

Subgroup analyses by neonatal active form (Vitamin D2 or D3), dosage (single oral dose of 50 000 IU or 400 IU daily), time of administration (from birth, from one month age), and duration of supplementation (single, oral 50 000 IU at birth, 1–2 months or > 6 months)

Source: Tan ML, Abrams SA, Osborn DA. Vitamin D supplementation for term breastfed infants to prevent vitamin D deficiency and improve bone health. Cochrane Database Syst Rev. 2020;(12):CD013046.

Certainty assessment							№ of patients		Effect		Certainty (GRADE)	Importance
№ of studies	Study design	Risk of bias	Inconsistency	Indirectness	Imprecision	Other considerations	Vitamin D	Placebo or no supplementation	Relative (95% CI)	Absolute (95% CI)		
Vitamin D insufficiency (25(OH) vitamin D < 50 nmol/L) – vitamin D3												
3	randomized trials	serious ^a	not serious	not serious	serious ^b	none	27/126 (21.4%)	60/136 (44.1%)	RR 0.58 (0.40 to 0.82)	185 fewer per 1000 (from 265 fewer to 79 fewer)	⊕⊕○○ LOW	CRITICAL
Vitamin D insufficiency (25(OH) vitamin D < 50 nmol/L) – vitamin D2												
1	randomized trials	very serious ^d	not serious	not serious	very serious ^{b,c,e}	none	2/6 (33.3%)	4/6 (66.7%)	RR 0.50 (0.14 to 1.77)	333 fewer per 1000 (from 573 fewer to 513 more)	⊕○○○ VERY LOW	CRITICAL
Vitamin D deficiency (25(OH) vitamin D < 30 nmol/L) – vitamin D3												
2	randomized trials	serious ^a	not serious	not serious	very serious ^{b,c,e}	none	5/58 (8.6%)	14/64 (21.9%)	not estimable	90 more per 1000 (from 20 fewer to 200 more)	⊕○○○ VERY LOW	CRITICAL
Vitamin D insufficiency (25(OH) vitamin D < 50 nmol/L) by dosage – vitamin D 400 IU/day												
3	randomized trials	serious ^a	not serious	not serious	serious ^b	none	25/121 (20.7%)	58/132 (43.9%)	RR 0.56 (0.39 to 0.81)	193 fewer per 1000 (from 268 fewer to 83 fewer)	⊕⊕○○ LOW	CRITICAL
Vitamin D deficiency (25(OH) vitamin D < 30 nmol/L) by dosage – vitamin D 400 IU/day												
1	randomized trials	serious ^a	not serious	not serious	very serious ^{b,c,e}	none	5/47 (10.6%)	14/54 (25.9%)	not estimable	150 more per 1000 (from 10 more to 300 more)	⊕○○○ VERY LOW	CRITICAL
Vitamin D insufficiency (25(OH) vitamin D < 50 nmol/L) by dosage – single, oral vitamin D 50 000 IU at birth												
1	randomized trials	serious ^a	not serious	not serious	serious ^{b,c,e}	none	4/11 (36.4%)	6/10 (60.0%)	RR 0.61 (0.24 to 1.54)	234 fewer per 1000 (from 456 fewer to 324 more)	⊕○○○ VERY LOW	CRITICAL

