July 1989 INFORMATION TEXT SERIES 034

FINAL REPORT

The MARKETS and MARKETING ISSUES of the KONA COFFEE INDUSTRY

Prepared for the
State of Hawaii
Department of Agriculture

Prepared by
Stuart T. Nakamoto and John M. Halloran
Dept. of Agricultural and Resource Economics
College of Tropical Agriculture and Human Resources
University of Hawaii

HITAHR · COLLEGE OF TROPICAL AGRICULTURE AND HUMAN RESOURCES · UNIVERSITY OF HAWAII

ACKNOWLEDGMENTS

This study was funded by the Hawaii State Legislature, under the administration of the Hawaii State Deparment of Agriculture. The study team wishes to acknowledge the many individuals and firms within the industry, whose knowledge and cooperation contributed significantly to this report. Special thanks to Dr. John Yanagida for his review and comments of an earlier draft. The tables and figures were prepared by Jill Lani Stone.

THE AUTHORS

Stuart T. Nakamoto is an assistant specialist in the Department of Agricultural and Resource Economics, College of Tropical Agriculture and Human Resources, University of Hawaii at Manoa.

John M. Halloran is an assistant specialist in the same department.

FINAL REPORT

The
MARKETS and MARKETING ISSUES
of the
KONA COFFEE INDUSTRY

Prepared for the
State of Hawaii
Department of Agriculture

Prepared by
Stuart T. Nakamoto and John M. Halloran
Dept. of Agricultural and Resource Economics
College of Tropical Agriculture and Human Resources
University of Hawaii

EXECUTIVE SUMMARY
The Markets and Marketing Issues of the Kona Coffee Industry

Findings:

1. The Kona Coffee industry is not dealing with a single, homogeneous market. Instead, several market segments are identified based on product form, channel of distribution, and final consumer. These are:

   (1) Institutions (hotels and restaurants)

   (2) Local residents (specialty outlets and supermarkets)

   (3) Tourists (from US vs. from Japan)

   (4) Exports (out-of-state sales, including mail order)

   These segments are in different stages of development, and have different marketing needs (promotion and advertising are treated as only part of marketing.) These market segments are perhaps the major reason for the lack of industry cohesion.

2. Universal concerns to the industry are or should be product quality, reputation, and image. These are essential to maintaining markets, expanding markets, and meeting competition posed by specialty coffees and other products. The biggest external threat is "Kona-style" or counterfeit coffee. Quality, reputation, and image can establish Kona coffee as distinct from but complementary to other Hawaii coffees.

3. Fluctuating prices resulting from fluctuating production have a negative influence on the price/value perceptions of especially roasters, and are a major cause of instability in markets. This aggravates the high carrying cost by purchasers of Kona coffee. In terms of many production problems, recent history has demonstrated that higher prices are attracting resources to the industry. Price stability will further enhance the position of Kona coffee in markets and hence, of producing Kona coffee.

4. This study cannot support or refute minimum content legislation for Kona blends. Besides issues of logistics, enforceability, jurisdiction, etc., the available information does not conclusively show that Kona blend either helps or hurts the <u>growers</u>. Further, it would be very costly to collect the information needed for a definite conclusion, and firms are unlikely to willingly part with the required information.

   This report instead recommends an approach that allows the market mechanism to dictate the proper blend percentage. The desired results attributed to minimum content standards can be obtained using truth in labelling together with a certification program and education/promotion as outlined below.

Recommendations:

1. **Certification program.** The individual market segments and overall Kona coffee industry will be best served by a certification program for pure Kona coffee. This program is patterned after similar endeavors in other products, notably Jamaica Blue Mountain and Colombia coffees, and Florida orange juice. However, especially the coffee examples serve as only models because of the different structure, organization, and operating conditions of these foreign industries.

   The underlying concept behind certification for Kona coffee is as follows. Although the program is voluntary, non-participation implies that something is wrong with the uncertified product. Certified processors issue dated certificates of authenticity with each bag of green coffee sold. This assures buyers that a product is pure Kona coffee of established quality. Buyers in turn are licensed to use a seal of approval on final products. Processors and buyers must demonstrate compliance in order to remain certified, reinforced by other means of monitoring. A fee schedule can also be included so the program is self-funding.

   An essential complement to certification is education/information directed first at the trade, then to retailers, and eventually the consuming public. This includes using trade magazines (e.g., an explanation of certification with a list of certified processors), and a newsletter on Kona coffee. Such efforts would also be a powerful negative incentive to cheating or not participating.

   If successful, the program could expand to include Kona blends, perhaps via truth in labelling. Again, the implication of non-participation would be that something is wrong with the product.

2. **Inventory/stock control** is one approach to easing supply fluctuations and thus to stabilizing inter- and intra-year price fluctuations. Possible actions include a centralized warehousing and/or distribution scheme; public subsidy (construction and low cost operating loans); the use of speculators to carry inventory costs and assume market risk.

3. There are innumerable activities for **promotion and advertising**, especially on the firm level. These would ideally be tied in to the certification program. However, promotion and advertising can quickly deplete limited resources without the desired results. For the industry in general, in-state markets have not been sufficiently tapped. In particular, tourists are a captive audience that need to be better utilized, with a "free" carryover to residents. Stronger efforts in activities focusing on the Kona area could be fruitful. Events include the Kona Coffee Festival, Ironman Triathalon, Hawaii and International billfish tournaments. If successful, such efforts could be extended to other events.

4. The recommendations outlined, especially on an industry-wide basis, will be best implemented by an **industry-wide organization** such as the Kona Coffee Council. Program success and longevity is enhanced with greater self-sufficiency in financing.

TABLE OF CONTENTS

TABLE OF CONTENTS (continued)

List of Tables

List of Figures

CHAPTER I: OBJECTIVES AND BACKGROUND

I.A Introduction

The goal of this report is to provide information on the markets for Kona Coffee so the Kona Coffee industry can maintain and increase its profitability. Profitability can be improved by increasing revenues, decreasing costs, or both. Profitability is also enhanced by increasing the stability of revenues or costs. To accomplish this goal, this research has three objectives:

1. Identify current and potential markets for Kona Coffee
2. Identity constraints to achieving market potential
3. Identify possible strategies and activities to penetrate or develop and maintain markets

The procedures for reaching these objectives rely heavily on published information, supplemented by surveys and interviews.

The primary audience for this report is a broadly defined Kona Coffee industry and when the situation warrants, more specifically the existing growers of Kona Coffee.

General overviews of the world's coffee trade and of specialty coffee are presented in this chapter, where some global and U.S. statistics are provided to gain a better perspective of Kona Coffee. The production and processing end is closely scrutinized in Chapter II. Chapter III describes various market segments as defined by product form, final consumer, and the way in which the product reaches the consumer. The discussion includes a summary of market statistics for coffee in Japan. Three surveys were conducted for North American tourists coming to Hawaii, Japanese tourists, and Honolulu residents. Their results are also presented. Finally, there is an analysis of supermarket coffee sales data.

Chapter IV is intended as an objective presentation of the various issues uncovered from interviews with various roasters and processors in Hawaii and on the continental United States. In particular, the closely related concepts of image, quality, and reputation are treated in separate sections. "Image" involves peoples' perceptions and beliefs such as are related to emotions and past experiences. "Quality" is used in reference to the physical characteristics of Kona Coffee (such as taste, aroma, and mildness), and "reputation" deals with the consistency and perceptions of quality, and the provision of quality (service).

The intent of Chapter V is to summarize the previous chapters and discuss various options that are available for developing a marketing strategy for the industry. Some activities will also be useful to individual firms.

I.B World Coffee Trade

Commodity coffee is the second most widely traded single commodity, following only oil in world trade. Trade is controlled by quotas set in the 6-year International Coffee Agreement (ICA) so as to keep prices within a predetermined range. The ICA is between the 50 coffee-producing and 24 coffee-consuming members<1> of the International Coffee Organization (ICO), a group whose goal is to provide fair prices and returns to both producers and consumers. Imports by ICO members account for 85 to 90 percent of total world exports. ICA quotas currently result in large inventories being held by producers: the USDA estimates beginning coffee stocks for the 1988-89 season to be half the expected world production. See Pieterse and Silvis<2> or Uker's Buyers' Guide<3> for more details on the ICA and ICO. The most recent ICA expires in September 1989.

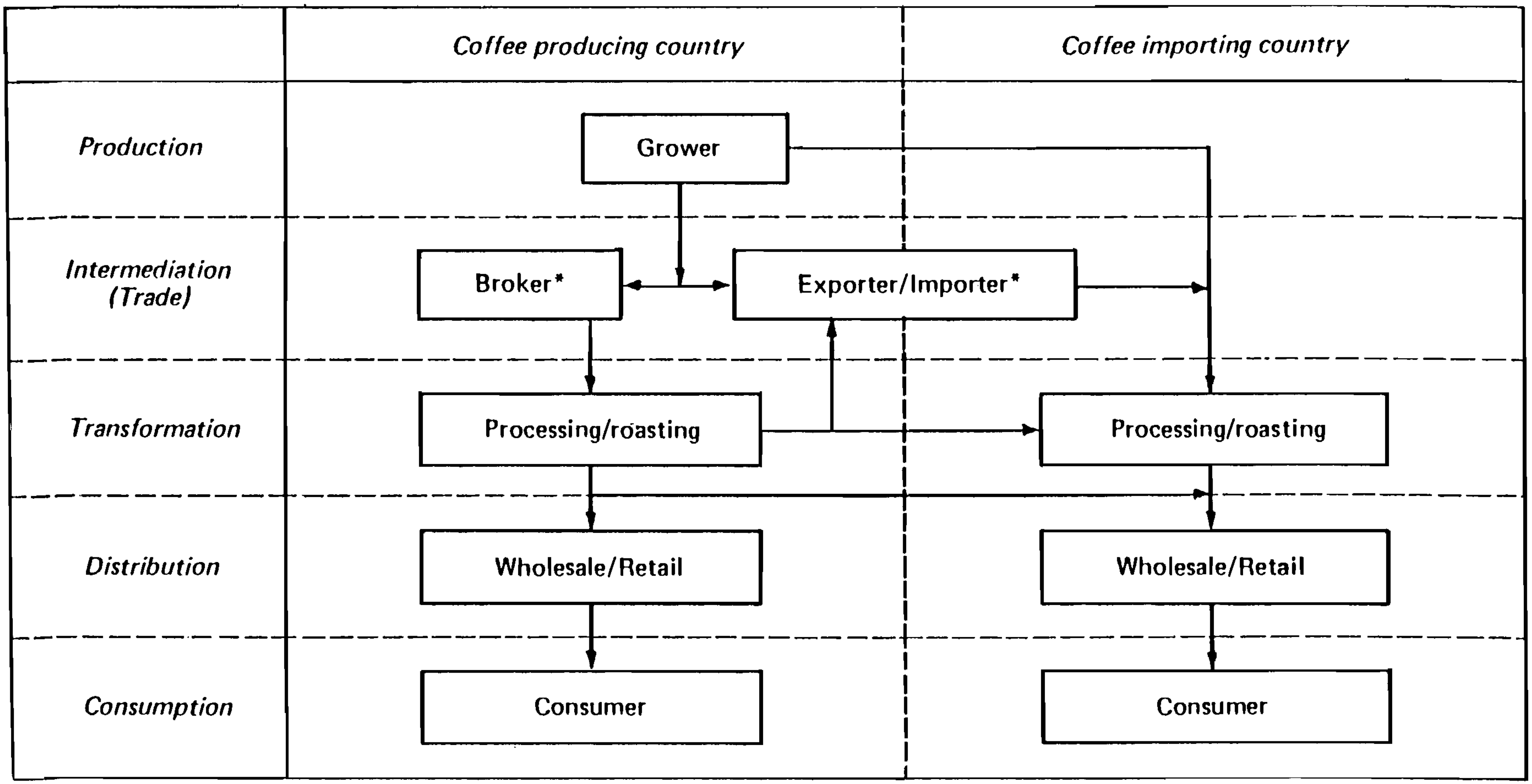
While the ICO is worldwide in scope, individual countries typically also have their own organizations. Uker's lists groups within each country. In the United States, the ICO funds the Coffee Development Group (CDG), whose mission is to increase the consumption of coffee in the U.S. via educational, informational, and marketing programs.

The largest industry group in the U.S. is the National Coffee Service Association. The National Coffee Association of U.S.A., Inc. is second with over 200 member companies handling about 85% of all coffee imported and roasted in the country. Other trade organizations in the U.S. are the Specialty Coffee Association of America, the Green Coffee Association of New Orleans, Green Coffee Association of New York City, New York Coffee Roasters' Association, Pacific Coast Coffee Association, and Southern Coffee Association.

For the 1988/89 crop year, the USDA Foreign Agricultural Service estimates world production to be 93.3 million bags, or roughly 12.3 billion pounds, down ten percent from the previous year (USDA<4>). Figure I-1 illustrates the flow of coffee from typical growers to final consumers. Brazil and Colombia are major producers, while major consumers are developed countries such as the United States, members of the European Economic Community, and Japan. In total, ten countries account for three-fourths of coffee imports. The United States is the largest importer with 25 to 30 percent of total world imports.

The 1982 study by Pieterse and Silvis estimated the world income elasticity of coffee demand at 0.448; that is, coffee demand would increase by 4.5 percent if income increases by 10 percent, *ceteris paribus* (or all other factors remaining constant. Japan, Central Europe, and centrally planned economies were estimated to have the greatest growth potential. Annual per capita consumption is highest in the Scandinavian countries (22 to 26 lbs per person), more than twice the ten lb/person in the United States.

Figure I-1. Coffee Marketing Systems



* Private or governmental agencies

Source: UNCTAD, 1984. Studies in Processing, Marketing and Distribution of Commodities.

In 1986, the United States imported 2.6 billion pounds of crude (green) coffee valued at $4.4 billion from over eighty countries (Yokoyama et al. <5>). Another $267 million was imported in the form of instant coffee, roasted coffee, coffee extract, and coffee mixed with substitutes. In terms of the type of coffee, 1987/88 imports were reported by the USDA as 15.5% Colombian milds, 36% other milds, 29% unwashed Arabicas, 15.5% Robustas, and 4% other in green bean equivalents. One-half to three-fourths of U.S. coffee imports are handled through some 100 trading firms (remainder imported directly by processors), with the ten leading importers accounting for about 40 percent of the volume. Although there are some 200 roasters and processors, General Foods (Maxwell House, Master Blend, Sanka, Yuban, Brim), Hills Brothers (Hills Bros, MJB, Chase & Sanborn), and Procter & Gamble (Folger's) account for three-fourths of 1987 roasted coffee sales in the United States. The Nestle Company (Nestle, Taster's Choice) is also a major firm for instant coffee.

In terms of individual countries, Brazil has been the leading supplier to the United States except in 1986, when Colombia had 13.5 percent of crude coffee imports by volume. Mexico also has a market share larger than 10 percent. The most expensive coffee, measured in terms of the average landed price of a supplier's shipments, came from Jamaica at $3.67 per pound for 99 thousand pounds<6>. The least expensive shipments were from the People's Republic of China, at $0.71 per pound. Colombian imports commanded $1.96/lb. On the average, green coffee received in 1986 had a landed price of $1.72 per pound.

Pieterse and Silvis estimated the short term price elasticity of coffee import demand for the United States at -0.372 and for the world at -0.186. Thus, a 10 percent decrease in price would result in an increase in the quantity demanded in the U.S. market of 3.7 percent, and an increase in the world market of less than two percent, *ceteris paribus*. Conversely, the market must adjust to any change in the quantity supplied with a proportionately greater change in price.

Reductions in supply seem to result from either disease or a natural disaster in some production area. The price increase from a production shortfall would be well received by surviving growers, and might result in some new plantings. Since there is a time lag for new trees to mature, persistent high prices that encourage even more plantings would have disastrous longer-term effects. When the additional plantings reach full production, prices are severely depressed until the next calamity. The impacts are more pronounced in many coffee exporting countries because of the importance of coffee these economies, leading to various government policies and programs to support production and better control supply. For importers, processing firms regularly carry 4-6 weeks of inventory to better control their supply fluctuations.

There are several noteworthy trends with regards to coffee consumption in the United States. The ICO conducts an annual Winter Coffee Drinking Study<7>. This study has shown a long-term decrease in both per capita and total consumption since 1962, the peak year for coffee consumption in the United States (Table I-1). The table also shows a marked decrease in the percentage of the population which drinks coffee, from 75% in 1962 to 50% in 1988<8>. In comparison, milk and tea have been relatively stable at about 45-50% and 25-30%, respectively. Per capita consumption of juices had been increasing but seems to be stabilizing in the 40-45% range, while soft drinks show a continuing increase, and have surpassed coffee as the most popular beverage.

Table I-1. Coffee Consumption Trends in the United States

	1962	1984	1985	1986	1987	1988
Cups per person per day	3.12	1.99	1.83	1.74	1.76	1.67
Cups per drinker per day	4.17	3.48	3.33	3.32	3.38	3.34
Percentage drinking	74.7	57.3	54.9	52.4	52.0	50.0
U.S. population (millions)	186.5	236.5	238.7	241.1	243.9	246.2
Computed total consumption (million cups/day)	581.9	470.6	436.8	419.5	429.3	411.2

Source: International Coffee Organization. United States of America: Coffee Drinking Study, Winter 1988 and earlier issues. ICO, London.

These long-term trends are more disturbing when the distribution of coffee drinkers is considered. The ICO and Diamond<9> show that younger persons are less likely to drink coffee. That is, we are witnessing the "graying of America" where the coffee drinking population tends to be middle-aged or older, and there are fewer new drinkers in younger age categories. In 1962, 81 percent of the 20-29 age group drank coffee. In 1987, coffee consumption within that age group decreased to 33 percent. There are also some indications of a lower consumption rate in the (now older) 1962 group. Health concerns about caffeine and decreasing quality of coffee are two factors leading to this decline. Another reason is the inroads being made by soft drinks. In particular, the coffee industry often cites the "Coke in the Morning" campaign.

There have been some efforts to slow or reverse these trends, especially by the Coffee Development Group. A summary of recent CDG activities is presented in the Tea & Coffee Trade Journal<10>.

Although the general trend is one of decreasing coffee consumption in the United States, the import quantity and value of crude coffee, roasted coffee, and coffee extract have generally increased over the period 1981 to 1986. Only instant coffee imports had a downward trend. Since consumption is decreasing, one explanation of this increase in imports is that exports from the United States are increasing. Another possibility is that more coffee is being used in non-traditional products. Neither explanation was explored for this report.

In comparison to the import figures for the U.S. as a whole, Kona's record production in the 1986-87 crop year was about 3 million pounds of parchment coffee worth $8.7 million at the farmgate<11>. The parchment, without converting to green coffee basis, is less than one-tenth of one percent (0.1%) of the quantity imported, and Kona Coffee's total value is less than one-fifth of one percent (0.2%) of U.S. import value. Compared to the average U.S. $1.72 price, the West Coast wholesale price of Kona Coffee ranged from $3.50 to $5 per pound. Thus, the volume of Kona Coffee is insignificant relative to the coffee market as a whole, but it commands a premium price.

Given the magnitude of Kona's production, it would seem that Kona Coffee should be subject to the ups and downs of the world market. A review of Kona Coffee's history reveals that this was the case until very recently. It might also seem unusual that Kona Coffee commands a price premium, and that it now seems to be independent of the world market. The next section on specialty coffees discusses these phenomena.

Chapter I.B Footnotes

<1> As of 1986, the 50 exporting members of the ICO were Angola, Benin, Bolivia, Brazil, Burundi, Cameroon, Central African Republic, Colombia, Congo, Costa Rica, Cuba, Dominican Republic, Ecuador, El Salvador, Equatorial Guinea, Ethiopia, Gabon, Ghana, Guatemala, Guinea, Haiti, Honduras, India, Indonesia, Ivory Coast, Jamaica, Kenya, Liberia, Madagascar, Malawi, Mexico, Nicaragua, Nigeria, Panama, Papua New Guinea, Paraguay, Peru, Philippines, Rwanda, Sierra Leone, Sri Lanka, Tanzania, Thailand, Togo, Trinidad and Tobago, Uganda, Venezuela, Zaire,Zambia, and Zimbabwe. There were 25 importing members: Australia, Austria, Belgium/Luxembourg, Canada, Cyprus, Denmark, Fiji, Finland, France, Federal Republic of Germany, Greece, Ireland, Italy, Japan, Netherlands, New Zealand, Norway, Portugal, Singapore, Spain, Sweden, Switzerland, United Kingdom, United States of America, and Yugoslavia.

<2> Pieterse, M.Th.A. and H.J. Silvis, The World Coffee Market and the International Coffee Agreement. Wageningen Agricultural University, The Netherlands.

<3> Annual "Uker's Buyers' Guide" available from the Tea & Coffee Trade Journal, 130 West 42nd Street, 22nd Floor, New York, NY 10036. Tel: (212) 391-2060. Published by Lockwood Book Publishing Co., Inc.

<4> U.S. Department of Agriculture, Foreign Agricultural Service, "World Coffee Situation," June 1987.

<5> Yokoyama, K.M., K. Wanitprapha, S.T. Nakamoto, J.C. Roecklein, and P.S. Leung, eds. U.S. Import Statistics for Agricultural Commodities (1981-1986). Transaction Books, Rutgers University, New Brunswick, N.J. April 1988, 879 pp.

<6> Although Jamaican Blue Mountain (JBM) is the world's most expensive coffee, most of the 99 thousand pounds of coffee from Jamaica is likely to be the lower priced High Mountain and/or Prime Washed, because the majority of JBM production is exported to Japan.

<7> International Coffee Organization. United Stated of America: Coffee Drinking Study, Winter 1988 and earlier issues. ICO, London.

<8> A 73% figure (63% for ages 18-34, 74% for ages 35-54, and 79% for ages 50+) was cited in the Honolulu Star Bulletin, January 24, 1989 issue. SAMI/Burke Market Research was listed as the source.

<9> Diamond, Joseph P. "Coffee Drinking and U.S. Lifestyles" in Tea & Coffee Trade Journal, 155(9):30-31+, September 1983. In a given age group, Diamond's data also shows decreasing consumption after 50-55 years of age.

<10> "Making Coffee Number One Again" in the Tea & Coffee Trade Journal, 161(1):104-109, January 1989.

<11> Hawaii State Department of Agriculture. Statistics of Hawaiian Agriculture 1987. The farmgate equivalent price for parchment coffee was estimated to be $2.90 per pound.

I.C Specialty Coffee

Except for Japan and a few other areas, coffee consumption throughout the world has been declining, and the United States is no exception. Health concerns about caffeine consumption, a decrease in product quality, and a strong push by soft drink manufacturers targeting younger consumers are all cited as contributing factors to coffee's decline.

Most product segments of the coffee industry can be characterized as "mature." Growth and/or profitability of industry participants are achieved by increasing market share at the expense of other firms. The industry is very competitive as marketing strategies focus on shelf space, packaging, and advertising and promotional campaigns targeted at wresting sales from the competition. Many efforts are aimed at older consumers, while the younger generation seems to be conceded to soft drink manufacturers.

The market segment called specialty coffee targets the high end of the coffee market. Kona Coffee is identified as a specialty coffee, and exemplifies better quality and higher price relative to regular retail coffees, which are perhaps the two most distinguishing characteristics of specialty coffees. Specialty coffees are usually identified by their country of origin (as compared to brand names in supermarkets), and are typically arabicas, high grown, and of best quality. Depending on the user and the context, specialty coffee also includes or excludes gourmet coffees and coffees flavored with extracts of fruits, nuts, and various liquors. Examples of the latter include chocolate, amaretto, almond, macadamia nut, Irish Cream, Kahlua, and Grand Marnier. The term specialty coffee traditionally refers to those coffees sold in the whole bean form, but certain other product forms such as dark roasts (e.g., Italian, European, Vienna, French), expresso, and cappuccino are more likely to be associated with specialty coffee.

Along the lines of achieving and maintaining high quality, preparation of specialty coffee is more user-oriented, with the emphasis on minimizing the time between roasting, grinding, brewing, and consuming the coffee. According to "Daw's first law of retail quality," the quality of the coffee in the cup varies inversely with the distance which separates the drinker from the roaster<1>. Home roasters and grinders, special filters, and similar paraphernalia may also be involved because of what might best be described as the rituals that are often associated with the consumption of fine coffee. In many cases, the consumer's perception may be of a higher quality product because of these rituals or "hype," although the actual quality may be no different from other products.

In the past, specialty coffees were often associated with small independent roasters, and sales were more likely through small outlets that stress quality and service. These specialty coffee outlets often serve coffee on the premises in a cozy, often intimate atmosphere. To a certain degree much of this is still true, but the use of the term specialty coffee has become broader or more blurred, especially for the consumer.

Specialty coffee has recently been the fastest, and depending on definition, the only growing segment in the coffee industry. Retail sales in the United States totaled $270 million in 1985, up from $60 million in 1981. This has attracted a number of firms; over the same period the number of roasters had increased from 15 to 60. In 1985, there were reportedly 125 wholesalers of specialty coffees in the United States and Canada<2>. Many of the large commercial roasters now have their own specialty lines. Associated with this growth is the sale of specialty-type coffees in the retail supermarket.

Some argue that these developments essentially reflect the expanding market of a new product, and that the segment is maturing, as evidenced by slower or stagnant growth in certain cities. They also maintain that the entry of commercial roasters further indicates an impending shakeout in specialty coffee. Nevertheless, and although purists may not consider all premium priced (and especially ground) products to be specialty coffee, it is clear that regardless of product form, the premium priced products are being merchandised as specialty coffee and that supermarkets have become a major outlet for specialty coffee. Both the specialty coffee outlets and supermarkets are further discussed in Chapter III.

Chapter I.C Footnotes

<1> Daw, Stuart. "Coffee's Image Still Needs Upgrading" in Tea & Coffee Trade Journal, 157(1):57-62, January 1985.

<2> Schoenhold, Donald N. "A Look into the Specialty Trade" in Tea & Coffee Trade Journal, 157(12):3-6, December 1985.

CHAPTER II: THE KONA COFFEE INDUSTRY

II.A Structure

The Hawaii Agricultural Statistical Service, State Department of Agriculture, regularly compiles and publishes statistics of coffee production in the yearbook "Statistics of Hawaiian Agriculture" and in a bi-annual newsletter. The most recent production statistics are reproduced in Table II-1.

In the 1987-88 crop year, there were 630 growers who harvested six million pounds of cherry (equivalent to 13,700 bags of green) from 2050 acres of land. Including 250 unharvested acres, the mean acreage per farm was 3.65 acres. Mean production per harvested acre was 2,900 pounds of cherry, a little more than half the 5250 lbs/acre yield of the previous year. These data show that total crop acreages are increasing.

