

Negative Space

Discussion and Exercise



GUN DEATHS IN FLORIDA

Business Insider, 2014



Background

“A person who is not engaged in an unlawful activity and who is attacked in any other place where he or she has a right to be has no duty to retreat and has the right to **stand his or her ground** and meet force with force, including **deadly force** if he or she reasonably believes it is necessary to do so to prevent death or great bodily harm to himself or herself or another or to prevent the commission of a forcible felony.”

See 2005 Title XLVI Chapter 776.013 at <http://www.leg.state.fl.us/Statutes/>



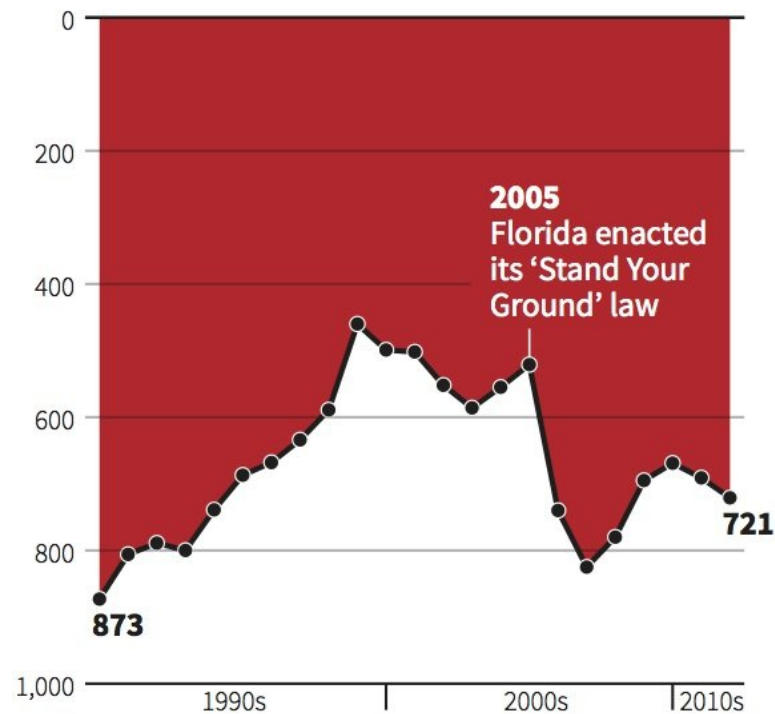
Background

- Did murders by firearms increase or decrease after the law was enacted?
 - What is your **initial** conclusion (within first second)?
 - What is your **final** conclusion (after a few seconds)?



Gun deaths in Florida

Number of murders committed using firearms



Source: Florida Department of Law Enforcement

C. Chan 16/02/2014

REUTERS

Source: <http://www.businessinsider.com/gun-deaths-in-florida-increased-with-stand-your-ground-2014-2>

Discussion

- **Visualization Goals**
 - Why was the y-axis inverted?
- **Perception Problems**
 - Why is the graph not perceived as intended?
- **Design Improvements**
 - What can we try to improve the design?



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Visualization Goals

- Can only **speculate** on true intentions for the graph
- Initial claims of **deception** and **misinformation**
- Some evidence that was **non-malicious**



Visualization Goals

This Chart Shows An Alarming Rise In Florida Gun Deaths After 'Stand Your Ground' Was Enacted

Pamela Engel, Business Insider, February 18, 2014

<http://www.businessinsider.com/gun-deaths-in-florida-increased-with-stand-your-ground-2014-2>



Visualization Goals

C² Christine Chan
@ChristineHHChan



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@john_self Thanks for the feedback. I prefer to show deaths in negative terms (inverted). It's a preference really, can be shown either way.

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12:30 AM - 15 Apr 2014

C² Christine Chan
@ChristineHHChan



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@john_self My inspiration for the graphic:
visualisingdata.com/blog/wp-content...

