

Protect your land and sea from Chemplast Sanmar's poison PVC plant

The proposed facility:

The Ministry of Environment and Forests has cleared Chemplast Sanmar's Poly Vinyl Chloride (PVC) factory in Cuddalore. This factory will produce 1,40,000 tonnes of PVC per year, and use about 170,000 litres of water per hour. PVC is the most poisonous plastic whose production, use and disposal result in the emission of some of the deadliest chemicals known to science. In 2002, SIPCOT Cuddalore residents rejected the proposal at a public hearing held by the District Collector. Chemplast then relocated its proposal to Krishnapatnam, Andhra Pradesh. Here too, residents rejected the project, and the Andhra Pradesh Pollution Control Board did not clear the project. In 2005, the company revived the proposal with the Tamilnadu Government, and received state government clearance in May 2005. Despite massive signature campaigns and representations against the factory by SIPCOT residents, the State and Central Governments have cleared this proposal. The factory is set to come up on 100 acres in SIPCOT Phase II in Semmankuppam. The main raw material is Vinyl Chloride Monomer (VCM) which will be imported by sea, and then transferred from ships to the plant through a jetty and pipeline from the sea.

VCM and its impact:

VCM is an extremely toxic, inflammable chemical and is known to cause cancer. Exposure to VCM could cause softening of bones, deformation of fingers, skin complications, impotence, bad circulation and shortness of breath, liver damage and a special form of liver cancer - Angiosarcoma. The chemical is so dangerous that it is generally not transported by road. Chemplast proposes to import VCM in ships, and transfer it to its factory through a marine jetty 1 km into the sea. The 2.5 km pipeline carrying this deadly chemical will pass through Chitrapettai-Thyagavelli villages. It will be stored in tanks at the factory. The jetty, pipeline and tanks increase the risk of exposure to residents especially of Chitrapettai and Semmankuppam villages, who are less than 500 meters away from the unit.

The proposal for the plant is more than 5 years old and the local conditions around the project site in Semmankuppam have changed significantly. Pandian Chemicals that manufactures the highly explosive rocket fuel -- ammonium perchlorate – is set up right next to the site where Chemplast's factory is to come up. VCM is also a highly volatile and explosive substance. An explosion in Pandian or Chemplast could trigger explosions in the other resulting in the destruction of entire villages nearby.

Risks of transporting VCM through marine pipeline:

The pipeline would go through Chitrapettai, Rajapettai, Tamannapettai, Sothikuppam, Naduthittu and Nochikadu villages before reaching the plant site in Semmankuppam. This is dangerous because VCM is actually a gas and is compressed and liquefied for transportation. Due to its highly volatile nature and a very low ignition temperature, even minor leak can lead to an explosion. When VCM escapes from a compressed chamber it forms pools of mist because it is heavier than air. If ignited it will flash back to the source of leakage and cause further explosions. Large VCM fires are almost impossible to contain. VCM is slightly soluble in water and reverts to a gaseous state quickly. VCM leaked into sewage systems is also highly explosive. Residents of the above villages should be worried about accidents due to VCM leakages and explosions.

Because VCM will be transported through a marine pipeline in the proposed facility, the chances of leaks and spills are high. This will adversely affect the marine health and livelihood of the fisherfolk in these areas. Accidents involving spills of VCM during transfer from ships to pipelines are common.

Effluent discharge into the sea, impact on fisherfolk:

The company proposes to discharge its 'treated' effluents into the sea. This will also have a significant negative impact on the marine life and on the livelihood of fisher folks. A recent sample of the ambient air from Chemplast's "treated" PVC plant effluent in Mettur found carcinogens like Ethylene Dichloride, Benzene and Vinyl Chloride at levels up to 32,000 times above norms. Some of the chemicals found accumulate in the fatty tissues of fish and other sea-life, and can poison consumers who eat the fish.

Chemplast is a major polluter with a poor track record of environmental compliance. In July 2005, the Indian People's Tribunal chaired by Justice (Retd) Akbar B. Kadri of the Madras High Court found the company's Mettur facilities guilty of discharging toxic effluents into the Kaveri, degrading several thousand acres of farmland, contaminating groundwater and affecting the health of villagers and workers.

The company also plans to set up a desalination plant that will suck sea water, and discharge highly saline and toxic effluents back into the sea. As a backup to the desalination plant, the company will also sink borewells in SIPCOT and extract groundwater at the rate of 1,20,000 litres per hour. This would have a serious impact on the groundwater level and cause water scarcity in the area.

Unfortunately, the Government has not based its clearance on a studied understanding of the total environmental impacts of the plant. In fact, the company has not even presented to the public the environmental impacts of the proposed desalination plant and power plant.

What can you do?

By approving the Chemplast plant in the face of massive protests against polluting industries in Cuddalore, the Government has conveyed that it intends setting up more and more dirty industries in SIPCOT. Their reasoning is that since SIPCOT Cuddalore and the seas nearby are already polluted, it makes sense to set up polluting industries here rather than in other areas that are still unpolluted. Textile dyeing units from Tiruppur, petrochemical factories and leather tanneries are also being invited to come to SIPCOT. All these units will discharge their effluents into the sea.

If these polluting factories comes up, they will kill fishing as a livelihood in the area.

Join the struggle against the PVC plant in Cuddalore and ensure that your land and sea is protected.

For more detail contact:

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