World vegetable oil markets are increasingly dynamic, with total consumption up nearly two-thirds in the last decade alone. Soybean oil and palm oil together account for nearly two-thirds of world utilization, and most of the world's recent production growth. However, the structure of world production and consumption has become increasingly uncertain. Thousands of food products formulated on the basis of the current competitive supply and price structure face sharply increasing uncertainty in the future from issues such as:

- What will the growing competition for available vegetable oils for industrial uses (especially as fuel) mean to food manufacturers?
- What effect will labeling requirements for trans fatty acids, along with concerns about dietary levels of saturated fats have on oil demand in the United States and abroad?
- What impact will declining US soybean acreage and production have on soy oil availability and prices, here and overseas?
- Will these trends change the vegetable oil and fat pricing structure and the composition of future vegetable oil formulations in the United States and overseas?
- Who are the potential winners and losers from these changes, and what strategies are available to end users to deal with this growing uncertainty?

These and other dynamics of the North American and world vegetable oil markets will be incorporated into the Sparks comprehensive analysis of The Vegetable Oil Market: New Challenges and Opportunities.
**Background**

World vegetable oil production has grown by nearly two-thirds over the past decade and could potentially reach 101 million tonnes this year. The expansion of oil palm plantations in Southeast Asia and the aggressive development of soybean acreage in South America have accounted for nearly all of the growth, while production of minor oilseeds and oils generally have remained flat.

Growth in vegetable oil consumption is driven mainly by economic expansion in developing countries. Vegetable oil consumption also is growing in the developed world, but primarily among premium oils with special nutrient profiles. Consumption of vegetable oils in the United States is among the highest in the world, although growth in oil use is below that of developing countries.

The most rapid consumption and import growth has been in a few very large markets including India, Pakistan, China, North Africa and the Middle East where price is a very strong competitive factor and where palm oil has a strong advantage. Global consumption of palm oil over the past decade more than doubled (and, could reach 27.6 million tonnes this marketing year). Over the same period, soybean oil use also has grown rapidly, up 73% (from a larger base) to an expected 31.9 million tonnes this year. Together, these two oils dominate world trade and could comprise nearly 60% of global vegetable oil consumption this year.

In this highly competitive environment, a well-defined structure of vegetable oil price relationships has evolved in recent years within the United States and worldwide. Food manufacturers formulate their products on the basis of technical characteristics of the oils (and of the foods themselves) and, for many products, after extensive research concerning taste, shelf-life, nutritional characteristics and other characteristics. Formula changes are risky, difficult and expensive for many food products and virtually impossible for others.
Thus, significant changes in the competitive position of major oils imply severe cost impacts and potential threats to some food products themselves. Within this environment, today’s vegetable oil markets in the US are under pressure from three separate sources:

- New requirements to label trans-fatty acid levels in foods are generating pressure to shift formulas for some products away from hydrogenated oils, shifting the demand for oils with high trans-fat levels;
- While US supports for soybean producers were formerly greater than corn, the 2002 farm bill attempted to harmonize support levels, and prospects have shifted modestly in favor of corn. At least in some parts of the United States, analysts expect that returns from corn (stimulated by growing industrial markets) will exceed those from soybeans enough to reduce soybean production. Combined with the dynamics of the US livestock industry and soybean meal feeding rates, the availability of soybean oil could be restrained;
- The growing demand for clean-burning fuels that reduce both air pollution and ground-water pollution is attracting growing amounts of vegetable oils in the production of bio-diesel fuels. While bio-diesel is well established in the European Union, it is in its early phases in the US, but could be accelerated by the new energy legislation now being drafted. It could mean significant impacts on the demand for vegetable oils in the US and abroad in the intermediate term.

Although the growth rate of US oil consumption has slowed in recent years, the United States likely will become a net edible oil and fat importer in 2003/04 for the first time since 1975/76 as oilseed production stagnates and the crush declines. This tightening supply, together with greater competition from overseas oilseed and oil palm production in low cost producing regions could noticeably reduce US export prospects in the future.

Sparks Companies, Inc. regularly consults with firms grappling with a broad range of economic, technical and political issues throughout this highly dynamic sector. As new questions arise and old conflicts intensify, Sparks is being asked by clients to step back...
and analyze the new pressures facing the vegetable oil industry, the outlook for investment across the sector and the competitive position of US products in world markets.

