

Sister Study Non-Cancerous Conditions by Type and Timing: Data Release 9.1¹

Condition	Baseline	Unknown Timing ²	Incident
	N (%)	N (%)	N (%)
Cardiovascular and Cerebrovascular ³			
Heart attack	629 (1.2)	174 (0.3)	894 (1.8)
Heart failure	353 (0.7)	176 (0.3)	848 (1.7)
Angina	1,320 (2.6)	625 (1.2)	714 (1.4)
Stroke	403 (0.8)	126 (0.2)	1,188 (2.3)
Transient ischemic attack/ mini-stroke	950 (1.9)	577 (1.1)	1,247 (2.5)
Respiratory			
Asthma ⁴	7,200 (14.2)	1,588 (3.1)	1,893 (3.7)
Chronic obstructive pulmonary disease (COPD)	4,756 (9.3)	2,409 (4.7)	1,392 (2.7)
Chronic bronchitis	3,834 (7.5)	1,858 (3.7)	514 (1.0)
Emphysema	214 (0.4)	171 (0.3)	271 (0.5)
Chronic bronchitis and emphysema	521 (1.0)	95 (0.2)	57 (0.1)
COPD, unspecified	187 (0.4)	285 (0.6)	550 (1.1)
Tuberculosis ⁵	391 (0.8)	1 (<0.1)	15 (<0.1)
Metabolic			
Diabetes ⁶	3,068 (6.0)	882 (1.7)	3,534 (6.9)
Hypertension ⁷	14,442 (28.4)	2,169 (4.3)	8,596 (16.9)
High cholesterol ^{8,9}	17,460 (34.3)	879 (1.7)	4,935 (9.7)
Thyroid Disease ¹⁰			
Hyperthyroidism ¹¹	2,475 (4.9)	0 (0.0)	1,205 (2.4)
Hypothyroidism ¹²	9,133 (17.9)	0 (0.0)	4,831 (9.5)
Non-toxic goiter/nodules ¹³	3,868 (7.6)	0 (0.0)	4,073 (8.0)
Other/unknown ¹⁴	305 (0.6)	0 (0.0)	389 (0.8)
Digestive			
Colon or rectum polyps/ benign neoplasms	8,726 (17.1)	5,283 (10.4)	8,231 (16.2)
Inflammatory bowel disease (IBD)	1,016 (2.0)	639 (1.3)	444 (0.9)
Crohn's disease	141 (0.3)	67 (0.1)	73 (0.1)
Ulcerative colitis	731 (1.4)	552 (1.1)	335 (0.7)
Crohn's disease and ulcerative colitis	143 (0.3)	17 (<0.1)	24 (<0.1)
IBD, unspecified	1 (<0.1)	3 (<0.1)	12 (<0.1)
Bone Disease			
Osteoporosis ¹⁵	578 (1.1)	2,466 (4.8)	3,697 (7.3)
Osteopenia ¹⁵	7,199 (14.1)	2,905 (5.7)	5,756 (11.3)
Osteoporosis or osteopenia ¹⁵	3,972 (7.8)	657 (1.3)	951 (1.9)
Reproductive ¹⁶			
Endometriosis	6,859 (13.5)	1,786 (3.5)	429 (0.8)
Uterine fibroids	15,091 (29.7)	3,310 (6.5)	1,797 (3.5)
Polycystic ovary syndrome (PCOS)	1,310 (2.6)	2,006 (3.9)	246 (0.5)
Other			
Cataracts	4,668 (9.2)	2,930 (5.8)	13,264 (26.1)
Depression ¹⁷	10,967 (21.6)	5,555 (10.9)	2,731 (5.4)
Parkinson's disease	43 (0.1)	46 (0.1)	283 (0.6)
Gout	458 (0.9)	688 (1.4)	857 (1.7)

- ¹ Data release 9.1 includes events from follow-up phases that closed on or before 9/30/2019, excluding all data from participants who have withdrawn their data from the study (n=3).
- ² Unknown if diagnosis at or prior to baseline vs. post-baseline (i.e. incident case)
- ³ Other reported conditions that have not systematically been asked about include other acute ischemic heart disease (baseline: n=7, unknown timing: n=12, incident: n=215), chronic ischemic heart disease (baseline: n=13, unknown timing: n=104, incident: n=554), and transient global amnesia (baseline: n=1, unknown timing: n=2, incident: n=30).
- ⁴ Includes those who reported asthma symptoms at baseline (unknown timing: n = 236, incident: n=29).
- ⁵ Asked directly only at baseline. Unknown timing and incident diagnoses are from: help desk reports, open-ended responses on follow-ups [i.e. responses to “Any other health conditions? (Please specify)”], and from National Death Index (NDI) Plus / death certificate reports.
- ⁶ Includes reports of borderline or Type 2 Diabetes (baseline: n=3, incident: n=4) and reports of borderline or non-specific diabetes (baseline: n=190, unknown timing: n=107, incident: n=374).
- ⁷ Includes reports of hypertension that are possibly borderline (baseline: n=154, incident: n=11).
- ⁸ Asked directly only at baseline and then not until the fourth detailed follow-up questionnaire. Additional incident diagnoses are from help desk reports and open-ended questions on follow-ups [i.e. responses to “Any other health conditions? (Please specify)”]
- ⁹ Includes reports of borderline or high cholesterol (baseline: n=5, unknown timing: n=209, incident: n=120).
- ¹⁰ Participants may have reported more than one type of thyroid condition. Reports of thyroid disease after thyroid cancer diagnoses are not included.
- ¹¹ Hyperthyroidism was originally reported as unknown timing for n=688; reports were imputed as baseline for n=369 and as incident for n=319.
- ¹² Hypothyroidism was reported as unknown timing for n=1,693; reports were imputed as baseline for n=737 and as incident for n=956.
- ¹³ Non-toxic goiter/thyroid nodules was reported as unknown timing for n=1,486; reports were imputed as baseline for n=235 and as incident for n=1,251.
- ¹⁴ Other/unknown thyroid disease was reported as unknown timing for n=171; reports were imputed as baseline for n=8 and as incident for n=163.
- ¹⁵ At baseline, participants were asked about “osteoporosis or osteopenia”. For all follow-ups, osteoporosis and osteopenia are asked separately. For many participants, these diagnoses could not be separated and are classified as “osteoporosis or osteopenia”.
- ¹⁶ Other reported condition that has not systematically been asked about includes adenomyosis (baseline: n=2, unknown timing: n=2, and incident: n=25)
- ¹⁷ Depression questions asked differently in baseline versus follow-ups. Baseline question: Has a doctor or physician ever told you that you have clinical depression? Follow-up question: Has a doctor or physician ever told you that you have depression?