

**Supplemental table S1: Gene expression change from baseline to end of study in SYSDIET relative to control group.**

<b>Gene</b>	<b>Estimate</b>	<b>95% CI</b>	<b>P-value</b>	<b>FDR</b>
<i>ABCA1</i>	0.321707	(-0.06 - 0.71)	0.101	0.590
<i>ABCG1</i>	-0.0868	(-0.49 - 0.32)	0.671	0.801
<i>CCL2</i>	0.119038	(-0.41 - 0.65)	0.655	0.801
<i>CCL5</i>	0.079275	(-0.28 - 0.44)	0.660	0.801
<i>CCR2</i>	0.324836	(-0.06 - 0.71)	0.096	0.590
<i>CCR4</i>	0.072374	(-0.32 - 0.46)	0.714	0.801
<i>CD36</i>	-0.22348	(-0.58 - 0.13)	0.210	0.590
<i>CD40</i>	-0.30838	(-0.7 - 0.08)	0.122	0.590
<i>CD40LG</i>	-0.24171	(-0.57 - 0.09)	0.147	0.590
<i>CPT1A</i>	-0.15937	(-0.56 - 0.24)	0.427	0.705
<i>CPT1B</i>	-0.18168	(-0.7 - 0.34)	0.490	0.735
<i>CRAT</i>	-0.06342	(-0.42 - 0.29)	0.721	0.801
<i>CXCR2</i>	0.370024	(-0.03 - 0.77)	0.067	0.590
<i>HMGCR</i>	-0.20361	(-0.53 - 0.12)	0.218	0.590
<i>ICAM1</i>	-0.09487	(-0.43 - 0.24)	0.578	0.782
<i>IFNG</i>	-0.23788	(-0.65 - 0.17)	0.252	0.590
<i>IKKBK</i>	0.272156	(-0.12 - 0.66)	0.166	0.590
<i>IL18</i>	-0.40786	(-1.03 - 0.22)	0.199	0.590
<i>IL1B</i>	0.210775	(-0.28 - 0.7)	0.391	0.705
<i>IL1RN</i>	-0.13093	(-0.47 - 0.2)	0.438	0.705
<i>IL23A</i>	-0.05431	(-0.38 - 0.28)	0.744	0.801
<i>IL23R</i>	0.07138	(-0.35 - 0.49)	0.735	0.801
<i>IL6</i>	0.136603	(-0.29 - 0.57)	0.530	0.742
<i>IL8</i>	0.64915	(-0.15 - 1.45)	0.110	0.590
<i>LDLR</i>	-0.02874	(-0.36 - 0.3)	0.863	0.884
<i>MMP9</i>	0.309196	(-0.29 - 0.91)	0.308	0.616
<i>NAMPT</i>	-0.22543	(-0.63 - 0.18)	0.275	0.590
<i>NFKBIA</i>	-0.17952	(-0.49 - 0.13)	0.249	0.590
<i>PDGFA</i>	-0.26867	(-0.68 - 0.15)	0.200	0.590
<i>PDGFB</i>	-0.29906	(-0.64 - 0.04)	0.087	0.590
<i>PDK4</i>	-0.14372	(-0.48 - 0.19)	0.397	0.705
<i>PLIN2</i>	-0.17631	(-0.5 - 0.15)	0.281	0.590
<i>PPARA</i>	0.108198	(-0.22 - 0.44)	0.515	0.742
<i>PPARD</i>	-0.11639	(-0.42 - 0.19)	0.453	0.705
<i>RELA</i>	0.414439	(0.08 - 0.75)	0.016	0.345
<i>SREBF1</i>	0.221734	(-0.35 - 0.79)	0.442	0.705
<i>TGFB2</i>	0.048171	(-0.42 - 0.52)	0.840	0.882
<i>TLR4</i>	0.007217	(-0.33 - 0.35)	0.966	0.966
<i>TNF</i>	-0.20531	(-0.58 - 0.16)	0.273	0.590
<i>TNFRSF1A</i>	-0.51981	(-0.87 - -0.17)	0.004	0.186
<i>TNFRSF1B</i>	0.059178	(-0.28 - 0.4)	0.727	0.801
<i>UCP2</i>	-0.27445	(-0.65 - 0.1)	0.146	0.590

Difference between SYSDIET and control group analysed with a linear regression model, adjusted for age, sex and study center.

**Supplementary table S2: Correlation between gene expression changes and changes in various metabolites, analysed with Spearman's correlation.**

