Using Outcomes Information for Revalidation in Cardiothoracic Surgery

December 2013

The Colleges and Surgical Specialty Associations believe that data on surgical outcomes is an important element of demonstrating that a surgeon meets the required standards of professionalism and practice. This framework provides guidance to surgeons working in cardiothoracic surgery to help them produce relevant outcomes data for appraisal and revalidation.

Any queries relating to this framework should be addressed to revalidation@rcseng.ac.uk.

Section 1: Introduction and Explanation

Background

Revalidation is the new approach to the regulation of doctors, it commenced in December 2012. The process is centred on local annual appraisal. All doctors will need to be revalidated every 5 years in order to retain their licence to practise.

The Surgical Specialty Associations and Surgical Royal Colleges have developed the standards for surgical revalidation and specified the supporting information that cardiothoracic surgeons will need to provide to their appraiser to facilitate a positive assurance of their fitness to practice and, at the end of the 5 year cycle, a recommendation for revalidation to the GMC. An important component of the supporting information required for revalidation is that relating to outcomes.

An important landmark in relation to transparency and openness in the NHS was achieved in 2013 with the publication of surgeon-level data from nine surgical audits. We see national clinical audit as the "gold standard" in relation to collection of data and measurement of outcome. We fully support the continuation and expansion of NHS England's programme of data transparency.

The Society for Cardiothoracic Surgery has defined the following measures for surgeons working within the specialty. Surgeons will only need to demonstrate their outcomes in their area(s) of practice. There is no requirement for cardiothoracic surgeons to undertake common 'index procedures'.

You should note the following points:

National Clinical Audit

- Where there are identified national clinical audit(s) that cover your area(s) of practice, it is essential that you participate. This will be mandatory for revalidation.
- If there is a national clinical audit that falls within NHS England's programme of consultant-level outcomes publication, your results will be made available publically.
- Your employer will need to facilitate the submission of data to the audit(s).
- It will be your responsibility to gather the relevant information from the audit (eg. reports/downloads) to present at appraisal.

Routinely Collected Data (HES, PEDW, HIS, ISD)

- These data are already collected by your NHS organisation and brought together on a national basis.
- We have identified key procedures in each sub-specialty area which should cover the majority of surgeons' practice.
- We have identified what should be measured and how.
- We expect that analyses of these data will be provided by your employer.
- Wherever possible your individual outcomes should be presented alongside all other surgeons in the country performing that procedure(s) (eg. in a funnel plot).
- We have identified the process of further investigation if it appears from these analyses that your outcomes are outside accepted norms (see below).

Local Audit

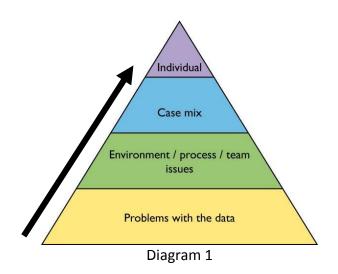
- Where your area of practice is not appropriately covered by a national audit or where routinely collected data will not assist in measuring outcomes, we recommend some form of local audit.
- This may be conducted by you personally, or form part of a wider unit/region-based audit.
- It will be your responsibility to conduct/participate in the audit and present the results at appraisal.
- Where you are obliged to undertake local audit, you are advised to audit a practice or procedure that is representative of your practice both in the NHS and in the private sector. The subject should be something that you undertake on a routine basis.

Structured Peer Review (of outcomes)

For some highly specialised/low volume areas of practice which cannot be appropriately
measured using the above methods, it may be necessary to have some form of structured peer
review. Where this is identified as necessary, we will work with the relevant specialties to identify
the methodology required so that the peer review process is fit for purpose for revalidation.

Managing Outliers

- Analysis of your outcomes provides one piece of the supporting information required for revalidation.
- If it appears that your outcomes are outside of the accepted norm, this should trigger a local investigation that closely examines the data for anomalies, looks at the environment and structure of the team/unit and your case mix before considering you as an individual (see diagram 1).
- We will be able to assist in the early stages of such an investigation.



Section 2: Measuring Outcomes

- 2.1 Adult Cardiac
- 2.2 Thoracic
- 2.3 Congenital

2.1 Adult Cardiac Surgery

- 1. The main method of outcome measurement will be the **CCAD national audit**. Surgeons will be able to demonstrate their outcomes for CABG and "All Adult cardiac Surgery" via the audit. This is reported on a **three year rolling cycle**.
- 2. **Additionally**, we think that outcomes from adult cardiac surgery should also be measured by looking at **routinely collected data** (HES, PEDW, HIS, ISD) against the criteria set out in this document. At appraisal we would expect that a surgeon's outcomes would be presented in a funnel plot showing comparison of their practice to all other surgeons in the country performing the same procedure(s).

Key Procedures	OPCS Codes	Measurement Criteria
CABG	K40, K41, K42, K43, K44, K45, K46	Mortality [1 year and 3-year rolling average] 28 day unplanned readmission Length of Stay (median) 28 day reoperation/reintervention (reopening of the chest T032-T034)
Mitral valve repair, mitral valve replacement	K25	
AVR	K26	

2.2 Thoracic Surgery

- 1. The main method of outcome measurement will be the **National Lung Cancer Audit (LUCADA)**. Participation in the audit will be mandatory.
- 2. Data submission to the SCTS detailed dataset (if made available to surgeons in the hospital) will also be mandatory.
- 3. Additionally, we think that outcomes should also be measured by looking at routinely collected data (HES, PEDW, HIS, ISD) against the criteria set out in this document. At appraisal we would expect that a surgeon's outcomes would be presented in a funnel plot showing comparison of their practice to all other surgeons in the country performing the same procedure(s).

Key Procedures	OPCS Codes	Measurement Criteria
Lobectomy	E54 + sub-	Mortality [1 year and 3-year rolling average]
	codes	Length of stay (median)
Pneumonectomy	E54 + sub	28 day unplanned readmission
	codes	28 day re-operation/reintervention (reopening of the
		chest T032-T034)
Oesophagectomy	G02	28 day Unplanned readmission
	G03	30 day mortality
		28 day reoperation/reintervention
		Length of stay (median)

2.3 Congenital

1. The main method of individualised outcome measurement will be routinely collected data (HES, PEDW, HIS, ISD) against the criteria set out in this document. At appraisal we would expect that a surgeon's outcomes would be presented in a funnel plot showing comparison of their practice to all other surgeons in the country performing the same procedure(s). The measurement criteria are as follows:

Key Procedures	OPCS Codes	Measurement Criteria
VSD	K11	
Tetralogy of Fallot	K04	Mortality [1 year and 3-year rolling average] Length of stay (median) 28 day unplanned readmission 28 day re-operation/reintervention (reopening of the chest T032-T034)
ASD	K10	
Isolated coarctation	?L23	
Arterial switch	K06	
AVSD (complete)	K09	

2. Congenital surgery is part of the **CCAD audit**, however, outcomes are reported to the unit/team level. This information can be used as supporting information for revalidation.

NCEPOD grading of quality of care

- 1. Good practice
- 2. Room for improvement (clinical care)
- 3. Room for improvement (organisational care)
- 4. Room for improvement (both clinical & organisational)
- 5. Less than satisfactory care
- 6. Insufficient data to judge

SASM "Areas of Concern"

- 1. No areas of concern or for consideration
- 2. Areas for consideration but they made no difference to the eventual outcome
- 3. Areas of concern but they made no difference to the eventual outcome
- 4. Areas for concern which may have contributed to patient's death
- 5. Areas of concern which caused death