



Badges

Please wear your badge at all times, otherwise you may well forget who you are.

Newcastle people and conference helpers have stars on their badges and perplexed looks on their faces to aid identification of those with local knowledge.

Today's talks

Day outline

9:30 Osin 3; 10:30 Coffee; 11:00 Tiep 2; 13:00 Excursion.

Abstracts

Abstracts of all talks can be obtained as a pdf file from the conference website. We can print paper copies of the abstract booklet for those that need one. Please speak to a helper about this.

Today: Excursion

The excursion is to Hadrian's Wall. There will be the option to either go for a walk along a length of the wall, or to explore one of the many Roman Forts along the wall. Coaches will leave from Claremont Rd at 1pm. Plan for the trip: Drop-off at 1.30pm at Housesteads, walk slowly to the Twice Brewed Inn (arrive approx 3pm), rest for a bit and then depart 3.45pm, arriving at Vindolanda at 4.30pm. The coach will depart Vindolanda at 6pm.

Pub of the day!

The classy *Wobbly Duck*, on the grassy Eldon Square.

Quote of the Day!

Two things are certain: every group is Sofic and human stupidity; and I'm not sure about human stupidity.

– Albert Einstein

An interview with Sarah Rees

We interviewed via e-mail local prof. and 1981 Groups St Andrews attendee Sarah Rees.

Question 1: *Which is your favourite of Thompson's group F , T and V , and why isn't it T ?*

I think very little about T , and so I guess it shouldn't be my favourite, but at least it has the advantage that I know which one it is (the one in the middle). I find

the names of those 3 groups so unhelpful, that I never know which is which. But you can't give the same object several different names (well, some people try to, but I don't find that very helpful), so we're stuck with names for those groups that tell me nothing...

Question 2: *What is your favourite automatic group that is not biautomatic?*

Now that IS a tricky one, there are just SO many options to choose from. I'll think about it...

Question 3: *Now that you are retiring, is there something you wish you had known at the start of your career?*

Hmmm. Maybe I shouldn't have worried so much about job security (but it's hard not to worry...) and just had more fun? Probably it would have helped to have spent some time learning a few more diplomatic skills...

Food, glorious food!

Lunch

A packed lunch is provided today for all who want one (including those staying in Newcastle).

Dinner

A description of a large number of places to eat/drink is here: <https://tinyurl.com/5n7r989x>

Plan ahead! Talks on Thursday

Day outline

9:30 Kassel 3; 10:30 Coffee; 11:00 Pevtsova; 12:00 Lunch; 13:30 Contributed talks; 14:30 Hulpke; 15:30 Coffee; 16:00 Tiep 3; 17:30 Organ recital

Contributed talks

13:30am – 14:30pm, Location – 4th Floor Herschel, Teaching Room 4 (HERB.4.TR4)

Chair: Jill Dietz

Mattia Brescia: *On the absolute centre of a group*
María José Felipe: *Structure of a normal subgroup from its G -character tables*

13:30am – 14:30pm, Location – 4th Floor Herschel, Teaching Room 2 (HERB.4.TR2)

Chair: Colva Roney-Dougal

Peiran Wu: *Irredundant bases for the primitive actions of the symmetric and the alternating groups*
Hongyi Huang: *Base-two primitive permutation groups*

Weekend check-out

When leaving Castle Leazes on Saturday, post keys and key-cards through the vent in the reception door.

Wifi

Wifi is available across the campus either as Eduroam or Wifi Guest. If you have an Eduroam account then use that, otherwise ask at the registration desk for help getting on the Wifi Guest network.

