



Government of India
Ministry of Environment, Forest and Climate Change
(Impact Assessment Division)

To,

The -1

GHARDA CHEMICALS LIMITED

Plot No. C-393 to C-396, Saykha GIDC Estate, Tal: Vagra, Dist.: Bharuch - 392140 (Gujarat), Bharuch, Gujarat-392140

Subject: Grant of Environmental Clearance (EC) to the proposed Project Activity under the provision of EIA Notification 2006-regarding

Sir/Madam,

This is in reference to your application for Environmental Clearance (EC) in respect of project submitted to the Ministry vide proposal number IA/GJ/IND3/417731/2023 dated 10 Mar 2023. The particulars of the environmental clearance granted to the project are as below.

- | | |
|--|--|
| 1. EC Identification No. | EC23A017GJ174749 |
| 2. File No. | J-11011/09/2016-IA.II(I) |
| 3. Project Type | Expansion |
| 4. Category | A |
| 5. Project/Activity including Schedule No. | 5(b) Pesticides industry and pesticide specific intermediates (excluding formulations) |
| 6. Name of Project | M/s. Gharda Chemicals Ltd. proposes expansion of Agrochemicals (Pesticides) & Organic Chemicals Manufacturing in Existing Unit (from 22750 MTPA to 77450 MTPA) located at Plot No. C-393 to C-396, Sayakha GIDC Estate, Tal: Vagra, Dist: Bharuch – 392 140 (Gujarat). |
| 7. Name of Company/Organization | GHARDA CHEMICALS LIMITED |
| 8. Location of Project | Gujarat |
| 9. TOR Date | N/A |

The project details along with terms and conditions are appended herewith from page no 2 onwards.

Date: 12/05/2023

(e-signed)
Mr. Motipalli Ramesh
Scientist E
IA - (Industrial Projects - 3 sector)

Note: A valid environmental clearance shall be one that has EC identification number & E-Sign generated from PARIVESH. Please quote identification number in all future correspondence.

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F. No. J-11011/09/2016-IA-II (I)
Government of India
Ministry of Environment, Forest and Climate Change
(Impact Assessment Division)

Indira Paryavaran Bhawan,
Jorbagh Road,
New Delhi - 110003

Dated: 12th May, 2023

To

M/s. Gharda Chemicals Ltd.
Plot No. C-393 to C-396,
Saykha GIDC Estate, Tal: Vagra,
Dist.: Bharuch - 392140 (Gujarat)
Email: neeraj.garg@gharda.com

Subject: Proposed Expansion of Agrochemicals (Pesticides) & Organic Chemicals Manufacturing in Existing Unit (from 22750 MTPA to 77450 MTPA) located at Plot No. C-393 to C-396, Sayakha GIDC Estate, Taluka Vagra, District Bharuch, Gujarat by M/s. Gharda Chemicals Ltd. - Consideration of Environmental Clearance

Sir,

This has reference to your proposal No. **IA/GJ/IND3/417731/2023**, on the above subject matter.

2. The Ministry of Environment, Forest and Climate Change has examined the proposal for Environmental Clearance to the project for Expansion of Agrochemicals (Pesticides) & Organic Chemicals Manufacturing in Existing Unit (from 22750 MTPA to 77450 MTPA) located at Plot No. C-393 to C-396, Sayakha GIDC Estate, Taluka Vagra, District Bharuch, Gujarat by M/s. Gharda Chemicals Ltd.

3. The project/activity is covered under Category 'A' of item 5(b)- Pesticides and 5(f) - Synthetic Organic Chemicals of Schedule of EIA Notification, 2006 (as amended) and requires appraisal at Central Level by the EAC.

4. The standard ToR has been issued by Ministry vide letter no. IA- J-11011/09/2016-IA II (I) dated 30.9.2020. The PP submitted that Unit is located in Sayakha GIDC Estate. Which falls in PCPIR region. EC of PCPIR Region was obtained File no. 21-49/2010-IA-III dated 14th September, 2017 so the Public Hearing (PH) is exempted as per para 7 (i) Stage III (3)(i)(b) of the EIA notification, 2006. The PP applied for Environment Clearance on 14.2.2023 in CAF and submitted EIA/EMP Report and other documents. The PP reported in Form that it is an **Expansion EC**. Due to some shortcomings, the proposal was referred back to PP on 2.3.2023 and the reply for the same has been submitted on 10.3.2023. The proposal was placed in 49th EAC Meeting held on 3, 5-6 April, 2023, wherein the PP and an accredited consultant, M/s. Aqua-Air Environmental Engineers Pvt. Ltd. [Accreditation number – NABET/EIA/2023/IA0062, Valid up to 7.10.2023] made a detailed presentation on the salient features of the project. The information submitted by the PP is as follows:

5. The PP reported that the total 75,410.29 m² (Existing – 75,410.29 m² + Additional – 0 m²) and no R& R is involved in the Project. The details of products are as follows:

S. No.	Name of Product	CAS No.	Existing (TPA)	Proposed (TPA)	Total (TPA)	End Use	LD 50-Oral (Rat) mg/kg	Category as per EIA Notification 5(f) or 5(b)	Remarks
1	Para Dichloro Benzene	106-46-7	6000	0	6000	Chemical Intermediate	500	5f	No change
2	O-Phenylenediamine (OPDA)	95-54-5	1000	0	1000	Chemical Intermediate	516	5f	No change
3	3-Amino-9-Ethyl Carbazole (AEC) and its intermediates	132-32-1	150	0	150	Intermediate for pigment	144	5f	No change
	a) Ethyl Carbazole	86-28-2					NA	5f	
	b) Nitro Ethyl Carbazole	86-20-4					NA	5f	
4	Chloranil and its intermediates	118-75-2	150	0	150	Fungicide	4000	5b	No change
	a) 2,4,6-Tri Chlorophenol	88-06-2					820	5f	
5	Meta Phenoxy Benzyl Alcohol (MPBA)	13826-35-2	100	0	100	Chemical Intermediate	1496	5f	No change
	a) Meta bromo benzaldehyde	3132-99-8					1126	5f	
	b) Meta bromo benzaldehyde acetal	62373-79-9					NA	5f	
6	A) Poly Ether Ketone (PEK)	104135-57-1	500	0	500	Specialty Polymer	NA	5f	No change
	a) Para Chloro Benzoyl Chloride (PCBC)	122-01-0						5f	
	b) Chlorohydroxy Benzophenone (CHBP)	42019-78-3						5f	
	c) Sodium Salt of 4-Chloro-4'-hydroxy	1202872-						5f	

	Benzophenone (NaCHBP)	85-2							
	d) Diphenyl Sulphone (DPSO2)	127-63-9						5f	
	B) Poly Ether Ketone Ketone (PEKK)	30604-15-0						5f	
	a) Terephthaloyl Chloride (TPC)	100-20-9						5f	
	C) Polybenzimidazole (ABPBI)	29692-96-4						5f	
7	Poly Ether Imide and its intermediates	61128-46-9	5000	0	5000	Specialty Polymer	>5000	5f	No change
	a) 4-Nitro N-Methyl Pthalimide (Nitro NMPI)	41663-84-7					2800	5f	
	b) Bis Phenol A Bis Ether –Tetra Carboxylic Acid (BPA-BE-TCA)	38103-05-8					NA	5f	
8	Hexaconazole and its intermediates	79983-71-4	300	0	300	Fungicide	2189	5b	No change
	a) Valeryl Chloride	638-29-9					NA	5f	
	b) 2,4-Dichloro Valerophenone	61023-66-3					NA	5f	
	c) 2-Butyl-2-(2,4-Dichlorophenyl) Oxirane	88374-07-6					NA	5b	
9	Propiconazole	60207-90-1	500	0	500	Fungicide	>1517	5b	No change
10	Dicamba and its intermediates	1918-00-9	5000	0	5000	Herbicide	2740	5b	No change
	a) 2,3 Di Chloro Nitro Benzene	3209-22-1					381	5f	
	b) 2,3 Di Chloro Aniline	608-27-5					NA	5f	
	c) 2,3 Di Chloro Phenol	576-24-9					2585 (mo use)	5f	
	d) Dipotassium salt of 3,6-Dichloro salicylic acid (DCSA K 2 Salt)	68938-80-7					NA	5f	

	e) 3,6-Dichloro-2-methoxy methyl benzoate (Dicamba Ester)	6597-78-0					NA	5f	
11	Profenofos and its intermediates	41198-08-7	1000	0	1000	Insecticide	162	5b	No change
	a) 4-Bromo-2-chlorophenol (BCP)	3964-56-5					NA	5f	
	b) Phosphorothioic acid O-(4-bromo-2-chlorophenyl) O,O-diethyl ester (PC-1)	60731-55-7					NA	5f	
12	Bifenthrin and its intermediates	82657-04-3	200	0	200	Pyrethroid	53.4	5b	No change
	a) Bifenthrin chloride	84541-46-8					NA	5b	
13	Lambda Cyhalothrin and its intermediates	91465-08-6	100	0	100	Pyrethroid	79	5b	No change
	a) 3-(2-Chloro-3-Trifluoropropenyl-2,2-Dimethyl Cyclopropane Carbonyl Chloride (CHAC)	393870-46-7					NA	5b	
14	Thiamethoxam	153719-23-4	500	0	500	Insecticide	>2000	5b	No change
15	Difenthiuron and its intermediates	80060-09-9	500	0	500	Insecticide	2068	5b	No change
	a) 1-(2,6-Disisopropyl-4-Phenoxyphenyl) (Thiourea)	135252-10-7					NA	5b	
	b) 4-phenoxy-2,6-diisopropylaniline isothiocyanate	80058-93-1					NA	5f	
16	Metalaxyl and its intermediates	57837-19-1	1000	0	1000	Fungicide	669	5b	No change
	a) Methoxy Acetyl Chloride	38870-89-2					NA	5f	
	b) Methyl (2,6-Dimethyl Phenylamino) Propanoate (Alaninate)	52888-49-0					NA	5b	
17	Buprofezin	69327-	250	0	250	Insecticide	2198	5b	No change

