

Table S5 Characteristics of the production of amino acids from acetate for different calculation schemes. For a description see Table S.

AS	Acetate								
	Manual			LP standard			LP unlimited energy		
	Yield (mol/mol)	ATP Cons.	Carb. Yield	Yield (mol/mol)	ATP Cons.	Carb. Yield	Yield (mol/mol)	ATP Cons.	Carb. Yield
Ala	0.50	-1	0.75	0.50	1.00	0.75	0.50	1.00	0.75
Arg	0.27	5	0.81	0.25	0.00	0.74	0.33	-7.50	1.00
Asn	0.47	1	0.93	0.47	0.00	0.95	0.50	-0.75	1.00
Asp	0.50	-1	1.00	0.50	0.25	1.00	0.50	0.25	1.00
Cys	0.32	8	0.48	0.27	0.00	0.40	0.50	-12.25	0.75
Glu	0.33	-2	0.83	0.33	0.75	0.83	0.33	0.75	0.83
Gln	0.33	-1	0.83	0.33	1.75	0.83	0.33	1.75	0.83
Gly	0.50	-2	0.50	0.71	0.00	0.71	1.00	-3.50	1.00
His	0.19	7.67	0.57	0.22	0.00	0.66	0.30	-13.25	0.90
Ile	0.21	6	0.62	0.20	0.00	0.60	0.25	-7.00	0.75
Leu	0.20	-5	0.60	0.20	3.25	0.60	0.20	3.25	0.60
Lys	0.22	4	0.66	0.21	0.00	0.64	0.25	-4.75	0.75
Met	0.19	17	0.47	0.16	0.00	0.41	0.50	-35.00	1.25
Phe	0.14	2.33	0.64	0.14	0.00	0.64	0.15	-2.75	0.68
Pro	0.29	3	0.73	0.29	0.00	0.71	0.33	-3.50	0.83
Ser	0.50	-2	0.75	0.50	1.25	0.75	0.50	1.25	0.75
Thr	0.37	5	0.74	0.35	0.00	0.70	0.50	-6.00	1.00
Trp	0.11	6	0.62	0.12	0.00	0.65	0.13	-3.25	0.69
Tyr	0.15	0.33	0.67	0.15	0.00	0.66	0.15	-1.00	0.68
Val	0.25	-2	0.63	0.25	2.25	0.63	0.25	2.25	0.63