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Debt, Trade, and Payments Issues of Developing Countries and U.S.-Mexican Economic Interdependencies

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ABSTRACT

Debt problems of developing countries seriously constrain their economic and social development as well as the prospects and pace of economic recovery in the developed countries. Debt and trade problems of Mexico are particularly important for the U.S. agricultural economy because of the size and importance of U.S.-Mexican agricultural trade. The importance of Mexico as a U.S. trading partner lends importance to research on Mexican supply, demand, and trade of agricultural commodities and on macroeconomic and monetary policies affecting Mexico's demand and capacity to import. The ninth meeting of the Consortium on Trade Research focused on the debt, trade, and payments problems of developing countries and on U.S.-Mexican economic relationships.

Keywords: Debt, trade, Mexico, United States, agricultural policy, research.

PREFACE

This report summarizes papers and discussions at the ninth meeting of the Consortium on Trade Research held in Tucson, Arizona, December 15-17, 1983. Organizers were Jimmye S. Hillman, Maury E. Bredahl, and Charles E. Hanrahan. The consortium focused attention on debt problems of the developing countries, U.S.-Mexican trade relationships, Mexican agricultural and trade policy, and research needs on Mexican agriculture. Copies of the papers presented at the consortium or in their final form are available from the authors.

This summary was prepared by Charles E. Hanrahan, Economic Research Service, U.S. Department of Agriculture (now with the Congressional Research Service), and Maury E. Bredahl, Department of Agricultural Economics, University of Missouri. Summaries were prepared from materials submitted by the contributors to the consortium.

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HIGHLIGHTS

The major developing country debtors are making structural changes and difficult policy decisions in order to meet their debt service obligations. Much of the burden of adjustment and of maintaining debt service payments falls on the developing countries and groups in society least able to sustain cuts in their living standards. The current shortage of credit and rising interest rates make it difficult for developing country debtors to realize the revenue streams from investments made in the seventies. Mexico is such a case. Much of its current economic difficulty is rooted in external disturbances. Mexico's future economic health depends largely on its ability to generate a surplus of foreign exchange through exports of energy and other products.

The ninth Consortium on Trade Research focused attention on the generic problem of debt of the developing countries, U.S.-Mexican agricultural trade, and research needed to understand better U.S.-Mexican agricultural trade relations.

U.S.-Mexican agricultural trade flourished during the seventies. Mexico's imports of U.S. agricultural products expanded largely as a result of a rapidly growing Mexican economy, declining per capita production of major crop and livestock products, generous food subsidies, and a rapidly expanding population. Credit currently plays an important role in enabling the United States to supply and Mexico to import U.S. food and feed grains.

A number of trade policy problems complicate U.S.-Mexican economic relationships. Mexico wants to diversify its export trade and move away from heavy dependence on the United States as both a supplier and market for Mexican goods. Mexico still maintains a range of import duties on basic foods and agro-industrial inputs and uses import licenses and taxes to control trade. A troublesome issue is Mexican unwillingness to join the General Agreement on Tariffs and Trade. There are, however, intergovernmental mechanisms in place to facilitate resolution of U.S.-Mexican trade disputes.

The consortium focused also on the political economy of Mexican agriculture. The rationale for government involvement in the Mexican agricultural sector has evolved considerably since the 1910 Revolution. By successive administrations, Mexican agriculture has been considered as a candidate for reform and for redistribution of resource ownership and income, as an engine of growth of the domestic economy, as an adjunct to the industrialization of the Mexican economy, and most recently as a source of food self-sufficiency. The major factors shaping Mexican agricultural policy have been the internationalization of the Mexican economy, the growth in importance of agribusiness, the growth of petroleum exports during the seventies, and most recently the fiscal and foreign exchange crisis of the early eighties.

Mexico is so important to U.S. agriculture that it is a major focus of research in the Economic Research Service (ERS). Not only must ERS give high priority to improving the agricultural data base for Mexico, but it must monitor and forecast Mexican economic and agricultural developments. Four broad areas of research on Mexican agriculture are required: supply potential and supply response; domestic demand; macroeconomic and monetary factors affecting demand and imports; and policies affecting supply, demand, and trade.

Consortium on Trade Research

Debt, Trade, and Payments Issues of Developing Countries and U.S.-Mexican Economic Interdependencies

DEBT, TRADE, AND PAYMENT ISSUES AND THE MEXICAN CASE

The Indebtedness Problems of the Major Developing Country Borrowers

by Chandra Hardy

While the major debtor countries suffer from a cash squeeze in meeting their present debt service obligations, their productive capacity has substantially expanded over the past decade. The largest debtors are middle-income countries which have achieved rapid rates of output growth and built up impressive production capabilities. But the shortage of credit and the rise in interest rates add to the delays and reduce the revenue stream of many good projects.

Debtor countries are making structural changes and difficult policy decisions in a period of reduced growth, but they appear to be approaching the social limits of such adjustments. The burden of adjustment and of maintaining debt-service payments falls entirely on the developing countries and on those groups in society least able to bear the cuts in living standards. To meet the challenge of their rapidly growing labor force and to protect the gains they have made over the past two to three decades, debtor countries have to move from austerity to recovery.