		76-0							ge
18	Carbendazim and its intermediates	10605-21-7	500	0	500	Insecticide	>5000	5b	No change
	a) Ortho Nitro Aniline (ONA)	88-74-4					2050	5b	
	b) O-Phenylenediamine (OPDA)	95-54-5					516	5f	
	c) Cyano Methyl Carbamate (CMC)	21729-98-6					NA	5b	
19	Dicamba and its intermediates	1918-00-9	0	4000	4000	Herbicide	2740	5b	New Product
	a) 2,5-Dichloro Phenol	583-78-8					580	5f	
	b) Mono Chloro Benzene	108-90-7					2300	5f	
	c) Para Dichloro Benzene	106-46-7					2950	5f	
	d) 2,5-Dichloro Nitro Benzene	89-61-2					2120	5f	
	e) 3,4-Dichloro Nitro Benzene	99-54-7					953	5f	
	f) 2,5-Dichloro Aniline	95-82-9					1600	5f	
	g) 3,4-Dichloro Aniline	95-76-1					545	5f	
	h) 2,3-Dichloro Aniline	608-27-5					NA	5f	
	i) Nitrosyl Sulphate	7782-78-7					NA	5f	
	j) Ortho Dichloro Benzene	95-50-1					500	5f	
	k) Meta Dichloro Benzene	541-73-1					NA	5f	
	l) 1,2,4-Tri Chloro Benzene	120-82-1					756	5f	
	m) 1,2,3-Tri Chloro Benzene	87-61-6					NA	5f	
	n) 1,3,5-Tri Chloro Benzene	108-70-3					800	5f	
	o) 2,3-Dichloro Nitro Benzene	3209-22-1					NA	5f	
	p) Dipotassium salt of 3,6-Dichloro salicylic acid	68938-80-7					NA	5f	

	q) Methyl Chloride	74-87-3					1800	5f	
	r) 3,6-Dichloro-2-methoxy methyl benzoate (Dicamba Ester)	6597-78-0					NA	5b	
20	Mesotrione and its intermediates (MCB Route)	104206-82-8	0	2500	2500	Herbicide	>2000	5b	New Product
	a) 4-chloro benzene sulfonyl chloride (MCB sulfonyl chloride)	98-60-2					4250	5f	
	b) 1-Chloro-4-(methyl sulfonyl) benzene	98-57-7					400	5f	
	c) 1-Chloro-2-nitro4-(methyl sulfonyl) benzene (Chloro NMSB)	97-07-4					NA	5f	
	d) Methyl-2-Cyano-2-(4-(methyl sulfonyl)-2-Nitrophenyl) acetate Cyano NMSB)	NA					NA	5b	
	e) 2-Nitro-4-methyl sulfonyl benzoic acid (NMSBA)	110964-79-9					NA	5b	
	f) 2-Nitro-4-methyl sulfonyl benzoyl chloride (NMSBAc)	110964-80-2					NA	5b	
	g) 1,3-Cyclohexane dione -sodium salt (1,3-CHD -Na salt)	50402-9					NA	5f	
	h) 3-(4'-methylsulfonyl-2'-nitro-benzoyloxy)-2-cyclohexene-1-one (Mesotrione enol ester)	226944-49-6					NA	5b	
21	Mesotrione and its intermediates (TSC Route)	104206-82-8					NA	5b	
	a) 4-Methyl sulfonyl toluene (MST)	3185-99-7					NA	5f	
	b) 2-Nitro-4-methyl sulfonyl toluene (NMST)	1671-49-4					NA	5f	
	c) 2-Nitro-4-methyl sulfonyl benzoic acid (NMSBA)	110964-79-9					NA	5f	
	d) 2-nitro -4-(methyl sulfony) benzoyl chloride (NMSBAc)	110964-80-2					NA	5f	
	e) 1,3-Cyclohexane dione	504-					NA	5f	

	-sodium salt(1,3-CHD -Na salt)	02-9							
	f) 3-(4'-methylsulfonyl-2'-nitro-benzoyloxy)-2-cyclohexene-1-one (Mesotrione enol ester)	2269 44- 49-6					NA	5b	
2	Tembotrione and its intermediates	3351 04- 84-2				Herbi cide	> 200 0	5b	New Prod uct
2	a) Methane thiol	74- 93-1					61	5f	
	b) 3-Chloro-2-methyl phenyl methyl sulphide (CMTT)	8296 1- 52-2					NA	5f	
	c) 2-Chloro-3-methyl-4-methylthio acetophenone (Acyl CMTT)	1819 97- 71-7					NA	5f	
	d) 2-chloro-3-methyl -4-methyl sulfonyl acetophenone	1819 97- 72-8					NA	5b	
	e) 2-chloro-3-methyl -4-methyl sulfonyl benzoic acid (CMMSBA)	1069 04- 09-0					NA	5b	
	f) 2-chloro-3-methyl -4-methyl sulfonyl benzoic acid methyl ester (CMMSBA Ester)	1201 00- 04-1					NA	5b	
	g) Methyl-(2-chloro-3-bromomethyl-4-methyl sulfonyl benzoate (CBrMMSBA Ester)	1201 00- 44-9					NA	5b	
	h) 2-chloro-4-(methylsulfonyl)-3-[(2,2,2-trifluoroethoxy)methyl] benzoic acid (CTFEMMSBA)	1201 00- 77-8					NA	5b	
	i) 2-chloro-4-(methylsulfonyl)-3-[(2,2,2-trifluoroethoxy)methyl] benzoyl chloride (CTFEMMSBAc)	1118 729- 23-9					NA	5b	
	j) 1,3-Cyclohexane dione -sodium salt (1,3-CHD -Na salt)	504- 02-9					NA	5f	
	k) 3-oxo-cyclo hexyl-2-chloro-4-(methyl sulfonyl)-3-((2,2,2-trifluoro ethoxy)methyl) benzoate (Tembotrione enol ester)	2634 01- 21-4					NA	5f	

2 3	Sulcotrione and its intermediates	9910 5- 77-8				Herbi cide	NA	5b	New Prod uct
	a) 4-Methyl sulfonyl toluene (MST)	3185 -99- 7					NA	5f	
	b) 2-Chloro-4-Methyl sulfonyl toluene (CMST)	1671 -18- 7					NA	5f	
	c) 2-Chloro-4-Methyl Sulfonyl Benzoic Acid (CMSBA)	5325 0- 83-2					NA	5f	
	d) 2 Chloro-4-Methyl sulfonyl benzoic acid chloride (CMSBAc)	1069 04- 10-3					NA	5f	
	e) 1,3-Cyclohexane dione -sodium salt (1,3-CHD -Na salt)	504- 02-9					NA	5f	
	f) Sulcotrione Ester	1149 11- 83-0					NA	5f	
2 4	Sulfentrazone and its intermediates	1228 36- 35-5	0	1500	15 00	Herbi cide	285 5	5b	New Prod uct
	a) 5-Methyl-2-phenyl-2,4-dihydro-[1,2,4]-triazol-3-one (PT)	2286 3- 24-7					NA	5f	
	b) 4-Difluoromethyl-5-methyl-2-phenyl-2,4-dihydro-[1,2,4]-triazol-3-one (DFMPT)	1338 40- 80-9					NA	5b	
	c) 4-Difluoromethyl-5-methyl-2-(2,4-dichlorophenyl)-2,4-dihydro-[1,2,4]-triazol-3-one (DCPT)	1119 92- 16-6					NA	5b	
	d) 4-Difluoromethyl-5-methyl-2-(2,4-dichloro-5-nitrophenyl)-2,4-dihydro-[1,2,4]-triazol-3-one (DCNPT)	1119 92- 17-7					NA	5b	
	e) 4-Difluoromethyl-5-methyl-2-(5-amino-2,4-dichlorophenyl)-2,4-dihydro-[1,2,4]-triazol-3-one (ADCPT)	1119 92- 18-8					NA	5b	
	OR Bromoxynil Octanoate and its intermediates	1689 -99- 2					250	5b	

	P-Hydroxy benzonitrile	767-00-0					450	5f	
	2,6 – Dibromo-4-cyano-phenol	1689-84-5					190	5f	
	Octanoyl chloride	111-64-8					>2000	5f	
	OR Bromoxynil Heptanoate and its Intermediates	56634-95-8					550	5b	
	P-Hydroxy benzonitrile	767-00-0					450	5f	
	2,6 – Dibromo-4-cyano-phenol	1689-84-5					190	5f	
	Heptanoyl chloride	2528-61-2					N/A	5f	
25	Bispyribac Sodium	125401-92-5	0	200	200	Herbicide	5000	5b	New Product
26	Anilophos and its intermediates	64246-01-0	0	1200	1200	Herbicide	500	5b	New Product
	a) 2-Chloro -N- (4-chlorophenyl) -N-isopropyl-acetamide (Anilide)	84012-61-3					NA	5b	
	b) Ammonium Salt of Dimethyl Dithio Phosphoric Acid (Ammonium DMTA)	1066-97-3					NA	5b	
27	Triclopyr Acid Butotyl Ester and its intermediates	64700-56-7	0	1500	1500	Herbicide	>1000	5b	New Product
	a) 3,4,5 Trichloro Pyridinol Sodium Salt (NaTCPOL)	37439-34-2					NA	5b	
	b) Triclopyr Acid Methyl Ester	60825-26-5					NA	5b	
	c) 3,5,6-Trichloro-2-pyridinyloxy acetic acid (Triclopyr Acid)	5533-53-06					650	5b	
28	Diuron and its intermediates	330-54-1	0	5000	5000	Herbicide	3400	5b	New Product
	a) N Methyl-N-(3,4 Dichloro) Phenyl Carbamate	1918-18-9					522	5b	
2	Pinoxaden and its	2439	0	1000	10	Herbi	312	5b	New

9	intermediates Route 1	73-20-8			00	cide	9		Product	
	a) 2,6-diethyl -4-methyl bromo-benzene	314084-61-2					NA	5f		
	b) 1-(2,6-diethyl -4-methyl phenyl)-malononitrile	314020-53-6					NA	5f		
	c) 1-(2,6-Diethyl-4-methyl-phenyl)-malonamide	314020-40-1					NA	5b		
	d) N,N'-diacetylhydrazine (DAH)	3148-73-0					NA	5f		
	e) 2,2'-Dichlorodiethyl ether (DCDEE)	111-44-4					75	5b		
	f) 4,5-Diacetyl-1,4,5-hexahydro-oxadiazepine (DAODAP)	83598-13-4					NA	5b		
	g) Hexahydro-1,4,5-oxadiazepine HCl (OXA.HCl)	405281-14-3					NA	5b		
	h) Pyrazole-oxadiazepine	314020-44-5					NA	5b		
	Or Pinoxaden and its intermediates Route 2	243973-20-8					3129	5b		New Product
	Heptylene-4-malononitrile	33296-20-7					NA	5f		
	Methacrolein	78-85-3					NA	5f		
	2-(2,6-diethyl -4-methyl cyclohexene-1-ylidene)-malononitrile	2231217-69-7					NA	5f		
	1-(2,6-diethyl -4-methyl phenyl)-malononitrile	314020-53-6					NA	5f		
	e) 1-(2,6-Diethyl-4-methyl-phenyl)-malonamide	314020-40-1					NA	5b		
f) N,N'-diacetylhydrazine (DAH)	3148-73-0					NA	5f			
g) 2,2'-Dichlorodiethyl ether (DCDEE)	111-44-4					75	5b			

	h) 4,5-Diacetyl-1,4,5-hexahydro-oxadiazepine (DAODAP)	8359 8- 13-4					NA	5b	
	i) Hexahydro-1,4,5-oxadiazepine HCl (OXA.HCl)	4052 81- 14-3					NA	5b	
	j) Pyrazole-oxadiazepine	3140 20- 44-5					NA	5b	
30	Imazethapyr	8133 5- 77-5	0	2000	2000	Herbicide	>5000	5b	New Product
31	Fipronil and its intermediates	1200 68- 37-3				Insecticide	200	5b	New Product
	a) Trichloro methyl sulfenyl chloride	594- 42-3					82.6	5f	
	b) Thiophosgen	463- 71-8					929	5f	
	c) Ortho-Chloro benzyl trifluoromethyl sulfide (OCBTMS)	2519 26- 48-4					NA	5f	
	d) Trifluoromethyl sulfinyl chloride (CF ₃ SOCl)	2062 1- 29-8					NA	5f	
	e) Aminopyrazole	1200 68- 79-3					NA	5f	
32	Indoxacarb and its intermediates	1735 84- 44-6	0	600	600	Insecticide	>5000	5b	New Product
	a) 5-Chloro Indanone	4234 8- 86-7					NA	5f	
	b) 5-Chloro Indanone Ester	6573 8- 56-9					NA	5f	
	c) 5-Chloro Indanone Hydroxy Ester	1441 72- 24-7					NA	5f	
	d) Urea Derivative	1441 72- 25-8					NA	5f	
	e) Oxadiazine	2005 68- 74-7					NA	5f	
3	Temephos and its	3383	0	400	40	Insecti	420	5b	New

