# Whitewater west industries case study

Business, Industries



# **Executive Summary**

Geoffrey Chutter, owner of Whitewater Industries, has to relocate his fiberglass moulding business to one of three locations he has in mind due to the need for expansion, complaints of residents nearby the factory while he keeps in mind the importance of his aspects of operating systems. This new factory must at least be 6040 square meters and be in an area with zoning regulations that allow for fiberglass production Whitewater West Industries has three proposed new locations; [1] the spacious Hiram-Walker plant in Kelowna that needs some land renovations, [2] a complete new build that would result in a perfect building, or [3] a location in Abbotsford that has potential to expand business into many major cities. The company was recommended to spend the extra time andmoneyon building their own facility in order to get exactly what the company needs to reach their goal revenue of six million annually.

# Introduction

Fifteen years ago, Geoffrey Chutter, President of Whitewater West Industries Limited, tried his luck building a water park with no real success. After selling that operation he turned his focus to the master planning and conceptual engineering designs of water parks, product manufacturing, and construction services. His company also produces other large fiberglass products that are used in the production of CAT body scanners, cushioned bathtubs, and environmental toilets, just to name a few.

## Problem Statement

Geoffrey is faced with the task of relocating his fiberglass molding manufacturing facilities now that plant capacity has been reached and the desire for expansion has increased. The new facility must be located in an area with zoning regulations that allow for fiberglass production and be at least 6040 square meters with extra land for a possible expansion. This is in addition to the growing complaints about the odour emanating from the fumes in the production of fiberglass from the residents who live near the plant. Geoffrey is even considering options of whether he should rent a facility or purchase it. Geoffrey wants to solve these issues and wants this move completed by May of next year (less than one year).

# Aspects of Operating Systems

Service: This aspect of operating systems must be considered with the utmost importance during this relocation for a number of reasons. A large portion of this business relies on the timeliness of deliveries to its customers – closer distance to major customers means quicker delivery. However, a move may also increase the distance from the plant's suppliers of raw material, therefore creating a problem in expected delivery times and availability of parts. A significant portion of this company's revenue comes from specialized products and services they provide and any location to be considered would need to have a facility big enough to sustain this part of the operation.

Quality: Since the production of fiberglass products is a very specialized industry, there are limited suppliers who manufacture these products outside major centers. The quality of WhiteWater West Industries' products is essential for the success of the business because a customer will usually pay

extra for shipping for a higher quality fiberglass product, especially on materials for items such as CAT Scanners. WhiteWater Specialities also has a competitive advantage in that they will work closely with the customer to design and deliver a product specific to their needs. The company will need to consider that a major relocation may result in the possibility of losing quality employees (Engineers, Production Team, Supervisors) that have made WhiteWater West Industries so successful.

Function: This aspect of operating systems is closely related to the quality aspect in the sense that the design and quality of WhiteWater 's products will continue to perform the way they are expected to. When the company relocates it would want to keep the equipment and procedures in place that have allowed the company to be successful in making quality fiberglass products.

Quantity: This aspect is important to note when relocating to ensure that the size of the plant will have enough room to incorporate any of the current equipment to maintain the same standard of quality, as well as purchasing new equipment with the intention of helping the company expand and increase their sales. A lack of sufficient space to meet demands may result in a loss of revenue.

Price: Price of the products is not really a factor in this relocation, however the company should do its best to keep the total cost of the move within the budget of the company so the price of their fiberglass products does not rise, and potentially losing customers.

# Alternative Analysis

Whitewater West Industries has three possible relocation options to consider:

Kelowna --- Hiram-Walker Plant

The Hiram-Walker plant is located only 25 kilometers from Kelowna and is the most spacious facility of all three options and will allow them to keep their current workforce. Zoning has already been approved to produce fiberglass since there are no residential buildings right beside the land - this would also solve the problem of residents complaining of the odour coming from the plant. The plant is located close to a major highway so naturally the ease of shipping and receiving products would be increased because of the proximity to major transportation routes. The building is also fire-safe, creating a safer workplace for the staff at WhiteWater West Industries. Most importantly if the company decided to expand, there is sufficient room to do so (64 total hectares of land they could purchase and 22 warehouses on the property).