At one time, Kona production yield was reported at as much as three times the world average. Cherry production was once 100 bags per acre, but has declined primarily due to different pruning methods that currently emphasize ease of harvesting and a limited labor supply rather than higher yields. Marutani *et al.*<1> estimated the cost of production for a typical farm for the 1984-85 season to be $3856 per acre. Under the assumptions used, breakeven price at a yield of 10,000 lbs/acre was about $0.39/lb, and breakeven yield at a price of $0.67/lb was 5756 pounds per acre.

There were six major processors in 1987, with a number of smaller operations. The bulk of production was historically processed by the two cooperatives, but other operations are gaining larger shares of the crop. Given the existence of idle family-sized mills, it is expected that a number of small processors will enter and exit as market conditions dictate<2>. Possible implications for the industry, noted in a 1959 report<3> but still applicable today, are that grower-operated processing could result in quality deterioration and inefficiencies in both harvesting and processing at the farm level, and overcapacity and inefficient use of resources for the industry as a whole.

Coffee roasters in Hawaii include Superior Coffee and Tea, Lions Coffee, Hill & Hill, and several smaller operations. Hill & Hill was purchased in 1987 by a joint venture between Misuzu Coffee Co. (60%), Sumida Corp. (31%), and Mitsubishi Corp. (9%) of Japan<4>. Most, if not all, do contract roasting for other firms. The activities of each firm range from single functions (e.g., wet or dry processing only, roasting only) to full vertical integration (from growing to retail sales). Ancillary activities include custom processing (especially roasting and packaging), sales of supplies, and tourism-oriented attractions.

The major consumer groups identified within Hawaii are residents, tourists, and institutional sales (primarily hotel and restaurant, but also including office coffee systems). The major geographical market for direct sales of green and roasted Kona Coffee outside of Hawaii is the West Coast of the United States, with sales also being expanded further inland and to Japan. Kona Kai Farms is reported to have a marketing agreement with New Hampshire-based Elkins Company, Inc. for "Kona Lei Plantations" coffee. If successful, this venture would be a major outlet for Kona Coffee <5>.

Some Kona Coffee exports are via mail order. Several roasters (Hawaii and U.S. Mainland) mentioned mail orders as a sizable source of revenue from especially regular customers, but the extent of this particular sub-segment is not known. Consumers can also be characterized by whether price or quality is the primary consideration in their purchasing decisions. The market segments for Kona Coffee are further discussed in Chapter III.

The history of Kona Coffee may provide some background to the present structure and conduct of the industry. Various reference materials are listed in "Coffee in Hawaii: A Guide to Historical Resources<6>." A detailed history not listed in this reference is a mimeographed manuscript by Duffy<7>.

Chapter II.A Footnotes

<1> Marutani, Herbert M., Norman Bezona, and Bill Koepke. Cost and Return of Kona Coffee Production: 1984-85. University of Hawaii, CTAHR Farm Management Report no. 18, May 1986.

<2> In 1988-89, several small family operations are processing cherry into parchment as cherry prices move to $0.85/lb (with associated increases for parchment).

<3> Slate, Daniel M. and Shelley M. Mark. Economic Study of the Kona Coffee Industry and a Program for Improvement. Kona Community Federal Credit Union, March 1959. 11 pp.

<4> Sylvester, James. "Japanese Acquire Isle Coffee Company" in Honolulu Star Bulletin, June 8, 1987.

<5> Pang, Gordon. "New Gourmet Marketing Plan Formed for Pure Kona Coffee" in West Hawaii Today, March 3, 1988, and Kona Kai Farms. Coffee Farmer Newsletter, no.9, June 1988. Kona Kai Farms projected up to 3,500 bags of green Kona Coffee would be used from the 1988-89 harvest.

<6> "Coffee in Hawaii: A Guide to Historical Resources" compiled and annotated by Jean A. Whelan (Linda K. Menton, editor). Published in 1986 by the Humanities Program of the Hawaii State Foundation on Culture and the Arts, in cooperation with the Hawaiian Historical Society.

<7> Duffy, William. The Re-Emergence of the Kona Coffee Industry. Mimeo, November 1984.

Table II-1. Kona Coffee Production Statistics

year	crop acres	harvest acres	cherry[1] volume (000#)	parchment volume (000#)	parchment value ($000)	green volume (000#)
1983-84	2000	1800	9800	2800	6300	na
1984-85	2000	1700	6125	1750	4813	na
1985-86	2100	1650	6475	1850	5180	1535
1986-87	2300	2000	10500	3000	8700	2400
1987-88	2300	2050	5950	1700	4845	1370

[1] Computed using 3.5:1 cherry to parchment conversion factor.

Source (except cherry volume): Hawaii Agricultural Statistics Service, "Statistics of Hawaiian Agriculture 1987," Hawaii State Department of Agriculture, annual.

Table II-2. Conversion Rates between Coffee Products

product	Equivalents to 100 lbs roasted	Equivalents to 100 lbs cherry
cherry	600	100
parchment	150	25
green	120	20
roast	100	16.6

Table II-3. Typical Kona Coffee Yield, by Grade

Peaberry	Extra Fancy	Fancy	#1	Prime & 3X
6%	13%	26%	45%	10%

II.B Product Characteristics

II.B.1 Grades

Kona Coffee, like most other coffees, goes through several stages of processing between the original cherry and the cup of final product. Actual conversion ratios between product in the different stages are affected by a number of factors, including weather conditions at time of harvest, the size distribution of coffee beans, the degree of roast, and the method used in "quenching," or cooling the roasted product (i.e., air vs. water). "Typical" conversion ratios are cherry to parchment 4:1, parchment to green 1.25:1, and green to roast 1.19:1. Using these factors, the quantities derived from 100 lbs of cherry or conversely, required to get 100 lbs of roasted product are presented in Table II-2.

With regards to grades and standards, there is a system of grades for Kona Coffee and for Hawaii coffee under the Administrative Rules of the Hawaii State Department of Agriculture<1>. Cherry can have three grades according to the percentage of defects and the foreign material content. #1 can have no more than 2% defects and 0.125% foreign material, #2--7% defects and 0.25% foreign material, and #3--12% defects and 0.25% foreign material. The Kona Farmers Cooperative is the only wet processor that is known to grade cherry.

Parchment grades are A, B, and Offgrade. The grades of green coffee based on size, appearance, and number of defects are Extra Fancy, Fancy, #1, Prime Green (#2), #3, and Offgrade, with a category called Peaberry<2>. The higher grades and Peaberry are especially attractive for products being sold as whole bean. #3 is the regular commercial grade; product grading out below #3 legally cannot have the Kona name.

Green coffee is mechanically graded by size with sorting screens, then by density with a gravity separator. Processed lots are then sampled for the number of defects and for cupping. As a general rule, less defects are associated with better cupping quality, but it is also possible for the best grades to cup poorly.

The yield of a crop between the grades will vary from year to year depending on weather, production practices (e.g., pruning, fertilization, weed control) tree stress and nutrition, size of the current crop per tree, and other factors. A "typical" breakdown of Kona Coffee is given in Table II-3. Many, if not most processors will try to upgrade the product by increased sorting, etc. so as to reduce the content of defects and damaged beans and for better sizing. As a result (and also to further price differentiate the market), some processors have also added a number of "sub-grades", for example High, Medium, and Low Fancy.

II.B.2 Prices

The only coffee priced consistently higher than Kona is Jamaica Blue Mountain, with 1987-88 prices of $6.50/lb for green coffee out of Jamaica (if available)<3> and around $11/lb if purchased via Japan. At the green level, Kona Coffee typically has a $2.50 to $3.00 premium over other high quality coffees. Some of the stated reasons for this difference are the higher quality of Kona Coffee, a strong demand for the product, the limited supply of Kona, the relative market power of the suppliers (until very recently, a thinly traded market because of Superior Coffee and Tea's control of supply), intrinsic characteristics (image, allure, romance of Hawaii, reputation), and high production costs.

In 1987, per pound prices for pure Kona Coffee were $0.50 to $0.60 for cherry<4>, $2.55 for parchment, $3.50 to $4.70 for green, $6 to $7 for roasted wholesale, and $7 to $14 at retail. In a February 1986 article, prices were listed at $9.95 to $11.95/lb to retailers, $7.50 to $8.50/lb to roasters, $4.00 to $5.00/lb to brokers, $2.50 to $3.00/lb to processors, and $0.50 to $0.75/lb to farmers<5>. 1987 U.S. prices for all roasted coffee were $2.79 to $3.30/lb at wholesale, and $2.73 to $3.24/lb at retail<6>.

Most West Coast roasters reported earning less on Kona than on other coffees; a typical figure was $1/lb "margin"<7> for Kona at wholesale versus $1.50/lb for others. Because other coffees also cost less, the percentage return is lower but Kona Coffee must be carried because of buyer requests--i.e., roasters need to carry a full product line. Specialty retailers were reported to be willing to buy Kona Coffee at a high price as long as the product moves. As a rule of thumb for coffee in general, the trade considers the value added to the cost of green coffee to consist of 16% for shrinkage plus a charge for roasting, typically 4-5 cents per pound of green coffee. On the other hand, typical retail margins were estimated by roasters at 35% to 50%, versus 25-30% for regular coffees.

There are a number of reasons for price differences observed at any one level. The quality of the coffee is a major factor. For example, Prime green might sell for $4, #1 for $4.45, Fancy for $4.55, and Extra Fancy could command "whatever price the seller wants." Some reported that an unspecified amount of damaged coffee coupled with a large harvest "was causing havoc" with market prices. Depending on the size of the total harvest, the timing of the purchase within the season could be an important factor. Related to timing is the carrying cost of holding inventory; at 12%, the interest cost on a bag of green Kona Coffee is nearly $5.00 a month.

Most sellers offer some type of volume discount, and firms handling a large volume usually have economies of size. The volume also affects the mode and cost of transportation. Transportation costs vary between ship, air freight, mail, or courier (UPS, Federal Express, etc.) and the distance; the differential between the East and West Coast was reported to be 7-8 cents/lb. Location also has an impact because of demand. For example, retail margins for all products are reportedly 25% outside of Waikiki and 25% to 35% in Waikiki.

Prices are affected by packaging. Valve bags may add to shelf life but could cost 24-25 cents each, versus 10-

12 cents for a paper bag. A common strategy in other products is to charge more on a per pound basis for smaller packages, partly because of increased handling and certain costs that change little between package sizes. At the other extreme, bulk bins may minimize packaging and handling by the seller, but entail other costs. Another strategy is to use different package sizes that cannot be easily compared. Related to the above are processing practices and the degree of processing. For example, a darker roast typically weighs less than a light roast of the same volume. Another example has to do with the degree of quenching; an often heard complaint was that certain roasters added weight to their product by using excess water in the cooling process.

The last major determinants of prices considered are the degree of vertical integration and the business and marketing strategies of the firm. For example, a roaster/ retailer who purchases green coffee direct from processors has more flexibility in pricing than if the product was bought and sold through every possible marketing level. In the extreme, some operations are fully integrated from growing to retailing.

II.B.3 Product Differentiation

Any good which has some characteristics or attributes that distinguish it from others can be called a separate product. Product differentiation is the process of creating this distinct set of characteristics. A successfully differentiated product has something unique, or some "gimmick," that consumers are willing to pay for.

The widest range of Kona Coffee products is found in Kona, followed by locations attracting many tourists. The primary product forms are pure (100%) and blended Kona Coffee, sold as regular or decaffeinated ("decaf") and as whole bean, ground, or instant. Some blends are flavored with extracts such as macadamia or chocolate, and some blends recently name other specific coffees in addition to Kona. At least one firm is known to offer an "organically grown" product. Coffee is decaffeinated via either the chemical or water processes, and is usually shipped to as far as Europe to be processed. Decaf typically commands a higher price because of the added processing costs and weight lost in the process (about 15 percent of the original weight).

Products are sold in cans, jars, paper or foil bags, cello bags, valve bags, and in bulk bins. Container sizes are typically from eight ounces to a pound, although there is some movement towards smaller sizes such as two ounces. Package appearance ranges from product and company names stenciled on brown paper bags, to one product with a package within an outer burlap bag, and another with a foil bag cushioned by packing material within an outer box. Some sport reproductions of photographs and paintings, graphics range from simple to ornate and often with a Hawaiian motif, others have lettering on a plain background.

Other products using the Kona Coffee name include flavored candies, chocolate covered coffee beans, and Kona Coffee liquor (the Kona Coffee Festival promotes recipes using Kona Coffee). The extent to which these products actually contain Kona Coffee (and thus contributes to industry sales) is unknown, and undoubtedly varies widely.

Chapter II.B Footnotes

<1> Hawaii State Department of Agriculture. Hawaii Administrative Rules, Title 4, Subtitle 4 Division of Marketing and Consumer Services; Chapter 43 Standards for Coffee.

<2> In the past, peaberry commanded a high price, comparable to the top grades, because consumers (especially in the Philippine market) were able to evenly roast coffee in a frying pan. Peaberries are again in demand in the specialty coffee market. Some claim that the flavor from two beans has been concentrated into the single peaberry.

<3> Comparable prices were 3.75/lb for High Mountain and $3.00-$3.20/lb for Prime Wash.

<4> In the 1988-89 season, observed prices reached $0.85/lb at farmgate and $4.25/lb for parchment in Kona, $5.50-$7.00 for green (including resale on the West Coast) and the equivalent of $33 per pound at some retail outlets.

<5> Cox, Daniel C. "Kona--America's True Cup" in Fancy Food & Candy, February 1986, pp. 51-53.

<6> U.S. Department of Agriculture, Foreign Agricultural Service. World Coffee Situation, Tables 9 and 10. We speculate that the reason for the discrepancy (i.e., wholesale higher than retail) is at least partially because retail prices are based on canned coffee only, whereas wholesale prices may include more expensive products.

<7> Margin was used by different roasters to mean "profit", profit plus overhead, the difference between sales price and an undefined level of costs.

CHAPTER III: MARKETS FOR KONA COFFEE

III.A Classifications of "Markets" for Kona Coffee

There is no one single, homogeneous market for Kona Coffee. Instead, the "market" for Kona Coffee consists of a number of segments, each of which can be considered a market in itself. Different interests within the industry deal with different segments. Further, different segments are in different stages of development, so have different marketing needs<1>. These differences are perhaps the major reason for the lack of industry cohesion.

These market segments are based on different combinations of product form, market channel, and final consumer (Figure III-1). There are theoretically 18 possible combinations that can be viewed as a three-dimensional matrix (Figure III-2), but in practice several possibilities are negligible or difficult to define (e.g., export blends), while others can be combined.

The product form deals with whether coffee is sold as a blend or as 100% pure Kona Coffee. The market channels concerns the outlets through which Kona Coffee reaches the final consumer. The distinguishing features of each channel are the type of customers and the form of the product. There are three channels: (1) institutions, including hotels, restaurants, and office coffee systems (OCS); (2) specialty or gourmet coffee outlets, involving specialty coffee shops, mail order businesses, and some department stores; and (3) retail outlets, consisting of supermarkets, tourist shops, and some department stores;

Final consumers are divided into Hawaii residents, tourists, and an export market. The first two concern purchases made within the State, while the export category recognizes that most decisionmaking occurs out of the State. Hawaii residents purchase Kona Coffee for gifts and for their own consumption (including consumption at home and when dining out). Tourists also drink Kona Coffee in local establishments, and purchase gifts and souvenirs. Anecdotal evidence stressed a difference between tourists that were westbound (from continental U.S.) and eastbound (from Asia, notably Japan). The export market is mostly to the West Coast, although the rest of the Mainland, Japan, and perhaps Europe could be large potential markets<2>.

Obviously, these market segments could be broken into even smaller units. Furthermore sellers and buyers may inhabit more than one market segment at various times. The important point is that the needs of a buyer will vary depending upon their location in market segment space. Given these differences the marketing approach to profitably satisfy these needs will also vary.

The basis of market segmentation is that not all customers have the same needs, wants or desire. By targeting and developing a product and marketing strategy which satisfies the needs of a specific segment of the customer base a firm or industry may achieve a competitive advantage, and thus higher sales and net profits. Through proper targeting, a product becomes differentiated in the eyes of the customer and a consumer franchise is developed.

Surveys were conducted on tourists and Hawaii residents. Personal interviews, secondary data, and non-published information were used to examine the remaining segments, especially the local retail market and Japanese market.

Chapter III.A Footnotes

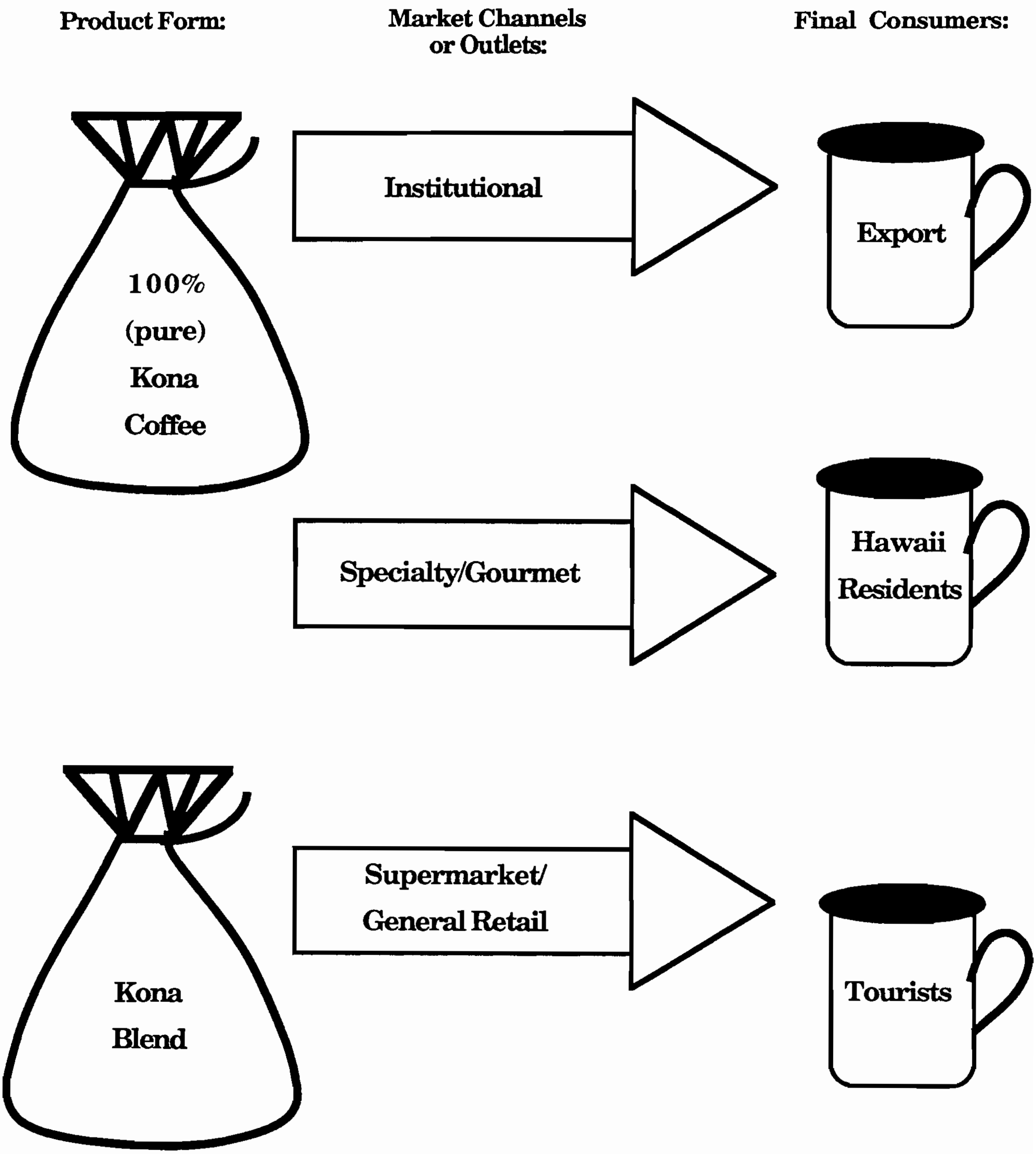
<1> Throughout this document, "marketing" is used in the broader sense, i.e., not only advertising and promotion, but all functions in getting the product/service from the producer to the final consumer.

<2> The following two references studied (1) the market for coffee in Europe, and (2) Germany as a possible export market for Kona Coffee.

a. E.R.C. Statistics International Ltd. The Market for Coffee in Europe (London). Volume one summarized in "From the E.R.C. Survey: The Market for Coffee in Europe" in Tea & Coffee Trade Journal, 161(1):86-96, January 1989.

b. Winter, Lothar G. A Market Survey of Kona Coffee Export Possibilities to Germany. Honolulu, Hawaii Coffee Industry, Inc., February 1962.

Figure III-1. Segmentation of Kona Coffee Markets



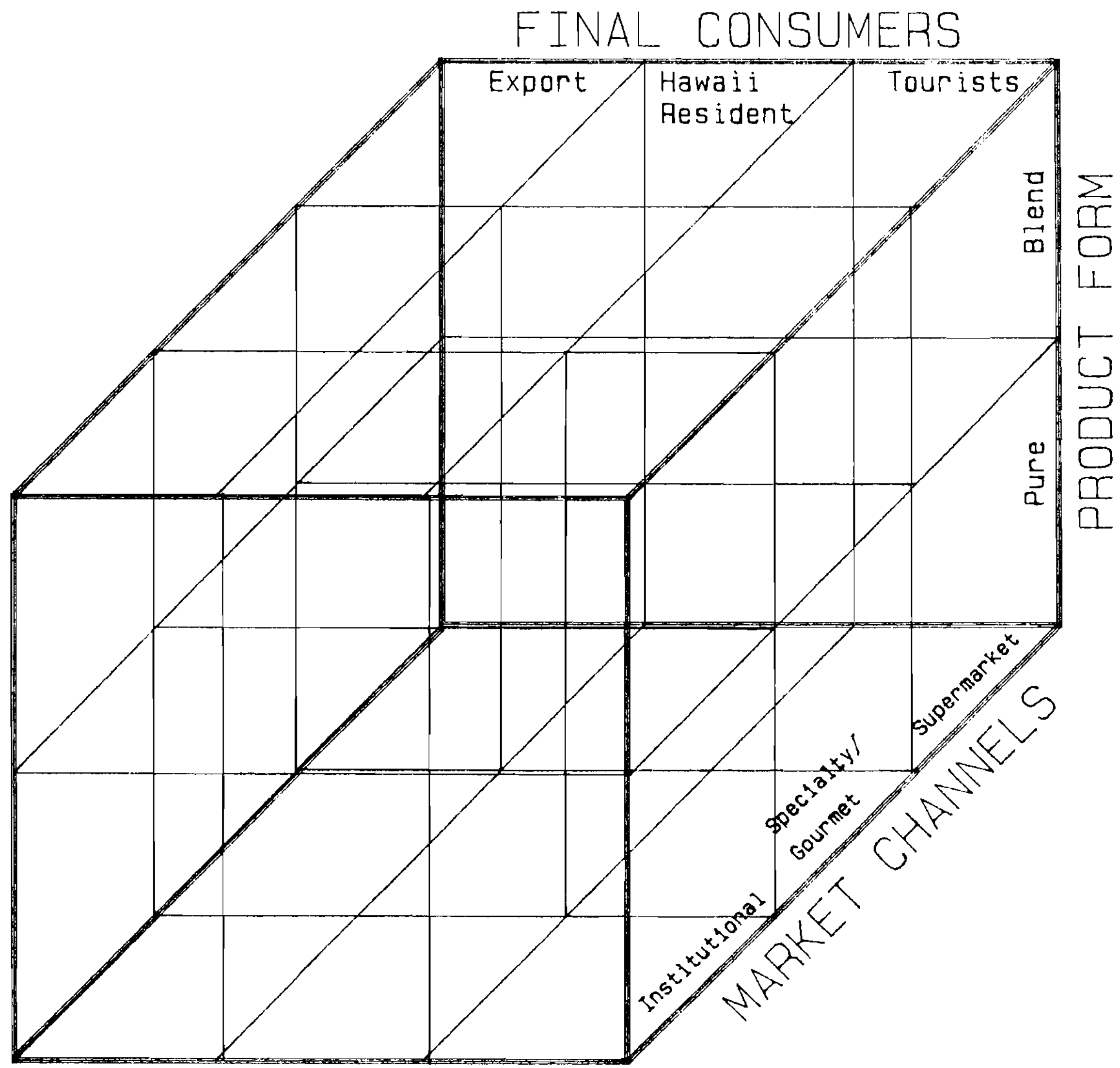


Figure III-2. Kona Coffee Market Segment Matrix

III.B Product Form

Most roasters produce blended Kona Coffee, while a smaller number will also produce a pure Kona Coffee. In so doing the roasters are attempting to target a different market segment as identified above. An operating assumption which will be used throughout the analyses is that any firm in the coffee industry is attempting to maximize its profit. Thus, a combination of strategies, such as selling both pure and blended coffee, may be pursued. Although many of the roasters interviewed believed that Kona blends had the potential to damage the product's image, virtually all roasters marketed a Kona blend. More Kona blend is sold than pure Kona, and at least for retail outlets, probably in a ratio that reflects shelf space. However, the actual amounts of Kona Coffee being moved as both product forms are not known.

In most cases, it will be argued that Kona blends and pure Kona Coffee appeal to different consumer segments. Pure Kona is viewed more as a luxury item than is blended Kona Coffee. Purists also maintain that the full characteristics of Kona Coffee can only be experienced with the unblended product. It is certain proper handling is necessary to maintain quality. As such, pure Kona Coffee is found more predominantly in the gourmet or specialty coffee outlets. However, this does not preclude its sale in other market outlets. Kona blend may also be sold in specialty and gourmet outlets as some customers may prefer it over pure Kona.

There are at least five reasons to produce a Kona blend. First,blends target a different market segment than does pure Kona Coffee. While still more expensive than most other blends, Kona blend is more likely to appeal to those customers of coffee who are more price conscious than are the consumers of pure Kona Coffee.

Second, to maintain their own accounts, roasters must be able to offer a full product line, and they must be able to offer the product on a consistent basis. Blending enables roasters to stretch a limited supply of pure Kona. Third, related to the limited supply, blending enables roasters to better use Kona Coffee's reputation and image and expand sales by offering product at a lower price.

The last two reasons have direct economic impacts on the firms. Fourth, economies of size may be achieved in roasting and packing through the blending of Kona Coffee. For example, the larger volume may allow existing capacity to be fully utilized, or it may warrant the purchase of larger, more efficient equipment. Finally, blends are often more profitable, especially for certain market segments.

A roaster producing Kona blend for the tourist market via retail outlets is likely to have different goals and operating conditions than a firm targeting specialty coffee shops with pure Kona Coffee. In general, the divergence of opinion and conflict within the Kona Coffee industry can be traced to the different market segments being pursued by its individual members. By pointing out the differences, these market classifications can help to identify some common ground or mutual areas for cooperation and coordinated, unified industry activity. The issue of pure versus blended Kona Coffee is further discussed in Chapter IV.

