

**South Africa (White) - The probabilities of a major osteoporotic fracture in men**

The following tables give the 10-year probability (%) of a major osteoporotic fracture (hip, clinical spine, forearm or proximal humerus fracture) according to the T-score for femoral neck BMD, the number of clinical risk factors (CRF) and age. Each table provides a mean estimate and a range, based on the epidemiology of South Africa (White). The range is not a confidence interval, but because the weight of different risk factors varies, is a true range.

Note that the BMI is set at 24 kg/m<sup>2</sup>

Age = 50 years

Number of CRFs	BMD T-score (femoral neck)										
	-4.0	-3.5	-3.0	-2.5	-2.0	-1.5	-1.0	-0.5	0	0.5	1.0
0	12	7.2	4.6	3.1	2.2	1.7	1.4	1.2	1.0	1.0	0.9
1	18 (15-23)	11 (9.5-14)	7.1 (6.2-9.1)	4.7 (4.0-6.0)	3.4 (2.7-4.3)	2.6 (1.9-3.3)	2.1 (1.5-2.7)	1.8 (1.2-2.4)	1.6 (1.0-2.2)	1.5 (1.0-2.1)	1.4 (0.9-2.0)
2	27 (20-38)	17 (13-24)	11 (8.4-15)	7.2 (5.5-10)	5.1 (3.6-7.3)	3.9 (2.5-6.0)	3.1 (1.9-5.1)	2.6 (1.5-4.4)	2.3 (1.2-4.0)	2.2 (1.1-3.8)	2.1 (1.1-3.7)
3	38 (27-52)	25 (17-34)	16 (11-21)	11 (7.6-15)	7.6 (4.9-12)	5.8 (3.3-9.7)	4.6 (2.5-8.2)	3.8 (1.9-7.1)	3.4 (1.6-6.4)	3.2 (1.5-6.1)	3.0 (1.4-5.9)
4	52 (37-65)	35 (24-45)	23 (15-29)	16 (10-20)	11 (7.2-15)	8.4 (5.5-12)	6.7 (4.1-11)	5.5 (3.2-9.1)	4.9 (2.7-8.2)	4.6 (2.4-7.9)	4.4 (2.2-7.6)
5	66 (56-76)	48 (38-57)	33 (25-38)	22 (17-25)	16 (12-19)	12 (8.9-15)	9.4 (7.1-13)	7.8 (5.9-11)	6.9 (5.0-9.7)	6.4 (4.5-9.3)	6.1 (4.2-8.9)
6	79	62	44	31	22	17	13	11	9.5	8.9	8.5

**Ten years probability of osteoporotic fractures (%) according to BMD, the number of clinical risk factors (CRF) and age in men from South Africa (White).**

**Age = 55 years**

Number of CRFs	BMD T-score (femoral neck)										
	-4.0	-3.5	-3.0	-2.5	-2.0	-1.5	-1.0	-0.5	0	0.5	1.0
0	13	8.5	5.6	3.9	2.8	2.2	1.7	1.5	1.3	1.2	1.1
1	20 (17-24)	13 (11-16)	8.5 (7.6-10)	5.8 (4.9-7.2)	4.2 (3.4-5.2)	3.3 (2.4-4.0)	2.6 (1.9-3.4)	2.2 (1.5-2.9)	1.9 (1.3-2.7)	1.8 (1.2-2.5)	1.7 (1.1-2.4)
2	29 (22-39)	19 (15-26)	13 (10-17)	8.7 (6.7-12)	6.3 (4.5-8.8)	4.8 (3.2-7.2)	3.9 (2.3-6.1)	3.2 (1.8-5.2)	2.9 (1.6-4.8)	2.7 (1.4-4.5)	2.5 (1.3-4.3)
3	40 (30-51)	27 (20-35)	18 (14-24)	13 (9.3-18)	9.3 (6.1-14)	7.0 (4.3-12)	5.6 (3.1-9.7)	4.6 (2.4-8.3)	4.1 (2.0-7.6)	3.8 (1.8-7.2)	3.6 (1.7-6.8)
4	53 (40-64)	38 (27-47)	26 (18-31)	18 (13-23)	13 (9.0-18)	10 (6.8-15)	8.0 (5.2-12)	6.6 (3.9-11)	5.9 (3.3-9.8)	5.4 (3.0-9.2)	5.1 (2.7-8.8)
5	66 (58-74)	50 (42-58)	36 (29-41)	26 (20-29)	19 (15-23)	14 (11-18)	11 (8.7-15)	9.2 (7.1-13)	8.2 (6.0-12)	7.6 (5.3-11)	7.1 (4.9-10)
6	78	63	47	35	26	20	16	13	11	10	9.8

