Certainty of evidence on the associations of cycling, running, and swimming participation with the risk of all-cause mortality

Evidence	Certainty assessment							№ of participants		Event rate in the non-exposed group	Effect		Certainty
	№ of studies	Study design	Risk of bias	Inconsistency	Indirectness	Imprecision	Other considerations	Exposed group	Non-exposed group		Relative (95% CI*)	Absolute (95% CI*)	
Cycling and risk of all-cause mortality	8	non-randomised studies	not serious	serious‡	not serious	not serious	none	77,931	559,532	6.2%	HR† = 0.79 (0.73, 0.84)	13 fewer events per 1,000 (from 16 fewer to 10 fewer)	⊕⊕⊕◯ Moderate
Running and risk of all-cause mortality	8	non-randomised studies	not serious	serious‡	not serious	not serious	none	42,056	464,528	30.3%	HR† = 0.77 (0.70, 0.85)	60 fewer events per 1,000 (from 80 fewer to 39 fewer)	⊕⊕⊕◯ Moderate
Swimming and risk of all-cause mortality	4	non-randomised studies	not serious	very serious§	not serious	not serious	none	39,324	331,707	35.6%	HR† = 0.76 (0.63, 0.92)	72 fewer events per 1,000 (from 114 fewer to 23 fewer)	⊕⊕◯◯ Low

* 95% confidence interval for the pooled hazard ratio

† Pooled hazard ratio

‡ Substantial heterogeneity across studies

§ High heterogeneity across studies