Backgrounder

No. 2256
April 8, 2009

Published by The Heritage Foundation

Principles for Reform of Catastrophic Natural Disaster Insurance

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Along with the winds, rain, and storm surges of Hurricane Katrina came a cacophony of voices urging Congress to adopt a catastrophic hurricane fund (CAT fund). A CAT fund, like the bankrupt and highly inefficient National Flood Insurance Program (NFIP), would provide government insurance to homeowners and businesses to protect against the next catastrophic hurricane. Lost in the chorus of doomsayers is the inconvenient fact that Hurricane Katrina—the most expensive natural disaster in American history—did not bankrupt the insurance industry. Unlike the current Wall Street financial crisis, the industry did not even require a federal bailout.

From 1970 to 2006, America experienced 23 insured catastrophic losses due to natural disasters or terrorism ranging from $45 billion down to $1.993 billion (in 2005 dollars). These included 15 hurricanes, one earthquake, and the terrorist attacks on September 11, 2001. Only four caused insured losses greater than $15 billion. Over the past 18 years, only five years have seen insured catastrophic losses in excess of $15 billion: $22.9 billion in 1992 (Hurricane Andrew); $16.9 billion in 1994 (Northridge earthquake); $26.5 billion in 2001 (9/11 terrorist attacks); $27.5 billion in 2004 (Hurricanes Frances, Charley, Ivan, and Jeanne); and $61.9 billion in 2005 (Hurricanes Katrina, Rita, and Wilma).[1]

As one expert noted, the insurance "industry held about $400 billion in equity capital and collected premiums of about $440 billion" in 2004.[2] While only 12 percent of those funds represented premiums from

Talking Points

- The private sector, state governments, and—as a last resort—the federal government could take many actions short of creating a CAT fund that would provide greater stability to the insurance market at a lower cost to most taxpayers.
- Most natural disasters over the past 18 years have occurred primarily in 11 states and caused insured losses of less than $15 billion, which the states involved should be able to handle without turning to the federal government.
- Any federal reform of catastrophic natural disaster insurance should begin by defining "catastrophic" as nationally catastrophic, rather than only catastrophic for a given community. Local and state governments should prepare for and handle local disasters.
- Those who assume the risk of living in higher risk areas should fully pay for that risk through actuarially sound insurance rates.

This paper, in its entirety, can be found at: *www.heritage.org/Research/HomelandSecurity/bg2256.cfm*

Produced by the Douglas and Sarah Allison Center for Foreign Policy Studies of the Kathryn and Shelby Cullom Davis Institute for International Studies

Published by The Heritage Foundation
214 Massachusetts Avenue, NE
Washington, DC 20002–4999
(202) 546-4400 • heritage.org

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homeowners insurance, that still amounts to $52.8 billion in yearly premiums.[3] Assuming that actuarially unsound state rate caps are lifted and insurance companies take a tighter approach to paying homeowners claims, insurance companies appear easily capable of dealing with all but the most catastrophic natural disasters—they have already dealt with the most catastrophic disaster to date.

Despite these inconvenient facts, proponents of a CAT fund continue to push for another federal program that would further distort the property and casualty (P&C) insurance market. As with many federal proposals, a CAT fund started small as a hurricane-centric idea, but California's congressional delegation would likely seek to add earthquakes to any proposed legislation. Yet no matter what is covered, a CAT fund would federalize even more of America's natural disaster response and spread the risks willingly accepted by a minority of taxpayers to a majority of taxpayers who live far away from routine hurricane and earthquake activity. Common sense demands a different approach.

In 2007, one CAT fund proposal, The Homeowners Defense Act (H.R. 3355), embodied many of the worst characteristics of CAT funds. It would have made it easier to create a federal government subsidy of P&C coverage for natural disasters. The bill would also have made it easier for individual states to create unrealistic disaster insurance programs, with underpriced policies, by creating a federal loan fund to cover losses suffered by those programs. Although states are already empowered to create such consortiums, H.R. 3355 would have granted this consortium a federal charter that would appear to extend a federal guarantee to the bonds issued by the group, when in fact no such guarantee would have existed. This false federal imprimatur could have increased pressure for a federal bailout following the inevitable disaster.

