

Supplemental Material

Online Table I: Systemic hemodynamics in lowlanders at sea level and high altitude.

		Control				Blockade			
		Rest	SNP1	SNP2	SNP3	Rest	SNP1	SNP2	SNP3
LL Sea level	<i>Vel.</i>	6.6 ± 2.3	19.8 ± 4.4*	22.3 ± 5.9*	27.3 ± 6.4*	20.1 ± 7.3 [†]	34.9 ± 12.8 ^{†*}	38.3 ± 10.3 ^{†*}	46.1 ± 10.2 ^{†*}
	<i>Dia.</i>	0.35 ± 0.03	0.37 ± 0.03*	0.37 ± 0.02*	0.38 ± 0.02*	0.37 ± 0.03 [†]	0.38 ± 0.03 ^{†*}	0.39 ± 0.02 ^{†*}	0.41 ± 0.03 ^{†*}
	<i>MBF</i>	38.9 ± 13.7	125.6 ± 34.1*	142.9 ± 38.5*	188.0 ± 46.8*	125.4 ± 40.7 [†]	239.3 ± 84.6 ^{†*}	275.0 ± 81.3 ^{†*}	359.8 ± 85.2 ^{†*}
	<i>Cond.</i>	43.4 ± 13.8	147.5 ± 44.7*	169.7 ± 49.1*	233.3 ± 66.0*	141.3 ± 51.4 [†]	276.7 ± 108.4 ^{†*}	324.2 ± 103.6 ^{†*}	442.6 ± 109.8 ^{†*}
LL High altitude	<i>Vel.</i>	5.58 ± 2.5	14.1 ± 7.9*	23.2 ± 5.4*	28.5 ± 7.4 *	20.2 ± 7.7 [†]	34.0 ± 9.5 ^{†*}	40.3 ± 6.9 ^{†*}	46.8 ± 9.3 ^{†*}
	<i>Dia.</i>	0.33 ± 0.03	0.35 ± 0.03*	0.36 ± 0.02*	0.39 ± 0.03*	0.36 ± 0.03 [†]	0.37 ± 0.02 ^{†*}	0.39 ± 0.02 ^{†*}	0.41 ± 0.02 ^{†*}
	<i>MBF</i>	38.7 ± 11.8	83.2 ± 45.6*	144.0 ± 41.4*	201.1 ± 60.2*	126.4 ± 58.8 [†]	226.1 ± 67.9 ^{†*}	293.2 ± 51.8 ^{†*}	365.9 ± 73.7 ^{†*}
	<i>Cond.</i>	30.8 ± 13.1	93.6 ± 52.4*	160.3 ± 45.2*	231.2 ± 72.3*	143.7 ± 78.7 [†]	251.0 ± 94.8 ^{†*}	324.0 ± 75.5 ^{†*}	408.1 ± 114.7 ^{†*}
		Rest	ACH1	ACH2	ACH3	Rest	ACH1	ACH2	ACH3
LL Sea level	<i>Vel.</i>	6.2 ± 2.6	19.2 ± 5.4*	23.8 ± 12.0*	34.6 ± 14.9*	19.6 ± 6.7 [†]	32.1 ± 10.3 ^{†*}	38.0 ± 15.2 ^{†*}	45.3 ± 18.0 ^{†*}
	<i>Dia.</i>	0.36 ± 0.03	0.37 ± 0.03	0.37 ± 0.03	0.38 ± 0.03*	0.36 ± 0.02	0.37 ± 0.03	0.37 ± 0.04	0.39 ± 0.04*
	<i>MBF</i>	38.2 ± 17.7	127.6 ± 57.1*	156.0 ± 93.2*	247.6 ± 132.2*	116.3 ± 35.5 [†]	209.6 ± 92.4 ^{†*}	263.7 ± 160.1 ^{†*}	339.1 ± 169.6 ^{†*}
	<i>Cond.</i>	42.6 ± 18.1	145.4 ± 56.8*	173.1 ± 89.8*	276.4 ± 125.7*	132.7 ± 46.0 [†]	240.2 ± 97.8 ^{†*}	301.0 ± 167.5 ^{†*}	390.5 ± 185.7 ^{†*}
LL High altitude	<i>Vel.</i>	4.5 ± 1.7	10.2 ± 4.2*	17.1 ± 5.7*	21.0 ± 7.2*	20.7 ± 6.9 [†]	32.4 ± 9.8 ^{†*}	36.8 ± 9.1 ^{†*}	46.4 ± 9.5 ^{†*}
	<i>Dia.</i>	0.35 ± 0.03	0.35 ± 0.03	0.36 ± 0.03	0.37 ± 0.03*	0.36 ± 0.03	0.37 ± 0.03 [†]	0.38 ± 0.03 ^{†*}	0.40 ± 0.03 ^{†*}
	<i>MBF</i>	24.5 ± 6.4	59.5 ± 23.8	102.2 ± 35.8*	137.5 ± 54.0*	124.2 ± 45.1 [†]	209.0 ± 78.2 ^{†*}	247.9 ± 60.4 ^{†*}	347.6 ± 68.0 ^{†*}
	<i>Cond.</i>	26.2 ± 7.0	65.9 ± 33.2	113.6 ± 47.3*	157.1 ± 73.5*	141.8 ± 68.6 [†]	245.0 ± 127.4 ^{†*}	274.3 ± 81.9 ^{†*}	401.3 ± 124.4 ^{†*}

List of Abbreviations: ACH, acetylcholine; Cond., absolute forearm vascular conductance; Dia, brachial artery diameter; LL, lowlander; MBF, brachial artery mean blood flow; SNP, sodium nitroprusside. *P<0.05, vs Rest. [†]P<0.05, vs control.

