



AgEcon SEARCH
RESEARCH IN AGRICULTURAL & APPLIED ECONOMICS

The World's Largest Open Access Agricultural & Applied Economics Digital Library

This document is discoverable and free to researchers across the globe due to the work of AgEcon Search.

Help ensure our sustainability.

Give to AgEcon Search

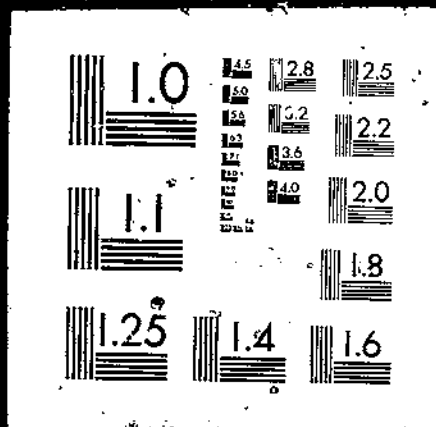
AgEcon Search
<http://ageconsearch.umn.edu>
aesearch@umn.edu

*Papers downloaded from **AgEcon Search** may be used for non-commercial purposes and personal study only. No other use, including posting to another Internet site, is permitted without permission from the copyright owner (not AgEcon Search), or as allowed under the provisions of Fair Use, U.S. Copyright Act, Title 17 U.S.C.*

PB83-245167

FAER-183 DOMINICAN REPUBLIC: FACTORS AFFECTING ITS CAPACITY TO IMP
ORT FOOD. (FOREIGN AGRICULTURAL ECONOMICS REPT.) / H. CHRISTINE BOLL
ING ECONOMIC RESEARCH SERVICE, WASHINGTON, DC. INTERNATIONAL ECONO
MICS DIV. AHC R2 210

1 OF 1
PB 83
245167

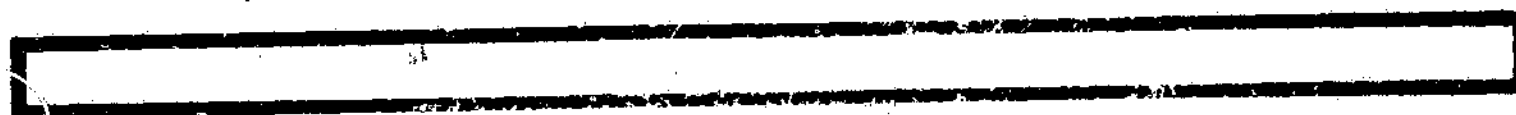
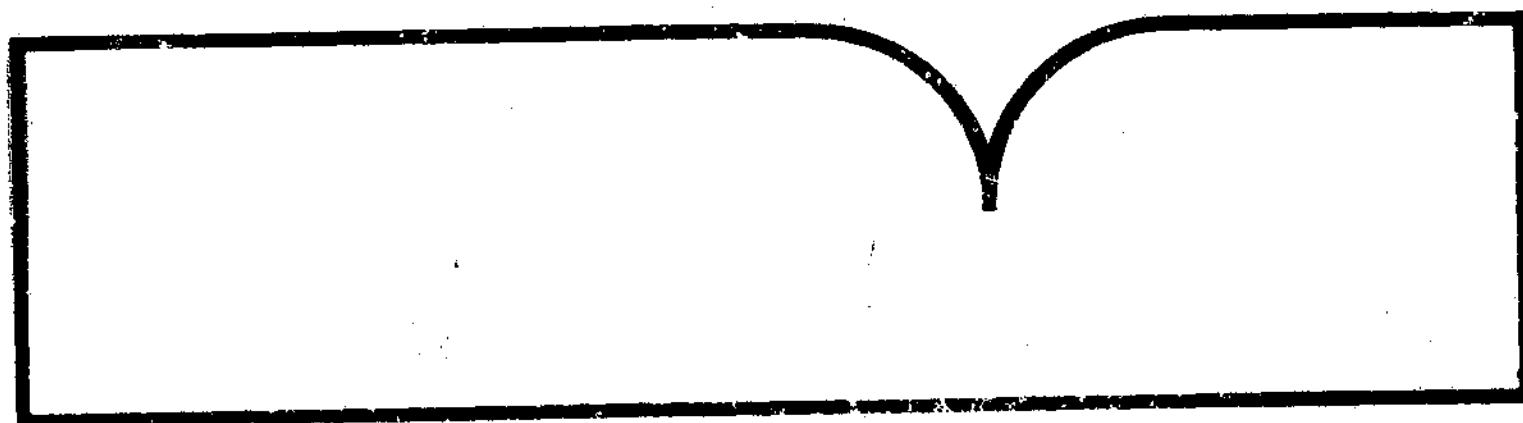


PB83-245167

Dominican Republic: Factors
Affecting Its Capacity to Import Food

(U.S.) Economic Research Service, Washington, DC

Aug 83



U.S. Department of Commerce
National Technical Information Service
NTIS

REPORT DOCUMENTATION PAGE		1. REPORT NO. FAER-183	2.	3. Recipient's Accession No. PB83 245167
4. Title and Subtitle Dominican Republic: Factors Affecting Its Capacity to Import Food				5. Report Date August 1983
7. Author(s) H. Christine Bolling				8. Performing Organization Rept. No. FAER-183
9. Performing Organization Name and Address International Economics Division Economic Research Service U.S. Department of Agriculture Washington, D.C. 20250				10. Project/Task/Work Unit No.
				11. Contract(C) or Grant(G) No. (C) (G)
12. Sponsoring Organization Name and Address				13. Type of Report & Period Covered
				14.
15. Supplementary Notes				
16. Abstract (Limit: 200 words) The Dominican Republic's food imports from the United States (including soybeans, fats, and oils) could reach \$290 million by 1985, up substantially from \$167 million in 1980. The Dominican Republic's food import bill has increased more than twenty-fold since 1960; soybeans, fats, and oils imports grew from \$2 million in 1970 to nearly \$55 million in 1980. Together, food, soybeans, fats, and oils imports from all sources should reach \$400 million by 1985. Substantial P.L.-480 aid from the United States had virtually no effect on commercial food imports. The United States accounted for 67 percent of the Dominican Republic's food imports in 1980, or 73 percent including P.L.-480 aid. Increased domestic production in the Dominican Republic will not likely displace future imports, due to the country's emphasis on growing crops it can successfully export.				
17. Document Analysis a. Descriptors Commodities Prices Economic analysis Production Exports Income b. Identifiers/Open-Ended Terms Domestic production Dominican Republic Food imports P.L.-480 c. COSATI Field/Group 02-B Prices as of 1/1/83 Paper: Fiche: Cost codes are: for Paper and A01 for Fiche				
18. Availability Statement: National Technical Information Service 5285 Port Royal Road, Springfield, VA 22161			19. Security Class (This Report) Unclassified	21. No. of Pages
			20. Security Class (This Page) Unclassified	22. Price See box 17

