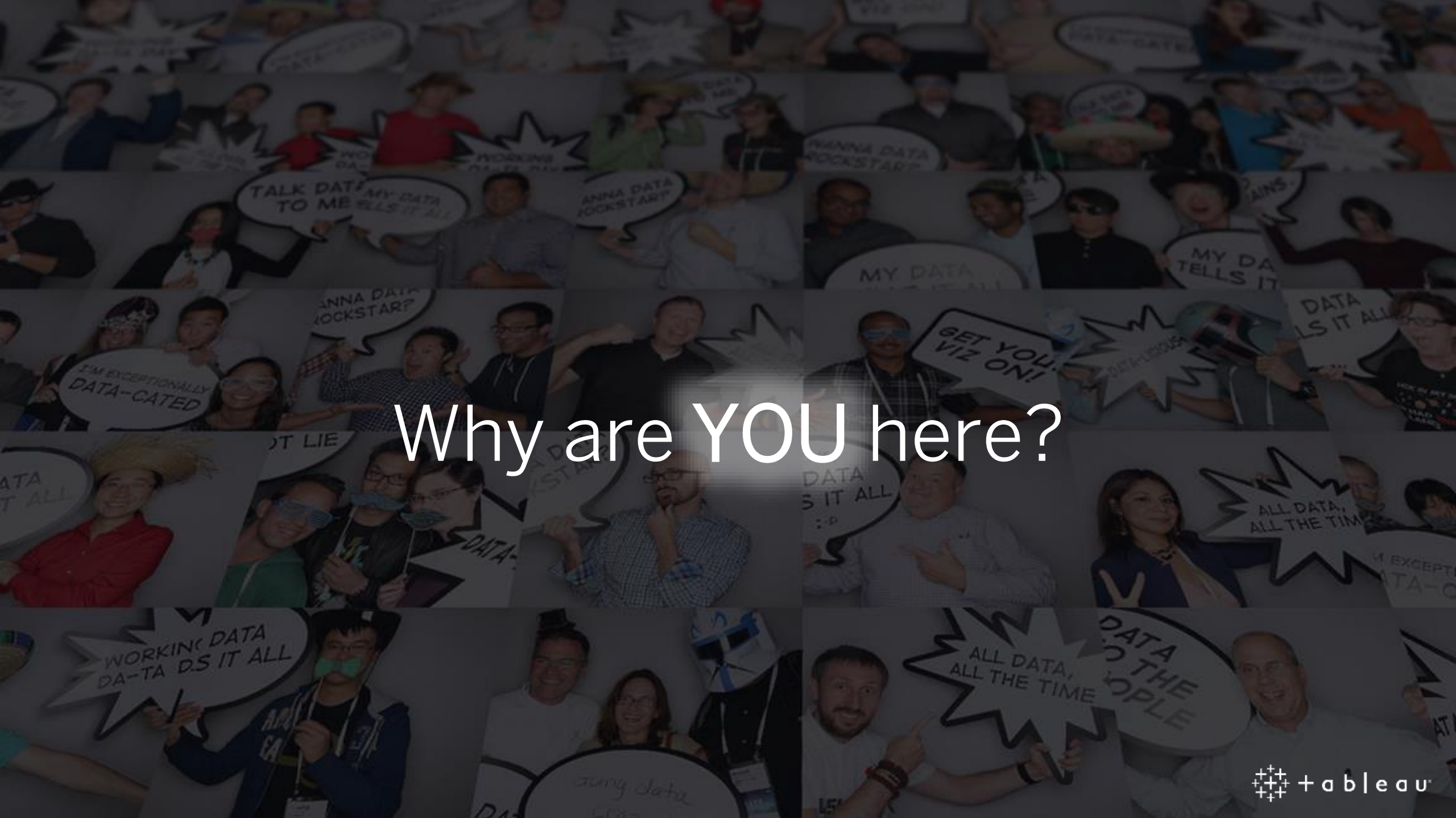




Storytelling with Data

The high art of data visualization

Timo Tautenhahn
Senior Solution Consultant
Tableau

A collage of numerous small photographs of people at a conference, likely a data-related event. The people are holding various signs and props. Some signs say "TALK DATA TO ME, I'LL TELL IT ALL", "ANNA DATA ROCKSTAR?", "MY DATA TELLS IT ALL", "GET YOUR VIZ ON!", "I'M EXCEPTIONALLY DATA-CATED", "DATA TELLS IT ALL", "ALL DATA, ALL THE TIME", "WORKING DATA DA-TA D.S IT ALL", "DATA IS IT ALL", "ALL DATA, ALL THE TIME", "DATA TO THE PEOPLE", "I'M EXCEPTIONALLY DATA-CATED", "DATA TELLS IT ALL", "ANNA DATA ROCKSTAR?", "MY DATA TELLS IT ALL", "GET YOUR VIZ ON!", "I'M EXCEPTIONALLY DATA-CATED", "DATA TELLS IT ALL", "ALL DATA, ALL THE TIME", "WORKING DATA DA-TA D.S IT ALL", "DATA IS IT ALL", "ALL DATA, ALL THE TIME", "DATA TO THE PEOPLE". The text "Why are YOU here?" is overlaid in the center of the collage in a large, white, sans-serif font. The Tableau logo is in the bottom right corner.

Why are YOU here?

tableau

DATA HEROES





Why am I here?

- ✓ Help you, becoming Data Heroes
- ✓ Save Time
- ✓ Confidence → YOUR Data Stories



Timo Tautenhahn

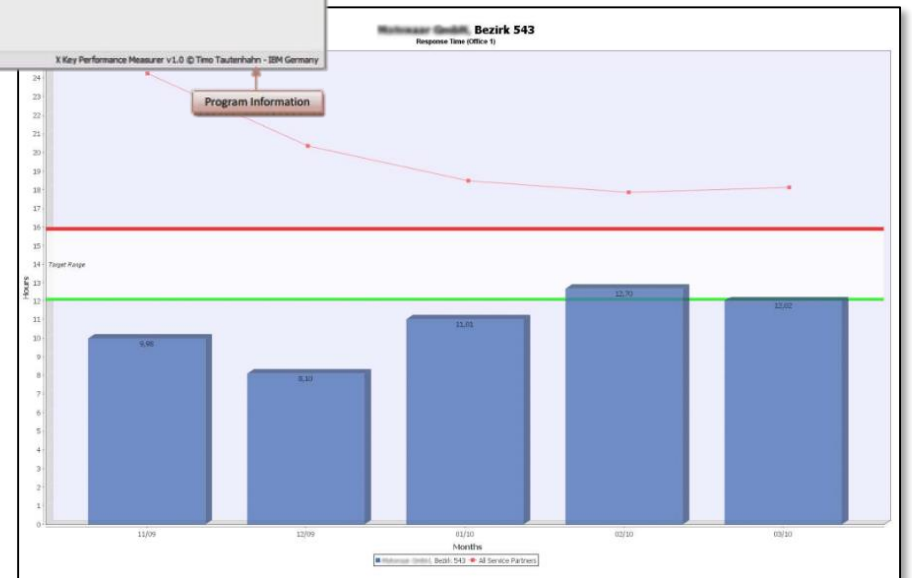
Senior Solution Consultant





Timo Tautenhahn

Senior Solution Consultant





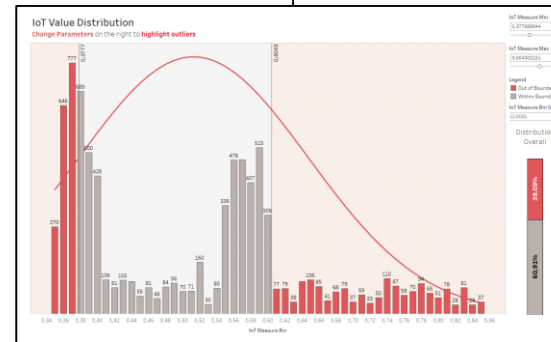
Timo Tautenhahn

Senior Solution Consultant



Tableau + 3rd Party Software

Translate Tableau queries into REST Calls – Live!



