

Insurance & Coastal Risk in Florida

An Economic Analysis

**Florida Hurricane Catastrophe Fund
7th Annual Participating Insurers Workshop
Orlando, FL**

June 7, 2007



**Robert P. Hartwig, Ph.D., CPCU, President & Chief Economist
Insurance Information Institute ♦ 110 William Street ♦ New York, NY 10038
Tel: (212) 346-5520 ♦ Fax: (212) 732-1916 ♦ bobh@iii.org ♦ www.iii.org**

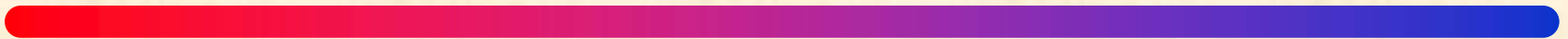


Presentation Outline

- **Review of Florida Hurricane Risk: An Insurance Industry Perspective**
- **Florida Exposure Analysis**
 - How Bad is It?
 - Could it Get Any Worse?
- **Are Florida's Development Patterns Rational?**
 - Examination of Stakeholder Incentives
- ***How Insurers Signal What Should be Built & Where***
 - Private vs. Government-run Insurers
- **Role of Risk Perception**
- **What Works, What Doesn't**
- **Overview of a National Catastrophe Plan**
- **State-Run Plans**
- **Recommendations**

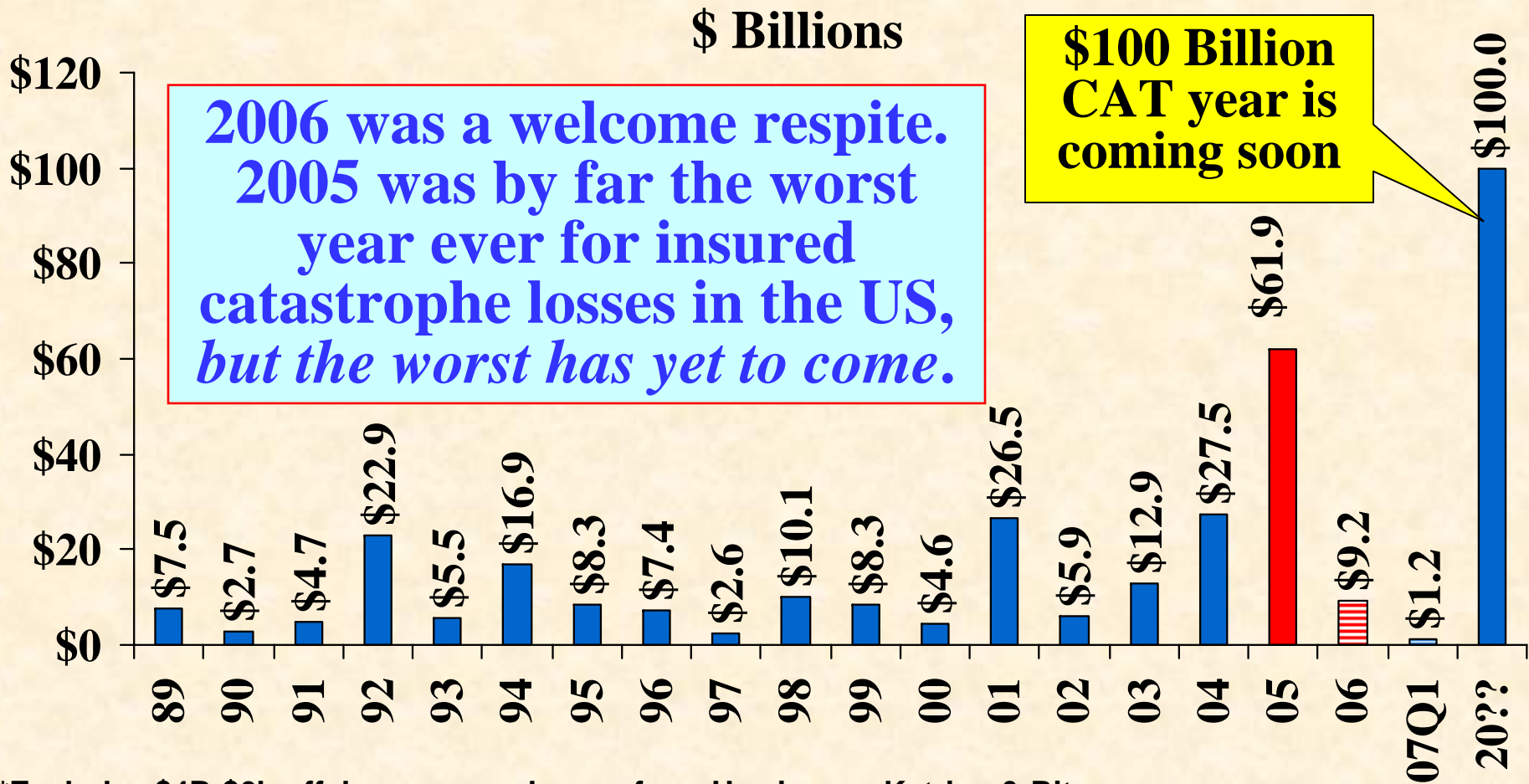
Review of Florida Hurricane Risk:

*An Insurance Industry
Perspective*





U.S. Insured Catastrophe Losses*



*Excludes \$4B-\$6b offshore energy losses from Hurricanes Katrina & Rita.

Note: 2001 figure includes \$20.3B for 9/11 losses reported through 12/31/01. Includes only business and personal property claims, business interruption and auto claims. Non-prop/BI losses = \$12.2B.

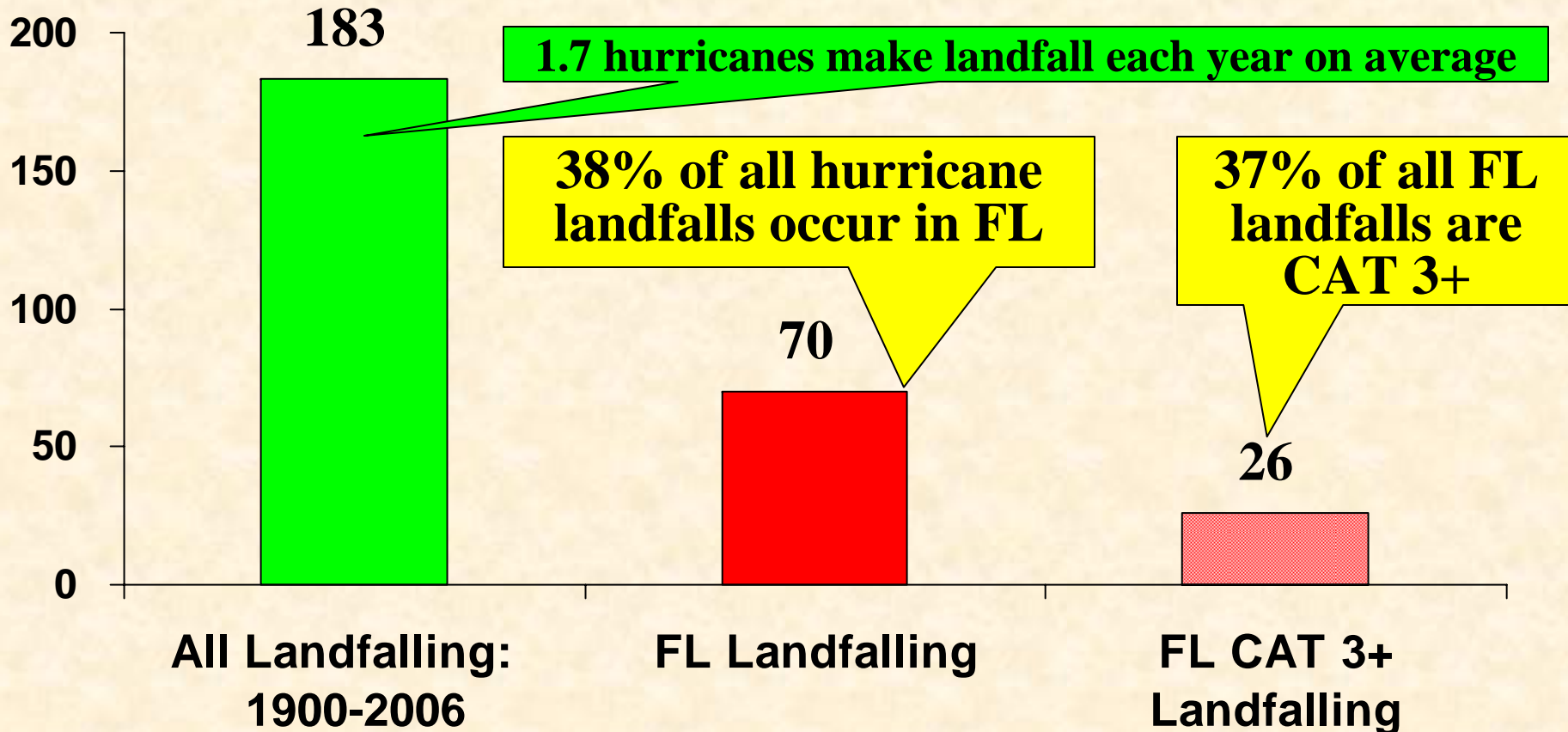
Source: Property Claims Service/ISO; Insurance Information Institute



Landfalling Hurricanes: 1900-2006

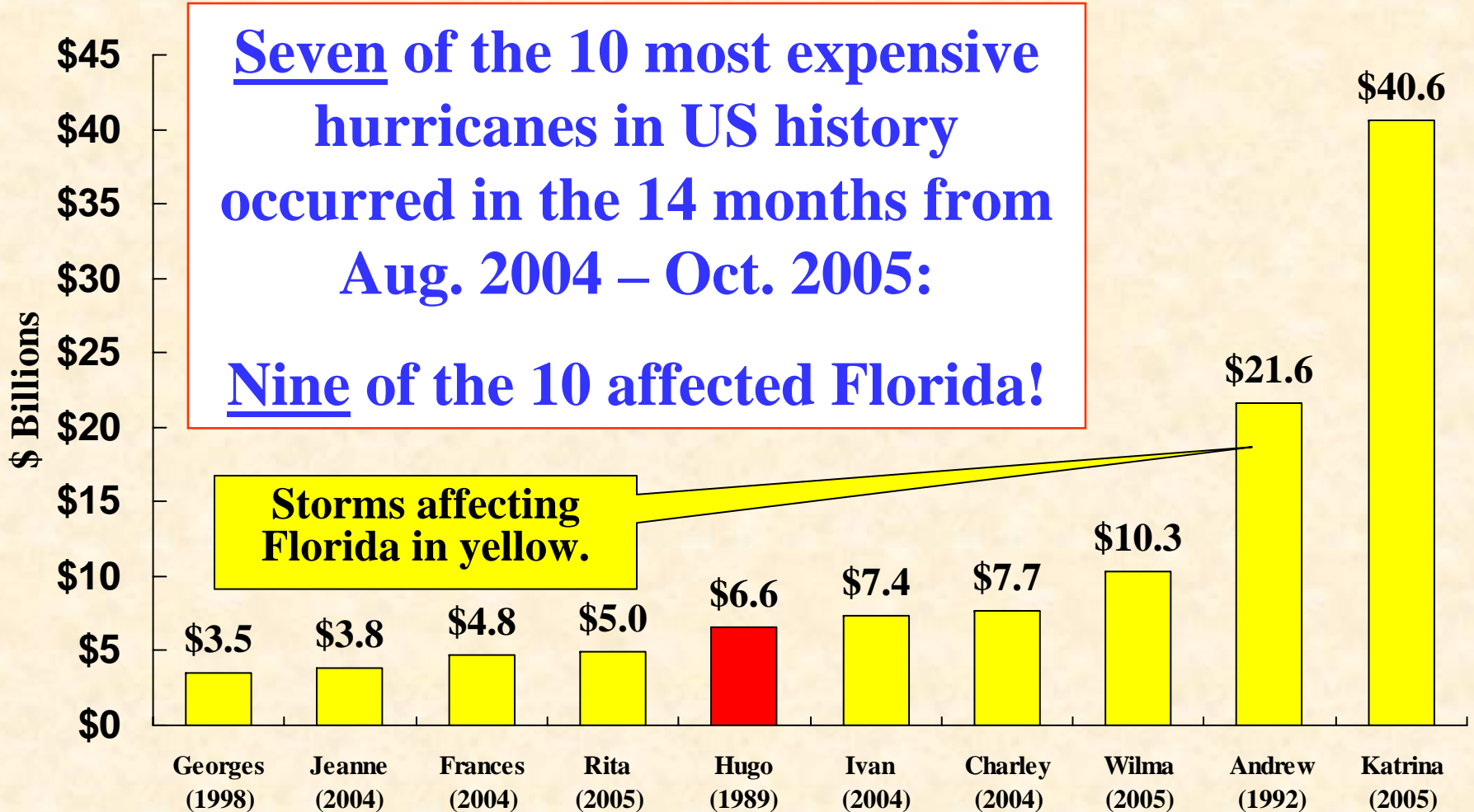
FL Landfalls are Common

A hurricane strikes FL every other year on average—CAT 3+ every 4 years



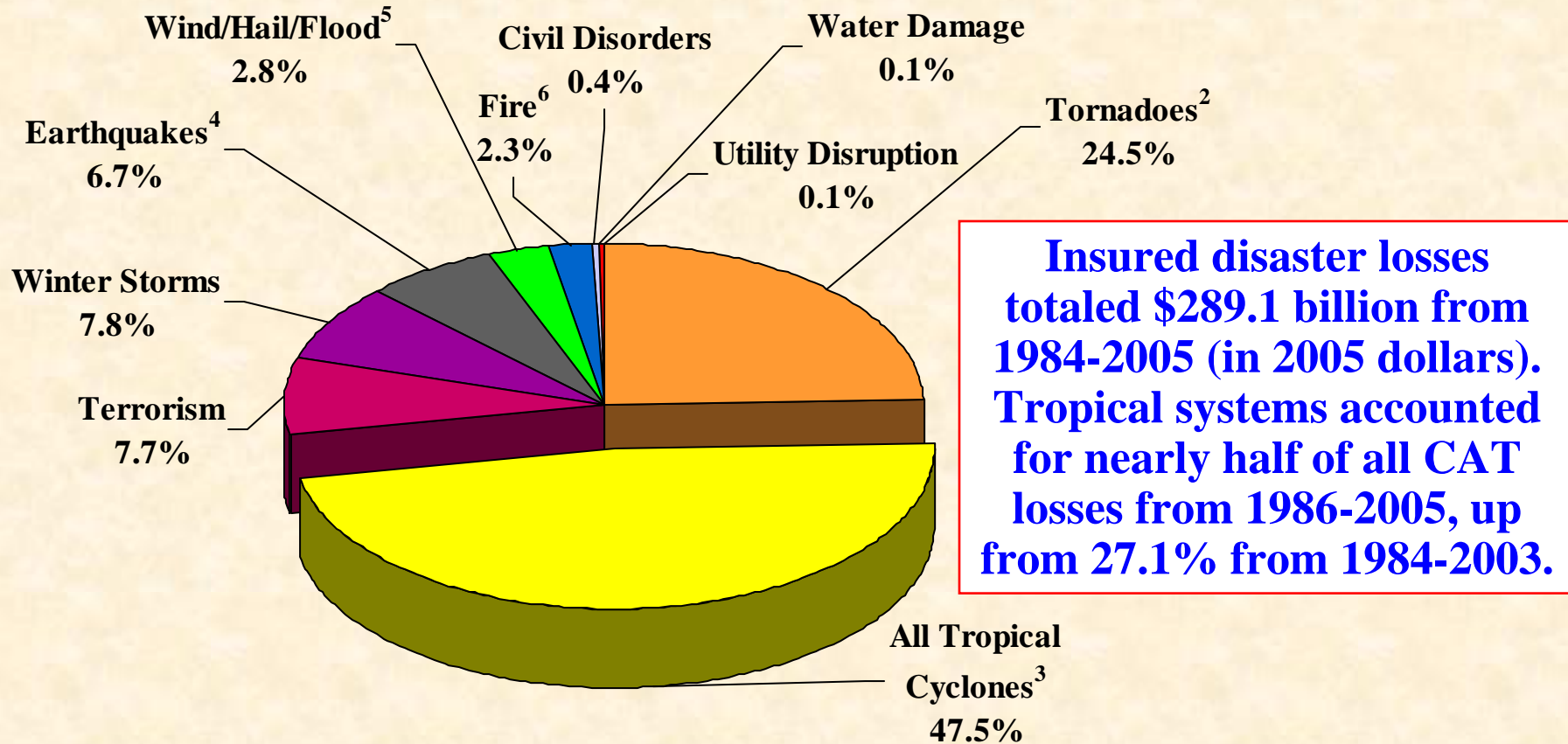


Top 10 Most Costly Hurricanes in US History, (Insured Losses, \$2005)





Inflation-Adjusted U.S. Insured Catastrophe Losses By Cause of Loss, 1986-2005¹

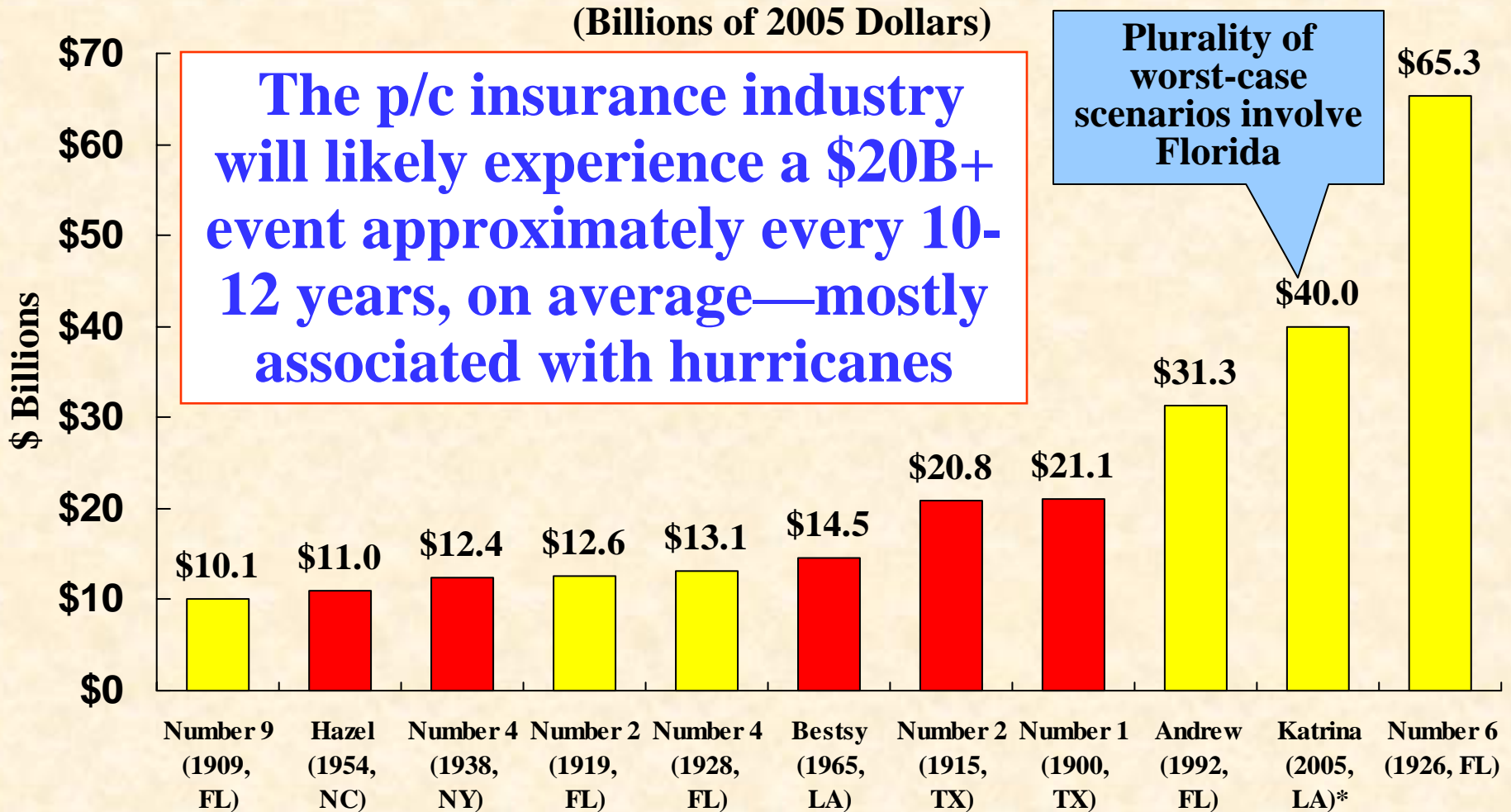


¹ Catastrophes are all events causing direct insured losses to property of \$25 million or more in 2005 dollars. Catastrophe threshold changed from \$5 million to \$25 million beginning in 1997. Adjusted for inflation by the III.

² Excludes snow. ³ Includes hurricanes and tropical storms. ⁴ Includes other geologic events such as volcanic eruptions and other earth movement. ⁵ Does not include flood damage covered by the federally administered National Flood Insurance Program. ⁶ Includes wildland fires.



Insured Losses from Top 10 Hurricanes Since 1990 & Katrina Adjusted for Inflation, Growth in Coastal Properties, Real Growth in Property Values & Increased Property Insurance Coverage

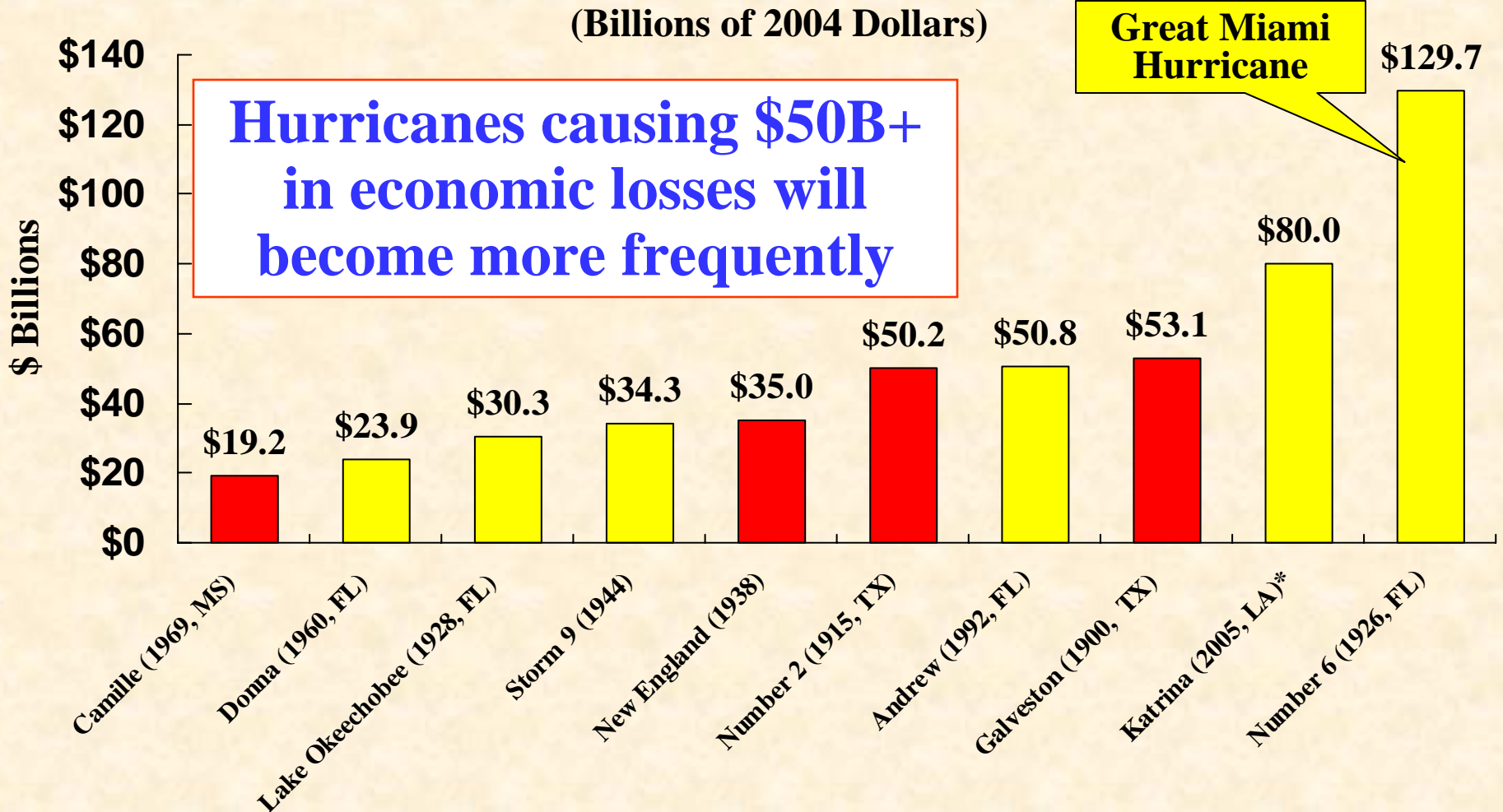


*ISO/PCS estimate as of October 10, 2005.

