

The Future of Digital Humanities

B8 - Digital Humanities – WISE Fall 2019

Course schedule

Date	Topics
10/29	Introduction Definition and history of Digital Humanities
11/5	Digital Humanities and the study of literature
11/12	Digital Humanities and the study of history
11/19	Digital humanities in the study of art, music, and other disciplines
11/26	What's ahead, or why hasn't artificial intelligence been able to figure out the Finnish language yet?

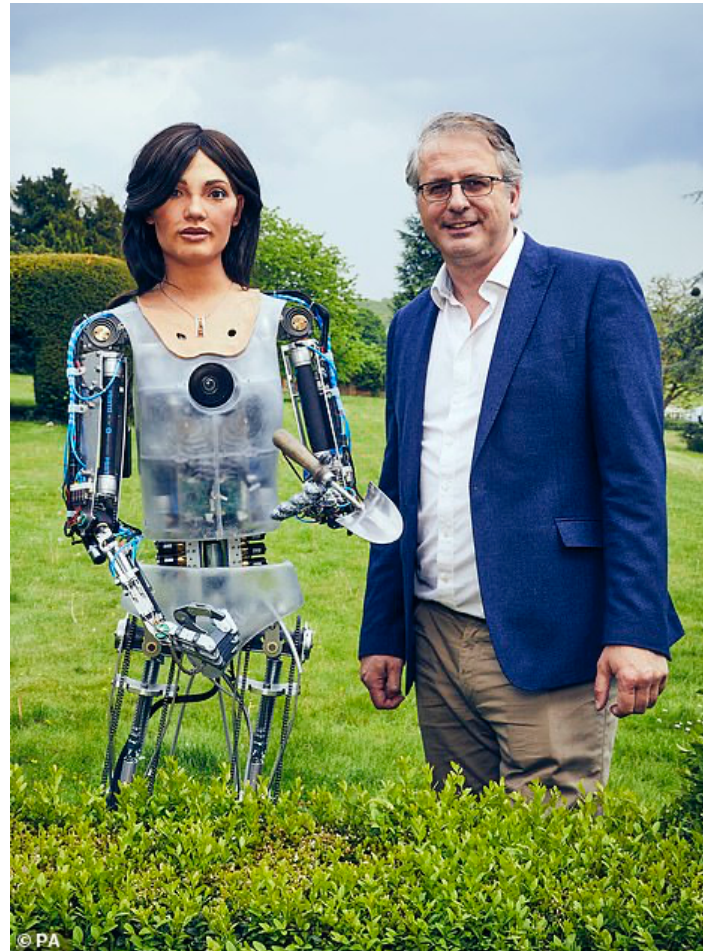
Info

- **Course materials**

- Course slides and related materials are available on <http://queenlake.com/wise/wise-fall-2019/digital-humanities/>.

