Supplementary materials

Table S1. List of TaqMan® probes.

Gene	Catalogue number	Gene	Catalogue number
Mouse		**Human**	
Agtr1a	Mm00616371_m1	*AGTR1*	Hs00258938_m1
Agtr2	Mm01341373_m1	*AGTR2*	Hs02621316_s1
Mas1	Mm01313002_m	*MAS1*	Hs00267157_s1
Ccl5	Mm01302427_m1		
Ccl2	Mm00441242_m1		
Rn18s	Mm03928990_g1		
Icam1	Mm00516023_m1		
Cxcl10	Mm00445235_m1		
Cxcr3	Mm99999054_s1		
IL6	Mm00446190_m1		
Tnf-α	Mm00443258_m1		

Table S2. List of human primers used for SybrGreen qPCR.

Gene	Forward primer sequence (5'→3')	Reverse primer sequence (5'→3')
CCR7	TGGTGGTGGCTCTCCTTGTC	TGTGGTGTTGTCTCCGATGTAATC
MRC1	ACCTCACAAGTATCCACACCATC	CTTTCATCACCACACAATCCTC
CD209	TCAAGCAGTATTGGAACAGAGGA	CAGGAGGCTGCGGACTTTTT
CXCL10	ATTTGCTGCCTTATCTTTCTG	TCTCACCCTTCTTTTTCATTGTAG
IL1B	TCCAGGGACAGGATATGGAG	TCTTTCAACACGCAGGACAG
TNF	AGCCCATGTTGTAGCAAACC	TGAGGTACAGGCCCTCTGAT
MCP1	CCCCAGTCACCTGCTGTTAT	AGATCTCCTTGGCCACAATG

Table S3. Flow cytometry antibodies used

Antibody	Clone	Company
anti-CD45 PerCP	Clone 30-F11	BD Bioscience
anti-CD45 V450	Clone 30-F11	BD Bioscience
anti-CD3e APC	Clone 145-2C11	BD Bioscience
anti-CD8a PerCP	Clone 53-6.7	BD Bioscience
anti-CD4 APC-H7	Clone GK1.5	BD Bioscience
anti-CD19 APC-H7	Clone 1D3	BD Bioscience
anti-I-A[b] FITC	Clone AF6-120.1	BD Bioscience
anti-CD11b PE	Clone M1/70	BD Bioscience
anti-CD11c APC	Clone HL3	BD Bioscience
anti-Gr1 APC	Clone RB6-8C5	BD Bioscience
anti-NK-1.1 APC	Clone PK136	BD Bioscience
anti-CD11b APC-Cy7	Clone M1/70	BD Bioscience
anti-CD11c PE	Clone HL3	BD Bioscience
anti-CD206 FITC	Clone C068C2	BioLegend
anti-F4/80 APC	Clone BM8	eBioscience
anti-Ly6C PE	Clone AL-21	BD Bioscience
anti-Ly6G PE-Cy7	Clone 1A8	BD Bioscience
anti-CD43 FITC	Clone S7	BD Bioscience

Table S4. Mas receptor mRNA expression in pVAT WT and ApoE-/- (n=6-10), in aorta and pVAT from ApoE-/- (n=6) and upon THP-1 cell activation (n=5)

Gene	Description	Fold change	p value
Mas1	C57BL/6J	1.00	
	ApoE-/-	1.79	0.11
Mas1	ApoE-/- aorta	1.00	
	ApoE-/- pVAT	5.21	0.008
Mas1	THP-1	1.00	
	THP-1 + TNF-α	1.21	0.89

