

Table S1. List of proteins in the confidently annotated reference set (CARS) with their annotations based on literature and/or the context-based analyses. Uniprot_Acc: the Uniprot accession number of proteins; SEED_PEGid: the protein identification number in SEED database; Uniprot_Recname: the Uniprot recommended name of the protein; Uniprot_Subname: The submitter recommended name of the protein; Organism: organism name from which the protein was identified; Context-based annotation: the annotation based on genomic and functional context analyses; Functional_context: the number of proteins in the genome that perform neighboring functions in a metabolic pathway of the target protein; Genomic_context: the number of proteins in a same operon of the target protein that perform neighboring functions in the metabolic pathway; Reference_annotation: the annotation based on literature; Clust_ID: the cluster numbers of target protein in 30% sequence identity clustering.

Uniprot_Acc	SEED_PEGid	Uniprot_Recname	Uniprot_Subname	Organism	Context-based Annotation	Functional_context	Genomic_context	Reference_annotation	Clust_ID
A3V752	fig 272620.3.peg.3969	-	Xylulokinase	Klebsiella pneumoniae NTUH-K2044.	XylB	3	2	XylB	252
Q0I2L5	fig 83333.1.peg.3498	-	Xylulokinase	Escherichia coli (strain K12 / DH10B).	XylB	3	2	XylB	66
Q2YIQ1	fig 100226.1.peg.1137	Xylulose kinase	-	Streptomyces coelicolor.	XylB	1	1	XylB	9
Q65PY1	fig 387344.13.peg.182	-	Xylulokinase	Lactobacillus brevis (strain ATCC 367 / JCM 1170).	XylB	3	2	XylB	342
Q8NZW9	fig 243274.1.peg.116	-	Sugar kinase, FGGY family	Thermotoga maritima.	XylB	1	0	XylB	152
A0LWM7	fig 350058.5.peg.5216	-	Xylulokinase	Mycobacterium vanbaalenii (strain DSM 7251 / PYR-1).	XylB	2	2	-	9
A1QZ35	fig 349965.3.peg.2781	-	Xylulose kinase	Yersinia intermedia ATCC 29909.	XylB	2	2	-	252
A1TFW7	fig 101510.15.peg.2837	-	Probable xylulokinase	Rhodococcus sp. (strain RHA1).	XylB	2	1	-	9
A2TYE0	fig 221988.1.peg.2230	-	XylB protein	Mannheimia succiniciproducens (strain MBEL55E).	XylB	2	2	-	252
A3I438	fig 220341.1.peg.3657	-	Xylulose kinase	Salmonella typhi.	XylB	1	1	-	252
A3IGA5	fig 349967.3.peg.716	-	Xylulose kinase	Yersinia mollaretii ATCC 43969.	XylB	2	2	-	252
A3SK66	fig 340185.3.peg.30	-	Xylulokinase	Escherichia coli (strain 55989 / EAEC).	XylB	3	2	-	252
A3VKN6	fig 300269.11.peg.4392	-	Xylulokinase	Shigella sonnei (strain Ss046).	XylB	2	1	-	252
A3XK62	fig 273123.1.peg.3950	-	Xylulose kinase	Yersinia pseudotuberculosis.	XylB	2	2	-	252
A3XSZ3	fig 502800.3.peg.55	-	Xylulokinase	Yersinia pseudotuberculosis serotype O:3 (strain YPIII).	XylB	2	2	-	66

A3ZQG2	fig 331112.3.peg.352 7	-	Xylulokinase	Escherichia coli 101-1.	XylB	3	2	-	252
A4APS0	fig 349968.3.peg.182	-	Xylulose kinase	Yersinia bercovieri ATCC 43970.	XylB	2	2	-	252
A4BZE8	fig 585057.4.peg.421 9	-	Xylulokinase	Escherichia coli O7:K1 (strain IA139 / ExPEC).	XylB	2	2	-	252
A4CJ47	fig 198215.1.peg.357 8	-	Xylulokinase	Shigella flexneri serotype 5b (strain 8401).	XylB	3	2	-	252
A4VJY7	fig 331271.3.peg.104 3	-	Xylulokinase	Burkholderia cenocepacia (strain AU 1054).	XylB	3	2	-	252
A5IMF5	fig 187410.1.peg.400 2	-	Xylulokinase	Yersinia pestis.	XylB	2	2	-	252
A5MU26	fig 205914.5.peg.613	-	Xylulokinase (Xylulose kinase)	Haemophilus somnus (strain 129Pt) (Histophilus somni (strain 129Pt)).	XylB	2	2	-	252
A5UIF7	fig 481805.3.peg.158	-	Xylulokinase	Escherichia coli (strain ATCC 8739 / DSM 1576 / Crooks).	XylB	3	2	-	66
A6LKN0	fig 300268.10.peg.42 68	-	Xylulokinase	Shigella boydii serotype 4 (strain Sb227).	XylB	3	2	-	252
A6V1L3	fig 298386.1.peg.269 6	-	Putative xylulose kinase	Photobacterium profundum (Photobacterium sp. (strain SS9)).	XylB	2	1	-	252
A6VPR1	fig 434924.4.peg.559	-	Xylulose kinase	Coxiella burnetii (strain CbuK_Q154) (Coxiella burnetii (strain Q154)).	XylB	1	1	-	252
A8GLA1	fig 342610.3.peg.371 4	-	Xylulokinase	Pseudoalteromonas atlantica (strain T6c / BAA-1087).	XylB	3	2	-	252
A8LDF9	fig 281090.3.peg.138 0	-	Xylulose kinase	Leifsonia xyli subsp. xyli.	XylB	1	1	-	9
A9WZF0	fig 391037.3.peg.382 6	-	Xylulokinase	Salinispora arenicola (strain CNS-205).	XylB	2	1	-	9
B0GU21	fig 399741.3.peg.128	-	Xylulokinase	Serratia proteamaculans (strain 568).	XylB	2	2	-	66
B0UT20	fig 349747.3.peg.262 1	-	Xylulokinase	Yersinia pseudotuberculosis serotype O:1b (strain IP 31758).	XylB	2	2	-	66
B0UTW2	fig 584.1.peg.2287	-	Xylulose kinase	Proteus mirabilis (strain HI4320).	XylB	1	1	-	66
B1BSG4	fig 554290.7.peg.370 6	-	Xylulose kinase	Salmonella paratyphi A.	XylB	1	1	-	252
B1JH39	fig 400668.6.peg.190 3	-	Xylulokinase	Marinomonas sp. (strain MWYL1).	XylB	3	1	-	66
B1LBG8	fig 216593.1.peg.430 5	-	Xylulokinase	Escherichia coli O127:H6 (strain E2348/69 / EPEC).	XylB	2	2	-	252
B1RR24	fig 218491.3.peg.305 8	-	Xylulose kinase	Erwinia carotovora subsp. atroseptica (Pectobacterium atrosepticum).	XylB	2	2	-	252

B2HNZ2	fig 312284.3.peg.173 9	-	Xylulose kinase	marine actinobacterium PHSC20C1.	XylB	1	1	-	9
B3IHD4	fig 227377.1.peg.331	-	Xylulose kinase	Coxiella burnetii.	XylB	2	2	-	252
B5BHV9	fig 83334.1.peg.4418	-	Xylulokinase	Escherichia coli O157:H7 str. EC4501.	XylB	3	2	-	66
B5PRN3	fig 228400.4.peg.987	-	Xylulokinase	Haemophilus sommus (strain 2336) (Histophilus sommus (strain 2336)).	XylB	2	2	-	66
B7ULE2	fig 349746.3.peg.307 1	-	Xylulokinase	Yersinia pestis biovar Orientalis str. MG05-1020.	XylB	3	3	-	66
B7VAK3	fig 48935.1.peg.1771	-	Xylulokinase	Novosphingobium aromaticivorans (strain DSM 12444).	XylB	2	1	-	252
C2PSC4	fig 272558.1.peg.275 6	-	Xylose kinase	Bacillus halodurans.	XylB	1	1	-	342
C4IV00	fig 369723.3.peg.353 7	-	Xylulokinase	Salinispora tropica (strain ATCC BAA- 916 / DSM 44818 / CNB-440).	XylB	2	1	-	9
C4SXT4	fig 331111.3.peg.1705	-	Xylulokinase	Escherichia coli O139:H28 (strain E24377A / ETEC).	XylB	3	2	-	66
C5C1D9	fig 269800.4.peg.188 7	-	Xylulokinase	Thermobifida fusca (strain YX).	XylB	1	1	-	9
Q02R51	fig 349966.3.peg.247 3	-	Xylulose kinase	Yersinia frederiksenii ATCC 33641.	XylB	2	2	-	252
Q0SCW9	fig 196627.4.peg.150	-	XYLULOSE KINASE	Corynebacterium glutamicum (Brevibacterium flavum).	XylB	1	1	-	9
Q162I2	fig 298653.4.peg.456 4	-	Xylulokinase	Frankia sp. (strain EAN1pec).	XylB	1	1	-	9
Q1AX49	fig 221109.1.peg.312 1	-	Xylose kinase (Xylulokinase)	Oceanobacillus ihyensensis.	XylB	1	1	-	342
Q1LL59	fig 66692.3.peg.574	-	Xylose kinase	Bacillus clausii (strain KSM-K16).	XylB	1	1	-	342
Q31V54	fig 224308.1.peg.176 5	Xylulose kinase	-	Bacillus subtilis.	XylB	1	1	-	342
Q3ICL7	fig 199310.1.peg.428 9	-	Xylulose kinase	Escherichia coli O6.	XylB	2	2	-	252