PB83-245167



**United States
Department of
Agriculture**

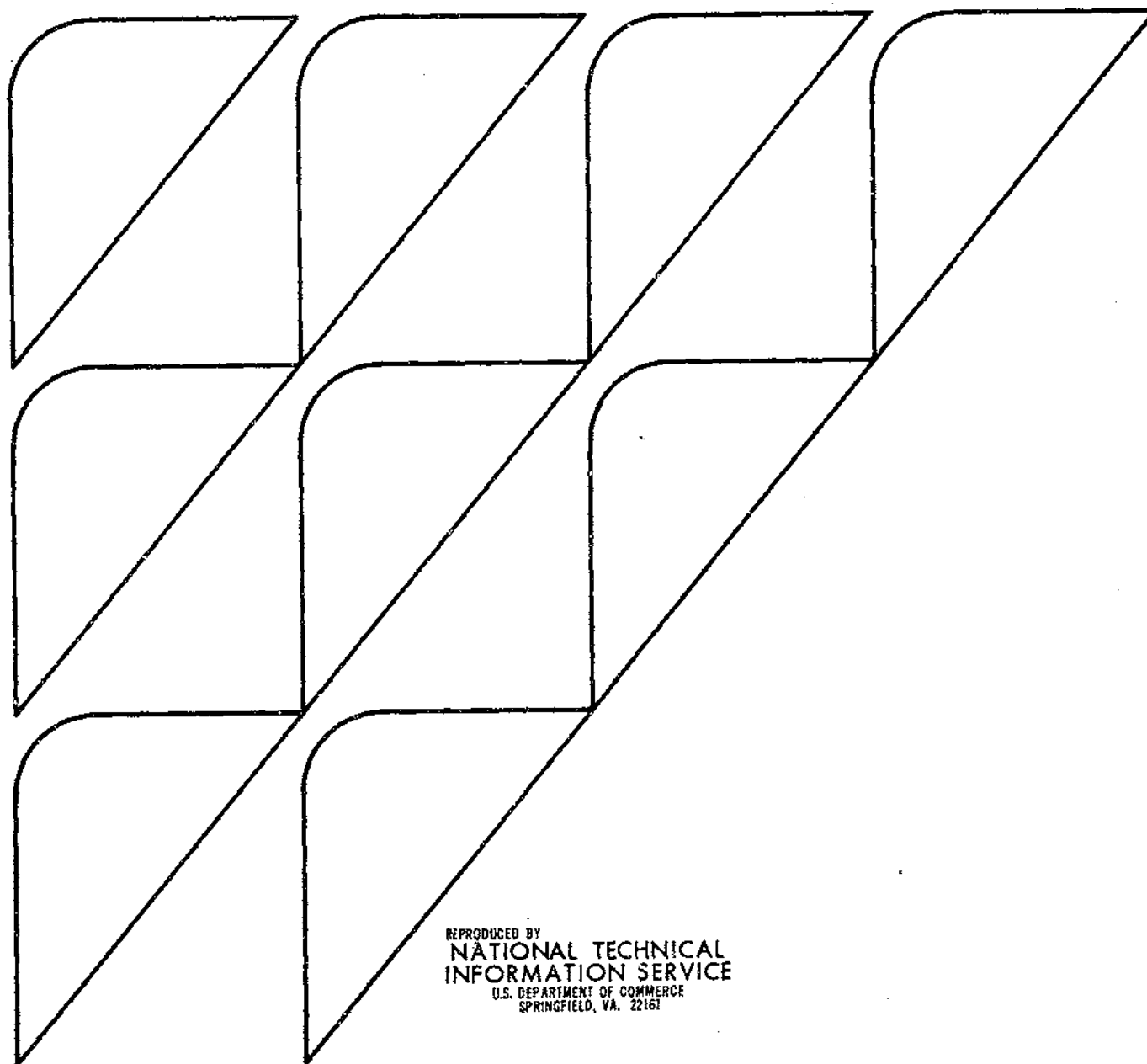
Economic
Research
Service

Foreign Agricultural
Economic Report
Number 183

Dominican Republic

Factors Affecting Its Capacity to Import Food

H. Christine Bolling



REPRODUCED BY
NATIONAL TECHNICAL
INFORMATION SERVICE
U.S. DEPARTMENT OF COMMERCE
SPRINGFIELD, VA. 22161

DOMINICAN REPUBLIC: FACTORS AFFECTING ITS CAPACITY TO IMPORT FOOD. By H. Christine Bolling, International Economics Division, Economic Research Service, U.S. Department of Agriculture. FAER-183.

ABSTRACT

The Dominican Republic's food imports from the United States (including soybeans, fats, and oils) could reach \$290 million by 1985, up substantially from \$167 million in 1980. The Dominican Republic's food import bill has increased more than twentyfold since 1960; soybeans, fats, and oils imports grew from \$2 million in 1970 to nearly \$55 million in 1980. Together, food, soybeans, fats, and oils imports from all sources should reach \$400 million by 1985. Substantial P.L.-480 aid from the United States had virtually no effect on commercial food imports. The United States accounted for 67 percent of the Dominican Republic's food imports in 1980, or 73 percent including P.L.-480 aid. Increased domestic production in the Dominican Republic will not likely displace future imports, due to the country's emphasis on growing crops it can successfully export.

