th>2019</th>
<th>2020</th>
<th>2021</th>
<th>2022</th>
<th>2023</th>
<th>Total 2019-23</th>
</tr>
</thead>
<tbody>
<tr>
<td>Federal Funding Cut (billions of $)</td>
<td>-$61.0</td>
<td>-$65.0</td>
<td>-$68.8</td>
<td>-$71.8</td>
<td>-$74.8</td>
<td>-$341.3</td>
</tr>
<tr>
<td>TOTAL EMPLOYMENT LOST (thousands of jobs)</td>
<td>-1,105</td>
<td>-1,202</td>
<td>-1,232</td>
<td>-1,184</td>
<td>-1,121</td>
<td>N/A</td>
</tr>
<tr>
<td>Private Employment:</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Health Care</td>
<td>-369</td>
<td>-377</td>
<td>-382</td>
<td>-377</td>
<td>-373</td>
<td>N/A</td>
</tr>
<tr>
<td>Construction &amp; Real Estate</td>
<td>-125</td>
<td>-164</td>
<td>-172</td>
<td>-157</td>
<td>-134</td>
<td>N/A</td>
</tr>
<tr>
<td>Retail Trade</td>
<td>-109</td>
<td>-114</td>
<td>-115</td>
<td>-109</td>
<td>-103</td>
<td>N/A</td>
</tr>
<tr>
<td>Finance &amp; Insurance</td>
<td>-88</td>
<td>-91</td>
<td>-91</td>
<td>-88</td>
<td>-85</td>
<td>N/A</td>
</tr>
<tr>
<td>All Other Private</td>
<td>-586</td>
<td>-414</td>
<td>-421</td>
<td>-399</td>
<td>-373</td>
<td>N/A</td>
</tr>
<tr>
<td>Public Employment</td>
<td>-27</td>
<td>-43</td>
<td>-51</td>
<td>-53</td>
<td>-53</td>
<td>N/A</td>
</tr>
<tr>
<td>Business Output Lost (billions of $)</td>
<td>-$188.4</td>
<td>-$212.5</td>
<td>-$225.2</td>
<td>-$224.0</td>
<td>-$218.6</td>
<td>-$1,068.7</td>
</tr>
<tr>
<td>Gross State Product Lost (billions of $)</td>
<td>-$109.3</td>
<td>-$123.4</td>
<td>-$131.1</td>
<td>-$130.9</td>
<td>-$128.3</td>
<td>-$623.0</td>
</tr>
<tr>
<td>State &amp; Local Taxes Lost (billions of $)</td>
<td>-$5.7</td>
<td>-$4.1</td>
<td>-$4.4</td>
<td>-$4.4</td>
<td>-$4.3</td>
<td>-$20.9</td>
</tr>
</tbody>
</table>

**Figure 5.** Household expected contributions, modified to age and income, under the AHCA

<table>
<thead>
<tr>
<th>“In the case of household income (expressed as a percent of the poverty line) within the following income tier:”</th>
<th>Up to Age 29</th>
<th>Age 30-39</th>
<th>Age 40-49</th>
<th>Age 50-59</th>
<th>Over Age 59</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Initial %</strong></td>
<td><strong>Final %</strong></td>
<td><strong>Initial %</strong></td>
<td><strong>Final %</strong></td>
<td><strong>Initial %</strong></td>
<td><strong>Final %</strong></td>
</tr>
<tr>
<td>Up to 133%</td>
<td>2</td>
<td>2</td>
<td>2</td>
<td>2</td>
<td>2</td>
</tr>
<tr>
<td>133%-150%</td>
<td>3</td>
<td>4</td>
<td>3</td>
<td>4</td>
<td>3</td>
</tr>
<tr>
<td>150%-200%</td>
<td>4</td>
<td>4</td>
<td>4</td>
<td>5.3</td>
<td>4</td>
</tr>
<tr>
<td>200%-250%</td>
<td>4.3</td>
<td>4.3</td>
<td>5.3</td>
<td>5.9</td>
<td>6.3</td>
</tr>
<tr>
<td>250%-300%</td>
<td>4.3</td>
<td>4.3</td>
<td>5.9</td>
<td>5.9</td>
<td>8.35</td>
</tr>
<tr>
<td>300%-400%</td>
<td>4.3</td>
<td>4.3</td>
<td>5.9</td>
<td>5.9</td>
<td>8.35</td>
</tr>
</tbody>
</table>


