Questions

1 **During lactic fermentation, pyruvic acid is:**

A reduced
B oxidised
C decarboxylated
D phosphorylated
E dephosphorylated

2 **Which of the following statements about glycolysis is correct?**

A Triose phosphate isomerase catalyses the conversion of dihydroxyacetone phosphate to 1,3-bisphosphoglycerate
B When a molecule of glucose is converted to pyruvate in glycolysis, 2 NAD^+ are reduced
C Phosphofructokinase catalyses the conversion of fructose 1,6-bisphosphate to dihydroxyacetone phosphate
D When a molecule of glucose is converted to pyruvate in glycolysis, CO_2 is produced
E In the first part, $FADH_2$ is formed

3 **Each acetyl-CoA molecule that enters the Krebs cycle produces:**

A 1 NADH, 3 $FADH_2$, 1 GTP and 2 molecules of CO_2
B 3 NADH, 1 $FADH_2$, 1 GTP and 3 molecules of CO_2
C 3 NADH, 1 $FADH_2$, 1 GTP and 2 molecules of CO_2
D 3 NADH, 1 $FADH_2$, 2 GTP and 3 molecules of CO_2
E 2 NADH, 2 $FADH_2$, 2 GTP and 2 molecules of CO_2

4 **Oxidative phosphorylation is a metabolic pathway:**

A through which the amino group resulting from the degradation of amino acids is eliminated
B through which fatty acids are broken down by removing two carbon atoms at a time
C which represents the final stage of the anabolism of amino acids, carbohydrates, and fatty acids
D through which the energy stored in reduced coenzymes is used for the synthesis of ATP
E through which fatty acid synthesis occurs

5 **Cytochromes are:**

A present in the respiratory chain
B transporters of hydrogen atoms in the respiratory chain
C enzymes that synthesize ATP
D inhibitors of oxidative phosphorylation
E cofactors of glycolysis

Solutions

Question	Answer	Question	Answer	Question	Answer	Question	Answer	Question	Answer	Question	Answer	Question	Answer	Question	Answer	Question	Answer	Question	Answer
1	A	2	B	3	C	4	D	5	A	6	E	7	E	8	B	9	D	10	D
11	C	12	E	13	C	14	D	15	A	16	C	17	E	18	A	19	B	20	B
21	C	22	C	23	A	24	A	25	E	26	A	27	B	28	D	29	A	30	B
31	C	32	C	33	D	34	D	35	E	36	D	37	A	38	E	39	D	40	A
41	C	42	D	43	A	44	E	45	A	46	B	47	C	48	E	49	B	50	B
51	C	52	B	53	B	54	B	55	A	56	E	57	C	58	E	59	A	60	D
61	C	62	D	63	B	64	E	65	A	66	D	67	C	68	D	69	B	70	E
71	C	72	B	73	C	74	A	75	E	76	E	77	D	78	B	79	E	80	C
81	A	82	D	83	E	84	E	85	C	86	C	87	D	88	C	89	C	90	A
91	D	92	D	93	A	94	E	95	A	96	B	97	B	98	C	99	A	100	D
101	C	102	D	103	B	104	B	105	B	106	D	107	C	108	C	109	D	110	B
111	E	112	C	113	B	114	C	115	C	116	C	117	D	118	D	119	E	120	A
121	A	122	B	123	E	124	B	125	E	126	B	127	B	128	C	129	D	130	C
131	E	132	C	133	E	134	E	135	B	136	E	137	C	138	A	139	A	140	A
141	B	142	C	143	D	144	C	145	E	146	C	147	D	148	E	149	A	150	A
151	A	152	C	153	A	154	D	155	A	156	C	157	B	158	B	159	D	160	E
161	A	162	B	163	C	164	E	165	B	166	D	167	E	168	D	169	A	170	D
171	A	172	E	173	E	174	D	175	A	176	C	177	D	178	B	179	A	180	E
181	E	182	E	183	C	184	A	185	B	186	E	187	C	188	D	189	E	190	B
191	D	192	C	193	A	194	E	195	D	196	C	197	A	198	A	199	A	200	C