Gender responsive value chain analysis of the Lambanog Industry in the Philippines

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Key Words

Value Chain Analysis, gender responsive value, product development, lambanog industry

Abstract

The coconut vodka, popularly known as 'lambanog' and primarily produce in Quezon Province, the lambanog capital of the Philippines, is on the threshold as a dollar-earning industry. It is considered for product development being one of the primary produce of the country. The current study is an initial step in establishing a development plan for the industry. This study uses the Gender Responsive Value Chain Analysis (GR-VCA) to determine the current status of the lambanog industry in the Philippines. Descriptive and participatory approaches were used to answer the following queries: (1) condition of lambanog industry players who are producer/distiller, distributors/retailers, and customers; and (2) identification of constraints and opportunities. The current status of the industry was revealed by the 12 distillers endorsed and highly-recommended by the Department of Trade and Industry (DTI) Quezon, 60 distributors/retailers and 100 consumers all dispersed in the different towns and city of the province.

Results of the study reveal that the conditions of lambanog industry players, both distillers and distributors, were assessed as small-scale in production, marketing and sales. The customers include local small-time drinkers and a very limited export market. Constraints identified include: high worker turn-over including gender issues on the selection, training and nature of work; sustainability of supply due to weather condition and seasonality of sap collection; poor product packaging and labeling; lack of facilities and equipment for proper distillation of lambanog; non-implementation of the Philippine National Standard and the Quality Control in Lambanog Production promulgated by the Department of Trade and Industry; no standard pricing for lambanog products; and increasing number of underground distributors compounding lambanog. The identified opportunities include: a very promising export market for the lambanog products; establishment of Common Shared Facilities (CSF) through the formation of an association and support from Local Government Units (LGUs), DTI and other government agencies; development of the numerous available channels of distributions; and establishment of a brand name for the Philippine lambanog that will niche the market and lead to the product innovation.

The results revealed the condition of lambanog industry players and identified the different constraints and various opportunities. Constraints can be addressed by a formation of an association for lambanog producers so that the need to develop the product to a world class standard can materialize. By establishing a model management for lambanog industry, it has all the potentials and opportunities from a small-scale industry to an export-oriented business.

Introduction

The coconut vodka, popularly known as 'lambanog' and primarily produce in Quezon Province, the lambanog capital of the Philippines, is on the threshold as a dollar-earning industry. It is considered for product development being one of the primary produce of the country. This 100% natural, 80 to 95 proof spirit, 40% to 45% alcohol content, originates from the sap of the coconut flower. Through fermentation and distillation, coconut sap is processed into lambanog.

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This exotic, natural, and organic drink gained the Seal of Excellence Award from the Department of Trade and Industry/ Center for International Trade Expositions and Mission (DTI/CTEM).

The lambanog production has been in business since 1908. However, its international acceptance started only on 2001 as its introduction in the export market. It is a recipient of the Packaging Excellence Award at PHILSTAR 2001, an annual competition sponsored by the Packaging Institute of the Philippines. Also, it was recognized as one of the 337 best food innovations in the Anuga Food Fair held in Germany on 2003. Despite the many local and international recognitions and awards, lambanog making still remains a small-scale industry. Several analyses had been done to develop programs for the industry. As a result, the Philippine's Department of Science and Technology (DOST) cited several causes of the inadequacy of the local production which include seasonality of fruits, sustainability of raw materials, lack of marketing and promotion, poor packaging, and labeling. There is a lack of scientific basis on the safety of the product, as well as product standard. Production process significantly varies among the distillers and quality is not maintained. It has no identity and comes in outdated packaging. Also, distilleries do not adopt principles of good manufacturing practices, packaging and labeling. These outcomes, however, reflect only one key player of the industry - the producer.

In the analysis of the lambanog industry in the Philippines, a chain of interrelated activities will provide a complete view that will address the needs of each component. Thus, value chain analysis comes into picture. Using this model to further stabilize the production and marketing potential of the product will provide comprehensive foundation for the establishment of an action plan. This will analyze the functions from pre-production to after sales, a method that will greatly impact on the various opportunities and constraints facing the industry. The current study is an initial step in establishing a development plan for the industry. This study uses the Gender Responsive Value Chain Analysis (GR-VCA). The Department of Trade and Industry first introduced this approach in its drive to further strengthen its One Town, One Product (OTOP) campaign. It is patterned after the generic value chain model as introduced by Michael Porter. The VCA approach develops economic viability and sustainability, creates linkages, coordinates public and private roles, and promotes self-reliant development. Gender issues were incorporated in the chain to map out concerns about men and women in the workplace.