3	intermediates	-96-8			0	cide	4		Prod uct
	a) Dimethyl Thiophosphoryl Chloride (DMTC)	2524-03-0					1340	5f	
3 4	Chlorpyriphos Methyl and its intermediates	5598-13-0	0	7000	7000	Insecti cide	3000	5b	New Prod uct
	a) 3,4,5-Trichloro Pyridinol Sodium Salt (NaTCPOL)	37439-34-2					NA	5b	
	b) Dimethyl Thiophosphoryl Chloride (DMTC)	2524-03-0					1340	5f	
3 5	Chlorpyriphos and its intermediates	2921-88-2				Insecti cide	200	5b	New Prod uct
	a) 3,4,5-Trichloro Pyridinol Sodium Salt (NaTCPOL)	37439-34-2					NA	5b	
	b) Di-ethyl Thiophosphoryl Chloride (DETC)	2524-04-1					800 (mo use)	5b	
3 6	Diflubenzuron and its intermediates	35367-38-5	0	1000	1000	Insecti cide	>4640	5b	New Prod uct
	a) 2,6-Difluorobenzamide (2,6-DFBA)	18063-03-1					3299	5f	
3 7	Cartap Hydrochloride and its intermediates	15263-52-2	0	2500	2500	Insecti cide	345	5b	New Prod uct
	a) N,N-Dimethyl allyl amine	2155-94-4					NA	5f	
	b) 2,3-Dichloro-N,N-Dimethyl propyl amine hydrochloride (DCDMPA.HCl)	50786-84-1					641	5f	
	c) 2-N,N-dimethylanino-1-Sodium-3-thiosulphate propane (Monosultap)	29547-00-0					333	5b	
3 8	Imidacloprid and its intermediates	138261-41-3	0	1000	1000	Insecti cide	450	5b	New Prod uct
	a) Nitro Guanidine	556-88-7					10200	5f	
	b) N-(Nitro-imono)	5465					NA	5f	

	imidazolidine (NIIMDA)	-96-3							
	c) 2-Chloro-5-Methyl Pyridine (CMP)	18368-64-4					1000	5f	
	d) 2-Chloro-5-chloromethyl pyridine (CCMP)	70258-18-3					NA	5f	
39	Acetamiprid and its intermediates	135410-20-7				Insecticide	217	5b	New Product
	a) Dry HCl gas	7647-01-0					277	5f	
	b) Methyl-N-Cyano acetamide (NCMA)	5652-84-6					432	5f	
	c) 2-Chloro-5(Methylaminomethyl)Pyridine (CMPMA)	120739-62-0					NA	5f	
40	Clothianidin and its intermediates	210880-92-5	0	2500	2500	Insecticide	>5000	5b	New Product
	a) 2,3 Dichloropropene (2,3-DCP)	78-88-6					320	5f	
	b) 2-Chloroallyl isothiocyanate	14214-31-4					NA	5f	
	c) 2-Chloro-5-chloromethylthiazole (CCMT)	105827-91-6					NA	5f	
	d) Nitro guanidine	556-88-7					10200	5f	
	e) N-methyl-N'-nitro guanidine	4245-76-5					1000	5f	
	f) 1,5-dimethyl-2-nitroimino-hexahydro-1,3,5-triazine (DMNITCH)	136516-16-0					3200	5f	
	g) 1-(2-chloro-5-thiazolylmethyl)-3,5-dimethyl-2-nitroimino-hexahydro-1,3,5-triazine (DMNITCH + CCMT)	NA					NA	5f	
41	Chlorantraniliprole and its intermediates Route 1	500008-45-7				Insecticide	>5000	5b	New Product
	a) 2,3-Dichloropyridine (DCP)	2402-77-					NA	5f	

	9							
b) 3-Chloro-2-hydrazinopyridine (CHP)	2284 1- 92-5					NA	5f	
c) Ethyl 2-(3-chloropyridin-2-yl)-5-oxo-pyrazolidine-3-carboxylate (DHPy)	5000 11- 88-1					NA	5b	
d) Ethyl 3-bromo-1-(3-chloro-2-pyridinyl)-4,5-dihydro-1H-pyrazole-5-carboxylate (DHBrPy)	5000 11- 91-6					NA	5b	
e) Ethyl 3-bromo-1-(3-chloro-2-pyridinyl)-1H-pyrazole-5-carboxylate (BrPy)	5000 11- 92-7					NA	5b	
f) 3-Bromo-1-(3-chloro-2-pyridinyl)-1H-pyrazole-5-carboxylic acid (Intermediate-B)	5000 11- 86-9					NA	5b	
g) 2-Hydroxyimino-N-o-tolyl-acetamide (Isonitroso)	1132 -03- 2					NA	5b	
h) 7-Methylisatin /7-Methylindole-2,3-dione	1127 -59- 9					NA	5f	
i) 5-Chloro-7-methylisatin/5-Chloro-7-methylindole-2,3-dione	1438 9- 06-1					NA	5b	
j) 6-Chloro-8-methylisatoic anhydride/6-chloro-8-methyl-1 H-benzo[d][1,3]oxazine-2,4-dione	1203 74- 68-7					NA	5f	
Or Chlorantraniliprole and its intermediates Route 2	5000 08- 45-7					>50 00	5b	New Prod uct
3-Chloro-2-hydrazinopyridine (CHP)	2284 1- 92-5					NA	5f	
Ethyl 2-(3-chloropyridin-2-yl)-5-oxo-pyrazolidine-3-carboxylate (DHPy)	5000 11- 88-1					NA	5b	
Ethyl 3-bromo-1-(3-chloro-2-pyridinyl)-4,5-dihydro-1H-pyrazole-5-carboxylate (DHBrPy)	5000 11- 91-6					Na	5b	
Ethyl 3-bromo-1-(3-chloro-2-pyridinyl)-1H-pyrazole-5-	5000 11-					NA	5b	

	carboxylate (BrPy)	92-7							
	3-bromo-1-(3-chloro-2-pyridinyl)-1H-pyrazole-5-carboxylic acid (Inter-B)	5000 11- 86-9					NA	5b	
	Isonitroso	1132 -03- 2					NA	5b	
	7-Methylisatin (7-Methylindole-2,3-dione)	1127 -59- 9					NA	5f	
	5-Chloro-7-methylisatin (5-Chloro-7-methylindole-2,3-dione)	1438 9- 06-1					NA	5b	
	2-Amino-5-chloro-3-methylbenzoic acid (ACMBA)	2077 6- 67-4					NA	5f	
4 2	Azoxystrobin and its intermediates	1318 60- 33-8	0	6000	60 00	Fungi cide	>20 00	5b	New Prod uct
	a) 3-Methoxymethylene benzofuran-2(3H)-one (MMB)	4080 0- 90-6					NA	5b	
	b) Methyl 2-(2-hydroxyphenyl)-3,3-dimethoxy propanoate (MMB inter)	1759 71- 61-6					NA	5b	
	c) 2-((6-chloropyrimidin-4-yl)oxy) benzonitrile (CPOB)	9138 46- 53-4					NA	5b	
	d) Dimethoxy Azoxystrobin	NA					> 500 0	5b	
4 3	Pyraclostrobin and its intermediates	1750 13- 18-0				Fungi cide	>50 00	5b	New Prod uct
	a) Sodium salt of 1-(4-chlorophenyl)-3-hydroxypyrazole	7620 5- 19-1					NA	5b	
	b) 1-(4-chlorophenyl)-3-[2-(nitrophenyl)-methoxy]-1H-pyrazole (PNBE)	2203 68- 29-6					NA	5b	
	c) Methyl N-hydroxy-N-(2-{[1-(4-chlorophenyl)-1H-pyrazol-3-yl]oxymethyl} phenyl) Carbamate (PHABEC)	NA					NA	5b	
4 4	Trifloxystrobin and its intermediates	1415 17-				Fungi cide	> 200	5b	New Prod

		21-7					0		uct
	a) 3-Bromo benzotrifluoride	401-78-5					NA	5f	
	b) 3-Trifluoromethyl acetophenone	349-76-8					NA	5f	
	c) 3-Trifluoromethyl acetophenone oxime	99705-50-7					NA	5f	
	d) Methyl -2-oxo-2-(o-tolyl) acetate	34966-54-6					NA	5f	
	e) Methyl-2-(2'-bromoethylphenyl)-2-oxoacetate	126534-57-4					NA	5b	
	f) Methyl (E)-2-oxo-2-(2-(((1-(3-(trifluoromethyl) phenyl) ethylidene) amino) oxy) methyl) phenyl) acetate	141493-05-2					NA	5b	
	g) Methyl(Z)-2-(hydroxyimino)-2-(2-(((E)-1-(3-(trifluoromethyl) phenyl) ethylidene)amino)oxy) methyl)phenyl acetate (Oxime Product)	NA					NA	5b	
4 5	Deltamethrin and its intermediates	52918-63-5	0	1000	1000	Pyrethroid	87.4	5b	New Products
	a) Tetrachloro Butyronitrile (TBN)	41797-95-9					NA	5f	
	b) Tetrachloro Butyric Acid (TBA)	4387-77-3					NA	5f	
	c) Tetrachloro Butyric Acid Chloride (TBAC)	68121-36-8					NA	5f	
	d) 2 Chlorobutanone (2-CB)	68697-08-5					NA	5f	
	e) Cypermethric Acid (CMA)	59042-49-8					NA	5b	
	f) R,R-Sodium salt of Cypermethric Acid (Na-CMA)	128241-41-8					NA	5b	
	g) R,R-Cypermethric Acid (CMA)	55667-					NA	5b	

		40-8							
	h) Dibromo Cypermethric Acid (DBCMA)	6359 7- 73-9					NA	5b	
	i) Di Bromo Cypermethric Acid ester (DB Ester)	6177 5- 87-9					NA	5b	
	j) Di Bromo Cypermethric Acid Chloride (DBCMAc)	5571 0- 82-2					NA	5b	
4 6	Alphamethrin and its intermediates	6737 5- 30- 80				Pyrethroid	200	5b	New Products
	a) Tetrachloro Butyronitrile (TBN)	4179 7- 95-9					NA	5f	
	b) Tetrachloro Butyric Acid (TBA)	4387 -77- 3					NA	5f	
	c) Tetrachloro Butyric Acid Chloride (TBAC)	6812 1- 36-8					NA	5f	
	d) 2 Chlorobutanone (2-CB)	6869 7- 08-5					NA	5f	
	e) Cypermethric Acid (CMA)	5904 2- 49-8					NA	5b	
	f) Cypermethric Acid Chloride (CMAC)	5231 4- 67-7					NA	5b	
	g) Cypermethrin	5231 5- 07-8					500	5b	
4 7	Cypermethrin and its intermediates	5231 5- 07-8	0	5200	5200	Pyrethroid	500	5b	New Products
	a) Tetrachloro Butyronitrile (TBN)	4179 7- 95-9					NA	5f	
	b) Tetrachloro Butyric Acid (TBA)	4387 -77- 3					NA	5f	
	c) Tetrachloro Butyric Acid Chloride (TBAC)	6812 1- 36-8					NA	5f	
	d) 2 Chlorobutanone (2-CB)	6869 7-					NA	5f	