Source: *Hurricane Katrina: Analysis of the Impact on the Insurance Industry*, Tillinghast, October 2005; Insurance Info. Institute.



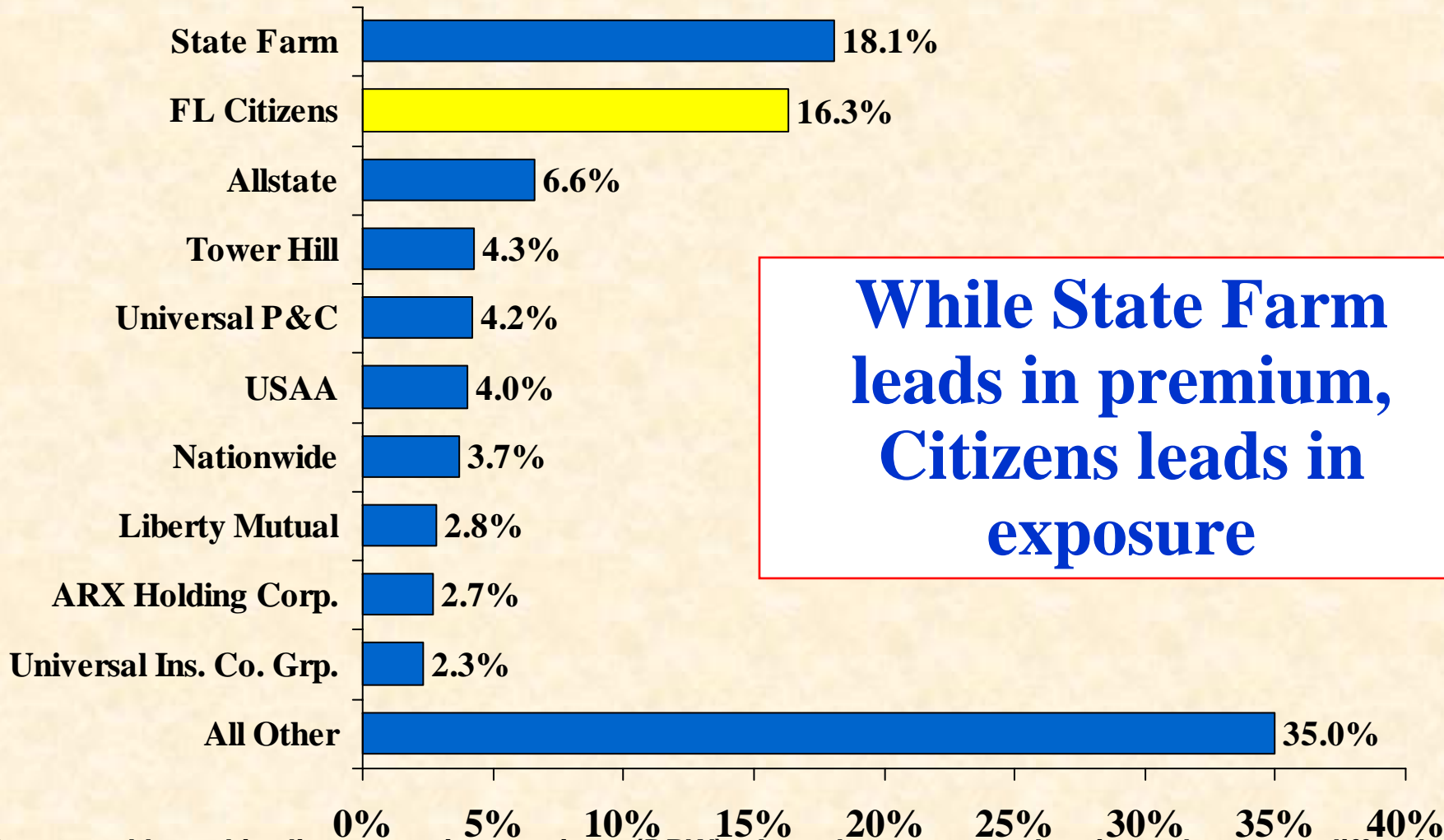
Hurricane Damage from Top 10 Hurricanes Since 1900 Adjusted for Inflation, Growth in Coastal Properties, Real Growth in Property Values*



*Includes damage from wind and storm surge but generally excludes inland flooding.
Source: Roger Pielke and Christopher Landsea, December 2005; Insurance Info. Institute.



Florida Homeowners Insurance Market Share (As of 12/31/06)



**While State Farm
leads in premium,
Citizens leads in
exposure**

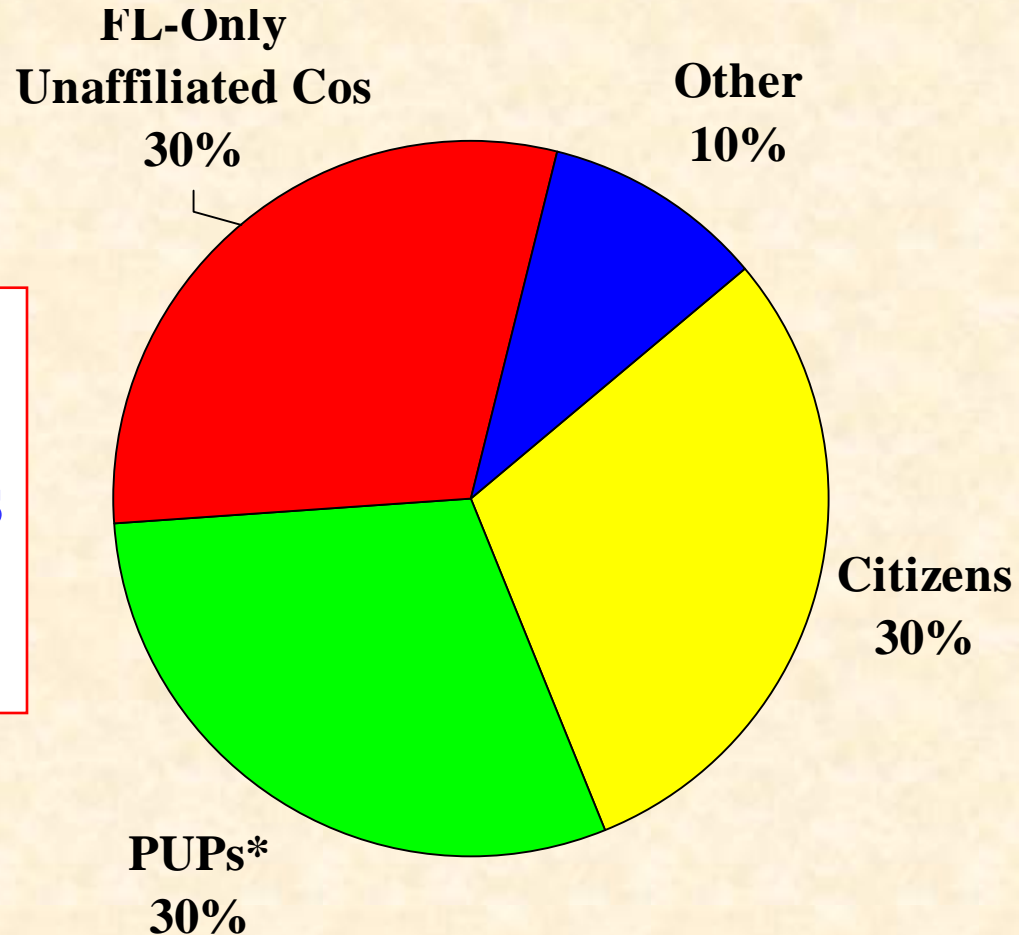
*Computed based in direct premiums written (DPW). Actual exposure to hurricane loss may differ due to reinsurance purchased and location of risk.

Source: Fitch Ratings, *Hurricane Season 2007: A Desk Reference for Investors*, June 1, 2007.



Florida Residential Insurance Admitted Market Breakdown

2006



Risk is highly concentrated in Florida in Citizens and FL-only companies

*PUPs are Florida-only subsidiaries of companies with multi-state or national operations.

Source: Citizens Property Insurance Corp.

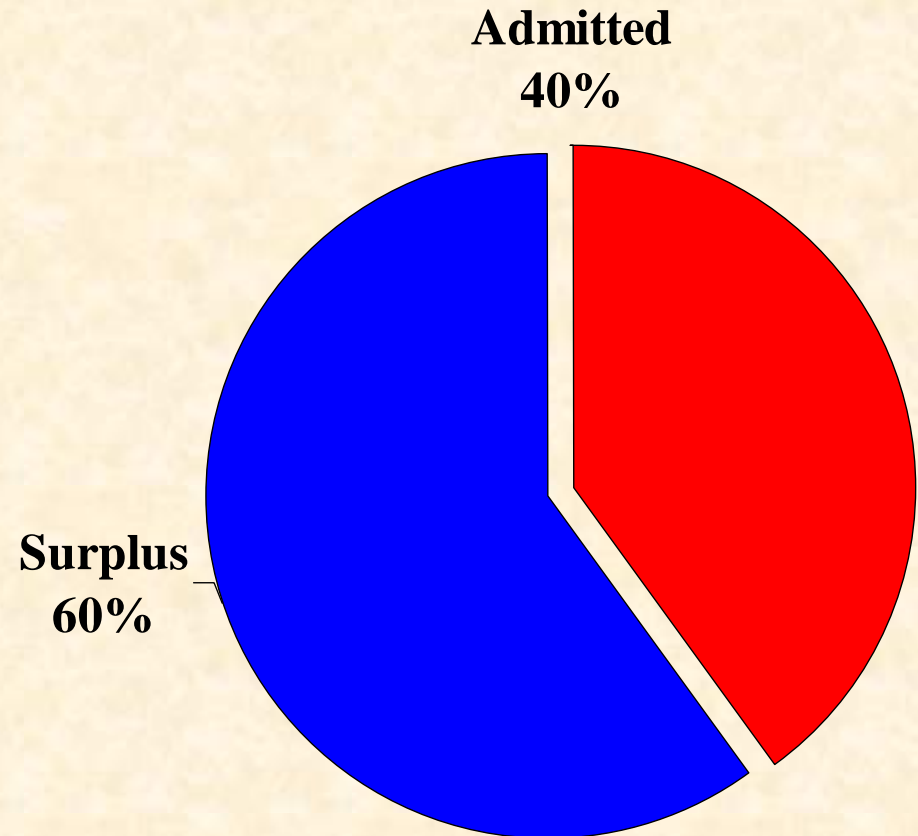
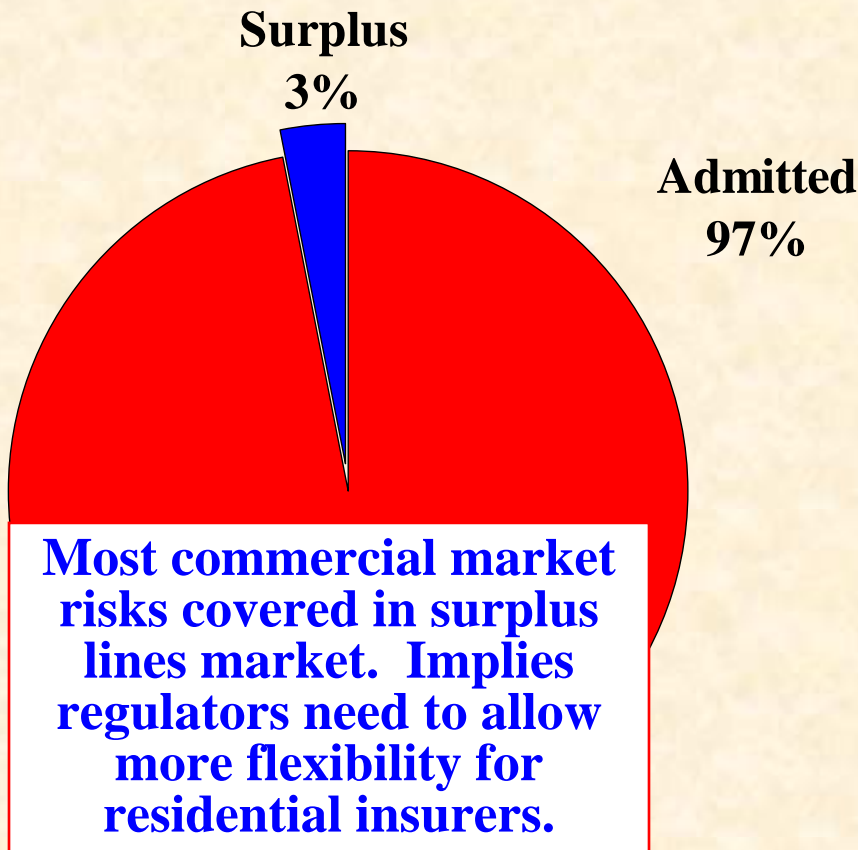


Florida Property Insurance

Market Breakdown (as of 12/31/05)

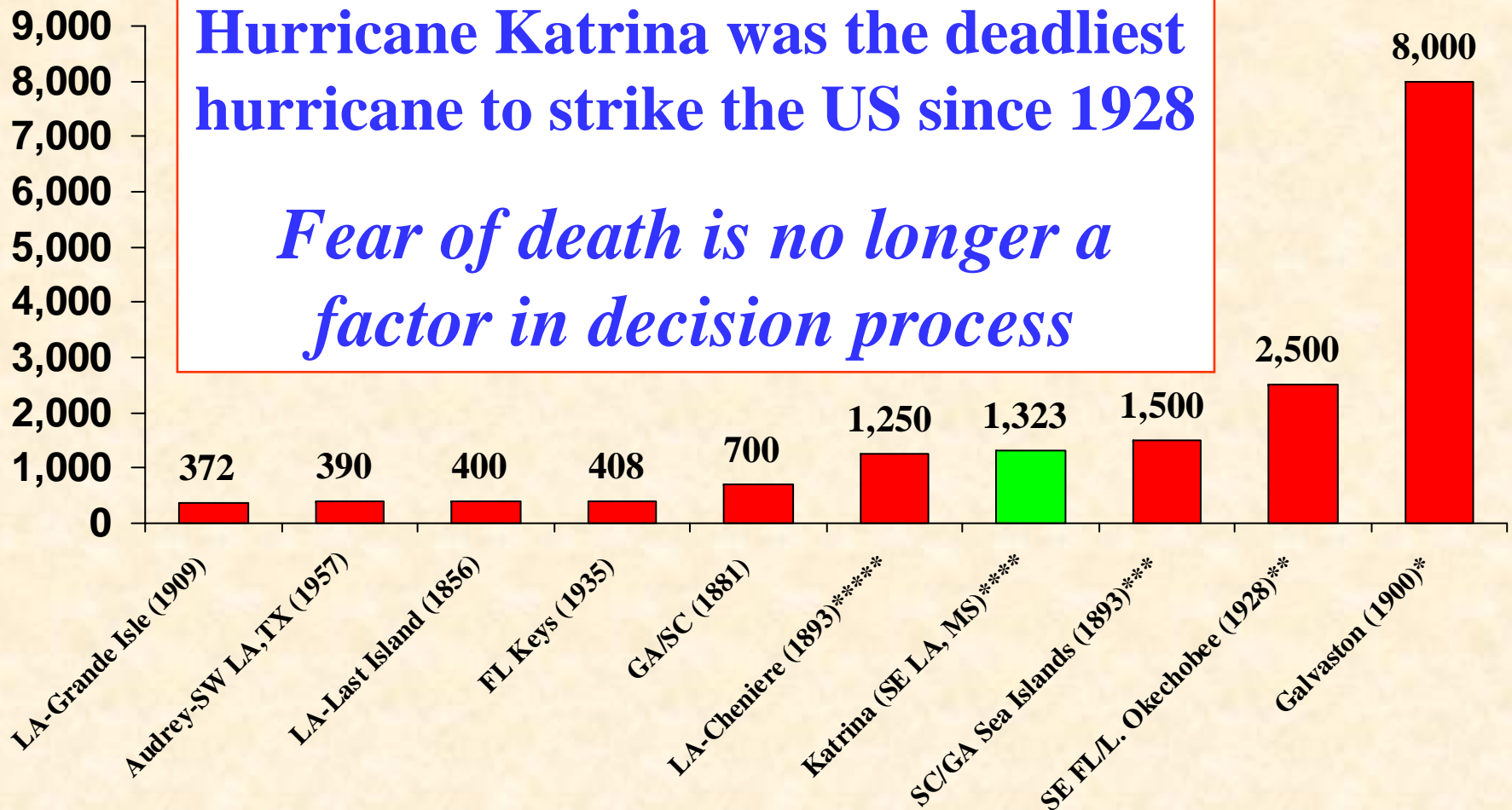
Residential

Commercial





Top 10 Deadliest Hurricanes to Strike the US: 1851-2006



*Could be as high as 12,000

**Could be as high as 3,000

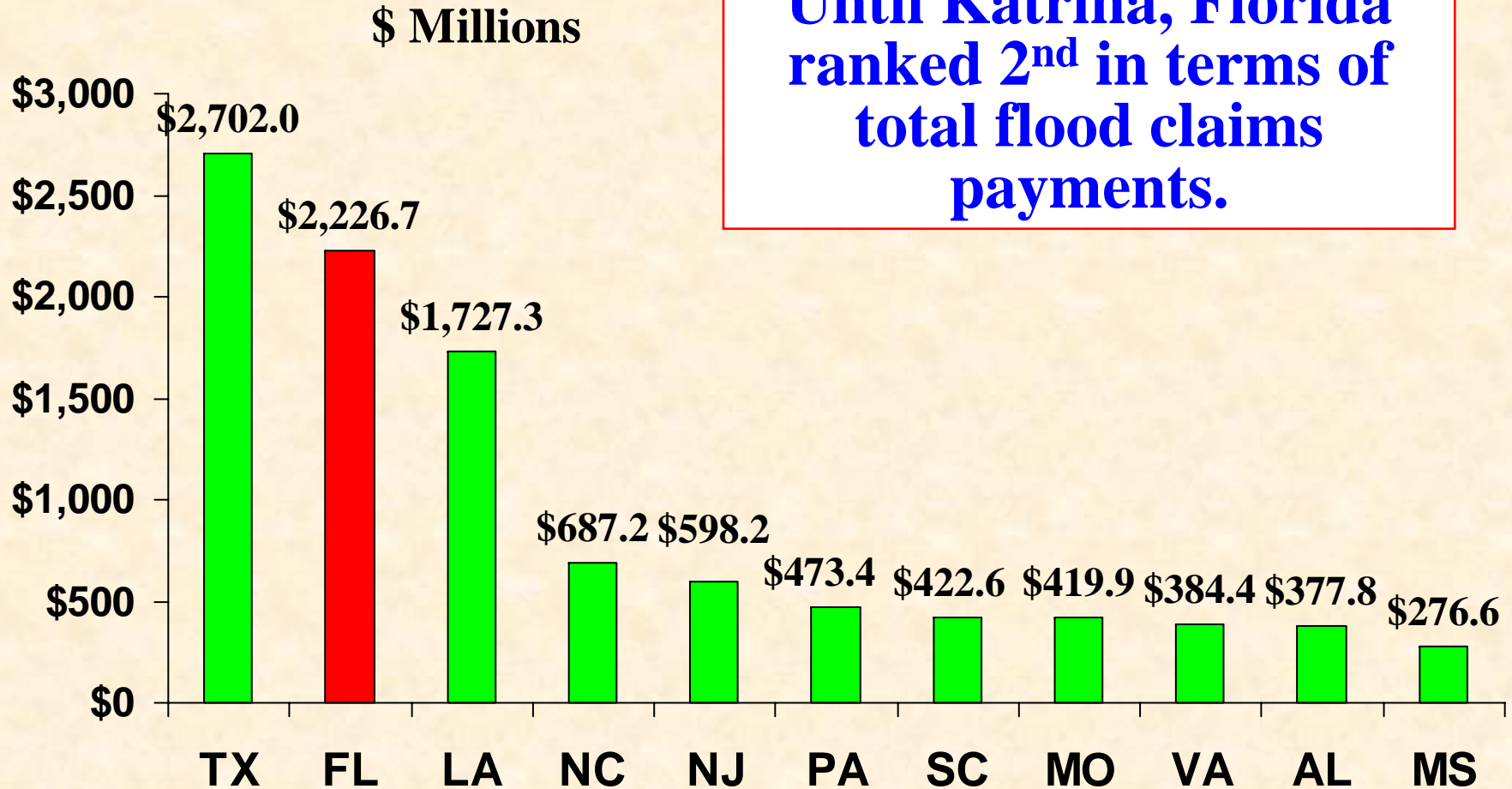
***Midpoint of 1,000 – 2,000 range

****Associated Press total as of Dec. 11, 2005. *****Midpoint of 1,100-1,400 range.

Sources: NOAA; Insurance Information Institute.



Total NFIP Claim Payments by State (Top 10) Jan 1, 1978 - Dec. 2004





Outlook for 2007 Hurricane

Season: 85% Worse Than Average

	Average*	2005	2007F
Named Storms	9.6	28	17
Named Storm Days	49.1	115.5	85
Hurricanes	5.9	14	9
Hurricane Days	24.5	47.5	40
Intense Hurricanes	2.3	7	5
Intense Hurricane Days	5	7	11
Accumulated Cyclone Energy	96.2	NA	170
Net Tropical Cyclone Activity	100%	275%	185%

*Average over the period 1950-2000.

Source: Philip Klotzbach and Dr. William Gray, Colorado State University, May 31, 2007.



