Spatial Data

> ⚠️ **Changes before 22/23**
>
> ☐ Add Learning Outcomes for each week
> ☐ Link back to Week 5 CASA0005 (Mapping) and Weeks 1–3 CASA0005 (Spatial Data)
> ☐ Add 'Module Dialogue' form, e.g. (to be tweaked):
>
>   – Do you understand what is being taught on the module?
>   – Do you know how you will be assessed?
>   – Can you access the learning resources?

Overview

> ❗ **Learning Outcomes**
>
> 1. You develop better *judgement* about interpreting and representing data.
> 2. You understand how GeoPandas *extends* Pandas with spatial functionality.
> 3. You develop better *practices* for data exploration.

Preparation

Lectures

Come to class prepared to present:

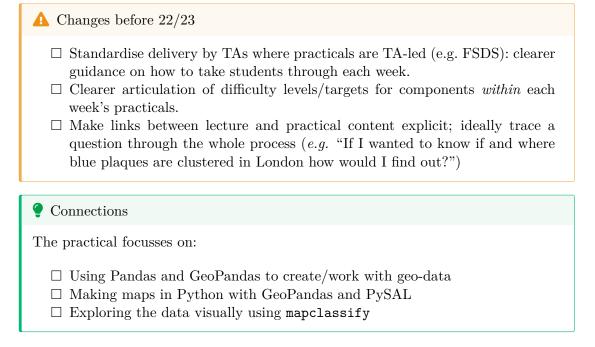| Session	Video	Presentation	Notes
Mapping	Video	Slides	Notes
GeoPandas	Video	Slides	Notes
EDA	Video	Slides	Notes
ESDA	Video	Slides	Notes

Spatial Data

Readings

Come to class prepared to present:

- (D'Ignazio and Klein 2020, chap. 6) Pre-review URL, *The Numbers Don't Speak for Themselves.*
- (Elwood and Wilson 2017) DOI

Activities

- Padlet: [Collaborative Agenda]
- Complete the short Moodle quiz associated with this week's activities.

Practical

> ⚠️ Changes before 22/23
>
> ☐ Standardise delivery by TAs where practicals are TA-led (e.g. FSDS): clearer guidance on how to take students through each week.
> ☐ Clearer articulation of difficulty levels/targets for components *within* each week's practicals.
> ☐ Make links between lecture and practical content explicit; ideally trace a question through the whole process (*e.g.* "If I wanted to know if and where blue plaques are clustered in London how would I find out?")

> 💡 Connections
>
> The practical focusses on:
>
> ☐ Using Pandas and GeoPandas to create/work with geo-data
> ☐ Making maps in Python with GeoPandas and PySAL
> ☐ Exploring the data visually using `mapclassify`

The practical can be downloaded from GitHub.

References

D'Ignazio, Catherine, and Lauren F. Klein. 2020. *Data Feminism*. MIT Press. https://bookbook.pubpub.org/data-feminism.

Elwood, S., and M. Wilson. 2017. "Critical GIS Pedagogies Beyond 'Week 10: Ethics." *International Journal of Geographical Information Science* 31 (10):2098–2116. https://doi.org/https://doi.org/10.1080/13658816.2017.1334892.