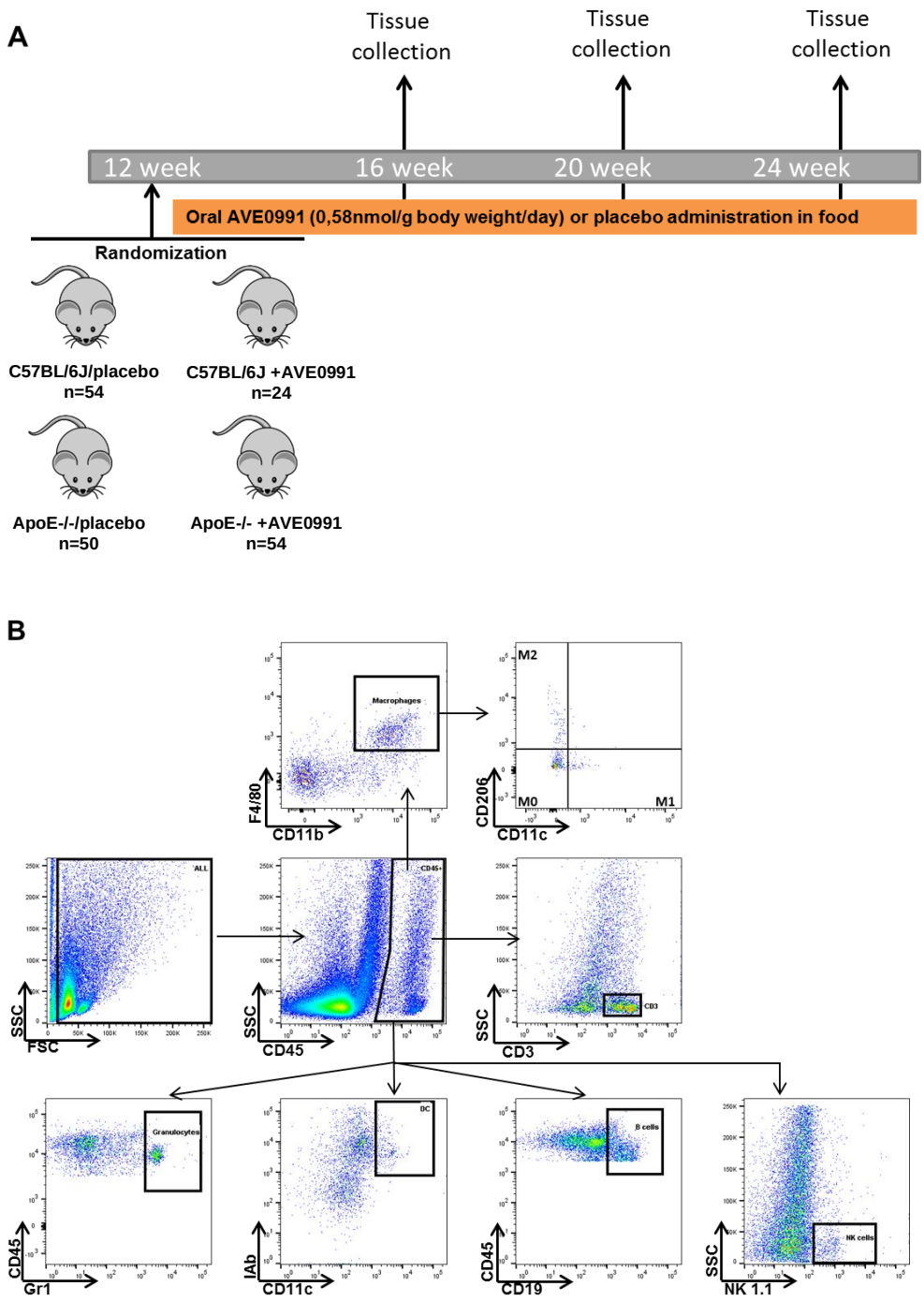

Figure Suppl. 1. (A) Experimental design and AVE0991 administration. Fifty four 12 weeks of age C57BL/6J female mice and fifty 12 weeks of age ApoE-/- mice were put on chow diet. To observe effect of Mas1 receptor agonist, AVE0991 (0.58µmol kg^{-1} body weight day^{-1}; Sanofi-Aventis, Germany) was added to food (Soest, Germany) and twenty four C57BL/6J female mice and fifty four ApoE-/- mice were feed. To observe progress of atherosclerosis and inflammatory state development, mice were sacrificed at 16, 20 and 24 weeks of age. **(B) Flow cytometric gating strategy.** Leukocytes were gated by CD45 staining. From leukocytes population B cells (CD19+), Dendritic Cells (CD11c+I-Ab+), Granulocytes (Ly6c+Ly6g+), macrophages (F4/80+CD11b+), NK cells (NK1.1+) and T cell (CD3+) were obtained. To distinguish macrophages polarization, gates for M0 macrophages (CD206-CD11c-), M1 macrophages (CD206-CD11c+) and M2 macrophages (CD206+CD11c-) were setup.