Q3R5A3	fig 279010.5.peg.316 8	-	Xylulose kinase	Bacillus licheniformis (strain DSM 13 / ATCC 14580).	XylB	1	1	-	342
Q3YVU9	fig 222523.1.peg.219 5	-	Xylulokinase	Bacillus cereus (strain ATCC 10987).	XylB	2	2	-	342
Q4JHR4	fig 471853.4.peg.372 7	-	Xylulokinase	Beutenbergia cavernae (strain ATCC BAA-8 / DSM 12333 / NBRC 16432).	XylB	1	1	-	9
Q65WK5	fig 399742.4.peg.239	-	Xylulokinase	Enterobacter sp. (strain 638).	XylB	2	2	-	66
Q92NH0	fig 227882.1.peg.718 3	-	Xylulose kinase	Streptomyces avermitilis.	XylB	1	1	-	9
Q93HF4	fig 351607.5.peg.206 1	-	Xylulokinase	Acidothermus cellulolyticus (strain ATCC 43068 / 11B).	XylB	2	1	-	9
Q986P3	fig 216594.1.peg.349 5	-	Carbohydrate kinase	Mycobacterium marinum (strain ATCC BAA-535 / M).	XylB	1	1	-	9
A4XXN1	fig 83333.1.peg.3825	Rhamnulokinase	-	Escherichia coli (strain K12 / DH10B).	RhaB	2	2	RhaB	137
Q73CE0	fig 99287.1.peg.3901	-	Rhamnulokinase	Salmonella enterica subsp. enterica serovar Saintpaul str. SARA23.	RhaB	2	2	RhaB	137
Q9X0G2	fig 243274.1.peg.106 3	-	Sugar kinase	Thermotoga maritima.	RhaB	2	2	RhaB	95
A1VA10	fig 340184.3.peg.150 1	-	Rhamnulokinase	Escherichia coli B7A.	RhaB	2	2	-	137
A5EWH1	fig 216593.1.peg.473 4	Rhamnulokinase	-	Escherichia coli O127:H6 (strain E2348/69 / EPEC).	RhaB	2	2	-	137
A5INA3	fig 390874.10.peg.16 85	-	Carbohydrate kinase, FGGY	Thermotoga petrophila (strain RKU-1 / ATCC BAA- 488 / DSM 13995).	RhaB	2	2	-	95
A5VZG7	fig 218491.3.peg.408 4	Rhamnulokinase	-	Erwinia carotovora subsp. atroseptica (Pectobacterium atrosepticum).	RhaB	2	2	-	137
A6LCZ1	fig 439842.7.peg.383 9	-	Rhamnulokinase	Salmonella enterica subsp. enterica serovar Kentucky str. CDC 191.	RhaB	2	2	-	137
A7X1U3	fig 83334.1.peg.4805	-	Rhamnulokinase	Escherichia coli O157:H7 str. EC869.	RhaB	2	2	-	137

B9DV90	fig 439843.6.peg.421 4	Rhamnulokinase	-	Salmonella schwarzengrund (strain CVM19633).	RhaB	2	2	-	137
P94524	fig 585034.4.peg.400 1	Rhamnulokinase	-	Escherichia coli (strain 55989 / EAEC).	RhaB	2	2	-	137
Q0SQ01	fig 554290.7.peg.409 9	Rhamnulokinase	-	Salmonella paratyphi A (strain AKU_12601).	RhaB	2	2	-	137
Q1IMB2	fig 340186.3.peg.120 7	-	Rhamnulokinase	Escherichia coli E110019.	RhaB	2	2	-	137
Q2FY25	fig 272994.5.peg.416 5	Rhamnulokinase	-	Salmonella paratyphi B (strain ATCC BAA-1250 / SPB7).	RhaB	2	2	-	137
Q2YXR6	fig 550537.3.peg.409 0	-	Rhamnulokinase	Salmonella enterica subsp. enterica serovar Saintpaul str. SARA29.	RhaB	2	2	-	137
Q39V17	fig 502800.3.peg.379 6	-	Rhamnulokinase	Yersinia pseudotuberculosis serotype O:3 (strain YP111).	RhaB	2	2	-	137
Q3AB25	fig 362663.8.peg.414 3	-	Rhamnulokinase	Escherichia coli F11.	RhaB	2	2	-	137
Q3BYR0	fig 220341.1.peg.339 3	Rhamnulokinase	-	Salmonella typhi.	RhaB	2	2	-	137
Q4L607	fig 344601.3.peg.172 0	-	Rhamnulokinase	Escherichia coli E22.	RhaB	2	2	-	137
Q4UZR8	fig 331112.3.peg.385 8	Rhamnulokinase	-	Escherichia coli O9:H4 (strain HS).	RhaB	2	2	-	137
Q65GC1	fig 454166.6.peg.416 4	Rhamnulokinase	-	Salmonella agona (strain SL483).	RhaB	2	2	-	137
Q6G9R3	fig 187410.1.peg.576	Rhamnulokinase	-	Yersinia pestis bv. Antiqua (strain Nepal516).	RhaB	2	2	-	137
Q6GHD5	fig 364106.7.peg.437 4	Rhamnulokinase	-	Escherichia coli O45:K1 (strain S88 / ExPEC).	RhaB	2	2	-	137
Q74911	fig 290338.6.peg.260 3	-	Putative uncharacterized protein	Citrobacter koseri (strain ATCC BAA- 895 / CDC 4225-83 / SGSC4696).	RhaB	2	2	-	137
Q81GZ2	fig 221988.1.peg.218 9	Rhamnulokinase	-	Mannheimia succiniciproducens (strain MBEL55E).	RhaB	2	2	-	137
Q81U58	fig 300268.10.peg.46 59	Rhamnulokinase	-	Shigella boydii serotype 4 (strain Sb227).	RhaB	2	2	-	137

Q87BZ2	fig 300269.11.peg.4690	Rhamnulokinase	-	Shigella sonnei (strain Ss046).	RhaB	2	2	-	137
Q8CSS0	fig 198214.1.peg.3748	Rhamnulokinase	-	Shigella flexneri.	RhaB	2	2	-	137
Q8ENK7	fig 585057.4.peg.3200	Rhamnulokinase	-	Escherichia coli O7:K1 (strain IAI39 / ExPEC).	RhaB	2	2	-	137
Q8NWX7	fig 349746.3.peg.2147	Rhamnulokinase	-	Yersinia pestis bv. Antiqua (strain Angola).	RhaB	2	2	-	137
Q8RHZ9	fig 439851.5.peg.4384	Rhamnulokinase	-	Salmonella dublin (strain CT_02021853).	RhaB	2	2	-	137
Q97JG4	fig 454169.6.peg.4312	-	Rhamnulokinase	Salmonella enterica subsp. enterica serovar Heidelberg str. SL486.	RhaB	2	2	-	137
Q9HY41	fig 321314.4.peg.3436	Rhamnulokinase	-	Salmonella paratyphi C (strain RKS4594).	RhaB	2	2	-	137
Q9KDW8	fig 349965.3.peg.3107	-	Rhamnulokinase	Yersinia intermedia ATCC 29909.	RhaB	2	2	-	137
Q9WYC0	fig 266117.6.peg.1540	-	Carbohydrate kinase, FGGY	Rubrobacter xylanophilus (strain DSM 9941 / NBRC 16129).	RhaB	2	1	-	95
Q9X1E4	fig 216598.1.peg.3988	-	Rhamnulokinase	Shigella dysenteriae serotype 1 (strain Sd197).	RhaB	2	2	-	137
A5LQY3	fig 272943.3.peg.3604	-	D-ribulokinase	Rhodobacter sphaeroides (strain ATCC 17023 / 2.4.1 / NCIB 8253 / DSM158).	RbtK	3	1	-	25
A5M8Q4	fig 204722.1.peg.2375	-	Ribitol kinase	Brucella suis.	RbtK	1	1	-	25
A5MG16	fig 216596.1.peg.7085	-	Putative D-ribulokinase/ribitol kinase	Rhizobium leguminosarum bv. viciae (strain 3841).	RbtK	5	1	-	25
B3BWR9	fig 224911.1.peg.3226	-	Ribitol kinase	Bradyrhizobium japonicum.	RbtK	2	1	-	25
B3H0N9	fig 288000.5.peg.1100	-	Putative sugar kinase (Ribulo-/ribitol kinase)	Bradyrhizobium sp. (strain BTAi1 / ATCC BAA-1182).	RbtK	2	1	-	25
B5NTU6	fig 224914.1.peg.3039	-	FGGY-family pentulose kinase	Brucella abortus str. 2308 A.	RbtK	1	1	-	25