Michael Porter introduced a generic value chain model that comprises a sequence of activities found to be common to a wide range of firms. He identified these activities to be valuecreating and classified them as primary and support activities. An analysis of the value chain rather than value added is the appropriate way to examine competitive advantage. By using the value chain approach, a firm has the opportunity to generate superior value by having both a cost advantage and a differentiation advantage. It is a process that requires four interconnected steps: data collection and research, value chain mapping, analysis of opportunities and constraints and vetting of findings with stakeholders and recommendations for future actions.

1.Literature Review

The literatures on the lambanog production in the Philippines are mostly focused on the export production and constraints faced by the industry. They particularly deal with data generated by the government agencies such as Department of Trade and Industry (DTI) and Department of Science and Technology (DOST). The large part of the literature is from case studies, undergraduate and graduate researches, and reports from government agencies. None of the literature discusses the use of a business model to analyze and reflect the current condition of the industry key players. Nevertheless, the literatures found are worth reviewing because it specifically sets tone on the prevailing status of the industry.

The discussion of the sources will be grouped into (1) lambanog production in the Philippines; (2) opportunities and constraints faced by the industry and (3) value of the GRVCA.

1.1Lambanog Production in the Philippines

In the context of global market, exports of lambanog, though increasing, had been minimal in volume due to issues and concerns on the local production. The study of Porter (2005) revealed that lambanog exports have increased since 2001. Data from a DTI report listed quantities that are still too small to be considered international export/import statistics. The total Philippine exports from year 2001 to 2003 were \$33,748,279,039, \$36,856,406,053, and \$38,060,440,953 respectively. Furthermore, the total Philippine Alcoholic Beverage Exports to Japan (1999 to 2001) were valued as \$1,680,663, \$2,038,163, and \$3,123,894, respectively.

Years earlier, there is a large discrepancy in the demand and supply of alcoholic beverages. Thus, the emerging need pushed the Philippines to rely on imports to satisfy the growing demand. Veluz and Guevarra (2008) cited that in 1998 the Philippines produced only about 1.25 million liters of alcoholic beverages compared with importation of about 3.5 million liters in 1999. However, statistics shows that wine consumption of the Filipinos increases by 10% every year (World Health Organization, 2004). Accordingly, the 2004 Family Income and Expenditure Survey conducted by National Economic Development Authority (NEDA) revealed that an average Filipino family spends 1% of its income on alcoholic beverages and for moderate and heavy drinkers, it can go up as high as 20%. In addition, the 2004 total recorded per capita consumption of the Filipinos as provided by World Health Organization is 3.75 liters of pure alcohol for the last 15 years. The increase is attributed to growing appreciation of wine as health beverage.

A vast number of distilleries in the Philippines are primarily found in Quezon Province, the lambanog capital of the Philippines. These contribute the largest percentage in the production of local coconut vodka in the country. Aside from economic contributions, it depicts the tradition and culture through lambanog making and drinking. The status of these distilleries is described in the study conducted by Ascan, Zapata and Agapay-De Jesús (2007): majority of the distilleries are family-owned and operated; categorized under micro-scale enterprises; production capacity ranges from eleven to thirty-six gallons per week; and the profit derived from sales averaged 32 percent.

1.2 Opportunities and Constraints Facing the Industry

The industry is on the threshold as a dollar-earning venture that will contribute in the economic uplift of the country. It has all the opportunity to become an international player in the wine industry given the right innovation and good market positioning strategy. The selection of the product by the DTI for export development is a big leap in its continuous growth. The industry started to network with culinary institutions and gourmet specialist in the promotion of the product for flavored concoctions and cocktails with different variants. Also, its active cooperation and collaboration with DTI in the promotion of the product both in the domestic and export markets through trade fairs further developed the industry (Bergen, 2003).