A recovery of output growth in the developing countries is also needed for a recovery in the industrial countries. During the seventies, the value of world trade grew almost sixfold to exceed $1,700 billion in 1980, increasing at 7-8 percent per annum in real terms. While the bulk of this trade took place among the industrial countries, the fastest growing trade was among the developing countries. Manufactured exports of developing countries grew at 25 percent per annum in current prices.

This phenomenal expansion of trade was facilitated by the easy availability of large volumes of commercial bank credit. Indeed, the explosive growth of financial markets was necessary to this trade development and its decline is a factor in the current decline in trade growth. In 1980 for the first time in the postwar period, trade grew more slowly than output growth. Initially the decline in credit may have been in response to the slowdown in trade growth due to the recession, but it has since been the dampening factor.

The developing countries account for 40 percent of the exports of the industrial countries and if there is to be a recovery in the developed countries without a resurgence of inflationary pressures, the recovery will probably have to be export-led. Measures to ease the global liquidity problem are therefore urgently needed. Improving the term structure of the debt would be a first step.

The Mexican Economy: A Sectorial View

by S. Kenneth Schwedel

A seemingly ever-increasing demand for oil at ever-increasing price levels led Mexico to quick and easy solutions to long-term social and economic problems. Financed by deficit spending, the Mexican Government's stimulation of the economy resulted in annual real growth of Gross National Product in excess of 8 percent in the late seventies and early eighties. The rapid growth of the economy induced rapid inflation and, despite devaluation, an overvalued peso. The situation was aggravated in 1981 when, faced with a fall in the price of oil, the Government increased borrowing to avoid slowing the rate of growth.

The dimension of the economic crisis emerged in 1982. In order to halt the flight of capital, exchange controls were imposed and the peso devalued from 26.6 to the dollar in January to nearly 150 at year's end. The devaluation and other controls reduced imports, primarily by the private sector. The downturn in economic activity coupled with increased Government spending caused the deficit to grow to over 17 percent of GNP.

In this environment, the de la Madrid administration formulated a new economic policy at the end of 1982. This policy, geared toward meeting the goals of the IMF agreement, can be described in one word, austerity. In order to reduce the deficit, taxes have been increased and subsidization of consumer goods has been slashed. All of these events have led to a dramatic, pervasive contraction of the economy.

Retail sales are estimated to be off 15 percent; consumer durables, down 35 percent. Car production has fallen 35 percent; truck production, down 61 percent. A bright spot is foreign tourism estimated to have increased 24 percent. Inflation will exceed 100 percent, placing pressure on the Government to increase wages.

The Government faces a number of difficult decisions in 1984. A decision to stimulate the economy could lead to the contraction-expansion dichotomy characterizing management of the Mexican economy. Previous administrations have been unwilling or unable to hold to self-imposed limits. The probable result will be an easing up, but not a clear expansionist policy. If the deficit increased to between 5.5 percent and 6.5 percent of GNP, average inflation will exceed 50 percent, but then will expand about 2 percent in real terms. The clear danger is to fall prey to pressures to over stimulate the economy.

Third-Country Monetary Disturbances in a Changed International Economy: The Case of Brazil and Mexico

by G. Edward Schuh

The emerging international economic system affects the economic performance of individual countries. Brazil and Mexico are two important case studies. The decline in the dollar's value in the seventies helped Brazil weather the effects of the first oil shock, while the rise in the value of the dollar in the eighties complicated Brazil's adjustment to the second oil shock. What most distinguishes the Mexican experience are the large monetary shocks associated with large fluctuations in the real exchange rate. The most important institutional and policy implications from the experience of these two countries is the extent to which their difficulties were rooted in external disturbances. This points to the need to reform the international financial institutions.

Foreign-Exchange Constraints and Mexican Agricultural Trade

by Philip C. Abbott

Mexico's foreign debt problem and the adjustments to reduce Mexico's staggering debt burden are important issues for U.S. agricultural trade. Mexico is not only an important exporter to and a competitor in some U.S. agricultural markets, but also a substantial importer of U.S. grains and oilseeds. Economic policies adopted in Mexico have altered the price structure and incentives to trade and have caused severe reductions in income growth, dampening import demand.

The purpose of special Purdue University research is to understand the linkages between a developing country's foreign exchange position and its agricultural trade. Mexico provides an example of problems being experienced in many developing countries, so modeling approaches are being developed and tested for Mexico which are to be extended to other countries. The notions behind this research and the model used are that developing countries were a dynamic force in expansion of agricultural trade in the seventies due to their rapid income growth, and that foreign exchange shortages will hamper continued expansion. Hence, a disaggregated version of the two-gap model of Chenery emphasizing the agricultural sector has been constructed for Mexico and is used to investigate these issues.

Preliminary results indicate that the model can be used to explain the causes of Mexico's current difficulties and to predict the impact of certain policies. Longrun projections indicate that Mexico's future as an agricultural importer hinges on its ability to continue to generate a surplus of foreign exchange through the export of energy. Mexico's agricultural comparative advantage depends on the exchange rate, which in turn depends on Mexico's ability to generate foreign exchange from other sectors of the economy, especially energy.

Discussion by Richard R. Barichello

The papers by Hardy, Schwedel, and Schuh ranged from a sectoral review of the Mexican economy, to an overview of newly industrialized country (NIC) indebtedness, to a comprehensive survey of trade and payments issues.1/ Schwedel's detailed survey of different sectors of the Mexican economy provides documentation of several of Hardy's statements on indebtedness for the case of Mexico. His generally optimistic conclusions, however, could be tempered by the withdrawal of new commercial bank lending and consequent difficulty in Mexican financing cited by Hardy, and the global institutional reform challenges noted by Schuh.

