



NELA Patient Audit Dataset

Version Control

Version	Date	Changes
2.0	24/11/2014	Changes made to dataset for 2 nd year.
2.1.1	02/04/2015	Still in hospital at 60 days answer option added to question 7.7
2.1.2	02/07/2015	Wording edited for question 2.9
3.1	01/12/2015	Changes made to dataset for 3 rd year.
3.1.1	21/03/2016	Q1.9 wording edited
4.1	01/12/2016	Changes made to dataset for 4 th year.
4.1.1	21/12/2016	Question 1.10b modified to include hospital transfers
5.1	01/12/17	Changes made to dataset for 5 th year.
6.1	01/12/18	Changes made to dataset for 6 th year.
6.1.1	01/04/19	Possum Calculation removed; Q3.2, 3.25, 6.2, 6.23, Q3.1, 6.1 Updated options
7.1.1	01/12/19	Changes made to dataset for 7 th year.
8.1	01/12/2020	Changes made to dataset for 8 th year: <ul style="list-style-type: none"> - Remove Q1.13a,b, Q7.11, Q7.12 - Update Q2.7(new Q's), Q2.12, Q7.3, Q7.10

This is the NELA proforma. All data entry will be carried out through an online data collection web tool. The web tool will be accessible via pc, tablets and mobiles

This audit is a continuous prospective audit with real time data collection. It is expected that clinical teams enter the data real time rather than retrospectively.

On the NELA Webtool by default Quality Improvement (QI) questions are enabled. If you do not wish to collect data for one or more QI questions, the questions can be disabled. This is done on the NELA webtool.

For queries, please contact info@nela.org.uk

Web tool for data entry: <https://data.nela.org.uk/>

This form is for information purposes only.

1.	Demographics and Admission	
1.1	NHS Number	
1.2	Pseudo-anonymisation	Computer generated
1.3	Local patient id/hospital number	
1.4	Date of birth	
	Age on arrival	<i>Age will automatically be calculated on web tool</i>
1.5	Sex	<input type="radio"/> Male / <input type="radio"/> Female
1.6	Forename	
1.7	Surname	
1.8	Postcode	
1.9	Date and time the patient first arrived at the hospital/Emergency department	
1.10	What was the nature of this admission?	<input type="radio"/> Elective / <input type="radio"/> Non-elective
1.10b	No Longer Required	
1.11	No Longer Required	
1.12	No Longer Required	
1.13a	No Longer Required	
1.13b	No Longer Required	

2	Pre-op	
	If the patient is returning to theatre as an emergency following previous elective surgery, all answers should relate to the emergency laparotomy, not the previous elective surgery.	
2.1	No Longer Required	
2.2	Date and time that the decision was made to operate <i>If this is unavailable please enter date and time that this patient was first booked for theatre for emergency laparotomy</i>	Date_____ (DD/MM/YYYY) <input type="radio"/> Date not known Time_____ (HH:MM) <input type="radio"/> Time not known

2.3	No Longer Required	
2.4	No Longer Required	
2.5	No Longer Required	
2.6	No Longer Required	
2.7	Was an abdominal CT scan performed in the pre- operative period as part of the diagnostic work-up? If performed, how was this CT reported pre- operatively? <i>(If CT is reported by a registrar and validated by a consultant before surgery, select “in-house consultant”. If not validated by consultant before surgery, select “registrar”)</i>	<input type="radio"/> Yes – reported by in-house consultant <input type="radio"/> Yes – reported by in-house registrar <input type="radio"/> Yes – reported by outsourced service <input type="radio"/> Yes but NOT reported <input type="radio"/> No CT performed <input type="radio"/> Unknown
2.7a	No Longer Required	
2.7b	No Longer Required	
2.7c	No Longer Required	
2.7d	What was the Date and Time of CT Scan?	Date_____ (DD/MM/YYYY) <input type="radio"/> Date not known Time_____ (HH:MM) <input type="radio"/> Time not known
2.7e	What was the Date and Time the CT Scan was reported electronically?	Date_____ (DD/MM/YYYY) <input type="radio"/> Date not known Time_____ (HH:MM) <input type="radio"/> Time not known
2.7f	Was there an addendum added to the initial CT report which altered the patient pathway or the decision to proceed with surgery?	<input type="radio"/> Yes - consultant addendum to SPR report <input type="radio"/> Yes - in house radiologist addendum to outsourced report <input type="radio"/> Yes - sub-specialist GI radiologist addendum non-GI consultant report <input type="radio"/> No <input type="radio"/> Unknown
2.8a	No Longer Required	
2.8b	No Longer Required	
2.9	No Longer required	
2.10	What was the date and time of the first dose of antibiotics following presentation to hospital? <i>(only relevant for non-elective admissions)</i>	<input type="radio"/> In theatre, or Date_____ (DD/MM/YYYY) <input type="radio"/> Date not known Time_____ (HH:MM) <input type="radio"/> Time not known <input type="radio"/> Not Administered

