

UCREL NLP Summer School 2024

Mini Hackathon and Team Collaboration

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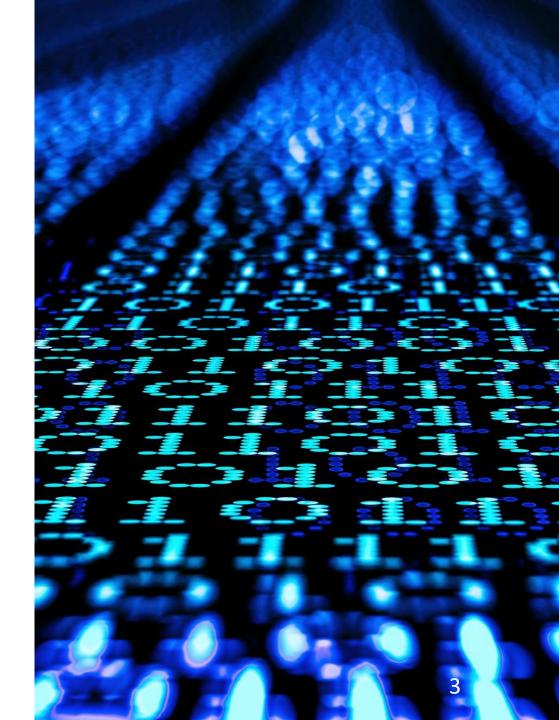
Mini Hackathon and Team Collaboration

- Aims for these sessions
 - Further time to put into practice what you've started this week
 - Collaborate on a small(ish) task and produce some outputs
 - Consolidate your learning around a particular NLP challenge or approach
- Mentoring
 - Each team will have an assigned mentor from one of the UCREL team
 - There's no such thing as a silly question!



Inputs ...

- All the corpus data and code that you've seen so far
- ... your own previous research and data
- ... any other online sources useful to you
- ... all knowledge and skills you have learned, in this summer school and beyond



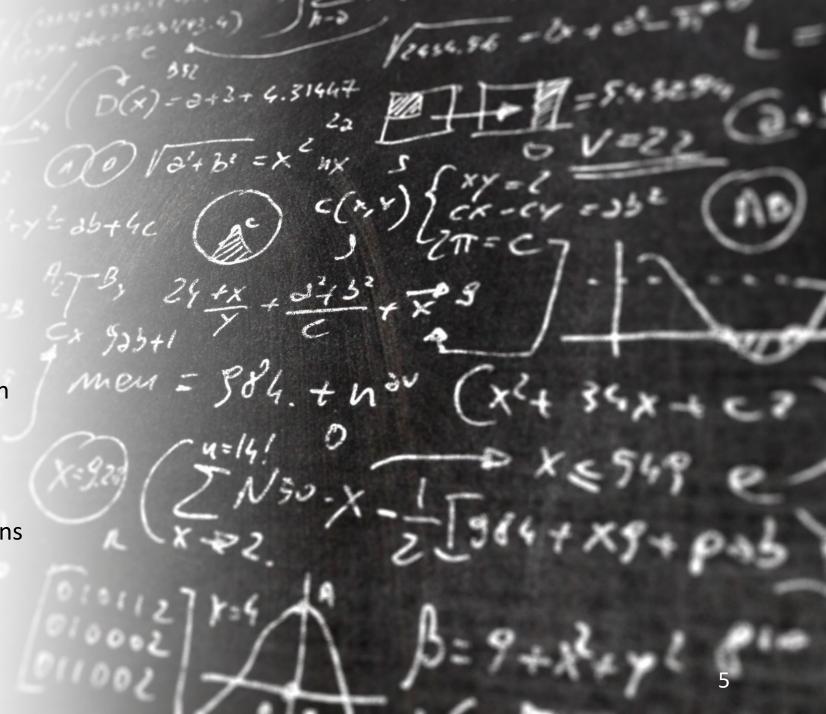
Suggested tasks ...

- Take an existing NLP task and apply it to new data, evaluate it, improve it by training or fine-tuning
 - E.g. semantic tagging, emotion or sentiment analysis
- Take an existing dataset and define your own task, manually annotate it, modify the existing program code, train a classifier and replicate the manual tagging
 - E.g. (subsets of) GoEmotions, 4D reddits, ParlaMint, SemEval
- Research question?
 - How does this feature change over time?
 - Is this feature represented differently in subcorpora?
 - Is the data biased?
 - How to tune LLMs more effectively?
- Remember to follow ...
 - Good practice guidelines for manual annotation
 - Sensible ethics approaches if you're collecting new data
 - Be aware the LLMs may produce biased outputs and pay attention to correct mis-information



Possible outputs ...

- A GitHub repository (can be private) with a readme describing what you've done
 - or equivalent but please check with your mentor on the format
- A (manually or automatically) annotated corpus
- A set of comparative evaluations and experiments
- A Jupyter Notebook



Evaluation criteria ...

- We're deliberately avoiding a leader board style comparison
- We'll use a number of criteria to review the hackathon submissions
 - Language: Multilinguality, low-resource approaches
 - Novelty: Defining a new task?
 - Annotation: manual tagging methods or guidelines
 - Result presentation: visualisations



To do ...

- Form a team of six around one desk in the lab (if you haven't already done so)
- 2. Choose a team name
- 3. Decide on a task to undertake
- 4. Complete the challenge
- 5. Finalise your github repository or link and document as much as possible with a readme
- 6. Submit your github / link to p.rayson@lancaster.ac.uk



Go!

 Plan your time wisely, you only have 1 hour 45 minutes



