2024 eCQM Flow
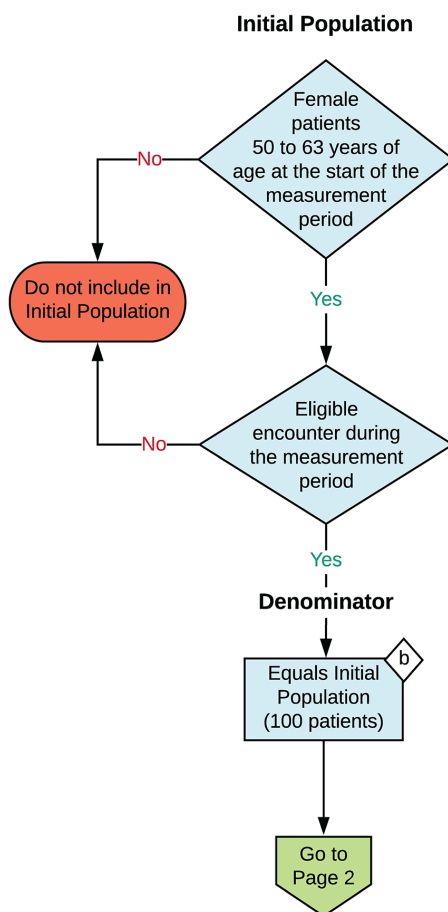**eCQM Identifier: CMS249v6**
NQF Number: 3475e

NOTE: This flow diagram represents an overview of population criteria requirements. **Refer to the eCQM specification for a complete list of data elements included in this measure and required for submission.**

Appropriate Use of DXA Scans in Women Under 65 Years Who Do Not Meet the Risk Factor Profile for Osteoporotic Fracture
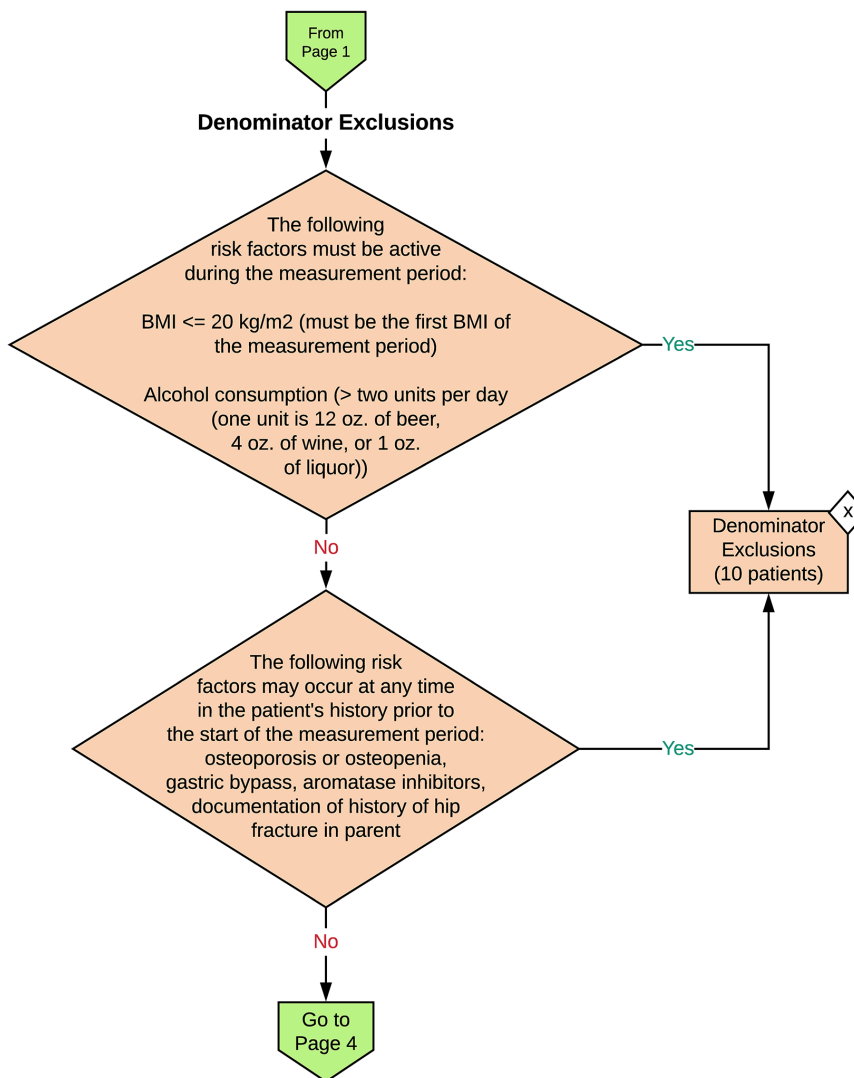
Percentage of female patients 50 to 64 years of age without select risk factors for osteoporotic fracture who received an order for a dual-energy x-ray absorptiometry (DXA) scan during the measurement period

