NTP Study Number: 075148

Study Result: Positive

Experiment Number: **075148**

Test Type: **Genetic Toxicology - Bacterial Mutagenicity**

G06: Ames Summary Data

Test Compound: **Ethylene glycol diethyl ether**

CAS Number: **629-14-1**

Date Report Requested: **09/11/2018**

Time Report Requested: **00:30:50**

Strain: TA100

Dose (ug/Plate)	Without S9	Without S9	With 10% Rat S9	With 30% Rat S9	With 10% Hamster S9
Vehicle Control[1]	111 ± 1.2	105 ± 6.3	106 ± 2.6	124 ± 9.4	138 ± 17.5
100.0	102 ± 4.2	93 ± 5.2	105 ± 3.2	149 ± 5.5	118 ± 6.3
333.0	108 ± 3.9	99 ± 6.7	105 ± 5.4	130 ± 4.4	127 ± 1.0
1000.0	101 ± 9.9	93 ± 8.1	106 ± 6.4	118 ± 3.9	121 ± 9.5
3333.0	100 ± 2.9	97 ± 1.5	102 ± 7.0	147 ± 5.7	150 ± 0.3
10000.0	102 ± 5.5	116 ± 4.6	103 ± 3.8	142 ± 3.2	125 ± 5.8
Trial Summary	Negative	Negative	Negative	Negative	Negative
Positive Control[2]					321 ± 18.5
Positive Control[3]	565 ± 37.2	536 ± 26.8			
Positive Control[4]			897 ± 68.9		
Positive Control[5]					
Positive Control[6]				1461 ± 52.3	

Experiment Number: **075148**

Test Type: **Genetic Toxicology - Bacterial Mutagenicity**

G06: Ames Summary Data

Test Compound: **Ethylene glycol diethyl ether**

CAS Number: **629-14-1**

Date Report Requested: **09/11/2018**

Time Report Requested: **00:30:50**

Strain: TA100

Dose (ug/Plate)	With 30% Hamster S9
Vehicle Control[1]	128 ± 4.6
100.0	158 ± 1.8
333.0	151 ± 2.9
1000.0	161 ± 10.2
3333.0	162 ± 5.2
10000.0	128 ± 8.2
Trial Summary	Negative
Positive Control[2]	
Positive Control[3]	
Positive Control[4]	
Positive Control[5]	1097 ± 16.8
Positive Control[6]	

Experiment Number: **075148**

Test Type: **Genetic Toxicology - Bacterial Mutagenicity**

G06: Ames Summary Data

Test Compound: **Ethylene glycol diethyl ether**

CAS Number: **629-14-1**

Date Report Requested: **09/11/2018**

Time Report Requested: **00:30:50**

Strain: TA1535

Dose (ug/Plate)	Without S9	Without S9	With 10% Rat S9	With 30% Rat S9	With 10% Hamster S9
Vehicle Control[1]	12 ± 2.2	8 ± 1.8	9 ± 2.3	16 ± 3.8	6 ± 1.0
Vehicle Control[7]					
100.0	11 ± 2.5	9 ± 3.8	11 ± 2.7	12 ± 1.2	12 ± 0.3
333.0	9 ± 1.2	7 ± 2.2	12 ± 1.2	15 ± 2.3	10 ± 1.3
1000.0	12 ± 2.0	9 ± 1.5	10 ± 2.4	13 ± 1.5	11 ± 2.1
3333.0	11 ± 3.3	13 ± 0.7	12 ± 1.7	13 ± 0.9	8 ± 1.2
10000.0	12 ± 1.5	9 ± 1.9	13 ± 3.5	9 ± 1.2	12 ± 0.7
Trial Summary	Negative	Negative	Negative	Negative	Negative
Positive Control[2]					49 ± 3.2
Positive Control[3]	338 ± 22.2	348 ± 15.4			
Positive Control[5]					
Positive Control[6]			143 ± 12.7	99 ± 13.5	

Strain: TA1535

Dose (ug/Plate)	With 10% Hamster S9	With 30% Hamster S9
Vehicle Control[1]		11 ± 3.5
Vehicle Control[7]	10 ± 1.3	
100.0	10 ± 0.9	8 ± 2.6
333.0	13 ± 0.9	17 ± 2.3
1000.0	10 ± 3.8	11 ± 1.5
3333.0	13 ± 0.3	14 ± 0.3
10000.0	9 ± 1.8	11 ± 0.6
Trial Summary	Negative	Negative
Positive Control[2]	41 ± 3.5	
Positive Control[3]		
Positive Control[5]		72 ± 3.6
Positive Control[6]		

Strain: TA1537

Dose (ug/Plate)	Without S9
Vehicle Control[1]	6 ± 0.3
100.0	6 ± 1.2
333.0	4 ± 0.6
1000.0	4 ± 1.7
3333.0	6 ± 0.3
10000.0	5 ± 0.9
Trial Summary	Negative
Positive Control[8]	82 ± 1.8