Key words: Dominican Republic, food imports, income, prices, import policy, P.L.-480

ADDITIONAL COPIES

Additional copies of this report may be ordered from:

National Technical Information Service
Identification Section
5285 Port Royal Road
Springfield, VA 22161

Ask for Dominican Republic: Factors Affecting Its Capacity to Import Food, and indicate whether you want paper copies or microfiche. Cost per paper copy is . . . cost per microfiche copy is . . . (prices subject to change). Enclose check or money order payable to NTIS. Or call (703) 487-4780.

ACKNOWLEDGMENTS

The author acknowledges the following agricultural economists for their helpful comments on this research: Oswald Blaich, David Peacock, William Kost, Richard Nehring, Fausto Medina-Lopez, Luis Sanint, Myles Mielke, and Nydia Rivera-Suarez.

CONTENTS

	<u>Page</u>
SUMMARY	iv
INTRODUCTION	1
FOOD IMPORTS	1
FACTORS AFFECTING FOOD IMPORTS	4
FUTURE CAPACITY TO IMPORT FOOD	15
REFERENCES	17
APPENDIX A --METHOD AND ESTIMATION PROCEDURES	19
APPENDIX B --TABLES	21

SUMMARY

The Dominican Republic's food imports from the United States (including soybeans, fats, and oils) could reach \$290 million by 1985, up substantially from \$167 million in 1980. This report looks at the country's food imports and factors affecting them. It finds that:

- o The Dominican Republic's food import bill has increased more than twentyfold since 1960, reaching \$173 million in 1980. Soybeans, fats, and oils imports grew from \$2 million in 1970 to nearly \$55 million in 1980. Together, food, soybeans, and fats and oils imports from all sources should reach \$400 million by 1985.
- o The United States accounted for 67 percent of the Dominican Republic's food imports in 1980 (73 percent when P.L.-480 aid is included). The U.S. share of the Dominican Republic's total import market should remain about 75 percent, with the United States the primary supplier of fresh and frozen meat, hams, hatching eggs, rice, wheat and flour, corn, deciduous fruits, potatoes, beans, canned fruits, and soybeans. Substantial P.L.-480 aid from the United States had virtually no effect on commercial food imports.
- o Increased domestic production in the Dominican Republic will not likely displace future imports, due to the country's long tradition of growing crops it can successfully export.
- o Per capita real gross domestic product (GDP) was a major factor affecting growth of demand. The economy experienced real annual growth of over 10 percent during the early seventies.
- o Although real food import prices moved up and down throughout the last 20 years, they were lower in 1980 than in 1960. This was important since a 10-percent drop in the real price of food was found to raise imports by 8 percent.
- o Through 1981, foreign exchange reserves had been maintained at about \$225 million, mostly because of foreign borrowings. Since then, the country's trade balance and reserves position have fallen, so that a 10-percent decrease in foreign reserves means a 3-percent decrease in food imports.

Dominican Republic

Factors Affecting Its Capacity to Import Food

H. Christine Bolling

INTRODUCTION

The Caribbean continues to be a growing market for U.S. agricultural products. A food-deficit area, the islands depend on imports for about half their food supply. Together, they are the second largest Latin American market for U.S. farm products after Mexico. Because of their proximity, they are also strategically important to the United States, as exemplified by the President's Caribbean Basin Initiative. 1/

The Dominican Republic ranks with Trinidad-Tobago and Jamaica as the region's leading food importer. While imports account for only 20 percent of the food consumed in the Dominican Republic, the United States currently has a 67-percent share of these imports. U.S. food exports to that country including soybeans, fats, and oils, amounted to \$117 million in 1980. 2/

The maintenance and development of this important market requires an understanding of the factors that cause food imports and the U.S. share to change and grow. This study examines some of those factors (mainly population, income, and domestic food production) and determines how they influenced demand during the sixties and seventies. It also examines the country's external purchasing power as reflected by its changing foreign reserve position, food aid, and import prices. This analysis provides a framework for projecting the size of the market as influenced by the expected growth and development of each variable examined. Finally, it evaluates the extent, if any, to which U.S. P.L.-480 assistance may have displaced commercial food imports.

FOOD IMPORTS

The Dominican Republic has become a rapidly expanding market for food imports, particularly since 1972. In 1980, food imports

1/ The Caribbean Basin Initiative is an aid program to the Caribbean Region--the Caribbean Islands, Central America, Surinam, and Guyana--proposed by President Reagan in 1981. The President's initiative to these countries emphasizes investment aid and free trade by providing government aid and encouraging private investment in the region, as well as granting duty-free entry of their farm products into the United States.

2/ All currency is listed in U.S. dollars unless otherwise noted.

and soybeans, fats, and oils imports together were \$227 million, of which \$167 million came from the United States (table 1). ^{3/} Today, food imports account for about 20 percent of the country's food supply, and 12 percent of its total imports. ^{4/} The country imports wheat and flour, cereal preparations, dried milk, canned fish, malt, vegetable oils (except coconut oil), prepared soups, and soybean meal. Rice is imported to supplement domestic production.