III.C Market Channels or Outlets

III.C.1 The Institutional Market

The institutional or food service market, comprised of hotels, restaurants, office systems, vending machines, and hospitals, has traditionally been a major market for Kona Coffee. This market is large: in 1987, one out of every three retail firms in the state, or 1870 businesses, were restaurants and bars<1>. There were also some 69,000 rooms in 195 hotels. At an 81.1% occupancy rate, this is a potential 20.4 million cups of coffee, if each room used one cup of coffee. Some industry participants have noted that a large hotel or restaurant can move as much coffee in a week as a roaster, i.e., 300 pounds of roasted product per week. At that rate, the entire 1987-88 crop could have been taken up by less than 90 hotels/restaurants serving pure Kona.

A 1963 survey estimated that 53 percent of Honolulu restaurants served Kona Coffee and that another 33 percent were willing to do so<2>. A more recent estimate pegs usage at 90-95% of the hotels and at least 60% of other institutional establishments. Even though the extent of pure versus blend usage is not known, there is little doubt that the potential market for Kona Coffee is huge. A recent figure published by the U.S. Department of Agriculture estimated that the average household spends 42 percent of its annual food budget on meals away from home. There are few reasons to doubt that Hawaii residents differ from the national average (if anything, Hawaii residents may eat out more often, especially given the number of families with two wage earners) and as the above figures indicate, the tourist population is huge as well.

The keys to entering this market segment are a cost competitive product, the related services provided by the distributor (including provision and service of brewing machines), and the ability to deliver on a consistent basis. Although most institutions attach large margins to their coffee, their purchase decision is based primarily on the cost of the product. Thus, the product form being moved is mostly Kona blend. Several roasters noted that pure Kona Coffee could be offered at a cost difference of less than a nickel per cup. It is uncertain whether this cost difference is sufficient to discourage buyers, or whether sellers have not promoted the notion that this is a small cost for the added value of having pure Kona.

Servicing a large number of accounts is probably beyond the capacity of most firms within the Kona Coffee industry except for a few major actors, especially if dealing with the unblended product on a consistent basis. However, there seems to be opportunities for smaller firms to service a few select accounts, notably with pure Kona Coffee.

There are several perceived problems in the institutional market segment. First is the weak, often non-existent differentiation between pure Kona Coffee and Kona blends. Menus throughout the state typically list only "Kona Coffee," and sometimes don't even mention Kona. Second, institutions are often criticized for their handling of coffee. Burnt or stale coffee, reheated coffee, and dirty or soapy equipment are included in a long list of complaints.

The quality of the coffee might be excellent going into the establishment, after which poor treatment ruins the product.

Third is the market share occupied by other coffees (e.g., Yuban and Maxwell House), including the observation that some establishments in Kona do not sell Kona Coffee in any form. However, we suggest that serving Kona Coffee in every restaurant and hotel may not be an appropriate goal at this time, especially if the quality maintenance issue is not addressed.

Although the institutional market is primarily serviced by larger firms, the industry as a whole will gain by assisting institutions in the promotion and use of Kona Coffee. The major reason is the excellent opportunity that hotels and restaurants provide for exposing potential customers to a new product. There is a longer-term goal to assisting institutions, and that is to increase the awareness and experience level of consumers to where they become regular Kona Coffee buyers. All other market segments then stand to benefit. Visitors typically have little choice except to use hotels and restaurants, and many are receptive to new products and experiences while in Hawaii. If just one percent of the 6.1 million visitors in 1988 became regular customers, the payoff from an institutional program would be 61,000 new clients.

Residents are also major institutional clients, and on a repeating basis. In especially the gourmet or luxury establishments, the experience and atmosphere are conducive to exposing both visitors and residents to what might otherwise be a "pricey" (and therefore untried) product. These outlets also allow the industry to target certain groups of consumers.

The institutional market segment therefore provides a unique opportunity to utilize this "captive audience." Further, dollars spent here are more effective. The audience is already attuned or receptive to promotion. And, rather than a nationwide program or a localized version duplicated in many cities, efforts are concentrated in a limited geographical area.

To fully utilize this opportunity, the Kona Coffee industry must maintain high quality to protect Kona Coffee's reputation and its image. If the Kona name is to be on the product, we need to be sure that product is of the best quality possible. Otherwise, the hotel and restaurant clients will try a poor product, wonder why it has so much publicity and such a high price, and never bother with Kona Coffee again. An important part of the institutional program therefore will be efforts aimed at educating and motivating institutional employees in proper handling techniques.

Other activities are promotional discounts during certain periods (e.g., to coincide with the Kona Coffee Festival or other events focusing on Kona), or in exchange for including Kona Coffee in firms' advertising. The industry could provide the advertising copy itself, or it might subsidize reprinting costs if the new menu highlights and differentiates Kona Coffee. Other possibilities are discussed in Chapter V.

III.C.2 Specialty Market

In one firm's experience<3>, a certain unnamed city with a population of about 3 million has some 300 outlets for specialty coffee, of which 70 were full-fledged specialty coffee stores and the remainder sold other products besides coffee. Each full-fledged store averaged sales of about 1,000 pounds per month, and each part-time store averaged about 200 pounds per month. Total sales in this city from specialty outlets therefore averaged 116,000 pounds per month.

One might expect conditions in Hawaii to be proportionately scaled, but especially compared to other market segments, specialty coffee outlets play a relatively limited role in the state. The telephone directory yellow pages lists seven retail coffee outlets on Oahu, two on Kauai, eight on Hawaii (including three affiliated with processors), and five on Maui. This may reflect the demographic characteristics of Hawaii consumers, including the tourist:resident mix, and also the fact fact that Hawaii is a producing area and located in the subtropics. Much of the Kona Coffee being consumed under the more traditional definitions of specialty coffee is being exported out of Hawaii. Nevertheless, a lot of Kona Coffee is sold via other retail outlets, most notably those affiliated with the tourist trade.

As discussed in Chapter I, supermarkets and specialty coffee outlets are strongly interrelated. Rather than being separate from traditional specialty outlets, supermarkets pose challenges of a different degree. As supermarket retailers gain more experience in handling specialty coffees and as more supermarkets adopt upscale formats, many differences will diminish. Furthermore, many developments at the supermarket mirror not only what is occurring in the specialty shop, but also events at other retail outlets (i.e., department stores, tourist-oriented shops). Lessons learned from any one are applicable to the other outlets. Although the following may mention a specific type of retailer, the discussion is also pertinent to other retail operations.

In the supermarket and most retail operations, the acquisition of shelf space and shelf location is highly competitive. Retailers look for products with either high turnover and/or high margins, and both are strongly influenced by what happens with shelf space. For certain retailers, Kona Coffee brands compete not only among themselves, but with other coffees as well. With other retailers, products such as macadamia nuts are among the competition. With the adoption of universal product codes, retailers are better able to track the performance of individual products and thus, are better able to cull products that don't perform to expectations. Furthermore, supermarkets possess limited brand loyalty. All other factors being equal, they will select the product from the firm that offers the best deal. Suppliers must also consider the different services that need to be offered. Specialty shops may restock their own bins, but suppliers may need to provide this service to supermarkets. So, the Kona Coffee industry must weigh the different total returns per unit against the potential sales through the various outlets.

Given the competition over shelf space, the establishment of consumer loyalty is highly desirable. Strong consumer loyalty will lessen the ability of the retailer to bargain with the roaster. Popular methods targeted at achieving brand identification in supermarkets are displays, attractive and distinctive packaging, in-store sampling, point of purchase materials, and of course, a quality product.

Another challenge is the maintenance of quality once the product is in the outlet. Most retailers outside of specialty coffee shops probably know little about maintaining coffee quality (and probably have little interest or incentive in doing so). Packaging can have a vital role with respect to maintaining product integrity. If education is desirable, either the individual roaster or the industry in general must assume the responsibility of educating retailers. Furthermore, quality maintenance may require the roaster to service the store to uphold quality and rotate stocks. A major Hawaii roaster with a significant presence in the Honolulu market employs many of these practices, and apparently with a fair measure of success.

A recent study commissioned by the Coffee Development Group (CDG) regarding the perceptions of whole bean and non-whole bean purchasers highlights several opportunities for growth<4>. The study found that only one out of five coffee drinkers regularly purchased whole bean coffee. Almost 60 percent of coffee drinkers rarely or never purchased whole bean coffee. Not surprisingly, those respondents who drank whole bean coffee on a regular basis could be characterized as more affluent and having a higher level of education than those who were not whole bean drinkers. The consumption of whole bean coffee is related to lifestyle. This information could be useful in targeting retail outlets for the sale of Kona Coffee, as well as for potential mail order sales.

Supermarkets are not ignorant of this information and the use of target marketing. More and more chains are designing their stores to individually match the tastes and wants of the local community. The use of chain-wide format is going by the wayside. This provides an opportunity for roasters who may be unable to supply the volume to meet the needs of an entire chain. However, they may be able to provide enough for select stores within a chain.

The CDG study also found that while salespeople in specialty stores were perceived as knowledgeable, they made actual recommendations only in a few sales. Very few respondents found supermarket salespeople to be useful. Most respondents, including those who rarely or never purchased whole bean coffee, indicated they would welcome brochures containing information such as place of origin, coffee cupping characteristics, and storage or brewing suggestions. Their responses also indicated that they are not interested in a lot of self-praise or puffery in the delivery of this information.

These results suggest that a more aggressive marketing stance in both the specialty shop and the supermarket would be useful to individual firms, and possibly to the Kona Coffee industry as a whole. Such activities might include merchandising kits and newsletters to keep retail outlet operators and their sales staff fully informed. Informational needs include the unique attributes of Kona Coffee and how it should be prepared for best results. In conjunction, incentives could be created to garner more personal commitment from the retail outlet and its employees. For example, a tour to Hawaii associated with the Kona Coffee Festival could be a sales incentive award, as well as a good educational tool. In-store sampling would be an effective tool for increasing sales, especially for introducing the first time buyer to Kona Coffee. Other suggestions are presented in Chapter V.

III.C.3 Hawaii Supermarkets

Uniform Product Code (UPC), or barcode data, was obtained from three cooperating supermarket chains (22 outlets) to identify actual sales of coffee in the local supermarket segment. The raw data are generated by the UPC bars on the packages as the items are rung up at the cash register. Data were available for the period February 1986 through November 1987.

There are two major weaknesses with the data. First, because of confidentiality, prices are not (as of yet) reported - only volume figures were available for this study. This is especially a problem in identifying trends, because promotional discounts at one store or chain typically has a strong impact on other outlets in the area. The analysis is therefore based only on the pounds sold, and should be interpreted accordingly. Second, not all firms cooperated in providing data, but there are no apparent differences between the cooperating outlets and other Oahu supermarket chains. Oahu is the largest market based on population; while there may be demographic differences from the Neighbor Islands, these are not expected to be significant for this market segment. We therefore believe the analysis is representative of supermarkets throughout the state.

Figure III-3 shows sales in the cooperating supermarkets for commercial, specialty (including Kona Coffee)<5>, and soluble (instant) coffees. Total sales by the reporting stores averaged 4600 pounds per month of specialty coffees, 31.6 thousand lbs/month of commercial coffee, and 9800 lbs/month of soluble coffee over the 22-month period in which data were collected. In Figure III-4, specialty coffees represent 12.7 percent of regular coffee sales (specialty and commercial--solubles not included). There were 71 separate products. Judging from 34 of these product descriptions, the market share of coffees labelled "Kona" is 9.4 percent of regular coffee. Kona-labelled products outsold other specialty coffees by a 3-to-1 ratio. Again, these figures are only representative of supermarkets, and do not include sales from specialty shops, tourist outlets, and other retail establishments.

Decaffeinated products accounted for eight percent of specialty coffee sales and 7 percent overall. Forty-six percent of specialty coffees were labelled as whole beans. This result is opposite of the commercial segment in which the ground form is predominant.

Figure III-3. Sales of Coffee in Selected Hawaii Supermarkets, 1986-1987

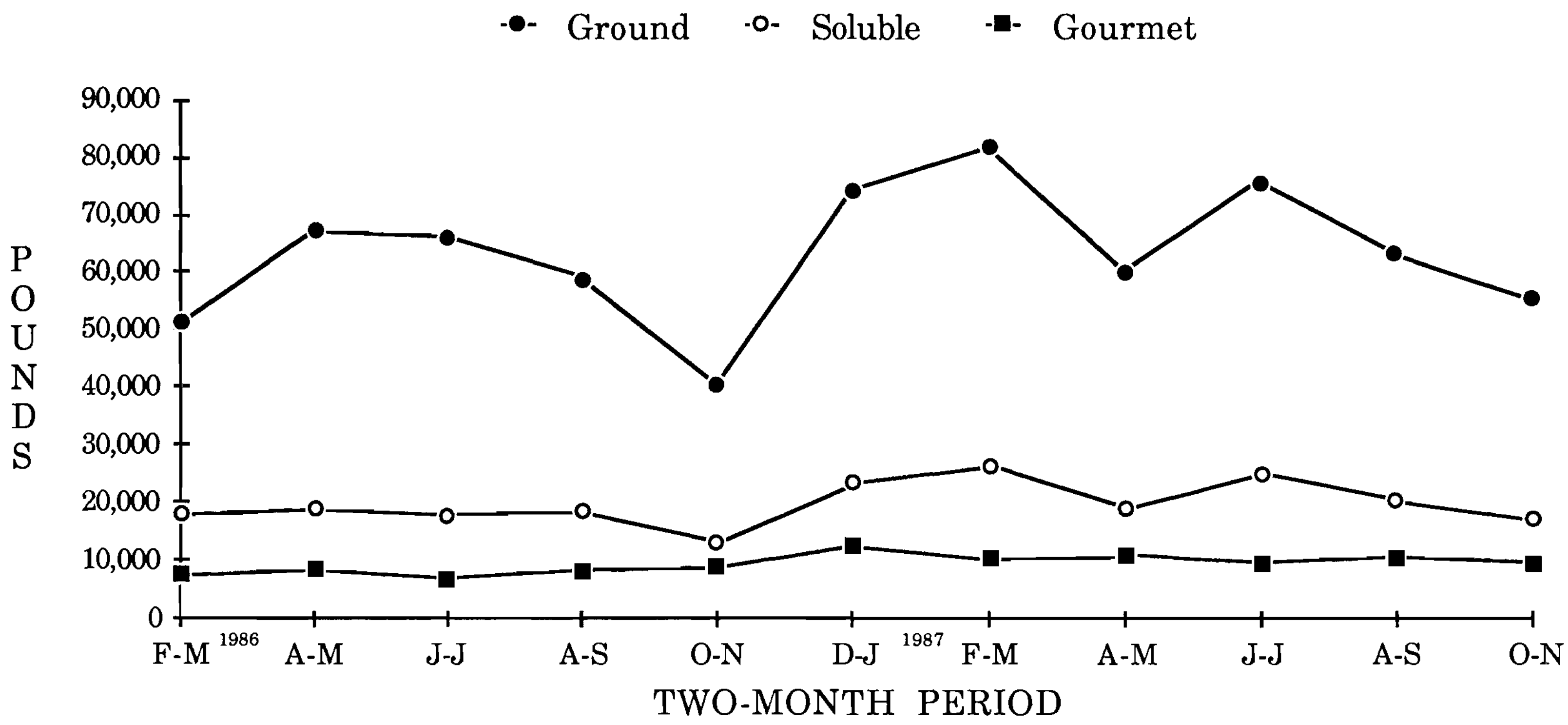
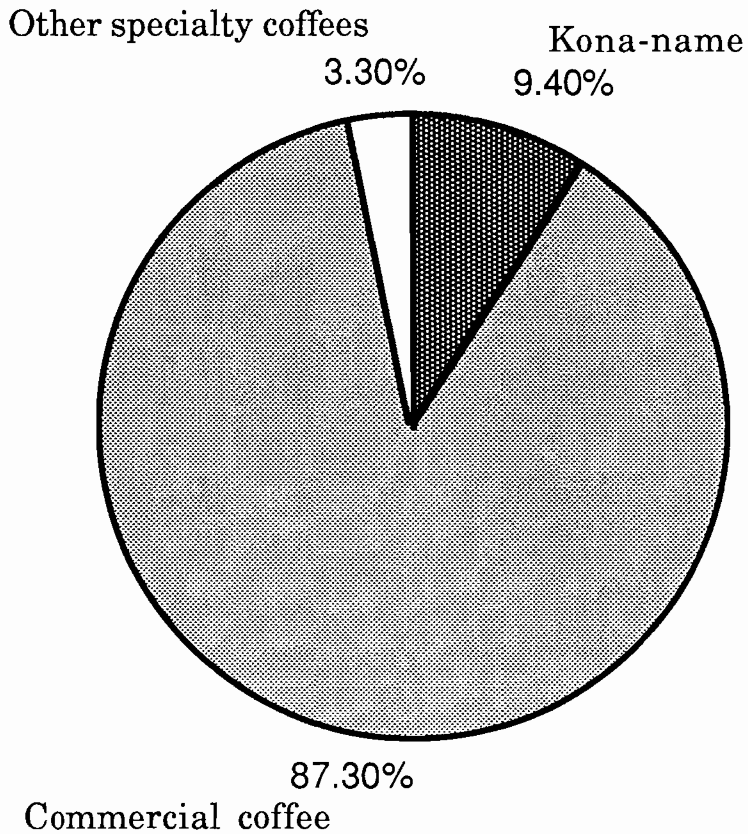


Figure III-4. Supermarket Sales of Regular Coffee by Type



Although specific firms cannot be cited because of confidentiality, three of the seven firms producing specialty coffees account for over 99% of sales volume. It should be noted that the two leaders in gourmet coffee usually have large shelf spaces, well-designed displays, and have extensive advertising/promotional campaigns.

The data are insufficient to estimate growth trends, but in general, specialty or "gourmet-like" coffee sales through supermarkets have increased in the past five years. This growth is expected to continue, but at a slower rate. A recent development in the Honolulu market is the proliferation of non-Kona specialty coffees. These items compete with Kona coffee for shelf-space and the consumers' dollars. In-store promotions and point-of-purchase material may be useful in assisting Kona coffee maintain and expand its current status in the market. As a general rule, in-store samples are a very effective method in (at least temporarily) boosting a product's usage.

Chapter III.C Footnotes

<1> Business statistics from Mason, George and Tom Leonard (eds), "All About Business in Hawaii 1989", 17th annual ed., Crossroads Press, Inc.

<2> Lindstrom, Harold R. and Joseph T. Keeler. Restaurant Use of Kona Coffee in Metropolitan Honolulu. Agricultural Economics Report no. 66, Hawaii Agr. Experiment Station, University of Hawaii. June 1965.

<3> Daw, Stuart. "Coffee's Image Still Needs Upgrading" in Tea & Coffee Trade Journal, 157(1):57-62, January 1985.

<4> R.H. Bruskin Associates. A Market Strategy Study of the Whole Bean Coffee Industry. Coffee Development Group, Washington. December 1985.

<5> As used in this section, "specialty coffee" refers to products of certain roasters, and products defined by the manufacturer as targeting the specialty or high-end market. The firms included are French Market Coffee, General Foods (Horizon, Maxwell House Special Reserve), Hawaiian Host, Hill & Hill, Lion Coffee, Superior Coffee, and S&W. Others are called "commercial coffee," while specialty plus commercial make up "regular coffee," as opposed to soluble or instant coffee.

III.D Final Consumers

III.D.1 The Export Market - U.S. Mainland<1>

In the late Fifties, 85% of the Kona Coffee crop was sold to U.S. mainland roasters<2>. The current portion entering the export market is sizable, probably still accounts for the majority of the crop, and undoubtedly numbers in the thousands of bags. Most of the buyers are concentrated on the West Coast, although several are located on the Eastern Seaboard. Several are brokers, including roasters who resell green coffee to other firms. One source estimated the number of roasters handling Kona coffee at 200-250 firms, of which 10 to 15 will purchase 250 or more bags of green Kona Coffee in a given year. While most of these roasters deal in the specialty coffee market, the amount of Kona going to different uses is not known.

Hawaii contributes a miniscule quantity of coffee to the total supply in the U.S. Several factors appear to favor Kona's ability to sell in the mainland market. There is continued interest among consumers to try and purchase quality products which appeal to their lifestyle, combined with the high quality of Kona Coffee. The U.S. market is huge and can easily absorb Hawaii's supply, even if only a small percentage of the population consumes Kona Coffee. More consumers are becoming more aware of Kona Coffee and Hawaii's marketers are showing increased aggressiveness in this market.

However, there are several factors which may adversely affect Hawaii's ability to market its coffee in the U.S. mainland. First is the small supply of Kona Coffee. It is difficult to conduct an aggressive marketing program when the product isn't available. Blends are already being used to stretch supplies, and unavailability has probably helped promote counterfeiting. Relatedly, mainland roasters expressed dissatisfaction with the general price level of Kona Coffee and the behavior of prices throughout the season. This subject is covered more thoroughly in Chapter IV.

A significant number of mainland roasters believed that while Kona Coffee is good, it isn't great. In some cases they indicated they carry Kona Coffee as a competitive response and to offer their accounts a full product line. The costs involved and the small amounts they were able to acquire often (they claimed) made Kona Coffee a low product item. Overall though, most of their complaints and resistance revolved around the small and erratic supply of Kona Coffee.

A significant number of mainland roasters believe that while Kona Coffee is good, it isn't great. In some cases they indicated they carry Kona Coffee as a competitive response and to offer their accounts a full product line. The costs involved and the small amounts they were able to acquire often (they claimed) made Kona Coffee a low profit item. Overall though, most of their complaints and resistance revolved around the small and erratic supply of Kona Coffee.

Several roasters mentioned that Hawaii, as an industry, could be more aggressive in their promotional efforts. The most common suggestions were the production of merchandising kits for the roasters to use in servicing their accounts and point-of-purchase material to be used at the retail level. They also believed that outside of some selected markets such as San Francisco and Seattle, even some specialty coffee shop operators are not aware of the characteristics of Kona Coffee.

Finally, Kona Coffee may be in danger of being a victim of its own success. Anecdotal evidence collected over the past year suggests that Kona Coffee (usually in the blend form) is being marketed in more places in the United States than in recent history. Given the short supply in the last two seasons, one is left wondering how much Kona is in the blend. Not only are there questionable blends, but several mainland specialty shops featured "Kona-style" or "Kona-like" coffee. The claim, when the package is read, is along the lines of "this coffee has been roasted (blended) to bring out the characteristics of the legendary Kona Coffee."

From a mainland roasters perspective, this type of strategy is understandable. They really have no vested interest in Kona Coffee, and if they can make a quick profit through the sale of such coffees, why not? Those roasters (and they may be the majority) who are concerned about putting out a quality product usually have to respond to competitive pressures. Since Kona's reputation for quality is one of its main sales attributes, the Kona Coffee industry must take a firm position on these practices. However, to do so will require more information on the extent of such practices and their impact on the perception of quality by Kona's consumers. This subject is discussed more fully in Chapters IV and V.

Chapter II.D.1 Footnotes

<1> Most of the observations in this section are based on personal interviews with mainland and Hawaii processors and roasters.

<2> Slate, Daniel M. and Shelley M. Mark. Economic Study of the Kona Coffee Industry and a Program for Improvement. Kona Community Federal Credit Union. March 1959.

III.D.2 The Export Market - Japan<1>

In Japan, coffee is the second most popular beverage after Japanese tea. Coffee plays a significant role in many business and social activities. Unlike the United States, consumption is increasing over time.

The Japanese are generally recognized as consumers who appreciate and are willing to pay for high quality and gourmet items. In the case of coffee, the majority of the world's premium coffee, Jamaica Blue Mountain, is consumed in Japan. According to Ukers' International Tea and Coffee Buyers' Guide, Japan also purchases nearly all of Yemen's production. A general observation is that tourists from Japan are major buyers of pure Kona Coffee while in Hawaii, especially in terms of purchasing omiyage, or gifts to bring home. However, current sales of Kona Coffee in Japan seem to be limited. Overall, Japan has the potential of being a significant market for Kona and other high quality coffees.

Japan in the world market. Of the International Coffee Organization (ICO) members, Japan has recently been the fifth largest importer of coffee and coffee products behind the United States, West Germany, France, and Italy. In the 1985/86 crop year, Japan imported the equivalent of 4.6 million bags of green coffee (274.7 thousand metric tons), a 10.6 percent increase over the previous year.

The most common imported product form is green coffee (88%), followed by about six percent of instant (or soluble) coffee, five percent of coffee extract or concentrate, and about 2/10 of one percent roasted coffee (Figure III-5). Of the various coffee product forms, only green coffee has no import tariff. Other coffee products are charged varying rates of up to 35%, depending on agreements, trade regulations, and trading status of the exporting nation.

Green coffee. Japan imported 535 million pounds of green coffee in 1986, with a U.S. equivalent value of $1.02 billion<2>. Except for recessionary periods, there has been a steady increase in green coffee imports since at least 1959 (Figure III-6). Imports from 1979 to 1986 grew at an annual rate of 4.7 percent.

About fifty countries are suppliers, with Brazil, Colombia, and Indonesia accounting for the majority of imports (Table III-1). These three countries supplied 53% of imports in 1982, and from 57% to 65% in the following four years<3>. During the same period, imports from the United States were relatively insignificant at from 57 thousand to 300 thousand pounds. Jamaican and Yemeni imports over the period ranged from 1.6 million to 2.5 million lbs, and 395 thousand to 736 thousand lbs, respectively. The largest importers by value generally mirror the quantity figures, except for Indonesia in 1986. This is reflected by the prices received by the market share leaders (Table III-2).

Table III-2 further indicates that the highest priced green coffee in 1984-1986 was from the United States, and that both the U.S. and Jamaican imports were priced much higher than the mean for all imports, indicative of their higher quality<4>. Imports from Yemen were priced third highest in 1984 and 1985.

