

THE CAMBRIDGE STATISTICS DISCUSSION GROUP  
**PLEASE NOTE SLIGHTLY LATER START TIME & CHANGE OF SPEAKER:**  
**PLEASE NOTE WE ARE NOW USING A DIFFERENT ROOM FOR THE MEETING AT AMGEN**  
**TO THAT ORIGINALLY PUBLISHED (SEE DIRECTIONS BELOW)**

**Thursday 7th May 2009 7:30 for 8:00**

Amgen Ltd,  
Cambridge Science Park,  
Milton Road,  
Cambridge CB4 0WG

## **Rainfall triggered volcanic activity at Soufriere Hills Volcano, Montserrat.**

**Adrian Matthews,**  
University of East Anglia, Norwich

**Abstract:** On 29 July 2001, the Soufriere Hills Volcano, on the Caribbean island of Montserrat, experienced a major eruption. This coincided with the passage of a tropical weather system and 100 mm of rain on the same day. There had been no significant rain or volcanic activity within at least the preceding 7 months. Coincidence? The talk will present a statistical analysis of several years of available rainfall and volcanic data from Montserrat. Far from being a one-off occurrence, such rainfall-triggered volcanic activity occurs frequently, and may be incorporated into volcanic hazard prediction models. Some physical-mathematical model results will also be presented, that try and answer how rainfall can trigger volcanic activity.

**Speaker:** Adrian's background is in physics and meteorology. His research interests are in climate variability and modelling (especially tropical meteorology) which has involved visits to, amongst others, West Africa and Antarctica, as well as Montserrat. He is currently a reader in the School of Environmental Sciences and School of Mathematics at the University of East Anglia.

**Directions:** Head north on Milton Road. Two traffic lights before the A14 turn left into the Science Park (clearly signposted). Turn left at the roundabout. The meeting takes place at Amgen in the restaurant in building 214 (the ground floor of the middle building on the attached map which is also at <http://imaging.mrc-cbu.cam.ac.uk/statswiki/csdg/amgen>).

Parking is available on site. There will be no admittance after 8pm.

Arrivals after 8pm can gain admittance by contacting the secretary on 07761769436.

**If anyone would like complementary transport to the talk venue from Central Cambridge please inform the secretary in advance of the meeting.**

### **Provisional Next Meetings:**

20th October – Andrew McGuinness (EMB Consulting) on 'Uses of Monte Carlo methods in General Insurance'.

18th November – Anne Campbell (Cams & P'boro Mental Health Partnership NHS Trust and former MP for Cambridge).

**Supper:** Some members eat regularly in the University Centre before each meeting at 5-45pm. Feel free to join them.

**Subscriptions:** of 1 pound are now due for attending the 2007-2008 session.

**Secretary:** Peter Watson, MRC Cognition and Brain Sciences Unit, 15 Chaucer Road, Cambridge CB2 7EF; telephone 01223 355294 Extension 801; E-mail [peter.watson@mrc-cbu.cam.ac.uk](mailto:peter.watson@mrc-cbu.cam.ac.uk)

**Take a look at our website:** <http://www.mrc-cbu.cam.ac.uk/people/peter.watson/csdg.html>