Q9K994	fig 344610.3.peg.15	-	Carbohydrate kinase FGGY	Escherichia coli (strain ATCC 8739 / DSM 1576 / Crooks).	LyxK	3	2	LyxK	48
A3GF74	fig 439851.5.peg.4018	-	L-xylulose/3-keto-L-gulonate kinase	Salmonella dublin (strain CT_02021853).	LyxK	3	2	-	48
A7ZTC7	fig 205914.5.peg.801	-	L-xylulose kinase	Haemophilus somnus (strain 129Pt) (Histophilus somni (strain 129Pt)).	LyxK	3	2	-	48
A8ARG8	fig 454169.6.peg.3949	-	L-xylulose/3-keto-L-gulonate kinase	Salmonella enterica subsp. enterica serovar Virchow str. SL491.	LyxK	3	2	-	48
B1IZL3	fig 314290.3.peg.1474	-	Lyx	Vibrio sp. MED222.	LyxK	2	2	-	48
B3H8E2	fig 331111.3.peg.1721	-	Cryptic L-xylulose kinase	Escherichia coli O139:H28 (strain E24377A / ETEC).	LyxK	3	3	-	48
B3HZJ6	fig 99287.1.peg.3550	-	L-xylulose/3-keto-L-gulonate kinase	Salmonella enterica subsp. enterica serovar Saintpaul str. SARA23.	LyxK	3	2	-	48
B3YDJ1	fig 272843.1.peg.1247	Probable L-xylulose kinase	-	Pasteurella multocida.	LyxK	3	2	-	48
B4SWM2	fig 216593.1.peg.4322	-	L-xylulose kinase	Escherichia coli O127:H6 (strain E2348/69 / EPEC).	LyxK	3	2	-	48
B5C9Q2	fig 585057.4.peg.4236	-	L-xylulose kinase	Escherichia coli O7:K1 (strain IAI39 / ExPEC).	LyxK	3	3	-	48
B5EX85	fig 221988.1.peg.46	-	XylB protein	Mannheimia succiniciproducens (strain MBEL55E).	LyxK	3	1	-	48
B5FLF1	fig 373384.10.peg.4447	-	L-xylulose kinase, cryptic	Shigella flexneri serotype 5b (strain 8401).	LyxK	3	2	-	48
B5Q768	fig 349965.3.peg.195	-	L-xylulose/3-keto-L-gulonate kinase	Yersinia intermedia ATCC 29909.	LyxK	3	3	-	48
B5R4R1	fig 374931.9.peg.1736	-	L-xylulose kinase	Haemophilus influenzae (strain PittGG).	LyxK	2	2	-	48
B7L6Z2	fig 439842.7.peg.3463	-	L-xylulose/3-keto-L-gulonate kinase	Salmonella enterica subsp. enterica serovar Kentucky str. CVM29188.	LyxK	3	2	-	48

B7NP80	fig 554290.7.peg.372 1	-	Putative L-xylulose kinase	Salmonella paratyphi A (strain AKU_12601).	LyxK	3	2	-	48
C1HSH9	fig 340197.3.peg.583	-	Cryptic L-xylulose kinase	Escherichia coli O6:K15:H31 (strain 536 / UPEC).	LyxK	3	2	-	48
C4VEE9	fig 340184.3.peg.274	-	Cryptic L-xylulose kinase	Escherichia coli B7A.	LyxK	3	3	-	48
Q02YH8	fig 199310.1.peg.430 8	-	Cryptic L-xylulose kinase	Escherichia coli O6.	LyxK	3	2	-	48
Q03BB9	fig 364106.7.peg.403 5	-	Cryptic L-xylulose kinase	Escherichia coli (strain UTI89 / UPEC).	LyxK	3	2	-	48
Q03TX2	fig 405955.9.peg.336 9	-	L-xylulose kinase	Escherichia sp. 3_2_53FAA.	LyxK	3	2	-	48
Q0SY98	fig 71421.1.peg.989	Probable L-xylulose kinase	-	Haemophilus influenzae.	LyxK	3	3	-	48
Q0TBM0	fig 228400.4.peg.129 5	-	Carbohydrate kinase FGGY	Haemophilus somnus (strain 2336) (Histophilus somni (strain 2336)).	LyxK	3	2	-	48
Q1R512	fig 454166.6.peg.378 0	-	L-xylulose/3-keto-L- gulonate kinase	Salmonella agona (strain SL483).	LyxK	3	2	-	48
Q2GC90	fig 439843.6.peg.384 9	-	L-xylulose/3-keto-L- gulonate kinase (L- xylulokinase)	Salmonella enterica subsp. enterica serovar Schwarzengrund str. SL480.	LyxK	3	2	-	48
Q53W24	fig 290338.6.peg.421 8	-	Putative uncharacterized protein	Citrobacter koseri (strain ATCC BAA- 895 / CDC 4225-83 / SGSC4696).	LyxK	3	3	-	48
Q5WKJ2	fig 340185.3.peg.14	-	Cryptic L-xylulose kinase	Escherichia coli E22.	LyxK	3	3	-	48
Q65DK4	fig 423368.6.peg.398 7	-	L-xylulose/3-keto-L- gulonate kinase	Salmonella newport (strain SL254).	LyxK	3	2	-	48
Q739D1	fig 340186.3.peg.171 3	-	L-xylulose kinase	Escherichia coli (strain 55989 / EAEC).	LyxK	3	3	-	48
Q8CX70	fig 209261.1.peg.357 6	-	Putative L-xylulose kinase	Salmonella typhi.	LyxK	3	2	-	48
Q8FCD0	fig 550537.3.peg.372 3	-	Putative L-xylulose kinase	Salmonella enteritidis PT4 (strain P125109).	LyxK	3	2	-	48
Q8Z2C9	fig 272994.5.peg.380 2	-	L-xylulose/3-keto-L- gulonate kinase	Salmonella enterica subsp. enterica serovar Hadar str. RI_05P066.	LyxK	3	2	-	48
Q1J5E4	fig 243274.1.peg.437	-	Gluconate kinase	Thermotoga maritima.	GntK	2	2	GntK	218

Q1QVQ3	fig 224308.1.peg.401 2	Gluconokinase	-	Bacillus subtilis.	GntK	2	1	GntK	13
A2SM29	fig 198094.1.peg.531 6	-	Gluconate kinase, C-terminus	Bacillus anthracis.	GntK	2	1	-	13
A4J8E6	fig 281309.3.peg.335 0	-	Gluconate kinase (2-dehydro-3-deoxygluconokinase)	Bacillus thuringiensis (strain Al Hakam).	GntK	2	1	-	13
A4JHM8	fig 315730.5.peg.365 2	-	Gluconate kinase	Bacillus weihenstephanensis (strain KBAB4).	GntK	2	1	-	13
A4SPA7	fig 281309.3.peg.161	-	Gluconate kinase	Bacillus thuringiensis subsp. konkukian.	GntK	2	1	-	13
A6M1Y8	fig 220668.1.peg.104 4	-	Gluconokinase	Lactobacillus plantarum.	GntK	2	1	-	13
A9MI40	fig 321967.8.peg.241	-	Gluconate kinase	Lactobacillus paracasei subsp. paracasei 8700:2.	GntK	2	1	-	13
B2FI02	fig 272622.8.peg.262 1	-	Gluconate kinase	Lactococcus lactis subsp. cremoris (strain SK11).	GntK	2	1	-	13
B4SJT3	fig 261591.3.peg.392 2	-	Gluconokinase	Bacillus anthracis (strain CDC 684 / NRRL 3495).	GntK	2	1	-	13
C3KBM0	fig 222523.1.peg.337 9	-	Gluconate kinase	Bacillus cereus (strain ATCC 10987).	GntK	2	1	-	13
O51257	fig 278197.10.peg.11 96	-	Gluconate kinase	Pediococcus pentosaceus (strain ATCC 25745 / 183-1w).	GntK	2	1	-	13
P57944	fig 543734.3.peg.221	-	Gluconokinase	Lactobacillus casei (strain BL23).	GntK	2	1	-	13
Q0BC36	fig 412694.5.peg.214	-	Gluconokinase	Bacillus cereus (strain 03BB102).	GntK	2	1	-	13
Q0SNS0	fig 279010.5.peg.374 5	-	GntK	Bacillus licheniformis (strain DSM 13 / ATCC 14580).	GntK	2	1	-	13
Q13UE3	fig 416870.7.peg.245 7	-	Gluconate kinase	Lactococcus lactis subsp. cremoris (strain MG1363).	GntK	2	1	-	13
Q1BT77	fig 203120.4.peg.541	-	Gluconate kinase	Leuconostoc mesenteroides subsp. mesenteroides (strain ATCC 8293 / NCDO 523).	GntK	2	1	-	13
Q1JAF2	fig 126740.4.peg.495	-	Carbohydrate kinase FGGY	Thermotoga sp. (strain RQ2).	GntK	2	2	-	218
Q3K7I5	fig 269801.1.peg.115 2	-	Gluconate kinase	Bacillus cereus G9241.	GntK	3	1	-	13
Q48F01	fig 272623.1.peg.223 9	-	Gluconate kinase	Lactococcus lactis subsp. lactis (Streptococcus lactis).	GntK	2	1	-	13

Q49X93	fig 288681.12.peg.158	-	Gluconokinase	Bacillus cereus (strain ZK / E33L).	GntK	2	1	-	13
Q4K734	fig 269801.1.peg.135	-	Gluconate kinase	Bacillus cereus G9241.	GntK	3	1	-	13
Q4ZP17	fig 101031.3.peg.165	-	Gluconokinase	Bacillus sp. B14905.	GntK	1	1	-	13
Q63X50	fig 340099.4.peg.591	-	Carbohydrate kinase, FGGY	Thermoanaerobacter pseudethanolicus (strain ATCC 33223 / 39E)(Clostridium thermohydrosulfuricum).	GntK	3	1	-	13
Q662C3	fig 226900.1.peg.3220	-	Gluconokinase	Bacillus cereus (strain ATCC 14579 / DSM 31).	GntK	2	1	-	13
Q7P1G2	fig 280355.3.peg.2781	-	Gluconate kinase	Bacillus anthracis str. A0465.	GntK	2	1	-	13
Q83D14	fig 280477.3.peg.4500	-	Gluconate kinase	Bacillus anthracis str. A0193.	GntK	2	1	-	13
Q8Z2Y6	fig 288681.12.peg.3257	-	Gluconate kinase (2-dehydro-3-deoxygluconokinase)	Bacillus cereus (strain ZK / E33L).	GntK	2	1	-	13
A9GMQ4	fig 71421.1.peg.661	-	Glycerol kinase	Haemophilus influenzae PittHH.	GlpK	4	1	GlpK	22
B3PD59	fig 511145.6.peg.4026	-	Glycerol kinase	Escherichia coli O157:H7 str. EC508.	GlpK	6	1	GlpK	22
C4SM10	fig 226185.1.peg.1795	-	Glycerol kinase	Enterococcus faecalis TUSoD Ef11.	GlpK	2	1	GlpK	309
A0KWX5	fig 344609.3.peg.3562	Glycerol kinase	-	Shigella boydii serotype 18 (strain CDC 3083-94 / BS512).	GlpK	5	1	-	22
A0LZ79	fig 312309.3.peg.2894	Glycerol kinase	-	Vibrio fischeri (strain ATCC 700601 / ES114).	GlpK	5	2	-	22
A0RGG3	fig 243365.1.peg.251	Glycerol kinase	-	Chromobacterium violaceum.	GlpK	3	2	-	22
A1AIA2	fig 126740.4.peg.1339	-	Glycerol kinase	Thermotoga sp. (strain RQ2).	GlpK	2	1	-	22

