Health Benchmarks®
Clinical Quality Indicator Specification 2008

Client	HEALTH BENCHMARKS, INC. STANDARD ALGORITHM *Implemented for Blue Cross Blue Shield of Texas*
Measure Title	TREATMENT OF CARDIOVASCULAR CONDITIONS: LDL
Disease State	Cardiovascular Conditions **Indicator Classification** 2º prevention
Strength of Recommendation	A
Organizations Providing Recommendation	American College of Cardiology American Heart Association National Cholesterol Education Program
Clinical Intent	To ensure that members with cardiovascular conditions receive lipid level monitoring at a clinically appropriate frequency.
Physician Specialties	Cardiovascular Disease Non-Interventional, Family Practice, Geriatric Medicine, Internal Medicine

Background

Disease Burden

- Cardiovascular disease is the leading cause of death in the United States, and is the primary cause of death for persons age 65 and older.[1, 2]
- In 2002, 13 million adults in the United States (6.9% of the population) had coronary heart disease [CHD] [1], which accounts for more than half of all cardiovascular events in men and women under the age of 75.[3]
- One of every five deaths in the United States in 2002 (approximately 650,000 deaths) was attributed to CHD.[1]
- Within 6 years of a myocardial infarction, 18% of men and 35% of women will have a recurrent myocardial infarction (MI), and 7% of men and 6% of women will experience sudden death.[4]

Reason for Indicated Intervention or Treatment

- Increased blood cholesterol increases the risk for coronary heart disease. Lipid-lowering therapy can help decrease or reverse atherosclerotic lesion progression [5-8], decrease inflammation [9-12], and help with plaque stabilization, endothelial dysfunction reversal, and thrombogenicity reduction.[6, 13, 14]
- Clinically, lipid-lowering drug treatment is associated with decreased mortality and a lower incidence of cardiovascular events.[15-34]

Evidence Supporting Intervention or Treatment

- Several large randomized controlled trials have shown that simvastatin or pravastatin use in patients with a history of cardiovascular disease reduces the risk of recurrent events and mortality, whether the patients

have elevated [16, 17], normal or slightly elevated [18-24] cholesterol levels.

- Large scale meta-analyses focusing on studies in which cholesterol medications were used have shown that when used as secondary prevention, lipid-lowering therapy is associated with a decreased risk of coronary events, CHD mortality and all-cause mortality.[25-32]
- No well designed trials have directly evaluated whether routine monitoring of lipid levels in patients with coronary artery disease is associated with better clinical outcomes.

Clinical Recommendations

- The Third Report of the National Cholesterol Education Program (NCEP) Expert Panel on Detection, Evaluation, and Treatment of High Blood Cholesterol in Adults (Adult Treatment Panel III, or ATP III) recommends lipid monitoring for patients on stable treatment (i.e. at target LDL) every 4-6 months. ATP III recommends that patients with CHD achieve a target LDL cholesterol < 100 mg/ dL.[35]
- The 2006 update to the AHA/ACC guidelines for secondary prevention for patients with coronary and other atherosclerotic vascular disease sets the following lipid goals for patients with CVD: LDL-C <100 mg/dL, and if triglycerides are ≥ 200 mg/dL, HDL-C should be less than 120 mg/dL.[36]

Source

Healthcare Effectiveness Data and Information Set (HEDIS®) 2008 Technical Specification for Physician Measurement

Denominator Definition

Continuously enrolled members 18-75 years of age who were discharged alive for an acute myocardial infarction (AMI), coronary artery bypass graft (CABG) or percutaneous transluminal coronary angioplasty (PTCA) during the first 10 months of the year prior to the measurement year, or who had a diagnosis of ischemic vascular disease (IVD) during the measurement year and the year prior to the measurement year.

Denominator Codes

AMI
ICD-9 diagnosis code(s): 410.x1
DRG code(s): 121, 122, 516
Inpatient setting
CPT-4 code(s): 99221-99223, 99231-99233, 99238-99239, 99251-99255, 99261-99263, 99291-99300, 99356-99357, 99431-99440
UB revenue code(s): 0100-0114, 0117-0124, 0127-0134, 0137-0144, 0147-0154, 0157-0159, 0160-0169, 0190-0219, 0220-0229, 0720-0729, 0800-0809, 0987
PTCA
ICD-9 surgical proc code(s): 00.66, 36.01, 36.02, 36.05, 36.06, 36.07, 36.09
CPT-4 code(s): 33140, 92980-92982, 92984, 92995, 92996
DRG code(s): 516, 517, 526, 527, 555-558
CABG
ICD-9 surgical proc code(s): 36.1x, 36.2x
HCPCS code(s): S2205-S2209
CPT-4 code(s): 33510-33514, 33516-33519, 33521-33523, 33533-33536, 35600,

33572
DRG code(s): 106, 107, 109, 547-550
IVD
Other forms of Ischemic Heart Disease
ICD-9 diagnosis code(s): 414.0x, 414.8x, 414.9x , 429.2
Stable Angina
ICD-9 diagnosis code(s): 411.xx, 413.x
Lower Extremity Arterial Disease/Peripheral Artery Disease
ICD-9 diagnosis code(s): 440.2x, 443.9x*
Stroke
ICD-9 diagnosis code(s): 433.xx, 434.xx, 436.x*-438.9x*
Athero-embolism
ICD-9 diagnosis code(s): 444.xx, 445.xx
Renal Artery Atherosclerosis
ICD-9 diagnosis code(s): 440.1
DRG code(s): 140, 559
Outpatient setting
CPT-4 code(s): 99201-99205, 99211-99215, 99217-99220, 99241-99245, 99341-99345, 99347-99350, 99384-99387, 99394-99397, 99401-99404, 99411, 99412, 99420, 99429, 99455, 99456, 99499
UB revenue code(s): 051x, 0520-0523, 0526-0529, 057x-059x, 077x, 0982, 0983
Inpatient setting
CPT-4 code(s): 99221-99223, 99231-99233, 99238, 99239, 99251-99255, 99261-99263, 99291
UB revenue code(s): 010x, 0110-0114, 0119, 0120-0124, 0129, 0130-0134, 0139, 0140-0144, 0149, 0150-0154, 0159, 016x, 020x-022x, 072x, 0987

Denominator Exclusion Definition Patients who were discharged as expired from the denominator qualifying AMI, CABG or PTCA.

Denominator Exclusion Codes N/A

Numerator Definition Members who received a lipid panel or had LDL levels measured through direct means during the measurement year.

Numerator Codes
LDL measurement
CPT-4 code(s): 80061, 83700, 83701, 83704, 83715, 83716, 83721
LOINC code(s): 2089-1, 12773-8, 13457-7, 18261-8, 18262-6, 22748-8, 24331-1, 39469-2, 49132-4 *(if available)*
CPT category II code(s): 3048F, 3049F, 3050F *(if available)*

Physician Attribution Description
If client data does not contain PCP:

Score all physicians (in the selected specialties) who saw the member during the

measurement year.

If client data does contain PCP:

Score all primary care physicians who were assigned to the member during the measurement year.

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