This eCQM is a patient-based measure

Initial Population

Female patients 50 to 63 years of age at the start of the measurement period

— No → Do not include in Initial Population

Yes ↓

Eligible encounter during the measurement period

— No → Do not include in Initial Population

Yes ↓

Denominator

Equals Initial Population (100 patients) [b]
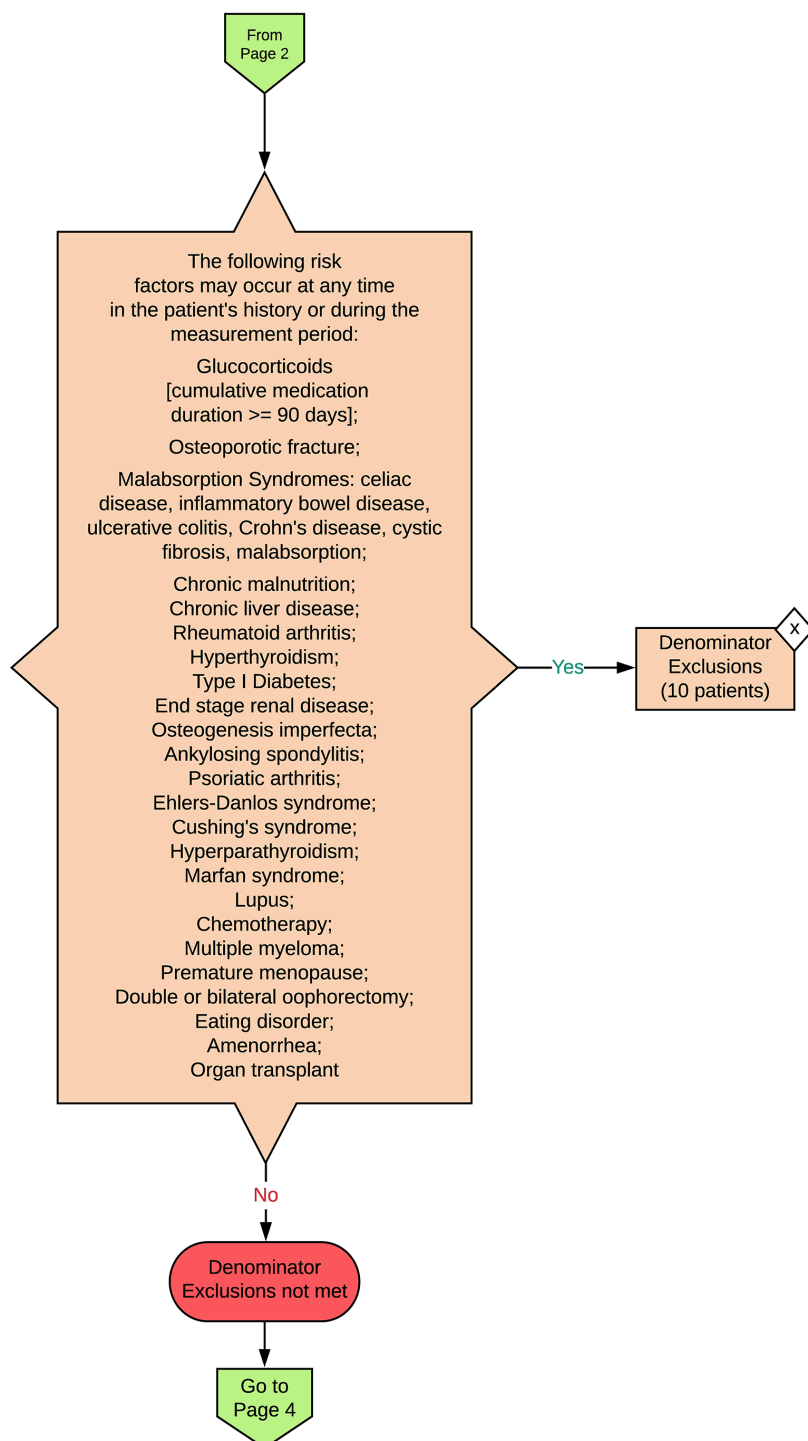
↓

