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Can You Keep It?  
An Examination of the Individual Health Insurance Market

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**Introduction:** President Barack Obama famously reassured Americans that the new health care law would not result in loss of health insurance coverage. He declared, “If you like your health plan, you can keep it.” Despite the fact that the health care law is now more popular than ever, if Americans like the law, can we keep it? <sup>1</sup> On March 23<sup>rd</sup>, 2010, President Barack Obama signed the Patient Protection and Affordable Care Act, commonly known as PPACA, Obamacare, or the ACA\*, which would change the landscape of the individual health insurance market.<sup>2</sup> Previously, insurers in the individual market could underwrite participants to achieve a more desirable risk pool. The ACA forced insurers in the individual market to offer every individual the same premiums in a transparent marketplace. This change, along with others, has caused the individual market struggle with stability. Those in the industry have questioned the feasibility of the ACA, as demonstrated by the high profile pullouts of several large insurers. If these trends continue, the law may not survive.

This thesis will explore the stability issues in the market and provide analysis about possible solutions. First, a broad outline of the individual health insurance and the ACA will be discussed. Then, the specific issues causing instability in the market will be explored, along with an analysis of the premium increases in the individual market. Finally, possible solutions along with their feasibility will be analyzed. Special attention will be given to the rise in premiums in the 2017 plan year and the future of the law under a Trump Administration. Ultimately, this thesis hopes to outline possible policy objectives for the federal government to achieve its goal of providing affordable health insurance to all while providing insurers with a functional and actuarially stable insurance market.

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\* In this thesis, the law will be referred to as the ACA

**Background:** During the 2008 Presidential Campaign, voters were concerned about the exponential rise in health care costs. At the time, the average family spent \$11,841 on medical care, which was \$1,000 more than the yearly salary of a minimum wage worker.<sup>2</sup> Annual premiums in the individual market could exceed \$10,000.<sup>2</sup> At the time of the election in 2008, 14.6% of Americans were uninsured according to a Gallup Poll.<sup>3</sup> Democratic Nominee and eventual president-elect, Barack Obama, promised to sign a universal health care law by the end of his first term that “not only guarantees coverage for every American, but also brings down the cost of health care and reduces every family's premiums by as much as \$2,500.”<sup>2</sup>

Before the passage of the ACA, Americans had no promise of health insurance. Most Americans received subsidized health insurance plans through their employers. This system was the result of wage freezes during World War II. The National War Labor Board ruled that health benefits were not considered wages and therefore not subject to wage freezes.<sup>2</sup> From then on, employers used health benefits to attract workers.

Furthermore, in the 1950s, the IRS ruled that health insurance should not be subject to a wage tax since it is not considered part of an employee's wage.<sup>2</sup> The IRS created a large tax loophole favorable to both workers and employers. Inadvertently, by favoring these groups, the IRS made reforming the health care financing system nearly politically impossible. Ultimately, the United States found itself in a policy trap where it had created an “increasingly costly and complicated system that [had] satisfied enough of the public and so enriched the Health-care industry as to make change extraordinarily difficult”<sup>5</sup>

For those who fall outside the employer-sponsored system and are ineligible for government-sponsored care through Medicaid and Medicare, acquiring health insurance prior to the ACA was extremely challenging. People who purchased coverage in the

individual market tended to be early retirees, self-employed, or worked in jobs without health benefits.<sup>6</sup> Prior to the ACA, the individual market covered about 16 million or 6% of Americans.<sup>7</sup> Insurers were able to underwrite based on health status in order to charge an actuarially fair premium. In general, the risk pool in the individual market tended to be worse than the one in the group market because those in the individual market purposely sought out insurance. A study from America's Health Insurance Plans (AHIP) in 2002 found that 8.7% of those in the individual market had to pay an additional premium because they were considered substandard risk.<sup>6</sup> In addition to charging unhealthier individuals higher premiums, insurers reserved the right to deny insurance to anyone deemed "too risky." High-risk individuals could find themselves being rejected by multiple insurers but accepted by another. The same AHIP study found that 11.8% of applicants were outright rejected.<sup>6</sup>

In some states, if an individual was denied insurance from all insurers, he or she could try to obtain coverage through a high-risk pool. These pools offered subsidized coverage, but enrollees still were considered substandard risks and had to pay higher than average premiums. Also, some states like Florida, had frozen enrollment while other states, like California, had a waiting list before people could enroll.<sup>8</sup> If someone was able to enroll in a high-risk pool, he or she still may not receive the health care they needed due to policy exclusions. These provisions exclude coverage for specific medical conditions during an elimination period or even the entire length of the policy.<sup>6</sup> For example, if someone were relegated to the high-risk pool due to back pain, his or her policy would likely explicitly not cover treatment for back pain. Dissatisfaction over these policies factored into President Obama's decision to turn health care reform into a national priority.

Following President Obama's inauguration in January 2009, Congress began drafting a health care reform bill. The bill was modeled after Massachusetts' successful health care reform from 2006. Creating a single payer system like ones found in comparable developed countries like the UK, France, or Canada was too politically unfeasible. Massachusetts' model was a private market reform based on three principles: Guaranteed issue, mandated coverage, and premium subsidies for those who qualified.<sup>2</sup> In the state of Massachusetts, a health insurer could not reject any applicant. Furthermore, the introduction of modified community rating prevented insurers from charging applicants more based on health status.<sup>2</sup> To avoid adverse selection, every single person in the state of Massachusetts is legally required to purchase health insurance or pay a tax penalty. To ease the financial burden of mandatory health insurance, the state provides subsidies for the purchase of health plans. Citizens in the individual market can buy insurance through an online platform, called the Connector, where shoppers are given the tools to compare health plans to make informed decisions.<sup>2</sup> Most importantly, the law seemed to be working. When Congress was considering health care reform at the federal level in 2009, Massachusetts had the lowest uninsured rate in the country at 5.1%.<sup>9</sup> In addition, more people were seeking out preventative care, the amount of unnecessary ER and inpatient visits fell, and fewer adults reported avoiding care due to high costs.<sup>9</sup>

Riding the wave of progressive excitement with the election of Barack Obama, the Democrats had taken the presidency, achieved a majority in the House of Representatives, and reached a supermajority in the Senate. Despite having majorities in both chambers of Congress, the Democrats did not find it easy to create a consensus bill. President Obama wanted bipartisan support for the bill, but the Republicans were encouraged by their leadership to decline any deal.<sup>10</sup> Therefore, the bill had to be

agreeable to Democrats across the ideological spectrum because the Senate needed the vote of every single Democrat to achieve cloture at 60 votes. When drafting the bill, Congress gave various interest groups, such as AHIP (America's Health Insurance Plans, the health insurance lobby), the pharmaceutical lobby, and the hospital lobby a seat at the table. These groups wielded substantial influence over the bill.<sup>10</sup> Karen Ignagni, the president of AHIP, realized health reform would put the insurance industry under attack, so she publicly promised that AHIP would support the effort.<sup>10</sup> However, Ignagni refused to support a bill without an individual mandate.<sup>10</sup> Insurers worried that a bill with a guaranteed issue but lacking a mandate would cause adverse selection and wreak havoc on the stability of the individual market. In addition, AHIP opposed a publicly run health insurance plan that would directly compete with private insurers, also known as the public option.<sup>10</sup>

Progressives in Congress supported the public option because they believed it would reduce costs through lowering administrative expenses and achieving economies of scale.<sup>11</sup> A publicly run insurer would pay reimbursement rates lower than private insurers and probably pay rates similar to Medicare.<sup>11</sup> The public option died in the Senate due to the opposition of Senator Joe Lieberman (D-CT).<sup>10,11</sup> He threatened to filibuster any bill that contained a public option.<sup>11</sup> Lieberman likely opposed the public option because his home state of Connecticut is a major hub for health insurers. However, the Democrats could not achieve 60 votes to achieve cloture without Lieberman. The Democrats had to acquiesce to Lieberman's demand and relinquish the hope of the public option to keep health care reform alive.

Congress continued to bicker over other details of the bill, including the generosity of the subsidies and the severity of the individual mandate.<sup>2</sup> The subsidies were tied to a

maximum percent of income that could be spent on health insurance premiums.<sup>13</sup> The final subsidy guideline covered those at or below 400% of the FPL (Federal Poverty Line) as set forth in the more generous House bill.<sup>14</sup> A more generous subsidy would be beneficial to the insurance market because insurance becomes more affordable for more people, creating a larger risk pool with greater diversity. The compromise bill required the purchase of insurance or the payment of a fine of \$695 or 2.5% whichever is greater.<sup>14</sup> The penalty is set to be phased in by 2016. The final mandate was a blend of the House bill, which had a fine of 2.5% of income, and the Senate bill, which had a fine up to \$750 or 2% of income.<sup>14</sup> The Senate bill originally had a tax penalty of \$950, but it was lowered to \$750 by the Snowe-Schumer amendment.<sup>15</sup> Liberals in Congress and insurance companies opposed the amendment because they believed a reduced penalty would not be meaningful enough to compel people to buy insurance.<sup>15</sup> A study commissioned by insurers and conducted by PriceWaterhouse Coopers concluded that premiums would rise thousands more than projected due to weaker penalties.<sup>15</sup> The increase would be due to effects of adverse selection, as healthy people would forgo the cost of insurance and simply pay the penalty. Then the market would be weighted towards unhealthy people who have higher expected costs and utilization, leading to higher premiums.

Finally, in March 2010, President Barack Obama signed the bill into a law after much deal making, debate, and uncertainty. In the signing ceremony, President Obama prophetically stated “This legislation will not fix everything that ails our health care system, but it moves us in decisively in the right direction.”<sup>10</sup> The signing of the ACA marked the beginning of a contentious era in American politics that still exists to this day. Partially as a result of the ACA, the Democrats lost their majorities in the House and



Senate during President Obama's term.<sup>2</sup> With the election of Donald Trump in 2016, the legacy of the law is in grave danger.

**Plans on the Individual Market:** One of the key goals of the ACA was to create a transparent and consumer-friendly individual marketplace. President Obama hoped to make the experience of shopping for health insurance comparable to shopping on Amazon.<sup>2</sup> Each state would be responsible for creating an exchange or marketplace where consumers could compare health plans and make informed purchases.<sup>2</sup> These exchanges had to be operating by the end of 2013, so citizens could purchase coverage for the 2014 plan year. However, several states, all of which had Republican governors, declined to establish state-run exchanges and used the federally run [healthcare.gov](http://healthcare.gov) platform instead.<sup>16</sup> Every plan offered on the exchange must cover a set of essential benefits, such as outpatient care, emergency services, hospitalization, pregnancy, maternity and newborn care, prescription drugs, lab services, and birth control.<sup>17</sup> Some preventive care services are free, and some plans cover additional services without any out of pocket costs.<sup>17</sup>

Plans are categorized into metal tiers based on their actuarial value, the average amount of benefit costs a plan covers. The lowest tier is the bronze level (60% actuarial value), followed by silver (70% actuarial value), gold (80% actuarial value), and platinum (90% actuarial value).<sup>18</sup> Those under the age of 30 are eligible to purchase catastrophic plans. These types of plans only provide insurance coverage after reaching the high deductible.<sup>18</sup>

**Subsidies and Individual Mandate:** Insurers salivated at the prospect of the insurance subsidies and the individual mandate working together to increase membership in the individual market. The subsidies cap the amount of premium paid to a percent of income.

