



**Name of Project** : Environmental clearance for Viscose Staple Fibre (VSF) plant, Sulphuric Acid, Carbon-Di-sulphide & Power Generation  
**Environment Clearance letter no. & Date** : J-11011/463/2007-IA II (I), dated 20-12-2007  
**Address for Correspondence** : Plot No. 1, GIDC Industrial Area, Vilayat, Taluka: Vagra, District: Bha (Gujarat)

S.No	Conditions	Compliance Status																												
<b>Specific Conditions</b>																														
1.	The project authority shall maintain emission limit of 50 kg/Ton of Viscose Staple Fibre (VSF) for Carbon di-sulphide (CS <sub>2</sub> )	We are complying the said stipulation by maintaining emission limits below 50 Kg/T of VSF for CS <sub>2</sub> . The Stack monitoring results are enclosed as <b>Annexure 1</b>																												
2.	A guard/polishing pond shall be provided before discharge of treated waste water into GIDC pipeline for discharge into sea and TOC should continuously monitored	2 nos. of guard ponds, each of (L: 90 m, B: 60 m, SWD: 6.5m) equivalent to 50,000m <sup>3</sup> capacity are installed, which is suitable for storage of 48 hrs. have been provided before discharge of treated waste water into GIDC pipeline for discharge into Sea. Photograph of guard pond is as below.  TOC is being regularly monitored by the TOC meter installed. The readinds of the TOC along with the photograph of TOC is as below.																												
																														
<b>TOC Meter Make: - Shimanzu</b>																														
<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th>Month</th> <th>Min</th> <th>Max</th> <th>Average</th> </tr> </thead> <tbody> <tr> <td>Apr-19</td> <td>42</td> <td>70</td> <td>56</td> </tr> <tr> <td>May-19</td> <td>44</td> <td>90</td> <td>67</td> </tr> <tr> <td>June-19</td> <td>58</td> <td>86</td> <td>72</td> </tr> <tr> <td>July-19</td> <td>40</td> <td>83</td> <td>62</td> </tr> <tr> <td>Aug-19</td> <td>37</td> <td>80</td> <td>59</td> </tr> <tr> <td>Sep-19</td> <td>58</td> <td>86</td> <td>72</td> </tr> </tbody> </table>			Month	Min	Max	Average	Apr-19	42	70	56	May-19	44	90	67	June-19	58	86	72	July-19	40	83	62	Aug-19	37	80	59	Sep-19	58	86	72
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3.	The project authorities shall install at least 11 multiple effect evaporator	We have installed 10 nos. of more efficient (less specific																												

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	(MEE) to achieve higher than 65% recovery of Sodium Sulphate	steam consumption) 14 stage multiple effect evaporator (MEE) having higher evaporation Capacity in place earlier visualized 11 small MEE's of 18 m3/hr. Total evaporation is 280 m3/hr. instead 198 m3/hr.						
4.	Electrostatic Precipitators (ESP's) to power plant boiler shall be provided to control particulate matter. 3-stage condensing system for recovery of CS <sub>2</sub> , Scrubber to Acid plant chimney, klaus kiln recovery system to recover Sulphur from CS <sub>2</sub> plant gases, followed by lime water absorber shall be provided, Monitoring arrangement shall be provided with the scrubber & condenser vents and shall be monitored monthly.	Electrostatic Precipitators (ESP's) to power plant boiler has provided to control particulate matter as Chemical division have installed CPP. EC has been amended through Chemical division. Pl. refer <b>Annexure-2</b> . We have installed 3 stage condensing system with all 4 spinning lines and Caustic scrubber has installed with Acid plant chimney. Klaus kiln recovery system to recover Sulphur from CS <sub>2</sub> plant gases installed for achieving > 96% Sulphur recovery efficiency.						
5.	Monitoring arrangement shall be provided with the scrubber & condenser vents and shall be monitored monthly. Report shall be submitted to Ministry's regional office, Bhopal, CPCB & GPCB	Monitoring arrangement provided for scrubbers & condenser vents. Following are the details tabulated under.  Reports are being submitted to MOEF as <b>Annexure-3</b> to compliance report every six months. Last compliance report submitted in May-18.						
Month	Spg. Aft. Treatment (Line-1 Exhaust Vent-1)	Spg. Plant Aft (Line 1 - Exhaust Vent- 2 )	Spg. Plant Aft (Line 2 - Exhaust Vent 1)	Spg. Plant Aft (Line 2 - Exhaust Vent- 2 )	Spg. Plant Aft (Line 3 - Exhaust Vent 1)	Spg. Plant Aft (Line 3 - Exhaust Vent- 2 )	Spg. Plant Aft (Line 4 - Exhaust Vent 1)	Spg. Plant Aft (Line 4 - Exhaust Vent- 2 )
Apr-19	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
May-19	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
June-19	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
July-19	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
Aug-19	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
Sep-19	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
<b>Min</b>	<b>&lt; 5.0</b>	<b>&lt;5.0</b>	<b>&lt; 5.0</b>	<b>&lt;5.0</b>	<b>&lt; 5.0</b>	<b>&lt;5.0</b>	<b>&lt; 5.0</b>	<b>&lt; 5.0</b>
<b>Max</b>	<b>&lt; 5.0</b>	<b>&lt;5.0</b>	<b>&lt; 5.0</b>	<b>&lt;5.0</b>	<b>&lt; 5.0</b>	<b>&lt;5.0</b>	<b>&lt; 5.0</b>	<b>&lt; 5.0</b>
6.	The technology employed shall achieve standards notified by the Ministry for the Rayon Industry vide Gazette Notification no. 195, dated 16th Oct-2006, other than CS <sub>2</sub> . The Company shall monitor CS <sub>2</sub> & H <sub>2</sub> S regularly and submit data on the emission levels to the Ministry and its Regional office at Bhopal, GPCB and CPCB. Provision shall be made for retrofit	As per Gazette notification, CS <sub>2</sub> emission of 125 Kgs/T F is to be met. New control technology using organic solvent based on absorption and desorption to recover CS <sub>2</sub> from exhaust gases installed which is helping in achieving CS <sub>2</sub> emission level at much lower level.  CS <sub>2</sub> & H <sub>2</sub> S is being monitored regularly. Emission details for Apr'19 to Sep'19 is tabulated below.  In future if required, company is committed to install						