			<b>Correlation coefficient</b>	<b>n</b>	<b>P-value</b>
<i>ABCA1</i>	vs	Adiponectin	0.052	79	0.646
<i>ABCG1</i>	vs	Adiponectin	-0.015	84	0.893
<i>CCL2</i>	vs	Adiponectin	-0.078	80	0.491
<i>CCL5</i>	vs	Adiponectin	0.092	86	0.398
<i>CCR2</i>	vs	Adiponectin	0.009	83	0.938
<i>CCR4</i>	vs	Adiponectin	0.044	81	0.697
<i>CD36</i>	vs	Adiponectin	-0.090	86	0.410
<i>CD40</i>	vs	Adiponectin	-0.183	87	0.090
<i>CD40LG</i>	vs	Adiponectin	-0.106	88	0.325
<i>CPT1A</i>	vs	Adiponectin	-0.157	81	0.161
<i>CPT1B</i>	vs	Adiponectin	-0.004	84	0.971
<i>CRAT</i>	vs	Adiponectin	-0.038	87	0.724
<i>CXCR2</i>	vs	Adiponectin	0.148	87	0.171
<i>HMGCR</i>	vs	Adiponectin	0.014	88	0.896
<i>ICAM1</i>	vs	Adiponectin	0.018	86	0.872
<i>IFNG</i>	vs	Adiponectin	0.078	87	0.470
<i>IKBKB</i>	vs	Adiponectin	-0.005	85	0.962
<i>IL18</i>	vs	Adiponectin	0.029	78	0.801
<i>IL1B</i>	vs	Adiponectin	-0.082	86	0.451
<i>IL1RN</i>	vs	Adiponectin	-0.004	87	0.969
<i>IL23A</i>	vs	Adiponectin	0.066	88	0.541
<i>IL23R</i>	vs	Adiponectin	0.112	88	0.299
<i>IL6</i>	vs	Adiponectin	0.035	86	0.747
<i>IL8</i>	vs	Adiponectin	-0.029	86	0.793
<i>LDLR</i>	vs	Adiponectin	0.007	80	0.952
<i>MMP9</i>	vs	Adiponectin	0.039	79	0.734
<i>NAMPT</i>	vs	Adiponectin	-0.136	82	0.222
<i>NFKBIA</i>	vs	Adiponectin	-0.006	88	0.956
<i>PDGFA</i>	vs	Adiponectin	0.062	71	0.609
<i>PDGFB</i>	vs	Adiponectin	-0.024	79	0.832
<i>PDK4</i>	vs	Adiponectin	-0.070	88	0.518
<i>PLIN2</i>	vs	Adiponectin	-0.197	83	0.074
<i>PPARA</i>	vs	Adiponectin	0.014	87	0.898
<i>PPARD</i>	vs	Adiponectin	-0.021	87	0.845
<i>RELA</i>	vs	Adiponectin	0.017	85	0.877
<i>SREBF1</i>	vs	Adiponectin	-0.077	85	0.483
<i>TGFB2</i>	vs	Adiponectin	-0.073	80	0.517
<i>TLR4</i>	vs	Adiponectin	-0.071	86	0.518
<i>TNF</i>	vs	Adiponectin	-0.043	86	0.696
<i>TNFRSF1A</i>	vs	Adiponectin	-0.097	88	0.369
<i>TNFRSF1B</i>	vs	Adiponectin	0.006	88	0.958
<i>UCP2</i>	vs	Adiponectin	-0.132	87	0.224
<i>ABCA1</i>	vs	hsCRP	0.085	79	0.457
<i>ABCG1</i>	vs	hsCRP	-0.016	84	0.885
<i>CCL2</i>	vs	hsCRP	-0.051	80	0.651
<i>CCL5</i>	vs	hsCRP	0.073	86	0.501
<i>CCR2</i>	vs	hsCRP	0.099	83	0.371
<i>CCR4</i>	vs	hsCRP	0.156	81	0.165
<i>CD36</i>	vs	hsCRP	0.024	86	0.827

<i>CD40</i>	vs	hsCRP	0.089	87	0.414	
<i>CD40LG</i>	vs	hsCRP	0.055	88	0.614	
<i>CPT1A</i>	vs	hsCRP	0.139	81	0.214	
<i>CPT1B</i>	vs	hsCRP	0.063	84	0.567	
<i>CRAT</i>	vs	hsCRP	0.064	87	0.557	
<i>CXCR2</i>	vs	hsCRP	0.145	87	0.182	
<i>HMGCR</i>	vs	hsCRP	0.030	88	0.779	
<i>ICAM1</i>	vs	hsCRP	0.001	86	0.990	
<i>IFNG</i>	vs	hsCRP	0.053	87	0.623	
<i>IKBKB</i>	vs	hsCRP	0.111	85	0.311	
<i>IL18</i>	vs	hsCRP	-0.280	78	0.013	*
<i>IL1B</i>	vs	hsCRP	-0.021	86	0.851	
<i>IL1RN</i>	vs	hsCRP	0.055	87	0.611	
<i>IL23A</i>	vs	hsCRP	0.020	88	0.851	
<i>IL23R</i>	vs	hsCRP	0.085	88	0.434	
<i>IL6</i>	vs	hsCRP	0.048	86	0.662	
<i>IL8</i>	vs	hsCRP	0.111	86	0.307	
<i>LDLR</i>	vs	hsCRP	0.186	80	0.098	
<i>MMP9</i>	vs	hsCRP	-0.002	79	0.984	
<i>NAMPT</i>	vs	hsCRP	0.157	82	0.158	
<i>NFKBIA</i>	vs	hsCRP	0.048	88	0.657	
<i>PDGFA</i>	vs	hsCRP	-0.122	71	0.312	
<i>PDGFB</i>	vs	hsCRP	-0.097	79	0.393	
<i>PDK4</i>	vs	hsCRP	0.068	88	0.527	
<i>PLIN2</i>	vs	hsCRP	0.113	83	0.309	
<i>PPARA</i>	vs	hsCRP	0.219	87	0.041	*
<i>PPARD</i>	vs	hsCRP	-0.033	87	0.759	
<i>RELA</i>	vs	hsCRP	0.347	85	0.001	**
<i>SREBF1</i>	vs	hsCRP	0.049	85	0.657	
<i>TGFB2</i>	vs	hsCRP	0.075	80	0.510	
<i>TLR4</i>	vs	hsCRP	0.012	86	0.914	
<i>TNF</i>	vs	hsCRP	0.031	86	0.775	
<i>TNFRSF1A</i>	vs	hsCRP	0.058	88	0.594	
<i>TNFRSF1B</i>	vs	hsCRP	0.114	88	0.288	
<i>UCP2</i>	vs	hsCRP	0.099	87	0.363	
<i>ABCA1</i>	vs	Glucose	0.029	79	0.802	
<i>ABCG1</i>	vs	Glucose	-0.172	84	0.117	
<i>CCL2</i>	vs	Glucose	-0.081	80	0.477	
<i>CCL5</i>	vs	Glucose	-0.009	86	0.931	
<i>CCR2</i>	vs	Glucose	-0.060	83	0.593	
<i>CCR4</i>	vs	Glucose	-0.160	81	0.153	
<i>CD36</i>	vs	Glucose	0.000	86	0.997	
<i>CD40</i>	vs	Glucose	-0.126	87	0.243	
<i>CD40LG</i>	vs	Glucose	-0.013	88	0.902	
<i>CPT1A</i>	vs	Glucose	0.014	81	0.903	
<i>CPT1B</i>	vs	Glucose	0.077	84	0.484	
<i>CRAT</i>	vs	Glucose	-0.122	87	0.260	
<i>CXCR2</i>	vs	Glucose	-0.146	87	0.178	
<i>HMGCR</i>	vs	Glucose	-0.199	88	0.063	
<i>ICAM1</i>	vs	Glucose	-0.272	86	0.011	*
<i>IFNG</i>	vs	Glucose	-0.054	87	0.621	
<i>IKBKB</i>	vs	Glucose	-0.203	85	0.062	

