

| Intervention                          | Year      | Deaths | Population | Odds of dying<br>(1 in ) | Source  | Details   |
|---------------------------------------|-----------|--------|------------|--------------------------|---|---|
| Hip Surgery                           | 1992-2007 | 22,538 | 93,391     | 4                        | Shiga et al. Can J Anaesth. 2008 Mar;55(3):146-54. Is operative delay associated with increased mortality of hip fracture patients? Systematic review, meta-analysis, and meta-regression | Mortality at 1 yr; Data from 13 trials; mean participant age 81 yrs; study population >70% female in all trials   |
| Endovascular Repair of Ruptured AAA   | 1994-2006 | 102    | 484        | 5                        | Mastracci et al. J Vasc Surg 2008;47:214-21. Endovascular repair of ruptured abdominal aortic aneurysms: A systematic review and meta-analysis  | 17 studies; in-hospital mortality outcome; mean participant age 74 yrs; varied controls   |
| Open Suregery for Colon Cancer        | 1992-2004 | 91     | 586        | 6                        | Kahnamoui et al. Can J Surg. 2007 Feb;50(1):48-57. Laparoscopic surgery for colon cancer: a systematic review   | Adults over the age of 16 yrs; RCTs; open or conventional resection used as control; 6 studies; mean participant age 70 yrs; mortality data taken from fig 3 (cancer related mortality) |
| Laparoscopic Surgery for Colon Cancer | 1992-2004 | 67     | 608        | 9                        | Kahnamoui et al. Can J Surg. 2007 Feb;50(1):48-57. Laparoscopic surgery for colon cancer: a systematic review   | Adults over the age of 16 yrs; RCTs; open or conventional resection used as control; 6 studies; mean participant age 70 yrs; mortality data taken from fig 3 (cancer related mortality) |
| Craniotomy                            | 2000      | 2,054  | 19,200     | 9                        | Dimick et al. JAMA 2004;292(7):847-851. Surgical Mortality as an Indicator of Hospital Quality  | Data from 2000 Nationwide Inpatient Sample (nationally representative sample of hospitals); mortalities calculated using national average mortality rates                               |
| Esophageal Resection                  | 2000      | 781    | 8,585      | 11                       | Dimick et al. JAMA 2004;292(7):847-851. Surgical Mortality as an Indicator of Hospital Quality  | Data from 2000 Nationwide Inpatient Sample (nationally representative sample of hospitals); mortalities calculated using national average mortality rates                               |
| Pancreatic Resection                  | 2000      | 865    | 10,416     | 12                       | Dimick et al. JAMA 2004;292(7):847-851. Surgical Mortality as an Indicator of Hospital Quality  | Data from 2000 Nationwide Inpatient Sample (nationally representative sample of hospitals); mortalities calculated using national average mortality rates                               |
| Hip Surgery                           | 1992-2007 | 18,018 | 236,179    | 13                       | Shiga et al. Can J Anaesth. 2008 Mar;55(3):146-54. Is operative delay associated with increased mortality of hip fracture patients? Systematic review, meta-analysis, and meta-regression | Mortality at 30 days; Data from 13 trials; mean participant age 81 yrs; study population >70% female in all trials  |
| Pediatric Heart Surgery               | 2000      | 99     | 1,832      | 19                       | Dimick et al. JAMA 2004;292(7):847-851. Surgical Mortality as an Indicator of Hospital Quality  | Data from 2000 Nationwide Inpatient Sample (nationally representative sample of hospitals); mortalities calculated using national average mortality rates                               |
| Repair of Abdominal Aortic Aneurysm   | 2000      | 2,907  | 74,550     | 26                       | Dimick et al. JAMA 2004;292(7):847-851. Surgical Mortality as an Indicator of Hospital Quality  | Data from 2000 Nationwide Inpatient Sample (nationally representative sample of hospitals); mortalities calculated using national average mortality rates                               |

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| Coronary Artery Bypass Graft Surgery                                  | 2000      | 17,804 | 508,676 | 29    | Dimick et al. JAMA 2004;292(7):847-851. Surgical Mortality as an Indicator of Hospital Quality   | Data from 2000 Nationwide Inpatient Sample (nationally representative sample of hospitals); mortalities calculated using national average mortality rates |
| Carotid Endarterectomy  | 1985-2004 | 1,033  | 84,299  | 82    | Bond et al. Cerebrovasc Dis 2005;20:69-77. A Systematic Review of the Associations between Age and Sex and the Operative Risks of Carotid Endarterectomy | Data from 62 papers included; mortality at 30 days (or similar time period); no. of deaths from all different studies pooled                              |
| Upper GI Endoscopy and Endoscopic Retrograde Cholangiopancreatography | 1999      | 153    | 35,006  | 229   | Thompson et al. Surg Endosc (2004)18:22-25. Analysis of 153 deaths after upper gastrointestinal endoscopy: room for improvement?                         | All deaths after an upper GI endoscopy; mean participant age 71 yrs; data from the Scottish Audit of Surgical Mortality                                   |
| Bariatric Surgery   | 1990-2006 | 310    | 84,931  | 274   | Buchwald et al. Surgery 2007;142:621-35. Trends in mortality in bariatric surgery: A systematic review and meta-analysis                                 | 361 studies; mean participant age 40 yrs; mean participant bmi 47; participants 85% female; mortality outcome within 30 days                              |
| Hip Replacement   | 2000      | 248    | 82,680  | 333   | Dimick et al. JAMA 2004;292(7):847-851. Surgical Mortality as an Indicator of Hospital Quality   | Data from 2000 Nationwide Inpatient Sample (nationally representative sample of hospitals); mortalities calculated using national average mortality rates |
| Groin Hernia Repair   | 1992-2004 | 496    | 195,132 | 393   | Nilsson et al. Ann Surg 2007;245: 656-660. Mortality After Groin Hernia Surgery  | Mean participant age 59 yrs;  |
| Laparoscopic Cholecystectomy  | 1992-1995 | 20     | 10,174  | 509   | Z'graggen et al. Surg Endosc (1998) 12: 1303-1310. Complications of laparoscopic cholecystectomy in Switzerland  | Mean participant age 54 yrs   |
| Upper GI Endoscopy and Endoscopic Retrograde Cholangiopancreatography | 1999      | 20     | 35,006  | 1,750 | Thompson et al. Surg Endosc (2004)18:22-25. Analysis of 153 deaths after upper gastrointestinal endoscopy: room for improvement?                         | Deaths directly attributed to endoscopic procedure; mean participant age 71 yrs; data from the Scottish Audit of Surgical Mortality                       |