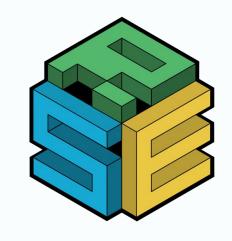


Running a local RSE call for proposals



RSECon25, September 2025

Romain Thomas; Neil Shephard RSE team, University of Sheffield

Who are we?



The RSE team at Sheffield was created in 2016 by two EPSRC fellows (Paul Richmond & Mike Croucher) in Computer Science.

⇒ 13 RSEs all on permanent research contracts

The team is now underwritten by the School of Computer Science, IT services and the School of Mathematical and Physical Sciences

We are working closely with another team at the University: The Data Analytics Service [DAS], hosted in IT services.

⇒ 9 Team members, all on permanent PS contracts



Communication in academia...is hard!

Reaching researchers across the University is not easy!

Some are getting to us via our trainings*, code clinics or by word of mouth...But still a lot of them do not know we exist...



How do we reach out? What could attract people?

What do researchers need? [based on my own experience when I was one]:

- **Grant Money** → We cannot give money out!
- **Citations** → We are helping them to get more robust software that should help with this...
- Time! → This we can provide! We have 1FTE of work available (fully underwritten)

We need to all speak the same language...

But How, in practice, to reach out in a way that actually talk to them?

⇒ Researchers are constantly looking for new opportunities to make progress on their research...This often translate to applying to various calls (for money/computing time/etc...)!

⇒ Let's add a RSE call in the mix!

Target audience & projects:

- Any research active staff, including PDRAs, and PhD students, affiliated to the University can apply.
- Projects must involve significant software development that would benefit from RSE expertise.
- Preference may be given to projects with potential high impact or those addressing pressing scientific challenges.



Expectation?

The team selects two/three projects.

Selected proposals will receive 6 months
 @ 45-50% FTE with an RSE on their project.

 The start date will be decided by the RSE team based on the project timeline and team members availability. The duration of the project will not exceed 6 months but might be shortened with a higher FTE fraction (e.g. 3 months @ 100%).

 The collaboration will be continuous and can not be split into multiple shorter, disjointed periods of time.

Application: Let's keep it painless

Everything is made on a google form:

- Abstract: Provide a brief description of project + role of software
- **RSE objectives:** Outline the specific areas where RSE expertise is needed,
- **Expected outcome:** What does a successful collaboration look like?
- **Project risks:** What issues may cause the collaboration to be unsuccessful?
- **Impact statement**: Explain how access to RSE skills contribute to the project success or broader research goals.
- **Existing material:** Briefly explain what existing material you already have.
- **Preferred timeline:** what would be the ideal time distribution of the RSE.



Selection:

- **Fit:** Request fits the objective of the call.
- **Skills:** Does the RSE team have the required skills? Are these skills available for the duration of the project?
- Impact: Potential Impact of the RSE work [For the project, and wider for the community.]
- Practicality: How easy will it be for the RSE to join the project?
- Resource efficiency: Is the work requested achievable in the offered time?





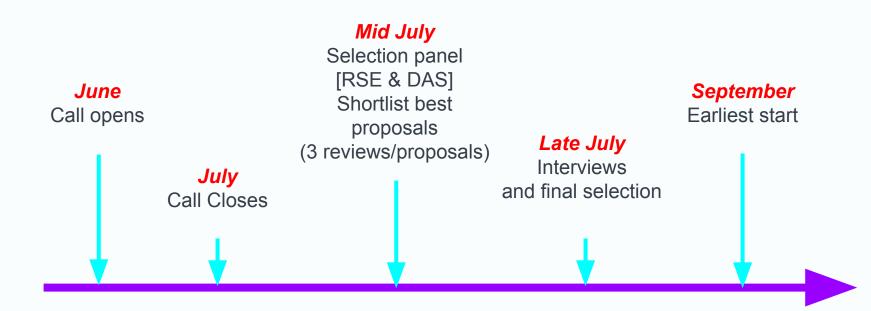
Interviews

The Primary Investigator and eventually some co-I, are invited to attend a short interview with three members of our teams. The purpose of the interview is to:

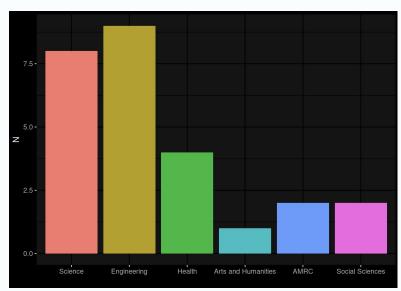
- Share with the panel the current state of the software,
 demonstrate how it is currently used,
- Clarify some parts of the project, if needed,
- Discuss the expected goals of RSE involvement and the impact it will have on the software and its users, both within the research group and beyond,
- Consider any risks associated with undertaking the work.