**Figure 6.** Estimated budgetary effects of the AHCA’s insurance coverage policies, 2017-2026

<table>
<thead>
<tr>
<th>(Billions of dollars, by fiscal year)</th>
<th>Total</th>
<th>2017</th>
<th>2018</th>
<th>2019</th>
<th>2020</th>
<th>2021</th>
<th>2022</th>
<th>2023</th>
<th>2024</th>
<th>2025</th>
<th>2026</th>
</tr>
</thead>
<tbody>
<tr>
<td>Medicaid Outlays</td>
<td>-3</td>
<td>-8</td>
<td>-86</td>
<td>-111</td>
<td>-124</td>
<td>-135</td>
<td>-146</td>
<td>-155</td>
<td>-880</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Subsidies for Coverage Through Marketplaces and Related Spending and Revenues</td>
<td>-1</td>
<td>-11</td>
<td>-16</td>
<td>-62</td>
<td>-87</td>
<td>-91</td>
<td>-95</td>
<td>-102</td>
<td>-106</td>
<td>-673</td>
<td></td>
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<tr>
<td>Small-Employer Tax Credits</td>
<td>*</td>
<td>*</td>
<td>*</td>
<td>-1</td>
<td>-1</td>
<td>-1</td>
<td>-1</td>
<td>-1</td>
<td>-1</td>
<td>-1</td>
<td>-1</td>
</tr>
<tr>
<td>Tax Credits for Nongroup Insurance</td>
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<td>0</td>
<td>0</td>
<td>30</td>
<td>44</td>
<td>47</td>
<td>52</td>
<td>58</td>
<td>63</td>
<td>63</td>
<td>63</td>
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<tr>
<td>Penalty Payments by Employers</td>
<td>2</td>
<td>16</td>
<td>20</td>
<td>15</td>
<td>16</td>
<td>18</td>
<td>19</td>
<td>20</td>
<td>22</td>
<td>23</td>
<td>171</td>
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<tr>
<td>Penalty Payments by Uninsured People</td>
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<td>3</td>
<td>3</td>
<td>3</td>
<td>4</td>
<td>4</td>
<td>4</td>
<td>4</td>
<td>38</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Patient and State Stability Fund Grants</td>
<td>0</td>
<td>0</td>
<td>12</td>
<td>15</td>
<td>10</td>
<td>9</td>
<td>9</td>
<td>8</td>
<td>8</td>
<td>8</td>
<td>80</td>
</tr>
<tr>
<td>Medicare</td>
<td>0</td>
<td>1</td>
<td>3</td>
<td>4</td>
<td>6</td>
<td>6</td>
<td>6</td>
<td>6</td>
<td>6</td>
<td>6</td>
<td>43</td>
</tr>
<tr>
<td>Other Effects on Revenues and Outlays</td>
<td>-1</td>
<td>-5</td>
<td>-5</td>
<td>-4</td>
<td>-4</td>
<td>-4</td>
<td>-4</td>
<td>-6</td>
<td>-10</td>
<td>-14</td>
<td>-18</td>
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</table>

