

Porosity and Permeability



(Why do they matter?)



Porosity

**A measure of a material's ability to hold a
It is measured in units of volume.**



Permeability

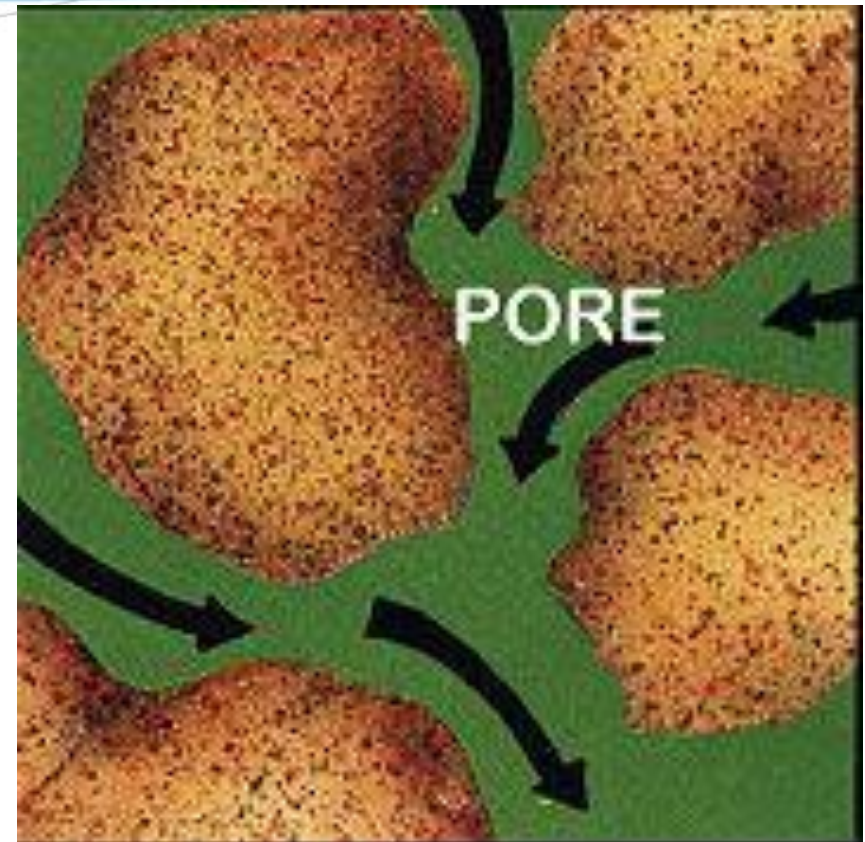
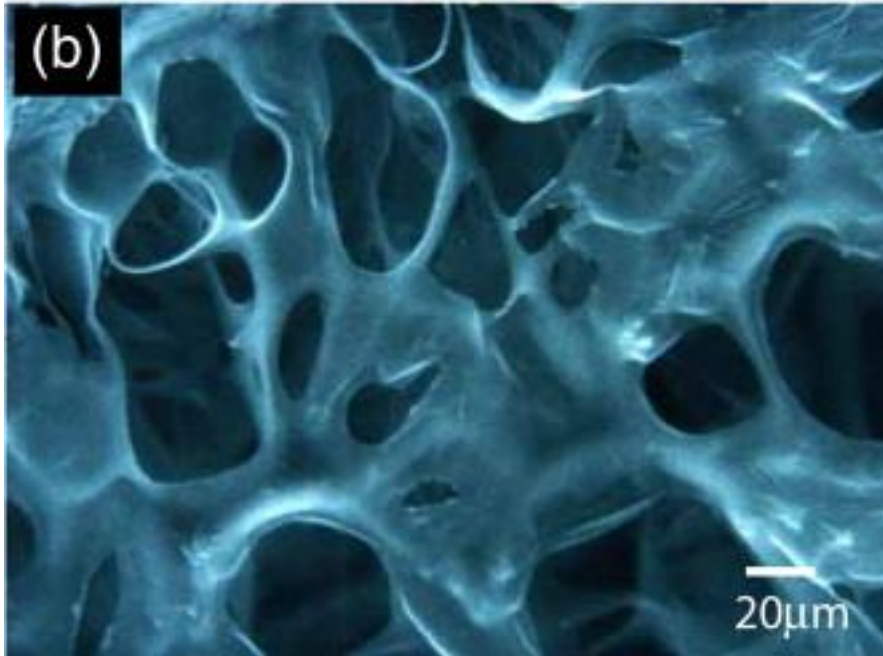
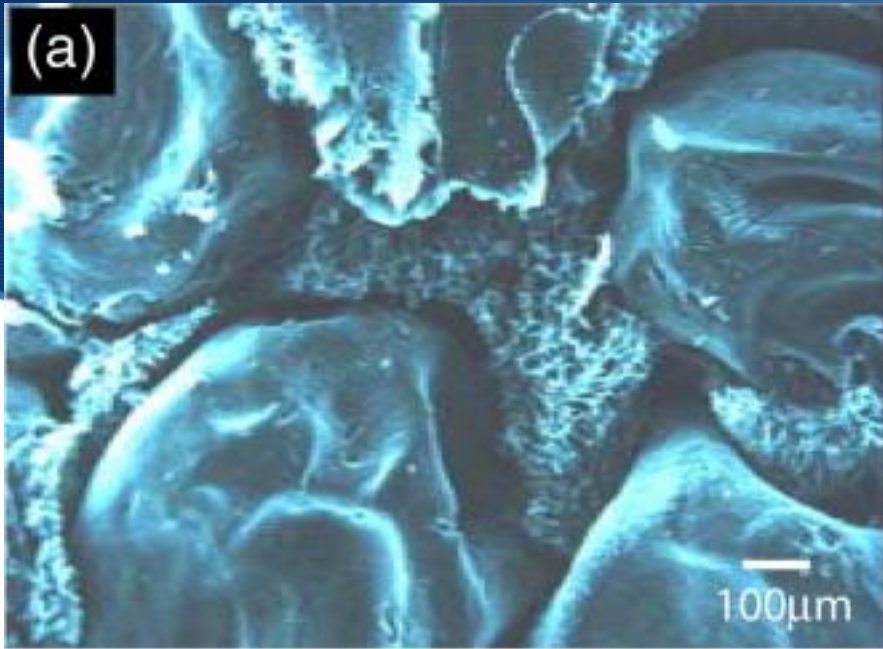
**A measure of the amount of fluid
able to flow through a material.**

**It is measured in units of volume per
unit time.**

Banff, Canada



Pores?



Hamasaki et al. (2008)

An **aquifer** is a geologic formation that can yield significant quantities of water to wells and springs.

aquifer

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An **aquitard** is a geologic formation that cannot yield significant quantities of water to wells and springs.

aquitard

An **confining bed** is a geologic formation (an aquitard) that binds an aquifer.