Table III-1. Green Coffee Imports to Japan, by Major Suppliers, 1982-1986
(in million lbs)

----1986----		----1985----		----1984----		----1983----		----1982----	
Supplier	Volume	Supplier	Volume	Supplier	Volume	Supplier	Volume	Supplier	Volume
Indonesia	109.12	Brazil	165.64	Brazil	147.45	Brazil	138.30	Brazil	106.79
Brazil	107.19	Indonesia	96.19	Indonesia	85.20	Indonesia	67.80	Indonesia	58.06
Colombia	88.44	Colombia	68.65	Colombia	62.13	Colombia	60.51	Colombia	51.40
Honduras	42.17	Honduras	28.80	Honduras	32.53	India	28.58	Honduras	28.58
Peru	33.67	Peru	27.23	El Salvador	22.91	Ivory Coast	26.66	Ivory Coast	26.44
Guatemala	18.99	Guatemala	19.07	India	21.32	Honduras	23.20	Uganda	22.49
Jamaica	1.92	Jamaica	1.83	Jamaica	2.49	Jamaica	1.57	Jamaica	2.12
Yemen	0.73	Yemen	0.71	Yemen	0.51	Yemen	0.66	Yemen	0.40
USA	0.09	USA	0.06	USA	0.18	USA	0.15	USA	0.31
Other	132.43	Other	101.58	Other	117.20	Other	102.42	Other	112.76

Figure III-5. 1986 Coffee Imports to Japan by Type. (green coffee equivalent)

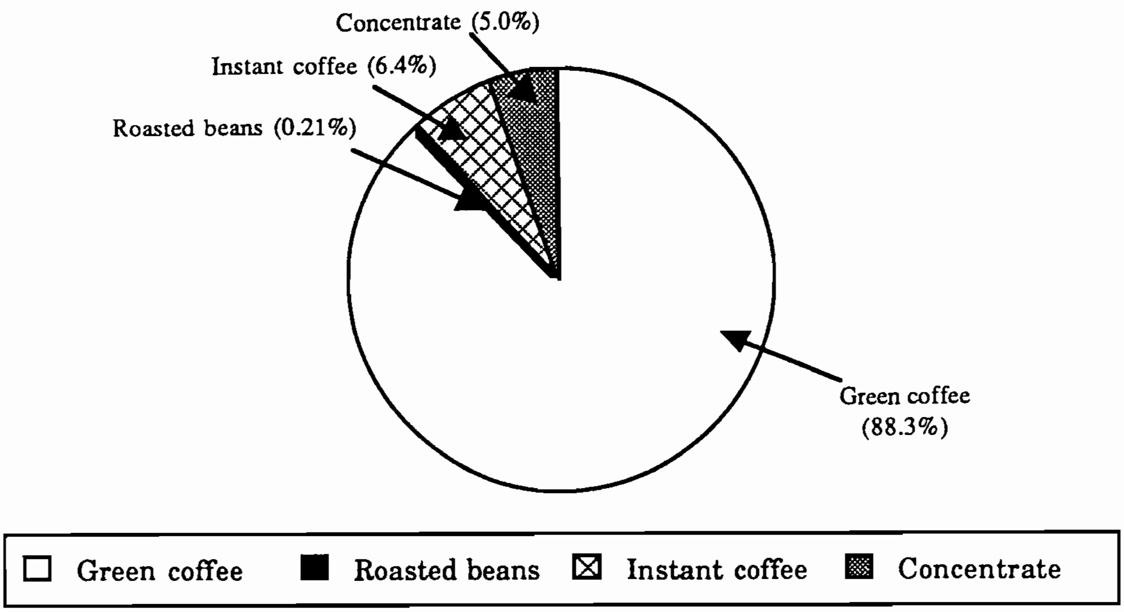


Figure III-6. Coffee Imports to Japan, 1959 to 1986

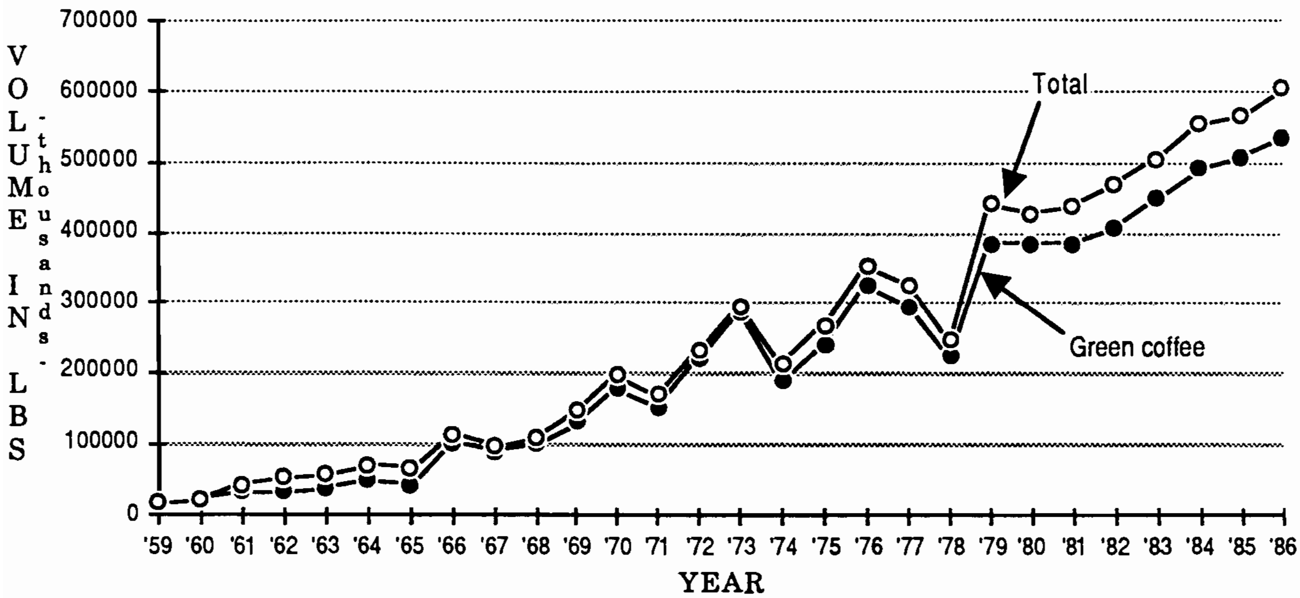


Table III-2. Price of Green Coffee Imports to Japan, by Supplier
(in dollars per pound)

	----1986----		----1985----		----1984----	
Top Five						
	USA	$4.86	USA	$4.18	USA	$3.93
	Bolivia	$4.44	Jamaica	$3.54	Jamaica	$3.19
	Venezuela	$4.35	Yemen	$2.22	Yemen	$2.15
	Jamaica	$4.04	Switzerland	$2.15	Cuba	$1.61
	Central Africa	$3.32	Cuba	$2.08	Kenya	$1.61
Selected						
	Brazil	$2.23	Brazil	$1.23	Brazil	$1.36
	Colombia	$2.05	Colombia	$1.43	Colombia	$1.46
	Honduras	$2.09	Honduras	$1.43	Honduras	$1.44
	Indonesia	$1.43	Indonesia	$1.18	Indonesia	$1.27
	Mean	$1.91	Mean	$1.33	Mean	$1.39

Other coffee products. Compared to the $1.02 billion of green coffee imported in 1986, Japan also imported $78 million of instant coffee, $4 million of roasted product, $24 million of sweetened coffee extract, and $8 million of coffee extract without sugar.

Brazil and Columbia accounted for 60% of the 15 million pounds of instant or soluble coffee imported in 1986, priced respectively at $3.68 and $4.08/lb. American instant coffee was the highest price at an average of $9.24/lb. From Table III-3, instant coffee imports peaked strongly in 1979, but gradually declined since then at an annual rate of about -3 percent.

Over 75% of the 1.1 million pounds of roasted coffee imported in 1986 came from the United States. Brazil is the major supplier of the other coffee products. The Tea and Coffee Trade Journal (6/88) reported imports of roasted beans and sugarless extract increased in 1987 by more than 2.5-fold to 5.1 million lbs and 10.7 million lbs, respectively. No figures were reported for sweetened extract.

Although imports of these products are small compared to green coffee, and although instant coffee imports have been declining, actual consumption in Japan of both regular and instant coffee has been steadily increasing (Table III-3). Consumption of regular roasted coffee has grown by 8.3% compounded annually, and instant coffee has grown by six percent. Production in Japan accounts for practically all the net supply in regular coffee, and about 85% of the net supply in instant coffee. Domestic production of both products utilize roughly equal shares of green coffee imports.<5> The per unit price of instant coffee is generally more than twice the price of regular coffee.

Channels of distribution. Figure III-7 diagrams the primary, secondary, and tertiary channels of distribution for regular coffee in Japan. Orders typically are placed when prices are favorable, or at a given inventory level independent of price, usually three months or 30 days prior to delivery. The major channel for green coffee, accounting for 75% of volume, is from the production region through an importer/trading company to a green coffee wholesaler, then to the roaster, with some flow bypassing the wholesaler. Twenty-five percent of imports go directly to wholesalers or roasters. There are three major roasters and 500 smaller firms engaged in roasting.

From the roaster, some coffee passes on to food processors, and food wholesalers handle some tertiary flows to retail firms. Four major categories are defined at the retail level: the institutional market, including hotels, restaurants, coffee houses and tea rooms; franchise chains; department stores and supermarkets; and miscellaneous food retailers. The most frequently reported retail outlets for purchasing regular coffee are specialty coffee stores and "super-combis" (supermarkets).

In 1986, Ueshima Coffee Company and Kimura Coffee had a combined 60.8% share of the regular coffee market going to business use, and 56.1% of home use. Instant coffee was dominated by Nestle Japan (67.8%) and Ajinomoto/General Foods (24.2%).

Table III-3. Domestic Supplies of Regular & Instant Coffee in Japan

REGULAR COFFEE

Year	Dom.Prodn (1000 lbs.)	Imports (1000 lbs.)	Exports (1000 lbs.)	Tot.Supply (1000 lbs.)	Value (in dollars)	Computed $ ($/lb.)
1977	101,430	185	0	101,615	$495,762	$4.88
1978	110,250	273	0	110,523	$550,223	$4.98
1979	132,300	364	0	132,664	$554,919	$4.18
1980	142,664	234	84	142,813	$619,780	$4.34
1981	145,089	542	415	145,217	$626,857	$4.32
1982	149,940	423	542	149,821	$581,002	$3.88
1983	164,052	412	494	163,970	$676,216	$4.12
1984	171,549	355	494	171,410	$710,256	$4.14
1985	191,615	439	256	191,798	$820,106	$4.28
1986	206,609	1,091	139	207,561	$1,393,390	$6.71

INSTANT COFFEE

Year	Dom.Prodn (1000 lbs.)	Imports (1000 lbs.)	Exports	Tot.Supply (1000 lbs)	Value (in dollars)	Computed $ ($/lb.)
1977	43,454	10,833	0	54,287	$607,389	$11.19
1978	42,268	7,764	0	50,031	$704,728	$14.09
1979	59,352	18,465	0	77,817	$961,121	$12.35
1980	55,321	13,964	0	69,286	$780,850	$11.27
1981	58,371	14,961	0	73,332	$783,613	$10.69
1982	64,706	16,077	0	80,782	$776,574	$9.61
1983	66,302	15,794	0	82,097	$816,707	$9.95
1984	71,054	16,231	0	87,285	$867,813	$9.94
1985	72,776	13,314	0	86,090	$910,091	$10.57
1986	76,379	14,981	0	91,360	$1,366,568	$14.96

* Computed $ = Value/Total Supply

Consumption trends. The most popular beverage in Japan is Japanese tea. This traditional beverage was consumed by more than 92% of the populace in 1985, slightly down from 94% in 1980. Coffee is second in popularity, and its reported consumption increased from 78% in 1980 to 83% of consumers in 1985. Next are milk, juice, sodas other than cola, and American tea. Canned coffee as the sixth most popular beverage, consumed at least sometimes by 70% of the population.

Coffee is rivaling tea as a social drink. Unlike the U.S., this is especially true among younger consumers. There are over 50,000 coffee shops in Tokyo, more than any other city in the world. These are an integral component of city life: most customers do not just drink coffee. "They go to meet friends or lovers, to do business (many offer a wide range of modern business services), to talk politics, to listen to music, to eat (most serve light meals or snacks), to study, to relax, and for a variety of other reasons. Coffee drinking is only incidental."<6>

In terms of the different coffee products, regular or ground coffee is regarded as a luxury item together with American tea (Figure III-8). This placement also suggests that coffee is regarded as a Western product, while instant coffee is more similar to other ordinary beverages. Figure III-8 also confirms that both regular and instant coffee drinkers tend to be younger than tea drinkers.

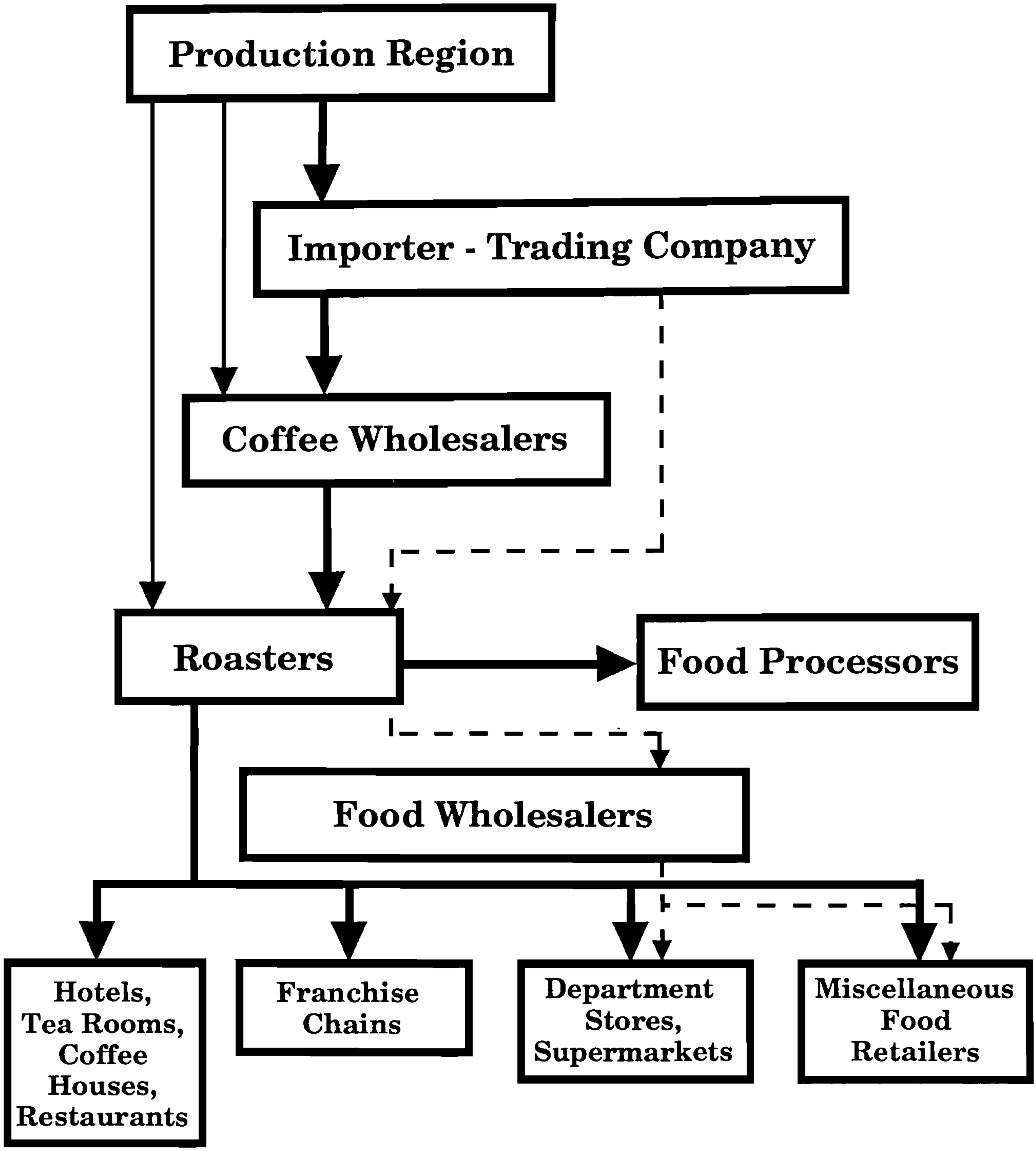


Figure III-7. Distribution Channels Of Regular Coffee In Japan

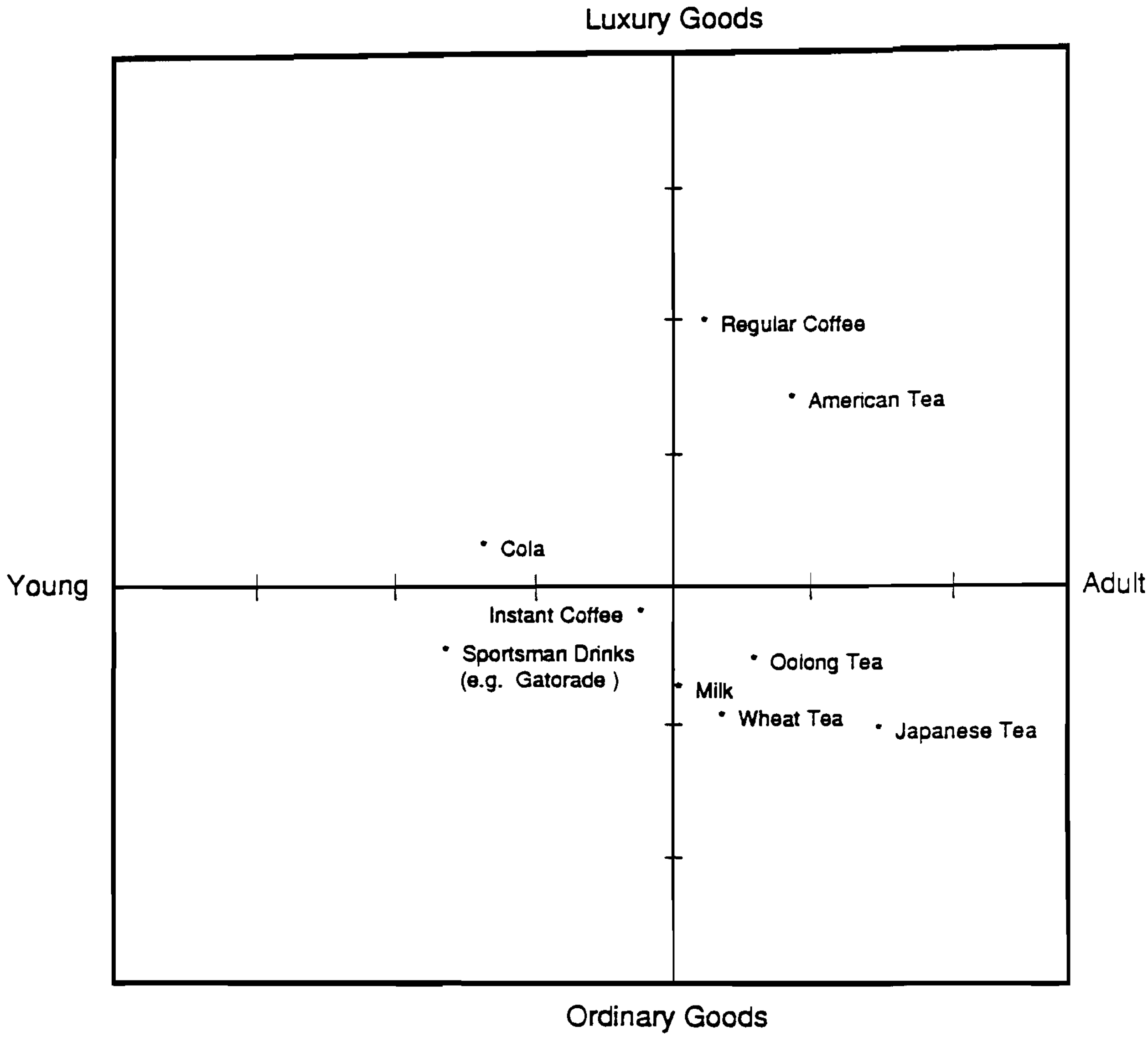


Figure III-8. Consumer Image of Selected Beverages in Japan.

Canned coffee drinks (iced coffee) was introduced to Japan in the early seventies by Ueshima Coffee Company. The market has since been increasing at an average rate of over ten percent annually, and has a current sales volume of over $3.5 billion. Canned coffee drinks are the best selling drink on a year-round basis in Japan's two million vending machines. The makers of Coca-Cola have about 33% of the market, and Ueshima Coffee Company has about a 20% market share<7>.

The household market for regular coffee is small but increasing. Given the strong historical use of Japanese tea and with coffee being regarded as a Western drink, most consumers don't know how to brew coffee. Household consumption has therefore been mainly instant coffee. Recent marketing efforts have concentrated more on households, have promoted coffee as a Japanese after-dinner beverage, and have demonstrated brewing techniques. The result of these efforts has been an increase in the overall consumption of coffee, and in relatively more regular coffee and relatively less instant coffee being consumed in households as opposed to institutional and business locations.

The consumption of coffee has also been increasing on a per capita basis (Table III-4). Per capita consumption of instant, regular, and canned coffee has increased between 1980 and 1985, with total consumption growing from 6.6 to nine cups per week. The proportions between products has remained relatively unchanged. The 1987 Ukers' International Tea and Coffee Buyers' Guide estimates 1986 per capita annual consumption of coffee in Japan at 7.1 pounds. Most regular coffee is purchased in specialty coffee stores (42%) and at "super-combis" (i.e. supermarkets--37%), while 75 percent of instant coffee comes from supermarkets.

Table III-5 breaks down 1985 per capita coffee consumption by different locations. Overall, the majority of coffee is consumed at home, with 22 percent being consumed at the workplace or at school. The breakdown is very different between products. Nearly all instant is consumed either at home or at the workplace/school. As much regular coffee is consumed in tea rooms as is at home. The consumption pattern for canned coffee is very different, with twenty percent being consumed at home, thirty percent at work/school, and half at some other location.

Table III-4. Consumption of Coffee Products Over Time in Japan
(in cups per week)

Coffee Type	1980	1983	1985
Instant	3.8	5.0	5.3
Regular	2.2	2.5	2.7
Can	0.6	1.0	1.0
Total	6.6	8.5	9.0*

Table III-5. 1985 Consumption of Coffee Products in Japan by Location

Location	Instant	Regular	Can	Total*	(%)
At home	3.9	1.1	0.2	5.2	58%
Tea room	0.0	1.1	0.0	1.1	12%
Work/school	1.3	0.4	0.3	2.0	22%
Restaurant/school	0.0	0.1	0.0	0.1	1%
Other	0.1	0.0	0.5	0.7	7%
Total	5.3	2.7	1.0	9.0	100%
(%)	59%	29%	11%	100%	

* May not total due to rounding

The characteristics of a coffee that at least 25 percent of consumers report as desirable, in decreasing order of importance, are: 1) a soft, mild aroma, 2) a mild taste, 3) a weak flavor, 4) mild bitterness, and 5) good aftertaste. The four least mentioned characteristics were a strong sour taste, lingering aftertaste, strong bitterness, and strong flavor.

The four most often mentioned reasons as to why consumers drink coffee, by decreasing frequency of responses, are: 1) the condition of the coffee, 2) taste or flavor, 3) coffee's aroma in preparation, and 4) to enhance enjoyment of conversation. All were static over time except for an increase in the condition of the coffee, presumably a reflection of a change from instant to ground coffee.

Finally, the Agriculture Department of the Japan External Trade Organization (JETRO) looked at six characteristics of food products that have gained popularity in the Japanese market<8>. The characteristic most often cited for coffee was tastiness, which was important to about 40% of the population. Second was cooking convenience (25%), brand name (20%), quality (13%), low price (12%), and freshness (2%). JETRO also noted four trends that seem to fit the needs of the Japanese market: (1) smaller servings of packaged foods, (2) more convenience foods, (3) better quality and increased variety, and (4) more healthful foods.

Outlook. There is a strong potential market for Kona Coffee in Japan. As in the case of the U.S. mainland, Japan could easily absorb all the Kona Coffee produced.

However, there are problems in penetrating this market. First is the need to maintain and perhaps increase high quality. Regardless of what suppliers may believe, the product must meet the specifications of the Japanese consumer. As with most goods that enter the Japanese market, it will probably be necessary to establish a strong contact with an established Japanese firm. The drawback is the danger of Hawaii firms being able to exercise only minimal control. As the State presently does on a periodic basis, a trade mission might be able to act as a facilitator in identifying interested parties on both sides of the exchange.

Chapter III.D.2 Footnotes

<1> The information for this section of the report was obtained via cooperative efforts with Professor Yuichi Kishimoto of St. Andrew's University, Osaka, Japan. Information is condensed from "The Coffee Market in Japan" by S.T. Nakamoto, J.M. Halloran, Y. Kishimoto, and H. Kazumi, forthcoming as a publication of the College of Tropical Agriculture and Human Resources. Reported figures are from the United Institute of Coffee in Tokyo, Japan, unless otherwise cited.

<2> All 1986 figures are converted from yen using an exchange rate of 168.5 yen per dollar.

<3> Only quantity data are available for 1987.

<4> While Jamaica Blue Mountain generally is recognized as the most expensive coffee in the world, the import figures probably includes other, lower priced Jamaican coffees.

<5> The conversion rates, in terms of green coffee required for one pound of finished product are 1.19 lbs for roasted (regular) coffee, and 2.6 pounds (up to 1983) and 3.0 pounds (since 1983) for instant coffee. It was reported that 1.72 grams of product is used for one cup (153 cc) of instant coffee, and 7.14 grams of grounds per 159 cc cup of regular.

<6> Asia Pacific Agribusiness Report, Supplement to Issue 8, August 1988

<7> Asia Pacific Agribusiness Report, Issue 5, May 1988.

<8> JETRO Agriculture Department AG-20, "Food Market in Japan, 1987" as cited in UH Department of Food Science and Human Nutrition, "Hawaii Food Technology News" vol. IV(5).

III.D.3 Oahu Residents

Telephone surveys and focus groups identified consumer and market characteristics of the resident population in Hawaii (Oahu).

Focus groups. Kunimoto<1> conducted focus group interviews to qualitatively identify the perceptions of Kona Coffee by resident consumers who fit the profile of whole bean coffee drinkers. Kunimoto had several findings of interest to this study:

1. Younger, affluent, more educated people expressed a willingness to purchase "gourmet" items if they perceive differences that justify the extra expense. These differences might include a gourmet image created by packaging and promotion, and where the product is consumed (e.g., a fancy restaurant) or the method in which it is prepared.

2. In the case of Kona Coffee, potential customers need to be educated on what is special about the product and how that differs from other coffees. Restaurants and inter-island flights were recommended as good places to introduce people to Kona Coffee, with the caveat that the coffee must be identifiable and of high quality.

3. Kona Coffee has a generally positive image, but high quality and consistency are necessary to maintaining that image. Blends are important for consumers who do not care for a pure product, e.g., for those who found pure Kona to be too bitter or too strong.

4. Consumers feel they are entitled to know what is in the coffee they buy, in particular the percent of pure Kona in a blend. Some felt the use of "Kona" to be deceptive if Kona were not the predominant coffee in a blend, with a minimum of 50 percent being the figure most often cited. "Kona-like" and "Kona-style" were viewed as synonymous with "imitation".

5. Some pointed out that a certain percentage did not ensure a good product, since nothing is specified about the quality of that percent.

6. Three fourths of the panelists had purchased Kona Coffee as a gift, often citing uniqueness to Hawaii and enjoyment by the recipients as reasons for the purchase. However, some said "Kona is cheaper on the mainland."

Telephone surveys. Four hundred Oahu residents aged 18 years or older were surveyed via the telephone to determine their coffee consumption habits and their attitudes towards Kona Coffee. Of the 400 respondents 61.2 percent indicated they were coffee drinkers who consumed a mean of 2.8 cups per day, or almost twenty cups per week. Ground regular and instant decaffeinated were the most popular forms, with whole beans, in both forms, following.

