

# Banks, insurance companies, and discrimination

Block, Walter and Snow, Nicholas and Stringham, Edward

Fayetteville State University

September 2008

Online at https://mpra.ub.uni-muenchen.de/26035/ MPRA Paper No. 26035, posted 27 Oct 2010 14:37 UTC

# **Banks, Insurance Companies, and Discrimination**

Walter Block\* Department of Economics, Loyola University New Orleans, LA 70118 Nicholas Snow Department of Economics, George Mason University, Fairfax, VA 22030 Edward Stringham Department of Economics, San Jose State University, San Jose, CA 95192

Abstract

This article examines some of the reasons why banks and insurance companies have been accused of discrimination, and shows that this is by and large a false accusation. Economic analysis demonstrates that racial discrimination is not a profit maximizing strategy. Actually, unwise public policies are actually precluding many consumers from the market.

JEL Classification: J15

Key words: Racism, discrimination, banks, insurance, market failure

<sup>\*</sup> We thank the editor and two anonymous referees for helpful comments and suggestions. The usual disclaimers apply.

# **1** Introduction

Insurance companies and banks are frequently accused of racial discrimination. This accusation is often brought about by the fact that minorities frequently have higher insurance rates and receive fewer loans. There has been a great deal of attention paid to the theory of discrimination in the economics literature (for examples see Arrow 1972a, 1972b; Becker 1971; Block 1992; Phelps 1972; and Stigler 1971) as well as to empirical studies of discrimination in the insurance and banking industries (for examples see Angel et al 2005; Benston 1999; Berkovic et al 1992; Black 1997; Black et al 1997, 2001; Buzzacchi and Valletti 2005; Calomiris et al 1994; Coate and Loury 1993; Evans et al 1985; Ferguson and Peters 1995, 1997; Holmes and Horvitz 1994; Horne 1997; Kerwin and Hurst 2002; Longhofer and Peters 1999; Muth 1979; Ross and Yinger 2002; Tootell 1993; Randall 1995; and Yezer et al 1994). While discrimination has been an issue in both industries for quite sometime a study done by the Boston Fed in 1992 concluded that there was indeed systematic discrimination in the mortgage-lending market. Despite many studies that followed (For examples see Bostic 1996; Browne and Tootell 1995; Day and Liebowitz 1998; Harrison 1998; and Munnell et al 1996), some attacking the Feds findings and some defending them, the study was all the legislators needed to move into action (Liebowitz 2008). One answer to eliminating this discrimination comes in the common proposal for the government to intervene and impose mandatory insurance and lending schemes (Wray 1995; Appelbaum 2008; Jagger 2007). Since the Boston Fed study came out many states have enacted laws imposing controls on both the banking and insurance industry. There was even a manual for mortgage lenders.

Regulation, however, may not be the best answer. Regulation often has unintended consequences that exacerbate the problems they are intended to solve. An alternative way to reduce or eliminate discrimination is through competition. Through competition we can see that discrimination would not last long in a free market.<sup>1</sup> Market forces would make sure that those who choose to engage in discrimination would bare the costs of doing so. This shows that it is something other than racial discrimination that is the cause of the differences in rates. In this paper we will present the conditions under which discrimination is not likely in the insurance and banking industries and then show why regulation is the wrong path for alleviating the differences in price for minorities. The same regulations that are meant to help actually end up doing more damage.

Section 2 examines the theory why discrimination is not sustainable under the assumption that companies are profit driven in the insurance industry. Section 3 does the same but in regards to the banking industry. Section 4 discusses the consequences of government intervention in banking and insurance. Section 5 concludes.

### 2 The Case of Insurance Companies

Many urban consumers pay higher insurance premiums than consumers. A few possible explanations exist, but one common hypothesis is that insurance companies engage in racial

<sup>&</sup>lt;sup>1</sup> As we will discuss competition provides incentives for companies to not act in discriminatory ways. Economics recognizes that taste-based discrimination on the part of consumers, however, is a different matter. Since people do not claim that taste-based discrimination on the part of consumers in the banking and insurance market a problem, we will not address it in this paper.

discrimination.<sup>2</sup> A company engaging in racial discrimination could be motivated out of malevolence or they could view it as a way to increase profits.<sup>3</sup> If insurance companies, for example, would exploit minorities into paying higher premiums they could earn higher earnings in the long run. Let us assume, that insurance companies do indeed want to earn as much from urban consumers and have no problem discriminating based on race. While most people assume that government regulation is necessary, they overlook a totally different solution: competition. Unlike regulation and other interventions into the market, competition provides important incentives to reduce or even eliminate racial discrimination.<sup>4</sup>

Consider what would happen in an insurance market where urban minorities are exploited. Take a hypothetical, but plausible, example. Let us say home insurance has a market rate of \$2,000, but urban minorities are purposely overcharged. Just because of their demographics, they have to pay \$3,000. By simply discriminating these insurance companies have enabled themselves to make an extra \$1000 profit on every minority they insure.

