

IOP Institute of Physics



Science & Technology Facilities Council
Particle Physics Department

Dalitz Institute, Oxford Theory Subdepartment

A black silhouette of the Oxford skyline, featuring various church spires and buildings.

BOOST 2010

Giving new physics a boost...

22 - 25 June, Oxford, UK

Welcome from the Department



Prof Roger Davies
Chairman of Physics



Prof. Brian Foster
Head of PP Subdepartment

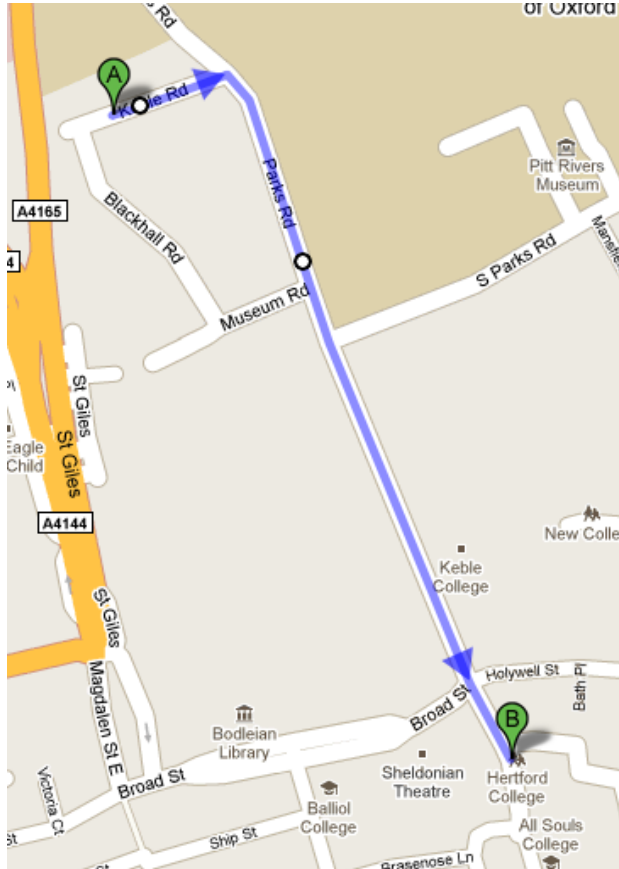
Local Organisation

- Organizing Committee
 - A. Carslaw (IT support)
J. Ferrando
S. Geddes (Admin head)
C. Issever
M. Karagoz (Chair)
J. March-Russell
A. Sherstnev
 - Admin & IT Support
 - Laura Nevay
Kim Proudfoot
 - Stig Topp-Jorgensen
Chris Hunter
 - Student helpers
 - Ryan Buckingham
Adrian Lewis
Sarah Livermore
Katie Oliver
- Many thanks!

Advisory Committee: Many thanks!

- J. Butterworth (UCL)
R. Chierici (CNRS/IPN Lyon)
A. de Roeck (CERN)
N. Glover (IPPP Durham)
A. Haas (SLAC)
C. Shepherd-Themistocleous (RAL)
T. Tait (UC Irvine)
J. Thaler (MIT)
M. Vos (IFIC Valencia)
J. Wacker (SLAC)

Hertford College



A: DWB
B: Hertford

- Workshop hosting college
 - many thanks to Prof. Robin Devenish
- **Welcome reception**
 - (Tuesday, 6-7pm)
- **Workshop dinner** with pre-drinks
 - (Wednesday, 6:45-10:00pm)



