Institut für Kartographie und Geoinformatik | Leibniz Universität Hannover

# Towards an Analysis of Toponym Endings

Tobias Dahinden

Leibniz Universität Hannover

# Once upon a time ...

Source: Wikipedia

# Names of places where I was born

- 20 Communities:
- Seelisberg, Bauen, Isental, Seedorf, Flüelen, Sisikon, Altdorf, Schattdorf, Attinghausen, Bürglen, Spirigen, Unterschächen, Erstfeld, Silenen, Gurtnellen, Wassen, Göschenen, Andermatt, Hospental, Realp

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# My teacher told me

- „Typically, the names in our region end on –*ingen*“

# Let's count!

- 20 Communities:
- Seelisberg, Bauen, Isental, Seedorf, Flüelen, Sisikon, Altdorf, Schattdorf, Attinghausen, Bürglen, Spirigen, Unterschächen, Erstfeld, Silenen, Gurtnellen, Wassen, Göschenen, Andermatt, Hospental, Realp

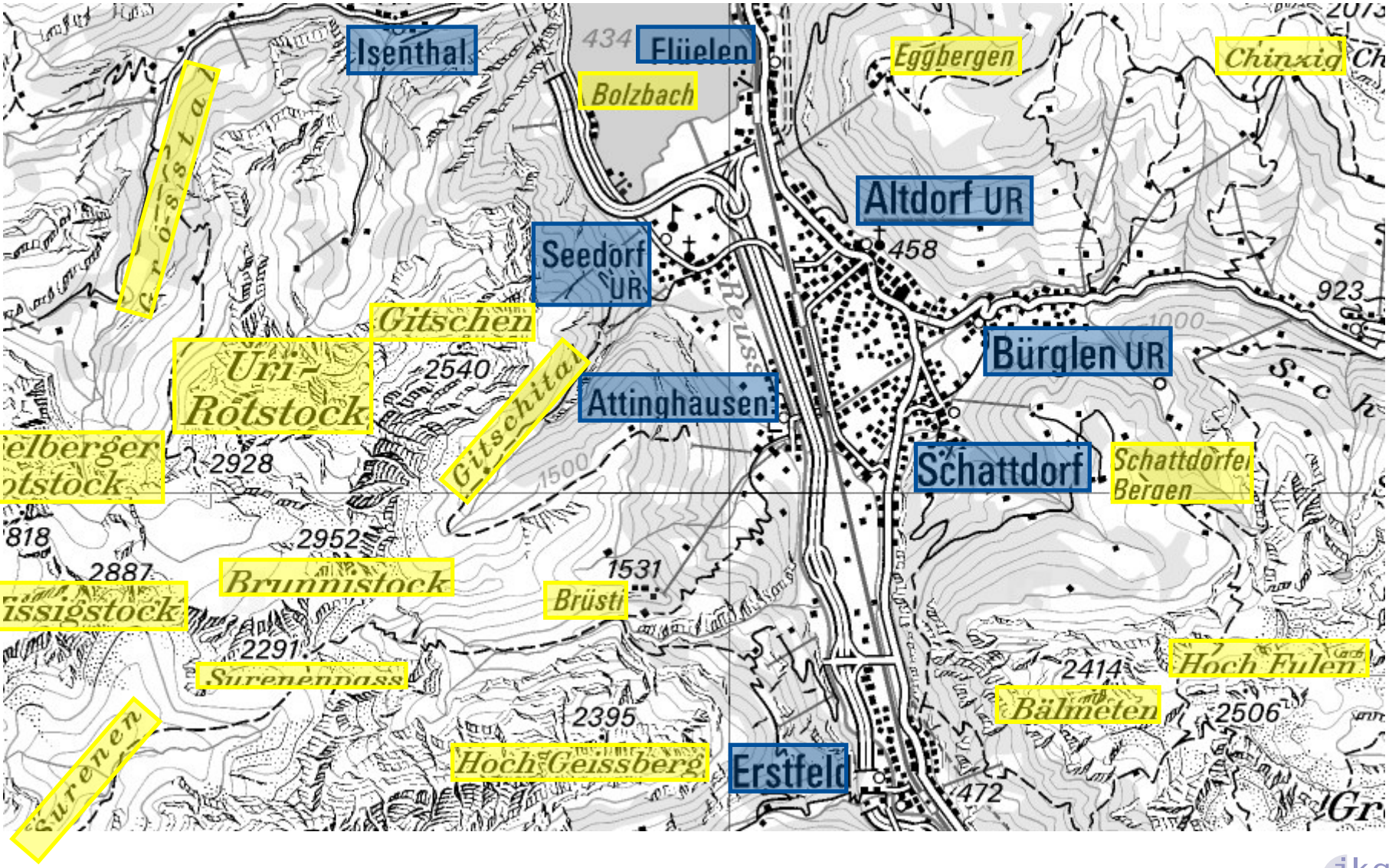
- 3x dorf (village?)
- 2x tal (valley?)
- 3x len
- 2x sen
- …
- no *ingen*

# Hm… Did I use the right ending?

- 20 Communities:
- Seelisberg, Bauen, Isental, Seedorf, Flüelen, Sisikon, Altdorf, Schattdorf, Attinghausen, Bürglen, Spiringen, Unterschächen, Erstfeld, Silenen, Gurtnellen, Wassen, Göschenen, Andermatt, Hospental, Realp

- 2x tdorf
- 2x ental
- 10x en

# Did I look close enough?



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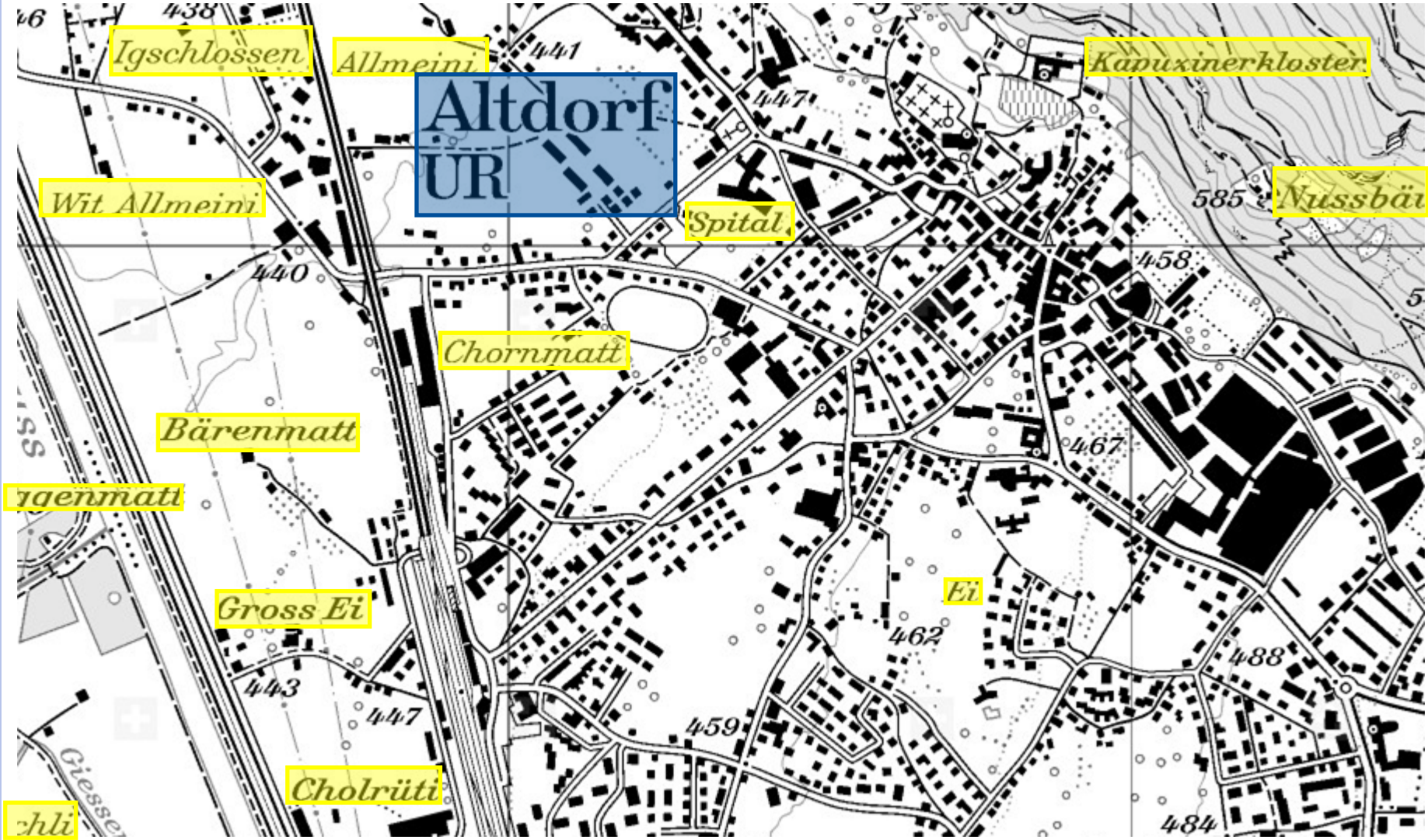


# Today: Questions that arise

- What is an ending of a place name?
- Are there are reliable gazetteers for place names?
- Are there certain endings dominating in a certain region?
- Do common endings appear in other languages?