There are, however, factors that hinder the global acceptance of the product. There is a lack of scientific basis on the safety of the product, as well as product standard. Production process significantly varies among the distillers and quality is not maintained. It has no identity and comes

in outdated packaging (S&T Media Service, 2008). This problem of local production which does not meet production standards was the concern of Morato (1996) when he argued that for the purpose of product development analysis, coconut toddy, which is the main supply ingredient of the local coconut vodka manufacturers, is just a minor supply ingredient for the alcohol industry in the world market. The two markets, local and international, would therefore have to be realized separately if one is to assess the demand and supply situation attendant to the coconut wine industry. This was attested by Rich Cabael who introduced lambanog as VuQo, coconut vodka, in the United States. The VuQo team's initial research showed that lambanog, as it is made by local distilleries today, was not the cleanest liquor as far as content and preparation is concerned, and its alcohol content was beyond the standard level in other countries (Junio, 2010; Sangalang, 2009; Hubilla, 2010; Mallari, 2007).

The problem with a good product is that, inevitably, Filipino ingenuity will manage to develop a fake or an adulterated version of it. Lambanog peddled in stalls along the provincial roadside is always suspect for extenders and chemical additives, and if they are not in Quezon-Batangas area, the more likely it becomes diluted and adulterated. Rural consumption has suffered recurrent periods of disfavor from local grapevine news of illnesses caused by the drinking of 'bad batches'. Some producers sadly confess that much of what they produce, once purchased for local commerce, suffers dilution and adulteration with chemicals and a miscellany of extenders. Much of the roadside purchases, in half-gallon or gallon recycled plastic or bottle jugs is second-rate, washed down, extended and chemically adulterated of inferior quality, easily discerned even by non-lamba-connoisseurs (Stuart, 2011). Accordingly, the DTI has issued a warning that unscrupulous sellers have been labeling their product concoction as 'lambanog' which are not the real thing. This is why consumers are urged to buy only from accredited manufacturers and sellers (Ho, 2010; Veluz and Guevarra, 2008).

1.3 The value of Gender responsive value chain analysis

The provision of real value is fundamental to any new venture. Successful products meet a real need in terms of functionality, price, distribution, durability and/or perceived quality (Sahlman and Stevenson, 1992). An important point to note is that achieving the goals of superior efficiency, quality, innovation, and customer responsiveness requires strategies that embrace several distinct value-creation activities. Indeed, these goals can be regarded as goals that cut across the different value-creation functions of a company (Hill and Jones, 1995). These value-creating activities are the major concerns of value chain analysis.

Value chain analysis is a method used by most of the developing countries in the world in its attempt to develop local products and services. It helps in understanding the advantages and/or disadvantages of firms in specializing in product or service offering (Gereffi, 1994). Through mapping the chain, a better look at the various issues and concerns will cross out activities adding disvalue to the final product. More often, value chain analysis is conducted to reveal company's strengths and weaknesses relative to competitors (Porter, 1985).

Kaplinsky and Morris (2002) believe that value chain analysis which focuses on the dynamics of inter-linkages within the productive sector is better than the traditional modes of economic and social analysis. It overcomes a number of important weaknesses of traditional sector analysis which tends to be static and suffers from the weaknesses of its bounded parameters. Furthermore, the method is also useful as an analytical tool in understanding what provides the efficient allocation of resources within the economy of a firm or nation.

As adopted by the DTI in its development programs, the gender-related issues were included for its advocacy to promote gender equality among all firms. Thus, from VCA to GRVCA.

The various literatures cited herein focused on the production and marketing of lambanog and the associated opportunities and constraints. None of the cited literature revealed the status of the industry through gender responsive value chain analysis. This paper, therefore, aims to: (1) develop a complete value chain map for the lambanog industry; and (2) formulate a constraints and opportunities analysis.

I. Data

In the development of the GRVCA, the following limitations should be noted: First, the distillers surveyed are the only endorsed and highly-recommended by the Department of Trade and Industry (DTI) Quezon and with varied production and marketing systems; second, majority of the distributors are not legally registered either with the DTI or to the municipality they are located; and third, the analysis will only be limited to the first two steps, value chain mapping and opportunities and constraints analysis.

1.1. The Respondents

The owners of the various distilleries and business distributing lambanog products are the respondents of the study. The location of the distillers and distributors are limited to Tayabas City, Candelaria, Sariaya, Unisan and Lopez, Tiaong, Lucena, and Lucban. The researcher personally visited, interviewed and observed the participants during the period of October 2011 to February Respondents are the twelve (12) owners of distilleries specifically endorsed by the Department of Trade and Industry - Quezon Province and the 60 owners of registered and unregistered wholesale and retail stores.