- **Contact information**

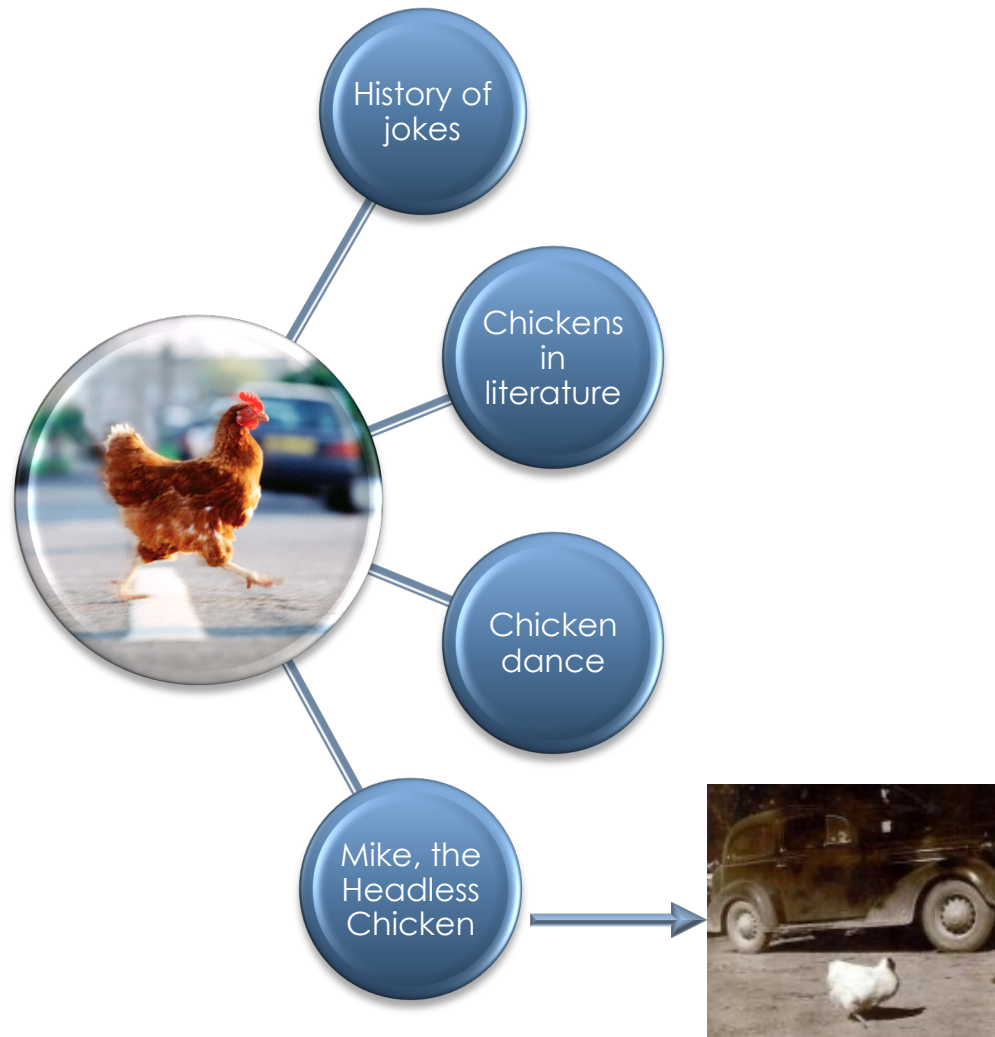
- Karl Hakkarainen
kh@queenlake.com
508 829 5825



How much computing power is required for AI-Da/

Answer: Not published

Research starts with an interesting question





Analysis

BORIS HIRES MIRROR CHICKEN AS ADVISER

BRAVE BIRD
Cain as our
chicken. Below
with Johnson



EXCLUSIVE
BY ANDY LINES and STEVE MYALL

THE Tory-baiting Mirror chicken has been hired as Boris Johnson's chief spin doctor.

Former reporter Lee Cain dressed as our bird to taunt Tories in 2010. But he is now a force in No10. One ex-colleague said: "It's hard to believe."

FULL STORY: PAGE 7

PM's aide unmasked as feathered hero who took on Tories

Communicating the results

I WANT NOTHING. I WANT NOTHING. I WANT NO QUID PRO QUO.

If you realize you have a hard time focusing and paying attention to the things that are important to you. Make a plan to get out of your head and into the environment where you live. Now. When you're ready to step in and take action.

If you need help with anxiety, I have a successful podcast with my wife Steph where we talk about anxiety, let you know if your anxiety is real and gives you tools to manage your anxiety. If you're willing

What happens when you feed Trump's "I WANT NOTHING" note to a Neural Network?

Harlemin Suom. Ev. Luth. Srk.

359 East 62nd Street

Pappila: 304 East 93rd Street, Phone ATwater 9-7733

Sunnuntaina 8 p. tammik. Jumalanpalvelus 4.30. Saarnaa pastori

ILTAJUHILA kello 7.30, ohjaa Miss Hida Myllys.

Vesper-harjoitukset kuorolla tiistaisin kello 8.30.

Hartaushetki torstaina 5 p:nä tammikuuta.

Seurakunnan vuosikokous on torstaina 12 p. tammikuuta.

Tärkeä kokous.

Jaapanin Lähetysjuhlaa vietetään 15 p:nä tammikuuta.