# Definition of endings

# Definition of endings

- Language science
  - Ethymologic
  - Historical sources
  - Possible meaning
  - Simplex vs. Composita
    - Diminutive (e.g. -i, -li)
    - Possible meaning (e.g. –reuth, -rode)
      - Beware of false friends
- Research only for restricted areas
  - Because this is really hard work

# Definition of endings

- Attempt for a statistical definition
  - An end-string that appears more often than other end-strings
  - BUT: the occurrence of sub-strings depends on its length
    - E.g. #(rg) ≥ #(erg)

# Definition of endings

- Idea: Adding a letter (*c*) to an end-string (*s*)
  - systematic or random?
  - *#(c+s)/#s = R*
  - The number of longer end-strings divided by the number of the shorter end-strings
- Chance of being an end-string C
  - Sum of R divided by the length of the string

# Definition of endings

- Note:
  - Ranking of end-strings
    - Always a result
    - Salience of endings
    - Number of endings is less relevant
  - Digraph should be taken into account
  - No etymology
  - “Rather naive approach”

# Gazetteers

# Special Gazetteers (examples)

- BKG: Geographische Namen (GN250)
  - Density ~0.3 names / km²
  - For Germany only
- Projects on vernacular names
  - Only place names; based on specific research
  - Density ~20 names / km²
  - For small areas only

Links

(Stand 02/2012)

Flurnamenprojekte im deutschsprachigen Raum:

- Digitales Flurnamenlexikon Rheinland-Pfalz
- Westfälischer Flurnamenatlas
- Mittelhessisches Flurnamenbuch
- Hessisches Flurnamenarchiv
- Das hessische Flurnamenarchiv als Organisationsrahmen für Projekte
- Vom Nachschlage- zum Abfragenamenbuch. Konzeption eines Internetbasierten Flurnamen-Informationssystems (IFLIS)
- Archiv der Siedlungs- und Flurnamen des Saarlandes und des germanophonen Lothringen
- Südwestdeutscher Sprachatlas
- Mecklenburgisches Flurnamenarchiv
- Flurnamenerhebung in Südtirol
- Liechtensteiner Namenbuch
- Oberwalliser Orts- und Flurnamenbuch
- Pilotprojekt zur Flurnamenerhebung der Universität Klagenfurt und der Hauptschule Winklern im Nationalpark Hohe Tauern, Kärnten

# Gazetteers for the whole world (example)

- Wikipedia World
  - Density for Germany ~0.8 entities / km²
  - Monuments, landmarks, ...: mixed
- Geonames
  - Density for Germany ~0.5 names / km²
  - Reviewed; information about feature type

# Salient endings

# Region: DE, CH and AT

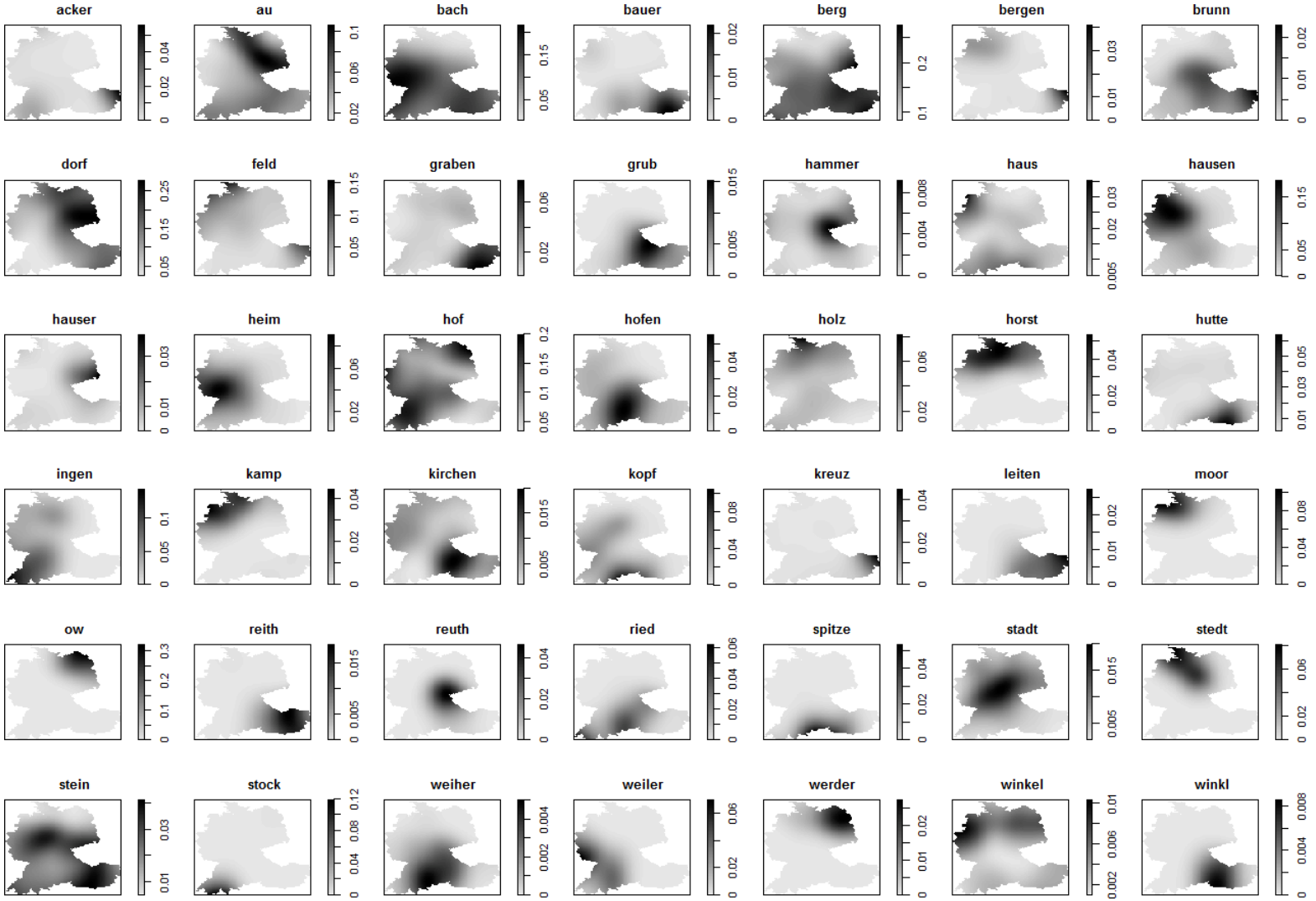
- Ranking: *berg, spitze, hausen, dorf, weiler, kreuz, graben, heim, weiher, kamp, hauser, bach, grub, elberg, stein, reuth, schlag, winkl, acker, holz, chberg, scheid, hammer, feld, neuhof, werder, brunn, nsdorf, hofen, stedt, kopf, reith, stadt, ndberg, winkel, tzberg, haus, horst, rnberg, ingen, hof, bauer, stock, onberg, leiten, ried, au, msdorf, nsberg, bergen, gsdorf, ow, hutte, eldorf, moor, ssberg, strass, garten, isberg, undorf, storf, indorf, tsberg, trup, itz, dsberg, amberg, wiesen, hlberg, spitz, krug, heide, bruck, moos, holzen, lsheim, brink, llberg, steig, itze, burg, schach, grund, berge, muhle, aubach, koog, kogel, elbach, schutz, usen, wald, chholz, bronn, sgrun, en, kanal, hagen, hardt, grat, statt, chfeld, reute, heid, tzbach, hofe, reit, iler, hlag, thal, er, buhel, muhlen, lehen, wiese, felden, halden, inbach, …*

# Region: DE, CH and AT

- Ranking: *berg, spitze, hausen, dorf, weiler, kreuz, graben, heim, weiher, kamp, hauser, bach, grub, elberg, stein, reuth, schlag, winkl, acker, holz, chberg, scheid, hammer, feld, neuhof, werder, brunn, nsdorf, hofen, stedt, kopf, reith, stadt, ndberg, winkel, tzberg, haus, horst, rnberg, ingen, hof, bauer, stock, onberg, leiten, ried, au, msdorf, nsb… e, eldorf, moor, ssberg… f, storf, indorf, tsberg, …esen, hlberg, spitz, krug, heide, bruck, moos, holzen, lsheim, brink, llberg, steig, itze, burg, schach, grund, berge, muhle, aubach, koog, kogel, elbach, schutz, usen, wald, chholz, bronn, sgrun, en, kanal, hagen, hardt, grat, statt, chfeld, reute, heid, tzbach, hofe, reit, iler, hlag, thal, er, buhel, muhlen, lehen, wiese, felden, halden, inbach, …*