2.11a	Was sepsis, with a NEWS2 ≥ 5 or ≥ 3 in any one variable or another diagnosis requiring urgent antibiotics e.g. peritonitis / perforation, suspected on admission?	<input type="radio"/> Yes <input type="radio"/> No <input type="radio"/> Unknown
2.11b	Was sepsis, with a NEWS2 ≥ 5 or ≥ 3 in any one variable and/or another diagnosis requiring urgent antibiotics e.g. peritonitis / perforation, suspected at the time the decision for surgery was made?	<input type="radio"/> Yes <input type="radio"/> No <input type="radio"/> Unknown
2.12	On admission to hospital and using the Clinical Frailty Score what was the patients pre-admission frailty status assessed as being? (see help box for full pictorial explanation of each grading)	<input type="radio"/> (1-3) - not frail <input type="radio"/> 4 - vulnerable <input type="radio"/> 5 - mildly frail <input type="radio"/> 6 - moderately frail <input type="radio"/> 7 - severely frail - completely dependent for personal care <input type="radio"/> 8 - very severely frail <input type="radio"/> 9 - Terminally ill <input type="radio"/> 0 - Not Recorded

3	Pre-op Risk stratification	
3.1	Prior to surgery, what was the risk of death for the patient that was entered into medical record? <i>For info, wording of relevant standard "An assessment of mortality risk should be made explicit to the patient and recorded clearly on the consent form and in the medical record."</i>	<input type="radio"/> Lower (<5%) <input type="radio"/> High ($\geq 5\%$) <input type="radio"/> Not documented
3.1a	If documented, how was risk assessed?	<input type="radio"/> Objective clinical score <input type="radio"/> Clinical judgement
3.1b	If patient assessed to be high risk, which consultants were involved immediately preoperatively in the assessment, decision making process and care of this patient? This may be either direct or indirect care. <i>Please mark all that apply.</i>	<input type="radio"/> Consultant Surgeon <input type="radio"/> Consultant Anaesthetist <input type="radio"/> Consultant Intensivist <input type="radio"/> None
3.2	No Longer Required	
3.3	What was the ASA score?	<input type="radio"/> 1: No systemic disease <input type="radio"/> 2: Mild systemic disease <input type="radio"/> 3: Severe systemic disease, not life-threatening <input type="radio"/> 4: Severe, life-threatening <input type="radio"/> 5: Moribund patient
3.4	What was the most recent pre-operative value for serum Creatinine (micromol/l)	<input type="text"/> <input type="radio"/> Not performed
3.5	What was the most recent pre-operative value for blood lactate – may be arterial or venous (mmol/l)	<input type="text"/> <input type="radio"/> Not performed
3.5i	No Longer Required	
3.5ii	What was the most recent pre-operative value for albumin (g/l)?	<input type="text"/> <input type="radio"/> Not performed
	NELA Risk calculation	
	For questions, 3.6 to 3.22 please enter values closest to time of booking for theatre in order to calculate NELA Risk score. Answers should reflect chronic and acute pathophysiology.	