Seurakunnan 45-vuotisjuhlat ovat tammik. 21—22 p:nä,

alkaen lauantaina klo 8 edustajien tervehdyksillä. Sunnuntain

Juhlajumalanpalvelus Pietarin Luth. kirkossa. Saarnaa past. R

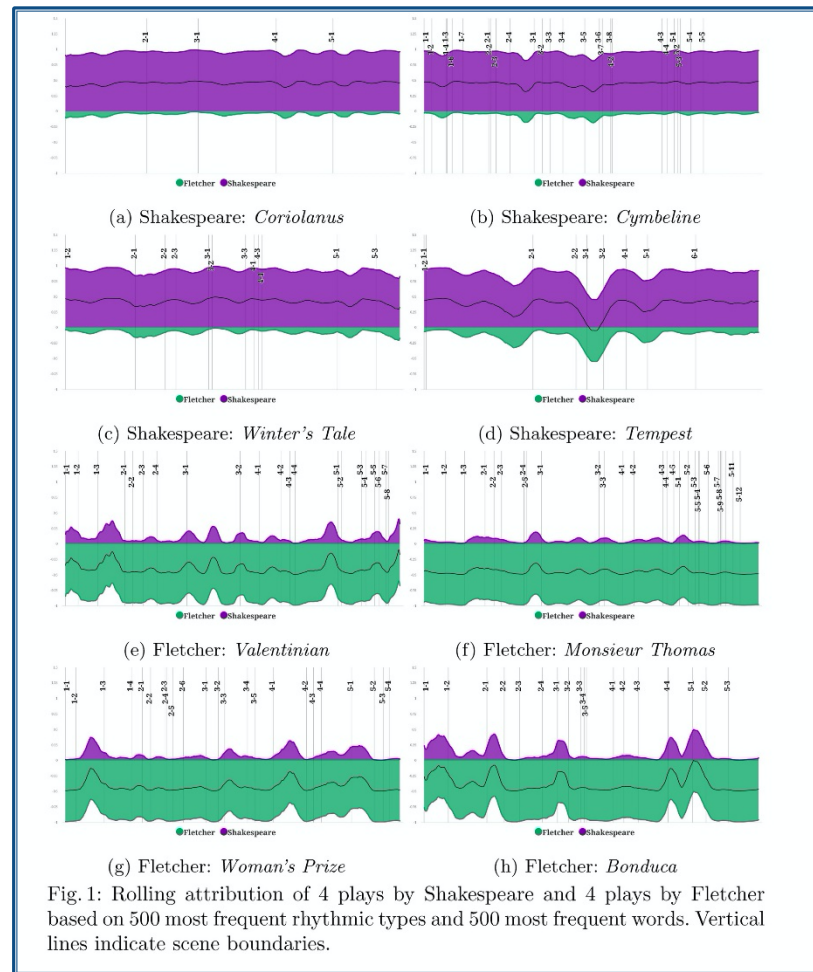
Wargelin. Vesper-esitys illalla.

Arvi Henry Saarisuu.

Who knew? – ad in Raiivaaja, January 3, 1955

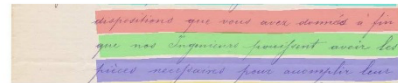
When Harlem was Manhattan's "Finntown"





Who wrote Henry VIII?

Relative contributions of Shakespeare and Fletcher in Henry VIII



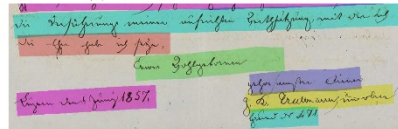
dispositions que vous avez données à fin
que nos Ingenieurs puissent avoir les
pièces necessaires pour accomplir leur

(a) No errors



eindringlichsten Zureden für jezige angesprochene
Hilfe, auch deutlich auf die Verpflichtung dessin's
hinzuweisen, die der Gotthardkomite schuldig.
Anerkennung für die so volle Aufnahme & Wohl

(b) Noisy lines, few transcription errors



die Versicherung meiner aufrichten Werthschätzung, mit der ich
die Ehre habe ich setze,
Huertn Wohlgebornen
gehorsamster Sinner
J. K. Truttmann, in oben
Grund No 471.
Luzern den 1 Juny 1857.

(c) Complex layout, few transcription errors



der mehrerwähnten Stelle Ihres Buches zu Haun.
de liegen, zukommen lassen zu wollen &
Wenn ich Sie im fernern ersuchen muß, die-
ser gefälligst mit möglichster Beförderung

(d) Noisy lines, LF error. IWR stopped reading after the error.

Fig. 9: Results from the ICDAR 2017 competition dataset. Colored lines represent different detected lines. Green, red, and purple characters represent insertion, substitution, and omission errors respectively.

Machine Learning for 600-year-old handwriting

Start, Follow, Read: End-to-End Full-Page Handwriting Recognition – BYU and Adobe Research

OBITUARIES

BENJAMIN RAY CHILDRESS

Liberty, SC. Benjamin Ray Childress, Sr., 92, of Route 1, Liberty, husband of Mrs. Florence Hendricks Childress, died 4:50 A.M., Monday, February 26, 1990 at Oakmont Nursing Center, East in Greenville after a short illness.

Mr. Childress was born in Pickens County, a son of the late Robert A. and Sarah Griffin Childress. He was a retired farmer and school teacher, having served as principal and trustee of several Pickens County Schools. Mr. Childress was active in the Pickens County ASC and the Pickens County Farm Bureau. He was a director of the Southside Water District and was a veteran of the U. S. Army, having served in France during World War I. Mr. Childress was a member of Flat Rock Baptist Church where he had served as a deacon and Sunday School teacher for over 50 years.

