The College of Emergency Medicine

CEM Clinical Audits 2011-12
Pain in Children

Executive Summary

Introduction
This report summarises the results of the 2011 CEM national audit Pain in Children (PIC). It has been produced by the Clinical Effectiveness Committee of the College as part of a continuing focus on quality of care for patients. This is the seventh time PIC has been audited since 2003.

The audit was conducted against the standards of the College of Emergency Medicine which were first published in 2002, and have been developed and refined over the last ten years by the Standards and Audit Subcommittee.

In 2011, 166 Emergency Departments (EDs) in the UK (81% of EDs in England and Wales) participated in the CEM national audit programme. This level of participation demonstrates a sustained and increasing commitment since the programme started in 2003. The audit period ran from1st August 2011 to 31st January 2012. On 18th May 2012 each participating Trust was sent an individualised report containing their audit results and direct comparisons with national results so their performance could be clearly seen.

An overall report with full findings is available at:
http://www.collemergencymed.ac.uk/Shop-Floor/Clinical Audit/Previous Audits/

Key findings:[1]

Pain management – general

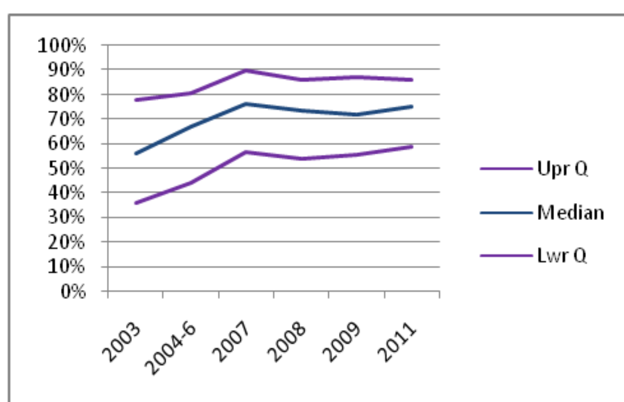
- 5% of all audited children received adequate pain relief before arrival in the ED.
- 43% received analgesia within 20 minutes of arrival, 57%within 30 minutes and 72% within 60 minutes of arrival.
- Analgesia was provided more quickly for children judged to be in severe pain: 53% within 20 minutes of arrival, 71% within 30 minutes and 87% within 60 minutes.
- In 5% of EDs at least 3 in every 4 children received analgesia within 20 minutes of arrival and in 64% of EDs at least 1 in 2 children received analgesia within 30 minutes
- In 7% of EDs less than 1 in 2 children received analgesia at all despite having moderate or severe pain.
- In 14% of EDs less than one half of the children included in the audit received analgesia within 60 minutes.

[1]Results quoted in the body of this summary are average (mean) values calculated over all audited patients unless stated otherwise.

- 9% of EDs said that they had made significant changes to relevant protocols or policies in the last 12 months, 39% minor changes and 14% no changes. The remaining 38% did not respond to this question.

Severity of pain and recording of pain scores

- 37% of patients presented in severe pain, and 63%in moderate pain.
- There was a large variation between EDs in the percentage of patients in severe pain (0% to 88%) which raises questions about the consistency of pain assessment and casemix.
- In 17% of EDs all children had the pain score recorded, but in 39% of EDs a pain score was recorded for less than 1 in every 2 children.
- Since the audit programme began there has been consistent improvement in the percentage of cases for which a pain score has been recorded. The median has risen from 12% in 2003 to 55% in 2008 and 63% in 2011.



Analgesia within 60min

Across the audit the median for EDs where patients received analgesia within 60min was 76%. However, practice varied greatly between departments.

Between 2003 and 2007 there was a considerable improvement in the proportion of patients receiving analgesia within 60 min, but this fell in 2009 and has not quite returned to 2007 levels of performance.

Analgesia within 30min

Nationally, the median performance for the percentage of patients receiving analgesia within 30 minutes peaked in 2007 at 60%. The median percentage in 2011 is slightly lower at 56%.

However, over the same period there has been an improvement in the timeliness of analgesia in the lowest performing EDs.

Analgesia within 20min

The median for patients receiving analgesia within20 minutes per ED was 40% (severe pain median was 50%, moderate pain was 48%).

Comment: The Standards & Audit subcommittee has reviewed the pain standard, and it is proposed that the 20minutesstandard be removed.

Prescribing appropriate analgesia

- Across the 2011 audit, 51% of children received analgesia wholly in accord with CEM guidelines (or local ones if present) and 62% received analgesia wholly or partly in accord with these guidelines.
- In 24% of EDs, less than 1 in every 2 children received analgesia either wholly or partly in line with guidelines.
- The level judged to be within CEM guidelines has risen from 43% in 2003 to 51% in 2011. It is probable that standards of assessment have become more rigorous in some departments over the intervening years.

Re-evaluation of pain

- Nationally, re-evaluation was noted in 22% of audited cases.
- In 2004, the national median of children in EDs who had their pain re-evaluated was7% and this rose to 18% in 2008.In the last two years there has been no further improvement.
- In 10% of EDs analgesia was re-evaluated for 50% or more children.
- In 54% of EDs re-evaluation was evidenced in less than 1 in 5 children.

Consideration of non-accidental injury

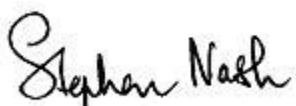
- NAI was recorded as having been considered in 43% of cases audited in 2011 compared to 31% in 2009.

Recommendations

Recommendation 1: We suggest that every department considers their trend charts over the 7 audits. If an ED has not improved since 2007, or is consistently below the 25th centile, we recommend that pain management is made a departmental priority over the next 12 months. Our patients deserve this.

Recommendation 2: When the College standards were first developed in 2002 the pain management standard received 4 times more votes than any other standard. It is clearly one of the most important indicators of quality care. We recommend that all departments should strive to continue to improve in this area because pain is a component of so many presentations and conditions.

Recommendation 3: Alongside vital signs, pain score should be recorded routinely on arrival so that appropriate triage and treatment can be initiated for every patient promptly.



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