Hardy's illuminating paper on NIC indebtedness gave particular attention to debt restructuring and default. She elaborated on the reasons for the current problems, concluding that they were largely exogenous to the affected countries. As Schuh also notes, this contradicts casual impressions that debtor mismanagement has been the major cause. Hardy's explanations do not include the possibility of default as a policy option which, under some conditions, may be a rational choice.

Schuh addressed the increased economic interrelations among countries and examined the recent crises in Brazil and Mexico. On the former, his insightful synthesis included increased trade, the international capital market, and flexible exchange rates. The importance of the United States in these areas, particularly U.S. monetary instability, was emphasized. A concluding note of warning was made that solutions to these problems will require major institutional restructuring, with attention to flexibility and policies of adjustment. The international dairy market is a good example. Accommodation of mounting surplus production and coordination of autarkic domestic policies will require creative new institutional arrangements.

1/ Abbott's paper was not presented in this session and was therefore not discussed by Barichello.

U.S.-MEXICAN TRADE

The Trade Environment

by Clark W. Reynolds

The history of U.S.-Mexico trade is one of increasing interdependence in terms of both the absolute and relative importance of trade to each country. The Mexican share of U.S. total and agricultural imports has risen to third place. Mexico, currently the seventh largest importer of U.S. agricultural products, ranked third a few years ago. Mexican exports to the United States increased from almost $900 million in the early seventies to almost $9 billion in the early eighties, with much of the increase due to energy exports. During the same period, Mexican imports grew from $1.4 billion to almost $12 billion.

While these figures indicate the growing importance of bilateral trade, they do not illustrate the asymmetry of the trade. Mexican trade with the United States accounts for two-thirds of its exports and imports, while that for the United States with its neightbor is only 6 percent of the total. Mexico has been much more vulnerable to shocks from the United States than the reverse, but with growing interdependence, trade and policies must be interpreted in a different light. Analysis of exchange must consider all flows, not only of goods and services, but of labor, capital, technology, tastes, and values.

Evaluation within this framework suggests dynamic adjustment will bring about some degree of convergence in factor prices and incomes. Convergence depends on the conditions of exchange which in an analytical sense can range from "full exchange"--a North American Common Market--to autarchy or no exchange. These two extremes provide insights into the process of adjustment; neither is advocated as a policy framework.

The exchange framework is especially useful in evaluating alternatives given the current economic crisis in Mexico. The United States has a vested interest in the recovery of the Mexican economy and in the convergence of the two economies. The exchange model suggests that the United States can facilitate the flow of capital to the Mexican economy and the flow of goods and services out or face the increased flow of labor migration into the U.S. economy. The key question is which flow or exchange and at what dimension will be least disruptive to the two economies.

The most general hypothesis is that exchange between the United States and Mexico will continue to lead to some degree of convergence of the wages of unskilled labor. That adjustment will occur with or without increased trade of agricultural commodities, but that agricultural trade is likely to make the process less disruptive of income and employment in the United States than adjustment through migration and capital movement.

The performance of the past few years reveals how distorted the process of exchange can become if the policies of either country ignore the consequences for the other country as well as the adverse effects of resulting feedback mechanisms. Attempts by Mexico to increase its growth and independence from the United States led to vastly expanding borrowing and accelerated imports from the United States, leading ultimately to increased dependence. U.S. measures have squeezed Mexico's debt service capacity and export potential, with negative consequences for U.S. creditors. The subsequent peso

devaluation and exchange controls cut imports from the United States and increased the competitive position of Mexican exports. To protect against these imports will reduce Mexico's debt service capacity, threatening U.S. banks and leading to increased migration. In short, there is no way to avoid adjustments between the two countries. Functional interdependence must be faced and policies pursued that will manage interdependence in the interests of both countries.

Dimensions of U.S.-Mexican Agricultural Interdependence

by Myles J. Mielke

The reasons for U.S.-Mexican interdependence have to do with geography, cultural and economic ties across the 2,000-mile common border, and the substantial presence of U.S. business and investments in the Mexican domestic economy. U.S.-Mexican interdependence was reinforced with the development of Mexican petroleum reserves and exports during the seventies and two serious agricultural production shortfalls (1979 and 1982) that necessitated unprecedented imports.

Mexican economic growth has temporarily been curtailed by the country's serious financial crisis and the measures taken to reduce inflation and public spending. These measures have further tied Mexico's economy and trade to the United States. Foreign debt servicing is largely to satisfy loans extended by U.S. financial institutions--some 58 percent of the total debt. The current account deficit is also a major factor in Mexico's efforts to trim imports and expand exports. This, in turn, affects interdependency as Mexico is the third largest U.S. trading partner, after Japan and Canada. It is by far the most important Latin American trading partner.

The growth of agricultural imports over the past several years resulted largely from demand outpacing production. Per capita production of major crop and livestock products during the seventies tended to stagnate. At the same time consumption was stimulated by a rapidly expanding economy (7-8 percent per year) and generous food subsidies.

The United States has become an increasingly important source of supply. The U.S. share of Mexican agricultural imports went from an average 58 percent in the early seventies to 78 percent in recent years. By comparison, the relative importance of the United States as a source of total trade has remained relatively constant at 63 percent.

