Supplementary Information (SI) for Food & Function.
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Supplemental Materials

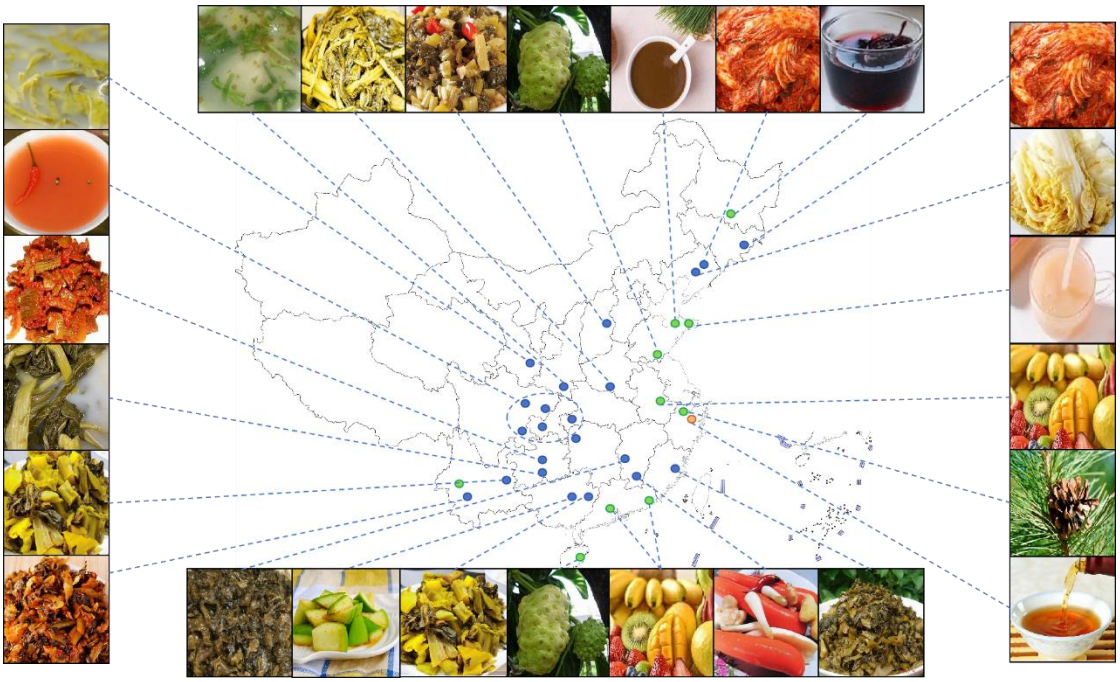

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Figure S1. Strain Screening Product Distribution

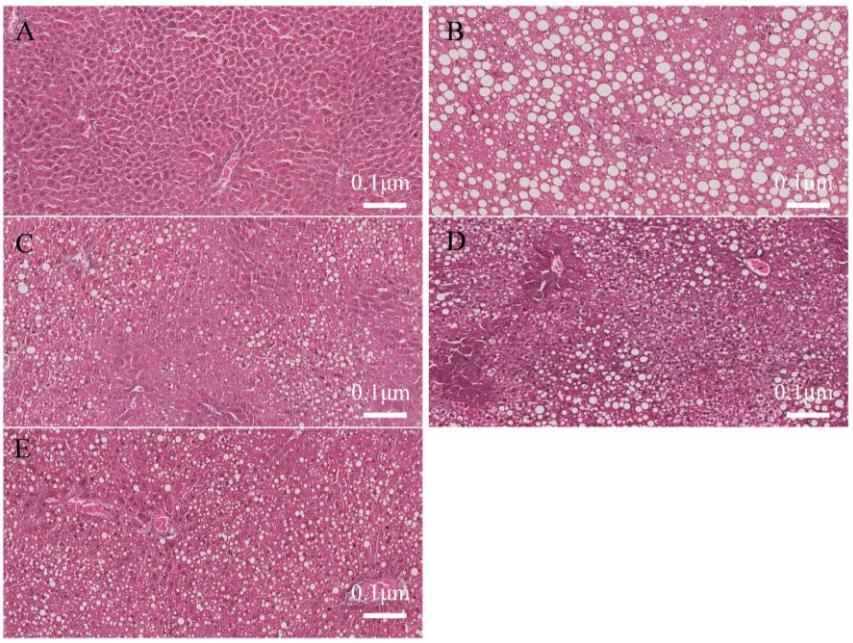

Figure S2. Mouse masson staining results (A) blank group; (B) control group; (C) probiotic group I; (D) probiotic group II; (E) probiotic group III.