Prof. Robin Devenish
Dean of Hertford

Practical Matters

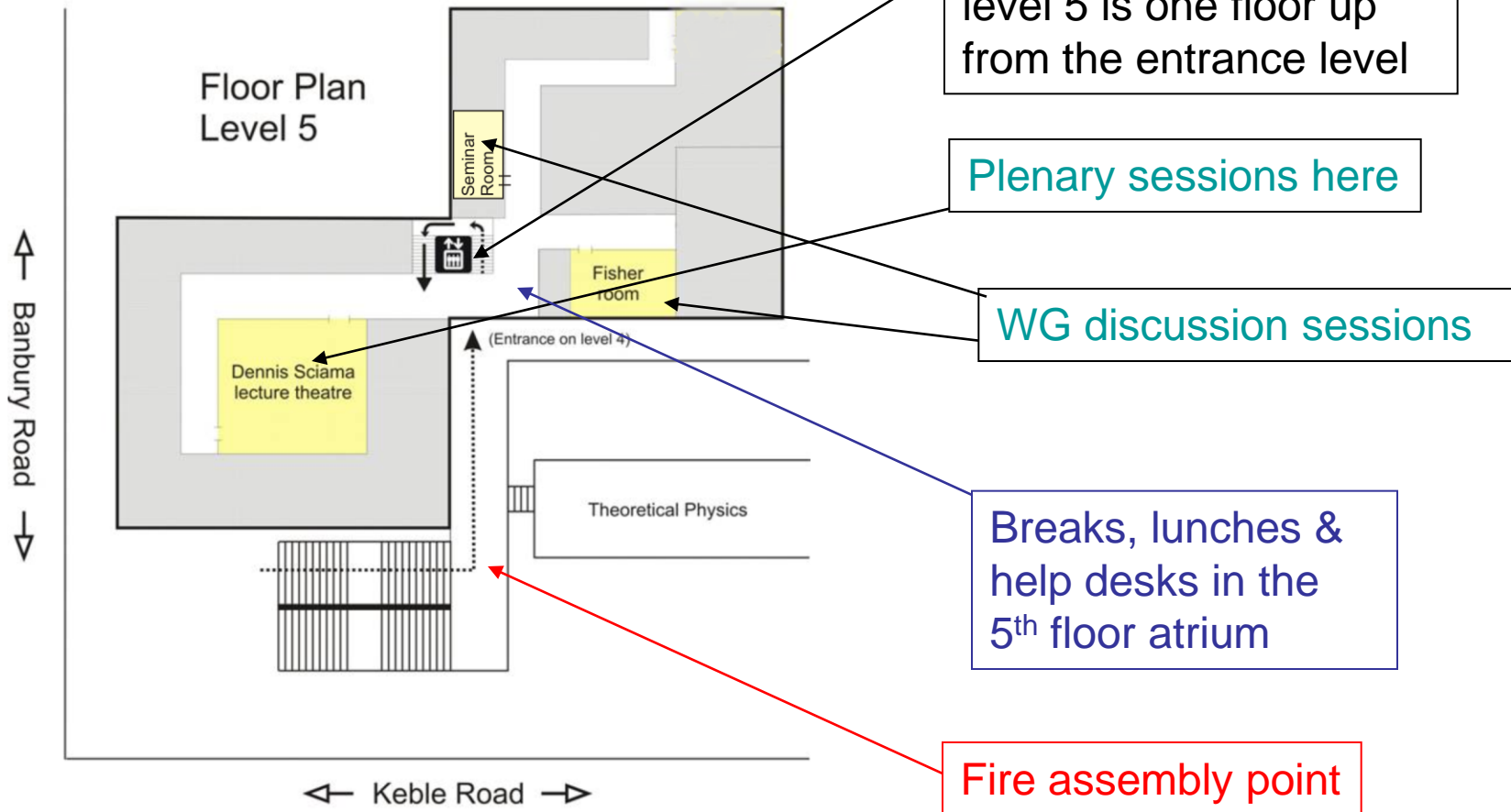
- DWB Reception on 4th floor open 8:30am-5:00pm
 - Disabled access on 3rd floor, north face of DWB
- Registration Desk: DWB 5th floor
- Admin: DWB 6th floor
- Common Room: DWB 5th floor
 - Tea, coffee = 10:00am-4:20pm
 - Lunch = 12:00-1:30pm
- Restrooms: DWB 3rd (gentlemen), 4th and 6th floors
- Please wear your badge at all times. You will need it to access to
 - DWB Physics building & Hertford College

Meeting Venues

- **Plenary** sessions:
 - Dennis Sciama Lecture Theatre: 8:00-8:00 Tues - Fri
- Working group/discussion sessions (all on 5th floor):
 - Seminar room: **Lepton WG**, 8:00-8:00 Tues - Fri
 - Fisher room: **Hadronic WG**, 8:00-8:00 Tues -Fri
except for 11:00 a.m.-13:00 p.m on Wed (hadronic WG discussion will be in Dennis Sciama building)
- Dalitz Theory Institute fish tank behind 4th floor reception: also available for use during the day

DWB 5th floor plan

Denys Wilkinson Building



Toilets can be found close to the central staircase on level 4 and 6.