Five Principles of Reform

Rather than trying to second-guess the collective wisdom of the private sector, this paper establishes five principles that should guide any catastrophic natural disaster insurance reform. Underpinning these principles is the belief that the private sector, state governments, and—as a last resort—the federal government could take many actions short of creating a CAT fund that would provide greater stability to the insurance market at a lower cost to most taxpayers.

Principle #1: Catastrophic should mean *nationally* catastrophic.

As noted in previous papers over the past 16 years,[4] the disaster response community has explicitly and implicitly reduced the threshold of what qualifies as a natural disaster eligible for a federal declaration. This "defining disaster down" approach is largely driven by the 75 percent or more cost-share provision that Congress included in the 1988 Robert T. Stafford Disaster Relief and Emergency Assistance Act (Stafford Act).[5] This helps to explain why disaster declarations are granted months *after* the events when there are simply no emergencies and the events clearly had been handled without federal involvement.

In the Stafford Act, the express threshold for a declaration is a disaster "of such severity and magnitude that effective response is beyond the capabilities of the State and the affected local governments

1. J. David Cummins, "Should the Government Provide Insurance for Catastrophes?" Federal Reserve Bank of St. Louis *Review* (July/August 2006), p. 340, Table 1, at *http://research.stlouisfed.org/publications/review/06/07/Cummins.pdf* (March 30, 2009).
2. *Ibid.*, p. 345.
3. *Ibid.*
4. Matt A. Mayer, Richard Weitz, and Diem Nguyen, "The Local Role in Disaster Response: Lessons from Katrina and the California Wildfires," Heritage Foundation *Backgrounder* No. 2141, June 4, 2008, at *http://www.heritage.org/Research/HomelandDefense/bg2141.cfm*, and James Jay Carafano and Matt A. Mayer, "FEMA and Federalism: Washington Is Moving in the Wrong Direction," Heritage Foundation *Backgrounder* No. 2032, May 8, 2007, at *http://www.heritage.org/Research/HomelandDefense/bg2032.cfm*.
5. Robert T. Stafford Disaster Relief and Emergency Assistance Act, Public Law 100–77, codified at 42 U.S. Code § 5170b (1988).

and that Federal assistance is necessary."[6] Despite this clear requirement, the Federal Emergency Management Agency (FEMA) has approved disaster declarations for many natural disasters that historically and factually were not beyond the capabilities of states and localities. Other than hurricanes, earthquakes, volcanic eruptions, and tsunamis, most natural disasters in America lack the potential to meet the Stafford Act definition. Even most hurricanes, earthquakes, volcanic eruptions, and tsunamis do not meet the Stafford Act requirement.

Of course, that does not mean that a particular natural disaster is not "catastrophic" for a particular community. It simply means that most natural disasters occur within confined geographic areas and that states and localities can handle them without federal involvement. At least, they should be and used to be before the Clinton and Bush Administrations federalized more and more of America's disaster response activities, giving states and localities an incentive to reduce their own investment in disaster response capabilities. (See Chart 1.)

As noted above, most natural disasters over the past 18 years have caused insured losses of less than $15 billion. Every one of the natural disasters occurred primarily in an 11 state area. Most of the 11 states have yearly budgets well in excess of $15 billion, so they should be capable of crafting state-based programs to handle catastrophic natural disasters, including raising taxes when necessary to fund a state-based CAT fund.[7]

Fundamentally, the United States needs to return to a decentralized disaster response framework in which states and the people living in the states bear the cost of disasters that occur in their own jurisdictions.

