

Table S1: Traditional probiotics efficacy to the care of obesity in animal and human clinical trials (not exhaustive).

	Single Strain or Consortium	Composition	Weight gain	Pre-clinical evidence				Clinical evidence					References
				Food Intake	Fat accumulation	Inflammation	comorbidity	Body weight	Food Intake	Fat accumulation	Inflammation	comorbidity	
Traditional probiotics	Single strain	<i>Lactobacillus gasseri</i> BNR17	↓**		↓		↓ insulin ↓ leptin	↓**		↓		↓ waist circumference	Kim et al. (2018) Kang, J. H et al (2013) SP Jung et al (2013)
	Single strain	<i>Bifidobacterium breve</i> B-3	↓		↓		↓insulin ↓ fasting glucose ↓ cholesterol			↓			S Kondo et al (2010)
	Single strain	<i>Bifidobacterium animalis subsp. Lactis</i> CECT 8145	↓	↓	↓		↓ plasma ghrelin levels ↑ insuline sensitivity	↓		↓		↓ waist circumference	NL Carreras et al(2018) Pedret et al. (2018) Cerdó, T. et al (2019)
	Single strain	<i>B. pseudocatenuatum</i> CECT 7765						↓					Cerdó, (2019).
	Single strain	<i>L. rhamnosus</i> CGMCC1.3724						↓					Sánchez et al. (2017) Cerdó, T. et al(2019)
	Single strain	<i>B. pseudocatenuatum</i> CECT 7765						↓					Sanchis-Chordá et al. (2018) Cerdó, T. et al (2019)
	Consortium	probiotic mixture including nine different strains of <i>Lactobacillus</i> and <i>Bifidobacterium</i>						↓		↓			Szulinska et al. (2018) Cerdó, T. et al (2019)
	Consortium	<i>L. acidophilus</i> LA140, <i>L. casei</i> LC107, <i>B. bifidum</i> BBL730 and isoflavones	↓		↓			↓					Cerdó, (2019).
	Consortium	VS1#3 ( <i>Streptococcus thermophilus</i> DSM24731, <i>L. acidophilus</i> DSM24735, <i>L. delbrueckii</i> subsp. <i>Bulgaricus</i> DSM24724, <i>L. paracasei</i> DSM24733, <i>L. plantarum</i> DSM24730, <i>B. longum</i> DSM24736, <i>B. infantis</i> DSM24737, and <i>B. breve</i> DSM2473)						↓		↓		↓ insulin resistance ↑ GLP-1 level	Alisi et al. (2014) Osterberg et al. (2015) Cerdó, T. et al (2019)
	Consortium	<i>L. acidophilus</i> ATCC B3208, <i>L. rhamnosus</i> DSMZ 21690, <i>B. lactis</i> DSMZ 32,296, and <i>B. bifidum</i> ATCC SD6576						=				↓ insulin resistance ↑ GLP-1 level	Cerdó, (2019)
	Consortium	<i>L. curvatus</i> HY7601 + <i>L. plantarum</i> KY1032						↓		↓		↓ waist circumference	Jung et al. (2015) Cerdó, T. et al (2019)
	Consortium	<i>L. acidophilus</i> LA-14, <i>L. casei</i> LC-11, <i>Lactococcus lactis</i> LL-23, <i>B. bifidum</i> BB-06, <i>B. lactis</i> BL-4						=				↓ waist circumference	Gomes et al. (2017) Cerdó, T. et al (2019)
Consortium	<i>L. curvatus</i> HY7601 + <i>L. plantarum</i> KY1032						↓		↓			Cerdó, (2019).	

\*\* Trend.