<i>IL18</i>	vs	Glucose	-0.151	78	0.188	
<i>IL1B</i>	vs	Glucose	-0.111	86	0.311	
<i>IL1RN</i>	vs	Glucose	-0.130	87	0.229	
<i>IL23A</i>	vs	Glucose	-0.187	88	0.081	
<i>IL23R</i>	vs	Glucose	0.021	88	0.843	
<i>IL6</i>	vs	Glucose	-0.065	86	0.551	
<i>IL8</i>	vs	Glucose	0.017	86	0.874	
<i>LDLR</i>	vs	Glucose	-0.111	80	0.327	
<i>MMP9</i>	vs	Glucose	-0.126	79	0.268	
<i>NAMPT</i>	vs	Glucose	-0.028	82	0.806	
<i>NFKBIA</i>	vs	Glucose	-0.076	88	0.480	
<i>PDGFA</i>	vs	Glucose	0.071	71	0.558	
<i>PDGFB</i>	vs	Glucose	-0.091	79	0.423	
<i>PDK4</i>	vs	Glucose	-0.008	88	0.943	
<i>PLIN2</i>	vs	Glucose	0.035	83	0.753	
<i>PPARA</i>	vs	Glucose	-0.184	87	0.088	
<i>PPARD</i>	vs	Glucose	-0.173	87	0.110	
<i>RELA</i>	vs	Glucose	-0.013	85	0.905	
<i>SREBF1</i>	vs	Glucose	-0.094	85	0.390	
<i>TGFB2</i>	vs	Glucose	0.254	80	0.023	*
<i>TLR4</i>	vs	Glucose	-0.077	86	0.478	
<i>TNF</i>	vs	Glucose	-0.074	86	0.498	
<i>TNFRSF1A</i>	vs	Glucose	-0.181	88	0.092	
<i>TNFRSF1B</i>	vs	Glucose	-0.132	88	0.220	
<i>UCP2</i>	vs	Glucose	-0.118	87	0.277	
<i>ABCA1</i>	vs	HDL-C	0.002	79	0.985	
<i>ABCG1</i>	vs	HDL-C	-0.070	84	0.528	
<i>CCL2</i>	vs	HDL-C	0.238	80	0.033	*
<i>CCL5</i>	vs	HDL-C	-0.027	86	0.806	
<i>CCR2</i>	vs	HDL-C	0.061	83	0.585	
<i>CCR4</i>	vs	HDL-C	-0.076	81	0.503	
<i>CD36</i>	vs	HDL-C	0.157	86	0.148	
<i>CD40</i>	vs	HDL-C	0.054	87	0.620	
<i>CD40LG</i>	vs	HDL-C	0.076	88	0.481	
<i>CPT1A</i>	vs	HDL-C	-0.139	81	0.217	
<i>CPT1B</i>	vs	HDL-C	0.143	84	0.193	
<i>CRAT</i>	vs	HDL-C	-0.030	87	0.782	
<i>CXCR2</i>	vs	HDL-C	0.170	87	0.116	
<i>HMGCR</i>	vs	HDL-C	-0.010	88	0.928	
<i>ICAM1</i>	vs	HDL-C	-0.076	86	0.485	
<i>IFNG</i>	vs	HDL-C	-0.068	87	0.530	
<i>IKBKB</i>	vs	HDL-C	0.140	85	0.201	
<i>IL18</i>	vs	HDL-C	0.013	78	0.907	
<i>IL1B</i>	vs	HDL-C	0.118	86	0.278	
<i>IL1RN</i>	vs	HDL-C	0.153	87	0.157	
<i>IL23A</i>	vs	HDL-C	0.092	88	0.395	
<i>IL23R</i>	vs	HDL-C	0.184	88	0.087	
<i>IL6</i>	vs	HDL-C	0.228	86	0.034	*
<i>IL8</i>	vs	HDL-C	0.242	86	0.025	*
<i>LDLR</i>	vs	HDL-C	-0.035	80	0.757	
<i>MMP9</i>	vs	HDL-C	0.231	79	0.041	*
<i>NAMPT</i>	vs	HDL-C	0.121	82	0.279	

