Thinking, Acting, and Communicating Like Scientists: A Focus on Disciplinary Literacy

In order to generate knowledge, members within a discipline use specific practices. These include articulating questions or problems for pursuit, investigating those questions using discipline-specific methods, communicating results of investigations to specific audiences, and evaluating one’s own claims and those of others. Disciplinary literacy practices are shared language and symbolic tools that members of different academic disciplines use to construct knowledge alongside others in their discipline. In science, to become critical consumers of and contributors to scientific knowledge, all students need explicit instruction in and opportunities to practice how to think, act, and communicate as scientists do.