Summary of the 1995/96 Report "Who operates when?"

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Summary of the Method

This report differed significantly from previous NCEPOD work, and the method is outlined below.

Between 1 April 1995 and 31 March 1996, data were provided to NCEPOD from 355 hospitals in the NHS and 22 independent sector hospitals about surgical procedures performed over seven 24-hour periods. The dates for the data collection were specified by NCEPOD and each of the seven dates for a Trust or unit occurred on a different day of the week.

NCEPOD defined as "out-of-hours" any surgical procedure for which the start of anaesthesia, or the start of the procedure, was between 18.01 and midnight (evening), or midnight and 07.59 hours (night-time), or the procedure was performed on a Saturday, Sunday or bank holiday. For these out-of-hours cases, the consultant surgeon or gynaecologist was asked to confirm or amend the starting time and other details and to state why the procedure was performed at that time.

The local contacts who had provided the initial data were asked also to inform NCEPOD of the death of any patient whose procedure was performed on the days studied. These were restricted to deaths within 30 days of that procedure. The relevant consultant surgeon and anaesthetist were asked to complete questionnaires about these patients.

Summary of findings in NHS hospitals

- 54% of all operations during the daytime on a weekday were performed in the presence of a consultant surgeon and 56% in the presence of a consultant anaesthetist.

- 71% of the operations during the daytime on a weekday were performed in the presence of a trained surgeon, where 'trained surgeon' includes staff grade, associate specialist, senior registrar and consultant. The figure for 'trained anaesthetists', similarly defined, was 72%.

- 7% of the operations during the daytime on a weekday and 20% during weekday evenings were performed by apparently unsupervised senior house officers. The related figures for SHO anaesthetists were 9 % and 47%.

- 37% of the emergency procedures during weekday daytime's (08.00 to 18.00 hrs), and 6.3% during weekday evenings (18.01 to 24:00 hrs) were performed during sessions scheduled primarily for emergency theatre cases. The overall percentage (08.00 to 24:00 hrs) was 25%.

- 51% of the participating hospitals had scheduled operating sessions for emergency procedures during the day from Monday to Friday.

- 46% of the routine cases started during the daytime from Monday to Friday were day cases.

Recommendations

- All hospitals admitting emergency surgical patients must be of sufficient size to provide 24-hour operating rooms and other critical care services. There should also be sufficient medical staff to perform these functions.

- These provisions should be continuous throughout the year: trauma and acute surgical emergencies do not recognise weekends or public holidays.

- Patients now expect to be treated and managed by trained and competent staff. Patients assume trainees to be taught appropriately and supervised as necessary. Consultants should acknowledge these facts and react accordingly.

Implementation

Organisational

- All hospitals which admit patients for emergency procedures should have an emergency surgery list, staffed and in a fully-equipped theatre suite. Anaesthetists and surgeons rostered for emergency work should be free from other commitments: this should be a fixed part of the consultant contract.

- Consultant anaesthetists, surgeons and hospital managers should together plan the administration and management of emergency admissions and procedures.

- In order to avoid queuing for theatre space it may be necessary to nominate an arbitrator in theatres who would decide the relative priority of theatre cases. This practice already successfully operates in some hospitals and should be used more widely.

- All hospitals should record the grades of anaesthetists and surgeons present in the anaesthetic room and the operating theatre and their responsibilities.

- Systematic clinical audit should include the pattern of work in the operating theatres.

- An attempt to harmonise the definitions used by the NHS Executive, and the clinical definitions commonly used by surgeons and anaesthetists, would be welcome.

Clinical

- The condition of patients should be optimised prior to anaesthesia and surgery. This may involve the use of local protocols addressing issues such as: the required duration of preoperative starvation, the use of emergency admission units/wards, the preoperative use of critical care services (ICU/HDU etc.), the management of comorbidities by other consultant medical specialists as appropriate, fluid management, analgesia and appropriate use of facilities for the elderly.

Key Points - review of deaths

Anaesthetic questionnaires

Much of the information is identical to that in previous NCEPOD reports but in examining these cases the specialist registrar advisors drew attention to a number of issues.

- Decision-making was still considered to be unsatisfactory in some cases; too many are made by too junior trainees. The specialist registrar advisors were strongly of the opinion that a decision to operate should be made by consultants.

- Preoperative management was sometimes poor. Guidance from experienced staff was needed in resuscitating patients, and on occasions this may require referral to an ICU preoperatively. A rush to operate before adequate resuscitation was completed was likely to lead to prolonged and often unproductive postoperative intensive care.

- Management of intravenous fluids was poor in some cases. There are benefits and dangers in their use. On occasions a lack of fundamental understanding of physiology appeared to be the problem.

- Records and charts were often poorly kept or inadequate.

Surgical questionnaires

- The authors and advisors were concerned about the lack of preoperative preparation received by many of these patients who died; particular attention is drawn to the low use of intravenous fluids, infrequent use of objective cardiac assessment and patchy application of thromboembolic prophylaxis.

- With regard to individual patients, the authors and advisory groups identified several themes concerning sub-optimal standards of delivery of care. These mainly concerned delays in admission and surgery, inappropriate grades of surgeon (too junior), failure of preoperative preparation, lack of communication between specialists and inappropriate operations. These problems have all been identified in previous NCEPOD reports and recommendations made repetitively.