Local Attractions

- Museums:
 - Pitt Rivers & National History
 - Ashmolean, ...
- University and Colleges:
 - Radcliffe Camera
 - Bodleian Library
 - Christ Church College
 - Magdalen College, ...
- Recreational:
 - University Parks
 - Punting (near Magdalen College)
 - Walk to Trout (Port Meadow)



Pubs

pubs near Oxford OX13RH, UK



[The Eagle and Child](#) [- more info >](#)



49 Saint Giles, Oxford OX1 3LU -
01865 302 925

This place has unverified edits.

★★★★★ 57 reviews

"The farm and I visited the Bird and Brat last summer and found the food ..."



[Royal Oak](#) [- more info >](#)



42-44 Woodstock Road, Oxford OX2
6HT - 01865 310 187

Category: Pubs, Bars & Inns

This place has unverified edits.

★★★★★ 17 reviews

"Lots of nice variations on seating, interesting furniture and plenty of ..."



[Lamb & Flag](#) [- more info >](#)



12 Saint Giles, Oxford OX1 3JS -
01865 515 787

This place has unverified edits.

★★★★★ 45 reviews

"and friendly former coaching inn serves a good range of real ales and ..."



[The Turf Tavern](#) [- more info >](#)



7 Holywell Street, Oxford OX1 3SU -
01865 243 235

Category: Pubs, Bars & Inns

★★★★★ 138 reviews

"A regular stop whenever I'm in this town. a big selection of cask ales, ..."



[Duke Of Cambridge](#) [- more info >](#)



5-6 Little Clarendon Street, Oxford
OX1 2HP - 01865 558 173

Category: Pubs, Bars & Inns

★★★★★ 11 reviews

"This does mean that the place gets very busy at these times, but if you ..."



[Angels](#) [- more info >](#)



Dartington House, 55 Little Clarendon
Street, Oxford OX1 2HS -
01865 554 224

Category: Pubs, Bars & Inns

29 reviews

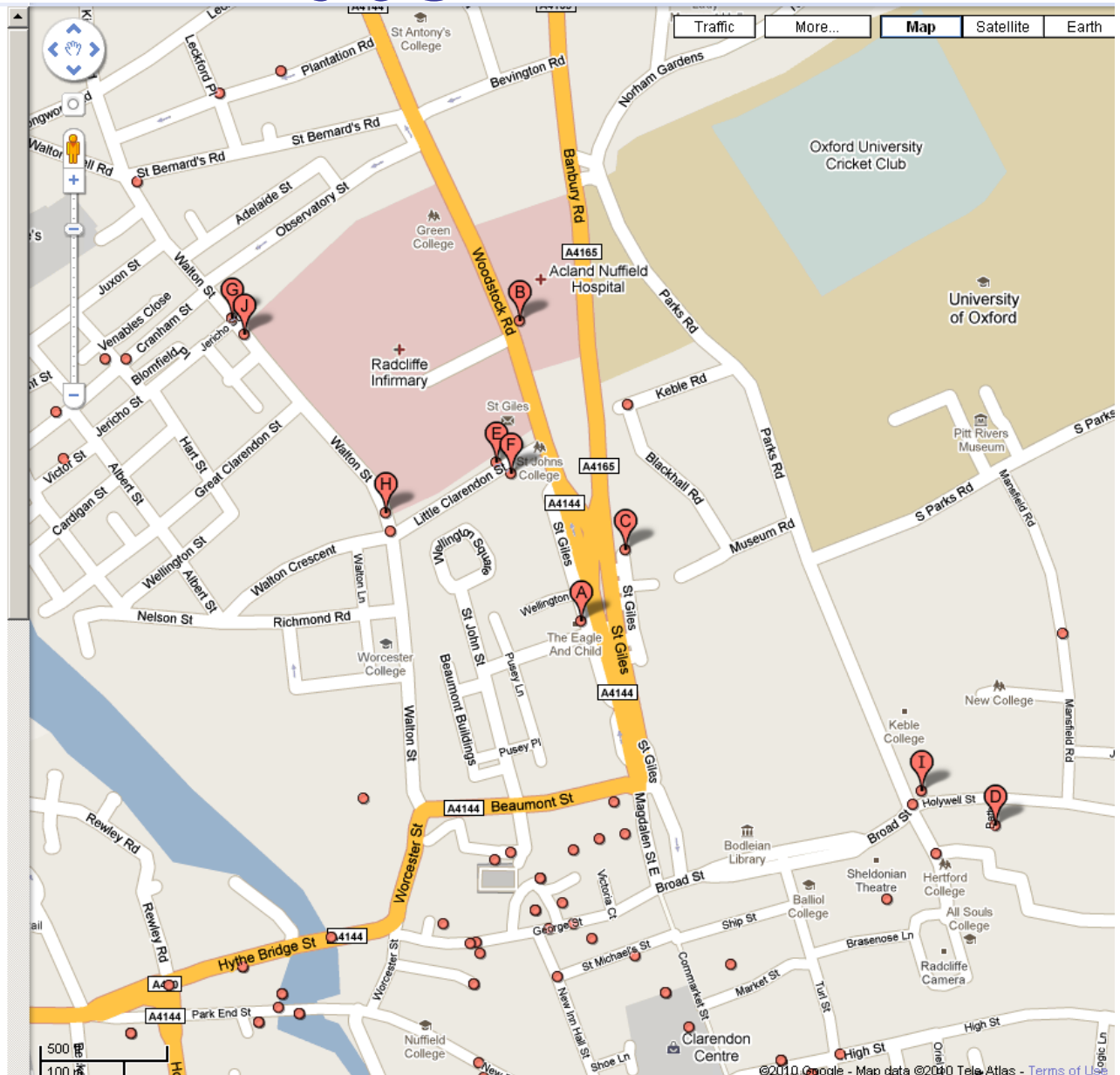
"We had a great time trying out their huge drink menu with no regrets because ..."