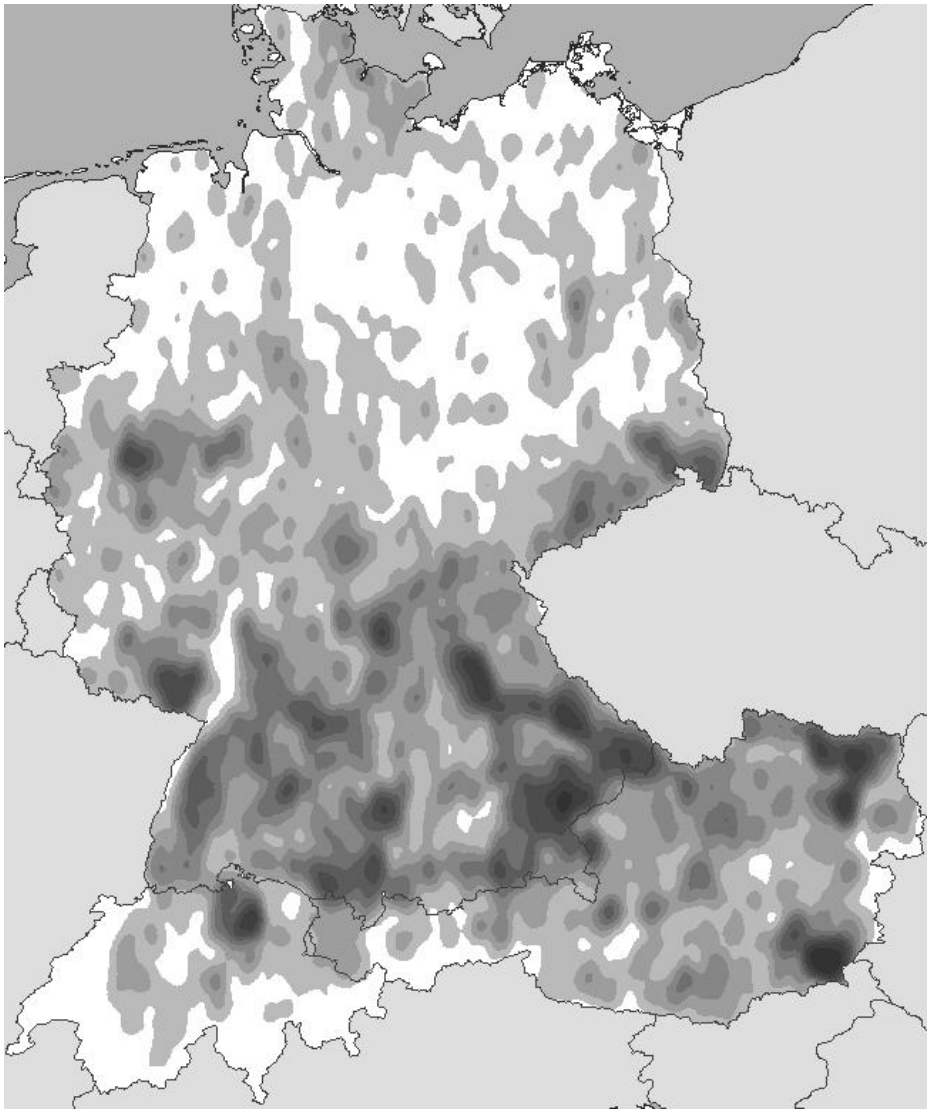
Place 40: *ingen*

# Region: DE, CH and AT



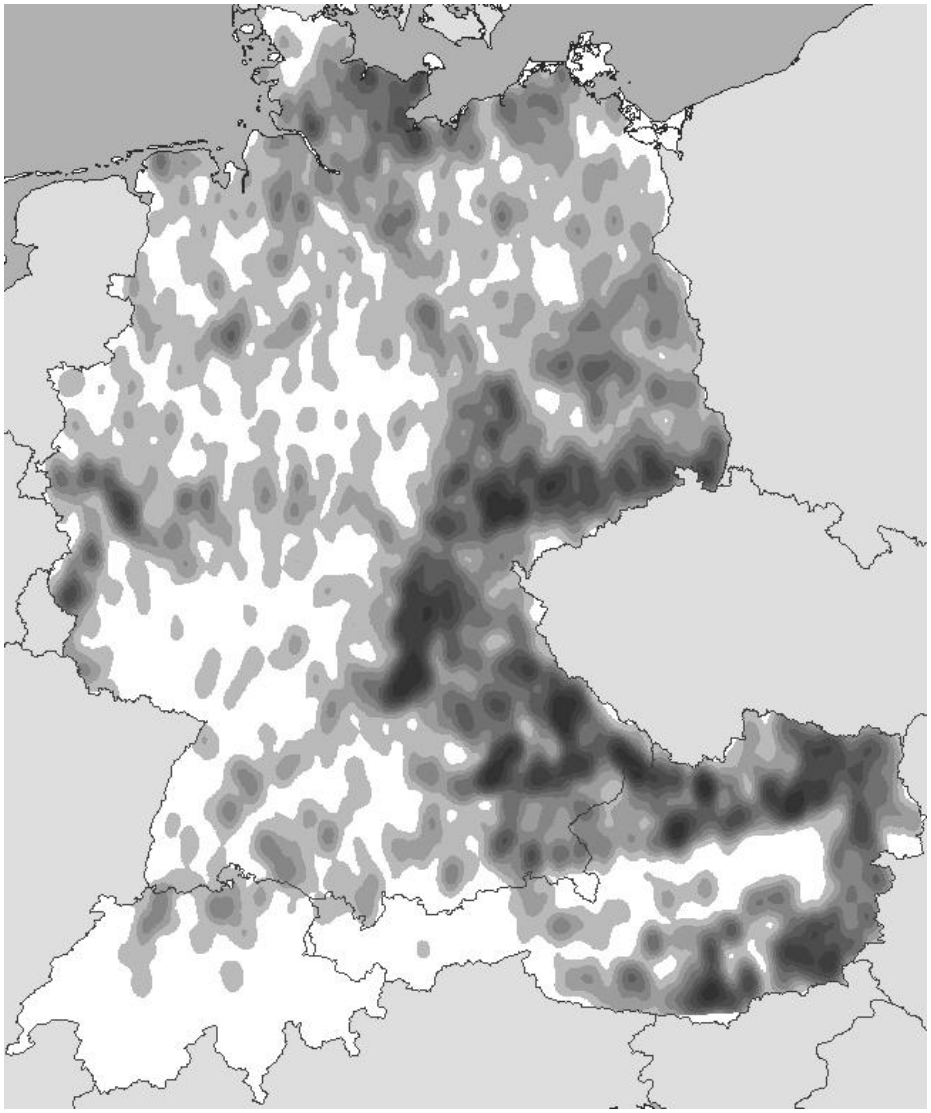
# A closer look

- -berg



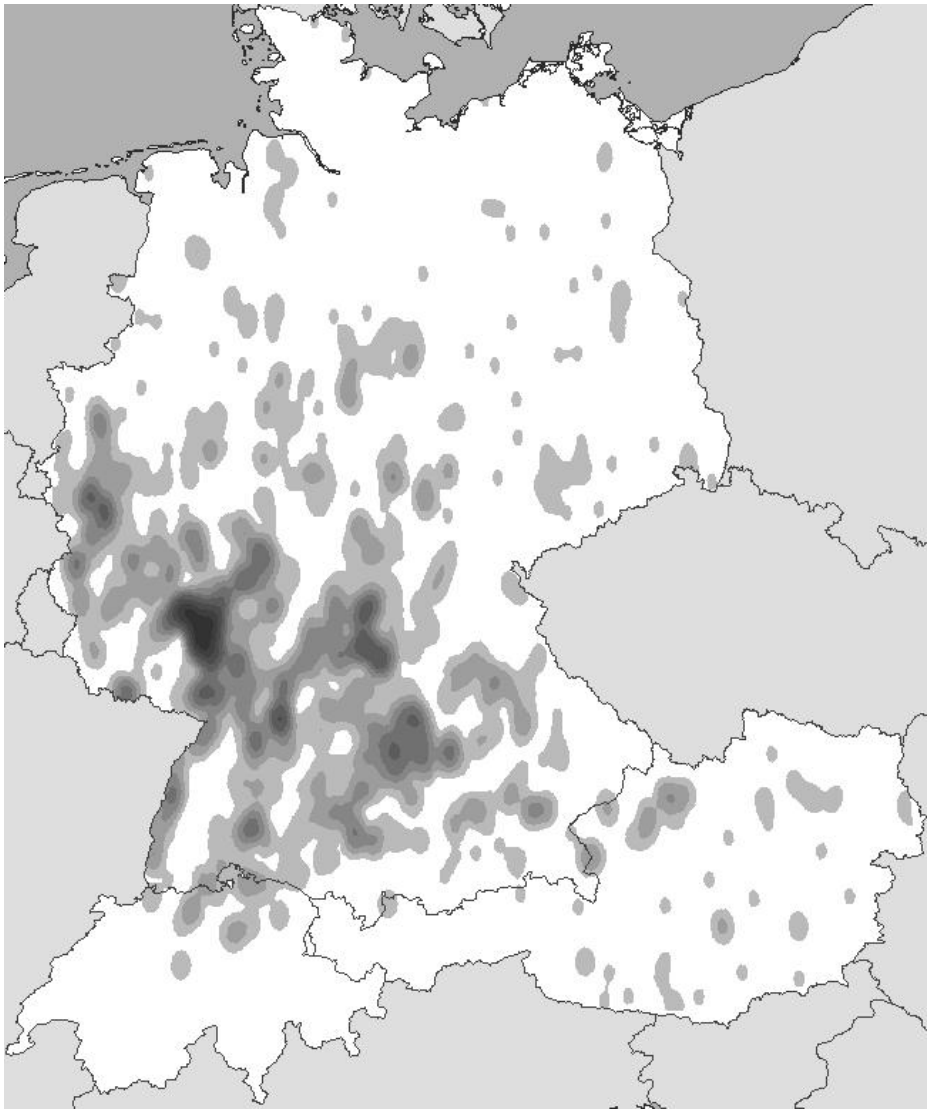
# A closer look

- -dorf