**Age = 60 years**

Number of CRFs	BMD T-score (femoral neck)										
	-4.0	-3.5	-3.0	-2.5	-2.0	-1.5	-1.0	-0.5	0	0.5	1.0
0	14	9.4	6.5	4.7	3.5	2.8	2.2	1.8	1.7	1.5	1.4
1	20 (18-24)	14 (13-16)	9.7 (8.6-11)	7.0 (5.9-8.3)	5.3 (4.2-6.2)	4.1 (3.1-5.0)	3.3 (2.4-4.2)	2.7 (1.9-3.6)	2.4 (1.6-3.4)	2.2 (1.5-3.1)	2.1 (1.4-2.9)
2	29 (23-37)	20 (16-26)	14 (12-19)	10 (8.0-13)	7.7 (5.6-11)	6.0 (4.0-8.7)	4.8 (3.0-7.4)	4.0 (2.3-6.3)	3.6 (2.0-5.8)	3.3 (1.8-5.5)	3.0 (1.6-5.1)
3	39 (31-48)	28 (22-35)	20 (16-26)	15 (11-21)	11 (7.5-17)	8.6 (5.4-14)	6.9 (4.0-12)	5.7 (3.1-9.9)	5.1 (2.6-9.2)	4.7 (2.3-8.6)	4.3 (2.1-8.1)
4	51 (40-60)	38 (29-45)	28 (21-33)	21 (15-26)	16 (11-21)	12 (8.5-18)	9.7 (6.5-15)	8.0 (5.0-13)	7.2 (4.2-12)	6.6 (3.7-11)	6.1 (3.3-10)
5	63 (57-70)	50 (43-55)	38 (32-41)	28 (23-33)	21 (18-26)	17 (14-21)	13 (11-18)	11 (8.7-15)	9.9 (7.4-14)	9.1 (6.5-13)	8.4 (5.8-12)
6	74	61	48	37	29	23	18	15	13	12	11

**Ten years probability of osteoporotic fractures (%) according to BMD, the number of clinical risk factors (CRF) and age in men from South Africa (White).**

**Age = 65 years**

Number of CRFs	BMD T-score (femoral neck)										
	-4.0	-3.5	-3.0	-2.5	-2.0	-1.5	-1.0	-0.5	0	0.5	1.0
0	14	10	7.3	5.4	4.2	3.3	2.6	2.2	2.0	1.8	1.6
1	20 (19-23)	15 (13-16)	11 (9.3-12)	8.0 (6.6-9.0)	6.1 (4.8-7.2)	4.8 (3.6-5.9)	3.9 (2.8-5.0)	3.2 (2.3-4.3)	2.9 (2.0-3.9)	2.6 (1.7-3.6)	2.4 (1.6-3.4)
2	28 (23-34)	21 (17-26)	15 (13-19)	11 (8.9-15)	8.8 (6.5-12)	6.9 (4.8-9.9)	5.6 (3.6-8.3)	4.7 (2.9-7.2)	4.2 (2.4-6.6)	3.8 (2.1-6.1)	3.5 (1.9-5.7)
3	38 (30-45)	28 (23-34)	21 (17-27)	16 (12-22)	12 (8.7-18)	9.8 (6.4-15)	7.9 (4.8-13)	6.6 (3.8-11)	5.9 (3.2-10)	5.3 (2.8-9.5)	4.9 (2.5-8.9)
4	48 (40-55)	38 (30-43)	29 (22-35)	22 (17-28)	17 (13-23)	14 (10-19)	11 (7.7-16)	9.2 (6.1-14)	8.2 (5.1-13)	7.4 (4.4-12)	6.8 (3.9-11)
5	59 (54-64)	48 (43-52)	38 (33-42)	30 (25-35)	23 (20-28)	19 (16-24)	15 (12-20)	13 (10-17)	11 (8.5-16)	10 (7.4-14)	9.3 (6.5-13)
6	69	59	48	38	31	25	20	17	15	14	13