Consider a few of the challenges and questions currently faced by producers and consumers of vegetable oils:

- **What factors are driving the consumption and import growth** for vegetable oils in each major importing country? How persistent are these likely to be? What will be the competitive position of each of the major oils in each market?

- **What is the market outlook for each major oil in the premier markets** (China, India, EU, and Pakistan)? What will be the major trends in each?

- **What will be the main production drivers and competitive position of investment in the production of vegetable oil** in Latin America, Southeast Asia, India, North America and elsewhere? Will Indonesia overtake Malaysia as the world’s largest palm oil producer?

- **What will be the impact of new trans-fatty acid labels** on product formulations and consumption of individual competing oils in the United States? Will high oleic oil consumption grow rapidly in the US?

- **How will the breakdown of World Trade Organization (WTO) negotiations impact the trade and supply of vegetable oils in key markets?** In a world where multilateral trade is diminished, bilateral agreements will prevail and this likely will result in more volatility in markets and likely inefficiencies.

- **What will be the implications of increased use of vegetable oils in fuels** in the United States and in the European Union?

- **What are the key drivers of increased vegetable oil consumption in the United States,** and what changes can be expected in the competitive position of each major oil?

- **What will be the likely competitive position of US soybean oil in world markets?** Will the United States become a net importer of soybean oil? Will the current shift of the US becoming a net vegetable oil and fat importer continue?

**About the Proposed Study**

The purpose of the study is to take a hard look at future vegetable oil markets and the factors likely to affect them in the coming decade, both domestically and globally. It will systematically examine the current trends in both supply and demand for competing vegetable oils, public policy and a broad range of other factors that are affecting domestic and international markets. The team will focus especially on the politics, regulatory
issues, and consumer attitudes that continue to challenge vegetable oil products—and the likely outcome of pending debates. Notions of magnitude and relative importance of trends and impacts will be developed where possible.

The study will focus initially on world and domestic vegetable oil markets, and the likely future role of US soybean oil in those markets. Continued uncertainty and a number of new developments prompt this special, new multi-client study focusing especially on the political, regulatory, and marketing issues facing vegetable oil processors and end users in the North American agricultural and food systems.

The study approach will include a mix of desk research, expert interviews and economic analyses to compile a comprehensive study report. This report will offer a review of market developments and investment patterns, policy shifts and other factors that brought us to where we are today, as well as an analysis of the market and regulatory pressures likely to follow from the current debates. Particular attention will be paid to trade policy issues (especially with the breakdown in WTO talks), production sector implications, consumer concerns and global food security matters.

Throughout the study, clients will be asked to participate actively, especially at the start to help chart the study’s exact course and identify the specific aspects to be emphasized. The study content will be focused to best reflect client concerns and special interests that arise from the kickoff meeting.

The Analysis

The project will develop a comprehensive study of factors affecting world vegetable oil production and trade, along with projected composition of US oil requirements.

Study Approach. Major economic trends, shifts in consumer tastes and preferences, local production, consumption, policies and other developments will be addressed. Sparks will develop a highly detailed analysis of vegetable oil trends (for the past ten years) and the outlook over the next decade. More specifically, for each of the world's major nations and regions, the model will consider:

- **Macroeconomic Trends.** A brief review of key macroeconomic trends expected for the future, together with impacts of these trends in major countries.

- **Trade Policies.** Review and evaluation of key trends, and possible changes affecting the outlook.

- **Agricultural Policies.** A brief review of major policy trends affecting agriculture in the United States and major markets and competing producer countries.

- **Other Key Assumptions.** Other major country and region information and assumptions would be reviewed.
Draft Study Outline

I. Introduction - Why this Study and Why Now?
An overview of world supply and demand trends for major vegetable oil products, and the major factors driving each.

II. The New Demand for Vegetable Oil: The Recent History and Key Developments
Vegetable oil demand is growing rapidly in many markets, especially in the world's most populous developing countries. This section will review the key economic and social drivers behind these trends in selected countries and estimate their impact on future world demand and trade. Particular emphasis will be focused on trans fatty acid labeling requirements, and the potential impacts of these new regulations and dietary concerns.

III. World Investment in Vegetable Oil Production--Recent Developments and Trends
Production and export of vegetable oils have been highly attractive investments for a number of Latin American and Southeastern Asian exporters, especially. What factors affect the supply of these products, what changes the competitive position of each, and what will be future investment patterns?