Therefore, the most critical principle is that for FEMA disaster declarations "catastrophic" must actually mean nationally catastrophic. Toward this end, Congress should:

- Amend the Stafford Act to limit eligibility for FEMA disaster declarations to hurricanes, earthquakes, volcanic eruptions, and tsunamis, explicitly excluding other natural disasters;
- Insert severity and magnitude thresholds for these four types of disasters so that only those that are truly national emergencies qualify for federal involvement;
- Adopt a high economic threshold requirement for any program that is created to prevent a national catastrophic natural disaster from bankrupting the insurance industry. For example, one insurance company suggested a $125 billion trigger for a lender-of-last-resort program.

Such a trigger is necessary given the federal tendency to spend the money by expanding eligibility downward. This tendency will increase if paid premiums piled up during years without any eligible events. Accountability needs to be returned to the governors and the people.

Principle #2: Those who assume the risk should bear the risk.

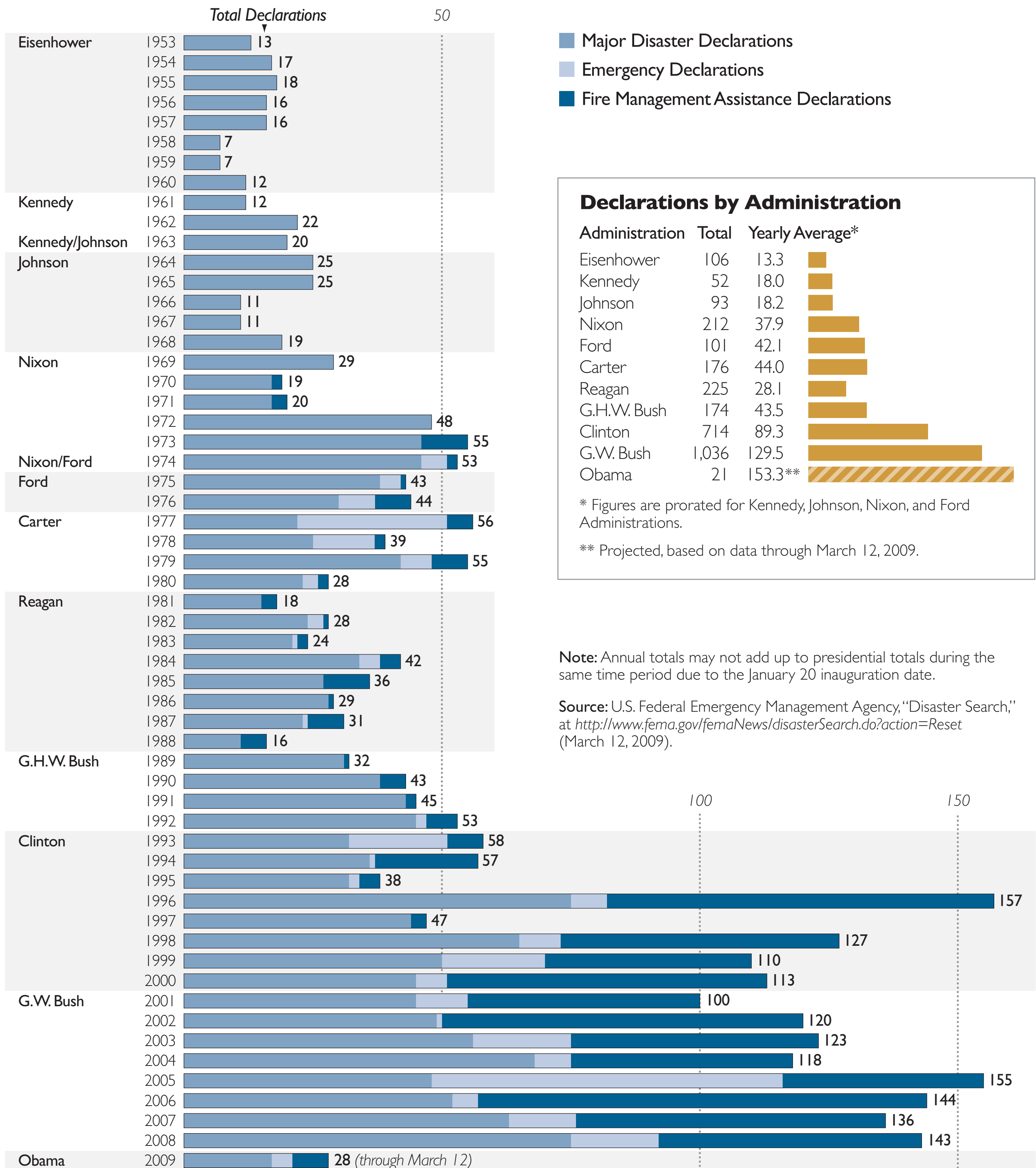
We possess at least 55 years of actuarial data on where and when natural disasters occur.[8] Roughly 11 states face a potential and predictable risk of a nationally catastrophic natural disaster. These states and the corresponding potential disasters are:

