

Supplementary File 9. Analyses by individual polyphenols

Table S1. Effect of individual polyphenol-rich foods, juices and concentrates on maximal voluntary isometric contraction (MIVC)

MIVC	Cherry	POM	Cocoa	Beetroot
Immediately post	0.31 (-0.06, 0.68); P = 0.10, I ² = 0%	0.03 (-0.33, 0.40); P = 0.85, I ² = 0%		0.29 (-0.04, 0.62); P = 0.08, I ² = 0%
24 hrs	0.59 (0.06, 1.12); P = 0.03, I ² = 64%	0.27 (-0.04, 0.58); P = 0.08, I ² = 0%	0.03 (-0.42, 0.48); P = 0.91, I ² = 0%	0.41 (-0.17, 0.99); P = 0.17, I ² = 62%
48 hrs	0.67 (0.23, 1.11); P = 0.003, I ² = 50%	0.23 (-0.15, 0.61); P = 0.24, I ² = 29%	0.50 (0.09, 0.91); P = 0.02, I ² = 0%	0.34 (-0.06, 0.75); P = 0.10, I ² = 29%
72 hrs	0.41 (-0.08, 0.90); P = 0.10, I ² = 38%	0.21 (-0.04, 0.46); P = 0.10, I ² = 0%		0.28 (-0.09, 0.64); P = 0.14, I ² = 0%
96 hrs	0.79 (-0.38, 1.95); P = 0.19, I ² = 77%	0.37 (0.11, 0.63); P = 0.006, I ² = 0%		

Data presented as SMD (95% CI)

Table S2. Effect of individual polyphenol-rich foods, juices and concentrates on delayed onset muscle soreness (DOMS)

DOMS	Cherry	POM	Cocoa	Beetroot
Immediately post	-0.32 (-0.92, 0.28); P = 0.30, I ² = 75	0.14 (-0.31, 0.59); P = 0.54, I ² = 37%		-0.42 (-0.90, 0.07); P = 0.09, I ² = 48%
24 hrs	-0.27 (-0.55, 0.00); P = 0.05, I ² = 46%	0.16 (-0.40, 0.72); P = 0.58, I ² = 73%	-0.23 (-0.89, 0.43); P = 0.50, I ² = 67%	-0.62 (-1.19, -0.06); P = 0.03, I ² = 60%
48 hrs	-0.24 (-0.58, 0.10); P = 0.17, I ² = 59%	0.09 (-0.53, 0.72); P = 0.77, I ² = 78%	-0.17 (-0.50, 0.17); P = 0.33, I ² = 0%	-0.56 (-0.89, -0.22); P = 0.001, I ² = 0%
72 hrs	-0.58 (-0.83, -0.33); P < 0.001, I ² = 64%	-0.22 (-0.48, 0.03); P = 0.09, I ² = 0%		-0.70 (-1.10, -0.31); P < 0.001, I ² = 0%
96 hrs	-0.15 (-0.49, 0.19); P = 0.40, I ² = 0%	-0.08 (-0.34, 0.17); P = 0.51, I ² = 0%		

Data presented as SMD (95% CI)

Table S3. Effect of individual polyphenol-rich foods, juices and concentrates on counter movement jump (CMJ)

CMJ	Cherry	POM	Cocoa	Beetroot
Immediately post	0.51 (-0.12, 1.14); P = 0.11, I ² = 0%			0.25 (-0.08, 0.58); P = 0.13, I ² = 0%
24 hrs	0.82 (-0.26, 1.90); P = 0.14, I ² = 87%			0.34 (0.04, 0.65); P = 0.03, I ² = 0%
48 hrs	0.72 (0.11, 1.32); P = 0.02, I ² = 84%			0.46 (0.12, 0.81); P = 0.009, I ² = 0%
72 hrs	0.65 (-0.55, 1.86); P = 0.29, I ² = 87%			0.49 (0.07, 0.90); P = 0.02, I ² = 22%

Data presented as SMD (95% CI)

Table S4. Subgroup Analyses comparing individual polyphenol-rich foods, juices and concentrates on maximal voluntary isometric contraction (MIVC)

MIVC	Tart Cherry	Pomegranate	Beetroot	Cocoa
		Post (P = 0.30) 24 hrs (P = 0.31) 48 hrs (P = 0.14) 72 hrs (P = 0.48) 96 hrs (P = 0.50)	Post (P = 0.94) 24 hrs (P = 0.65) 48 hrs (P = 0.28) 72 hrs (P = 0.67)	24 hrs (P = 0.11) 48 hrs (P = 0.58)
Tart Cherry				
			Post (P = 0.31) 24 hrs (P = 0.68) 48 hrs (P = 0.68) 72 hrs (P = 0.77)	24 hrs (P = 0.38) 48 hrs (P = 0.33)
Pomegranate				
				24 hrs (P = 0.30) 48 hrs (P = 0.59)
Beetroot				
Cocoa				

Table S5. Subgroup Analyses comparing individual polyphenol-rich foods, juices and concentrates on delayed onset muscle soreness (DOMS)

DOMS	Tart Cherry	Pomegranate	Beetroot	Cocoa
Tart Cherry		Post (P = 0.23) 24 hrs (P = 0.17) 48 hrs (P = 0.36) 72 hrs (P = 0.05) 96 hrs (P = 0.77)	Post (P = 0.80) 24 hrs (P = 0.28) 48 hrs (P = 0.19) 72 hrs (P = 0.61)	24 hrs (P = 0.91) 48 hrs (P = 0.76)
Pomegranate			Post (P = 0.10) 24 hrs (P = 0.05) 48 hrs (P = 0.07) 72 hrs (P = 0.05)	24 hrs (P = 0.38) 48 hrs (P = 0.47)
Beetroot				24 hrs (P = 0.38) 48 hrs (P = 0.10)
Cocoa				

Table S6. Subgroup Analyses comparing individual polyphenol-rich foods, juices and concentrates on countermovement jump (CMJ)

CMJ	Tart Cherry	Pomegranate	Beetroot	Cocoa
Tart Cherry			Post (P = 0.47) 24 hrs (P = 0.41) 48 hrs (P = 0.48) 72 hrs (P = 0.80)	
Pomegranate				
Beetroot				
Cocoa				