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	additional equipment's, if necessary in future	additional equipment. At present there is no such requirement.																																			
	<table border="1"> <thead> <tr> <th rowspan="2">Month &amp; Date of Sample</th> <th colspan="2">Rayon Plant</th> </tr> <tr> <th>CS<sub>2</sub> (Kg/Ton of Fibre)</th> <th>H<sub>2</sub>S (mg/nm<sup>3</sup>)</th> </tr> </thead> <tbody> <tr> <td>Consent Value</td> <td>50</td> <td>-</td> </tr> <tr> <td>Apr-19</td> <td>44</td> <td>138</td> </tr> <tr> <td>May-19</td> <td>40</td> <td>139</td> </tr> <tr> <td>June-19</td> <td>38</td> <td>125</td> </tr> <tr> <td>July-19</td> <td>43</td> <td>127</td> </tr> <tr> <td>Aug-19</td> <td>45</td> <td>129</td> </tr> <tr> <td>Sep-19</td> <td>47</td> <td>119</td> </tr> <tr> <td>Min</td> <td>38</td> <td>119</td> </tr> <tr> <td>Max</td> <td>47</td> <td>139</td> </tr> <tr> <td>Avg</td> <td>43</td> <td>130</td> </tr> </tbody> </table>	Month & Date of Sample	Rayon Plant		CS <sub>2</sub> (Kg/Ton of Fibre)	H <sub>2</sub> S (mg/nm <sup>3</sup> )	Consent Value	50	-	Apr-19	44	138	May-19	40	139	June-19	38	125	July-19	43	127	Aug-19	45	129	Sep-19	47	119	Min	38	119	Max	47	139	Avg	43	130	
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7.	<p>The effluent should be treated in ETP having primary &amp; secondary treatment facilities and treated effluent should meet the standards to be prescribed by the GPCB or under E. P. Act-1986 whichever are more stringent.</p> <p>Total quantity of effluent should not exceed 60m<sup>3</sup>/ ton of production. The production shall be regulated to match the permitted discharge quantity by GIDC/GPCB</p>	<p>Full Fledged ETP installed, which comprises of Primary, Extended aeration activated sludge process and secondary treatment.</p> <p>The treated effluents meet the required standards and the analysis report is enclosed as <b>Annexure 4</b></p> <p>The quantity of effluent discharged is 20.66 m<sup>3</sup> / Ton of Fibre. Against stipulation of 60m<sup>3</sup>/TF.</p> <p><b>Avg. water intake</b> : 13718 m<sup>3</sup>/day</p> <p><b>Effluent discharge</b> : 9689 m<sup>3</sup>/day (For all 3 units)</p> <p>Following are the details tabulated in <b>Table No.11</b></p>																																			
8.	<p>The project authorities shall produce the copy of agreement with GIDC for discharge of treated wastewater to the Ministry &amp; its Regional office within three months and submit the same to Regional office</p>	<p>Agreement with GIDC for water supply &amp; discharge of treated waste water in GIDC chamber was done. A Copy of same was submitted along with earlier six monthly compliance report to MoEF&amp;CC.</p> <p><b>Following are the GIDC offer cum allotment letter details;</b></p> <table border="1"> <tbody> <tr> <td>1) Letter No.</td> <td>GIDC/POJ/MKT/GRASIM/575 Dated 06<sup>th</sup> December-2006</td> </tr> <tr> <td>Agreement for Water Supply</td> <td>15.60 MLD</td> </tr> <tr> <td>Effluent Discharge</td> <td>12.48 MLD</td> </tr> </tbody> </table>	1) Letter No.	GIDC/POJ/MKT/GRASIM/575 Dated 06 <sup>th</sup> December-2006	Agreement for Water Supply	15.60 MLD	Effluent Discharge	12.48 MLD																													
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Agreement for Water Supply	25.00 MLD							
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9.	The project authorities shall take up the in-house or through IIT's research studies for further reduction of CS <sub>2</sub> emission below 50 Kg/ Ton of production of VSF within three months and submit the same to Regional office.	<p data-bbox="824 680 1537 785">In house research studies done and many steps taken to further reduce the CS<sub>2</sub> emission level. Some of the initiatives taken are :</p> <ol data-bbox="867 827 1537 1058" style="list-style-type: none"> <li>1) Control technology using organic solvent based on absorption and desorption to recover CS<sub>2</sub> from exhaust gases installed.</li> <li>2) Natural Gas based CS<sub>2</sub> plant installed in place of conventional charcoal process to avoid CS<sub>2</sub> emission from CS<sub>2</sub> plant.</li> </ol> <p data-bbox="824 1058 1537 1121">Above information is submitted to MOEF through letter, dated 05.11.18 Please refer as <b>Annexure-6.</b></p> <p data-bbox="824 1163 1537 1352">Ambient air quality is being monitored regularly for CS<sub>2</sub> &amp; H<sub>2</sub>S emissions, 4 nos. ambient air quality monitoring stations (covering all directions) placed in consultation with the GPCB. CS<sub>2</sub> &amp; H<sub>2</sub>S emission are well below the prescribed standards.</p>						
10.	The industry shall measure ambient air quality for CS <sub>2</sub> , and H <sub>2</sub> S at the 3 ambient air quality monitoring stations set up in consultation with the GSPCB to ensure CS <sub>2</sub> and H <sub>2</sub> S emission not exceed 100 microgram/m <sup>3</sup> and 150 microgram/m <sup>3</sup> .	<p data-bbox="824 1373 1537 1562">Ambient air quality is being monitored regularly for CS<sub>2</sub> &amp; H<sub>2</sub>S emissions, 4 nos. ambient air quality monitoring stations (covering all directions) placed in consultation with the GPCB. CS<sub>2</sub> &amp; H<sub>2</sub>S emission are well below the prescribed standards.</p> <p data-bbox="824 1583 1537 1646">Monitoring results enclosed as <b>Annexure 7.</b></p>						
11.	The Solid & Hazardous waste shall be segregated according to its calorific contents and stored separately for treatment and disposal	<p data-bbox="824 1656 1537 1877">Solid / Hazardous waste being categorized as per guideline of GPCB consent, treatment &amp; disposal practice is followed accordingly. We are member of BEIL, Dahej for transportation &amp; disposal of hazardous waste ; Following are the Disposal details tabulated below</p>						