Probability of Major Hurricane Landfall (CAT 3, 4, 5) in 2007

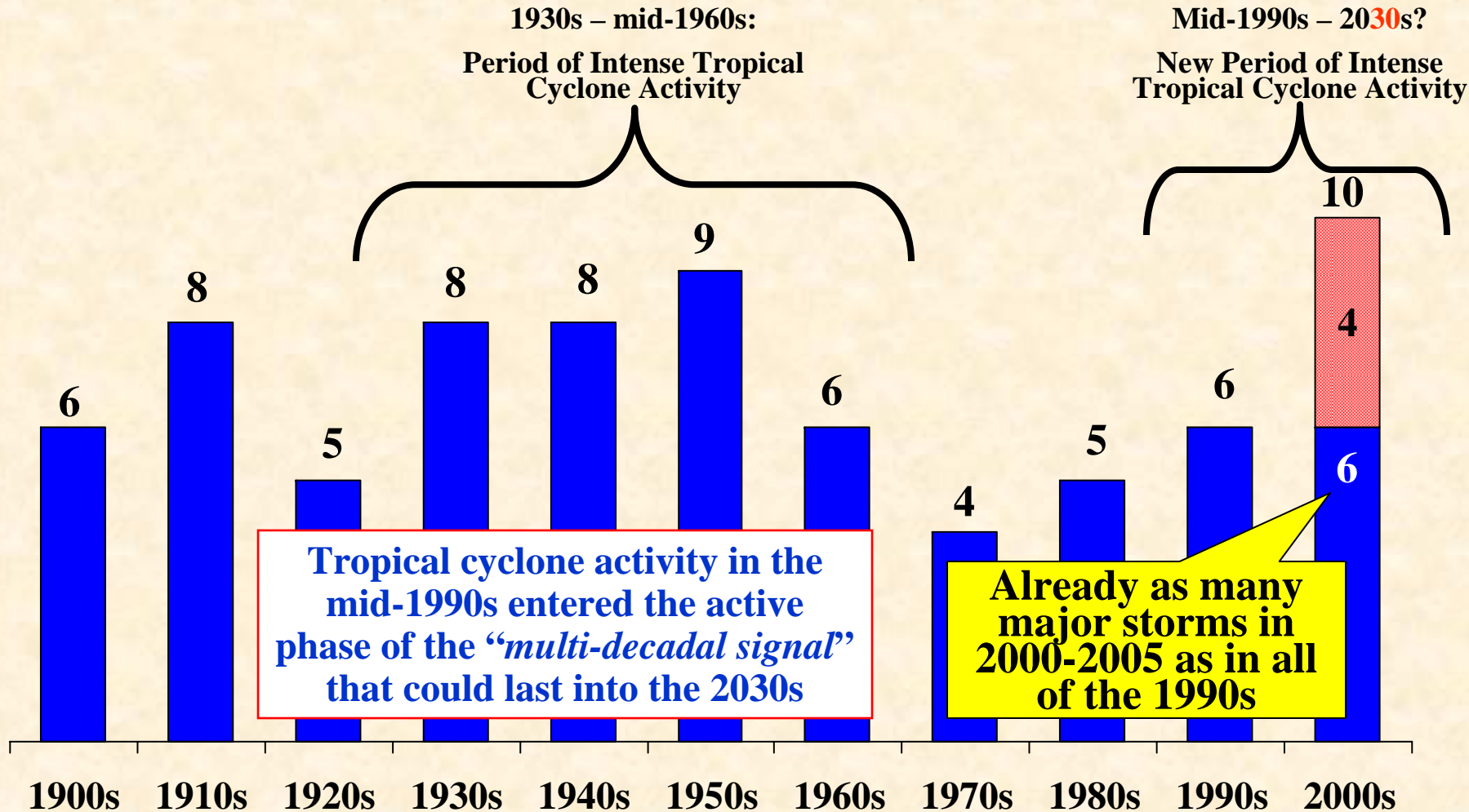
	Average*	2007F
Entire US Coast	52%	74%
US East Coast Including Florida Peninsula	31%	50%
Gulf Coast from FL Panhandle to Brownsville, TX	30%	49%
<i>ALSO...Above-Average Major Hurricane Landfall Risk in Caribbean for 2007</i>		

*Average over the period 1950-2000.

Source: Philip Klotzbach and Dr. William Gray, Colorado State University, May 31, 2007.



Number of Major (Category 3, 4, 5) Hurricanes Striking the US by Decade



*Figure for 2000s is extrapolated based on data for 2000-2005 (6 major storms: Charley, Ivan, Jeanne (2004) & Katrina, Rita, Wilma (2005)).

Source: Tillinghast from National Hurricane Center: <http://www.nhc.noaa.gov/pastint.shtm>.

Florida Hurricane Exposure Analysis:

How Bad Is It? (Bad)

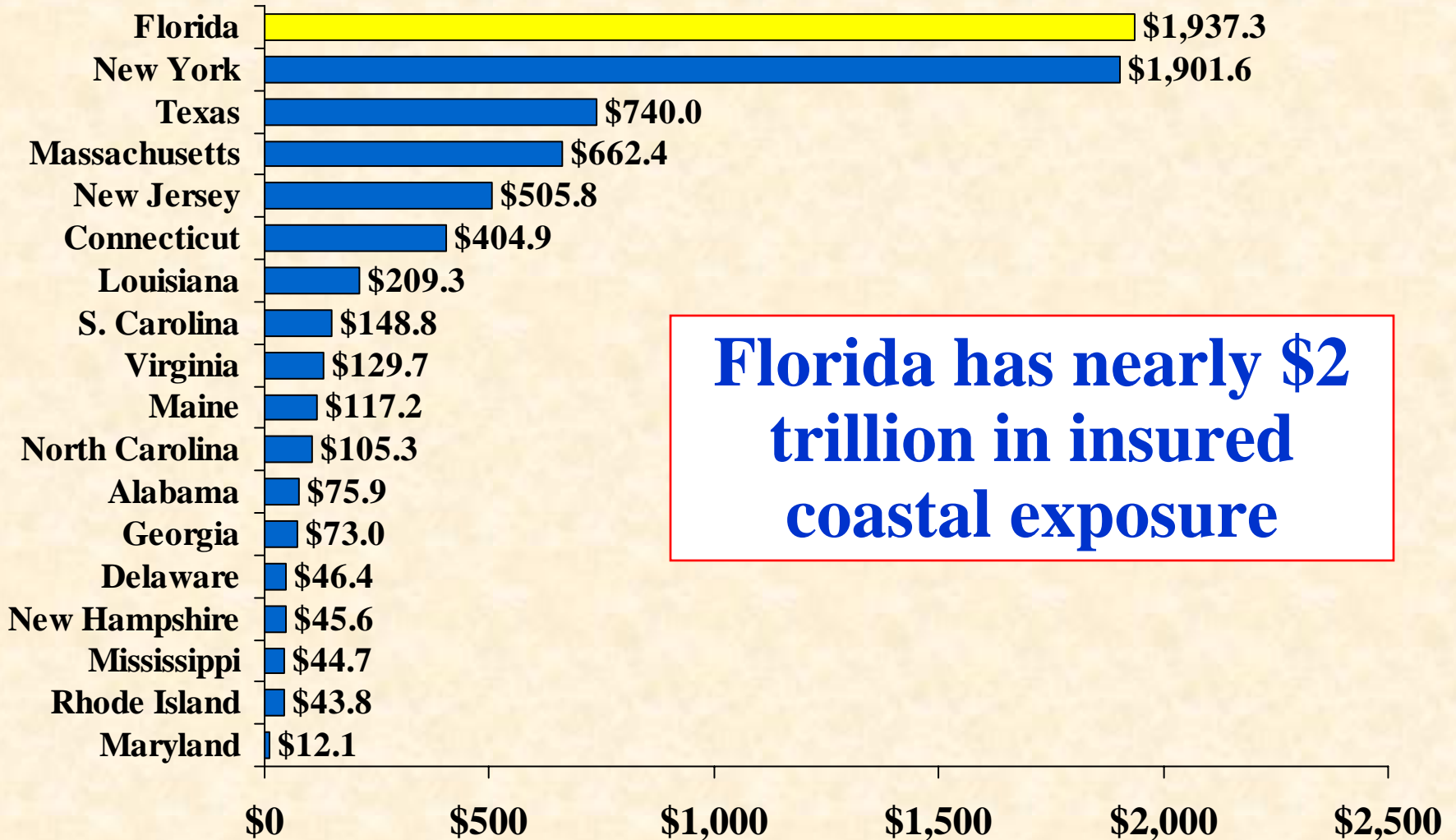
Could It Get Any Worse?

iii

(Yes)

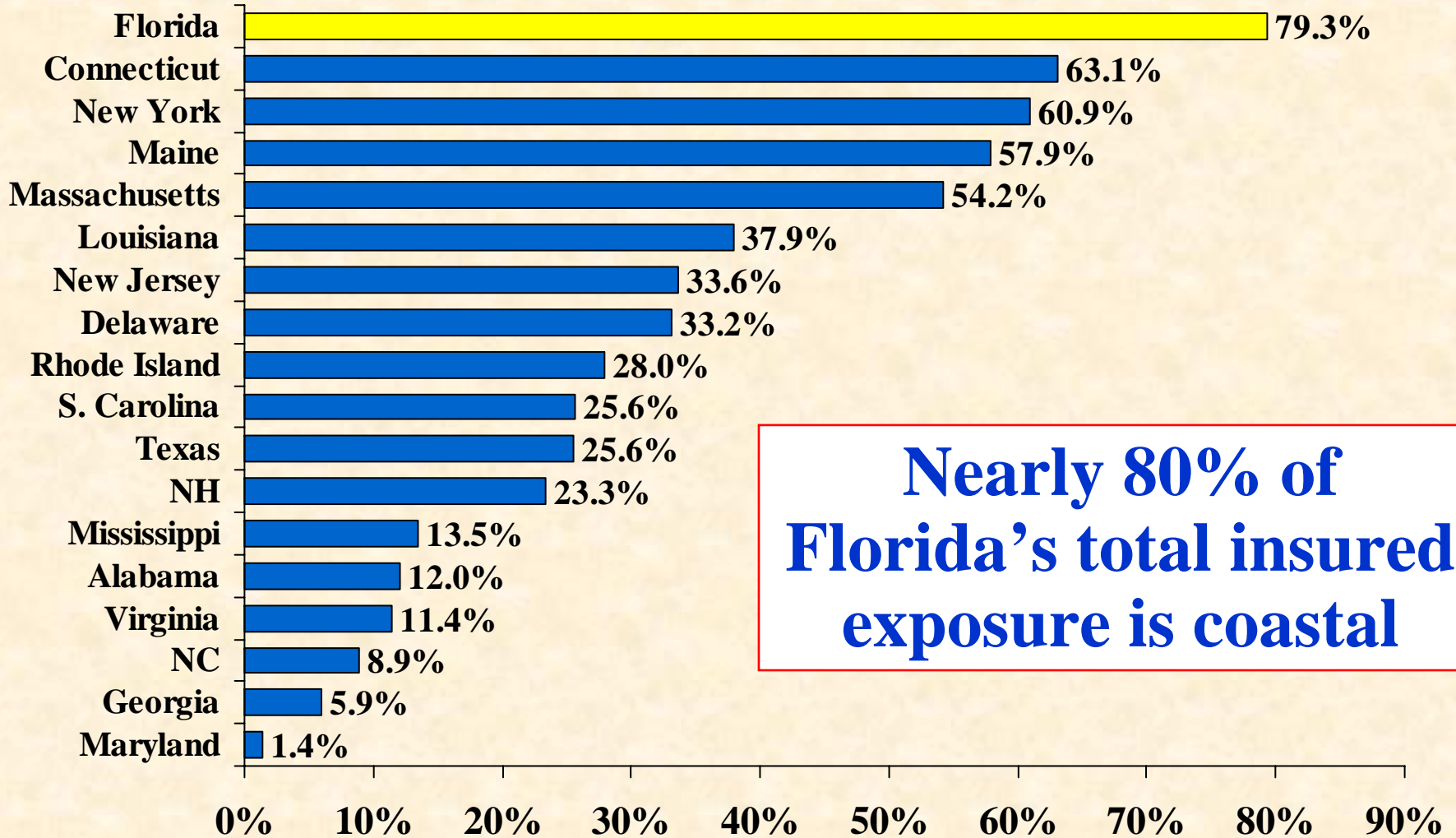


Total Value of Insured Coastal Exposure (2004, \$ Billions)





Insured Coastal Exposure as a % of Statewide Insured Exposure (2004, \$ Billions)

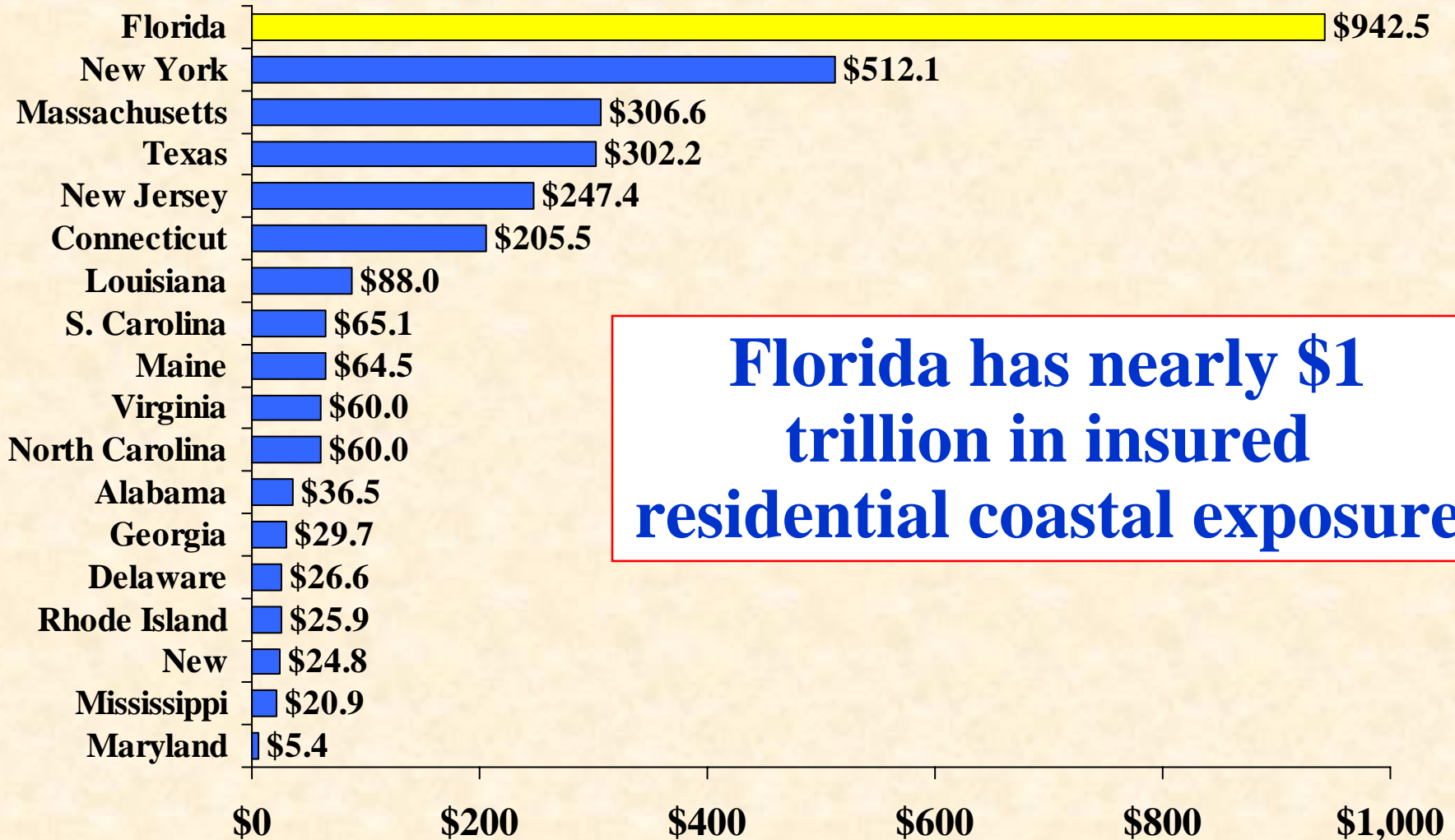


*III list

Source: AIR Worldwide

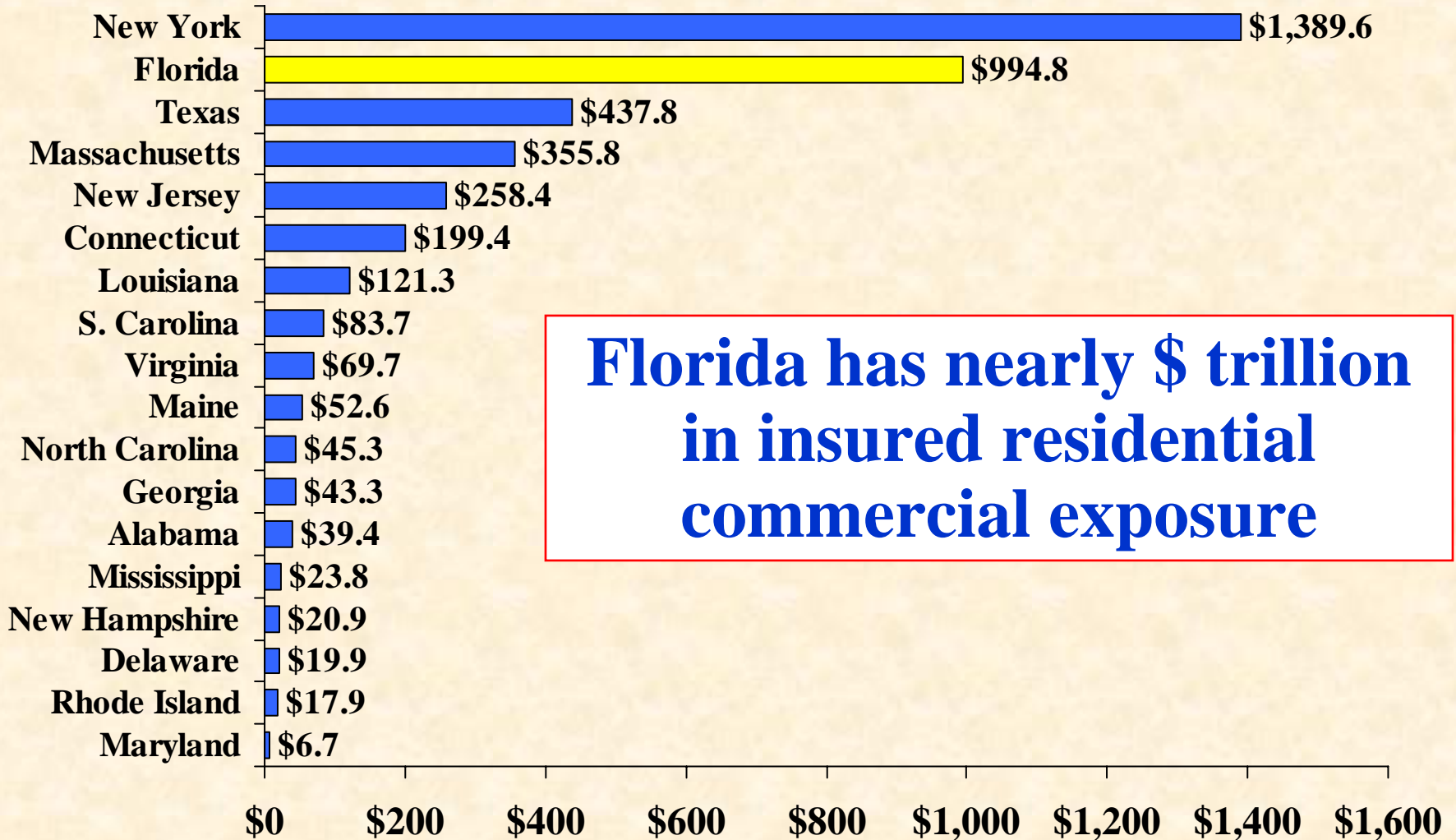


Value of Insured Residential Coastal Exposure (2004, \$ Billions)





Value of Insured Commercial Coastal Exposure (2004, \$ Billions)





Florida for Sale: 24/7/365

WATERFRONT PROPERTIES
To Advise, call (800) 843-3113

\$
SOUTH of FIVE

305.604.1400 | www.sof5th.com
starting at \$5 million

double height
oceanfront residences
south of fifth neighborhood
south beach

PLAY WHEN YOU STAY, RENT WHEN AWAY, BEHINDS YEAR ROUND.

MONACO
330341 & 3304
West Beach, Florida

CONTACT ONLINE: www.MonacoResortandSpa.com

MONACO
CONDO HOTEL & RESIDENCES

When it Comes to Waterfront Property,
Visionaries Have the Best View

PLAY WHEN YOU STAY, RENT WHEN AWAY, BEHINDS YEAR ROUND.

Name Units Remain-Call or Visit Today!
St. Myers - 2745 West 1st Street - 1-866-7MONACO
West Palm Beach Satellite Office - 317 Clematis Street

MONACO
330341 & 3304
West Beach, Florida

CONTACT ONLINE: www.MonacoResortandSpa.com

BAL HARBOUR, A WAY OF LIFE

BELLINI
ALL HARBOUR OF THE SKYLINE

The height of luxury living + immediate accessibility
• Priced from 2 million to 5.5 million + Ranging from 1,800 - 8,000 square feet
• Two extraordinary penthouses + 3 Marlin 2, Marlin 3, Marlin 4

Contact or visit the Bellini sales office for details
10250 Collins Avenue, 5th Floor, Fort Lauderdale, Florida 33315 • 954.801.8711
www.bellinirealestate.com

THE NEW YORK TIMES MAGAZINE / DECEMBER 11, 2006 121

Florida oceanfront real estate is advertised for sale throughout the country year round, like these ads from the *New York Times* and *Wall Street Journal*

THE SAVOY
A FENDI CASA

A HISTORIC OCEANFRONT OPPORTUNITY ON SOUTH BEACH

LUXURY HOTEL CONDOMINIUMS, OCEAN RESIDENCES, LOFTS & BEACH CLUB

Designs in concert with T. S. Johnson Architects, Inc.
Sales & Design: 312-368-6672

28th Street & Ocean Drive, South Beach, Miami • 305.666.9705 • SavoysMiami.com
©2006 Savoy • www.savoymiami.com

All images are artist's renderings. One or more units shown for illustrative purposes only. All prices are estimates and are subject to change without notice. This advertisement is not intended to constitute an offer of securities. For more information, please contact the issuer or the issuer's agent.



Florida for Sale: 24/7/365

forty-two stories of life, love, and luxury in the heart of Fort Lauderdale

When viewed from above, the colors of the city seem more vivid, the landscape more diverse, and the ocean a stone's throw away. Downtown feels alive with art and culture. Walks along the New River intersect with upscale shopping and scintillating nightlife. This is Icon Las Olas, 272 luxury condominiums with all the features and amenities you expect and desire, down to the last detail.

icon LAS OLAS
live famously

Now accepting reservations. Please call **888.249.3780** or visit www.iconlasolas.com

Other restrictions may apply. All information is subject to change without notice. All prices are estimates and do not include taxes, fees, and other charges. All prices are subject to change without notice. All prices are estimates and do not include taxes, fees, and other charges. All prices are subject to change without notice. All prices are estimates and do not include taxes, fees, and other charges.