Texas	hurricane
Louisiana	hurricane
Alabama	hurricane
Mississippi	hurricane
Florida	hurricane
Georgia	hurricane
South Carolina	hurricane
North Carolina	hurricane
California	earthquake
Washington	volcanic eruption
Hawaii	tsunami, volcanic eruption

Of course, other states could experience a nationally catastrophic natural disaster, but the frequency of such events is very low, which minimizes

6. 42 U.S. Code § 5191(a).
7. See Matt A. Mayer, "An Analysis of Federal, State, and Local Homeland Security Budgets," Heritage Foundation *Center for Data Analysis Report* No. CDA09–01, March 9, 2009, at *http://www.heritage.org/Research/HomelandSecurity/cda0901.cfm*.
8. See U.S. Federal Emergency Management Agency, "Disaster Search," at *http://www.fema.gov/femaNews/disasterSearch.do?action=Reset* (March 27, 2009).

FEMA Declarations Increased Dramatically Beginning in 1996



Declarations by Administration

Administration	Total	Yearly Average*
Eisenhower	106	13.3
Kennedy	52	18.0
Johnson	93	18.2
Nixon	212	37.9
Ford	101	42.1
Carter	176	44.0
Reagan	225	28.1
G.H.W. Bush	174	43.5
Clinton	714	89.3
G.W. Bush	1,036	129.5
Obama	21	153.3**

* Figures are prorated for Kennedy, Johnson, Nixon, and Ford Administrations.

** Projected, based on data through March 12, 2009.

Note: Annual totals may not add up to presidential totals during the same time period due to the January 20 inauguration date.

Source: U.S. Federal Emergency Management Agency, "Disaster Search," at *http://www.fema.gov/femaNews/disasterSearch.do?action=Reset* (March 12, 2009).

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the assumption-of-the-risk concept. Thus, individuals and businesses living in those places should not face steeper insurance rates because the probability of such an event is low, hard to price, and impossible to predict. For example, a catastrophic hurricane could hit New York and Connecticut, but such an event may not happen for many years, if at all. Therefore, individuals living in those states cannot be held to be placing themselves at risk of such a low-probability event.[9] If such a catastrophe occurred, a state-based program paid for by its taxpayers to deal with the economic impact should take precedence over a federal program paid for by taxpayers outside of that state.

In contrast, as the much-referenced map[10] developed by Risk Management Solutions vividly illustrates, only a handful of states are predictably at risk of a nationally catastrophic natural disaster.[11] Individuals and businesses in those states, especially in jurisdictions close to the coast and along the San Andreas Fault Line, have unquestionably assumed the risk of a catastrophic natural disaster.[12]

This is especially true for the individuals and businesses that have moved to those jurisdictions over the past two decades. Six of the 11 states have experienced population growth above the national average from 1990 to 2007.[13] With the influx in population and attendant development, the cost of natural disasters has steadily increased.