But is this really sustainable? The outcome depends on what types of insurers exist. If any insurers are motivated by profits over race, they would try to insure as many minorities as possible.<sup>5</sup> The more minorities the profit motivated companies signed up, the

<sup>&</sup>lt;sup>2</sup> Calls of discrimination in the insurance industry come from many different sources. From politicians (Kagen 2008) to news reports (Kurkjiian 1995a, 1995b; Sherman 2008; Ruiz 2008) to scholarly papers (Squire 1997).

<sup>&</sup>lt;sup>3</sup> See for examples Block 1992 and Liebowitz 2008.

<sup>&</sup>lt;sup>4</sup> See Alchian and Kessel 1962; Becker 1971; Benston 1999; Block 1992; and Cymrot 1985.

<sup>&</sup>lt;sup>5</sup> But if they could really get away with this why would they only charge the higher price to minorities? Insurers would truly want to charge as many people this price regardless of whether they are a minority or not. If a company is profit driven this should seriously call into question what is really going on.

higher their profits. No profit maximizing company would pass up the opportunity to make so much extra money. Indeed, why would the company bother with non-minorities at all? With so many profitable minorities to insure, non-minorities would be shown the door.

In reality, however, this situation cannot last for long. Other companies alert to profit opportunities would catch on and undercut their competitors by offering insurance for slightly less.<sup>6</sup> This would attract further business from the minority community, so instead of making \$1000 profit on a handful of downtrodden, it could make say \$900 profit on hoards of people. The latter position would yield enormous profits. Would this be the final outcome? Would minorities now be exploited, only this time to the tune of \$2900 at the hands of the new competitor?

The answer is no. Retaliation would ensue and others would charge less, to increase profits in the same fashion. In this case companies charging \$2900 would lose customers or be forced to lower their price as well. This process would continue until the price paid by the customer roughly equaled the marginal cost to the company, \$2000. With competition, no firm would be able to exploit minorities by charging them \$3000 for \$2000 insurance. In the long run, if the price of the insurance to a customer stays at \$3000 that must be its market value.<sup>7</sup>

<sup>&</sup>lt;sup>6</sup> This does assume free entry into the market, and when there is no free entry these results do not hold. An example of large scale discrimination occurring due to lack of free entry was found in the American South in the early 20<sup>th</sup> century with the Jim Crow laws. Roback (1986), however, shows that much of the segregation was a result of state intervention, not the free market. This was also more recently shown by Bartlett (2008).

<sup>&</sup>lt;sup>7</sup> Operationally the long run would refer to the point when others become aware of profit opportunities. With all of today's technology, this time frame is becoming shorter and shorter.

A competitive system provides incentives for profit maximizing firms to serve minorities. But what if companies are motivated by something besides profits, such as the desire to advance racial discrimination? A situation with racially motivated companies' sounds dour, but for racial discrimination to be the long run equilibrium this motivation must be industry wide.<sup>8</sup> Otherwise the businesses are driven by profits will under cut the businesses driven by discrimination and the latter would find it difficult to sustain the costs associated with the racial hatred.

Harrington and Niehaus (1998) have found the evidence of discrimination to be lacking and one study found that many reports that claim discrimination are using bad or incorrect data (Harrison 1998). So why do disparities between insurance rates persist in absence of laws forcing them to conform? Simple: many insurable risks are higher in the inner city where a proportionately higher number of minorities live. Through no fault of their own, city dwellers are often faced with higher rates of crimes against their property.<sup>9</sup>

If property is more often the target of burglary, the inner city insurance customer would need to be reimbursed more often than his suburban counterpart and this translates into higher premiums. It is completely unrelated to racial discrimination (Williams, 1982, 19). All of the additional costs to the insurance company require higher premiums if bankruptcy is not to ensue. The fact that city residents face a higher risk of infringements on their property is unfortunate, but insurance companies set their rates based on

<sup>&</sup>lt;sup>8</sup> One of the more discriminatory environments in recent history was in the American South in the early 20<sup>th</sup> Century, but it also must be recognized that much of the discrimination was enforced by government laws rather than the market. See for example, Roback (1984, 1986) and Bartlett (2008).

<sup>&</sup>lt;sup>9</sup> There is no evidence that lenders discriminate by accepting only the most qualified black applicants and marginally qualified whites (Benston 1999). In fact, Berkovic et al. (1992) find just the opposite.

actuarial tables not personal worldviews.<sup>10</sup> If they did it would create profit opportunities for companies that were more sensible.