3.6	Serum Sodium concentration (mmol/l)	
3.7	Serum Potassium concentration (mmol/l)	
3.8	Serum Urea concentration (mmol/l)	
3.9	Serum Haemoglobin concentration (g/dl)	
3.10	Serum White cell count ($\times 10^9 / l$)	
3.11	Pulse rate(bpm)	
3.12	Systolic blood pressure (mmHg)	
3.13	Glasgow coma scale	
3.14	Select an option that best describes this patient's ECG	<input type="radio"/> No abnormalities <input type="radio"/> AF rate 60-90 <input type="radio"/> AF rate >90/ any other abnormal rhythm/paced rhythm/ >5VE/min/ Q, ST or T wave abnormalities
3.15	Select an option that best describes this patient's cardiac signs and chest xray appearance	<input type="radio"/> No failure <input type="radio"/> Diuretic, digoxin, antianginal or antihypertensive therapy <input type="radio"/> Peripheral oedema, warfarin Therapy or CXR: borderline cardiomegaly <input type="radio"/> Raised jugular venous pressure or CXR: cardiomegaly
3.16	Select an option that best describes this patient's respiratory history and chest xray appearance	<input type="radio"/> No dyspnoea <input type="radio"/> Dyspnoea on exertion or CXR: mild COAD <input type="radio"/> Dyspnoea limiting exertion to < 1 Flight or CXR: moderate COAD <input type="radio"/> Dyspnoea at rest/rate > 30 at rest or CXR: fibrosis or consolidation
3.16a	No Longer Required	
	<i>Online web tool will automatically calculate Physiology severity score</i>	
3.17	Select the operative severity of the intended surgical intervention (see help box for examples)	<input type="radio"/> Major <input type="radio"/> Major+
3.18	Including this operation, how many operations has the patient had in the 30 day period prior to this procedure?	<input type="radio"/> 1 <input type="radio"/> 2 <input type="radio"/> >2
3.19	Based on your clinical experience of the intended surgery, please estimate the likely intraoperative blood loss (ml)	<input type="radio"/> <100 <input type="radio"/> 101-500 <input type="radio"/> 501-999 <input type="radio"/> >=1000
3.20	Please select a value that best describes the likely degree of peritoneal soiling	<input type="radio"/> None <input type="radio"/> Serous fluid <input type="radio"/> Localised pus <input type="radio"/> Free bowel content, pus or blood
3.21	What severity of malignancy is anticipated to be present?	<input type="radio"/> None <input type="radio"/> Primary only <input type="radio"/> Nodal metastases <input type="radio"/> Distant metastases

3.22	Please select urgency of surgical intervention (see help notes for additional information)	<input type="radio"/> 3. Expedited (>18 hours) <input type="radio"/> 2B. Urgent (6-18 hours) <input type="radio"/> 2A. Urgent (2-6 hours) <input type="radio"/> 1. Immediate (<2 hours)
	Online web tool will automatically calculate Operative severity score	
3.23	No Longer Required	
3.24	No Longer Required	
3.25	Not all investigations available for calculation of NELA Risk	<input type="radio"/>
3.26	Estimated mortality using NELA risk adjustment model (Figure only provided if all data available)	Calculated <input type="text"/>

4	Intra-op	
4.1	Date and time of entry in to operating theatre/anaesthetic room (not theatre suite)	Date _____ (DD/MM/YYYY) Time _____ (HH:MM) <input type="checkbox"/> Time not known
4.2	Senior surgeon grade (this can include surgeon supervising in theatre but not necessarily scrubbed)	<input type="radio"/> Consultant <input type="radio"/> Post-CCT fellow <input type="radio"/> SAS grade <input type="radio"/> Research Fellow / Clinical Fellow <input type="radio"/> Specialty trainee <input type="radio"/> Other
4.2a	Consultant present/supervising: Name/GMC/specialty of operating or supervising consultant (If consultant not present, enter name of supervising consultant)	(Please select consultant - Online)
4.3	Senior anaesthetist present in theatre	<input type="radio"/> Consultant <input type="radio"/> Post-CCT fellow <input type="radio"/> SAS grade <input type="radio"/> Research Fellow / Clinical Fellow <input type="radio"/> Specialty trainee <input type="radio"/> Other
4.3a	Consultant present (or supervising) : Name/GMC of anaesthetist (If consultant not present, enter name of supervising consultant)	(Please select consultant - Online)
4.4	How did you provide goal directed fluid therapy?	<input type="radio"/> Patient recruited to FLO-ELA trial * <input type="radio"/> Not provided <input type="radio"/> Dynamic index e.g. Stroke volume, PPV, SVV <input type="radio"/> Static index e.g. CVP <input type="radio"/> Other, eg bioimpedence