Figure 7. AHCA’s estimated effects on health insurance coverage, 2017-2026

<table>
<thead>
<tr>
<th></th>
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<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Total Population Under Age 65</td>
<td>273</td>
<td>274</td>
<td>275</td>
<td>276</td>
<td>276</td>
<td>277</td>
<td>278</td>
<td>279</td>
<td>279</td>
<td>280</td>
</tr>
<tr>
<td>Uninsured Under Current Law</td>
<td>26</td>
<td>26</td>
<td>27</td>
<td>27</td>
<td>27</td>
<td>27</td>
<td>27</td>
<td>28</td>
<td>28</td>
<td>28</td>
</tr>
<tr>
<td>Change in Coverage Under the AHCA</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Medicaid&lt;sup&gt;a&lt;/sup&gt;</td>
<td>-1</td>
<td>-5</td>
<td>-6</td>
<td>-9</td>
<td>-12</td>
<td>-13</td>
<td>-13</td>
<td>-14</td>
<td>-14</td>
<td>-14</td>
</tr>
<tr>
<td>Nongroup coverage, including marketplaces&lt;sup&gt;b&lt;/sup&gt;</td>
<td>-2</td>
<td>-6</td>
<td>-7</td>
<td>-9</td>
<td>-8</td>
<td>-8</td>
<td>-6</td>
<td>-5</td>
<td>-4</td>
<td>-2</td>
</tr>
<tr>
<td>Employment-based coverage</td>
<td>-1</td>
<td>-2</td>
<td>-2</td>
<td>-2</td>
<td>-2</td>
<td>-2</td>
<td>-3</td>
<td>-3</td>
<td>-5</td>
<td>-7</td>
</tr>
<tr>
<td>Other coverage&lt;sup&gt;c&lt;/sup&gt;</td>
<td>-1</td>
<td>-1</td>
<td>-1</td>
<td>-1</td>
<td>-1</td>
<td>-1</td>
<td>-1</td>
<td>-1</td>
<td>-1</td>
<td>-1</td>
</tr>
<tr>
<td>Uninsured</td>
<td>4</td>
<td>14</td>
<td>16</td>
<td>21</td>
<td>23</td>
<td>23</td>
<td>23</td>
<td>24</td>
<td>24</td>
<td>24</td>
</tr>
<tr>
<td>Percentage of the Population Under Age 65</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>With Insurance Under the AHCA</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Including all U.S. residents</td>
<td>89</td>
<td>85</td>
<td>84</td>
<td>83</td>
<td>82</td>
<td>82</td>
<td>82</td>
<td>82</td>
<td>82</td>
<td>81</td>
</tr>
<tr>
<td>Excluding unauthorized immigrants</td>
<td>91</td>
<td>87</td>
<td>87</td>
<td>85</td>
<td>84</td>
<td>84</td>
<td>84</td>
<td>84</td>
<td>84</td>
<td>84</td>
</tr>
</tbody>
</table>

Sources: Congressional Budget Office; staff of the Joint Committee on Taxation.


Figure 8. Tax credits in the exchanges for the ACA and AHCA, 2026

<table>
<thead>
<tr>
<th></th>
<th>Current Law 21 years old</th>
<th>Current Law 40 years old</th>
<th>Current Law 64 years old</th>
<th>AHCA 21 years old</th>
<th>AHCA 40 years old</th>
<th>AHCA 64 years old</th>
<th>Premium&lt;sup&gt;a&lt;/sup&gt;</th>
<th>Premium Tax Credit&lt;sup&gt;b&lt;/sup&gt;</th>
<th>Net Premium Paid</th>
<th>Subsidies (Percent)&lt;sup&gt;c&lt;/sup&gt;</th>
</tr>
</thead>
<tbody>
<tr>
<td>Single Individual With Annual Income of $26,500 (175 percent of FPL)&lt;sup&gt;d&lt;/sup&gt;</td>
<td>5,100</td>
<td>6,500</td>
<td>15,300</td>
<td>3,900</td>
<td>6,050</td>
<td>19,500</td>
<td>3,400</td>
<td>4,800</td>
<td>13,600</td>
<td>1,700</td>
</tr>
<tr>
<td>Single Individual With Annual Income of $68,200 (450 percent of FPL)&lt;sup&gt;d&lt;/sup&gt;</td>
<td>5,100</td>
<td>6,500</td>
<td>15,300</td>
<td>3,900</td>
<td>6,050</td>
<td>19,500</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>5,100</td>
</tr>
</tbody>
</table>

Sources: Congressional Budget Office; staff of the Joint Committee on Taxation.

All dollar figures have been rounded to the nearest $50; AHCA = American Health Care Act, FPL = federal poverty level.

Figure 9. AHCA changes to Medicaid enrollment, 2018-2026

**Table 1. Repayment caps for ACA tax credits, 2017**

<table>
<thead>
<tr>
<th>FPL Category</th>
<th>Singles</th>
<th>Families</th>
</tr>
</thead>
<tbody>
<tr>
<td>Less 200%</td>
<td>$300</td>
<td>$600</td>
</tr>
<tr>
<td>200-300%</td>
<td>$750</td>
<td>$1,500</td>
</tr>
<tr>
<td>300-400%</td>
<td>$1,275</td>
<td>$2,500</td>
</tr>
<tr>
<td>400% +</td>
<td>No cap</td>
<td>No cap</td>
</tr>
</tbody>
</table>