IV. International and Trade Patterns and Concerns
This section will evaluate the future trade position of each of the major exporters and importers and key factors affecting each. In addition, it will develop and present a world trade matrix for selected major countries and each major oil with a 10-year horizon.

V. Focus on the United States
This section will focus on key economic, social and regulatory trends affecting markets for vegetable oils in the United States, and the outlook through the next 10 years. It will draw upon historic trends and current experience to provide a step-by-step analysis of the structural and market implications of continuing developments in vegetable oil demand, production and trade.

VI. Conclusion and Key Findings
A concise summary of the key findings and implications, with a focus on expectations for the future, will be provided.
Deliverables

The project will involve several specific products for participating clients, including:

- **Pre-Study (“kick-off”) Conference.** A meeting of participating clients and Sparks study staff will be held in Memphis, Tennessee, to review the detailed plans for the study and to *identify particular areas and issues to receive special attention*. This conference will address the major study topics, provide a presentation on each topic to update clients on current developments, and enable specific client comments and interests relating to each topic to be noted.

- **Comprehensive Study Report and Presentation Materials.** Clients will receive the fully documented study report, *The Vegetable Oil Market: New Challenges and Opportunities*. The report will include all new and fully updated background statistics, analyses and evaluations, empirical projections and supporting detail developed during the study. Clients also will receive copies of all PowerPoint presentation materials used in reporting study results. (All materials will be available both electronically and in hard copy.)

- **Post-Study Seminar.** Sparks staff will present the results of the study at a concluding day-long client seminar, with ample time for the group to participate in discussing the implications of the findings.

- **Final Report Presentation at Clients' Offices.** Sparks staff will travel to client offices to present the final report and conduct in-house seminars, as requested. These seminars are tailored to each client’s individual needs and interests, and provide a unique opportunity to stimulate discussion and bring an outside viewpoint to within an organization. Sparks staff will present these findings at the clients’ offices for only out-of-pocket expenses.

**Preliminary Project Schedule**
(Dates to be finalized once signup is complete)

<table>
<thead>
<tr>
<th>Date Range</th>
<th>Event</th>
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<tbody>
<tr>
<td>October 2003</td>
<td>Pre-study conference and study begins</td>
</tr>
<tr>
<td>December, 2003</td>
<td>Study completed – final report sent to clients</td>
</tr>
<tr>
<td>December-January, 2003</td>
<td>Client seminar to review report</td>
</tr>
<tr>
<td>January 2003—May 2004</td>
<td>Individual presentations at client offices</td>
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**Study Fees**

The fees for participating in the study are $14,500 for Sparks clients and $16,500 for non-clients. The fees include attendance at the pre-study conference, the client group review seminar, and a presentation at clients’ offices by Sparks staff (as requested). Cost of company representatives' travels to the conference and seminar, and expenses for Sparks staff travel to companies' offices for the presentation are not included.
Study Team

Mr. Rob Westmoreland, Executive Vice President, will coordinate the project in the Sparks Memphis, Tennessee, headquarters. Other staff with directly relevant experience will actively participate, including Dr. Bruce Scherr, Dr. Don Frahm, Mr. Scott Richman, and others. In addition, consultants with extensive experience evaluating various aspects of the industry will serve as special advisors to the study team. Brief notes on the lead analysts follow.

- **Rob M. Westmoreland, Executive Vice President.** Mr. Westmoreland's responsibilities include overseeing the Sparks grains, oilseeds, and other crop and food ingredient research and analyses functions and client services. His many food and agribusiness consulting assignments include commodity planning, price risk management and business strategic planning for a wide spectrum of US and international food and agribusiness companies. Previously, Mr. Westmoreland was group vice president and general manager of Pillsbury Industrial Foods. His management experience includes economic analyses and commodity risk management, business strategic planning, marketing, and general management in food processing. He is an economics graduate of Rice University and of the Stanford University Graduate School of Business.