5	Procedure	
5.1	Is this the first surgical procedure of this admission?	<input type="radio"/> Yes- First surgical procedure after admission <input type="radio"/> No - Surgery for complication of previous elective general surgical procedure within the same admission <input type="radio"/> No – Previous 'non-abdominal/non-general surgical' procedure within same admission (eg previous hip replacement) <input type="radio"/> Unknown
5.2	What is the indication for surgery? <i>(Please select all that apply)</i>	<input type="radio"/> Peritonitis <input type="radio"/> Perforation <input type="radio"/> Abdominal abscess <input type="radio"/> Anastomotic leak <input type="radio"/> Intestinal fistula <input type="radio"/> Phlegmon <input type="radio"/> Pneumoperitoneum <input type="radio"/> Necrosis <input type="radio"/> Sepsis <input type="radio"/> Small bowel obstruction <input type="radio"/> Large bowel obstruction <input type="radio"/> Volvulus <input type="radio"/> Internal hernia <input type="radio"/> Pseudo-obstruction <input type="radio"/> Intussusception <input type="radio"/> Incarcerated hernia <input type="radio"/> Obstructing incisional hernia <input type="radio"/> Haemorrhage <input type="radio"/> Hiatus Hernia/para-oesophageal hernia <input type="radio"/> Ischaemia <input type="radio"/> Colitis <input type="radio"/> Abdominal wound dehiscence <input type="radio"/> Abdominal compartment syndrome <input type="radio"/> Acidosis <input type="radio"/> Iatrogenic injury <input type="radio"/> Foreign body <input type="radio"/> Planned relook

5.3.a	Main procedure	<ul style="list-style-type: none"> <input type="radio"/> Abdominal wall closure following dehiscence <input type="radio"/> Abdominal wall reconstruction <input type="radio"/> Adhesiolysis <input type="radio"/> Colectomy: left (including sigmoid colectomy and anterior resection) <input type="radio"/> Colectomy: right (including ileocaecal resection) <input type="radio"/> Colectomy: subtotal or panproctocolectomy <input type="radio"/> Colorectal resection - other <input type="radio"/> Debridement <input type="radio"/> Defunctioning stoma via midline laparotomy <input type="radio"/> Drainage of abscess/collection <input type="radio"/> Enterotomy <input type="radio"/> Evacuation of haematoma <input type="radio"/> Exploratory/relook laparotomy only <input type="radio"/> Gastrectomy: partial or total <input type="radio"/> Gastric surgery - other <input type="radio"/> Haemostasis <input type="radio"/> Hartmann's procedure <input type="radio"/> Intestinal bypass <input type="radio"/> Laparostomy formation <input type="radio"/> Large incisional hernia repair with bowel resection <input type="radio"/> Large incisional hernia repair with division of adhesions <input type="radio"/> Peptic ulcer – oversew of bleed <input type="radio"/> Peptic ulcer – suture or repair of perforation <input type="radio"/> Reduction of volvulus <input type="radio"/> Removal of foreign body <input type="radio"/> Removal of gastric band <input type="radio"/> Repair of intestinal fistula <input type="radio"/> Repair of intestinal perforation <input type="radio"/> Repair of para-oesophageal hernia <input type="radio"/> Repair or revision of anastomosis <input type="radio"/> Resection of Meckel's diverticulum <input type="radio"/> Resection of other intra-abdominal tumour(s) <input type="radio"/> Revision of stoma via midline laparotomy <input type="radio"/> Small bowel resection <input type="radio"/> Splenectomy <input type="radio"/> Strictureplasty <input type="radio"/> Washout only <input type="radio"/> Not amenable to surgery
5.3.b	Second procedure (at same laparotomy)	

