

Category	Trait	adipose P	brain P	Means			signif tissue
				adipose	brain	popln	
Body size measures	Body mass index	1.84E-227	3.01E-230	30.39	27.60	27.40	both
Body size measures	Waist circumference	1.06E-183	1.46E-108	95.50	89.20	90.33	both
Body size measures	Weight	8.66E-175	2.82E-140	85.20	77.58	78.31	both
Body size measures	Standing height	4.32E-64	2.49E-56	167.45	167.65	168.84	both
Body size measures	Sitting height	9.28E-28	2.14E-53	88.97	88.82	89.41	both
Blood count	Haemoglobin concentration	1.79E-48	3.94E-122	14.04	13.97	14.21	both
Blood count	Haematocrit percentage	3.60E-33	4.67E-98	40.76	40.54	41.16	both
Blood count	Red blood cell erythrocyte count	6.27E-14	2.90E-96	4.48	4.44	4.51	both
Blood count	High light scatter reticulocyte percentage	3.58E-67	1.54E-21	0.44	0.40	0.40	both
Blood count	Red blood cell erythrocyte distribution width	9.82E-62	1.26E-24	13.62	13.56	13.47	both
Blood count	White blood cell leukocyte count	1.84E-58	6.44E-06	7.15	6.98	6.89	both
Blood count	High light scatter reticulocyte count	1.09E-56	4.95E-37	0.02	0.02	0.02	both
Blood count	Neutrophil count	1.34E-55	1.47E-10	4.45	4.35	4.24	both
Blood count	Reticulocyte count	1.92E-32	3.69E-54	0.06	0.06	0.06	both
Blood count	Reticulocyte percentage	8.06E-44	2.39E-30	1.42	1.32	1.35	both
Blood count	Mean corpuscular haemoglobin concentration	2.91E-22	1.78E-15	34.46	34.48	34.54	both
Blood count	Platelet crit	1.92E-16	5.08E-07	0.24	0.23	0.23	both
Blood count	Basophil count	1.31E-13	7.98E-06	0.04	0.04	0.03	both
Blood count	Monocyte percentage	1.77E-13	2.29E-13	6.99	6.97	7.10	both
Blood count	Neutrophil percentage	1.18E-12	2.01E-12	61.67	61.67	61.14	both
Blood count	Mean corpuscular volume	2.42E-11	2.74E-05	91.09	91.49	91.34	both
Blood count	Platelet count	8.36E-10	1.94E-05	256.95	255.58	253.21	both
Blood count	Lymphocyte percentage	1.46E-09	1.56E-08	28.20	28.25	28.63	both
Blood count	Monocyte count	7.85E-07	0.0002	0.49	0.47	0.48	both
Blood count	Basophil percentage	1.38E-05	1.86E-05	0.59	0.60	0.57	both
Medications	Number of treatments medications taken	6.17E-102	7.84E-11	3.08	2.70	2.45	both
Medical conditions	Number of self reported non cancer illnesses	1.32E-84	6.03E-06	2.24	1.98	1.87	both
Medical conditions	Interpolated Age of participant when non cancer illness first diagnosed	3.77E-05	6.52E-09	41.89	41.56	42.32	both
Baseline characteristics	Townsend deprivation index at recruitment	1.26E-53	6.69E-28	-1.13	-1.26	-1.58	both
Mental health	Neuroticism score	1.41E-24	5.79E-19	4.44	4.38	4.10	both
Urine assays	Creatinine enzymatic in urine	1.51E-05	2.80E-24	9077.69	8429.45	8806.93	both
Urine assays	Sodium in urine	6.09E-13	3.67E-08	79.56	74.72	76.21	both
Sleep	Sleep duration	0.0001	1.92E-06	7.08	7.08	7.13	both
Blood count	Immature reticulocyte fraction	2.46E-69	0.13	0.30	0.29	0.29	adipose
Blood count	Mean corpuscular haemoglobin	5.73E-25	0.96	31.39	31.55	31.55	adipose
Blood count	Lymphocyte count	2.47E-15	0.26	1.98	1.93	1.95	adipose
Blood count	Eosinophil count	8.62E-07	0.02	0.18	0.17	0.17	adipose
Medical conditions	Non cancer illness code self reported	2.02E-35	0.05	2405.55	2779.19	2891.97	adipose
Medical conditions	Non cancer illness year age first occurred	1.25E-15	0.002	628.73	703.82	702.47	adipose
Blood count	Mean sphered cell volume	0.05	9.57E-21	82.86	83.37	82.87	brain
Blood count	Mean reticulocyte volume	0.09	2.40E-08	106.00	106.22	105.83	brain
Blood count	Eosinophil percentage	0.37	3.26E-07	2.53	2.52	2.56	brain
Blood count	Platelet distribution width	0.79	3.69E-06	16.49	16.47	16.49	brain
Urine assays	Potassium in urine	0.18	8.26E-12	63.61	61.68	63.47	brain
Early life factors	Birth weight	0.001	4.19E-06	3.30	3.30	3.33	brain

S10 Table: Quantitative traits among 106 phenotypes in UK Biobank which are differentially distributed between the adipose (and/or brain) specific subtype group of individuals for BMI and the remaining population. We provide the p-values of testing heterogeneity of each trait between each tissue-specific subtype group of individuals and the remaining population. For each trait, the tissue-specific (adipose and brain) mean which is calculated only in the individuals classified as the corresponding tissue-specific subtype of BMI are provided. We also provide the trait means computed in whole sample (popln). For each trait, we list the tissues for which the trait was differentially distributed between the corresponding tissue-specific subtype group of individuals and the remaining population (signif tissue).