The majority of drinkers obtained their coffee from grocery stores (89%). Other sources were coffee machines at work or school (6%), and coffee shops (3%).

A little less than one-fourth of the respondents (24%) reported drinking Kona Coffee. Eight percent indicated they drink Kona Coffee on a regular basis and an additional 7% said they drink Kona Coffee at least once a week. Mean consumption among the Kona Coffee drinkers was 3.1 cups per day versus 2.8 cups per day for all respondents. Thus, it appears that Kona Coffee drinkers consume more coffee, on the average, than non-Kona Coffee drinkers.

The ratio of Kona Coffee drinkers who consumed blend versus 100% Kona was over 2.5 to 1 (72% to 28%). Eighty-three percent drank regular and 17% decaffeinated Kona Coffee. As compared to regular coffee, relatively fewer residents drank instant Kona Coffee (5%), and a much larger proportion proportion used whole beans (29%). Ground Kona Coffee was used by the largest group.

As shown in Figure III-9, there were more residents who reported purchasing Kona Coffee in the past year (33%) than there were Kona Coffee drinkers (24%). Not surprisingly, 37% of buyers (12% of all respondents) last purchase of Kona Coffee was for gifts. Sixty percent (19.5% of all respondents) were for purchasers' own or household consumption.

The total amount purchased in the past year was most often 1 to 4 pounds (31% of buyers). Nearly similar proportions were found for those who purchased over ten pounds (25%), less than one pound (23%), and five to ten pounds (21%). These results are shown in Figure III-10.

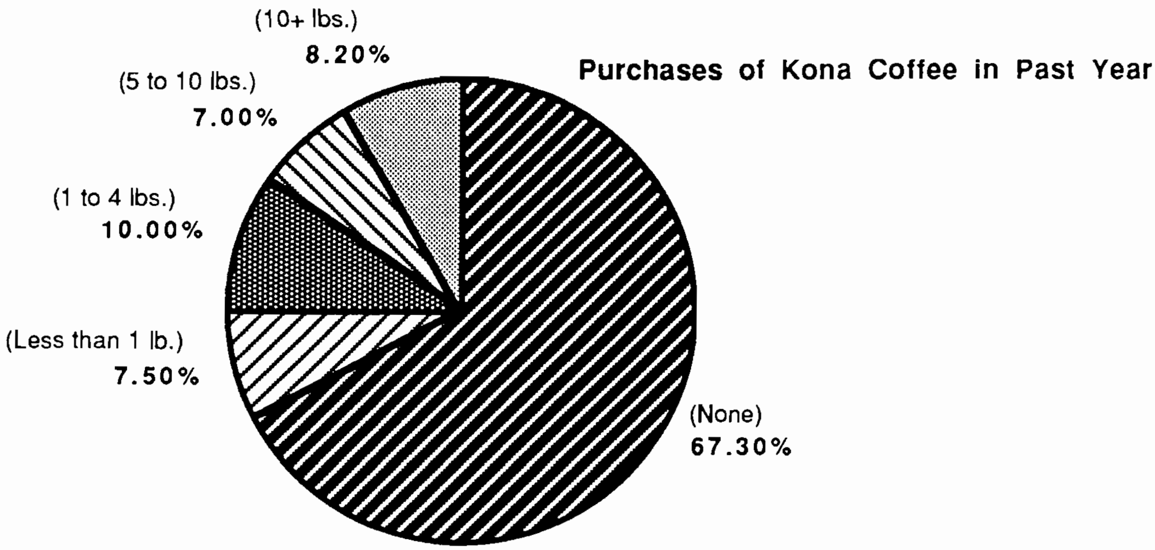
Figure III-11 shows the relative importance of various Kona Coffee attributes, as reported by residents who recently purchased the product. Quality was often rated "very important" or "important", (95% of purchasers), followed by taste (89%) and aroma (81%). Price was also important to three-fourths of Kona Coffee buyers. The last three characteristics, prestige or reputation, an attractive package, and a nice store display were important to less than half of the respondent purchasers.

The 67 percent of the residents who did not purchase Kona Coffee in the past year were asked for the main reason they did not do so (Figure III-12). Nearly half did not drink coffee or drank some other brand of coffee. Of note, less than 1% named quality as a problem.

These results highlight the need for continued quality in Kona Coffee. They also indicate that, at least among some consumers, the image and prestige of Kona Coffee may be important. Furthermore, they may be an opportunity for the industry to promote Kona Coffee as a gift item for the local resident population. A tie-in with the prestige and mystique of Kona Coffee seems appropriate. Interestingly, while the focus groups indicated that consumers believed they had a right to know the percent Kona in a blend, blend consumption was much greater than pure Kona Coffee consumption. A couple of obvious explanations for this seeming inconsistency is that blends are more available and at a lower per unit costs than is pure. Furthermore, consumers may just assume a level of Kona Coffee in a blend; in the survey, 70 percent of residents believed a Kona blend contained at least 50% Kona Coffee.

<1>Kunimoto, Sandra L. "Consumer Perceptions of Kona Coffee," unpublished manuscript. Spring 1986.

Figure III-9. Resident Purchase Habits of Kona Coffee, All Respondents



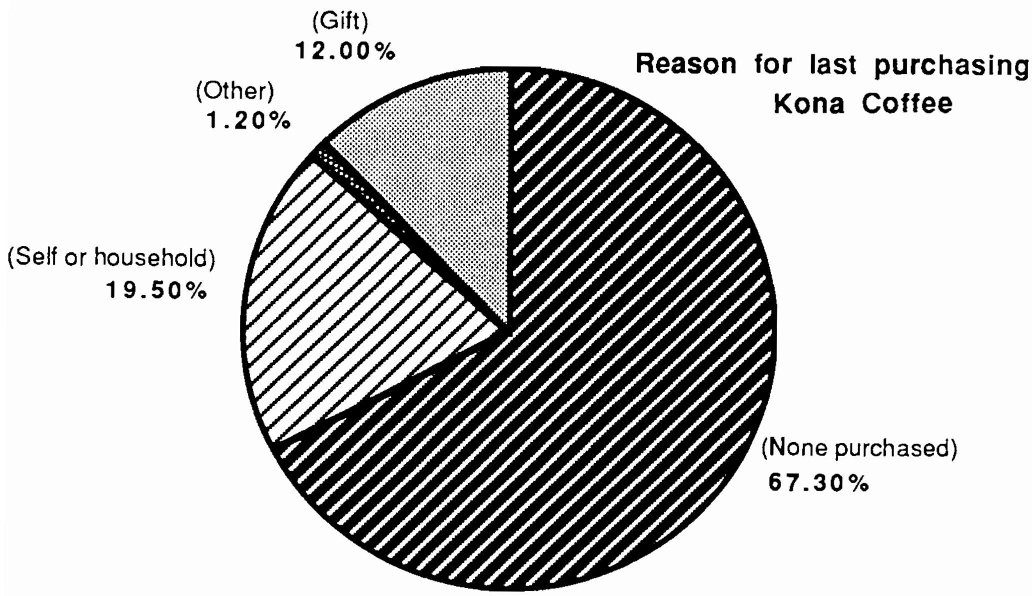


Figure III-10. Resident Purchase Habits of Kona Coffee Purchasers Only

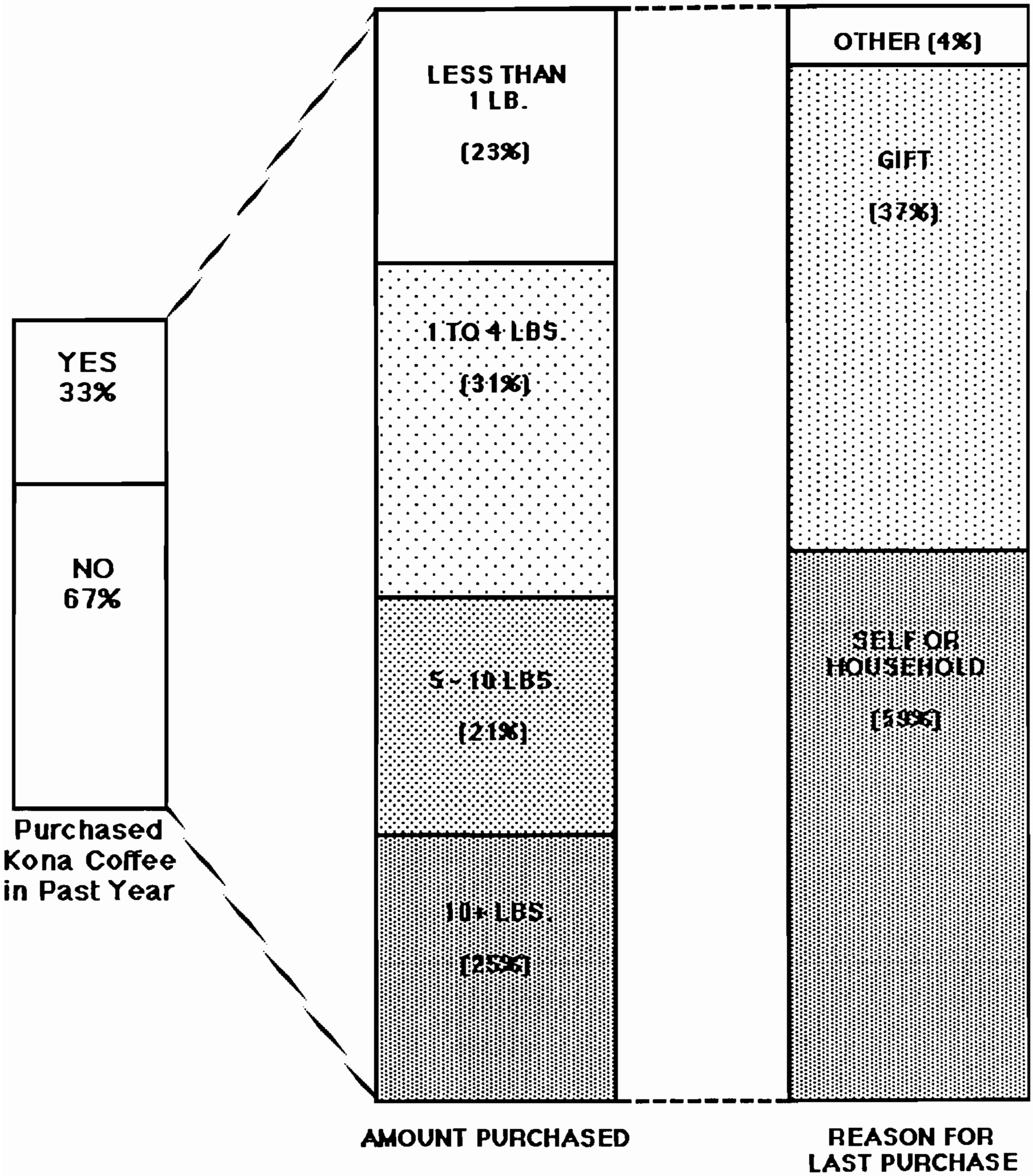
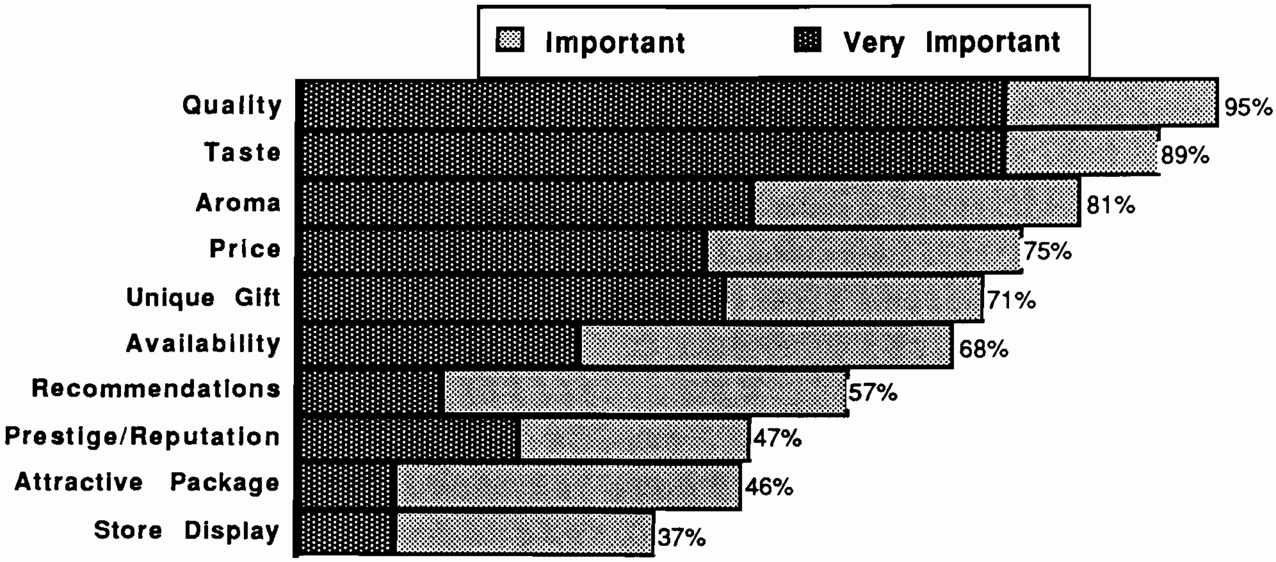
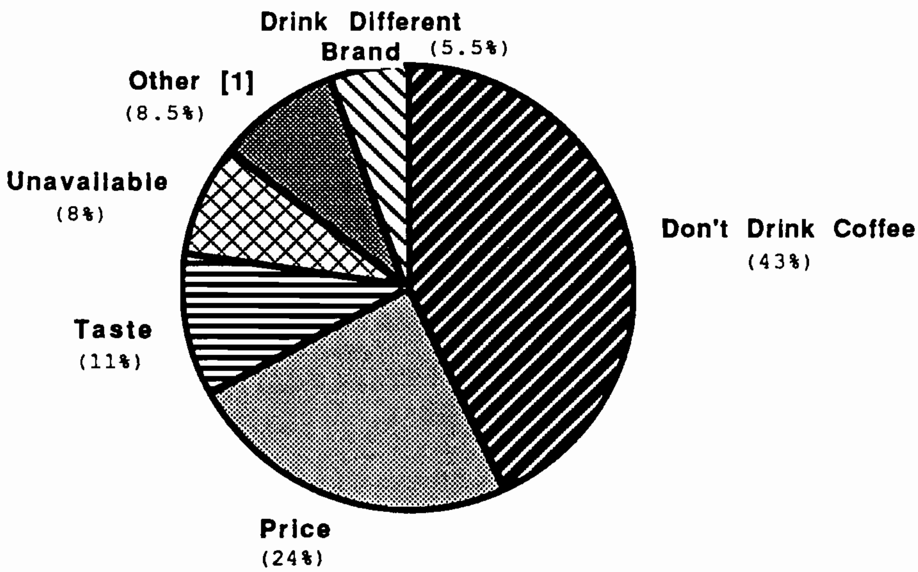


Figure III-11. Relative Importance of Kona Coffee Characteristics in Purchase Decision of Residents



(1) Responses of "somewhat unimportant &"not at all important"

Figure III-12. Residents' Main Reasons for Not Purchasing Kona Coffee



[1] Including quality (0.4%)

III.D.4 The Visitor Market

Visitors from the U.S. mainland and Japan were surveyed to identify: (1) their coffee consumption and purchase habits; (2) the association of different products with Hawaii; (3) what items they purchased while in Hawaii; (4) why they purchased these products; and (5) demographic data.

III.D.4.a Visitor Demographics

Table III-6 compares typical visitors from the U.S. and Japan that completed the survey. American visitors are typically older and have more education that their Japanese counterparts. While incomes are comparable, Japanese are more likely to be married.

Japanese visitors are more predisposed to package tours, as they were more likely to use tour agencies and traveled in larger groups. Americans stayed nearly twice as long, and were a little more likely to be on a repeat trip. U.S. visitors were also 3 times more likely to visit the Big Island, but only Molokai and Lanai received less visits from either group.

U.S. In our survey, the typical visitors from the Mainland U.S. are likely to be married (76 percent) and on a 10 day pleasure trip. They are in their mid-forties, have some college education, and have a family income in the $40-50,000 range. Including this trip, they have been in Hawaii over 3-1/2 times. As with 69 percent of other U.S. tourists, they are traveling alone or as a pair. Travel and lodging arrangements were made by a tour agency in 62% of the cases. One out of four tourists visited Hilo or Kona - only Molokai and Lanai had a lower rate.

The largest portion of visitors was from California (23%), followed by Texas (7 percent), Minnesota (6 percent), New York (5 percent) and Illinois (5 percent). Not counting California, all regions of the country seem to be well represented.

Japan. Although 22 percent traveled in pairs or alone, the average tourist from Japan arrived in a group of 19 persons on a 5-1/2 day trip; 84 percent were traveling for pleasure. This trip was most likely his or her first (91 percent were on their first trip to Hawaii), and arranged by a tour agency (92 percent). Tourists were likely to be married (91 percent), in their late twenties with 51% having no more than a high school education, and had family incomes equivalent to $40-50,000 in the U.S. While 9 of 10 tourists visited Honolulu, less than 1 in 10 visited Hilo or Kona.

Table III-6. Comparative Visitor and Trip Profiles

Japan	Characteristic	U.S.A.
Married (91%)	Marital Status	Married (76%)
28.6 years	Mean Age	46.2 years
High School	Median Education	Some Univ. or College
$40-49,000	Median Household Income	$40-49,000
-----	Mean Household Size	2.8 persons
Pleasure (84%)	Type of Trip	Pleasure (91%)
18.5 persons	Mean Party Size	4.6 persons (median 2)
5.5 days	Length of Trip	10.1 days
1.2 trips	Trips to Hawaii	3.6 trips
Tour Agency (92%)	Travel Arrangement	Tour Agency (62%)

Percentage Visiting Different Locations and Islands

Japan	Characteristic	U.S.
89%	Honolulu/Oahu	81%
29%	Maui	39%
26%	Kauai	33%
8%	Kona/Hilo	24%
4%	Molokai/Lanai	5%

III.D.4.b Tourists' Perceptions

Tourists were asked to rate how strongly they identified certain products with Hawaii (Figure III-13). The top three products were very strongly or strongly identified by at least 85 percent of respondents, were Aloha wear, macadamia nuts, and chocolate covered macadamia nuts for Japanese visitors, and pineapple, macadamia nuts, and Aloha wear for Americans. From the negative end of the scale, no more than 5 percent of responses had a weak or very weak identification for these products.

The products least identified with Hawaii, in terms of both a low strong rating and high weak rating, were arts and crafts, jewelry, and perfume.

There were major differences between both groups of visitors when considering only the six agricultural products (Table III-7). Only macadamia nuts were identified by comparable percentages, with other products being widely divergent in absolute scores and relative rankings. Pineapple was the strongest and papaya the weakest product for Americans, but both were in the middle, and with reversed rankings, for Japanese visitors. Kona Coffee did relatively poorly in both groups, and was the only agricultural product to be strongly identified by less than 50 percent of either group.

One explanation for these differences is that the identification reflects the amount of promotion and advertising put into the different products. Since few tourists are fluent in both Japanese and English, an advertisement would have to be bilingual to reach both groups while also considering the different cultures - e.g., one group may spend more time or be more likely to watch television, especially while on vacation.

Identification may also reflect the availability of the product, especially from competing sources, at home. For example, papayas may do poorly because of Mexican and Caribbean imports to North America, but "Hawaiian pineapple" may be a household word. A lot of Southeast Asian pineapple and flowers may enter Japan.

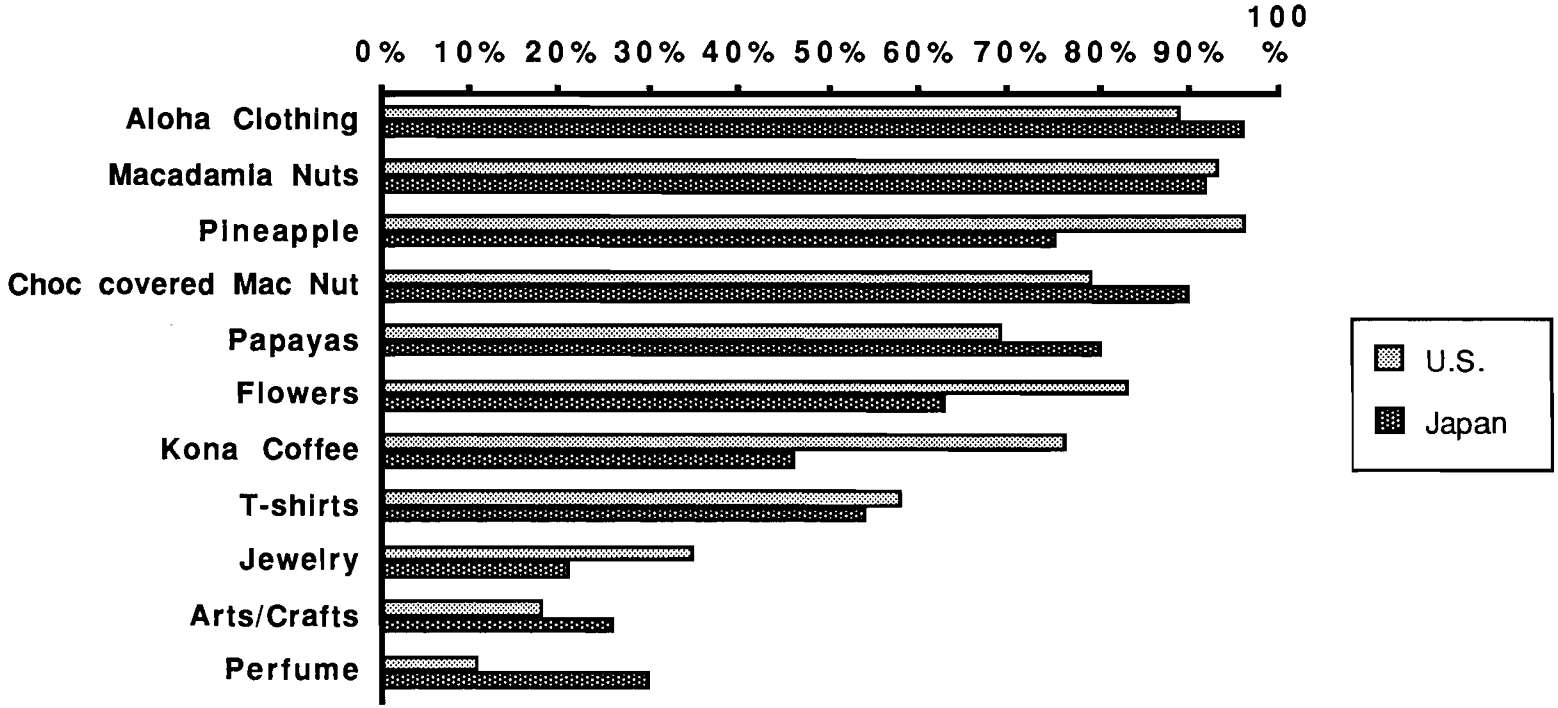
In the case of Kona Coffee, 76 percent of U.S. visitors strongly identified the product with Hawaii, but it still had the second lowest level of identification among the agricultural products listed. Forty-three percent either did not or were not sure if they knew of Kona Coffee before their trip (57 percent knew of Kona Coffee), implying that many were informed in Hawaii. Further, 31 percent said Kona Coffee is available in their hometowns.

In contrast, 46 percent of Japanese visitors strongly identified Kona Coffee with Hawaii and forty percent knew of the product before their trip. This suggests that exposure to Kona Coffee in Hawaii is minimal. Kona Coffee is also less available in Japan (21 percent said it is available at home), where competition is stronger given the dominance of tea as a beverage and the strong presence of Jamaican Blue Mountain and other specialty coffees. With a low profile and strong competition, we speculate that "Kona", especially if not tied to Hawaii, is easily lost or obscured in the mix of products.

Table III-7. Visitors' Comparative Identification of Agricultural Products with Hawaii

United States		Japan	
Pineapple	96%	Macadamia Nuts	92%
Macadamia Nuts	93%	Chocolate Covered Macadamia Nuts	90%
Flowers	83%	Papayas	80%
Chocolate Covered Macadamia Nuts	79%	Pineapple	75%
Kona Coffee	76%	Flowers	63%
Papayas	69%	Kona Coffee	46%

Figure III-13. Visitors' Identification of Products with Hawaii



III.D.4.c Important Factors Affecting Purchase

Identification notwithstanding, the bottom-line variable for those targeting the tourist market are sales. Visitors polled on agricultural products that were purchased to take home indicated that regular and chocolate covered macadamia nuts were overwhelming favorites for both groups (Figure III-14). While this might be expected for Japan, pineapples and flowers would also be expected to be more popular for the U.S. In the survey, Kona Coffee does about as well as both products. For Japan, Kona Coffee does much better than the fruit and flowers in relative terms, although the opposite would be expected from the identification of the products with Hawaii.

Perishability is apparently a factor in returning to Japan, given the lengthy return trip and the very low level of purchases for all fresh products. Perishability may also be a factor for North America, but foreign competition and the availability of the product at home may also be factors.

What other factors are considered by tourists when selecting gifts and souvenirs? Figure III-15 shows the relative importance of eleven product characteristics. The strong identification of products with Hawaii is reflected in two of the top four characteristics for both groups of visitors: uniqueness to Hawaii and image of Hawaii. Being easy to take home was also common to both, while taste for North Americans and price for Japanese rounded out the top four<1>.

Three other variables, store display, advertising, and coupons had negligible importance. There were noted differences between groups for price, looks of package, and product reputations, and also for whether a product was requested, package size, and store display. In general, visitors from Japan were more likely to rate a characteristic as important, and Americans as not important. One implication is that many marketing efforts may be more effective for Japanese rather than U.S. visitors.

Chapter III.D.4.c Footnotes

<1> This is a somewhat surprising result, in that a widely held belief is that Japanese visitors are quality or brand conscious, and willing to pay sometimes exorbitant prices. However, the question did not ask if low price was important. Further, prices may be relatively reasonable, given the favorable exchange rate and prices in Japan. Finally, prices may be important because of its role in the custom of gift giving, where either a too expensive or too low cost gift would be inappropriate.

III.D.4.d Factors Affecting Kona Coffee Purchase

The tendency toward a higher rating for factors by Japanese visitors as opposed to American visitors was even more pronounced when considering the characteristics important to the purchase of only Kona Coffee (Figure III-16). Respondents did not find Kona Coffee characteristics to be as important as the same characteristics for gifts and souvenirs in general.

Taste, aroma, quality, price, and uniqueness to Hawaii were the five most important characteristics influencing Japanese tourists' purchase of Kona Coffee. These were the same for American visitors except for price. The four most unimportant factors for Americans were a request for the product, store display, prestige, and package appearance. The corresponding four most unimportant for Japanese were store display, requested item, recommendations, and package size.