		08-5							
	e) Cypermethric Acid (CMA)	5904 2- 49-8					NA	5b	
	f) Cypermethric Acid Chloride (CMAC)	5231 4- 67-7					NA	5b	
4 8	Bifenthrin and its intermediates	8265 7- 04-3				Pyrethroid	500	5b	New Products
	a) Bifenthrin chloride	8454 1- 46-8					375	5b	
4 9	Lambda Cyhalothrin and its intermediates	9146 5- 08-6				Pyrethroid		5b	New Products
	a) 3-(2 Chloro 3 Trifluoro Propenyl -2, 2- Dimethyl Cyclopropane Carbonyl Chloride (CHAC)	3938 70- 46-7					56	5b	
5 0	Permethrin and its intermediates	5264 5- 53-1				Pyrethroid		5b	New Products
	a) Tetrachloro Butyronitrile (TBN)	4179 7- 95-9					383	5f	
	b) Tetrachloro Butyric Acid (TBA)	4387 -77- 3					NA	5f	
	c) Tetrachloro Butyric Acid Chloride (TBAC)	6812 1- 36-8					NA	5f	
	d) 2 Chlorobutanone (2-CB)	6869 7- 08-5					NA	5f	
	e) Cypermethric Acid (CMA)	5904 2- 49-8					NA	5b	
	f) Cypermethric Acid Chloride (CMAC)	5231 4- 67-7					NA	5b	
5 1	Mepiquat Chloride	2430 7- 26-4	0	100	10 0	Growth Regulator	464	5b	New Product
5 2	A) Meta Phenoxy Benzaldehyde (MPB) and its intermediates	3951 5- 51-0	0	6000	60 00	Chemical Intermediate	NA	5f	New Product
	a) Meta bromo	3132					112	5f	

	benzaldehyde	-99-8					6		
	b) Meta bromo benzaldehyde acetal	62373-79-9					NA	5f	
	B) Meta Phenoxy Benzyl Alcohol (MPBA) and its intermediates	13826-35-2					NA	5f	
	a) Meta bromo benzaldehyde	3132-99-8					1126	5f	
	b) Meta bromo benzaldehyde acetal	62373-79-9					NA	5f	
53	EKKE Monomer	54299-17-1	0	500	500	Specialty Polymer	NA	5f	New Product
	PEKK Polymer 100:00 OR	65461-61-2					NA	5f	
	PEKK Polymer 80:20 OR	12115-58-0					NA	5f	
	PEKK Polymer 70:30 OR	12115-58-0					NA	5f	
	PEKK Polymer 60:40 OR	12115-58-0					NA	5f	
	S PEKK and its Intermediates	2217635-74-8					NA	5f	
54	Pigment Violet 23 and its intermediates	228-767-9	0	2000	2000	Pigment & Chemical intermediate	>2000	5f	New Product
	a) Carbazole	86-74-8					500	5f	
	b) Ethyl Carbazole	86-28-2					NA	5f	
	c) Nitro Ethyl Carbazole	86-20-4					NA	5f	
	d) Amino Ethyl Carbazole	132-32-1					NA	5f	
	e) Chloranil	118-75-2					4000	5f	
55	Pigment Yellow-237 (Florescent Yellow 8501 B and its intermediates)	40382-92-1				Pigment & Intermediate	NA	5f	New Product
	a) 1,2,3,4 Tetra Chloro	4038					NA	5f	

	isoindolo [2,3-a] benzimidazol-11-one (TCBBIZ)	2-92-1							
56	Pigment Red 168 and its intermediates	4378-61-4				Pigment & Intermediate	8300	5f	New Product
	a) 1,1,Binaphthyl-8,8-Dicarboxylic Acid (DINAH Acid)	29878-91-9					NA	5f	
57	Pigment Red 254	84632-65-5				Pigment	8380	5f	New Product
58	Pigment Red 255	120500-90-5				Pigment	8340	5f	New Product
59	Pigment Red 122 and its intermediates	980-26-7				Pigment & Intermediate	>5000	5f	New Product
	a) 2,5-di (P-toludino) Terephalic acid (DTTPA)	10291-28-8					NA	5f	
60	Pigment Violet 19 and its intermediates	1047-16-1				Pigment & Intermediate	8420	5f	New Product
	a) 2,5 Dianilino terephthalic acid (DATPA)	10109-95-2					NA	5f	
61	Pigment Yellow 138 and its intermediates	30125-47-4				Pigment & Intermediate	8370	5f	New Product
	a) 8-Chloro Quinaldine	3033-82-7					NA	5f	
	b) 8-Amino Quinaldine	18978-78-4					NA	5f	
62	Pigment Yellow 139	36888-99-0				Pigment	8310	5f	New Product
63	Pigment Yellow 151	31837-42-0				Pigment	8330	5f	New Product
64	Pigment Yellow 154	68134-22-5				Pigment	>5000	5f	New Product
Grand Total			22750	54700	77450				

Products that do not require EC:

Sr. No.	Name of Product	Existing (TPA)	Proposed (TPA)	Total (TPA)	End Use	Remarks
1	Pesticide Formulations (Solid & Liquid) (from own technical products and/or technical products purchased from outside market)	6000	6000	12000	Pesticide	CTE from GPCB is obtained.

Sr. No.	Name of Product	CAS No.	Existing (TPA)	Proposed (TPA)	Total (TPA)	End Use	LD 50-Oral (Rat) mg/kg	Category as per EIA Notification 5(f) or 5(b)	Remarks
1	KCl + KF	7447-40-7 + 7789-23-3	0	2898	2898	KCl is used in making fertilizer. KF is used in etching glass, as a preservative, as an insecticide, and in organic synthesis	2600 + 245	Inorganic	By-product
2	Calcium Chloride (35%)	10043-52-4	24219	27724	51493	Used in antifreeze mixtures, as coagulant in rubber etc.	1000	Inorganic	By-product
3	Ortho Dichloro Benzene (ODCB)	95-50-1	1998	0	1998	Used as a solvent for waxes, gums, resins, tars, rubbers, oils, asphalts and as a degreasing agent for metals and leather	1516	5(f)	By-product

						Used as starting raw materials for other chemicals.			
4	Trichloro Benzene (TCB)	120-82-1	312	0	312	Used as a dye carrier, a herbicide intermediate, dielectric fluid in transformers, a degreaser, a lubricant, and as a solvent in chemical manufacturing	756	5(f)	By-product
5	30 % HCl	7647-01-0	20760	65594	86354	Will be used as raw material for other chemical process internally or will be sold externally for use in metal pickling	900 (Rabbit)	Inorganic	By-product
6	Calcium Sulfate (92%)	10101-41-4	9840	3655	13495	Used as landfill / gypsum	3000	Inorganic	By-product
7	SO ₂ or Sodium Bisulphite Solution (NaHSO ₃) (20-25%)	7446-09-5 or 7631-90-5	6500	0	6500	Used as Bleaching agent, and used in manufacture of chemical intermediates internally.	1310 (NaHSO ₃)	Inorganic	By-product

8	Aluminum Chloride Solution	7446-70-0	4690	46804	51494	Used for making Poly Aluminum Chloride (PAC)	3450	Inorganic	By-product
9	Potassium Chloride Solution	7447-40-7	5000	39130	44130	KCl is used in making fertilizer.	2600	Inorganic	By-product
10	Sulfuric Acid	7664-93-9	19095	95721	114816	Used in the manufacture of fertilizers, chemicals.	2140	Inorganic	By-product
11	HBr Solution	10035-10-6	1525	23340	24865	Will be used internally in other products or used as pharmaceutical and chemical intermediate	NA	Inorganic	By-product
12	Sodium Bromide Solution	7647-15-6	1158	855	2013	Will be used internally in other products or used as pharmaceutical and chemical intermediate	3500	Inorganic	By-product
13	Ammonia Solution	1336-21-6	162	2551	2713	Used in the production of ammonium fertilizers, synthetic urea, synthetic fibers, dyes, and plastics.	350	Inorganic	By-product
14	Sodium Sulphite	7757-83-7	1312	7985	9297	Used in chemical	3560	Inorganic	By-product

						manufacture, and as bleaching agent			ct
15	Sodium Bicarbonate	144-55-8	0	59960	59960	Used in the manufacture of many chemicals.	4220	Inorganic	By-product
16	Ammonium Nitrate 40% Solution	6484-52-2	0	2149	2149	Used in pesticide and fertilizer industry	2217	Inorganic	By-product
17	Nitric Acid	7697-37-2	0	11331	11331	Used in the manufacture of chemical intermediates for fertilizers, dyes, etc.	NA	Inorganic	By-product
18	Methanol	67-56-1	0	4854	4854	Used as a solvent, fuel additive, and in the manufacture of chemical intermediates.	5600	5(f)	By-product
19	Compressed SO ₂	7446-09-5		8479	8479	It is used internally for our other chemical processes and in industries such as paper production, waste water treatment and metal and oil refining.	NA	Inorganic	By-product
20	2-chloro-3-methyl-4-	1819-97-	0	438	438	Chemical intermediat	--	5(f)	By-produ

	methyl sulfonyl acetophenone	72-8				e			ct
21	Chloroform	67-66-3	0	1602	1602	It is widely used in the production of liquid refrigerant, as a solvent, chemical intermediate, dry cleaning agent, fumigant ingredient and in synthetic rubber production.	36 (mouse)	5(f)	By-product
22	Methane Sulfinic acid Sodium salt	20277-69-4	0	102	102	Used in the manufacture of alkyl methyl sulfones and other chemicals intermediates.	NA	5(f)	By-product
23	Sodium Carbonate	497-19-8	0	20806	20806	Used in the manufacture of chemicals. And used as a bleaching agent. Will be used as waste alkali	4090	Inorganic	By-product
24	Phosphoric Acid	7664-38-2	0	50141	50141	Used in chemical, fertilizer and dye industries.	1250	Inorganic	By-product
25	Ammonium Chloride	12125-02-9	0	15351	15351	It is used in manufactur	1410	Inorganic	By-product

						ing of various ammonia compounds			
26	NaSH (Sodium hydrosulfide)	1672 1-80- 05	0	502	502	Used in the manufacture of chemicals. pigment & dyes. It is also used in tanneries and paper and textile industries.	96	Inorganic	By-product
27	2,6-DE-4-Me-Phenol	3505 0-88- 5	0	227	227	Chemical / Herbicide intermediate, used as buffer in battery, photoreceptor.	--	5(b) & 5(f)	By-product
28	Bromine	7726 -95-6	0	4219	4219	Will be used internally as Raw material in other processes. Also used in manufacturing of organic and inorganic chemicals, such as fuel additives, fire retardants, pesticides, oil well drilling fluids, pharmaceuticals and	2600	Inorganic	By-product

						dyestuffs. Also used as a brominating agent, water disinfectant and bleaching agent.			
29	Methyl Acetate	79-20-9	0	6574.09	6574	Used widely as a solvent and catalyst in chemical manufacturing. Also used in paint remover compounds, lacquer solvents and synthetic flavoring.	5000	5(f)	By-product
30	Acetic Acid	64-19-7	0	5888	5888	Used widely to make other chemicals, and as a solvent in chemical manufacturing. It is also used for fabric dyeing, production of nylon and in leather tanning.	3310	5 (f)	By-product
31	Sodium Acetate	127-09-3	0	2624	2624	Used in manufacturing of chemical intermediates, pharmaceu	3530	5(f)	By-product