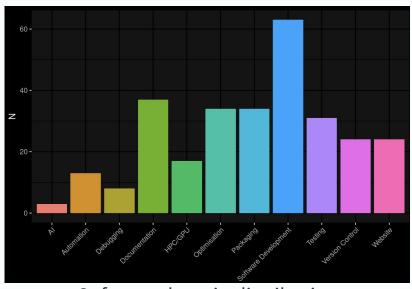
Call for Proposal Timeline



Call for proposal 2024 (1st)

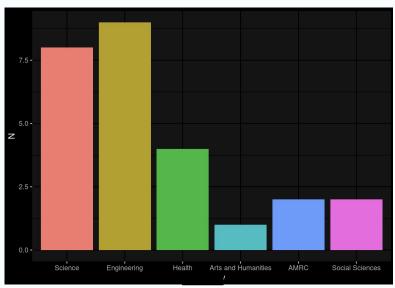


Faculty Distribution



Software domain distribution (Reviewer classification)

Call for proposal 2024 (1st)

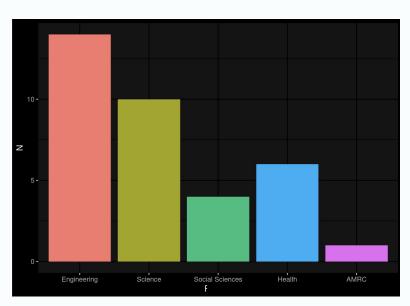


Faculty Distribution

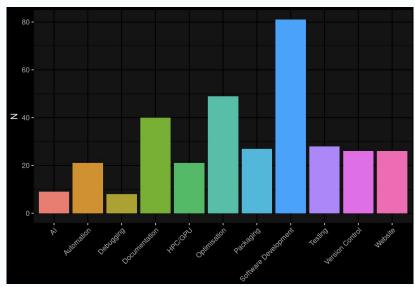
26 proposals received!

- Call leader: <u>Neil Shephard</u>
- 10 reviewers (RSE & DAS)
- From 6 Faculties
- 3 new collaborations started
 - Civil Engineering → GPU / C++
 - Archeology → General RSE dev / Python
 - BioScience → General RSE dev / Python

Call for proposal 2025 (2nd)

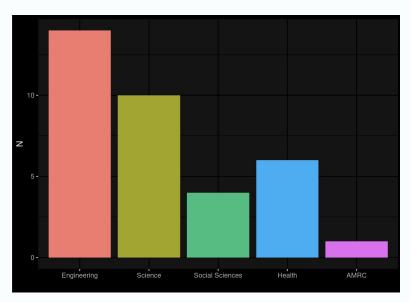


Faculty Distribution



Software domain distribution (Reviewer classification)

Call for proposal 2025 (2nd)



Faculty Distribution

35 proposals received! [+9!]

- Call leader: <u>Neil Shephard</u>
- 9 reviewers (RSE & DAS)
- Applications from 5 Faculties
- 3 new collaborations set to start from October
 - Physics → General RSE dev / Python
 - Economics → Infrastructure
 - Mechanical Engineering → Optimisation/Python

Lessons learned

Positives

- Diverse applications (Research domain/Software).
- Recognise utility of improving code (maintenance, usability, extensibility, performance).
- Many wanted to use the collaboration to upskill.
- Useful method of raising awareness of RSE work and extend RSE network
- Gives the opportunity to the team to be more in control on what they are working on.
- Gives experience on review, project interview, process management.

Improvements

- Use clearer language in the call.
 - Scope was too ambitious in many applications.
 - Clarity about "impact".
- Emphasise the utility of sharing existing code.
- Avoid timing calls around exam periods.

Things to keep in mind:

- Organising the call, Reviews, Interviews take a LOT of time
- Communicating through 6 faculties requires contacts in each of them
- More need than capacity!

Thank you!

What's next?

- Continue to run the call every year
- Try to find more funding:) to choose more projects
- Run a quarterly smaller version (Very similar to the Imperial's 'open source booster' programme)