- **Bruce A. Scherr, President and Chief Executive Officer.** Dr. Scherr has been with Sparks since 1987 and has worked extensively with companies to develop improved price risk management procedures, to organize and manage purchasing and merchandising programs, and to assist agribusinesses and public sector institutions in strategic and tactical planning. Formerly he was president of Sparks, Jacobs, Scherr, Inc. (SJS), a sister company to Sparks, and president of Agri-Commodities, Inc., an agriculture consulting firm based in Andover, Massachusetts, which was acquired by SJS. Prior to forming Agri-Commodities, Dr. Scherr was a divisional vice president at Data Resources, Inc., where he developed and utilized for the public and private sectors the first commercially available econometric model for US agriculture. Dr. Scherr received his bachelor's degree from Rutgers University and his master's and doctorate degrees from Purdue University, all in agricultural economics. Currently, he is a member of the Board of Trustees of North American Electric Reliability Council (NERC). He served as a member of the Board of Directors for Desert STAR Inc., an electrical transmission Independent System Operator for the Desert Southwest from January 2000 through February 2002. In addition, Dr. Scherr has served as a member of the University of Tennessee’s (UT) Institute of Agriculture Agricultural Development Board and UT’s Committee for the Future. He is a member of several honorary research and agricultural societies, a member of the National FFA Foundation Sponsors’ Board 2000 through 2001 and a former advisor to the President's Council of Economic Advisers and National Aeronautics and Space Administration.
• **Donald G. Frahm, Senior Vice President.** Dr. Frahm manages the Sparks acreage and production research, and provides client services and consulting as well as long-term forecasting and planning. Prior experience includes work with grain merchandising and brokerage companies and as senior economist with the American Soybean Association as well as faculty positions at the University of Nebraska and Purdue University. His bachelor’s degree is from The Ohio State University and his master’s degree and doctorate degrees are from Purdue University.

• **Dr. William C. Motes, Senior Vice President.** Dr. Motes has more than 30 years of experience in the evaluation of world markets and trends. He has worked and traveled extensively in Africa, Latin America, Europe, and Asia to evaluate impacts of policies and programs. Under this project, he will have primary responsibility for the data collection, government and industry interviews and the development of the research findings and conclusions. His bachelor’s and master’s degrees are from Kansas State University, and his doctorate degree is from Iowa State University.

• **Scott A. Richman, Vice President.** Mr. Richman provides management consulting services to agribusinesses, food companies and related associations, with emphasis on financial feasibility studies, business plans and the positioning of products within specialized markets. Additionally, he has substantial experience in performing economic impact analyses and constructing market forecasts. Mr. Richman has worked extensively with the agricultural biotechnology, grain processing, and meat packing industries on such projects as an analysis of the economic impact of herbicide resistant crops, long-term forecasts of the ethanol market and the formation of a pork cooperative. In addition to work in North America, he has participated in business planning efforts in Poland. He received his bachelor's degree in economics from Vanderbilt University and his master's degree in international affairs at Columbia University where he specialized in international business.

• **Dr. Mark Jekanowski, Vice President.** Dr. Jekanowski is responsible for economic analyses and agricultural policy research at the Sparks Washington, D.C., office. Prior to joining Sparks, Dr. Jekanowski was an agricultural economist in the Food Markets Branch of USDA’s Economic Research Service where his research focused on the changing structure of the food manufacturing and retailing industries as well as trends in consumer demand. He received his bachelor’s degree in resource economics from the University of Massachusetts at Amherst and his master’s and doctorate degrees in agricultural economics from Purdue University.

• **Bradley C. Anderson, Vice President.** Mr. Anderson is responsible for the Sparks oilseeds, protein and vegetable oil research. Mr. Anderson also is the research coordinator of data and technology. Prior to joining Sparks, he was a feed grain analyst in USDA's Agricultural Stabilization and Conservation Service. He also served as legislative assistant to US Senator Rudy Boschwitz and US Representative Vin Weber, both of Minnesota. Mr. Anderson received his bachelor's degree in agronomy from North Dakota State University and his master's in agricultural economics from the University of Minnesota.
• **Kurt J. Collins, Analyst, Tropical Products.** Mr. Collins is responsible for the Sparks fundamental economic research of several commodity markets including vegetable oils, cocoa, frozen concentrated orange juice, and tropical oils. Mr. Collins received his bachelor’s degree in agriculture and food business management from the University of Minnesota and his master’s degree in agricultural economics from Purdue University. Prior to joining Sparks, Mr. Collins was a floor trader and commodity researcher for Horsager Trading Company in Minneapolis, Minnesota.

