



**ABSTRACT**

Summary

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**TITLE** : A Project Feasibility Study on Assembling Water Filter Using Bamboos as Trickling Filter Media in Noveleta, Cavite

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### **Summary**

The study is about the assembling of water filter using bamboos as trickling filter media in Noveleta, Cavite. It includes the management, marketing, technical, financial and socio-economic aspects. The researcher used the descriptive method of research. Through the use of surveys and actual interviews with the owners of related businesses, important data were gathered. Other information were gathered from Aklatang Emilio Aguinaldo, De La Salle University - Taft Library, Technology Livelihood Research Center (TLRC), Department of Trade and Industry (DTI), Department of Health (DOH), and Noveleta Municipality was utilized.

### **Organization and Management Aspect**

This project feasibility study uses the sole proprietorship type of organization, because of its ease and low cost of formation and dissolution. The other reasons were less regulation by government in operating decisions, less conflict and disagreements in manner of management. It is also best suited for small businesses.

The organizational members employed are the owner who will act as the general manager, an accountant, bookkeeper, sales representative, secretary/cashier, driver, and three workers. All will be handling different duties and responsibilities, and will be oriented with their respective field of work.



**Marketing Aspect**

“Crystal Clear Water System” has been chosen, as the product name among choices because, it is exactly what the firm needs to project to the consumer – pure and clean water.

The target markets of the proposed business are the A, B, and C groups of income bracket of the society in Noveleta and nearby towns.

In determining the selling price of the proposed product, the policy is that it is relatively cheaper compared to the other existing water filters and it has a guaranteed quality as far as strength and durability are concerned even though bamboos are the primary materials used. The price study would be based on the cost of materials, labor and other expenses incurred in the production.

**Technical Aspect**

The product name is known as “Crystal Clear Water System”, a water purifier made of fresh bamboos that serves as the filter medium. The bamboos are cut into appropriate dimensions based on filter medium specifications and characteristics required, and are arranged at random. The test parameters (Biochemical Oxygen Demand (BOD), Chemical Oxygen Demand (COD), pH and temperature) were



measured for each trial run. The filter efficiency was analyzed based on the BOD and COD removals of the original wastewater.

The method used is by means of gravity flow through porous media composed of indigenous materials like silica sand, beach sand, activated carbon, diatomaceous earth, jute sack and coconut fiber. The model is made up of material called Polycarbonate.

Leachate was taken and used as the sample for the experiment.

### **Financial Aspect**

The proposed business utilized the use of the computed amount of capital for about P690,255.00. This covers the renovation of plant/office, the materials and equipment used in assembling the proposed product, the salaries of employees and other operational expenses incurred during the production.

### **Socio-Economic Aspect**

The proposed business helps the government in their campaign to “Buy Filipino Products”, since local materials are being used to the said product. Although the materials are local, they are of good quality. And likewise, the proposed business helps the unemployed and out of school youth (OSY) in Noveleta, Cavite.