For example, an individual earning \$30,000 is at about 250% above the FPL. The maximum amount this individual is required to contribute towards the benchmark plan is 6.3% of their income, or about \$1,890. The difference between the annual premium of the benchmark plan and \$1,890 will be given to the individual as a subsidy. The subsidies are structured to insulate consumers from premium increases. The subsidies create a permanent market for health insurance because subsidized enrollees will pay the same amount each year regardless of premium increases. The subsidies support people to up to 400% of the federal poverty line, and the amount of subsidy decreases as income increases.<sup>18</sup> The subsidy schedule is as follows<sup>18</sup>:

Income Level	Maximum Premium Contribution as a Percent of Income
Up to 133% FPL	2% of Income
133-150% FPL	3-4% of Income
150-200% FPL	4-6.3% of Income
200-250% FPL	6.3-8.05% of Income
250-300% FPL	8.05-9.5% of Income
300-400% FPL	9.5% of Income

The subsidy is a refundable tax credit.<sup>19</sup> Individuals can choose to either have their subsidy be paid directly to their health insurer to cover their monthly premiums or choose to take a tax deduction worth the entire subsidy when they file their annual tax returns.<sup>19</sup> The subsidy is tied to the second lowest cost silver plan in the relevant area.<sup>18</sup> The amount of the subsidy does not vary with the plan an individual chooses. If an individual chooses a more generous plan with a more expensive premium than the second lowest

cost silver plan, he or she will pay a higher percentage of their income than the subsidy anticipated. However, individuals generally choose to enroll in silver plans. For the 2016 plan year, 70% of enrollment nationwide was in silver plans.<sup>20</sup>

In order to maintain a diverse risk pool, the ACA has an individual mandate (aka shared responsibility payment). As of 2016, individuals who do not purchase a qualifying health insurance plan must pay a tax penalty of \$695 or 2.5% of taxable income, whichever is greater.<sup>18</sup> In the future, the \$695 penalty will increase with inflation.<sup>18</sup> There are exemptions for financial hardship and for certain groups of people, including religious objectors.<sup>18</sup> The tax penalty is reported on the federal income tax form.<sup>20</sup> However, if an individual is not required to file a federal income tax form, he/she is not required to pay the shared responsibility payment.<sup>20</sup> Furthermore, as a result of an executive order signed on January 20<sup>th</sup>, the IRS will no longer automatically reject income tax forms that do not provide information about health coverage.<sup>21</sup> It is unclear if those who do not report their health coverage status will be required to pay the tax in the future.

The individual mandate is absolutely vital to the success of the ACA because it creates a diverse, balanced risk pool. If everyone is forced to buy health insurance, regardless of health status, the low costs of the healthy people will cross subsidize the high claim costs of the unhealthy population. As a result, premiums are lower and the market is more stable for insurers.<sup>20</sup> Without the individual mandate, fewer healthy people will buy coverage in the individual market. Therefore, insurers will have to raise premiums to cover expected claim costs. As a result of the higher premiums, the relatively healthier people in the risk pool begin to drop out, and insurers will have to again raise premiums. This cycle would continue until insurers lose too much money on the individual market

and exit the market. This severe adverse selection is more commonly known as the “death spiral.”

The legality of the individual mandate and subsidies was called into question in the 2015 Supreme Court case, *King v. Burwell*.<sup>22</sup> The plaintiffs in the case argued that the wording of the law forbids the government from offering subsidies for plans bought on the federally run exchange.<sup>22</sup> The Obama Administration feared the foundation of the ACA would collapse if the Court ruled against them. Because the majority of states rely on the federal exchange, if the Supreme Court ruled in favor of King, millions of people would be unable to afford insurance. Ultimately, the Obama Administration won the case because the court found the act of refusing to offer tax subsidies on the federal exchange “would destabilize the individual insurance market in any State with a Federal Exchange, and likely create the very 'death spirals' that Congress designed the Act to avoid.”<sup>22</sup> Furthermore, the court ruled that individual mandate was legal because it was technically a tax, which the federal government has the constitutional authority to levy and collect.<sup>22</sup> This interpretation of the law was fairly interesting because at no point during the ACA negotiations or in the text of the law, is the word ‘tax’ used to refer to the individual responsibility payment. Although the Obama Administration did win the case, it was a somewhat controversial 6-3 decision, with the four liberal justices, Justice Anthony Kennedy, and surprisingly, conservative Chief Justice John Roberts, voting in favor of the defendants.<sup>22</sup>

**Financing of the Individual Market and the ACA:** The various aspects of the ACA are mainly funded through taxes on high-income individuals, insurers, and pharmaceutical companies.<sup>18</sup> President Obama, keeping true to his campaign promise to not raise taxes on the middle class, only increased the Medicare Part A tax by 0.9% on individuals earning

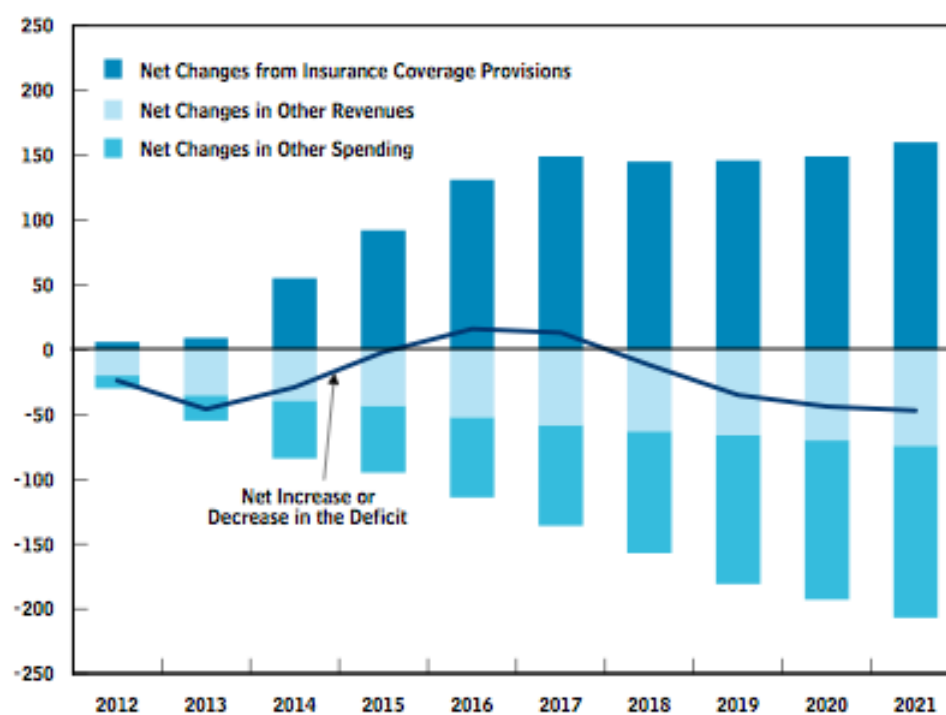
over 200K and on couples earning more than 250K.<sup>2,18</sup> Furthermore, individuals who do not obtain a qualifying health plan are required to pay a tax penalty. The ACA would also tax high-cost plans.<sup>18</sup> The so-called Cadillac Tax would tax overly generous plans that cover beyond the threshold set by the government. These plans would be subject to a 40% tax of the excess amount.<sup>18</sup> However, this tax proved to be controversial because opponents feared employers would switch to plans with lower premiums and a higher cost-sharing burden on workers to avoid the tax.<sup>23</sup> Because the Cadillac Tax is indexed to general inflation and not the faster growing medical inflation, it is likely that over time more run of the mill plans, not just overly generous plans, will be subject to this tax.<sup>18</sup> The Cadillac tax implementation has been pushed off until 2020, but Congress will likely continue to push it off indefinitely.<sup>23</sup>

The exchange is funded through user fees levied on insurers on the exchange.<sup>18</sup> Insurers that offer individual plans off the government marketplace ('Off-exchange' plans) do not have to pay this fee. The federal government is also imposing an annual fee on the health insurance sector.<sup>18</sup> In 2017, this fee will be \$13.9 billion.<sup>18</sup> After 2018, the fee will be increased each year according to premium growth, giving insurers yet another reason to try to control premium growth.<sup>18</sup>

**CBO Projections:** By design, the ACA is intended to have no effect on the national debt.<sup>2</sup> The CBO expected the initial implementation of the subsidies and marketplace expansion would increase the deficit but would eventually be offset as the market adjusted and more people became insured, as shown in Figure 1<sup>23</sup>.

## Estimated Effects of PPACA and the Health Care Provisions of the Reconciliation Act on the Federal Budget

(Billions of dollars, by fiscal year)



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

**Figure 1**

By 2017, the CBO expected the ACA to actually lower the deficit. These projections include the Cadillac tax, which is currently delayed until 2020.<sup>24</sup> The ACA is projected to have a net savings of \$124 billion between 2010 and 2019. The taxes discussed above and reductions in direct spending, such as lower Medicare reimbursements are expected to balance out the costs of the ACA.<sup>24</sup>

In 2016, the CBO estimated all federal subsidies for those under 65 would have a net cost of \$660 billion and would continue to increase by 5.4% per year.<sup>23</sup> The federal government subsidizes health care not just through marketplace subsidies, but also through Medicaid coverage, tax breaks for employer-sponsored coverage, and Medicare

benefits in specific cases. Federal marketplace subsidies only account for 10% of the total net subsidy, while Medicaid coverage and tax breaks for employer-sponsored coverage (mainly the premium tax exclusion) account for 43% and 41% of the net subsidy respectively. By 2026, the CBO projects the total subsidy payments to reach \$1.1 trillion (4.1% of GDP).<sup>23</sup> The amount of media attention and political criticisms the ACA subsidies receive is much greater than their proportional cost to the government.

In 2016, the CBO reduced its ten-year cost estimate of the ACA from \$1.344 trillion to \$1.207 trillion mainly due to lower than expected enrollment on the exchanges.<sup>23</sup> The federal government incorrectly predicted that more employers would stop offering coverage and force their employees onto the exchange, increasing the cost of subsidized coverage for the government.<sup>23</sup> However, this reduction will be somewhat offset by revised downward projections for wages of low-income earners. As a result, more people will qualify for larger subsidies.<sup>23</sup>

The CBO projects premiums for silver plans will increase 8.5% a year and insurer spending per enrollee will grow at a rate of 2.2% per year.<sup>25</sup> Premiums for plans on the exchange are expected to rise faster than the underlying medical trend.<sup>25</sup> To try to control costs, insurers are offering plans with lower reimbursement rates, narrower networks, and tighter management.<sup>25</sup> Since subsidies are tied to maximum percent of income and not to a percent of premium, individuals are insulated from premium increases. As a result, the government must carefully monitor health insurance costs and ensure the individual market is functioning properly to keep premium costs relatively low. If premiums continue to increase by 8.5% a year, the current state of the subsidy program could become unsustainable. The government would have to offer less generous subsidies,

which would be harmful to the insurance market, as more people will lack the funds for insurance.