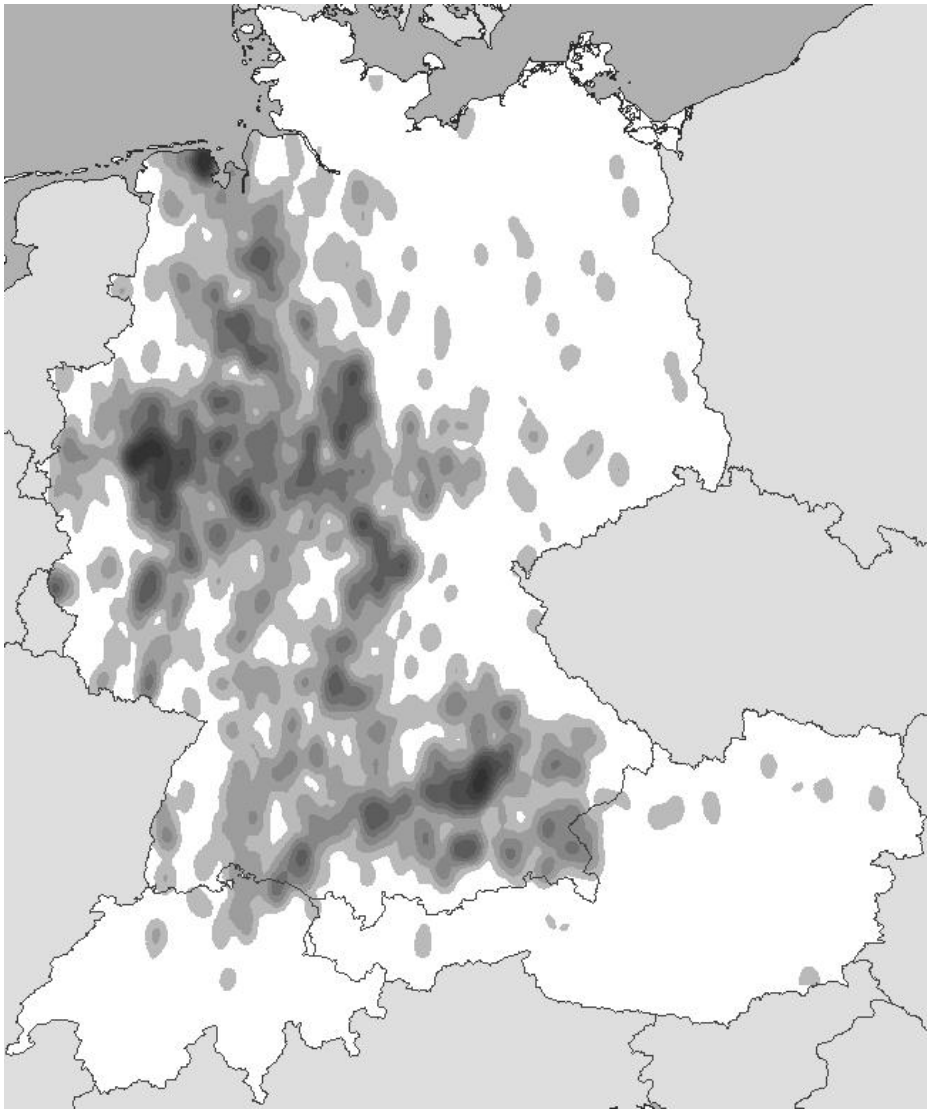
# A closer look

- -heim



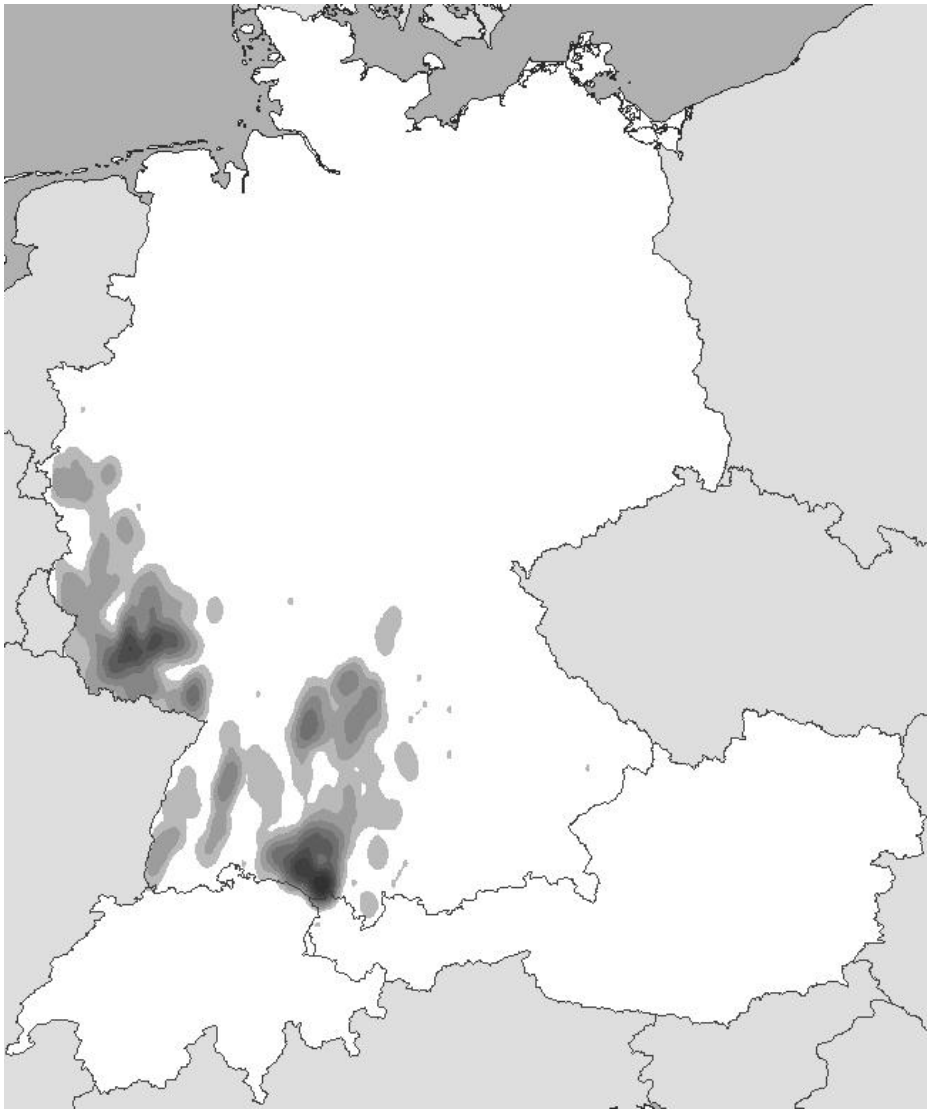
# A closer look

- -hausen



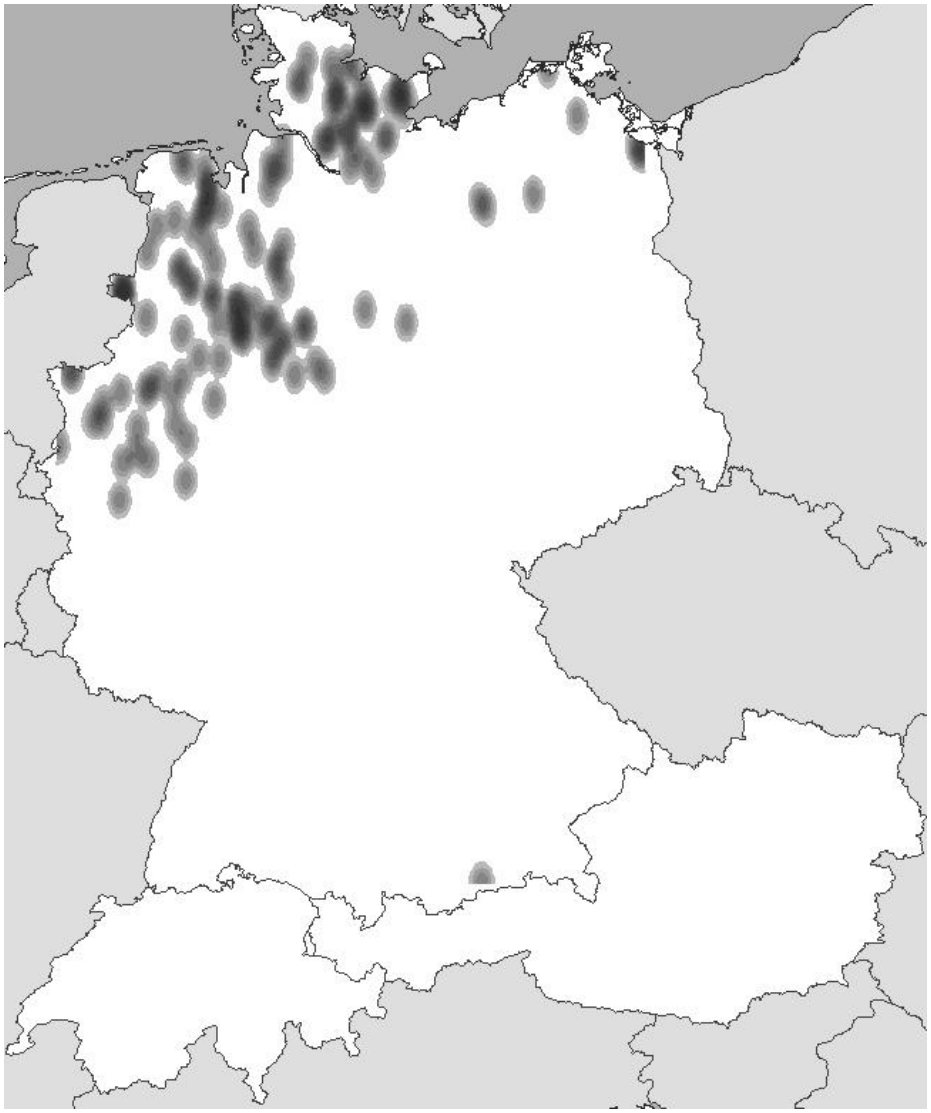
# A closer look

- -weiler