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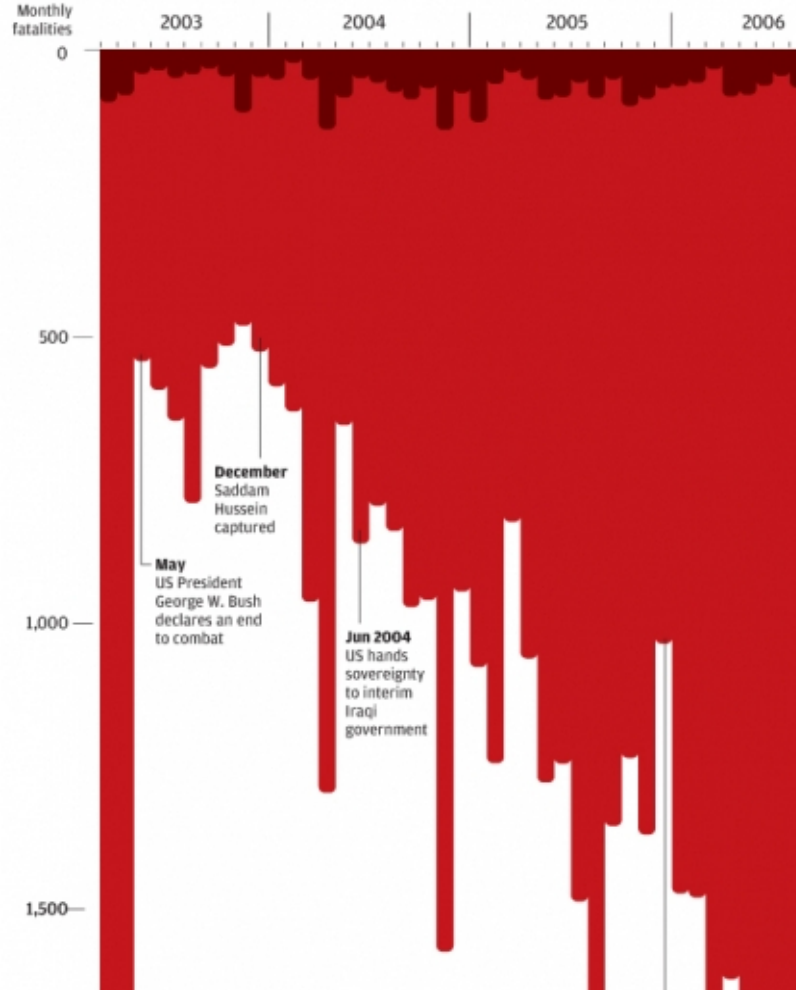
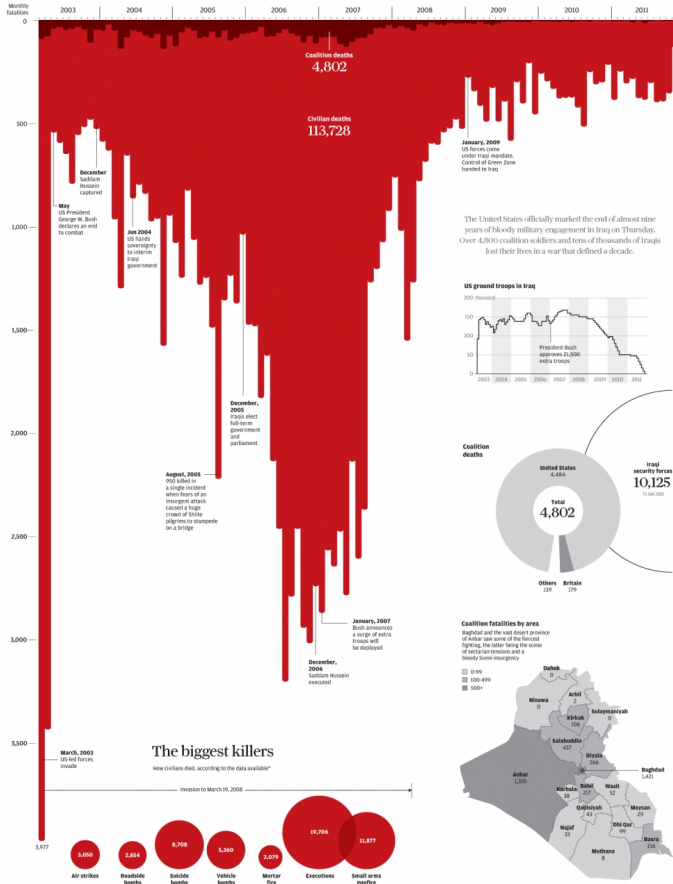
12:31 AM - 15 Apr 2014