Table 1--Dominican Republic: Value of food imports, soybeans, fats, and oils imports, and share of total imports

Year	Food imports ^{1/}		Soybeans, fats, and oils imports	
	Value	Share of total imports	Value	Share of total imports
	1,000 dollars	Percent	1,000 dollars	Percent
1960	8,529	10	304	0
1961	6,309	9	829	0
1962	18,856	15	1,480	1
1963	26,287	16	753	1
1964	38,971	20	6,998	1
1965	21,142	24	5,521	2
1966	33,413	21	2,344	1
1967	34,261	20	1,284	1
1968	45,264	21	1,127	1
1969	31,278	14	1,127	1
1970	32,974	11	1,800	1
1971	37,333	13	2,276	1
1972	24,716	9	2,626	1
1973	51,531	13	6,766	1
1974	NA	NA	NA	NA
1975	NA	NA	NA	NA
1976	NA	NA	NA	NA
1977	101,078	12	15,686	1
1978	90,028	11	33,708	2
1979	102,966	10	40,679	4
1980	172,551	12	54,365	4

NA = Not available. ^{1/} Excludes soybeans, fats, and oils.
Source: (10).

^{3/} Includes soybeans, fats, and oils with food items from Standard International Trade Codes (SITC) codes 0 and 1.

^{4/} During 1964-66, 16 percent of the calories and 23 percent of the protein consumed were from imported sources; in 1972-74, the share was 19 percent of the calories and 17 percent of the protein imported; in 1975-77, 18 percent of the calories and 22 percent of the protein (4). Underscored numbers in parentheses refer to items in the references.

Government also made a concerted attempt to improve the quality of the national diet through imports, to develop a poultry industry based on imported chicks and feeds, and to construct soybean processing facilities and a new flour mill. These developments, along with the decimation of the swine herd in 1980 after an outbreak of African swine fever, contributed to an expanding and changing food import market.

The international oil crisis changed the composition of the country's total imports, and increased its trade deficit. Imports of petroleum and other fuels accounted for less than 10 percent of the total import bill prior to 1974; by 1980, that share had increased to 25 percent. The higher cost of petroleum imports and weak foreign demand for ferro-nickel, bauxite, and sugar, the country's major foreign exchange earners, contributed to a sharply declining balance of trade. The country's strong internal economic growth diverted attention from the troubling effects of the growing external debt. By 1978, international reserves had been drawn down to critical levels, causing the Government to impose import restrictions. In April 1978, President Guzman suspended imports of many processed food products including flour-based pastas, preserved vegetables, fish, seafood, fruit juices, spiced sauces, cacao and byproducts, butter, yogurt, and cream; these products, however, accounted for only a minor part of the total food import bill.

Industrial development changed the complexion of imports during the last 10 years. Imports of raw products like wheat, corn, chicks, and hatching eggs replaced high-value finished products like flour and poultry meats.

FACTORS AFFECTING FOOD IMPORTS

Changes in real income, real food import prices, population, food supplies from domestic food production, food aid, and foreign reserves had important effects on food imports during the sixties and seventies. An empirical analysis was made to measure the impacts of each factor on food imports (see appendix tables). The results are expressed as percentage changes in food imports resulting from a 10-percent increment of change in each influencing factor when the effects of all other factors are assumed unchanged. The effects differed greatly.

Real per capita income growth was the single most important economic determinant of food imports. As gross domestic product (GDP) grew through most of the seventies, each 10-percent increase in per capita real income resulted in roughly a 20-percent increase in food imports. Per capita GDP reached \$1,224 in 1980, having increased an average of 5 percent per annum since 1960 (table 3).

This rapid growth in nominal GDP resulted primarily from an eightfold increase in mining and a sixfold increase in construction during the last 20 years. Utilities, transport, and commerce also experienced significant growth. Agriculture, in contrast, grew more slowly (table 4). More than half of the GDP now originates in trade, finance, manufacturing, and agriculture. Much of the growth in current GDP has been eroded

Table 3--Dominican Republic: Gross domestic product and population

Year	Gross domestic product	Population	Per capita gross domestic product	Real per capita gross domestic product
	Million dollars	Millions	Dollars	1960 dollars
1960	723.9	3.04	238	238
1961	704.2	3.12	226	235
1962	887.2	3.21	276	263
1963	1,012.7	3.31	306	268
1964	1,104.2	3.41	324	279
1965	956.8	3.51	273	239
1966	1,059.5	3.62	293	257
1967	1,114.6	3.72	300	260
1968	1,162.2	3.83	303	261
1969	1,325.4	3.95	335	284
1970	1,485.5	4.06	366	302
1971	1,666.5	4.18	399	314
1972	1,987.4	4.30	462	339
1973	2,344.8	4.43	529	337
1974	2,931.2	4.56	642	361
1975	3,599.1	4.70	766	377
1976	3,951.5	4.84	816	371
1977	4,587.1	4.98	921	373
1978	4,728.4	5.12	923	361
1979	5,525.4	5.28	1,017	375
1980	6,649.0	5.43	1,224	377

Source: (6).

by inflation, and pressures on per capita real GDP have resulted from a rapid growth in population. Thus, per capita real income rose only an average of 2.1 percent per annum but still provided a substantial basis for the strong growth in the import demands.

Population, which totaled 3.0 million in 1960, grew to 5.4 million in 1980. This represents a 3-percent growth rate, one of the highest in the world, with a corresponding 3-percent-per-year growth in total food needs.

Food production for domestic use increased only 2.8 percent per annum since 1960. Most of these gains occurred during the seventies (table 5). Since this rate of growth was about the same as growth in population, the degree of dependence on imported food supplies did not change materially. There were, however, some notable successes in domestic food production. Rice output nearly tripled during this period and a sizable broiler industry was developed based largely on imported

