Recurrent boils

- Commonest sites: face, neck, armpits, shoulders, and buttocks (bottom)
- Infection of the hair root or sweat pore
- Occur in otherwise healthy people (higher rates in diabetics, eczema, iron deficient)
- Caused by *Staphylococcus aureus*
Risk factors?

Insect bites?
Hygiene?
Household crowding
Health literacy

NZ – we have high rates and highest in

- Maori and Pacific children
- Children from lower socioeconomic families
- Preschool children (also twice as likely to get hospitalised compared with 5-9yr olds)
- Boys
- Kids from urban areas and from northern NZ

Michael is a 6 year old boy from Manurewa - fell off his bike a week ago and had a minor abrasion to his leg. He now has a boil which is very tender.

• Your next action is

A) wound care and drainage of pus
B) Start flucloxacillin
C) Assess for MRSa risk factors
D) Start cotrimoxazole
E) Send off cultures and treat based on these in 48hours
BPAC guidelines 2011 and just updated this month

Most lesions may be treated with incision and drainage alone.

Antibiotics - consider if fever, cellulitis or co-morbidity, e.g. diabetes, or if the lesion is in a site associated with complications, e.g. face.

**Antibiotic treatment**  First choice **Flucloxacillin**  
500 mg, four times daily, for *seven to ten days*

Alternatives: **Erythromycin, co-trimoxazole**
Another oral option..

Cephalexin
– 1\textsuperscript{st} generation cephalosporin
– Activity
  • Gram pos - Staph aureus and Strep pyogenes
  • Gram neg - if sensitive then E.coli, Moraxella, Haemophilus

• Cephalexin syrup 125mg/5ml or 250mg/5ml listed Dec 2009
• Cephalexin tablets 500mg listed May 2010
• For skin infections
  – adult doses - 500mg BD
  – Syrup dosing for skin and soft tissue infection
    – Medsafe 25-50mg/kg/day divided doses BD for skin
      • \textit{Starship skin treatment} 20mg/kg per dose BD
      • \textit{CMDHB Kidsfirst} 40mg/kg/day 2-3 times daily
      • Current school trial: Sth Auckland 25mg/mg /kg /day Div BD with daily review
Michael – boil now gone

A) What is his chance of getting another one?

He get another one; then goes on to have 2 more …

Do you do a swab? Of what nose, armpit, groin

Do you swab the rest of his family?

Do you offer any treatment?
BPAC define recurrent as >10 boils over >3 mths

If recurrent boils then

• Attempt staphylococcal decolonisation (previously outlined as..)
  – Nasal antibiotic cream, triclosan wash and household hygiene measures

• Consider other household contacts and hygiene or decolonisation measures

• Swab nose and/or wound if no improvement

• Consider MRSA if there is a lack of response to flucloxacillin.

BPAC 2012: Combination of bleach baths, intranasal antibiotics and education about personal and household hygiene did eradicate S.aureus nasal carriage*

Recipe for swimming pool bleach bath – ¼ cup of bleach added to bath 2-3x/week

Decolonising household…

- Results from community paediatric study on kids with soft tissue infection plus positive for nasal, groin or armpit S.aureus
  - Child plus or minus family decolonised
    - 5 days of chlorhexidine daily wash
    - 5 days of BD daily mupirocin
    - Household hygiene measures
  - If entire household decolonised rather than child only

*Less SSTI treated at end of a year*

Fritz et al Clin Infect Dis 2012
Michael’s 2 year old brother

Has **recurrent superficial boils** over the last year (every 3-4 weeks)
Has well controlled eczema in separate site to the boils
Dad and brother have also had a couple of boils

What to do now?
Consider referral to Starship ID outpatients

• We will
  – usually do full blood count and blood glucose if not done already
  – Usually take wound and nasal swab
  – Usually have a more generous definition than BPAC
    • Recurrent “>6 over 3 mths plus at least one needing surgical drainage or hospital attendance or persisting problems > 6 mths”
Recurrent boils - Starship ID outpatients

INDEX CHILD

Every 1 week in 4 treat with flucloxacillin three times daily plus rifampicin daily for 3-6 months*

- Or cephalexin

- We do suggest decolonisation measures for whole family over the first week
  - nasal ointment BD over first plus either 3 times weekly janola baths or daily chlorhex washes and household hygiene

*Sweetman and Ellis-Pegler Treatment of recurrent staphylococcal furunculosis Medical J Aust 1992 156; 292