

Dataset Profile: Carotid Endarterectomy Procedures

Description: This dataset combines the surgical registry data for carotid endarterectomy (CEA) procedures performed at 370 hospitals participating in the Vascular Quality Initiative (VQI) from Jan 2003 – Jun 2017 with late outcomes from Medicare claims from Jan 1, 2003- Sept. 30 2015. The dataset was generated by linking VQI cases in Medicare claims that matched on SSN, date of birth (DOB), gender, and date of procedure. Canadians, patients under 65 years of age, procedures after 9/30/2015 and any patient with missing or invalid SSN was excluded from the matching process. Medicare-derived outcomes variables were created for the matched cases to facilitate evaluation of long term outcomes of CEA procedures.

Late Events Variables Derived from Medicare:

- 1) Death
- 2) Adverse outcome: stroke
- 3) Readmission to the hospital after the index procedure for vascular complications involving mesenteric artery, renal artery or other vessels; postoperative infection; stroke or vascular myelopathies; cardiac complications; urinary or renal complications; GI complications; or respiratory complications,
- 4) Repeat procedure/reintervention,
- 5) Post-surgical imaging (such as CT angiogram, MRI, or ultrasound of the neck/head, or carotid angiography) and
- 6) Payment information

Filename of VQI Registry File linked to Medicare:

CEA_NATIONAL_PROC_r12_0_20170717 and CEA_NATIONAL_LTF_r12_0_20170717

Analytic period of VQI procedures: 01/2003 - 06/2017

Analytic period of Medicare-derived variables: 01/01/2003 -09/30/2015

Date matched dataset generated: 11/8/2017

Results of match:

40,051 cases were eligible for matching (procedures in the VQI with a valid bene_ID crosswalk and are US citizens). The matching process returned a total of 36,736 matched cases. The match rate among eligible cases was 92%.

Data Use Agreement:

This dataset was created for the PCORI-funded project, “Advancing Patient Centered Outcomes Research in Survival Data with Unmeasured Confounding to Improve Patient Risk Communication” under CMS DUA 28593. The dataset and related files reside in the secure environment of the Data Analytic Core at The Dartmouth Institute for Health Policy and Clinical Practice. Permission from CMS is required to obtain access to data.

For questions, email Kayla.O.Moore@dartmouth.edu at The Dartmouth Institute for Health Policy & Clinical Practice

Supported by:



Cornell University

PI=Sedrakyan