Table 4--Dominican Republic: Gross domestic product by sector, current and real

Sector	1960	1965	1970	1975	1976	1977
<u>Million dollars at current factor costs 1/</u>						
Agriculture	193.1	253.0	345.2	772.8	769.1	931.2
Mining	13.5	13.0	22.7	107.8	133.5	133.6
Manufacturing	125.0	138.1	275.4	752.1	829.6	840.8
Construction	21.7	32.2	72.7	248.5	257.6	297.7
Electric, gas, water	7.5	11.4	17.5	30.1	27.9	32.9
Transportation and commerce	33.2	49.9	114.8	217.8	238.4	282.4
Trade and finance	145.7	163.9	264.6	666.2	765.5	889.3
Public administration	71.6	144.6	152.1	228.6	250.0	269.4
Other	112.3	150.7	220.5	575.3	663.6	789.3
GDP	723.6	956.8	1,485.5	3,599.2	3,935.2	4,466.6
<u>Million dollars at 1970 factor costs</u>						
Agriculture	280.0	260.5	345.2	399.9	431.1	433.7
Mining	15.2	15.2	22.7	127.1	146.1	142.8
Manufacturing	147.4	143.4	275.4	428.5	454.7	469.4
Conservation	24.2	33.2	72.7	152.6	155.1	183.5
Electric, gas, water	7.2	9.2	17.5	30.0	30.9	39.3
Transportation and commerce	50.3	72.4	114.8	182.7	190.8	210.4
Trade and finance	155.7	163.1	264.6	434.6	468.0	482.8
Public administration	100.9	194.0	152.1	183.1	185.3	187.4
Other	124.2	139.0	220.5	355.8	374.2	394.9
GDP	905.1	1,030.0	1,485.5	2,288.9	2,436.2	2,544.2

1/ Current factor costs refers to input cost method of valuing GDP, as opposed to products value at their output price.

Source: (17).

hatching eggs, chicks, and feedstuffs (table 6). In total, about 80 percent of the country's food is from domestic production; thus, it depends less on imports than does many of its neighbors. The bulk of the food produced for domestic use consists of rice, cassava, mangoes, avocados, bananas, plantains, and milk, and does not compete seriously with imported foods. This fact is supported by analysis showing that on the average for the period, each 10-percent increase in domestic food production (excluding export crops) reduced food imports only by about 1 percent. GDP valued at factor costs--rather than at market prices of the finished goods--includes compensation of employees, operating surplus,

Table 5--Dominican Republic: Index of competitive agricultural production 1/

Year	Total	Per capita
	<u>1960=100</u>	
1960	100	100
1961	97	95
1962	99	94
1963	101	93
1964	106	94
1965	105	91
1966	112	94
1967	105	86
1968	112	89
1969	127	98
1970	136	102
1971	146	106
1972	153	108
1973	153	105
1974	162	108
1975	150	97
1976	169	106
1977	187	114
1978	206	122
1979	203	117
1980	207	116
1981	216	121

1/ Adjusted to remove export commodities.
Source: (13).

and provision for the consumption of fixed costs. This method provides a more accurate measure of sectional value added than market price valuation, since it takes the country's tax and subsidy system into account. The products raised primarily for domestic use tended to compete for resources (with a long tradition of export crops such as sugar, coffee, cocoa, and tobacco which make up more than 50 percent of the country's total exports) in which the Dominican Republic has a substantial comparative advantage.

The persistence of this advantage over production of imported items such as wheat, feed grains, and soybeans makes it unlikely that the Government would try to displace imports with increased domestic food production. It is furthermore unlikely that the Government would adopt a policy to increase domestic food production for import substitution at the expense of its primary exports.

Table 6--Dominican Republic: Food production for domestic and export use

Use and commodity	1960	1965	1970	1975	1980	1981
	1,000 metric tons					
Domestic use:						
Rice, paddy	114	167	210	218	354	369
Corn	52	38	45	32	40	49
Sorghum	0	0	14	17	25	35
Beans, dry	25	23	25	30	40	43
Pigeon peas	17	21	25	14	19	24
Potatoes	6	16	23	27	25	27
Cassava	153	152	170	170	140	180
Sweetpotatoes	87	77	87	80	81	85
Yams	25	26	29	32	16	18
Onions	2	3	10	8	13	14
Peanuts	62	45	75	50	48	50
Mangoes	159	140	153	163	175	180
Avocados	87	115	122	128	145	150
Bananas	380	270	275	318	310	320
Plantains	300	395	531	500	600	625
Pineapples	6	5	13	18	20	25
Beef	25	24	32	37	43	46
Pork	7	8	11	19	12	1
Poultry	3	6	17	36	95	99
Milk	245	240	283	320	350	360
Export use:						
Sugar (raw)	876	640	1,035	1,075	1,200	1,253
Coffee	30	37	40	53	54	47
Cocoa	36	29	37	33	30	34
Tobacco	27	19	23	22	49	45

Source: (13).

In terms of total agricultural land, however, it would take very little acreage from export crops to make up the 20-percent food deficit. In 1981, about 340,000 of the 750,000 hectares (ha) harvested were devoted to food crops for domestic use. An additional 85,000 ha would make the country self-sufficient in food. This would, however, be at the expense of a 15-percent reduction in the country's agricultural exports, leaving consumers without wheat products and forcing a substantial reduction in poultry and pork production which are produced largely from imported feeds.

Food policies are adopted through Government control of marketing of agricultural commodities. The major power is vested in INESPRES (Instituto Nacional de Estabilizacion de Precios). This organization regulates the marketing and pricing

of such staples as rice, beans, corn, sugar, onions, garlic, chickpeas, plantains, bananas, peanut oil, and soybean oil by purchasing these items from producers at set support prices. INESPRES also licenses imports, and controls rice milling and retailing as well. In 1974, wheat imports came under the separate jurisdiction of the Government-owned flour mill.

Nominal import prices of major import commodities were stable until 1973, when they began to rise sharply (table 7). Real food import prices, represented by the food import price index of major import commodities deflated by the country's consumer price index, remained nearly level and then dropped in 1980. Each 10-percent change in real prices resulted in an average 7-percent change in food imports in the opposite direction.

Imports of rice, milk, coffee, wheat, flour, sardines, and herring are generally subsidized. This made some imported foods cheaper for consumers than world prices, and increased their consumption.