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2024 eCQM Flow
eCQM Identifier: CMS249v6
NQF Number: 3475e

Appropriate Use of DXA Scans in Women Under 65 Years
Who Do Not Meet the Risk Factor Profile
for Osteoporotic Fracture

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Page 1

Denominator Exclusions

The following
risk factors must be active
during the measurement period:

BMI <= 20 kg/m2 (must be the first BMI of
the measurement period)

Alcohol consumption (> two units per day
(one unit is 12 oz. of beer,
4 oz. of wine, or 1 oz.
of liquor))

Yes

No

The following risk
factors may occur at any time
in the patient's history prior to
the start of the measurement period:
osteoporosis or osteopenia,
gastric bypass, aromatase inhibitors,
documentation of history of hip
fracture in parent

Yes

No

Denominator
Exclusions
(10 patients)

+

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2024 eCQM Flow
eCQM Identifier: CMS249v6
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Appropriate Use of DXA Scans in Women Under 65 Years
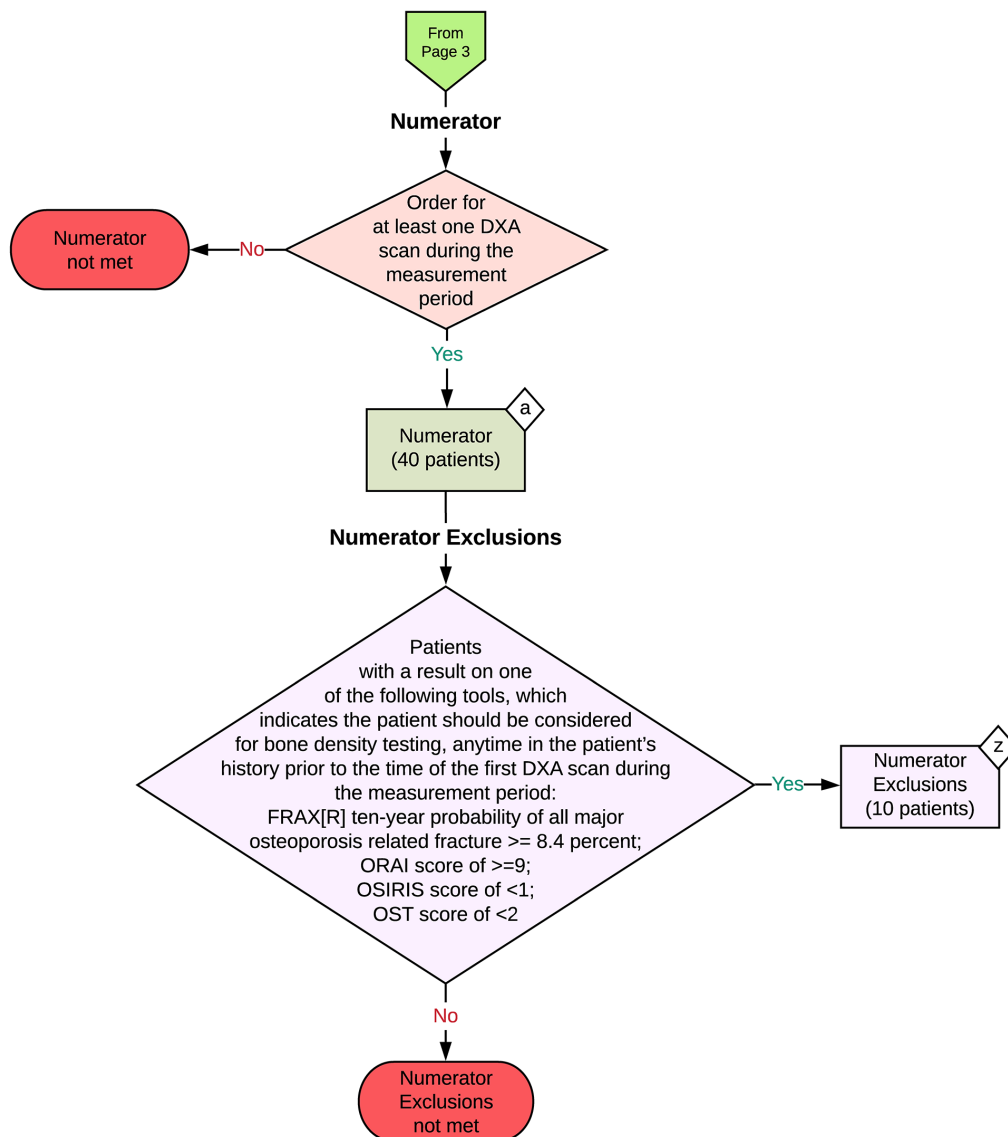**Who Do Not Meet the Risk Factor Profile**
for Osteoporotic Fracture

From
Page 2

The following risk
factors may occur at any time
in the patient's history or during the
measurement period:

Glucocorticoids
[cumulative medication
duration >= 90 days];

Osteoporotic fracture;

