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**WHEN WILL U.S. FIRMS BECOME MAJOR DAIRY
EXPORTERS AND BIGGER DIRECT INVESTORS
IN FOREIGN DAIRY-FOOD BUSINESSES?**

**W. D. Dobson
Jeffrey Wagner
Rodney Hintz**

**The Babcock Institute for International Dairy Research and Development
University of Wisconsin, College of Agricultural and Life Sciences
240 Agriculture Hall, 1450 Linden Drive
Madison, Wisconsin 53706-1562**

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The Babcock Institute
College of Agricultural and Life Sciences
240 Agriculture Hall, 1450 Linden Drive
Madison, Wisconsin 53706

Phone: 608-265-4169; Fax: 608-262-8852
Email: babcock@calshp.cals.wisc.edu
Internet: <http://babcock.cals.wisc.edu>

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WHEN WILL U.S. FIRMS BECOME MAJOR DAIRY EXPORTERS AND BIGGER DIRECT INVESTORS IN FOREIGN DAIRY-FOOD BUSINESSES?

W. D. Dobson, Jeffrey Wagner, and Rodney Hintz*

Executive Summary

Introduction

- Established in 1991, the Babcock Institute for International Dairy Research and Development carries out studies on international dairy marketing and trade, and dairy science issues that have international dimensions. As part of its programs, the Institute has conducted case studies and/or industry studies in a dozen countries and has contributed financially to development of a world dairy trade model. This Discussion Paper draws insights from international marketing/trade studies carried out by the Babcock Institute during the last decade.
- This paper addresses the question posed in the title of the paper and presents implications for U.S. firms, emphasizing the implications for U.S. foreign direct investment in dairy-food businesses.

When Will U.S. Firms Become Major Dairy Exporters?

- U.S. firms exported about \$1.0 billion in dairy products in 1999. In dollar value, dairy exports in 1999 were equal to about 2.0% of the total value of U.S. agricultural exports. In milk equivalent terms, U.S. dairy exports in 1999 totaled about 8.0 billion pounds (equal to 4.9% of U.S. milk production).
- With a few prominent exceptions, the prospects for substantially expanded dairy exports by U.S. firms are not bright for at least the current decade. The exceptions relate to exports of products such as dried whey, whey fractions, dairy blends, selected specialty dairy products (specialty cheeses, premium ice cream, etc.), and nonfat dry milk (NFDM). U.S. NFDM will be exported mainly with the help of the USDA's Dairy Export Incentive Program subsidies. Mexico will be an important destination for U.S. dairy exports.
- U.S. dairy exports are low partly because U.S. market prices for major bulk dairy products (cheddar cheese, butter and NFDM) are sharply higher (nearly 50% higher during 1990-2000) than world prices.
- U.S. prices of cheddar cheese, butter and NFDM are higher than world prices mainly because of differences between U.S. and foreign supply-demand conditions, U.S. border protection and, to a lesser extent, because of the USDA's dairy price support program.
- Deregulation of the U.S. dairy industry would make bulk and partially differentiated dairy products more competitive in international markets. However, deregulation is unlikely—especially unilateral deregulation by the U.S. The uncertain benefits from expanded dairy exports in a deregulated environment would occur in the future after substantial adjustment pain.
- The possible benefits of deregulation are unlikely to make politically-influential U.S. milk-producer organizations clamor for deregulation and a bigger role for U.S. firms in the international dairy trade. Consumers and certain milk processors might favor deregulation but are unlikely to wield the political power needed to produce such a result.

* W.D. Dobson is Professor of Agricultural & Applied Economics, Co-Director of the Babcock Institute, and Director of the Renk Agribusiness Institute at the University of Wisconsin-Madison. Jeffrey Wagner and Rodney Hintz were Project Assistants and MBA in Agribusiness students in the School of Business at the University of Wisconsin-Madison when this study was conducted. The help of Ms. Anchallee Marutarulert, Project Assistant and MBA in Agribusiness student at the University of Wisconsin-Madison, in assembling material for the study is acknowledged.

- Maintaining the status quo will come at a cost for the U.S. dairy industry. Thomas Suber, Executive Director of the U.S. Dairy Export Council, hypothesized that U.S. dairy processors, cooperatives, traders, and farmers face the future with the cold realism that either the U.S. dairy industry competes internationally or shrinks. Lack of incentives to export will also foster interregional competitive pressures in the U.S. that may work to the disadvantage of the Upper Midwest.

When Will U.S. Firms Become Bigger Investors in Foreign Dairy-Food Businesses?

- While barriers to foreign direct investment by U.S. firms are less formidable than barriers to dairy exporting, U.S. firms have limited involvement in foreign direct investment in dairy-food businesses. Kraft Foods is a prominent exception. A few other firms, including Schreiber Foods, also have a notable presence as foreign direct investors.
- Many reasonable hypotheses can be advanced to explain the limited amount of foreign direct investment by U.S. firms. The U.S. market is large, familiar, mostly English speaking, and largely devoid of corruption, making it attractive for U.S. businesses to serve. In addition, many small and mid-sized dairy firms may have concluded that foreign direct investment in dairy-food businesses is a "big firm's game."
- The heavy emphasis on domestic sales may limit profits of U.S. dairy food firms if, as claimed by a former Nestle CEO, the U.S. and European dairy-food markets are "flat and fiercely competitive." The New Zealand Dairy Board-Global Dairy Company has also placed increased emphasis on foreign direct investment because foreign markets remain less accessible than the firm expected to dairy exports. This action by the largest of the private dairy exporters speaks volumes about opportunities in dairy exporting vs. foreign direct investment.
- The paper analyzes strategies of a cross section of firms (listed below) that have been successfully involved in direct investment in foreign dairy-food businesses to identify strategies that may be worth emulating by U.S. dairy food firms.

Firm	Location of Headquarters
Arla Foods	Aarhus, Denmark
Kerry Group/PLC	Tralee, Ireland
Kraft Foods, Inc.	Northfield, IL, U.S.A.
Nestle	Vevay, Switzerland
New Zealand Dairy Board-Global Dairy Company	Wellington, New Zealand
Parmalat	Parma, Italy
Unilever	London and Rotterdam

- Strategies of the case firms that U.S. firms might find noteworthy, and possibly worth emulating, include the following:
 - All have expanded in recent years to gain market power to countervail the growing power of supermarkets, to achieve the size required to obtain economies of scale in R&D and brand development, and for a host of other reasons.
 - All emphasized product differentiation that manifested itself in widely differing ways. The New Zealand Dairy Board-Global Dairy Company superimposed product differentiation on top of being supplied by the world's lowest-cost milk producers.
 - Variations of an "Ization" staffing program were practiced by Unilever, Nestle and others. This involves filling local executive and technical positions in foreign subsidiaries with local personnel.
 - All are in near-constant pursuit of efficiencies.
 - Unique strategies were pursued by individual firms, especially the cooperatives.

- Implications for U.S. firms potentially interested in expanding foreign direct investment include the following:
 - The case firms, for the most part, adjusted well to the distinctive conditions in which they found themselves. This is the essence of successful competitive strategy.
 - Parmalat's view—one that drove the firm's acquisition strategies in the 1990s—is that the global fluid milk business is fragmented and ripe for profitable further consolidation. If correct, Parmalat's view of the world has implications for the new Dean Foods Company (Suiza-Dean combination). This situation could give the new Dean Foods Company incentives to further consolidate the U.S. fluid milk business and expand in the Mexican and Canadian markets.
 - Surprisingly, strategy may not be the dominant key to the successes enjoyed by the case firms. The successful responses of the firms may have occurred substantially because the firms have assembled and retained superior management for extended periods.
- The analysis does not disclose when U.S. firms will become bigger foreign direct investors in dairy-food businesses, but a few relevant points emerged:
 - Most of the case firms expanded direct investments in foreign markets because of constraints in the home country market.
 - Foreign direct investment in dairy-food businesses indeed may be somewhat of a "big firm's game."
 - If much of the U.S. dairy-food market is "flat and fiercely competitive," this will provide incentives for U.S. firms to consider additional foreign direct investment in dairy-food businesses. Whether a U.S. firm should engage in such investment is, of course, a complex question, the answer to which must be based on a firm's individual circumstances and capabilities. But, unlike the situation for dairy exporting—where border protection and price supports price many U.S. dairy products out of world markets—the barriers to foreign direct investment appear less daunting. The prevalence of direct investment by a cross section of foreign firms in dairy-food businesses suggests something about the prospects for engaging in such activity successfully.

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Introduction

Established in 1991, the Babcock Institute for International Dairy Research and Development carries out studies on international dairy marketing and trade, and on dairy science issues that have international dimensions. The Institute's international dairy marketing and trade work—the focus of this Discussion Paper—has produced case studies and/or industry studies for New Zealand, Australia, the U.S., Canada, Mexico, Argentina, Ireland, Denmark, Italy, The Netherlands, Russia, and Kazakhstan. Several of the case studies represent joint efforts of the Babcock Institute and the Renk Agribusiness Institute. The Babcock Institute has also contributed financially to development of a world dairy trade model. In early 2001, the Institute issued a report summarizing selected results of these studies in a paper entitled, "Policy and Management Lessons for Dairy Exporters and Investors in Foreign Dairy-Food Businesses—What Did We Learn in the Past Decade?"[21]. The earlier paper emphasized general trade and investment lessons for international dairy firms. This paper has a narrower focus. It addresses the question posed in the title of the paper and presents implications for U.S. dairy firms, emphasizing those relating to foreign direct investment. Like those in the earlier paper, the findings in this publication emerged mainly from studies conducted by Babcock Institute analysts during 1991-2000.

