

## ESI Programme on “K-Theory and Quantum Fields”

May 21 - July 27, 2012

Instructional Workshop

Tuesday, May 29 - June 1

Organized by: Matt Ando, Alan Carey, Harald Grosse, Jouko Mickelsson

Monday, May 28: bank holiday, ESI administration is closed

- **Tuesday, May 29**

**09:30 – 10:30:** Urs Schreiber

*Twisted differential structures in string theory I*

**10:30 – 11:00:** coffee break

**11:00 – 12:00:** Frederic Rochon

*K-duality on stratified spaces I*

**12:00 – 14:00:** lunch break

**14:00 – 15:00:** Daniel Stevenson

*An introduction to twisted K-theory and higher structures I*

**15:00 – 16:00:** break

**16:00 – 17:00:** tutorial

- **Wednesday, May 30**

**09:30 – 10:30:** Urs Schreiber

*Twisted differential structures in string theory II*

**10:30 – 11:00:** coffee break

**11:00 – 12:00:** Daniel Stevenson

*An introduction to twisted K-theory and higher structures II*

**12:00 – 14:00:** lunch break

**14:00 – 15:00:** John Francis

*Factorisation algebras and homology I*

- **Thursday, May 31**

**09:30 – 10:30:** John Francis

*Factorisation algebras and homology II*

**10:30 – 11:00:** coffee break

**11:00 – 12:00:** Urs Schreiber

*Twisted differential structures in string theory III*

**12:00 – 14:00:** lunch break

**14:00 – 15:00:** Frederic Rochon

*K-duality on stratified spaces II*

**16:00 – 17:00:** Matthias Lesch

*Regular operators in Hilbert  $C^*$ -modules*

- **Friday, June 1**

**09:30 – 10:30:** Urs Schreiber

*Twisted differential structures in string theory IV*

**10:30 – 11:00:** coffee break

**11:00 – 12:00:** Alan Carey

*~Analytic K-homology*

**16:00 - 17:00:** Matthias Lesch

*A gluing formula for the analytic torsion on singular spaces*

**All lectures take place in the ESI Boltzmann Lecture Hall**