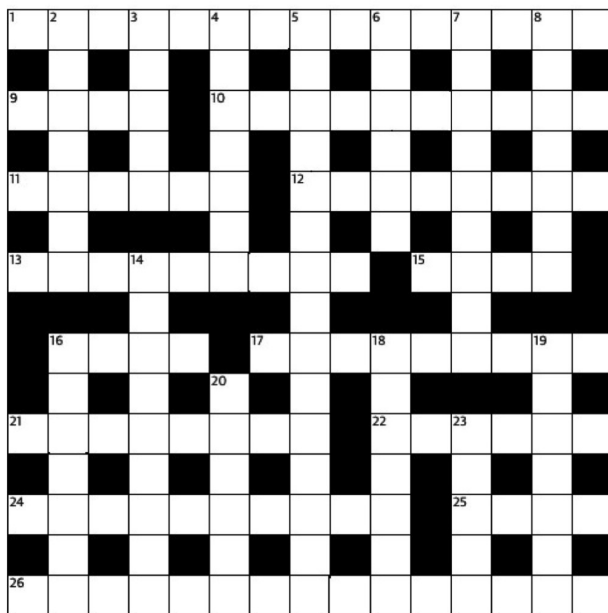
Taxis

Try Blue Line taxis on 0191 262 6666. They also have an app you can download.

For those with no soul, there is also Uber.

Puzzle section

Crossword



Set by Trickster

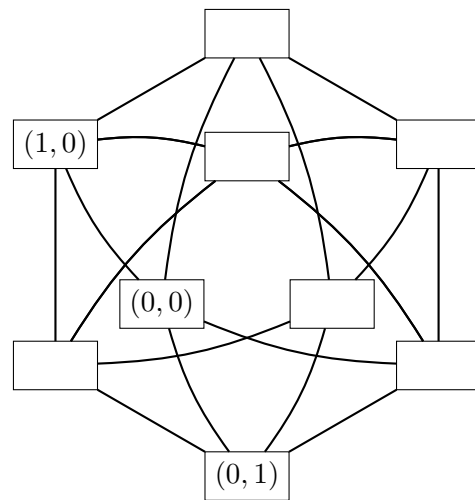
Across

1. Set password ‘rung’. Disoriented? This is the place to be. (6,2,7).
9. For starters, the undertaker never appreciated fish. (4)
10. Muddled local fever might be lucky. (6,4)
11. Old boys see compound in reverse. (6)
12. Being who you are, this is always found in an object from 1. (8)
13. It’s absolutely vital that bewildered Elena sits. (9)
15. Policeman with unknown duplicate. (4)
16. Dog lost her head; that’s an irritation. (4)
17. Publicity calling for a confession. (9)
21. Dwell back on headland – it’s depraved. (8)
22. Pictures of current wise men. (6)
24. In favour of exam, worker is a follower of a particular religion. (10)
25. Improve condition in the alley. (4)
26. Well is enchanted? That’s out of order. This year 1 is being ... (4,2,9)

Down

2. Worries that don’t start with this currency. (7)
3. Take weapons away from the middle of Hun army. (5)
4. Clearly expressed, adding more would lead to concert music confusion. (8)
5. Cholera, for example, or cancer confounds sales idea. (8,7)
6. Left out? Annoyed but necessary. (6)
7. Relatives bewildered, so reliant. (9)
8. Question about energy; key to being rich. (7)
14. Another key date; AI was perplexed but became more intense. (9)
16. In poetry if an element combines with this you will get the 12. (7)
18. Amin has zero movement – that’s ridiculous! (7)
19. Taking everything into account, this can protect your clothes. (7)
20. Add salt to child under the ocean. (6)
23. Remains of tree with opponents at card table. (5)

The Daily Cayley Graph



Cayley Table Sudoku

	a	b	c
a			
b		a	
c			

	a	b	c	d
a	b			
b	c			
c				
d				

Solutions will appear in **The Daily Group Theorist** later in the week.

Open problems.

Still at a loose end? Here are two still-open problems from the 1st edition of the Kurovka Notebook, 1965.

- 1.3 (Mal’cev) Is the group ring $\mathbb{Z}[G]$ of a right-ordered group G embeddable into a skew field?
- 1.12 (Magnus) The problem of the isomorphism to the trivial group for all groups with n generators and n defining relations, $n > 2$.