<https://twitter.com/ChristineHHChan/status/455971447169511424>

<https://twitter.com/ChristineHHChan/status/455971685783441408>



Iraq's bloody toll



Number of murders committed using firearms


REUTERS[illegible]

SCMP graphic: Seven Sins

*Deaths from unknown causes are not included. Causes of death accounting for less than 0.1 per cent of deaths are not included.

Sources: *Casualties*, *Ex-Gratia* Court, *New England Journal of Medicine*, *Global Security*, *Aviation*, *Aviation*

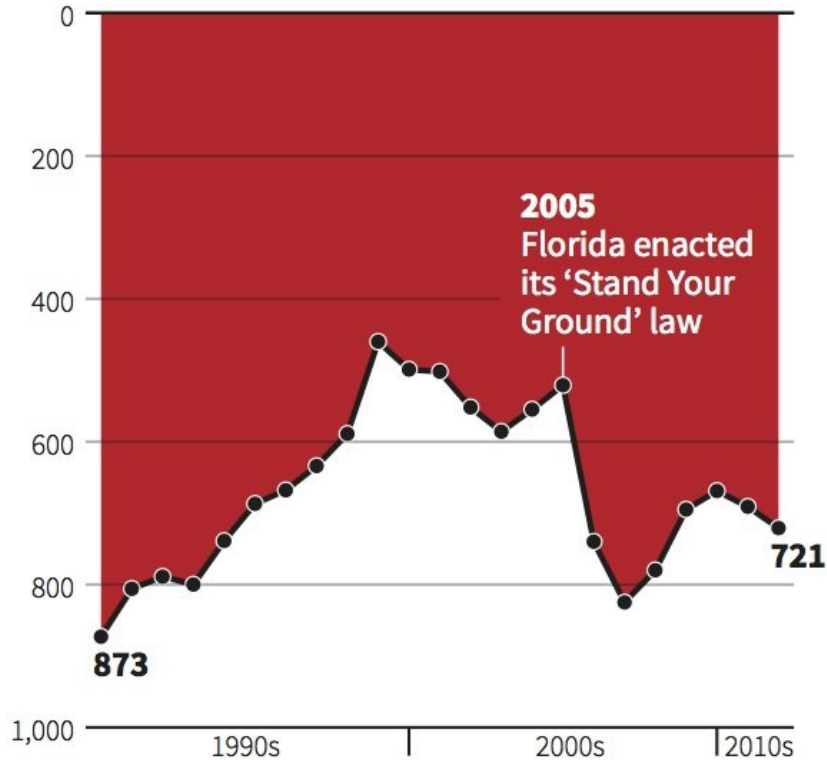
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Number of murders committed using firearms

