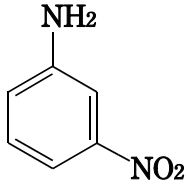
Chemical Name; m-Nitroaniline
Synonym ; 3-Nitroaniline
3-Nitrobenzenamine
C.I. Azoic Diazo Component 7
C.I. 37030
3-ニトロアニリン
3-ニトロベンゼナミン
アゾイック DC 7

Molecular Weight ; 138.13
Melting Point ; 114 ℃ [CHCD,Merck]
112 - 114 ℃[Aldrich]
Boiling Point ; 306 ℃ [Merck]
Flashing Point ; — ℃
Molecular Formula; $C_6H_6N_2O_2$

Chemical Structure



CAS No. ; 99-09-2
MITI No. ; (3)-392 , (5)-4676
ML No. ; —
Specified Chemical Substances; —

Source of Substance; Tokyo Kasei Kogyo Co.,Ltd.
Lot No. ; FHA01
Purity ; 99.9 %

Vehicle ; DMSO

Judgement for
Chromosomal Aberration in CHL ; **Positive**

IARC Evaluation ; Group 2B

Exprimental Data without Metabolic Activation

Treatment Substance	Time (h)	Concentration (mg/ml)	No. of Metaphase	Polyploid (%)	Judgement	Cell with Structural Chromosome Aberration (%) Gap	Chromatid CTB	Chromatid CTE	Chromosome CSB	Chromosome CSE	Total −G	Total +G	Judgement
DMSO	24		200	1.0	−	0.0	1.0	0.0	0.0	0.0	1.0	1.0	−
	48		200	0.0	−	0.0	0.0	0.0	0.0	0.0	0.0	0.0	−
Test Chemical	24	0.1	200	3.0	−	0.0	0.5	1.0	0.0	0.0	1.5	1.5	−
		0.2	200	2.0	−	0.0	0.0	1.5	0.0	0.0	1.5	1.5	−
		0.4	200	1.0	−	0.5	0.0	2.5	0.0	0.0	2.5	3.0	−
		0.6 *	200	0.5	−	0.5	1.5	3.0	0.0	0.0	4.5	5.0	±
		0.8 *	200	1.0	−	1.0	1.5	3.5	0.0	0.0	4.5	5.5	±
	48	0.1	200	6.0	±	0.0	0.0	1.5	0.0	0.0	1.5	1.5	−
		0.2	200	11.0	+	1.0	0.0	1.0	0.0	0.5	1.5	2.0	−
		0.4	200	12.5	+	1.0	2.0	2.0	0.0	0.5	5.0	5.5	±
		0.6 *				No observation for metaphase							
		0.8 *				No observation for metaphase							
Positive Control [MMC]	24	0.00004	200	1.0	−	1.0	7.5	17.5	0.0	0.0	22.5	23.0	+
	48	0.00004	200	1.5	−	1.0	11.5	30.0	0.0	0.5	36.5	37.0	+

* Test chemical was precipitated.

※ There was no observation for metaphase with both treatment of 24Hr and 48Hr at 1.0 mg/ml.

Exprimental Data with Metabolic Activation

Treatment			No. of Metaphase	Polyploid (%)	Judge-ment	Cell with Structural Chromosome Aberration (%)							
							Chromatid		Chromosome		Total		
Substance	S9 mix	Concent-ration (mg/ml)				Gap	CTB	CTE	CSB	CSE	−G	+G	Judge-ment
DMSO	−		200	1.5	−	0.0	1.0	0.5	0.0	0.0	1.5	1.5	−
	+		200	2.0	−	0.0	0.5	0.5	0.0	0.0	1.0	1.0	−
Test Chemical	−	0.3	200	3.0	−	0.0	0.5	0.0	0.0	0.0	0.5	0.5	−
		0.6 *	200	8.5	±	0.0	0.0	0.0	0.0	0.0	0.0	0.0	−
		1.2 *	200	0.5	−	0.0	0.0	4.5	0.0	0.0	4.5	4.5	−
		1.8 *	200	0.5	−	0.5	4.5	6.0	0.0	0.0	8.5	8.5	±
		2.4 *	200	2.5	−	1.5	2.5	6.0	0.0	0.0	8.0	8.5	±
	+	0.3	200	1.5	−	0.0	0.5	0.0	0.0	0.0	0.5	0.5	−
		0.6 *	200	8.5	±	0.0	0.5	0.5	0.0	0.5	1.5	1.5	−
		1.2 *	200	1.5	−	0.5	0.5	2.5	0.0	0.0	3.0	3.0	−
		1.8 *	200	1.0	−	1.0	3.0	5.5	0.0	0.0	7.5	7.5	±
		2.4 *	200	3.5	−	0.0	1.0	4.5	0.0	0.0	5.5	5.5	±
Positive Control [B(a)P]	−	0.01	200	2.0	−	0.0	0.5	0.5	0.0	0.0	1.0	1.0	−
	+	0.01	200	2.0	−	0.5	5.0	18.5	0.0	0.0	21.0	21.0	+

* Test chemical was precipitated.