I. When Will U.S. Firms Become Major Dairy Exporters?

With a few prominent exceptions, the prospects for substantially expanded dairy exports by U.S. firms are not bright for at least the current decade. The exceptions for U.S. companies relate to exports of products such as dried whey, whey fractions, dairy blends, and selected specialty dairy products (specialty cheeses, premium ice cream, etc.). Mexico will be an important destination for U.S. dairy exports. Over the longer-run, after important barriers to and disincentives for U.S. dairy exports are eliminated, the U.S. may become more important as a dairy exporting country. This is so because the U.S. dairy industry already has some internationally competitive producers and processors who would expand exports of dairy products if disincentives to exporting were removed. However, it is impossible to accurately predict when those impediments to U.S. dairy exporting will fall. This section explains the rationale for these conclusions.

The Size and Nature of Dairy Exports by U.S. Firms

According to a U.S. Dairy Export Council (USDEC) study, dairy product exports by U.S. firms were valued at \$920 million and \$1.0 billion for 1998 and 1999, respectively [64]. Other statistics describing the relative size of dairy exports by U.S. firms are shown in Table 1.

Table 1. Dairy Product Export Figures for U.S. Firms, 1998 and 1999*

Item	1998	1999
U.S. Dairy Exports		
U.S. \$ Value (Bil.)	\$0.920	\$1.000
Milk Equivalent (Mil. Lbs.)	6,770	8,040
Milk Equivalent Quantity of U.S. Dairy Exports as % of U.S. Milk Production	4.3%	4.9%
\$ Value of U.S. Dairy Exports as % of \$ Value of Total U.S. Agricultural Exports	1.7%	2.0%

* Source: U.S. Dairy Export Council, 2000 [64] and USDA, Agricultural Outlook [66].

In terms of dollar values, the largest U.S. dairy exports in 1999 were nonfat dry milk (NFDM), cheese, and whey products. In milk equivalent terms, the largest exports were NFDM, whey, lactose, and cheese in 1999. This largest export group includes certain products in the "prominent exception" group, for which U.S. dairy exporting prospects are reasonably bright. Anecdotal accounts of successful U.S. dairy exporting initiatives frequently include products from this group, as noted below [22]:

- Successes of Foremost Farms, Inc. of Baraboo, Wisconsin in exporting dried whey products to multiple countries.
- Profits of Davisco in exporting dried whey from Minnesota and Idaho plants.
- The savvy exhibited by Hilmar Cheese of California in tailoring cheese products for export to the Japanese market.
- Cabot Creamery's sales of cheddar cheese to the U.K.
- Dean Foods' sales of fluid milk to Mexican supermarkets from the firm's southwestern U.S. plants.
- Successful exports of specialty cheeses into Mexico by a few upper-midwestern firms.

The successes recorded by U.S. companies in exporting dried whey products—including dairy blends containing dried whey—are not confined to those described in the anecdotal accounts. U.S. firms exported this item to more than 10 countries in 1999, with about 35% of the product going to Mexico and Canada [23]. Exports of whey fractions are expected to increase when the new Land O'Lakes-Mitsui joint venture plant becomes fully operational in 2001. Among other products, this plant will supply whey fractions for the global market. Cheese exports—including high-valued specialty cheeses of the type mentioned above—equaled about one percent of U.S. cheese production during 1995-99. Of course, fluid milk is generally costly for U.S. firms to export. However, Dean Foods has developed a market in Mexico for fluid milk processed in the firm's Texas and New Mexico plants [17].

Approximately one third of U.S. dairy exports in milk equivalent terms in 1999 consisted of NFDM—the vast majority of which was exported with USDA Dairy Export Incentive Program (DEIP) subsidies. The DEIP has been extensively used to sell the U.S.'s structural surplus of NFDM in foreign markets. Approximately 21% of the NFDM produced by the U.S. during 1995-99 was exported largely with the aid of DEIP export subsidies. The GATT/WTO limits on U.S. subsidized exports of NFDM that will apply after 2000/2001 (68.2 thousand metric tons per year) will limit DEIP exports to the equivalent of about 10% of U.S. NFDM production for 2000.

As noted below, the U.S. had about a 4% share of world dairy exports in 1998 [24]. While the European Union (EU) had the largest market in 1998, much of that large market share was achieved with the help of government dairy export subsidies. Australasia (Australia and New Zealand) held about a 44% world market share, achieved with little or no use of government export subsidies.

Country	Dairy Export Market Share (Milk Equivalent, 1998)
European Union	37%
New Zealand	31
Australia	13
U.S.	4
Other	15
Total	100%

Why Are Dairy Exports by U.S. Firms So Low?

While U.S. companies can point to dairy exporting success stories, in the aggregate U.S. firms are "bit players" in international dairy markets. The reason for this is not hard to find. U.S. prices

for major dairy products have been sharply higher than world prices. As indicated in Table 2, U.S. central market prices for bulk dairy products during 1990 to 2000 averaged about 50% higher than world prices as measured by the midpoint of prices reported by the USDA for fob Northern Europe. U.S. butter prices—which averaged lower than world prices in 1995—represent the single exception.

Table 2. Percentages by Which U.S. Central Market Prices for Cheddar Cheese, Butter, and Nonfat Dry Milk Exceeded World Prices, 1990-2000*

Year	Percent by Which U.S. Market Prices Exceeded World Prices		
	Cheddar Cheese	Butter	Nonfat Dry Milk
1990	71.4%	58.3%	53.1%
1991	56.8	59.5	51.8
1992	41.6	20.5	39.2
1993	60.3	21.1	60.7
1994	56.0	20.2	55.9
1995	29.4	-18.0	13.6
1996	33.8	42.6	39.4
1997	18.9	48.3	38.1
1998	55.4	111.0	61.2
1999	61.7	89.6	75.8
2000	36.2	97.2	19.3
1990-2000 Avg.	47.4%	50.0%	46.2%

* Source: USDA, "Dairy: World Markets and Trade," Various Issues, 1991-2000 [68].

The importance of price to exporting competitiveness is indicated by a 1995 Cornell University survey. Fifteen hundred U.S. agricultural exporters were asked by Cornell researchers to rank the importance of 13 obstacles to exporting [10, p.38]. Respondents named "meeting prices of foreign competitors" as the most important obstacle by a sizable margin. Thus, when U.S. dairy product prices exceed world prices by the amounts indicated in Table 2, it is no surprise that U.S. bulk dairy products are generally priced out of world markets.

U.S. prices of cheddar cheese, butter, and NFDM are higher than world prices substantially because of differences between U.S. domestic and foreign supply-demand conditions for milk and dairy products, U.S. border protection (tariffs, tariff rate quotas, and minimum access provisions) for these products, and to a lesser extent because of operation of the USDA's dairy price support program. In recent years, the strong U.S. dollar has exacerbated the problem created by the price disparity.

Over-quota tariffs on imports of U.S. dairy products in 2000 were as follows [14]:

Product	Over-Quota Tariff, 2000	
Cheese	\$1,636/mt	\$0.74/lb.
Butter/Butteroil	1,703/mt	0.77/lb.
NFDM	865/mt	0.39/lb.
WMP	1,122/mt	0.51/lb.

U.S. border protection is important. This is suggested by the fact that U.S. prices for butter, cheese, and NFDI stayed substantially above world prices for extended periods during the 1990s, when there was little price support activity involving these dairy products. For example, in fiscal 1996, U.S. prices of cheddar cheese, butter and NFDI averaged more than a third above world prices, while the USDA's net outlays for dairy price support purposes were negative. This indicates, in part, that on balance for the year the government was a net seller of dairy products onto the commercial market [65]. (Government receipts from the Dairy Assessment Program also contributed to the negative net outlay number for fiscal 1996.)

It also is not surprising that U.S. exports of dried whey products are increasing. There is no USDA price support program and attendant restrictive border protection program for dried whey to price the product out of international markets. Not so obvious are the reasons for expanding exports of specialty cheeses and premium ice cream. In part, exports of these items have expanded because they are differentiated products that can be sold competitively in international markets despite raw product cost disadvantages in the U.S. and high tariffs in foreign markets.

When Will U.S. Firms Obtain Incentives to Expand Dairy Exports Substantially?

Not soon, if Cox's World Dairy Model provides useful predictions. The Cox Model is a mathematical programming model that uses FAO production and trade figures for 1989-94 as base period data [14]. Tariff and non-tariff barriers and constraints agreed to under the Uruguay Round GATT negotiations are included in the model. While the model fails to take account of certain market imperfections, especially the influence of large traders and investors, it reflects many of the underlying economic forces operating in world dairy markets.