A1JI03	fig 208964.1.peg.357 9	Glycerol kinase 2	-	<i>Pseudomonas aeruginosa</i> .	GlpK	4	2	-	22
A1RJD4	fig 434271.3.peg.395	-	Glycerol kinase	<i>Actinobacillus pleuropneumoniae</i> serotype 7 (strain AP76).	GlpK	5	2	-	22
A2RNY7	fig 391008.3.peg.355 5	Glycerol kinase	-	<i>Stenotrophomonas maltophilia</i> (strain R551-3).	GlpK	2	1	-	22
A3IAP5	fig 342451.4.peg.903	Glycerol kinase	-	<i>Staphylococcus saprophyticus</i> subsp. <i>saprophyticus</i> (strain ATCC 15305 / DSM 20229).	GlpK	3	2	-	22
A3UPP4	fig 381754.5.peg.150 6	-	Glycerol kinase	<i>Pseudomonas aeruginosa</i> (strain PA7).	GlpK	4	2	-	22
A3XLT3	fig 262727.1.peg.146 7	-	Glycerol kinase	<i>Haemophilus influenzae</i> 3655.	GlpK	4	1	-	22
A3XSV7	fig 313598.3.peg.172 7	-	Glycerol kinase	<i>Polaribacter</i> sp. MED152.	GlpK	3	1	-	22
A4BF97	fig 406561.4.peg.115 8	-	Glycerol kinase	<i>Streptococcus pneumoniae</i> SP18-BS74.	GlpK	2	1	-	22
A4CJN0	fig 374931.9.peg.133 5	-	Glycerol kinase	<i>Haemophilus influenzae</i> 22.1-21.	GlpK	8	2	-	22
A4Y756	fig 416269.5.peg.361	-	Glycerol kinase	<i>Actinobacillus pleuropneumoniae</i> serotype 5b (strain L20).	GlpK	4	3	-	22
A5EAI3	fig 183190.1.peg.124 7	Glycerol kinase	-	<i>Xylella fastidiosa</i> (strain Temecula1 / ATCC 700964).	GlpK	3	2	-	265
A5FKW1	fig 320372.3.peg.361 3	-	Glycerol kinase	<i>Burkholderia pseudomallei</i> (strain 1710b).	GlpK	3	2	-	22
A5LLM3	fig 196600.1.peg.269 2	Glycerol kinase	-	<i>Vibrio vulnificus</i> (strain YJ016).	GlpK	5	2	-	22
A5LR06	fig 412883.3.peg.366	-	Glycerol kinase	<i>Vibrio cholerae</i> MZO-3.	GlpK	5	3	-	22
A5M1U5	fig 314280.3.peg.531 7	-	Glycerol kinase	<i>Photobacterium profundum</i> 3TCK.	GlpK	5	1	-	22
A5MU04	fig 262543.4.peg.109 8	-	Glycerol kinase	<i>Exiguobacterium sibiricum</i> (strain DSM 17290 / JCM 13490 / 255-15).	GlpK	5	1	-	22
A6TBJ4	fig 272558.1.peg.109 3	Glycerol kinase	-	<i>Bacillus halodurans</i> .	GlpK	3	2	-	265
A6TD84	fig 224326.1.peg.625	Glycerol kinase	-	<i>Borrelia burgdorferi</i> (Lyme disease spirochete).	GlpK	3	2	-	22
A7FHY3	fig 381754.5.peg.150 3	-	Glycerol kinase	<i>Pseudomonas aeruginosa</i> (strain PA7).	GlpK	4	2	-	22

A8A707	fig 66692.3.peg.3363	-	Glycerol kinase	Bacillus clausii (strain KSM-K16).	GlpK	4	1	-	115
A8AL29	fig 101031.3.peg.69	-	Glycerol kinase	Bacillus sp. B14905.	GlpK	4	1	-	22
A8AP16	fig 227377.1.peg.889	Glycerol kinase	-	Coxiella burnetii.	GlpK	2	1	-	22
A8BF0	fig 418136.4.peg.209	Glycerol kinase	-	Francisella tularensis subsp. tularensis (strain WY96-3418).	GlpK	3	2	-	22
A9MZC6	fig 340099.4.peg.528	Glycerol kinase	-	Thermoanaerobacter pseudethanolicus (strain ATCC 33223 / 39E)(Clostridium thermohydrosulfuricum).	GlpK	3	2	-	115
A9N2J3	fig 349161.4.peg.2797	Glycerol kinase	-	Desulfotomaculum reducens (strain ML-1).	GlpK	4	3	-	22
A9QYS1	fig 279010.5.peg.1669	Glycerol kinase	-	Bacillus licheniformis (strain DSM 13 / ATCC 14580).	GlpK	3	2	-	115
A9VMK7	fig 195102.1.peg.2615	-	Glycerol kinase	Clostridium perfringens E str. JGS1987.	GlpK	5	1	-	22
B0GHX8	fig 314288.3.peg.430	-	Glycerol kinase	Vibrio alginolyticus 12G01.	GlpK	3	2	-	22
B0K7L5	fig 40324.1.peg.3273	Glycerol kinase	-	Stenotrophomonas maltophilia (strain K279a).	GlpK	2	1	-	22
B0PX16	fig 269482.4.peg.5988	Glycerol kinase	-	Burkholderia vietnamiensis (strain G4 / LMG 22486) (Burkholderiacepacia (strain R1808)).	GlpK	3	2	-	22
B1GK19	fig 205922.3.peg.5515	Glycerol kinase	-	Pseudomonas fluorescens (strain Pf0-1).	GlpK	3	2	-	22
B1I9X7	fig 349521.5.peg.6106	-	Glycerol kinase	Hahella chejuensis (strain KCTC 2396).	GlpK	4	1	-	22
B1JQ85	fig 314232.3.peg.2627	-	Glycerol kinase	Loktanella vestfoldensis SKA53.	GlpK	2	1	-	22
B1L950	fig 190304.1.peg.318	Glycerol kinase	-	Fusobacterium nucleatum subsp. nucleatum.	GlpK	2	1	-	22
B1S255	fig 314290.3.peg.1506	-	Glycerol kinase	Vibrio sp. MED222.	GlpK	3	2	-	22
B1S281	fig 406558.4.peg.25	-	Glycerol kinase	Streptococcus pneumoniae SP9-BS68.	GlpK	2	1	-	22
B1YE68	fig 391009.4.peg.651	-	Glycerol kinase	Thermosiphon melanesiensis (strain B1429 / DSM 12029).	GlpK	2	1	-	22
B1YKL3	fig 439842.7.peg.3882	-	Glycerol kinase	Salmonella enterica subsp. enterica serovar Kentucky str. CDC 191.	GlpK	5	1	-	22

B2DHW6	fig 290338.6.peg.257 7	Glycerol kinase	-	Citrobacter koseri (strain ATCC BAA-895 / CDC 4225-83 / SGSC4696).	GlpK	6	1	-	22
B2DUN0	fig 208963.3.peg.111 8	-	Glycerol kinase	Pseudomonas aeruginosa (strain LESB58).	GlpK	4	2	-	22
B2GE12	fig 246194.3.peg.237 8	Glycerol kinase	-	Carboxydotherrmus hydrogenoformans (strain Z-2901 / DSM 6008).	GlpK	4	3	-	265
B2K4K8	fig 416870.7.peg.109 8	-	GlpK protein	Lactococcus lactis subsp. cremoris (strain MG1363).	GlpK	7	2	-	22
B2UN37	fig 379731.4.peg.161 2	-	Glycerol kinase	Pseudomonas stutzeri (strain A1501).	GlpK	4	2	-	22
B3BFS9	fig 418127.4.peg.119 5	Glycerol kinase	-	Staphylococcus aureus (strain Mu3 / ATCC 700698).	GlpK	3	2	-	22
B3DTJ7	fig 222523.1.peg.112 0	Glycerol kinase	-	Bacillus cereus (strain ATCC 10987).	GlpK	3	2	-	265
B3HBT3	fig 204669.6.peg.298 5	Glycerol kinase	-	Acidobacteria bacterium (strain Ellin345).	GlpK	4	1	-	22
B3HPH9	fig 441952.3.peg.234	Glycerol kinase	-	Francisella tularensis subsp. mediasiatica (strain FSC147).	GlpK	3	2	-	22
B3HTS7	fig 272562.1.peg.147 9	Glycerol kinase	-	Clostridium acetobutylicum.	GlpK	5	2	-	22
B3HY55	fig 316275.9.peg.362 3	Glycerol kinase	-	Aliivibrio salmonicida (strain LF11238) (Vibrio salmonicida (strain LF11238)).	GlpK	5	2	-	22
B3I5Y6	fig 314724.3.peg.234	-	Glycerol kinase	Borrelia turicatae (strain 91E135).	GlpK	3	2	-	22
B3IHB1	fig 282458.1.peg.120 5	Glycerol kinase	-	Staphylococcus aureus (strain MRSA252).	GlpK	3	2	-	22
B3IQ43	fig 269483.3.peg.748 7	-	Glycerol kinase	Burkholderia sp. (strain 383) (Burkholderia cepacia (strain ATCC 17760/ NCIB 9086 / R18194)).	GlpK	4	2	-	22
B3IQX1	fig 557723.7.peg.105 0	-	Glycerol kinase	Haemophilus parasuis serovar 5 (strain SH0165).	GlpK	5	1	-	22
B3W8Q2	fig 216595.1.peg.747 5	Glycerol kinase	-	Pseudomonas fluorescens (strain SBW25).	GlpK	3	2	-	22
B3WR88	fig 388396.7.peg.347 9	Glycerol kinase	-	Vibrio fischeri (strain MJ11).	GlpK	5	2	-	22
B3X839	fig 370553.3.peg.140 4	Glycerol kinase	-	Streptococcus pyogenes serotype M12 (strain MGAS2096).	GlpK	2	1	-	309

