

Fundamentals of GIS: Term Project Poster

25 Points

You are an analyst who has been given the task of conceiving, testing and evaluating a model that will develop new data which may be useful in a decision making situation. **Note that your goal is not to solve the problem, but to explore the feasibility of modeling *some specific facets of a situation* using data and GIS. Make recommendations as to the utility of your model prototype with regard to understanding the specific facet of the situation.**

Prepare a 30" x 40" poster that demonstrates your mastery of the skills that you have learned in NUTR0231. Your work may become part of the Tufts poster collection.

- _____ Provide a [conceptual overview](#) of the **specific entities and conditions** you seek to understand. By specific, I mean that from your discussion *it should be possible for a person to identify actual cases of things in the world that you will be attempting to model.*
- _____ Describe your decision-making purpose in terms of things and conditions that you are considering modifying, creating or preserving. Your aim is to create a model that will provide some guidance concerning **specific** locations and the impact of carrying out this sort of intervention.
- _____ Describe the [spatial mechanism](#) you will model in terms of: **SPECIFIC** phenomena and relationships which will be represented with data and GIS procedures. Recommended: provide an image or diagram that illustrates the entities, relationships, and/or change involved in the spatial mechanism you will be exploring. Cite prior work that has a bearing on the spatial mechanism that you have chosen to model.
- _____ [Describe the key datasets](#) that you have chosen to use. How were these originally collected and for what purpose? What are the key attributes that will be instrumental? Discuss the categorical and spatial precision of these datasets with specific regard to representing the critical facets of the things and conditions stipulated in your conceptual model.
- _____ Describe the most important GIS operations that you are using to model the spatial relationships inherent in your spatial mechanism.
- _____ Provide a map that illustrates the context of an exemplary area at a scale in which we can understand the specific elements of the spatial mechanism in question. The [Graphic hierarchy](#) of your maps should help your audience to understand the context of your data with physical geography, settlements and circulation. Additional maps may portray model inputs and key transformations that you have employed in your model. If terrain is potentially related to the spatial mechanism in question be sure to use shaded relief.
- _____ Use tables and graphs to digest your key parameters and weights and some information about the types of places discerned by your model, or the predicted impacts of your intervention.
- _____ Demonstrate the use of your model to evaluate places that typify the useful and / or problematic places that your model has identified. It can be very helpful to pull out inset maps and use an aerial photo and your original source data to evaluate details. If you are in an urban area, you could use Google Streetview to visit a location.
- _____ [Evaluate your model](#) and the level of confidence that you ascribe to it. Describe one or two of the most important shortcomings of the data and operations that you have used. **Speculate on errors that may be expected with regard to the specific entities and conditions identified in your conceptual model and the intervention that you are considering.** You may also discuss shortcomings in the conception of the model itself. Recommend next steps for the improvement of your model.
- _____ Export your poster as a PDF named **nutr0231_S2019_poster_yourname.pdf** and upload it to the Term project dropbox on Canvas so that I can grade it. To have it printed for the Poster expo, use [this link](#) Note that this must be accessed from a computer on the Tufts network.