• **Juan E. Sacoto, Vice President.** With Sparks since 1997, Mr. Sacoto’s responsibilities include research and analyses for international and domestic consulting clients. His work often involves market assessment, financial and competitive analyses, economic modeling, strategy, and economic impact and risk management studies. Mr. Sacoto works in several commodity areas analyzing agricultural markets in the US and abroad. He also has extensive experience evaluating agribusiness industries and agricultural markets in Mexico and South America. He is fluent in Spanish and has broad cross-cultural training. Prior to joining Sparks, he worked as a financial and equity analyst. He received his bachelor's degree in finance from Jacksonville State University and his master's in international business administration from The University of Memphis.

**About Sparks Companies, Inc.**

Sparks Companies, Inc. is a private food and agriculture consulting firm with a highly capable staff, a very comprehensive data/information system, and close association with major private agribusinesses worldwide. It is a world leader in the collection, analysis, and dissemination of agriculture and food information. Headquartered in Memphis, Tennessee, Sparks also has offices in Washington, D.C.; St. Paul, Minnesota; Buenos Aires, Argentina; Winnipeg, Canada; and is affiliated with the agriculture research of East-West Consultants Limited, based out of Beijing, China. In operation since 1977, Sparks Companies, Inc. serves more than 400 commercial clients, government agencies, law firms, associations, and others with high quality analytic information and consulting services. The Sparks team has extensive experience in agribusiness and agricultural policy decision-making. Many employees formerly held senior policy, analysis or advisory positions in government; worked for major trade associations; held positions in land grant universities; or held senior management positions in leading agribusiness companies. (For more information on Sparks, its staff and the services it provides, see [www.sparksco.com](http://www.sparksco.com).)

**Selected Relevant Experience in Project and Market Evaluations**

Sparks routinely conducts market and program evaluations for governments, private companies, and associations throughout agriculture. To support this activity, Sparks maintains ongoing evaluations and projections in markets worldwide with detailed coverage of macroeconomic, agricultural industry and commodity trends for several countries. Selected recent international market assessment experience includes:
- Large numbers of proprietary market evaluation and feasibility studies routinely conducted for commercial clients in domestic and international markets. These include world and domestic market trends for vegetable oils, among numerous other agricultural products.

- **Evaluation of the World Grains/Oilseeds & Products Markets of the Future.** A highly detailed study of the key factors driving current and expected trends in each of the world's major markets and each of the key producing areas for the coming decade (2002).

- **Evaluation of Markets for Soybeans and Products in Five Turkic Republics.** A team of Sparks experts traveled to Turkmenistan, Uzbekistan, Kazakhstan, Azerbaijan and Georgia to gather research information, interview producers, government officials and others across the livestock and crop production sectors in order to evaluate future prospects for livestock feeding, feed use and potential future markets for US soybean products. Prepared for the American Soybean Association (May 1998).

- **Impacts of Trade Liberalization for Oilseeds and Products.** Baseline analysis of world markets for oilseeds, vegetable meals and vegetable oils was prepared for the five years 1995-01. The study evaluated impacts of primary policies and evaluated potential impacts of trade liberalization on US soybean producers. Prepared for the United Soybean Board/American Soybean Association (March, 1997).

- **Boom or Bust? An Evaluation of the World Grains/Oilseeds Markets of the Future.** A highly detailed study of the key factors driving current and expected trends in each of the world's major markets and each of the key producing areas for the coming decade. The study was commissioned by two dozen major commercial firms to evaluate basic commodity production, consumption, trade and price trends and their likely persistence for the future in the United States and worldwide (1996).


- **Evaluation of American Soybean Association Market Development Programs for Soybean Oil in Europe.** An evaluation of programs funded by the United Soybean Board and undertaken by the American Soybean Association to develop soybean oil markets in Europe. A team of experts traveled through key markets in Europe interviewing industry cooperators, government officials and others. Based on available research and the interview results, a comprehensive study report with recommendations for program modifications was developed. Prepared for the United Soybean Board (1993).
ENROLLMENT FORM

Yes, I want to participate in the special multi-client study, The Vegetable Oil Market: New Challenges and Opportunities.

The cost of the study for current Sparks clients will be $14,500 and $16,500 for non-clients. One-half will be billed upon initiation of the study and the remaining one-half upon my acceptance of the final report.

FAX to 901-766-4470

Please have someone contact me to provide further information.

Name: ___________________________ Signature: ___________________________

Title: ______________________________

Company: ____________________________

Address: ____________________________

City, State, Zip: ____________________________

Telephone: ____________________________ Fax: ____________________________

Email Address: ____________________________

Return this form to:

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