To attract and keep these individuals and businesses, states have imposed rate caps to prevent insurance companies from charging actuarially sound P&C insurance rates. These state rate caps have prevented insurance companies from securing sufficient capital reserves and, more troubling, indirectly spread the cost of their known risks to other, less risk-prone states.[14] Hence, the rate caps in these 11 states have resulted in the other 39 states—many of which lost population, businesses, and tax revenue to the 11 states—subsidizing the cost of living in those 11 states. Such a moral hazard has disconnected the risk from those who willingly assumed the risk and enjoy the benefits of living in a warmer and more scenic place.

In nine of the 11 states, not including Florida and California, a majority of their populations and land areas are a safe distance away from the coast, thereby providing a large pool of individuals and businesses

9. Since 1954, New York has received six FEMA disaster declarations and Connecticut has received four disaster declarations for hurricanes, which average to one hurricane disaster declaration every nine years for New York and one every 13 years for Connecticut. Of those, only Hurricane Floyd in 1999 ranked among the top 40 insured losses since 1970, and the Hurricane Floyd losses covered 15 states from Florida up to Maine. Cummins, "Should the Government Provide Insurance for Catastrophes?" p. 340.

10. Risk Management Solutions, "Catastrophic Risk in the United States: Earthquake, Hurricane, Tornado and Hail," map, at *http://www.rms.com/Images/CatMapUS_8inch.gif* (March 30, 2009).

11. Critical to this discussion is the distinction between a Category 5 hurricane and a tornado or wildland fire. A Category 5 hurricane, such as Hurricane Katrina, can cause multi-state physical, economic, and human damage that ripples across the national economy due to energy sector and commercial (e.g., key ports) damage. In contrast, a tornado or wildland fire could cause physical, economic, and human damage in a state, but would not cause measurable ripple effects in the national economy.

12. Much has been written about the potential for a catastrophic earthquake along the New Madrid Fault Line. The last major earthquake in that area occurred in 1812. Current estimates place a 7–10 percent chance of an earthquake greater than 8.0 on the Richter Scale in the next 50 years. Robert Roy Britt, "New Data Confirms Strong Earthquake Risk to Central U.S.," LiveScience, June 22, 2005, at *http://www.livescience.com/environment/050622_new_madrid.html* (March 27, 2009). While such an event might rival Hurricane Katrina, given the uncertainty both as to when such an event may occur and its severity, it makes little economic sense to prospectively levy increased fees on those individuals and businesses that may be affected.

13. See U.S. Census Bureau, "Geographical Mobility/Migration," modified October 21, 2008, at *http://www.census.gov/population/www/socdemo/migrate.html* (March 27, 2009).

14. This inequitable subsidizing of the risk does not mean insurance companies should not be able to diversify their risk by *pooling* insured parties from low-risk states and high-risk states or through reinsurance. It simply means that those in low-risk states should not pay a higher rate for P&C insurance to *subsidize* those in high-risk states. Insured parties should pay the actuarially sound rate for their state or even subsidiary jurisdiction. For example, Galveston, Texas, is presumably a higher risk to insure than Amarillo, Texas.

that can diversify the risk of insuring the coastal areas. At least those individuals who live in the high-risk states directly benefit from their robust and viable coastal communities. However, it is a bit harder to see how someone living in the Upper Peninsula of Michigan should bear the cost of insuring high-risk coastal or fault-line communities.

Given these realities, individuals and businesses in the 39 lower-risk states should not pay higher P&C insurance rates or pay higher federal taxes to subsidize the living costs of those individuals and business that choose to locate in the 11 high-risk states. This is especially true given the irresponsible coastal and fault line development over the past two decades in spite of the high risks.

Furthermore, Florida and Texas heavily promote their lack of a state income tax to encourage individuals and businesses to relocate into their jurisdictions. Low-risk states ought to be equally justified in promoting their significantly lower P&C insurance rates to retain or attract the same individuals and businesses. Since owning a home is the single largest cost-of-living expense, substantially lower P&C rates would equate to a discernable advantage. If competition is good in tax policy, then competition among the states in P&C insurance rates should also be good. Yet it is taken almost as gospel that high-risk states should not be required to charge actuarially sound P&C insurance rates. This belief should be rejected because it ignores reality.