B3XIM5	fig 343509.6.peg.4788	-	Glycerol kinase	Sodalis glossinidius (strain morsitans).	GlpK	5	2	-	22
B3YJZ6	fig 41514.4.peg.3400	Glycerol kinase	-	Salmonella arizonae (strain ATCC BAA-731 / CDC346-86 / RSK2980).	GlpK	5	1	-	22
B4BKR7	fig 585034.4.peg.4025	Glycerol kinase	-	Escherichia coli O8 (strain IA1).	GlpK	6	1	-	22
B4F166	fig 390874.10.peg.1375	-	Glycerol kinase	Thermotoga petrophila (strain RKU-1 / ATCC BAA-488 / DSM 13995).	GlpK	2	1	-	22
B4T4X2	fig 220341.1.peg.3356	Glycerol kinase	-	Salmonella typhi.	GlpK	5	1	-	22
B4TGN4	fig 339671.5.peg.1576	-	Glycerol kinase	Actinobacillus succinogenes (strain ATCC 55618 / 130Z).	GlpK	4	1	-	22
B4TPQ8	fig 487214.3.peg.2311	Glycerol kinase	-	Streptococcus pneumoniae (strain Hungary19A-6).	GlpK	2	1	-	115
B5BJG7	fig 66692.3.peg.924	-	Glycerol kinase	Bacillus clausii (strain KSM-K16).	GlpK	4	1	-	115
B5C7K8	fig 273036.3.peg.1482	Glycerol kinase	-	Staphylococcus aureus (strain bovine RF122 / ET3-1).	GlpK	3	2	-	22
B5CBW6	fig 406563.4.peg.807	-	Glycerol kinase	Streptococcus pneumoniae SP23-BS72.	GlpK	2	1	-	22
B5F0M8	fig 453363.3.peg.1184	-	Glycerol kinase	Streptococcus pneumoniae CDC1873-00.	GlpK	2	1	-	115
B5F4S4	fig 264730.3.peg.4170	Glycerol kinase	-	Pseudomonas syringae pv. phaseolicola (strain 1448A / Race 6).	GlpK	3	2	-	22
B5FTY2	fig 272843.1.peg.1447	Glycerol kinase	-	Pasteurella multocida.	GlpK	4	3	-	22
B5MMZ8	fig 314230.3.peg.1516	-	Glycerol kinase	Blastopirellula marina DSM 3645.	GlpK	2	1	-	22
B5MV63	fig 314292.13.peg.2707	-	Glycerol kinase	Photobacterium angustum (strain S14 / CCUG 15956) (Vibrio sp. (strain S14 / CCUG 15956)).	GlpK	3	2	-	22
B5NMB4	fig 208964.1.peg.3582	Glycerol kinase 1	-	Pseudomonas aeruginosa.	GlpK	4	2	-	22
B5NTQ5	fig 279808.3.peg.2592	Glycerol kinase	-	Staphylococcus haemolyticus (strain JCSC1435).	GlpK	3	2	-	22
B5P7I0	fig 313594.3.peg.1540	-	Glycerol kinase	Polaribacter irgensii 23-P.	GlpK	3	2	-	22

B6J5X8	fig 198094.1.peg.955	Glycerol kinase	-	Bacillus anthracis.	GlpK	3	2	-	265
B7L9G0	fig 406557.4.peg.226 7	-	Glycerol kinase	Streptococcus pneumoniae CDC1087-00.	GlpK	3	1	-	115
B7MLC4	fig 406560.4.peg.133 7	-	Glycerol kinase	Streptococcus pneumoniae SP14-BS69.	GlpK	2	1	-	22
B7NP64	fig 370554.3.peg.149 2	Glycerol kinase	-	Streptococcus pyogenes serotype M4 (strain MGAS10750).	GlpK	3	1	-	309
B7NUA2	fig 484022.4.peg.104 5	Glycerol kinase	-	Francisella philomiragia subsp. philomiragia (strain ATCC 25017).	GlpK	3	2	-	115
B7UHL9	fig 340186.3.peg.123 0	-	Glycerol kinase	Escherichia coli E110019.	GlpK	5	1	-	22
B7ULC5	fig 220668.1.peg.311	Glycerol kinase 1	-	Lactobacillus plantarum.	GlpK	5	2	-	309
C0Q3L3	fig 467705.8.peg.609	Glycerol kinase	-	Streptococcus gordonii (strain Challis / ATCC 35105 / CH1 / DL1 / V288).	GlpK	2	1	-	115
C1EU16	fig 313596.3.peg.177 6	-	Glycerol kinase	Robiginitalea biformata (strain ATCC BAA-864 / HTCC2501 / KCTC 12146).	GlpK	3	1	-	22
C3LJZ6	fig 435591.10.peg.17 29	Glycerol kinase	-	Parabacteroides distasonis (strain ATCC 8503 / DSM 20701 / NCTC11152).	GlpK	3	2	-	22
C3SWV3	fig 99287.1.peg.3940	Glycerol kinase	-	Salmonella typhimurium.	GlpK	5	1	-	22
C4B4W2	fig 266264.4.peg.263 6	-	Glycerol kinase	Ralstonia metallidurans (strain CH34 / ATCC 43123 / DSM 2839).	GlpK	3	1	-	265
C4IWD3	fig 196620.1.peg.118 3	Glycerol kinase	-	Staphylococcus aureus (strain MW2).	GlpK	3	2	-	265
C4S052	fig 286636.1.peg.142 9	Glycerol kinase	-	Streptococcus pyogenes serotype M6.	GlpK	3	1	-	309
C4S4W9	fig 345072.3.peg.166 3	Glycerol kinase	-	Vibrio cholerae.	GlpK	5	3	-	22
C4S6A1	fig 326442.4.peg.347 6	-	Putative glycerol kinase	Pseudoalteromonas haloplanktis (strain TAC 125).	GlpK	3	2	-	22
C4SAH6	fig 338187.4.peg.242 2	Glycerol kinase	-	Vibrio harveyi (strain ATCC BAA-1116 / BB120).	GlpK	3	2	-	22

C4SC56	fig 198466.1.peg.1468	Glycerol kinase	-	Streptococcus pyogenes serotype M3.	GlpK	2	1	-	309
C4SS63	fig 399739.6.peg.3233	Glycerol kinase	-	Pseudomonas mendocina (strain ymp).	GlpK	3	1	-	22
C4STW2	fig 223926.1.peg.2386	Glycerol kinase	-	Vibrio parahaemolyticus.	GlpK	3	2	-	22
C4T286	fig 186103.1.peg.1395	Glycerol kinase	-	Streptococcus pyogenes serotype M18.	GlpK	3	1	-	309
C4T5B8	fig 208963.3.peg.1115	-	Putative glycerol kinase	Pseudomonas aeruginosa (strain UCBPP-PA14).	GlpK	4	2	-	22
C4T6J3	fig 101031.3.peg.804	-	Glycerol kinase	Bacillus sp. B14905.	GlpK	4	2	-	22
C4X272	fig 278197.10.peg.1429	Glycerol kinase	-	Pediococcus pentosaceus (strain ATCC 25745 / 183-1w).	GlpK	4	1	-	309
C5F6I2	fig 205918.4.peg.4340	Glycerol kinase	-	Pseudomonas syringae pv. syringae (strain B728a).	GlpK	3	2	-	22
P21939	fig 349968.3.peg.2516	-	Glycerol kinase	Yersinia bercovieri ATCC 43970.	GlpK	5	1	-	22
P39211	fig 349124.5.peg.78	Glycerol kinase	-	Halorhodospira halophila (strain DSM 244 / SL1) (Ectothiorhodospira halophila (strain DSM 244 / SL1)).	GlpK	2	1	-	22
P44991	fig 630.2.peg.98	-	Glycerol kinase	Yersinia enterocolitica serotype O:8 / biotype 1B (strain 8081).	GlpK	5	1	-	22
P57928	fig 349965.3.peg.2953	-	Glycerol kinase	Yersinia intermedia ATCC 29909.	GlpK	5	1	-	22
Q02VU6	fig 351746.4.peg.1100	Glycerol kinase	-	Pseudomonas putida (strain F1 / ATCC 700007).	GlpK	3	2	-	22
Q03DS8	fig 298386.1.peg.2471	-	Putative ATP:glycerol 3-phosphotransferase (Glycerokinase)(GK)	Photobacterium profundum (Photobacterium sp. (strain SS9)).	GlpK	5	1	-	22
Q03EH2	fig 290398.4.peg.2121	Glycerol kinase	-	Chromohalobacter salexigens (strain DSM 3043 / ATCC BAA-138 / NCIMB13768).	GlpK	1	1	-	22
Q03HQ2	fig 314565.3.peg.388	Glycerol kinase	-	Xanthomonas campestris pv. campestris (strain 8004).	GlpK	3	2	-	265
Q03PR3	fig 289380.14.peg.2479	Glycerol kinase	-	Clostridium perfringens (strain SM101 / Type A).	GlpK	5	2	-	265
Q03XW0	fig 266117.6.peg.975	-	Glycerol kinase	Rubrobacter xylanophilus (strain DSM 9941 / NBRC 16129).	GlpK	2	1	-	265