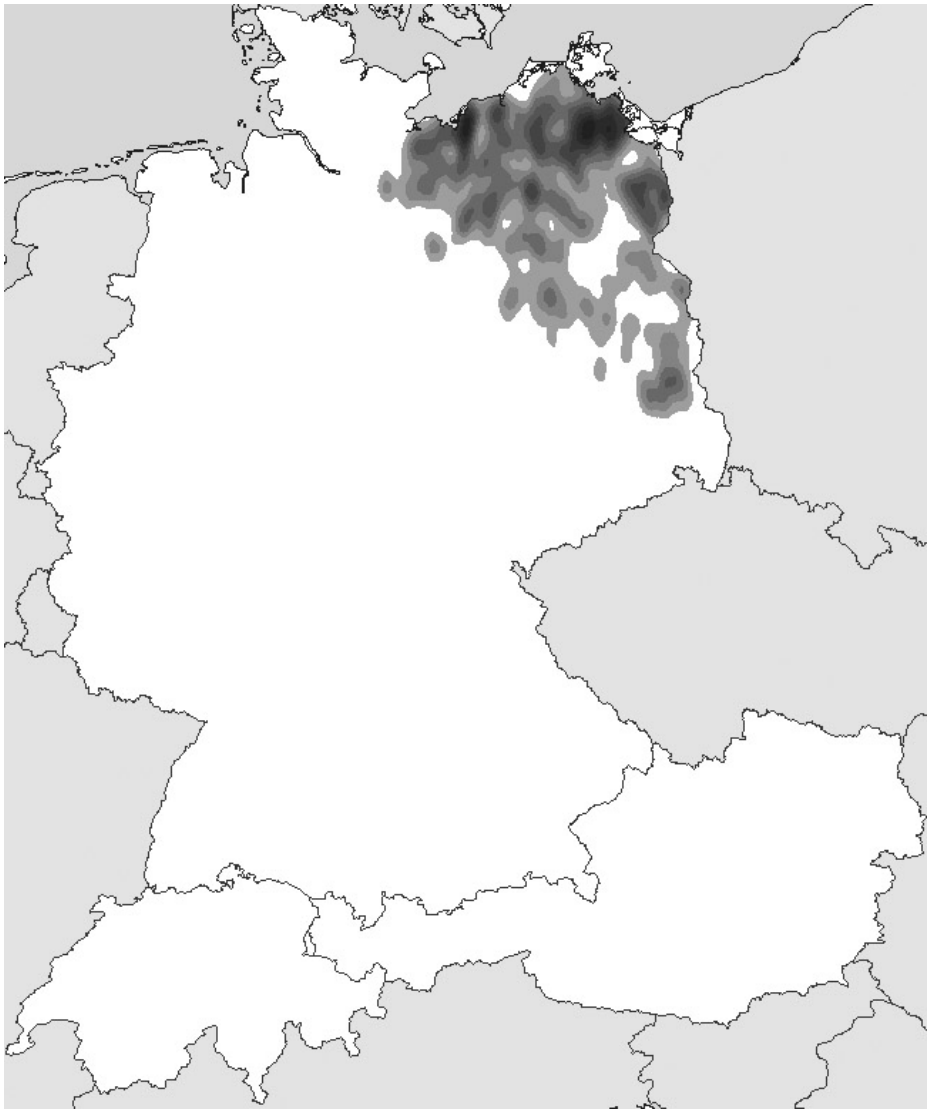
# A closer look

- -kamp

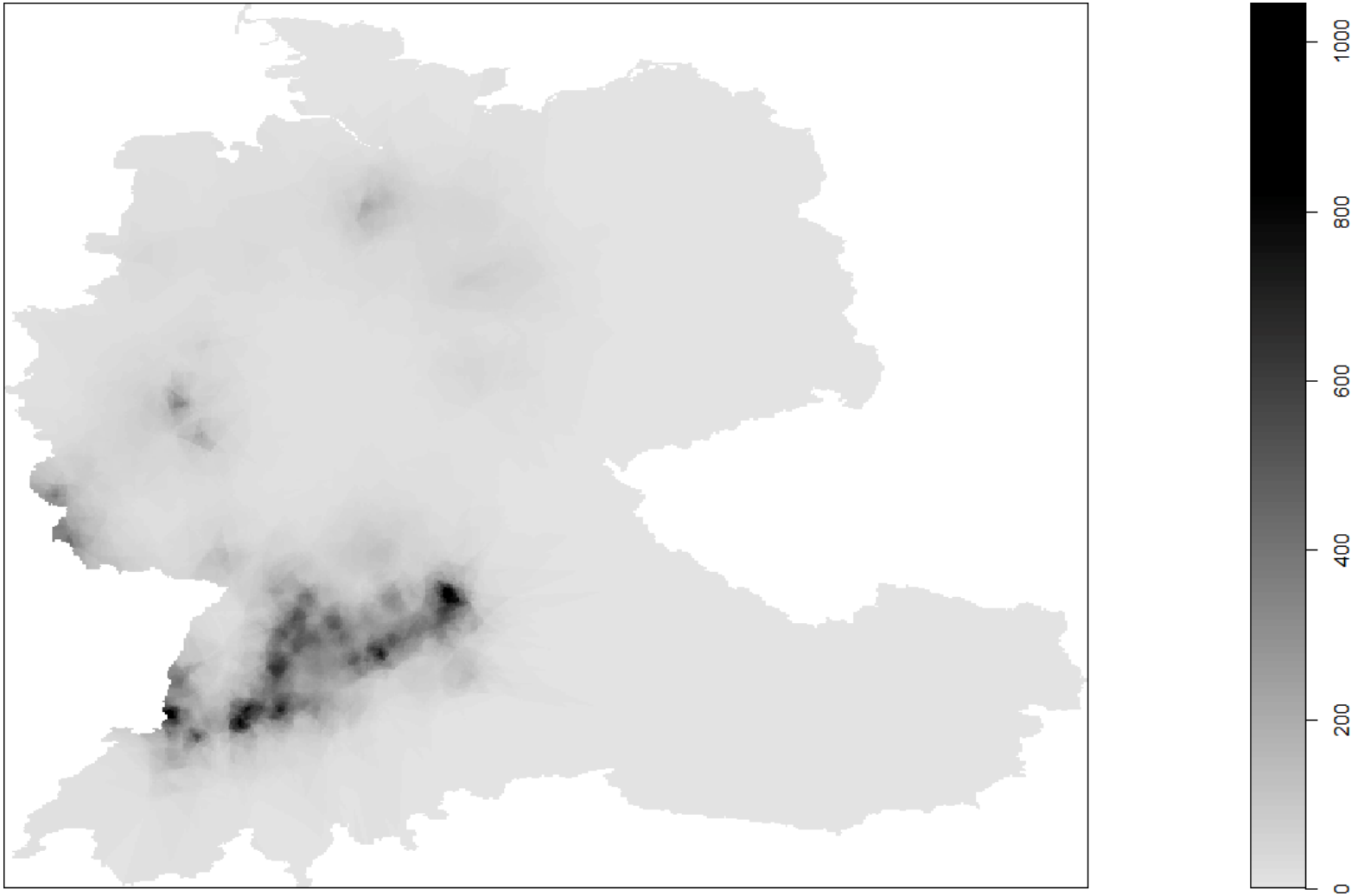


# A closer look

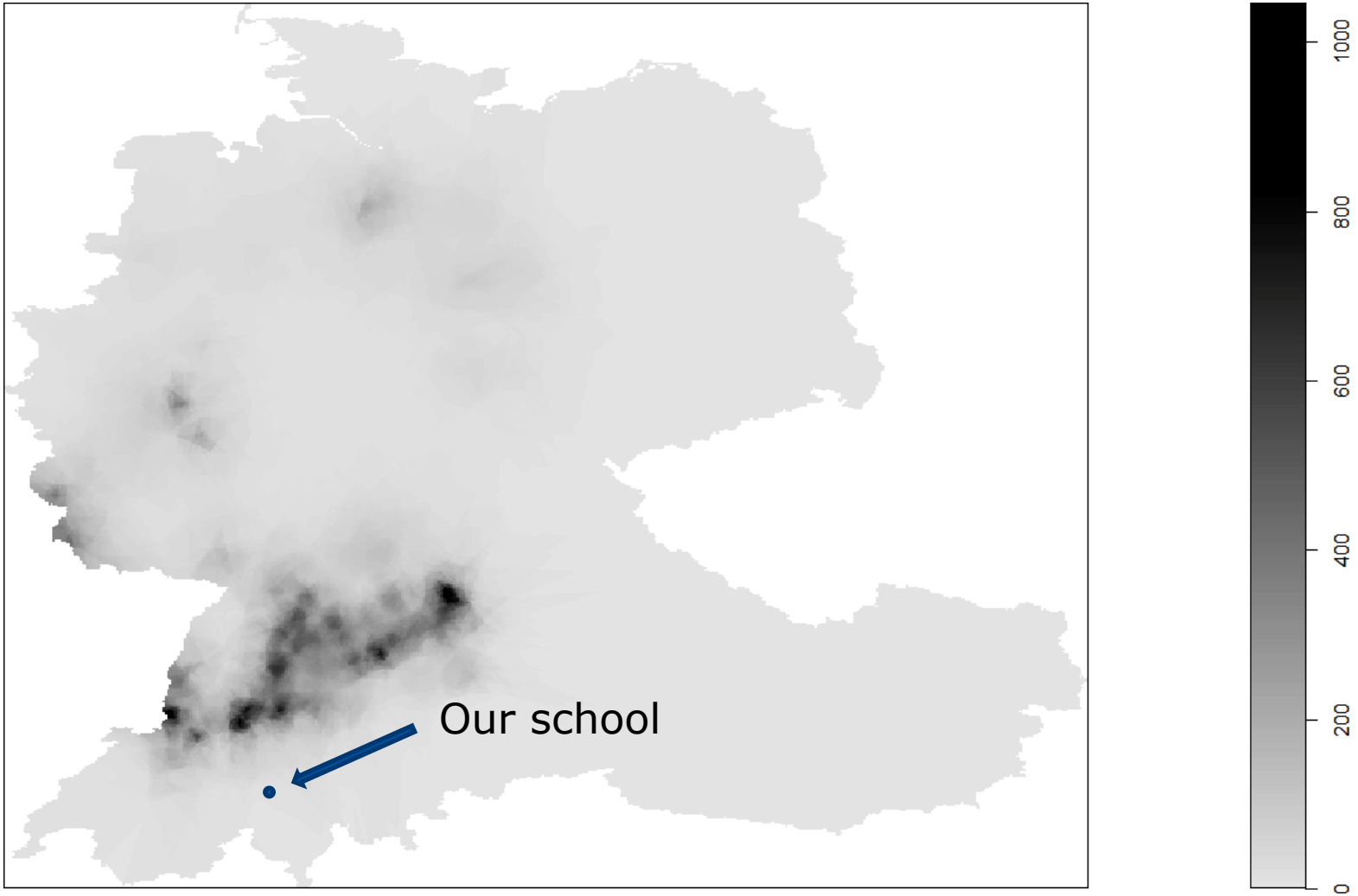
- -ow



# Where is “-ingen”



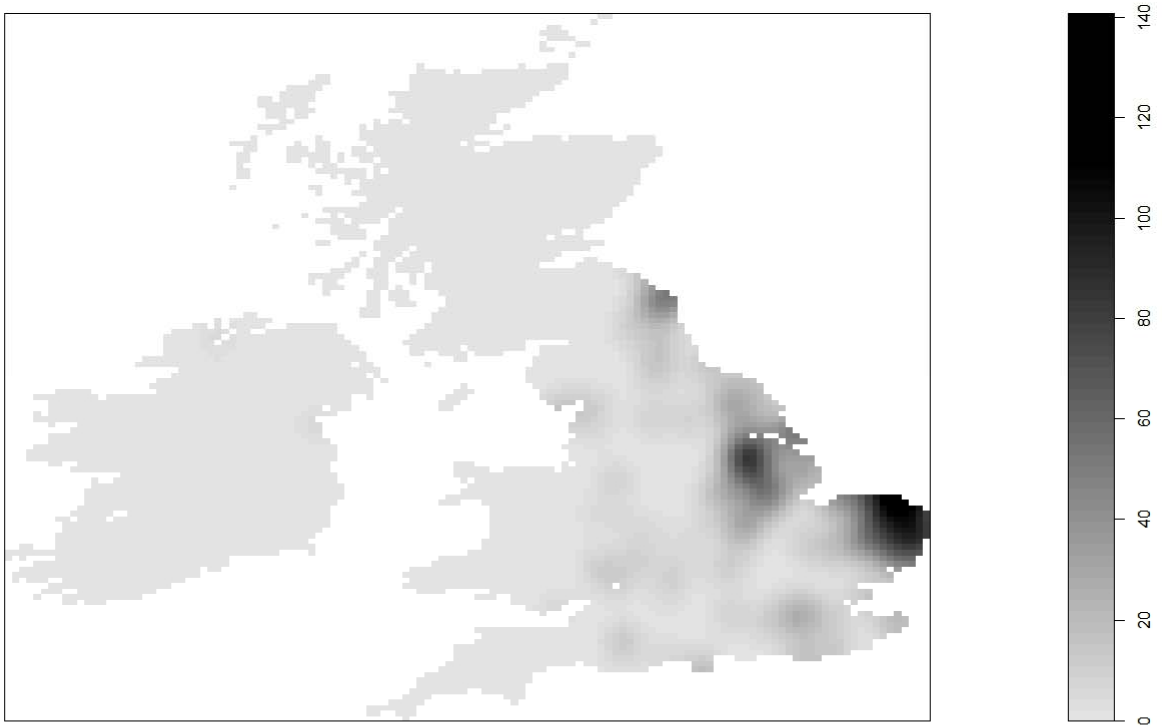
