

CHAPTER – IX

SUMMARY AND CONCLUSION

9.0 INTRODUCTION

NV Group is one of the prominent players in the distillery Industry, having one of the largest manufacturing/ production facilities of Extra Neutral Alcohol in Haryana and Blending & Bottling operations in Punjab. The company has a strong marketing base of its own, strategically located all over India for marketing of its own products. The company also earns valuable foreign exchange from their exports. NV Distilleries & Breweries (North East) Pvt. Ltd. is a subsidiary of NV Group. With a view to ensure growth of the company, the management is planning to set up a 200 KLPD Grain based Distillery along with 15 KLPD Malt Spirit and 10 MW Cogeneration Power Plant at village Bartezpur, P.O. Vijayanagr, District Kamrup (Assam).

TABLE NO - 9.1
GENERAL DETAILS ABOUT THE PROJECT

S. No.	Particulars	Details
1.	Name of the project	Proposed 200 KLPD Grain based Distillery, 15 KLPD Malt Spirit, Bottling of IMFL, Country Liquor & Co-Generation Power Plant of 10 MW
2.	Total Plot Area for Distillery	25 Acres (10 ha.)
3.	Greenbelt Area	8 Acres (33% of the total plot area)
4.	Locations	
	A. Village	Bartezpur
	B. P.O.	Vijayanagar
	B. District	Kamrup
	C. State	Assam
5.	Nearest Railway Station	Guwahati (32 km E)
6.	National Highway	NH – 37 (1 km N)
7.	Nearest Airport	Guwahati (16 km E)
8.	Nearest Town /city	Guwahati
9.	Nearest River	Brahmaputra river (6 km in NNE)
10.	Reserve forest/Protected	Kulsi Reserve Forest (9 km in SSW)

S. No.	Particulars	Details
	forest/ Wildlife Sanctuary/ Biosphere reserve	Kawasingh Reserve Forest (9 km in SE)
11.	Seismic Zone	Zone V
12.	Total project cost	Rs. 243 Crores
13.	Cost for EMP	Rs. 25 Crores
14.	Type of Fuel	Rice husk/Coal/Pet coke/PNG
15.	Total Power Requirement	4.5 MW
16.	Source of Power	Captive Power Plant, State Electricity Board & D. G. sets for power backup
17.	Number of working days	330 days
Micrometeorology (Summer Season – March to May, 2009)		
18.	Temperature	Max : 33.4 ⁰ C Min : 17.3 ⁰ C
19.	Relative Humidity	At 08.30 Hrs. : 57% to 93% At 17.30 Hrs. : 41% to 75%
20.	Dominant Wind Direction	From NE

9.1 JUSTIFICATION FOR THE IMPLEMENTATION OF THE PROJECT

The following points show the justification for the implementation of the project:

The total land required for the implementation of the project is 25 acres(10 hectares). However the company has proposed for the development of greenbelt in 8 acre (33% of the land area) area which will improve the aesthetic beauty of the area.

The proposed project will generate employment for the local people.

The distillery would be a zero discharge as no waste water will be discharged outside the project premises. There will not be any kind of major pollution due to the project activity, as the project will be implemented with environment friendly technology. Mitigation measures to be taken are listed below.

9.2 EXPLANATION OF THE MITIGATION MEASURES

9.2.1 Environment Management Plan

The project will be implemented with environment friendly technology. This distillery would be a zero discharge as no liquid waste will be generated from the project activity. The boiler stack will have appropriate stack height and mechanical dust collectors will be attached to the stacks.

1. AIR POLLUTION CONTROL

- Gaseous emission from fuel burning, which consists of common pollutants like SO₂, NO_x and SPM, would be discharged into atmosphere through stacks of suitable height. There will not be any kind of emission due to the handling or transportation of final product as the product will be in the liquid form and handled in the sealed bottles.
- Development of Green Belt within the premises of the plant will help in attenuating the pollutants emitted by the plant.
- Ambient air quality and stack emission would be regularly monitored to ensure that ambient air quality standards and suggested limits on stack emission loads would be met honestly all the time.

2. NOISE MITIGATION

- Noise pollution from NV Distilleries & Breweries (North East) Pvt. Ltd. will be controlled by proper maintenance and compact technology.
- The green belt will help in reducing noise levels in the campus as a result of attenuation of noise generated due to plant operations, and transportation.
- The persons working in the high noise level area will be provided with the personnel protective equipments such as earplugs, ear muffs etc.
- The D. G. sets would be kept in acoustic enclosures.

3. WATER MANAGEMENT

- In order to reduce the water consumption by plant, it is recommended to carryout a water audit every year. The study shall focus on water consuming operations and measures to reduce water use.
- Efforts should be made to conserve as much water as possible by recycling and reusing. Water table levels shall be measured at the baseline stations once every season.

3.1 EFFLUENT TREATMENT

Grain Slops (Spent Wash) will be taken through Centrifuge Decanters for separation of Suspended Solids separated as Wet Cake and which goes as cattle feed as it contains higher protein and fibre content. (Also known as DWG – Distillers Wet Grains)

- Thin Slops from the Decanter Centrifuge are partly recycled back to process (30-35%) and partly taken to Thins Slops Evaporation Plant for concentration of remaining solids to form a Syrup. This Syrup is also mixed into the Wet Cake coming out of Centrifuge and forms part of Cattle Feed. (Also known as Solubles – Collectively known as DWGS)
- The Process condensate is cooled and collected into a neutralization tank with sufficient residence time. After Neutralization, this process condensate is recycled into process and is used for green belt development within the complex.

4. SOLID WASTE MANAGEMENT

- Fly ash from the Boiler would be utilized in brick manufacturing.
- The Solid waste from the Grain based operations generally comprises the Fibres and proteins in the form of Wet Cake, ideally used as Cattle Feed.
- The Yeast sludge is sent to the Sludge Drying Beds or may be added to the Wet Cake.

9.2.2 Environmental Management Cell & Monitoring Programme

NV Distilleries & Breweries (North East) Pvt. Ltd. shall set up an Environmental Management Cell and also proposes the Environmental Monitoring Plan for the regular monitoring of the pollution load.

The committee has the responsibility for liasoning with state and central governmental environmental authorities for enforcing environmental legislation environmental protection and control.

The duties of the EMC will include the following:

- i. Environmental monitoring of the project site and the surrounding area.
- ii. Commissioning of pollution control equipment.
- iii. Specification and regulation of maintenance schedules for pollution control equipment.
- iv. Ensuring that standards of house keeping in the plant are maintained.
- v. Developing the green belt.
- vi. Ensuring water use is minimized.
- vii. Carrying out the Environmental Management Plan.
- viii. Organizing meetings of the Environmental Management Committee and reporting to the committee.

9.3 CONCLUSION

NV Distilleries & Breweries (North East) Pvt. Ltd. will generate a fair amount of direct, indirect and induced employment in the study region. The local economy will receive a boost due to employee spending and services generated by the company. Due to the implementation of the project activity there shall be improvement in the standard of living viz. better education, improved health and sanitation facilities housing and acquisition of consumer durable. This is envisaged as a major positive benefit.

The company's management recruits the semi skilled & unskilled workers from the nearby villages due to local labours rapidly increasing the social status of the villagers.

It has been observed that the company's management supports the local administration and other form of assistance for the development of public amenities in the areas surrounding their other projects. Mainly they are providing the basic amenities to nearby villagers for water distribution, building of schools, hospitals, etc.