Malabsorption Syndromes: celiac
disease, inflammatory bowel disease,
ulcerative colitis, Crohn's disease, cystic
fibrosis, malabsorption;

Chronic malnutrition;
Chronic liver disease;
Rheumatoid arthritis;
Hyperthyroidism;
Type I Diabetes;
End stage renal disease;
Osteogenesis imperfecta;
Ankylosing spondylitis;
Psoriatic arthritis;
Ehlers-Danlos syndrome;
Cushing's syndrome;
Hyperparathyroidism;
Marfan syndrome;
Lupus;
Chemotherapy;
Multiple myeloma;
Premature menopause;
Double or bilateral oophorectomy;
Eating disorder;
Amenorrhea;
Organ transplant

Yes → Denominator
Exclusions
(10 patients) [X]

No

Denominator
Exclusions not met

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Page 4

**Appropriate Use of DXA Scans in Women Under 65 Years
Who Do Not Meet the Risk Factor Profile
for Osteoporotic Fracture**

From Page 3

Numerator

Order for at least one DXA scan during the measurement period

No → Numerator not met

Yes ↓

Numerator (40 patients) a

Numerator Exclusions

Patients with a result on one of the following tools, which indicates the patient should be considered for bone density testing, anytime in the patient's history prior to the time of the first DXA scan during the measurement period:
FRAX[R] ten-year probability of all major osteoporosis related fracture >= 8.4 percent;
ORAI score of >=9;
OSIRIS score of <1;
OST score of <2