Let us consider a related example. Owners of housing in flood plains are also faced with the unfortunate problem with owning property more likely to be damaged through no fault of their own. But just because the risk of property damage is not their fault, does not mean they should expect to pay the same insurance premiums as people whose property is less likely to be damaged. The property with higher risks will have higher premiums, even though no discrimination is operating here. If discrimination were to surface, it would get penalized by the market process.

Yet some people argue it is unfair that people should be penalized merely for living in a high-crime neighborhood. The theory is that they have a hard enough time as it is. Insurers should not add to the burden by tacking on penalties for poor living conditions that residents would change if they could. For this reason many state governments, most famously Massachusetts, have set maximum price ceilings on insurance premiums.

Is government intervention in the insurance market the most effective way to benefit the downtrodden? Unfortunately government interference with insurance rates has the unintended consequence of preventing many people from finding insurance. First let us consider the theory and then let us consider the evidence. Suppose an insurance company is legally forbidden from charging anything above the going rate for insurance in the suburbs, \$2,000. What customers will insurers tend to want to insure? With a price ceiling imposed, the insurance corporations will do everything they can to not insure any inner city residents.

<sup>&</sup>lt;sup>10</sup> It is true that actuary tables can be calculated in number of different ways, including with racial or other prejudicial attitudes. If, however, a company does this it will bare the costs of doing so. A profit maximizing company would not factor irrelevant racial variables into their actuarial analysis.

The inner city residents will be discriminated against in a real sense, but in this sense the problem is not inherent in the market, the problem stems from the price controls. The companies are not being racist; they are simply responding to perverse incentives created by bad policies. In this example, the government has moved us from a situation where there had been no shortage of insurance for people in the inner city to one where it is virtually unavailable.

Another tactic is to impose anti-discrimination law that imposes penalties if government notices any systematic disparities in the pricing structure for insurance between racial groups. The company will still face the reality that risk pools are not equal for all people. The companies have to be more subtle about it, but they will do what they can to avoid high-risk areas. In this way, antidiscrimination law works like a price control. It distorts the availability of insurance, raises premiums for everyone, restricts innovation, and dampens competitive bidding among suppliers.

Nowhere is this more obvious than in auto insurance, where states like Massachusetts and New Jersey both mandate insurance and have numerous policies to prohibit discrimination. The result, however, has been a financial disaster for consumers. As Kurkjiian (1995a) reports, "Massachusetts is one of few states that prohibits [allowing insurance companies to write policies that insure homes at their fair market value, instead of their replacement cost], and impact is particularly tough financial in poorer the neighborhoods".<sup>11</sup> A more recent study on health insurance, another area that tends to be heavily regulated, found that the poor are much less likely to be covered (Angel et al. (2005). Still the

<sup>&</sup>lt;sup>11</sup> In Massachusetts auto insurance has been deregulated in certain ways in recent years (Mohl 2007) but it still remains highly regulated and it has the 4<sup>th</sup> highest rates in the country (Mohl 2006). In other industries such as with mortgages, the number of regulations in Massachusetts are going up (Appelbaum 2008).

unwillingness of the insurance industry to provide coverage to inner city residents is unlikely to stem inherent racism. Even if a significant percentage of providers seek to engage in racial discrimination, as long as they face competition, the companies engaging in racial discrimination will lose out. The companies wishing to engage in long term discrimination would be at a significant disadvantage compared to competitors who care not about race, but about serving as many customers as possible. So even an industry is not free from individual racists (it is possible some acted out of racial discrimination) the market in the aggregate can still be free of racial discrimination.<sup>12</sup> The lack of coverage for many urban residents stems from the fact that insurance companies are unable to charge prices that cover the costs involved - let alone prices that allow for profit.

#### 3 The Case of Banking and Loans

Similar problems exist with bank lending to urban minorities. Many people believe that banks make their decisions based on race rather than profits and that the government must step in. If all demographics had the same credentials and banks bypassed minority borrowers there would be a clear case of unfair discrimination.<sup>13</sup> Let us say that most banks are guilty of such prejudice and are unaware about the good risks that certain demographics present.

But even if we start in such an unfortunate situation, competition provides incentives to weed such behavior out. If a group of minorities, for example, could not receive loans because

<sup>&</sup>lt;sup>12</sup> Harrison's (1998) research indicates that there is no significant evidence of racial discrimination in mortgage markets. See also Day and Liebowitz 1998; and Benston 1999.