5.3e	Was a stoma formed (by any means)?	<input type="radio"/> Yes <input type="radio"/> No
5.4	Procedure approach	<input type="radio"/> Open <input type="radio"/> Laparoscopic <input type="radio"/> Laparoscopic assisted <input type="radio"/> Laparoscopic converted to open
5.5	<p>Operative findings: <i>(Please select all that apply)</i> <i>If unsure whether this patient is eligible for NELA please refer to help box</i></p>	<input type="radio"/> Abscess <input type="radio"/> Anastomotic leak <input type="radio"/> Perforation – peptic ulcer <input type="radio"/> Perforation – small bowel/colonic <input type="radio"/> Diverticulitis <input type="radio"/> Intestinal fistula <input type="radio"/> Adhesions <input type="radio"/> Incarcerated hernia <input type="radio"/> Volvulus <input type="radio"/> Internal hernia <input type="radio"/> Intussusception <input type="radio"/> Stricture <input type="radio"/> Pseudo-obstruction <input type="radio"/> Gallstone ileus <input type="radio"/> Meckel’s diverticulum <input type="radio"/> Malignancy – localised <input type="radio"/> Malignancy – disseminated <input type="radio"/> Colorectal cancer <input type="radio"/> Gastric cancer <input type="radio"/> Haemorrhage – peptic ulcer <input type="radio"/> Haemorrhage – intestinal <input type="radio"/> Haemorrhage – postoperative <input type="radio"/> Ulcerative colitis <input type="radio"/> Other colitis <input type="radio"/> Crohn's disease <input type="radio"/> Abdominal compartment syndrome <input type="radio"/> Intestinal ischaemia <input type="radio"/> Necrotising fasciitis <input type="radio"/> Foreign body <input type="radio"/> Stoma complications <input type="radio"/> Abdominal wound dehiscence <input type="radio"/> Normal intra-abdominal findings

5.6	Please describe the peritoneal contamination present (select all that apply)	<input type="checkbox"/> None or reactive serous fluid only <input type="checkbox"/> Free gas from perforation +/- minimal contamination <input type="checkbox"/> Pus <input type="checkbox"/> Bile <input type="checkbox"/> Gastro-duodenal contents <input type="checkbox"/> Small bowel contents <input type="checkbox"/> Faeculent fluid <input type="checkbox"/> Faeces <input type="checkbox"/> Blood/haematoma
5.7	Please indicate if the contamination was;	<input type="checkbox"/> Localised to a single quadrant of the abdomen <input type="checkbox"/> More extensive / generalised

6	Post-op Risk stratification	
6.1	At the end of surgery, what was the risk of death for the patient that was entered into medical record?	<input type="checkbox"/> Lower (<5%) <input type="checkbox"/> High (>=5%) <input type="checkbox"/> Not documented
6.1a	If documented, how was risk assessed?	<input type="checkbox"/> Objective clinical score <input type="checkbox"/> Clinical judgement
6.2	No Longer Required	
6.3	Blood lactate – may be arterial or venous (mmol/l)	<input type="text"/> <input type="checkbox"/> Not performed
	Post-operative NELA Risk calculation Q 6.4 – 6.14 No Longer Required	
	Physiology severity score:	
6.15	What was the operative severity? (see help box for examples)	<input type="checkbox"/> Major <input type="checkbox"/> Major+
6.16	Including this operation, how many operations has the patient had in the 30 day period prior to this procedure?	<input type="checkbox"/> 1 <input type="checkbox"/> 2 <input type="checkbox"/> >2
6.17	Please select this patient's measured/estimated intraoperative blood loss (ml)	<input type="checkbox"/> <100 <input type="checkbox"/> 101-500 <input type="checkbox"/> 501-1000 <input type="checkbox"/> >1000
6.17a	If the patient's blood loss was greater than 500mls, was Tranexamic Acid given?	<input type="checkbox"/> Yes <input type="checkbox"/> No
6.18	Please select the option that best describes this patient's degree of peritoneal soiling	<input type="checkbox"/> None <input type="checkbox"/> Serous fluid <input type="checkbox"/> Local pus <input type="checkbox"/> Free bowel content, pus or blood
6.19	What was the level of malignancy based on surgical findings	<input type="checkbox"/> None <input type="checkbox"/> Primary only <input type="checkbox"/> Nodal metastases <input type="checkbox"/> Distant metastases
6.20	What was the NCEPOD urgency? (see help notes for additional information)	<input type="checkbox"/> 3. Expedited (>18 hours) <input type="checkbox"/> 2B. Urgent (6-18 hours) <input type="checkbox"/> 2A. Urgent (2-6 hours) <input type="checkbox"/> 1. Immediate (<2 hours)
	Online web tool will automatically calculate Operative severity score	



