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# COMPLEX INTERPOLATION BETWEEN OPERATOR SPACES

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## Abstract

The classical Riesz-Thorin theorem says that if an operator  $T$  is contractive both on  $L_{p_0}$  and  $L_{p_1}$  then it is also contractive on  $L_p$  for  $p_0 < p < p_1$ . This led to the complex interpolation method (Calderon-Lions) between two Banach spaces  $B_0, B_1$ .

In this talk we will describe the interpolation spaces for the case when  $B_0, B_1$  are the spaces of bounded operators respectively on  $L_{p_0}$  and  $L_{p_1}$ , that is  $B_0 = B(L_{p_0})$  and  $B_1 = B(L_{p_1})$ .

**Date:** Wednesday, May 14, 2008

**Time:** 14:00

**Place:** IMBM Seminar Room, Boğaziçi University