<i>NFKBIA</i>	vs	HDL-C	0.262	88	0.014	*
<i>PDGFA</i>	vs	HDL-C	-0.040	71	0.739	
<i>PDGFB</i>	vs	HDL-C	0.015	79	0.896	
<i>PDK4</i>	vs	HDL-C	-0.016	88	0.884	
<i>PLIN2</i>	vs	HDL-C	-0.088	83	0.428	
<i>PPARA</i>	vs	HDL-C	0.057	87	0.599	
<i>PPARD</i>	vs	HDL-C	0.075	87	0.492	
<i>RELA</i>	vs	HDL-C	0.109	85	0.321	
<i>SREBF1</i>	vs	HDL-C	-0.184	85	0.091	
<i>TGFB2</i>	vs	HDL-C	-0.004	80	0.970	
<i>TLR4</i>	vs	HDL-C	-0.028	86	0.799	
<i>TNF</i>	vs	HDL-C	0.058	86	0.593	
<i>TNFRSF1A</i>	vs	HDL-C	0.066	88	0.544	
<i>TNFRSF1B</i>	vs	HDL-C	-0.029	88	0.789	
<i>UCP2</i>	vs	HDL-C	-0.004	87	0.968	
<i>ABCA1</i>	vs	IL10	0.152	79	0.181	
<i>ABCG1</i>	vs	IL10	-0.162	84	0.140	
<i>CCL2</i>	vs	IL10	0.159	80	0.158	
<i>CCL5</i>	vs	IL10	-0.006	86	0.953	
<i>CCR2</i>	vs	IL10	0.194	83	0.079	
<i>CCR4</i>	vs	IL10	-0.235	81	0.035	*
<i>CD36</i>	vs	IL10	0.198	86	0.067	
<i>CD40</i>	vs	IL10	0.107	87	0.324	
<i>CD40LG</i>	vs	IL10	-0.024	88	0.827	
<i>CPT1A</i>	vs	IL10	-0.011	81	0.925	
<i>CPT1B</i>	vs	IL10	0.014	84	0.897	
<i>CRAT</i>	vs	IL10	-0.094	87	0.384	
<i>CXCR2</i>	vs	IL10	0.102	87	0.349	
<i>HMGCR</i>	vs	IL10	-0.021	88	0.848	
<i>ICAM1</i>	vs	IL10	-0.046	86	0.675	
<i>IFNG</i>	vs	IL10	-0.041	87	0.708	
<i>IKBKB</i>	vs	IL10	0.026	85	0.814	
<i>IL18</i>	vs	IL10	-0.028	78	0.808	
<i>IL1B</i>	vs	IL10	0.077	86	0.478	
<i>IL1RN</i>	vs	IL10	0.181	87	0.094	
<i>IL23A</i>	vs	IL10	-0.228	88	0.033	*
<i>IL23R</i>	vs	IL10	0.029	88	0.789	
<i>IL6</i>	vs	IL10	0.042	86	0.700	
<i>IL8</i>	vs	IL10	0.148	86	0.175	
<i>LDLR</i>	vs	IL10	0.079	80	0.485	
<i>MMP9</i>	vs	IL10	-0.105	79	0.357	
<i>NAMPT</i>	vs	IL10	0.186	82	0.095	
<i>NFKBIA</i>	vs	IL10	0.177	88	0.099	
<i>PDGFA</i>	vs	IL10	-0.156	71	0.193	
<i>PDGFB</i>	vs	IL10	-0.059	79	0.605	
<i>PDK4</i>	vs	IL10	0.187	88	0.081	
<i>PLIN2</i>	vs	IL10	0.273	83	0.012	*
<i>PPARA</i>	vs	IL10	0.060	87	0.580	
<i>PPARD</i>	vs	IL10	-0.072	87	0.506	
<i>RELA</i>	vs	IL10	0.144	85	0.189	
<i>SREBF1</i>	vs	IL10	-0.037	85	0.739	
<i>TGFB2</i>	vs	IL10	0.057	80	0.613	

<i>TLR4</i>	vs	IL10	0.180	86	0.096
<i>TNF</i>	vs	IL10	0.012	86	0.916
<i>TNFRSF1A</i>	vs	IL10	0.066	88	0.542
<i>TNFRSF1B</i>	vs	IL10	0.046	88	0.667
<i>UCP2</i>	vs	IL10	0.010	87	0.927
<i>ABCA1</i>	vs	IL1B	0.117	79	0.304
<i>ABCG1</i>	vs	IL1B	-0.080	84	0.472
<i>CCL2</i>	vs	IL1B	-0.038	80	0.740
<i>CCL5</i>	vs	IL1B	0.057	86	0.601
<i>CCR2</i>	vs	IL1B	-0.200	83	0.069
<i>CCR4</i>	vs	IL1B	-0.055	81	0.626
<i>CD36</i>	vs	IL1B	-0.087	86	0.426
<i>CD40</i>	vs	IL1B	-0.063	87	0.561
<i>CD40LG</i>	vs	IL1B	-0.037	88	0.730
<i>CPT1A</i>	vs	IL1B	-0.120	81	0.285
<i>CPT1B</i>	vs	IL1B	-0.108	84	0.329
<i>CRAT</i>	vs	IL1B	-0.054	87	0.620
<i>CXCR2</i>	vs	IL1B	-0.105	87	0.333
<i>HMGCR</i>	vs	IL1B	-0.066	88	0.542
<i>ICAM1</i>	vs	IL1B	-0.009	86	0.931
<i>IFNG</i>	vs	IL1B	0.041	87	0.708
<i>IKBKB</i>	vs	IL1B	0.063	85	0.565
<i>IL18</i>	vs	IL1B	0.131	78	0.252
<i>IL1B</i>	vs	IL1B	0.076	86	0.489
<i>IL1RN</i>	vs	IL1B	0.040	87	0.711
<i>IL23A</i>	vs	IL1B	-0.090	88	0.406
<i>IL23R</i>	vs	IL1B	-0.009	88	0.934
<i>IL6</i>	vs	IL1B	-0.012	86	0.914
<i>IL8</i>	vs	IL1B	0.043	86	0.692
<i>LDLR</i>	vs	IL1B	-0.066	80	0.559
<i>MMP9</i>	vs	IL1B	-0.116	79	0.309
<i>NAMPT</i>	vs	IL1B	-0.114	82	0.306
<i>NFKBIA</i>	vs	IL1B	-0.068	88	0.529
<i>PDGFA</i>	vs	IL1B	0.113	71	0.347
<i>PDGFB</i>	vs	IL1B	-0.150	79	0.186
<i>PDK4</i>	vs	IL1B	0.087	88	0.420
<i>PLIN2</i>	vs	IL1B	0.095	83	0.395
<i>PPARA</i>	vs	IL1B	-0.160	87	0.138
<i>PPARD</i>	vs	IL1B	-0.056	87	0.609
<i>RELA</i>	vs	IL1B	0.040	85	0.719
<i>SREBF1</i>	vs	IL1B	-0.072	85	0.511
<i>TGFB2</i>	vs	IL1B	0.145	80	0.199
<i>TLR4</i>	vs	IL1B	0.092	86	0.399
<i>TNF</i>	vs	IL1B	-0.085	86	0.434
<i>TNFRSF1A</i>	vs	IL1B	-0.097	88	0.368
<i>TNFRSF1B</i>	vs	IL1B	-0.082	88	0.447
<i>UCP2</i>	vs	IL1B	-0.002	87	0.987
<i>ABCA1</i>	vs	IL1Ra	0.038	79	0.741
<i>ABCG1</i>	vs	IL1Ra	-0.104	84	0.346
<i>CCL2</i>	vs	IL1Ra	-0.140	80	0.216
<i>CCL5</i>	vs	IL1Ra	0.092	86	0.400
<i>CCR2</i>	vs	IL1Ra	-0.189	83	0.088