S.No	Conditions		Compliance Status
Type of waste	Category	Treatment /Disposal	
Chemical sludge from ETP	34.3	Collection, storage, transportation, disposal at Cement Industries/ TSDf-BEIL	
Used Oil	5.1	Collection, storage, transportation, disposal by selling to registered refiners.	
Discarded container	33.3	Collection storage, transportation, disposal by selling to vendors after detoxification	
Discarded bags/liner	33.3	Collection, storage, transportation, disposal by selling to vendors after detoxification	
Spent catalyst from H <sub>2</sub> SO <sub>4</sub> plant	17.2	Collection, storage, transportation, disposal to TSDf-BEIL	
Spent catalyst from H <sub>2</sub> SO <sub>4</sub> plant	34.2	Collection, storage, transportation, disposal to TSDf-BEIL	
12.	Fly Ash generated from CPP shall be utilize as per fly ash notification 1999 and subsequent amendment in 2003.	We are utilizing 100% fly ash as per guidelines.	

<p>13.</p>	<p>Green belt development 150 Acre out of 567 Acre to mitigate the effect of fugitive emission all around the plant. The development of green belt along the boundary wall and two additional rows in predominant wind direction shall be provided in consultation with the local DFO as per the CPCB guideline.</p>	<p>In order to achieve 33% greenbelt, we have developed greenbelt in our factory complex along the boundary wall and open space area. Total 58,000 nos. tree have been planted till Sep-2019.</p> <p>We are planning to plant &gt; 15,000 trees in FY-21 and to cover 33% of total plant area the detail action plan are Tabulated below. We have developed greenbelt along with boundary wall &amp; planted different plant species in campus area. Plant species were selected as per the directives of CPCB &amp; DFO.</p> <p><b>Existing Plantation Species:</b></p> <p>Neem (<i>Azadirachta indica</i>), Kasood (<i>Cassia siamea</i>), Pine/Junglisaru (<i>Casuarina equisetifolia</i>), Orchid tree (<i>Bauhinia blakeana</i>), Gulmohar (<i>Delonix regia</i>), Rain tree (<i>Samanea saman</i>), Yellow Gulmohar (<i>Peltophorum ferrugineum</i>), Bottle brush (<i>Callistemon sp.</i>), Earleaf Acacia (<i>Acacia auriculiformis</i>), Kadamb (<i>Neolamarckia cadamba</i>), Basant Rani (<i>Tabebuia rosea</i>), Safeda (<i>Eucalyptus</i>), Bougainvillea <i>spectabilis</i>, Lawn Plantation and Shrubbery.</p> <p><b>Proposed Plantation Species:</b>Neem (<i>Azadirachta indica</i>), Kasood (<i>Cassia siamea</i>), Pine/Junglisaru (<i>Casuarina equisetifolia</i>), Orchid tree (<i>Bauhinia blakeana</i>), Saptparni (<i>Alstonia scholaris</i>), Gulmohar (<i>Delonix regia</i>), Rain tree (<i>Samanea saman</i>), Shisham (<i>Dalbergia sissoo</i>), Bel (<i>Aegle marmelos</i>), Arjun tree (<i>Terminalia arjuna</i>), Cassia fistula (<i>Amaltas</i>), Yellow Gulmohar (<i>Peltophorum ferrugineum</i>), Bottle brush (<i>Callistemon sp.