Surviving are his wife, Mrs. Florence Hendricks Childress of the home; 3 sons, Ben R. Childress, Jr. and Robert H. Childress, both of Easley and William Edwin Childress of Raleigh, N.C.; 2 daughters, Mrs. Colleen Pettit of Liberty and Mrs. Lida Finley of Easley; 12 grandchildren and 16 great-grandchildren. Mr. Childress was the last member of his immediate family.

Funeral services will be 11 AM Wednesday, February 28th, at Flat Rock Baptist Church by the Reverend John Tollison, the Reverend Marvin Murphree and the Reverend Grady Tollison. Burial will be at Hillcrest Memorial Park.

Active pallbearers will be the grandchildren. Honorary escort will be the Opportunity Class and the Young Adult Training Union Class of Flat Rock Baptist Church.

The body is at Robinson Funeral Home in Easley and will be placed in the church 10:30 AM Wednesday.

The family is at the home.

In lieu of flowers, memorials may be made to the Baptist Foundation, C/O Flat Rock Baptist Church, 115 Slab Bridge Road, Liberty, S.C. 29657.

ROBINSON FUNERAL HOME,
Easley

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ROBINSON FUNERAL HOME,
Easley

Name, age, address

Date of death

Place of birth

Occupation

Military service

Membership

Occupation

Names of sons

Married names of daughters

Grandchildren

Great-grandchildren

Cemetery

Photo

Funeral home

Important document, an obituary discovering your family include places of birth, place, and family members, site location.

ated artificial intelligence using the new collection and announcing an Collection, adding to what is chable digital archive of obituaries and death almost 1 billion searchable on of digitized obituary fill in the gaps of an have been lost.

Ancestry Taps AI to Sift Through Millions of Obituaries

262M obituaries with more than 1B names

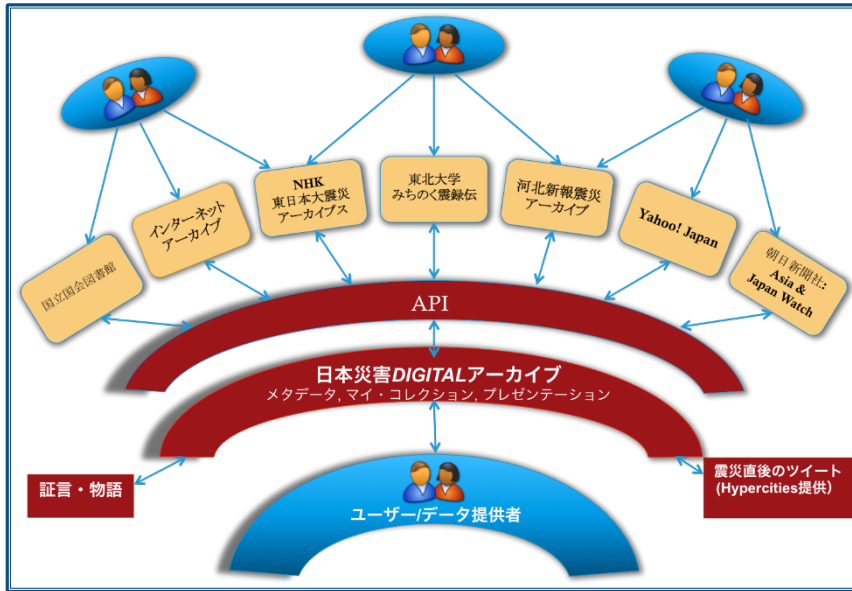


Linking Art through Human Poses

From Titian's Salome to Vecellio Tiziano, Portrait of a young woman with a casket

Using DH in times of crisis

Japan Disasters Archive



Puerto Rico Mapathon

Columbia's Group for Experimental Methods in the Humanities & Columbia University Libraries ask you to join us for

Puerto Rico Mapathon for Hurricane Relief

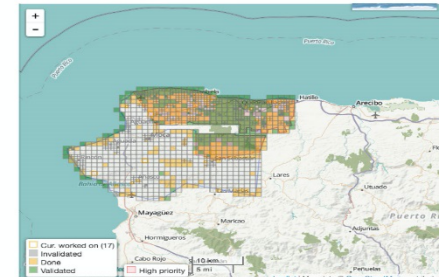
September 29, 2017 | 2PM-5PM | Studio@Butler (208B)

Come help with relief efforts on the ground in Puerto Rico by contributing your time to open-source mapping.