Distiller	Location	Year Started Operation
A	Tayabas City	1999
В	Tayabas City	1979
С	Tayabas City	1982
D	Tayabas City	1987
Е	Tayabas City	1987
F	Tayabas City	1995
G	Tayabas City	1908
Н	Candelaria, Quezon	1969
I	Unisan Quezon	1999
J	Lopez Quezon	1978
K	Lopez Quezon	1984
L	Sariaya Quezon	1991

Table 1. List of Distilleries endorsed by the DTI Quezon Province

The table shows the location of the lambanog producers and the year they started their operations. Majority of the distillers are from the City of Tayabas comprising 58% or seven (7) out of 12. Two (2) of the distillers are from Lopez, Quezon. The rest are one each from Candelaria, Unisan and Sariaya. The distillers have been in lambanog production for more than 12 years.

	Location	Number of Participants	Percentage
1	Tiaong, Quezon	10	17%
2	Candelaria, Quezon	9	15%
3	Sariaya, Quezon	7	12%
4	Tayabas City	6	10%
5	Lucban, Quezon	8	13%
6	Lucena City	4	7%
7	Unisan, Quezon	8	13%
8	Lopez, Quezon	8	13%
	TOTAL	60	100%

Table 2. Distributor and Retailer Respondents Per Location

Snowball approach was used to locate various lambanog distributors since there is no list of distributors registered in the Department of Trade and Industry as well as the local government units. A participant was asked to identify other participants who, in turn, would identify another until 60 distributors were located.

The highest percentage of the distributors is located at Tiaong, Quezon with 10 stores (17%) followed by Candelaria, Quezon with 9 stores (15%). The lowest percentage of respondents is located in Lucena City with 4 stores (7%).

Location		Percent Share in the 2007 Population	Number of Participants
1	Tiaong, Quezon	11	11
2	Candelaria, Quezon	13	13
3	Sariaya, Quezon	16	16
4	Tayabas City	11	11
5	Lucban, Quezon	6	6
6	Lucena City	29	29
7	Unisan, Quezon	3	3
8	Lopez, Quezon	11	11
TOTAL		100%	100

Table 3.

Distribution of Lambanog Drinkers Per Area

Quota sampling was used in the selection of lambanog drinkers. These lambanog drinkers could be male or female with an age bracket of 18 – 65. A total of 100 lambanog drinkers were chosen from the different areas of Tiaong, Candelaria, Sariaya, Tayabas, Lucena, Lucban, Unisan and Lopez. The 2007 population was used as the basis for the distribution of customers per area. Prior to the giving of the survey instrument, the participants were asked if they are drinking lambanog. Only those who are drinking lambanog were included as participants.

II. Discussion

2.1. The value chain mapping

The comprehensive Value Chain Map is presented in Figure 1.

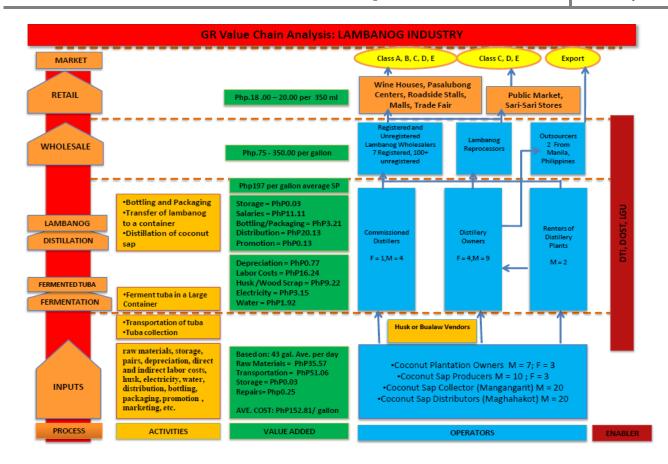


Figure 1. The Value Chain Map of the Lambanog Industry

The basic sequence of functions in the lambanog industry value chain include specific inputs, processing and production, commerce/trade, and final sale under which various activities, value added, operators and enablers are identified. The mapping segregates the various functions into various colors. The arrows signify the process flow while the broken lines separate one function from another function.