**Age = 70 years**

Number of CRFs	BMD T-score (femoral neck)										
	-4.0	-3.5	-3.0	-2.5	-2.0	-1.5	-1.0	-0.5	0	0.5	1.0
0	14	11	8.1	6.2	4.9	3.9	3.1	2.6	2.3	2.1	1.9
1	21 (19-26)	16 (14-19)	12 (10-15)	9.1 (7.4-11)	7.0 (5.6-8.5)	5.5 (4.3-6.6)	4.4 (3.3-5.2)	3.7 (2.7-4.4)	3.2 (2.3-3.8)	2.9 (2.0-3.4)	2.6 (1.8-3.1)
2	30 (25-38)	23 (18-29)	17 (13-22)	13 (10.0-17)	10 (7.5-13)	7.9 (5.6-10)	6.2 (4.3-8.4)	5.2 (3.5-7.0)	4.5 (2.9-6.2)	4.0 (2.5-5.5)	3.5 (2.2-4.9)
3	42 (33-51)	32 (25-41)	25 (18-33)	19 (14-26)	15 (10-20)	11 (7.6-16)	8.8 (5.8-13)	7.3 (4.6-11)	6.2 (3.9-9.6)	5.4 (3.3-8.5)	4.8 (2.9-7.6)
4	54 (45-61)	44 (35-51)	34 (27-41)	27 (20-33)	21 (15-26)	16 (12-21)	12 (9.0-17)	10 (7.3-14)	8.6 (6.1-12)	7.4 (5.2-11)	6.5 (4.5-9.8)
5	66 (58-70)	56 (48-61)	46 (39-51)	36 (30-41)	29 (23-33)	22 (18-26)	17 (14-21)	14 (11-18)	12 (9.6-15)	10 (8.3-13)	8.8 (7.2-12)
6	75	67	58	48	39	30	24	19	16	14	12

**Ten years probability of osteoporotic fractures (%) according to BMD, the number of clinical risk factors (CRF) and age in men from South Africa (White).**

**Age = 75 years**

Number of CRFs	BMD T-score (femoral neck)										
	-4.0	-3.5	-3.0	-2.5	-2.0	-1.5	-1.0	-0.5	0	0.5	1.0
0	15	12	9.2	7.2	5.7	4.6	3.7	3.2	2.8	2.5	2.2
1	24 (19-39)	19 (14-30)	14 (11-23)	11 (8.4-18)	8.7 (6.5-13)	6.8 (5.1-10)	5.4 (4.0-7.6)	4.6 (3.3-6.0)	3.9 (2.8-4.9)	3.4 (2.4-4.0)	3.0 (2.1-3.4)
2	35 (25-52)	28 (19-43)	22 (15-34)	17 (11-27)	13 (8.7-21)	10 (6.7-16)	8.0 (5.2-12)	6.6 (4.3-9.6)	5.5 (3.6-7.8)	4.7 (3.1-6.4)	4.1 (2.7-5.3)
3	48 (33-62)	40 (26-53)	32 (20-44)	25 (15-36)	20 (12-28)	15 (9.0-22)	12 (7.0-17)	9.7 (5.7-14)	8.0 (4.8-11)	6.6 (4.1-9.6)	5.6 (3.5-8.1)
4	60 (43-71)	53 (35-63)	44 (27-55)	36 (22-46)	29 (17-37)	23 (13-29)	18 (10-23)	14 (8.6-18)	11 (7.3-15)	9.4 (6.2-13)	7.9 (5.3-11)
5	71 (54-77)	65 (46-71)	57 (38-64)	49 (31-55)	40 (25-46)	32 (20-37)	26 (16-30)	21 (13-24)	17 (11-20)	13 (9.4-16)	11 (8.2-14)
6	79	75	69	62	53	44	36	29	24	19	16