It is axiomatic that public policy should place the full burden of risk on those who assume that risk. States need to eliminate arbitrary rate caps on P&C insurance so that the insured parties pay fully for the risk of their actions, thereby allowing insurance companies to acquire capital reserves sufficient to deal with most, if not all, natural disasters.

Principle #3: State eligibility should depend on meeting five requirements.

To be eligible for any federal catastrophic natural disaster program, a state should meet five requirements:

1. **No rate caps.** The state must eliminate rate caps and permit insurance companies to charge actuarially sound P&C insurance rates. Before receiving federal taxpayer funds, the state must have allowed insurance companies the opportunity to earn capital reserves sufficient to meet any obligations. Otherwise, taxpayers in other states are forced to subsidize the high-risk state's irresponsible behavior. The decision by State Farm, the largest P&C insurer in Florida, to stop offering coverage in Florida because the state refuses to let it charge an actuarially sound rate demonstrates that this issue is not theoretical.[15]
2. **Sound building codes.** The state must enact and enforce sound building codes that minimize damage from known natural disaster risks. Due to the aggressive development in high-risk areas, the costs of natural disasters have increased substantially. Therefore, it makes eminent sense to require states to enact and enforce sound building codes known to mitigate the vulnerabilities and consequences of known risks.
3. **No redevelopment of disaster-prone areas.** The state must prohibit redevelopment of disaster-prone areas unless the U.S. Army Corps of Engineers has approved the mitigation action taken to prevent repetitive losses and the private sector insurance market has ascertained, through offering rate-cap-free P&C policies, that the mitigation action has eliminated or minimized the repetitive loss issue. As learned from the NFIP, the only outcome that can be expected from rebuilding in a known flood zone is a flooded structure. This insanity must end.
4. **Tort reform.** As important, the state must enact tort reform to eliminate or significantly reduce the frivolous lawsuits by overzealous lawyers seeking to capitalize on sensational headlines and public sympathy following a natural disaster. In most cases, the insurance companies win such lawsuits. Nonetheless, insurance companies must spend millions of dollars defending insurance contracts. In some cases, insurance companies settle to avoid negative publicity or a stacked deck in "jackpot" jurisdictions. Baseless lawsuits only drive up the cost of P&C policies for consumers.

15. Randy Diamond, "State Farm Pulling Out of Florida," *Palm Beach Post*, January 27, 2009.

Case Study: The National Flood Insurance Program as a Model of What Not to Do

Started in 1968, the NFIP aimed to provide flood insurance to people living in known flood plains. From 1968 to 2005, the NFIP paid roughly $15 billion in claims. It went bankrupt in 2005. Part of the problem was that some policyholders paid premiums covering only 35 percent to 40 percent of the expected costs. NFIP also contained many "repetitive-loss properties," which are properties that had claims in excess of $1,000 twice over a 10-year period. These properties represent almost 30 percent of all claims. Furthermore, in many flood plains the vast majority of individuals lack flood insurance.

In summary, policyholders do not pay actuarially sound premiums, policyholders are permitted to rebuild in known flood plains, and a majority of individuals in known flood plains do not purchase flood insurance.[1]

1. J. David Cummins, "Should the Government Provide Insurance for Catastrophes?" Federal Reserve Bank of St. Louis *Review* (July/August 2006) at *http://research.stlouisfed.org/publications/review/06/07Cummins.pdf* (March 30, 2009).

5. **Mandated P&C insurance.** Finally, states must require individuals and businesses in known hurricane, earthquake, and flood zones to purchase P&C insurance, including state-based earthquake and hurricane insurance and federal flood insurance. Such a mandate will increase the capital reserves of insurance companies and the liquidity of government insurance programs.

Principle 4: State participation should be opt-in only.