**Table 2. Uninsurance rate by age in the United States, 2013-2015**

<table>
<thead>
<tr>
<th>Age (years)</th>
<th>2013</th>
<th>2014</th>
<th>2015</th>
</tr>
</thead>
<tbody>
<tr>
<td>19-25</td>
<td>22.1%</td>
<td>17.1%</td>
<td>14.4% a</td>
</tr>
<tr>
<td>26-34</td>
<td>23.7%</td>
<td>18.2%</td>
<td>17.9% b</td>
</tr>
<tr>
<td>35-44</td>
<td>18.9%</td>
<td>15.4%</td>
<td>14.5%</td>
</tr>
<tr>
<td>45-64</td>
<td>14.6%</td>
<td>11.0%</td>
<td>8.8%</td>
</tr>
</tbody>
</table>

a. Ages 18-24  b. Ages 25-34


**Table 3. Uninsurance rate by income in the United States, 2013-2015**

<table>
<thead>
<tr>
<th>FPL Level</th>
<th>2013</th>
<th>2014</th>
<th>2015</th>
</tr>
</thead>
<tbody>
<tr>
<td>100-199%</td>
<td>20.4%</td>
<td>15.1%</td>
<td>13.6%</td>
</tr>
<tr>
<td>200-299%</td>
<td>15.8%</td>
<td>11.7%</td>
<td>9.8%</td>
</tr>
<tr>
<td>300-399%</td>
<td>10.3%</td>
<td>8.4%</td>
<td>7.3%</td>
</tr>
<tr>
<td>+ 400%</td>
<td>5.6%</td>
<td>4.8%</td>
<td>4.5%</td>
</tr>
</tbody>
</table>


Table 4. 2017 Federal Poverty Level Chart – Income Brackets for 2017 Premium Tax Credits

<table>
<thead>
<tr>
<th>Persons in Household</th>
<th>100% FPL</th>
<th>133% FPL</th>
<th>250% FPL</th>
<th>400% FPL</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>$11,880</td>
<td>$15,800</td>
<td>$29,700</td>
<td>$47,550</td>
</tr>
<tr>
<td>2</td>
<td>$16,020</td>
<td>$21,300</td>
<td>$40,050</td>
<td>$64,100</td>
</tr>
<tr>
<td>3</td>
<td>$20,160</td>
<td>$26,800</td>
<td>$50,400</td>
<td>$84,650</td>
</tr>
<tr>
<td>4</td>
<td>$24,300</td>
<td>$32,300</td>
<td>$60,750</td>
<td>$97,200</td>
</tr>
<tr>
<td>5</td>
<td>$28,440</td>
<td>$37,850</td>
<td>$71,100</td>
<td>$113,800</td>
</tr>
<tr>
<td>6</td>
<td>$32,580</td>
<td>$43,350</td>
<td>$81,450</td>
<td>$130,300</td>
</tr>
</tbody>
</table>


Table 5. Household expected contributions per FPL category under the ACA, 2016-2017

<table>
<thead>
<tr>
<th>Income</th>
<th>Expected Contribution</th>
</tr>
</thead>
<tbody>
<tr>
<td>FPL Category (% Poverty)</td>
<td>Plan Year 2016</td>
</tr>
<tr>
<td>Under 100%</td>
<td>No Cap</td>
</tr>
<tr>
<td>100% - 133%</td>
<td>2.03%</td>
</tr>
<tr>
<td>133% - 150%</td>
<td>3.05% - 4.07%</td>
</tr>
<tr>
<td>150% - 200%</td>
<td>4.07% - 6.41%</td>
</tr>
<tr>
<td>200% - 250%</td>
<td>6.41% - 8.18%</td>
</tr>
<tr>
<td>250% - 300%</td>
<td>8.18% - 9.66%</td>
</tr>
<tr>
<td>300% - 400%</td>
<td>9.66%</td>
</tr>
<tr>
<td>Over 400%</td>
<td>No Cap</td>
</tr>
</tbody>
</table>

WORKS CITED


http://laborcenter.berkeley.edu/modified-adjusted-gross-income-under-the-affordable-care-act/


http://www.cnn.com/2017/03/14/politics/moderate-republicans-health-care/