

Online supplementary appendix 5. Results of single trials that investigated pain

Comparison	Intervention		Comparator		Outcome measure	Mean difference (95% CI) ^b
	Mean pain (SD) ^a	Sample size	Mean pain (SD)	Sample size		
Short term pain						
Customised foot orthosis vs firm prefabricated foot orthosis[27]	23.9 (3.3)	25	22.3 (6.5)	21	FFI-R – Pain subscale	1.6 (-2.7 to 5.9)
Customised foot orthosis vs soft prefabricated foot orthosis[38]	36.4 (19.8)	72	39.4 (27.9)	72	FFI-R	-3.0 (-10.9 to 4.9)
Customised foot orthosis vs night splint[47]	-69.0 (19.0)	13	-69.0 (18.0)	15	FAOS – pain subscale	0.0 (-13.8 to 13.8)
Firm prefabricated foot orthosis vs low-Dye taping[37]	3.3 (1.2)	15	5.0 (1.8)	15	VAS (0-10)	-1.7 (-2.8 to -0.6)
Firm prefabricated foot orthosis vs contoured sandal[49]	4.0 (0.7)	51	4.5 (1.0)	49	NPRS (0-10)	-0.5 (-0.8 to -0.2)
Firm prefabricated foot orthosis vs flat flip-flop[49]	4.0 (0.7)	51	4.0 (0.8)	50	NPRS (0-10)	0.0 (-0.29 to 0.29)
Soft prefabricated foot orthosis vs sham foot orthosis[50]	20.3 (20.1)	10	46.0 (33.9)	10	VAS (0-100)	-25.7 (-50.1 to -1.3)
Soft prefabricated foot orthosis vs corticosteroid injection[52]	4.6 (1.3)	20	3.7 (1.4)	20	VAS (0-10)	0.9 (0.1 to 1.7)
Soft prefabricated foot orthosis + magnetic foil vs soft prefabricated foot orthosis[51]	4.4 (1.3)	57	4.2 (1.9)	44	VAS (0-10)	0.2 (-0.6 to 1.0)
Medium term pain						
Customised foot orthosis vs soft prefabricated foot orthosis[38]	31.9 (26.0)	72	34.2 (27.6)	72	FFI-R	-2.3 (-11.1 to 6.5)
Customised foot orthosis vs heel cup[[45]	-19.0 (29.2)	34	-27.7 (31.5)	43	FFI – Pain subscale	-3.2 (-17.4 to 11.0)
Customised foot orthosis vs corticosteroid injection + NSAID[42]	-4.4 (3.1)	28	-3.4 (3.0)	31	VAS (0-10)	-1.0 (-2.6 to 0.6)
Customised foot orthosis vs no additional treatment (stretching provided to both groups)[45]	-19.0 (29.2)	34	-15.8 (32.9)	39	FFI – Pain subscale	-3.2 (-17.4 to 11.0)

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Firm prefabricated foot orthosis vs soft prefabricated foot orthosis[46]	-74.0 (25.3)	22	-62.0 (26.1)	22	FHSQ – pain subscale	-12.0 (-27.2 to 3.2)
Firm prefabricated foot orthosis vs night splint[44]	-3.2 (2.2)	62	-2.8 (2.1)	60	VAS (0-10)	-0.4 (-1.2 to 0.4)
Firm prefabricated foot orthosis vs ankle brace[41]	-21.1 (17.5)	25	-25.8 (19.5)	25	FFI	4.7 (-5.6 to 14.9)
Firm prefabricated foot orthosis vs contoured sandal[49]	2.0 (0.7)	51	3.0 (0.6)	49	NPRS (0-10)	-1.0 (-1.3 to -0.7)
Firm prefabricated foot orthosis vs flat flip-flop[49]	2.0 (0.7)	51	3.0 (0.8)	50	NPRS (0-10)	-1.0 (-1.29 to -0.71)
Soft prefabricated foot orthosis + magnetic foil vs soft prefabricated foot orthosis[51]	3.9 (2.6)	57	3.9 (2.6)	44	VAS (0-10)	0.0 (-1.0 to 1.0)
Longer term pain						
Customised foot orthosis vs firm prefabricated foot orthosis[26]	-83.1 (21.4)	46	-83.8 (18.0)	44	FHSQ – Pain subscale	0.7 (-7.5 to 8.9)
Firm prefabricated foot orthosis vs sham foot orthosis[26]	-83.8 (18.0)	44	-82.3 (18.0)	46	FHSQ – Pain subscale	-1.5 (-8.9 to 5.9)
Soft prefabricated foot orthosis vs heel pad[43]	5.3 (1.5)	35	5.5 (1.2)	40	VAS (0-10)	-0.2 (-0.8 to 0.4)
Short term 'first step' pain						
Customised foot orthosis vs sham foot orthosis[27]	3.4 (1.9)	24	3.6 (2.0)	21	VAS (0-10)	-0.2 (-1.3 to 0.9)
Customised foot orthosis vs firm prefabricated foot orthosis[27]	3.4 (1.9)	24	4.0 (1.5)	23	VAS (0-10)	-0.6 (-1.6 to 0.4)
Firm prefabricated foot orthosis vs sham foot orthosis[27]	4.0 (1.5)	23	3.6 (2.0)	21	VAS (0-10)	0.4 (-0.6 to 1.4)
Medium term 'first step' pain						
Customised foot orthosis vs sham foot orthosis[27]	2.6 (2.4)	25	2.9 (2.4)	23	VAS (0-10)	-0.1 (-0.7 to 0.4)
Customised foot orthosis vs night splint[44]	-5.3 (2.4)	71	-6.1 (1.6)	60	VAS (0-10)	0.4 (0.1 to 0.7)

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	Mean pain (SD) ^a	Sample size	Mean pain (SD)	Sample size		
Firm prefabricated foot orthosis vs sham foot orthosis[27]	2.7 (2.1)	21	2.9 (2.4)	23	VAS (0-10)	-0.1 (-0.7 to 0.5)
Firm prefabricated foot orthosis vs night splint[44]	-5.3 (2.4)	62	-6.1 (1.6)	60	VAS (0-10)	0.80 (0.1 to 1.5)

Abbreviations: SD, standard deviation; CI, confidence interval; VAS, visual analogue scale; FFI, Foot Function Index; FFI-R, Foot Function Index – Revised; FHSQ, Foot Health Status Questionnaire; NPRS, numeric pain rating scale.

^a Negative mean pain values indicate outcome measures where higher scores represent less pain, or mean change was reported.

^b Negative mean difference values indicate that the effect size favours the intervention. A positive value favours the comparator