One of the greatest aspects of American democracy is its adherence to federalism. As U.S. Supreme Court Justice Louis Brandeis noted many years ago, America has its "laborator[ies]" of democracy[16] that constantly seek ways to meet objectives more efficiently and more effectively. As the Risk Management Solutions map illustrates, most states do not face a predictable catastrophic natural disaster risk. Forcing those states to join a catastrophic natural disaster program is inherently unfair and violates U.S. federalist principles. Hence, governors and state legislatures—not the federal government—should decide whether or not their individual states will opt into any catastrophic natural disaster program and its higher P&C rates.

Principle 5: Tax and accounting policies must permit insurance and reinsurance companies to retain sufficient capital reserves.

Before launching another federal program, Congress should amend existing tax laws that prevent insurance and reinsurance companies from taking tax deductions for capital reserves. Concomitant with tax reform, the accounting industry should alter generally accepted accounting principles to permit insurance and reinsurance companies to establish reserves for potential catastrophes. These two changes would provide incentives for those companies to establish larger capital reserves for potential catastrophic natural disasters, thereby reducing the need for government assistance.

Are These Principles Enough?

These five principles are a good start, but even they may not be enough to justify passage of a CAT fund. Experience has shown that both states and insurance companies have used CAT funds and similar insurance programs to shift risk to the federal government that should be retained by insurance companies. They have used such programs to obtain back-door federal subsidies for state property insurance and reinsurance systems, which are designed more to help taxpayers avoid paying insurance rates than reflect the true risk to their properties.

State governments are free to develop irresponsible property insurance programs provided that they and their citizens understand that they must bear the consequences. CAT funds that create a direct

16. See *New State Ice Co. v. Liebmann*, 285 U.S. 262, 285 (1932) (Brandeis, L., dissenting).

federal loan program to provide federal "bridge loans" to cover losses to state reinsurance programs when natural disaster claims exceed the state funds' assets need special scrutiny. Experience with the federal flood insurance program shows that once federal loans reach a significant level, there will be an immediate attempt to persuade the government to forgive them.[17] At that point, the "bridge loan" program becomes a back-door approach for the federal government to assume much of the risk for property losses caused by hurricanes and similar disasters.

Conclusion

Over the past six months, we have witnessed an unprecedented expansion of federal control, power, spending, and deficits. As we are quickly learning, federal expansion comes at a steep price and with the entire baggage of waste, fraud, and abuse that is expected with monolithic, opaque federal action. It is high time that America steps back from this dangerous precipice before the government structure is changed wholly beyond the one designed by the Founding Fathers in the Constitution.

Those who sound the clarion call for federalizing more disasters would do well to read the Constitution, *The Federalist Papers*, and *The Heritage Guide to the Constitution*.[18] As President Calvin Coolidge remarked on the 150th Anniversary of the Declaration of Independence, "It is not so much then for the purpose of undertaking to proclaim new theories and principles that this annual celebration is maintained, but rather to reaffirm and reestablish those old theories and principles which time and the unerring logic of events have demonstrated to be sound."[19] History has repeatedly shown that federalization is rarely the path to a better tomorrow.

The U.S. has thrived for 223 years without a federal CAT fund. Other than irresponsible government action, a lack of leadership and accountability, and a federally incented policy of ignoring risk, nothing is preventing states from freeing insurance companies to charge actuarially sound P&C insurance rates and citizens from bearing the costs of the risks they assume.

Nothing but politics, that is.

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17. Becky Bohrer, "Local Government Katrina Loans Could Be Forgiven," Associated Press, March 31, 2009.
18. Edwin Meese III, Matthew Spalding, David Forte, eds., *The Heritage Guide to the Constitution* (Washington, D.C.: Regnery Publishing, 2005).
19. Calvin Coolidge, "On the Occasion of the One Hundred and Fiftieth Anniversary of the Declaration of Independence," speech in Philadelphia, July 5, 1926, at *http://www.ashbrook.org/library/20/coolidge/declaration.html* (March 27, 2009).

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