

KNOWING YOUR AUDIENCE

Denis Kazakov

M.S. Applied Math @ CU Boulder

Data Science Intern @ Chartbeat

Because you watched New Girl



TV Mysteries



Irreverent TV Shows



PLAYLIST

Discover Weekly

Your weekly mixtape of fresh music. Enjoy new discoveries and deep cuts chosen just for you. Updated every Monday, so save your favourites!

Created by: Spotify • 30 songs, 2 hr 9 min



Discover Weekly

PAUSE

FOLLOWING

...

FOLLOW

Available Offline



SONG

ARTIST



+

Coffee

Sylvan Esso



2 days ago

+

Feelin (feat. Spinn & Taso)

DJ Rashad, Spinn, Taso

2 days ago

Your “blob” of music preferences

White line = Discover Weekly songs

Funk/soul

- > The Jackson 5
- > James Brown
- > Allen Toussaint

Indie folk/rock

- > Passion Pit
- > The Arcs
- > José González

Ref: Nikhil Sonnad

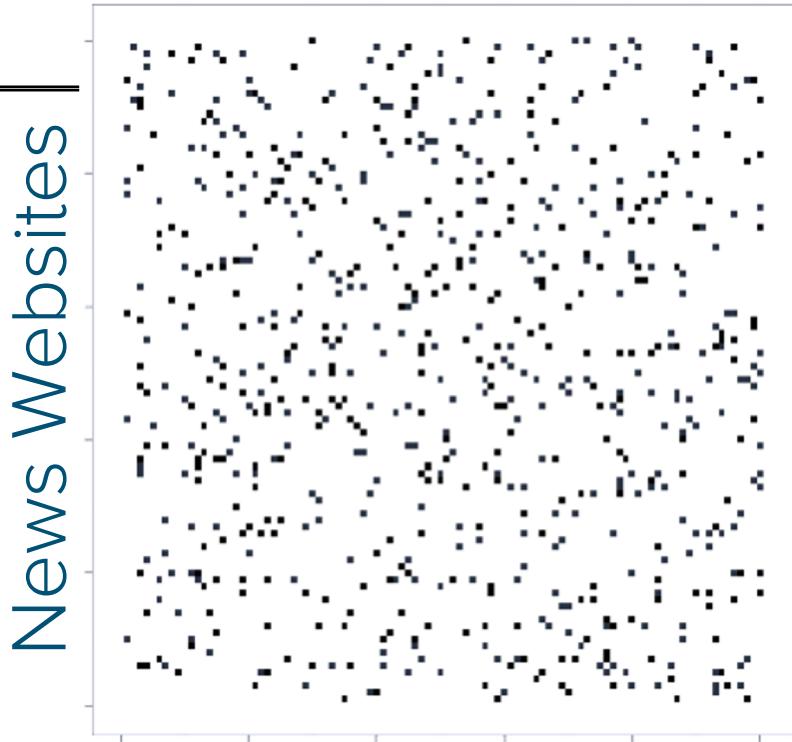
Kids' songs
(for my daughter)

- > Susie Tallman

Folk,
Singer-songwriter

- > Joni Mitchell
- > Brenton Wood
- > The Beach Boys

News Stories



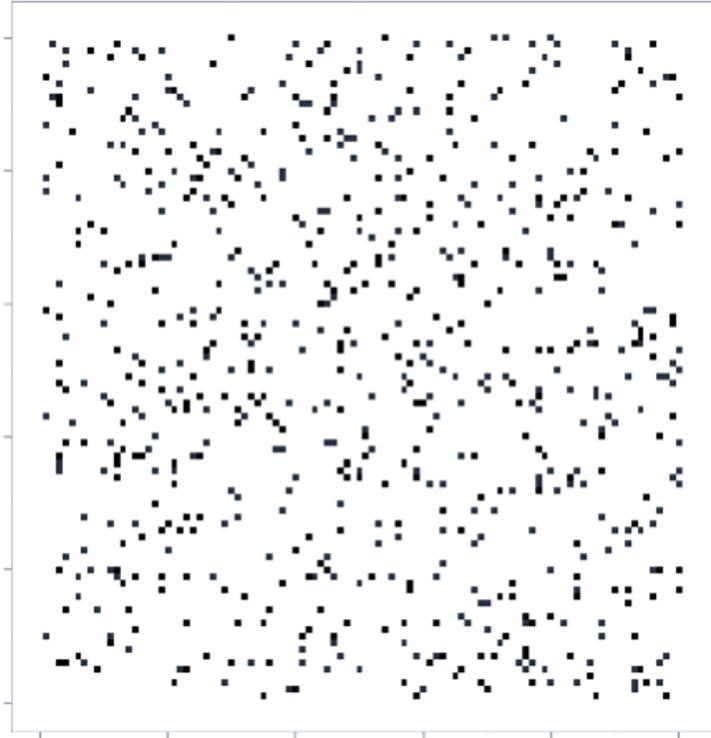
Story = {article1,
 article2,
 article3,
 ...}