tableaufans.com

Tableaufans.com

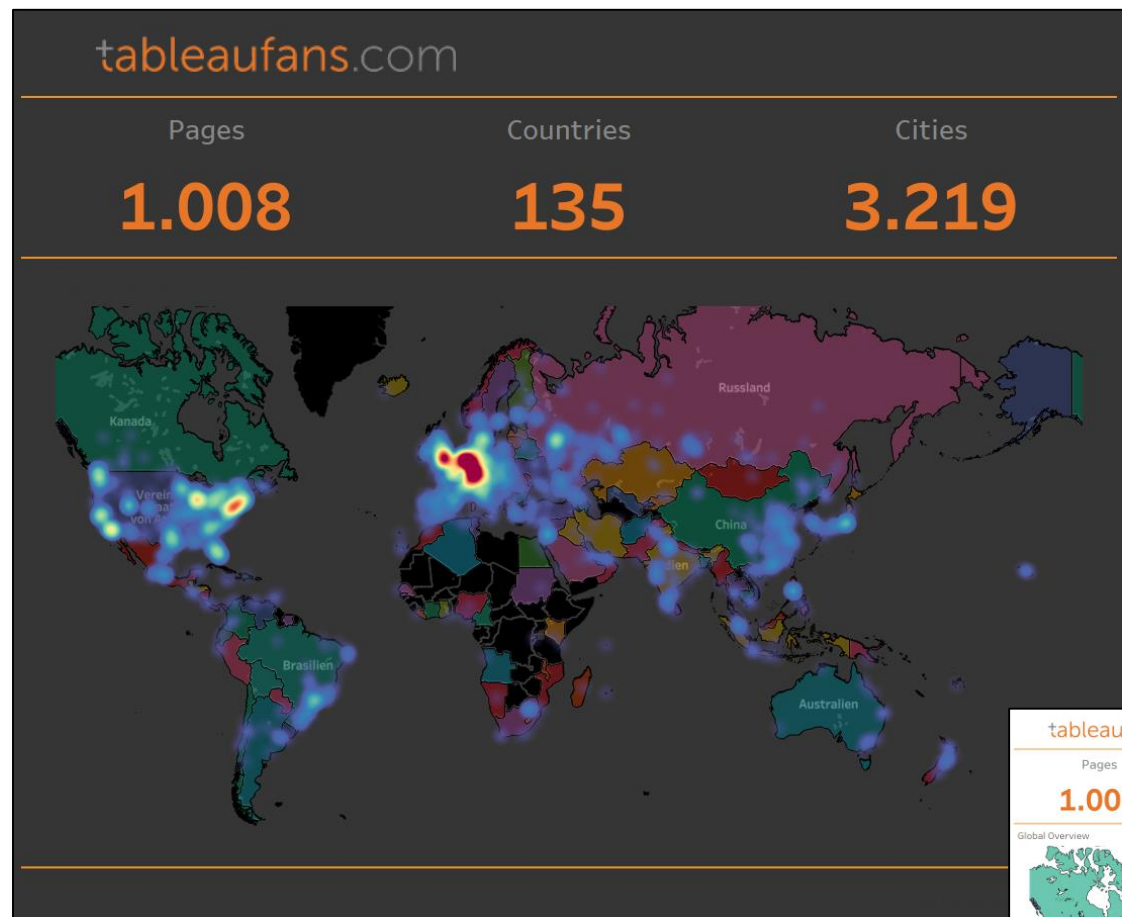
Internet of Things (IoT)



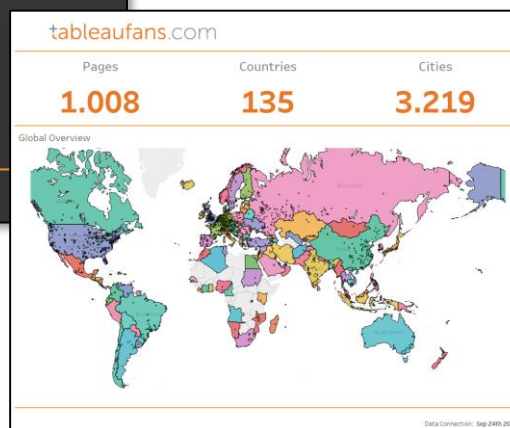
A collage of various people holding signs that say "We help people see and understand data". The signs are in different shapes and sizes, some are speech bubbles, some are rectangular, and some are circular. The people are of different ages and ethnicities, and they are all smiling and looking at the camera. The background is a dark, textured grey. The text "We help people see and understand data" is written in a white, sans-serif font across the center of the image. The Tableau logo is in the bottom right corner.

We help people see and understand data

tableau



tableaufans.com





Storytelling with Data

The high art of data visualization



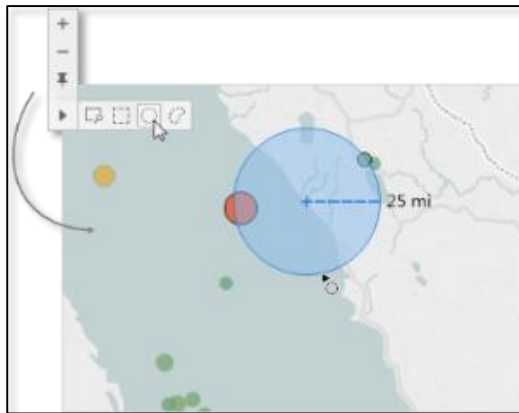
Storytelling with Data

The high art of **data visualization**

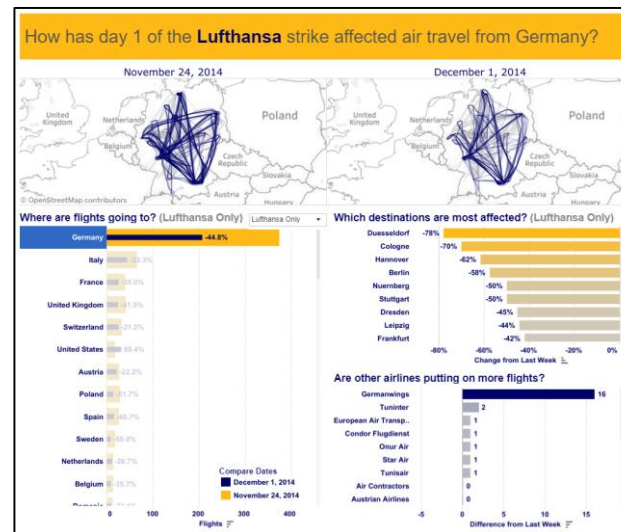
What is **Data Visualization**?

Data Visualization

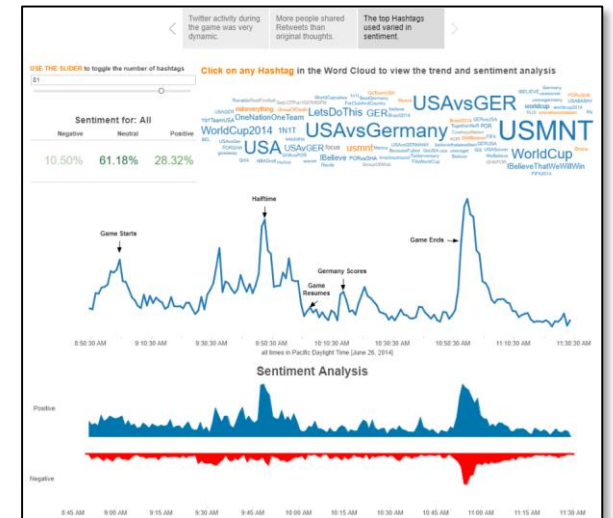
Analysis



Dashboards



Data Stories



Why **Data Visualization**?