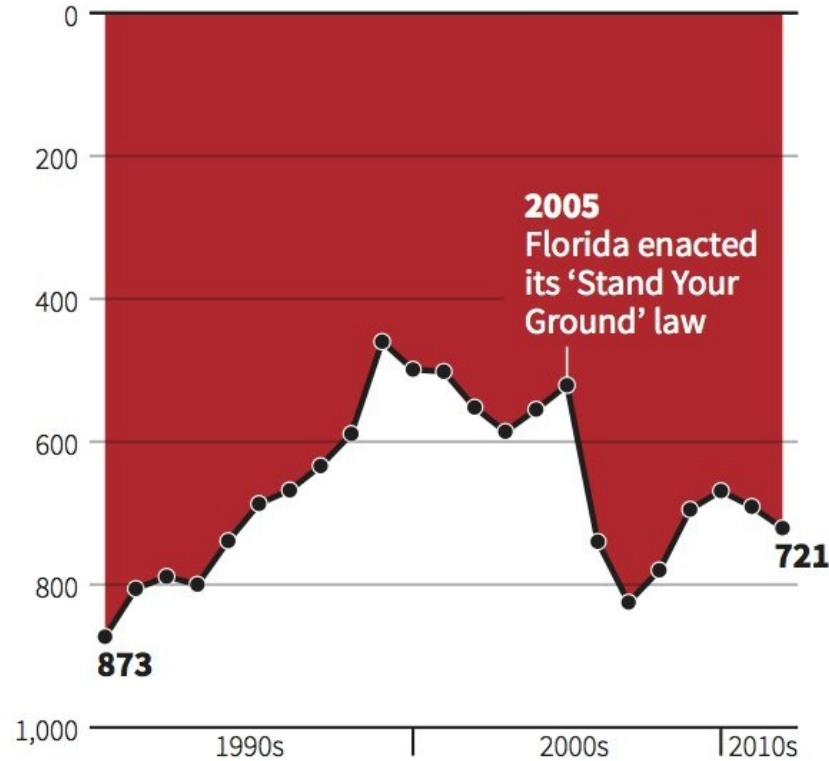


Source: Florida Department of Law Enforcement

- If you focus on the **red area**, you see an **increase**
- If you focus on the **white area**, you see a **decline**
- If you focus on the **black line**, you see a **decline**

Gun deaths in Florida

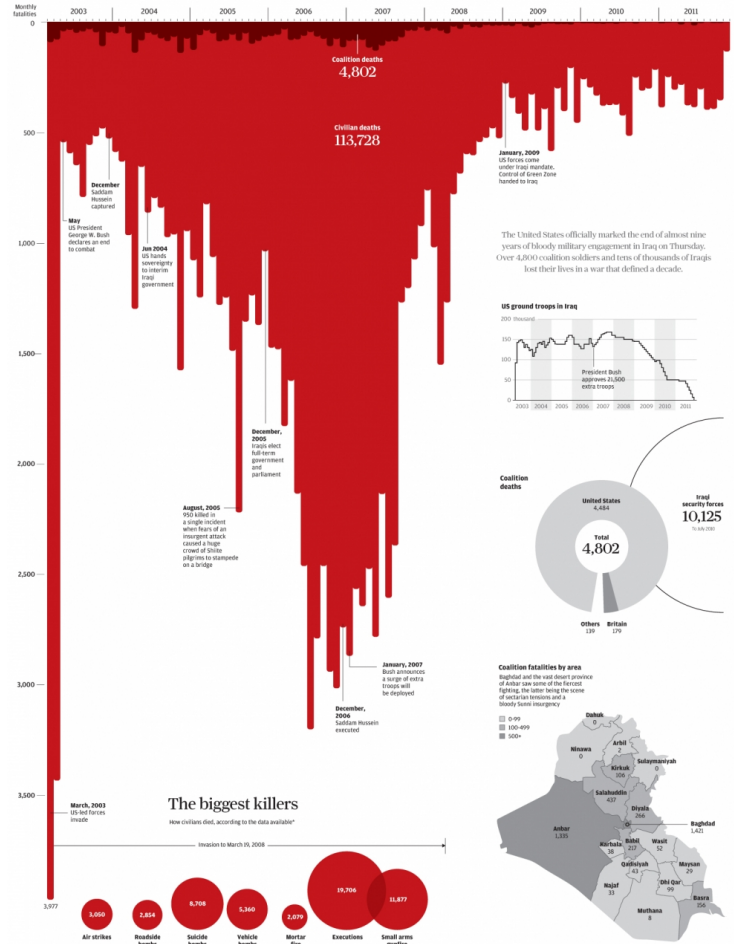
Number of murders committed using firearms