**Age = 80 years**

Number of CRFs	BMD T-score (femoral neck)										
	-4.0	-3.5	-3.0	-2.5	-2.0	-1.5	-1.0	-0.5	0	0.5	1.0
0	16	13	10.0	8.0	6.4	5.2	4.2	3.6	3.1	2.7	2.4
1	24 (19-39)	19 (15-32)	15 (12-25)	12 (9.2-20)	9.8 (7.3-16)	7.8 (5.8-12)	6.3 (4.6-9.5)	5.3 (3.9-7.7)	4.5 (3.3-6.3)	3.9 (2.8-5.2)	3.4 (2.4-4.3)
2	34 (24-50)	28 (19-43)	23 (16-36)	18 (12-29)	15 (9.8-23)	12 (7.7-18)	9.4 (6.2-15)	7.8 (5.1-12)	6.6 (4.3-9.8)	5.6 (3.6-8.1)	4.7 (3.1-6.7)
3	45 (31-60)	39 (25-53)	32 (21-45)	27 (17-38)	22 (13-31)	17 (10-25)	14 (8.3-20)	12 (6.9-16)	9.6 (5.8-13)	8.0 (4.9-11)	6.7 (4.1-9.5)
4	57 (40-67)	50 (33-61)	44 (27-54)	37 (22-47)	31 (18-39)	25 (14-32)	20 (12-26)	17 (9.7-22)	14 (8.2-18)	12 (7.0-15)	9.6 (6.0-13)
5	67 (49-73)	61 (43-68)	55 (36-62)	48 (30-55)	42 (25-48)	35 (20-40)	29 (17-33)	24 (14-28)	20 (12-24)	17 (10-20)	14 (8.9-16)
6	75	71	66	60	53	46	39	33	28	23	19

**Ten years probability of osteoporotic fractures (%) according to BMD, the number of clinical risk factors (CRF) and age in men from South Africa (White).**

**Age = 85 years**

Number of CRFs	BMD T-score (femoral neck)										
	-4.0	-3.5	-3.0	-2.5	-2.0	-1.5	-1.0	-0.5	0	0.5	1.0
0	15	13	10	8.5	6.9	5.6	4.7	4.0	3.5	3.0	2.6
1	23 (18-38)	19 (15-32)	16 (12-27)	13 (9.7-22)	11 (7.9-18)	8.7 (6.4-15)	7.2 (5.3-12)	6.2 (4.5-9.9)	5.2 (3.8-8.3)	4.5 (3.2-6.9)	3.8 (2.8-5.7)
2	33 (23-48)	28 (19-42)	24 (16-36)	20 (13-31)	16 (11-26)	13 (8.6-21)	11 (7.1-18)	9.3 (6.0-15)	7.9 (5.1-13)	6.7 (4.3-10)	5.7 (3.7-8.8)
3	43 (30-57)	38 (25-52)	33 (21-46)	28 (17-40)	24 (14-34)	20 (12-29)	16 (9.8-24)	14 (8.2-20)	12 (6.9-17)	10.0 (5.9-14)	8.4 (5.0-12)
4	54 (37-65)	49 (32-60)	44 (28-54)	38 (23-48)	33 (19-42)	28 (16-36)	24 (13-31)	20 (11-27)	17 (9.6-23)	15 (8.2-19)	12 (7.0-16)
5	64 (46-70)	59 (41-66)	54 (36-61)	49 (31-56)	43 (26-50)	38 (22-44)	33 (19-38)	29 (16-34)	25 (14-29)	21 (12-25)	18 (10-21)
6	73	69	65	60	54	49	44	39	34	30	25

**Age = 90 years**

Number of CRFs	BMD T-score (femoral neck)										
	-4.0	-3.5	-3.0	-2.5	-2.0	-1.5	-1.0	-0.5	0	0.5	1.0
0	14	12	10	8.5	7.0	5.8	5.0	4.3	3.7	3.2	2.8
1	22 (17-37)	19 (14-32)	16 (12-28)	13 (9.9-24)	11 (8.3-20)	9.4 (6.9-17)	8.1 (5.9-15)	6.9 (5.0-13)	6.0 (4.3-11)	5.1 (3.7-9.1)	4.4 (3.2-7.8)
2	31 (21-47)	27 (18-42)	24 (16-37)	20 (13-32)	17 (11-28)	15 (9.3-24)	13 (8.0-21)	11 (6.9-18)	9.4 (5.9-16)	8.1 (5.1-14)	7.0 (4.4-12)
3	41 (28-55)	37 (24-51)	33 (21-46)	29 (17-41)	25 (15-36)	22 (12-32)	19 (11-28)	16 (9.3-25)	14 (8.1-22)	12 (7.0-19)	11 (6.0-16)
4	52 (35-63)	48 (31-58)	43 (27-54)	39 (23-49)	35 (20-45)	30 (17-40)	27 (15-36)	24 (13-32)	21 (11-28)	18 (9.6-25)	16 (8.3-22)
5	62 (43-68)	58 (39-65)	54 (35-61)	50 (31-56)	45 (27-52)	41 (23-47)	37 (20-43)	33 (18-39)	30 (16-35)	26 (14-31)	23 (12-28)
6	71	68	64	60	56	52	48	44	40	36	32