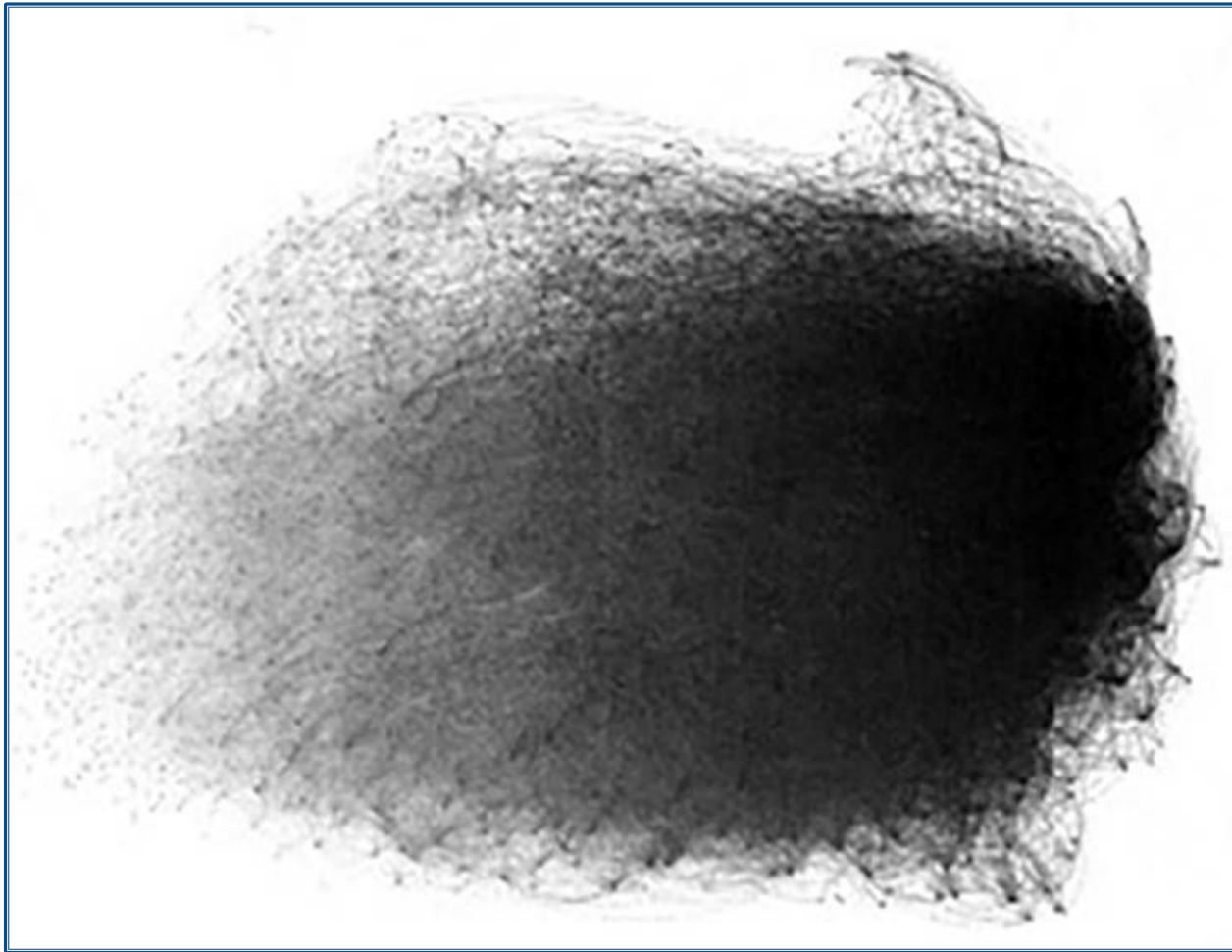
Following the recent hurricane, people around the world are using the OpenStreetMap platform to give their time to hurricane relief efforts. The Red Cross in Puerto Rico has requested two tasks we can help with for their relief efforts. During the mapathon, we will teach people how to help with these efforts through mapping, and we will map together.

No mapping experience necessary. No knowledge of local terrain is necessary. Come any time during the afternoon.