						ticals, buffer solutions, soaps and dehydrating agents. It is also used in electroplating tanning, textile and food industries.			
32	Calcium Fluoride	7789-75-5	0	1044	1044	It is used in manufacture of glass, iron and steel castings.	4250	Inorganic	By-product
33	Benzotrifluoride	98-08-8	0	838	838	Used as a chemical intermediate in the manufacture of dyes, polymers, insecticides and pharmaceuticals.	15000	5(f)	By-product
34	Magnesium Sulphate	10034-99-8	0	8786	8786	It is used in the manufacture of plastics, fertilizers, detergents and ceramics, and textiles.	NA	Inorganic	By-product
35	Succinimide	123-56-8	0	2661	2661	It is used in the manufacture of chemical intermediates and pharmaceu	14000	5(f)	By-product

						tical preparation s.			
36	t-Butanol/ tertiary butyl alcohol	75- 65-0	0	1411	1411	Used as a solvent, denaturant for ethanol, paint removers and octane booster in gasoline. It is also used in the manufacture of flotation agents, flavors, perfumes, oil-soluble resins and antioxidants.	3100	5(f)	By-product
37	Phenol	108- 95-2	0	333	333	Used for chemical manufacturing, appliance and automotive industries. Other uses of include as a slimicide, as a disinfectant.	317	5(f)	By-product
38	Diethyl-5-ethyl-pyridine-2,3-dicarboxylic acid (Diacid)	1051 51- 39-1	0	472	472	Chemical intermediate	--	5(b)	By-product
39	Ethanol	64- 17-5	0	1186	1186	Will be used as a solvent in cleaners	7060	5(f)	By-product

						and as a fuel additive. It is also used in the production of other chemicals, perfumes, pharmaceuticals, and cosmetics. It is also used as a fungicide and to regulate plant growth.			
40	Sulphur	7704-34-9	0	1133	1133	It is used in the as fumigants, Fungicides, Acaricides, Repellants, pulp and paper, cosmetics, rubber vulcanization, detergents, petroleum refining, dyes, drugs and pharmaceutical intermediates.	5000	Inorganic	By-product
41	Methyl Chloride	74-87-3	0	1125	1125	It is used in the manufacture of various chemical intermediates, silicone resins and	1800	5(f)	

						rubbers.			
42	Sodium Chloride	7647-14-5	0	18402	18402	It has wide applications in chemical, highway de-icing and stabilization, agriculture and water conditioning field. It is widely consumed in textiles, dyeing, pulp and paper, metal processing, tanning and leather treatment, and rubber manufacture.	3000	Inorganic	By-product
43	Bisultap	52207-48-4	0	2131	2131	Pesticide and Chemical intermediate	120 (Mousse)	5(b)	By-product
44	Ammonium Sulphate	7783-20-2	0	1927	1927	Used as chemical intermediate and fertilizer.	2840	Inorganic	By-product
45	Dimethyl Amine	124-40-3	0	712	712	It will be used for the manufacture of chemical intermediates internally or to other manufacturers.	1000	5f	By-product

46	Benzyl Chloride	100-44-7	0	640	640	It is used as a chemical intermediate in the manufacture of certain dyes and pharmaceuticals, plasticizers, disinfectants and phase-transfer catalysts.	1231	5f	By-product
47	N, N- bis (dichloromethyl) methyl amine	34645-08-4	0	1280	1280	Chemical intermediate	--	5f	By-product
48	KHSO4	7646-93-7	0	281	281	It is used in the manufacture of chemical intermediates. It is also used in bleaching and cleaning products.	2340	Inorganic	By-product
49	Cupric Chloride	10125-13-0	0	1542	1542	Used as catalyst and oxidizing agent for organic and inorganic reactions, used in dyeing and printing textiles. Also used in	140	Inorganic	By-product

						manufacture of glass, ceramics, wood preservatives, disinfectants.			
50	Sodium Bisulphite	7631-90-5	0	8491	8491	Used in the manufacture of chemicals, vat dyes textiles. It is also used as a bleaching agent, reducing agent, and color preservative for pale crepe rubber and for wood pulp digestion.	1310	Inorganic	By-product
51	Bromobenzene	108-86-1	0	3372	3372	Used in the manufacture of chemical and pharmaceutical intermediates as a crystallizing solvent, and as solvent in organic synthesis.	2383	5f	By-product
52	Di Bromobenzene	106-37-6	0	450	450	Used for the organic synthesis of dyestuffs & drugs, manufacture	3120 (Mouse)	5f	By-product

						e of chemical intermediates and as a fumigant.			
53	Ammonium Acetate	631-61-8	0	850	850	Used in the manufacture of chemical intermediates, foam rubbers, vinyl plastics, and drugs.	NA	5f	By-product

6. The PP reported that there is no violation case as per the Notification No. S.O. 804(E) dated 14.03.2017 and no direction is issued under E (P) Act/Air Act/Water Act.

7. The PP reported that Ministry had issued EC earlier vide letter no. J-11011/09/2016-IA-II (I), dated 19.12.2017 for setting up Agro- chemical (pesticides) & organic chemical manufacturing unit of capacity 22750 TPM at plot no. C-393 to C-396, Sayakha GIDC Estate, Tal: Vagra, Dist: Bharuch – 392 140 (Gujarat) by M/s. Gharda Chemicals Ltd. Certified compliance report has been issued by the IRO, Gandhinagar dated 13.1.2023, out of 35 condition it may be seen that 10 are compiled 4 are partly complied and 21 are agreed to comply. Action Taken Plan for the partly complied and agreed to comply conditions of CCR is also submitted to Government of India, Ministry of Environment, Forest & Climate Change, Integrated Regional office, Gandhinagar dated 11.02.2023

8. The PP reported that there are no national parks and Biosphere Reserves, Tiger/Elephant Reserves, Wildlife Corridors etc. within 10 km distance from the project site. River Narmada is flowing at distance of 10.0 Km in South direction. Schedule I species or Indian Peafowl exist within 10 km study area of the project, for which conservation plan is submitted to PCCF/ chief wildlife warden dated 1.2.2023.

9. The PP reported that the **ambient air quality** monitoring was carried out at 8 locations during October, 2020 to December, 2020 and the maximum concentration of SPM ($140.4 \mu\text{g}/\text{m}^3$), PM_{10} ($78.63 \mu\text{g}/\text{m}^3$), $\text{PM}_{2.5}$ ($47.41 \mu\text{g}/\text{m}^3$), SO_2 ($14.38 \mu\text{g}/\text{m}^3$), NO_x ($16.96 \mu\text{g}/\text{m}^3$), O_3 ($13.72 \mu\text{g}/\text{m}^3$) & VOC (0.8 ppm) was recorded in study area. The minimum concentration of SPM ($124.2 \mu\text{g}/\text{m}^3$), PM_{10} ($70.43 \mu\text{g}/\text{m}^3$), $\text{PM}_{2.5}$ ($40.86 \mu\text{g}/\text{m}^3$), SO_2 ($9.13 \mu\text{g}/\text{m}^3$), NO_x ($10.25 \mu\text{g}/\text{m}^3$), O_3 ($10.67 \mu\text{g}/\text{m}^3$) & VOC (0.3 ppm) was recorded in study area. **Noise-** Based on noise level data obtained during the survey for residential area and industrial area, it is interpreted that noise levels are within the standard norms prescribed by CPCB. Looking towards the increase in noise generating sources it is suggested that there is need to apply noise reducing devices at noise generating sources and generate public awareness. **Soil-** The porosity of soils can be considered as moderate too good for air and water movement in the soil and the pH of soils are slightly alkaline. The concentration of available Nitrogen, Phosphorous and Potassium in the soil samples signifies that the soil of the area is fertile. **Groundwater-** Based on comparison study with drinking water standards, it is interpreted that water samples collected from the villages should not be directly used in drinking but can be used in other domestic purposes like

washing, bathing and irrigation. Results of copper, lead in the water sample of all the villages are found below detectable. It can be observed that ground water qualities in terms of various essential and desirable characteristics are found within the limits specified by IS 10500:2012. **Surface water-** There are seven ponds considered in the study area. However, this water is not used for domestic/industrial activities; as the raw water is easily available through pipelines of local authorities. These water sources cannot be utilized for drinking but the water of these ponds can be used in irrigation. The water quality is good and it was observed that all the parameters are well within the range of acceptance criteria as per IS: 10500.

10. The PP reported that the total water requirement is 8164 KLD of which fresh water requirement of 3447 KLD and will be met from GIDC Water Supply letter no. GIDC/DEE/WS/BRH/421, Dated: 28/07/2022. Effluent will be treated in ETP having primary, secondary, tertiary treatment, RO, Solvent stripper & MEE. The wastewater generation will be 5098.0 KLD (Existing – 319 KLD + Additional proposed - 4779 KLD). Wastewater generated will be segregated into high concentration and low concentration streams. High concentration stream will be treated in Multiple Effect Evaporator (MEE) and low concentration stream will be treated in ETP followed by Reverse Osmosis (RO). Wastewater generated (5098 KLD) will be segregated into high concentration and low concentration streams. High concentration stream will be treated in Multiple Effect Evaporator (MEE) and low concentration stream will be treated in ETP followed by Reverse Osmosis (RO). Out of 5098 KLD, 1399 KLD will be discharged to deep sea via CETP, 157 KLD solids from MEE will be disposed to CHWTSDF, 63 KLD treated sewage will be used for tree plantation & remaining 3454 KLD treated effluent along with 1200 KLD steam condensate (Total 4617 KLD) will be recycled/reused back in process. Domestic waste water 70 KLD will be treated in STP and 63 KLD will be reused for Gardening.

11. The Power requirement will be 14.2 MW (DGVCL/Torrent Energy Ltd./Captive Power Plant @ 4.8 MWH), DG Set (1500 KVA x 3 Nos.). Unit will have 3 Nos. DG sets of 1500 KVA capacity, additionally DG sets are used as standby during power failure. Stack (height 15 m) will be provided as per CPCB norms to the proposed DG sets. Unit will have 3 Nos. of Cogen Boilers (30 TPH (2 Nos.) & 50 TPH (1 Nos.)) & 2 Nos. of Hot Oil Unit (10 lac KCal/hr) will be installed. Adequate Stack Height of 35 m & 30 m will be installed for controlling the particulate emissions within the statutory limit of 150 mg/Nm³ for the proposed boilers.

