



# Burns and Scalds – First Aid and Prevention

## The NHSGGC approach

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*Presentation to Cross Party Group on Accident  
Prevention and Safety Awareness, 24/06/2014*

# Royal Hospital for Sick Children

- Burns Team

- 4 surgeons
- Burns Nurse Specialist
- Physiotherapists
- Dietician/psychology

- Emergency Department

- Burns Ward

- Cubicles
- Experienced nursing staff

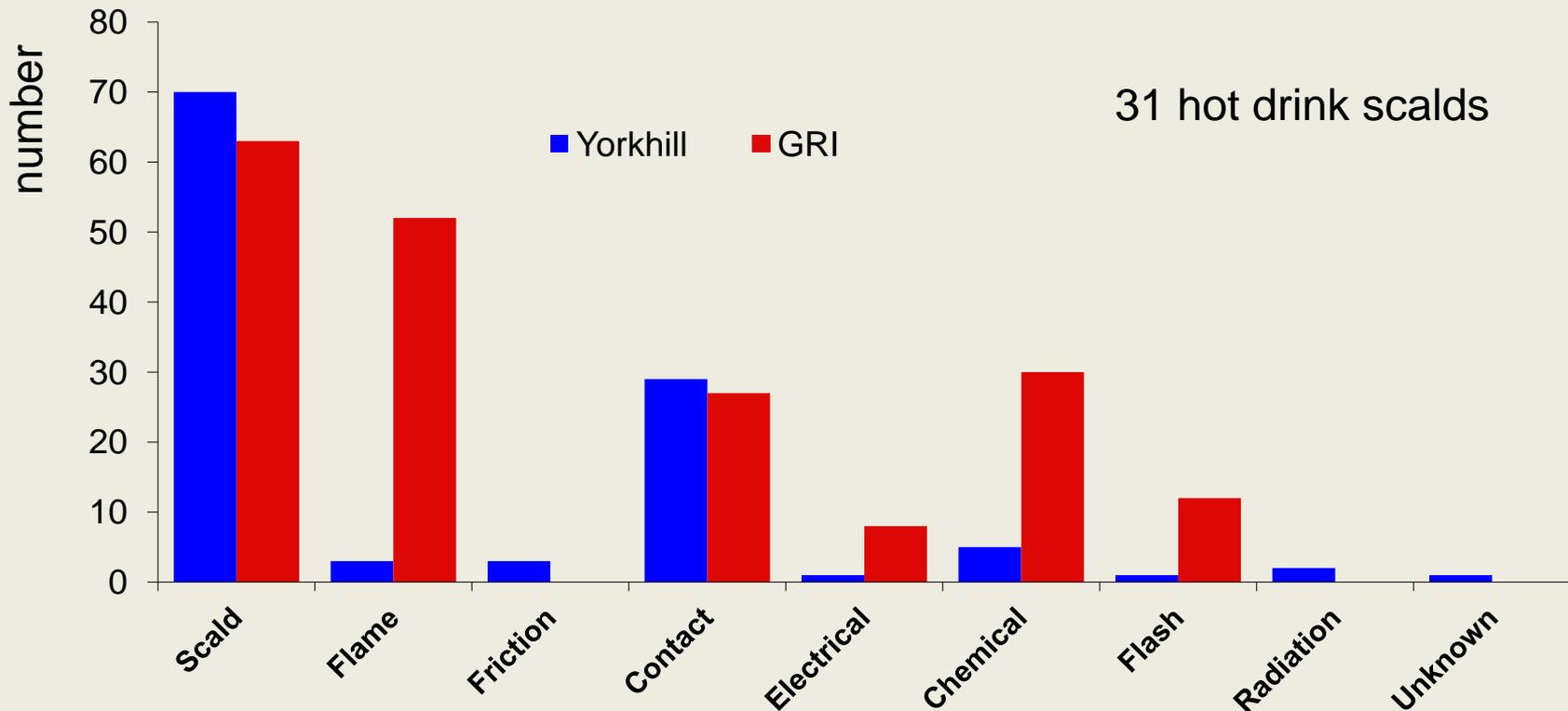
- Dedicated theatre lists and out-patient clinics