<i>CCR4</i>	vs	IL1Ra	0.004	81	0.972	
<i>CD36</i>	vs	IL1Ra	-0.012	86	0.913	
<i>CD40</i>	vs	IL1Ra	0.030	87	0.780	
<i>CD40LG</i>	vs	IL1Ra	-0.102	88	0.345	
<i>CPT1A</i>	vs	IL1Ra	0.092	81	0.417	
<i>CPT1B</i>	vs	IL1Ra	0.013	84	0.908	
<i>CRAT</i>	vs	IL1Ra	0.018	87	0.865	
<i>CXCR2</i>	vs	IL1Ra	-0.150	87	0.166	
<i>HMGCR</i>	vs	IL1Ra	-0.066	88	0.540	
<i>ICAM1</i>	vs	IL1Ra	-0.007	86	0.950	
<i>IFNG</i>	vs	IL1Ra	0.083	87	0.442	
<i>IKBKB</i>	vs	IL1Ra	-0.228	85	0.036	*
<i>IL18</i>	vs	IL1Ra	0.120	78	0.296	
<i>IL1B</i>	vs	IL1Ra	0.025	86	0.820	
<i>IL1RN</i>	vs	IL1Ra	-0.077	87	0.479	
<i>IL23A</i>	vs	IL1Ra	-0.228	88	0.033	*
<i>IL23R</i>	vs	IL1Ra	-0.105	88	0.329	
<i>IL6</i>	vs	IL1Ra	-0.251	86	0.020	*
<i>IL8</i>	vs	IL1Ra	-0.148	86	0.174	
<i>LDLR</i>	vs	IL1Ra	-0.023	80	0.841	
<i>MMP9</i>	vs	IL1Ra	-0.262	79	0.020	*
<i>NAMPT</i>	vs	IL1Ra	-0.013	82	0.905	
<i>NFKBIA</i>	vs	IL1Ra	0.061	88	0.569	
<i>PDGFA</i>	vs	IL1Ra	0.134	71	0.265	
<i>PDGFB</i>	vs	IL1Ra	-0.038	79	0.741	
<i>PDK4</i>	vs	IL1Ra	0.030	88	0.779	
<i>PLIN2</i>	vs	IL1Ra	0.112	83	0.313	
<i>PPARA</i>	vs	IL1Ra	-0.027	87	0.806	
<i>PPARD</i>	vs	IL1Ra	-0.292	87	0.006	**
<i>RELA</i>	vs	IL1Ra	-0.181	85	0.098	
<i>SREBF1</i>	vs	IL1Ra	-0.078	85	0.477	
<i>TGFB2</i>	vs	IL1Ra	-0.057	80	0.618	
<i>TLR4</i>	vs	IL1Ra	0.002	86	0.985	
<i>TNF</i>	vs	IL1Ra	0.065	86	0.554	
<i>TNFRSF1A</i>	vs	IL1Ra	0.160	88	0.137	
<i>TNFRSF1B</i>	vs	IL1Ra	0.053	88	0.623	
<i>UCP2</i>	vs	IL1Ra	-0.180	87	0.096	
<i>ABCA1</i>	vs	IL6	-0.032	79	0.779	
<i>ABCG1</i>	vs	IL6	-0.223	84	0.041	*
<i>CCL2</i>	vs	IL6	0.087	80	0.444	
<i>CCL5</i>	vs	IL6	-0.304	86	0.004	**
<i>CCR2</i>	vs	IL6	0.029	83	0.794	
<i>CCR4</i>	vs	IL6	-0.321	81	0.004	**
<i>CD36</i>	vs	IL6	0.196	86	0.070	
<i>CD40</i>	vs	IL6	0.092	87	0.399	
<i>CD40LG</i>	vs	IL6	-0.180	88	0.093	
<i>CPT1A</i>	vs	IL6	-0.130	81	0.246	
<i>CPT1B</i>	vs	IL6	-0.069	84	0.534	
<i>CRAT</i>	vs	IL6	-0.043	87	0.690	
<i>CXCR2</i>	vs	IL6	-0.029	87	0.791	
<i>HMGCR</i>	vs	IL6	0.057	88	0.600	
<i>ICAM1</i>	vs	IL6	-0.056	86	0.607	