CABS IN NYC

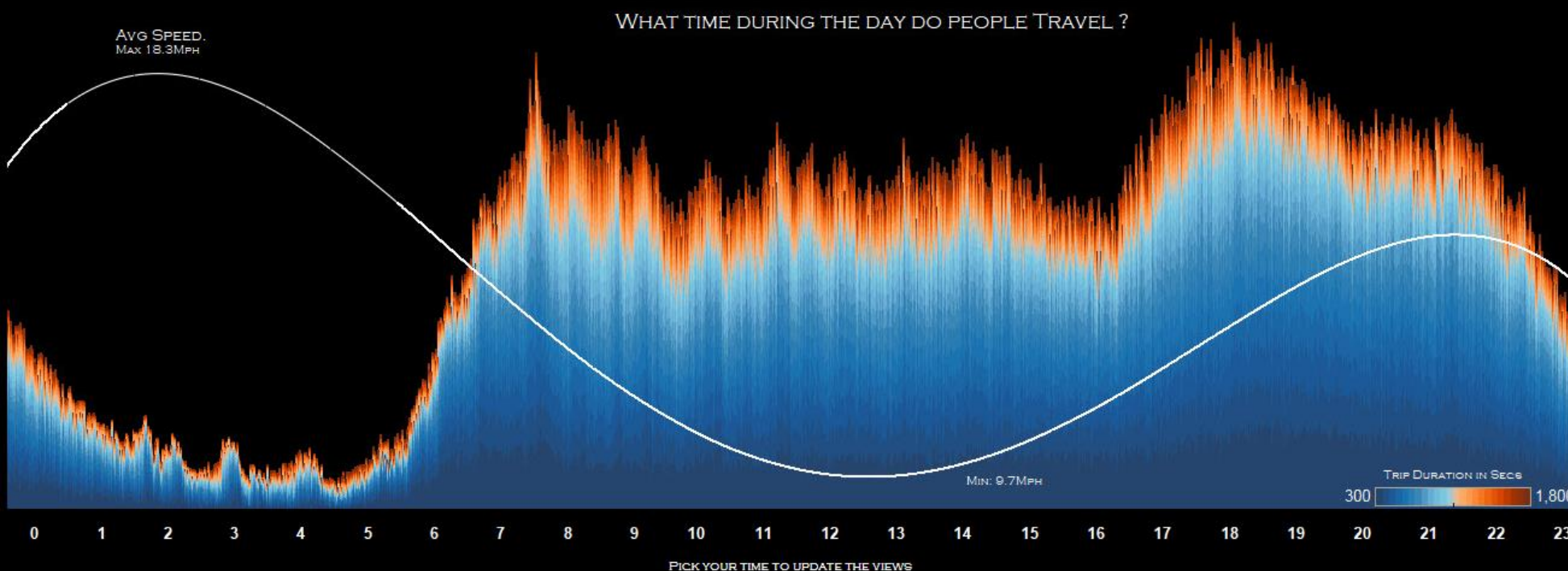
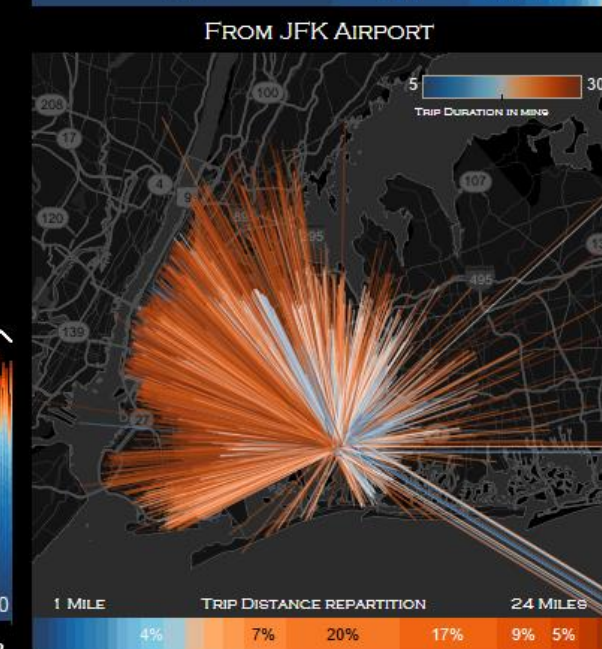
485.000
TRIPS PER DAY