**Insurer Regulation in Individual Market:** The ACA placed serious restrictions on insurer behavior in the individual market in exchange for providing insurers with greater enrollment and premium stabilization. Famously, the ACA eliminated lifetime limits and introduced guaranteed issue, meaning that no one can be rejected for a preexisting condition.<sup>18</sup> Plans on the exchanges cannot price based on health status or sex. Rating variation can only be based on geography, family size, metal tier, tobacco usage (limited to 1.5:1 ratio), and age (limited to 3:1 ratio).<sup>18</sup> Because plans are community rated (meaning everyone pays the same premium regardless of health status), the health of the insurance market depends on a diverse risk pool. Healthy people in the insurance pool inherently subsidize the sicker individuals by paying more than the actuarially fair premium. Previously, plans were experience-rated, meaning unhealthy people who needed insurance the most were charged much higher premium rates. The ACA was designed to eliminate this practice to create a fairer market.

All plans available in the marketplace must have at least an 80% medical loss ratio (MLR), while all group plans must have a minimum MLR of 85%.<sup>18</sup> The MLR represents the percent of premium spent on clinical services, quality, and other medical costs.<sup>18</sup> This does not include administrative and underwriting cost.<sup>18</sup> If a plan's MLR is below the benchmark, the insurer must rebate the excess premium back to the enrollees.<sup>18</sup> This regulation forces insurers to spend more on their enrollees and effectively caps their profits.

**Premium Stabilization:** Because of the guaranteed issue regulation and the marketplace subsidies, many new customers flooded into the insurance markets. However, insurers



cautiously approached the reformed individual market because they had no data on these new customers. In the most basic sense, insurance premiums are the expected cost of medical claims plus some expense loading. If insurers have no prior experience with their enrollees or no sense of their behavior, it becomes nearly impossible to model expected costs and develop a viable premium. In light of insurers' worries, the government established a premium stabilization program consisting of three parts: risk adjustment, risk corridor, and reinsurance.

Risk adjustment is the only permanent program of the three. The goal of risk adjustment is to "create a stable market in which health plan premiums will reflect the value of the coverage offered."<sup>28</sup> Risk adjustment transfers funds from insurers with relatively healthier enrollees to insurers with relatively sicker enrollees. If an insurer were to purposely design a plan that would attract healthier enrollees, the insurer would not keep all the profit because the insurer still needs to subsidize other firms with the sicker enrollees through a risk adjustment payment. Risk adjustment is a zero-sum game, meaning that the fees some insurers pay is equal to the total payments other insurers receive.<sup>31</sup> The payment is based on a complex formula that takes the difference between the plan premium estimate with risk selection and without risk selection.<sup>28</sup> The model that Health and Human Services (HHS) uses to determine the payments is based on current year data.<sup>28</sup> Risk adjustment is vital in creating a competitive marketplace because it prevents adverse selection in the health insurance market.

The risk adjustment formula gives each plan a plan liability risk score (PLRS), which takes into account a plan's generosity and enrollee health status.<sup>29</sup> The PLRS gives each enrollee a risk score composed of predicted insurance expenditures based on demographic and plan data, which is then compared to the enrollee's actual experience.<sup>28</sup>

The PLRS is used to calculate the plan's premium with risk selection. The premium with risk selection is compared to the premium without risk selection through the formula shown below.<sup>29</sup>

$$T_i = \left[ \frac{PLRS_i \cdot IDF_i \cdot GCF_i}{\sum_i (s_i \cdot PLRS_i \cdot IDF_i \cdot GCF_i)} - \frac{AV_i \cdot ARF_i \cdot IDF_i \cdot GCF_i}{\sum_i (s_i \cdot AV_i \cdot ARF_i \cdot IDF_i \cdot GCF_i)} \right] \bar{P}_s$$

**Figure 2**

If the difference is positive, then the plan receives a transfer payment to compensate for its worse than market average risk.<sup>29</sup> The left side of the equation represents the premium with risk selection, which is the product of the PLRS, the induced demand factor and the geographical cost factor.<sup>29</sup> The induced demand factor considers how a plan's generosity would change an enrollee's behavior to receive services more or less than necessary. The denominator represents the market average premium with risk selection. The right side calculates the premium without risk selection. This part of the equation calculates what a plan's premium should be based solely on the actuarial value, allowable rating factors, induced demand factor, and geographical cost factor.<sup>29</sup> The allowable rating factor is based on the strict underwriting restrictions of the ACA. A plan's premium without risk selection is then divided by the market average. The difference between the premium with risk selection and without risk selection is scaled to the average premium in the market, giving the risk transfer payment.

Since the risk adjustment formula takes into account the market average in the denominator, by definition, larger insurers are closer to market average. If a larger insurer has a higher PLRS than average, the market PLRS will be skewed upward and it is likely than the other plans will have to pay higher risk adjustment payments. In contrast, smaller

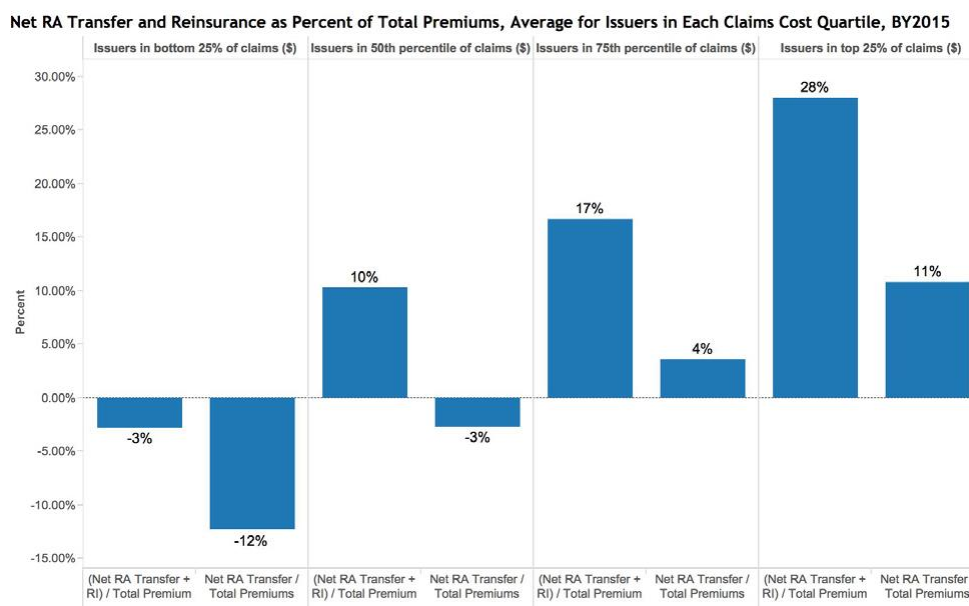
insurers are at a disadvantage because their payments are more likely to be skewed in a negative way.<sup>30</sup> The skewedness can become an issue for small insurers that owe risk adjustment payments, especially since they tend to have less capital. Risk adjustment also does not take into account the health of the national insurance market. If a particular market has worse risks than the national average, markets with better risks do not subsidize it. Theoretically, a plan with a high PLRS may still owe transfer funds if the market average is even higher. Risk adjustment is not intended to “ensure any greater stability from one year to the next in the market premiums.”<sup>30</sup> Risk adjustment equalizes the competition among plans in a single market but does not offset high claim costs or alleviate pricing risk.

The other two programs, reinsurance and risk corridor, are temporary programs that are effective from 2014-2016.<sup>31</sup> Reinsurance reimburses insurers when enrollees have extraordinary high claims. Insurers feared that enrollees on the exchange would be sicker than the general population and therefore be more likely incur catastrophic costs.

Lawmakers planned for reinsurance to be temporary because they anticipated that high-cost enrollees would participate in the marketplace first.<sup>31</sup> As the insurance market began to stabilize and more people enrolled with time, lawmakers predicted the population participating in the individual market would match the general population.<sup>31</sup> They hoped that as the risk pool increased in size, the healthy people would subsidize the sicker population, eliminating a need for a government reinsurance pool. The reinsurance fund comes from a fee levied on all insurance plans, including those outside the individual market.<sup>31</sup> HHS then redistributes this fund to insurers in the individual market with high claim costs. In 2014, HHS anticipated paying 80% of a claim in excess \$45,000 (up to a cap of \$250,000), but HHS has the power to alter this threshold to ensure payments don't

exceed the fund.<sup>32</sup> However, HHS was ultimately able to pay a coinsurance rate of 100% in 2014.<sup>32</sup> In 2015, the attachment point remained at \$45,000 but the coinsurance rate was initially reduced to 50% before HHS decided to raise it to 55.1%.<sup>32</sup> For 2016, HHS anticipates a \$90,000 attachment point with a coinsurance rate of 50%.<sup>32</sup> Like, risk adjustment, reinsurance was designed to be budget neutral.<sup>28</sup> The federal government contributes no monies to the fund; it is entirely financed by insurer payments.

Both reinsurance and risk adjustment are working as intended. The amount of paid claims is strongly correlated with both risk adjustment and reinsurance payments.<sup>33</sup> An insurer that is paying more claims has comparatively healthier enrollees and higher actuarial risk on average, and therefore, should theoretically be receiving money from plans with lower risk. Figure 2 shows the net transfer amounts compared to the claims quartile.<sup>33</sup>



**Figure 3**

Each claims quartile corresponds with the amount of claims paid relative to the industry; therefore, the insurers in the top 25% of claims are paying the relatively greatest amount

of claims. Insurers in the lower half of claims paid subsidize the insurers with higher claims paid and higher risk. When looking at payments as a percent of total premiums, the lower half pays in 15% and the upper half receives 15%, which matches the budget neutral principle. Instead of rewarding the insurers with low actuarial risk by allowing them to profit from risk selection, insurers with high actuarial risk must be subsidized to keep a competitive market and avoid adverse selection. These programs encourage insurers to save money by properly managing and preventing conditions instead of purposely trying to design plans that encourage risk selection.