Please bring your laptop & RSVP to agil@columbia.edu



Digital Humanities - What's Ahead



The Case Against Computational Literary Studies

Nineteenth-century Novel Network with Date Shading, from Matthew Jockers, *Macroanalysis: Digital Methods and Literary History* (Urbana, Ill., 2013), p. 165.“

DhṣBṖ / anigayvli / elders

ḐZṖṢ / kanoheda / also ḐZṖḐ / kanohedi / things that have been told

ḐhḐḐR / nuniwesv / what they said

ḐhḐVḐḐ / unigidosanv / what they knew

ḐhRṣḐḐT / unisvgatlanvi / they held onto it in their mind

SḐSḐḐ / dunedeyonv / they taught

ShḐR / duniyosv / they let go of it

ḐḐḐḐ / unutedi / they picked it up

Whose data are these?

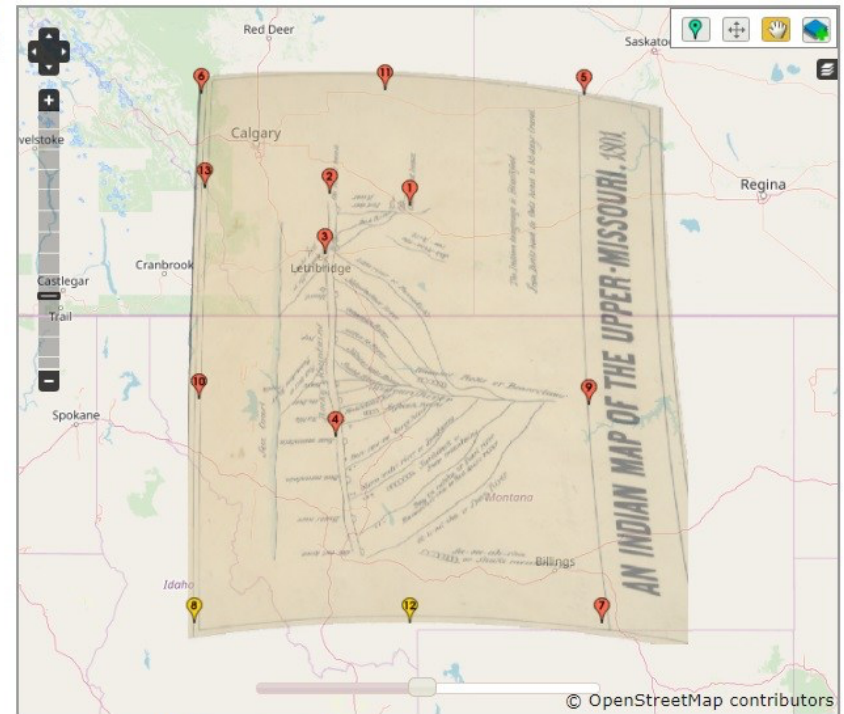
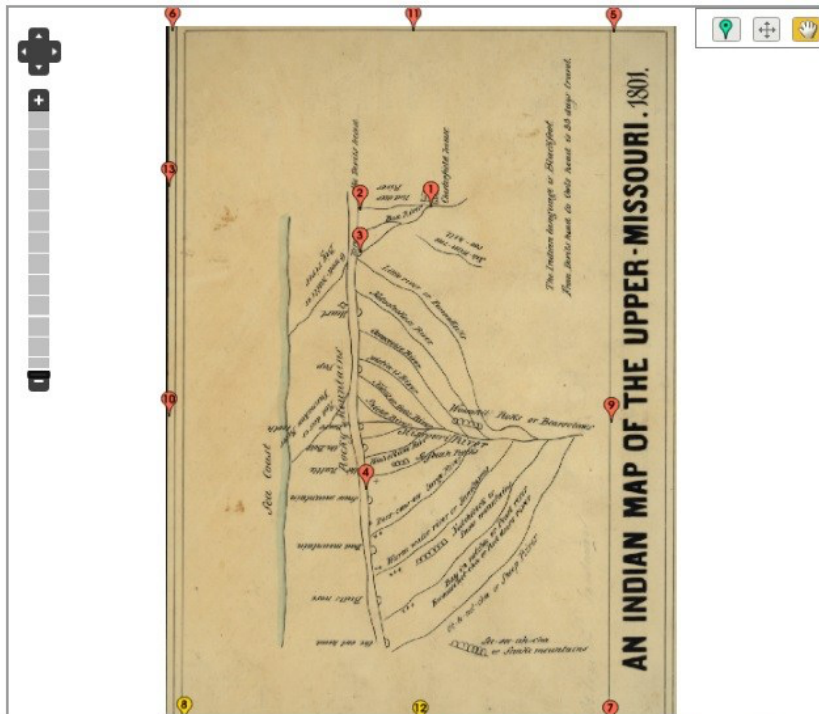
Wampum, Sequoyan, and Story: Decolonizing the Digital Archive



Passamaquoddy People

Including Audio recordings made during Jesse Walter Fewkes' research trip to Maine in March of 1890

Show Edit Rectify Crop Align Preview Export Metadata Activity Comments (0)



Double-click on both maps, then click **Add Control Point**. Do this for at least three points.