The results suggest that banking on the image of Hawaii to sell Kona Coffee is not enough. The most important factors -- taste, aroma, and quality -- are physical characteristics of Kona Coffee.

Figure III-14. Comparative Purchases of Products by Tourists

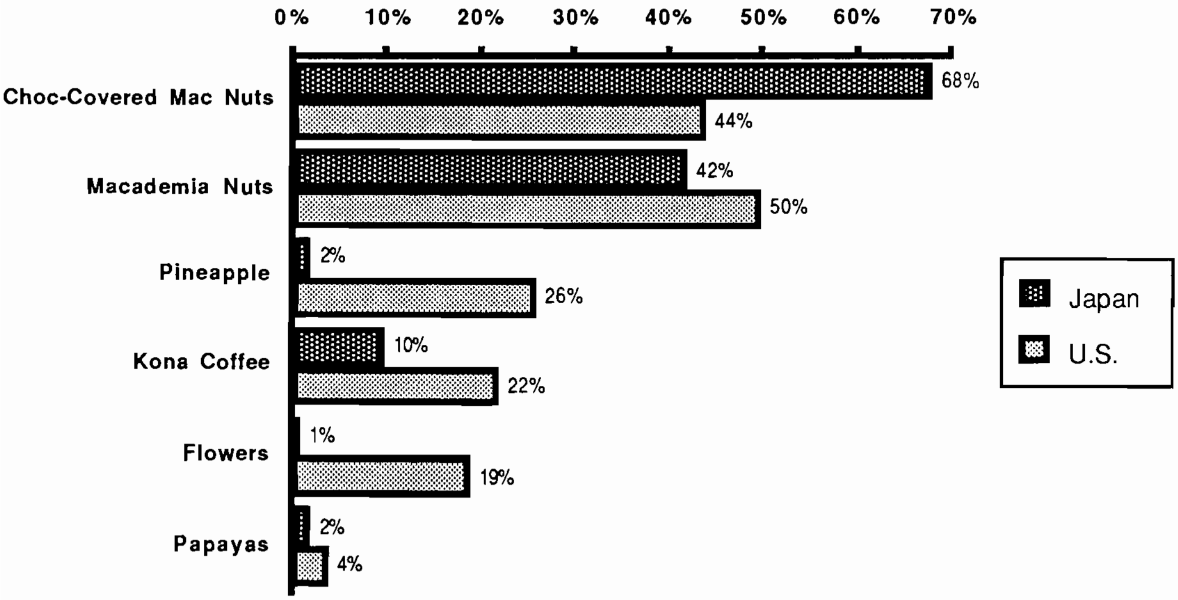


Figure III-15. Relative Importance of Souvenir and Gift Characteristics in Purchase Decision for Visitors

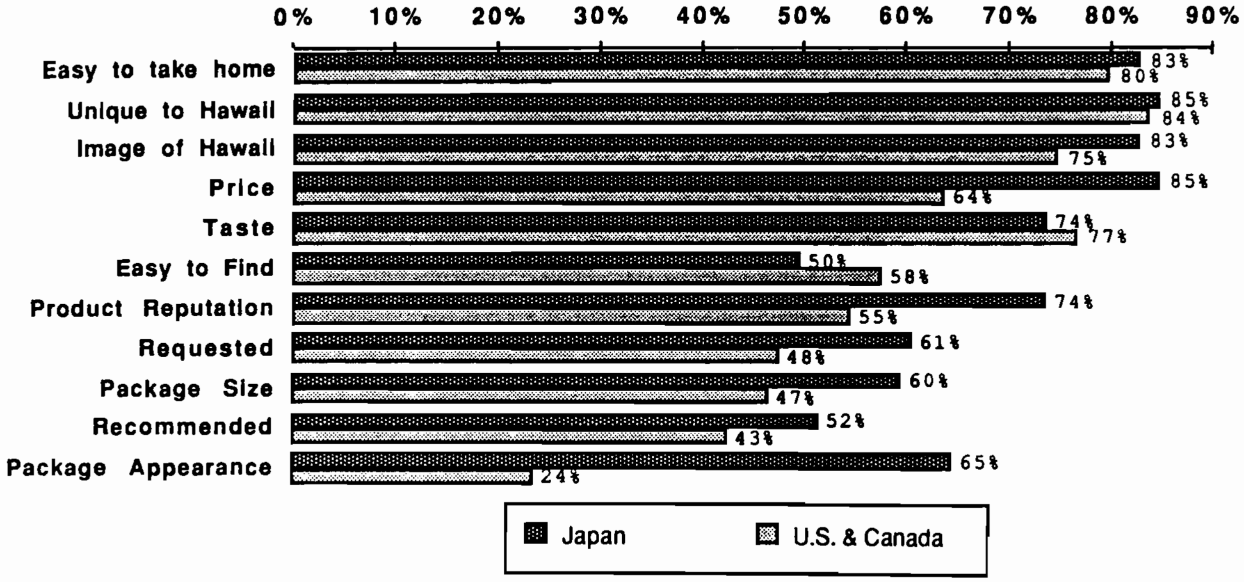
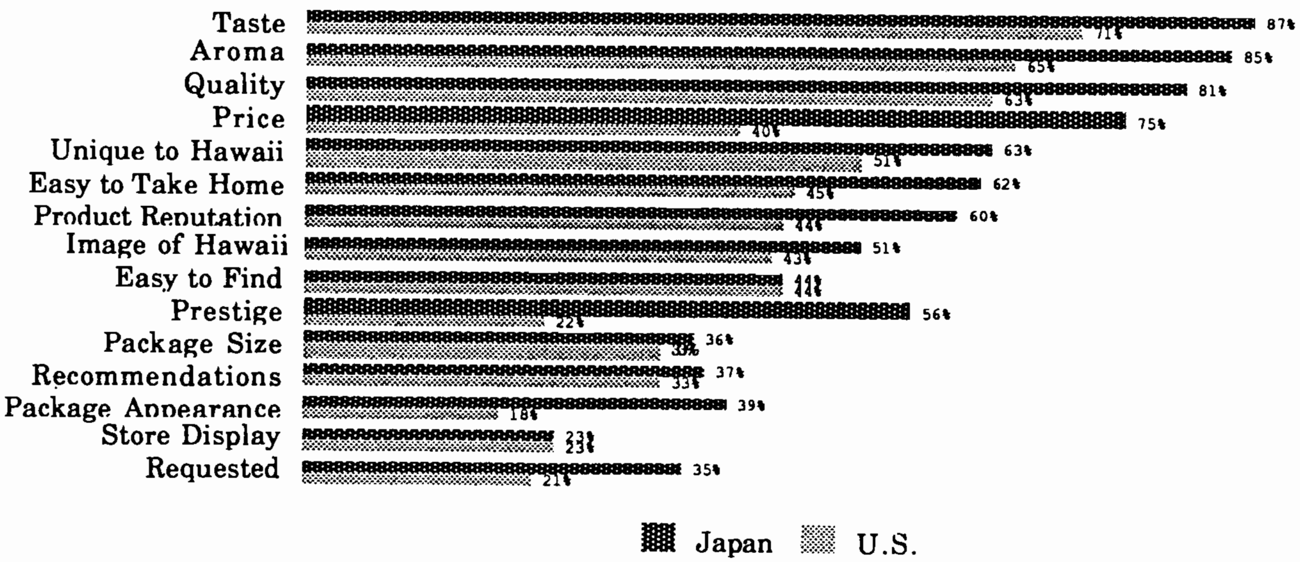


Figure III-16. Relative Importance of Kona Coffee Characteristics in Purchase Decision of Visitors



III.D.4.e Place of Consumption

A larger percentage of respondents from Japan drink coffee, but each drinker consumes less than his or her counterpart from the U.S. Ninety-two percent of Japanese visitors drank coffee, at a mean average of 11 cups per week, compared to 78 percent of Americans at 18 cups per week<1>.

The location at which coffee was purchased also varied widely. Visitors from the U.S. were most likely to purchase coffee from a grocery store or supermarket (69 percent). In comparison, only 46 percent of visitors from Japan used this source, while 59 percent bought coffee from specialty coffee shops, including tea rooms. Also, more Japanese bought coffee at work<2>.

A large proportion of Japanese tourists either did not know (42 percent) or were not sure (18 percent) of Kona Coffee before their current trip. As compared to the remaining forty percent who had known about Kona Coffee, 57 percent of U.S. tourists were aware of Kona Coffee before their trip. Still, a larger proportion of Japanese visitors drank Kona Coffee more often than U.S. tourists. Thirty-one percent of respondents reported drinking Kona Coffee more than once a month, and 24 percent consumed it on a daily basis. In the U.S., 13 percent drank Kona Coffee more than once a month, and five percent drank it daily.

Nineteen percent reported Kona Coffee was not available where they live in Japan. It was available for 21 percent, and the majority, 60 percent, were not sure. Only 1 out of 10 Japanese tourists purchased coffee to take home.

Thirty-one percent of American tourists could get Kona Coffee at home, 27 percent could not, and 42 percent were not sure. Seventy-five percent did not purchase any coffee to take home. Of those who did, nearly two-thirds (16 percent of all respondents) purchased less than two pounds and one-fourth (7 percent of all responses) purchased two to five pounds.

These results are interesting from several perspectives. First, they indicate that only a small percentage of the tourists (10% of Japanese and 25% of U.S.) purchase any Kona Coffee to take home with them. It has long been thought that tourists could be used as a mechanism to "export" Kona Coffee, but it would appear that greater efforts could be made in this area. Second, it is interesting that these percentages roughly correspond to the percentage of tourists which visit the Island of Hawaii (Table III-6), so immediate efforts might be targeted on the Island of Oahu. Third, it was found that advertising and store displays had little impact on the purchase decision. This is not a criticism of what is currently being done, but perhaps more on the level of these activities. Tourists could also be targeted before they leave the airport upon their arrival. Ideally, preliminary efforts would be done before their arrival in Hawaii.

These results also indicate that if the Japan market is to be targeted, the outlets through which Kona Coffee will be moved are likely to be different than for the U.S. mainland. This will dictate a different promotional strategy. Furthermore, some thought should be given to the product form (ground, whole bean, and instant) and what is appropriate in each market. In both cases, there appears to be an opportunity to better inform mainland consumers about the availability of Kona Coffee.

Footnotes

<1> Our information on the Japan market showed 83% of Japanese drank an average of 9 cups per week in 1985. The ICO 1988 Winter Coffee Drinking Study reported 50% of Americans are coffee drinkers who consume 23.4 cups/week (3.34 cups/day). Per capita consumption (drinkers and non-drinkers combined) is 11.7 cups/week (1.67 cups/day).

We speculate that the main reason for these differences are that visitors differ from the general populations. The mean age of the Japanese visitor was 28.6 years, probably much lower than the national average. Since older Japanese are more likely to drink tea, it stands to reason that removing them from the statistics would raise the percentage of coffee drinkers and the average amount of coffee consumed. Also, the nationwide figures should have increased since 1985, if historical trends had continued.

For Americans, proportionately more visitors drank coffee, but at a lower rate than the population in general. There were only 19 persons aged 18 or below (out of nearly 1100 visitors surveyed), while the national survey apparently considered all persons 10 years and older. The visitor survey therefore did not include many of the non-drinkers in the national population, so the proportion is higher. Of note, an independent survey found the coffee drinking percentage to be 73% for persons aged 18 and older (SAMI/Burke Market Research, as cited in the Honolulu Star Bulletin, January 24, 1989). We speculate that differences in incomes, education, and age as well as the large amount of California visitors, could explain differences in the quantity consumed.

<2> The information from the Japan market listed the supermarket as a source for 75% of instant coffee purchases and 42% of regular coffee. Specialty coffee shops and tea rooms accounted for 53% of regular coffee purchases.

IV. ISSUES AFFECTING THE KONA COFFEE INDUSTRY

Various groups have identified a number of issues that might stand in the way of the Kona Coffee industry in reaching its full potential. An arbitrary grouping of most of these issues is listed in Table IV-1.

Kona Coffee starts at the grower level. The industry analyses identified several production-oriented problems including land tenure, pest control, water, and labor. Production and marketing go hand in hand. It is obvious that marketing is not a problem if there is no production to market, and that a crop that can't be sold is equally useless. Any improvement in production or marketing that will increase and stabilize revenues or decrease costs will benefit the grower and ultimately the overall industry. Other efforts are involved with production; this study focused on more marketing-oriented issues. In particular, this chapter considers unreliable supply, some competition to Kona Coffee, the related concepts of image, reputation, and quality, and the issue of blending and minimum content legislation.

Table IV-1. Perceived Issues in Kona Coffee

(as reported by various groups)

Production and Supply issues
- aging farmers, land, labor, mechanical harvesting, etc.
- cost reduction in processing and production
- production practices
- seasonality
- weather

Quality, Image, and Reputation
- inconsistent image
- quality standards
- price/value perceptions

Existing and potential market segments
- undeveloped export (out-of-state) markets
- tourist markets
- resident markets
- institutional markets
- supermarket/retail
- specialty outlets

market structure & conduct
- price resistance
- limited working capital
- fluctuation in supply
- inventory carrying cost

Competition
- specialty coffees as luxury goods
- price competition from other coffees
- coffee product proliferation (flavored, other gourmet)
- counterfeiting, Kona-style coffee
- other Hawaii coffees
- passing fad, lifestyle, life cycle issues

Blends and labelling
- pure vs. blend
- minimum content legislation
- truth in labelling legislation
- consumer misconception of blend

Industry-wide activities
- lack of cohesive industry association
- industry vs. individual incentives
- funding and enforcement

IV.A Unreliable Supply

One issue which has received a fair amount of attention, especially from the West Coast market, is the fluctuating quantity of Kona coffee both within a year and between seasons. There are several aspects of this problem which must be considered.

1. Much of the supply fluctuation stems from production issues. Production fluctuations seem to be a seasonal phenomenon, yet there is some evidence that points to the possibility of easing the year-to-year variation. Potential production-oriented approaches include some pruning, fertilization, and irrigation practices. These issues require research, whose results should be incorporated into a grower education program.

2. Easing the production fluctuation will ease processing problems. To maintain quality, current fluctuations may force processors to adopt a "peak load" mentality to maintain quality. That is, there will be idle capacity in the mills to assure that large crops can be handled without a drop in quality, but this idle capacity means idle capital and labor which most processors cannot afford. The result is an inability to maintain quality during heavy production, as may have been the case with recent bumper crops.

3. Fluctuating supply, especially under past conditions, has a downward drag on price. Because buyers know that Kona can be bought at say $4/lb (and because processors had to sell at that price at some time), there is resistance to price increases.

On the other hand, if the expectation is for a high price (as is the case for Jamaica Blue Mountain), price resistance can be eased and perhaps eliminated. With an absolute limit on the amount of pure Kona Coffee that can be produced, with the increased demand from a successful promotional program, and with an inelastic demand during short years, Kona should be able to command higher prices.

4. The high price of Kona coffee, given limited budgets and the need to stockpile Kona to last a year, makes it very expensive to carry an inventory. At $5/lb, ten bags of green Kona Coffee represents $5000 of someone's working capital sitting in a storeroom before considering interest costs. This could put a significant strain on a company's finances.

Barring investments in processing capacity, the industry can expect fluctuating production to lead to future quality problems. This will aggravate price resistance and problems with buyers. While recent high prices have attracted resources to the industry, stability in prices should further enhance the industry's position.

Suggested approaches to the supply inconsistency problem include a research program and grower education to stabilize production. Our recommendations also include a stock control/inventory program to further reduce fluctuations faced by buyers. This may also help the financial aspect of holding Kona Coffee in inventory.

IV.B Competition

Kona Coffee faces five sources of competition from other coffees. These are:

1. specialty coffees as luxury goods
2. specialty coffees as quality products
3. flavored coffees
4. Kona-style coffee
5. Other Hawaii coffee

These products compete with Kona Coffee in different market segments. They may target the same consumers and they may offer many of the same product characteristics as Kona coffee. As a specialty coffee, Kona must compete with other high quality coffees for a share of the consumer's pocketbook. Kona Coffee may be a prestige or luxury good for some of these consumers. Others may buy Kona Coffee for its physical characteristics, such as appearance, taste, and aroma. Still others may want the trappings of specialty coffees, but may prefer a familiar flavor (at least on some occasions). The high price and limited quantity of genuine Kona Coffee may attract imitations, whose lower price is attractive to many consumers. Other than on a price basis, Hawaii coffee will be a competitor to the extent that it is the image of Hawaii that sells Kona coffee.

Thus, the competition from other coffees varies with the desired product attributes, geographic market, and target consumer. Although not directly addressed in this section, this principle can be applied beyond competing coffees. Other souvenir items in the tourist market are an example.

Specialty coffees as luxury goods. Some consumers gain satisfaction from paying a high price for their coffee; more satisfaction is gained with a higher price. Products such as designer clothing, expensive jewelry, and racy sportcars are often cited as examples of luxury goods, where it is the "snob appeal" more than any physical characteristic that commands an expensive price tag. The rituals associated with specialty coffee and the service provided by vendors also are attractive.

The population segments and markets for luxury goods are typically affluent and/or described as "Yuppie." Market segments dealing with pure Kona Coffee are most likely to be affected. Competing products include product forms such as expresso and cappuccino.

As a prestige item, Kona Coffee's main competitor, especially for Extra Fancy and products at the high end of the price spectrum, is Jamaica Blue Mountain (JBM)<1>. JBM is the best of three grades produced in Jamaica (blue mountain, high mountain, and prime wash), and is the most expensive coffee in the world. The supply of green JBM is about one million pounds annually, and is expected to double by the early 1990s. Japan purchases 75 to 80 percent of the crop, but the Japanese market is controlled by only a few companies. Two Japanese firms own farms with fifteen percent of production, and Japanese are also rumored to be financing expanded production. European sales are limited because JBM is too expensive. However, recent sales had been increasing at an annual rate of fifteen to twenty percent.

Thus, part of the higher price for JBM can be explained by a smaller annual production than Kona coffee, and by being sold almost exclusively as pure JBM. The fact that most JBM is exported to Japan contributes to price, but also points out Japan as a market opportunity for Kona coffee. Further, the Jamaican government plays a prominent role in controlling the quality and supply of JBM (see discussion of the program in Chapter V) and in financing the industry. These also provide strong insights into possible action by Kona's industry.

In summary, the price of Kona Coffee comes partially from being a luxury product and to that extent, JBM is a good example and role model. However, prestige is only part of the overall image of Kona coffee, an image that also includes the mystique, allure, and romance associated with Hawaii.

Specialty coffees as quality products. Other consumers focus on the physical characteristics of a coffee. As a top quality product, Kona must compete with other high quality coffees such as Guatemalan Antigua, Costa Rican, Kenya AA, Sumatra Mandheling, and Celebes Kalossi. Many industry members thought these and similar products were comparable to Kona Coffee in terms of quality, but at a much lower price. The lower cost of the competition may mean a higher margin to the seller and/or a lower price to the buyer than for Kona coffee. The main advantages Kona has over this competition are its image and "grown in the U.S.A." distinction.

Other high quality coffees are especially a factor in continental U.S. specialty outlets, where it may be more the roaster's or retailer's preference (and hence recommendation) that sells a coffee rather than a final consumer's own selection. That is, coffee in specialty shops are often "pushed" instead of "pulled," especially when the customer has no stated preference. Seller incentives as well as a vested interest in Kona Coffee can be particularly useful in this regard. Past industry activities tied to the Kona Coffee Festival and this report's recommendations (see Chapter V) are some possible actions.

Flavored coffees. Related to the above, some consumers may enjoy the quality of and trappings (e.g., the rituals of grinding and brewing coffee) associated with specialty coffees without having a particular preference. Many, if not most, would be hard-pressed to describe the differences between coffees of similar quality. Some assert that at least fifty percent of coffee drinkers cannot distinguish between coffees, yet, most know when they taste a product they like. Flavored coffees provide these consumers with a familiar and perhaps favorite taste.

While this has been called an "aberration ... a mutant that came crawling out of Lake Mead into Las Vegas" (Davids<2>), sales of flavored coffee seems to be more than an "insidious fad," and likely cuts into sales of Kona. This may be particularly true in Hawaii markets, where the popularity of macadamia nuts will enhance a macnut-flavored coffee, especially in the tourist market. Image is a major contributing characteristic for both gift and tourist sales.

Kona-style coffee. The limited supply of Kona Coffee coupled with its high prices and revenues are a powerful incentive to produce Kona-style coffee. A Kona-style coffee is essentially a counterfeit product. Mislabelling a blend as pure Kona is one example. At best, Kona-style coffee is a blend of inexpensive coffees that allegedly mimics the characteristics of Kona. With anything less, consumers get a product whose quality may impart a false, and perhaps negative, impression of true Kona Coffee. Producers of Kona-style use the name, image, and reputation of the true product to their benefit, while the Kona Coffee industry loses both current and potential revenues and markets. As an example, a rumor on the West Coast was that the amount of Kona sold is two times the actual production. Further, part of the "poor quality coming out of Kona" might be traced to a counterfeit product! Buyers would therefore be more unwilling to pay higher prices because they may not get the real thing, would be more leery of making a purchase, or may not buy Kona at all.

One estimate places the extent of counterfeit product at 20 to 35 percent of the total U.S. mainland market for Kona. The existence of Kona-style coffee seems to be more pervasive on the East Coast--in New York City, both Kona-style and JBM-style coffees were observed being sold out of bulk barrels in one of the leading gourmet stores. Casual observation led to the belief that shoppers tend to ignore the "style" portion of the name.

Other Hawaii coffee. Kona's high prices and revenues have also attracted several efforts to produce other Hawaii coffees. Maui Tropical Plantations is producing and marketing its own "Maui Blend," albeit on limited acreage. Amfac and Castle & Cooke are conducting trials at several locations on a number of varieties. Amfac's intent is to look for a niche, perhaps around the idea of Hawaii being an American coffee. The firm may also approach the labor problem by subleasing orchards to individuals while contracting to provide certain services and to purchase the crop.

Two other firms will rely heavily on mechanical harvesting, and have stated an intent to produce commercial-grade coffee at world prices. Coffees of Hawaii, inc. (formerly Hawaii Guarani Plantations) plans production on up to 800 acres on Molokai and is reported to have at least informal marketing agreements with a large roaster. Island Coffee Co., a joint venture between McBryde Farms Inc. (a subsidiary of Alexander & Baldwin Inc.) and Hills Bros. Coffee Inc. (A subsidiary of Nestle S.A.) has processed a small sample crop<3>. The venture has 400 acres in coffee on Kauai, of up to a planned three million trees on 5,000 acres. If successful, the first commercial crop will be harvested and marketed in 1990-91, either as a separate blend, as part of other Hills Bros. coffees, or both.

One of the major product attributes of Kona Coffee is its image. Hawaii coffee will be a competitor to the extent that it is the image of "Hawaii" and not "Kona" that sells the product. This will be especially true for the tourist and local gift markets, where the expected lower cost of Hawaii coffees will provide a distinct advantage.

Hawaii coffee has been called the dark storm clouds on the horizon that threaten to engulf the Kona industry. It has also been called a double-edged sword because while Hawaii coffee could cut drastically into existing markets with its image and price, it could also enhance Kona Coffee's position. For one, this might provide the basis for a blend of Hawaii coffees, and thus increase the demand for Kona Coffee because of a broader product line.

Hawaii coffee is also expected to provide sufficient volume to attract large firms and efforts toward developing a mass market. These firms have considerable financial resources, especially relative to the Kona industry. By positioning itself as the premium Hawaii coffee, Kona could benefit from promotional efforts by these companies to better penetrate new and existing markets. Hawaii coffees would therefore enhance the awareness of Kona Coffee.

Chapter IV.B Footnotes

<1> Much of the information presented is from a personal interview with Mr. Derryck Cox, Jamaica Trade Commissioner, supplemented by data obtained from other sources.

<2> Davids, Kenneth. Coffee: A Guide to Buying, Brewing, and Enjoying (revised edition). 101 Productions, San Francisco, 1987. pg. 28.

<3> Andrade, Ken. "A&B in Coffee Venture with Nestle" in Honolulu Star Bulletin, February 14, 1989.

IV.C Image

The standard against which all coffees are judged is Jamaica Blue Mountain (JBM). Where Kona is often described as good or very good, JBM is a great coffee. Thus, while the general consensus holds Kona to be of very high quality, many people in the industry, the specialty roasters in particular, believe Kona to be no better than many other premium coffees when judged purely on its physical characteristics as a coffee. Some comparable products named by different individuals include Kenya AA, Sumatra Mandheling, Guatemalan Antigua, and Colombian Supremo, all of which may sell for $2.50 to $3.00/lb less (green) than Kona.

The main reason for this price differential is herein called the image of Kona Coffee, backed by a high quality product with a good reputation. This nebulous characteristic of image has also been described as the mystique, aura, or romance associated with Kona Coffee.

More often than not, image is associated with Hawaii instead of Kona. For these consumers, there is little difference whether the coffee is from Hawaii or from Kona. The imagery and fond memories of Hawaii are a unique characteristic and currently a strong selling point of Kona Coffee. Yet, Kona Coffee is a part of the Hawaii experience for only some of the general public--the overall mystique of Hawaii does not automatically carry over to Kona. "Hawaii" and the name "Kona" do not make the average consumer think of coffee as does "Colombia." Similar to how "Idaho" evokes an image of potatoes, "Washington" of apples, and "Florida" of oranges, Colombia's advertising and promotional campaign has been successful in associating their name (and Juan Valdez) with coffee.

To knowledgeable consumers the Kona name means high quality, but some people do not know that Kona is in Hawaii. One anecdote tells of a retail seller who claimed Kona Coffee was from Africa. This again points to the need of high quality associated with the name.

Thus, Kona Coffee can command a price premium over similar quality coffees if only because of its image, especially as associated with Hawaii. In this sense, prestige is involved--a high price can reinforce the image of a high-quality, exotic product. Several approaches taken to further bolster this image involve slick packaging and an emphasis on the whole bean appearance of especially higher grade Kona Coffee.

The price/value relationship that exists in buyers' minds must be maintained. Part of its image is that Kona Coffee is expensive, but worth it. A price not consistent with a high quality image could lead consumers to question the quality of the product (e.g., why would a Mercedes sell for $100, unless something was terribly wrong with it?). Conversely, a poor quality product will hurt Kona's image and prestige, possibly to the extent that consumers expect to pay a lower price and again, suspect products priced inconsistent with the price/value perception.

Other Hawaii coffees will benefit to the extent that it is "Hawaii" rather than "Kona" that builds Kona Coffee's image. In the longer run, it will therefore be imperative that consumers be able to differentiate Kona from other Hawaii coffees. If not, one person noted that product may otherwise leave the State as Hawaii coffee, but will be "transformed" and sold on the mainland as Kona Coffee. Hawaii coffee gets Kona's price, but assuming Kona Coffee is of higher quality, such sales will only harm the Kona image.