Risk corridor, the final premium stabilization program, has not worked nearly as well as the others. The government intended to use risk corridor to provide a cushion for insurers when pricing plans for the individual market. If expected claims (as embedded in the premium) were within 3% of actual claims, insurers would keep all the gains or losses<sup>31</sup>. However, if actual claims exceeded expected claims by more than 3%, HHS would reimburse insurers at least 50% of the excess loss. If the expected claims exceeded the actual claims by more than 3%, insurers would pay HHS at least 50% of the excess. This program was designed to finance underpriced plans while penalizing overpriced plans to promote accurate pricing. This program was intended to be temporary because insurers should in theory understand the exchange population better with time and therefore will be able to price plans properly in the future.

Risk adjustment and risk corridor seem somewhat similar on the surface. However, risk adjustment considers the risk selection of the plan whereas risk corridor is based solely on the premium level. If a plan prices assuming they will have worse risks, but their experience reflects better than average risk, the premium would be underpriced and the plan would have healthier than average participants. Thus, the insurer would have to

make risk corridor and risk adjustment payments. On the other hand, if an insurer designs a bare bones plan to attract healthy enrollees and prices the plan under this expectation, they will not have to pay into risk corridor, assuming healthy people actually enroll in the plan. The expected claims would then match the actual claims. However, the insurer would still need to make risk adjustment payments because the plan would contain healthier than average participants. Risk adjustment intends to evaluate plans based on their level of coverage, so this less generous plan would be penalized.

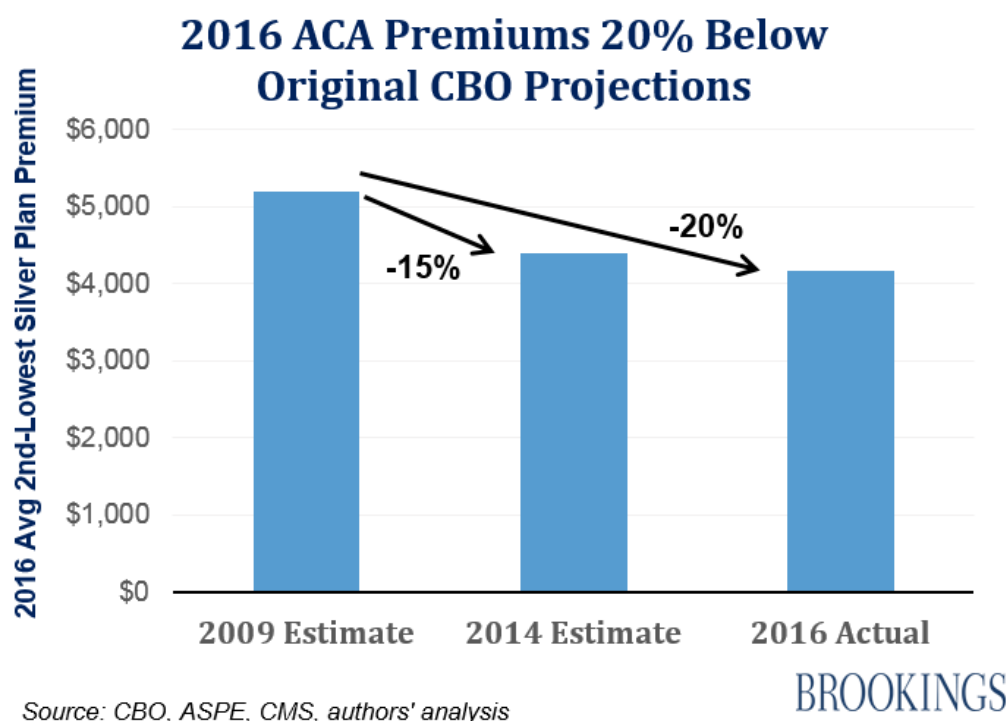
Initially, the federal government was allowed to provide funding for risk corridor payments.<sup>32</sup> However, Republican politicians perceived the payments as a bailout to health insurers and rewrote the regulation to ensure it was budget neutral.<sup>34</sup> Due to this change, the risk corridor fund fell extremely short, and HHS was only able to reimburse insurers 12.6 cents on the dollar in 2014.<sup>32</sup> Between 2014 and 2015, the federal government owed insurers about \$8.3 billion.<sup>34</sup> Insurers were furious because they had priced their plans expecting this payment. Some smaller insurers, like some co-ops based in Iowa and New York, were forced to dissolve as result of missed risk corridor payments.<sup>34</sup> Other insurers have sued the federal government for payment, and as of the end of 2016, these lawsuits are still ongoing.<sup>34</sup>

**Issues in the Exchanges:** By many metrics, the ACA is achieving its goals. In 2016, the uninsured rate reached an all-time low of 11%. People are generally happy with their coverage, and the structure of the subsidies ensures plans remain affordable for those who qualify.<sup>35</sup> However, as even President Obama will openly admit, the law is far from perfect. The exchanges face many problems with affordability, competition, and enforcement of regulation that threaten the stability of the individual market.

**Issue of Affordability:** In 2017, premiums in the individual market skyrocketed, increasing by an average of 25%.<sup>36</sup> In comparison, premiums rose 2% in 2015 and 7% in 2016.<sup>36</sup> (When reports say ‘average premium’ they mean the premium of the second lowest cost silver plan, off of which the subsidies are based) The Obama Administration tried to stress that these premium increases do not affect the average marketplace enrollee because the value of an individual’s subsidy increases with the premium. Of the 11.1 million enrollees on the marketplace in 2016, about 80% qualified for a subsidy.<sup>37</sup> These enrollees pay the same amount for insurance year after the year because their subsidies increase with premiums rather than their out of pocket expenses. Affordability especially concerns the federal government and those in the individual market with incomes above 400% of the FPL. For each year that premiums increase, the federal government must finance the increase in subsidies. If the growth in premiums becomes unsustainable for the federal government to support with the current financing model, the government will be forced to increase taxes, create new taxes, reduce the generosity of the subsidies or divert funds from other programs. At the rate premiums are increasing, this scenario is becoming much more likely in the near future. The federal government must find a way to fix the affordability problem out of both necessity and responsibility to its citizens. The other group that high premiums hurt is, ironically, higher income Americans who purchase coverage on the exchange. These individuals do not receive premium subsidies, so they are not insulated from premium increases like lower income Americans. In fact, a study by the Commonwealth Fund found that higher income individuals were more likely to view coverage as less affordable and to have higher deductible plans. Individuals above 400% of the FPL may choose to go uninsured and pay the tax penalty. Of uninsured Americans, nearly half are uninsured because they tried to get coverage, but it

was too expensive.<sup>38</sup> The high premiums likely cause some adverse selection in this group because only the healthy individuals could feasibly choose to forgo insurance. Premiums likely spiked in 2017 because insurers realized they were underpricing their plans.<sup>39</sup> Premiums for plan year 2017 were filed in spring 2016, so insurers had two years of data: 2014 and 2015. Only then could insurers start judging behavior and trend more accurately to price more exact premiums. Furthermore, the reinsurance program ended in 2017, so insurers were entirely on the hook for high cost claims. As a result, insurers needed to increase premiums because these high claims would only be spread across the insurer's enrollees, not the entire insurance market.

Insurers may have originally underpriced their plans to gain more market share, but by 2017, premiums needed to rise for plans to be sustainable. Evidence for the underpricing theory is backed by CBO projections, as shown in figure 3.<sup>39</sup>



**Figure 4**



The original 2009 projections for the 2016 annual premiums was about \$5,000, 20% lower than the actual experience. Likely, the CBO made more conservative estimates and assumed insurers would be more cautious when determining pricing. Since premiums spiked 25% in 2017, they moved closer to the original CBO projection and corrected for the underpricing in previous years. Therefore, the sharp increases in 2017 could very likely be a one time market correction rather than persistent trend.

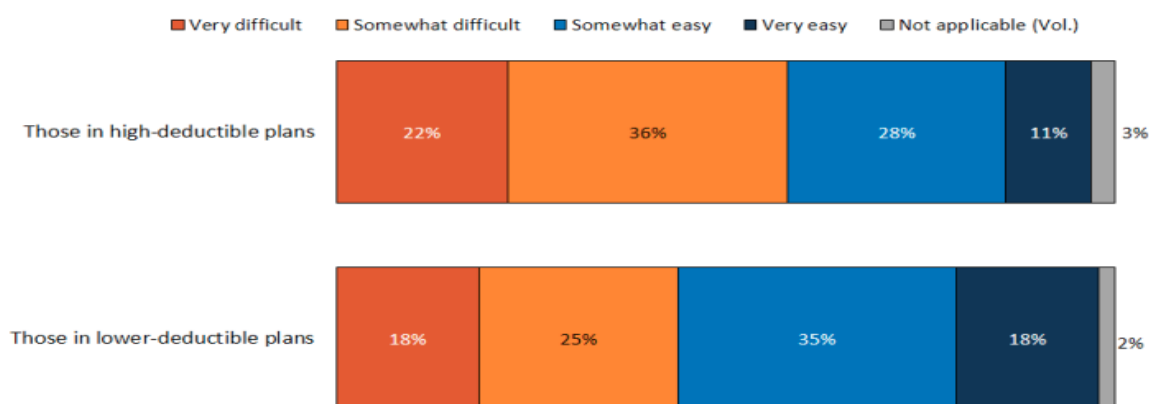
However, it will be difficult to test the one time correction theory due to the market disruption caused by the Trump administration. Even in their short time in office, the administration has already taken action to weaken the ACA. The 2018 rates will be filed in spring of this year. As of March, it is unclear how stringently the Trump administration will enforce the ACA. On his first day in office, President Trump signed an executive order that allowed him to “waive, defer, grant exemptions from, or delay” any tax laws or penalties associated with the ACA.<sup>40</sup> Soon after the inauguration, Trump senior advisor, Kellyanne Conway stated in an interview with George Stephanopoulos that the Trump Administration would stop enforcing the individual mandate.<sup>40</sup> At the tail end of the open 2017 open enrollment period, shortly after taking office, the new administration stopped running ads and outreach efforts to increase enrollment, despite the fact that these initiatives had already been paid for and created by the Obama Administration.<sup>41</sup> Without even considering the possible repeal and replace of the ACA, evidence has shown that Trump Administration will likely not vigorously enforce the regulations surrounding the ACA. As a result, insurers fear the adverse selection problem will worsen and will increase premiums yet again to protect themselves from higher expected claims. In addition to raising premiums, insurers have been shifting costs to enrollees by raising out of pocket costs to shield themselves from a worse risk pool. Even if a plan has

affordable premiums, it may have high out of pocket costs, rendering it effectively useless for routine care. Theoretically, there is nothing actuarially unstable with offering less generous plans in the highly regulated exchange marketplace. Plans must offer essential health benefits and risk adjustment prevents less generous plans from having a competitive advantage. However, insurance is supposed to provide financial security and peace of mind for the buyer. If potential enrollees see no financial value in having coverage due to high out of pocket costs, they may choose to simply pay the individual mandate penalty. This would worsen the adverse selection problem because only relatively healthy people would choose to do this. Studies by the Kaiser Family Foundation have found that satisfaction with deductibles has declined since 2014, and by 2016, only 51% percent of ACA enrollees reported being ‘satisfied’ with their deductible.