Control Panel

The Geospatial West: Georectifying Historical Native American Space

Humans still needed

Prisoners to train artificial intelligence as part of developing work activities

Prisoners Rescuing Prisoners:
Indexing at Utah State Prison





What you see ain't always what's there

Varying the number of frames

Training frames:



Face landmarks



1-shot result



8-shot result



32-shot result

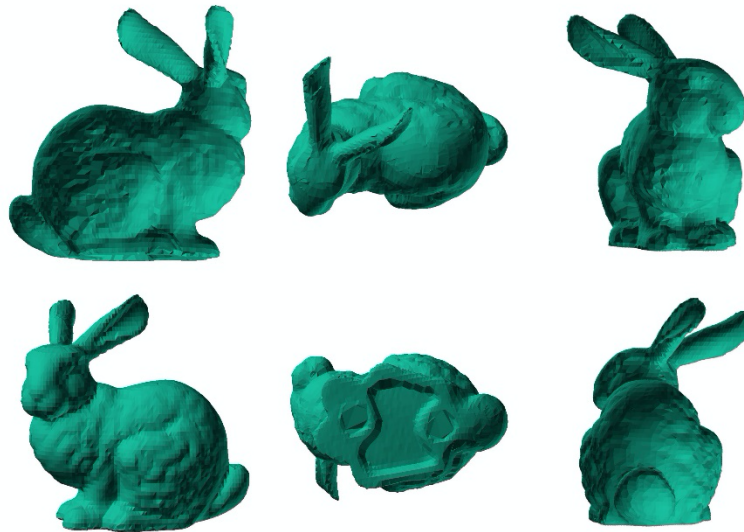
Few-Shot Adversarial Learning of Realistic Neural Talking Head Models

Report

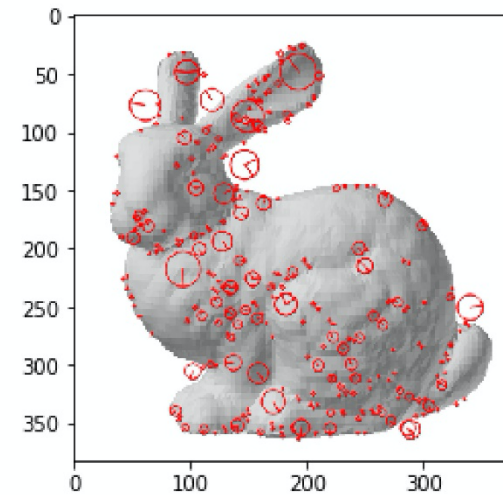


Famously Dead Actor James Dean to Star in Upcoming War Drama

Does RIP mean resurrected individual performance?



(a) 6-view document representation of Stanford Bunny.



(b) SIFT key points (in red) identified in the front view of Stanford Bunny

Figure 2: Retrieval based on the document representation images of the Stanford Bunny. The SIFT key points are generated for the document representation images and collected as a visual bag-of-words.

Searching Document Repositories using 3D Model Reconstruction



Google Earth gets content creation tools for geography-focused presentations

In short, explaining is a social act that has social motives and is performed according to rules and norms that serve social purposes. What counts as an explanation depends on why we're asking, and what counts as a satisfactory explanation depends on the domain we're in: doing fundamental physics research, investigating an air crash, or trying to learn from a fallen soufflé.

A.I. may not have to and may not be able to explain itself to us.

Everyday Chaos: Technology, Complexity, and How We're Thriving in a New World of Possibility

So my Swedish teacher showed the class this conversation from the internet. Apparently it demonstrates how easy it is to learn Swedish. I'm Finnish. 😊