Cox evaluated a number of scenarios with the model. The one most relevant for purposes of this paper is the GATT/WTO 2005 scenario that extrapolates from 2000 to 2005 certain provisions of the agreements on dairy (minimum access, tariff changes, and reductions in export subsidies) reached under the GATT/WTO Uruguay Round. In essence, this scenario portrays a continuation of measures to open world dairy markets during 2000-2005 at the same rate that these markets were opened during 1995-2000. While major market distortions remain after GATT/WTO 2005, the model indicates that the world would move about half way to "Free Trade" by 2005 under this scenario.

Cox's GATT/WTO 2005 scenario predicts price reductions for milk producers in Western Europe, modest price changes for producers in Japan and Canada, little change in milk prices for the U.S., and economic gains for low-cost exporters. Farm milk prices fall 13% to 14% in Western Europe, increase by 8% to 9% in Oceania, and change relatively little in the U.S. under this scenario. *However, the quantity of U.S. exports of dairy products would increase under this scenario.* Interestingly, a "Free Trade" scenario produced similar results. Losses for producers in Western Europe were bigger under the Free Trade scenario and so were gains for producers in Oceania, but U.S. producers saw their farm milk prices remain essentially unchanged under Free Trade.

The prospect of little or no price gain for U.S. dairy farmers from freer trade in dairy products partially explains the lack of strong interest on the part of most U.S. dairy cooperatives in dairy trade liberalization. The conclusions and implications flowing from the World Dairy Model are plausible because the results correspond broadly to industry expectations arrived at through a number of analytical avenues. Even the results for the Free Trade scenario confirm what a few major dairy exporters have understood in a general way for decades.

Given the price reduction in store for EU milk producers under scenarios similar to GATT/WTO 2005, it is even less surprising that many EU dairy farmers show little eagerness for additional dairy trade liberalization. EU milk producers would, of course, face a host of problems under liberalized dairy trade. In particular, the EU milk production quotas—now scheduled to remain in effect until 2008—could be jeopardized by substantially expanded imports of dairy products. In addition, before agreeing to dairy trade liberalization and other major agricultural

policy changes, the EU would undoubtedly prefer to decide (under the Common Agricultural Policies) how to accommodate Eastern European countries that eventually will join the Union. In view of the continued resistance to substantially freer trade in dairy products from both U.S. and EU producers, it is difficult to envision major liberalization of dairy markets in the next few years. The U.S., of course, is not likely to unilaterally deregulate and open its dairy markets in the absence of similar, substantive moves by the EU and others.

What Would It Mean if the U.S. Unilaterally Deregulated?

While unilateral deregulation of U.S. milk markets is unlikely, it is useful to note what such an action would entail. Unilateral deregulation would mean eliminating the U.S. dairy industry's border protection, ending the dairy price support program, and allowing domestic dairy product prices to fall to new equilibrium levels closer to world prices. In the absence of deregulation by other dairy countries, this development would produce lower average U.S. milk and dairy product prices, and probably greater price variability. The latter development would be encouraged by the thinness of world dairy markets—world dairy trade accounts for the equivalent of only 6% to 7% of world milk production. If the U.S. placed substantial additional quantities of dairy products onto this market, it would not only drive down world prices but could also—depending upon the timing of U.S. sales and actions of competitors—increase the variability of world dairy product prices.

What Could Make Unilateral Deregulation Palatable?

Is there any policy action that would make unilateral deregulation palatable to U.S. dairy farmers? Compensation for producers might. Moreover, it is an option worth thinking about since the U.S. dairy industry has a producer cost structure that could make the industry competitive in international dairy markets with fewer structural adjustments than would be necessary in countries with high farm milk production costs (such as parts of the EU). After making the structural adjustments, the U.S. could be a significant player in international dairy markets. Furthermore, there is a model—Australia has developed a deregulation-compensation package that promises to make that country's dairy industry more competitive in international dairy markets. Australia's dairy farmers began to receive compensation for accepting virtually complete deregulation beginning in mid-2000. Under this complex compensation package, an average fluid milk producer in Queensland will receive the equivalent of about U.S.\$63,000 over an eight-year period in return for accepting deregulation [24]. It is unclear what level of compensation would be required to persuade U.S. milk producers to accept deregulation. But, if the U.S. dairy industry is serious about becoming internationally competitive in dairy exporting, it would pay to find out.

Implications for U.S. Dairy Exporters of Maintaining the Status Quo

Thomas Suber, Executive Director of the USDEC, characterized the future of the U.S. dairy industry as one where real costs of milk production are declining, domestic demand is growing modestly, and the role of government is declining. As a result, he claimed that "...the processors, cooperatives, traders, and farmers who determine USDEC policy face the future with a cold realism that either we compete internationally or we will shrink as an industry [58]." Suber advanced this hypothesis in 1999 when termination of the USDA's dairy price support program was imminent. But, the December 31, 1999 termination date for the USDA's dairy price support program was scrubbed, and it now appears that the program has new life extending at least through 2002. Whether the U.S. dairy industry will actually shrink is unclear. The industry grew during the 1990s by an average of 1.3% per year (as measured by milk production) despite limited dairy exports [65]. But it is no stretch to conclude that growth of the U.S. dairy industry over the longer-run will be less than it would be if dairy exports were increasing in a robust fashion.

The growth in U.S. milk production during the 1990s contrasts sharply with that of New Zealand, which began gearing up in the early 1990s to expand dairy exports. New Zealand's milk production increased by an average of 5.3% per year during the 1990s, and in three years during the decade recorded double-digit increases averaging 12.6% per year [68].

In addition to limiting growth of the industry, the status quo will create interregional competitive pressures. Three firms plan to increase California's cheese processing capacity by up to 40% by the mid-2000s [23]. If these firms have no incentive to export, they will turn inward and compete aggressively with domestic firms in the Upper Midwest for cheese sales. Hence, the status quo will not be without pain for part of the industry.

If U.S. dairy firms ultimately find themselves positioned to become major exporters, they may not be well served by a *de facto* better-late-than-never strategy. The early movers in dairy exporting—chiefly Australasian and Argentine firms—will have sewed up many attractive accounts in the growth markets of Asia and Latin America before the U.S. gets around to expanding dairy exports in a significant way.

The Bottom Line for U.S. Dairy Exports

Exports of U.S. dried whey products, dairy blends, and selected specialty dairy items will undoubtedly increase in the next few years. NFDM exports generally will equal the amount that can be exported with DEIP subsidies, but occasionally will exceed that figure when world prices rise above U.S. prices for the product. Mexico is likely to be an important growth market for U.S. dairy exports—in part because of low Mexican dairy import tariffs negotiated under the NAFTA and expanding demand in the country. With such exceptions, however, raw product cost disadvantages will sharply limit exports of bulk and partially differentiated dairy products by U.S. firms for much of the current decade. It would take deregulation of the U.S. dairy industry to change the latter situation. The comments of Michael Porter of Harvard's Business School describe why deregulation is often an unattractive option to those in a protected industry [49, p.87]:

Deregulating a protected industry...will lead to bankruptcies sooner and to stronger, more competitive companies only later.

Thus, the uncertain benefits from deregulation for the U.S. dairy industry would occur in the future after substantial adjustment pain. This is not a prospect that is likely to make politically influential U.S. milk producer organizations clamor for deregulation and a bigger role for U.S. firms in the international dairy trade in the near future. Consumers and certain milk processors might relish deregulation, but they are unlikely to wield the political power to do much to produce such a result. Therefore, in summary, there are plenty of reasons why U.S. firms collectively will remain bit players in dairy exporting for at least the current decade.

II. When Will U.S. Firms Become Bigger Investors in Foreign Dairy-Food Businesses?

U.S. firms also appear to have limited involvement in foreign direct investment in dairy-food businesses. Of course, Kraft Foods is a prominent exception. Kraft Foods, a unit of the Philip Morris Companies, which was partially spun out of the parent company through an initial public offering in 2001, is in the same league as Nestle and Unilever regarding foreign direct investment in dairy-food businesses. Schreiber Foods also has noteworthy foreign direct investments in dairy food businesses in Mexico, Brazil, Germany, and India. However, with such exceptions there are few big U.S. players involved in foreign direct investment in dairy-food businesses.

What would explain this phenomenon? Many reasonable hypotheses can be advanced. The U.S. market is large, familiar, mostly English speaking, and largely devoid of corruption, making it an attractive market for U.S. firms to serve. In the U.S., the risks of nonpayment by customers and defaults on contracts are less than in many foreign markets. In addition, capital constraints may limit the dairy-related foreign direct investments of some smaller U.S. firms. More generally, many small and mid-sized dairy firms may conclude that foreign direct investment in dairy-food businesses is a "big firm's game."

It is plausible for U.S. companies to conclude that there are satisfactory profits to be made by expanding sales of dairy products in the U.S. rather than in foreign markets. Thus, when U.S. dairy companies are asked why they do little foreign direct investment, they might respond: If there

are no profits to be made in the U.S., why have so many foreign companies expanded direct investments in the U.S. dairy industry? To support this reasoning they point out that Danone (France), Lactalis (France), Diegeo (UK), Glanbia (Ireland), Kerry Group (Ireland), Nestle (Switzerland), Unilever (UK-Netherlands), and Parmalat (Italy) increased or maintained substantial dairy-food investments in the U.S. in the 1990s and 2000. This pattern of foreign direct investment by the European firms undoubtedly reflects a host of considerations. One important consideration is the desire on the part of the European firms to expand sales of their well-known branded products. Brand expansion by the firms is feasible in the U.S. partly because of the greater availability of milk supplies in this country.