<sup>42</sup> Furthermore, those in high deductible plans (\$1500 for an individual, \$3000 as a family) find out of pocket costs to be more difficult to afford, as shown in figure 5 <sup>42</sup>

**Figure 14**  
**Those in High-Deductible Plans More Likely To Say Out-of-Pocket Costs Are Difficult to Afford**

AMONG NON-GROUP ENROLLEES WITH ACA-COMPLIANT PLANS: In general, how easy or difficult is it for you to afford the out-of-pocket costs your insurance doesn’t cover, like co-pays and deductible?



NOTE: High deductible defined as \$1500 or higher for an individual or \$3000 or higher for a family. Don't know/ Refused responses not shown.  
 SOURCE: Kaiser Family Foundation Survey of Non-Group Health Insurance Enrollees, Wave 3 (conducted Feb. 9-Mar. 26, 2016)



**Figure 5**

As marketplace plans feature increasingly high deductibles and out of pocket costs as a way to cut costs, insurers need to realize that buyers realize that more costs are being shifted on to them. Although health care is complex, enrollees know when they have to pay a bill. If costs become too high, insurance will no longer provide financial security and buyers will exit the market. Insurers must provide a valuable product that buyers want in order to create a sustainable market.

**Issue of Competition:** Recently, the individual market saw the high profile exits of Aetna, UnitedHealthcare, and most recently, Humana. In April 2016, UnitedHealthcare was the first to announce a mass exodus of the ACA exchanges except in a ‘handful’ of places.<sup>43</sup> United’s exit seemed to be purely a business decision as the company had lost \$475 million in 2015 and was on track to lose \$650 million in 2016 at the time of their announcement to exit the market.<sup>43</sup> Aetna announced its exit later that year in August. Its exit surprised many observers, especially since earlier in the year, CEO Mark Bertolini spoke highly of the exchanges and intended to expand the company’s presence.<sup>44</sup> Unlike UnitedHealthcare, Aetna’s decision to leave the marketplace was not purely a business decision. Aetna had been losing money on the exchanges: it had lost \$100 million in 2014 and \$131 million in 2015 despite projecting a \$100 million profit.<sup>44</sup> The vast majority of the marketplaces Aetna exited were unprofitable. On top of this, Aetna was due for a \$100 million payment from CMS for risk corridor and only received about \$12.5 million of it.<sup>44</sup> However, for seventeen counties that Aetna exited in Florida, Georgia, and Missouri, the Department of Justice (DOJ) found compelling evidence that Aetna had pulled out of these markets to avoid anti-trust accusations.<sup>44</sup> (At the time, the DOJ had sued Aetna over anti-trust concerns from its proposed merger with health insurer Humana. Humana had a large presence in these 17 counties. Aetna ultimately lost the

case and called off the merger with Humana.) According to the court opinion from the merger case, Aetna officials had allegedly told HHS Secretary Burwell that if the merger were blocked, Aetna “would likely have to revisit its plans for and presence on the public exchanges.”<sup>44</sup> Three of the counties in Florida that Aetna pulled out of were profitable.

The Court believes Aetna will likely compete in those counties again.<sup>44</sup>

In February 2017, Humana announced that it would no longer participate in the individual marketplace for the 2018 plan year.<sup>45</sup> Humana cited “signs of an unbalanced risk pool” after preliminary data to justify its decision to exit the market.<sup>45</sup> Humana had already been rolling back its presence on the marketplace and was only participating in 11 states with a total of 150,000 enrollees.<sup>45</sup> Ultimately, the effects of this decision will not be felt until the next open enrollment period, but Humana is just another example of an insurer struggling due to uncertainty surrounding the marketplace.

The health insurance marketplace is designed to work best when there are many insurers that compete to provide a high quality but low-priced product. When insurers decide to pull out of the market, it has a noticeable effect on premiums. Even though

UnitedHealthcare did not have the lowest or second-lowest premium in most of the markets they were in, economist Jonathan Gruber (one of the original architects of the ACA) estimated that the cost of the second lowest price silver plan would have decreased by 5.4% if UnitedHealthcare had stayed in the marketplace.<sup>46</sup> Furthermore, the same study estimated that if all the insurers active in the individual market in 2011 were active for the 2014 plan year, the second lowest silver plan would be 11.1% lower and the total subsidy would decrease \$1.7 billion.<sup>46</sup> When an insurer drops out of the market, it affects the market in two ways. First, that insurer could of actually priced the second lowest premium if it had participated. Second, if the insurer had participated, the additional

competition would have placed downward pressure on premiums. In the 2017 plan year, there were 5 states that had exactly one insurer in the marketplace.<sup>35</sup> Therefore, it is in both the government's and consumers' best interest to attract more insurers to the market. More insurers lead to a lower premium for individual consumers and to a lower subsidy expense for the government.

UnitedHealthcare and Aetna, the largest and third largest health insurers in the nation respectively, were not able to find footing in the individual market.<sup>43,44</sup> Their exits raise following questions: Why can't the largest, most successful insurers in the nation generate profit in the ACA marketplaces? Is it the fault of the insurers or the law itself? Part of the insurers' issues do stem from the weakness of some regulations, which will be explored later. However, there is compelling evidence that part of their struggles come from an inability to adapt to the challenges in the marketplace. Much of Aetna and UnitedHealthcare's business comes from employer group plans. This experience does not translate well to individual non-group plans. Before the ACA, the individual market was small and in danger of disappearing, so it was not a focus of large insurers.<sup>2</sup>

UnitedHealthcare's CEO cited struggles unique to the marketplace, such as "the smaller overall market size and shorter term, [and] higher-risk profile" as to why UnitedHealthcare was "unable to serve the exchanges effectively."<sup>43</sup> In addition to the challenges with the market structure, the population in the individual market tends to be poorer, less educated, older, and more racially diverse than the general population.<sup>16</sup> Enrollees in the individual market are less 'sticky', meaning they are unlikely to stay with the same plan every year because they gravitate towards the cheapest plans each year. Since consumers are constantly switching plans, insurers have little incentive to stress preventive care, which may lower medical costs in the long run. Furthermore, the

population in the exchanges is similar to the Medicaid population and 81% of ACA enrollees have incomes at or below 250% of the federal poverty line.<sup>35</sup> More and more plans are starting to mirror the narrow networks of Medicaid plans.<sup>35</sup> Despite the fact one might expect large insurers, like Aetna or UnitedHealthcare, to be more successful in the marketplace, it is actually smaller insurers specializing in Medicaid like Cetele that are turning a profit.<sup>35</sup> These insurers realized that the exchange population is similar to the Medicaid population in the sense that they are low income and not ‘sticky.’ Also, they were able to leverage their expertise in the Medicaid to create successful marketplace plans. Larger insurers specialize in employer group insurance, which features a very different population with different behaviors. These large insurers must realize that in the marketplace, they are offering a product that its buyers may not know how to use.

Insurers must provide education and outreach for newer enrollees who may not know how to utilize their plans properly. For example, new enrollees may go to the ER instead of going to a lower cost general practitioner for a routine issue because they do not have a family doctor. Teaching new enrollees how to use their plan correctly keeps costs down for the entire market and may not be something larger insurers anticipated having to do when entering the market. Ultimately, success for insurers translates to success for the marketplace.

**Affordability and Competition Analysis:** This section focuses on my findings on determinants of affordability in the marketplace. This analysis will be based on data from the healthcare.gov platform, so only states using the federal marketplace will be included. I will only consider data from 2015, 2016, and 2017. I am excluding 2014 because it was the first year of the marketplace, so insurers lacked reliable data to formulate premiums. The data set from HHS contains premiums from all plans on the marketplace in the given

year. I only considered the second lowest cost silver plan (also called the benchmark plan) for a single 40 year-old. The marketplace subsidies are based on the second lowest cost plan in the rating area (usually county). Health insurers generally consider a single 40 year old when creating a baseline. I condensed the final data set to only contain counties in the market since 2015, the premiums from 2015-2017, the number of insurers in the market from 2015-2017, a dummy variable for if Aetna or UnitedHealthcare offered a plan in that region in 2016, a dummy variable if the second lowest cost plan switched from a PPO to HMO (should lower price), a dummy variable if the second lowest cost plan switched from an HMO to a PPO (should increase price), and a population factor. The population data comes from linking the HHS data set to census data. The population for each county was assigned a factor (a dummy variable) based on the following table:

<b>Range</b>	<b>Population Factor</b>
0- 1,000	1
1,001- 5,000	2
5,001- 10,000	3
10,001- 25,000	4
25,001- 50,000	5
50,001- 100,000	6
100,001-500,000	7
500,001 -1,000,000	8
>1,000,000	9

Using this data, I created a linear model to predict 2017 premiums based on the 2016 premium. I decided to use a logarithmic regression model in order to understand the percent effect of each variable. The original model, using all the variables I created, is as followed:

```

> summary(lmfit)

Call:
lm(formula = log(Premium17) ~ log(Premium16) + Aetna_UHC + PPO_HMO_Change +
    HMO_PPO_Change + Pop_Factor + Insurers17, data = Comb)

Residuals:
    Min       1Q   Median       3Q      Max
-0.66576 -0.10304 -0.01654  0.09108  0.67274

Coefficients:
              Estimate Std. Error t value Pr(>|t|)
(Intercept)   1.725904   0.114177  15.116 < 2e-16 ***
log(Premium16) 0.781604   0.019292  40.514 < 2e-16 ***
Aetna_UHC      0.065393   0.008554   7.645 2.97e-14 ***
PPO_HMO_Change1 0.033138   0.012975   2.554 0.0107 *
HMO_PPO_Change1 0.046538   0.009511   4.893 1.06e-06 ***
Pop_Factor     -0.013882   0.001940  -7.156 1.09e-12 ***
Insurers17     -0.082825   0.003022 -27.410 < 2e-16 ***
---
Signif. codes:  0 '***' 0.001 '**' 0.01 '*' 0.05 '.' 0.1 ' ' 1

Residual standard error: 0.153 on 2505 degrees of freedom
(1 observation deleted due to missingness)
Multiple R-squared:  0.6343, Adjusted R-squared:  0.6334
F-statistic: 724.1 on 6 and 2505 DF, p-value: < 2.2e-16

```

**Figure 6**

The variable PPO\_HMO\_Change1, which measures if the second lowest cost plan switched from a PPO to an HMO only had an effect at the 5% level. Although this effect is significant at conventional levels, only 151 of the 2512 plans in the data set switched from a PPO to an HMO. Also, this estimate was positive despite the fact premiums are expected to fall when a plan switches from a PPO to a more restrictive HMO. Also, only 421 of the 2512 plans switched from an HMO to a PPO. Since these variables contain a relatively small percentage of the total plans in the data set and were not very meaningful, I felt that these variables were fairly noisy and decided to eliminate them from the final model.