English: A dog.
Swedish: What?
English: The dog.
English: Two dogs.
Swedish: Okay. We have: En hund, hunden, Två hundar, hundarna.
German: Wait, I wan't to try it too!
English: No, go away.
Swedish: No one invited you.
German: Der Hund.
English: I said go away.
German: Ein Hund, zwei Hunde.
Swedish: Stop it!
German: Den Hund, einen Hund, dem Hund, einem Hund, des Hundes, eines Hundes, den Hunden, der Hunden.
Finnish: Sup.
English: NO.
Swedish: NO.
German: NO. Finn, you go away!!
Finnish: Koira, koiran, koiraa, koiran again, koirassa, koirasta, koiraan, koiralla, koiralta, koiralle, koirana, koiraksi, koiratta, koirineen, koirin.
German: WHAT?
Swedish: You must be kidding us!
English: This must be a joke...
Finnish: Aaaand... koirasi, koirani, koiransa, koiramme, koiranne, koiraan, koiraa, koiransa, koiramme, koiranne, koirassani, koirassasi, koirassansa, koirassamme, koirassanne, koirastani, koirastasi, koirastansa, koirastamme, koirastanne, koirallani, koirallasi, koirallansa, koirallamme, koirallanne, koiranani, koiranasi, koiranansa, koiranamme, koiranne, koirakseni, koiraksesi, koiraksensa, koiraksemme, koiraksenne, koirattani, koirattasi, koirattansa, koirattamme, koirattanne, koirineni, koirinesi, koirinensa, koirinemme, koirinenne.
English: Those are words for a dog???

Finnish: Wait! I didn't stop yet. There is still: koirakaan, koirankaan, koirakaan, koirassakaan, koirastakaan, koirankaan, koirallakaan, koiraltakaan, koirallekaan, koiranakaan, koiraksikaan, koirattakaan, koirineenkaan, koirinka, koirako, koiranko, koirako, koirassako, koirastako, koiranko, koirallako, koiraltako, koiralleko, koiranako, koiraksiko, koirattako, koirineenko, koirinko, koirasikaan, koiranikaan, koiransakaan, koirammekaan, koirannekaan, koiraanikaan, koirasikaan, koiransakaan, koirammekaan, koirannekaan, koirassanikaan, koirassasikaan, koirassansakaan, koirassammekaan, koirassannekaan, koirastanikaan, koirastansakaan, koirastammekaan, koirastannekaan, koirallanikaan, koirallasikaan, koirallansakaan, koirallammekaan, koirallannekaan, koirananikaan, koiranasikaan, koiranansakaan, koiranammekaan, koirannekaan, koiraksenikaan, koiraksesikaan, koiraksensakaan, koiraksemmekaan, koiraksennekaan, koirattanikaan, koirattasikaan, koirattansakaan, koirattammekaan, koirattannekaan, koirinenikaan, koirinesikaan, koirinensakaan, koirinemmekaan, koirinennekaan, koirasiko, koiraniko, koiransako, koirammeko, koiranneko, koiraaniko, koirasiko, koiransako, koirammeko, koiranneko, koirassaniko, koirassasiko, koirassansako, koirassammeko, koirassanneko, koirastaniko, koirastasiko, koirastansako, koirastammeko, koirastanneko, koirallaniko, koirallasiko, koirallansako, koirallammeko, koirallanneko, koirananiko, koiranasiko, koiranansako, koiranammeko, koiranneko, koirakseniko, koiraksensako, koiraksemmeko, koiraksenneko, koirattaniko, koirattasiko, koirattansako, koirattammeko, koirattanneko, koirineniko, koirinesiko, koirinensako, koirinemmeko, koirinenneko, koirasikaanko, koiranikaanko, koiransakaanko, koirammekaanko, koirannekaanko, koiraanikaanko, koirasikaanko, koiransakaanko, koirammekaanko, koirannekaanko, koirassanikaanko, koirassasikaanko, koirassansakaanko, koirassammekaanko, koirassannekaanko, koirastanikaanko, koirastasikaanko, koirastansakaanko, koirastammekaanko, koirastannekaanko, koirallanikaanko, koirallasikaanko, koirallansakaanko, koirallammekaanko, koirallannekaanko, koirananikaanko, koiranasikaanko, koiranansakaanko, koiranammekaanko, koirannekaanko, koiraksenikaanko, koiraksesikaanko, koiraksensakaanko, koiraksemmekaa

So... 😊 I'm glad that I don't have to learn Finnish from books myself. I'm not really sure how some of those last ones work though... Maybe they are usable but then it gets quite hard to understand.

English, Swedish, German and Finnish decline "dog"



front*.ai*



Automatic Semantic Understanding

Context meets context »
Knowing what is important when

- ▶ Handles multiple intents
- ▶ Eliminates false positives
- ▶ Understands complexity

front.ai

Making easy work of decoding complex languages with conversational AI



The future of work in academia

The Invisible Work of the Digital Humanities Lab: Preparing Graduate Students for Emergent Intellectual and Professional Work



Enabling innovative research with British Library digital collections



Minecraft: Education Edition

Explore AI in New Minecraft Hour of Code



Where do we go from here?

Learn more: Harvard's free, online [Introduction to Digital Humanities](#)



This AI-generated sculpture is made from the shredded remains of the computer that designed it