12. **Details of Process Emission Generation and Its Management:**

**Flue Gas Stack
Existing**

Sr. no.	Source of emission With Capacity	Stack Height (meter)	Type of Fuel	Quantity of Fuel	Type of emissions i.e. Air Pollutants	Air Pollution Control Measures (APCM)
Existing Flue Gas Stacks & Emission Details:						
1	Boiler-1 (10 TPH)	30	Coal	1500 kg/h	PM, SO ₂ , NO _x	Electrostatic Precipitator + Water scrubber
2	Boiler-2 (10 TPH)	30	Coal	1500 kg/h		Electrostatic Precipitator + Water scrubber
3	Boiler-3 (10 TPH)	30	Coal	1500 kg/h		Electrostatic

	TPH)					Precipitator + Water scrubber
4	Hot oil unit-1 (5 lac KCal/hr)	30	HSD	45 L/h		--
5	Hot oil unit-2 (5 lac KCal/hr)	30	HSD	45 L/h		--
6	Coal Fired Boiler (30 TPH) for (3 MW Power Plant)	30	Coal	4500 kg/h	PM, SO ₂ , NO _x	Electrostatic Precipitator + Water scrubber
7	D.G. Set-1 (1150 KVA (Stand-by))	30	HSD	300 L/h	PM, SO ₂ , NO _x	Adequate stack height
8	D.G. Set-2 (1150 KVA (Stand-by))	30	HSD	300 L/h	PM, SO ₂ , NO _x	Adequate stack height

Total After Proposed Expansion

Sr. No.	Source of emission With Capacity	Stack Height (meter)	Stack Diameter (meter)	Type of Fuel	Quantity of Fuel	Type of emissions i.e. Air Pollutants	Air Pollution Control Measures (APCM)
Total Flue Gas Stacks & Emission Details After Proposed Expansion:							
1	Cogen Boiler-1 (30 TPH)	35	1.25	Coal	4500 kg/h	PM, SO ₂ , NO _x	Electrostatic Precipitators (1 for each) + Caustic scrubber
2	Cogen Boiler-2 (30 TPH)			Coal	4500 kg/h	PM, SO ₂ , NO _x	
3	Cogen Boiler-3 (50 TPH) (4.8 MW Power Plant considering all boilers in operation)	35	1.25	Coal	7500 kg/h	PM, SO ₂ , NO _x	
3	Hot oil unit-1 (10 lac KCal/hr)	30	1.0	HSD	90 L/h	PM, SO ₂ , NO _x	Adequate stack height
4	Hot oil unit-2 (10 lac KCal/hr)						
5	D.G. Set-1 (1500 KVA)	15	0.4	HSD	400 L/h	PM, SO ₂ , NO _x	Adequate stack height

	(Stand-by))						
6	D.G. Set-2 (1500 KVA (Stand-by))	15	0.4	HSD	400 L/h	PM, SO ₂ , NO _x	Adequate stack height
7	D.G. Set-3 (1500 KVA (Stand-by))	15	0.4	HSD	400 L/h	PM, SO ₂ , NO _x	Adequate stack height

Note: All Existing Flue Gas Stacks are to be removed and replaced with new ones after proposed expansion

**Process Stack
Existing**

Sr. No.	Process Stack Attached To	No. Of Scrubbers	Height from Ground (M)	Diameter (M)	Air Pollution Control System	Expected Pollutants Mg/Nm ³
Existing Process Vent Details						
1	Chloranil	2	20	0.08,0.1	Caustic Scrubber, Venturi Scrubber	HCl, Cl ₂ , SO ₂
2	PDCB	2	20	0.08,0.1	Caustic Scrubber, Venturi Scrubber	HCl, Cl ₂
3	Hexaconazole	2	20	0.08,0.1	Caustic Scrubber, Venturi Scrubber	HCl, Cl ₂ , SO ₂
4	Dicamba	NA	20	NA	Sent to Co- incineration	CH ₃ Cl
5	Profenophos	4	20	0.1, 0.08	Caustic Scrubber, Venturi Scrubber	HBr, HCl, Cl ₂ , Br ₂
6	Lambda Cyhalothrin	2	20	0.08,0.1	Caustic Scrubber, Venturi Scrubber	HCl, Cl ₂ , SO ₂
7	Difenthiuron	2	20	0.08,0.1	Caustic Scrubber, Venturi Scrubber	HCl, Cl ₂ , SO ₂
8	Metalaxyl	3	20	0.08,0.1	Caustic Scrubber, Venturi Scrubber	HCl, Cl ₂ , SO ₂

Total Proposed

S. No.	Process Stack Attached To	No. Of Scrubbers	Height from Ground (M)	Diameter (M)	Air Pollution Control System	Expected Pollutants Mg/Nm ³
Additional Process Vent Details						
1	Chloranil	2	33	0.08,0.1	Caustic Scrubber, Venturi Scrubber	HCl, Cl ₂ , SO ₂
2	PDCB	2	33	0.08,0.1	Caustic Scrubber, Venturi Scrubber	HCl, Cl ₂
3	Hexaconazole	2	33	0.08,0.1	Caustic Scrubber, Venturi Scrubber	HCl, Cl ₂ , SO ₂
4	Dicamba	NA	33	NA	Methanol Scrubber	CH ₃ Cl

5	Profenophos	4	33	0.1, 0.08	Caustic Scrubber, Venturi Scrubber	HBr, HCl, Cl ₂ , Br ₂
6	Lambda Cyhalothrin	2	33	0.08,0.1	Caustic Scrubber, Venturi Scrubber	HCl, Cl ₂ , SO ₂
7	Difenthiuron	2	33	0.08,0.1	Caustic Scrubber, Venturi Scrubber	HCl, Cl ₂ , SO ₂
8	Metalaxyl	3	33	0.08,0.1	Caustic Scrubber, Venturi Scrubber	HCl, Cl ₂ , SO ₂
9	Tembotrione	2	NA	NA	Flame arrestor followed by Blow down tank	H ₂
			33	0.1	Emergency Caustic scrubber	SO ₂
			33	0.08	Water scrubber	HCl
10	Mesotrione (MCB Sulfonyl Chloride Route)	3	33	0.08	Water scrubber	HCl
			33	0.1	Caustic Scrubber	CO ₂
			NA	NA	Methanol Scrubber	CH ₃ Cl
			33	0.1	Emergency Caustic scrubber	SO ₂
			NA	NA	Flame arrestor followed by Blow down tank	H ₂
11	Mesotrione (Toluene sulfonyl Chloride Route)	4	33	0.1	Caustic Scrubber	CO ₂
			NA	NA	Methanol Scrubber	CH ₃ Cl
			33	0.08	H ₂ O ₂ Scrubber	NO _x
			33	0.08	Water scrubber	HCl
			33	0.1	Emergency Caustic scrubber	SO ₂
			NA	NA	Flame arrestor followed by Blow down tank	H ₂
12	Sulfentrazone	3	NA	NA	Flame arrestor	Freon-22
			33	0.1	Caustic Scrubber	Cl ₂
			33	0.08	H ₂ SO ₄ Scrubber	NO _x
			NA	NA	Flame arrestor followed by Blow down tank	H ₂
			33	0.08	Water scrubber	HCl
13	Bromoxynil Octanoate	4	33	0.08	Water scrubber	HCl
			33	0.1	Caustic scrubber	SO ₂
			33	0.1	Water Scrubber	HBr
			33	0.08	Water Scrubber	NH ₃
14	Bromoxynil Heptanoate	4	33	0.08	Water scrubber	HCl
			33	0.1	Caustic scrubber	SO ₂
			33	0.1	Water Scrubber	HBr
			33	0.08	Water Scrubber	NH ₃
15	Sulcotrione	4	NA	NA	Methanol	CH ₃ Cl

					Scrubber	
			33	0.1	Caustic Scrubber	CO2
			33	0.1	Caustic Scrubber	Cl2
			33	0.08	Water scrubber	HCl
			33	0.1	Emergency Caustic scrubber	SO2
			NA	NA	Flame arrestor followed by Blow down tank	H2
16	Dicamba	4	33	0.08	Water scrubber	HCl
			33	0.1	Caustic Scrubber	Cl2
			NA	NA	Flame arrestor followed by Blow down tank	H2
			33	0.1	Caustic Scrubber	CO2
			NA	NA	Methanol Scrubber	CH3Cl
17	Bispyribac Sodium	0	NA	NA	Flame arrestor followed by Blow down tank	H2
18	Anilophos	3	33	0.08	Water scrubber	HCl
			33	0.1	Caustic Scrubber	H2S
			33	0.08	Water scrubber	NH3
19	Diuron	1	33	0.08	Water scrubber	HCl
			NA	NA	Water Scrubber	DMA
20	Pinoxaden	4	33	0.1	Caustic Scrubber	Cl2
			33	0.1	Caustic Scrubber	Br2
			NA	NA	Flame arrestor followed by Blow down tank	H2
			33	0.08	Water scrubber	HCl
			33	0.1	Caustic Scrubber	CO2
21	Pyraclostrobin	2	33	0.1	Caustic Scrubber	Cl2
			33	0.1	Caustic Scrubber	CO2
22	Trifloxystrobin	5	33	0.1	Caustic Scrubber	Br2
			33	0.1	Calcium Hydroxide Scrubber	HF
			33	0.1	Caustic Scrubber	HBr
			33	0.08	Water scrubber	HCl
			33	0.1	Caustic Scrubber	Cl2
23	Indoxacarb	2	33	0.08	Water scrubber	HCl
			33	0.1	Emergency Caustic scrubber	SO2
			NA	NA	Flame arrestor followed by Blow down tank	H2
24	Fipronil	3	33	0.1	Caustic Scrubber	Cl2
			33	0.1	Emergency	SO2

					Caustic scrubber	
			33	0.08	Water scrubber	NH3
25	Imazethapyr	0	NA	NA	Flame arrestor followed by Blow down tank	H2
26	Temephos	2	33	0.1	Caustic Scrubber	Cl2
			33	0.08	Water scrubber	HCl
27	Chloropyriphos	2	33	0.1	Caustic Scrubber	Cl2
			33	0.08	Water scrubber	HCl
28	Chloropyriphos Methyl	2	33	0.1	Caustic Scrubber	Cl2
			33	0.08	Water scrubber	HCl
29	Cartap Hydrochloride	1	NA	NA	Water scrubber	DMA
			33	0.1	Caustic Scrubber	Cl2
			NA	NA	Methanol Scrubber	CH3Cl
30	Imidacloprid	2	33	0.08	Water Scrubber	DMA
			33	0.1	Caustic Scrubber	Cl2
			33	0.08	Water scrubber	HCl
31	Acetamiprid	1	33	0.08	Water scrubber	HCl
			NA	NA	Water scrubber	MMA
32	Clothianidin	5	33	0.1	Caustic Scrubber	Cl2
			33	0.08	Water scrubber	HCl
			33	0.1	Emergency Caustic scrubber	SO2
			33	0.08	Water scrubber	NH3
			33	0.1	Caustic Scrubber	CO2
33	Chlorantraniliprole	3	33	0.1	Caustic Scrubber	Cl2
			33	0.1	Caustic Scrubber	CO2
			NA	NA	Flame arrestor followed by Blow down tank	H2
			33	0.08	Water scrubber	HCl
34	Deltamethrin	4	33	0.1	Caustic Scrubber	Cl2
			33	0.08	Water scrubber	HCl
			33	0.1	Emergency Caustic scrubber	SO2
			33	0.08	Water Scrubber	HBr
35	Cypermethrin	3	33	0.1	Caustic Scrubber	Cl2
			33	0.08	Water scrubber	HCl
			33	0.1	Emergency Caustic scrubber	SO2
36	Alphamethrin	3	33	0.1	Caustic Scrubber	Cl2
			33	0.08	Water scrubber	HCl
			33	0.1	Emergency Caustic scrubber	SO2
37	Permethrin	3	33	0.1	Caustic Scrubber	Cl2
			33	0.08	Water scrubber	HCl
			33	0.1	Emergency Caustic scrubber	SO2