Q03YQ6	fig 89187.3.peg.1225	-	Glycerol kinase	Roseovarius nubinhibens ISM.	GlpK	2	1	-	22
Q04H58	fig 316273.3.peg.591	Glycerol kinase	-	Xanthomonas campestris pv. vesicatoria (strain 85-10).	GlpK	3	2	-	265
Q04I07	fig 357804.5.peg.2985	Glycerol kinase	-	Psychromonas ingrahamii (strain 37).	GlpK	3	1	-	22
Q0HIR7	fig 550537.3.peg.4131	Glycerol kinase	-	Salmonella paratyphi A (strain AKU_12601).	GlpK	5	1	-	22
Q0HV69	fig 374930.8.peg.1737	Glycerol kinase	-	Haemophilus influenzae (strain PittEE).	GlpK	7	3	-	22
Q15PG1	fig 315730.5.peg.1465	-	Glycerol kinase	Bacillus cereus AH621.	GlpK	3	2	-	265
Q1BG91	fig 243231.1.peg.2744	Glycerol kinase	-	Geobacter sulfurreducens.	GlpK	2	1	-	265
Q1CEB3	fig 235909.3.peg.209	Glycerol kinase	-	Geobacillus kaustophilus.	GlpK	3	1	-	115
Q1M8S5	fig 367830.3.peg.820	Glycerol kinase	-	Staphylococcus aureus (strain NCTC 8325).	GlpK	3	2	-	265
Q1YZX9	fig 557722.3.peg.1500	-	Probable carbohydrate kinase	Pseudomonas aeruginosa (strain LESB58).	GlpK	4	2	-	22
Q21MP5	fig 585057.4.peg.3176	Glycerol kinase	-	Escherichia coli O7:K1 (strain IAI39 / ExPEC).	GlpK	6	1	-	22
Q2S6Z4	fig 314271.3.peg.3568	-	Glycerol kinase	Rhodobacterales bacterium HTCC2654.	GlpK	3	1	-	22
Q32A69	fig 391774.5.peg.375	Glycerol kinase	-	Desulfovibrio vulgaris subsp. vulgaris (strain DP4).	GlpK	5	2	-	22
Q32CB5	fig 399741.3.peg.4775	-	Glycerol kinase	Serratia proteamaculans (strain 568).	GlpK	5	1	-	22
Q3IVW9	fig 282459.1.peg.1227	Glycerol kinase	-	Staphylococcus aureus (strain MSSA476).	GlpK	3	2	-	265
Q3YV72	fig 420246.5.peg.1187	-	Glycerol kinase	Geobacillus sp. G11MC16.	GlpK	3	1	-	115
Q3YY54	fig 388919.8.peg.1620	Glycerol kinase	-	Streptococcus sanguinis (strain SK36).	GlpK	3	1	-	22
Q48RX6	fig 405955.9.peg.3694	-	Glycerol kinase	Escherichia coli (strain UTI89 / UPEC).	GlpK	5	1	-	22

Q4MUX7	fig 36873.1.peg.5233	Glycerol kinase	-	Burkholderia xenovorans (strain LB400).	GlpK	3	2	-	22
Q4MXU4	fig 290434.1.peg.339	Glycerol kinase	-	Borrelia garinii.	GlpK	3	2	-	22
Q5PEK8	fig 220664.3.peg.306	Glycerol kinase	-	Pseudomonas fluorescens (strain Pf-5 / ATCC BAA-477).	GlpK	4	2	-	22
Q5PLM7	fig 48935.1.peg.3229	-	Glycerol kinase	Novosphingobium aromaticivorans (strain DSM 12444).	GlpK	3	1	-	265
Q5WCJ3	fig 393115.8.peg.138	Glycerol kinase	-	Francisella tularensis subsp. tularensis.	GlpK	3	2	-	22
Q5WIL1	fig 399742.4.peg.3849	Glycerol kinase	-	Enterobacter sp. (strain 638).	GlpK	5	1	-	22
Q5XAJ9	fig 155864.1.peg.4863	-	Glycerol kinase	Escherichia coli O1:K1 / APEC.	GlpK	5	1	-	22
Q638K2	fig 331271.3.peg.6140	Glycerol kinase	-	Burkholderia cenocepacia (strain AU 1054).	GlpK	2	1	-	22
Q63H40	fig 320390.3.peg.2705	Glycerol kinase	-	Burkholderia pseudomallei (Pseudomonas pseudomallei).	GlpK	3	2	-	22
Q65CW4	fig 339670.3.peg.434	Glycerol kinase	-	Burkholderia ambifaria (strain ATCC BAA-244 / AMMD) (Burkholderiacepacia (strain AMMD)).	GlpK	3	2	-	22
Q65Q24	fig 262543.4.peg.718	-	Glycerol kinase	Exiguobacterium sibiricum (strain DSM 17290 / JCM 13490 / 255-15).	GlpK	5	2	-	115
Q663Y2	fig 321967.8.peg.655	-	Glycerol kinase	Lactobacillus casei (strain ATCC 334).	GlpK	4	2	-	309
Q6DB06	fig 300852.3.peg.2129	-	Glycerol kinase	Thermus thermophilus (strain HB8 / ATCC 27634 / DSM 579).	GlpK	2	1	-	265
Q6HPK8	fig 290402.34.peg.4428	Glycerol kinase	-	Clostridium beijerinckii (strain ATCC 51743 / NCIMB 8052) (Clostridiumacetobutylicum).	GlpK	5	2	-	22
Q6I4N1	fig 176279.3.peg.254	Glycerol kinase	-	Staphylococcus epidermidis (strain ATCC 12228).	GlpK	3	2	-	22
Q6LUX7	fig 272623.1.peg.1281	Glycerol kinase	-	Lactococcus lactis subsp. lactis (Streptococcus lactis).	GlpK	6	2	-	309
Q6LVI8	fig 313603.3.peg.2550	-	Glycerol kinase	Flavobacteriales bacterium HTCC2170.	GlpK	3	2	-	22
Q734J8	fig 382245.6.peg.2531	Glycerol kinase	-	Aeromonas salmonicida (strain A449).	GlpK	5	2	-	22

Q81B23	fig 195103.9.peg.275 5	-	Glycerol kinase	<i>Clostridium perfringens</i> NCTC 8239.	GlpK	6	2	-	22
Q83EH5	fig 269799.3.peg.199 3	Glycerol kinase	-	<i>Geobacter metallireducens</i> (strain GS-15 / ATCC 53774 / DSM 7210).	GlpK	2	1	-	265
Q88S82	fig 221109.1.peg.247 4	Glycerol kinase	-	<i>Oceanobacillus ihayensis</i> .	GlpK	3	2	-	265
Q88XF6	fig 420662.8.peg.344 5	Glycerol kinase	-	<i>Methylobium petroleiphilum</i> (strain PM1).	GlpK	2	1	-	22
Q88ZF1	fig 584.1.peg.1407	-	Glycerol kinase	<i>Proteus mirabilis</i> (strain HI4320).	GlpK	5	1	-	22
Q89QA4	fig 155920.1.peg.114 4	-	Glycerol kinase	<i>Xylella fastidiosa</i> subsp. <i>sandyi</i> Ann-1.	GlpK	3	2	-	265
Q8CZH7	fig 272622.8.peg.162 9	-	Glycerol kinase	<i>Lactococcus lactis</i> subsp. <i>cremoris</i> (strain SK11).	GlpK	6	2	-	309
Q8E794	fig 349746.3.peg.293 9	-	Glycerol kinase	<i>Yersinia pseudotuberculosis</i> serotype O:3 (strain YPIII).	GlpK	6	1	-	22
Q8FCE4	fig 208435.1.peg.272	Glycerol kinase	-	<i>Streptococcus agalactiae</i> serotype III.	GlpK	3	1	-	309
Q8FX21	fig 405532.4.peg.931	Glycerol kinase	-	<i>Bacillus cereus</i> (strain ATCC 14579 / DSM 31).	GlpK	3	2	-	265
Q8XNL6	fig 150340.3.peg.367	-	Glycerol kinase	<i>Vibrio</i> sp. (strain Ex25).	GlpK	3	2	-	22
Q8Z2B7	fig 319701.3.peg.180 5	Glycerol kinase	-	<i>Streptococcus pyogenes</i> serotype M28.	GlpK	2	1	-	309
Q8Z2V4	fig 315750.5.peg.795	-	Glycerol kinase	<i>Bacillus pumilus</i> (strain SAFR-032).	GlpK	3	2	-	115
Q97JE2	fig 218495.3.peg.131 5	Glycerol kinase	-	<i>Streptococcus uberis</i> (strain ATCC BAA-854 / 0140J).	GlpK	3	1	-	265
Q97N88	fig 88888881.3.peg.2 620	-	Glycerol kinase	<i>Vibrio cholerae</i> 1587.	GlpK	5	3	-	22
Q9CDN5	fig 390236.5.peg.302	Glycerol kinase	-	<i>Borrelia afzelii</i> (strain PKo).	GlpK	3	2	-	22
Q9CG64	fig 349966.3.peg.332 3	-	Glycerol kinase	<i>Yersinia frederiksenii</i> ATCC 33641.	GlpK	5	1	-	22
Q9RK00	fig 314291.3.peg.404 1	-	Glycerol kinase	<i>Vibrio splendidus</i> 12B01.	GlpK	3	2	-	22
Q9WXX1	fig 313593.3.peg.178 6	-	Glycerol kinase	<i>Leeuwenhoekella blandensis</i> MED217.	GlpK	3	2	-	22
Q9WYS4	fig 246195.3.peg.210	Glycerol kinase	-	<i>Dichelobacter nodosus</i> (strain VCS1703A).	GlpK	3	2	-	22