Table 7--Dominican Republic: Index of food import prices

Year	Actual import prices	Consumer prices	Real import prices
		1960=100	
1960	100	100	100
1961	88	96	92
1962	88	105	84
1963	89	114	78
1964	99	116	85
1965	106	114	93
1966	108	114	94
1967	118	116	102
1968	126	116	109
1969	126	117	108
1970	117	121	97
1971	132	127	104
1972	149	137	109
1973	170	157	108
1974	NA	178	NA
1975	NA	203	NA
1976	NA	220	NA
1977	255	247	103
1978	281	256	109
1979	308	279	110
1980	319	325	98

Sources: (6, 10).

Food aid amounted to more than half of total food imports in 1966, 1968, and 1972, and at other times was near 30 percent. Some of the aid came from international programs such as UNICEF but most came from individual countries including P.L.-480 from the United States (table 8).

P.L.-480 sales were especially large during 1967-72, when they peaked at nearly \$19 million. These sales fell somewhat until 1978, when they again began rising sharply, reaching \$21 million in 1980. U.S. assistance currently includes wheat flour, bulgar, rolled oats, corn, blended food supplements such as corn-soya-milk mixes, and vegetable oils. In earlier years, nonfat dried milk, wheat, and rice were also included (tables 9 and 10).

Food aid has not offset commercial imports to any appreciable extent. The analysis showed no significant correlation between them.

Table 8--Dominican Republic: Value of P.L.-480 food shipments

Year	Value of total shipments 1,000 dollars	Per capita value of shipments Dollars	Real value of per capita shipments 1960 dollars
1960	210	0.01	0.01
1961	125	.04	.04
1962	993	.31	.30
1963	10,004	3.02	2.64
1964	13,741	4.03	3.47
1965	8,537	2.43	2.13
1966	10,083	2.78	2.44
1967	18,758	5.04	4.34
1968	17,674	4.61	3.97
1969	16,961	4.29	3.67
1970	12,907	3.17	2.62
1971	15,821	3.78	2.98
1972	18,697	4.35	3.18
1973	4,513	1.02	.65
1974	4,152	.91	.51
1975	5,775	1.22	.60
1976	9,708	2.01	.91
1977	9,240	1.85	.75
1978	5,383	1.05	.41
1979	19,700	3.73	1.33
1980	20,023	3.68	1.13
1981	21,059	3.77	1.08

Source: (10).

The foreign exchange position remained relatively strong during 1960-80, largely because massive infusions of foreign investment capital more than offset the unfavorable total trade balances (table 11).

Table 9--Dominican Republic: Quantity of P.L.-480 imports

Commodity	1962	1964	1966	1968	1970
	<u>Metric tons</u>				
Milk, dried nonfat	251	6,443	7,329	3,688	4,990
Milk, evaporated	0	0	23	0	0
Butter	0	2,574	3	225	0
Milk fat, anhydrous	0	0	0	0	0
Cheese	0	36	2	0	0
Tallow, inedible	0	571	246	2,370	65
Wheat	2,912	10,451	14,288	83,334	91,063
Wheat flour	2,606	4,282	7,508	1,737	3,785
Wheat, bulgar and rolled	0	5,889	7,274	3,373	4,168
Rice	0	49,760	0	0	0
Corn	2,743	1,245	102	4,318	0
Blended food products	0	0	0	682	3,417
Beans, dried	0	74	2,540	907	0
Cottonseed, peanut, and soybean oil	189	806	4,570	25,259	3,404
	<u>Metric tons</u>				
	1972	1974	1976	1978	1980
	<u>Metric tons</u>				
Milk, nonfat dried	5,500	0	914	0	1,011
Milk, evaporated	0	0	0	0	0
Butter	0	0	0	0	0
Milk fat, anhydrous	0	0	0	0	0
Cheese	0	0	0	0	0
Tallow, inedible	670	0	0	0	0
Wheat	104,943	0	0	0	38,291
Wheat flour	3,227	1,019	1,133	388	1,242
Wheat, bulgar and rolled	4,893	2,868	2,902	1,782	1,815
Rice	0	0	0	0	2,899
Corn	15,011	0	0	14,820	76,879
Blended food products	5,215	7,486	10,729	6,112	3,634
Beans, dried	0	0	0	0	0
Cottonseed, peanut, and soybean oil	12,750	1,292	2,200	712	787

Table 10--Dominican Republic: Value of P.L.-480 imports

Commodity	1962	1964	1966	1968	1970
	<u>1,000 dollars</u>				
Milk, nonfat dried	69	1,143	2,452	1,861	2,707
Milk, evaporated	0	0	0	0	0
Butter	0	1,875	4	438	0
Milk fat, anhydrous	0	0	0	0	0
Cheese	0	26	3	0	0
Tallow, inedible	0	222	132	756	23
Wheat	185	968	936	5,255	5,344
Wheat flour	229	253	450	111	234
Wheat, bulgar and rolled	0	532	723	301	321
Rice	0	5,684	0	0	0
Corn	133	83	5	251	0
Blended food products	0	0	0	116	571
Beans, dried	0	13	437	139	0
Cottonseed, peanut, and soybean oil	101	280	1,746	6,150	1,218
Total	993	13,741	10,083	17,674	12,907
	<u>1,000 dollars</u>				
	1972	1974	1976	1978	1980
	<u>1,000 dollars</u>				
Milk, nonfat dried	3,963	0	1,145	0	352
Milk, evaporated	0	0	0	0	0
Butter	0	0	0	0	0
Milk fat, anhydrous	0	0	0	0	0
Cheese	0	0	0	0	0
Tallow, inedible	260	0	0	0	0
Wheat	6,743	0	0	0	6,813
Wheat flour	203	273	275	79	362
Wheat, bulgar and roll	434	650	576	330	460
Rice	0	0	0	0	1,026
Corn	794	0	0	1,500	9,614
Blended food products	926	2,128	3,906	875	1,262
Beans, dried	0	0	0	595	0
Cottonseed, peanut, and soybean oil	4,020	874	2,379	595	719
Total	18,697	4,188	9,654	5,063	21,059

Source: (14).