<sup>&</sup>lt;sup>13</sup> See for examples Berkovic et al 1992; Bostic 1996; Black 1997; Black et al 1997, 2001; Blanton 2007; Browne and Tootell 1995; Jagger 2007; and Tootell 1993.

of unfair discrimination, they would do whatever possible to receive a loan. Such individuals would be willing to pay higher than market interest rates. With a large group of otherwise qualified people willing to pay higher rates, any bank would be foolish not to lend to this group. But even if the vast majority of banks willfully ignored a group of qualified customers solely because of their race, all it takes is one bank to step in to mitigate the problem. The first bank to notice the situation could enhance profits by charging these qualified people higher rates. The bank could be run by members of that demographic group or simply be run by one entrepreneur who cares more about profits than about discrimination.

The company that discovers this market opportunity would above normal profits by catering to minorities and earn discriminating against non-minorities. The success of this one company would attract even more capital if that bank persistently earned above normal returns. And this is not the end of the story. As in the insurance example above, any banks engaging in racial discrimination would be faced with the choice. They could continue to discriminate unfairly, but to do so would mean lower profits and a continued loss in market share. As long as a market has open entry, non-racist entrants would be free to come in and compete with the firm earning extra profits by serving minorities. Even if many people would forgo profits to engage in discrimination as long as there is enough competition, profits in the long run will be pushed towards their normal rate (Block 1992, 19). This process can continue until the point where these qualified minorities would be paying the same rates as their non-minority counterparts. Even if many bankers were inherently racist, competition provides important incentives for them to not act in a racist manner and instead compete and undercut each other's prices in order to attract profitable customers. As Benston (1999) notes, "Competition and just good business sense have been effective in encouraging, most, if not all, banks to offer loans to credit worthy mortgagors without regard to their race, gender, or other irrelevant personal attributes."

Eventually others would catch on and lending rates to the two groups would be the same, all else equal. In the current world all else is not always equal, so not only do interest and lending rates differ from person to person, the averages between demographic groups differ. Certain demographic groups do in fact receive a disproportionately lower percentage of loans, so this leads many policymakers to declare that disparities between groupings such as race are evidence for discrimination on the part of bankers. But alternative explanation is that differences emerge not because of personal preferences of bankers but because applicants have differences in income, credit ratings, default risk, and assets. Because each individual is different we should not everyone to have the same rate and we should not expect to see averages across groups to always be the same.

Interestingly, when looking at the data, adjusted for all these factors, we find that some minority groups actually receive a higher proportion of loans than their credit would suggest. Jacoby (1995) reports, Federal Reserve economists tracked 220,000 federally insured loans and discovered "a higher likelihood of default on the part of black borrowers compared with white households."<sup>14</sup> This finding brings doubt to the hypothesis that current lenders discriminate against minorities. If banks were indeed rejecting qualified minorities, then the minorities who did receive loans must have been extra-qualified and would have lower default rates.<sup>15</sup>

<sup>&</sup>lt;sup>14</sup> See also Berkovic et al. (1992) and Benston (1999).

<sup>&</sup>lt;sup>15</sup> Black (1997) also finds that African American applicants are more often denied loans by African American owned banks than non African American owned banks. This evidence suggests that something other than race is driving the differences in rates.

The difference in default rate can in all likelihood be explained by the anti-discrimination laws. Without the law, borrowers would *ceteris paribus* be given loans based on their credit risk. But with the laws, banks have to go out of their way to lend to borrowers of certain demographics even if they are more likely to default.

One can find evidence for or against the discrimination hypothesis by looking at how minority owned banks treat minority customers. Studies by Black, Collins, and Cyree (1997) and Ross and Yinger (2002) show that minority owned banks do get a higher proportion of minority applicants, but white owned banks do not have a higher denial rate then the minority owned banks. If anything minority owned banks have a slightly higher denial rate due to the regulations imposed on white owned banks (Benston 1997).

Because of the regulations banks have to take numerous steps to make sure they are not accused of discrimination. Regulators need only reason to believe that discrimination has taken place before fining banks, blocking mergers, or stopping other kinds of regulatory applications that banks may be working on. Sadly this story is all too much a reality.

Recently Liebowitz (2008) has shown that government directives made lenders such as Countrywide to be less diligent with their loan. Since then the market has fallen into a sub-prime lending crisis and many of the companies have fallen into bankruptcy. By trying to avoid charges of discrimination, many bad loans were made and in the end it has had important negative repurcusions in the industry. As Liebowitz and Day (1998) predicted ten years ago before, "After the warm and fuzzy glow of 'flexible underwriting standards' has worn off, we may discover that they are nothing more than standards that lead to bad loans...these policies will have done a disservice to the punitive beneficiaries if...they are disposed from their homes." To avoid charges of discrimination, banks were essentially forced to do things that would not occur in the market.