This plant does have some issues that could prove to be quite costly in both the short and long term. The immediate cost of preparing the land and factory to be ready for operations would be just over \$1. 5 million dollars bringing the total cost of purchase to \$5, 127, 875. 00. The company would also have to deal over the long term with an increase in heating costs caused by the structural design of the building and an additional cost to deal with the lack of sanitary sewers – the lack of sewers could cause a problem inrespectto sanitation issues produced by 215 employees.

Kelowna --- Build Option

Building a new facility in Kelowna is the best way for Whitewater West Industries to get exactly what they need to generate more revenue and expand the business. This could become a state-of-the-art manufacturing facility raising the profile of the company, and which could attract young professionals and potential new business. This new building would reduce the maintenance costs associated with the upkeep of an old building and would comply withhealthand safety standards creating a positive workingenvironmentfor staff.

However, if funding is an issue, then building a new facility is not the right option for the company as this is the most expensive option. Also, building a brand new facility would take longer than what WhiteWater had initially wanted – one year instead of ten months. Another problem that WhiteWater will have with building their own facility is finding a suitable piece of land to build their plant. Locating an area large enough to support the size of a plant with a possibility for expansion in an area with zoning regulations that will allow fiberglass production may be difficult.

### Abbotsford Site

The last of the three sites, Abbotsford, is located 65 kilometers east of Vancouver and a substantial distance from Kelowna. The site includes a large enough total area for what is needed, plus a small amount of room for expansion without having to build an additional building, although expansion could not go any further than that. The potential for getting new customers is extremely promising and achieving revenue of \$6 million could be easily accomplished since this site is directly across the border from Seattle and Portland and a short distance from Vancouver. Also this location would save

Specialties \$100, 000 on shipping costs every year. This property could also be divided into sections, the larger building for production and the smaller building for Specialities – keeping both divisions at the same location and at the same time keeping individuality among them.

However, the purchase of the property may not even be suitable to run a fiberglass plant as it needs to undergo an environmental audit due to the storage of PCBs. This could cost WhiteWater West thousands of dollars and potentially the location as a whole. This property is the least safe of three options; a wood building is not the best choice for a fiberglass facility since the operating machines produce a considerable amount of heat causing a potential fire hazard that must be closely monitored. Choosing this location might also result in the loss of many employees from the Specialties department (only 1 out of 90 said they would leave to somewhere outside the city limits). Finding a new, similar team that matches their current workforce would be crucial to the success of this option.

### Recommendation

It is recommended that Whitewater West Industries opt to own their building and choose Option #2 – the Build Option. Although this option is the most costly in both dollars and time, it will allow the company the opportunity to achieve their potential. The company would be able to install and arrange their equipment in any manner they wish to optimize production needs and function, enabling the company to reach their desired goal of generating \$6 million of revenue annually. This option would also provide sufficient room to expand and have exactly the type of competitive facility they need to be successful. However the company should keep their original plant operating

in order to keep generating revenue and providing quality service to their customers during this transition. This will also avoid a stockpile of orders and delays to customers. Although this option does not provide as much opportunity to increase sales as the move to Abbotsford would, it will allow the company to keep an already trained and skilled workforce, and not having to deal with severance packages and then the time and money to recruit and train new staff.

Choosing this option is going to be the most costly and will take the longest. However, money should not be an issue as the financial statements shows sufficient income to pay for the building of a new property and which can be offset from the sale of their old plant when the time comes. The money generated from the sale will pay off most of the new mortgage. The company may still have to deal with the residents who have been complaining about the odour as this plant will need to be kept operating until the new building is move-in ready. Read about Timmons model

### Action Plan

The company should immediately begin to look at possible spots to build their new location; somewhere with sufficient space for the new building plus expansion and that meets the zoning requirements. It may be also beneficial for the company to approach the City and ask them to change the zoning regulations for a specific parcel of land if it meets the needs of the company. The long-term benefits of rezoning for the City will ensure that they will not be losing a major employer who is also considering expanding their business. Building will need to start as soon as possible to stay on track and avoid further delay past the desired move in date. In the meantime the company

needs to begin preparing the employees for the move. Continued complaints by residents may be alleviated by the fact that the company is moving quickly on finding a new location to build their new facility away from the residential area.