

Supplementary Table 1. Experimental Group Sizes and Ages

<u>ITP Study</u>			
<u>Total</u>	<u>Control</u>	<u>ACA</u>	<u>NDGA Hi</u>
N=45	N=16	N=15	N=14
Mean Age (days)	1145	1159	1137
Std Dev (days)	76	90	105
<u>Total</u>	<u>Control</u>	<u>NDGA Mid</u>	
N=20	N=5	N=15	
Mean Age (days)	666	658	
Std Dev (days)	11	3	
<u>Total</u>	<u>17-α-Estradiol</u>	<u>Control</u>	
N=24	N=12	N=12	
Mean Age (days)	932	943	
Std Dev (days)	167	159	
<u>Dwarf mice</u>			
<u>Total</u>	<u>Dwarf</u>	<u>Control</u>	
N=42	N=20	N=22	
Mean Age (days)	426	422	
Std Dev (days)	12	24	
<u>Total</u>	<u>Dwarf</u>	<u>Control</u>	
N=34	N=16	N=18	
Mean Age (days)	757	715	
Std Dev (days)	13	53	

ITP, Interventions Testing Program; ACA, acarbose; NDGA, nordihydroguaiaretic acid.

Supplementary Table 2. ACS and Saf O Scores for the MTP and LTP in mice fed ACA, high-dose NDGA, mid-Dose NDGA, or control diet, 17- α -estradiol or control diet, and in dwarf mice and controls.

	Average Age = 1150 days			660 days	
	<u>Control</u>	<u>ACA</u>	<u>NDGA Hi</u>	<u>Control</u>	<u>NDGA Mid</u>
	N=16	N=15	N=14	N=5	N=15
<u>ACS MTP</u>					
Mean	6.1	3.7	4.6	5.2	5.1
Std Dev	5.8	5.1	5.3	5.9	5.7
<u>ACS LTP</u>					
Mean	0.9	0.5	1.5	4.6	3.3
Std Dev	1.3	0.5	2.1	5.9	3.4
<u>SAF-O MTP</u>					
Mean	6.8	5.5	6.4	6.4	7.3
Std Dev	5.6	4.9	4.9	5.8	4.7
<u>SAF-O LTP</u>					
Mean	3.1	2.6	3.3	8.2	5.4
Std Dev	3.3	2.1	3.1	3.8	4.0
Average Age = 950 days					
	<u>17-α-Estradiol</u>	<u>Control</u>			
	N=12	N=12			
<u>ACS MTP</u>					
Mean	4.9	2.4			
Std Dev	5.9	3.7			
<u>ACS LTP</u>					
Mean	2.2	2.8			
Std Dev	3.1	3.5			
Average Age = 450 days		750 days			
	<u>Dwarf</u>	<u>Control</u>	<u>Dwarf</u>	<u>Control</u>	
	N=20	N=22	N=16	N=18	
<u>ACS MTP</u>					
Mean	0.4	2.6	0.4	2.2	
Std Dev	1.6	3.4	1.0	2.9	
<u>SAF-O MTP</u>					
Mean	1.5	3.4	1.1	3.1	
Std Dev	2.5	4.0	2.0	4.2	

ACS, articular cartilage score; Saf-O, Safranin-O score; MTP, medial tibial plateau; LTP, lateral tibial plateau; ACA, acarbose; NDGA, nordihydroguaiaretic acid;.