The fear of discrimination charges comes in many different forms. Regulators look for three types of alleged misdeeds: "blatant discrimination," "differential treatment discrimination," or "adverse impact discrimination." The burden of proof is generally on the accused. This ends up diverting credit from its highest valued uses toward ends determined by politics and pressure groups.

What about redlining? With deregulation and advances in banking, neighborhood based banking is in decline, but still there are claims that banks red line certain areas out of the lending market, a charge which banks have denied for decades (Benston 1999). Here too the logic and the effects of competition will be similar. Even if certain banks did indeed engage in conspicuous redlining, under a system of competition there will be few negative affects. If anything, conspicuous redlining would alert competitors that a bank is writing off whole sections of the city where there might be profits to be had.

Again, even if bankers were inherently discriminatory, unless they would be willing to forgo profits, their lending criterion will expected monetary returns. In the current world, it is true that certain neighborhoods residents are less likely to have a home loan. But this may have nothing to do with racial discrimination and more to do with the fact that each neighborhood has different demographics and some demographics are more likely to demand or have the qualifications necessary to receive loans.<sup>16</sup> A college neighborhood consisting of rental housing, for example, would

<sup>&</sup>lt;sup>16</sup> Research by Charles and Hurst (2002) suggests that African Americans are less likely to be homeowners due to the fact that they apply for mortgages less often.

have fewer good candidates for home mortgage loans. If a lender finds few qualified borrowers in that neighborhood he may take his business elsewhere. Race would have nothing to do with it. Lenders look at a potential borrower's income, outstanding debt, and credit rating and of course these factors differ from person to person.

# **4** Problems with Government Intervention

To determine whether redlining and other forms of discrimination should be prohibited requires deciding whether loan decisions should be made by people putting their money on the line or by political agents. Should lending institutions be compelled to make loans against their better judgment? According to many, the answer is yes. For example, the number of hurdles that Fleet Financial Group had to pass when it purchased Shawmut National Corporation demonstrates this well. Unless the newly formed company promised to make large amounts of loans to the disadvantaged, Massachusetts regulators would not approve the merger. As Reidy (1995) detailed, "[The most recent commitment] bring to more than \$600 million Fleet's commitments in recent months to affordable housing, mortgages, and small business loans. The programs, analysts said, are part of Fleet's efforts to mute opposition from community groups and state agencies as it seeks the approval of federal regulators to purchase Shawmut."<sup>17</sup> Eventually the merger was approved but the politicians imposed significant costs. This is just one of the many examples of how financial decisions have become more and more influenced by the political process.

The insurance market faces its share of government involvement as well. As principles of economics demonstrates,

 $<sup>^{17}</sup>$  After the 2004 merger of Fleet Bank into Bank of America, the Boston Globe (2004) reports that the merged company did not take up much of the housing promises originally made by Fleet. .

price restrictions prevent supply and demand from equilibrating, creating shortages or surpluses. Because of various price restrictions and regulations insurers have simply chosen not to underwrite large classes of goods. To fill this void, government is put in the odd position of either mandating private provision or providing financial services itself.

Both controlling private firms and creating state run enterprises can create perverse incentives. Oftentimes this leads to more government involvement (Mises, 1992). A state-sponsored insurance company crowds out private firms, because they now have a competitor that can charge less and take tremendous losses without going out of business. The Massachusetts state-sponsored Fair Plan provides insurance to people who cannot obtain the private variety. In Roxbury, northern Mattapan, and southwest Dorchester, where a higher percentage of minorities live, over three-quarters of the insured homes are covered by the Fair Plan. This compares to half a percent of all homes in Newton, a town with a lower percentage of minorities (Blanton, 1995). But the costs of government policies are often ignored. Just because government provides a service, it does not mean it is free to society. When a state enterprise's expenses exceed its revenue taxpayers, of course, end up footing the bill.

Government regulation is usually promoted as a measure to benefit consumers, while in actuality it can have the opposite effect. It is quite possible that when increased regulation raises costs to producers they will pass those on to consumers. What has been the result of the regulations and more involvement in Massachusetts? Have they really helped citizens against high insurance costs? The answer is pretty clear: "On average, Massachusetts drivers pay the third highest auto insurance bills in the country. With rates set by law every year there has been little opportunity for competition" (Kurkjiian, 1995b)<sup>18</sup>. With all of its interference in the market, government does not seem to be an effective tool for increasing choices for consumers.

