

Supplementary Materials: CST, a Herbal Formula, Exerts Anti-Obesity Effects through Brain-Gut-Adipose Tissue Axis Modulation in High-Fat Diet Fed Mice

AbuZar Ansari, Shambhunath Bose, Mukesh Kumar Yadav, Jing-Hua Wang, Yun-Kyung Song, Seong-Gyu Ko and Hojun Kim

Table S1. Details of diet composition.

Normal Research Diet (NRD)			High Fat Diet (HFD)		
Product # D10012G	gm%	kcal%	Product # D12492	gm %	kcal %
Protein	20.0	20.3	Protein	26.2	20
Carbohydrate	64.0	63.9	Carbohydrate	26.3	20
Fat	7.0	15.8	Fat	34.9	60
Total		100	Total		100
Kcal/gm	3.9		Kcal/gm	5.24	

Table S2. Details of CST composition.

Pharmacognostic Name	Dried Weight (g)
Coicis Semen	3.75 g
Castaneae Semen	3.75 g
Raphani Semen	1.875 g
Ephedrae Herba	1.25 g
Platycodi Radix	1.25 g
Liriopsis Tuber	1.25 g
Schizandrae Fructus	1.25 g
Acori Graminei Rhizoma	1.25 g
Polygalae Radix	1.25 g
Asparagi Radix	1.25 g
Zizyphi Spinosae Semen	1.25 g
Longanae Arillus	1.25 g

Table S3. Details of neuropeptides and adipokines primer sequences.

Gene	Forward Primer Sequence	Reverse Primer Sequence	Reference
<i>Agrp</i>	5'-CGGAGGTGCTAGATCCACAGA-3'	5'-AGGACTCGTGCAGCCTTACAC-3'	[60]
<i>Npy</i>	5'-TACTCCGCTCTGCGACACTACA-3'	5'-AATCAGTGTCTCAGGGCTGGAT-3'	[61]
<i>Cart</i>	5'-CTGCAATTCTTCTCTTGAAGTG-3'	5'-GGGAATATGGGAACCGAAGGT-3'	[61]
<i>Pomc</i>	5'-TGCTTCAGACCTCCATAGATGTGT-3	5'-GGATGCAAGCCAGCAGGTT-3'	[61]
<i>Adipoq</i>	5'-TGTTCTCTTAATCCTGCCCA-3'	5'-CCAACCTGCACAAGTTCCTT-3'	[62]
<i>Adn</i>	5'-GCAGTGGGTGCTCAGTGCT-3'	5'-TCGTCATCCGTCCTCCATC-3'	[63]
<i>Gapdh</i>	5'-GTCACCAGGGCTGCCTTCT-3'	5'-CATTGAACTGCCGTGGGTA-3'	[63]
<i>Lep</i>	5'-CTGCCCCCAGTTTGATG-3'	5'-GCCAGGCTGCCAGAATTG-3'	[64]
<i>Lcn2</i>	5'-TGCCACTCCATCTTCTGT-3'	5'-GGGAGTGTGGCCAAATAAG-3'	[65]
<i>Rbp4</i>	5'-ACTG GGGTGTAGCCTCCTT-3'	5'-GGTGTCTAGTCCGTGTCG-3'	[66]
<i>Vasp</i>	5'-CCTGTGGCGTTAGAGTA-3'	5'-GGCGGAAAGAGGTGATT-3'	[67]
<i>Visf</i>	5'-ACATAGGACACCAGCG-3'	5'-AAACACGAACCCACAC-3'	[67]
<i>Retn</i>	5'-GTACCCACGGGATGAAGAACC-3'	5'-CAAGTTGGATGGGGCCGAAGGG-3	[68]

Table S4. Details of gut microbiota primer sequences.

Bacteria	Forward Primer Sequence	Reverse Primer Sequence	Ref.
<i>Lactobacillus</i>	5'-GAGGCAGCAGTAGGGAATCTTC-3'	5'-GGCCAGTTACTACCTCTATCCTTCTTC-3'	[26]
Bacteroidetes	5'-GGARCATGTGGTTTAATTTCGATGAT-3'	5'-AGCTGACGACAACCATGCAG-3'	[69]
Fermicutes	5'-GGAGYATGTGGTTTAATTCGAAGCA-3'	5'-AGCTGACGACAACCATGCAG-3'	[69]
<i>Akkermansia</i>	5'-CAGCACGTGAAGGTGGGGAC-3'	5'-AGCTGACGACAACCATGCAG-3'	[70]
<i>Bacteroides</i>	5'-GAAGGTCCCCACATG-3'	5'-CGCKACTTGGCTGGTTCAG-3'	[71]
<i>Prevotella</i>	5'-CACRGTAACGATGGATGCC-3'	5'-GGTCGGGTTGCAGACC-3'	[71]
<i>Roseburia</i>	5'-GATGAAGTATCTCGGTATGT-3'	5'-CTACGCTCCCTTTACAC-3'	[71]
<i>Bifidobacterium</i>	5'-CGCGTCTGGTGTCAAAG-3'	5'-CCCCACATCCAGCATCCA-3'	[72]
<i>Ruminococcus</i>	5'-GGCGCCTACTGGGCTTT-3'	5'-CCAGGTGGATAACTTATTGTGTTAA-3'	[73]
16sRNA universal primers	27F, 5'-AGAGTTTGATCCTGGCTCAG-3'	1525R, 5'-AAGGAGGTGATCCAGCC-3'	[74]

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