IV.D Reputation.

An issue often discussed with image is the reputation or "good name" of Kona Coffee. Reputation and image are closely related; similar to image, reputation deals with peoples' past experiences, but with emphasis on a specific product. Reputation also deals with more tangible measures (e.g., cupping quality, supply reliability, price) whereas image has more emotional ties. The major difference is that Kona Coffee has a reputation of its own, but the image of Kona Coffee is blurred into the image of Hawaii.

Reputation and image are also intertwined with peoples' expectations: a good reputation and image help form high expectations of a product. Conversely, since Kona Coffee has no separate image, reputation will be tarnished more than image if expectations are not met. That is, Hawaii will survive, but Kona Coffee will go downhill.

The separation of reputation and image into closely related but distinct concepts makes it easier for the industry to focus its activities so as to get a greater marginal impact--that is, better results for the extra time and effort that are invested. In the long run, it may be beneficial to develop a stronger image for Kona Coffee, but the industry's short run programs will be more effective with an emphasis on maintaining or enhancing Kona Coffee's reputation, rather than Hawaii's image. The element of reputation that can be most affected by the industry (that which the industry has strongest impact on) is the quality of Kona Coffee. By no coincidence, reputation and quality are pivotal elements in discussions of Kona-style or counterfeit Kona Coffee and of Kona blend.

The issue of ruining a product's reputation through the marketing of low-quality goods is very relevant to Kona Coffee and cannot be ignored. In economics, it is widely recognized that selling some inferior units can harm the reputation, and thereby reduce the total demand for the product. Once the reputation is hurt, prices must be lowered on all units - regardless of their quality - to move the same volume of product as before the diminishment of the product's reputation.

Used cars are the classic example of this phenomenon. Everyone assumes that used cars are "lemons" and thus reduce the amount they are willing to pay for any particular car. Assuming the worst case reduces the costs of making a mistake. The other alternatives the buyer faces are: 1) to conduct a costly search to identify those cars which are not lemons; or 2) to believe the salesperson at face value, which entails obvious risks. Thus, the least risky and least costly strategy for the buyer is to assume all used cars are lemons. This is a situation which the Kona Coffee industry must avoid.

IV.E Quality.

Quality is a cornerstone of the Kona Coffee industry. Without high quality, it is doubtful that the current industry would survive for very long. We can trace out a likely scenario: High prices are a powerful temptation to sell lower-quality product, but if enough producers sell low-quality coffee, consumers will learn to associate low quality with the product. The practice will alienate consumers, who will switch to other coffees of equal quality but lower price. The consumer will not believe claims of high quality, so will not continue to pay a premium. Without high prices the incentive to produce and maintain high quality is eliminated, and most of the current growers, processors, roasters, and related entities would find it unprofitable to handle Kona Coffee. Only low quality coffee would be produced and sold. For the industry in general, bad coffee will drive out good coffee.

Low quality will have somewhat different impacts on different market segments. Assuming it is still profitable to the firms involved, the Hawaii image will continue to sell some Kona Coffee, but at a lower price. Because of its image, Kona Coffee will probably continue to be in demand for the tourist market as a souvenir item, and for residents as gifts.

Image will have less of an impact on the specialty coffee segment, including most of the export markets, where quality is more important. However, the problem of poor quality does not preclude the development of, for example, estate coffees or some other means of branding. Individual firms may get price premiums to the extent that they are able to develop and maintain their own reputations, since consumers can learn to associate quality with certain brand names.

Thus, problems with quality do not necessarily mean that the industry will totally vanish. However, any surviving industry will probably be smaller than the current situation. It is almost certain that Kona Coffee will not develop to its full potential.

The current general opinion within the industry and among coffee handlers is that Kona Coffee is a high quality coffee. However, a number of complaints were repeated in our interviews. Many roasters noted irregularities in either the production, harvesting, processing, grading, roasting, or some other facet in the handling of Kona Coffee, leading to irregular quality. Some industry observers have commented that the processors seem intent on competing via price, instead of quality. It is reported that at least some Japanese believe Kona is "not too good", in part because of the poor quality and bad reputation of the product processed in Japan. Several have complained that "You can't get a good cup of Kona Coffee in Kona."

It seems the industry's and product's reputation for high quality is being tarnished. Individuals are trading short-term profits (the "quick buck") for the longer term benefits. Once lost, it is very difficult to regain a good name. The easier route in the long run is to maintain high quality and a good reputation.

There is a chain of handlers from the grower to the final consumer. Maintaining quality is important throughout: like a chain, the overall industry is only as strong as its weakest link. Quality cannot improve once coffee is harvested. Therefore, production and harvesting methods must ensure top quality. Proper milling is important. Buyers must be knowledgeable enough to "purchase correctly," and final consumers must properly prepare the final cup of coffee.

For example, "raisins" lowers grade and poor cupping, but it is difficult to separate them at the mill. Pickers must understand this and correct the problem; if they won't, then a scheme such as a per pound penalty at the mill level (if universally applied) could be a powerful incentive. If the mill is not maintaining quality, then roasters should be made aware, and take action with appropriate price adjustments. Ideally, if final consumers are aware, they could boycott a roaster's product. The growers and perhaps processors currently have very little control of what happens to Kona Coffee once it leaves Hawaii, and it may be unrealistic to try to do so. However, the industry can can take steps to assure top quality when the product does leave.

IV.F Blends and Labelling

IV.F.1 Recommendation

This report recommends that the State move cautiously in the area of minimum content standards. Instead, we propose a combination of truth in labelling, certification, and buyer education and promotion as an alternate means of protecting the Kona Coffee industry. Our analysis and reasoning follows.

IV.F.2 Analysis

Blended Kona Coffee is a major issue and point of contention within the Kona Coffee industry. A related problem is counterfeiting, but the underlying problem for both is that a large amount of other coffees is being perceived by consumers and being sold as pure Kona Coffee. Of note, the majority of residents and visitors surveyed believed pure Kona Coffee makes up at least 50 percent of a Kona blend (Table IV-2). This would tend to support the contention of one roaster that his sales were being hurt by labelling his actual content.

The minimum content argument revolves around how much Kona Coffee should be in a blend before it can carry the label "Kona." The two extreme positions are: (1) any Kona blend should have a minimum of fifty percent (or some other level) of Kona; and (2) as long as the product is accepted in the market place (i.e., consumers are satisfied) don't bother with any minimum standards. The costs and benefits of pursuing either proposal varies with the identity and position of the market participant, so it is usually true that once the target market segment of a participant is identified, so is the position that he or she favors.

Supporters of the legislation implicitly assume the reputation of Kona Coffee is being weakened through the sale of low content Kona blends, so requiring a minimum content will strengthen reputation and lead to an increase in demand for Kona Coffee. The basic argument is that consumers of Kona blend are disappointed by its quality and so are "turned off" to Kona Coffee in general. Those who oppose the legislation maintain that the sale of Kona blends has not adversely affected sales and, if anything, has increased the demand for Kona Coffee.

While we strongly believe the quality and reputation of Kona Coffee must be protected, the role of Kona blends relative to quality and reputation, and especially to demand, is not clear. The proper strategy for the industry to follow depends upon at least four factors:

1. The ability of consumers to distinguish (based on their perception of cupping quality) various levels of Kona in the blends and their preferences, based on a willingness to pay, for these levels.

2. The degree to which, if any, the presence of low percentage Kona blends damages the overall image of Kona Coffee and hurts its marketability.

3. The economies of size (efficient plant utilization) in the processing and roasting of Kona Coffee.

4. The relative consumer price elasticities of demand for pure Kona Coffee and blended Kona Coffee.

With respect to these four points, let's review what information is needed to arrive at a rational decision regarding the minimum content, and what some implications could be.

Consumer cupping ability. There is some information on the desirable characteristics of pure Kona Coffee. Many argue that blending is an art to create a particular set of characteristics, and some claim Kona can be duplicated using the proper mix of other coffees. The mix for a particular blend usually changes over time with the availability, cost, and quality variation in the blend components. Further, higher percentage of Kona does not guarantee a better product; it is possible for a 25% Kona blend to be inferior to a 10% blend, depending on the quality of the other coffees. So, setting some minimum level may or may not improve the blend's quality.

It also seems accepted that most Americans are used to and prefer a blend, and some argue that Kona Coffee has the image of a premium blend. Critics point out that Kona is unique, and should not be transformed to imitate a common, everyday beverage.

It is not clear whether consumers are able to discern any differences, positive or negative, from the amount of Kona in a blend. Moreover, we don't know how this would translate into what they would be willing to spend nor the amounts they would wish to purchase. A minimum

Table IV-2. Perceived Percentage of Pure Kona Coffee in Blend, by Respondent Type

respondent	At least 50% n (%)	Mean level of Kona in blend
Oahu Resident	75/107 (70%)	51.4%
U.S. Visitor	567/670 (85%)	55.7%
Japan Visitor	156/222 (70%)	51.1%

Explanation: thus 75 of 107 Oahu residents, or 70% of respondents, believed a Kona blend contains at least 50% Kona Coffee. The mean perceived level of Kona Coffee, over the 107 respondents, is 51.4%

content may raise the price of the product, with no other discernible difference to the consumer! Unless the customer can be convinced otherwise, the laws of supply and demand predict that sales will decline.

Taste panels and focus groups are appropriate methods of obtaining information on the cupping abilities of consumers, and on their preferences. CTAHR is conducting research in this area using these formats. In addition, this may present an opportunity for the industry to educate consumers on what constitutes a "good" cup of Kona Coffee blend - if the industry chooses this direction.

Impact on reputation. Many (but not all) roasters believe there should be some type of control over blend percentages to minimize abuse of the Kona name, although it was unclear on how such legislation would be enforced and even whether they themselves would abide by it. There was wide disagreement on what an appropriate minimum level should be, with suggestions varying from ten percent to over seventy percent. A straw poll found that most roasters considered even as high as a 25-30% blend to be a questionable practice, but that it is nevertheless common for "the other guys" to abuse the Kona name. Nevertheless, all except one roaster implied that their product was below the proposed fifty percent minimum.

This may be primarily a competitive response. Most will agree that blends are more profitable and are often necessary to "stretch" supplies of Kona, especially during short years. Almost all mainland roasters also complained about the high costs of Kona Coffee, including inventory costs, advancement of payments, and small order size. A high minimum content law could exacerbate their problems.

Economies of size. Certain costs such as depreciation, management salaries, and lease rent are fixed over a broad range of production output. The efficient and profitable operation of a processing or a roasting plant depends not only on the price received for output and prices paid for inputs, but also on the ability to operate at close to physical, managerial and marketing capacity. If not, the overhead costs per unit of output become very high. There obviously may be tradeoffs between the number of units produced and the price per unit received. However, it would be foolish to assume Rolls Royce is not operating its plant at close to capacity simply because Rolls Royce receives a high per unit price .

Requiring a higher minimum content in Kona blends than whatever is the current practice would raise the raw materials cost of the blend. This may mean roasters would reduce the number of units produced (see discussion on elasticity) and thus, incur higher per unit overhead costs. It could conceivably lead to some processors and roasters dropping out of the industry if the price received doesn't cover reduced operating efficiencies (but surviving roasters will have increased opportunities). It could also enhance the possibility of other coffees being roasted and sold in Hawaii (notably other Hawaii coffees) in place of Kona blend, if only so roasters can more fully utilize their plants. Whether either scenario is good for the Kona Coffee industry, especially the producers, is questionable. The impact of minimum content standards on economies of scale must be addressed.

Elasticity of demand. With the exception of possible damage to reputation, the selection of the appropriate minimum level of Kona in a blend will hinge on the relative elasticities of demand for blended Kona and pure Kona Coffee. The elasticity of demand, E_d, also called demand elasticity, is a measure of consumers' responsiveness in terms of purchases of a product to changes in the price of that product, *ceteris paribus*. It is usually expressed as a ratio of percentages:

$$E_d = (\text{\% change in quantity purchased}) / (\text{\% change in price}) <1>$$

E_d is almost always characterized as elastic or inelastic. In the case of an inelastic demand, the percent change in quantity purchased is less than the associated percent change in price (i.e. for inelastic demand, $E_d < 1$). In the case of an elastic demand the percent change in quantity purchased is greater than the percent change in price (i.e., for elastic demand, $E_d > 1$).

While not in such vague or overly academic terms, most successful businesses are increasingly aware of demand elasticity. That is, they know what happens to sales volume and revenues (and hence profits) if the price of their product is either raised or lowered. While it is generally true that less product is sold if price is raised (and vice versa), whether total revenue also decreases is another matter. Recalling that total revenue equals the quantity sold times its per unit price (TR = P X Q), the elasticity of demand predicts the relationships between a price change and its effects on quantity sold and total revenue.

With an inelastic demand, total revenue increases when price is increased. Although charging a higher price will reduce the number of units sold (law of demand), the price gain is high enough to offset the loss in numbers sold. If price decreases, revenues will decrease.

With an elastic demand just the opposite is true. Total revenue is decreased (increased) if price is increased (decreased). The increase in price is not enough to offset the decrease in units sold.

With a demand elasticity of 1, total revenues are unaffected by changes in product price. (However, $E_d = 1$ is a hypothetical case that is rarely observed).

In a simple example with Kona Coffee, suppose blends and pure are separable products, and suppose minimum content legislation is used to force an increase in the amount of Kona Coffee used in a blend, with the intent of helping the Kona Coffee "industry" (however industry is defined). The cost of the blend will increase, because Kona Coffee is more expensive than the other blend components. What happens if roasters pass this cost increase on to consumers? This sets of a chain of events. Because price is increased, we expect that less blend will be sold. If the demand for Kona blend is elastic, the increase in price will not compensate for the loss of sales volume, so total revenues from blend sales will decrease.

If this means less Kona is used for blends, then the excess must be sold on the pure market. To move this extra, the price will have to decrease, but if demand is inelastic the revenues from pure sales will also decrease! If the hypothetical demand elasticities are correct, then what is necessary to increase revenues is to increase sales in the blend market, just the opposite effect of the proposed minimum content!<2>

The analysis to this point shows what happens on the roaster level. What are the impacts on growers? In the short run, especially over a harvest season, the supply of Kona Coffee is essentially fixed. That is, the amount of coffee is set (growers might harvest less, but cannot produce any more), so grower earnings are determined by the price received. In the scenario above, it is likely that roasters and processors will pass the lower price needed to move pure Kona Coffee back to the grower, resulting in lower grower revenues. Again, the effect is the opposite of the legislation's intent.

But what if the elasticities were reversed? Or what if both demand curves are elastic (or inelastic) but to a different degree? We can gain intuitive insights toward answering such questions by considering two major factors that determine the demand elasticity for coffee: (1) the importance of Kona Coffee in the buyer's budget, and (2) the availability of good substitutes for Kona Coffee.

First, if expenditures on a product make up a small portion of the buyer's total income or wealth, we expect that demand would be more inelastic than for a product which takes up a larger share of the budget because the amount of money affected by a change in price is relatively insignificant. Second, with many good substitutes, buyers are able to easily switch between products when prices change. Such a product will tend to have a more elastic demand than another product which has few substitutes.

Salt is a commodity that illustrates both factors<3>. A dash or two of salt costs less than a penny, and one package lasts a long time. Thus, expenditures on salt are a very small part of consumer budgets. Further, salt has only a few good substitutes. Even if salt prices were to double or triple, we would not be sprinkling sugar on french fries. If prices were to fall away to almost nothing, we would not give up pepper and instead pour more salt onto our scrambled eggs. Overall, buyers are relatively insensitive to any change in the price of salt; demand is very inelastic.

This example provides further insights. Suppose an executive at Morton's Salt Company is inspired by this analysis to double the price of their product. If this scheme were carried out, Morton is likely to lose a lot of its customers because there are other sources -- i.e., substitutes -- for Morton salt. The demand faced by a firm is usually more elastic than the demand for the industry. As a sidenote, this observation is a major driving force behind product differentiation via branding, packaging, advertising, and other activities. A differentiated product is perceived as being different from its competitors, so it effectively has few substitutes.

In considering these factors, it quickly becomes apparent that the relevant level of inspection is not the broad "Kona Coffee market" but instead the individual market segments. For instance, we would expect demand at four-star restaurants to differ from demand in supermarkets. The restaurant would be part of a small elite group, patrons are likely to be more affluent and pure Kona Coffee may be the only coffee served, while supermarkets shoppers have shelves of coffees and probably several supermarket chains to choose from. For tourists, substitution is not only between different brands of Kona Coffee, but also with any other product that could serve as a gift or souvenir. In this tourist market segment, we expect a price increase will result in sales shifting to items such as chocolate-covered macadamia nuts, shell leis, or Aloha wear.

There are other issues relating to a regulatory or legislative approach such as proposed with a minimum content standard. A major one is whether government should support one group at the expense of another. Others relate to monitoring and enforcement, the applicability of laws to out-of-state roasters and markets, the ability and cost to evaluate the blend level to check for compliance, whether a government-run program will be too bureaucratic, who is liable (should there be government subsidy) if buyers decide to abandon the regulated product in favor of a cheaper import, and the question of who would pay for any such program.

The relevant demand elasticities would be of great assistance in resolving the minimum content issue. Unfortunately, this information is not available, and obtaining such information is a costly, time-consuming, and often impossible task. There are at least three alternatives. One is to do nothing. The second is to go ahead with the minimum content standard anyway, and hope things work out or that any damage is reversible. We cannot blindly condone an effort that could severely backfire, and which may be advocating one segment of the industry to the detriment of another.

The third is to take a modified approach somewhere between both extremes. This report recommends using "truth in labelling" together with promotional backup and a certification program for pure Kona Coffee. With truth in labelling, blends must be clearly labelled as such, and roasters will be required to specify the percentage of Kona Coffee. Many of the benefits attributed to minimum content standards would be achieved by truth in labelling. There should be less problems than with minimum content, because the market mechanism will decide many of the issues, including how much Kona should be in a Kona blend<4>.

Truth in labelling might even be instituted in a voluntary form, using the rationale in Chapter V for certification. That is, customers can be educated to question blends that do not list the content. Roasters will have an incentive to behave ethically, so products will be represented accurately. Consumers in the different segments will be able to effectively dictate what blends they want, and what prices they are willing to pay.

IV.F.3 Conclusions

Our recommendation is that the State move cautiously and slowly in the area of minimum content standards. Rightly or wrongly, it is clear that some Kona Coffee handlers will benefit from minimum content legislation, and given the current situation, probably at the expense of others. Beyond that, the impacts and objectives of such legislation are very uncertain. There are several serious questions that our research does not and cannot fully address.

As stated earlier, when necessary this report is written from the perspective of the well-being of the coffee producer. It is unclear whether minimum content standards would result in higher prices and revenues to producers. The assumption that prices at the farm level would increase can only be justified under certain conditions. Based on the on the limited information available, it is impossible to determine the "optimum" level for minimum content standards. The information can neither support nor refute minimum content legislation.

The desired industry-wide results attributed to minimum contend standards could be obtained using truth in labelling augmented by certification and education/promotion. This will promote free and honest competition by allowing the consumer to make an informed choice.

Chapter IV.F Footnotes

<1> E_d is generally a negative number since price and quantity purchased usually have an inverse relationship, i.e., as price increases (decreases), the quantity purchased decreases (increases). To avoid complication, demand elasticity is usually referred to as a positive (absolute) value.

<2> A variation of this occurs in the orange industry, where fresh oranges are the higher priced product and orange juice is the equivalent of the blend. Much of a season's production is often sent to the processing market, or destroyed in the field, to limit supplies of fresh oranges and hence, raise prices and revenues.

<3> Adapted from Paul Heyne, The Economic Way of Thinking (4th edition), Science Research Associates, Inc., 1983. pp. 27-31.

<4> As to the argument of undue hardship because roasters would need several labels to account for a percentage that is continually changing, truth in labelling could allow for lettering along the lines of "contains at least X percent pure Kona Coffee," or only different stickers with the various percentages could be used. The latter will also allow existing stock to be utilized.

V. CONCLUSIONS AND RECOMMENDATIONS

V.A Conclusions

The Kona Coffee industry is not dealing with a single, homogeneous market. Instead, Kona Coffee involves several market segments according to the product form, target consumer, and market channel by which the product reaches the consumer. These market segments are different because of the factors that affect buyers' purchases and subsequently, the focus of any marketing efforts. The fact that there are several market segments, and that different firms target different segments, makes it very difficult to develop industry-wide recommendations that help, or at least don't hurt, all industry participants.

It is not the intent of this report's recommendations to neglect any market segment. In most cases, a strong argument can be made that improvements in one market segment has positive spillover effects on other market segments. As an example, promoting Kona Coffee in restaurants should increase sales in gift shops. Yet, given the scarce resources available to the industry, it will be unwise to apply efforts equally across all market segments. The Kona Coffee industry will be facing difficult choices.

This study identified various marketing issues that revolve around three product and industry characteristics: high quality, good reputation, and appealing image (romance, mystique, and allure). Although treated separately in the analyses, these characteristics are strongly interrelated. Quality is the cornerstone. It must be re-emphasized that top quality starts at the producer and can only be maintained, not enhanced by each step to the final consumer. The reputation of Kona Coffee is largely based on the quality of the product, but reputation is also magnified by Kona Coffee's image. To come full circle, the image of Kona Coffee is enhanced by the product's quality--Kona Coffee is at least a class above the more common tourist trinkets such as plastic hula skirts, beach mats, and Hawaii key chains.

All three characteristics are necessary conditions that must be maintained and improved for a viable, long-term Kona Coffee industry. To do this, the long-term recommendation is for ongoing education, information, and promotional programs. If successful, many of the market-oriented issues in Table IV-1 will be addressed by providing high quality, good reputation, and appealing image. However, there are three problems that can have an immediate negative impact on these characteristics and in doing so, that pose a threat to the long-term well being of the industry. These are counterfeit Kona Coffee, inconsistent supply, and a lack of industry cohesion.

First, counterfeiting--the use of "Kona-style" and "Kona-like" coffee--must be minimized and eliminated. The industry is not only being hurt by lost sales right now, but the impact on image, reputation, and quality will cause serious long-term, perhaps irreversible damage. We recommend certification of pure Kona Coffee backed up by an education and information program.

The second problem of inconsistent supply as a result of fluctuations in yields would be less of an issue by itself, except for the high cost of carrying Kona Coffee in inventories. This problem involves both fluctuations between years, and fluctuation within a year. The suggested inventory or stock control program is a possible solution.

Finally, a problem that affects the following recommendations and any other industry-wide programs is the lack of industry cohesion, especially as relates to implementation and cost. The dimensions and extent of this problem are aptly demonstrated by the industry's experience with their Kona Coffee Council. An organization such as the KCC will greatly facilitate any type of industry-wide activity. In some instances the industry organization is necessary. This report contends that an underlying cause of industry divisiveness is the different Kona Coffee market segments. We hope this understanding will encourage the re-establishment of some type of active industry organization.

Many of the issues confronting the Kona Coffee industry can be traced or distilled to concerns with quality, reputation, and image. Other issues are different perceptions arising because different individuals service different market segments. The major issue in this regard is Kona blend. The analysis in Chapter IV did not conclusively show that a Kona blend is either good or bad for the entire industry. There are serious questions that our research does not and cannot fully address. Given our current state of knowledge, we believe the industry as a whole should not have minimum content standards at this time. Instead, the desired industry-wide results attributed to minimum content standards could be obtained via truth in labelling augmented by certification and, on an industry or firm by firm basis, with education and promotion.

The remainder of this report offers some broad, market-oriented recommendations by which the entire Kona Coffee industry can improve its profitability. The coffee marketing programs of Jamaica and Colombia are first outlined. These programs provide a wealth of background information for industry programs.

Our long-term recommendation for improved profitability in the Kona Coffee industry involves information, education, and promotional programs directed at all marketing levels from the grower to the final consumer. More immediately, certification is a viable program to supplement and enhance information, education, and promotion. A second recommendation that can be initiated is an inventory or stock control program as a marketing-oriented approach to easing supply fluctuations. Finally, any attempt at reaching the industry's potential, and almost certainly the most effective and efficient means for doing so, will require cohesive group action on the part of the Kona Coffee industry members. Therefore, our last recommendation is for some type of industry-wide organization.

V.B Jamaica and Colombia's Programs

Jamaica and Colombia provide examples of programs aimed at protecting and promoting their coffees. In these programs, the roles of grading and certification, as well as of government, promotion, and financing provide strong insights into possible action by Kona's industry.

Jamaica.<1> In the 1920s and Thirties, Jamaica had a large coffee export industry but with poor quality control. The industry almost collapsed until the coffee industry board and certification program was started in the Fifties. Today, Jamaica Blue Mountain (JBM) coffee is the premier coffee in terms of reputation, quality, and price. JBM can command a retail price of $24 per pound (1987), when and if it is available. Such prices combined with a limited supply (only about one million pounds of green JBM is produced annually, with three-fourths being shipped to Japan) are a powerful incentive for activities such as counterfeiting and cutting or diluting the product and selling it as pure JBM.

To demand its price and be able to hold it, Jamaica has taken a number of steps to maintain quality and assure a 100%, pure product. Only coffee grown in certain areas and above a given elevation (2500 feet) can be called "Blue Mountain". Other grades are High Mountain and Prime Wash. The government has grower education programs and a nursery, and government farms produce 25 percent of the crop. All JBM production is purchased by the Jamaica Coffee Industry Board (a government body) which checks quality, grades, and sets price. Any product not suitable for export can be processed for the domestic market. The board has returned to shipping green JBM after an abortive attempt to protect quality by shipping only roasted JBM, since it is harder to tamper with roasted coffee.

Specialty roasters are the preferred customers. If sold to brokers, the buyer must disclose its customers. Only certain cooperatives can export JBM, and only after the buyer has been approved by the board. Further, the board has the authority to take and test samples.

Jamaica prohibits the importation of green coffee except for use in domestic instant coffee, and JBM blend is "discouraged" in Jamaica. Although a High Mountain blend exists, there is no authentic JBM blend in the U.S. (although it is not clear whether this is by mandate, because it is counter to the 100 percent image of JBM, because of implicit loss of ability to purchase JBM, or because of impossibility of proving content in a blend).

Jamaica started exporting JBM in a distinctive wooden barrel in the late Fifties or early Sixties. A consumer and trade education program is planned. Consumers are warned to be suspicious of underpriced JBM, since Jamaica prices green JBM at $9 to $10 per pound. The trade education emphasizes that JBM is only exported in a wooden barrel, with a seal by the coffee board and ICO certification. A buyer will be able to ask for both the seal and certificate. Jamaica is actively fighting resales from Japan, including warnings that the seal and certificate are not applicable except to direct purchases.

Initially, the program was fully funded by the government. Assessments were started in the 1970's. Roasters and exporters now pay about a penny per pound (3-4 cents Jamaican) to help defray costs, but the program is not self-financing. Thus, much of the program is government subsidized. Since 1977, the British Commonweath, Japan, and the European Economic Community have been aggressively solicited for loans to be used in expanding the industry.