With the different regulations being enacted there is an increase in unsound loans being made. This can have adverse consequences that end up affecting the entire mortgage market without its cause being completely obvious (Day and Liebowitz 1998, Liebowitz 2008). As Day and Liebowitz (2008) also show they regulations are often brought on by poor and misinformation.. The leading reason for the anti-discrimination regulations that have helped cause the recent trouble was brought about by a flawed study by the Boston Fed in 1992.<sup>19</sup> Evidence like this calls into question the different regulations.

This leads to the question of what is government's proper role in a market economy. Should government be providing banking and insurance to all comers? If the answer is yes then what makes the insurance industry unique? Rather than relying on what amount to price controls, mandatory lending schemes, and government provision, the government could simply remove the restrictions which would enable more competition. If the insurance and banking industries were able to operate freely<sup>20</sup> everybody who could afford and wanted services could get them.<sup>21</sup> There would be

 $<sup>^{18}</sup>$  As of 2006 Massachusetts has the 4<sup>th</sup> highest auto insurance rates (Mohl 2006). Auto deregulations, however, have started to be made (Mohl 2007).

<sup>&</sup>lt;sup>19</sup> In addition to Day and Liebowitz 2008 see Harrison 1998.

<sup>&</sup>lt;sup>20</sup> Nothing here should be taken to imply that the present authors believe these to be completely free. On the contrary, both depend on restrictions on entry and other illegitimate government interventions. For more on this see Rothbard (1983, 1994).

<sup>&</sup>lt;sup>21</sup> It is even less clear why those who advocate policies to help the poor do not request that the poor be given cash transfers to purchase insurance. Perhaps there is an ulterior motive for supporting regulation (Stigler, 1971).

no shortages and no need for state provided services. With fewer restrictions the quality of services available would also increase. Competition forces banks and insurers to be driven not by considerations of discrimination but by the promises of profits.

Like any other industry, anyone who's willing to pay for a good would be able to obtain what they want. Should we allow companies to charge more and allow people to pay more if that is what both parties prefer? Higher insurance rates and higher loan rejection rates all occur because of higher inner city costs and higher default risks. As we have seen, discrimination does not cause the higher prices; it is, rather, higher costs. In an unregulated market, would there be equal insurance rates and bank loans to all people? Any differences among groups, just as differences among individuals, would be reflected in market phenomena.

# **5** Conclusion

Insurance companies and banks are often accused of engaging in racial discrimination. Even if it were true in many individual cases, as long as there is competition the problem will not persist at the aggregate level. Racial discrimination comes at a cost to those who engage in it, but luckily most banks and insurance companies are profit driven. Any examples of racial discrimination create profit opportunities for those who do not engage in racial discrimination. The higher the profit opportunities the more companies will seek to replicate that behavior; which means in the long run, extra normal profit opportunities cannot persist. Therefore, if there is any difference in coverage or in rates it must be due to some other factor such as costs or risk.

Real world banking and insurance markets may not operate exactly like the textbook model of perfect competition, but that does not mean that the non-profitable strategy racial discrimination

will persist. Even if the market is not perfectly competitive, the solution should be to allow as much competition as possible because the more competition the less likely discrimination is to take place. Markets may not be perfect, but they still might the best way of dealing with the potential problem of racial discrimination because government policies have unintended consequences and often end up hurting the very people it sets out to help. Competition, in contrast, provides incentives for banks and insurance companies to not engage in racial discrimination since doing so involves a cost. Rather than considering regulation as the solution, policymakers should look towards deregulation since competition has built in incentives to mitigate if not eliminate harmful cases of racial discrimination. Unfortunately in the current world, government policies have only exacerbated problems and made it more difficult for city residents to purchase the financial services they demand.

# **Bibliography**

Alchian, Arman A. and Reuben A. Kessel. 1962. "Competition, Monopoly, and the Pursuit of Pecuniary Gain," In *Aspects of Labor Economics*, Princeton, NJ: National Bureau of Economic Research pp. 157-183.

Angel, Ronald J., et al. 2005. "Determinants of Household Insurance Coverage Among Low Income Families From Boston, Chicago, and San Antonio: Evidence from the Three-City Study." *Social Science Quarterly*, Supplement to Vol. 86.

Appelbaum, Binyamin. 2008. "Most Lenders Accept Tough New Mortgage Rules in Mass.," *The Boston Globe, January 10, 2008, p. E1.* 

Arrow, Kenneth J. 1972a. "Models of Job Discrimination." In *Racial Discrimination in Economic Life*, edited by Anthoney H. Pascal, Lexington, MA: Lexington Books.

Arrow, Kenneth J. 1972b. "Some Mathematical Models of Race Discrimination in the Labor Markets." In *Racial Discrimination in Economic Life*, edited by Anthoney H. Pascal, Lexington, MA: Lexington Books.