B6ER09	fig 83333.1.peg.2759	L-fuculokinase	-	Escherichia coli (strain K12).	FucK	3	3	FucK	124
C1Z4Y4	fig 171101.1.peg.2172	-	L-fuculose kinase FucK, putative	Streptococcus pneumoniae serotype 2 (strain D39 / NCTC 7466).	FucK	3	2	FucK	100
A3CPV3	fig 272994.5.peg.3090	-	Putative uncharacterized protein	Salmonella paratyphi B (strain ATCC BAA-1250 / SPB7).	FucK	3	3	-	124
A4IW85	fig 454166.6.peg.3047	-	L-fuculokinase	Salmonella agona (strain SL483).	FucK	3	3	-	124
A4WG72	fig 272620.3.peg.3157	-	L-fuculokinase	Klebsiella pneumoniae subsp. pneumoniae (strain ATCC 700721 / MGH78578).	FucK	3	3	-	124
A5UE44	fig 349741.3.peg.1944	-	L-fuculokinase	Akkermansia muciniphila (strain ATCC BAA-835).	FucK	2	1	-	124
A7N1R1	fig 155864.1.peg.3666	-	L-fuculokinase	Escherichia coli.	FucK	3	3	-	124
A8AL00	fig 439843.6.peg.3147	-	L-fuculokinase	Salmonella enterica subsp. enterica serovar Schwarzengrund str. SL480.	FucK	3	3	-	124
B2SF32	fig 290338.6.peg.3495	-	Putative uncharacterized protein	Citrobacter koseri (strain ATCC BAA-895 / CDC 4225-83 / SGSC4696).	FucK	3	3	-	124
B2TWC2	fig 439842.7.peg.2718	-	L-fuculokinase	Salmonella enterica subsp. enterica serovar Kentucky str. CVM29188.	FucK	3	3	-	124
B5BJK3	fig 99287.1.peg.2872	-	L-fuculokinase	Salmonella heidelberg (strain SL476).	FucK	3	3	-	124
B5ET10	fig 216593.1.peg.1270	-	L-fuculokinase	Escherichia coli O127:H6 (strain E2348/69 / EPEC).	FucK	3	3	-	124
B7M6X7	fig 220341.1.peg.2762	L-fuculokinase	-	Salmonella typhi.	FucK	3	3	-	124
B7NU81	fig 550538.3.peg.3066	-	L-fuculokinase	Salmonella dublin (strain CT_02021853).	FucK	3	3	-	124
C1Q0P5	fig 170187.1.peg.2028	-	Putative L-fuculose kinase fucK	Streptococcus pneumoniae.	FucK	3	2	-	100

C1RTJ4	fig 406559.4.peg.1306	-	D-alanine--poly(Phosphoribitol) ligase subunit 2	Streptococcus pneumoniae SP11-BS70.	FucK	3	2	-	100
C1U043	fig 453362.3.peg.1376	-	Rhamnulokinase (Rhamnulose kinase)	Streptococcus pneumoniae CDC1873-00.	FucK	3	2	-	100
C1W5M4	fig 453364.8.peg.1218	-	Rhamnulokinase (Rhamnulose kinase)	Streptococcus pneumoniae CDC0288-04.	FucK	3	2	-	100
C1Z7E3	fig 406563.4.peg.788	-	L-fucose kinase fucK, putative	Streptococcus pneumoniae SP23-BS72.	FucK	3	2	-	100
C4BFM5	fig 406557.4.peg.932	-	L-fucose kinase FucK, putative	Streptococcus pneumoniae SP6-BS73.	FucK	3	2	-	100
C4CLB0	fig 453365.3.peg.1417	-	Rhamnulokinase (Rhamnulose kinase)	Streptococcus pneumoniae (strain Hungary19A-6).	FucK	3	2	-	100
C4EMX7	fig 1313.3.peg.1747	-	D-alanine--poly(Phosphoribitol) ligase subunit 2	Streptococcus pneumoniae SP9-BS68.	FucK	4	1	-	100
C4EWK3	fig 195102.1.peg.380	-	Rhamnulokinase	Clostridium perfringens.	FucK	2	2	-	100
Q51390	fig 405955.9.peg.2580	-	L-fuculokinase	Escherichia coli O45:K1 (strain S88 / ExPEC).	FucK	3	3	-	124
Q5E0Z0	fig 216598.1.peg.49	-	L-fuculokinase	Shigella dysenteriae serotype 1 (strain Sd197).	FucK	3	2	-	124
Q5NIE5	fig 554290.7.peg.2999	-	L-fucose kinase	Salmonella paratyphi A.	FucK	3	3	-	124
Q7MI93	fig 340186.3.peg.4322	-	L-fuculokinase	Escherichia coli E110019.	FucK	3	3	-	124
Q87M72	fig 340197.3.peg.1264	-	L-fuculokinase	Escherichia coli F11.	FucK	3	3	-	124
Q8ZKP3	fig 423368.6.peg.3277	-	L-fuculokinase	Salmonella newport (strain SL254).	FucK	3	3	-	124
Q9KLJ9	fig 216599.1.peg.1785	-	L-fuculokinase	Shigella sonnei (strain Ss046).	FucK	3	3	-	124
A7FP69	fig 262698.3.peg.2303	-	EryA, erythritol kinase	Brucella abortus str. 2308 A.	EryA	2	2	EryA	85
A4W567	fig 288000.5.peg.3260	-	Putative carbohydrate kinase	Bradyrhizobium sp. (strain BTAi1 / ATCC BAA-1182).	EryA	2	2	-	85

A5EGP3	fig 470137.3.peg.826	-	Putative uncharacterized protein	Brucella suis (strain ATCC 23445 / NCTC 10510).	EryA	2	2	-	85
A6VWG3	fig 430066.3.peg.382	-	Carbohydrate kinase, FGGY	Brucella abortus (strain 2308).	EryA	1	1	-	85
A8G7W7	fig 224914.1.peg.2490	-	Erythritol kinase	Brucella melitensis.	EryA	2	2	-	85
B1IZM8	fig 114615.3.peg.4624	-	Putative carbohydrate kinase (Xylulose/erythritol kinase, lyx/eryA-like)	Bradyrhizobium sp. (strain ORS278).	EryA	2	2	-	85
B1X8I0	fig 266834.1.peg.3529	-	Erythritol kinase	Rhizobium meliloti (Sinorhizobium meliloti).	EryA	3	2	-	85
B3AWW2	fig 314269.3.peg.1569	-	Putative sugar kinase	Manganese-oxidizing bacterium (strain SI85-9A1).	EryA	4	2	-	85
B4F2W7	fig 375451.6.peg.3381	-	FGGY family of carbohydrate kinases	Roseobacter denitrificans (strain ATCC 33942 / OCh 114) (Erythrobactersp. (strain OCh 114)) (Roseobacter denitrificans).	EryA	3	2	-	85
Q1YJN8	fig 204722.1.peg.2941	-	Erythritol kinase	Brucella suis.	EryA	2	2	-	85
Q38DF2	fig 266835.1.peg.5725	-	Xylulose kinase	Rhizobium loti (Mesorhizobium loti).	EryA	3	3	-	85
A4N0H8	fig 224308.1.peg.2882	Ribulokinase	-	Bacillus subtilis.	AraB	2	2	AraB	228
A5IKC5	fig 243274.1.peg.280	-	Sugar kinase, FGGY family	Thermotoga maritima.	AraB	2	1	AraB	94
B2U269	fig 316407.3.peg.63	Ribulokinase	-	Escherichia coli (strain K12).	AraB	3	2	AraB	11
C4BF18	fig 99287.1.peg.101	Ribulokinase	-	Salmonella enterica subsp. enterica serovar 4,[5],12:i:-str.CVM23701.	AraB	2	2	AraB	11
A2P9H6	fig 205913.1.peg.935	-	Putative L-ribulokinase	Bifidobacterium longum (strain DJO10A).	AraB	2	2	-	222
A2RK83	fig 279010.5.peg.2761	-	Sugar kinase, possible xylulose kinase	Bacillus licheniformis (strain DSM 13 / ATCC 14580).	AraB	4	2	-	222
A3MZ93	fig 279010.5.peg.3375	Ribulokinase	-	Bacillus licheniformis (strain DSM 13 / ATCC 14580).	AraB	4	2	-	228
A4NC34	fig 220668.1.peg.2892	-	L-ribulokinase (Putative)	Lactobacillus plantarum.	AraB	2	2	-	222
A4NMV6	fig 203123.5.peg.222	-	L-ribulokinase (Putative)	Oenococcus oeni (strain BAA-331 / PSU-1).	AraB	2	2	-	222
A4W6G7	fig 349747.3.peg.649	Ribulokinase	-	Yersinia pseudotuberculosis serotype O:1b (strain IP 31758).	AraB	4	2	-	11
A6V1L0	fig 334390.3.peg.1712	-	Sugar kinase	Lactobacillus fermentum (strain IFO 3956 / LMG 18251).	AraB	2	2	-	222
A7ZHF4	fig 331111.3.peg.2635	Ribulokinase	-	Escherichia coli O139:H28 (strain E24377A / ETEC).	AraB	3	2	-	11