Experiment Number: **075148**

Test Type: **Genetic Toxicology - Bacterial Mutagenicity**

G06: Ames Summary Data

Test Compound: **Ethylene glycol diethyl ether**

CAS Number: **629-14-1**

Date Report Requested: **09/11/2018**

Time Report Requested: **00:30:50**

Strain: TA97

Dose (ug/Plate)	Without S9	Without S9	Without S9	Without S9	Without S9
Vehicle Control[1]	125 ± 3.9	104 ± 6.2	122 ± 10.7	108 ± 4.9	124 ± 0.6
100.0	118 ± 4.3	102 ± 4.3	154 ± 13.9		
333.0	111 ± 1.9	100 ± 5.2	145 ± 4.5		
500.0					
667.0					
1000.0	127 ± 3.2	104 ± 5.5	121 ± 1.2	119 ± 9.0	130 ± 6.7
3333.0	129 ± 8.5	109 ± 3.8	118 ± 5.3	134 ± 5.0	207 ± 14.6
5000.0				192 ± 10.4	312 ± 18.7
6667.0				190 ± 11.3	282 ± 1.8
10000.0	231 ± 7.8	177 ± 8.0	191 ± 8.8	224 ± 20.2	279 ± 3.5[s]
Trial Summary	Equivocal	Equivocal	Equivocal	Positive	Positive
Positive Control[4]					
Positive Control[6]					
Positive Control[9]	440 ± 29.5	884 ± 29.3	773 ± 22.5	361 ± 72.2	722 ± 27.1

Experiment Number: **075148**

Test Type: **Genetic Toxicology - Bacterial Mutagenicity**

G06: Ames Summary Data

Test Compound: **Ethylene glycol diethyl ether**

CAS Number: **629-14-1**

Date Report Requested: **09/11/2018**

Time Report Requested: **00:30:50**

Strain: TA97

Dose (ug/Plate)	With 10% Rat S9	With 30% Rat S9	With 10% Hamster S9	With 30% Hamster S9
Vehicle Control[1]	158 ± 7.4	208 ± 0.9	157 ± 7.6	154 ± 4.7
100.0	155 ± 15.6	203 ± 4.7	154 ± 7.4	162 ± 5.6
333.0	163 ± 4.2	209 ± 5.9	130 ± 3.3	165 ± 12.9
500.0				
667.0				
1000.0	138 ± 9.4	194 ± 11.9	163 ± 1.9	161 ± 6.7
3333.0	131 ± 4.5	213 ± 12.0	152 ± 0.6	159 ± 4.3
5000.0				
6667.0				
10000.0	169 ± 3.8	216 ± 11.2	148 ± 5.3	155 ± 7.1
Trial Summary	Negative	Negative	Negative	Negative
Positive Control[4]			985 ± 50.1	
Positive Control[6]	2358 ± 55.1	713 ± 4.0		1461 ± 48.6
Positive Control[9]				

Experiment Number: **075148**

Test Type: **Genetic Toxicology - Bacterial Mutagenicity**

G06: Ames Summary Data

Test Compound: **Ethylene glycol diethyl ether**

CAS Number: **629-14-1**

Date Report Requested: **09/11/2018**

Time Report Requested: **00:30:50**

Strain: TA98

Dose (ug/Plate)	Without S9	Without S9	With 10% Rat S9	With 30% Rat S9	With 10% Hamster S9
Vehicle Control[1]	20 ± 1.5	11 ± 0.9	18 ± 1.5	27 ± 2.3	25 ± 3.5
100.0	16 ± 2.3	16 ± 2.2	21 ± 0.3	26 ± 2.9	18 ± 0.9
333.0	11 ± 0.9	14 ± 1.8	22 ± 2.9	33 ± 2.5	16 ± 4.9
1000.0	18 ± 1.2	13 ± 3.2	25 ± 3.2	29 ± 0.9	23 ± 2.4
3333.0	21 ± 2.6	15 ± 1.7	24 ± 4.6	24 ± 2.4	20 ± 4.0
10000.0	22 ± 2.7	17 ± 1.3	19 ± 3.4	26 ± 1.0	26 ± 4.3
Trial Summary	Negative	Negative	Negative	Negative	Negative
Positive Control[2]			280 ± 4.9		277 ± 11.3
Positive Control[10]	380 ± 7.8	350 ± 16.3			
Positive Control[5]				742 ± 10.2	

Strain: TA98

Dose (ug/Plate)	With 30% Hamster S9
Vehicle Control[1]	30 ± 3.0
100.0	30 ± 2.2
333.0	28 ± 4.2
1000.0	35 ± 3.0
3333.0	27 ± 3.2
10000.0	38 ± 1.9
Trial Summary	Negative
Positive Control[2]	
Positive Control[10]	
Positive Control[5]	952 ± 26.9

LEGEND

Values given as Mean or Mean ± Standard Error Mean
The number of samples = 3, unless samples marked toxic or contaminated were excluded from mean and SEM calculations
CAS Number = Chemical Abstracts Service registry number
1: Vehicle Control: Dimethyl Sulfoxide
2: 0.4 ug/Plate 2-Aminoanthracene
3: 0.5 ug/Plate Sodium Azide
4: 0.75 ug/Plate 2-Aminoanthracene
5: 1.0 ug/Plate 2-Aminoanthracene
6: 2.0 ug/Plate 2-Aminoanthracene
7: Vehicle Control: Water
8: 4.0 ug/Plate 9-Aminoacridine
9: 24.0 ug/Plate 9-Aminoacridine
10: 1.0 ug/Plate 4-Nitro-O-Phenylenediamine
s: Slight Toxicity

** END OF REPORT **