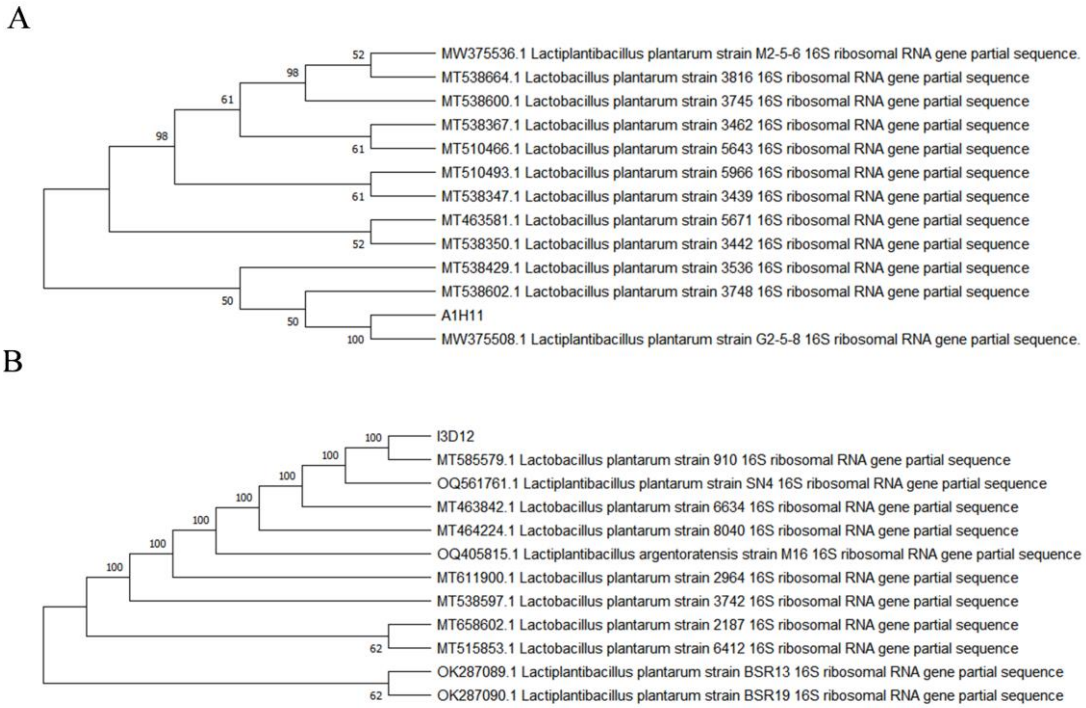

Figure S3. Phylogenetic tree of A1H11 and I3D12

Table S1. The Linear Relationship between WST-8 and NADH Content.

Time（h）	Equation	R^2
1	y = 0.08720x + 0.04744	0.7562
2	y = 0.1951x - 0.01490	0.8512
3	y = 0.3197x - 0.03900	0.9194
4	y = 0.4186x + 0.09983	0.9840
5	y = 0.4753x + 0.1197	0.9900
6	y = 0.5038x+ 0.3483	0.9948

Table S2. The Correlation between WST-8 and Intracellular NADH.

Amount of bacterial liquid added	Equation	R^2
10%	y = 0.6953x - 0.8385	0.9614
20%	y = 0.7018x - 0.6321	0.9904
30%	y = 0.5720x - 0.2752	0.9766
40%	y = 0.4917x - 0.08156	0.9425
50%	y = 0.4025x + 0.1326	0.9249

Table S3. The Correlation between WST-8 and Strain NADH in the Presence of 5% (v/v) Ethanol.

Time（h）	Equation	R^2
1	y = 0.09266x - 0.03472	0.8009
2	y = 0.2111x - 0.1004	0.8820
3	y = 0.3328x - 0.1023	0.9366
4	y = 0.4985x - 0.009605	0.9283
5	y = 0.5085x + 0.06822	0.9261
6	y = 0.5222x + 0.1226	0.9354

Table S4. Strain Information.

Serial number	Strain No.	Name of strain
1	A1B8	*Pichia manshurica*
2	A1H11	*Lactiplantibacillus plantarum*
3	A4D9	*Lactiplantibacillus plantarum*
4	B4A9	*Lactiplantibacillus plantarum*
5	B4C8	*Lentilactobacillus buchneri*
6	B5A8	*Lacticaseibacillus casei*
7	C5H12	*Levilactobacillus brevis*
8	E4A10	*Levilactobacillus brevis*
9	H1A5	*Pichia manshurica*
10	H1A6	*Lacticaseibacillus casei*
11	H1A8	*Pichia manshurica*
12	H1A9	*Pichia manshurica*
13	H2A5	*Pichia manshurica*
14	I1A5	*Pichia manshurica*
15	I1G3	*Pichia manshurica*
16	I3D12	*Lactiplantibacillus plantarum*
17	I3G12	*Lactiplantibacillus plantarum*
18	I4B9	*Pichia manshurica*
19	I4E10	*Pediococcus pentosaceus*
20	I4G9	*Pichia manshurica*
21	I4G10	*Pichia manshurica*
22	I5H12	*Levilactobacillus brevis*
23	J1A3	*Lactiplantibacillus plantarum*
24	K4H12	*Pichia manshurica*
25	K5A9	*Pichia manshurica*
26	N3E11	*Lactiplantibacillus plantarum*
27	P1A7	*Lactiplantibacillusplantarum*
28	Q5H7	*Lentilactobacillus buchneri*
29	YI	*Pediococcus pentosaceus*
30	YIBA	*Pediococcus pentosaceus*
31	YIBAP	*Pediococcus pentosaceus*
32	YIER	*Pediococcus pentosaceus*
33	YIWU	*Pediococcus pentosaceus*