Source: Florida Department of Law Enforcement

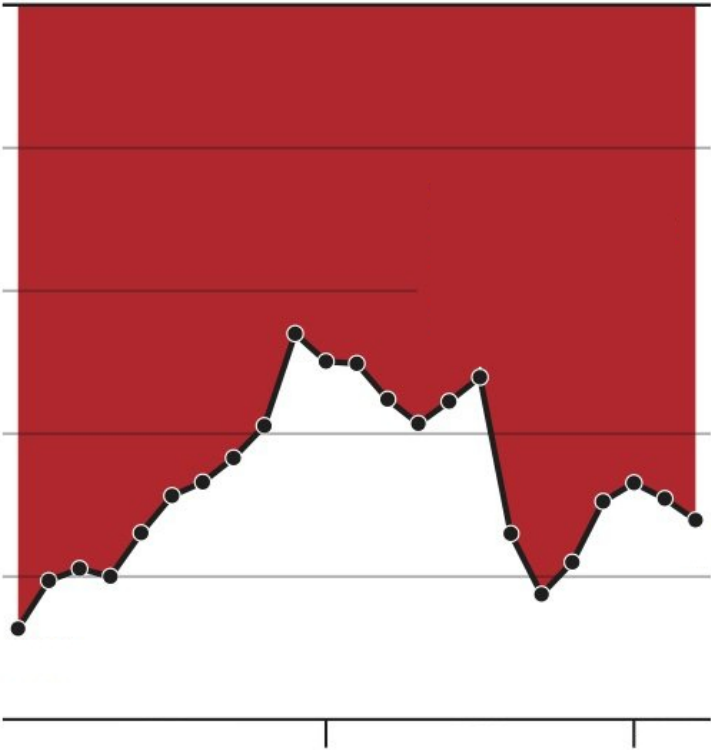
C. Chan 16/02/2014

Iraq's bloody toll



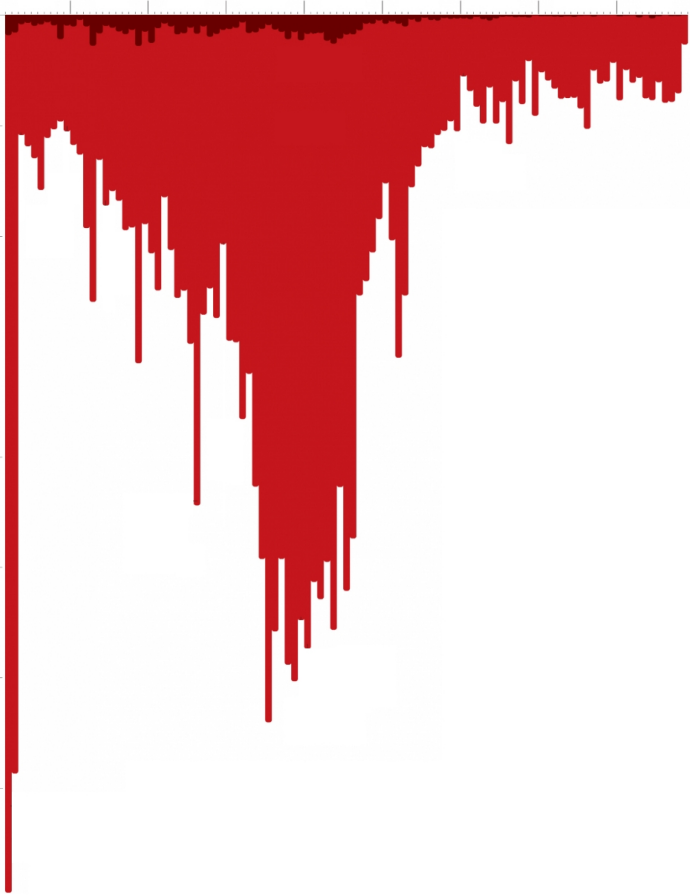
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Number of murders committed using firearms



Source: Florida Department of Law Enforcement

Iraq's bloody toll



Number of murders committed using firearms



REUTERS

The biggest killers
How civilians died, according to the data available*

Invasion to March 20, 2008

Category	Deaths
Air strikes	3,090
Roadside	3,854
Suicide	6,708
Vehicle	1,340
Mortar	3,079
Encounters	19,706
Small arms	11,877

Coalition deaths
4,802

Civilian deaths
113,728

Coalition deaths by country

Country	Deaths
United States	4,684
Iraq security forces	10,125
Others	139
Britain	179