38	Mepiquate Choride	0	NA	NA	Methanol Scrubber	CH3Cl
39	Amino Ethyl Carbazole	0	NA	NA	Flame arrestor followed by Blow down tank	H2
40	Meta Phenoxy Benzyl Alcohol	0	NA	NA	Flame arrestor followed by Blow down tank	H2
41	Meta Phenoxy Benzaldehyde	2	33	0.08	Water scrubber	HCl
			33	0.1	Caustic Scrubber	Cl2
42	Meta Phenoxy Benzaldehyde Acetal	2	33	0.08	Water scrubber	HCl
			33	0.1	Caustic Scrubber	Cl2
43	O-Phenylene Diamine	0	NA	NA	Flame arrestor followed by Blow down tank	H2
44	PEKK	2	33	0.1	Emergency Caustic scrubber	SO2
			33	0.08	Water scrubber	HCl
45	PEK	2	33	0.1	Emergency Caustic scrubber	SO2
			33	0.08	Water scrubber	HCl
46	ABPBI	2	33	0.1	Emergency Caustic scrubber	SO2
			33	0.08	Water scrubber	HCl
47	Carbendazim	2	33	0.08	Water scrubber	NH3
			NA	NA	Flame arrestor followed by Blow down tank	H2
			33	0.08	Water scrubber	HCl
48	Thiamethoxam	1	33	0.08	Water Scrubber	HCl
49	Metalaxyl	3	33	0.08	Water scrubber	HCl
			33	0.1	Emergency Caustic scrubber	SO2
			33	0.08	Water scrubber	NH3
			33	0.1	Water Scrubber	HBr
			33	0.1	Caustic Scrubber	Br2
			33	0.08	Water scrubber	HCl
			33	0.1	Caustic Scrubber	Cl2
50	Hexaconazole	2	33	0.08	Water scrubber	HCl
			33	0.1	Emergency Caustic scrubber	SO2
51	Lambda Cyhalothrin	2	33	0.08	Water scrubber	HCl
			33	0.1	Emergency Caustic scrubber	SO2
52	Difenthiuron	5	33	0.1	Caustic Scrubber	Br2
			33	0.1	Water Scrubber	HBr
			33	0.1	Caustic Scrubber	Cl2
			33	0.08	Water scrubber	HCl

			33	0.08	Water scrubber	NH3
53	Triclopyr Acid / Triclopyr Butotyl Easter	1	33	0.1	Caustic Scrubber	Cl2
54	Azoxystrobin	1	33	0.1	Caustic Scrubber	CO2
55	PV 23	4	NA	NA	Flame arrestor followed by Blow down tank	H2
			33	0.08	Water scrubber	NH3
			33	0.1	Emergency Caustic scrubber	SO2
			33	0.08	Water scrubber	HCl
			33	0.1	Caustic Scrubber	Cl2
56	PR-168	2	33	0.1	Water Scrubber	HBr
			33	0.08	Caustic Scrubber	Br2
57	PR-254	0	NA	NA	Flame arrestor followed by Blow down tank	H2
58	PR-255	0	NA	NA	Flame arrestor followed by Blow down tank	H2
59	PR-122	0	NA	NA	Flame arrestor followed by Blow down tank	H2
60	PV-19	0	NA	NA	Flame arrestor followed by Blow down tank	H2
61	PY-138	2	33	0.1	Emergency Caustic scrubber	SO2
			33	0.08	Water scrubber	NH3
			33	0.1	Caustic Scrubber	CO2
			33	0.1	Caustic Scrubber	Cl2
			33	0.08	Water scrubber	HCl
			33	0.1	Emergency Caustic scrubber	SO2
			NA	NA	Flame arrestor followed by Blow down tank	H2

13. **Details of Solid Waste/ Hazardous Waste Generation and Its Management:** 12 Categories of Hazardous/Solid Wastes and their management & 2 Nos. of Non-Hazardous waste.

Hazardous/Solid Wastes

Sr . No.	Type of Waste	Nature/ Type of solid waste	Hazard ous Waste Catego ry	Existin g Qty (MT/Y ear)	Additio nal Propos ed Qty (MT/Y	Total Qty (MT/Y ear)	Treatment /Disposal
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					ear)		
1	Used/ spent Oil	Liquid	5.1	24	14	38	Collected, Stored, Transported & Disposed by CHWIF/ Co-Processing/Pre-Processing or selling it to Authorized registered recyclers
2	Oil Waste	Solid/Semi-Solid	5.2	16	5.0	21.0	Collected, Stored, Transported & Disposed by CHWIF/ Co-Processing/Pre-Processing or selling it to Authorized registered recyclers
3	Distillation Residues	Solid/Semi-Solid	20.3	6075	21351	27426	Collected, Stored & Transported by disposing it CHWIF/Co-Processing/Pre-Processing
4	Spent solvents	Liquid	29.4	25	85.0	110	Collected, Stored, Transported & Disposed by CHWIF/ Co-Processing/Pre-Processing or selling it to Authorized registered refiners
5	ETP Sludge	Solid	35.3	3500	1022	4522	Collected, Stored & Transported to authorized

							TSDf for land filling
6	Concentration/ Evaporation Residue (MEE Salt/ Solids)	Solid	37.3	6935	66065	73000	Collected, Stored & Transported to authorized TSDf for land filling
7	Oily Waste from ETP	Solid/Semi-Solid	35.4	24	66.0	90.0	Collected, Stored, Transported & Disposed by Incineration/ CHWIF/ Co-Processing/Pre-Processing
8	Spent Catalyst	Solid	29.5	1.2	4.8	6.0	Collected, Stored & Transported to authorized TSDf or sell to registered recyclers
9	Spent activated Carbon	Solid	28.3	103	748.5	851	Collected, Stored & Transported by disposing it CHWIF/Co-Processing/Pre-Processing
10	Discarded barrels/containers/liners a) Drums b) Carboys c) Glass Bottles d) Used contaminated PPEs	Solid	33.1	20000 Nos. / 420.0 MT	30000 Nos. / 772 MT	50000 Nos. / 1192. MT	Collected, Stored, decontaminated & detoxification & Sell to GPCB approved end-users after decontamination/ CHWIF/Authorized recyclers/ Authorized decontamination facility

11	Date expired/ off spec pesticides	Solid	29.3	0	5	5	Collected, Stored & Transported to authorized TSDF
12	Process waste	Solid /Semi-Solid	29.1	250	7897.5	8147.5	Collected, Stored & Transported by disposing it CHWIF/ Co-Processing/Pre-Processing

14. The Budget earmarked towards the Environmental Management Plan (EMP) is ₹ 70.11 Crore (capital) and the Recurring Cost (operation and maintenance) will be about ₹ 150.0 Lakh per annum, Industry proposes to allocate Rs. 1.07625 Crore in next 2 years towards Corporate Social Responsibility

15. Industry will develop Greenbelt over an area of 34.37% i.e., 25,916.92 m² out of total area of the project. Total 75,410.29 m² land area is available at site; out of this area about 25,916.92 m² (34.37 %) area will be covered as greenbelt. Trees will be planted in the plant premises with spacing of 2m x 2m and Approx. 8630 number of trees will be developed accordingly.

16. The PP proposed to set up an Environment Management Cell (EMC) by engaging Site head- GM EHS- Env. Manager - Env. Deputy manager in charge for the functioning of EMC.

17. The PP reported that the total CO₂ generation would be 130817.5 MT/ annum which is equivalent to 3.61 tonne CO₂ eq/tonne production. The company will sequester 15826.1MT/annum eq. CO₂ through greenbelt development within plant premises.

18. The PP submitted the Disaster and On-site and Off-site Emergency Plans in the EIA report.

19. The Total Project Cost will be Rs. 463.50 Crores (Existing – Rs. 320.0 Crores + Additional Rs. 143.5 Crores). M/s. Gharda Chemicals Ltd. will give direct employment to 775 Nos of people based on qualification and requirement. In addition to direct employment, indirect employment shall generate ancillary business to some extent for the local population.

20. The EAC constituted under the provisions of the EIA Notification, 2006 comprising expert members/domain experts in various fields, examined the proposal submitted by the PP in desired format along with the EIA/EMP reports prepared and submitted by the Consultant accredited by the QCI/ NABET on behalf of the PP.

The EAC noted that the PP has given an undertaking to the effect that the data and information given in the application and enclosures are true to the best of his knowledge and belief and no information has been suppressed in the EIA/EMP reports. If any part of data/information submitted is found to be false/ misleading at any stage, the project will be rejected and EC given, if any, will be revoked at the risk and cost of the PP.

The EAC noted that the EIA reports are in compliance of the ToR issued for the project, reflecting the present environmental status and the projected scenario for all the environmental components. The EAC deliberated on the proposed mitigation measures towards Air, Water, Noise and Soil pollutions. The EAC advised that the storage of toxic/explosive raw materials/products shall be undertaken with utmost precautions and following the safety norms and best practices.

The EAC inter-alia, deliberated on the Greenbelt development plan, Fuel, Sewage treatment Plant and advised the PP to submit the following:

- Revised Greenbelt details.
- Undertaking for Usage of agro briquette with imported coal as a fuel in 1:10 ratio, whenever agro briquette are not available, imported coal shall be used as a fuel.
- Process Description for proposed STP.

The PP submitted the above information/documents and the EAC found it to be satisfactory.

The EAC deliberated on the Onsite and Offsite Emergency plans and various mitigation measures to be proposed during implementation also of the project and advised the PP to implement the provisions of the Rules and guidelines issued under the Manufacture, Storage and Import of Hazardous Chemicals (MSIHC) Rules, 1989, as amended time to time, and the Chemical Accidents (Emergency Planning, Preparedness and Response) Rules, 1996.

The EAC deliberated on the proposal with due diligence in the process as notified under the provisions of the EIA Notification, 2006, as amended from time to time and accordingly made the recommendations to the proposal. The expert members of the EAC found the proposal in order and recommended for grant of EC.

The EAC is of the view that its recommendation and grant of EC by the regulatory authority to the project/activity is strictly under the provisions of the EIA Notification 2006 and its subsequent amendments. It does not tantamount/construe to approvals/consent/permissions etc. required to be obtained or standards/conditions to be followed under any other Acts/ Rules/ Subordinate legislations, etc., as may be applicable to the project. The PP shall obtain necessary permission as mandated under the Water (Prevention and Control of Pollution) Act, 1974 and the Air (Prevention and Control of Pollution) Act, 1981, as applicable from time to time, from the State Pollution Control Board, prior to construction & operation of the project.

21. Based on the proposal submitted by the PP and recommendations of the EAC (Industry-3 Sector), the Ministry of Environment, Forest and Climate Change hereby accords **Environmental Clearance for the “Expansion of Agrochemicals (Pesticides) & Organic Chemicals Manufacturing in Existing Unit (from 22750 MTPA to 77450 MTPA) located at Plot No. C-393 to C-396, Sayakha GIDC Estate, Taluka Vagra, District Bharuch, Gujarat by M/s. Gharda Chemicals Ltd.”** under the provisions of the EIA Notification 2006 and its subsequent amendments subject to the compliance of terms and conditions as under:-

A. Specific Conditions:

- (i) The PP shall develop Greenbelt over an area of at least, 25,916.92 m² (34.37%) by planting 9348 saplings within a period of one year of grant of EC. The saplings selected for the plantation should be of sufficient height, preferably 6-ft (about 2 m). The budget earmarked for the plantation shall be kept in separate account and should be audited

annually. PP should annually submit the audited statement along with proof of activities viz. photographs (before & after with geo-location date & time), details of the expert agency engaged, details of species planted, number of species planted, survival rate, density of plantation etc. to the Regional Office of MoEF&CC before 1st July of every year for the activities carried out during the previous year.