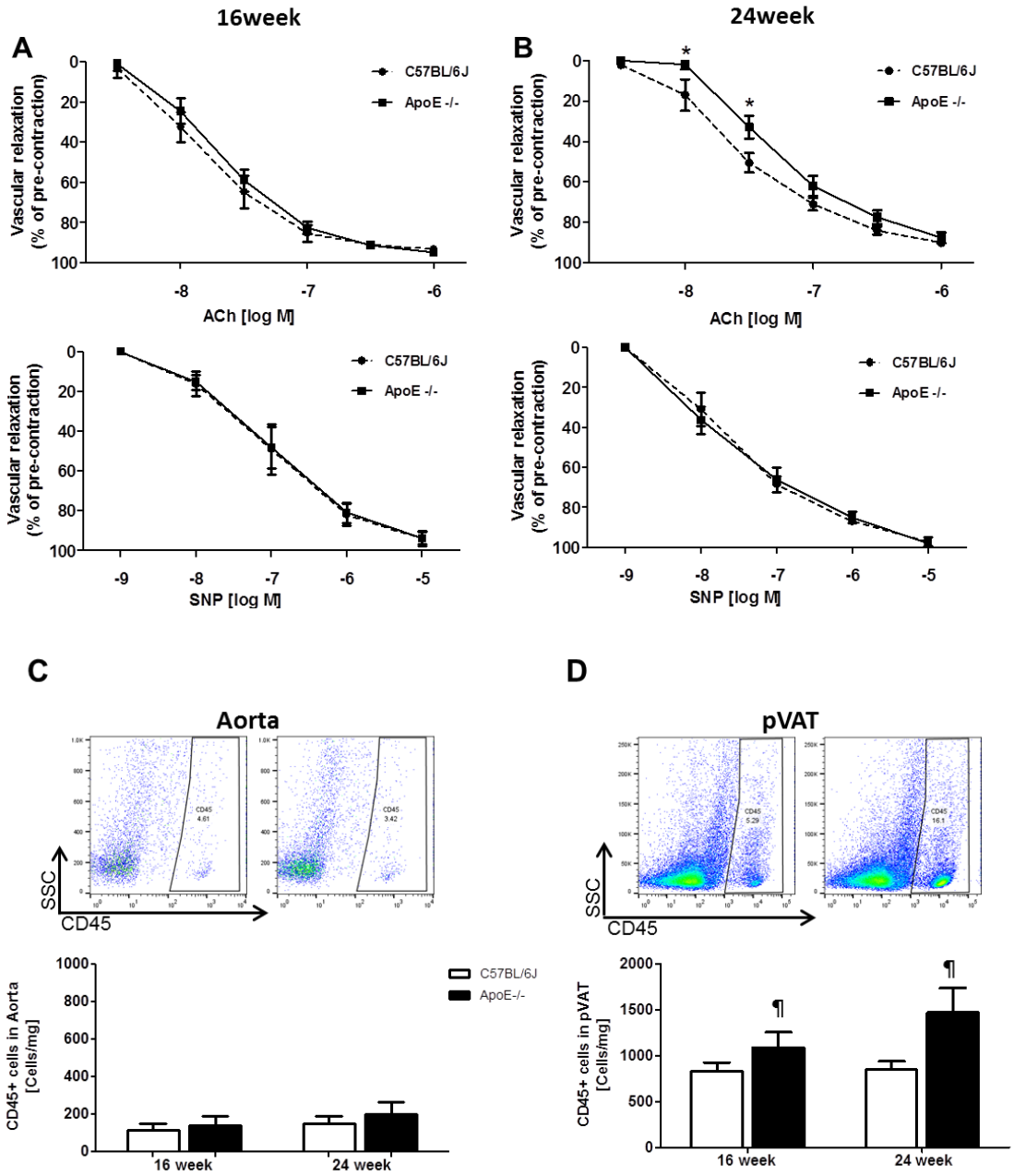

Figure Suppl. 2. At early stage of atherosclerosis in ApoE-/- mice there is no impairment of endothelium-dependent NO bioavailability and visible inflammation in aorta whereas increase of inflammatory cells infiltration is evident in perivascular adipose tissue. (A, B) Vascular relaxation endothelial dependent (ACh) and independent (SNP) were analysed in C57BL/6J and ApoE-/- mice at **(A)** 16 weeks and **(B)** 24 weeks of age (n=5) **(C, D)** Representative flow cytometric analysis of leukocytes infiltration to **(C)** aorta and **(D)** periaortic adipose tissue in C57BL/6J and ApoE-/- mice at 24 weeks of age. Leukocytes infiltration was calculated as a cell number per mg of tissue. **p*<0.05 by T test.