50.000
DRIVERS

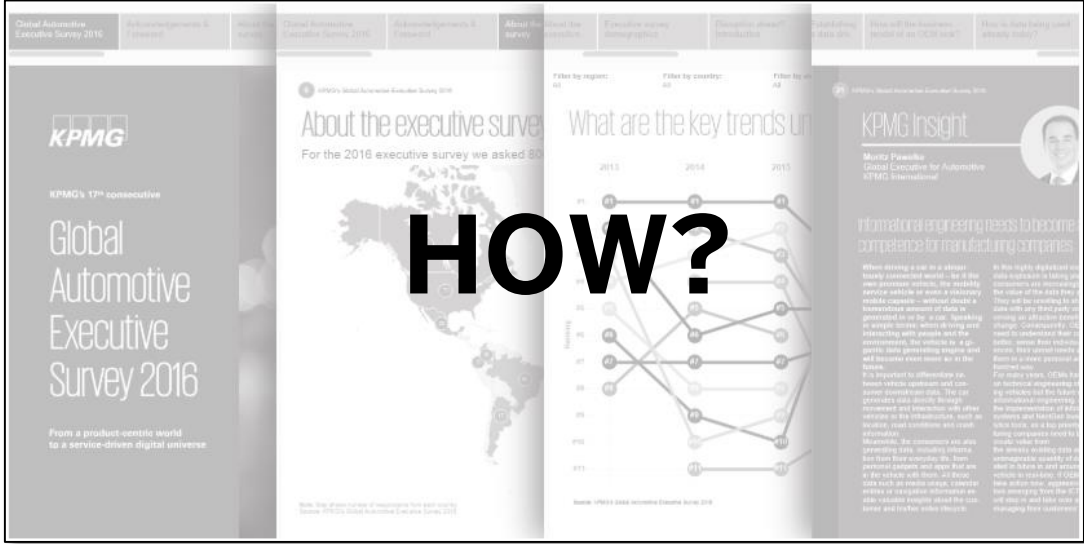
96%
OF TRIPS LAST 30 MINS OR LESS

70.000
MILES P/YR FOR A TYPICAL DRIVER

Gets our attention & helps us remember



The high art of data visualization

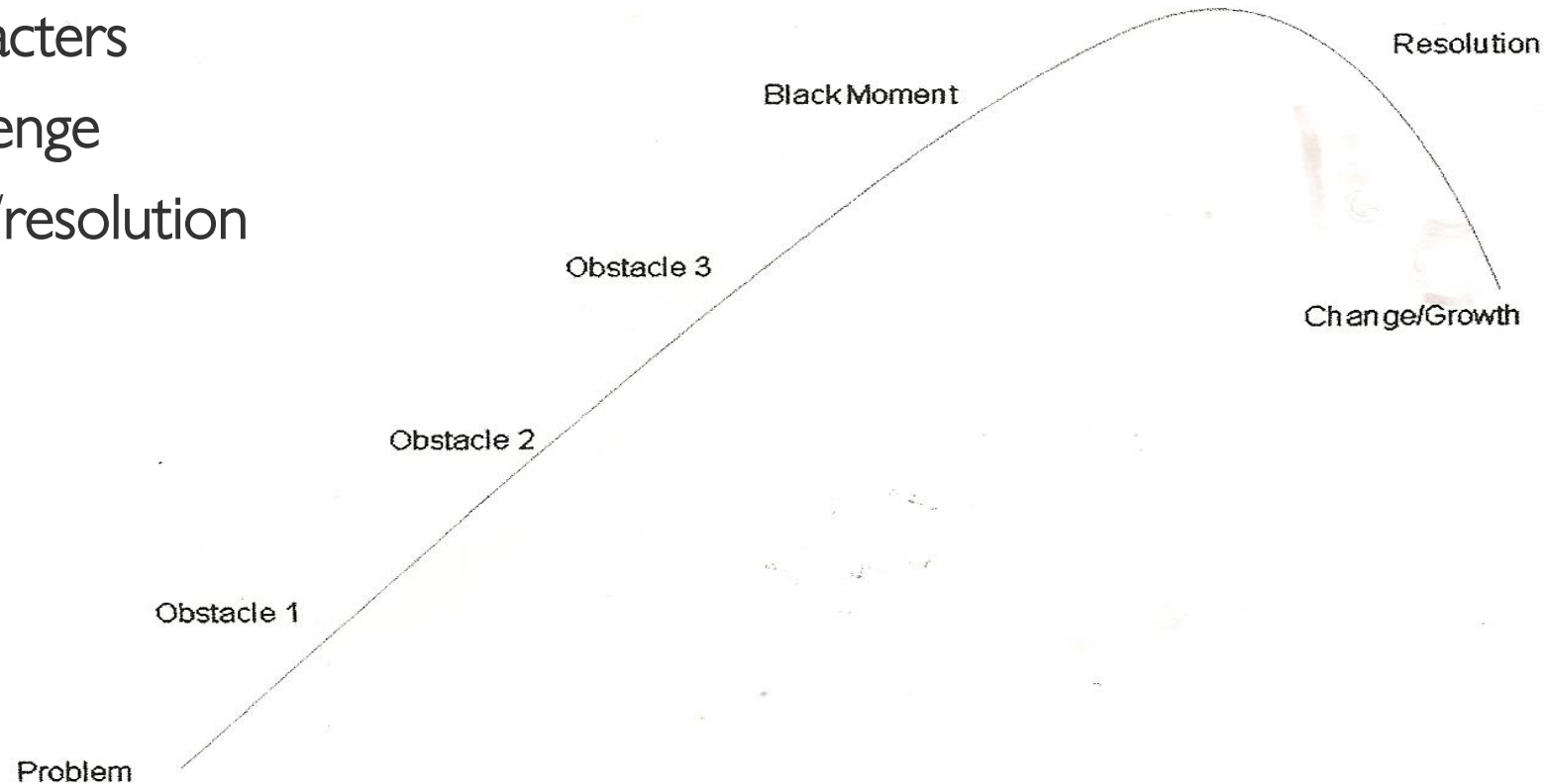




A great data story is like any other story

A great data story is like any other story

1. There are **characters**
2. There is a **challenge**
3. There is **insight/resolution**
4. There is an **arc**





Demo **Spotify**

Data Story



La photographie de l'Europe en récession

Le Monde | 20.05.2013 à 18h50 • Mis à jour le 20.05.2013 à 20h01

Abonnez-vous
à partir de 1 €

Réagir

Classer

Envoyer

Partager

Recommander

Envoyer

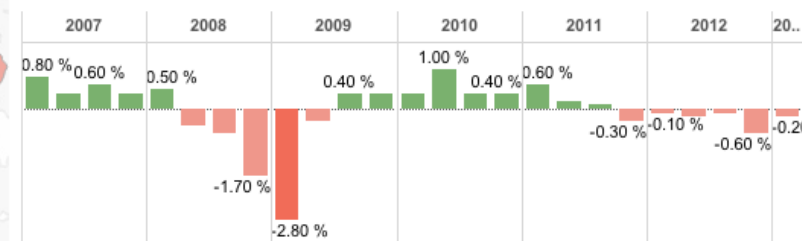
53 personnes recommandent ça. Soyez le
premier parmi vos amis.

La crise de 2008 avait arrêté la croissance européenne pour plusieurs mois, faisant basculer dans la récession une majorité des pays. La crise de l'euro fait à son tour marquer un coup d'arrêt à la croissance en Europe et la récession touche une dizaine de pays. Cliquez sur les pays pour obtenir plus d'informations.

Premier trimestre 2013



Zone euro (17 pays)



