Lie Group and Representation Theory Seminar
Kyoto 2006

Date: February 21 (Tue), 2006, 16:30–17:30
Place: RIMS, Kyoto University : Room 402
Speaker: Hubert Rubenthaler (IRMA, Strasbourg)
Title: Local Zeta functions for a class of real symmetric spaces

Abstract: Let G/H be a symmetric space which is embedded as an open set in $\mathbb{R}^n$, let P be a polynomial invariant of the action of G on G/H and let π be a representation of G admitting a generalized H-invariant vector u. Then for $f \in \mathcal{S}(\mathbb{R}^n)$ one can form the Zeta function:

$$Z(f, \pi, s) = \int_{G/H} f(\dot{g})|P(\dot{g})|^s \pi(\dot{g}) u d\dot{g}.$$

For a class of symmetric spaces we will make this definition precise in the case where π belongs to the spherical minimal series, and we will prove a functional equation.