Understanding subduction through the study of exhumed terranes
Collective research on exhumed rocks
Targeted sample collection
Sample sharing and management
Explore key scientific questions
Aim for diversity in participants: non-field geologists, early stage researchers
• How does deformation across the subduction plate boundary evolve in space and time, through the seismic cycle and beyond?
• How do volatile release and transfer affect the rheology and dynamics of the plate interface, from the incoming plate and trench through to the arc and backarc?
• How are volatiles, fluids, and melts stored, transferred, and released through the subduction system?
• What are the geochemical products of subduction zones, from mantle geochemical reservoirs to the architecture of arc lithosphere, and how do these influence the formation of new continental crust?
• What are the physical and chemical conditions that control subduction zone initiation and the development of mature arc systems?
ExTerra
Science Questions

• Arc crust
  – What are the products of subduction that influence the formation and evolution of the continental crust?
  – What are the major fluxes into and out of the continental crust over geologic time?
  – How is magma generated, stored, and transported within the crust?

***For more details see white paper***
http://geoprism.org/exterra/