# An information for my teacher



# Other languages

# British Isles

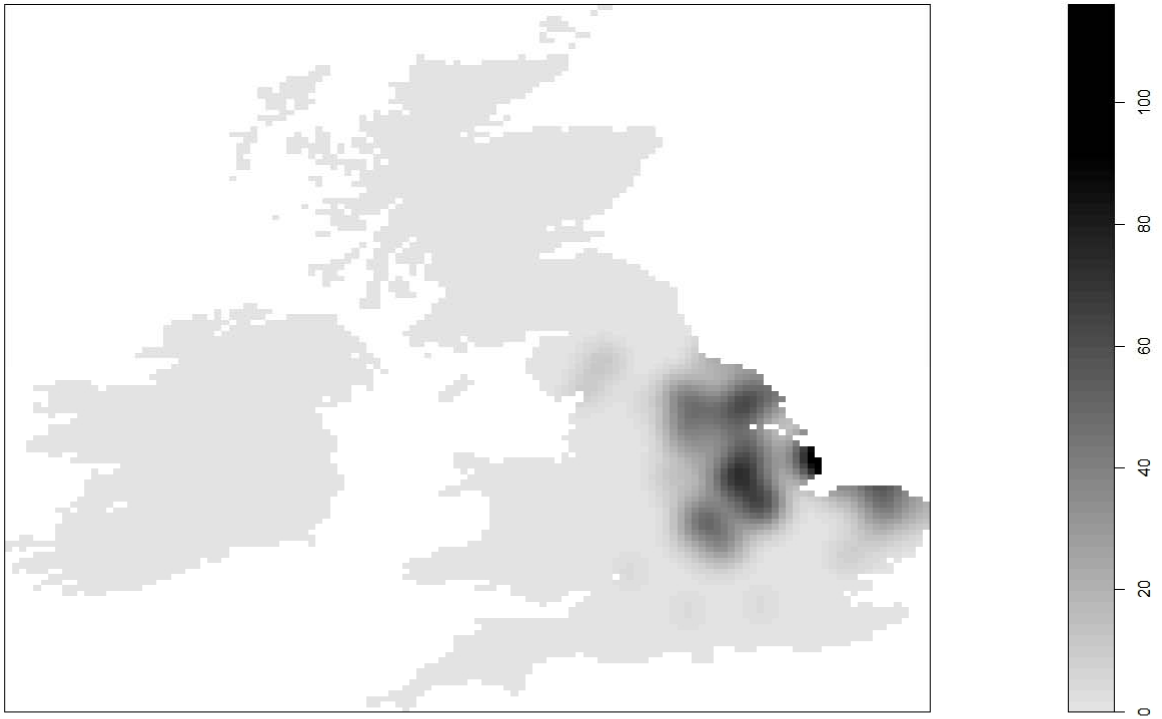
- -*ingham*, -thorpe, -duff, -field, -ington, -borough, -ham, -brook, …




