



Table 1. Model coefficients.

Variable	Parameter	Coefficient	MPE
Time R ² = 64.4 (52.5–74.7)	β_0 (Intercept)	0.48 (0.26–0.72)	
	$\beta_1 = \text{hs-cTnT}_{0h}$	0.17 (−0.11 to 0.44)	84.4%
	$\beta_2 = \text{hs-cTnT}_{3h}$	1.4 (1.12–1.68)	100% *
Age (Years) R ² = 68.7 (59.4–78.5)	β_0 (Intercept)	0.48 (0.26–0.7)	
	$\beta_1 = \text{Post}$	1.4 (1.11–1.68)	100% *
	$\beta_2 = \text{Age}$	0.06 (−0.18 to 0.27)	65.6%
	$\beta_3 = \text{Post} \times \text{Age}$	0.42 (0.13–0.74)	98.7% *
Tanner Stage R ² = 63.8 (52.1–74.7)	β_0 (Intercept)	0.48 (0.25–0.73)	
	$\beta_1 = \text{Post}$	1.39 (1.08–1.74)	100% *
	$\beta_2 = \text{Tanner}$	0.07 (−0.16 to 0.34)	67.9%
	$\beta_3 = \text{Post} \times \text{Tanner}$	0.28 (−0.04 to 0.62)	91.8% *
Experience (Years) R ² = 72.9 (64.3–81.5)	β_0 (Intercept)	0.48 (0.27–0.68)	
	$\beta_1 = \text{Post}$	1.4 (1.14–1.67)	100% *
	$\beta_2 = \text{Experience}$	0.05 (−0.13 to 0.28)	66.8%
	$\beta_3 = \text{Post} \times \text{Experience}$	0.5 (0.23–0.78)	99.8% *
BMI (kg/m²) R ² = 59.8 (46.2–72)	β_0 (Intercept)	0.48 (0.22–0.73)	
	$\beta_1 = \text{Post}$	1.39 (1.08–1.74)	100% *
	$\beta_2 = \text{BMI}$	0.09 (−0.17 to 0.35)	73%
	$\beta_3 = \text{Post} \times \text{BMI}$	0.03 (−0.3 to 0.37)	56.2%
HR Max (bpm) R ² = 69.1 (59.3–79)	β_0 (Intercept)	0.48 (0.26–0.7)	
	$\beta_1 = \text{Post}$	1.4 (1.13–1.7)	100% *
	$\beta_2 = \text{HR max}$	−0.05 (−0.28 to 0.17)	64.3%
	$\beta_3 = \text{Post} \times \text{HR max}$	−0.43 (−0.71 to −0.11)	99% *
HR Aver (bpm) R ² = 57.6 (42.2–71)	β_0 (Intercept)	0.49 (0.21–0.78)	
	$\beta_1 = \text{Post}$	1.34 (0.95–1.69)	100% *
	$\beta_2 = \text{HR aver}$	0.07 (−0.2 to 0.36)	65.6%
	$\beta_3 = \text{Post} \times \text{HR aver}$	0.09 (−0.31 to 0.45)	66.4%
rHR Aver (%) R ² = 58.9 (44.4–72.3)	β_0 (Intercept)	0.49 (0.23–0.76)	
	$\beta_1 = \text{Post}$	1.34 (0.98–1.68)	100% *
	$\beta_2 = \text{rHR aver}$	0.07 (−0.19 to 0.36)	66.6%
	$\beta_3 = \text{Post} \times \text{rHR aver}$	0.17 (−0.2 to 0.52)	78.4%
HR Peak (bpm) R ² = 56.6 (41.7–70.5)	β_0 (Intercept)	0.49 (0.2–0.76)	
	$\beta_1 = \text{Post}$	1.34 (0.99–1.71)	100% *
	$\beta_2 = \text{HR peak}$	0.05 (−0.24 to 0.35)	60.4%
	$\beta_3 = \text{Post} \times \text{HR peak}$	−0.08 (−0.47 to 0.3)	64.8%
rHR Peak (%) R ² = 57 (42–71.6)	β_0 (Intercept)	0.49 (0.22–0.77)	
	$\beta_1 = \text{Post}$	1.34 (0.98–1.7)	100% *
	$\beta_2 = \text{rHR peak}$	0.06 (−0.22 to 0.37)	63%
	$\beta_3 = \text{Post} \times \text{rHR peak}$	0.03 (−0.38 to 0.4)	54%
Time HR-Z5 (min) R ² = 60.7 (45.6–73.7)	β_0 (Intercept)	0.5 (0.23–0.78)	
	$\beta_1 = \text{Post}$	1.3 (0.97–1.68)	100% *
	$\beta_2 = \text{Time HR-Z5}$	0.04 (−0.24 to 0.33)	60%
	$\beta_3 = \text{Post} \times \text{Time HR-Z5}$	0.31 (−0.04 to 0.67)	92.5% *
RPE (UA) R ² = 66 (53.8–76)	β_0 (Intercept)	0.48 (0.27–0.72)	
	$\beta_1 = \text{Post}$	1.39 (1.1–1.72)	100% *
	$\beta_2 = \text{RPE}$	0.07 (−0.17 to 0.3)	67.1%
	$\beta_3 = \text{Post} \times \text{RPE}$	0.34 (0.02–0.66)	96.8% *
Dist Abs (m) R ² = 70.1 (58.8–80.8)	β_0 (Intercept)	0.49 (0.24–0.72)	
	$\beta_1 = \text{Post}$	1.34 (1.01–1.63)	100% *
	$\beta_2 = \text{Dist abs}$	0.01 (−0.24 to 0.24)	53%