Table 11--Dominican Republic: External accounts

Item	1972	1974	1976	1978	1979
	Million dollars				
Merchandise exports f.o.b. <u>1/</u>	321.3	636.7	716.3	675.5	868.1
Merchandise imports f.o.b.	-337.6	-672.9	-763.6	-870.3	-1,093.9
Travel credit <u>2/</u>	32.9	53.5	70.8	87.9	115.8
Travel debit <u>3/</u>	-37.4	-75.6	-84.0	-100.9	-112.1
Other investment income, debit <u>4/</u>	-18.7	-37.0	-39.8	-43.4	135.1
Other goods and services, debit <u>5/</u>	13.0	19.5	29.0	37.5	117.9
Other goods and services, credit	-10.2	-24.3	-33.0	-43.4	-55.9
Unrequited transfers <u>6/</u>	30.6	35.0	46.6	109.4	142.2
including workers remittance credit	24.0	26.8	30.0	106.6	117.9
Capital, excluding reserves	85.1	316.5	173.5	371.5	506.4
inc. direct investment in					
Dominican Republic <u>7/</u>	43.5	53.5	59.9	39.6	-13.4
Other long-term credit of resident					
official sector	28.8	61.8	76.0	144.9	120.6
Drawings on loans received <u>8/</u>	50.0	81.2	115.8	188.7	322.5
Repayment on those loans <u>9/</u>	-18.1	-19.4	-39.8	-43.8	-201.8
Other long-term capital of					
other sectors	10.1	45.9	32.6	-29.0	32.9
Including other loans	18.1	69.5	78.0	57.5	121.5
Repayment of those loans <u>10/</u>	-8.0	-28.7	-52.0	-86.5	-88.6
Other short-term capital of resident	5.2	28.2	-4.2	53.0	209.3
Official nature, incl. liabilities					
to banks abroad	1.6	-15.9	6.0	53.0	186.8
Other short-term capital of deposit					
money banks	-9	30.4	7.6	17.8	-15.6
Other short-term capital of other					
sectors <u>11/</u>	8.8	86.5	16.9	145.3	172.7
Change in reserves	-10.1	-2.7	14.1	29.3	-8.2
Use of IMF credit	4.1	0	25.0	47.6	124.3
Total reserves minus gold	55.3	87.1	123.5	154.0	238.6

1/ F.o.b. is free on board. 2/ Tourist expenditures in Dominican Republic. 3/ Dominican Republic's tourist expenditures outside Dominican Republic. 4/ Undefined. 5/ Income earned by Haitians working in Dominican Republic. 6/ From Dominican Republic workers employed in United States. 7/ Equity capital and reinvestment of earnings. 8/ Loans from commercial banks, IDB, IBRD, U.S. Government, and other unspecified lenders. 9/ Loans from IDB, U.S. commercial bankers, and U.S. Government. 10/ Liabilities of Central Bank of Dominican Republic. 11/ Mostly the private nonmonetary sector's holdings.

Source: (7). Note that this listing is not all inclusive and only shows trade and capital flows of interest.

Long-term loans from U.S. commercial banks, Inter-American Development Bank, International Bank for Reconstruction and Development (World Bank), the U.S. Government, a buildup of short-term loans from foreign banks, the private nonmonetary sector's holding of foreign exchange, and an increase in remittances from Dominican workers employed in the United States contributed substantially to the maintenance of high level reserves (table 12).

Except for 1975, when the world price of sugar rose dramatically, the Dominican Republic has had a negative trade balance. Recent weak international demand for sugar, the country's major export, accompanied by low prices for ferronickel, coffee, cocoa beans, tobacco, and bauxite, reduced export earnings sharply. This situation, coupled with the rising cost of oil imports, created a growing deficit in the trade balance. As long as inflows of investment capital continue, the country's foreign reserve position should remain

Table 12--Dominican Republic: Foreign reserves

Year	Foreign reserves	Per capita reserves	Per capita real reserves
	Million dollars	Dollars	1960 dollars
1960	15.4	5.06	5.06
1961	6.0	1.92	2.00
1962	16.7	5.20	4.95
1963	38.9	11.75	10.31
1964	38.4	11.26	9.71
1965	47.8	13.62	11.95
1966	40.6	11.22	9.84
1967	29.4	7.90	6.81
1968	32.6	8.51	7.34
1969	36.8	9.32	7.97
1970	29.1	7.17	5.93
1971	52.8	12.63	9.94
1972	55.3	12.86	9.39
1973	84.3	19.03	12.12
1974	87.1	19.10	10.73
1975	112.6	23.96	11.80
1976	123.5	25.51	11.59
1977	180.1	36.16	14.64
1978	154.0	30.08	11.70
1979	238.6	45.19	16.14
1980	201.8	37.16	11.43
1981	225.2	40.36	11.53

Source: (6).

strong, but the debt service burden already threatens the country's external purchasing power.

Foreign reserves were generally adequate during the period. Even so, a 10-percent change in foreign reserves was found to be associated with a similar 5-percent change in food imports. If reserves should reach critically low levels as in other countries (such as Jamaica), however, it is very likely that much greater cutbacks in imports should be expected.

FUTURE CAPACITY TO IMPORT FOOD

Despite recent setbacks in external purchasing power, the Dominican Republic is expected to remain a significant market for U.S. farm products. Continued population and income growth will sustain continued growth in food demand. Since domestic agriculture will not likely meet this demand, the country will have to increase its food imports as well as agricultural raw materials to maintain its agribusiness. Continued growth of the economy depends heavily on agribusiness, mining, and manufacturing, the backbone of the economy and the country's growth industries; these should continue to thrive.

Foreign exchange earnings are a key factor affecting food imports. With a continued favorable investment climate, the inflow of foreign capital and loans should help offset negative trade balances. Debt servicing could be a problem in the near future if export prices for sugar and mineral exports do not recover soon.