Lambanog making starts with coconut sap collection. The collectors locally known as 'mangangarit' tap the white liquid from the unopened coconut flower of the coconut tree. The raw materials will be transported to the production area for fermentation. The coconut sap is manually transferred to the fermentation vats. The sap is allowed to ferment for about three days. After the fermentation, the 'tuba' will undergo the process of distillation. The traditional process of distillation is the batch type pot-still process with rice husk or wood as a source of heat. After distillation, the product, also known as 'alak' is transferred to plastic containers. Some of the distilleries have bottling and packaging before the final sale.

There are two types of lambanog being produced in the Philippines. The most popular is the pure lambanog with 45% alcohol content or 90% proof. Some of the distilleries produce flavored lambanog, pure lambanog soaked with different types of fruits such as apple, prune, jackfruit, etc.

There are several reasons shared by the distillers which directly affect the production. First, the limited supply of raw materials or tuba caused by the seasonality of the coconut fruits. Second,

the fast employee turn-over and absenteeism of workers particularly coconut tapper. Third, the bad weather conditions. On the average, distillers mentioned that typhoon and bad weather would mean no production for a maximum of three (3) weeks. The supply of tuba varies accordingly with the type of weather. The highest production of tuba is during dry season particularly months of February to May. During typhoon season up to cold season, from August to December, the yield is at its lowest. During very dry season, the production of tuba is also reduced. During the rainy season, there is no or little tuba produced.

Inbound logistics of the value chain analysis include receiving and warehousing of raw materials and their distribution to manufacturing as they are required. The costs involve include the raw materials such as tuba some others use sugar, transportation costs including the amount paid to coconut tapper, transportation costs whether by vehicle or by horse, storage costs, and repairs of 'karitan'. The costs of tuba range from P50 to P55 per stauffer. A stauffer contains 5 gallons of tuba. Depending on the average number of produce, the costs of raw materials vary. Those that do not own coconut plantation would costs an average of P12,000 or P3,000 every quarter as payment for rental.

On an average a coconut tapper is paid P50 to P60 per gallon of tuba. On a fixed rate, a tapper is paid a maximum of P1,800 per production on a 22 gallons capacity. Payment for the delivery of tuba getter is P100 a day or P10 per container. Transportation costs from plantation to production site either by horse or vehicle range from P300 to P1,100.

Storage costs range from P200 to P1,500. This depends on the type of container they are using as storage. Stainless containers are the most expensive at P1,500. Plastic containers vary depending on the size and type of container that range from P200 to P400 a single container. Depreciation cost of storage was computed using the straight-line method of depreciation with an estimated useful life of 2 years. The daily depreciation is obtained to get an expense allocated daily. Repairs of the 'karitan' would cost a distiller from P1,500 to P4,500 a year.

Costs under operations include the transformation of inputs into finished products and services. The costs involve in the production of lambanog include depreciation of the machines used in cooking lambanog, labor costs particularly for cook and other production staff, costs of wood scrap or husk as the cheaper version of petroleum gas, electricity and water.

The cost of machineries used in the production of tuba which were locally known as 'tansong pula' or 'caldera' range from P100,000 to P600,000 per machine. To gauge the alcohol grade of the produce, distillers use alcoholmeter. This costs P1,500. Depreciation of the machines and other equipment was computed using the output method of depreciation. That is, the depreciable cost is divided by the estimated life in terms of units of production. The machines have estimated useful life of 10 years. On an average, the highest depreciation cost is P98.88 while the lowest is P2.40 per production. This only means that the higher the produce the lower the depreciation cost of the machines. The distillers pay P300 to P600 salary for the cook per production.

Costs of wood scrap range from P100 to P1,000 per production. This depends on the type they use. The most common 'bualaw' or husk costs higher than 'kahoy' or wood. There is no problem as to the source of these because it is available everywhere. Cost of lighting on the production site is lower because distilleries don't have night production. The monthly costs of electricity range from P100 to P15,000. The cost of electricity depends on the condition of the

production site. Costs of water range from P700 to P15,000 per month. On an average, the highest operations costs is P48.39 while the lowest operations costs is P8.20 per gallon.

The costs involve in outbound logistics including warehousing and storing of lambanog products, salaries of selling and administrative staff, costs of bottles, packaging materials such as label, seal, and box, and costs of distributing the products.