Bartlett, Bruce. 2008. *Wrong on Race: The Democratic Party's Buried Past*, New York, NY: Palgrave Macmillan.

Becker, Gary S. 1971. *The Economics of Discrimination*. Chicago, IL: University of Chicago Press.

Becker, Gary S. 1993. "The Evidence Against Banks Doesn't Prove Bias," *Business Week* April 19, 1993: p. 18.

Benston, George J. 1999. "The Community Reinvestment Act Looking for Discrimination That Isn't There." *Policy Analysis*, October 6, 1999, No. 354.

Berkovic, James A. et al. 1992. "Mortgage Discrimination and FHA Loan Performance," *Cityscape: A Journal of Policy Development and Research* 2, pp. 9-24.

Bostic, Raphael W. 1996. "The Role of Race in Mortgage Lending: Revisiting the Boston Fed Study." Board of Governers of the Federal Reserve System, Unpublished Manuscript, December 1996.

Boston Globe. 2004. "Bank Imbalance." *Boston Globe*, April 12, 2004, p. A14.

Black, Harold, 1997. "Discrimination in Financial Services, *Journal of Financial Services Research*, 11, nos. 1-2, pp. 189-204.

Black, Harold et al. 1997. "Do Black Owned Banks Discriminate Against Black Borrowers?" *Journal of Financial Services Research*, Vol. 11, Issue 1, pp. 189-204.

Black, Harold et al. 2001. "Do Lenders Discriminate Against Low Income Borrowers?" *The Review of Black Political Economy*, Vol. 28, No. 4, pp. 73-94.

Blanton, Kimberly. 1995. "Policies for the People," *Boston Globe*, October 15, 1995, p.41.

Blanton, Kimberly. 2007. "Borrowers Sue Subprime Lender, Allege Race Bias Countrywide Denies Blacks were Charged More in Fees," *Boston Globe*, July 13, 2007, p. C-1.

Block, Walter. 1992. "The Economics of Discrimination," *The Journal of Business Ethics*, Vol.11, pp.241 -254.

Browne, Lynn Elaine and Geoffery M.B. Tootell. 1995. "Mortgage Lending in Boston—A Response to Critics," *New England Economic Review*, September/October 1995: p. 53.

Buzzacchi, Luigi and Tommaso M. Valletti. 2005. "Strategic Price Discrimination in Compulsory Insurance Markets." *The Geneva Risk and Insurance Review*, 30, pp. 71-97.

Calomiris, Charles W. et al. 1994. "Housing Finance Intervention and Private Incentives: Helping Minorities and the Poor," *Journal* of Money, Credit, and Banking 26 (1994): p. 634.

Coate, Stephan and Glenn C. Loury. 1993. "Will Affirmative Action Policies Eliminate Negative Stereo Types?" *American Economic Review* 83 (1993): p. 92.

Cymrot, Donald J. 1985. "Does Competition Lessen Discrimination? Some Evidence," *The Journal of Human Resources*, Vol. 20 No. 4 (Autumn 1985), pp. 605-612.

Day, Theodore E. and Stan J. Liebowitz. 1998. "Mortgage Lending to Minorities: Where's the Bias?" *Economic Inquiry*, January 1998, pp. 1-27.

Evans, Richard D. et al. 1985. "Expected Loss and Mortgage Default Risk," *Quarterly Journal of Business and Economics* 24 (1985): p. 75.

Ferguson, Michael F. and Stephen R. Peters. 1995. "What Constitutes Evidence of Discrimination in Lending?" *Journal of Finance* 50 (1995): p. 739.

Ferguson, Michael F. and Stephen R. Peters. 1997. "Cultural Affinity and Lending Discrimination: the Impact of Underwriting Errors and Credit Risk Discribution on Application Denial Rates," *Journal of Financial Services Research* 11 (1997): p. 153.

Harrington, Scott E. and Greg Niehaus. 1998. "Race, Redlining, and Automobile Insurance Prices," *Journal of Business, Vol. 71 No. 3, pp. 439-469.* 

Harrison, Glenn W. 1998. "Mortgage Lending in Boston: A Reconsideration of the Evidence," *Economic Inquiry*, Vol. 36 Issue 1, pp. 29-38.

Harvard Law Review. 1997. "Finding a Place for the Jobless in Discrimination Theory," *Harvard Law Review*, 1997, Vol. 110, No. 7, pp. 1609-1626.

Holmes, Andrew L. and Paul Horvitz. 1994. "Mortgage Redlining: Race, Risk, and Demand," *Journal of Finance* 49 (1994), pp. 81-99.

