

Analysis Seminar Stockholm University 2017-02-15

*Speaker:* **Elizabeth Wulcan**, Göteborg.

*Title:* **Generalized Monge-Ampère operators.**

*Abstract:* The complex Monge-Ampère operator is a useful tool in, e.g., analytic intersection theory, complex dynamics and Kähler geometry. A classical result by Bedford-Taylor asserts that if  $u$  is a bounded plurisubharmonic function on an  $n$ -dimensional complex manifold, the Monge-Ampère  $MA(u) = (dd^c u)^n$  is a welldefined positive closed current that can be obtained, e.g., as a limit of the Monge-Ampère of a sequence of smooth plurisubharmonic functions decreasing to  $u$ . This result has later been extended to the case when the unbounded locus of  $u$  has dimension zero.

I will discuss a generalization of this to the case when the unbounded locus of  $u$  is large, but  $u$  has analytic singularities; this is based on a joint work with Mats Andersson.