	$\beta_3 = \text{Post} \times \text{Dist abs}$	0.52 (0.22–0.85)	99.4% *
Dist Rel (m/min)	β_0 (Intercept)	0.49 (0.26–0.72)	
	$\beta_1 = \text{Post}$	1.34 (1.06–1.67)	100% *
$R^2 = 69.8$ (58.7–80.1)	$\beta_2 = \text{Dist rel}$	0.01 (–0.23 to 0.24)	54%
	$\beta_3 = \text{Post} \times \text{Dist rel}$	0.52 (0.21–0.83)	99.6% *
Speed Aver (km/h)	β_0 (Intercept)	0.49 (0.24–0.71)	
	$\beta_1 = \text{Post}$	1.34 (1.05–1.63)	100% *
$R^2 = 71.7$ (61.3–81.5)	$\beta_2 = \text{Speed aver}$	0.02 (–0.23 to 0.25)	54.6%
	$\beta_3 = \text{Post} \times \text{Speed aver}$	0.55 (0.24–0.85)	99.8% *
Speed Peak (km/h)	β_0 (Intercept)	0.5 (0.22–0.77)	
	$\beta_1 = \text{Post}$	1.34 (0.98–1.66)	100% *
$R^2 = 60$ (45.6–73.7)	$\beta_2 = \text{Speed peak}$	–0.05 (–0.32 to 0.24)	60.3%
	$\beta_3 = \text{Post} \times \text{Speed peak}$	0.29 (–0.06 to 0.66)	90.3% *
Time Speed-Z4 (min)	β_0 (Intercept)	0.49 (0.22–0.77)	
	$\beta_1 = \text{Post}$	1.34 (1–1.68)	100% *
$R^2 = 60.2$ (45–73.1)	$\beta_2 = \text{Time SP-Z4}$	–0.04 (–0.32 to 0.23)	59.6%
	$\beta_3 = \text{Post} \times \text{Time SP-Z4}$	0.29 (–0.07 to 0.64)	90.4% *
Dist Speed-Z4 (m)	β_0 (Intercept)	0.49 (0.21–0.74)	
	$\beta_1 = \text{Post}$	1.34 (1.02–1.71)	100% *
$R^2 = 60.4$ (46.6–74.3)	$\beta_2 = \text{Dist SP-Z4}$	–0.04 (–0.32 to 0.24)	59%
	$\beta_3 = \text{Post} \times \text{Dist SP-Z4}$	0.3 (–0.06 to 0.64)	90.5% *
Edwards' TL (UA)	β_0 (Intercept)	0.49 (0.22–0.78)	
	$\beta_1 = \text{Post}$	1.34 (1–1.71)	100% *
$R^2 = 58.1$ (42.9–71)	$\beta_2 = \text{TL}$	0.06 (–0.21 to 0.35)	63.7%
	$\beta_3 = \text{Post} \times \text{TL}$	0.13 (–0.25 to 0.49)	72%
Session RPE (UA)	β_0 (Intercept)	0.48 (0.25–0.71)	
	$\beta_1 = \text{Post}$	1.39 (1.09–1.7)	100% *
$R^2 = 65.8$ (54.8–76.7)	$\beta_2 = \text{s-RPE}$	0.07 (–0.18 to 0.31)	68.2%
	$\beta_3 = \text{Post} \times \text{s-RPE}$	0.34 (0.02–0.67)	96.6% *