</i>), Kadamb (<i>Neolamarckia cadamba</i>), Semal/Kapok (<i>Bombax ceiba</i>), Jamun (<i>Syzygium cumini</i>), Apple blossom tree (<i>Cassia javanica</i>), Sausage tree (<i>Kigelia pinnata</i>), Basant Rani (<i>Tabebuia rosea</i>), Morpankhi (<i>Thuja occidentalis</i>), Safeda (<i>Eucalyptus</i>), Guh babool (<i>Acacia farnesiana</i>), Kaner (<i>Nerium indicum</i>), Champa (<i>Plumeria</i></p>
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		<p><i>rubra</i>), Holy basil (<i>Ocimum tenuiflorum</i>), Jarul (<i>Lagerstroemia speciosa</i>), <i>Bougainvillea spectabilis</i>, Lemon (<i>Citrus lemon</i>), Sankuppi (<i>Clerodendrum inerme</i>), Lawn Plantation and Shrubbery etc.</p> <p><b>Plant species for Odor management :</b> Neem (<i>Azadirachta indica</i>), Saptparni (<i>Alstonia scholaris</i>), Guh babool (<i>Acacia farnesiana</i>), Morpankhi (<i>Thuja occidentalis</i>), <i>Bougainvillea</i>(<i>Bougainvillea spectabilis</i>), Lemon (<i>Citrus lemon</i>), Kaner (<i>Nerium indicum</i>), Mehndi (<i>Lawsonia inermis</i>), Champa (<i>Plumeria rubra</i>), Holy basil (<i>Ocimum tenuiflorum</i>), Tulsi (<i>Ocimum sanctum</i>), Sankuppi (<i>Clerodendrum inerme</i>), Jasmine tree (<i>Plumeria alba</i>), Jarul (<i>Lagerstroemia speciosa</i>), Gurhal (<i>Hibiscus rosa sinensis</i>), Bunchgrass (<i>Vetiveria zizanioides</i>) etc.</p> <p><b>Gaseous emission (SO<sub>2</sub> &amp; NO<sub>x</sub>) tolerant species:</b>Neem (<i>Azadirachta indica</i>), Bel (<i>Aegle marmelos</i>), Kasood (<i>Cassia siamea</i>), Earleaf Acacia (<i>Acacia auriculiformis</i>), Saptparni (<i>Alstonia scholaris</i>), Aldu (<i>Ailanthus excelsa</i>), Siris (<i>Albizia lebbek</i>), Shisham (<i>Dalbergia sissoo</i>), Pipal (<i>Ficus religiosa</i>), White fig (<i>Ficus infectoria</i>), Maulsari (<i>Mimusops elengi</i>), Kaner (<i>Nerium indicum</i>), Jarul (<i>Lagerstroemia speciosa</i>) etc.</p>
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		Table No. 15				
		Sr. No	Duration	Area (Acre.) for Plantation	Number of Plant	
		1	Existing (Till FY; 2017-18)	60	37,500 Plants	
		2	2018-19	25	15,000 Plants	
		3	2019-20	25	15,000 Plant	
		4	2020-21	25	15,000 Plant	
		5	2021-223	25	15,000 Plant	
		6	2022-23	25	15,000 Plant	
		<b>Total=&gt;</b>		<b>185</b>	<b>1,12,500 Plant</b>	
14.	The project proponent shall comply with the environmental protection measures and safeguards recommended in the EIA/EMP					Total project cost was Rs. 1200 Crores as mentioned in EC. As committed in the EIA/EMP, Unit has been allocated capital cost Rs. 170.5 Crores and recurring cost Rs. 15.5 Crores per annum respectively for