A8AVX5	fig 373384.10.peg.67	Ribulokinase	-	<i>Shigella flexneri</i> serotype 5b (strain 8401).	AraB	4	2	-	11
A9MYN9	fig 502800.3.peg.1973	Ribulokinase	-	<i>Yersinia pseudotuberculosis</i> serotype IB (strain PB1/+).	AraB	4	2	-	11
B0K754	fig 411154.5.peg.661	Ribulokinase	-	<i>Gramella forsetii</i> (strain KT0803).	AraB	2	2	-	11
B0TWZ7	fig 585034.4.peg.64	Ribulokinase	-	<i>Escherichia coli</i> O8 (strain IA1).	AraB	3	2	-	11
B1I9Z6	fig 344609.3.peg.4672	Ribulokinase	-	<i>Shigella boydii</i> serotype 18 (strain CDC 3083-94 / BS512).	AraB	3	2	-	11
B1XB71	fig 314283.3.peg.1782	Ribulokinase	-	<i>Reinekea blandensis</i> MED297.	AraB	2	2	-	11
B4SU24	fig 295319.3.peg.193	Ribulokinase	-	<i>Salmonella paratyphi</i> A (strain AKU_12601).	AraB	2	2	-	11
B4TJ60	fig 272994.5.peg.106	Ribulokinase	-	<i>Salmonella paratyphi</i> B (strain ATCC BAA-1250 / SPB7).	AraB	3	2	-	11
B5BL44	fig 550537.3.peg.106	Ribulokinase	-	<i>Salmonella enteritidis</i> PT4 (strain P125109).	AraB	2	2	-	11
B5F784	fig 399742.4.peg.665	Ribulokinase	-	<i>Enterobacter</i> sp. (strain 638).	AraB	3	2	-	11
B5FPP4	fig 203122.12.peg.770	Ribulokinase	-	<i>Saccharophagus degradans</i> (strain 2-40 / ATCC 43961 / DSM 17024).	AraB	3	2	-	11
B5R1U0	fig 223926.1.peg.4754	Ribulokinase	-	<i>Vibrio parahaemolyticus</i> .	AraB	3	3	-	11
B5RGD4	fig 209261.1.peg.105	Ribulokinase	-	<i>Salmonella typhi</i> .	AraB	2	2	-	11
B7L414	fig 198214.1.peg.56	Ribulokinase	-	<i>Shigella flexneri</i> .	AraB	2	2	-	11
B7M0F8	fig 340185.3.peg.4269	Ribulokinase	-	<i>Escherichia coli</i> B171.	AraB	5	2	-	11
B7MI36	fig 498211.3.peg.2903	Ribulokinase	-	<i>Cellvibrio japonicus</i> (strain Ueda107) (<i>Pseudomonas fluorescens</i> subsp. <i>cellulosa</i>).	AraB	3	3	-	11
B7UIA9	fig 216593.1.peg.3514	Ribulokinase	-	<i>Escherichia coli</i> O127:H6 (strain E2348/69 / EPEC).	AraB	3	2	-	11
C0T3B0	fig 439851.5.peg.201	Ribulokinase	-	<i>Salmonella gallinarum</i> (strain 287/91 / NCTC 13346).	AraB	2	2	-	11
C0V0B3	fig 454166.6.peg.150	Ribulokinase	-	<i>Salmonella agona</i> (strain SL483).	AraB	3	2	-	11

C1QV7	fig 454169.6.peg.203	Ribulokinase	-	Salmonella heidelberg (strain SL476).	AraB	2	2	-	11
C1RPJ6	fig 349968.3.peg.295 1	Ribulokinase	-	Yersinia bercovieri ATCC 43970.	AraB	3	2	-	11
C1UX26	fig 349966.3.peg.314 1	Ribulokinase	-	Yersinia frederiksenii ATCC 33641.	AraB	3	2	-	11
C1W0X2	fig 349967.3.peg.418	Ribulokinase	-	Yersinia mollaretii ATCC 43969.	AraB	3	2	-	11
C1WJY8	fig 439842.7.peg.450 4	Ribulokinase	-	Salmonella enterica subsp. enterica serovar Kentucky str. CDC 191.	AraB	3	2	-	11
C4DF67	fig 423368.6.peg.266	Ribulokinase	-	Salmonella newport (strain SL254).	AraB	3	2	-	11
O66131	fig 376686.6.peg.111 4	Ribulokinase	-	Flavobacterium johnsoniae (strain ATCC 17061 / DSM 2064 / UW101)(Cytophaga johnsonae).	AraB	2	2	-	11
P08204	fig 300268.10.peg.24 5	Ribulokinase	-	Shigella boydii serotype 4 (strain Sb227).	AraB	3	2	-	11
P11553	fig 351745.7.peg.182 6	-	L-ribulokinase	Shewanella sp. (strain W3-18-1).	AraB	3	2	-	11
P12011	fig 60481.10.peg.188 8	Ribulokinase	-	Shewanella sp. (strain MR-7).	AraB	3	2	-	11
P18157	fig 319224.13.peg.18 88	Ribulokinase	-	Shewanella putrefaciens (strain CN-32 / ATCC BAA-453).	AraB	3	2	-	11
P58541	fig 405955.9.peg.54	Ribulokinase	-	Escherichia coli (strain UTI89 / UPEC).	AraB	3	2	-	11
P58542	fig 377628.5.peg.203 5	Ribulokinase	-	Yersinia pestis biovar Antiqua str. UG05-0454.	AraB	4	2	-	11
Q0T8D4	fig 344610.3.peg.432 8	Ribulokinase	-	Escherichia coli 101-1.	AraB	3	2	-	11
Q1RGD6	fig 340184.3.peg.286 2	Ribulokinase	-	Escherichia coli (strain 55989 / EAEC).	AraB	3	2	-	11
Q1VF74	fig 203120.4.peg.837	-	L-ribulokinase (Putative)	Leuconostoc mesenteroides subsp. mesenteroides (strain ATCC 8293 / NCDO 523).	AraB	3	2	-	222
Q1ZSC2	fig 221109.1.peg.280 1	-	Hypothetical conserved protein	Oceanobacillus iheyensis.	AraB	2	2	-	222
Q2NQX8	fig 387344.13.peg.16 37	-	L-ribulokinase (Putative)	Lactobacillus brevis (strain ATCC 367 / JCM 1170).	AraB	2	2	-	222

Q326H2	fig 199310.1.peg.71	Ribulokinase	-	Escherichia coli O6.	AraB	3	2	-	11
Q39D66	fig 272562.1.peg.1501	-	Sugar kinase, possible xylulose kinase	Clostridium acetobutylicum.	AraB	3	3	-	222
Q3JVT4	fig 278197.10.peg.146	-	L-ribulokinase (Putative)	Pediococcus pentosaceus (strain ATCC 25745 / 183-1w).	AraB	2	2	-	222
Q5L091	fig 313593.3.peg.3518	-	Ribulokinase	Leeuwenhoekiella blandensis MED217.	AraB	2	2	-	11
Q65M11	fig 448385.11.peg.3058	-	Ribulokinase	Sorangium cellulosum (strain So ce56) (Polyangium cellulosum (strainSo ce56)).	AraB	2	2	-	11
Q6DA23	fig 94122.5.peg.2132	Ribulokinase	-	Shewanella sp. (strain ANA-3).	AraB	3	2	-	11
Q6M8P0	fig 390874.10.peg.630	-	Carbohydrate kinase, FGGY	Thermotoga petrophila (strain RKU-1 / ATCC BAA-488 / DSM 13995).	AraB	2	1	-	94
Q83IU3	fig 60480.16.peg.1879	Ribulokinase	-	Shewanella sp. (strain MR-4).	AraB	3	2	-	11
Q83MG5	fig 340186.3.peg.4032	Ribulokinase	-	Escherichia coli E110019.	AraB	3	2	-	11
Q87FK5	fig 155864.1.peg.67	Ribulokinase	-	Escherichia coli O157:H7.	AraB	3	2	-	11
Q8FL88	fig 340197.3.peg.4346	Ribulokinase	-	Escherichia coli F11.	AraB	3	2	-	11
Q9WX53	fig 313596.3.peg.1965	Ribulokinase	-	Robiginitalea biformata (strain ATCC BAA-864 / HTCC2501 / KCTC 12146).	AraB	2	2	-	11
A4YX95	-	-	D-xylulokinase	Candida sp. Xu316.	-	-	-	XylB	87
Q0SY84	-	-	D-xylulokinase	Pichia stipitis (Yeast).	-	-	-	XylB	29
Q2GAC0	-	Xylulose kinase	-	Lactobacillus pentosus.	-	-	-	XylB	342
B8F5S3	-	-	Ribulokinase	Klebsiella pneumoniae subsp. pneumoniae (strain ATCC 700721 / MGH78578).	-	-	-	RbtK	25
A1SZE1	-	Glycerol kinase	-	Bacillus subtilis.	-	-	-	GlpK	115
A1WT61	-	Glycerol kinase	-	Thermus aquaticus.	-	-	-	GlpK	115
A7ZTB1	-	-	Glycerol kinase, glycosomal	Trypanosoma brucei.	-	-	-	GlpK	76
Q0I345	-	Glycerol kinase 2	-	Thermotoga maritima.	-	-	-	GlpK	265
Q31U85	-	Glycerol kinase	-	Thermus thermophilus.	-	-	-	GlpK	115
B7VAK0	-	-	L-ribulokinase	Corynebacterium glutamicum (Brevibacterium flavum).	-	-	-	AraB	222