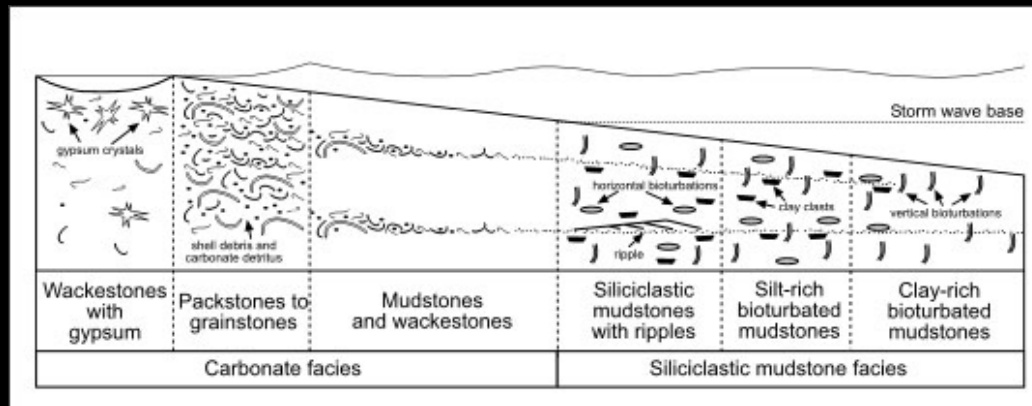


# Deposition on the far end - shale facies architecture as an archive for high-frequency cyclicity

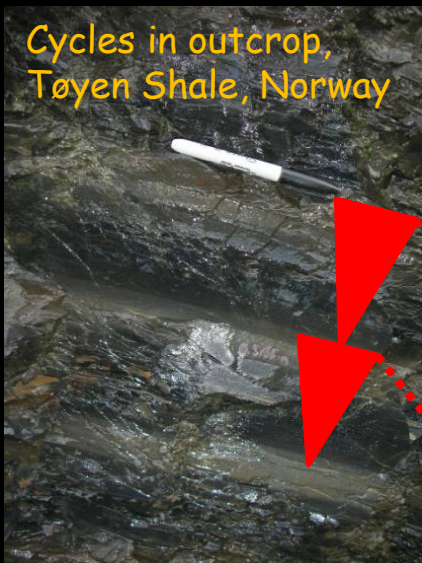
Sven Egenhoff, Department of Geosciences, Colorado State University

## The Alum and Tøyen Shale depositional systems of Scandinavia...

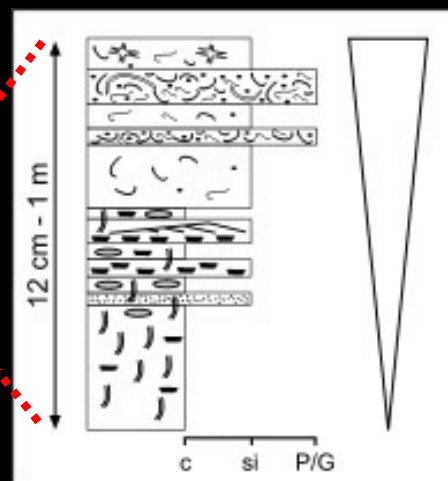


- show burrowing throughout; the depositional setting is therefore NOT anoxic
- contain ripples and irregular silt laminae as indicators for bed-load transport processes
- show 2 types of internal cyclicity:

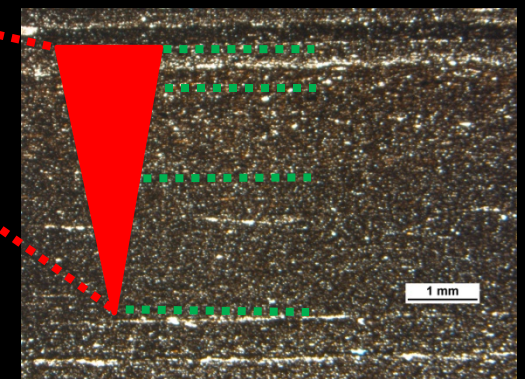
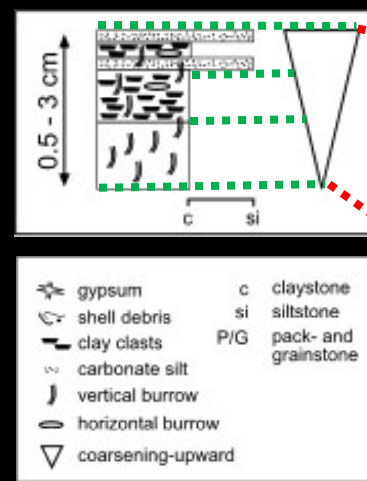
Cycles in outcrop, Tøyen Shale, Norway



(1) Milankovitch?-type  
decimeter-thick cycles



(2) Sub-Milankovitch  
centimeter-scale cycles



Thin section of Alum  
Shale, southern Sweden