Coalition fatalities by area
Regional and the vast desert province of Anbar saw some of the fiercest fighting, the latter being the scene of sectarian tensions and a bloody Sunni insurgency

Coalition forces cover under Iraqi mandate, Control of Green Zone handed to Iraq

January, 2009
US forces cover under Iraqi mandate, Control of Green Zone handed to Iraq

US ground troops in Iraq
200 thousand
Projected Bush withdraws approximately 20,000 extra troops

March, 2003
US-led forces invade

December, 2003
Saddam Hussein captured

May
US President George W. Bush declares an end to combat

June 2004
US hands sovereignty to interim Iraqi government

August, 2005
UN-led UN is a single incident when forces of an insurgent attack caused a huge crowd of Shiite pilgrims to stampede on a bridge

December, 2005
Iraqis elect Saddam Hussein government and parliament

January, 2007
Bush announces a surge of extra troops will be deployed

December, 2008
Saddam Hussein executed

SCMP grade 6: Simon Scafe

*Deaths from unknown causes are not included. Causes of death accounting for less than 0.1 per cent of illness do not include

Sources: *Cassidy*, *Forbes*; *Court*, *New England Journal of Medicine*; *Global Security*; *London Institute*

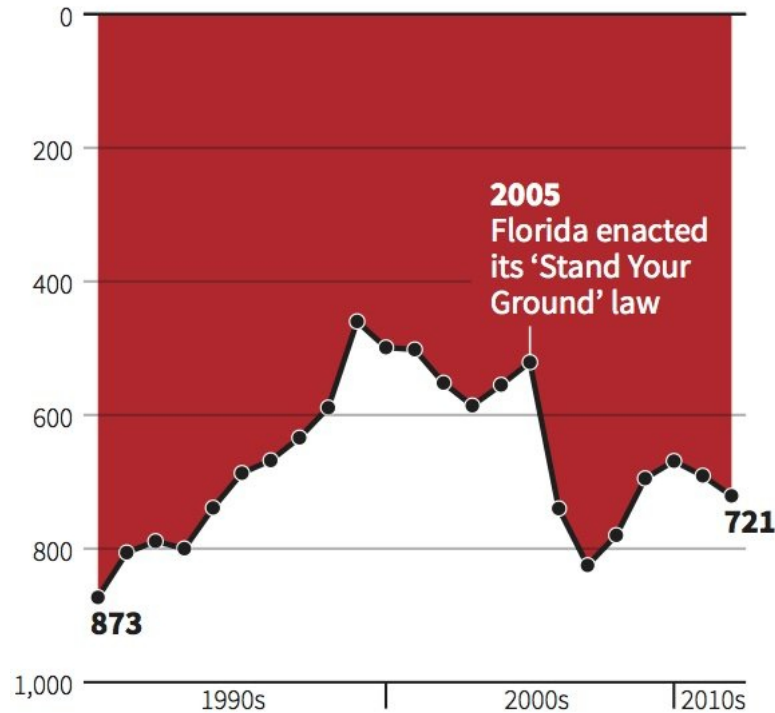
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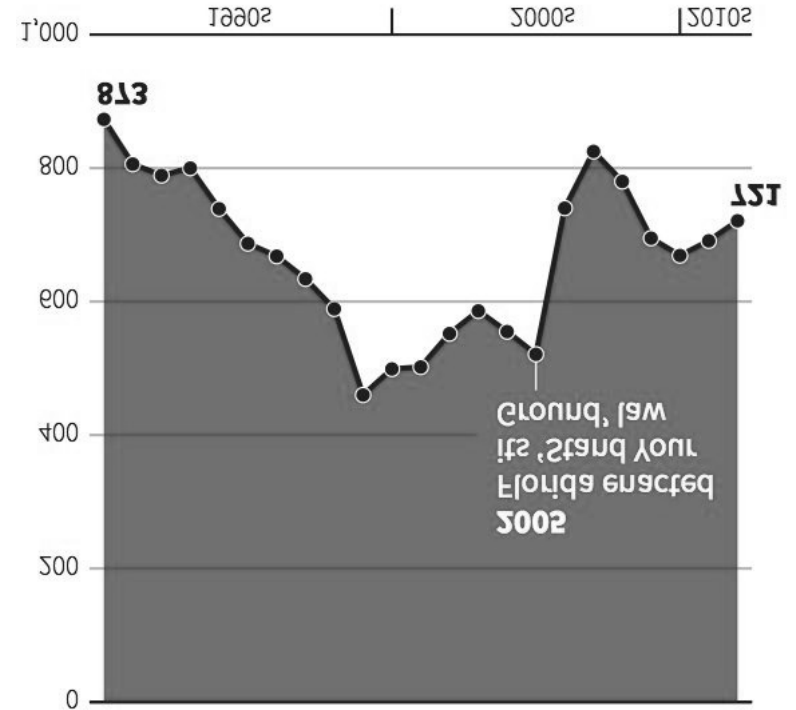