Colombia.<2> The marketing program for Colombian coffee is administered by the Federacion National de Cafeteros de Colombia (National Federation of Coffee Growers of Colombia). The goal of the Federation is to improve the standard of living of coffee growers by providing an acceptable economic return to growing coffee and by avoiding drastic fluctuations in purchasing power. Activities include production research; grower education, health care, housing, and sanitation; market promotion; and grower financing. The Federation generally facilitates the marketing of coffee, and is a direct seller in some European countries.

Product quality and consistency are critical to the success of the program and ultimately, for the overall welfare of producers. There must be sufficient volumes to meet increased demand--it is costly to advertise a product that is not available. The Federation therefore supports research and development, and promotes the application of modern technology to coffee production. It also operates a freeze-drying facility, and has a participatory role in the Grancolombiana Shipping Company, the Coffee Bank, and in warehousing and insurance.

Colombia's program is centered around the twenty-five year old "Juan Valdez" logo and "100% pure Colombian coffee." Colombia's strategy is partly based on consumer awareness of the logo. According to the Federation, Juan Valdez has been very effective in developing consumer demand for Colombian coffee, mainly by getting existing drinkers to switch from other coffees.

Together with this "pull", the strategy called for Colombian coffee to be pushed into the market channels. U.S. roasters were hesitant to join the program due to the investment made in developing blends and in branding products, so strong incentives were offered to handle 100% Colombian coffee. Incentives included a rebate program as well as help in advertising. These have reportedly developed a vested interest on the part of roasters to continue buying Columbian coffee and to abide by the program's rules.

In the current program, the Federation runs a multimedia campaign featuring Juan Valdez, augmented by promotional materials such as shelf strips saying 100% Colombian. Columbian coffee can only be purchased by entering into contracts with the Federation, and according to certain quotas. Packaging must say 100% Columbian, but roasters can piggyback on the extensive media campaign by using the Juan Valdez logo in their advertising.

Monitoring and enforcement are crucial for maintaining credibility. The burden of monitoring rests on the buyers, who must provide reports audited and certified by a CPA. These reports also are the basis for the rebate program, so there is a financial incentive for timeliness and accuracy.

Enforcement also relies on blind tasting of retail packages to test for fraudulent use of either the logo or "100% Colombian." These are conducted on both a random basis, and according to tips from the industry. Colombian coffee costs more than most commercial coffees. Because competition is often on the basis of price, any "100% Colombian" product that sells below certain price levels is immediately suspect.

Since the logo is trademarked, legal recourse is available to the Federation. Prosecuting a few cases takes care of most problems: in Colombia's case prosecution has resulted in an estimated 80% reduction of fraudulent use.

The program currently costs $20 million per year ($80 million over the past five years) just for advertising. The industry self-finances its programs with taxes on products assessed on growers and paid by exporters. For Colombia, the volume of coffee is substantial, so program is cost effective.

As a crude measure of the program's effectiveness, consider the prices received. Table V-1 lists selected F.A.S. (source country) prices for green coffee entering the United States. In the six years of data, Colombian coffee had a price premium of at least six cents per pound and up to 22 cents per pound over the world average. In 1986, the premium translates to an additional $76.5 million over what would have been received if Colombia's exports to the United States were priced at the world average. In this sense, the Federation has achieved above average returns for growers.

However, the effectiveness is less certain when Brazil is considered. As the world's largest producer, Brazil also received a price premium over the average. It can be argued that the difference between Colombia and Brazil is due to quality (i.e., type of coffee and processing) rather than a successful program.

Chapter V.B Footnotes

<1> Much of the information presented is from a personal interview with Mr. Derryck Cox, Jamaica Trade Commissioner, supplemented by data obtained from other sources.

<2> The information presented is from a personal interview with Mr. Dario Rodrigues of the National Federation of Coffee Growers of Colombia, supplemented with information published by the Federation.

Table V-1. Prices Received for Green Coffee

year	world average	Colombia	difference	Brazil
1981	$1.19	$1.37	$0.18	$1.56
1982	1.18	1.40	.22	1.25
1983	1.19	1.29	.10	1.23
1984	1.30	1.36	.06	1.31
1985	1.26	1.35	.09	1.22
1986	1.66	1.88	.22	1.72

V.C Information, Education, and Promotional Activities

"Promotion" involves general activities for the entire industry as well as activities targeting specific market segments. Promotion includes not only the more familiar persuasive element, but information and educational components as well. The distinction being made between the three components is largely a matter of degree, but understanding the difference is crucial because (1) it is usually easier (and less costly) to keep an existing customer than it is to create a new one, but (2) keeping a customer requires sustained effort and outlays<1>.

Persuasion includes the advertising and related activities aimed atincreasing sales. Results are often immediate, but results may also be short-lived. Information and education seek to pass on knowledge that may increase or extend the value of a product. There may or may not be an immediate impact on sales, but results are usually longer-lasting. Further, informational activities are more passive while education requires more active participation on the part of the audience. With respect to the certification program discussed in section V.D, there is a subtle but important difference between a buyer merely reading a list of certified sellers, and knowing the implications of being or not being on that list. The difference could mean the success or failure of the program.

Promotional activities, as defined to include education and information, provide excellent opportunities for enhancing the long-term profitability and success of the Kona Coffee industry. Promotion will enhance certification and inventory control. However, successful implementation on an industry-wide basis may hinge on a cohesive industry organization.

Footnotes

<1> It should also be recognized that promotion usually entails a threshold effect. That is, a certain minimal level of promotion must be conducted before there is any impact. In some cases the dollars necessary to reach this threshold level may be prohibitive. Two typical examples are magazine and television advertising. Thus, the potential impacts of promoting Kona coffee via any one activity should be evaluated in light of not only that activity's merits, but also that money's use in some other activity.

V.C.1 Promotional Opportunities

Promotional programs can capitalize on a number of factors. One group of programs centers around the product's quality, reputation, and image. Kona Coffee is a recognized high quality product. It is American, and is grown in a place with romance and allure. As an export, it can aid the trade imbalance. One industry suggestion is the slogan "American coffee for the American meal."

A second group relates to the tourists that come to Hawaii. Visitors to Hawaii need be recognized not only because of their direct and considerable purchases of Kona Coffee, but because of the longer-term, indirect benefits they could provide to the Kona Coffee industry. We in effect have a "captive audience" that continuously turns over, with many opportunities for free or low cost promotion (especially compared to taking the message to visitors' hometowns). Each visitor that becomes a loyal customer in Hawaii is one less client that needs to be sold in less conducive conditions, and a satisfied customer often sells his or her friends. Further, most visitors purchase souvenirs and gifts, so any items that convey the message of Kona Coffee would effectively be free advertising.

Interisland and trans-Pacific flights provide excellent opportunities, as in subsidized 100% Kona being served to first class passengers or being included in complementary goody bags. Hotels may have displays of local attractions, and some have gifts for their guests. Kona Coffee could have a prominent role in both. Restaurants provide ideal opportunities for visitors (and residents) to be exposed to and to try a new food product. Japanese-owned local hotels may provide a great opportunity to gain an entry into selling coffee in Japan.

Tourist-related attractions and events also provide unique opportunities. Attractions such as the Kona Coffee Museum and Maui Tropical Plantations provide an atmosphere conducive to promotion. The Kona Coffee Festival is generally perceived as a positive event for the industry. Among others, the festival provides opportunities for tie-ins with tour packages and media exposure. Other events such as the annual Ironman Triathalon and the gamefishing tournaments attract as much or more people to Kona. Events on other islands or even out of state could also be utilized, as in the Hawaiian Open or Kapalua Open golf tournaments or the Aloha Week, Kamehameha Day, or Rose Bowl parades. These are further discussed under specific promotional activities.

V.C.2 Promotional Activities

Table V-2 lists a number of possible promotional activities for the Kona Coffee industry. This list is not comprehensive, nor presented with the idea that all activities should be pursued. Its intent is to demonstrate the range of possible activities, many of which have already been used to some degree within the industry. Individual firms may wish to pursue these activities independently. On an industry-wide basis, different programs should be targeted at different marketing levels. The foundation of Kona Coffee's quality are growers; educational programs need to be directed at this level to produce top quality. The industry must then target processors, roasters, other handlers, and finally consumers to maintain that quality. The following discusses some of the items listed in the table.

Table V-2. Possible Promotional Activities for the Kona Coffee Industry

* packaging
* point-of-purchase/point-of-sale materials and displays
* Coupons, price discounts
* In-store demonstrations and sampling
* Mass media

* generic advertising
* cooperative advertising
* Golden Cup program
* joint promotion of complimentary products

* newsletter
* trade magazines
* tourist pubs
* other publications, literature

* Kona Coffee Festival
* tourist events
* tourist attractions
* Secondary market gifts and souvenirs

* Grower/processor education
* Trade shows and booths
* specialty outlet incentives

Standard Promotional Activities. Some of the more familiar promotional efforts deal with advertisements in the mass media such as television, radio, newspapers, magazines, or billboards. These typically can be quite expensive, and there is often a threshold effect for especially television and radio, where an ad needs to be run for a number of times before the message is passed to the target audience.

Generic advertising, where industry members pool their resources to advertise Kona Coffee as a whole, is one option for meeting expenses. Others are cooperative advertising with some of the broader spectrum promotional campaigns (i.e., Island Fresh, Made in Hawaii With Aloha, Hawaii Food Manufacturers), or with retailers and restauranteurs. For restaurants, a "Golden Cup" program could be tied to a certification program, with associated promotional opportunities. Another possibility is joint promotion with complementary products such as pure Hawaii cane sugar or Hawaii fresh milk. In the last case, there are already gift packs combining Kona Coffee with other items. While this is mainly targeted at the tourist market, other opportunities are available. Again, activities will vary with different market segments.

Coupons or similar price discounts are often used in printed media, and ad campaigns may include sales. However, these should be used cautiously depending on intent and because of possible impacts on image and reputation. For example, customers may question a high-quality item that is being discounted, or a sale price that is run often enough may be perceived as the actual price. Questionable and often illegal tactics such as bait-and-switch, mislabelling, or "running out of stock" of a sale item hurts not only the firm's integrity, but the overall Kona Coffee industry's reputation as well.

Attractive packaging and displays often can sell a product by themselves. A clear wrap can highlight certain characteristics such as the appearance of the whole bean. Other attributes such as color or graphic design are used to convey a certain image. Container size and type (can vs. bag) can be a factor not only because of serving/storage considerations, but because associated cost and ease of packing can affect the purchase decision of especially visitors. While innovations like the valve bag might improve product quality, this may be lost on consumers in certain market segments, especially if they are uninformed.

In-store displays play a prominent role. Shelf-space and location (e.g., end of aisle, eye level) have long been a major determinant of success in supermarket retailing, and probably work similarly in other retail outlets. Clear bulk bins and self-service grinders seem to have been very successful in retailing coffee. Point-of-purchase or point-of-sale materials include literature, videos, merchandising kits, and shelf promotions. In-store demonstrations and taste sampling have been successful in at least temporarily increasing sales.

Publications. A newsletter or similar periodical is a useful promotional device. It serves to maintain communications within the industry. Industry members can be notified of new developments as they occur, including general information for each season such as the crop outlook or market statistics. Either a separate newsletter for the targeted groups, or specific sections or issues could be a cost-effective means of educating and informing specific groups such as growers, brokers, roasters, or retailers. Features could include refresher material gleaned from other sources (e.g., hints on brewing great Kona Coffee, the recommended timing and application rates of fertilizer), a column responding to client concerns, or a forum for debating industry issues.

For out-of-state readers, a newsletter is especially important in providing timely information directly from the source, versus via hearsay or a biased source. This will eliminate much of the misperceptions and false rumors that periodically seem to surface. To the extent that expectations are important in purchasing decisions, a newsletter is also a potent tool for setting expectations and guiding perceptions. It helps to justify prices, and can be useful for advertising.

Some connection to existing publications, such as contributed columns or articles into trade magazines and association newsletters, can be invaluable. These may be lower cost alternatives to paid advertisements, and are integral parts of certain programs such as certification. The concept could be expanded to newspapers and general circulation magazines, as well as tourist-oriented publications in the "Things to do/Places to see" genre. This would include material for hotel lobby and visitor information booths, hotel guest information packets, and car rental brochures.

In general, clients also appreciate written information such as the "Kona Coffee Guide" produced by the Kona Coffee Council. This is both for their information, and for their clientele. Existing materials include fliers and leaflets (often in conjunction with sales displays), table tents in restaurants, and merchandise tags physically attached to the product.

Kona Coffee Festival. The previous discussion on tourism related opportunities listed several events that the Kona Coffee Industry might target as promotional opportunities. While mentioned in the context of visitors, such events are also valuable for residents and out-of-state audiences. The Kona Coffee Festival (KCF) in particular provides an annual focal point for the industry.

If nothing else, these events provide opportunities for free media exposure because of the coverage by local and national press. Although this exposure is more informational in nature, it would be useful for building awareness in the general population and in maintaining/renewing existing clients.

The Kona Coffee Festival is an opportunity for tie-ins with tour packages, similar to seeing the Mardi Gras in New Orleans. A variation of this concept is what was done with the Specialty Coffee Association of America (SCAA). That is, regional or national organizations of especially the coffee industry could be persuaded to time their conventions to coincide with the Festival.

Two related problems cited are that most persons know very little about coffee production areas, and that sales staff don't know about Kona Coffee. Thus, another program that could be tied into the Festival is an educational tour of production and processing, as is done by the Kenya coffee industry. Allowing the customer to see the process fosters trust in the industry and reinforces honesty. A trip to Hawaii to participate in the Festival might be part of an incentives or awards program for shops and sales personnel to push Kona Coffee.

Other Tourist Opportunities. Besides visitor events, other promotional opportunities include visitor attractions and a "secondary market" for Kona Coffee related items. Attractions such as the visitor plantations and botanical gardens have been mentioned. It is important that displays be well-designed and well-maintained to project a positive image of Kona Coffee. Such attractions are often conducive for product sampling or for distributing certain types of literature.

Some firms are at least peripherally involved in what is called the secondary market for Kona Coffee related items. These are broadly defined as items depicting Kona Coffee in words or pictures. Products include traditional visitor souvenirs such as T-shirts, caps, sun visors, calendars, and key chains as well as items more closely associated with coffee. Examples are coffee mugs, coffee grinding or brewing paraphenalia, posters (perhaps printed on burlap), bumper stickers, buttons, coffee picking baskets, and even the coffee bags themselves.

There are several reasons for being involved in the secondary market. Perhaps the most obvious is the immediate revenue potential: a sale can still be made even if the visitor or resident is not interested in the coffee itself. More importantly, the item is being used for promotional purposes. A coffee drinker remembers Kona Coffee each time he or she uses the Kona Coffee mug. An attractive picture for the month of December reminds the shopper that Kona Coffee makes an excellent Christmas gift. Houseguests or office visitors inquire about the distinctive, perhaps koa framed poster. In this light, it is important that the item reflects high quality, good reputation, and an appealing image. The concept is readily carried over to other target audiences such as coffee brokers or specialty outlet owners and employees.

While the potential to individual firms are obvious, an industry-wide effort will provide certain benefits. For example, these products would be useful reminders of a certificate program. Materials might use a standard logo with provisions for individual members to add their firm name. An industry organization should possess economies of scale in ordering certain items that could be passed on to members. Provisions can be made to be a revenue generating source for the industry organization.

Grower/Processor Education. The inherent quality of a coffee bean is at its peak when that bean is harvested. Growers are therefore essential in producing that quality, as are subsequent handlers in maintaining the quality level. Education of industry participants is an ongoing activity, either to keep members up to date on latest developments or to refresh past knowledge. A newsletter has been discussed earlier. Activities that have been used in the past include field days, demonstration farms, tours of showcase operations, field representatives, and problem hotlines. With regards to other Kona Coffee handlers, trade shows and booths are often used as opportunities to inform and promote, as well as gain sales. Activities that are highly complementary to education are a strong tie to research and the ability to keep abreast of developments in other areas.

V.D Certification Program

A recommendation that can be implemented in the near future is a certification program, where the buyer is assured that he or she is receiving pure Kona Coffee, e.g. via a "seal of approval" and certificate of authenticity. There is recent precedent for this activity, in that the Kona Coffee Council had initiated a seal of approval program in 1988. However, the status and future of the program is unknown at this time.

Participation in the recommended certification program could be voluntary, but the implication of being a non-participant is that there is something wrong with the non-certified product. Promotional activities will play a strong role especially in informing and educating the industry's clientele, and also as a powerful tool for compliance with the terms of the certification program. Since most industry members had expressed a willingness to be ethical, we envision that this program will encourage ethical behavior as a marketing advantage.

A seal of approval has several precedents, including Jamaica Blue Mountain Coffee, Colombia coffee (where buyers pay for privilege of using the Juan Valdez logo), Florida orange juice which has two seals, one for 100% Florida juice and one for product that meets Florida's specifications, and the Good Housekeeping and Underwriters Laboratories seals. The following discussion outlines possible procedures; the existing programs can provide examples of other activities.

The certification program would involve several levels from processors to buyers to roasters and retailers. The process, as well as monitoring and enforcement, begins at the processing level. Green Kona Coffee is already graded and can be cupped. Either all bags, or once a processor passes a probationary period, random samples, are to be tested for lot certification. Dated certificates are issued per unit (e.g. bag or half-bag of coffee) and paid for via assessment. To get and maintain "certified processor" status, the processor must submit records of purchase, processing, and sales (including buyer and quantity). The program could require that these records be verified by a CPA, and/or be subject to an independent audit. A list of certified processors is distributed to buyers and could be used in promotions, as in trade magazines.

At the retail level, a "Golden Cup Award" and membership into the elite club of awardees could be used to both publicize the certification program and recognize restaurants and similar outlets for serving excellent, certified Kona Coffee. Incentives for firms to participate can be similar to those involved in obtaining a four or five-star rating, and also would include the associated free publicity and perhaps assistance in reprinting menus for participants and awardees.

The certificate is administratively or physically attached to the coffee bag and passed on to the green coffee buyer. For a roaster to obtain and maintain certified status, he or she must submit records of purchases, processing, and sales together with certificates. Certified roasters would then be able to apply the seal to their final product. A fee may be involved, if only for the certification stamp and number of seals used. A list of certified roasters will be distributed or available for distribution to retailers and possibly final consumers. As an added incentive, this list of certified dealers can also be used in promotional material. Once educated, retailers and consumers would know that this seal signifies real Kona Coffee.

Assuming a technical test is available, there could be random testing of products at all levels, with decertification and a widely publicized notice of deletion from the list as minimum penalties. The negative publicity from being decertified should be used as a strong deterrent against non-compliance. To be most effective, participants should be fully aware of these penalties before they sign up. Finally, legal prosecution may also be an option.

As stated above, an integral part of the certification is an information and educational program explaining what it is and why it is done. However, this certification program does not preclude other promotional programs either on an industry wide or individual firm basis. Fees will make for a self-supporting, perhaps income generating program, and records will provide necessary information for future marketing efforts.

The certification program is more easily applied to the pure product, and reporting must include what goes into blends to minimize fraudulent use. It might be adapted for blends via a separate seal certifying that "this product contains Kona Coffee as one of its ingredients in the proportion listed", together with truth in labelling.

Some entity must administer the certification program. The State is one candidate (as is done for Jamaica and Colombia), but is suggested only as a last resort. A market order is also possible, but implies mandatory rather than voluntary participation. The costs involved with either alternative are formidable. A private management/administrative firm is a third alternative, but the desirable and recommended option is an industry organization. This is most likely to involve the level of detail and commitment necessary for a successful program. An industry organization can also foster an air of authority and objectivity vis-a-vis a private firm.

V.E. Inventory or Stock Control Programs

The inconsistent supply of Kona Coffee, resulting from fluctuations in yields and aggravated by the high cost of carrying Kona Coffee in inventory, is having a strong negative effect on the reputation of the industry and on prices received. Much of the problem can be traced to production issues.

An approach with a marketing orientation seeks to ease supply fluctuations between years and within a year via some type of inventory control or stockpiling program. The aim of this program is to stabilize the physical flow of coffee and ease the cash flow requirements of individual firms.

Inventory/stock control would operate around the general theme of having pooled operations with or without a centralized facility. The general idea is for processors to put their harvest into one pot, and for the crop to be doled out as needed, with price adjustments for storage costs. Since control is exerted over a larger supply, Kona Coffee can be sold at either a minimum price (excess supplies to be carried over to the next season) or in a short season, at prices dictated by consumer demand with excess returns being distributed back to the industry. The minimum price ensures price stability to processors and ultimately growers. Pooling harvests can also even out price and supply uncertainties over the harvest season.

At one extreme, processors could sell their product to an organization with a sales force and a warehouse specially adapted for coffee storage. Processors would benefit because this would free funds and facilities currently used for storage, free resources used for sales and collection, guarantee a set price, and provide quicker payment. Growers should benefit commensurately. Buyers benefit via resources freed from searching out and carrying an inventory of Kona Coffee, and in general, from a more reliable supply. Further, the holding firm offers the industry advantages from specialization and economies of scale not only in storage, but possibly in transportation, bookkeeping, and many of the activities that would be associated with a certification program.

At the other extreme, the organization might only act as an information broker that brings buyers and sellers together. This arrangement offers less benefits to all participants, so would be less likely to succeed.

As for the certification program, some industry organization is the preferable means of implementation. An additional organizational form to be considered is the cooperative.

The inventory/stock control program could be government subsidized, e.g. in construction of a facility or in low interest operation loans. However, it should be financially self-sufficient for long-term success. Thus, a program may include the use of speculators to carry inventory costs and assume market risks.

V.F Industry Organization

Most observers will agree that Kona Coffee is a very fragmented industry. Organizational attempts in the Kona Coffee industry has a long a colorful history. The Kona Coffee Association (KCA) received nearly $700 thousand from the State (matched by Superior Coffee and Tea) over an eight year period starting in 1970. However, the KCA expired with its charter in 1978. The Kona Coffee council was organized in the early to mid-Eighties, but was steadily weakening throughout 1988. Interest has also been periodically expressed in a Federal or State market order. The duration and success of such efforts are varied and, in the words of one observer, "seem to be inversely related to the price level of the product."

This report presents several recommendations that could conceivably be put into operation by individual firms. Since the industry is made up of these firms, it could further be argued that such actions will benefit the industry.

However, we contend that any attempt at reaching the Kona Coffee industry's potential is more likely to succeed with cohesive group action on the part of the industry members. The most effective and efficient means of implementing the recommendations will require some type of industry-wide organization. This organization could be very formalized and rigid, as in a Federal or State market order, or it could exist in a less structured form.

The advantages of cohesive action relate mostly to the benefits of a large group, and to certain economies to be gained from group versus individual action. There are at least four advantages.

(1) Coordinated activities will eliminate duplicated effort and wasted resources. Instead of fighting each other, industry members could better focus their energies and resources. For example, advertising expenditures by competing firms to capture larger shares of an existing market might be better spent in trying to enlarge the overall market.

(2) Certain programs require a critical mass to have any impact. Using our recommendations as an example, certification by an individual firm is more likely to be perceived as a gimmick, than if the entire industry were to certify its product. As another example, most individual firms do not have the resources to develop and implement a grower or consumer education program.

Related to this are what economists call "spillover effects" and "free riders," which refer to the tendency to not pay for receiving certain benefits if someone else will do so. A dollar spent on any activity should lead to more than a dollar's increase in benefits. However, any one firm may be unwilling to foot the entire bill if its competitors stand to reap much of the benefits for free. If all firms (i.e., via the industry organization) agree to pay a proportionate share, then the industry as a whole stands to benefit.

(3) Compared to an individual firm, an industry organization would be best able to coordinate the various activities that could take place. Consider, for example, the case when promotional efforts are not matched to

production capability. That is, what if a strong demand is created without sufficient supply?

The macadamia nut industry faced this situation when a certain firm's marketing program was, in retrospect, too successful. Supply was short, so retail shelf space was lost. Later inability to regain the space resulted in lost sales, and wasted promotional efforts overall. The supply problem was further aggravated by other products tagging on the promotional coattail, with more macnuts being used as ingredients in products such as cookies, ice cream, and candy. An alleged result was that Hawaii became the largest importer of macadamia nuts! At least some buyers found the imports to be good, low cost substitutes for the Hawaii product. So, when production catches up, Hawaii producers will have to match lower prices, or more promotion will be required to regain market share, or these market segments will be lost.

A similar situation might exist for Kona Coffee, where we could consider a number of issues. The point is, the Kona Coffee industry should be better off coordinating its various activities, and some type of industry organization is the best available vehicle for such coordination.

(4) In the past, different parties have presented themselves as representative of the industry, with the result that an outsider will receive conflicting reports on what is going on in "the industry." A cohesive industry presents a "united front" or a "single voice" to the public. A formal group will also provide industry leadership. This is especially crucial for effective communication with the legislature and State and Federal agencies.

There are several prerequisites for a successful industry organization. Four of these are as follows:

* **Areas of mutual interest**. Individuals cannot work together without some common bond, but perhaps more than most other groups, the organization must be concerned with striking a balance in its focus and objectives; its goals need to be realistic to enhance its chances of success (especially given the history of past industry organizations), yet not so limited as to have no impact on the industry's problems. A key may be the fact that a strong industry means its members will prosper. This report points out maintenance and improvement of high quality, good reputation, and appealing image as necessary conditions for a viable, long-term Kona Coffee industry.

* **Recognition of differences**. The various Kona Coffee market segments provide the basis for understanding these differences. These will also identify issues that can be addressed on an industry-wide basis, as opposed to those which may be applicable to only specific market segments.

* **A willingness to compromise to reach decisions.** Given individual differences, there must be some give and take to reach industry-wide decisions.

* **Commitment and unified support of decisions.** A successful organization requires the commitment of its membership, and one measure of commitment is support of decisions. Anyone can support a popular decision. The better test of commitment is the recognition that some decisions will be unpopular, but that they need equal support.

Additionally, a viable industry organization needs funding of its programs as well as its day-to-day operations. There are problems related to obtaining funding, then in the distribution of those funds. Most recent voluntary funding in the industry has had only limited, short-run success. One option that had been investigated was a market order, in part as a source of funds. The proposed certification program offers some other opportunities for raising funds.

Past attempts at industry organizations have failed because of a lack of industry cohesion, yet some form of organization would best serve to address many of the Kona Coffee industry's problems. An underlying cause of industry divisiveness is the different Kona Coffee market segments. This report has identified these segments and outlined some of the problems and potentials of each. We hope this understanding will facilitate the re-establishment of some type of viable industry organization.

Hawaii Agricultural Experiment Station
HITAHR, College of Tropical Agriculture and Human Resources
Noel P. Kefford, Dean of the College, and Chauncey T. K. Ching, Director of the Institute
INFORMATION TEXT SERIES 034—07.89(900)