The United States is expected to be the principal supplier of food grains and feed grains in 1984, but other exporters could enter the market if U.S. export credit guarantees are not extended beyond December 1983. If credit guarantees are not forthcoming, we can expect Argentina, Brazil, Canada, and the EC countries to increase their trade with Mexico. In the past, Canada has been willing to offer concessional credit in wheat sales and Brazil has offered to barter soybeans for oil.

Mexican agricultural exports earlier averaged over $500 million (1969/71) and rose to an average $1.8 billion (1979/81). This is a much smaller growth than for imports and has generated a negative trade balance in recent years. Once accounting for over 30 percent of total exports, farm exports now average

around 10 percent. The drop in the agricultural share is largely the result of the growth in petroleum exports and the emphasis on economic development policy to promote industrial production and exports.

Both the United States and Mexico have been at odds over specific trade regulations, tariff structures, and other external policies for many years. For Mexico's part, this involves a gradual shift away from import substitution and towards a greater diversification of the export trade. The latter reflects the desire to move away from the heavy dependence on the United States as both a supplier and market for Mexican trade.

Mexico maintains a wide range of ad valorem import duties ranging from zero percent on basic foods and some agro-industrial inputs needed to supplement domestic supplies to very high levels for so-called luxury items. All agricultural imports require a permit and the terms, including the tariff rate, are subject to change without notice. Mexico has refused to join the General Agreement on Trade and Tariffs.

Through bilateral agreements, the U.S. Government has helped Mexico import large quantities of grains and oilseeds since 1980. A 1983 agreement provided $1.7 billion between October 1982 and December 1983.

Major devaluations in February and August of 1982 helped alleviate the export slump but raised import prices. U.S. trade with Mexico, however, was relatively unaffected by these measures. The large public sector purchases of bulk food commodities under the bilateral trade agreement were not subject to exchange rate controls. The two-tier exchange regime initiated in December 1982 is still in effect. The official rate is currently being devalued at 13 centavos per day in an attempt to unify the official and free-market rates.

U.S.-Mexican Agricultural Trade Relations

by Richard A. Smith

U.S. agricultural trade policy toward Mexico reflects overall U.S. agricultural trade policy objectives of expanding U.S. farm exports and working for a free and liberal world market system. However, Mexico does benefit from a number of special U.S. policies and cooperative programs not available to all other countries. Mexico in 1982 was the third largest agricultural supplier to the U.S. market and was the United States' ninth largest market for farm goods. The United States has been Mexico's largest supplier of grain, although other exporting countries have recently made substantial inroads into the Mexican market. Virtually all of Mexico's corn and sorghum imports come from the United States. Mexico is also an important market for U.S. oilseeds and products. Mexico markets more than 60 percent of its total exports in the United States.

Mexico was once a major exporter of grains, beef, livestock, and sugar. The seventies, however, marked a major turning point largely as a result of new, large oil findings, and the spread of economic development and increased demand, especially the demand for proteins. Agricultural production did not keep pace, population growth burgeoned, and Mexico now relies heavily on imports to meet its food needs.

The United States has signed agricultural supply agreements with Mexico. The current agreement covered $1.7 billion in agricultural trade during 1982-83. The United States has also extended export credit guarantees (GSM-102) to Mexico to guarantee the repayment of loans that banks make to Mexico for the purchase of food imports. Mexico was the largest recipient of GSM-102 in fiscal year 1983. The GSM-102 allocation to Mexico is important to the United States; it guarantees exports of 7 million tons of feed grains, 1.2 million tons of oilseeds, and $143 million of other commodities.

U.S.-Mexican agricultural trade relations are characterized by some difficulties. The Mexican Government controls trade of many agricultural products with licensing requirements, and import and export taxes. On the U.S. side, import restrictions applied to Mexican goods consist generally of relatively low import duties. For coffee, cocoa, and bananas, few trading problems exist. They enter the United States duty free or at times under the Generalized System of Preferences (GSP). Many Mexican agricultural exports to the United States, including winter vegetables, strawberries, and melons, compete with U.S. products. The most publicized and recurrent example of trade conflict is the competition between Mexico's and Florida's winter tomatoes, cucumbers, eggplants, squash, and green peppers. An additional complication arises from the fact that Mexico is not a member of the GATT and thus faces few external obligations with regard to its trade policy. Fortunately, there are a number of effective mechanisms in place to prevent and resolve U.S.-Mexican trade disputes.

Domestic Policy and Trade Interactions: The Case of Mexico

by Nicole Ballenger and Alex F. McCalla

Agricultural trade defines an important set of linkages between the U.S. and the Mexican economies. These linkages can be direct through bilateral relationships--e.g., vegetables--or indirect through interactions in world markets where both countries participate as exporters and/or importers. The nature of these trade aspects--the composition of trade, quantities exchanged, and their values--is influenced by the agricultural policies of both nations. International conditions may also, however, be important factors in the formation of these domestic policies. Mexico's recently cancelled food self-sufficiency program (SAM), for example, provoked serious question about the country's ability to eliminate grain imports. Its demise, however, is generally attributed to Mexico's ill-fortune in world markets.