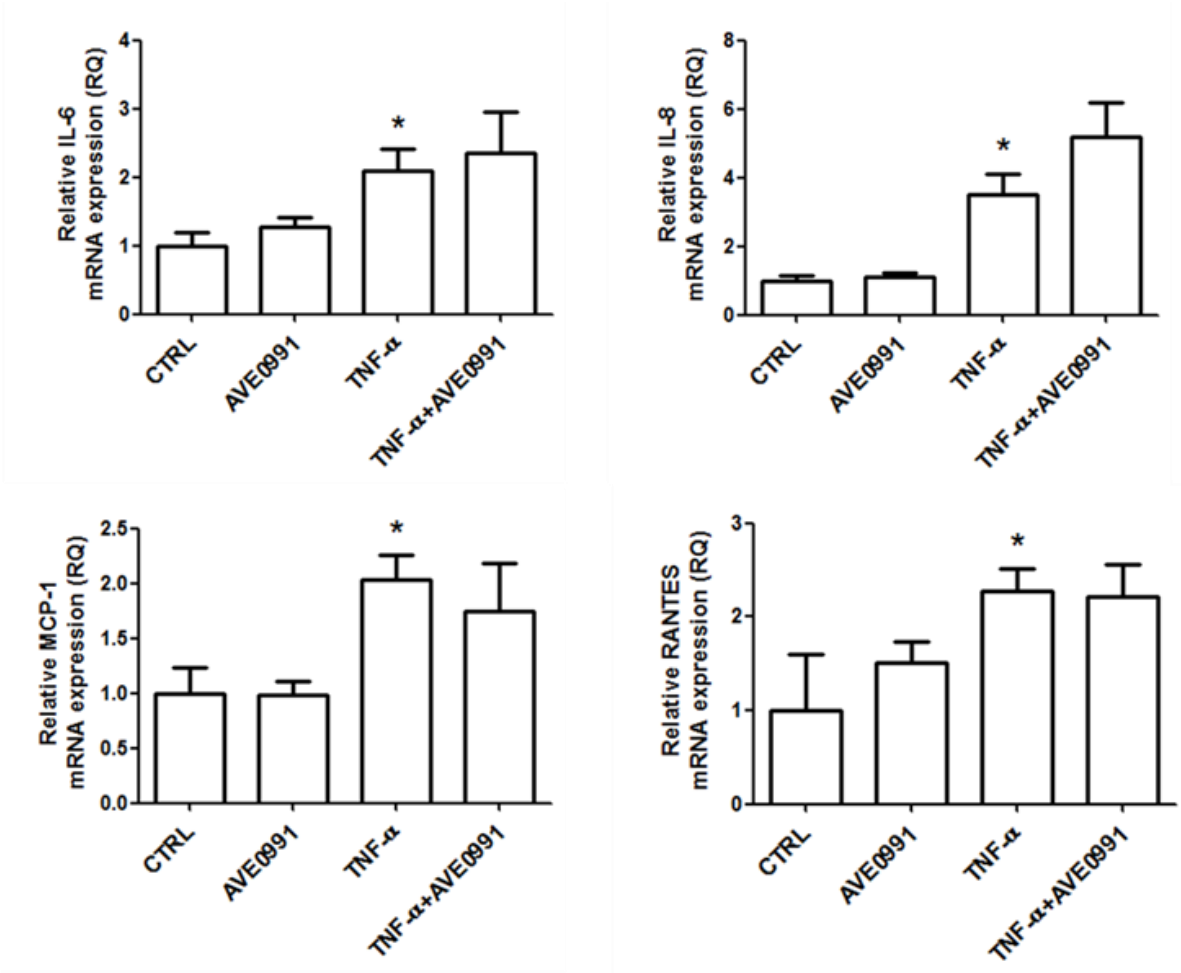

Figure Suppl. 3. Effect of AVE0991 on TNF-α activated human vascular smooth muscle cells (HVSMC) cytokine and chemokine mRNA expression. Expression of selected proinflammatory mRNA cytokines and chemokines in HVSM cells stimulated with TNF-α (10ng cm^{-3}) in presence of AVE0991 (1μM) and/or Mas receptor inhibitor A779 (5μM) (n=5). *p<0.05 vs CTRL (control) by T test.