<i>IFNG</i>	vs	IL6	-0.144	87	0.182	
<i>IKBKB</i>	vs	IL6	-0.246	85	0.023	*
<i>IL18</i>	vs	IL6	0.096	78	0.405	
<i>IL1B</i>	vs	IL6	0.058	86	0.597	
<i>IL1RN</i>	vs	IL6	0.138	87	0.201	
<i>IL23A</i>	vs	IL6	-0.225	88	0.035	*
<i>IL23R</i>	vs	IL6	-0.093	88	0.390	
<i>IL6</i>	vs	IL6	-0.019	86	0.860	
<i>IL8</i>	vs	IL6	0.011	86	0.918	
<i>LDLR</i>	vs	IL6	-0.081	80	0.475	
<i>MMP9</i>	vs	IL6	-0.032	79	0.783	
<i>NAMPT</i>	vs	IL6	0.250	82	0.024	*
<i>NFKBIA</i>	vs	IL6	0.084	88	0.439	
<i>PDGFA</i>	vs	IL6	-0.188	71	0.117	
<i>PDGFB</i>	vs	IL6	-0.111	79	0.330	
<i>PDK4</i>	vs	IL6	0.180	88	0.094	
<i>PLIN2</i>	vs	IL6	0.087	83	0.435	
<i>PPARA</i>	vs	IL6	-0.124	87	0.254	
<i>PPARD</i>	vs	IL6	-0.214	87	0.046	*
<i>RELA</i>	vs	IL6	-0.114	85	0.300	
<i>SREBF1</i>	vs	IL6	-0.181	85	0.098	
<i>TGFB2</i>	vs	IL6	-0.066	80	0.558	
<i>TLR4</i>	vs	IL6	0.146	86	0.181	
<i>TNF</i>	vs	IL6	-0.033	86	0.764	
<i>TNFRSF1A</i>	vs	IL6	0.022	88	0.837	
<i>TNFRSF1B</i>	vs	IL6	-0.022	88	0.838	
<i>UCP2</i>	vs	IL6	0.104	87	0.336	
<i>ABCA1</i>	vs	Insulin	-0.123	79	0.282	
<i>ABCG1</i>	vs	Insulin	-0.024	84	0.826	
<i>CCL2</i>	vs	Insulin	0.152	80	0.179	
<i>CCL5</i>	vs	Insulin	0.043	86	0.694	
<i>CCR2</i>	vs	Insulin	-0.056	83	0.618	
<i>CCR4</i>	vs	Insulin	-0.092	81	0.413	
<i>CD36</i>	vs	Insulin	0.183	86	0.091	
<i>CD40</i>	vs	Insulin	-0.003	87	0.976	
<i>CD40LG</i>	vs	Insulin	0.107	88	0.319	
<i>CPT1A</i>	vs	Insulin	-0.091	81	0.421	
<i>CPT1B</i>	vs	Insulin	0.231	84	0.034	*
<i>CRAT</i>	vs	Insulin	-0.048	87	0.662	
<i>CXCR2</i>	vs	Insulin	0.043	87	0.694	
<i>HMGCR</i>	vs	Insulin	-0.042	88	0.695	
<i>ICAM1</i>	vs	Insulin	-0.002	86	0.983	
<i>IFNG</i>	vs	Insulin	0.130	87	0.232	
<i>IKBKB</i>	vs	Insulin	-0.198	85	0.069	
<i>IL18</i>	vs	Insulin	0.162	78	0.156	
<i>IL1B</i>	vs	Insulin	0.129	86	0.237	
<i>IL1RN</i>	vs	Insulin	0.151	87	0.162	
<i>IL23A</i>	vs	Insulin	-0.039	88	0.716	
<i>IL23R</i>	vs	Insulin	0.174	88	0.106	
<i>IL6</i>	vs	Insulin	-0.069	86	0.531	
<i>IL8</i>	vs	Insulin	0.123	86	0.261	
<i>LDLR</i>	vs	Insulin	0.170	80	0.131	



<i>MMP9</i>	vs	Insulin	-0.049	79	0.668	
<i>NAMPT</i>	vs	Insulin	0.057	82	0.608	
<i>NFKBIA</i>	vs	Insulin	0.090	88	0.405	
<i>PDGFA</i>	vs	Insulin	-0.103	71	0.391	
<i>PDGFB</i>	vs	Insulin	-0.019	79	0.870	
<i>PDK4</i>	vs	Insulin	0.069	88	0.522	
<i>PLIN2</i>	vs	Insulin	0.139	83	0.209	
<i>PPARA</i>	vs	Insulin	-0.191	87	0.077	
<i>PPARD</i>	vs	Insulin	-0.027	87	0.802	
<i>RELA</i>	vs	Insulin	0.015	85	0.895	
<i>SREBF1</i>	vs	Insulin	-0.257	85	0.018	*
<i>TGFB2</i>	vs	Insulin	0.207	80	0.066	
<i>TLR4</i>	vs	Insulin	0.086	86	0.431	
<i>TNF</i>	vs	Insulin	0.099	86	0.364	
<i>TNFRSF1A</i>	vs	Insulin	0.076	88	0.482	
<i>TNFRSF1B</i>	vs	Insulin	-0.013	88	0.907	
<i>UCP2</i>	vs	Insulin	0.044	87	0.688	
<i>ABCA1</i>	vs	LDL-C	0.021	79	0.853	
<i>ABCG1</i>	vs	LDL-C	0.218	84	0.046	*
<i>CCL2</i>	vs	LDL-C	-0.066	80	0.558	
<i>CCL5</i>	vs	LDL-C	0.025	86	0.818	
<i>CCR2</i>	vs	LDL-C	-0.124	83	0.266	
<i>CCR4</i>	vs	LDL-C	0.201	81	0.072	
<i>CD36</i>	vs	LDL-C	0.039	86	0.720	
<i>CD40</i>	vs	LDL-C	0.105	87	0.333	
<i>CD40LG</i>	vs	LDL-C	0.183	88	0.087	
<i>CPT1A</i>	vs	LDL-C	0.167	81	0.135	
<i>CPT1B</i>	vs	LDL-C	0.061	84	0.580	
<i>CRAT</i>	vs	LDL-C	0.227	87	0.034	*
<i>CXCR2</i>	vs	LDL-C	-0.135	87	0.214	
<i>HMGCR</i>	vs	LDL-C	0.168	88	0.118	
<i>ICAM1</i>	vs	LDL-C	0.206	86	0.057	
<i>IFNG</i>	vs	LDL-C	0.112	87	0.301	
<i>IKBKB</i>	vs	LDL-C	-0.082	85	0.456	
<i>IL18</i>	vs	LDL-C	0.046	78	0.692	
<i>IL1B</i>	vs	LDL-C	0.059	86	0.587	
<i>IL1RN</i>	vs	LDL-C	0.048	87	0.656	
<i>IL23A</i>	vs	LDL-C	0.186	88	0.083	
<i>IL23R</i>	vs	LDL-C	-0.038	88	0.726	
<i>IL6</i>	vs	LDL-C	-0.176	86	0.104	
<i>IL8</i>	vs	LDL-C	-0.094	86	0.390	
<i>LDLR</i>	vs	LDL-C	-0.174	80	0.123	
<i>MMP9</i>	vs	LDL-C	-0.028	79	0.810	
<i>NAMPT</i>	vs	LDL-C	0.107	82	0.337	
<i>NFKBIA</i>	vs	LDL-C	-0.074	88	0.491	
<i>PDGFA</i>	vs	LDL-C	0.169	71	0.159	
<i>PDGFB</i>	vs	LDL-C	0.241	79	0.033	*
<i>PDK4</i>	vs	LDL-C	0.044	88	0.685	
<i>PLIN2</i>	vs	LDL-C	0.123	83	0.267	
<i>PPARA</i>	vs	LDL-C	-0.039	87	0.721	
<i>PPARD</i>	vs	LDL-C	0.193	87	0.073	
<i>RELA</i>	vs	LDL-C	-0.222	85	0.041	*

