

## Expenditure Plan

The expenditure plan for the Medichem IPPC variation application are listed below as per ERA's terms of reference listed below:

*Please provide a plan of the estimated expenditure for each phase of the following specified activities arising from your proposal.*

*The plan should include the likely costs of:*

- ☐ *monitoring (emission/discharge and ambient monitoring);*
- ☐ *clearing the installation (including drainage systems) of all wastes;*
- ☐ *remedial action in the event of the failure of pollution control systems.*

## A. Monitoring (emission/discharge and ambient monitoring)

Reference Point	Source	Parameters Monitoring	Estimate Cost
1	Vent Scrubber	-VOCs as Carbon -VOCs having hazard statements H340, H350, H350i, H360D or H360F	€350
2	Vent Atmospheric tank	NA	/
3	Boiler	-Carbon Monoxide -Oxides of Nitrogen -Particulate Matter	€400
4a	HVAC finished area exhaust	-Particulate Matter	€3500
4b	HVAC HPAPI laboratory exhaust	-Particulate Matter	€1000
4c	HVAC production plant exhaust	-Particulate Matter	€3500
5	Cooling towers	- Legionella Testing every 6 months - Heterotrophic Count every month	€400
Discharge point 1	Discharge to Public Sewer	- Each batch : Temperature, pH, Chlorides, COD - Every Quarter: BOD - Yearly basis: Settleable Solids, Suspended Solids, Total Kjeldhal Nitrogen, Sulphides, Free and Emulsified grease, Free Chlorine, Total Sulphates, Total Boron, Total Phosphorus	- In-house -€120 -€200

Environmental noise monitoring is due in 2021 which is estimated at a cost of about €2,000.

B. Clearing the installation (including drainage systems) of all waste

Should the need arise for the installation to be cleared it is very difficult to provide the cost of the clearing of all installation. One estimate which can be provided is that for the removal of waste material which would need to be removed which yearly amounts to a budget of about €200,000.

C. Remedial action in the event of the failure of pollution control systems

In the event of the failure of pollution control systems the cost for remedial action in such cases is difficult to estimate as it would depend on the type and location of incident which would have occurred.