Certainty assessment							№ of patients		Effect		Certainty (GRADE)	Importance
№ of studies	Study design	Risk of bias	Inconsistency	Indirectness	Imprecision	Other considerations	Vitamin D	Placebo or no supplementation	Relative (95% CI)	Absolute (95% CI)		
Vitamin D deficiency (25(OH) vitamin D < 30 nmol/L) by dosage – single, oral vitamin D 50 000 IU at birth												
1	randomized trials	serious ^a	not serious	not serious	very serious ^{b,e,f}	none	0/11 (0.0%)	0/10 (0.0%)	not estimable	0 fewer per 1000 (from 170 fewer to 170 more)	⊕○○○ VERY LOW	CRITICAL
Vitamin D insufficiency (25(OH) vitamin D < 50 nmol/L) by timing of commencement – from birth												
3	randomized trials	serious ^a	not serious	not serious	serious ^b	none	25/64 (39.1%)	42/70 (60.0%)	RR 0.65 (0.46 to 0.94)	210 fewer per 1000 (from 324 fewer to 36 fewer)	⊕⊕○○ LOW	CRITICAL
Vitamin D deficiency (25(OH) vitamin D < 30 nmol/L) by timing of commencement – from birth												
2	randomized trials	serious ^a	not serious	not serious	very serious ^{b,c,e}	none	5/58 (8.6%)	14/64 (21.9%)	not estimable	90 more per 1000 (from 20 fewer to 200 more)	⊕○○○ VERY LOW	CRITICAL
Vitamin D insufficiency (25(OH) vitamin D < 50 nmol/L) by timing of commencement – from 1 month of age												
1	randomized trials	serious ^a	not serious	not serious	serious ^{b,c}	none	4/68 (5.9%)	22/72 (30.6%)	RR 0.19 (0.07 to 0.53)	248 fewer per 1000 (from 284 fewer to 144 fewer)	⊕⊕○○ LOW	CRITICAL
Vitamin D insufficiency (25(OH) vitamin D < 50 nmol/L) by duration of supplementation – single, oral vitamin D 50 000 IU at birth												
1	randomized trials	serious ^a	not serious	not serious	very serious ^{b,c,d}	none	4/11 (36.4%)	6/10 (60.0%)	RR 0.61 (0.24 to 1.54)	234 fewer per 1000 (from 456 fewer to 324 more)	⊕○○○ VERY LOW	CRITICAL
Vitamin D deficiency (25(OH) vitamin D < 30 nmol/L) by duration of supplementation – single, oral vitamin D 50 000 IU at birth												
1	randomized trials	serious ^a	not serious	not serious	very serious ^{b,e,f}	none	0/11 (0.0%)	0/10 (0.0%)	not estimable	0 fewer per 1000 (from 170 fewer to 170 more)	⊕○○○ VERY LOW	CRITICAL

№ of studies	Certainty assessment						№ of patients		Effect		Certainty (GRADE)	Importance
	Study design	Risk of bias	Inconsistency	Indirectness	Imprecision	Other considerations	Vitamin D	Placebo or no supplementation	Relative (95% CI)	Absolute (95% CI)		

Vitamin D insufficiency (25(OH) vitamin D < 50 nmol/L) by duration of supplementation – 1–2 months

1	randomized trials	very serious ^c	not serious	not serious	very serious ^{a,b,d}	none	2/6 (33.3%)	4/6 (66.7%)	RR 0.50 (0.14 to 1.77)	333 fewer per 1000 (from 573 fewer to 513 more)	⊕○○○ VERY LOW	CRITICAL
---	-------------------	---------------------------	-------------	-------------	-------------------------------	------	-------------	-------------	----------------------------------	---	------------------	----------

Vitamin D insufficiency (25(OH) vitamin D < 50 nmol/L) by duration of supplementation – > 6 months

2	randomized trials	serious ^a	not serious	not serious	serious ^c	none	23/115 (20.0%)	54/126 (42.9%)	RR 0.57 (0.39 to 0.83)	184 fewer per 1000 (from 261 fewer to 73 fewer)	⊕⊕○○ LOW	CRITICAL
---	-------------------	----------------------	-------------	-------------	----------------------	------	-------------------	----------------	----------------------------------	---	-------------	----------

Vitamin D deficiency (25(OH) vitamin D < 30 nmol/L) by duration of supplementation – > 6 months

1	randomized trials	serious ^a	not serious	not serious	very serious ^{b,c,e}	none	5/47 (10.6%)	14/54 (25.9%)	not estimable	150 more per 1000 (from 10 more to 300 more)	⊕○○○ VERY LOW	CRITICAL
---	-------------------	----------------------	-------------	-------------	-------------------------------	------	--------------	---------------	---------------	--	------------------	----------

CI: confidence interval; RR: risk ratio.

a. The pooled effect provided by studies "B".

b. Less than 300 babies.

c. Less than 30 events.

d. The pooled effect provided by studies "C".

e. Wide confidence interval crossing the line of no effect.

f. No events.