<i>SREBF1</i>	vs	LDL-C	0.250	85	0.021	*
<i>TGFB2</i>	vs	LDL-C	0.048	80	0.673	
<i>TLR4</i>	vs	LDL-C	-0.028	86	0.797	
<i>TNF</i>	vs	LDL-C	0.124	86	0.256	
<i>TNFRSF1A</i>	vs	LDL-C	0.110	88	0.309	
<i>TNFRSF1B</i>	vs	LDL-C	0.117	88	0.278	
<i>UCP2</i>	vs	LDL-C	0.125	87	0.248	
<i>ABCA1</i>	vs	Triglycerides	-0.108	79	0.344	
<i>ABCG1</i>	vs	Triglycerides	-0.034	84	0.756	
<i>CCL2</i>	vs	Triglycerides	0.045	80	0.690	
<i>CCL5</i>	vs	Triglycerides	-0.134	86	0.218	
<i>CCR2</i>	vs	Triglycerides	-0.172	83	0.120	
<i>CCR4</i>	vs	Triglycerides	0.029	81	0.796	
<i>CD36</i>	vs	Triglycerides	-0.118	86	0.280	
<i>CD40</i>	vs	Triglycerides	-0.167	87	0.122	
<i>CD40LG</i>	vs	Triglycerides	-0.029	88	0.788	
<i>CPT1A</i>	vs	Triglycerides	0.016	81	0.889	
<i>CPT1B</i>	vs	Triglycerides	0.053	84	0.632	
<i>CRAT</i>	vs	Triglycerides	-0.043	87	0.692	
<i>CXCR2</i>	vs	Triglycerides	0.023	87	0.830	
<i>HMGCR</i>	vs	Triglycerides	0.122	88	0.256	
<i>ICAM1</i>	vs	Triglycerides	0.100	86	0.361	
<i>IFNG</i>	vs	Triglycerides	-0.062	87	0.566	
<i>IKBKB</i>	vs	Triglycerides	0.055	85	0.620	
<i>IL18</i>	vs	Triglycerides	0.056	78	0.629	
<i>IL1B</i>	vs	Triglycerides	0.010	86	0.927	
<i>IL1RN</i>	vs	Triglycerides	0.002	87	0.983	
<i>IL23A</i>	vs	Triglycerides	-0.031	88	0.771	
<i>IL23R</i>	vs	Triglycerides	-0.022	88	0.837	
<i>IL6</i>	vs	Triglycerides	-0.042	86	0.699	
<i>IL8</i>	vs	Triglycerides	-0.042	86	0.703	
<i>LDLR</i>	vs	Triglycerides	0.191	80	0.090	
<i>MMP9</i>	vs	Triglycerides	0.018	79	0.873	
<i>NAMPT</i>	vs	Triglycerides	-0.043	82	0.703	
<i>NFKBIA</i>	vs	Triglycerides	0.112	88	0.298	
<i>PDGFA</i>	vs	Triglycerides	-0.060	71	0.620	
<i>PDGFB</i>	vs	Triglycerides	0.133	79	0.243	
<i>PDK4</i>	vs	Triglycerides	-0.066	88	0.543	
<i>PLIN2</i>	vs	Triglycerides	-0.003	83	0.978	
<i>PPARA</i>	vs	Triglycerides	-0.094	87	0.386	
<i>PPARD</i>	vs	Triglycerides	0.025	87	0.819	
<i>RELA</i>	vs	Triglycerides	-0.098	85	0.374	
<i>SREBF1</i>	vs	Triglycerides	-0.028	85	0.799	
<i>TGFB2</i>	vs	Triglycerides	-0.093	80	0.410	
<i>TLR4</i>	vs	Triglycerides	-0.111	86	0.309	
<i>TNF</i>	vs	Triglycerides	0.048	86	0.658	
<i>TNFRSF1A</i>	vs	Triglycerides	0.042	88	0.698	
<i>TNFRSF1B</i>	vs	Triglycerides	0.037	88	0.732	
<i>UCP2</i>	vs	Triglycerides	-0.081	87	0.453	
<i>ABCA1</i>	vs	sTNFRII	-0.214	79	0.059	
<i>ABCG1</i>	vs	sTNFRII	-0.262	84	0.016	*
<i>CCL2</i>	vs	sTNFRII	0.085	80	0.455	