[Jericho Tavern](#) [- more info >](#)



56 Walton Street, Oxford, Oxfordshire
OX2 6AE - 01865 311 775



A Few Announcements

- Wireless available in the building (registration pack for details)
- Workshop **photo** on Thursday (possibly right after the morning plenary session)
 - Congregate on the walkway outside the front door.
- 2 terminals will be available in Fisher room.
- Let us know if you have special needs and we will help.

Boost2010 Overview & Objectives

- Topics include: boosted tops ("t-tagging"), Higgs, W, and Z bosons, "lepton jets",

Aim:

- Bring together theorists and experimentalists to study physics behind boosted signatures, how to detect them and which tools to use
- Better understanding of what measurements need to be made this year and their efficient feedback to theorists
- Common tools/standards to increase efficiency in comparing various algorithms in the market to better evaluate their effectiveness
- Better understanding of how well experiments can utilize and calibrate such tools given their specific detectors
- A wiki is in place for information sharing:
<https://atlaswiki.physics.ox.ac.uk/bin/view/Boost2010>

Programme Overview

- Tuesday:
 - Morning: introductory talks
 - Afternoon: first data results
- Wednesday: Boosted signatures overviews
 - Morning: experimental results/prospects
 - Afternoon: BSM models signatures
- Thursday: Subject talks
 - Morning: W/Z and tops (mostly) hadronic
 - Afternoon: Higgs and leptonic
- Friday:
 - Morning: summaries from WG conveners and final discussion

Working Groups

- WG Conveners:
 - **Leptonic:**
 - Theory: **Jay Wacker (SLAC)**
 - Experiment: **Chris Hill (CMS, Univ. Bristol)**
 - **Hadronic:**
 - Theory: **Michael Spannowsky (Univ. Oregon)**
 - Experiment: **Marcel Vos (ATLAS, IFIC Valencia)**
- Aim is to initiate/continue work towards achieving the objectives
- Discussion sessions are set for WG. All day work is possible, of course. :)
- End of workshop summaries from conveners on Friday morning
 - May have daily reports as well, TBS...
- Proceedings: TBS (no more than 20 pages).

Brand-new results in time for Boost2010!

- Just to mention a few...
- Experiments:
 - CDF jets and tops
 - D0 W/Z+jets
 - A last-minute nice surprise from CMS!
- Theory:
 - Freshly finished papers (most will be presented on Thursday) and ongoing work
- A few theory papers are already linked on boost2010 Wiki:
<https://atlaswiki.physics.ox.ac.uk/bin/view/Boost2010>

Looking forward to a fruitful
workshop!

Thanks for coming!
Welcome & Enjoy!