Abgout Tableau maps: www.tableausoftware.com/mapdata

-14.23 6.10

données Eurostat

1. Who are the characters?

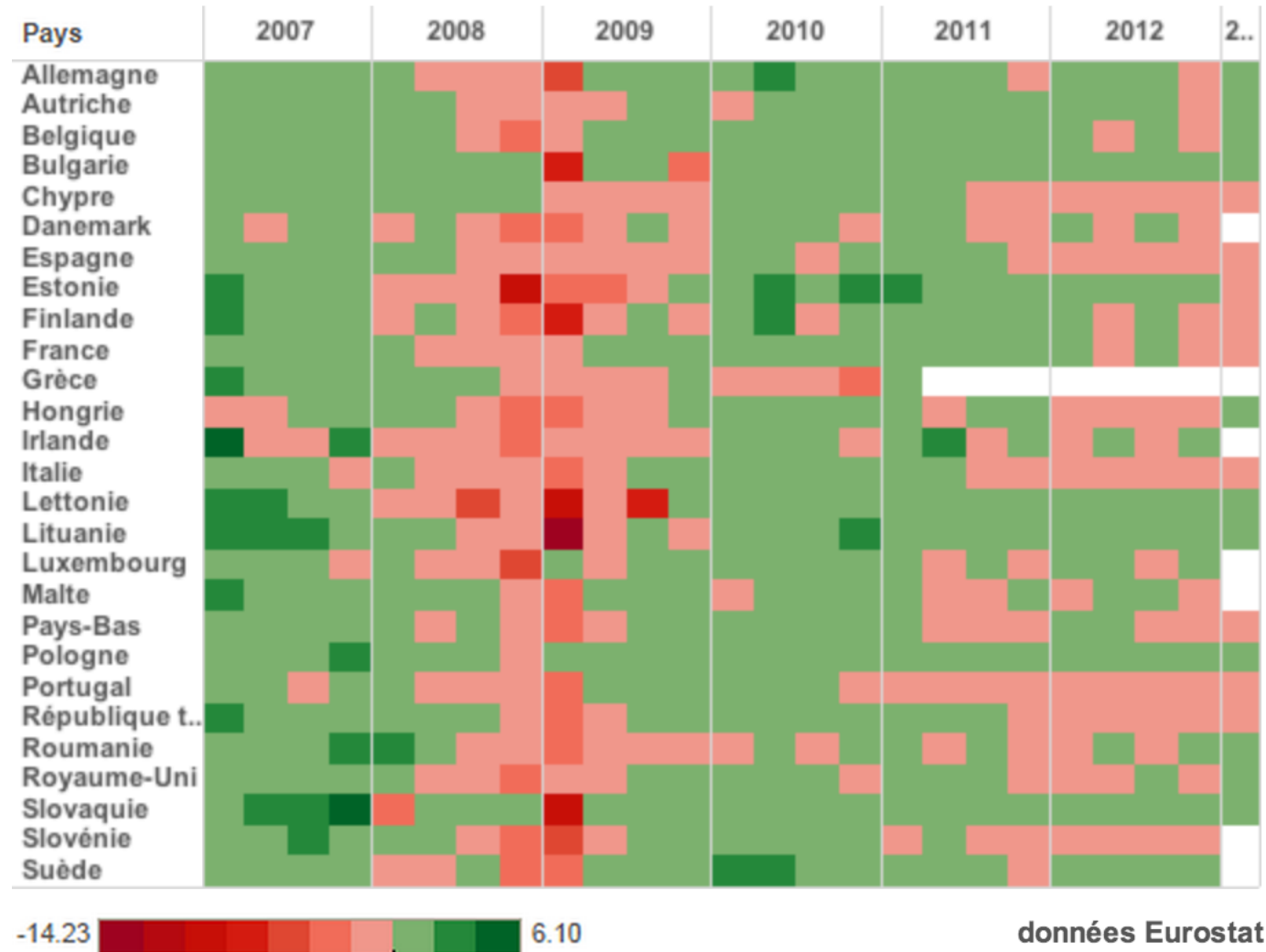


2. What's the challenge?

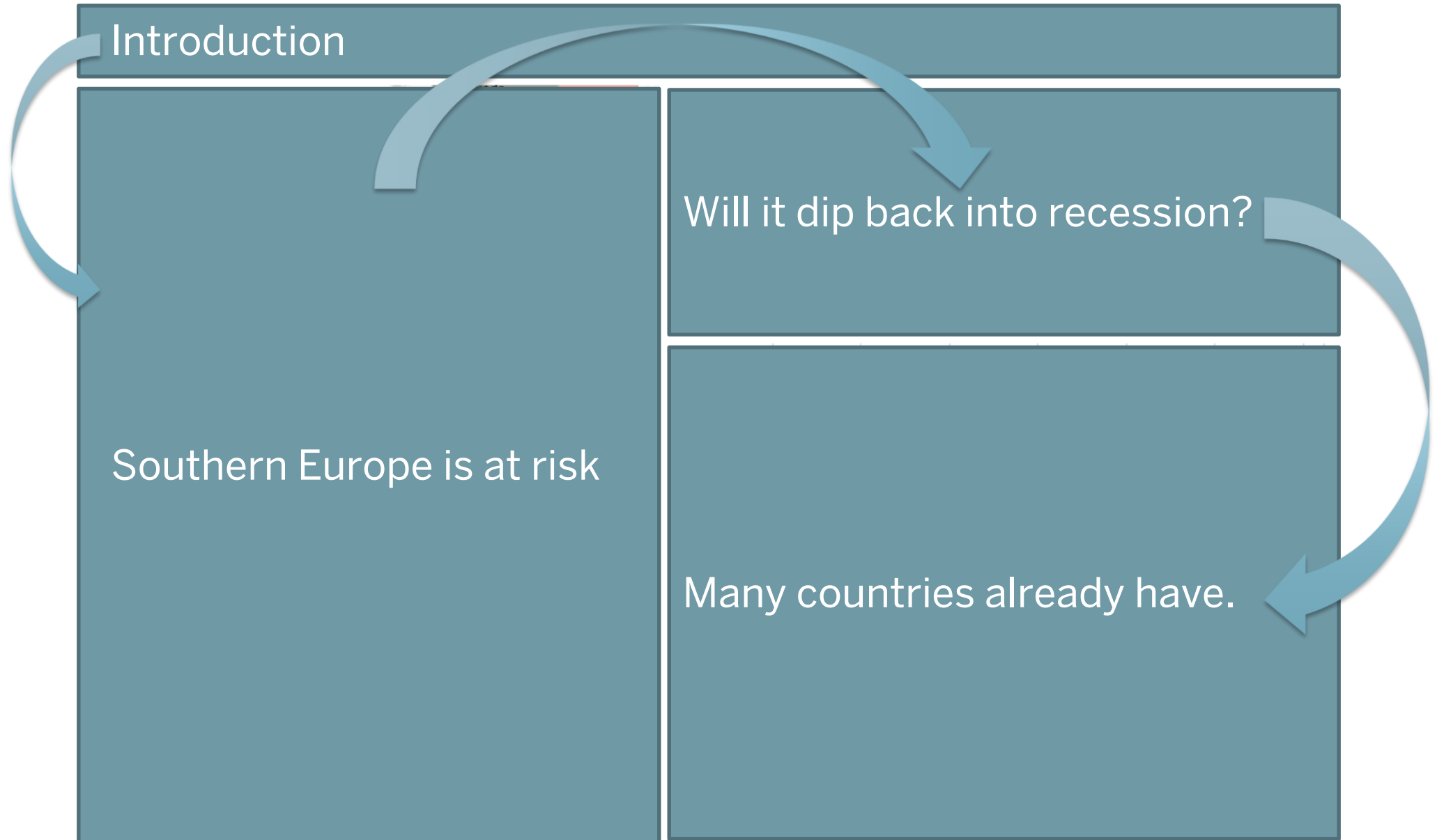
Premier trimestre 2013



3. What's the insight?



4. The arc



How did the author enable the audience
to get his/her point?

Will we dip back into recession?

Contrast



La photographie de l'Europe en récession

Le Monde | 20.05.2013 à 18h50 • Mis à jour le 20.05.2013 à 20h01

Abonnez-vous
à partir de 1 €

✉ Réagir

★ Classer

✉ Envoyer

Partager [f](#) [t](#) [v](#) [in](#)

[f](#) Recommander

[f](#) Envoyer

[f](#) 53 personnes recommandent ça. Soyez le premier parmi vos amis.

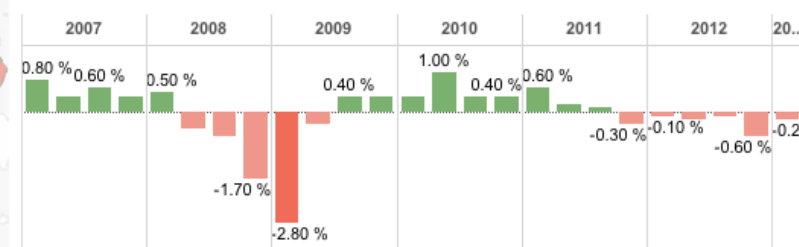
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Premier trimestre 2013

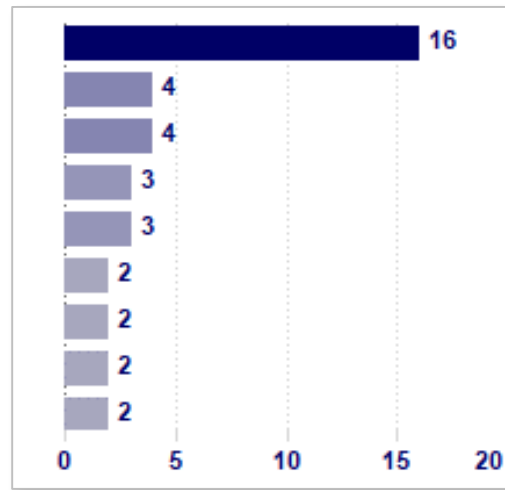


Abgout Tableau maps: www.tableausoftware.com/mapdata

Zone euro (17 pays)



Data visualization is all about comparison



Airports in London

Now get on with it

Britain needs to expand Heathrow airport—and soon

Jul 4th 2015 | From the print edition



FOR over 40 years British politicians have squabbled about where to build runways in south-east England. They have commissioned reports, ordered public inquiries and submitted to judicial reviews. For as long as the paperwork has helped them avoid local protesters, not a shovel has bitten into the ground. No full-length runway has been built to serve Britain's economic powerhouse since the second world war.

In 2012 David Cameron, Britain's prime minister, dodged the issue again, asking a commission under Sir Howard Davies, an economist, to look into airport expansion. On July 1st Sir Howard published his final report, backing a new runway at Heathrow, Britain's busiest airport (see [article](#)). There are worrying signs that Mr Cameron will be tempted to join the long line of paper-pushers.

World's busiest airports

By international passengers, m
Year ending March 2015

Dubai	71.2
London Heathrow	68.4
Hong Kong	64.3
Paris CDG	58.9
Amsterdam	55.3

Economist.com

Airports in London

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Economist.com



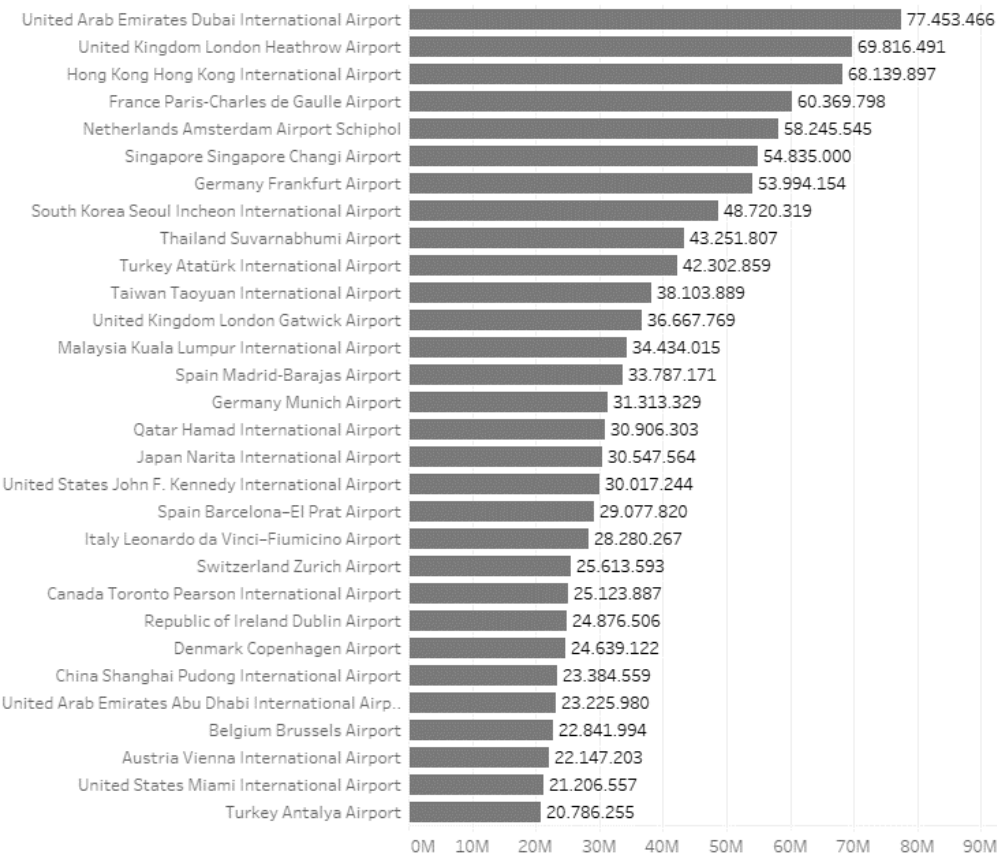


2015 statistics [\[edit \]](#)

Airports Council International's (January–December) figures are as follows.^[2]