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Source: Florida Department of Law Enforcement

19

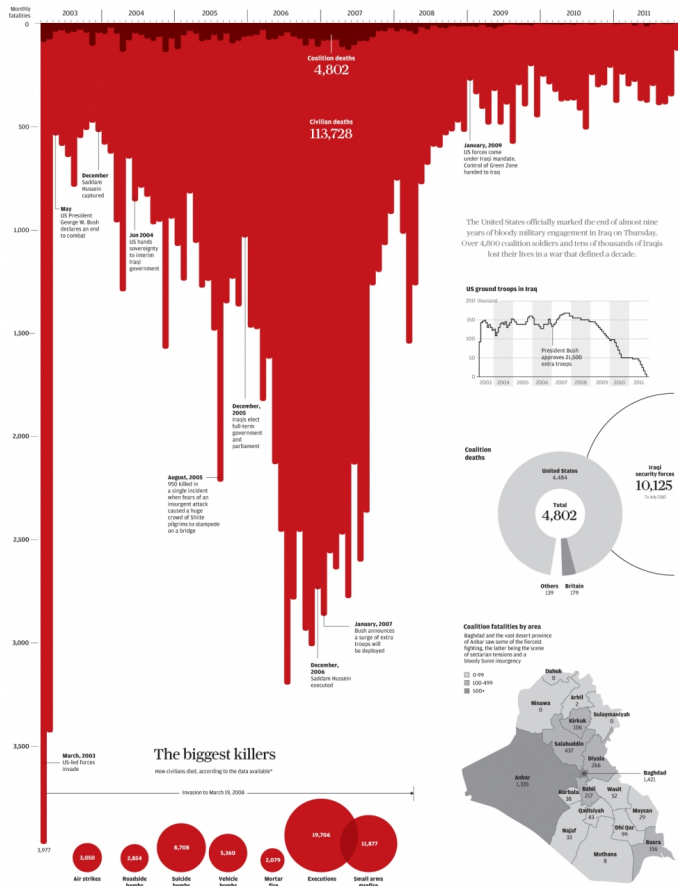


Number of murders committed using firearms

Gun deaths in Florida

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Iraq's bloody toll



Original Data Source

Florida Department of Law Enforcement Uniform Crime Reports (UCR) Offense Data

Murder: Firearm Type and Rate for Florida, 1971 – 2013
Total by Firearm (See 1990 to 2012)

<http://www.fdle.state.fl.us/cms/FSAC/Data-Statistics/UCR-Offense-Data.aspx>



Original Data Source

Year	Deaths
1990	873
1991	806
1992	789
1993	800
1994	739
1995	687
1996	668
1997	634

Year	Deaths
1998	589
1999	460
2000	499
2001	502
2002	552
2003	586
2004	555
2005	521

Year	Deaths
2006	740
2007	825
2008	780
2009	695
2010	669
2011	691
2012	721

<http://www.fdle.state.fl.us/cms/FSAC/Data-Statistics/UCR-Offense-Data.aspx>



References

- “This Chart Shows An Alarming Rise In Florida Gun Deaths After ‘Stand Your Ground’ Was Enacted,” Pamela Engel, Business Insider, February 18, 2014.
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<http://www.fdle.state.fl.us/cms/FSAC/Data-Statistics/UCR-Offense-Data.aspx>

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