The new model is as followed.



```

> summary(lmfit2)

Call:
lm(formula = log(Premium17) ~ log(Premium16) + Aetna_UHC + Pop_Factor +
    Insurers17, data = Comb)

Residuals:
    Min       1Q   Median       3Q      Max
-0.64189 -0.10601 -0.01171  0.09348  0.70284

Coefficients:
              Estimate Std. Error t value Pr(>|t|)
(Intercept)    1.708654    0.114731   14.893 < 2e-16 ***
log(Premium16)  0.784968    0.019380   40.503 < 2e-16 ***
Aetna_UHC       0.084314    0.007404   11.388 < 2e-16 ***
Pop_Factor     -0.013891    0.001948   -7.131 1.3e-12 ***
Insurers17     -0.081303    0.003010  -27.007 < 2e-16 ***
---
Signif. codes:  0 '***' 0.001 '**' 0.01 '*' 0.05 '.' 0.1 ' ' 1

Residual standard error: 0.1538 on 2507 degrees of freedom
(1 observation deleted due to missingness)
Multiple R-squared:  0.6301, Adjusted R-squared:  0.6295
F-statistic: 1068 on 4 and 2507 DF, p-value: < 2.2e-16

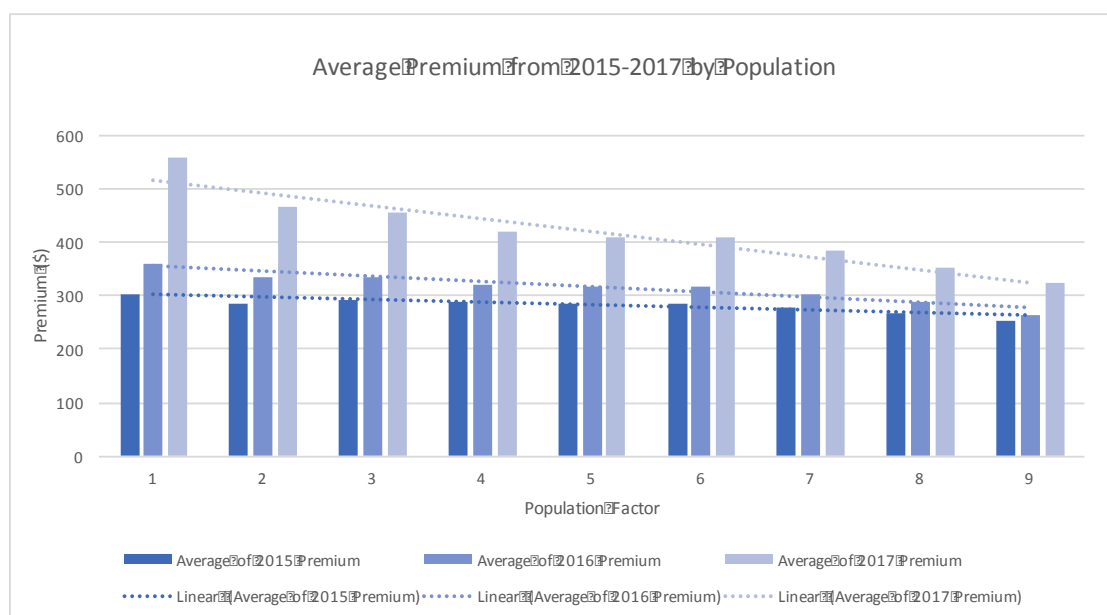
```

**Figure 7**

The adjusted R-squared (which penalizes the model for having more variables and being more complicated) is 0.63. These variables are somewhat correlated to premium. All of the variables in the model are statistically significant at the 0.001 level. The significance of the variables ‘Aetna\_UHC’, ‘Pop\_Factor’, and ‘Insurers17’ all support the theory that increased competition leads to lower premiums.

The ‘Aetna\_UHC’ variable measures if Aetna or UnitedHealthcare was present in the market in the year prior. This only takes into account their presence, not if they had the lowest or second lowest premium. Markets that Aetna or UnitedHealthcare pulled out of were expected to have a benchmark premium 8.43% higher. The exit of Aetna or UnitedHealthcare from a market causes a more oligopolistic or monopolistic market structure, which would logically lead to higher premiums.

The variable, 'Pop\_Factor', is based on the population factor table from above and is statistically significant at the 0.001 level. For each movement into a higher population bucket, the benchmark premium is expected to decrease by 1.39%. Once again, this supports the theory that greater competition leads to lower premiums theory. Not only do larger markets offer more potential enrollees to better spread risk, but also there is more competition among providers in a more densely populated region. A large city like New York City or Boston has many different doctors, hospitals, and other medical services that are competing to be part of an insurance network. If a single provider charges extremely high prices, there is enough competition where the insurer can reject that provider and find a less expensive close substitute for their network. As a result, the competition among providers forces rates down which is reflected in cheaper premiums. Over time, the difference in population leads to a significant difference in premiums, as illustrated below in figure 8.



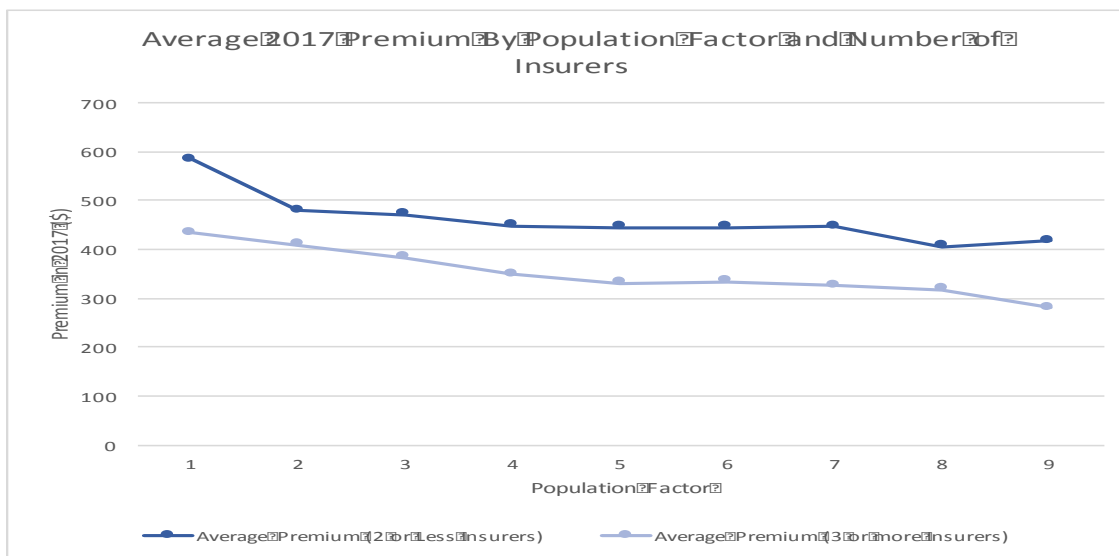
**Figure 8**

The spike in premiums in 2017 can be seen very clearly across all populations. Although higher population does lead to lower premiums, it does not insulate enrollees from increases in premiums.

Additionally, there are many other factors beyond population that affect premiums. In 2015 and 2016, the difference in premiums due to population had a downward but very flat trend. The variation in premium among populations was fairly small. However, in 2017, the difference in premiums due to population had a much steeper downward trend. Likely reasons for the steep trend are the end of the reinsurance program and/or that the general spike in premiums caused more variation. The first year without a federal reinsurance program is 2017, so insurers had to increase premiums to cover their greater responsibility for high cost claims. Areas with higher populations have a larger risk pool, so insurers are able to better spread the risk of high cost claimants throughout the plan's enrollees without the help of a federal reinsurance program. However, smaller populations cannot spread high claims as effectively. One large claim among a small population can skew the average amount of a claim upwards significantly. Premiums would have to increase significantly to cover a few high cost enrollees.

Furthermore, a more populated area would likely have more insurers. To increase market share and remain competitive, insurers must find ways to lower premiums. In more monopolistic markets, insurers have less of an incentive to lower premiums because most enrollees are subsidized and will continue to purchase coverage from that one plan instead of exiting the market. This is supported by the fact that the variable, 'Insurers17', which counts the number of insurers in the market, is significant at the 0.001 level. For each additional insurer in the market, premiums are expected to decrease by 8.13%. The combination of the number of insurers in a market and the population is especially

powerful. Of the 2512 counties on the federal exchange since 2015, only 780 of them have three or more insurers in the market. Counties that have three or more insurers have an average monthly premium of \$342.02 while counties with just one or two insurers have an average monthly premium of \$455.14, over \$100 more. This effect is illustrated below in figure 9.



**Figure 9**

Regardless of the population of an area, competition among insurers leads to lower premiums. Unfortunately, over half of the counties in the federal marketplaces have only 1 or 2 insurers, which leads to significantly higher premiums. The spike in premiums in 2017 along with the stifling of competition due to the high profile pullouts calls for changes to the law in order to create a more stable marketplace.

**Future of Health Care Reform:** In March 2017, the Republican majority in Congress and President Trump announced a replacement plan of the ACA. Throughout the past seven years, Republicans have fought the ACA tooth and nail and campaigned on ‘repealing and replacing’ the ACA. Now that the Republicans control both the legislative

and executive branch, they have drafted their own legislation that they hope will fulfill their campaign promises.

In early March, Speaker of the House Paul Ryan released the American Health Care Act (AHCA) as a replacement to the ACA. Surprisingly, this bill is not the antithesis to the ACA and is far from the full repeal many Republicans desired. The main features of the bill involve a replacement of the income-based tax credits with age-based tax credits, the repeal of the individual mandate, the repeal of some ACA era taxes on health insurers and high income earners, and finally the reduction of Medicaid expansion and Medicaid funds.<sup>48</sup> The change of the tax credit from income-based to age-based will significantly alter the risk pool in the individual market. However, the CBO predicts the individual market will remain stable in most areas.<sup>48</sup>

Currently, the ACA subsidies are designed to cap the amount lower income people pay for insurance each year, regardless of the premium. Therefore, this population will buy insurance at the same cost year after year. The subsidies are cut off at 400% of the FPL. The AHCA plans replace this with an age-based flat tax credit, starting at \$2,000 for those younger than 30 and up to \$4,000 for those 60 and older.<sup>48</sup> Although AHCA offers tax credits to those with incomes above 400% of the FPL, the flat tax credit will grow at the rate of the CPI index for all urban consumers plus 1% and will not take into account geographic variations in premium.<sup>48</sup> Premiums and medical trend tend to grow much faster than general inflation, so the relative value of the tax credit will decrease each year. Furthermore, the AHCA plans to change the age rating rules from the ACA. Previously, insurers could charge older citizens only three times the amount of a young person; the AHCA increases this rate to 5:1.<sup>48</sup> Also, the AHCA calls for a phase out of the requirements on actuarial value. Insurers will be able to offer less expensive, less

generous, catastrophic plans that only appeal to low-utilizers like young people.<sup>48</sup> The cumulative effect of these changes will likely lock out sicker people, older people, and poorer people from the market.