Rank ↕	Airport ↕	Location ↕	Code (IATA/ICAO) ↕	Total passengers ↕	Monthly rank change ↕	% change ↕
1.	 Dubai International Airport	Garhoud, Dubai, United Arab Emirates	DXB/OMDB	77,453,466	—	▲ 10.7%
2.	 London Heathrow Airport	Hillingdon, Greater London, United Kingdom	LHR/EGLL	69,816,491	—	▲ 2.5%
3.	 Hong Kong International Airport	Chek Lap Kok, Islands, Hong Kong	HKG/VHHH	68,139,897	—	▲ 8.3%
4.	 Paris-Charles de Gaulle Airport	Roissy-en-France, Val d'Oise, Île-de-France, France	CDG/LFPG	60,369,798	—	▲ 3.0%
5.	 Amsterdam Airport Schiphol	Haarlemmermeer, North Holland, Netherlands	AMS/EHAM	58,245,545	—	▲ 6.0%
6.	 Singapore Changi Airport	Changi, East Region, Singapore	SIN/WSSS	54,835,000	—	▲ 2.9%
7.	 Frankfurt Airport	Flughafen, Frankfurt, Hesse, Germany	FRA/EDDF	53,994,154	—	▲ 2.4%
8.	 Seoul Incheon International Airport	Jung-gu, Incheon, South Korea	ICN/RKSI	48,720,319	—	▲ 8.5%
9.	 Suvarnabhumi Airport	Racha Thewa, Bang Phli, Samut Prakan, Greater Bangkok, Thailand	BKK/VTBS	43,251,807	▲ 1	▲ 16.3%
10.	 Atatürk International Airport	Yeşilköy, Bakırköy, Istanbul, Turkey	IST/LTBA	42,302,859	▼ 1	▲ 11.1%
11.	 Taoyuan International Airport	Dayuan, Taoyuan, Taiwan	TPE/RCTP	38,103,889	—	▲ 7.6%
12.	 London Gatwick Airport	Crawley, West Sussex, United Kingdom	LGW/EGKK	36,667,769	—	▲ 6.4%

