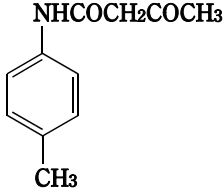


[N-アセトアセチル-p-トルイジン]

Chemical Name; N-Acetoacetyl-p-toluidine
 Synonym ; p-Acetoacetotoluidide
N-(4-Methylphenyl)-3-oxobutanamide
4-Methylacetoacetanilide
p-アセトアセトトルイジド
N-(4-メチルフェニル)-3-オキソブタナミド
4-メチルアセトアセトアニリド

Molecular Weight ; 191.23
 Melting Point ; 94 - 96 °C
 Boiling Point ; - °C
 Flashing Point ; - °C
 Molecular Formula; C₁₁H₁₃N₂O₂

Chemical Structure



CAS No. ; 2415-85-2
 MITI No. ; (3)-204
 ML No. ; -
 Specified Chemical Substances; -

Source of Substance; Tokyo Kasei Kogyo Co., Ltd.
 Lot No. ; AW11
 Purity ; 99.8 %

Vehicle ; DMSO

Conc. µg/plate	Number of Revertants/plate									
	Base-substitution						Frame-shift			
	TA100		TA1535		WP2uvrA		TA98		TA1537	
	S9-	S9+	S9-	S9+	S9-	S9+	S9-	S9+	S9-	S9+
DMSO	(155)	(164)	(12)	(21)	(27)	(40)	(23)	(24)	(12)	(11)
	165	170	21	15	32	31	14	26	10	9
	190	159	8	20	25	40	20	30	11	9
0.0763	(178)	(165)	(15)	(18)	(29)	(36)	(17)	(28)	(11)	(9)
	164	179	25	15	30	37	25	36	7	13
	157	193	11	14	44	44	18	28	7	15
0.305	(161)	(186)	(18)	(15)	(37)	(41)	(22)	(32)	(7)	(14)
	159	160	24	17	41	43	23	21	11	11
	187	157	10	17	32	33	25	22	6	13
1.22	(173)	(159)	(17)	(17)	(37)	(38)	(24)	(22)	(9)	(12)
	194	170	7	15	25	29	15	17	13	15
	176	194	23	20	16	37	20	25	10	15
4.88	(185)	(182)	(15)	(18)	(21)	(33)	(18)	(21)	(12)	(15)
	171	164	21	14	44	39	14	30	6	14
	149	169	17	16	24	34	15	28	6	7
19.5	(160)	(167)	(19)	(15)	(34)	(37)	(15)	(29)	(6)	(11)
	172	180	22	15	37	39	20	29	15	7
	199	179	13	20	43	44	17	21	6	15
78.1	(186)	(180)	(18)	(18)	(40)	(42)	(19)	(25)	(11)	(11)
	153	165	20	16	33	61	22	15	10	11
	162	166	21	15	41	53	18	24	13	6
313	(158)	(166)	(21)	(16)	(37)	(57)	(20)	(20)	(12)	(9)
	184	152	14	14	37	68	16	17	9	11
	166	157	11	17	46	64	21	23	8	8
1250	(175)	(155)	(13)	(16)	(42)	(66)	(19)	(20)	(9)	(10)
	0*	0*	0*	0*	0*	0*	0*	0*	0*	0*
	0*	0*	0*	0*	0*	0*	0*	0*	0*	0*
5000	(0*)	(0*)	(0*)	(0*)	(0*)	(0*)	(0*)	(0*)	(0*)	(0*)
Judgement	-	-	-	-	-	-	-	-	-	-
Specific Mutagenicity										
Positive Control	AF-2 (928)	2-AA (1229)	NaN ₃ (353)	2-AA (243)	AF-2 (180)	2-AA (934)	AF-2 (450)	2-AA (318)	9-AA (481)	2-AA (179)