Horne, David K. 1997. "Mortgage Lending, Race, and Model Specification," *Journal of Finance Services Research*, 11, nos. 1-2, pp. 43-68.

Jagger, Suzy. 2007. "US Lenders Charge Higher Rates to Black and Hispanic Borrowers," *The Times (London)*, September 13, 2007, Business p. 57.

Kagen, Steve Rep. 2008. "Ending Discrimination in Health Insurance," *The Huffington Post*, February 14, 2008, http://www.huffingtonpost.com/rep-steve-kagen/endingdiscrimination-in-\_b\_86711.html

Kerwin, Charles and Erik Hurst. 2002. "The Transition to Home Ownership and the Black-White Wage Gap." *Review of Economics and Statistics* 84(2), pp. 281-297.

Kurkjiian, Stephen. 1995a. "State warns that auto insurance should not be discriminatory," *Boston Globe*, June 27, 1995, p.29.

Kurkjiian, Stephen. 1995b. "Panel OK's insurance measures," Boston Globe, June 28, 1995, p.14.

Liebowitz, Stan J. 2008. "The Real Scandal: How Feds Invited the Mortgage Mess." *The New York Post*, February 5, 2008.

Longhofer, Stanley D. and Stephen R. Peters. 1999. "Self-Selection and Discrimination in Credit Markets," *Federal Reserve Bank of Cleveland Working Paper* 98-09, February 1999.

Menger, Carl. 1976. Principles of Economics. New York, NY: New York University Press.

Mises, Ludwig. 1991. *Two Essays by Ludwig von Mises*, Auburn, Al: The Mises Institute.

Mohl, Bruce. 2006. "State Still has 4<sup>th</sup>-Highest Auto Rates Insurance Costs Up 6%, Data Show," *Boston Globe*, December 9, 2006, p. A11.

Mohl, Bruce. 2007. "New Insurance Chief Goes Beyond Expectations Auto Deregulation Shocks Industry," *Boston Globe*, July 23, 2007, A1. Munnell, Alicia H. et al., 1996. "Mortgage Lending in Boston: Interpreting HMDA Data," *American Economic Review*, 86, pp.25-53.

Muth, Richard F. 1979. "Yields on Inner-City Mortgage Loans," *Federal Home Loans Bank of San Francisco, 1979.* 

Phelps, Edmond J. 1972. "The Statistical Theory of Racism and Sexism," *American Economic Review* 62 (1972): p. 659.

Squires, Gregory D. 1997. Insurance Redlining: Disinvestment, Reinvestment, and the evolving role of Financial Institutions, Urban Institute.

Reidy, Chris. 1995. "Fleet agrees to loan program," *Boston Globe*, September 27, 1995, p.45.

Roback, Jennifer 1984. "Southern Labor Law in the Jim Crow Era: Exploitative or Competitive?" *University of Chicago Law Review*, Vol. 51, No. 4, pp. 1161-1192.

Roback, Jennifer 1986. "The Political Economy of Segregation: The Case of Segregated Streetcars," *Journal of Economic History* Vol. 46, No. 4, pp.893-917.

Ross, Stephen L. and John Yinger. 2002. *The Color of Credit,* Cambridge, MA: MIT Press.

Rothbard, Murray. 1983. The Mystery of Banking, New York: Richardson and Snyder.

Rothbard, Murray. 1994. *The Case Against the Fed*, Auburn, AL: The Mises Institute.

Ruiz, Albor. 2008. "A Sobering Look at Race Realities in NY," New York Daily News, February 17, 2008.

Sherman, Mark. 2008. "Supreme Court Considering 5 Cases Alleging Age Discrimination," *Associated Press*, February 17, 2008.

Solomont, Alan and Esther Schlorholtz. 2006. "Curtailing Lending Excess," *Boston Globe*, May 5, 2006, p. A19.

Stigler, George. 1971. "The theory of economic regulation." *Bell Journal of Economics*, Vol. 2, pp.3-21.

Tootell, Geoffrey M. B. 1993. "Default, Denials, and Discrimination in Mortgage Lending," *New England Economic Review* September/October 1993: p. 45.

Williams, Walter E. 1982. *The State Against Blacks*, New York: McGraw Hill.

Wray, L. Randall. 1995. "If Free Markets Cannot 'Effectively Allocate Credit', What Monetary Policy Could Move Us Closer to Full Employment?" *Review of Political Economy*, Vol. 7, No. 2, pp. 186-211.

Yezer, Anthony M.J. et al. 1994. "Bias in Estimates of Discrimination and Default in Mortgage Lending: The Effects of Simultaneity and Self-Selecting," *Journal of Real Estate and Finance* 9 (1994): p. 197.