A possible approach to modeling U.S.-Mexican interdependencies through trade is to start with national agricultural policy models, build in international components, and identify the set of trade linkages by which the models can be connected. In this paper an agricultural policy model for Mexico is presented which, it is hoped, is a useful step in this direction. The model is based on the concept of multi-level programming, whereby it is recognized that the policymakers' problem is to optimize national objectives by attempting to influence a myriad of independent decisionmakers by policy interventions. The model allows the development of policy tradeoff frontiers which recognize the choices between sometimes disparate goals that policymakers must deal with. International market conditions influence the positioning of these frontiers.

The results of the policy model for Mexico lead to several important conclusions. First, pricing policies (for several commodities and chemical inputs) differ quite significantly in their usefulness for attaining any single policy objective (such as employment, food production, sector income, or foreign exchange). Second, whether or not any two objectives can be viewed as complementary or competitive depends on the available set of policy instruments, the levels at and the mixes in which they are employed. Furthermore, it is possible to combine multiple instruments effectively in order to maximize the value of some combination of several objectives.

The choice of an optimal instrument package and the rates at which goals must be exchanged are functions of conditions in world markets. Several sensitivity tests were conducted to determine the response of the agricultural sector to changes in the international environment, especially to those which might come about because of U.S. agricultural policy decisions. These involved movements in grain import prices and changes in restrictions imposed vis-a-vis Mexican exports. The results indicated quite important effects on the policy objectives, suggesting that world market conditions may significantly influence policy choice. A next step would be to quantify how the important world market variables (from Mexico's perspective) are affected by changes in policy in major countries such as the United States.

Discussion by David R. Mares

Smith makes three points in his presentation: the U.S.-Mexican relation is unique; the United States has a stake in the economic and political stability of Mexico; and each nation should maximize its respective comparative advantages in the relationship. His talk emphasizes how much has been done to the mutual benefit of both countries. But, how much has been done is not really the question to ask. Rather we should ask under what circumstances has this been accomplished. If we did a comprehensive study, we might find that U.S. help for Mexico correlates quite well with dire economic crises in Mexico and/or U.S. problems of surplus stocks. This is not an optimal way to contribute to the development of Mexico. We also need to compare results with what Mexico has asked for before we can compliment ourselves on how much is being done. I wish to ask Mr. Smith to clarify how the U.S.-Mexican supply agreement actually works. Some of my USDA sources play down its importance, noting that all we are committed to doing is facilitating Mexican access to established commercial, and not official, channels.

Gutierrez-Kirchner's presentation is a valuable one because it illuminates the thinking of the current Mexican administration on trade matters.2/ He makes two major points. First, that Mexico will show greater respect for comparative advantage and let trade, rather than Government inducements, be the engine of growth. Second, that Mexico wants a bilateral solution to the U.S. discriminatory and unilateral application of countervailing duty and graduation policies. My comments are oriented to the question of comparative advantage. Mexico would be better off importing milk rather than continuing to subsidize its inefficient production in Mexico. But this is because Mexico is trying to use technology which is not appropriate. There are efforts, and I suggest one examine Dr. Tourrent's efforts at the Secretaria de Agricultura y Recursos Hidraulicos (SARH), to utilize alternative technologies which will

2/ Alfredo Gutierrez-Kirchner made an oral presentation on "Future North American Agricultural Trade Relations: Mexican Perspective."

enable the country to be come self-sufficient in milk. This leads me to my broader point. To import means having the infrastructure to receive and distribute the goods: railroads, harbor, and storage facilities. Mexico does not have an infrastructure adequate to handle the massive food imports that a static view of comparative advantage implies. Rather than scarce capital investments in expanding this capacity, there are other investments which could alleviate food problems and at the same time help distribute wealth.

Reynolds presented us with a stimulating analysis of the increasing interdependence of the U.S. and the Mexican economies and a call for making policy with that reality in mind. He recognizes the socio-political problems with a complete merging of the two economies and does not call for a North American Common Market. Still, he insists that Mexico would be better off importing its basic grains from the United States and exporting certain high value crops to pay for them. I defend the production of winter vegetables for export and argue that their impact on basic grain production is marginal; the Ballenger and McCalla model illustrates this. Nevertheless, it still appears to be almost a "national sacrificial act" for Mexico to accept such a high dependence on basic foods from the United States. U.S. embargoes against the Soviets, Nicaragua, and almost anyone who wants to have either a foreign policy or a domestic political economy different from that of the United States are potential threats. The food weapon doesn't always work, but mainly because some states have the ability to enforce changes in domestic consumption patterns to offset the effect of the boycott. To do so implies a strong authoritarian state and in the Mexican case could strain the relative openness of the Mexican authoritarian state, an outcome many of us would like to avoid.

Reynolds has given us the "why we should" scenario with respect to policy making in the bilateral context. We also need to address the "why it hasn't been done" issue. We can't make policy differently if we don't analyze the obstacles to alternative policy formulation. I suggest that they are embedded in the structure of U.S. policy formation, specifically in the congressional, electoral, and bureaucratic arenas. Because the United States was such a large country endowed with great resources, society has had the luxury of ignoring international issues, except in the case of direct military conflict, usually entered into only reluctantly. Therefore, the U.S. policymaking process is like the Ballenger/McCalla multi-level model: it includes competing interests. Some issues are perceived as purely local, shortrun issues and these generally take precedence over trade and international ones, unless the latter involve war or have a negative impact on some U.S. interests. This means it is inherently difficult to make what are perceived as U.S. "sacrifices" in favor of interdependence unless that interdependence is perceived on a military-strategic level. Even here, the power of this justification may be weakening.