The lobbying group for health insurers, AHIP, has had a mixed reaction to the bill. In a letter to Congress, AHIP President Marilyn Tavenner implied the proposed tax credit might be too skimpy. AHIP prefers a tax credit formula that takes into account age and income to “help ensure that more people stay covered.”<sup>49</sup> Insurers’ goals should include enrolling as many people as possible, so they can spread risk and maximize premium revenues. This is why insurers cooperated with the Obama administration in drafting the ACA: they knew the ACA would add many more people into the individual market. Part of the lukewarm reaction to AHCA derives from the reduction of coverage. AHCA is expected to increase the number of uninsured citizens by 24 million compared to the current law.<sup>48</sup> This number is significant for many reasons, but from the business perspective of insurers, this means 24 million fewer participants.

AHCA was supposed to be the first of the GOP’s three-pronged solution to America’s health care woes.<sup>51</sup> The first prong consists of passing AHCA. The second prong involves loosening Obama-era regulations on insurers to stabilize the exchange. The third involves passing other health care related reforms outside budget reconciliation.

Experts have questioned the effectiveness of some of the third prong ideas, specifically high-risk pools and selling across state lines. Several states had established high-risk pools in the later half of the 20<sup>th</sup> century.<sup>8</sup> Many of the states that offered high-risk pools had a waiting list or an enrollment freeze, and enrollees still had to pay higher than standard rates for insurance.<sup>8</sup> In this model, states would depend on government money to subsidize the high-risk pool. An estimate by the Commonwealth Fund predicts a national

high-risk pool would need to cover 15.4 million people at net federal cost of \$178.1 billion per year.<sup>52</sup> AHCA allocates a maximum of \$10 billion per year to high-risk pools. High-risk pools would be unlikely to work because they would certainly never achieve the necessary level of funding. Insurers would either have to take a loss or charge higher premiums to the unhealthiest individuals. The Republicans proposing this plan are the same people who advocate reduced federal spending.

Furthermore, the requirement of community rated premiums is an extremely popular provision of the ACA. High-risk pools would remove higher claimants from the general risk pool and force them to pay higher rates, which would be politically unpopular.

However, other types of insurance currently utilize high-risk pools, particularly auto insurance. Pat Teufel, a past president of the Casualty Actuarial Society, thinks a high-risk pool would be unlikely to work in health insurance. She believes that medical trend is too high and the focus should be on lowering prices for all, rather than targeting high-risk individuals. Premiums in the car insurance reflect behavior and are actuarially fair, which is why a high-risk pool is necessary. A good driver does not pay a higher premium to subsidize a worse driver. Drivers can change their behavior by, for example, driving slower or without distractions to exit a high-risk pool and receive lower premiums.

However, one cannot exit the high-risk pool in health insurance by changing one's behavior. One cannot simply change a serious health diagnosis. In addition, health insurance is community rated. As a society, we feel it is unfair to charge people based on health conditions that cannot be changed, such as asthma, genetic disorders, or simply being a woman. By spreading the cost throughout society, insurers can still make a profit while not penalizing enrollees for having an uncontrollable health condition. Regardless of the existence of a high-risk pool or not, the government will still be subsidizing the

higher costs for sicker individuals. It would be more politically feasible to combine healthy and sick people into a single pool and subsidize that pool.

Selling insurance across state lines is a personal favorite of President Trump, who mentioned it during his first joint address to Congress. However, insurance experts do not feel the same way. Some states have actually already tried to allow insurers to sell across state lines, but out-of-state insurers have not chosen to enter another state's market.<sup>20</sup>

Creating provider networks is largely a local task, so it is difficult for an out-of-state insurer to establish a network, promise high enrollment, and negotiate competitive rates.<sup>53</sup>

In addition, enrollees in high cost areas would still have to pay higher premiums because premiums are a function of local health costs, regardless of what state the coverage is purchased in.<sup>53</sup>

Because of the McCarran-Ferguson act, insurance is regulated at the state level. Selling insurance across state lines would lead to a so-called race to the bottom. States with more regulation would have higher premiums whereas states with less regulation would have lower premiums. The regulations and consumer protections would be favorable for high-risk enrollees, but lower premiums in the less regulated states would attract a healthy population. Therefore, there would be adverse selection in states with more regulation, and possibly threaten the viability of the insurance market in these states.<sup>20</sup> If insurance was regulated at the federal level, selling across state lines may work because insurers would be unable to game the system. Once again, the people proposing this idea, the Republicans, are fundamentally against more federal regulation. Selling insurance across state lines would fail as a result of Republican aversion to centralized regulations and the difficulty in establishing competitive networks.



AHCA has received criticism from the left for not being generous enough and for removing Obama-era protections and from the right for not going far enough in removing federal regulations. Various trade and consumer groups, like the American Medical Association, the American Hospital Association and the AARP, have voiced their opposition along with think tanks from all ideologies.<sup>54</sup> The proposal was widely disliked by voters, who overwhelmed their representatives with calls, town hall meetings, and protests. Ultimately, Speaker Ryan pulled the bill from the floor because he could not garner enough supporting votes. The future of health care in America is extremely uncertain at this point because, as President Trump recently learned, health care is complicated.<sup>55</sup>

**Possible Reforms to the ACA:** President Obama is the first to acknowledge that the ACA has much room for improvement. He understands that “the nation typically reaches its greatest heights when we find common ground between the public and private good and adjust along the way.”<sup>56</sup>

President Obama has advocated adding a public option to the ACA, especially in areas of the country where competition is limited.<sup>56</sup> A public option would likely be able to use the federal government’s influence to negotiate rates at or near Medicare rates.<sup>20</sup> The American Academy of Actuaries recommends that the federal government still sell plans with a self-supporting premium to avoid disrupting the private market too much.<sup>20</sup>

Providers fear the establishment of a public option would lead to lower reimbursement rates.<sup>11</sup> Despite these worries, the public option could be extremely beneficial to the individual market. As the analysis of premiums from earlier shows, markets with more insurer competition have much lower premiums. Even if the public option could not negotiate rates as low as Medicare rates, the federal government still maintains an

advantage over private insurers in terms of administrative costs. Slightly over 20% of each premium dollar from private insurance goes to either profit or administrative costs.<sup>57</sup> On the other hand, a total of 6.4% of Medicare's budget goes towards administrative costs.<sup>57</sup> Unlike private insurers, a public option plan would not be bound to stockholders. The principal-agent problem would be alleviated because the users of the public option are also voters.<sup>11</sup> If they did not like how the public option is currently being run, they could vote in other officials to make the desired changes.<sup>11</sup> The federal government has experience in creating a well-received health plan and can leverage this experience to force competition in struggling markets to bring down health care prices.

Also, the government could theoretically force individuals that do not have a private individual plan and fall outside the employer or government system to enroll in the public option. Although the individual mandate already requires that all Americans to have health insurance, its weak enforcement has factored into many Americans' decision to stay uninsured. Since the federal government would control a public option, it could potentially auto-enroll participants who do not have other health coverage. If individuals are auto-enrolled, the uninsured rate in the United States becomes effectively 0 and charity care would be virtually eliminated. When an uninsured person receives care, they are forced to pay much higher rates because they do not have the negotiating power of an insurance company behind them. As a result, many uninsured people cannot afford their hospital bills and go into medical debt or the bills remain unpaid. The cost of uncompensated, 'charity care' is implicit in the providers' negotiated rates with insurers. Insurers then pass on these higher rates to the enrollees through higher premiums who effectively subsidize the higher costs of the uninsured.

Another, although not as commonly discussed, idea for health care reform is the introduction of all-payer rate setting. This method, coupled with a public option, could potentially be very effective in lowering health care costs. Normally, reimbursement rates are determined through a negotiation between a single insurer and provider. If an insurer lacks negotiating power, the provider can charge much higher rates. All-payer rate setting gives insurers more negotiating power at the expense of each insurer's competitive advantage to receive relatively lower rates. In this system, all the insurers in a region negotiate together or pay the same price set by an independent regulatory agency.<sup>58</sup>

Insurers compete on the quality of their services, not their ability to negotiate rates.

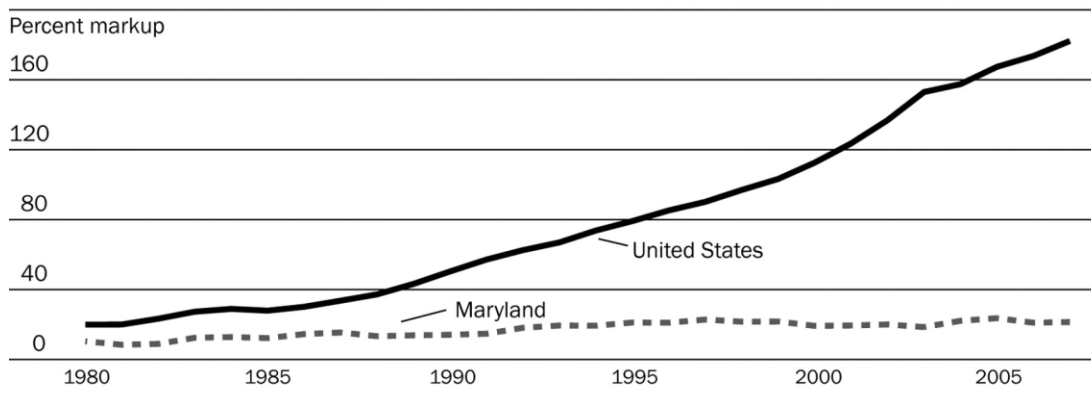
Maryland is currently the only state that has all-payer rate setting, and a state regulatory agency sets the reimbursement rates for inpatient, hospital-based outpatient, and emergency services that all insurers must pay.<sup>58</sup> Maryland has found success with this system. The state's cost per case is 2% lower than the national average, resulting in \$43 billion in savings since the program was implemented in the 1970s.<sup>58</sup> Insurers have been satisfied with the program, especially because they benefit from the greater negotiating power of the federal government. The federal government programs cannot opt out of negotiations unless the regulatory agency recommends increasing Medicare costs above the national average.<sup>58</sup>

In Maryland, rates must be approved by HSCRC (Health Services Cost Review Commission), an independent governmental agency.<sup>58</sup> The goal of the HSCRC is not to cap profits; rather it is to cap costs.<sup>59</sup> In Maryland, all-payer rate setting essentially limits the budget of hospitals by eliminating hospitals' power to demand rates multiple times above cost.<sup>59</sup> However, there are no regulations on how hospitals spend this budget, so if hospitals are efficient in allocating their resources and provide the necessary care to

prevent over-utilization, the hospitals can still profit. The all-payer rating setting system aligns the incentives of the hospital with the insurer, as they both want to control ‘utilization per case.’<sup>58</sup> Because the HSCRC sets a global budget for the hospital rather than the hospital setting its own budget through negotiations with different insurers, the amount of mark-up in Maryland hospital prices is much less than the national average.<sup>58</sup> Because all payers (and in the Maryland system, the uninsured) pay the same rate, hospitals cannot shift costs.<sup>58</sup> Smaller insurers with low negotiating power pay the same rate as the largest insurer in the state. The staggering difference in the average hospital markup in Maryland against the rest of the country is shown below.<sup>58</sup>

### EXHIBIT 3

#### Average Hospital Markup (Charges Over Costs), Maryland And United States, 1980–2007



**SOURCE:** American Hospital Association statistics, 1980–2007.

**NOTE:** Maryland's Markup includes the provision for the financing of uncompensated care (which accounts for about 8 percent of hospital revenue or approximately 40 percent of Maryland's 21.5 percent markup of charges over costs).