U.S. firms may have concluded that there is ample room for achieving economies and increasing profits by further consolidating the U.S. dairy industry. For example, this might be the situation in the fluid milk business. There has been a spate of highly publicized consolidations of the U.S. fluid milk business in the 1990s and 2000, most notably the acquisitions made by Suiza Foods and Dean Foods. After acquiring many smaller firms, these two largest fluid milk processors in the U.S. announced in 2001 that they themselves would merge. However, together these firms hold only about a 35% market share in the U.S. fluid milk market. While these two companies already have absorbed some of the most profitable smaller, regional firms, the U.S. fluid milk industry may be ripe for further consolidation.

Heavy emphasis on domestic sales may limit profits of U.S. dairy-food firms, however. One reason was mentioned by a former CEO of Nestle who characterized U.S. and European dairy-food markets as being "flat and fiercely competitive [59]." This belief has encouraged Nestle to expand dairy-food sales in the growth markets of Latin America and Asia rather than spend excessive amounts of energy fighting over market share in the U.S. and Western Europe. Of course, this view does not mean that Nestle makes no direct investments in U.S. dairy-food businesses. It is simply a statement about priorities.

Finally, disappointing prospects for further liberalization of world dairy markets make foreign direct investment in growth markets a potentially attractive alternative to exporting. John Roadley, then Chairman-Designate of the Global Dairy Company, argued in early 2001 that if New Zealand's dairy industry is to grow competitively, it must increase foreign direct investment in dairy businesses and use domestically-produced milk in the country of the acquired business rather than rely nearly exclusively on exports of New Zealand dairy products. Roadley elaborated on his position as follows [55, p.2]:

While we have been successful in achieving a third of international dairy trade (mainly through operations of the NZDB), the lion's share of the global dairy business is not traded across borders. The part of the market that is accessible to us is as small as six percent of world dairy production. Ninety-four percent of the market is largely inaccessible to us because of trade restrictions...(We will need to continue) to work closely with government on international trade liberalization. But far more immediately, we need to seek acquisitions and joint ventures with companies already operating in the inaccessible part of the market. And we need to continue to invest in leading-edge research and development, manufacturing technologies and brand development.

For reasons noted by the NZDB-Global Dairy Company and others, many companies located outside the U.S. are engaging in foreign direct investment in dairy-food businesses. Do these firms know something that U.S. companies are overlooking?

Background Information and Competitive Strategies of the Case Firms

The remainder of the paper analyzes key strategies of a cross section of firms that are successfully involved in direct investment in foreign dairy-food businesses to identify strategies that may be worth emulating by U.S. dairy-food firms. As will be evident, most of the case firms are involved in both dairy exporting and foreign direct investment in dairy-food businesses. The firms whose strategies were scrutinized are:

Firm	Location of Headquarters
Arla Foods	Aarhus, Denmark
Kerry Group/PLC	Tralee, Ireland
Kraft Foods, Inc.	Northfield, Illinois, U.S.A.
Nestle	Vevay, Switzerland
New Zealand Dairy Board-Global Dairy Company	Wellington, New Zealand
Parmalat	Parma, Italy
Unilever	London, UK and Rotterdam, The Netherlands

With the exception of the NZDB-Global Dairy Company, the firms analyzed appear in the list of the world's top 20 dairy companies (Table 3). Because the NZDB-Global Dairy Company was not yet established when the list was developed, that firm does not appear in the table. However, that firm's strategies are analyzed because the NZDB-Global Dairy Company (like the NZDB before it) will be a major player in dairy exporting and foreign direct investment in dairy-food businesses.

Table 3. The World's Top 20 Dairy Food Companies, 1999*

Company	Home Country	Dairy Sales	Total Sales
		(Billion U.S. \$)	
1. Nestle	Switzerland	\$11.85	\$45.58
2. Philip Morris (Kraft)	U.S.	8.70**	27.50
3. Danone	France	5.91	12.56
4. Parmalat	Italy	5.20	6.16
5. Unilever	UK/Netherlands	5.00	40.49
6. Lactalis(Besnier)	France	4.54	4.54
7. Arla-MD Foods	Sweden-Denmark	4.30	4.50
8. Snow Brands	Japan	4.20**	NA
9. Suiza Foods	U.S.	3.99	4.48
10. Friesland-Coberco	Netherlands	3.62	3.80
11. Meiji Milk Products	Japan	3.50**	NA
12. Campina-Melkunie	Netherlands	3.30	3.30
13. Morinaga Milk Industry	Japan	3.30**	NA
14. Bongrain	France	3.27	3.27
15. Dean Foods	U.S.	2.99	3.76
16. Land O'Lakes	U.S.	2.74	5.61
17. Sodiaal Industry	France	2.56	2.56
18. Kerry Group	Ireland	2.32	2.40
19. Nordmilch	Germany	2.27	2.27
20. Dairy Farmers of Am.	U.S.	1.98	7.30**

* Sources: Fusaro, D., "Consolidation's Dairy Peak," *Dairy Foods*, July 2000 [29], Rabobank International, 1999 [59], and selected annual reports for 1999. Figures for cooperatives do not include sales of raw producer milk.

**Figures for 1998.

Prior to discussing potentially valuable strategies for U.S. firms, it is useful to provide a brief amount of background for the case firms and list key strategies of those firms. It also is useful to define what we mean by competitive strategy (strategy for short). We found it useful to adopt Porter's language, which specifies that "the essence of formulating competitive strategy is relating a

company to its environment [50, p.3]." A caveat is in order regarding the analysis. The material represents a "snapshot" of background information and strategies for case firms for a particular point in time—generally 1998-2000. Thus, the information presented will not reflect all recent acquisitions of dairy-food businesses by case firms. Moreover, in some instances the sales information will differ from that specified in Table 3 because useful, available information was for a period different from that shown in the table.

Readers wishing to see only a summary analysis of strategies of the case firms should skip to the section entitled "Summary of Foreign Direct Investment Strategies of Case Firms."

Arla Foods

- **BACKGROUND.** Formally established on April 17, 2000, Aarhus, Denmark-based Arla Foods is the product of the merger of MD Foods of Denmark and Sweden's Arla Cooperative. It is one of the first mergers of major cooperatives from two different countries. The proposed merger required the clearance by the competition authorities of the seven countries where MD Foods and Arla Cooperative held substantial market shares. Arla Foods is owned by the approximately 17,000 Danish and Swedish milk producers who supply milk to the organization [3].

Milk processed by Arla Foods originates from the following sources [4]:

Source	Amount	% of Total
Denmark	4.1 billion kg	58.6%
Sweden	2.1 billion kg	30.0
UK	0.8 billion kg	11.4
Total	7.0 billion kg	100.0%

Sales revenues of Arla Foods will total about DKK 36 billion per year (approximately U.S.\$4.2 billion based on exchange rates for late May 2001), making the firm one of Europe's largest dairy organizations. Arla Foods' sales were distributed across countries or regions and products as follows in 2000 [3, p.50]:

Country or Region	% of Total Sales	Products	% of Total Sales
Sweden	29.0%	Fresh Products	40.5%
Denmark	24.0	Cheese	26.6
Other EU	30.4	Butter & Spreads	11.6
Rest of Europe	1.9	Condensed Milk	14.8
Middle East	5.1	Packaging & Additives	2.9
North America	2.4	Other	3.6
Central & S. America	3.4	Total	100.0%
Asia	2.7		
Africa	1.0		
Other	0.1		
Total	100.0%		

Prospective efficiency gains were part of the rationale for the merger. However, earlier plant closings and other efficiency-generating measures within MD Foods and Arla Cooperative had achieved efficiencies that limited the number of additional rationalization measures required

after the merger. Earlier plant closings as a result of merger of MD Foods and Kloeber Maelk in Denmark provide prominent examples.

Two initiatives undertaken prior to the time that the MD Foods-Arla Cooperative merger was completed are noteworthy. One was a joint venture between Arla Foods Ingredients and the Argentine dairy cooperative, SanCor. This initiative created the first large-scale whey processing plant in Argentina. The plant will be supplied with whey from SanCor's 14 cheese operations [3]. This joint venture plant will provide additional competition for food ingredient sales for firms such as the Kerry Group of Ireland and U.S. whey processors. A second initiative was the construction of the Taulov, Denmark yellow cheese factory, which is one of the most highly automated, energy efficient, and flexible cheese plants in the world [40]. The Taulov plant will produce 55 million pounds of cheese per year. Two existing dairy processing plants were closed when the Taulov plant became operational.

