

Mid-term assignment for GEOG-479

Motivation of the mid-term project:

For the lectures and labs during the previous weeks, we have been using the computational resources in ROGER, the first GIS supercomputer, with almost no restrictions. However, in real-world scenarios, almost all supercomputing centers would require users to submit a request (normally in the form of a proposal) first to allocate computing resources. In such proposals, users need to clearly express and justify their motivations for using the resources. Users also need to elaborate the details regarding the requirements for the resources, such as computing hours, number of nodes, types of computing infrastructures (e.g., Spark, Hadoop and databases).

The mid-term assignment of this course (GEOG-479) takes the form as a proposal to request computational resources from ROGER. In this scenario, you (student) are a potential user of ROGER and you are required to prepare a proposal for getting computational resources from ROGER. To prepare this proposal, you should consider the following suggested content.

Suggested content:

To request computational resources from ROGER, your proposal needs to clarify the (research) topic you would like to pursue (**What is your research topic?**) and what is the significance of such a topic (**Why this topic is important**).

You need to make it clear on why ROGER could be beneficial or a must for your investigations (**Why do you have to use ROGER and Which ROGER components are needed for your investigation**). You can describe the data, software and tools, and highlight why ROGER is a good place for the ones you are dealing with). Last but not least, the potential impact your work would bring to ROGER or the CyberGIS Center (**What others can benefit from your research output and experiences**).

Requirements:

This proposal will be *minimum 1 page and maximum 3 pages*. You can craft it with the final project of this course in your mind. This does not mean the final project will be the exactly the

same as you are describing here, but it could be helpful as you will have a specific topic to work with for this proposal.

Try to focus on a big picture when you are writing this proposal, with less worry about whether the proposed topic will work out or not (apparently, it should be reasonable, for example, probably it would not be possible to implement an AlphaGo with ROGER from scratch in one-month time). Having said that, put some thoughts about your topic, you need to tailor it to fit your justification.

Simply put, you need to convince the program manager of ROGER to allocate the resource you are asking for, then, put them all in this proposal.

Deadline **12:00 pm, 10th April 2016 (Sunday)**, late submission will receive penalty of losing 5 points per week.