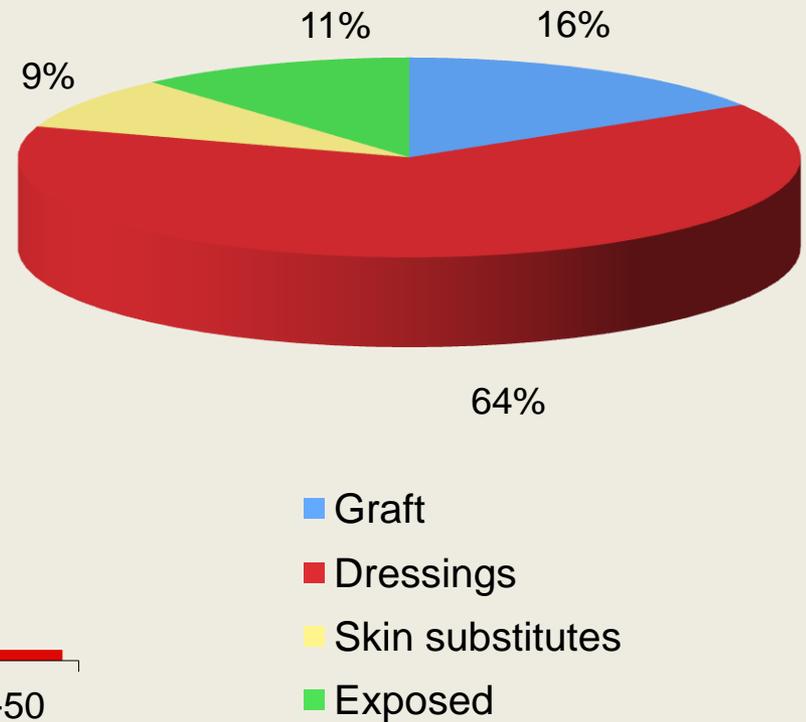
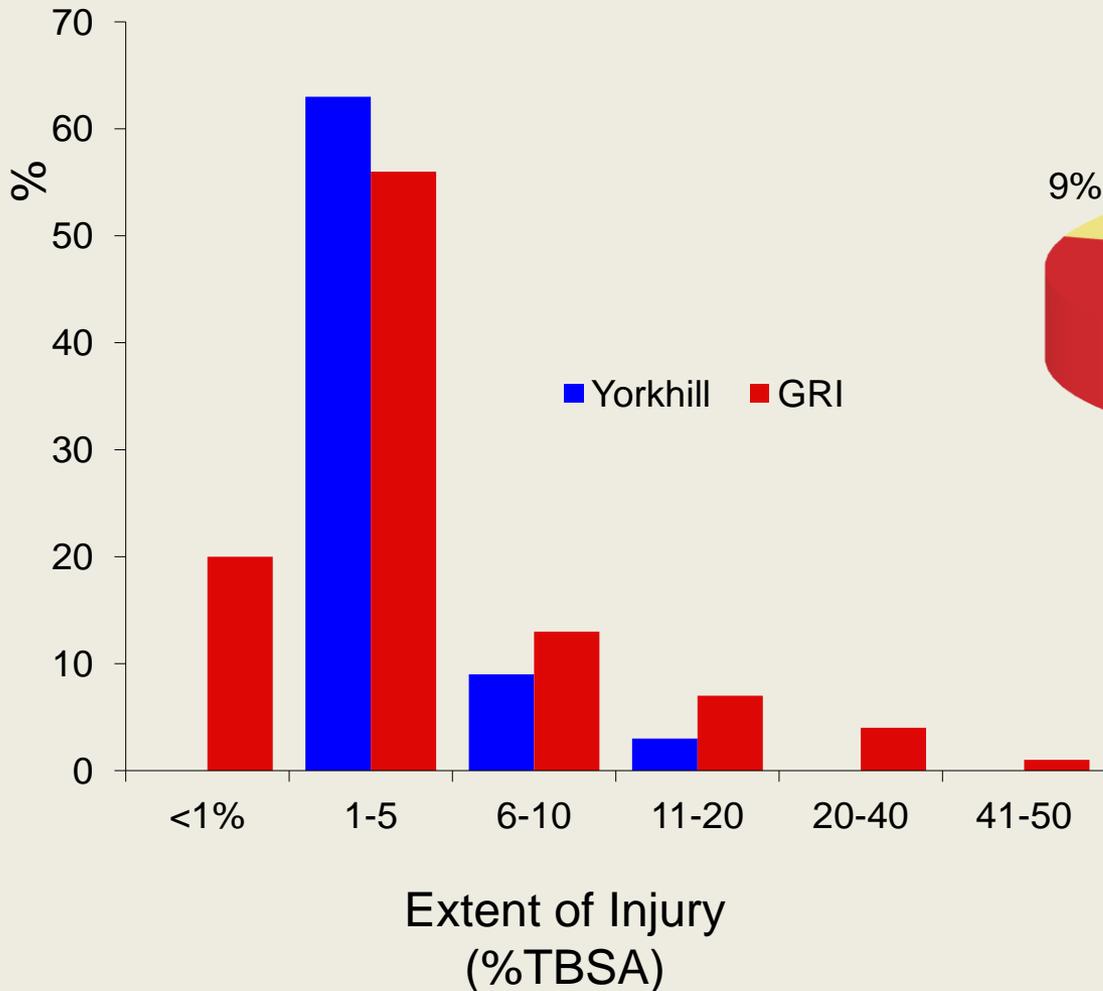
# Activity Data 2012