-ingham

# British Isles

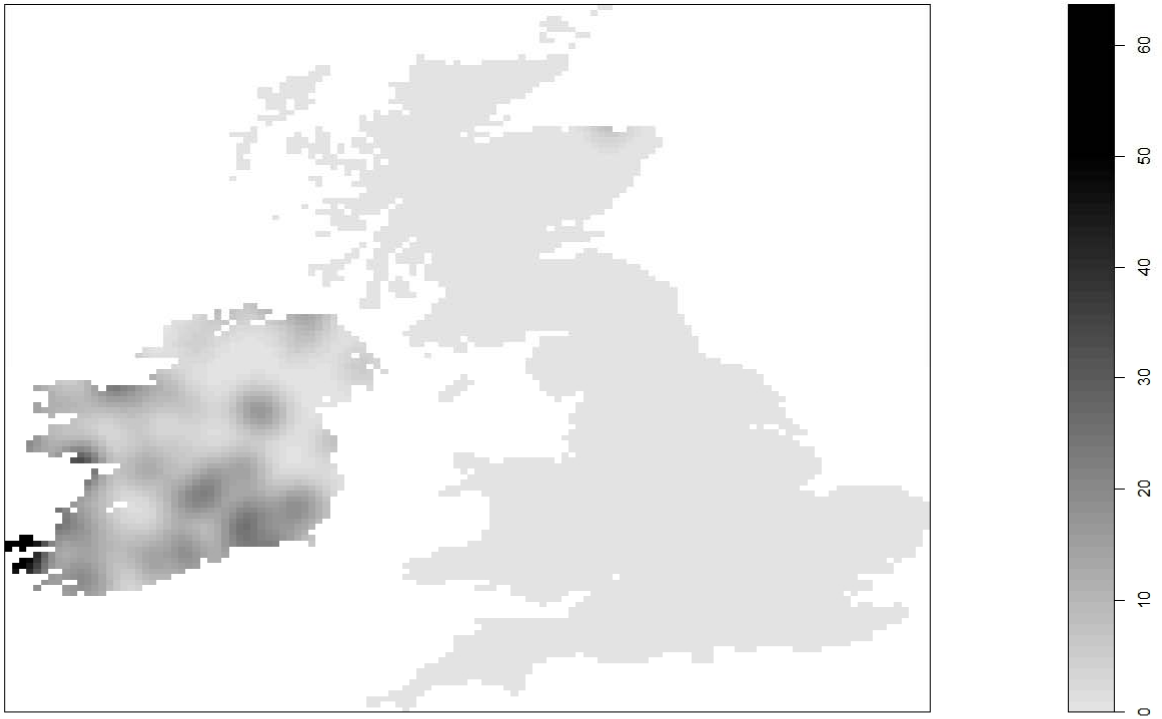
- -ingham, -*thorpe*, -duff, -field, -ington, -borough, -ham, -brook, …




-thorpe

# British Isles

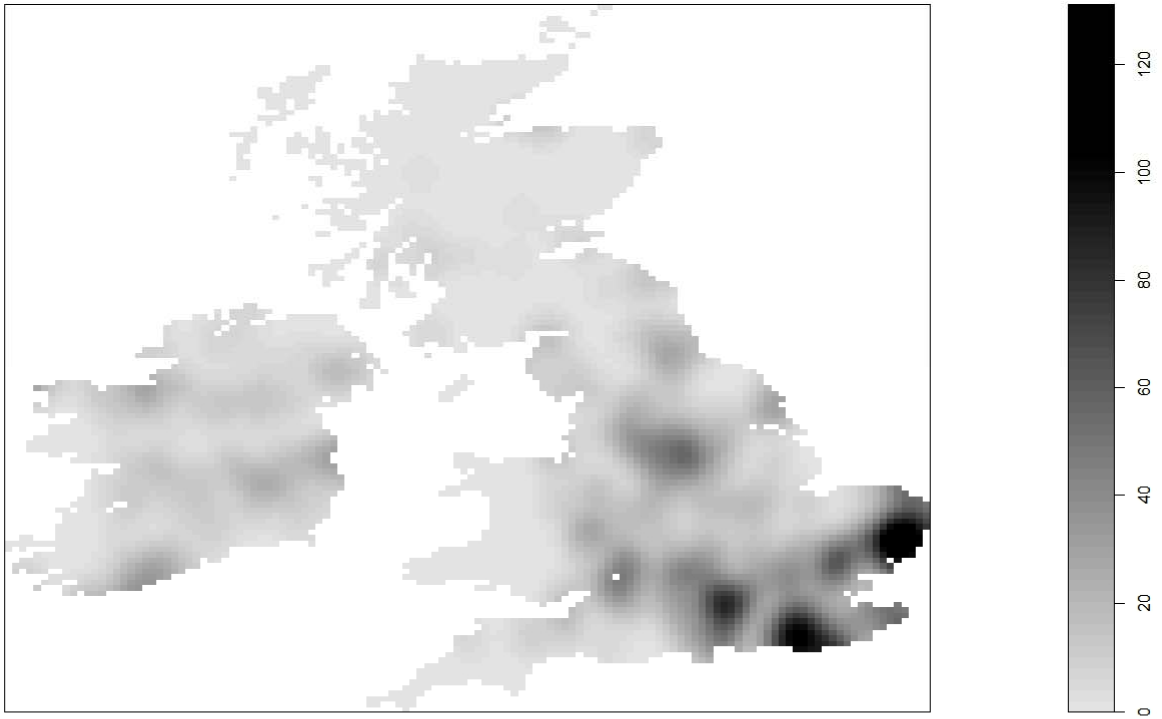
- -ingham, -thorpe, -*duff*, -field, -ington, -borough, -ham, -brook, …




-duff

# British Isles

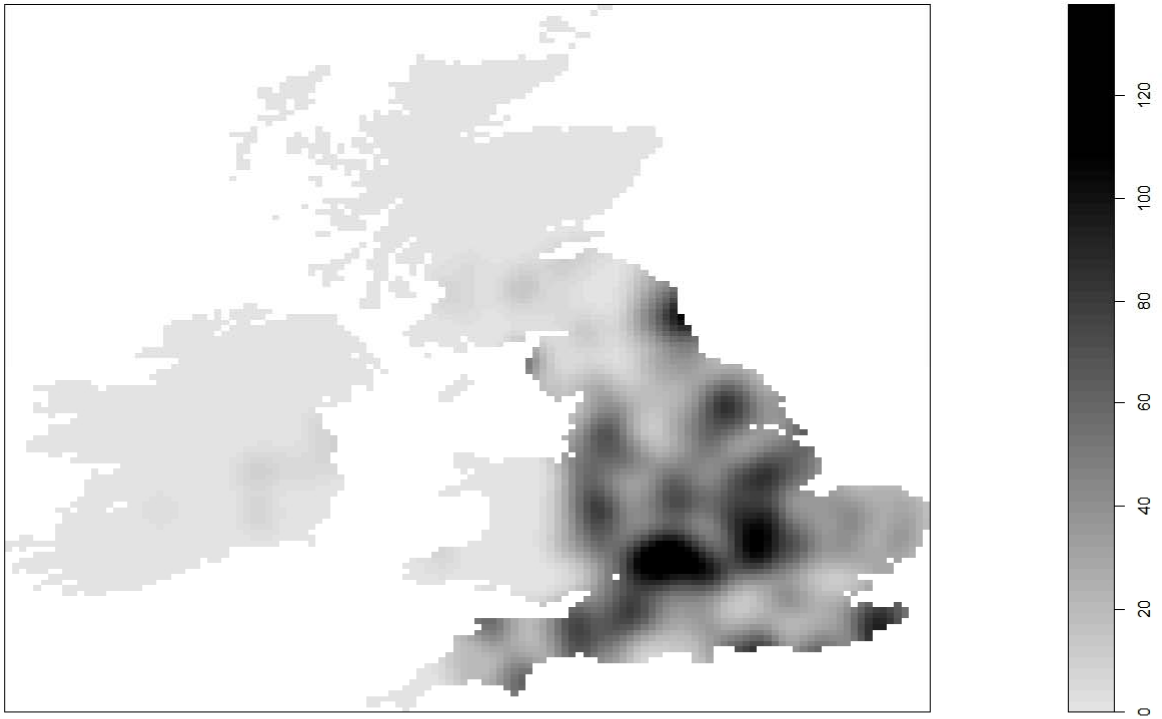
- -ingham, -thorpe, -duff, -*field*, -ington, -borough, -ham, -brook, …