Online Table II: Systemic hemodynamics in highlanders

		Control				Blockade			
		Rest	SNP1	SNP2	SNP3	Rest	SNP1	SNP2	SNP3
EE	<i>Vel.</i>	8.6 ± 2.8	22.8 ± 11.8*	26.7 ± 10.2*	25.7 ± 7.7*	15.9 ± 3.8†	34.0 ± 9.2†*	33.1 ± 5.2†*	33.7 ± 4.9†*
	<i>Dia.</i>	0.42 ± 0.07	0.45 ± 0.09*	0.48 ± 0.09*	0.51 ± 0.10*	0.43 ± 0.06†	0.48 ± 0.07†*	0.51 ± 0.07†*	0.52 ± 0.09†*
	<i>MBF</i>	67.9 ± 17.0	230.9 ± 161.0*	294.1 ± 147.6*	324.8 ± 158.0*	139.7 ± 41.6†	383.5 ± 166.7†*	411.7 ± 131.3†*	437.3 ± 135.6†*
	<i>Cond.</i>	74.5 ± 19.2	268.2 ± 195.9*	354.4 ± 176.7*	425.3 ± 207.4*	161.9 ± 53.1	458.9 ± 188.5†*	491.7 ± 150.8†*	531.5 ± 170.3†*
Non-EE	<i>Vel.</i>	6.8 ± 3.1	22.9 ± 8.8*	24.9 ± 10.3*	27.2 ± 7.9*	19.4 ± 7.9†	40.6 ± 16.2†*	43.7 ± 14.9†*	44.5 ± 17.2†*
	<i>Dia.</i>	0.36 ± 0.04	0.38 ± 0.03*	0.43 ± 0.03*	0.44 ± 0.03*	0.36 ± 0.03	0.39 ± 0.04*	0.44 ± 0.04*	0.45 ± 0.04*
	<i>MBF</i>	42.5 ± 17.8	158.9 ± 65.8*	210.0 ± 78.5*	249.9 ± 67.0*	121.6 ± 54.8	299.0 ± 153.7†*	395.6 ± 149.6†*	419.8 ± 165.3†*
	<i>Cond.</i>	43.9 ± 16.6	172.5 ± 64.1*	235.8 ± 74.9*	292.4 ± 76.3*	123.7 ± 48.6	320.4 ± 141.8†*	442.7 ± 139.4†*	490.9 ± 166.5†*
		Rest	ACH1	ACH2	ACH3	Rest	ACH1	ACH2	ACH3
EE	<i>Vel.</i>	6.6 ± 2.9	9.8 ± 3.5	10.5 ± 3.3*	12.4 ± 4.6*	17.6 ± 6.9†	20.2 ± 4.2†	21.3 ± 7.5†*	25.3 ± 9.6†*
	<i>Dia.</i>	0.44 ± 0.07	0.43 ± 0.08	0.44 ± 0.07	0.44 ± 0.07	0.45 ± 0.09	0.45 ± 0.07	0.45 ± 0.07	0.46 ± 0.07
	<i>MBF</i>	55.0 ± 13.2	80.9 ± 17.6	87.5 ± 16.0*	101.6 ± 24.3*	155.8 ± 48.6†	187.0 ± 42.4†	193.2 ± 61.2†*	241.0 ± 73.3†*
	<i>Cond.</i>	60.1 ± 14.0	89.2 ± 19.3	95.4 ± 17.1*	112.9 ± 26.5*	183.4 ± 67.8†	210.7 ± 46.8†	220.2 ± 65.4†*	273.9 ± 81.0†*
Non-EE	<i>Vel.</i>	7.1 ± 3.9	13.0 ± 8.4*	16.5 ± 8.2*	22.5 ± 9.5*	20.5 ± 8.7†	26.9 ± 14.1†*	32.2 ± 14.3†*	40.2 ± 21.2†*
	<i>Dia.</i>	0.38 ± 0.04	0.39 ± 0.04	0.40 ± 0.03*	0.40 ± 0.03*	0.38 ± 0.05	0.38 ± 0.05	0.39 ± 0.04*	0.41 ± 0.04*
	<i>MBF</i>	47.2 ± 23.5	88.9 ± 48.2	122.1 ± 59.7*	168.5 ± 67.7*	139.2 ± 64.8†	185.2 ± 104.2†	239.6 ± 125.1†*	322.5 ± 180.2†*
	<i>Cond.</i>	48.7 ± 23.1	94.2 ± 46.9	126.8 ± 56.3*	177.8 ± 65.5*	140.1 ± 56.0†	187.2 ± 91.4†	244.0 ± 109.1†*	323.7 ± 156.8†*

List of Abbreviations: List of Abbreviations: ACH, acetylcholine; Cond., absolute forearm vascular conductance; Dia, brachial artery diameter; EE, Excessive erythrocytosis; MBF, brachial artery mean blood flow; SNP, sodium nitroprusside. *P<0.05, vs Rest. †P<0.05, vs control.