- (ii) A separate Environmental Management Cell (having qualified persons with Environmental Science/Environmental Engineering/specialization in the project area) equipped with full-fledged laboratory facilities shall be set up to carry out the Environmental Management and Monitoring functions. PP shall engage Site head- GM EHS- Env. Manager - Env. Deputy manager in charge. In addition to this one safety & health officer as per the qualification given in Factories Act 1948 shall be engaged within a month of grant of EC. PP should annually submit the audited statement of amount spent towards the engagement of qualified persons in EMC along with details of person engaged to the Regional Office of MoEF&CC before 1st July of every year for the activities carried out during previous year.
- (iii) The company shall comply with all the environmental protection measures and safeguards proposed in the documents submitted to the Ministry. All the recommendations made in the EIA/EMP in respect of environmental management, and risk mitigation measures relating to the project shall be implemented. The budget propose under EMP is ₹ 70.11 Crore (Capital cost) and ₹ 150.0 Lakh annum (Recurring cost) shall be kept in separate account and should be audited annually. The PP should submit the annual audited statement along with proof of implementation of activities proposed under EMP duly supported by photographs (before & after with geo-location date & time) and other document as applicable to the Regional Office of MoEF&CC before 1st July of every year for the activities carried out during previous year.
- (iv) Agro briquettes shall be used as a primary fuel and only during the unavailability of agro briquettes, imported coal shall be used as fuel.
- (v) The total water requirement is 8164 KLD of which fresh water requirement of 3447 KLD and will be met from GIDC Water Supply. The PP should ensure that water supply should not be above the permissible limit as mentioned in the letter and fresh water shall be withdrawn only after obtaining valid agreement from Concerned Authority. The PP should submit the details of utilization to the Integrated Regional Office (IRO), MoEF&CC before 1st July of every year for the activities carried out during the previous year.
- (vi) The wastewater generation shall be 5098.0 KLD (Existing – 319 KLD + Additional proposed - 4779 KLD). Wastewater generated shall be segregated into high concentration and low concentration streams. High concentration stream shall be treated in Multiple Effect Evaporator (MEE) and low concentration stream will be treated in ETP followed by Reverse Osmosis (RO). Wastewater generated (5098 KLD) shall be segregated into high concentration and low concentration streams. High concentration stream shall be treated in Multiple Effect Evaporator (MEE) and low concentration stream shall be treated in ETP followed by Reverse Osmosis (RO). Out of 5098 KLD, 1399 KLD shall be discharged to deep sea via CETP, 157 KLD solids from MEE shall be disposed to CHWTSDF, 63 KLD treated sewage shall be used for tree plantation & remaining 3454 KLD treated effluent along with 1200 KLD steam condensate (Total 4617 KLD) shall be

recycled/reused back in process. Domestic waste water 70 KLD shall be treated in STP and 63 KLD shall be reused for Gardening.

- (vii) No banned chemicals shall be manufactured by the project proponent. No banned raw materials shall be used in the unit. The project proponent shall adhere to the notifications/guidelines of the Government in this regard.
- (viii) The project proponent shall comply with the environment norms for Pesticide Industry as notified by the Ministry of Environment, Forest and Climate Change, vide GSR 446 (E), dated 13.6.2011 under the provisions of the Environment (Protection) Rules, 1986.
- (ix) The project proponent shall comply with the environment norms for synthetic organic chemical as notified by the Ministry of Environment, Forest and Climate Change, vide GSR 608 (E), dated 21. 7.2010 under the provisions of the Environment (Protection) Rules, 1986.
- (x) The project proponent shall utilize modern technologies for capturing of carbon emitted and shall also develop carbon sink/carbon sequestration resources capable of capturing more than emitted. The implementation report shall be submitted to the IRO, MoEF&CC in this regard.
- (xi) All necessary precautions shall be taken to avoid accidents and action plan shall be implemented for avoiding accidents. The project proponent shall implement the onsite/offsite emergency plan/mock drill etc. and mitigation measures as prescribed under the rules and guidelines issued in the Manufacture, Storage and Import of Hazardous Chemicals (MSIHC) Rules, 1989, as amended time to time, and the Chemical Accidents (Emergency Planning, Preparedness and Response) Rules, 1996.
- (xii) The volatile organic compounds (VOCs)/Fugitive emissions shall be controlled at 99.97 % with effective chillers/modern technology. Regular monitoring of VOCs shall be carried out.
- (xiii) The PP shall explore possibilities for recycling and reusing of treated water in the unit to reduce the fresh water demand and waste disposal.
- (xiv) The storage of toxic/hazardous raw material shall be bare minimum with respect to quantity and inventory. Quantity and days of storage shall be submitted to the Regional Office of Ministry and SPCB along with the compliance report.
- (xv) The occupational health centre for surveillance of the worker's health shall be set up. The health data shall be used in deploying the duties of the workers. All workers & employees shall be provided with required safety kits/mask for personal protection.
- (xvi) Training shall be imparted to all employees on safety and health aspects for handling chemicals. Safety and visual reality training shall be provided to employees. Action plan for mitigation measures shall be properly implemented based on the safety and risk assessment studies.

- (xvii) The unit shall make the arrangement for protection of possible fire hazards during manufacturing process in material handling. Fire-fighting system shall be as per the norms.
- (xviii) The solvent management shall be carried out as follows: (a) Reactor shall be connected to chilled brine condenser system. (b) Reactor and solvent handling pump shall have mechanical seals to prevent leakages. (c) Solvents shall be stored in a separate space specified with all safety measures. (d) Proper earthing shall be provided in all the electrical equipment wherever solvent handling is done. (e) Entire plant shall be flame proof. The solvent storage tanks shall be provided with breather valve to prevent losses. (f) All the solvent storage tanks shall be connected with vent condensers with chilled brine circulation.
- (xix) The PP shall undertake waste minimization measures as below (a) Metering and control of quantities of active ingredients to minimize waste; (b) Reuse of by-products from the process as raw materials or as raw material substitutes in other processes. (c) Use of automated filling to minimize spillage. (d) Use of Close Feed system into batch reactors. (e) Venting equipment through vapor recovery system. (f) Use of high pressure-hoses for equipment cleaning to reduce wastewater generation.

B. General Conditions:

- (i) No further expansion or modifications in the plant, other than mentioned in the EIA Notification, 2006 and its amendments, shall be carried out without prior approval of the Ministry of Environment, Forest and Climate Change/SEIAA, as applicable. In case of deviations or alterations in the project proposal from those submitted to this Ministry for clearance, a fresh reference shall be made to the Ministry/SEIAA, as applicable, to assess the adequacy of conditions imposed and to add additional environmental protection measures required, if any.
- (ii) The Project proponent shall strictly comply with the rules and guidelines issued under the Manufacture, Storage and Import of Hazardous Chemicals (MSIHC) Rules, 1989, as amended time to time, the Chemical Accidents (Emergency Planning, Preparedness and Response) Rules, 1996, and Hazardous and Other Wastes (Management and Trans-Boundary Movement) Rules, 2016 and other rules notified under various Acts.
- (iii) The energy source for lighting purpose shall be preferably LED based, or advanced having preference in energy conservation and environment betterment.
- (iv) The overall noise levels in and around the plant area shall be kept well within the standards by providing noise control measures including acoustic hoods, silencers, enclosures etc. on all sources of noise generation. The ambient noise levels shall conform to the standards prescribed under the Environment (Protection) Act, 1986 Rules, 1989 viz. 75 dBA (day time) and 70 dBA (night time).
- (v) The company shall undertake all relevant measures for improving the socio-economic conditions of the surrounding area. The activities shall be undertaken by involving local villages and administration. The company shall undertake eco-developmental measures including community welfare measures in the project area for the overall improvement of the environment.

- (vi) The company shall earmark sufficient funds towards capital cost and recurring cost per annum to implement the conditions stipulated by the Ministry of Environment, Forest and Climate Change as well as the State Government along with the implementation schedule for all the conditions stipulated herein. The funds so earmarked for environment management/ pollution control measures shall not be diverted for any other purpose.
- (vii) A copy of the clearance letter shall be sent by the project proponent to concerned Panchayat, Zilla Parishad/Municipal Corporation, Urban local Body and the local NGO, if any, from whom suggestions/ representations, if any, were received while processing the proposal.
- (viii) The project proponent shall also upload/submit six monthly reports on Parivesh Portal on the status of compliance of the stipulated Environmental Clearance conditions including results of monitored data to the respective Integrated Regional Office of MoEF&CC, the respective Zonal Office of CPCB and SPCB. A copy of Environmental Clearance and six monthly compliance status report shall be posted on the website of the company.
- (ix) The environmental statement for each financial year ending 31st March in Form-V as is mandated shall be submitted to the concerned State Pollution Control Board as prescribed under the Environment (Protection) Rules, 1986, as amended subsequently, shall also be put on the website of the company along with the status of compliance of environmental clearance conditions and shall also be sent to the respective Integrated Regional Office of MoEF&CC by e-mail.
- (x) The project proponent shall inform the public that the project has been accorded environmental clearance by the Ministry and copies of the clearance letter are available with the SPCB/Committee and may also be seen at Website of the Ministry and at <https://parivesh.nic.in/>. This shall be advertised within seven days from the date of issue of the clearance letter, at least in two local newspapers that are widely circulated in the region of which one shall be in the vernacular language of the locality concerned and a copy of the same shall be forwarded to the concerned Regional Office of the Ministry.
- (xi) The project authorities shall inform the Regional Office as well as the Ministry, the date of financial closure and final approval of the project by the concerned authorities and the date of start of the project.
- (xii) This Environmental clearance is granted subject to final outcome of Hon'ble Supreme Court of India, Hon'ble High Court, Hon'ble NGT and any other Court of Law, if any, as may be applicable to this project.

22. The Ministry reserves the right to stipulate additional conditions, if found necessary at subsequent stages and the project proponent shall implement all the said conditions in a time bound manner. The Ministry may revoke or suspend the environmental clearance, if implementation of any of the above conditions is not found satisfactory.

23. Concealing factual data or submission of false/fabricated data and failure to comply with any of the conditions mentioned above may result in withdrawal of this clearance and attract action under the provisions of the Environment (Protection) Act, 1986.

24. Any appeal against this environmental clearance shall lie with the National Green Tribunal, if preferred, within a period of 30 days as prescribed under Section 16 of the National Green Tribunal Act, 2010.

25. The above conditions shall be enforced, *inter-alia* under the provisions of the Water (Prevention & Control of Pollution) Act, 1974, the Air (Prevention & Control of Pollution) Act, 1981, the Environment (Protection) Act, 1986, Hazardous and Other Wastes (Management and Transboundary Movement) Rules, 2016 and the Public Liability Insurance Act, 1991 along with their amendments and Rules and any other orders passed by the Hon'ble Supreme Court of India / High Courts and any other Court of Law relating to the subject matter.

This issues with approval of the competent authority.

(Dr. M. Ramesh)
Scientist 'E'

Copy to:

1. The Principal Secretary, Forests & Environment Department, Government of Gujarat, Sachivalaya, 8th Floor, Gandhi Nagar - 382 010 (Gujarat).
2. The Deputy Director General of Forests (C) Ministry of Env., Forest and Climate Change, Integrated Regional Office, Gandhi Nagar, A-Wing – 407 & 409, Aranya Bhawan, Near CH-3 Circle, Sector-10A, Gandhi Nagar - 382010
3. The Chairman, Central Pollution Control Board Parivesh Bhavan, CBD-cum-Office Complex, East Arjun Nagar, Delhi -32
4. The Member Secretary, Gujarat Pollution Control Board, Paryavaran Bhawan, Sector 10 A, Gandhi Nagar-382 043 (Gujarat)
5. The Member Secretary, Central Ground Water Authority, Jamnagar House, 18/11, Man Singh Road Area, New Delhi, Delhi 110001
6. The District Collector, District Bharuch, Gujarat.
7. Guard File/Monitoring File/PARIVESH.

(Dr. M. Ramesh)
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