*Matrix entry: # of articles posted by website to given story (implicit feedback)



News Stories

News Websites



~

News Websites

News Stories

*Matrix entry: # of articles posted by website to given story (implicit feedback)



Website vs. Story (relevance)

$$w_i \cdot s_j$$

Story vs. Story (similarity)

$$\frac{s_i \cdot s_j}{\|s_i\|^2 \|s_j\|^2}$$

Website vs. Website (similarity)

$$\frac{w_i \cdot w_j}{\|w_i\|^2 \|w_j\|^2}$$



Story vs. Story API

QUERY: Hurricanes lose Nehe Milner-Skudder for six weeks with fractured foot

id: 1422

Crusaders storm home to down Chiefs

id: 63066

Seta Tamanivalu try hands Crusaders important Super Rugby win over Highlanders

id: 11404

Hurricanes drop Julian Savea

id: 34041

Crusaders stay unbeaten after cruising past Sunwolves

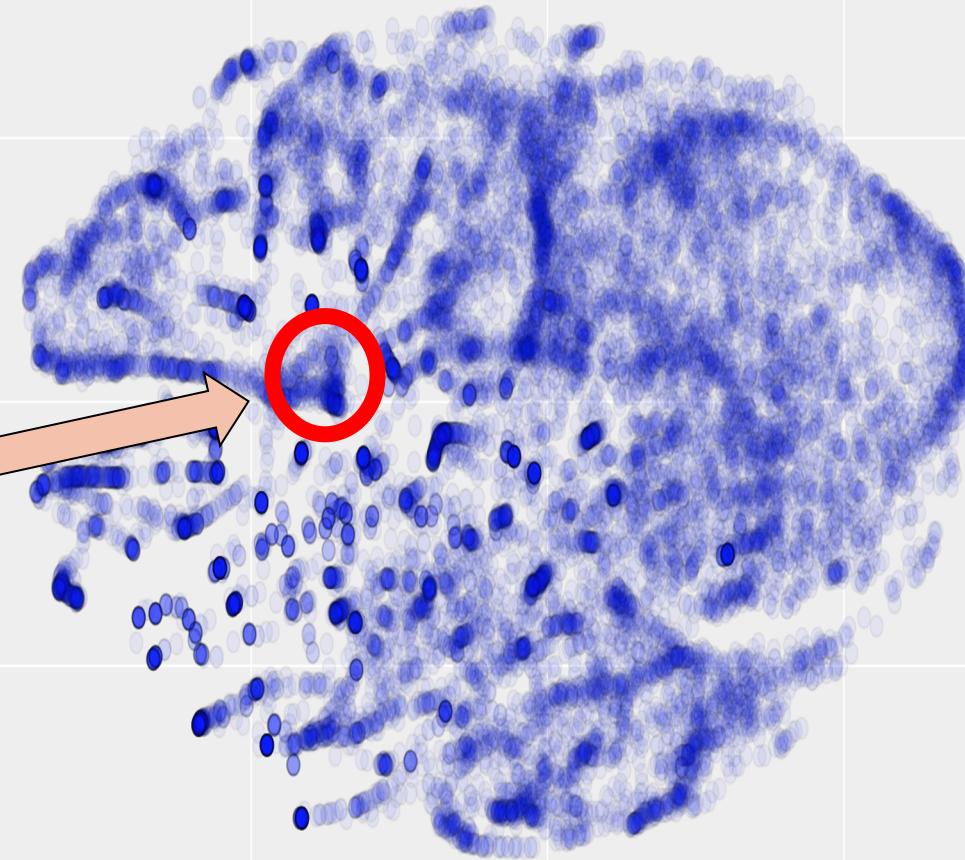
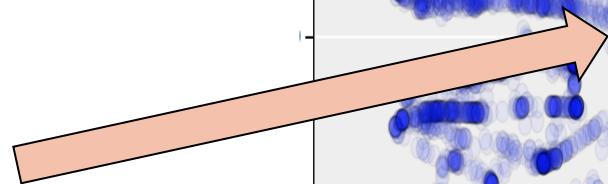
id: 61208