What can be done? And how can we do it? We need to elevate economic issues to the level of "high politics," but in such a manner as to avoid provincialism. To do so requires political leadership and a massive campaign to reach the U.S. public. We did it for the Cold War, now we need to do it for interdependence. The failure of the United States to deal with interdependence has serious implications: it would suggest that democratic politics are impossible in an interdependent world.

Discussion by Stephen J. Torok

Mielke has presented an overview of U.S.-Mexican agricultural trade interdependence. Several factors reinforced agricultural trade interdependency between the United States and Mexico, including: the combination of petroleum exports and Mexican agricultural production shortfalls of 1979 and 1982; Mexico's foreign debt servicing; and measures to reduce Mexico's inflation and public spending.

Mielke noted that Mexico's agricultural imports were greatly increased in the late seventies and early eighties. The increase in agricultural imports to Mexico were a result of several factors including: reductions in per capita production of major crop and livestock products, and increases in Mexico's domestic demand for agricultural commodities that were directly or indirectly subsidized by Mexico. The U.S. share of Mexico's imports has increased to over 75 percent.

A major contribution by Mielke was his evaluation of the future of Mexico's agricultural imports from the United States. Mielke suggests that a combination of factors affect the future of Mexico's imports of U.S. agricultural commodities. Factors such as the price competitiveness of U.S. feed grains in Mexico, the uncertainty of U.S. export credit guarantees to Mexico, and the relative strength of the U.S. dollar will influence Mexico's decision to diversify its share of agricultural imports from abroad.

Mielke's discussion of U.S.-Mexican agricultural trade interdependence did not make use of Reynolds methodology of incorporating a "full exchange setting" for looking at U.S.-Mexican agricultural trade interdependence. A discussion of trade in factors of production including unskilled labor from Mexico is warranted for a complete understanding of U.S.-Mexican agricultural trade interdependence.

General Discussion

Schwedel disagreed with Mares' comments about substituting grain imports with domestic production, noting that Mexico does not have the internal distribution network to service the domestic production. He noted that the questions were whether Mexico could change production and land tenure structures to permit production of high-value crops and asked what those crops might be. Mares replied that if both importing and domestic production required substantial investments, the latter would spread the benefits to a much larger portion of Mexican society. Reynolds suggested spices, fruits, and tropical products in general would be suitable export products for Mexico if attention were paid to comparative advantages and trade restrictions. He also rejected the idea of food dependence by Mexico as being an act of "national sacrifice," pointing out that Mexico already was dependent upon the U.S. security umbrella. Reynolds commented that if Mexico starved simply because it did not want to import that also would be such a sacrifice and rejected the idea that alternative technologies could provide Mexico with a domestic solution. Smith agreed with Reynolds on the technology issue and noted that an important question is how to deal with the land tenure issue.

Hardy pointed out that the discussion ignored internal conflicts of interest in both societies as to the goals of agricultural development. Mines noted the importance of this question by suggesting that the problems of production in Mexican rainfed areas were social rather than economic.

Reynolds noted that the Binational Project on U.S.-Mexico relations demonstrated that much could be done in rainfed areas of Mexico, but claimed that the present Mexican administration was not interested and did not want to hear U.S. investigators tell them about it. He also claimed that the vast majority of Mexican economists did not agree with the austerity program. Gutierrez-Kirchner ended the discussion by disagreeing with Reynolds, noting that it was only economists who belonged to the political oppositions that disagreed with the austerity program.

MEXICAN DOMESTIC AND AGRICULTURAL TRADE POLICY

The Politics of Mexican Agricultural Policy

by Steven E. Sanderson

The rationale for intervention in the agricultural sector by the Mexican Government has altered radically since the Mexican revolution. Mexican agricultural policy has evolved considerably since the midthirties. A major constraint on the formulation and execution of agricultural policy has been the "internationalization" or increased openness to external shocks of Mexican agriculture. The food self-sufficiency program, Sistema Alimentario Mexicano (SAM), and its successor, Programma Nacional Alimentaria (PRONAL), are the most recent examples of state intervention in the agricultural sector and of how the constraints imposed by the openness of the Mexican agricultural economy influence policy.

From its initial emphasis on land reform, the Mexican Government turned first to policies aimed at stimulating productivity and increasing output in the agricultural sector to efforts to make the agricultural sector an engine for growth and an adjunct to the industrialization of the Mexican economy. In recent years, the Mexican Government has looked to the agricultural sector as a source of food self-sufficiency, or more recently "food sovereignty."

During the seventies, Mexican agricultural policy made a dramatic shift. In the forties and fifties political emphasis had changed from agrarian reform to counterreform and subsidiarity to industrialization. In the seventies, the logic of state intervention shifted from a declining export and commercially oriented agriculture as an adjunct of industrialization to a new concept of agriculture as the driving force behind national food self-sufficiency.