- **STRATEGIES OF MD FOODS.** Key strategies pursued by MD Foods in the pre-merger period—which are likely to be retained in the merged organization—included those noted below.
 1. The European market will receive first priority, but the firm's investments in a few countries in the Middle East, Southeast Asia, and Latin America reveal MD Foods' global view [38].
 2. MD Foods attaches importance to building strategic alliances with foreign dairies [38]. Arla Cooperative and other organizations possessing limited exporting capabilities can make use of the firm's exporting network and experience.
 3. The firm has developed a Key Account Management System to promote close cooperation with a few multiples (supermarkets) as to product range, terms of delivery, logistics, and product development [18]. This applies in particular to Germany, the UK, France, Holland, and Sweden but will spread to other countries as well.
 4. The organization will move away from bulk products and go for growth by added value [18]. Consequently, a larger share of the firm's production will be sold to customers in the industrialized world.
 5. R&D will receive additional emphasis and bigger marketing projects will result from the added emphasis placed on this functional area.
- **STRATEGIES OF ARLA FOODS, CIRCA 2000-2001.**
 1. In the ingredients area, Arla Foods will establish itself as one of the world's leading global suppliers of added value, milk-based ingredients for selected areas within the food industry [5].
 2. Arla will be the market leader in Northern Europe for all types of dairy products with strong brands and strong consumer confidence [5].
 3. Arla Foods will grow through organic development, acquisitions, and the development of profitable products [5].
 4. The firm will focus on European markets and certain selected markets outside Europe [36].
 5. The newly formed organization called the Arla Foods Innovation and Environment unit will be employed to combine the R&D and environmental functions of Arla Cooperative and MD Foods [3, p.35].

Kerry Group, PLC

- **BACKGROUND.** Headquartered in Tralee, County Kerry Ireland, the Kerry Group/PLC is a diversified food ingredients and consumer foods company [71]. The firm grew from a small dairy cooperative that had sales of about U.S.\$50 million in 1974 to a multinational with sales of U.S.\$2.4 billion in 1999.

Much of this growth was achieved by acquisitions of food ingredients firms. Kerry Group/PLC opened its first overseas food ingredients manufacturing plant in Jackson, Wisconsin in 1987, and in 1988 acquired Beatreme Food Ingredients (a division of Beatrice Corporation). One of the larger acquisitions, DCA, was obtained from Allied Domecq for U.S.

\$402 million in 1994. By 1995, Kerry Group/PLC had made 43 acquisitions, acquisitions that doubled the firm's size in each of the previous five-year periods. By 1999, Kerry had operations in Ireland, the U.S., continental Europe, Canada, Mexico, Brazil, Argentina, Chile, New Zealand, Australia, and Malaysia.

The firm's acquisitions have produced a strong emphasis on food ingredients as indicated by Kerry's Divisional sales figures for 1998 [71]:

- Kerry Ingredients 63%
- Kerry Foods 34%
- Kerry Agribusiness 3%

As the firm grew into a world leadership position in food ingredients, the sales of Irish-based dairy products declined to about 11% of the firm's total revenues.

- **STRATEGIES.** In the early 1970s, a brucellosis eradication program reduced the milk supply of Kerry Cooperative (parent of the current organization) by about 20%. Facing this situation, the Kerry Cooperative's management and board of directors concluded that, if the firm was to grow, it needed to reduce its reliance on commodity dairy products and diversify into differentiated products. Accordingly, the firm pursued the following strategies [71]:
 1. Emphasized production and sale of food ingredients.
 2. Acquired firms selling branded food products.
 3. Beginning in 1986, exchanged the assets of Kerry Cooperative for a majority holding in a public limited company, mainly to obtain capital for growth.
 4. Emphasized quality and continuity in management.
 5. Increased expenditures on R&D to 2%-3% of sales in order to remain competitive in the food ingredients business.
 6. Emphasized growth through acquisitions, especially of profitable food ingredients firms.
 7. Sought 15% per year earnings growth—10% from organic growth and 5% to 6% from acquisitions [72].

Kraft Foods, Inc.

- **BACKGROUND.** Kraft Foods traces its origins to the early 1900s when J.L. Kraft and Bros. Co. became a successful Chicago cheese distributor. Founder J.L. Kraft's vision for the company was to bring to retailers a variety of cheeses of consistent quality and with longer shelf life. One early contribution of the company was to develop processed cheese in 1916 [16].

The Philip Morris Companies, one of which is Kraft Foods, had aggregate sales of \$78.6 billion in 1999. Philip Morris' acquisition of Kraft Foods was sandwiched between the firm's acquisitions of two other major food companies, as indicated below:

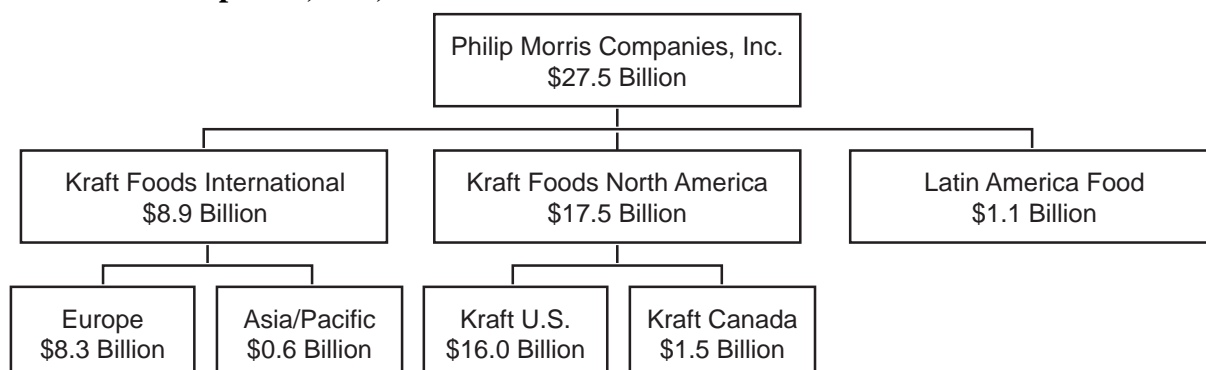
Company Acquired by Philip Morris	Year of Acquisition
General Foods Corporation	1985
Kraft Foods	1988
Nabisco Holdings	2000

The major companies acquired by Philip Morris had themselves acquired many smaller companies during their years as independent organizations. For example, the Oscar Mayer Company was previously part of General Foods and eventually became a prominent part of Kraft Foods.

Globally, Philip Morris Companies operate food businesses in over 100 countries and generate in excess of \$27 billion each year [48]. Food sales revenues of the Philip Morris Companies in 1999 were distributed among Kraft Foods International (KFI), Kraft Foods North America (KFNA), Philip Morris Latin America (PMLA) and subdivisions of the first two units as shown

in Figure 1. Industry analysts estimate that KFNA contributes about 64% of Philip Morris' food revenues, while KFI provides 32% and PMLA 4%, respectively [15,48,53].

Figure 1. Total Food Sales and Food Sales by Subsidiaries, Philip Morris Companies, Inc., 1999



* Source: [15,48 and 53].

KFI has a substantial presence in Europe. Sales from that unit in 1998 totaled \$2.2 billion in Germany, \$1.1 billion in France, \$920 million in Italy, and \$3.5 billion in other European countries [15].

Food Sales revenues of the Philip Morris Companies in 1998 were distributed among the different food categories as shown the following schedule:

Category	% of Revenues
Miscellaneous Groceries	30%
Cheese	20
Coffee	20
Confectioneries	11
Cold Cuts	9
Cereal	5
Food Service	5
Total	100%

* Source: Philip Morris Companies, Inc. Fact Book 2000 [47].

Philip Morris owns a host of well-known dairy brands including Kraft, Philadelphia, Velveeta, Cheez Whiz, Breakstone's, Knudsen, Cracker Barrel, Polly-O Churney, and Athenos.

A particularly successful KFI product is Philadelphia Cream Cheese. Sold in over 30 countries, this product has maintained a 4% sales growth rate since 1995. Philadelphia Cream Cheese is a leader among KFI's 21 brands each of which generate revenues exceeding \$100 million per year. The product has leading market shares in Germany, Italy, the UK, Belgium, Spain, Austria and Australia [47].

Kraft's U.S. market shares in 1999 were as follows for the cheese brand categories noted in the following schedule [23]:

Brand Category	Kraft's Dollar Share
Natural Cheese Brands	21%
Natural Shredded Cheese Brands	31
American Cheese Brands	61

These figures give only general indications of the nature of Kraft Foods and Philip Morris' other food businesses and must be regarded as only a snapshot of the parent company's food

businesses, as they existed before the acquisition of Nabisco Holdings. They also fail to reflect ongoing reorganizations of the company and consolidation of acquired food businesses. More enduring information is provided by insights into Kraft-Philip Morris strategies.