Ft. Lauderdale

FLORIDA

FREE CONDO FEES FOR ONE YEAR
(WHEN YOU PURCHASE BY JUNE 30, 2007*)

THE PALM BEACH LIFE IS CLOSER THAN YOU THINK

IMMEDIATE OCCUPANCY

STOP BY & VISIT OUR ONSITE DESIGN CENTER TO VIEW ALL YOUR CUSTOM FINISH OPTIONS

CONVERTIBLES from \$214,900 - \$269,900
ONE BEDROOMS from \$239,900 - \$464,900
TWO BEDROOMS from \$274,900 - \$545,900
THREE BEDROOMS from \$422,900 - \$724,900

The Strand
ON THE BEACH

877.291.9521
www.TheStrand3.com

255 Avenida St,
West Palm Beach, FL 33401

Sales Center Hours:
M-F 10am-6pm, Sat 10am-5pm, Sun 12pm-5pm

Equal Housing Opportunity. Exclusively Marketed By Realty Executives and Services of Florida, LLC. *Offering begins June 1, 2007. All prices are estimates and do not include taxes, fees, and other charges. All prices are subject to change without notice. All prices are estimates and do not include taxes, fees, and other charges.

West Palm

Only 15 Residences Remaining

MIAMI BEACH DEVELOPER'S FINAL CLOSE-OUT

Blue/GreenDiamond CONDOMINIUMS

Only 15 Residences Remaining

2-Level Tower Suite Penthouse
3 bedrooms/4 baths • 2,400 sq ft
Private Heated Pool

Other models from \$810,000

Conveniently located between South Beach and Bal Harbour
Spectacular views overlooking 500 feet of pristine beach
16,000 sq ft ocean-side clubhouse & spa

Ocean-side recreation deck with pool, two spas, beachside cabanas & cafe
Two Tennis courts
630 residences in two 45-story towers

Sales Center open daily until 6:00pm
4777 Collins Avenue, Miami Beach
305.532.8668
www.BlueGreenDiamond.com

NewFlorida
www.newflorida.com

CHRISTIE'S REAL ESTATE

EWM
www.ewm.com

Miami Beach



New Condo Construction in South Miami Beach, 2007-2009

- **Number of New Developments: 15**
- **Number of Individual Units: 2,111**
- **Avg. Price of Cheapest Unit: \$940,333**
- **Avg. Price of Most Expensive Unit: \$6,460,000**
- **Range: \$395,000 - \$16,000,000**
- **Overall Average Price per Unit: \$3,700,167***
- **Aggregate Property Value: At least \$6 Billion**

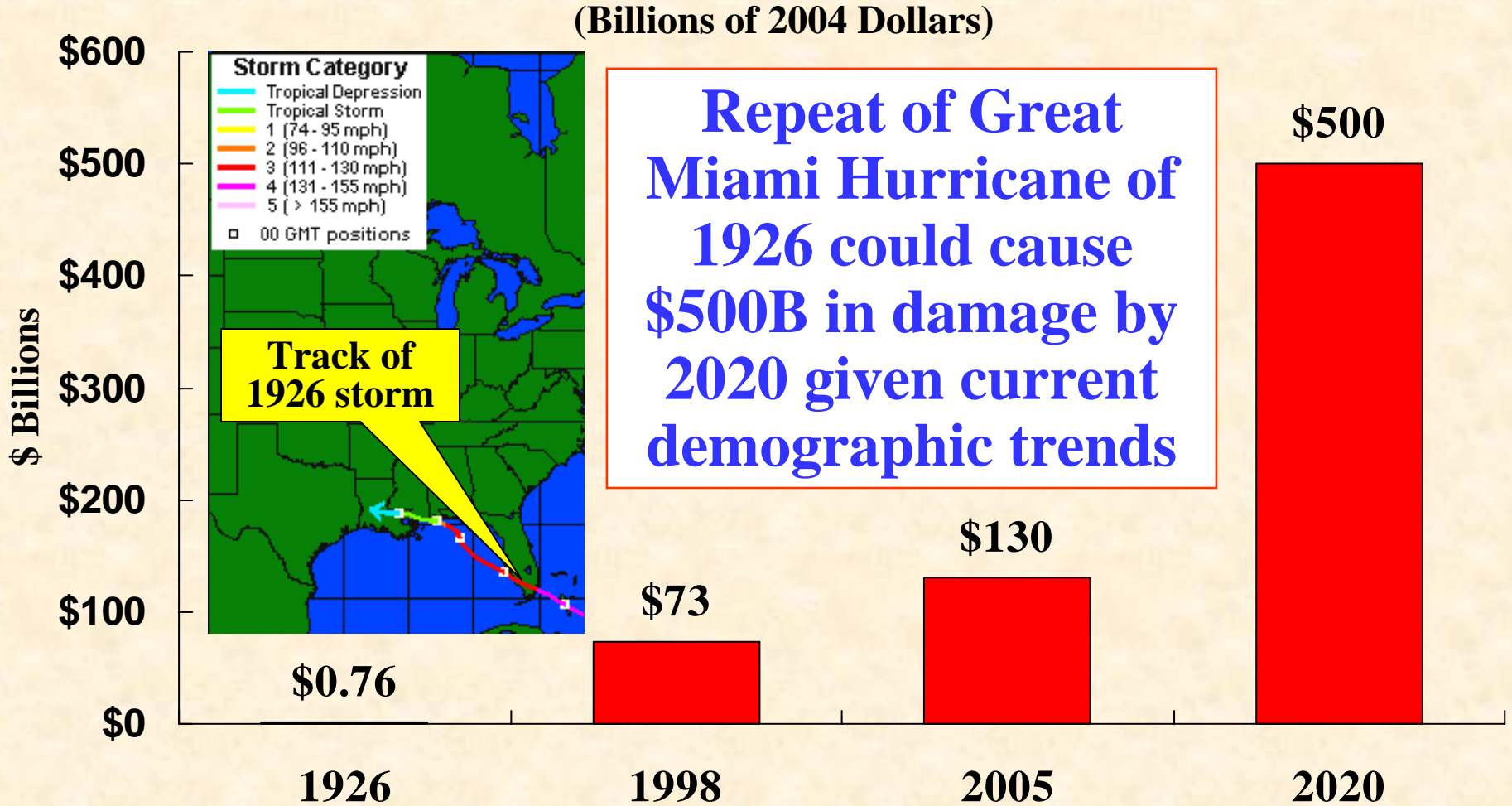


*Based on average of high/low value for each of the 15 developments

Source: Insurance Information Institute from www.miamicondolifestyle.com accessed April 5, 2007.



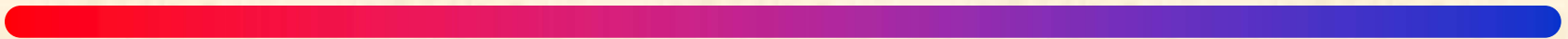
Great Miami Hurricane of 1926: Hurricane Damage Adjusted for Inflation, Growth in Coastal Properties, Real Growth in Property Values*



*Includes damage from wind and storm surge but generally excludes inland flooding.
Source: Roger Pielke and Christopher Landsea, December 2005; Insurance Info. Institute.

FINANCIAL STRENGTH & RATINGS

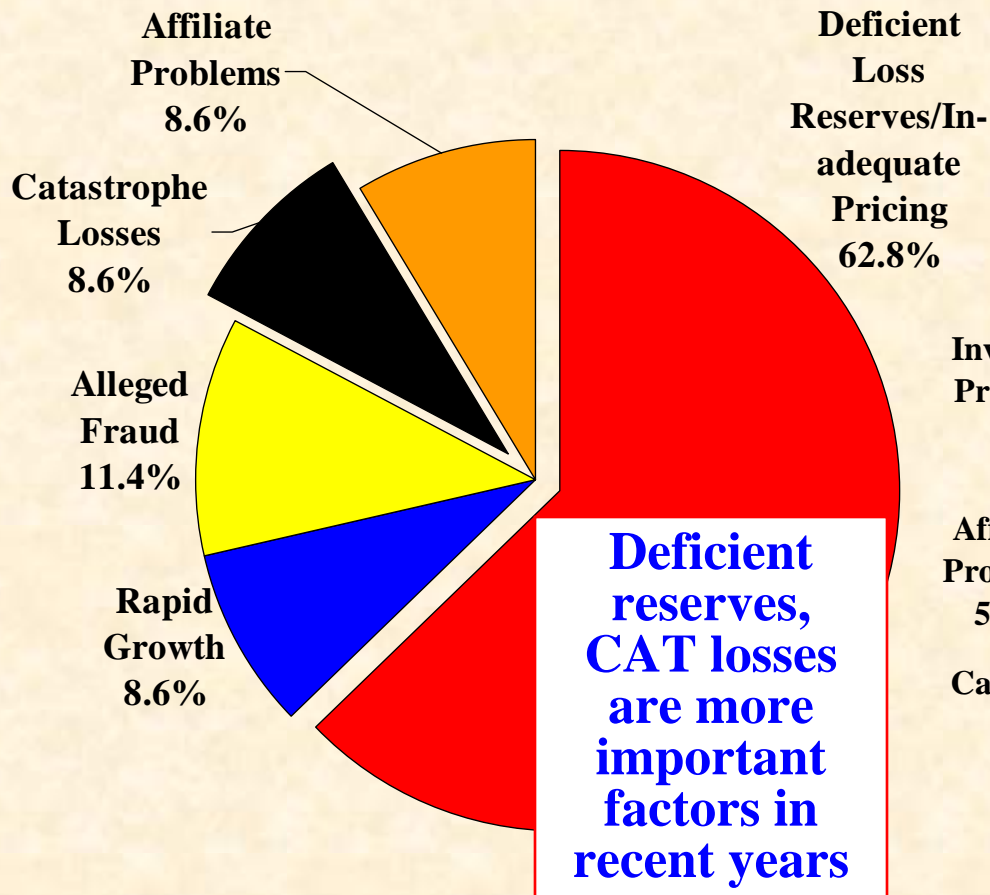
Industry Has Weathered
the Storms Well



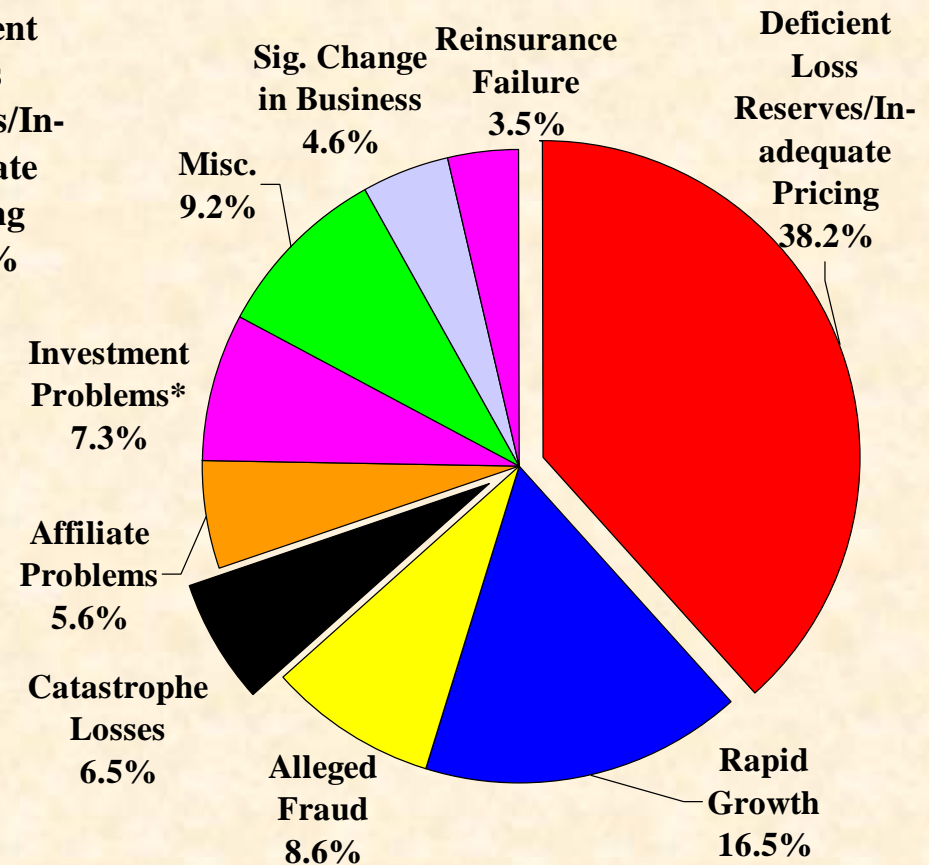


Reasons for US P/C Insurer Impairments, 1969-2005

2003-2005



1969-2005



*Includes overstatement of assets.



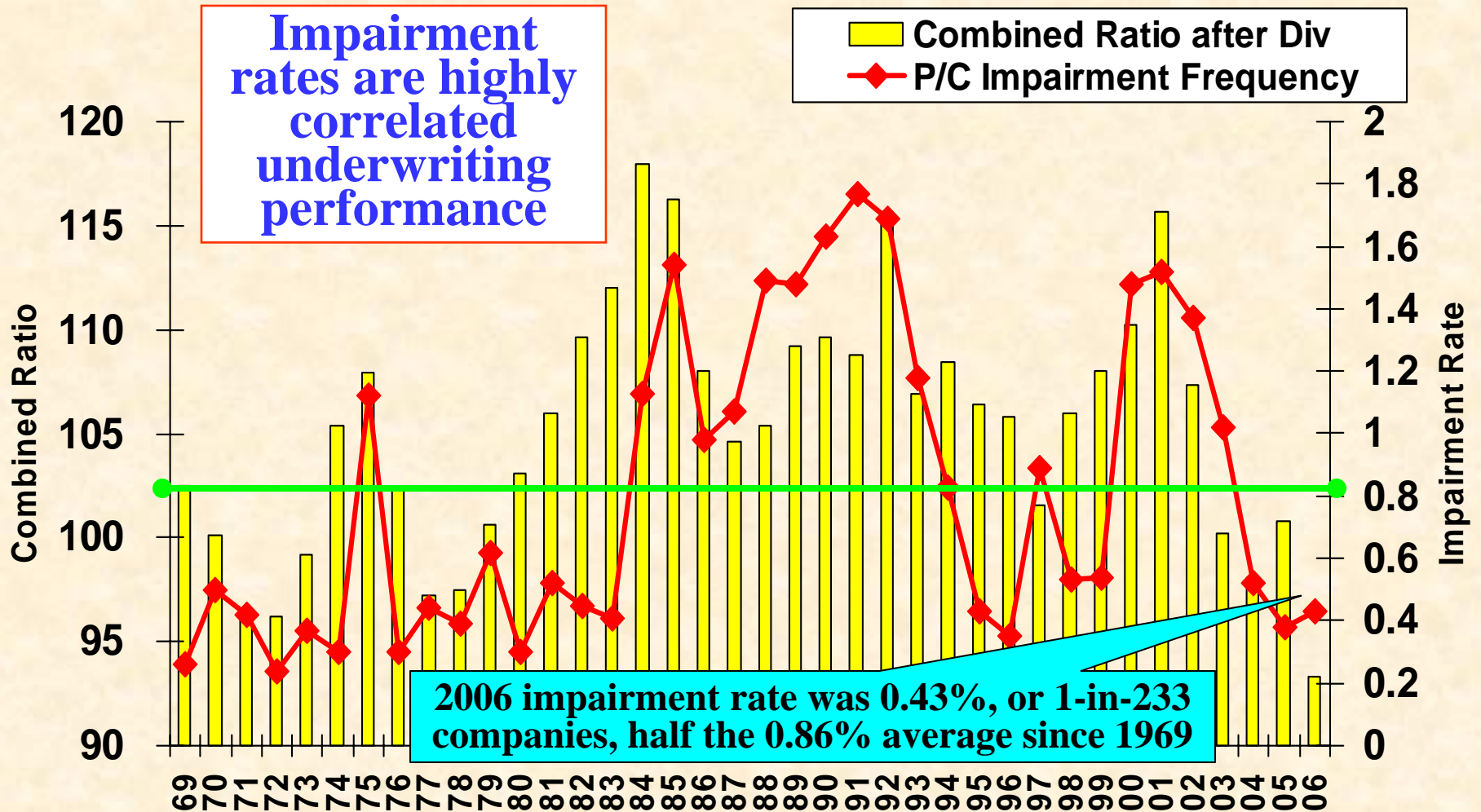
P/C Insurer Impairments, 1969-2006

The number of impairments varies significantly over the p/c insurance cycle, with peaks occurring well into hard markets





P/C Insurer Impairment Frequency vs. Combined Ratio, 1969-2006

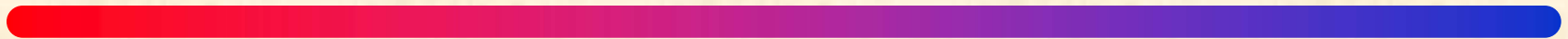


The Insurance Economics of Florida Hurricanes

Drivers of Private Insurer

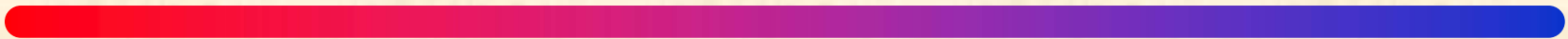


Behavior in Florida



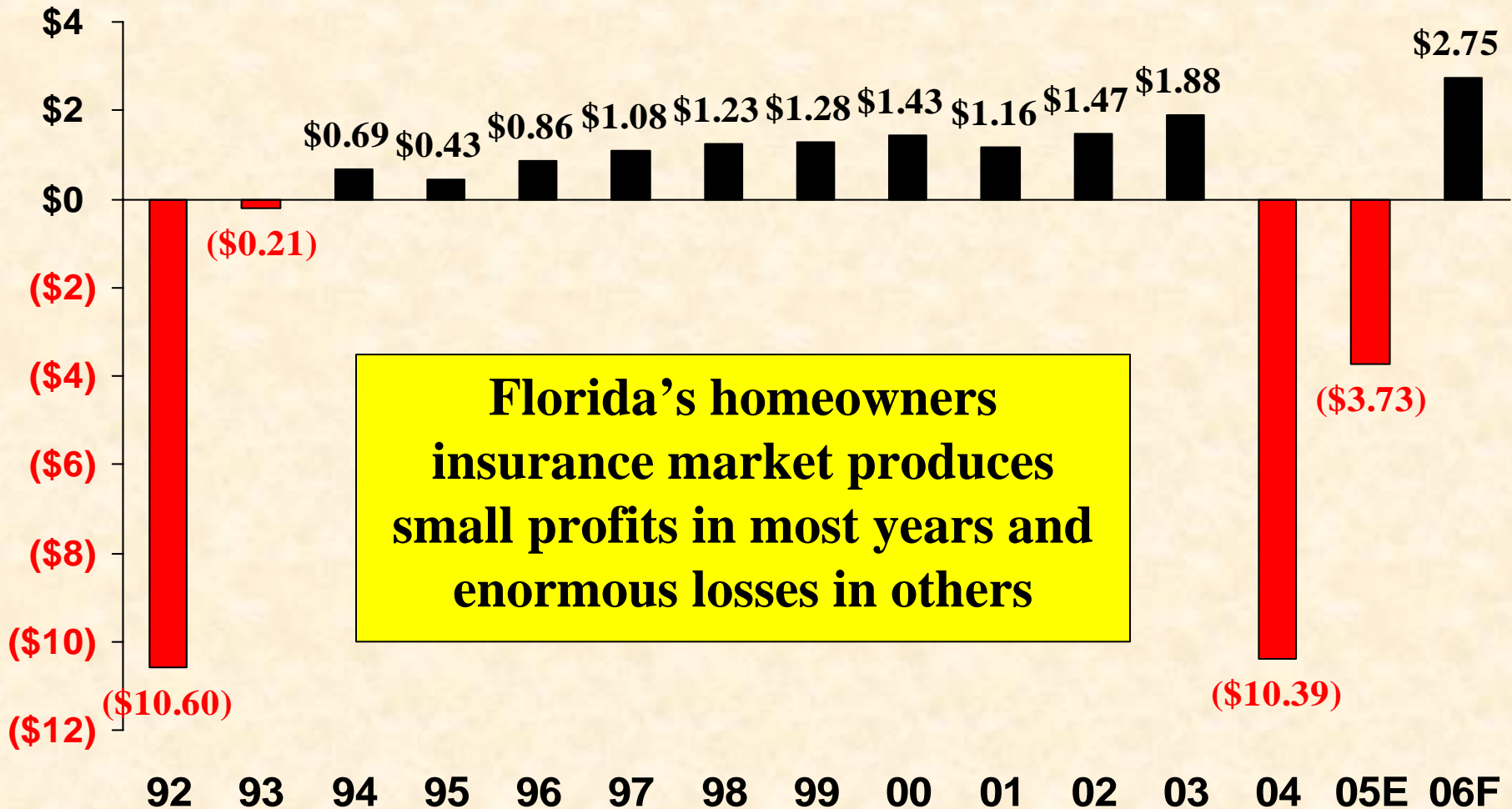
***FLORIDA HURRICANES
& UNDERWRITING
PERFORMANCE:***

**Homeowners Insurers
Have Lost Billions
in Florida**





*Underwriting Gain (Loss) in Florida Homeowners Insurance, 1992-2006E**



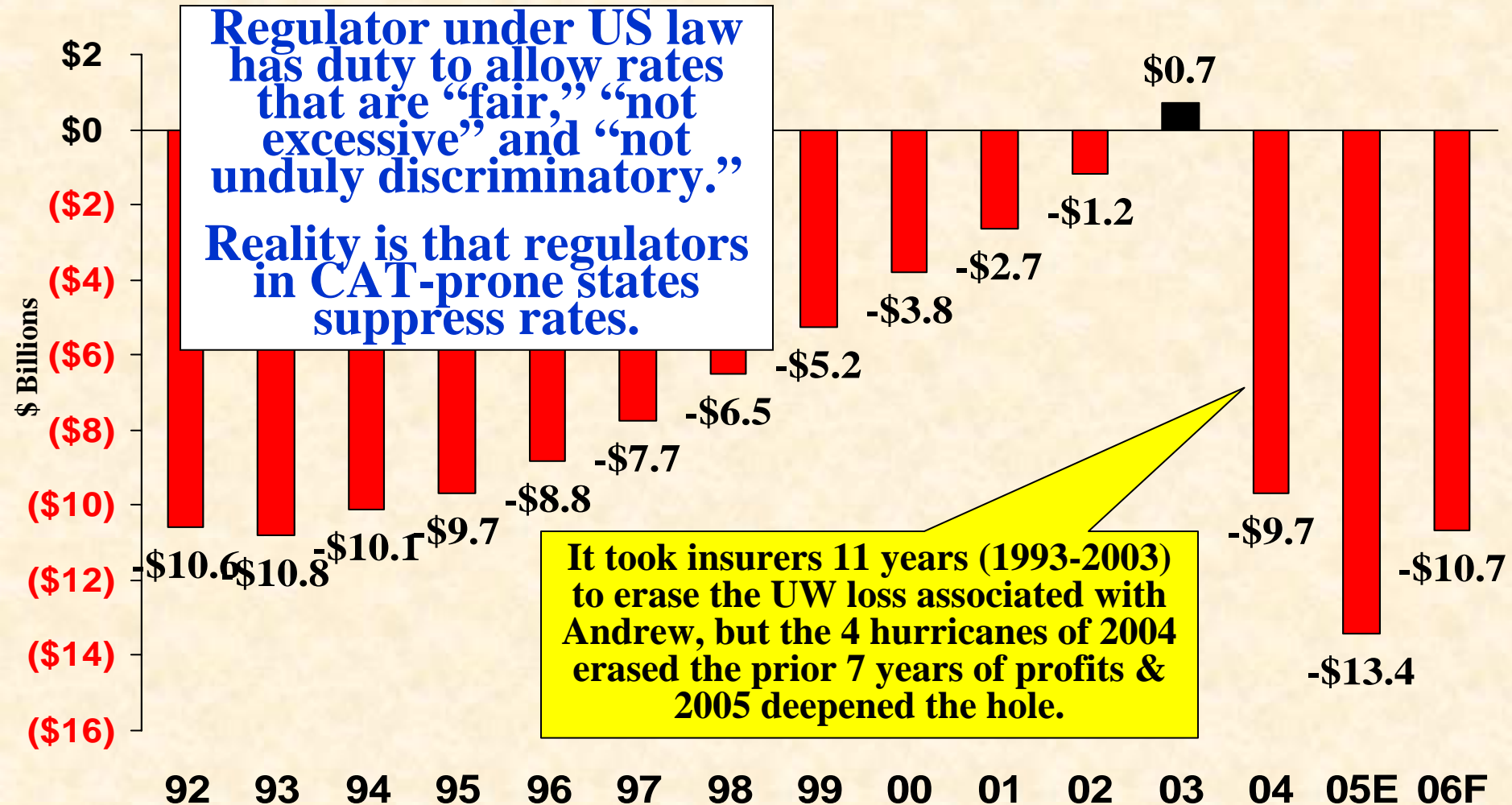
*2005 estimate by Insurance Information Institute based on historical loss and expense data for FL adjusted for estimated 2005 residential windstorm losses of \$7.35B. 2006 estimate from Ins. Info. Inst.