Waratahs v Brumbies; Super Rugby



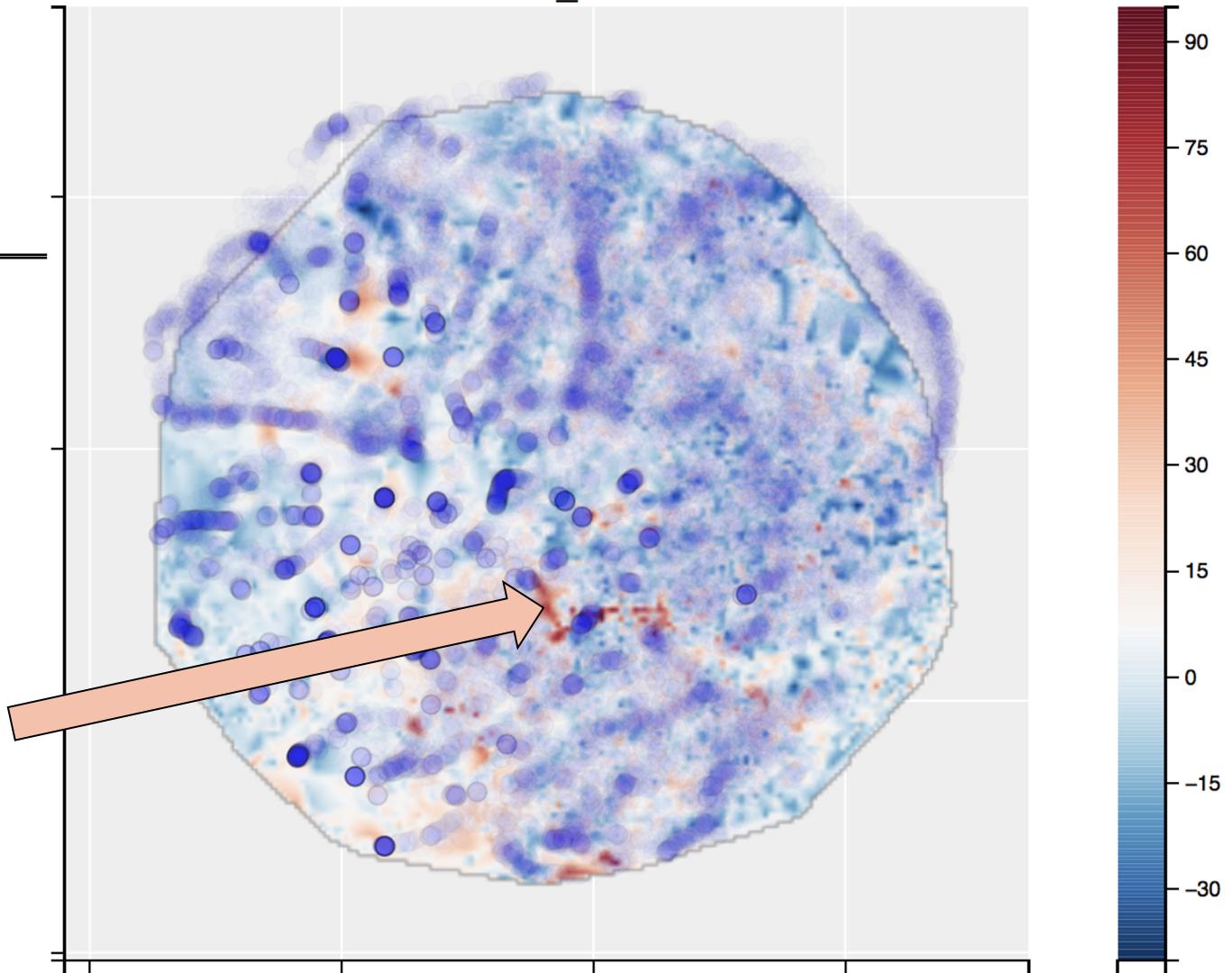
Story Space

Soccer

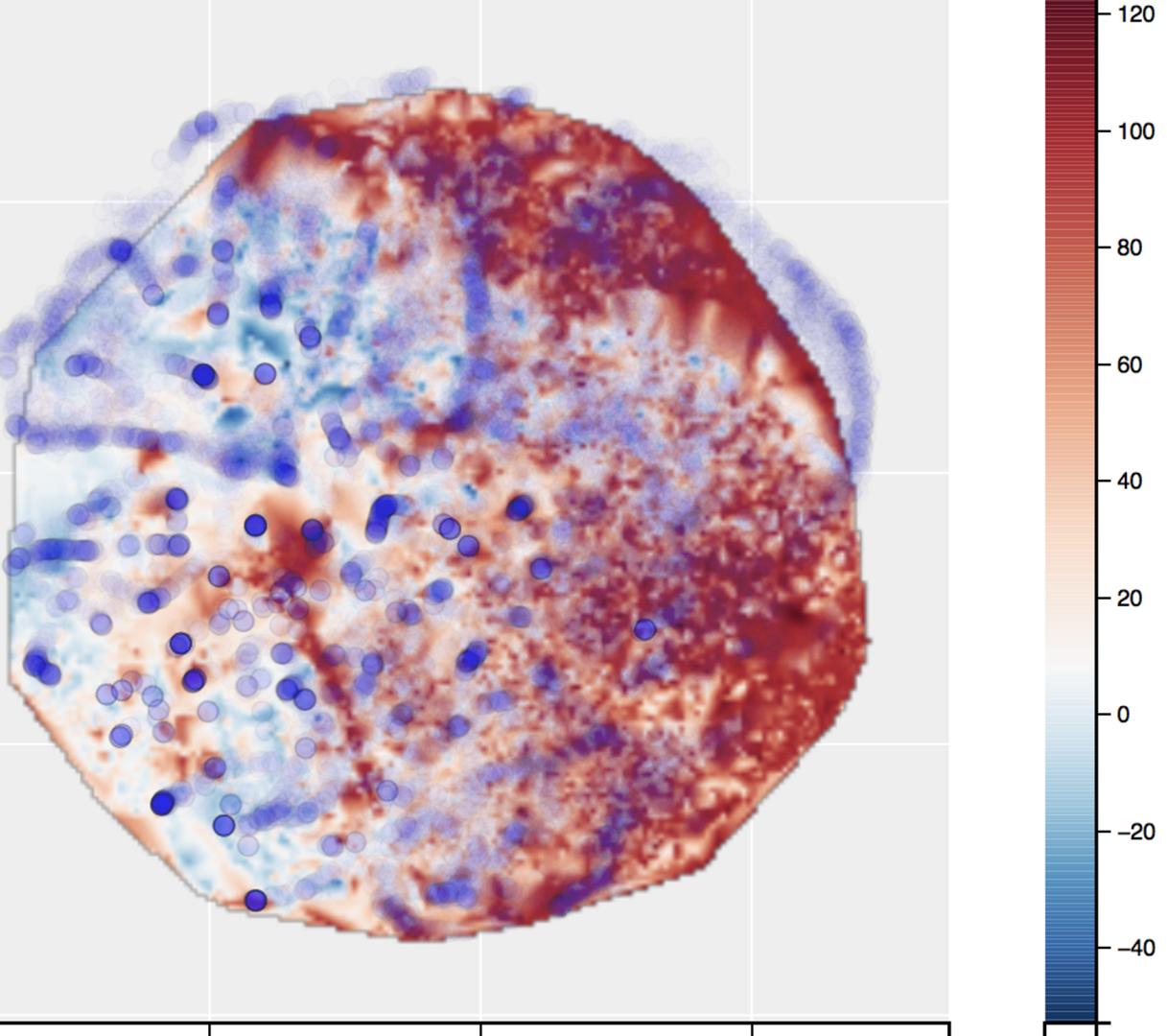


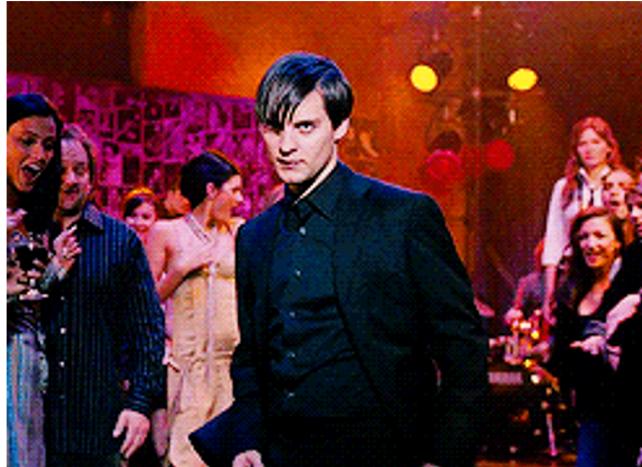
Query:
Car Website

Car related article



Query:
One of the
top breaking
news
websites





Thank you to:
Chartbeat
hackNY
NYC
U