- ~450 emergency attendances/year
- 115 admissions to ward (192 in GRI)



# Extent of injury/Treatment



Duration of stay 1-14 days

# Burns - First Aid

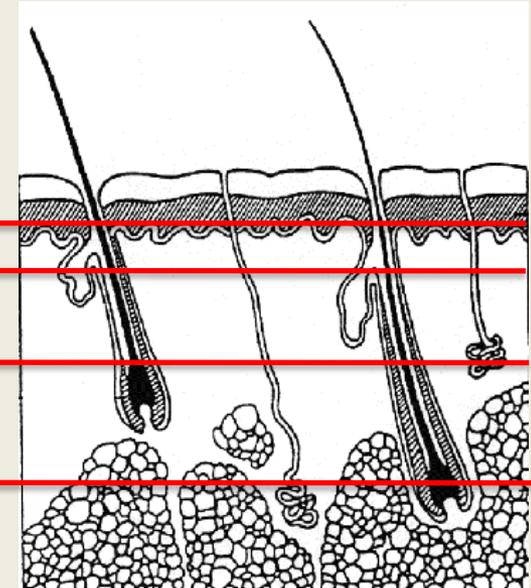
- Remove from source
- Cool the wound
- Protective dressing/Analgesia
  
- EMSB Course
  - Cool **running** water for 20 mins
  - Between 8-25°C (Ideally 15°C)
  - Avoid ice
  
- Cooling is beneficial up to 1 hour post burn
  - Some evidence to suggest benefits up to 2 hours



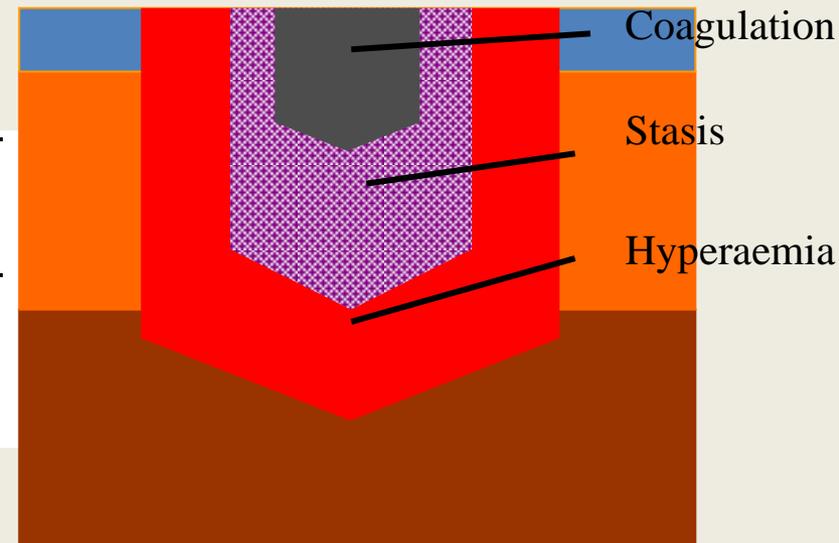
# Benefits of Cooling

- Analgesia
- Reduce tissue temp
- Reduce oedema
- Improved healing

Superficial  
 Superficial Dermal  
 Deep Dermal  
 Full Thickness



Depth of burn	Superficial partial thickness	Deep	Total	Percentage with deep burn
Immediate cooling with water	131	65	196	33
Not cooled with water	257	242	499	49