Cumulative Underwriting Gain (Loss) in Florida Homeowners Insurance, 1992-2006E*

Regulator under US law
has duty to allow rates
that are "fair," "not
excessive" and "not
unduly discriminatory."

Reality is that regulators
in CAT-prone states
suppress rates.

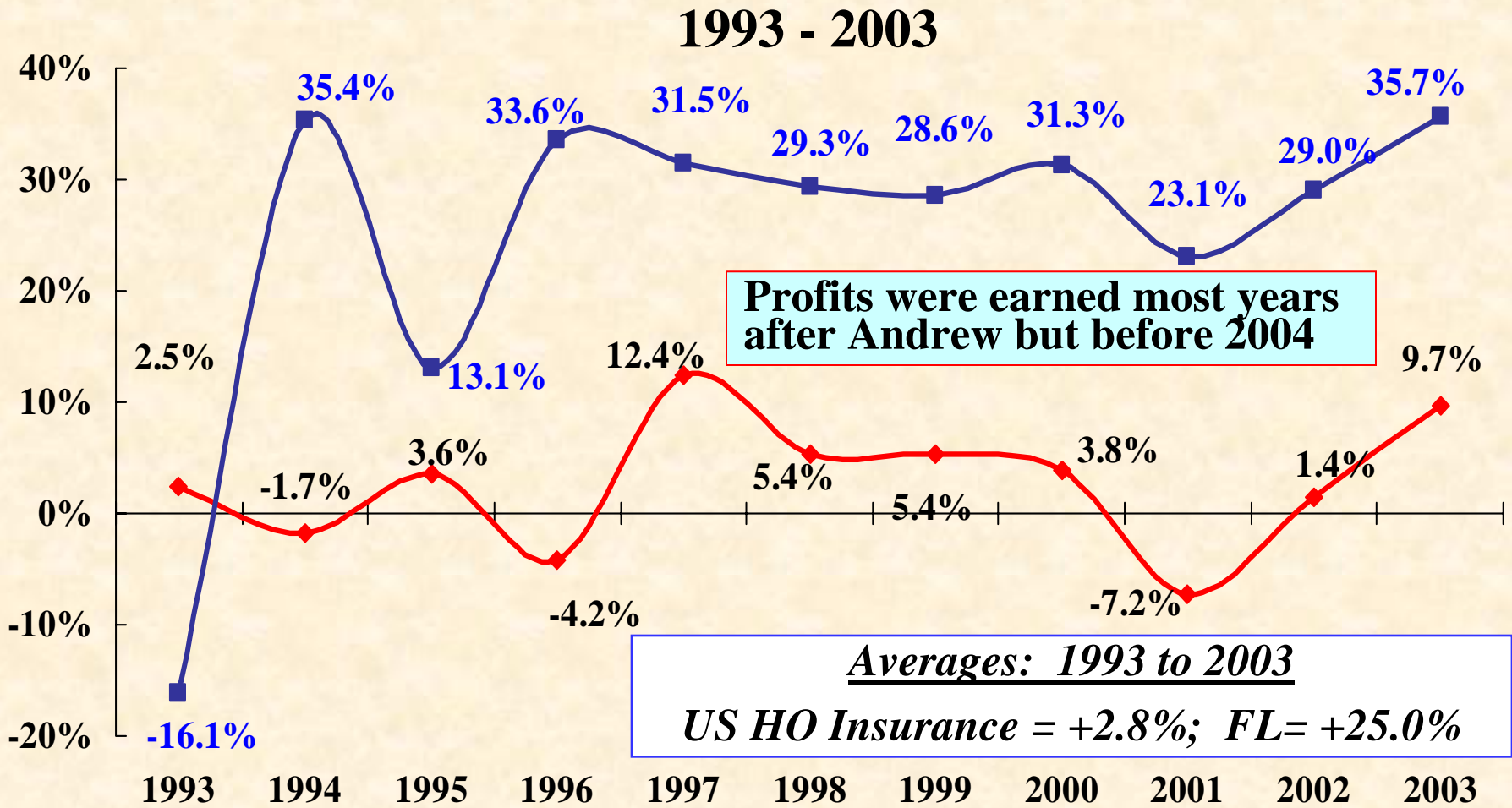


It took insurers 11 years (1993-2003)
to erase the UW loss associated with
Andrew, but the 4 hurricanes of 2004
erased the prior 7 years of profits &
2005 deepened the hole.

*2005 estimate by Insurance Information Institute based on historical loss and expense data for FL adjusted for estimated 2005 residential windstorm losses of \$7.35B. 2006 estimate from Ins. Info. Inst.

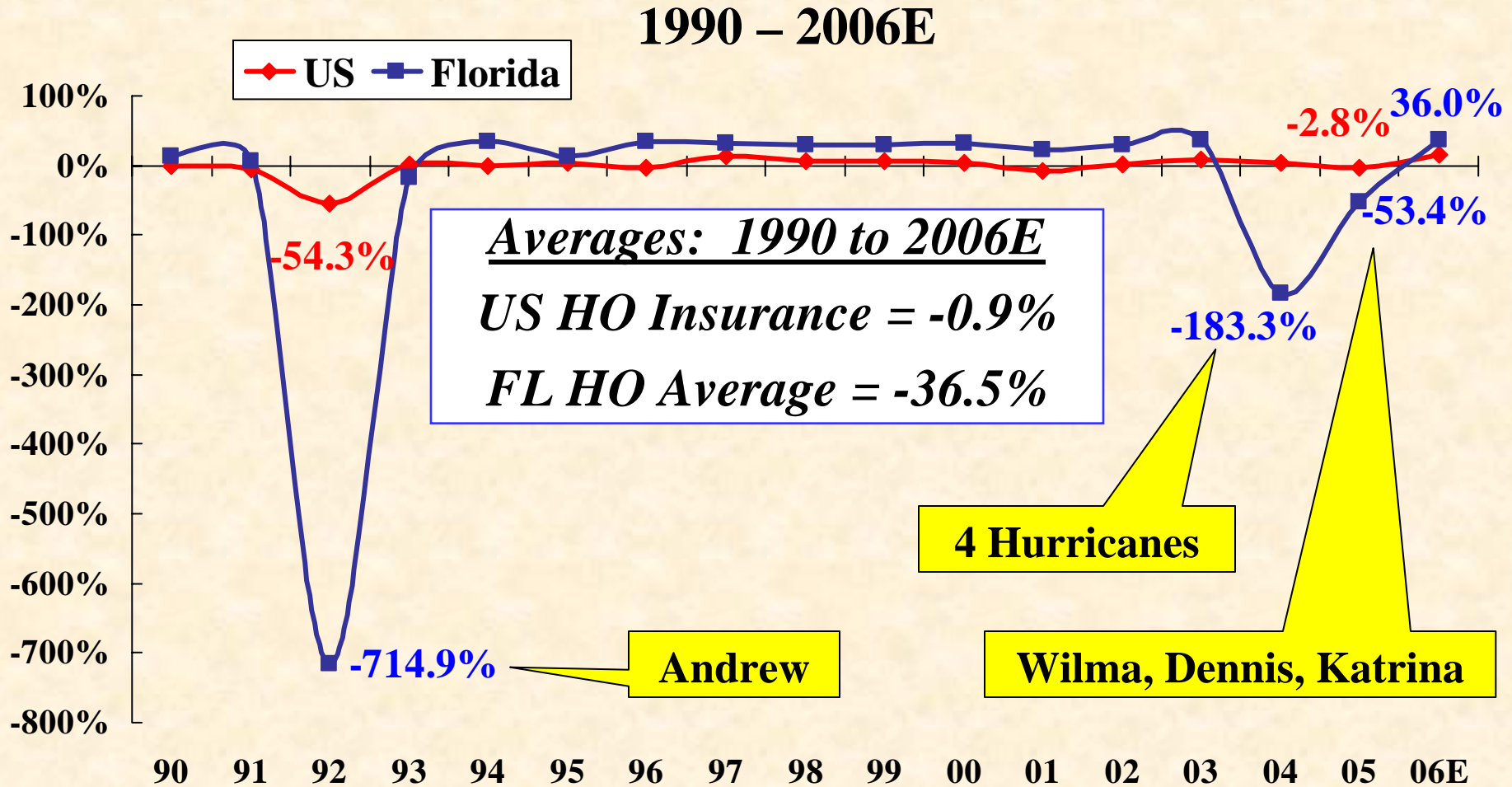


Rates of Return on Net Worth for Homeowners Ins: US vs. Florida



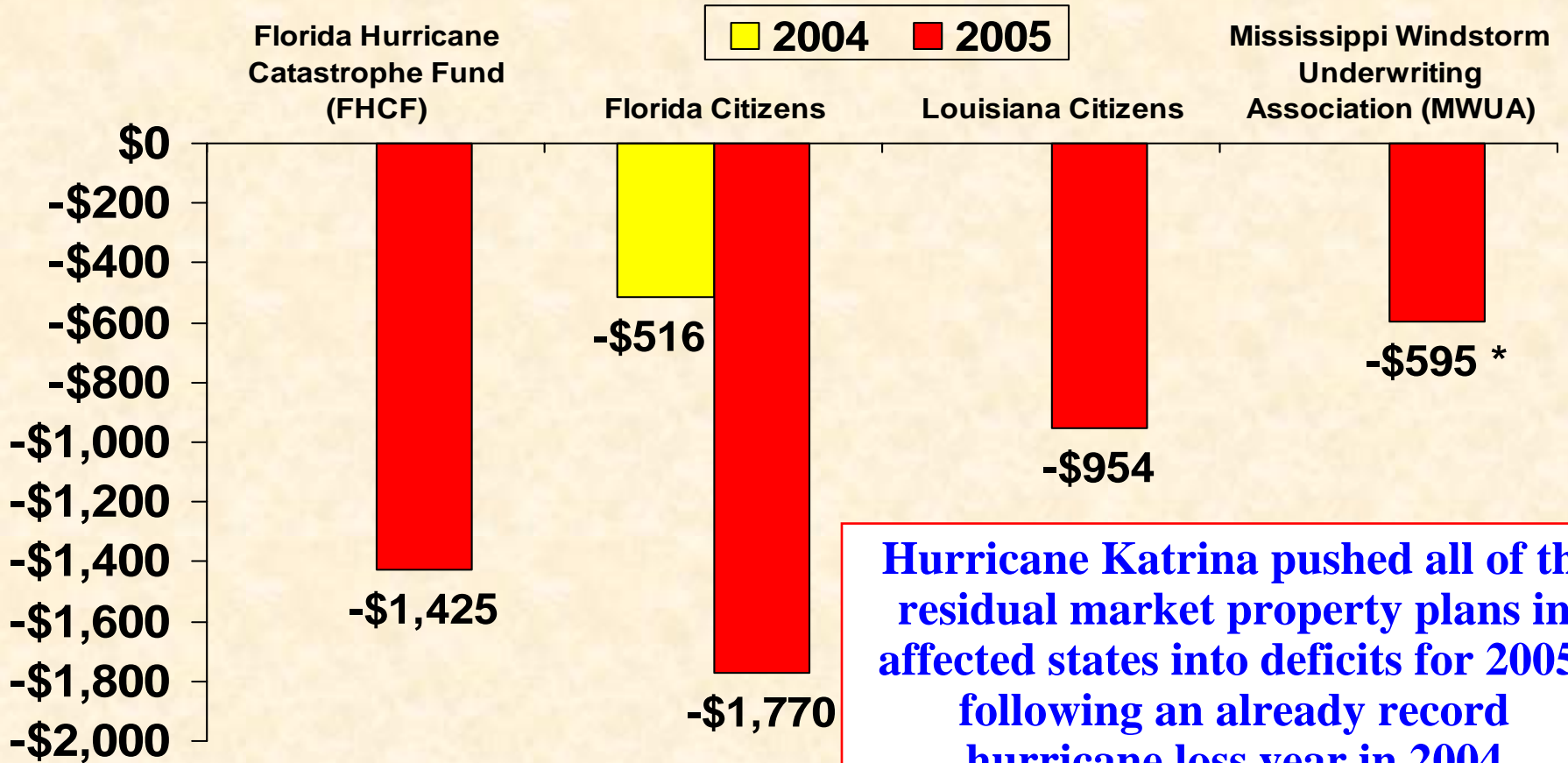


Rates of Return on Net Worth for Homeowners Ins: US vs. Florida





Major Residual Market Plan Estimated Deficits 2004/2005 (Millions of Dollars)

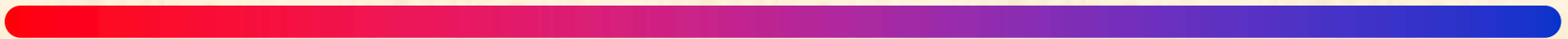


Hurricane Katrina pushed all of the residual market property plans in affected states into deficits for 2005, following an already record hurricane loss year in 2004

* MWUA est. deficit for 2005 comprises \$545m in assessments plus \$50m in Federal Aid.

CAPITAL & CAPACITY CONSIDERATIONS:

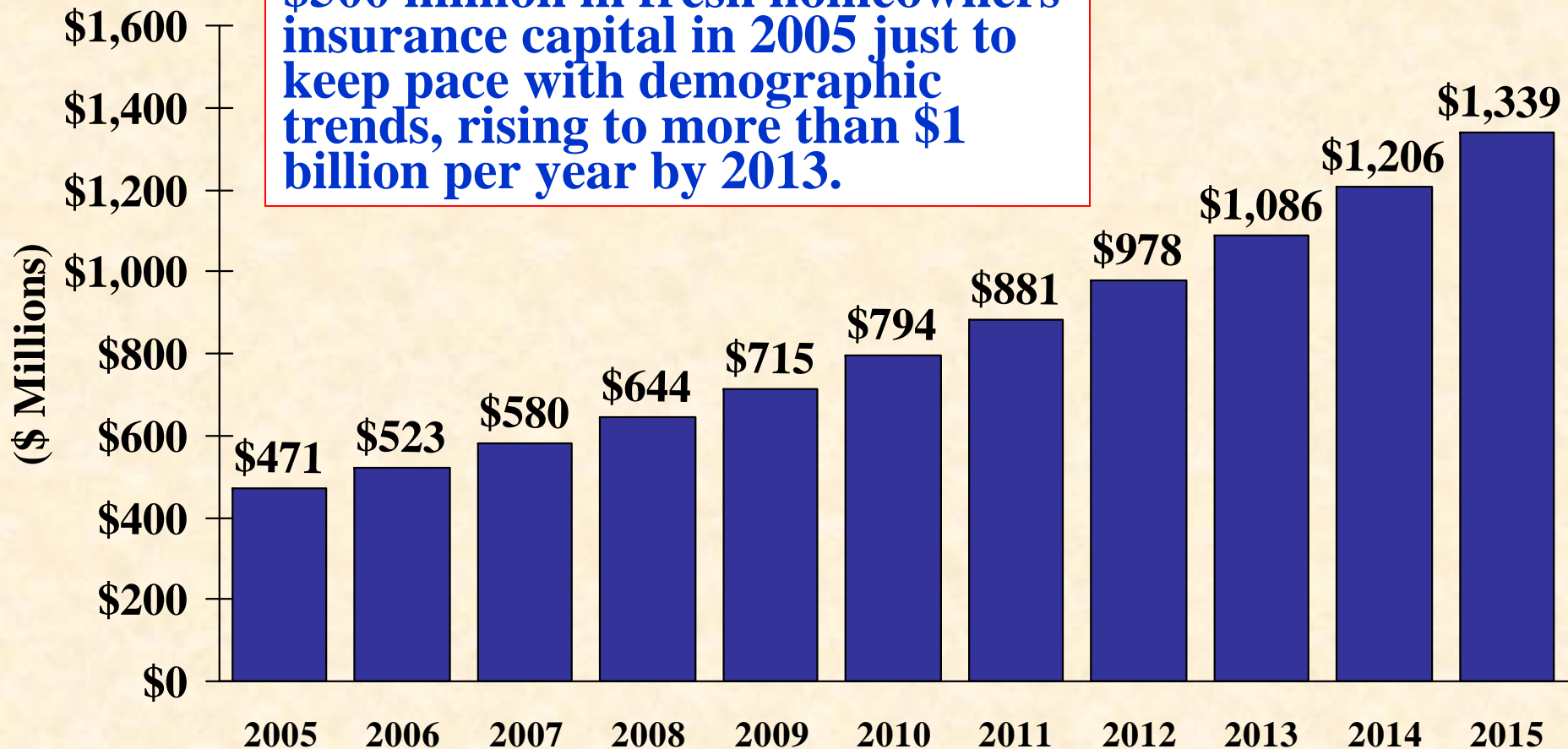
**INSURERS MUST PUT LARGE
AMOUNTS OF CAPITAL AT
RISK TO OFFER INSURANCE
IN FLORIDA**





*Estimated New Insurance Capital Required to Support Growth in FL Homeownership, 2005-2015**

Florida needs to attract about \$500 million in fresh homeowners insurance capital in 2005 just to keep pace with demographic trends, rising to more than \$1 billion per year by 2013.



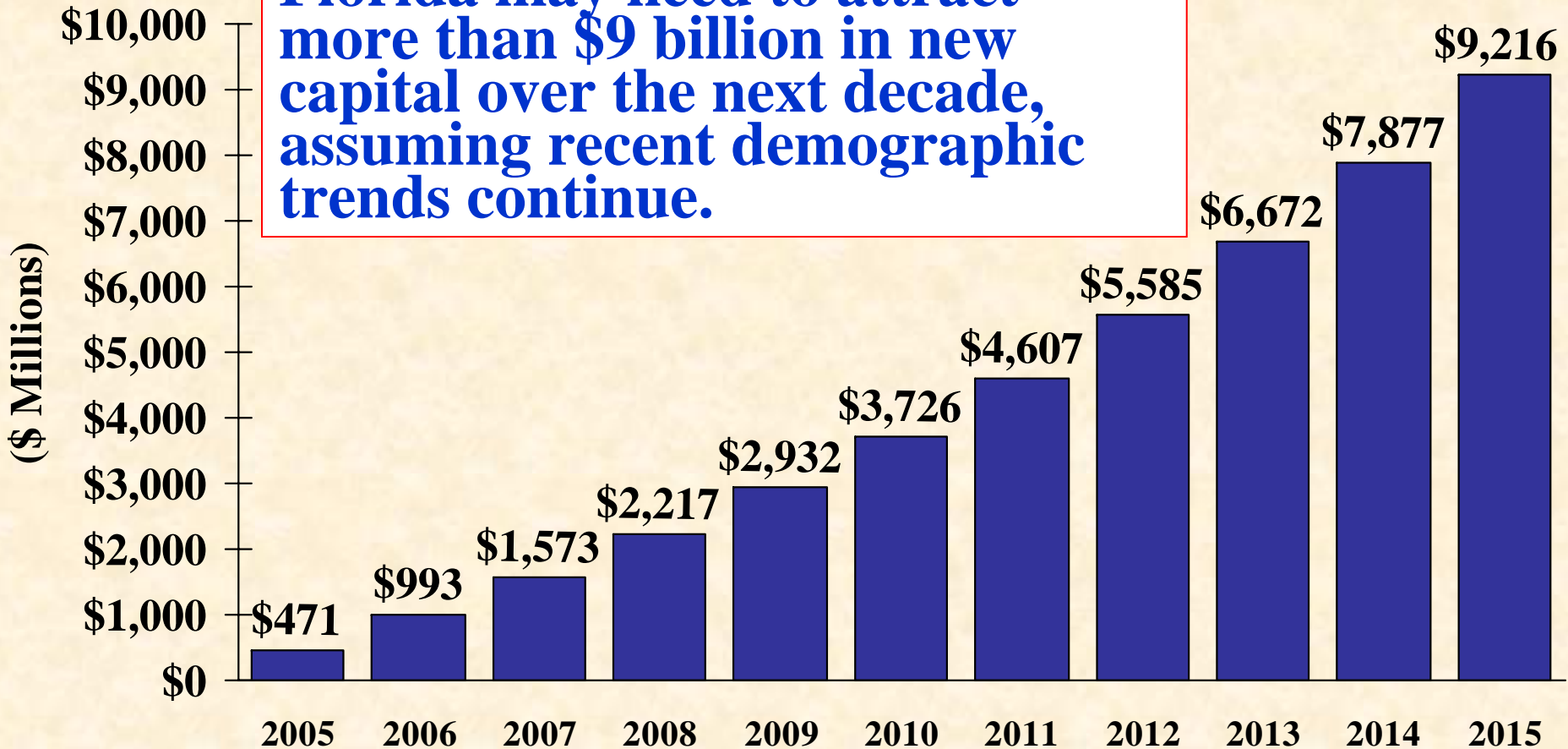
*Estimate assumes 1:1 premium-to-surplus ratio and continuation of CAGR in direct premiums written of 11% (actual rate for period 1996-2003).

Source: Insurance Information Institute



*Estimated Cumulative New Insurance Capital Required to Support Growth in FL Homeownership, 2005-2015**

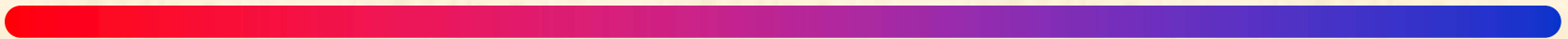
Florida may need to attract more than \$9 billion in new capital over the next decade, assuming recent demographic trends continue.



*Estimate assumes 1:1 premium-to-surplus ratio and continuation of CAGR in direct premiums written of 11% (actual rate for period 1996-2003).

Source: Insurance Information Institute

Are Florida's Development Patterns Rational?





Excessive Catastrophe Exposure: Outcome of Economically & Politically Rational Decision Process?