- **STRATEGIES.** The global strategies of Philip Morris' food businesses include efforts to foster product diversity, country-specific marketing, international cross fertilization, and aggressive new product development. Specific strategies pursued by the firm that are consistent with this "umbrella" strategy include the following:
 1. The company strives to maintain diversity at both the category and brand level, and has used its R&D capabilities to create new categories.
 2. Packaging and advertising are tailored specifically for each country. This is contrary to the current strategy employed by certain other multinational consumer packaged goods companies, which are moving to a single, international packaging design.
 3. The company encourages a free exchange of ideas and products across international boundaries.
 4. New product development is a key element of the firm's marketing strategy, since it enables the firm to maintain a diversified portfolio of brands and permits development of products for specific ethnic or cultural groups that can be employed in other regions.
 5. Kraft Foods North America purchases the majority of its cheese for further processing, rather than processing cheese from raw milk. Thus the firm focuses on the value-added cheese segment.
 6. The firm divests itself of product lines that face stiff competition from well-established local brands and offer limited opportunity for rapid growth. This strategy has manifested itself in the firm's divestiture of several dairy operations in Germany and Australia during the 1990s.
 7. Philip Morris' food companies have developed and promoted value-added products that provide higher-than-average profit margins, while avoiding commodity products such as fluid milk.
 8. The firm aims for high market share for many categories and brands.

For the most part, these specific strategies are orthodox, suggesting that the firm's high profit margins result substantially from excellent management.

Nestle

- **BACKGROUND.** The company traces its origins to the Anglo-Swiss Condensed Milk Company founded in 1866 in Cham, Switzerland. The Anglo-Swiss company merged with Farine Lactee Henri Nestle—a producer of infant formula—in 1905 to create the foundation for the modern company. Over the years, the company has developed or acquired such well-known brands as Carnation, Klim, Nescafe, Libby's, Friskies, Stouffers, Kitkat and Perrier [17,41]. However, these brands understate Nestle's brand presence worldwide. The company has about 8,000 brands, nearly a tenth of which are registered in more than one country.

In 1999, the company had about 230,000 employees, 495 factories in 77 countries, and sales of about U.S.\$46.7 billion [17,51,74]. The company operates 17 R&D facilities with a combined budget of \$600 million per year [74, p.114]. In 1998, Nestle was the world's largest seller of powdered/condensed milk, non-dairy creamers, soluble coffee, mineral water, and chocolate and confectionery products [51, p.73]. Nestle is the world's No. 2 seller of ice cream, behind Unilever.

- **STRATEGIES.** Nestle's strategies, which are associated mainly with foreign direct investments in dairy and other food businesses, include the following:
 1. Balance sales between low risk and low-growth countries of the developed world and high-risk and potentially high-growth markets of Asia, Latin America, and Africa [60].
 2. Keep brands local and people regional; only technology goes global [52].
 3. In developed markets, grow and gain economies of scale through foreign direct investment in big companies such as Carnation, Perrier, and Stouffer. In the developing world, grow by

manipulating ingredients or processing technology for local conditions, and employ appropriate (often local) brands [52].

4. In developing countries, first establish sales channels by making basic, mass-produced foodstuffs that the locals can afford. Then as consumers in these countries grow richer, pump higher-valued products through these same channels [25].
5. Deepen the pool of Asian and other developing country managers to gain a cadre of autonomous regional managers who know more about the culture of the local markets than Americans or Europeans [52].
6. Employ a wide-area strategy for Asia that involves producing different products in each country to supply the region with a given product from one country [45].
7. Selectively strike strategic partnerships in instances when this will clearly produce advantages for the firm.
8. Engage in continuous improvement and nearly constant cost cutting. Discover the root sources of competitive advantage for the firm [74, p.119].
9. Initiate or join business-to-business internet-based systems that offer the firm and competitors an opportunity to drive down costs by pooling their purchases from commonly used suppliers, and by automating certain accounting functions [28].
10. Seek to achieve 4% per year real internal growth [74, p.117].

New Zealand Dairy Board-Global Dairy Company

- **BACKGROUND.** Established in 1924, the New Zealand Dairy Board (NZDB) is headquartered in Wellington, New Zealand [17]. From June 30, 1998 to May 31, 1999, the NZDB had sales of NZ\$7.4 billion (approximately US\$3.3 billion). The firm employed 9,800 staff in New Zealand and in 98 subsidiary and 19 associate companies worldwide [44]. The firm had about a 31% market share in world dairy export markets (in milk equivalent terms) in 1999 [21], and presently has a single desk (monopoly) exporting privilege granted by New Zealand's parliament.

The NZDB is in transition. The Board is scheduled to become part of a combined organization called the Global Dairy Company that includes the current New Zealand Dairy Group and Kiwi Cooperative—two cooperatives that process more than 95% of the milk marketed in New Zealand. The Board also is scheduled to lose its statutory monopoly exporting privilege one year after it becomes part of the larger organization.

- **EARLY CORE AND SUBSIDIARY STRATEGIES OF THE NZDB.**
 1. Lift the 30% to 40% of milk, which is sold as value-added (differentiated or partially differentiated) products, to close to 100% as soon as possible [57].
 2. Subsidiary strategies include the following [43]: (a) expand the Board's global own-brand consumer products business, (b) grow the value-added food ingredients business, (c) develop further the Board's international food service business, (d) increase dominance of the UK consumer butter and cheese markets, and (e) continue to take advantage of opportunities created in Europe by the GATT/WTO agreement.
 3. Superimpose the core and subsidiary product differentiation strategies onto a strategy of being supplied by the world's lowest-cost milk producers.
- **STRATEGIES OF THE NZDB, CIRCA 1999-2000 [21].**
 1. Create a global dairy business four times larger than the New Zealand dairy industry of 2000 within 10 years.
 2. Create value for New Zealand's dairy farmers by manufacturing and marketing products in the following categories: (a) Value-added dairy products and dairy commodities made from New Zealand milk, and (b) dairy products made with milk from other countries using the New Zealand industry's skills and know-how.

3. Use local milk where shelf life restrictions rule out use of New Zealand product and be prepared to do business in countries where tariff barriers price New Zealand products out of the market.
 4. Establish targets of a 15% minimum return on the total gross assets of the New Zealand dairy businesses, 15% annual growth in revenues, and a 4% annual improvement in productivity from farm to consumer.
- STRATEGIES OF THE NZDB–GLOBAL DAIRY COMPANY (Combined organization consisting of the New Zealand Dairy Group, Kiwi Cooperative and the NZDB) [55].
 1. Integrate the manufacturing and marketing arms of New Zealand's major firms to allow the industry to compete more effectively in world dairy markets.
 2. Seek coordinated acquisitions of, and joint ventures with, companies already operating in inaccessible parts of the world dairy market—94% of the market.
 3. Obtain scale economies in R&D and brand development.

Parmalat

- BACKGROUND. Headquartered in Parma, Italy, Parmalat Finanziaria SPA (Parmalat) grew from a small cold cuts and preserves firm in 1961 into the fourth largest dairy firm in the world in 1999. In 2000, the founding Tanzi family still held 51% of the 1.529 million shares outstanding through the family's holding company, Coloniale S.r.l. Parmalat's dairy sales in 1999 totaled U.S.\$5.2 billion, placing the firm below only Nestle, Kraft, and Danone (Table 3).

Parmalat had 41,670 employees in 33 subsidiaries in Europe and 61 subsidiaries in other parts of the world in 1999 [31,54]. Products produced and marketed by Parmalat include milk (UHT and pasteurized), cream, bechamel sauce, yogurt, desserts, fruit juices, tomato-based sauces, tea-based drinks, vegetable soups, snacks, biscuits and cakes. The company's products are sold under the following brands: Parmalat, Santal, Pomi, Pais, KYR, and Mister Day.

In 1999, the company's sales were distributed across major product categories and regions as follows [56]:

Product Category	% of Sales	Geographic Region	% of Sales
Milk and By-Products	61%	Europe	31%
Fresh Products	24	North America	31
Vegetable Products	8	South America	28
Baked Products and Other	7	Rest of the World	10
Total	100%	Total	100%

The company's North American sales in 1999 included operations in New York, Georgia, and Florida, with U.S. sales totaling \$650 million. Parmalat ranked 27th in the U.S. in terms of dairy sales for 1999, just ahead of Nestle (dairy only). Operating in part under a joint venture with Dairyworld Foods, the firm is a leading fluid milk supplier in Canada [56].

Parmalat is a world leader in UHT milk production and sales. UHT milk is Parmalat's strongest branded product and accounts for about 90% of the firm's milk sales (55% of the firm's total sales) [37]. This product, which has a shelf life of about six months in the unopened container, represents the bulk of the firm's sales in South America and half of the firm's sales in Europe. Parmalat's sales of UHT milk in developing countries were fostered by the following developments:

1. Governments in developing countries promoted consumption of UHT milk as a safe alternative to poor quality tap water.
2. Government programs to combat malnutrition included UHT milk.
3. The longer shelf life and no refrigeration costs led retailers to prefer to carry shelf-stable UHT milk rather than regular pasteurized milk.

Reflecting an aggressive acquisition strategy, Parmalat expanded its presence from six countries to 31 countries during the 1990s. The company's total sales grew by 800% from 1990 to 1999—two-thirds of which was accounted for by acquisitions. The firm's sheer number of acquisitions in the late 1990s—29 companies in 1998 and 1999—may have led to operating inefficiencies. A number of analysts have questioned the wisdom of Parmalat's decision to enter the mature, highly competitive markets of the U.S., Canada and Australia. Profit margins for the firm's North American acquisitions were lower than the company average—probably reflecting a nonoptimal product mix in the North American operations and lower productivity.