Top 30 bussiest airports - international passengers



World's busiest airports

By international passengers, m
Year ending March 2015

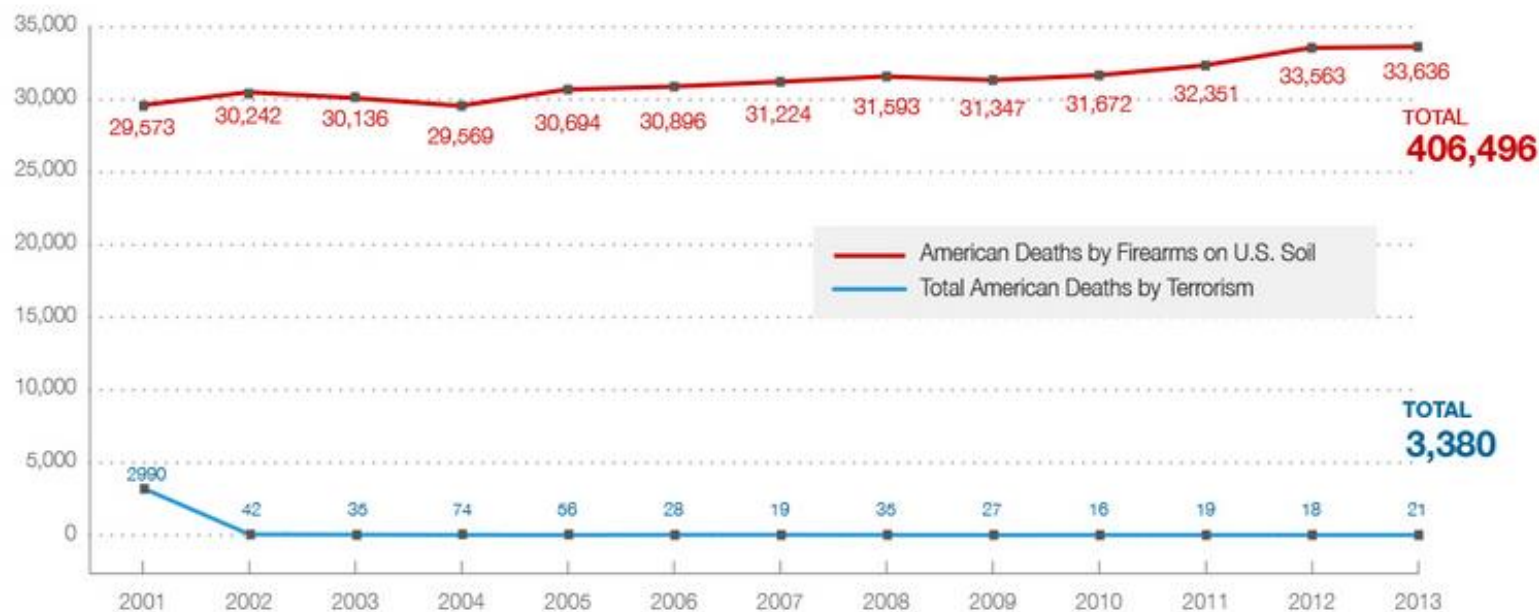


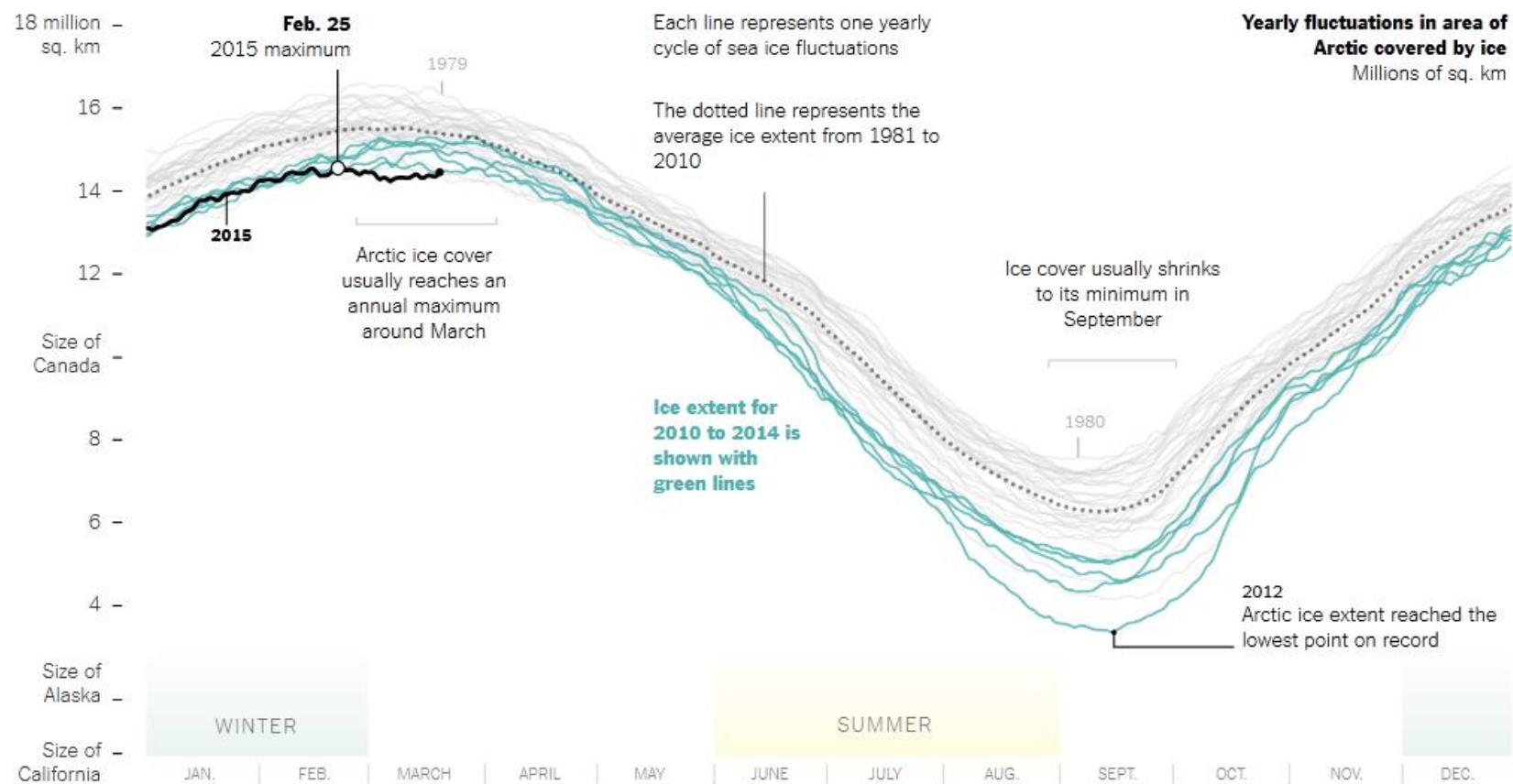
Economist.com

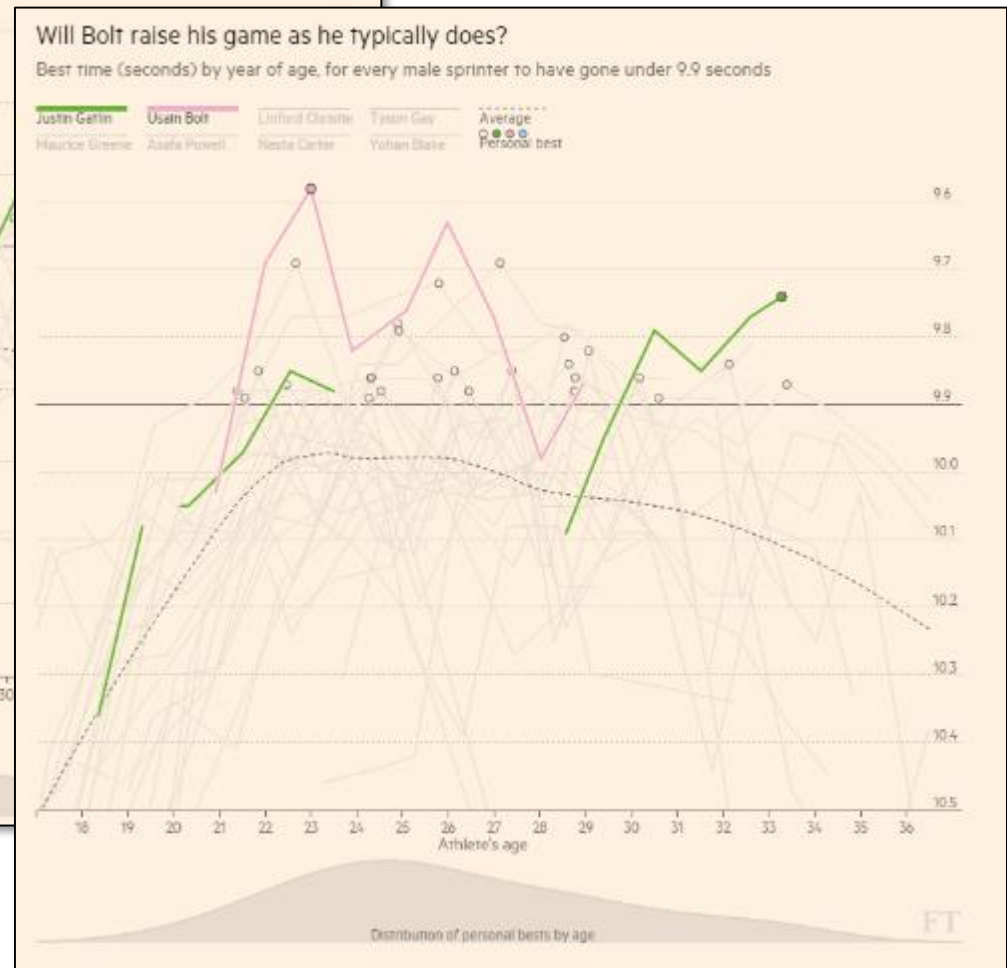
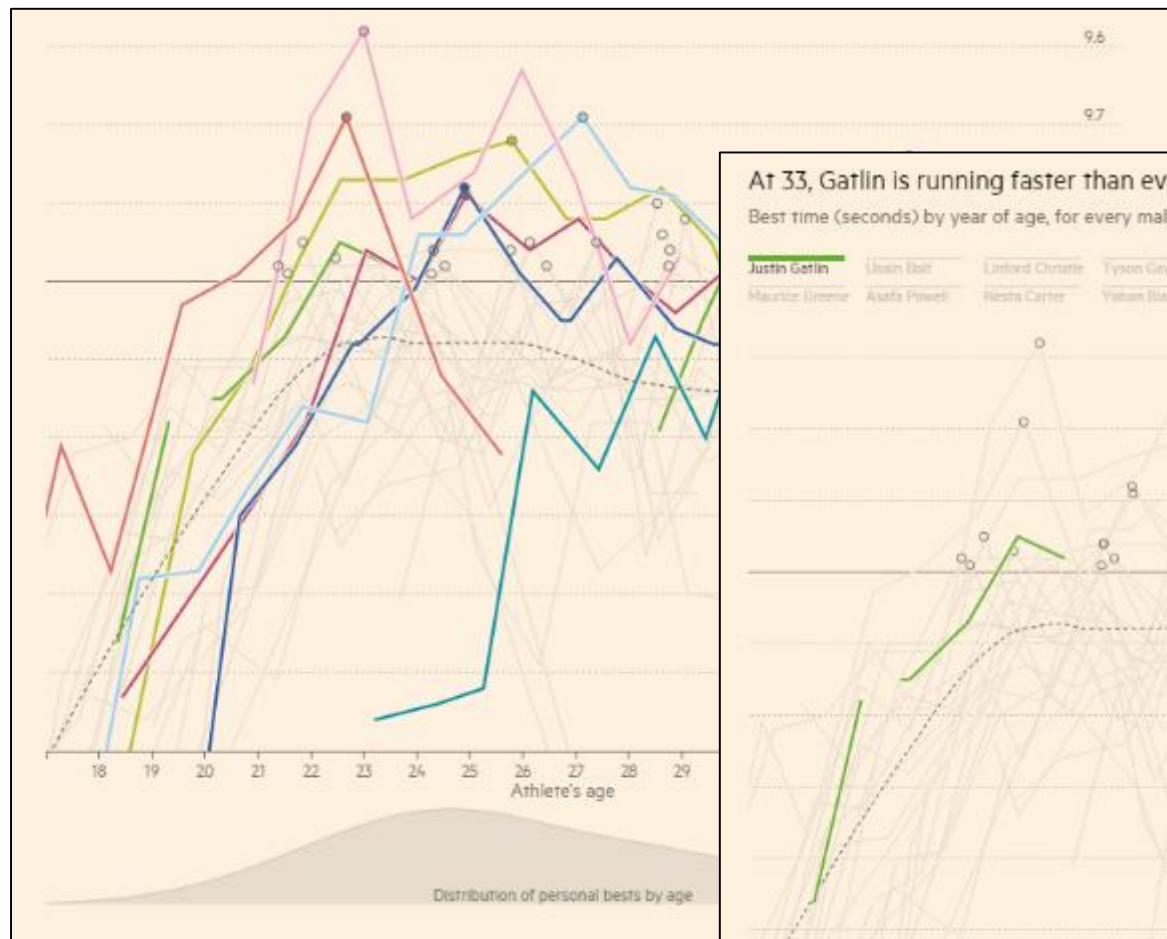
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NUMBER OF AMERICAN DEATHS CAUSED BY TERRORISM VS. GUN VIOLENCE

For every American killed by terrorism in the U.S. and around the world, more than 1,000 died from firearms inside the U.S. during the most recent decade for which comparative data is available. The gun fatalities cover all manners of death, including homicide, accident and suicide.








Data Stories
accelerate the
decision making
process.