- **Property Owners**

- Make economically rational decision to live in disaster-prone areas
- Low cost of living, low real estate prices & rapid appreciation, low/no income tax, low property tax, rapid job growth
- Government-run insurers (e.g., CPIC, NFIP) provide implicit subsidies by selling insurance at below-market prices with few underwriting restrictions
- Government aid, tax deductions, litigation recovery for uninsured losses
- No fear of death and injury

- **Local Zoning/Permitting Authorities**

- Allowing development is economically & politically rational & fiscally sound
- Residential construction creates jobs, attracts wealth, increases tax receipts, stimulates commercial construction & permanent jobs, develops infrastructure
- Increases local representation in state legislature & political influence
- Property and infrastructure damage costs shifted to others (state and federal taxpayers, policyholders in unaffected areas)

- **Developers**

- Coastal development is a high-margin business
- Financial interest reduced to zero after sale



Excessive Catastrophe Exposure: Outcome of Economically & Politically Rational Decision Process?

• **State Legislators**

- Loathe to pass laws negatively impacting development in home districts
- Local development benefits local economy and enhances political influence
- Rapid development lessens need for higher income and property taxes
- Can redistribute CAT losses to unaffected policyholders and taxpayers
- Can suppress insurance prices via state insurance regulator, suppress pricing and weaken underwriting standards in state-run insurer & redistribute losses

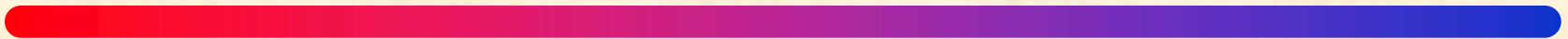
• **Congressional Delegation**

- Home state development increases influence in Washington
 - Political representation, share of federal expenditures
- Loathe to pass laws harming development in home state/district
- Tax law promotes homeownership and actually produces supplemental benefits for property owners in disaster-prone areas
- Large amounts of unbudgeted disaster aid easily authorized
- Tax burden largely borne by those outside CAT zone & those with no representation (children & unborn)

• **President**

- Presidential disaster declarations and associated aid are increasing
- Political benefits to making declarations and distributing large amounts of aid
- Direct impact on favorability ratings & election outcomes
- Losses can be distributed to other areas and the unrepresented

How Insurers Signal *What* Should be Built and *Where*



Government-Run Insurers Lead to Poor Land Use/Design Decisions

- **Government-run insurers (markets of last resort) serve as a vital safety valve after major market disruptions, but also serve as an enabler of unwise development...**
- **Government-run property insurers wash away market-based signals about relative risk**
- **Consequence is runaway development in disaster-prone areas**
- **Government-run insurers:**
 - Generally fail to charge actuarially sound rates
 - Have weak underwriting standards
 - Are thinly capitalized
 - Can assess losses to policyholders other than their own
 - Vulnerable to political pressure
- **Inadequate premiums, insufficient capital and weak underwriting mean that most government plans, from Citizens Property Insurance Corporation to the National Flood Insurance Program operate with frequent deficits**



Negative Outcomes from Flaws in Government-Run Insurers

- **True risk associated with building on a particular piece of property is obscured**
- **Subsidies are generated leading to market distortions/inequities:**
 - Many thousands of homes likely would not have been built (or built differently) if property owner obligated to pay actuarially sound rates
 - CPIC assessments from Wilma will require grandmothers living in trailer parks on fixed incomes in Gainesville to subsidize million dollar homes in Marco Island via assessment (surcharges).
- **Serial rebuilding in disaster-prone areas is the norm**
- **Property owners come to assume that the government rate is the “fair” rate and object to moves to actuarially sound rates.**
- **Government-run insurer can’t control its own exposure**
 - Legislature mandates that CPIC offer coverage in most cases if no private insurer will offer coverage due to high risk, near certainty of destruction
 - No restrictions on value of property, so high-valued properties represent disproportionate share of potential loss
- **Taxpayer Burden: NFIP borrowed \$20B+ in 2005**

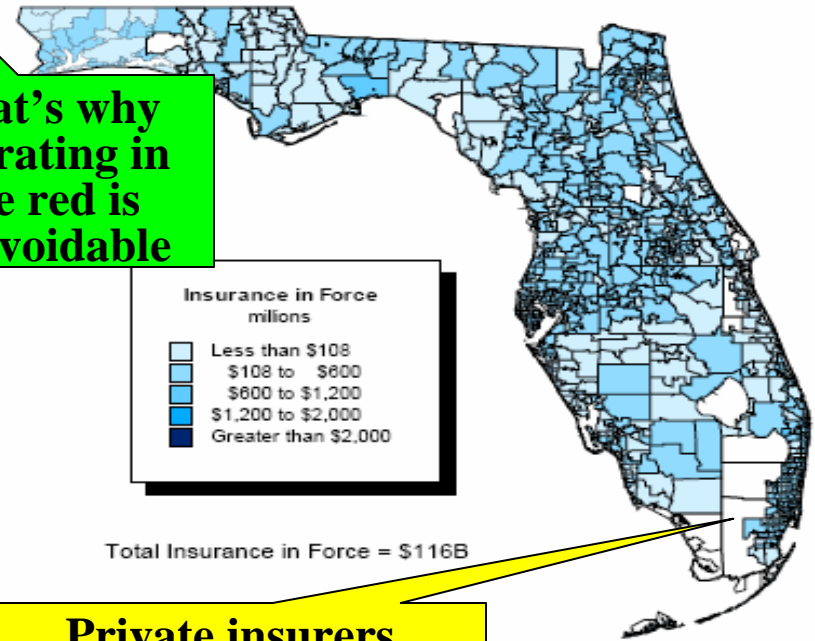
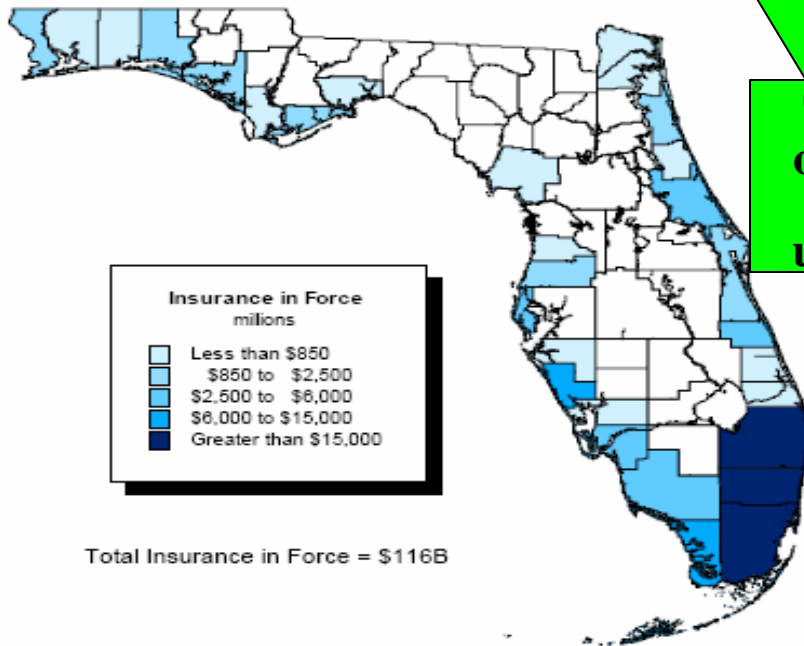


Insurance-in-Force: CPIC vs. Voluntary (Private) Insurers

Citizens is Required to Insure More Loss Exposure Than Any Private Insurer Would Ever Consider:

Citizens High Risk Account Risk

Voluntary Insurers Portfolio

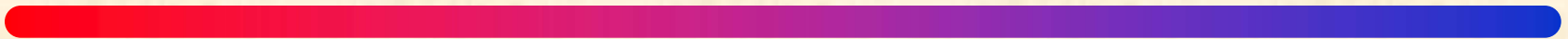


That's why operating in the red is unavoidable

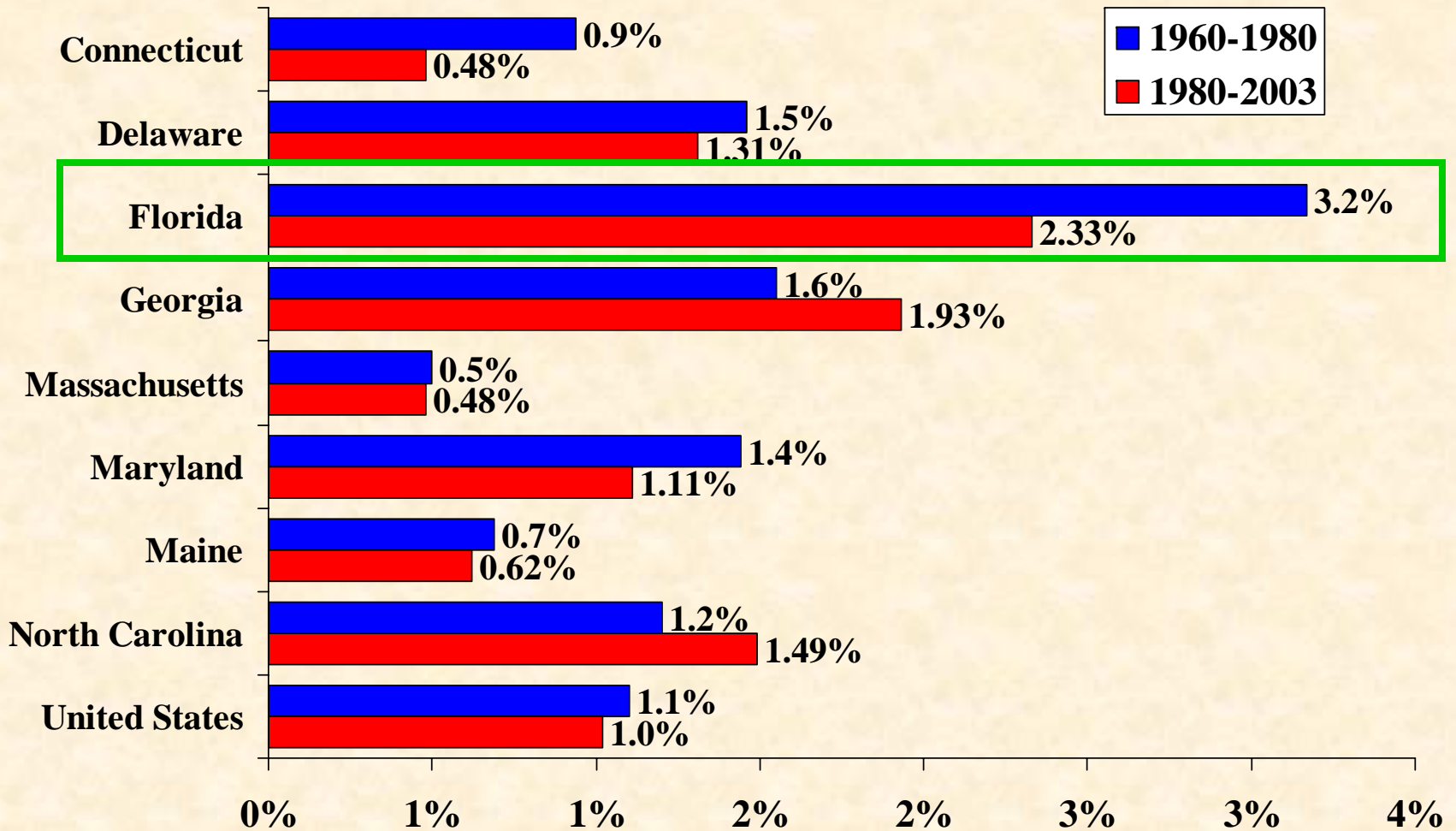
Private insurers accept relatively little wind risk in South FL

Risk Perception

*Is Disaster Risk Factored
into the Buy/Build/Move
Decision?*

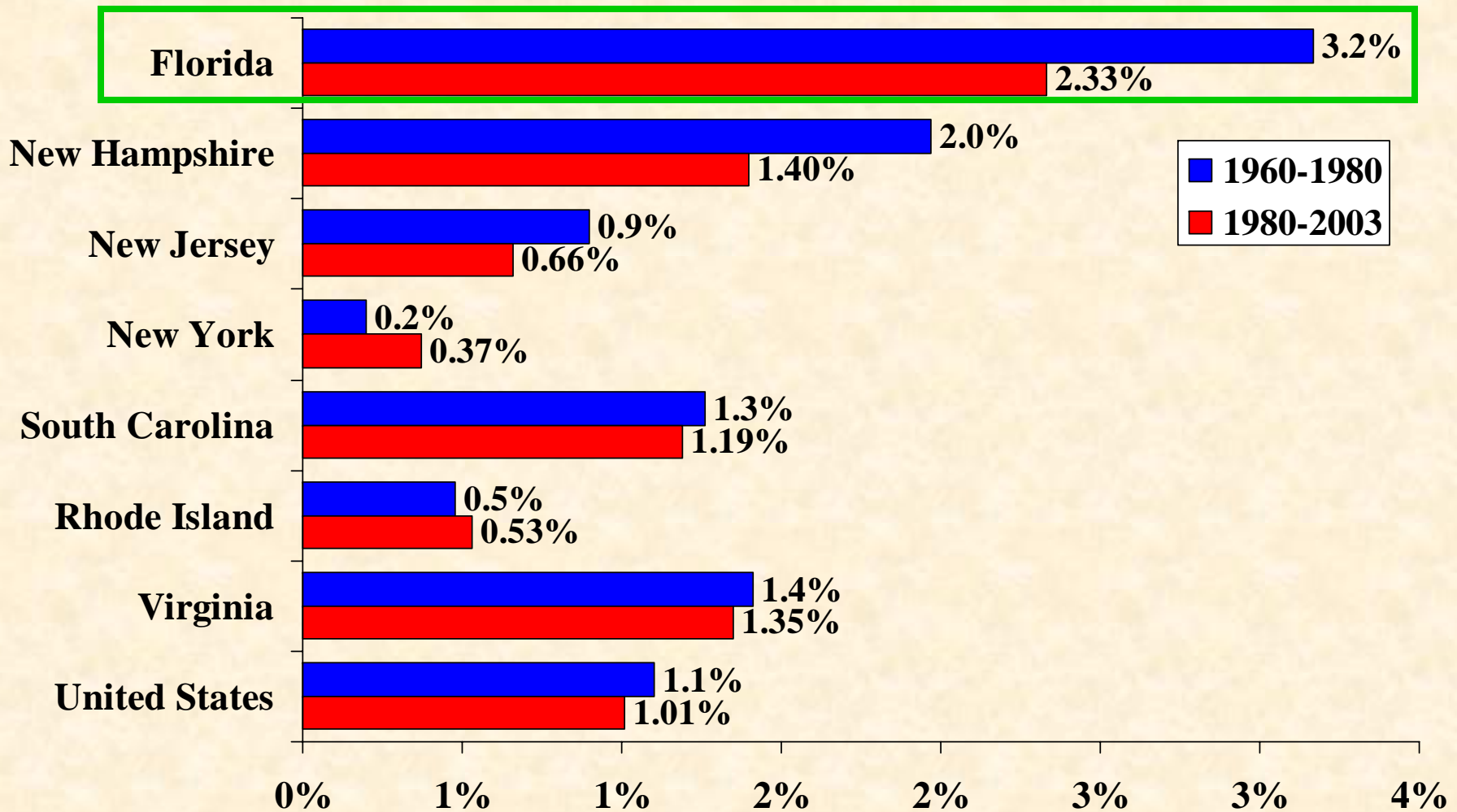


Average Annual Population Growth Rates of Atlantic States, 1960-1980 & 1980-2003



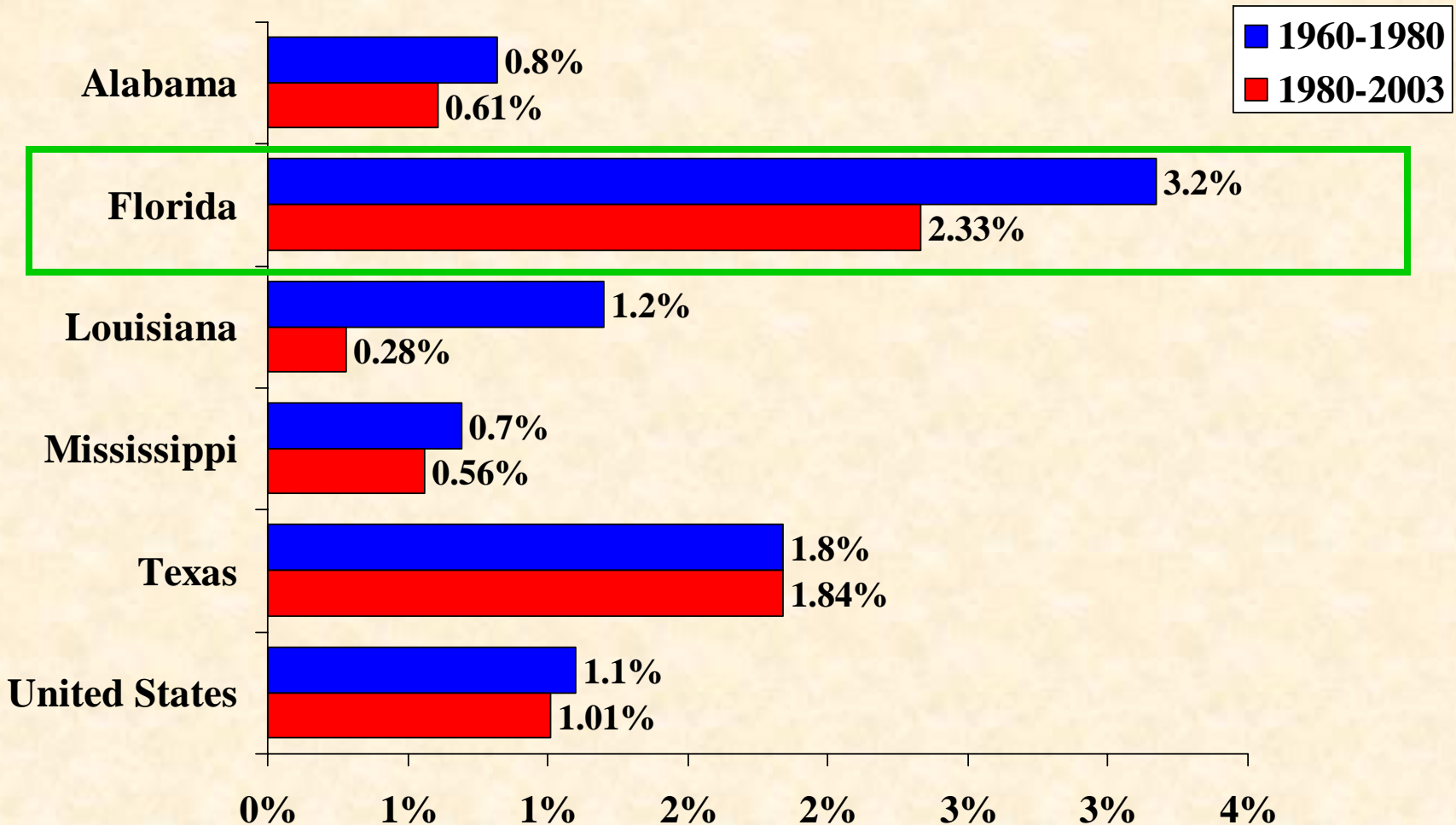
Source: US Census Bureau.

Average Annual Population Growth Rates of Atlantic States, 1960-1980 & 1980-2003



Source: US Census Bureau.

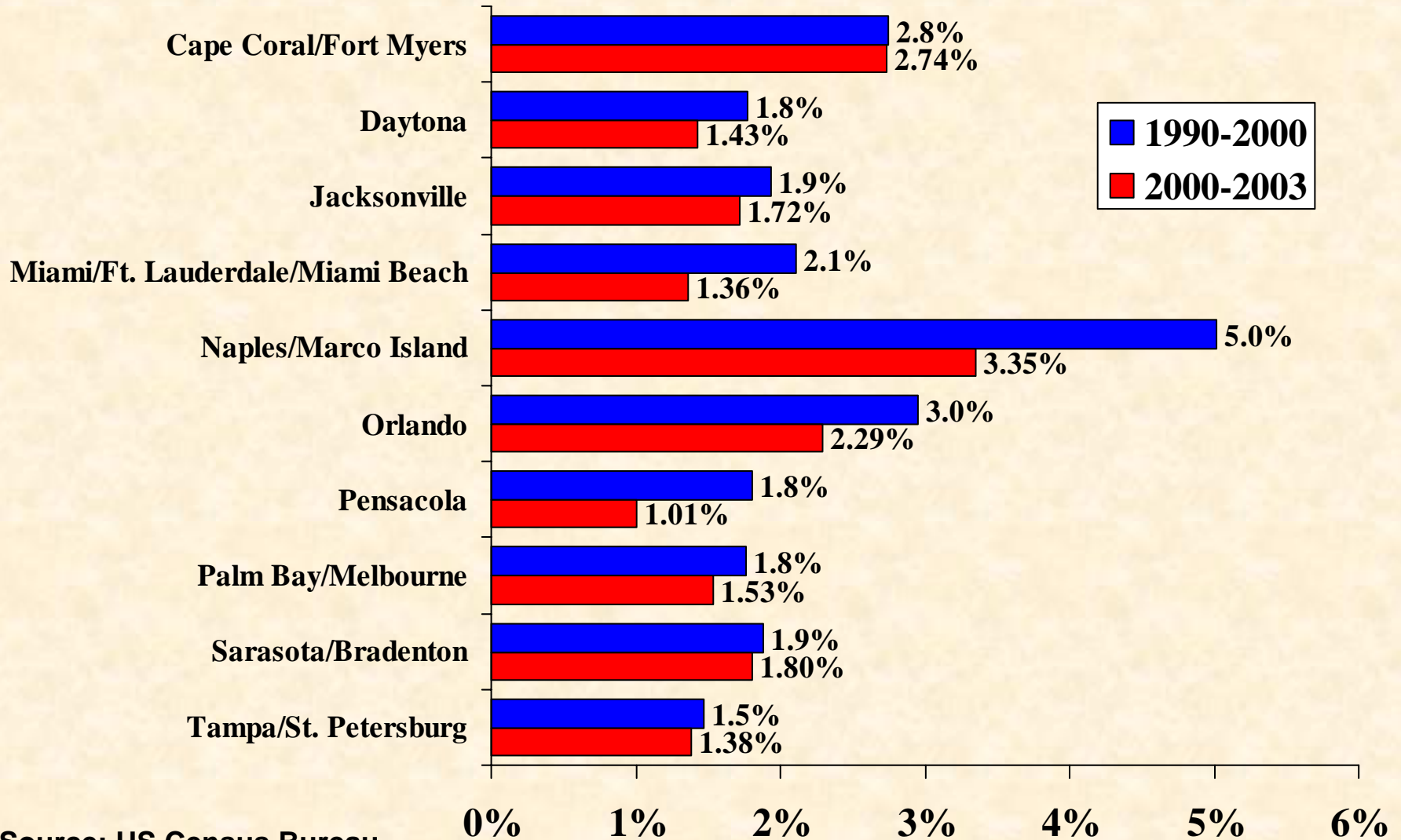
Average Annual Population Growth Rates of Gulf Coast States, 1960-1980 & 1980-2003



Source: US Census Bureau.