Storage costs range from P80 to P3,000. This depends on the type of container they are using as storage. Stainless containers are the most expensive at P3,000. Plastic containers vary depending on the size and type of container that range from P80 (recyclable) to P400 per container. Depreciation cost of storage was computed using the straight-line method of depreciation with an estimated useful life of 2 years. The daily depreciation is obtained to get an expense allocated daily.

Salaries herein include daily rate of driver for the distribution of finished products, bottlers and packagers. Payment for driver is P220 a day. Packager and bottlers are paid within the range of P3,000 to P4,000 a month or P400 on a daily basis.

Distribution costs range from P300 to P1,500 depending on the distance. Most of the distillers have their own vehicles. They pay for the gasoline as distribution costs. On an average, the highest outbound logistics cost is P28.49 while the lowest is P12.00 per gallon.

Marketing and sales include the identification of customer needs and the generation of sales. The only costs included in the marketing and sales are salaries of the sales staff and secretary and promotion costs. Promotion for the lambanog distillers is only about sponsorship and giving free lambanog during special occasions.

Salaries of the sales staff is P400 on a daily basis or P4,000 on a monthly basis. Promotion costs range from P500 to P2,000 a year in cash or in lambanog products. On an average, the highest marketing and sales cost is P4.60 per gallon. The lowest cost is P0.06 per gallon.

All the costs under each component were totaled to get the costs per production. This is then divided by the total number of produce in gallons to get the cost per gallon. The highest cost per gallon is P234.05 while the lowest cost is P55.30. The major key players in the industry include 10 coconut growers 7 male and 3 female, 13 coconut sap producers 10 male and 3 female, 20 male coconut sap collectors and 29 male distributors. Few of the distillers own coconut plantation. Many are leasing coconut plantations while some others source raw materials from tuba producers.

All of the distilleries are family-owned, under the micro and small enterprises with not more than 10 employees. There are 12 distillers owned by 9 male and 4 female. Some of the distilleries are registered under the names of the husband and wife. There are 5 commissioned distillers, 4 of them are male. These distillers implement the profit sharing scheme with the coconut sap producers. There are 2 renters of distillery plant.

Lambanog products are distributed through various channels as outsourcers, registered and unregistered wholesalers and lambanog reprocessors. Of the total lambanog wholesalers in the area, only 7 are registered. There are wholesalers that reprocess pure lambanog products through mixing with water and other chemicals and sell the same at the lower price. Distillers, on the other hand, produce exclusively for outsourcers that export lambanog to other countries.

Retailers of lambanog are wine houses, pasalubong centers, roadside stalls, malls and trade fairs all of which cater to class A, B, C, D and E market. Public market and sari-sari stores sell to class C, D and E. The customers' preferences on the lambanog products were pure lambanog, flavored and other variants; the frequency of drinking lambanog were monthly, weekly, daily and majority occasionally. The factors considered in buying lambanog were quality and taste, price, and promotional strategies. Customers perceive that label, container, and seal of lambanog products should be improved. The lambanog industry is supported by various government agencies such as Department of Trade and Industry, Department of Science and Technology and Local Government Units.

2.2. The Constraints and Opportunities Analysis

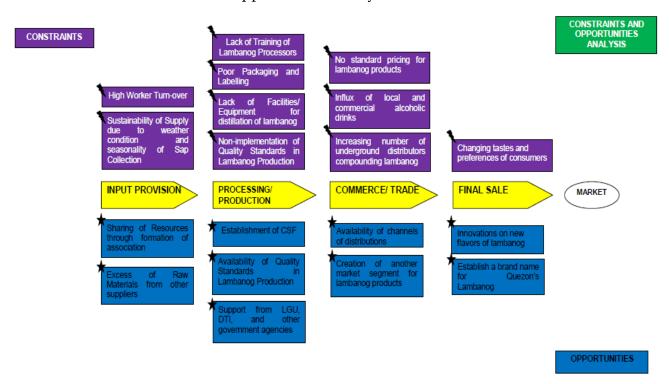


Figure 2 presents the various constraints and opportunities identified in the various stages. **Figure 2.** Constraints and Opportunities Analysis of the Lambanog Industry

The various constraints identified by the distillers under the input provision are high worker turn-over and sustainability of supple due to weather condition and seasonality of sap collection. Since there is no standard paying scale as well as benefits for workers, most of them are not staying good in their jobs. Meanwhile, the supply of tuba varies depending on weather. During cold and dry season as well as when there is typhoon, the yield is low.

