

MIT Quantum Summer School Program

Talk Schedule for week 2: August 9th - 13th

Monday, August 9th

Time

8:00-9:00am	Breakfast (335 & 337 West Hall)
9:00-10:00am	Brian DeMarco (University of Illinois at Urbana-Champaign) <i>Experimental aspects of ultra-cold atoms in optical lattices, including spin-dependent lattices</i>
10:00-10:30am	COFFEE BREAK (335 & 337 West Hall)
10:30-11:30am	Ana Maria Rey (JILA) <i>Ultra-cold atoms in optical lattices: an overview</i>
11:30-1:30pm	LUNCH & DISCUSSION (Ground Level Food Court in Ross School of Business)
1:30-2:30pm	Ana Maria Rey (JILA) <i>Ultra-cold atoms in optical lattices: an overview</i>
2:30-3:30pm	Joseph Thywissen (Toronto) <i>Quantum Gas Basics</i>
3:30-4:00pm	COFFEE BREAK (335 & 337 West Hall)
4:00-5:00pm	Joel Moore (University of California, Berkeley) <i>Searching for non-equilibrium universality with ultracold atoms</i>
5:00-6:00pm	Poster Session & Discussion

Tuesday, August 10th

Time

8:00-9:00am	Breakfast (335 & 337 West Hall)
9:00-10:00am	Ana Maria Rey (JILA) <i>Ultra-cold atoms in optical lattices: an overview</i>
10:00-10:30am	COFFEE BREAK (335 & 337 West Hall)

10:30-11:30am	Brian DeMarco (University of Illinois at Urbana-Champaign) <i>Experimental aspects of ultra-cold atoms in optical lattices, including spin-dependent lattices</i>
11:30-1:30pm	LUNCH & DISCUSSION (Ground Level Food Court in Ross School of Business)
1:30-2:30pm	Joseph Thywissen (Toronto) <i>Bose Josephson Junctions</i>
2:30-3:30pm	Dan Stamper-Kurn (University of California, Berkeley) <i>Spinor Bose gases</i>
3:30-4:00pm	COFFEE BREAK (335 & 337 West Hall)
4:00-5:00pm	Joel Moore (University of California, Berkeley) <i>Quantum information concepts in condensed matter</i>
5:00-6:00pm	Poster Session & Discussion

Wednesday, August 11th

Time	
8:00-9:00am	Breakfast (335 & 337 West Hall)
9:00-10:00am	Joel Moore (University of California, Berkeley) <i>Realizing topological phases with ultracold atoms</i>
10:00-10:30am	COFFEE BREAK (335 & 337 West Hall)
10:30-11:30am	Brian DeMarco (University of Illinois at Urbana-Champaign) <i>Experimental aspects of ultra-cold atoms in optical lattices, including spin-dependent lattices</i>
11:30-1:30pm	LUNCH & DISCUSSION (Ground Level Food Court in Ross School of Business)
1:30-2:30pm	Joseph Thywissen (Toronto) <i>Ultracold Ferromagnetism</i>
2:30-3:30pm	James Thompson (JILA) <i>Fundamentals of Cavity QED</i>
3:30-4:00pm	COFFEE BREAK (335 & 337 West Hall)
4:00-5:00pm	Dan Stamper-Kurn (University of California, Berkeley)

Spinor Bose gases / Cavity optomechanics

5:00-6:00pm Poster Session & Discussion

Thursday, August 12th

Time

8:00-9:00am Breakfast (335 & 337 West Hall)

9:00-10:00am Dan Stamper-Kurn (University of California, Berkeley)
Cavity optomechanics

10:00-10:30am COFFEE BREAK (335 & 337 West Hall)

10:30-11:30am Seth Lloyd (MIT)
Simulating the Universe

11:30-1:30pm LUNCH & DISCUSSION (Ground Level Food Court in Ross School of Business)

1:30-2:30pm Seth Lloyd (MIT)
Simulating the Universe

2:30-3:30pm James Thompson (JILA)
Beating Quantum Projection Noise

3:30-4:00pm COFFEE BREAK (335 & 337 West Hall)

4:00-5:00pm Luming Duan (University of Michigan)
Quantum simulation of many body physics with cold atoms and classical computers

5:00-6:00pm Poster Session & Discussion

Friday, August 13th

Time

8:00-9:00am Breakfast (335 & 337 West Hall)

9:00-10:00am James Thompson (JILA)
Collective Interactions between Atoms and Light

10:00-10:15am COFFEE BREAK (335 & 337 West Hall)

10:15-11:30am	LAB TOURS (see sign-up sheet at registration desk)
11:30-1:30pm	LUNCH & DISCUSSION (Ground Level Food Court in Ross School of Business)
1:30-2:30pm	Georg Raithel (University of Michigan) <i>Applications of Rydberg Atoms in QIP</i>
2:30-3:30pm	Seth Lloyd (MIT) <i>Simulating the Universe</i>
3:30-4:00pm	Closing Remarks
4:30pm	Dominick's