Average Annual Population Growth Rates of Florida Coastal Cities, 1990-2003

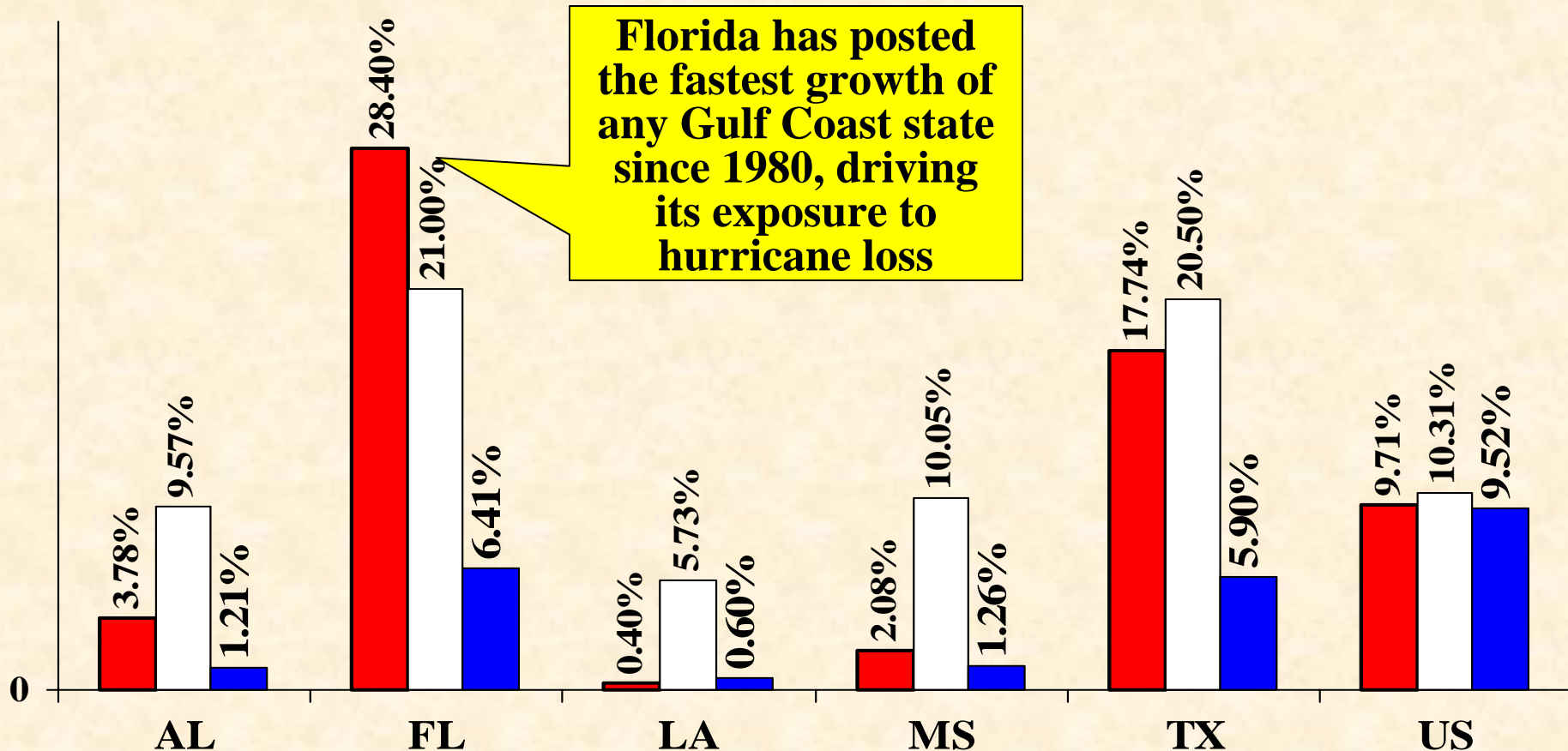


Source: US Census Bureau.



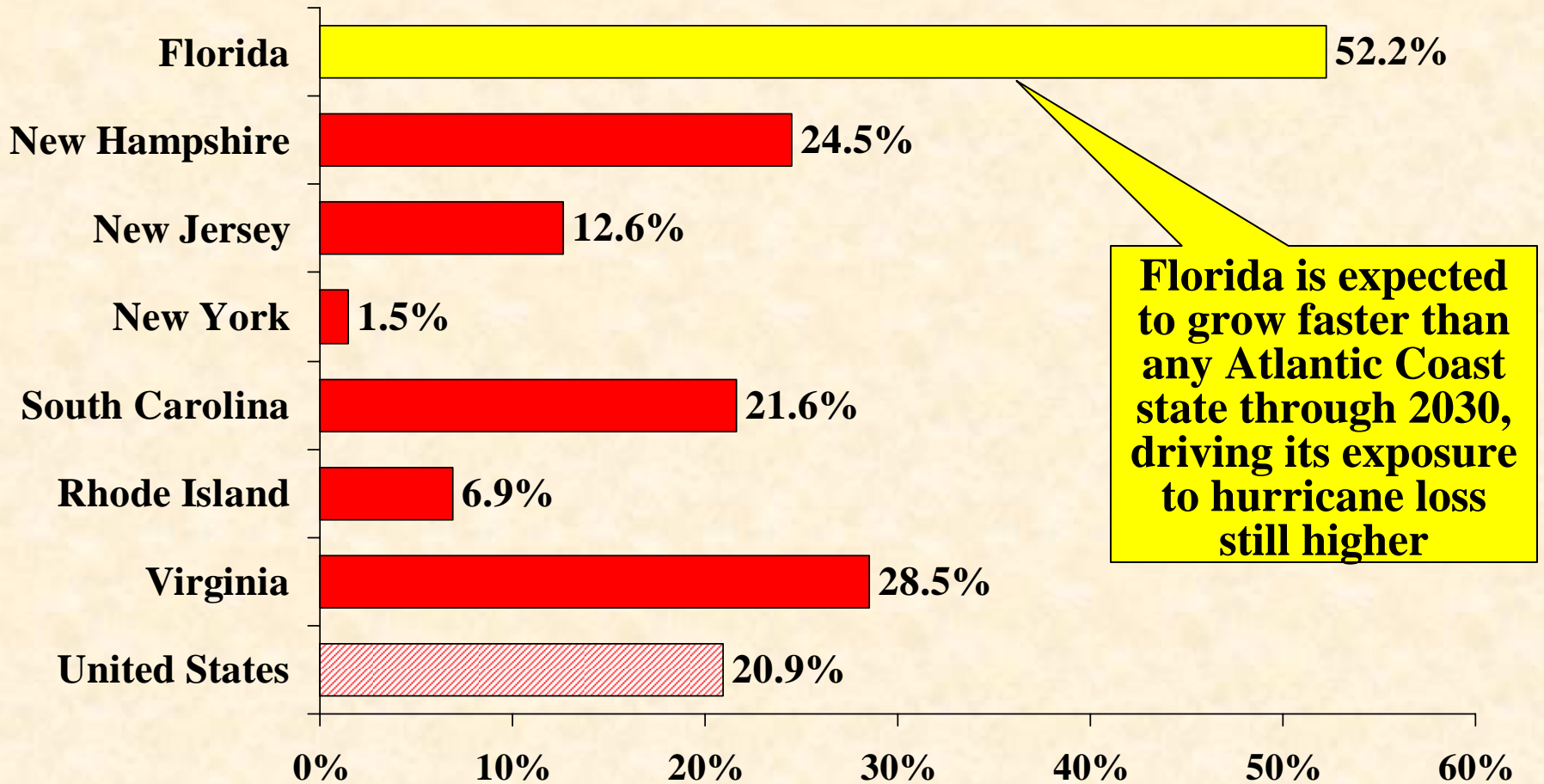
State Population Growth Rates by Decade, Gulf Coast, 1980-2003

■ 1980-1990 □ 1990-2000 ■ 2000-2003



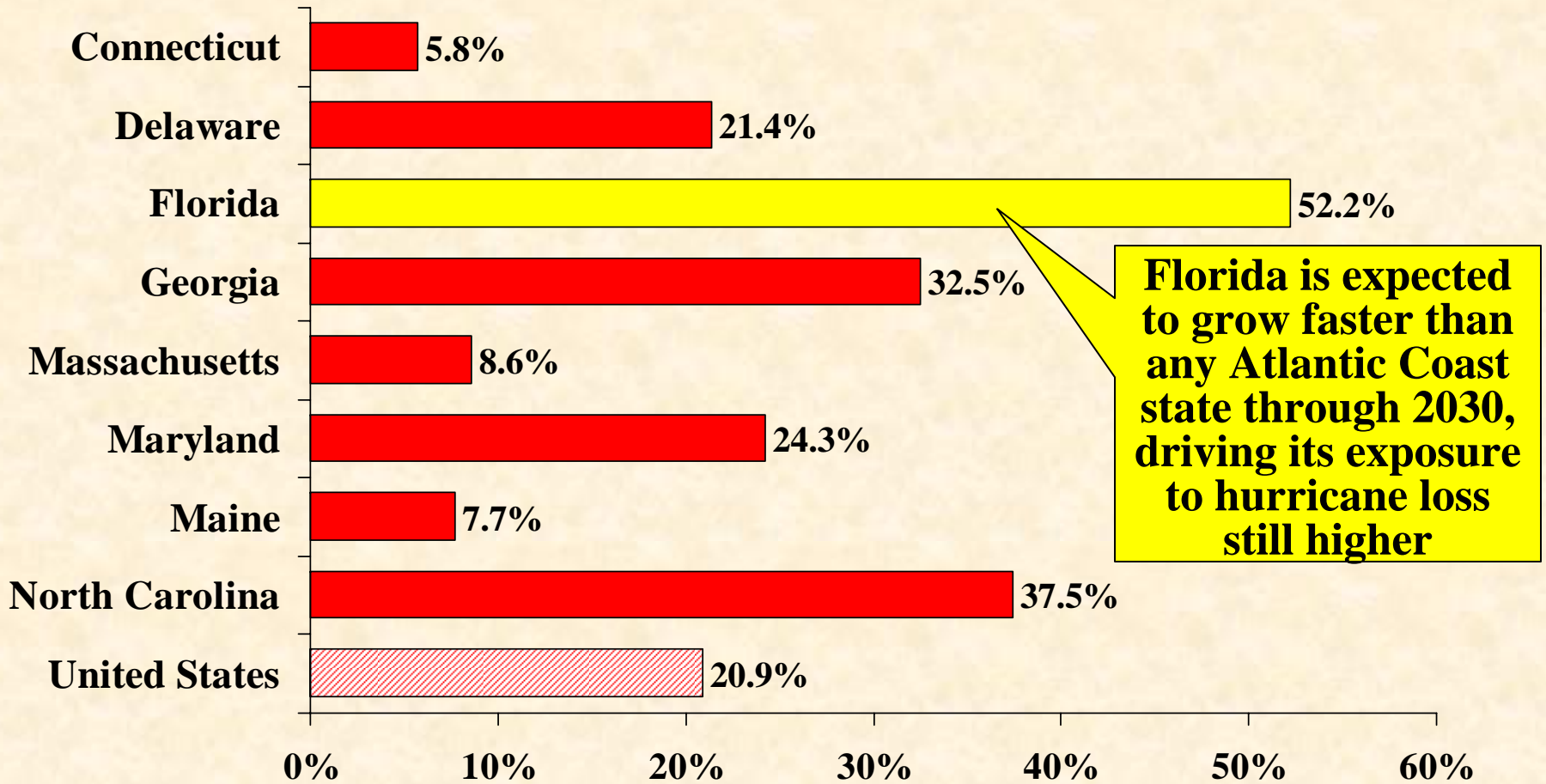


Projected Percent Population Growth of Atlantic States, 2003-2030



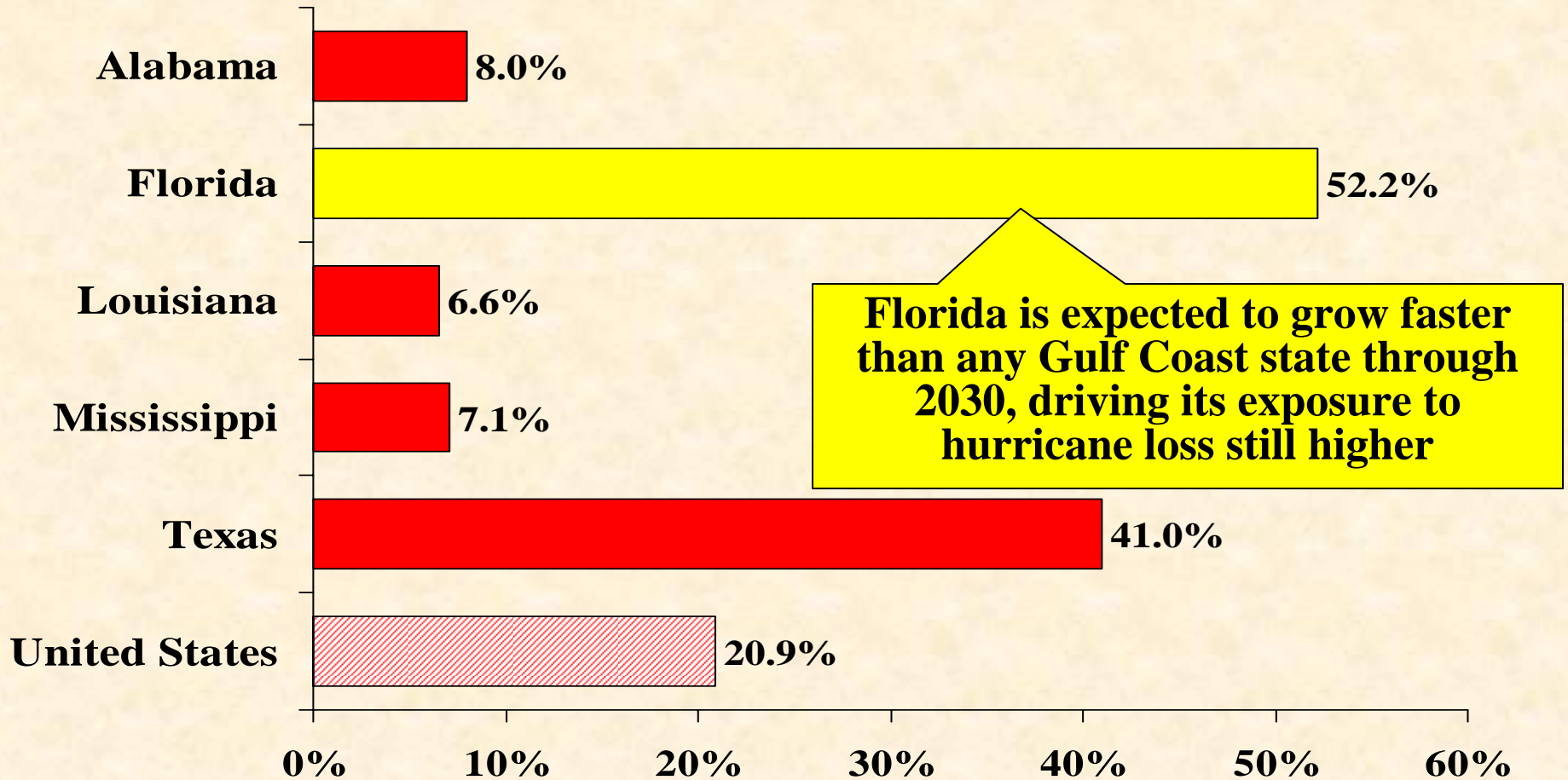


Projected Percent Population Growth of Atlantic States, 2003-2030





Projected Percent Population Growth of Gulf Coast States, 2003-2030

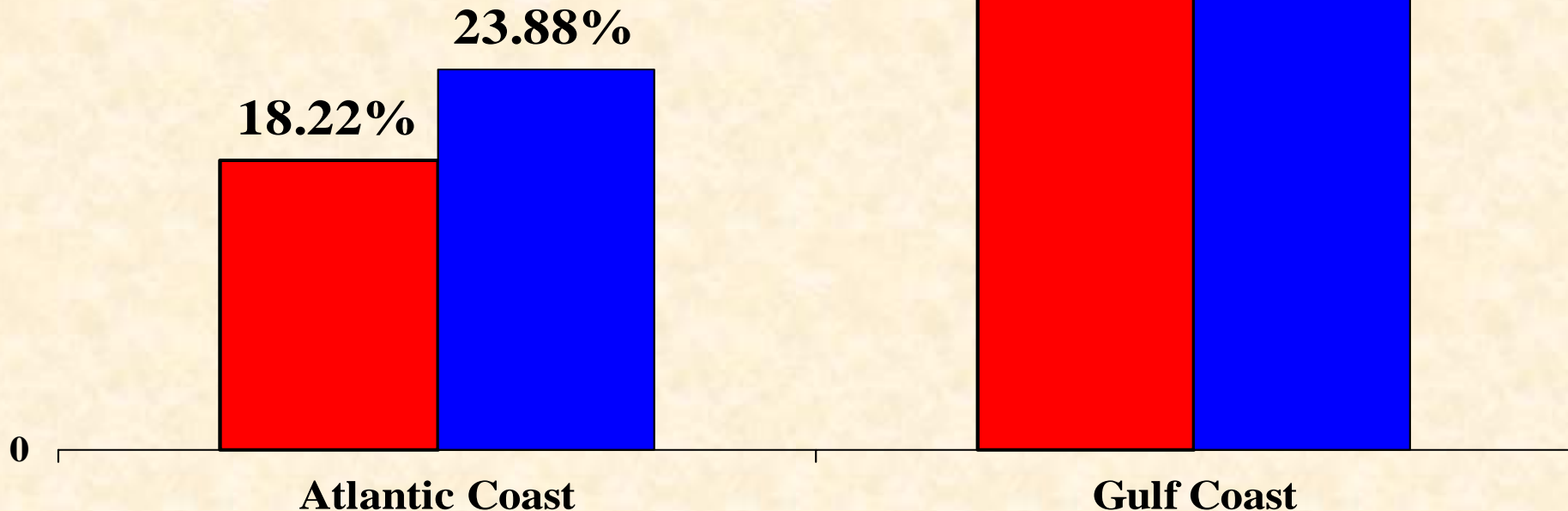




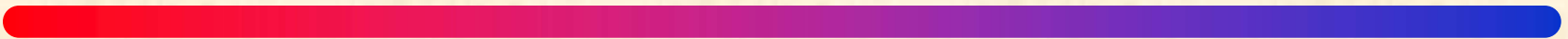
Percent of Atlantic & Gulf Coast Populations Living in FL, 2003 and 2030

■ 2003 ■ 2030

The proportion of Atlantic and Gulf coast population living in FL will continue to swell in the decades ahead



What Works, What Doesn't





Successful Tools for Controlling Hurricane Exposure

- **Strengthened building codes**
- **Stringent enforcement of building codes**
- **Fortified home programs**
- **Insurance rates based on sound actuarial principles (risk-based rates that are not government controlled); Works for commercial insurers**
- **Disciplined underwriting**
- **Removing impediments to capital flows**
- **Incentives to adopt mitigation**
- **Forcing communities to consider and take a larger stake in their catastrophe exposure**



Unsuccessful Tools for Controlling Hurricane Exposure

- **Insurance rates that are not actuarially sound (i.e., don't reflect true risk)**
- **Political interference in rate process**
- **Inadequate underwriting controls**
- **Subsidies**
 - **Intra-state (policyholders/taxpayers)**
 - **US Taxpayer**
- **Voluntary flood coverage**
- **Litigation**



Faux Pas & Fatal Flaws in Florida's Approach to Managing CAT Risk

FAUX PAS

- **Governor has unnecessarily, unjustifiably and counterproductively vilified private insurers and reinsurers**
 - **Insurers want to find ways to cover the majority of hurricane-exposed property in FL and will do so if given the opportunity**
 - **Insurers and capital markets can be partners in finding lasting and innovative solutions to Florida's permanent hurricane problem**
- **Changes to market are arbitrary, capricious and punitive and violate virtually all laws of modern economics, finance, statistics and actuarial science**
- **Meteorological and actuarial reality have been forced to take a back seat to politics**
- **Political risk to insurers now *exceeds* hurricane risk**
- **Bottom Line: Residents of Florida are Now the Most Financially Exposed People on Earth to Catastrophic Risk**



Faux Pas & Fatal Flaws in Florida's Approach to Managing CAT Risk

FATAL FLAWS

- **Virtually no diversification**
 - Basically monoline, single state, single risk
- **No true spread of risk**
 - Citizens market share is concentrated in riskiest areas
 - FHCF is Citizen's sole reinsurer; FHCF doesn't access retrocessional mkt.
- **Rates in Citizens not even remotely close to actuarially sound**
- **Citizens & FHCF are too thinly capitalized**
- **Losses are substantially funded via post-event assessment**
- **Plants seeds of animosity between non-coastal & coastal dwellers (within state and with non-coastal states)**
 - Largest beneficiaries are residents of southeast coast
- **Plan will alienate business community (liability lines assessed)**
- **Homeowners insurance has been converted into a regressive income and wealth transfer mechanism**
- **May have harmed chances for Fed Natural Catastrophe Fund**
- **Little done to address true risk of hurricanes**

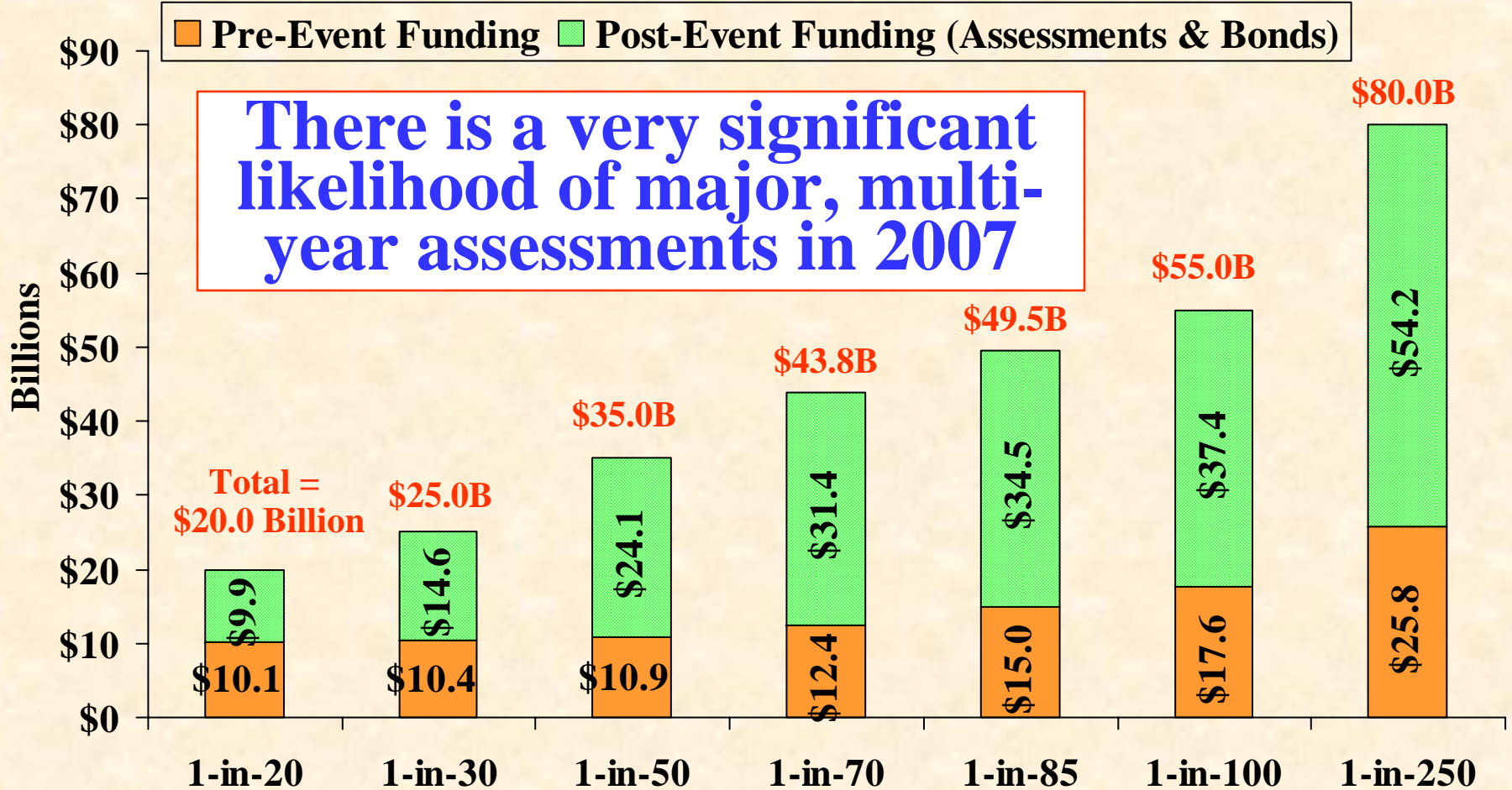


Problem Issues

- **Local control of land use and permitting creates significant incentive problems**
 - **Benefits accrue locally while many costs can be redistributed to others via taxes, insurance and aid**
- **Prospect of government aid reinforces unsound building and location decisions**
- **States don't want to raise taxes to pay for mitigation/prevention even if state is sole beneficiary**
 - **E.g., NO levees; Beach replenishment**



