Banff International Research Station
for Mathematical Innovation and Discovery

Approximation Algorithms and Hardness of Approximation
Nov 27-Dec 2, 2011

MEALS

*Breakfast (Buffet): 7:00–9:30 am, Sally Borden Building, Monday–Friday
*Lunch (Buffet): 11:30 am–1:30 pm, Sally Borden Building, Monday–Friday
*Dinner (Buffet): 5:30–7:30 pm, Sally Borden Building, Sunday–Thursday
Coffee Breaks: As per daily schedule, in the foyer of the TransCanada Pipeline Pavilion (TCPL)
***Please remember to scan your meal card at the host/hostess station in the dining room for each meal.**

MEETING ROOMS

All lectures will be held in the new lecture theater in the TransCanada Pipelines Pavilion (TCPL). LCD projector, overhead projectors and blackboards are available for presentations.

SCHEDULE

Sunday

16:00	Check-in begins (Front Desk - Professional Development Centre - open 24 hours)
	Lecture rooms available after 16:00 (if desired)
17:30–19:30	Buffet Dinner, Sally Borden Building
20:00	Informal gathering in 2nd floor lounge, Corbett Hall (if desired)
	Beverages and a small assortment of snacks are available on a cash honor system.

Monday

7:00–8:45	Breakfast
8:45–9:00	Introduction and Welcome by BIRS Station Manager, TCPL
9:00–10:30	Contributed talks
	Nikhil Bansal: *"The randomized k-server problem"*
	Kunal Talwar: *"Low Rank Scheduling"*
	Glencora Borradaile: *"A guide to polynomial-time approximation schemes for connectivity problems in planar graphs"*
10:30–11:00	Coffee Break
11:00–12:00	Plenary talk
	Julia Chuzhoy: *"Routing in Undirected Graphs with Constant Congestion"*
12:00–13:30	Lunch
13:00–14:00	Guided Tour of The Banff Centre; meet in the 2nd floor lounge, Corbett Hall
14:00	Group Photo; meet on the front steps of Corbett Hall
16:00–18:00	Contributed talks + tutorial
	James Lee: *"L_1 embeddings, differentiation, and Sparsest Cut"*
	Lisa Fleischer: *"Online Mixed Packing and Covering"*
	Konstantinos Georgiou: *"Lift and project tutorial"*
18:00–19:30	Dinner

Tuesday

7:00–9:00	Breakfast
9:30–10:30	TSP Session 1
	Amin Saberi: *"A Randomized Rounding Approach to the Traveling Salesman Problem"*
10:30-11:00	Coffee Break
11:00-12:00	TSP Session 2
	Ola Svensson: *"Approximating Graphic TSP by Matchings"*
12:00–13:30	Lunch
16:30–18:00	Contributed talks
	David Shmoys: *"Improving Christofides Algorithm for the $s-t$ Path TSP"*
	Anke van Zuylen: *"The Subtour LP for the Traveling Salesman Problem (A Proof of the Boyd-Carr Conjecture)"*
	Zachary Friggstad: *"Multiple Traveling Salesmen in Asymmetric Metrics"*
18:00–19:30	Dinner

Wednesday

7:00–9:00	Breakfast
9:00–10:30	Contributed talks
	Konstantin Makarychev: *"How to Play Unique Games Against a Semi-Random Adversary"*
	Yi Wu: *"Lovasz versus Local Distribution: the Approximability of Multiway Partitioning Problems"*
	Alantha Newman: *"A counterexample to Beck's Three Permutations Conjecture"*
10:30–11:00	Coffee Break
11:00–12:00	Plenary talk
	David Steurer: *"Semidefinite Programming Hierarchies and the Unique Games Conjecture"*
12:00–13:30	Lunch
16:00-17:00	Plenary talk
	Dana Moshkovitz: *"The Sliding Scale Conjecture From Intersecting Curves"*
17:00–18:00	Contributed talks
	Chaitanya Swamy: *"Facility location with client latencies: LP-based techniques for minimum-latency problems"*
	Adrian Vetta: *"Packet Routing with BGP"*
18:00–19:30	Dinner

Thursday

7:00–9:00	Breakfast
9:00–10:30	Contributed talks

Yury Makarychev: *"The Grothendieck Constant is Strictly Smaller than Krivine's Bound"*

Per Austrin: *"Inapproximability of Treewidth and Related Problems"*

Uri Feige: *"Universal factor graphs"*

10:30–11:00	Coffee Break
11:00-12:00	Plenary talk

Nisheeth Vishnoi: *"Hardness of Approximating the Closest Vector Problem (with Pre-Processing)"*

12:00–13:30	Lunch
16:30–18:00	Contributed talks

Jochen Konemann: *"Weighted Capacitated, Priority, and Geometric Set Cover via Improved Quasi-Uniform Sampling"*

Mohit Singh: *"Online Algorithms for Node-weighted Network Design Problems"*

Sanjeev Khanna: *"Improved Approximation Algorithms for the Stochastic Knapsack Problem"*

18:00–19:30	Dinner

Friday

7:00–9:00	Breakfast
9:00–10:30	Contributed talks

Thomas Rothvoss: *"Directed Steiner Tree and the Lasserre Hierarchy"*

Guyslain Naves: *"Approximating rooted Steiner network"*

Jaroslaw Byrka: *"Iterative randomized rounding for Steiner Tree"*

10:30–11:00	Coffee Break
12:00–13:30	Lunch

Checkout by 12 noon.

** 5-day workshop participants are welcome to use BIRS facilities (BIRS Coffee Lounge, TCPL and Reading Room) until 3 pm on Friday, although participants are still required to checkout of the guest rooms by 12 noon. **