Yes → Numerator Exclusions (10 patients) z

No ↓

Numerator Exclusions not met

Sample Calculation

Performance Rate =

$$\frac{\text{Numerator (a = 40 patients) - Numerator Exclusions (z = 10 patients)}}{\text{Denominator (b = 100 patients) - Denominator Exclusions (x = 20 patients)}} = \frac{30}{80} = 38\ \%$$

A lower score indicates better quality

eCQM Identifier: CMS249v6
NQF Number: 3475e
eCQM Title: Appropriate Use of DXA Scans in Women Under 65 Years Who Do Not Meet the Risk Factor Profile for Osteoporotic Fracture

NOTE: This flow diagram represents an overview of population criteria requirements. Refer to the eCQM specification for a complete list of data elements included in this measure and required for submission.

Description: Percentage of female patients 50 to 64 years of age without select risk factors for osteoporotic fracture who received an order for a dual-energy x-ray absorptiometry (DXA) scan during the measurement period.

This eCQM is a patient-based measure.

eCQM Flow Narrative

Initial Population
Start by identifying the Initial Population, which includes female patients 50 to 63 years of age at the start of the measurement period with an eligible encounter during the measurement period.

Denominator
The Denominator equals the Initial Population. In the sample calculation provided at the end of the eCQM flow, the Denominator is equal to 100 patients.

Denominator Exclusions
The Denominator Exclusions criteria identify a subset of the Denominator population by excluding patients with risk factors of a BMI <= 20 kg/m2 (must be the first BMI of the measurement period), or alcohol consumption (> two units per day (one unit is 12 oz. of beer, 4 oz. of wine, or 1 oz. of liquor)) during the measurement period. The Denominator Exclusions criteria also exclude patients with osteoporosis, osteopenia, gastric bypass, aromatase inhibitors, or documentation of history of hip fracture in parent that occurs at any time prior to the start of the measurement period, or one or more independent risk factors occurring at any time in the patient's history or during the measurement period (i.e., Glucocorticoids [cumulative medication duration >= 90 days], Osteoporotic fracture, Malabsorption Syndromes: celiac disease, inflammatory bowel disease, ulcerative colitis, Crohn's disease, cystic fibrosis, malabsorption, Chronic malnutrition, Chronic liver disease, Rheumatoid arthritis, Hyperthyroidism, Type I Diabetes, End stage renal disease, Osteogenesis imperfecta, Ankylosing spondylitis, Psoriatic arthritis, Ehlers-Danlos syndrome, Cushing's syndrome, Hyperparathyroidism, Marfan syndrome, Lupus, Chemotherapy, Multiple myeloma, Premature menopause, Double or bilateral oophorectomy, Eating disorder, Amenorrhea, or Organ transplant). In the sample calculation provided at the end of the eCQM flow, the Denominator Exclusions are equal to 20 patients.

Numerator
The Numerator criteria identify a subset of the Denominator population (that did not meet the Denominator Exclusions criteria) by including patients with an order for at least one dual-energy x-ray absorptiometry (DXA) scan during the measurement period. In the sample calculation provided at the end of the eCQM flow, the Numerator is equal to 40 patients.

Numerator Exclusions

The Numerator Exclusions criteria identify a subset of the Numerator population by excluding patients with a result on one of the following tools, which indicates the patient should be considered for bone density testing, anytime in the patient's history prior to the time of the first DXA scan during the measurement period: FRAX[R] ten-year probability of all major osteoporosis related fracture >= 8.4 percent, ORAI score of >=9, OSIRIS score of <1, or OST score of <2. In the sample calculation provided at the end of the eCQM flow, the Numerator Exclusions are equal to 10 patients.

Sample Calculation

A sample calculation is provided to help determine how the measure performance rate is derived. The measure performance rate is calculated by dividing the difference between the Numerator (total equals 40 patients) and the Numerator Exclusions (total equals 10 patients) by the difference between the Denominator (total equals 100 patients) and the Denominator Exclusions (total equals 20 patients), which is equal to a score of 38 percent.