		<p>implementations of environmental pollution control measures as per condition stipulated by the MoEF&amp;CC &amp; state government. Detailed EIA/EMP report is explained below &amp; Capex – Opex Details are tabulated under:</p> <table border="1" data-bbox="820 352 1537 1020"> <thead> <tr> <th colspan="6">Table No. 16</th> </tr> <tr> <th>Sl.</th> <th>Particular</th> <th>Capex</th> <th>Opex FY-17</th> <th>Opex FY-18</th> <th>Opex FY-19</th> </tr> </thead> <tbody> <tr> <td>1</td> <td>Effluent treatment Plant</td> <td>79.00</td> <td>11.50</td> <td>10.56</td> <td>11.0</td> </tr> <tr> <td>2</td> <td>Air Pollution Control</td> <td>91.00</td> <td>03.50</td> <td>04.00</td> <td>3.3</td> </tr> <tr> <td>3</td> <td>Green belt development</td> <td>00.50</td> <td>00.50</td> <td>00.55</td> <td>1.3</td> </tr> <tr> <td>4</td> <td>Waste Management</td> <td>01.50</td> <td>00.50</td> <td>00.60</td> <td>1.6</td> </tr> <tr> <td colspan="2"><b>Total Amount</b></td> <td><b>172.00</b></td> <td><b>16.00</b></td> <td><b>15.71</b></td> <td><b>17.2</b></td> </tr> </tbody> </table>	Table No. 16						Sl.	Particular	Capex	Opex FY-17	Opex FY-18	Opex FY-19	1	Effluent treatment Plant	79.00	11.50	10.56	11.0	2	Air Pollution Control	91.00	03.50	04.00	3.3	3	Green belt development	00.50	00.50	00.55	1.3	4	Waste Management	01.50	00.50	00.60	1.6	<b>Total Amount</b>		<b>172.00</b>	<b>16.00</b>	<b>15.71</b>	<b>17.2</b>
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2	Air Pollution Control	91.00	03.50	04.00	3.3																																							
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15.	<p>The project authorities shall obtain the membership of TSDF and waste water disposal facility and copy of the same shall be submitted to the GPCB and Ministries regional office at Bhopal within three months.</p>	<p>We have obtained the membership of TSDF and waste water disposal facility and copy of the same has submitted to the GPCB and Ministries regional office at Bhopal regularly with six monthly compliance reports</p> <p>Membership with TSDF for waste disposal,</p> <p><b>TSDF Name:</b> - Bharuch Enviro Infrastructure Limited, Dahej.</p> <p><b>Ref :</b> -BEIL/ANK/2019</p> <p><b>Membership Qty:</b> -3500Ton/Annum</p> <p>Membership copy is attached herewith as <b>Annexure-10</b></p> <p>Membership copy is attached for waste water disposal through GIDC pipeline, Pl. refer <b>Annexure-1</b></p>																																										
16.	<p>Occupational health surveillance of the workers shall be carried out on a regular basis and records shall be maintained as per the factories Act.</p>	<p>100% employees undergo with occupational health surveillance every 6 month / 12 month depending on exposure. Record is available with Occupational Health Centre.</p> <p>No one is suffering from any occupational health related</p>																																										



		disease.
17.	A monitoring mechanism for water / air quality , production & crop pattern around the plant shall be adopted and comparative status shall be reported annually to the Ministries Regional office, GPCB & CPCB	Water, Air quality & production is being monitored regularly and compared with base line. Same is being reported to Ministries Regional office on six monthly basis and submitting reports to GPCB on monthly basis for the same.  refer monthly data from Unistar Test Report <b>Annexure – 4</b>
	<b>General Condition: -</b>	
1.	The project authorities must strictly adhere to the stipulations of the SPCB/State Government or any statutory body	All stipulations made by GPCB in various consent and authorizations are strictly complied.
1.	No expansion or modifications in the plant shall be carried out without prior approval of the Ministry of Environment and Forests. In case of deviations or alterations in the project proposal from those submitted to the Ministry for clearance, a fresh reference shall be made to the Ministry to access the adequacy of conditions imposed and to add additional environmental protection measures required, if any.	Noted. No further expansion or modifications in the plant will be carried out without prior approval of the Ministry of Environment, Forest and Climate Change
1.	The gaseous emission (SO <sub>2</sub> , Nox, H <sub>2</sub> S & CS <sub>2</sub> ) and PM along with RSPM levels from various process units shall conform to the standards prescribed by the concerned authorities from time to time. At no time, the emission shall exceed the prescribed limits. In the event of failure of any pollution control system adopted by the unit, the unit shall be immediately put of the operation and shall not be restarted until the desired efficiency has been achieved	Gaseous emission is monitored regularly and results confirm to the standards specified by both GPCB and CPCB Monthly.  Interlocking facility is being provided in the pollution control equipment so that in the event of the pollution control equipment not working, the respective unit(s) is stopped automatically.
1.	The location of Ambient Air Quality (AAQ) monitoring stations shall be reviewed in consultation with SPCB and additional shall be installed, if required, in the downwind direction as well as where maximum ground level concentration is anticipated.	The location of Ambient Air Quality (AAQ) monitoring stations have been reviewed& there are 4 nos. AAQ monitoring stations installed in consultation with GPCB in nearby 4 villages, at Derol, Vilayat, Sarnar and Argama within 2-3 kms radius.