<i>CCL5</i>	vs	sTNFR2	-0.155	86	0.154	
<i>CCR2</i>	vs	sTNFR2	-0.154	83	0.164	
<i>CCR4</i>	vs	sTNFR2	-0.162	81	0.148	
<i>CD36</i>	vs	sTNFR2	0.060	86	0.583	
<i>CD40</i>	vs	sTNFR2	0.096	87	0.375	
<i>CD40LG</i>	vs	sTNFR2	-0.088	88	0.416	
<i>CPT1A</i>	vs	sTNFR2	-0.046	81	0.682	
<i>CPT1B</i>	vs	sTNFR2	0.123	84	0.263	
<i>CRAT</i>	vs	sTNFR2	-0.172	87	0.111	
<i>CXCR2</i>	vs	sTNFR2	0.059	87	0.590	
<i>HMGCR</i>	vs	sTNFR2	-0.089	88	0.409	
<i>ICAM1</i>	vs	sTNFR2	-0.025	86	0.816	
<i>IFNG</i>	vs	sTNFR2	0.055	87	0.612	
<i>IKKBK</i>	vs	sTNFR2	-0.082	85	0.457	
<i>IL18</i>	vs	sTNFR2	0.257	78	0.023	*
<i>IL1B</i>	vs	sTNFR2	0.009	86	0.931	
<i>IL1RN</i>	vs	sTNFR2	0.027	87	0.802	
<i>IL23A</i>	vs	sTNFR2	-0.164	88	0.126	
<i>IL23R</i>	vs	sTNFR2	0.024	88	0.823	
<i>IL6</i>	vs	sTNFR2	-0.010	86	0.926	
<i>IL8</i>	vs	sTNFR2	-0.020	86	0.854	
<i>LDLR</i>	vs	sTNFR2	0.153	80	0.176	
<i>MMP9</i>	vs	sTNFR2	0.016	79	0.888	
<i>NAMPT</i>	vs	sTNFR2	0.178	82	0.109	
<i>NFKBIA</i>	vs	sTNFR2	0.194	88	0.071	
<i>PDGFA</i>	vs	sTNFR2	-0.121	71	0.316	
<i>PDGFB</i>	vs	sTNFR2	-0.241	79	0.032	*
<i>PDK4</i>	vs	sTNFR2	-0.029	88	0.785	
<i>PLIN2</i>	vs	sTNFR2	0.096	83	0.389	
<i>PPARA</i>	vs	sTNFR2	-0.066	87	0.545	
<i>PPARD</i>	vs	sTNFR2	-0.171	87	0.113	
<i>RELA</i>	vs	sTNFR2	-0.013	85	0.908	
<i>SREBF1</i>	vs	sTNFR2	-0.184	85	0.091	
<i>TGFB2</i>	vs	sTNFR2	0.033	80	0.774	
<i>TLR4</i>	vs	sTNFR2	-0.120	86	0.269	
<i>TNF</i>	vs	sTNFR2	0.088	86	0.423	
<i>TNFRSF1A</i>	vs	sTNFR2	0.018	88	0.867	
<i>TNFRSF1B</i>	vs	sTNFR2	-0.123	88	0.253	
<i>UCP2</i>	vs	sTNFR2	0.167	87	0.122	
<i>ABCA1</i>	vs	Total-C	-0.004	79	0.970	
<i>ABCG1</i>	vs	Total-C	0.110	84	0.318	
<i>CCL2</i>	vs	Total-C	0.050	80	0.659	
<i>CCL5</i>	vs	Total-C	-0.056	86	0.609	
<i>CCR2</i>	vs	Total-C	-0.146	83	0.187	
<i>CCR4</i>	vs	Total-C	0.111	81	0.322	
<i>CD36</i>	vs	Total-C	0.002	86	0.988	
<i>CD40</i>	vs	Total-C	-0.029	87	0.792	
<i>CD40LG</i>	vs	Total-C	0.086	88	0.428	
<i>CPT1A</i>	vs	Total-C	0.079	81	0.482	
<i>CPT1B</i>	vs	Total-C	0.093	84	0.402	
<i>CRAT</i>	vs	Total-C	0.117	87	0.280	
<i>CXCR2</i>	vs	Total-C	-0.034	87	0.754	

<i>HMGCR</i>	vs	Total-C	0.148	88	0.170	
<i>ICAM1</i>	vs	Total-C	0.167	86	0.125	
<i>IFNG</i>	vs	Total-C	0.019	87	0.862	
<i>IKBKB</i>	vs	Total-C	-0.010	85	0.931	
<i>IL18</i>	vs	Total-C	0.070	78	0.544	
<i>IL1B</i>	vs	Total-C	0.072	86	0.510	
<i>IL1RN</i>	vs	Total-C	0.071	87	0.513	
<i>IL23A</i>	vs	Total-C	0.141	88	0.191	
<i>IL23R</i>	vs	Total-C	-0.005	88	0.960	
<i>IL6</i>	vs	Total-C	-0.098	86	0.371	
<i>IL8</i>	vs	Total-C	-0.013	86	0.904	
<i>LDLR</i>	vs	Total-C	-0.144	80	0.203	
<i>MMP9</i>	vs	Total-C	0.044	79	0.703	
<i>NAMPT</i>	vs	Total-C	0.067	82	0.551	
<i>NFKBIA</i>	vs	Total-C	0.034	88	0.755	
<i>PDGFA</i>	vs	Total-C	0.121	71	0.316	
<i>PDGFB</i>	vs	Total-C	0.243	79	0.031	*
<i>PDK4</i>	vs	Total-C	0.001	88	0.991	
<i>PLIN2</i>	vs	Total-C	0.044	83	0.693	
<i>PPARA</i>	vs	Total-C	-0.072	87	0.510	
<i>PPARD</i>	vs	Total-C	0.148	87	0.171	
<i>RELA</i>	vs	Total-C	-0.194	85	0.075	
<i>SREBF1</i>	vs	Total-C	0.085	85	0.441	
<i>TGFB2</i>	vs	Total-C	-0.029	80	0.796	
<i>TLR4</i>	vs	Total-C	-0.084	86	0.445	
<i>TNF</i>	vs	Total-C	0.107	86	0.326	
<i>TNFRSF1A</i>	vs	Total-C	0.091	88	0.399	
<i>TNFRSF1B</i>	vs	Total-C	0.088	88	0.415	
<i>UCP2</i>	vs	Total-C	0.060	87	0.582	

\*\* p < 0.01, \* p < 0.05.



**Figure S1.** Gene expression changes (deltaCt) in the ND group at baseline and end of study.  $\Delta Ct$  was calculated as  $Ct_{(reference\ gene)} - Ct_{(target)}$ , and the log ratio ( $\Delta\Delta Ct$ ) was calculated as  $\Delta Ct_{(end\ of\ study)} - \Delta Ct_{(baseline)}$ . Differences between the time points are tested with a paired *t*-test. *p*-values < 0.05 were considered significant.



**Figure S2.** Gene expression changes (deltaCt) in the CD group at baseline and end of study.  $\Delta Ct$  was calculated as  $Ct_{(reference\ gene)} - Ct_{(target)}$ , and the log ratio ( $\Delta\Delta Ct$ ) was calculated as  $\Delta Ct_{(end\ of\ study)} - \Delta Ct_{(baseline)}$ . Differences between the time points are tested with a paired *t*-test. *p*-Values < 0.05 were considered significant.