Demo **BASF ECR** Sales & CRM Activities

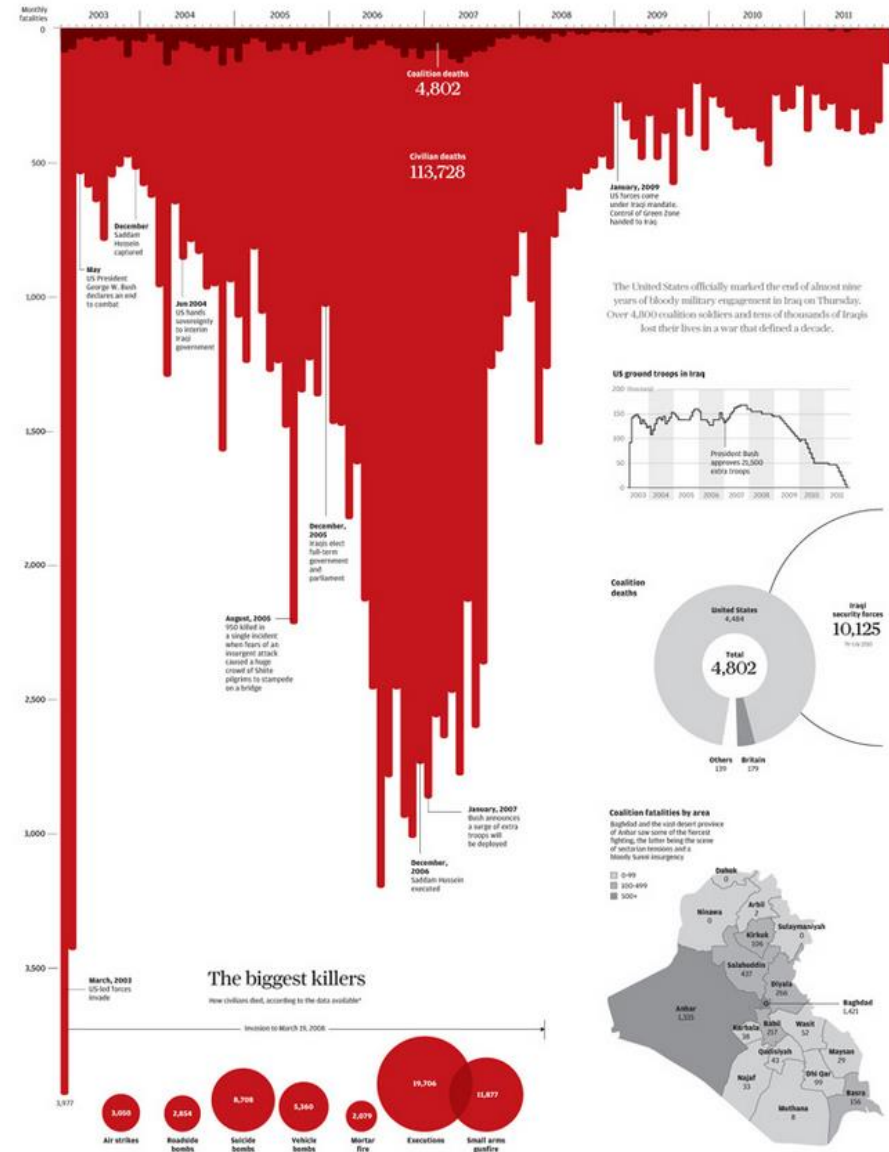


“Data visualisation is a language. It’s a means to convey an opinion, an argument.”

Kim Rees – Founding Partner, Periscopic

PERISCOPIC
DO GOOD WITH DATA

Iraq's bloody toll



Monthly	2003	2004	2005	2006	2007	2008	2009	2010	2011
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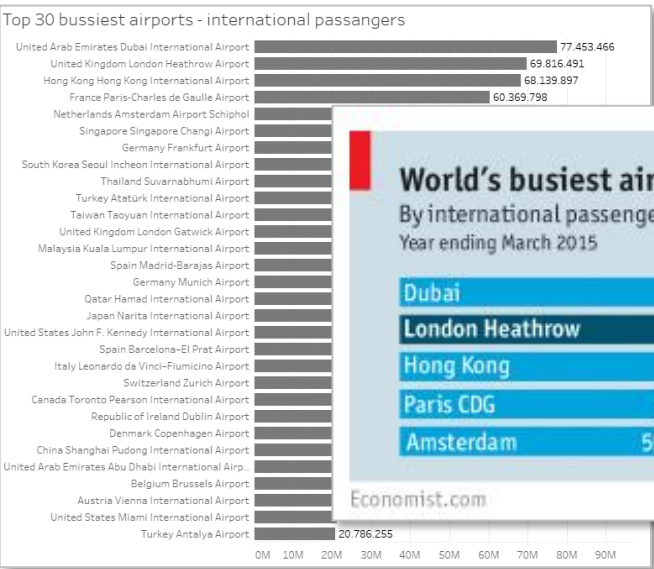


[illegible][illegible]

2015 statistics | v01

Airport-Country International | Country-Document figures are in Millions (M)

Rank	Airport	Country	Code	Total passengers	Monthly rank change	% change
1	United International Airport	United Arab Emirates	UAE	77,453,466	—	+1.7%
2	London Heathrow Airport	United Kingdom	UK	69,816,491	—	+2.2%
3	Hong Kong International Airport	Hong Kong	HK	68,139,897	—	+2.2%
4	Charles de Gaulle Airport	France	FR	60,369,798	—	+2.2%
5	Amsterdam Schiphol Airport	Netherlands	NL	55,300,000	—	+2.2%
6	Singapore Changi Airport	Singapore	SG	54,557,968	—	+2.2%
7	Frankfurt Airport	Germany	DE	52,984,554	—	+2.2%
8	Incheon International Airport	South Korea	KR	46,723,337	—	+2.2%
9	London Gatwick Airport	United Kingdom	UK	42,321,337	—	+1.7%
10	Paris Charles de Gaulle Airport	France	FR	42,321,337	—	+1.7%
11	Osaka Kansai International Airport	Japan	JP	42,321,337	—	+1.7%
12	London Luton Airport	United Kingdom	UK	42,321,337	—	+1.7%
13	London City Airport	United Kingdom	UK	42,321,337	—	+1.7%
14	London Stansted Airport	United Kingdom	UK	42,321,337	—	+1.7%
15	London Heathrow Airport	United Kingdom	UK	42,321,337	—	+1.7%
16	London Gatwick Airport	United Kingdom	UK	42,321,337	—	+1.7%
17	London Luton Airport	United Kingdom	UK	42,321,337	—	+1.7%
18	London City Airport	United Kingdom	UK	42,321,337	—	+1.7%
19	London Stansted Airport	United Kingdom	UK	42,321,337	—	+1.7%
20	London Heathrow Airport	United Kingdom	UK	42,321,337	—	+1.7%
21	London Gatwick Airport	United Kingdom	UK	42,321,337	—	+1.7%
22	London Luton Airport	United Kingdom	UK	42,321,337	—	+1.7%
23	London City Airport	United Kingdom	UK	42,321,337	—	+1.7%
24	London Stansted Airport	United Kingdom	UK	42,321,337	—	+1.7%
25	London Heathrow Airport	United Kingdom	UK	42,321,337	—	+1.7%
26	London Gatwick Airport	United Kingdom	UK	42,321,337	—	+1.7%
27	London Luton Airport	United Kingdom	UK	42,321,337	—	+1.7%
28	London City Airport	United Kingdom	UK	42,321,337	—	+1.7%
29	London Stansted Airport	United Kingdom	UK	42,321,337	—	+1.7%
30	London Heathrow Airport	United Kingdom	UK	42,321,337	—	+1.7%



data → interpretation → action

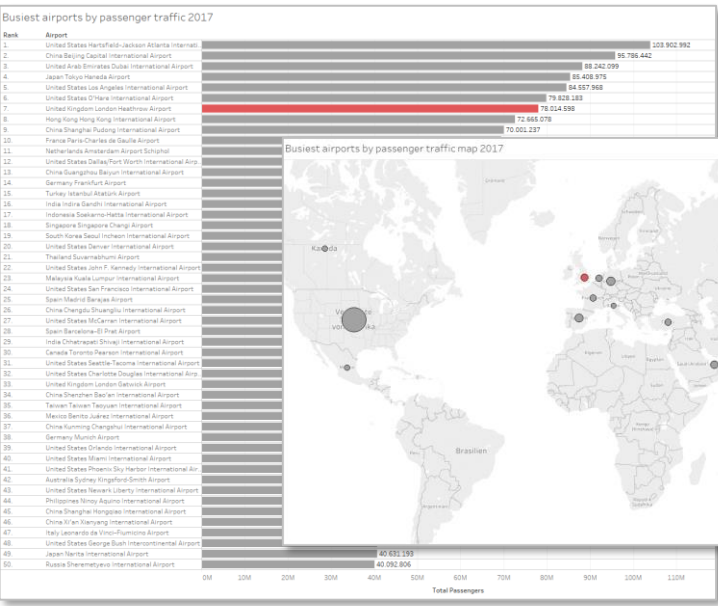
Choose Yes or No

?

Choose Yes or No

Yes

No



— Timo Tautenhahn —

Questions, comments, feelings?

ttautenhahn@tableau.com
www.tableaufans.com



DATA
ROCKSTAR

Tableau Day 22. November kuTurm Ludwigshafen