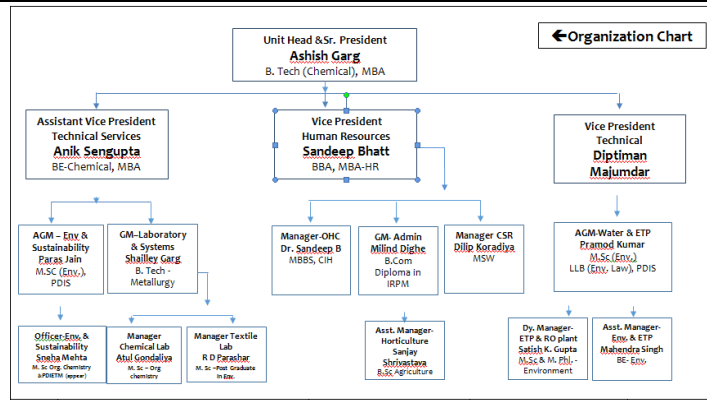
7.	<p>Dedicated scrubbers and stack of appropriate height as per CPCB guidelines shall be provided to control the emissions from various stacks/vents. The scrubber water shall be sent to ETP for further treatment.</p>	<p>Dedicated scrubbers and stack of appropriate height as per CPCB guidelines are provided to control the emissions from various stacks/vents. The scrubber water is routed through ETP.</p>
8.	<p>All the chemicals / solvents storage tank shall be under negative pressure to avoid any leakages. Breather valve, N2 blanketing and secondary condensers with brine chilling system shall be provided for all the storage tanks to minimize vapor loses. All liquid raw material shall be stored in storage tanks and drums.</p>	<p>All storage tanks are suitably designed to avoid leakages for storage under atmospheric conditions. CS2 is stored under water due its volatile nature. Dykes re provided at all chemical storage area as per guidelines to arrest spillages / leaks with Emergency response plan for any such event.</p>
9.	<p>The company shall undertake following waste minimization measures;</p> <ul style="list-style-type: none"> <li>• Metering &amp; control of quantities of active ingredients to minimize waste</li> <li>• Reuse of by-products from the process as raw material or as RM substitution in other processes</li> <li>• Use of "closed feed" system into batch reactors</li> <li>• Venting equipment through vapor recovery system</li> </ul>	<ul style="list-style-type: none"> <li>• Metering &amp; measurement system is in place. Reduction in wastage is also reflected in specific consumption of chemicals</li> <li>• Sodium Sulphate is bye-product. Though it is not used in our process, it is being utilized by detergent, glass, &amp; paper industries</li> <li>• Chemicals such as Caustic, Sodium hypochlorite, Sulphuric acid, Carbon disulphide is transported through pipelines. Sodium sulphate is bagged through automatic bagging M/c.</li> <li>• Not Applicable as ours is continuous process</li> <li>• There is one CS2 recovery system/machine (total 4 nos.) wherein CS2 is being recovered by condensation.</li> </ul>
10.	<p>Fugitive emissions in the work zone environment, product &amp; raw materials storage area shall be regularly monitored. The emissions shall confirm to the limits imposed by SPCB/ CPCB</p>	<p>Fugitive emissions in work zone environment &amp; storage area are monitored by our Lab on monthly basis and are well within stipulated norms.</p>
11.	<p>The project authorities shall strictly comply with the rules and</p>	<p>Deputy Controller of Explosive from M/s PESO (PETROLEUM &amp; Explosives Safety Organization), has</p>

	<p>guidelines under manufacture, storage and import of hazardous chemicals Rules 1989 as amended up to date and Hazardous waste (management &amp; handling) Rules 1989 as amended time to time. Authorization from the GPCB shall be obtained for collection, storage, treatment and disposal of hazardous wastes</p>	<p>granted license for storage of 60 KL light diesel oil and storage of 10 KL HSD at 2 location in plant area for DG sets. We have valid factory license from DISH. Copy of factory &amp; Petroleum License copy attached as <b>Annexure -8</b></p> <p>HazardouswasteRules2000isfullycompliedas per the consent stipulated norm and Unit is complying all the waste defined in CC&amp;A. Hazardous waste is being disposed to M/s BEIL, Dahej TSDF facility and annual hazardous waste disposal details are submitted on GPCB XGN online site and waste disposal online report. Unit has obtained CC&amp;A # AWH 62510 for collection, storage, treatment and disposal of hazardous waste from GPCB dated 7thJul 2014 which is valid up to 23rd Mar2019.</p>
k.	<p>The overall noise levels in and around the plant area shall be kept well within the standard by providing noise control measures including acoustic hoods, silencers, enclosures etc. on all sources of noise generation. The ambient noise levels shall confirm to the standards prescribed under the Environment (P) Act, 1986 Rules 1989 viz. <b>75 dB (day time and 70 dB (night time)</b></p>	<p>Following measures taken to control noise level:</p> <ul style="list-style-type: none"> <li>- Provision of Silencers</li> <li>- Acoustic Enclosures</li> <li>- Rubber pads for rotating equipment</li> </ul>