-field

# British Isles

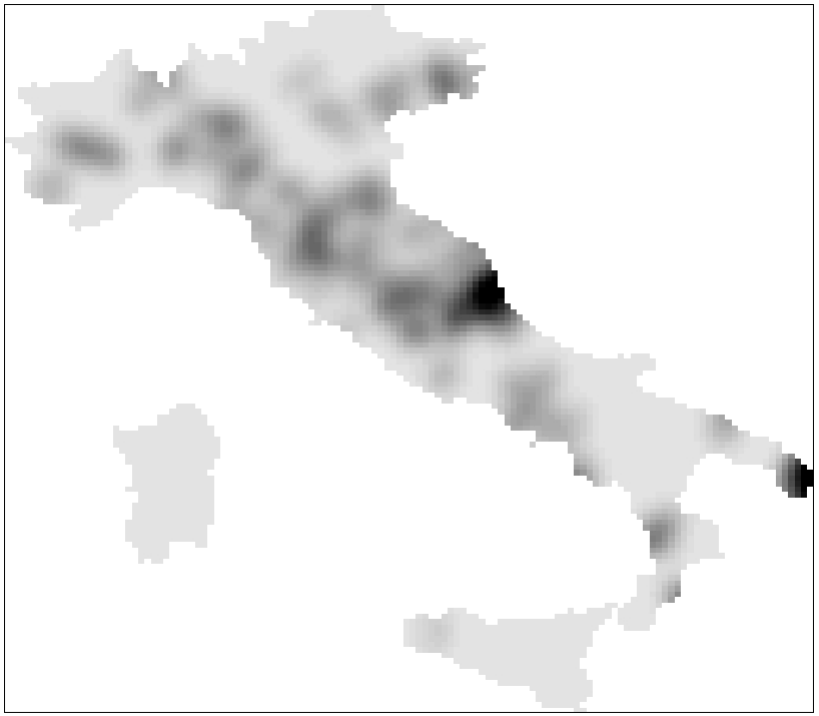
- -ingham, -thorpe, -duff, -field, -*ington*, -borough, -ham, -brook, …



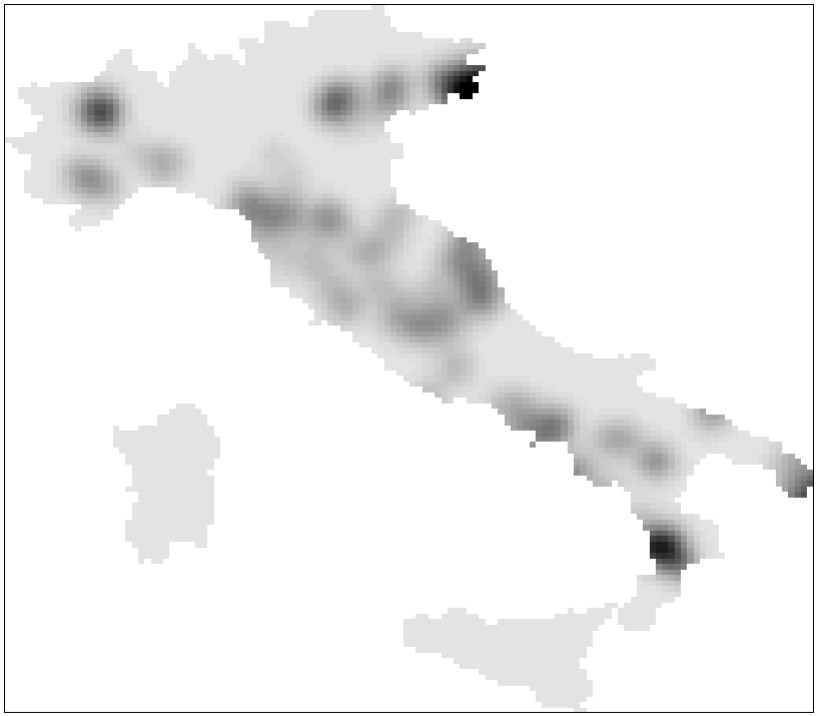

-ington

# Italian

- -ignano, -gliano, -ello, -iano, -zzano, -ona, -ella, -one, …



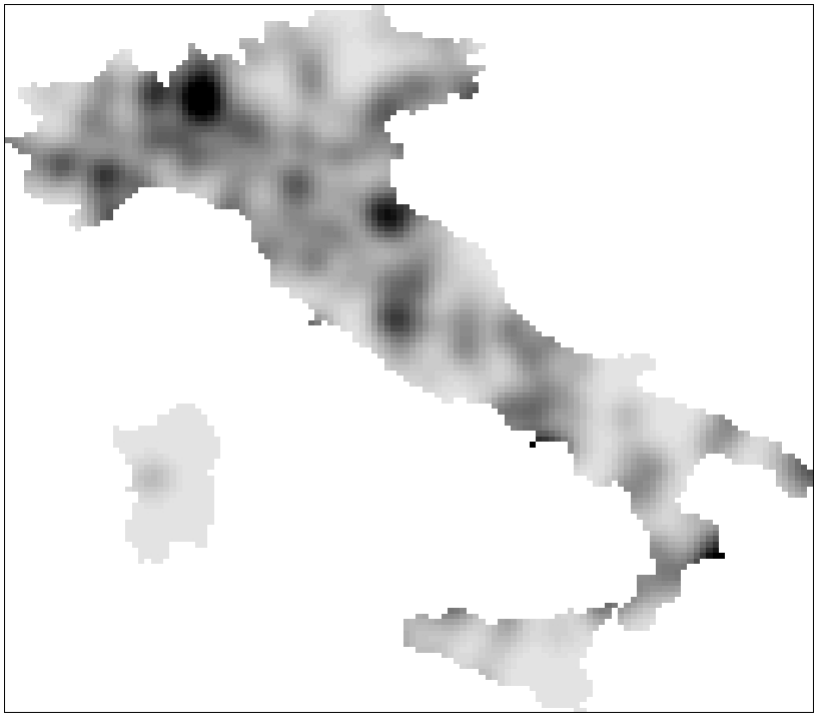
-ignano



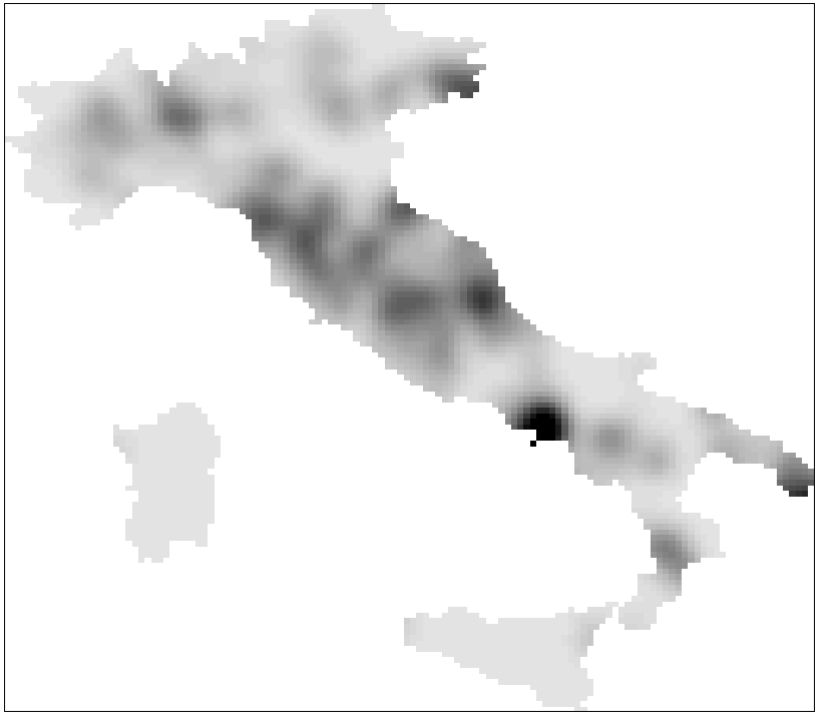
-gliano

# Italian

- -ignano, -gliano, -ello, -iano, -zzano, -ona, -ella, -one, …



-ello



-iano

# Language structure

- Interesting if language builds compounds (in parts)
  - Germanic languages
  - Roman languages
  - What about Celtic languages?
    - E.g. regions in Wales didn’t show up

- Issues:
  - Political boundaries
  - Equal distribution of places
  - Pattern inside of words?
  - Build a dictionary

# Open issues

- (Non-)equal distribution of place names
- Restriction to settlements, rivers, ...

- Several endings (or patterns) for the same area?
- Which expressions exclude each other?

- There are also prefixes; stem analysis
- Useful definition for patterns in toponyms needed

- Detection of false friends?

# Conclusion

# Conclusion: Was my teacher right?

- „Most of the names in our region end on –*ingen*“

+ There are differences in endings of place names

O *ingen* is salient in a certain region

- but not exactly where we lived

(according to Geonames)

# Conclusion (Continued)

- Do not believe your teacher all the time
  - You can write articles for international conferences if you are critical on what your teacher said

# Thanks for your attention!