### Figure 10

An all-payer rate setting system prevents hospitals from grossly overcharging insurers and patients. Yet, in Maryland, hospitals are not going out of business and patients are still finding access to care. If all-payer rate setting were applied on a national level, a significant drop in premiums would be likely because hospitals would no longer be able

to charge multiple times their costs in the opaque negotiations process. The MLR regulations in the ACA force insurers to pass on these cost savings to enrollees instead of keeping level premiums and profiting.

Furthermore, all-payer rate setting controls costs without directly rationing services.

Currently, in the United States, services are not directly rationed by the central government like in single payer systems in other industrialized countries. Some Americans' opposition to health care reform is partially derived from a fear of rationing leading to a loss of access. However, there is evidence that all-payer rate setting can 'temper excessive use of cost-increasing technologies' but does not reduce their availability.<sup>60</sup> All-payer rate setting is more politically viable than converting a single-payer system because it controls costs while keeping a free market structure without limiting access. Currently, at least five other countries use all-payer rate setting systems including Germany and Japan.<sup>61</sup> Over the period from 2000 to 2008, the United States' health spending as a percent of GDP grew 2.7 percentage points, whereas Japan's and Germany's grew .8 and .3 percentage points respectively over the same period.<sup>61</sup> As other countries have demonstrated, a nationally implemented all-payer rate setting system could be extremely effective in tempering health care costs.

Unlike many of the reforms proposed, all-payer rate setting has a direct effect on lowering costs. Premiums will continue to rise and damage the stability of the individual market until the United States controls its cost problem. All-payer rate setting forces providers to accept a lower rate in exchange for business with all insurers. Furthermore, all-payer rate setting allows for quality adjusted payment initiatives to be easily established system-wide. Currently, the health system in the United States operates largely on a fee-for-service basis where providers are reimbursed for each service they

perform, regardless of its need. A quality based system rewards providers that better manage cases. This leads to better outcomes for patients, which translates to lower claims.

Furthermore, the ACA has been less effective in rural areas, which tend to have fewer insurers and a monopolistic provider environment. In the current structure, doctors' increased negotiating power allows them to demand higher reimbursement rates, leading to increased premiums for consumers. All-payer rate setting would allow insurers to negotiate a lower rate and return the savings to consumers. An all-payer rate setting combined with a public option could potentially be very effective because all-payer rate setting prevents the public option from undercutting the reimbursement rates of private insurers while adding more competition to the market. In this model, the role of the insurer would need to change dramatically. Currently, the most successful insurers typically have the most negotiating power. If these changes were implemented, insurers would have to compete on the quality of their administrative services, ability to manage conditions, and other, less tangible qualities. The insurance industry would have to change to a more patient-centered industry to survive, which would benefit all Americans.

Although these combined changes would be very effective in redefining and improving the American health care industry, they necessitate tremendous amounts political capital and will not come quickly. These changes should not be a replacement for the ACA.

Rather they should complement the current law. In the short term, the ACA can be improved by increasing the strength of its regulations.

First, lawmakers should try to alter some regulations to increase the size of the risk pool.

The original enrollment numbers projected by the CBO in 2010 are much less than the

actual numbers.<sup>23</sup> For political reasons, the individual mandate is extremely weak. As result, healthy people who do not receive subsidized coverage in the individual market tend to forgo coverage. For an example, according to the data analysis done earlier, the average premium for the second lowest cost silver plan for a single 40 year old man is about \$5,040 annually. If this individual makes \$50,000, which is just above 400% of the FPL, then paying the \$1,250 mandate seems much more appealing than paying \$5,040 in solely premiums for insurance. Insurers are frustrated with the individual mandate's lack of teeth, which has led to 10% less young adults in the marketplace than projected.<sup>35</sup> Other countries that have a private insurance-based universal coverage system have much harsher penalties. For example, in Switzerland, individuals that do not have coverage within three months are penalized with garnished wages and possible jail time.<sup>35</sup> A harsher individual mandate penalty will bring more, especially healthy, people into the market to create a better risk pool.

Increasing the generosity of the subsidies by increasing their amount and expanding eligibility would also improve the risk pool. Despite the subsidies, affordability is still a major issue for a lot of people, especially those right above 400% of the FPL.<sup>20</sup> The ACA subsidies are less generous than originally proposed because President Obama did not want the bill to add to the deficit.<sup>2</sup> The ACA has been successful in lowering the deficit and in fact, has cost 28% less than the CBO projections.<sup>56</sup> The federal government could easily use some of these savings to expand the subsidies and provide affordable coverage to more people.

The federal government could also improve its outreach initiatives. A study done in Texas, Arkansas, and Kentucky found that awareness of the ACA was the strongest predictor in applying for coverage while application assistance was the strongest

predictor of successful enrollment.<sup>62</sup> Kentucky had the greatest success out of the three states partially because it made specific effort to provide general outreach and awareness efforts and branded itself distinct from the less popular national law.<sup>62</sup> The state of Texas had the worst enrollment outcome because it effectively tried to oppose the law at every possible decision. The study concluded that “state policy decisions are likely having a critical impact...on who chooses to apply for coverage and whether they successfully enroll.”<sup>62</sup>

In 2017, the effect of outreach on enrollment became fairly obvious. Marketplace sign-ups were in line with 2016, until the Trump administration stopped outreach efforts and caused a decline in enrollment.<sup>63</sup> (These states control their own advertising.) The final enrollment data has indicated that states that run their own exchanges have had a stronger performance than the federal marketplace.<sup>63</sup> The decline in enrollment will have a negative effect on consumers. The nonpartisan Brookings Institute estimates that a 5% decline in federal marketplace sign ups translates to roughly 1% higher individual market claims.<sup>63</sup> To mitigate this problem, the federal government could create a minimum standard for outreach and provide support to states that are more averse to running outreach efforts. Most importantly, the government should offer easy to understand, accessible, and heavily advertised enrollment assistance to its citizens. The government must stress how the subsidies work in order to make insurance affordable and explain to its citizens why it is important to purchase coverage, no matter if you are young, old, sick, or healthy.

On the insurer side, the federal government needs to provide more premium support. Insurers were extremely angry over the missing risk corridor payments. Even former CMS head under President Obama, Andy Slavitt, admits it would be better if risk corridor



payments were made.<sup>64</sup> Honoring the payments may not bring insurers back into the individual market, but it would help insurers that are currently in the market become more profitable and encourage them to stay. However, risk corridor makes better sense as a temporary program because as insurers gain more data about ACA enrollees, they should be able to price their premiums properly. Reinsurance, on the other hand, should become a permanent program. A federal reinsurance pool offsets some risk for insurers, leading to lower premiums. The ending of reinsurance contributed to the spike in premiums in 2017. Continuing this program would lead to a better management of risk for insurers and eliminate some of the fear in entering the individual market. Slavitt, along with the American Academy of Actuaries, supports the establishment of a permanent reinsurance program and believes it would help stabilize the market.<sup>20,64</sup> The risk adjustment program should be periodically updated to better serve the needs of insurers. Currently, risk adjustment is determined based on the market average premium, which inherently benefits larger insurers.<sup>65</sup> The formula should be adjusted to take into account the size of an insurer to avoid giving one insurer too much clout. Also, risk adjustment is dependent on doctors identifying conditions and coding them correctly.<sup>65</sup> Taking pharmacy data into account may help insurers catch conditions more quickly and easily, without spending as much time and energy to educate providers.<sup>65</sup> The risk adjustment model must be recalibrated every few years to make sure it is properly compensating insurers.<sup>65</sup> Changing these regulations on the consumer and insurer side is definitely feasible and will stabilize the exchanges in the short term. In the long term, the United States should explore adding more competition and capping costs by utilizing both a public option plan and an all-payer rate setting system. The competition will force insurers to offer a high-quality, low cost product, while capping costs will lead to overall

lower premiums in the market. Although health insurer profits will not reach the high levels of years past, the United States can create a system where everyone will be guaranteed coverage at an affordable rate and where health insurers can be guaranteed a large customer base and stability.

**Conclusion:** Essentially, health care reform in America boils down to two different questions: 1) What is the federal government's role in ensuring health insurance coverage for every American? and 2) How can the United States control health care prices?

Republicans and Democrats have contrasting views on the first question. Democrats tout the reductions in the uninsured rate due to provisions in the ACA. On the other hand, the Republican proposal for health care increases the number of uninsured by 24 million, tilts the market towards the younger and richer people, and contains a large tax cut for the wealthy. The Republicans' vitriol for the ACA and their replacement bill make it clear that they do not feel it is the federal government's role to ensure that every citizen is insured. Until we, as a country, decide whether it is a right of all citizens to have health insurance, sustainable health care reform will be impossible. Every time the party in power changes, so will the regulations and laws surrounding health care. The individual market and government regulation have now become very intertwined, so the political uncertainty around reform will undoubtedly create an unstable market.

To answer the second question, prices in the health care sector rise much faster than inflation each year. However, no prominent health care reform plan has tried to attack health care costs. Health care premiums are a function of health care costs, so until the United States controls its cost problem, premiums will continue to rise. Drastic policy measures, such as adding a public option and pursuing an all-payer rate setting system, must be pursued to lower costs. A public option would place downward pressure on

premiums by adding more competition to the market, while all-payer rate setting ensures all insurers pay the same reimbursement rates to providers. All-payer rate setting forces all insurers to negotiate together, which prevents providers from gouging insurers in individual negotiations. Furthermore, sharpening the teeth of ACA regulations, such as better enforcement of the individual mandate and premium stabilization programs, work to lower premiums by mitigating adverse selection issues.

The ACA should not be an end all, be all. Rather, it should be the first step in a process to reform health care in America. The ACA seems like it is here to stay. When the ACA was in danger of being repealed, public opinion quickly turned against AHCA. Once people realized how the ACA changed their quality of life, they were determined to keep the law on the books. Politicians should build on the success of the ACA in order to pass regulations that control prices in the health care market. Ultimately, the United States will keep the Affordable Care Act as the law of the land, but it can and should be evolved to continually respond to America's complex and challenging health care needs.

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