Parmalat's acquisitions are expected to decline in number during the early 2000s as the firm focuses on integrating new businesses into the overall company and cutting costs. The cost-cutting measures will include plant closures, paring down of operating costs, and streamlining distribution. The firm anticipates that these measures and the launch of value-added products will increase the firm's operating margins, which are below those of leading dairy firms in the EU and the U.S.

- **STRATEGIES.** Parmalat's key strategies included the following during the 1980s and 1990s:
 1. Parmalat has opted to invest in countries with more growth potential than Western Europe. This led the firm to open a single factory in Brazil in 1974. By 1995, Parmalat Brazil operated 18 plants, employing 10,000 people and manufacturing more than 400 products. By 1996, the company operated 84 plants around the world with total production of 4.5 million liters of milk per day. In addition to its major presence in Brazil, the firm had plants in Argentina, Uruguay, Paraguay, Chile, Spain, Portugal, Germany, France, Hungary, Russia, the U.S., Australia, Mexico, and China.
 2. Debt has been the major source of funding for Parmalat's acquisitions. The firm has been reluctant to raise additional equity capital because this would dilute the 51% stake of the Tanzi family in the firm.
 3. Parmalat seeks to transform the firm from a commodity food company into a nutrition company, offering functional foods that have special health benefits [69]. Examples include UHT milk enriched with seven vitamins. The goal is to increase value-added sales from 35% to 50% of the total sales by 2004.
 4. The firm's R&D capability is being expanded to support the increased sales of functional foods and other differentiated dairy products.
 5. In developing countries the firm will use commodity dairy products to generate cash and provide a distribution platform. As incomes increase in these countries, Parmalat will push higher value-added products through the same channels, build strong brand awareness for the firm's products, and ultimately introduce a range of value-added products.

Unilever

- **BACKGROUND.** Unilever was founded in 1930 by the merger of Margarine Unie of the Netherlands and Lever Brothers of the United Kingdom. The company had sales of U.S.\$43.8 billion in 2000. This figure reflects sales gained by acquisitions in 2000 of U.S. firms Best Foods for U.S.\$20.3 billion, Ben & Jerry's Homemade for U.S.\$326 million, and Slimfast for U.S.\$2.3 billion. The acquisitions pushed the firm to a strong second place to Nestle in sales. While the employment figures undoubtedly have shrunk in the past year as a result of rationalization measures, the firm had about 250,000 employees in 88 countries in 2000 [9].

Effective in January 2001, the company consolidated operations into two global divisions: The Foods Division and the Home and Personal Care Division. Unilever has a host of brands, the most well-known of which include: Magnum ice cream, Ben & Jerry's ice cream, Lipton Tea, Wish-Bone salad dressing, Flora margarine, Hellmann's mayonnaise, Knorr soups, Skippy peanut butter, Dove soaps, and hundreds of lesser-known brands. Because of competitive advantages the firm developed in the logistics of handling frozen products, Unilever became the world's largest ice cream company and achieved strong market positions in other frozen foods. Unilever obtained about 10% of its \$44 billion in sales in 2000 from ice cream.

During the 1990s, Unilever's annual sales growth averaged about 2%, trailing the company's 5% target. Competitor Proctor & Gamble had annual sales growth in this period of 4.9%, while Nestle recorded growth of 3.1% in the 1990s [9].

- **EARLY STRATEGIES.**

1. The two companies that formed Unilever established a tradition of expanding their businesses through both exports and local production [34].
2. Starting with the Indian subsidiary in 1942, Unilever put into place a management process that company insiders refer to as "ization" [34, p.48]. Thus, filling local executive and technical positions with Indian managers led to the "Indianization" of that subsidiary—along with "Brazilianization" and similar staffing in various other countries with Unilever operations.
3. The company focused on two consistent and related practices to underpin structural changes: recruitment of high-quality managers, and linking of decentralized units through a common corporate culture.
4. In its corporate strategies aimed at maintaining and developing synergies, Unilever has shifted from a predominantly portfolio concept toward a transferring skills concept and even a sharing of activities concept [33, p.41].

- **STRATEGIES OF THE LATE 1990s AND EARLY 2000s.**

1. In 1999 and 2000, the firm decided to focus on its 400 top-performing brands, which accounted for about 86% of the firm's sales. The company's 1,600 lesser brands may not be eliminated, but will be allowed to "wither on the vine" [9].
2. High growth brands in core categories will be added to the firm's portfolio. Major components of the Best Foods acquisition are consistent with the strategy described in Point 1.
3. A series of linked initiatives (including the 400-brand strategy) were unveiled to align the entire company behind growth ambitions—including expansion of e-business—to increase annual growth in revenues to 5%-6% and operating margins to 16% by 2004 [2].
4. The company's supply chain will be simplified to produce a billion British pounds in savings annually by cutting the number of suppliers and eliminating needless variations in ingredients [26].
5. Product "tinkering" at the local level is being reduced. For example, Magnum ice cream bars now have a uniform name, logo, and packaging globally and flavors vary only slightly by country [9].
6. Early in 2000, Unilever realigned its top management structure into two operating units to accelerate decision making and tighten control of marketing strategies.
7. Products that save the consumer time will be incorporated into the "bloodstream" of the business.
8. To increase efficiencies, the firm identified 8,000 jobs that will be eliminated and 100 plants that will be closed as part of a plan to reduce the company's workforce by 10% [42].

Summary of Foreign Direct Investment Strategies of Case Firms

What generalizations can be drawn from the strategies of these firms that U.S. investors in foreign dairy-food firms might find noteworthy and possibly worth emulating?

All Have Expanded

In pursuit of profits, all the case firms have expanded in size and, in the process, contributed to industry consolidation. The main reasons given by the firms for expanding include those in Table 4.

Table 4. Reasons Given for Expansion by the Case Firms

Reason	Firm(s) Specifying Reason
To gain market power to countervail the growing power of supermarkets	All case firms
To achieve the large size required to obtain economies of scale in R&D and brand development	NZDB-Global Dairy Company, Kerry Group, Arla Foods, and Unilever
To gain profits associated with consolidating the still fragmented global fluid milk business	Parmalat
To achieve benefits from geographic diversification to include businesses with potentially rapid growth (and high risk) in developing countries and slower growth (and lower risk) markets in the developed world	Nestle
To obtain businesses that complement the firm's core enterprises	Unilever

All Emphasize Product Differentiation

Not surprisingly, all the case firms emphasized product differentiation. Undoubtedly, the firms recognize Porter's notion that a firm can be a profitable processor and marketer of commodities if it is a low cost producer [50]. However, with one partial exception, none the case firms emphasized a low cost processor-commodity marketer strategy. The partial exception emerged for the NZDB-Global Dairy Company, which followed a two-pronged strategy, one component of which was low cost production. For the most part, however, the firms acted as if they attach credence to Warren Buffett's comment that securities in companies selling commodity-like products should come with a warning label that "competition may prove hazardous to human wealth [12]."

There is substantial variation in how the firms pursued product differentiation. A few examples will suffice to show the variation. As indicated earlier, the NZDB-Global Dairy Company superimposes conventional product differentiation (brand development, etc.) on top of being supplied by the world's lowest-cost milk producers. The advantage of this combination is that the benefits of the two strategies are additive. While this practice is more important to the firm's dairy exporting activities than to foreign direct investment in dairy-food businesses, it is strongly applicable to the latter when dairy products of New Zealand origin are sold through the organization's foreign subsidiaries.

Kerry Cooperative (parent of Kerry Group/PLC) was concerned about a host of problems associated with selling bulk and partially differentiated dairy products manufactured from milk produced in Ireland. The concerns emerged in part because milk purchased by Kerry Cooperative was priced under the EU's quota-based Common Agricultural Policies and carried the baggage that goes with quotas. Partly because of these concerns the company diversified heavily into food ingredients—many with nondairy components—and into branded food products. As a result, only about 11% of the firm's sales in the late 1990s originated from milk of Irish origin.

Unilever modified its brand strategy beginning in the late 1990s by pruning the firm's brands with the objective of reducing the total from about 1,600 to 400. The pruning will take place partly by allowing minor brands to "wither on the vine." Nestle does not prune brands as vigorously as Unilever. Indeed, Nestle has maintained literally thousands of brands, many of which are registered in only one country. Local brands have been useful to Nestle for expanding sales of the company's products in developing countries.

"Ization" is Practiced by Unilever, Nestle, and Others

Unilever reports that the firm began to fill local executive and technical positions in the early 1940s through a process that company insiders refer to as "ization." Thus, there was "Indianization" of subsidiaries in India, Brazilianization of subsidiaries in Brazil, etc. While Nestle does not give the staffing of its foreign subsidiaries the same name, the firm follows staffing

practices somewhat similar to "ization" for its numerous foreign units. While the "ization" process is well established in Unilever, the firm has installed stronger central controls on local managers. Other large case firms that practice variations of "ization" are putting in place mechanisms to see that good ideas relating to technology and marketing are shared across all units of the firm.