The SAM had a short life span, 1980-82. It was intended to provide self-sufficiency in basic foodstuffs for Mexico by the year 1985. The goals of SAM were to produce more food as a hedge against imports, to revive rural production in marginal areas, and to enhance rural production in general through producer incentives and state intervention. SAM failed for a number of reasons. It was never successfully integrated into the Mexican Government as its functions were hostile to many entrenched bureaucratic interests. It had to compete for control of the agricultural sector and agricultural policymaking with the Ministry of Agriculture, CONASUPO, and the Ministry of Commerce, all well-entrenched bureaucratic agencies. The internationalization of Mexican agriculture and agribusiness interests were antithetical to many of the goals of SAM. The fiscal and foreign exchange crisis which Mexico experienced in 1982 dried up the financial resources so necessary to the successful implementation of SAM.

Future Mexican agricultural policy will be constrained by the necessity of being responsive to the general structure of Mexican politics. The political base for the kind of redistribution implied by SAM may not be sufficiently broad to permit agricultural policy to move in that direction. The openness of the Mexican economy, especially its status as a debtor country, will also constrain state strategy and policies for the agricultural sector. Fiscal austerity will limit the scope for agricultural policymaking of the kind implied by SAM. However, some program of food security will survive and will be implemented through institutional channels other than SAM. But fiscal constraint on SAM-like policies, subsidies, and other forms of state

intervention will severely limit agricultural policymaking in the tradition of rural patronage.

The Changing Dimensions of Mexican Food Consumption and the Ability of Mexican Agriculture to Meet Consumption Requirements

by S. Kenneth Schwedel

In the early fifties, Mexico embarked on a policy designed to promote and develop its industrial base. The programs that the Mexican Government followed had the dual effect of slowing the growth rate in agricultural production and, at the same time, (2) stimulating food demand while facilitating changes in consumption patterns towards animal protein and oilseeds.

Taking into consideration tax and investment policies along with bank lending activity during the fifties through 1965, there was net flow of capital out of agriculture. At the same time, real crop prices have fallen continually since 1954. The annual average growth rate fell from 6.2 percent during the fifties to 5.4 percent in the sixties, and 3.4 percent in the seventies.

Throughout the sixties and into the seventies, the decline in agricultural output, contrasted by a growing and subsidized industrial economy, accelerated the emigration from rural areas into the country's urban centers. As the cities grew, a number of Government policies were simultaneously stimulating and shifting demand. Between 1960 and 1980, the minimum wage rate grew almost twice as fast as food costs as a result of price controls on key consumer food items. Among the products under price control were milk, eggs, and vegetable oil. Government retail distribution outlets were predominantly located in the larger towns and cities, having a positive income-transfer effect on the urban poor.

The effect of slowdown in production with the growth in demand caused Mexico to turn to international markets in the early seventies to supplement domestic food and feed supply. By 1980, Mexico's traditional positive agricultural trade balance of payments turned negative.

With no change in policy, present prospects are for continued imports of agricultural commodities. Mexico's population growth--estimated at 2 to 2.5 percent annually--and the recovery of its economy beginning in 1984 will cause demand to grow by at least 4.5 percent through 1988. Technological, financial, and resource limitations will not permit agricultural output to grow fast enough to satisfy demand. Mexico's recently announced consumer-oriented National Food Program appears to confirm this projection, with food imports of 8.4 million metric tons planned for 1988, the last year of the present administration.

The Supply of and Demand for Mexican Labor in California Agriculture: A Binational Issue

by Richard Mines

California's labor intensive agriculture has experienced unparalleled growth and prosperity. Still, it faces two important challenges: it has a serious income problem among many of the farmworkers who perform seasonal farm tasks and it faces the challenge of making the proper technological choices in the coming years.

Though there is much variety in the institutional structure of California farm labor markets, at the level of the worksite we usually find a Mexican foreman supervising and setting the working conditions for Mexican immigrant workers. In effect, Mexican foremen match the supply and demand in California crop agriculture and supervise the seasonal farm labor force.

The farm labor market has always depended on first generation rural immigrants in California; in the postwar period, employers have turned to Mexicans. Most of these workers are settled immigrants from Mexico's Central Highlands but an important subgroup are young unaccompanied male Mexicans who do a large part of the heavy manual tasks. All these groups derive most income from U.S. farmwork though the settled ones also rely on nonfarmwork and unemployment insurance benefits.

Since World War II, there have been two important trends: increased production of labor intensive crops and mechanization of many hand tasks. These two trends have tended to cancel each other out and have left the demand for seasonal labor quite high. The demand for heavy hand labor, done mostly by young male Mexicans, is particularly noticeable requiring the continual replenishment of new workers at the entry level.

Despite obstacles, another spurt in mechanization of fruit and vegetable production is in the offing. Rational policy would try to smooth this transition by encouraging the Mexican immigrant farm labor force to gradually settle north of the border and participate in the transformation of California agriculture. This would imply improved personnel practices, encouragement of the correct technological innovations, and immigration reform.

Discussion by Stephen J. Torok

Sanderson has presented a recorrido (rapid tour) of agricultural policy trends in Mexico. He recognized a "fundamental contradiction in Mexico." This is the situation whereby Mexico is currently a leading agricultural exporter of various agricultural commodities to many nations; but simultaneously, Mexico is unable to provide its population with sufficient foodstuffs. Sanderson pointed out that Mexico is experiencing a heavy reliance on domestic government intervention in its food distribution system with an emphasis on public food redistribution in order to allocate an adequate level of basic foodstuffs to its population.