On the processing and production, lack of training of lambanog processors, poor packaging and labeling, lack of facilities/equipment for distillation of lambanog and non-implementation of quality standards in lambanog production are the major constraints. Since most of the distillers inherited the business from their families, the early training is the early exposure to the production and management of the industry. There is no standard package and label for lambanog products. Lambanog is commonly stored in a plastic container. Customers need to bring containers where the drink will be transferred into when bought. The Philippine National Standard for lambanog

production has been drafted and approved by the Technical Working Group of the Department of Trade and Industry but is not yet implemented until today.

Wholesalers enumerated constraints such as no standard pricing for lambanog products, influx of local and commercial alcoholic drinks, and increasing number of underground distributors compounding lambanog. Prices of lambanog products vary depending on competition. The wide range of selling prices as imposed by the wholesalers make it impossible for high-priced lambanog products to sustain the operation. This is due to the increasing number of distributors compounding pure lambanog with water or other chemicals to lower the cost. Also, there are quite a number of alcoholic drinks dictating a very strong competition in the market.

With the ever increasing number of alcoholic drinks, the constraint being faced is the changing tastes and preferences of the customers. The introduction of flavored lambanog in the market at the onset of the export production on 2001 already created a market niche. The younger generation of drinkers prefers flavored lambanog due to its lower alcohol content and innovative features. However, its higher cost is the driving factor in choosing pure rather than flavored lambanog.

The buying pattern of the customers determines the occasions and seasons. During festivities, fiestas and several occasions such as birthday, drinking lambanog is more frequent. The frequency of drinking lambanog equates to practicality. On occasions where greater volume of alcoholic drinks is required, customers prefer cheaper alcoholic beverages.

The customers are now getting picky. They consider numerous factors in buying alcoholic beverages including lambanog products. They are choosing drinks that are safe from adulteration. Since the manner of selling lambanog is quite different from other commercial alcoholic beverages, customers are checking on the quality of the products they are buying. The quality and taste of lambanog products are evaluated by customers based on who produced the product. Different distillers produce different tastes and quality though they have similar alcohol content or proof. The disparity in the taste and quality of lambanog lies on the production practices. Drinkers relate the quality to the name of its producer.

Under the input provision the opportunities are sharing of resources through formation of association and excess of raw materials from other suppliers. An association of lambanog distillers will eventually pave way to major reconstruction on the management of the industry. Aside from the standardization of quality control, marketing and pricing, it will also lead to the sharing of available resources. Some of the distillers enjoy surpluses of raw materials while some are short. This scenario will eventually be phased out and equality will be achieved if an associated be formed. This will likewise lead to the establishment of Common Shared Facilities (CSF). CSFs are only given to registered and legitimate cooperatives or associations. Most of the government agencies are granting aide, support and financial budget to purchase equipment and machines to legally organized associations.

Another milestone in the industry is the drafting of the Philippine National Standard (PNS) on lambanog production. It has been formulated by the Technical Working Group duly assigned to study, analyze and monitor the quality procedures in lambanog making. This is ready for implementation and should be adopted by all distillers in the Philippines.

The various government agencies are giving full support for the local lambanog producers. Aside from marketing assistance, there are agencies giving seminars and lectures, assistance to join national and international trade shows and series of training for product branding and packaging. Moreso, local distillers are taxed lower than any other producers of alcoholic beverages.

Under commerce/trade, the availability of channels of distributions and creation of another market segment for lambanog products are two opportunities. There are several channels of distributions that should be further enhanced. The availability of channels makes marketing and networking with potential clients easier. The widening of market horizon will then lead to creation of another market segment particularly international market. Truly, the opportunities under the final sale including innovations on new flavors and establishment of a brand name will come into place.

III. Conclusion/Recommendation

The lambanog industry in the Philippines has all the potentials and opportunities from a small-scale industry to an export-oriented business. A management development plan should be developed with specific actions to be taken for each constraint. Also, the government agencies such as Department of Trade and Industry, the lead institution, the local government units from the province and municipalities, the Department of Science and Technology, Cooperative Development Authority and Technical Education, Skills and Development Authority among other members of the Technical Working Group (TWG) should be convened and organized immediately for the vetting of the action plan. Thus, management development plan should be fully established and implemented. Years from now, the lambanog will be trademarked as 'Philippine Lambanog' that competes with the global brands.

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