

THEO MURPHY INTERNATIONAL SCIENTIFIC MEETING  
**Emergence of new exotic states at interfaces with superconductors**

DAY 1 - 27 March 2014				DAY 2 – 28 March 2014			
SESSION 1 - Majorana's in superconductors and superfluids Chair: Laura Greene		SESSION 2 - Odd frequency generated superconductivity in ferromagnets Chair: James Annett		SESSION 3 - Superconductor - Topological Insulator Proximity effects Chair: Nadya Mason		SESSION 4 - Future horizons Chair: Oded Millo	
08.50	Welcome by lead organiser						
09.00	<b>Carlo Beenakker</b> Majorana fermions in quantum spin Hall insulators	13.30	<b>Sebastian Bergeret</b> Singlet-triplet conversion in superconductor-ferromagnet systems with spin-orbit coupling	09.00	<b>Yukio Tanaka</b> Theory of superconducting topological insulator	13.30	<b>Alexander Balatsky</b> Odd frequency pairing in hybrid structures and multiband superconductors
09.30	Discussion	14.00	Discussion	09.30	Discussion	14.00	Discussion
09.45	<b>Leo Kouwenhoven</b> Majorana fermions in nanowires	14.15	<b>Norman Birge</b> Triplet supercurrents in ferromagnetic Josephson junctions	09.45	<b>Yoichi Ando</b> Superconducting topological insulators	14.15	<b>Tomas Löfwander</b> Spin-mixing phenomena in superconductors
10.15	Discussion	14.45	Discussion	10.15	Discussion	14.45	Discussion
10.30	<b>Coffee</b>	15.00	<b>Tea</b>	10.30	<b>Coffee</b>	15.00	<b>Tea</b>
11.00	<b>James Sauls</b> Topological edge and surface states of superfluid $^3\text{He}$	15.30	<b>Jan Aarts</b> Supercurrents in half-metallic ferromagnetic oxides	11.00	<b>Erhai Zhao</b> Andreev states in superconductor/topological insulator hybrid structures	15.30	<b>Mark Blamire</b> Magnetic Insulator Josephson Tunnel Junctions
11.30	Discussion	16.00	Discussion	11.30	Discussion	16.00	Discussion
11.45	<b>Liang Fu</b> Majorana Fermions	16.15	<b>Elke Scheer</b> Probing odd-triplet contributions to the proximity effect by scanning tunneling spectroscopy	11.45	<b>Jagadeesh Moodera</b> Broken symmetry by interface exchange-coupling in TI thin film heterostructures	16.15	<b>Panel discussion/Overview/ Summary of meeting</b>
12.15	Discussion	16.45	Discussion	12.15	Discussion	17.00	<b>CLOSE</b>
12.30	<b>LUNCH</b>	17.00	<b>Wolfgang Belzig</b> Noise correlation signatures of Majorana modes and thermo-electricity in superconductor-ferromagnet heterostructures	12.30	<b>LUNCH</b>		
		17.30	<b>CLOSE</b>				