6.21	No Longer Required	
6.22	No Longer Required	
6.23	Not all investigations available for calculation of NELA Risk	<input type="radio"/>
6.24	Where did the patient go for continued post-operative care following surgery?	<input type="radio"/> Ward <input type="radio"/> Critical Care (<i>includes Level 2 HDU or Level 3 ICU</i>) <input type="radio"/> Extended recovery area within theatres (eg PACU or OIR) <input type="radio"/> Enhanced care area on a normal ward <input type="radio"/> Died prior to discharge from theatre complex
6.24a	At the end of surgery, was the decision made to place the patient on an end of life pathway?	<input type="radio"/> Yes <input type="radio"/> No
6.25	No Longer Required	
6.26	Estimated mortality using NELA risk adjustment model (<i>Figure only provided if all data available</i>)	Calculated

7	Post-op – Some fields will need to be completed on discharge or death	
7.1	Total length of post-operative critical care stay (rounded up to whole days). <i>Includes both ICU and HDU stay -see help box for additional information. Do not include LOS in PACU/other enhanced recovery area</i>	<input type="text"/> Number required
7.2	No Longer Required	
7.3	For frail (CFS≥5) patients aged 65 or older, was the patient assessed by a member of the geriatrician-led multidisciplinary team during any part of the perioperative period?	<input type="radio"/> Yes <input type="radio"/> No <input type="radio"/> Unknown
7.4	Within this admission, did the patient have an unplanned or planned return to theatre in the post-operative period following their initial emergency laparotomy?	<input type="radio"/> Yes; unplanned return <input type="radio"/> Yes; planned return <input type="radio"/> Yes; unplanned AND planned return <input type="radio"/> No <input type="radio"/> Unknown
7.4a	What was the main indication for the unplanned return to theatre? (<i>Select most significant reason</i>)	<input type="radio"/> Anastomotic leak <input type="radio"/> Abscess <input type="radio"/> Bleeding or Haematoma <input type="radio"/> Decompression of abdominal compartment syndrome <input type="radio"/> Bowel obstruction <input type="radio"/> Abdominal wall dehiscence <input type="radio"/> Accidental damage to bowel or other organ <input type="radio"/> Stoma viability or retraction <input type="radio"/> Ischaemia/non-viable bowel <input type="radio"/> Sepsis/inadequate source control <input type="radio"/> Deteriorating patient <input type="radio"/> Missed pathology at first laparotomy <input type="radio"/> Other <input type="radio"/> Unknown



7.4b	No Longer Required	
7.5	Did the patient have an unplanned move from the ward to a higher level of care within 7 days of surgery? (do not include moves from HDU to ITU, or escalation from other enhanced area/PACU)	<input type="radio"/> Yes <input type="radio"/> No <input type="radio"/> Unknown
7.6	No Longer Required	
7.7	Status at discharge	<input type="radio"/> Dead <input type="radio"/> Alive <input type="radio"/> Still in hospital at 60 days
7.8	Date discharged from hospital	(DD/MM/YYYY) Date required
7.9	No Longer Required	
	COVID-19 Questions	
7.10	Please indicate the patient's SARS-CoV-2/COVID-19 infection status	<input type="radio"/> Covid positive – confirmed pre-operatively <input type="radio"/> Covid positive – confirmed post-operatively <input type="radio"/> Covid negative throughout in-patient stay
7.11	No Longer Required	
7.12	No Longer Required	