It appears that Mexico's agricultural development, as suggested by Sanderson, has been undermined by the "internationalization" of agriculture in Mexico. The process of "internationalization" has manifested itself in a variety of

ways, including allocation of nontraditional agricultural commodities to "internationalized" urban palates, the allocation of Mexican agricultural commodities as imports to transnational agribusinesses, and the influence of external "actors" on Mexico's public economy.

The contribution of Sanderson's paper is important to our understanding of Mexico's agricultural politics. The concept of "internationalization" is timely. A few important questions are left unanswered, such as what is the future of Mexico's agricultural "internationalization?"

The presentation by Schwedel concentrated on the demand side of Mexican agriculture. The focus of previous research on Mexican agriculture rarely treated domestic agricultural consumption and Schwedel's research is long awaited and necessary for a comprehensive view of Mexican agriculture. Schwedel's observations and statistical display of Mexican agriculture suggests that Mexico's policies and changes in Mexico's socioeconomic characteristics have led to increases in the demand for agricultural commodities in Mexico. It appears that the increase in the demand has occurred in recent years as a result of: increases in Mexico's population, domestic policies encouraging rural immigration to urban cities, increases in Mexico's per capita income, changes in Mexico's wage rates, and domestic policies leading to reductions in domestic agricultural prices.

There has been a change in Mexico's agricultural consumption pattern, as pointed out by Schwedel, that has resulted in an increase in the consumption of animal protein and a resulting decrease in traditional foodstuffs such as tortillas and beans. These changes in Mexico's consumption pattern have influenced imports of feed grains and breeding livestock imports from the United States.

Schwedel's report fills a void in research on Mexico's domestic demand for agricultural commodities. His presentation yields an important question regarding Mexican agricultural trade: Is it possible that changes in Mexico's consumption pattern could be altered in favor of domestic consumption of Mexico's agricultural exports--such as fresh fruits and vegetables--in order to reduce Mexico's agricultural import burden?

ERS Research Needs as Related to Mexican Agriculture

by David L. Peacock

A major purpose of ERS research on the Mexican agricultural sector is to improve its capacity to interpret the importance of current events and project, as accurately as possible, changes in production, consumption, and trade. In addition to providing the public with research information, ERS research must provide the quantitative measures of cause and effect relationships, the coefficients, and the models which analysts can draw upon to respond to current questions. The long-term objective is to develop policy sensitive models representing the Mexican agricultural sector, which can be the basic tools for analyzing a wide variety of possible economic events and projecting directions.

One of the perplexing problems faced by ERS is to manage the combination of the long lead time inherent in research and the short lead time for responding to current questions. One way to deal with this problem is to look for means of reducing the lead time on research projects such as building automated data bases and making use of microcomputers. A second approach is to anticipate the geographic locations or types of problems which may become important. Clearly, there will be enough continuing interest in Mexico to justify giving it considerable research priority. A third approach is to focus upon fundamental relationships determining structure and performance of the agricultural economy as the basis of ERS research. Emphasis should be given to rather basic and broad research topics in the near term which in the longer term will provide the foundation for treating more specific issues.

To develop the basic quantitative relationships and models, four general areas of research will be required:

- supply potential, supply response, and variability;
- domestic demand;
- macroeconomic factors affecting domestic demand and capacity to import; and
- policy affecting supply, demand, and trade.

Concurrent with individual projects in these general areas is an effort to develop a supply, demand, and trade model for Mexico treating the major commodities. This Mexican model, based upon the Grains-Oilseeds-Livestock modeling efforts, will also provide some structure for the research undertaken in each of the four component areas.

The current ERS research activities, beginning with efforts to create and expand an automated Mexican data base, are listed below. These represent studies by both ERS staff and cooperating universities.

- Data base automation and improvement--Mexico was the first priority in improving the data base for Latin America.

- Detailed supply, demand, and trade model--A model based upon the GOL format is being developed for Mexico.

- Longrun supply function for agricultural land--A study is presently underway to evaluate Mexico's potential to increase area under cultivation as a means of expanding production and conditions under which such an expansion might occur.

- Technological change and research at international institutions--This project is intended to evaluate the relationship between research by domestic agencies and the international research centers, and increases in the yields of crops in Mexico.

- Factors affecting food consumption--A University of Missouri cooperative study (Maury Bredahl) represents one activity in evaluating food demand and consumption. In addition, ERS is in contact with the Ministry of Planning and Budgeting (SPP) in an effort to collaborate on an analysis of the 1977 consumer survey data.

- Policy changes and socioeconomic forces which shape these policy changes--two cooperative studies have been undertaken to assess policy changes and determine what forces precipitate policy change in order to better anticipate policy developments in Mexico.

Future research will build on current studies depending upon the results, directions, and problem areas that evolve. In addition, the following topics have been identified for research:

Supply:

- Assessment of producer supply response on a regional basis.

- Assessment of the variability in crop production, especially yields, and development of a weather-crop yield model.

- Analysis of the livestock sector and livestock-feed relationships.

Demand:

Analysis of data forthcoming from consumer surveys planned by Mexico's SPP.

Policy:

- Analysis of the Mexican grain marketing system.

- Analysis of farm credit and input subsidy policies and their impact upon production.

- Relationship between agricultural and nonagricultural export levels and Mexico's policy on agricultural export promotion.

Macroeconomic and Trade:

- Evaluation of the impact of recent domestic inflation and exchange rate policy on Mexican food consumption patterns and trade.

- Changes in market-shares of Mexican exports and imports.

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