Area	Apr-19		May-19		June-19		July-19		Aug-19		Sep-19	
	Day Time	Night Time	Day Time	Night Time	Day Time	Night Time	Day Time	Night Time	Day Time	Night Time	Day Time	Night Time
Norms=>	75	70	75	70	75	70	75	70	75	70	75	70
Main Gate	64	61	64	51	59	51	61	55	58	56	59	52
Material Gate	67	61	67	53	60	49	63	51	60	57	50	48
OHC	65	62	63	62	58	65	61	66	62	59	59	55
Derol	65	54	65	56	56	54	67	62	65	64	62	60
Vilayat	62	54	58	55	64	52	65	56	62	60	62	56
Sarnar	66	54	56	55	62	56	65	55	66	63	64	58
Argama	68	59	57	54	64	59	66	64	63	61	65	60
Min	62	54	58	55	64	52	65	56	62	60	62	56
Max	66	54	56	55	62	56	65	55	66	63	64	58
Avg	68	59	57	54	64	59	66	64	63	61	65	60

l.	The company shall develop rain water	Survey has been done for roof top rain water harvesting.
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	<p>harvesting structures to harvest the runoff water for recharge of ground water</p>	<p>Job is being taken up in few locations. Pl. refer <b>Annexure-15</b></p>																																			
<p>i.</p>	<p>The company shall undertake eco-development measures including community welfare measures in the project area for the overall improvement of the environment. The eco development plan should be submitted to SPCB within three months of receipt of this letter for approval</p>	<p>We have been undertaking various community development measures in and around 25 Villages and 27,768 nos. of beneficiaries covered in FY'19. Unit has proposed Eco development plan yearly basis through CSR activities and submitting CSR activities update in Annual Environment Audit Report to GPCB on yearly basis.</p> <p>Eco development measures including community welfare being done under CSR initiatives as attached in <b>Annexure-9</b> &amp; its expenditure details are in below <b>Table</b>.</p> <table border="1" data-bbox="821 684 1536 1545"> <thead> <tr> <th colspan="5" style="text-align: center;"><b>Table No. 24</b></th> </tr> <tr> <th style="text-align: center;">Financial Year</th> <th style="text-align: center;">Average Net Profit (in Crore) of the company (As per 135(S) company's Act)</th> <th style="text-align: center;">Allocate CSR Amount (2%)</th> <th style="text-align: center;">Actual Spent in CSR (Amount in Crore)</th> <th style="text-align: center;">% Spent CSR against Net Profit</th> </tr> </thead> <tbody> <tr> <td style="text-align: center;">2015-2016</td> <td style="text-align: center;">791</td> <td style="text-align: center;">15.82</td> <td style="text-align: center;">15.05</td> <td></td> </tr> <tr> <td style="text-align: center;">2016-2017</td> <td style="text-align: center;">790</td> <td style="text-align: center;">15.80</td> <td style="text-align: center;">18.06</td> <td></td> </tr> <tr> <td style="text-align: center;">2017-2018</td> <td style="text-align: center;">1107</td> <td style="text-align: center;">22.14</td> <td style="text-align: center;">29.84</td> <td></td> </tr> <tr> <td style="text-align: center;">2018-2019</td> <td style="text-align: center;">1699</td> <td style="text-align: center;">33.97</td> <td style="text-align: center;">47.14</td> <td></td> </tr> <tr> <td style="text-align: center;"><b>Total=&gt;</b></td> <td style="text-align: center;"><b>4387</b></td> <td style="text-align: center;"><b>87.74</b></td> <td style="text-align: center;"><b>110.09</b></td> <td style="text-align: center;"><b>2.51%</b></td> </tr> </tbody> </table>	<b>Table No. 24</b>					Financial Year	Average Net Profit (in Crore) of the company (As per 135(S) company's Act)	Allocate CSR Amount (2%)	Actual Spent in CSR (Amount in Crore)	% Spent CSR against Net Profit	2015-2016	791	15.82	15.05		2016-2017	790	15.80	18.06		2017-2018	1107	22.14	29.84		2018-2019	1699	33.97	47.14		<b>Total=&gt;</b>	<b>4387</b>	<b>87.74</b>	<b>110.09</b>	<b>2.51%</b>
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<p>i.</p>	<p>A separate Environment Management Cell equipped with full-fledged laboratory facilities shall be set up to carry out the Environmental Management and monitoring functions. The details of the Cell shall be submitted to MoEF regional officer prior to commissioning of the plant.</p>	<p>We have personnel within Environment Management/ Engineering, Chemical, botany &amp; water resources and also from Process &amp; Engineering. Pl. refer below Organization chart enclosed below.</p>																																			





The project authorities shall earmark separate funds to implement the condition stipulated by MoEF as well as state government along with the implementation schedule for all the conditions stipulated herein. The funds so provided shall not be diverted for any other purpose.

Total project cost was Rs. 1200 Crores as mentioned in EC. As committed in the EIA/EMP, unit has allocated capital cost Rs. 170.5 Crores and recurring cost Rs. 15.5 Crores per annum respectively for implementation of environmental pollution control measures as per condition stipulated by the MoEF as well as state Govt.

Funds are used in Air pollution control measures, water pollution control measures, Environmental monitoring & management, waste management, green belt development. We hereby declare that the capital & recurring fund is not diverted for other purpose.