From Nguyen et al. Burns;28:173-6, 2002

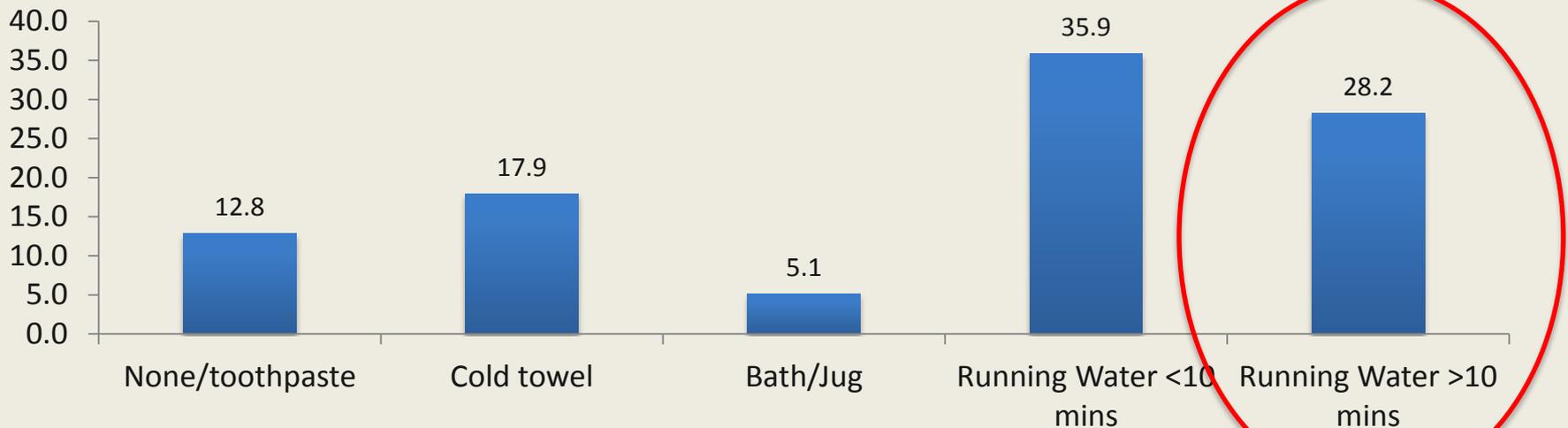
# Public Awareness



- Intuitive
- First Aid Courses
- Minority cool effectively

Age	Total	Turn on cold tap (any duration)	Run cold water greater than 10 min
<20	5	4 (80%)	2 (40%)
20-30	36	25 (69%)	11 (31%)
31-40	92	62 (67%)	28 (30%)
>40	54	46 (85%)	25 (46%)
Total	187 <sup>a</sup>	137 (73%)	66 (35%)

from Graham *et al* Burns;38:438-43, 2012



# Background



- Multi partnership workshop to consider how bad the burns and scalds issue is in NHSGGC
- Engineering, Environmental, Enforcement, Education and Empowerment prevention options
- Short life working group set up to agree actions
- Consultation carried out with parents, carers and staff in NHSGGC
- Agreement on importance of first aid message and secondary prevention approach

# STOP



## First Aid for burns and scalds

**S** **Strip** hot clothes and jewellery if possible.



**T** **Turn on cold tap** (never use ice). Run the burn under cool water for 10-20 minutes. Keep the rest of the person warm.



**O** **Organise** medical assistance. Contact NHS 24 – dial 111, attend A&E or dial 999.



**P** **Protect** burn with cling film or clean cloth (NO dressings, fluffy cloth, creams/lotions). **Give painkillers**



Keep your children away from these:



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Posters



Fridge Magnets

# Actions



- Funding secured to purchase first aid fridge magnets
- 50,000 magnets to be distributed across NHSGGC
- Brief Intervention with every family
- Successful event with pharmacists
- Launch with case study 12<sup>th</sup> June, 2014
  - Extensive media coverage
  - Facebook and Twitter
  - RoSPA and NHSGGC websites

# Distribution



- All families with babies at 10 day visit
- All children in Nursery Schools
- Local community venues focusing on ambulant toddlers
  - GP practices
  - Health improvement teams (6 regional teams)
  - Mothers & toddlers groups
  - Pre-5 centres/weaning centres
  - Go Safe Scotland
  - Soft play centres/Schools/swimming pools/sports centres

# Evaluation/Further Actions



- Close the audit loop
- Follow-up assessment of pharmacy training
- Assess number of attendances/admissions
  - Needs better data collection (attendances)
- Widen the message nationally
- Research on cold tap temperatures throughout year
- Undertake cost-benefit analysis
- Consider other primary prevention strategies