

Centre de recherches mathématiques
Université de Montréal

Atelier «Pavage aléatoire, partitions aléatoires et processus de croissance
stochastique»
Du 1 au 5 septembre 2008

*Workshop “Random tilings, random partitions and stochastic growth
processes”
September 1-5, 2008*

HORAIRE / PROGRAM

Conférences : salle 6214
Pauses-café : salle 6245
Réception (1er septembre) : salle 6245

*Lectures: Room 6214
Coffee Breaks: Room 6245
Reception (September 1st): Room 6245*

Le lundi 1 septembre 2008 / *Monday, September 1, 2008*

09:00 - 09:30 Inscription (salle 5345) et café-croissants (salle 6245) / *Registration (Room 5345) and Coffee & Croissants (Room 6245)*

09:25 - 09:30 Mots de bienvenue / *Welcoming addresses*

09:30 - 10:20 **Kurt Johansson** (Royal Institute of Technology)
“Random matrices and random tilings”

10:20 - 11:10 **Evgeny Strahov** (The Hebrew University of Jerusalem)
“Measures on partitions, Pfaffian point processes, and the matrix hypergeometric kernel”

11:10 - 11:30 Pause-café / *Coffee break*
(Salle / *Room* 6245)

11:30 - 12:20 **Nicolas Destainville** (Université Paul Sabatier)
“Mixing times of Markov chains, the multi-decomposition technique, and flip dynamics in random tilings”

12:30 - 14:30 Pause-déjeuner / *Lunch break*

14:30 - 15:20 **Gerard Ben Arous** (NYU)
“À venir”
“TBA”

15:20 - 16:10 **Cédric Boutillier** (Université Paris VI)
“The critical Ising model on isoradial graphs via dimers”

16:10 - 16:30 Pause-café / *Coffee break*
(Salle / *Room* 6245)

16:30 - 17:20 **Filippo Colomo** (INFN, Sezione di Firenze)
“Arctic Curves for the Domain Wall six vertex model”

17:20 Réception vin et fromages (6245) / *Wine-and-cheese reception (6245)*

Le mardi 2 septembre 2008 / *Tuesday, September 2, 2008*

09:00 - 09:30 Café croissants (6245) / *Coffee & Croissants (6245)*

09:30 - 10:20 **Nicolai Reshetikhin** (University of California, Berkeley)

“À venir”

“TBA”

10:20 - 11:10 **Grigori Olshanski** (Institute for Information Transmission Problems)

“*Markov chains on partitions and time-dependent point processes*”

11:10 - 11:30 Pause-café / *Coffee break*

(Salle / *Room* 6245)

11:30 - 12:20 **Jason Fulman** (University of Southern California)

“*Some applications of random walk on partitions*”

12:30 - 14:30 Pause-déjeuner / *Lunch break*

14:30 - 15:20 **Senya Shlosman** (CNRS, Marseille-Luminy)

“*Gibbs Ensembles of Nonintersecting Paths and Determinantal Processes*”

15:20 - 16:10 **Aleksander Yu. Orlov** (Institute for Oceanology)

“*Phase transitions in random turn walk of hard core particles*”

16:10 - 16:30 Pause-café / *Coffee break*

(Salle / *Room* 6245)

16:30 - 17:20 **Andrei Okounkov** (Princeton University)

“*Noncommutative geometry of planar dimers - part I*”

Le mercredi 3 septembre 2008 / *Wednesday, September 3, 2008*

09:00 - 09:30 Café croissants (6245) / *Coffee & Croissants (6245)*

09:30 - 10:20 **Eric M. Rains** (California Institute of Technology)
“Elliptic hypergeometric integrals”

10:20 - 11:10 **Taro Nagao** (Nagoya University)
“Vicious walks and matrix models”

11:10 - 11:30 Pause-café / *Coffee break*
(Salle / *Room* 6245)

11:30 - 12:20 **Mihai Ciucu** (Georgia Institute of Technology)
“Combinatorial identities and the correlation function of gaps in dimer packings”

12:30 Pause-déjeuner et après-midi libre / *Lunch break and free afternoon*

Le jeudi 4 septembre 2008 / *Thursday, September 4, 2008*

09:00 - 10:20 Café croissants (6245) / *Coffee & Croissants (6245)*

10:20 - 11:10 **Christian Krattenthaler** (Universität Wien)
“The interaction of a gap with a free boundary in a two-dimensional dimer system”

11:10 - 11:30 Pause-café / *Coffee break*
(Salle / Room 6245)

11:30 - 12:20 **Andrei Okounkov** (Princeton University)
“Noncommutative geometry of planar dimers - part II”

12:30 - 14:30 Pause-déjeuner / *Lunch break*

14:30 - 15:00 **Eric Nordenstam** (Swedish Royal Institute of Technology)
“A particle dynamics related to the shuffling algorithm for the Aztec diamond”

15:00 - 15:30 **Mirjana Vuletic** (Caltech University)
“The shifted Schur process and generalized MacMahon’s formula”

15:30 - 16:00 **Vadim Gorin** (Moscow State University)
“Around lozenge tilings of a hexagon”

16:00 - 16:30 Pause-café / *Coffee break*
(Salle / Room 6245)

16:30 - 17:00 **Jeffrey Kuan** (California Institute of Technology)
“Asymptotics of Plancherel measures for the infinite-dimensional unitary group”

17:00 - 17:30 **Sevak Mkrtchyan** (University of California, Berkeley)
“Random skew plane partitions with a piecewise periodic back wall”

Le vendredi 5 septembre 2008 / *Friday, September 5, 2008*

09:30 - 10:20 Café croissants (6245) / *Coffee & Croissants (6245)*

10:20 - 11:10 **Tomohiro Sasamoto** (Faculty of Science, Chiba University)
“The fluctuations of a tagged particle in one-dimensional exclusion process”

11:10 - 11:30 Pause-café / *Coffee break*
(Salle / *Room* 6245)

11:30 - 12:20 **Patrik Ferrari** (WIAS-Berlin)
“Anisotropic growth of random surfaces in 2+1 dimensions”

12:30 Fin de l'atelier / *Closure of the workshop*