All are in Near-Constant Pursuit of Efficiencies

The publicly-held case firms, in particular, have pursued familiar cost-cutting measures that involve plant closings, worker layoffs, and greater use of e-commerce. Shareholders in the firms undoubtedly demand such behavior. The brand pruning strategy of Unilever is being done in part to achieve greater efficiencies. Nestle seeks to discover the root causes of competitive advantage for the firm, a practice that often involves identifying efficiencies. The New Zealand Dairy Board-Global Dairy Company is seeking to achieve greater efficiencies in processing, marketing and on-farm milk production. The greater on-farm production efficiencies are being sought to ensure that the New Zealand dairy industry maintains arguably its greatest source of competitive advantage—the lowest milk production costs in the world.

Unique Strategies of Individual Firms

Most case firms exhibit unique strategies that serve them well. The cooperatives (i.e., Arla Foods and the NZDB-Global Dairy Company) and cooperative public limited company (Kerry Group) have pursued strategies that are especially noteworthy.

Arla Foods. This firm has put in place strategies that have permitted the firm to:

- Establish itself as one of the world's leading suppliers of value-added, milk-based ingredients for selected segments of the food industry. A manifestation of the strategy was the joint venture entered into by Arla Foods and SanCor of Argentina to create the first large-scale whey processing plant in Argentina.
- Create a Key Account Management System to promote close cooperation with a few multiples (supermarkets) as to product range, terms of delivery, logistics, and product development. This helps the firm to continue to be a preferred supplier of larger supermarkets.
- Remain nimble despite its large size. This allows the firm to efficiently redirect sales relatively quickly when market conditions change.

NZDB-Global Dairy Company. The important strategy of superimposing product differentiation on top of being supplied by the world's lowest-cost milk producers was noted earlier. In addition, the firm recognized in a timely fashion the need to restructure the New Zealand dairy industry's exporting-foreign direct investment mix to recognize limits on opportunities to expand dairy exports. On a related point, New Zealand's dairy industry recognized that it had outgrown the need for the NZDB to serve as a monopoly exporter. Hence, the NZDB will merge with the two large cooperatives that dominate New Zealand's dairy industry, and within about a year is expected to relinquish its monopoly exporting privilege.

Kerry Group/PLC. This firm's diversification into food ingredients and product differentiation strategies served the organization well after it found itself placed in an untenable position by a 20% loss of milk supply and an unfavorable market environment for its major products. While the cooperative was innovative in converting itself into a cooperative public limited company to raise capital needed for acquiring foreign firms, this probably was not the firm's most important strategic move. The more important measure was its ability to keep superior, insightful management in the employ of the firm for a generation.

Strategies of Other Case Firms

Other case firms pursued unique strategies that are more difficult to categorize. A few noteworthy strategies that relate specifically to foreign direct investment in dairy-food business appear below.

Parmalat. This firm developed proficiency in tapping capital markets that permitted the company to successfully finance a host of major dairy acquisitions in the 1980s and 1990s. Secondly, the firm has adopted strategies that made it a world leader in UHT milk. This capacity has proven particularly useful to Parmalat for expanding fluid milk sales in developing countries. Finally, the firm is partially transforming itself from a producer of partially differentiated dairy products into a "nutrition company" that will produce functional foods that satisfy consumer groups with new products that have special health characteristics.

Kraft Foods. This firm's successes probably reflect the impact of generally superior management rather than pursuit of any particular strategy. But unwavering pursuit of product differentiation is a strategy that has produced superior results for the firm. For example, Kraft Foods North America purchases the majority of its cheese from other firms for further processing rather than processing cheese from raw milk. This has permitted the firm to focus on the value-added segment of the cheese business and use the firm's marketing prowess to advantage.

Nestle. Firms such as the NZDB-Global Dairy Company point to Nestle as the model to be emulated in international markets for highly differentiated products. The balance the firm maintains between developed and developing country sales, its use of variations of an "ization" staffing strategy, and a bundle of other strategies have served the firm well. The firm employs a goal of real 4% internal growth as an important benchmark for the firm's employees. Nestle's CEO described the importance of the benchmark as follows: "I've done it (established the 4% benchmark) for Nestle's employees. If all I wanted was growth, I could do that myself with a banker and a negotiator, through acquisitions [74, p. 117]." This comment about ways of attaining growth appears to reflect some disdain on the part of Nestle for growth through acquisitions—an attitude that contrasts sharply with that of several other case firms.

Unilever. Unilever is a company in transition. The firm recently emphasized acquisitions (Best Foods, Ben & Jerry's Homemade, and Slimfast), efficiency measures, and core brands that the firm hopes will lift the firm into the top tier of larger international food firms in terms of profitability. It has also adopted the forward-looking strategy of incorporating products into the "bloodstream" of the business that save the consumer time. The jury is still out on whether these strategies will produce the results sought by the company.

Implications for Foreign Direct Investment in Dairy-Food Businesses by U.S. Firms

The case firms have, for the most part, adjusted well to the distinctive conditions in which they found themselves. Nestle's geographic diversification decisions, which took the firm into the growth markets of Asia and Latin America reflect, in part, the belief that U.S. and Western European dairy-food markets are "flat and fiercely competitive." This diversification decision by a model firm has implications for U.S. firms. Maybe the implication is as simple as "if Nestle is doing it, maybe there are profits in it."

The NZDB-Global Dairy Company's decision to emphasize foreign direct investment that produces dairy products using milk produced in the country where the foreign direct investment has been made, speaks volumes about how this largest of the specialized, private dairy exporters views prospects for expanded dairy exports. The implications to be drawn might be similar to those generated by Nestle's behavior. In addition, the NZDB-Global Dairy Company is likely to provide strong competition for U.S. firms in foreign markets where U.S. direct investments might be made.

While Nestle and the NZDB-Global Dairy Company are models for other firms to emulate, the decisions of MD Foods and Arla Cooperative also warrant the attention of U.S. dairy cooperatives. MD Foods and Arla Cooperative appear to have done many things correctly. The two firms gave strong attention to strategic fit as they contemplated the merger. Arla Cooperative, for example, lacked the international sales network possessed by MD Foods. Now the merged organization has the international sales capabilities, a larger milk supply, and expanded R&D capability. The Arla Foods joint venture with SanCor in Argentina promises to make Arla-SanCor a strong competitor for U.S. firms attempting to sell dried whey in the growth markets of Latin America.

Parmalat's view that the global fluid milk business is fragmented and ripe for profitable further consolidation guided that company's acquisition binge in the 1990s. If correct, Parmalat's view of the world has implications for the new Dean Foods Company (Suiza-Dean combination). Presumably, the new Dean Foods will seek to further consolidate processing and marketing of fluid milk in the U.S., and perhaps extend the firm's operations more fully into the international arena. Mexico and Canada will be logical early geographic extensions.

One lesson for U.S. firms that might become more heavily involved in foreign direct investment in dairy-food businesses does not relate heavily to strategy. Upon reflection, the reader will probably conclude that the case firms, for the most part, have merely responded thoughtfully to the situations in which they found themselves. Thoughtful responses, however, are not foreordained. The successful responses have occurred substantially because the firms have assembled and kept superior management for extended periods. Given their resources, it is perhaps no surprise that the large, publicly held firms (Nestle, Unilever, Kraft Foods) could keep such a stable of managers, but the cooperative case firms also pursued practices that allowed them to retain strong managers.

The "Bottom Line" for U.S. Foreign Direct Investment

Of course, the summary points and implications do not fully answer the question relating to when U.S. firms will become bigger foreign direct investors in dairy food businesses. They merely say a little about what it might take for additional U.S. firms to become successful foreign direct investors in these businesses. However, few key points have emerged:

- Most of the case firms expanded direct investments in foreign markets partly because of constraints in the home country. The European-based firms and the NZDB-Global Dairy Company are all located in countries where the size and growth prospects for the home country market are limited. U.S. firms face no comparable constraint. Hence, they lack incentives as strong as those of the New Zealand and European firms to engage in foreign direct investment in dairy-food businesses.
- Several European case firms had strong brands that cried out for expansion. With the exception of Kraft Foods, few, if any, U.S. dairy firms have brands as strong as those of several European firms. Hence, the incentives of U.S. firms to foster brand expansion by engaging in foreign direct investment in dairy-food businesses are lower than those facing some European firms.
- Foreign direct investment in dairy-food businesses indeed may be somewhat of a "big firm's game." The successful firms analyzed were all multi-billion dollar firms and capitalized on the advantages associated with large size. The consolidation that is taking place in the U.S. dairy processing and marketing business should increase the ability of selected U.S. firms to compete effectively in this environment.
- If, as claimed by the former CEO of Nestle, much of the U.S. dairy-food market is "flat and fiercely competitive," this will provide incentives for U.S. firms to consider additional foreign direct investment in dairy-food businesses. Whether a U.S. firm should engage in foreign direct investment is, of course, a complex question that must be based on a firm's individual circumstances and capabilities. The decision also should take into account a firm's desire to gain early-mover advantages. But, unlike the situation for dairy exporting—where price supports and border protection price many U.S. dairy products out of world markets—the barriers to foreign direct investment are less daunting. The prevalence of foreign direct investment by a diverse cross section of firms suggests something about how feasible it is to do successfully.

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