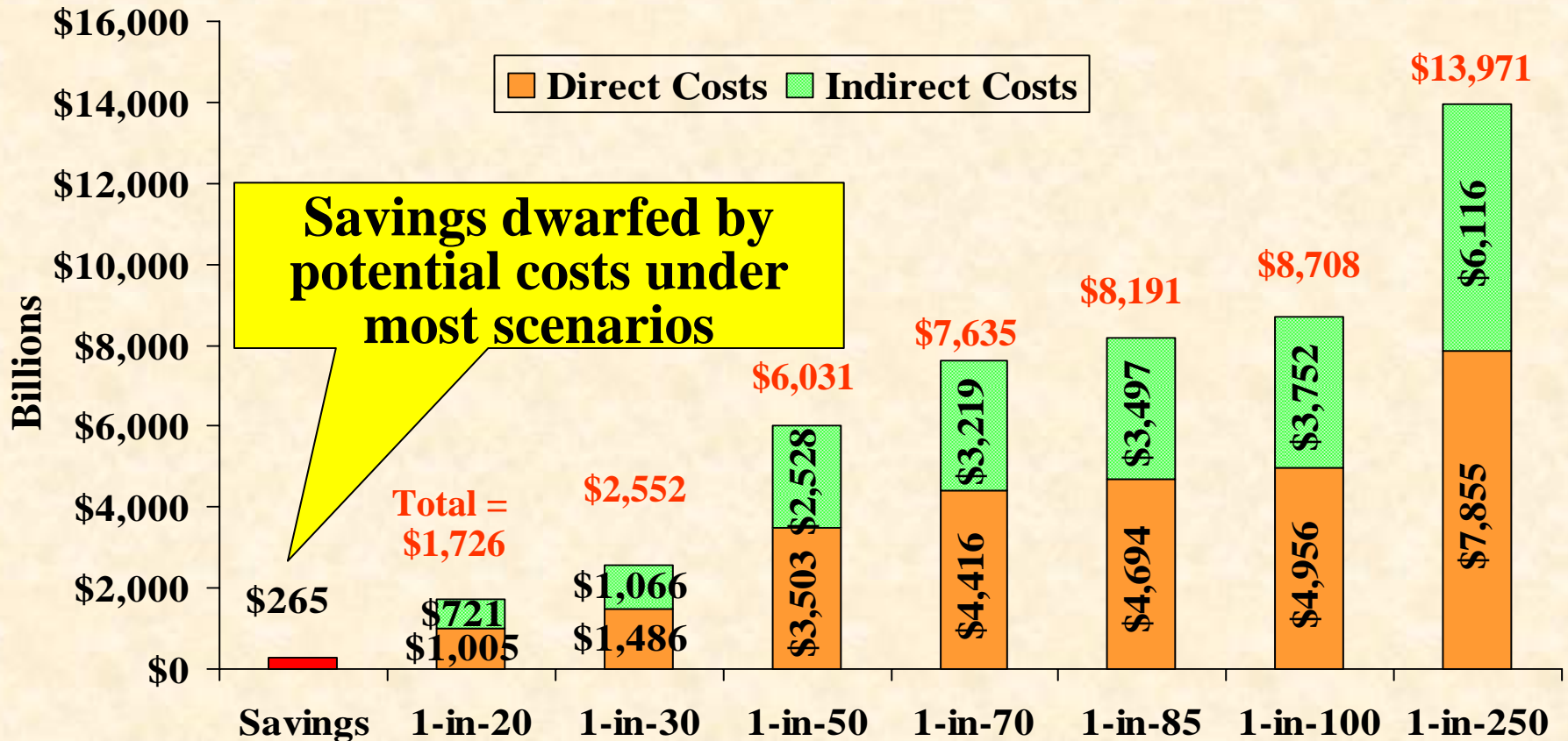
Pre- vs. Post-Event in FL for 2007 Hurricane Season



Notes: Pre-event funding includes funds available to Citizens, FHCFC and private carriers plus contingent funding available through private reinsurance to pay claims in 2007. Post-event funding is on a present value basis and does not include financing costs. Probabilities are expressed as “odds of a single storm of this magnitude or greater happening in 2007.”
Source: Tillinghast Towers Perrin, *Study of Recent Legislative Changes to Florida’s Property Insurance Mechanisms*, 3/07.

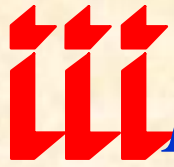


Per Household Savings vs. Long-Term Costs of FL Legislation for 2007 Hurricane Season



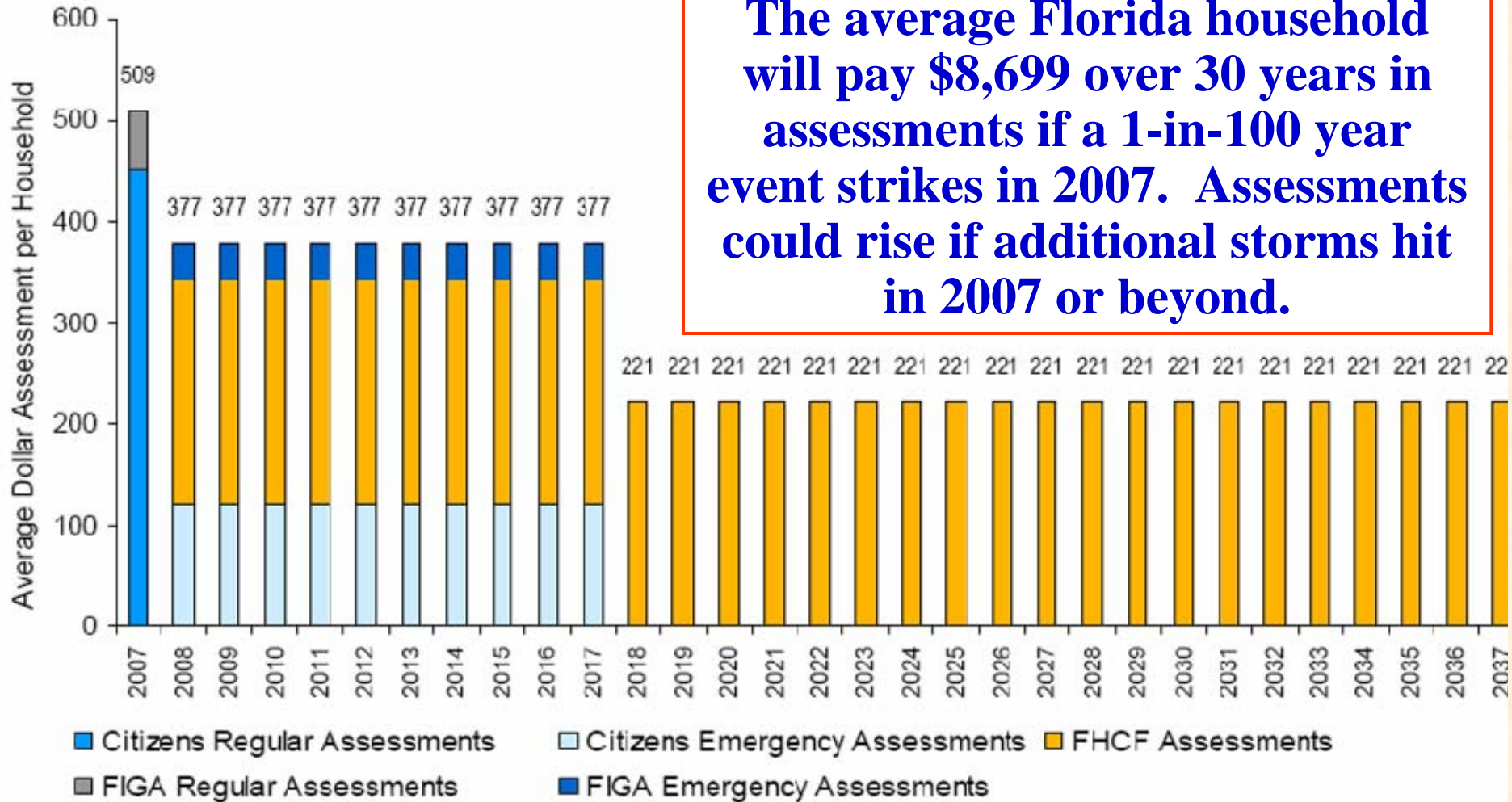
Notes: Assumes average homeowners insurance premium of \$1300 in 2007. Savings for 2007 reflects 24.3% savings on hurricane costs, assumed to be 63% of premium. Savings based on statewide OIR estimate. Actual savings may be less. Direct costs include assessments paid by policyholders on home and personal auto premiums. Indirect costs include assessments on commercial lines passed on to policyholders via higher prices. Amounts are in nominal dollars, or the total cost of borrowing including finance charges over the term of the bond.

Source: Tillinghast Towers Perrin, *Study of Recent Legislative Changes to Florida's Property Insurance Mechanisms*, 3/07.



Average Annual Assessment per

Household, 1-in-100 Year Event in 2007



Source: Tillinghast Towers Perrin, *Study of Recent Legislative Changes to Florida's Property Insurance Mechanisms*, 3/07.



Savings vs. Costs by Region: *Neither Equitable nor Proportionate*

STATEWIDE AVERAGE

Average Savings: \$265
Cost of 1-in-30 Storm: \$2,550
Cost is 10 times avg. savings

ORLANDO

Average Savings: \$30
Cost of 1-in-30 Storm: \$2,075
Cost is 69 times avg. savings

TALLAHASSEE

Average Savings: \$20
Cost of 1-in-30 Storm: \$2,000
Cost is 100 times avg. savings

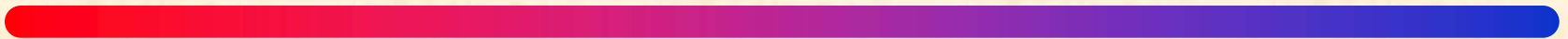
TAMPA

Average Savings: \$100
Cost of 1-in-30 Storm: \$2,300
Cost is 23 times avg. savings

MIAMI

Average Savings: \$1,120
Cost of 1-in-30 Storm: \$3,375
Cost is 3 times avg. savings

Overview of Plans for a National Catastrophe Insurance Plan





NAIC's Comprehensive National Catastrophe Plan

- **Proposes Layered Approach to Risk**
- **Layer 1: Maximize resources of private insurance & reinsurance industry**
 - Includes “All Perils” Policy
 - Encourage Mitigation
 - Create Meaningful, Forward-Looking Reserves
- **Layer 2: Establishes system of state catastrophe funds (like FHCF)**
- **Layer 3: Federal Catastrophe Reinsurance Mechanism**



Comprehensive National Catastrophe Plan Schematic

1:500 Event

National Catastrophe Contract Program

1:50 Event

State Regional Catastrophe Fund

State Attachment

**Personal
Disaster
Account**

Private Insurance

Private Reinsurance



Objectives of NAIC's Comprehensive National Catastrophe Plan

- **Should Promote Personal Responsibility Among Policyholders**
- **Supports Reasonable Building Codes, Development Plans & Other Mitigation Tools**
- **Maximize the Risk Bearing Capacity of the Private Markets**
- **Should Provide Quantifiable Risk Management to the Federal Government**



Legislation has been introduced and ideas espoused by ProtectingAmerica.org will likely get a more thorough airing in 2007/8

A VULNERABLE AMERICA

HURRICANES EARTHQUAKES

WHAT ARE YOU AT RISK FOR?

OUR MISSION IS TO RAISE AWARENESS, EDUCATE THE PUBLIC AND POLICYMAKERS, AND OFFER SOLUTIONS THAT WILL BETTER PREPARE AND PROTECT AMERICA FROM MAJOR CATASTROPHE IN A SENSIBLE, COST-EFFECTIVE FASHION.

REPLAY

- HELP PROTECT AMERICA
- UNDERSTAND YOUR RISKS >
 - STRENGTHEN 1ST RESPONDERS >
 - BUILD SMARTER & STRONGER >
 - ADVOCATE CATASTROPHE FUNDS >

PREPARE YOURSELF:

HOW YOU CAN BETTER PREPARE
tips for average americans >

- RECENT NEWS:
- Teaching Earthquake Science Made Easy: USGS Partnership Puts Curriculum into the Classroom
2.1.06
 - Faculty Senate hears report on emergency-preparedness plan
2.1.06
 - It's Earthquake Preparedness Week In Kentucky
2.1.06

AMERICA NEEDS YOUR VOICE!

Our current system leaves too many people unprotected and unable to rebuild their lives following a catastrophe. We need to prepare for future catastrophes and protect ourselves.

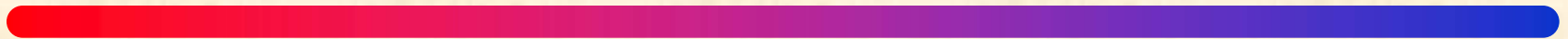
CONTACT YOUR ELECTED OFFICIALS > **JOIN OUR CAUSE >**

STATS & FIGURES:

repeat of the 1886 Charleston, South Carolina, earthquake today would cause

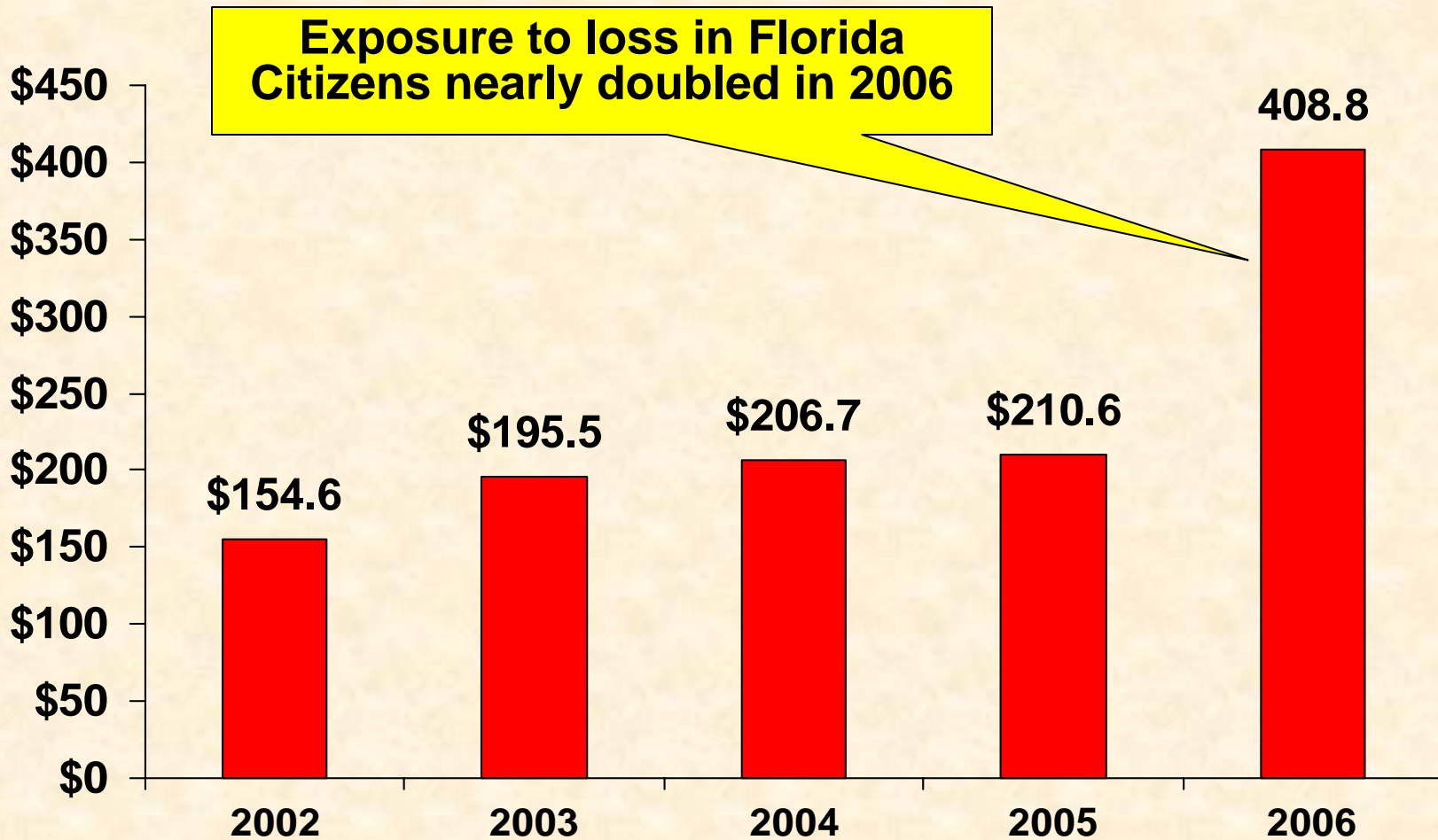
STATE RESIDUAL MARKETS

*Still Growing Despite
a Quiet 2006*



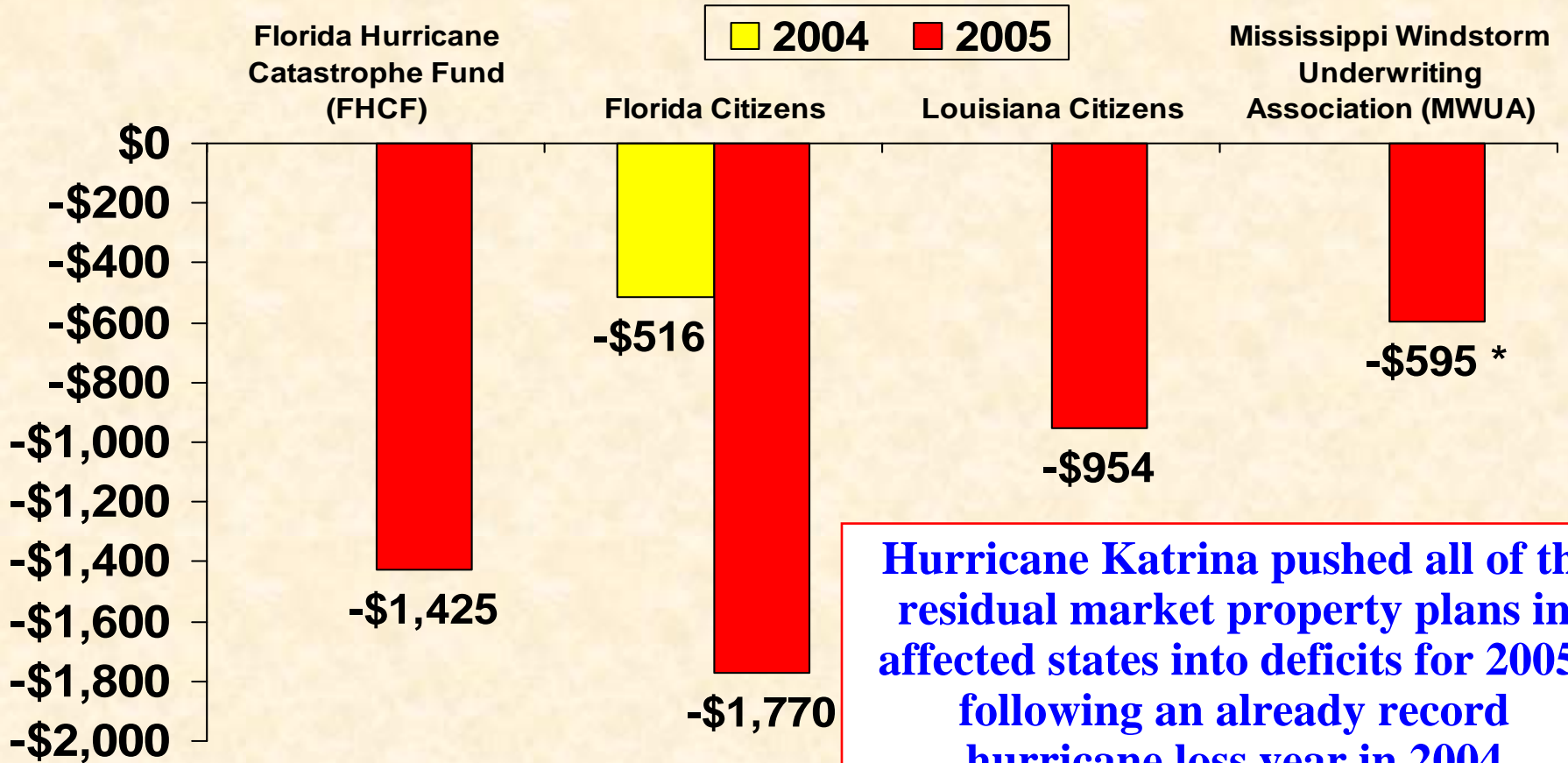


Florida Citizens Exposure to Loss (Billions of Dollars)





Major Residual Market Plan Estimated Deficits 2004/2005 (Millions of Dollars)

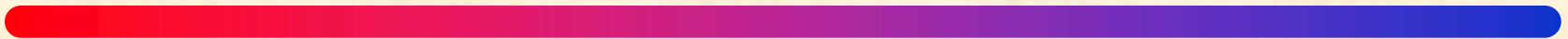


Hurricane Katrina pushed all of the residual market property plans in affected states into deficits for 2005, following an already record hurricane loss year in 2004

* MWUA est. deficit for 2005 comprises \$545m in assessments plus \$50m in Federal Aid.

Source: Insurance Information Institute

Recommendations





Recommendations for

Controlling Hurricane Exposure

- **Raise public awareness of risk**
 - Mandatory risk disclosure in all residential real estate transactions
 - Require signed waivers if decline flood coverage that also waive rights to any and all disaster aid, or
 - Mandate flood coverage
- **Continue to strengthen & enforce of building codes**
- **Allow markets to determine all property insurance rates**
 - Role of state focused on difficult-to-insure or income issues
- **Increase incentives to mitigate**
- **Require state-run insurer to charge actuarially sound rates and limit high value exposure**
- **Require communities/counties to a financial stake in their catastrophe exposure**
 - Reimburse disaster aid to state/federal government



Insurance Information Institute On-Line

WWW.III.ORG

*If you would like a copy of this presentation, please
give me your business card with e-mail address*