Mutagenicity in Bacterial Test ; **Positive**

IARC Evaluation ; not yet cited

Conc. µg/plate	Number of Revertants/plate									
	Base-substitution						Frame-shift			
	TA100		TA1535		WP2uvrA		TA98		TA1537	
	S9-	S9+	S9-	S9+	S9-	S9+	S9-	S9+	S9-	S9+
DMSO	(153)	(162)	(11)	(14)	(22)	(28)	(20)	(20)	(7)	(6)
	176	167	11	15	21	33	20	29	3	2
	146	201	8	14	32	24	16	31	6	8
78.1	(161)	(184)	(10)	(15)	(27)	(29)	(18)	(30)	(5)	(5)
	158	174	5	17	26	36	13	14	3	6
	149	171	5	8	37	31	14	30	6	5
156	(154)	(173)	(5)	(13)	(32)	(34)	(14)	(22)	(5)	(6)
	191	176	10	16	29	40	10	23	3	2
	142	176	8	7	15	44	11	17	7	3
313	(167)	(176)	(9)	(12)	(22)	(42)	(11)	(20)	(5)	(3)
	133	152	8	8	28	36	17	21	7	3
	141	157	11	7	31	34	18	24	3	6
625	(137)	(155)	(10)	(8)	(30)	(35)	(18)	(23)	(5)	(5)
	172	160	7	8	30	38	15	24	5	2
	170	152	9	9	44	43	17	16	6	8
1250	(171)	(156)	(8)	(9)	(37)	(41)	(16)	(20)	(6)	(5)
	157	141	14	11	30	49	20	17	3	10
	165	192	7	6	34	33	18	24	6	7
2500	(161)	(167)	(11)	(9)	(32)	(41)	(19)	(21)	(5)	(9)
	0*	0*	0*	0*	20*	29*	10*	0*	0*	5*
	0*	0*	0*	0*	10*	30*	6*	8*	0*	0*
5000	(0*)	(0*)	(0*)	(0*)	(15*)	(30*)	(8*)	(4*)	(0*)	(3*)
Judgement	-	-	-	-	-	-	-	-	-	-
Specific Mutagenicity										
Positive Control	AF-2 (748)	2-AA (1045)	NaN ₃ (389)	2-AA (235)	AF-2 (137)	2-AA (999)	AF-2 (548)	2-AA (273)	9-AA (392)	2-AA (122)

Experimental Data - 3

Conc. µg/plate	Number of Revertants/plate					
	Base-substitution					
	TA102		TA104		WP2uvrA/pKM101	
	S9-	S9+	S9-	S9+	S9-	S9+
DMSO	(259)	(398)	(400)	(475)	(90)	(138)
	254	391	487	493	89	119
	242	396	391	516	60	112
0.0763	(248)	(394)	(439)	(505)	(75)	(116)
	226	394	402	455	72	108
	252	405	450	487	82	142
0.305	(239)	(400)	(426)	(471)	(77)	(125)
	278	418	413	511	97	119
	236	358	423	494	94	113
1.22	(257)	(388)	(418)	(503)	(96)	(116)
	258	401	434	507	79	106
	248	379	439	497	72	112
4.88	(253)	(390)	(437)	(502)	(76)	(109)
	311	385	450	529	92	151
	230	410	456	580	92	142
19.5	(271)	(398)	(453)	(555)	(92)	(147)
	266	383	499	609	120	192
	246	374	489	546	109	160
78.1	(256)	(379)	(494)	(578)	(115)	(176)
	212	350	582	645	156	227
	225	364	623	682	155	192
313	(219)	(357)	(603)	(664)	(156)	(210)
	236	379	595	741	180	235
	211	336	630	843	184	246
1250	(224)	(358)	(613)	(792)	(182)	(241)
	0*	89*	0*	413*	0*	78*
	0*	84*	0*	330*	0*	91*
5000	(0*)	(87*)	(0*)	(372*)	(0*)	(85*)
Judgement	-	-	-	-	+	-
Specific Mutagenicity	73.6					
Positive Control	BLM (877)	2-AA (1890)	PA (1408)	2-AA (758)	AF-2 (2026)	2-AA (1018)

Experimental Data - 4

(B9301-3/3)

Conc. µg/plate	Number of Revertants/plate					
	Base-substitution					
	TA102		TA104		WP2uvrA/pKM101	
	S9-	S9+	S9-	S9+	S9-	S9+
DMSO	(234)	(318)	(358)	(479)	(78)	(107)
	240	301	451	483	100	141
	279	324	467	516	93	163
78.1	(260)	(313)	(459)	(500)	(97)	(152)
	230	291	499	556	141	151
	250	332	496	600	135	172
156	(240)	(312)	(498)	(578)	(138)	(162)
	252	319	538	654	144	205
	227	334	513	636	156	181
313	(240)	(327)	(526)	(645)	(150)	(193)
	225	319	649	703	155	215
	209	305	645	699	158	227
625	(217)	(312)	(647)	(701)	(157)	(221)
	213	293	555	809	171	238
	252	312	542	798	177	227
1250	(233)	(303)	(549)	(804)	(174)	(233)
	181	276	566	776	179	208
	201	274	555	817	174	192
2500	(191)	(275)	(561)	(797)	(177)	(200)
	0*	0*	0*	0*	17*	96*
	0*	0*	0*	0*	52*	107*
5000	(0*)	(0*)	(0*)	(0*)	(35*)	(102*)
Judgement	-	-	-	-	+	+
Specific Mutagenicity	126					
Positive Control	BLM (740)	2-AA (1859)	PA (1482)	2-AA (1017)	AF-2 (1376)	2-AA (1001)