Introduction: Graduate Seminar tutorial

We have all been there. As a PhD student, you complete a field season’s worth of work observing your study system, measuring as much as was humanly possible for you and your research assistants, only to come in front of your committee as one member sagely raises an eyebrow in looking at your analysis and suggest, “Why didn’t you measure that? It could confound your entire story!” As a Post Doc, you are handed an amazing set to work with to make your career, but you swiftly notice it is missing the key variable is needed to properly resolve the story you want to tell. As a PI, you are ready to move from small-scale experiments to testing whether your theories are applicable across large spatial and temporal scales - but measurement of key elements of the system are simply not possible outside of small confined environments. Or, more vexingly, any attempt to do so is called ‘ambitious’ by funding agencies, leading to proposals being rejected.