Fund Utilize for environmental Management are under (Rs. In Crore)					
Sr. No.	Particular	Capex	Opex FY-17	Opex FY-18	Opex FY-19
1	Effluent Water	79.00	11.50	10.56	11.00
2	Air Pollution Control	91.00	03.50	04.00	03.30
3	Green Belt Development	00.50	00.50	00.55	01.30
4	Waste Management	01.50	00.50	00.60	01.60
	<b>Total Amount=&gt;</b>	<b>172.00</b>	<b>16.00</b>	<b>15.71</b>	<b>17.20</b>
	<b>In FY-19 (EDTA for H2S)</b>	<b>35.0</b>	<b>-</b>	<b>-</b>	<b>-</b>

		Recovery)														
		<b>Total Amount=&gt;</b>	<b>210.0</b>	-	-											
7.	<p>The implementation of the project vis-a-vis environmental action plans shall be monitored by the concerned regional office of MoEF/ GPCB/ CPCB. A six monthly compliance status report shall be submitted to monitoring agencies and shall be posted on the website of the company.</p>	<p>Six monthly compliance status report is being regularly submitted, pl. refer attached <b>Annexure-7</b> of last report as acknowledgement, dated 21/05/2018.</p> <table border="1"> <thead> <tr> <th>Compliance Period</th> <th>Date of Report Submission</th> </tr> </thead> <tbody> <tr> <td>Apr-16 to Sep-16</td> <td>10.11.2016</td> </tr> <tr> <td>Oct-16 to Mar-17</td> <td>24.04.2017</td> </tr> <tr> <td>Apr-17 to Sep-17</td> <td>14.06.2017</td> </tr> <tr> <td>Oct-17 to Mar-18</td> <td>21.05.2018</td> </tr> <tr> <td>Apr-18 to Sep-18</td> <td>12.09.2018</td> </tr> <tr> <td>Sep-18 to Mar-19</td> <td>14.06.2019</td> </tr> </tbody> </table>	Compliance Period	Date of Report Submission	Apr-16 to Sep-16	10.11.2016	Oct-16 to Mar-17	24.04.2017	Apr-17 to Sep-17	14.06.2017	Oct-17 to Mar-18	21.05.2018	Apr-18 to Sep-18	12.09.2018	Sep-18 to Mar-19	14.06.2019
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8.	<p>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 MoEF <a href="http://envfor.nic.in">http://envfor.nic.in</a>. 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.</p>	<p>EC issued on 20.12.2007, received on 24.12.2007 following are the advertisement details.</p> <p><b>Name of Paper :</b> - Indian Express  <b>Date of Issue:</b> - 28.12.2007  <b>In :</b> - English language</p>  <p><b>Name of Paper :</b> - Gujarati Loksatta  <b>Date of Issue:</b> - 28.12.2007  <b>In :</b> - Gujarati language</p>														

		 <p>ગ્રાસીમ સેલ્યુલોઝીક પ્લોટ નં.-૧, જુઆઈડીસી વિલાયત, ડી.ભરૂચ, (ગુજરાત) <b>MOEF દ્વારા પર્યાવરણીય પરવાનગી</b> પર્યાવરણ તથા વનમંત્રાલયે (ભારત સરકાર) વિલાયતમાં VSF પ્લાન્ટ ૧૨૭૭૫૦ ટન પ્રતિ વર્ષ અને પાવરનું ઉત્પાદન ૨૫ મેગાવોટના ગ્રીન ફીલ્ડ પ્રોજેક્ટની પરવાનગી તારીખ ૨૦-૧૨-૨૦૦૭ના પત્ર નં. એફ. નં. જે-૧૧૦૧૧/૪૬૩/૨૦૦૭- Iએ II (I) દ્વારા આપેલ છે. પરવાનગી પત્રની નકલ જુપીસીબી અને પર્યાવરણ તથા વન મંત્રાલયની વેબસાઈટ <a href="http://envfor.nic.in">http://envfor.nic.in</a> પર પ્રાપ્ય છે.</p> <p><b>ગ્રાસીમ ઈન્ડસ્ટ્રીઝ લીમીટેડ</b> રજીસ્ટર્ડ ઓફીસ: પી.ઓ.ભિરલાગ્રામ, નાગદા-૪૫૬ ૩૩૧ જી. ઉર્જેન (એમ.પી.)</p>
i.	<p>The project authorities shall inform the Regional Office as well as Ministry, the date of financial closure and final approval of the project by the concerned authorities and the date of the start of the project</p>	<p>We have submitted the same in last six monthly EC compliance report&amp; BSE –NSE report to MoEF&amp;CC, Bhopal. Pl. Refer <b>Annexure-3</b> for EC compliance report Project / plant activities are as under;</p> <ol style="list-style-type: none"> <li>(1) EC received on 20<sup>th</sup> Dec-07,</li> <li>(2) Civil &amp; other const. work started in Jun-2011.</li> <li>(3) 1<sup>st</sup> line commissioned in Mar-2014.</li> <li>(4) All 4 lines commissioned by Jan-2015.</li> </ol>

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