The Dominican Republic will continue to be a strong growth market for U.S. commodities in the next 3 to 4 years. Based on current views and trends, we estimate that by 1985:

- o Real GDP will grow at a rate of 5 percent per annum;
- o Foreign reserves will remain at about \$200 million;
- o Domestic per capita food production will remain at its 1979 level;
- o Real import prices will remain at their 1979 level;
- o Food aid from foreign countries will continue at about the 1980 level;
- o Inflation will be held to 10 percent per annum or less.
- o The official U.S. dollar-Dominican Republic peso exchange rate will remain fixed at the 1980 level of \$1 per peso.
- o Population will continue to grow at 3 percent per annum.

If these assumptions materialize, the country should import an estimated \$400 million of food (including soybeans, fats, and oils) by 1985. This would be a 13-percent increase from the record level in 1980.

Assuming also that the United States continues its current market development strategy and P.L.-480 assistance, the U.S. share of that growing market should remain at about 75 percent. Thus by 1985, the value of U.S. exports to the Dominican Republic should reach \$290 million. ^{5/} The United States should continue as the primary supplier of fresh and frozen meat, hams, hatching eggs, rice, wheat and flour, corn, deciduous fruits, potatoes, beans, canned fruits, and soybeans and products as in recent years (table 13).

Table 13--Dominican Republic: U.S. share of selected food imports

Commodity	Percentage of total commodity		
	1960	1970	1980
	Percent		
Chicks	0	0	91
Meat, fresh and frozen	99	53	93
Hams	73	18	90
Milk, condensed	82	53	0
Milk, dried	0	0	8
Eggs, hatching	0	0	99
Butter	82	14	1
Cheese	14	21	32
Herring	1	3	5
Codfish	59	3	2
Rice	0	95	100
Wheat	45	100	98
Wheat flour	67	80	100
Corn	0	0	100
Semolina and rolled grain	6	72	45
Cereal base food preparation	50	50	54
Fruit, fresh (apples, grapes)	94	90	92
Onions and garlic	39	10	57
Potatoes, fresh	78	0	100
Beans, dried	30	99	100
Oils, edible	99	99	99
Fish, canned	16	25	14
Canned fruits	92	92	99
Vegetables, canned	27	23	15
Meat, canned	28	24	72
Soups	79	28	14
Soybeans	0	100	100
Fats and oils	0	0	88
Total food	44	58	68
Total food, including fats and oils	44	60	73

Source: (10).

^{5/} The U.S. share of the Dominican Republic's food imports reached 73 percent in 1980, compared with 58 percent in 1970 and 44 percent in 1960.

REFERENCES

1. Abbott, Phillip C. "Modeling International Grain Trade with Government Controlled Markets," American Journal of Agricultural Economics. Vol. 61, No. 1, February 1979.
2. _____ . "Developing Countries and International Grain Trade." Unpublished Ph.D. diss., Massachusetts Institute of Technology, Cambridge, June 1976.
3. Food and Agriculture Organization of the United Nations. Provisional Food Balance Sheets, 1972-74 average. Rome, 1977.
4. _____ . Food Balance Sheets. Rome, 1971.
5. Garcia Garcia, Jorge. Exchange Rate, Commercial Policy and Agricultural Development: The Experience of Colombia from 1953 to 1978. International Food Policy Research Institute, Washington, D.C., forthcoming.
6. International Monetary Fund. International Financial Statistics. Washington, D.C., 1980 Yearbook.
7. _____ . Balance of Payments, Yearbooks. Washington, D.C., 1978, 1979.
8. Leamer, Edward E. and Stern, Robert M. Quantitative International Economics. Boston: Allyn and Bason, 1970.
9. May, Jacques M. and McLellan, Donna L. The Ecology of Malnutrition in the Caribbean, Studies in Medical Geography. New York: Hafner Publishing Co., Vol. 12, 1973.
10. Secretariado Tecnico de la Presidencia, Oficina Nacional de Estadistica. Comercio Exterior de la Republica Dominicana. Santo Domingo, selected years.
11. Solemano, Georgio, and Lance, Taylor. Food Price Policies and Nutrition in Latin America. United Nations University, World Hunger Program, Food and Nutrition Bulletin, Supplement 3, Tokyo, 1980.
12. United Nations. Monthly Bulletin of Statistics. Rome, selected issues.
13. U.S. Department of Agriculture, Economic Research Service. Indices of Agricultural Production for the Western Hemisphere, 1970 through 1979, excluding the United States and Cuba. SB-639 (supplemented by unpublished data).
14. _____ . U.S. Agricultural Exports under Public Law 480. ERS-Foreign 395 (supplemented by unpublished data).
15. _____ . Jamaica, Trinidad, and Tobago, Leeward Islands, Windward Islands, Barbados, and British Guyana: Projected Levels of Demand, Supply and Imports of Agricultural Products to 1975. ERS-Foreign 94, 1963.

16. World Bank. World Trade Tables. Baltimore: Johns Hopkins Press, 1979.

17. _____ . World Tables. Baltimore: Johns Hopkins Press, 1979.

APPENDIX A--METHOD
AND ESTIMATION
PROCEDURES

Variables in the model to explain changes in the Dominican Republic's food imports included income, real food import prices, population, food supplies from domestic food production, food aid, and foreign reserves. These variables are suggested by the classical theory of demand.

Expected signs of these variables are:

1. The quantity index of food imports is expected to be inversely related to real import prices.
2. The quantity index of food imports is expected to be directly related to per capita real GDP.
3. The quantity index of food imports is expected to be directly related to per capita real foreign reserves.
4. The quantity index of food imports may be inversely correlated to per capita real aid if granting of aid means that the country substitutes P.L.-480 purchases for food that would otherwise have been imported on a commercial basis.
5. The quantity index of food imports may be inversely related to per capita production if indeed imports and domestic production are substitute sources of food.

The model is a single equation and is specified in the following way:

where:

PCQIIMP = f (PCGDP, PCAGPROD, PCREALES, PCREALAID, REALIMPPR).

PCQIIMP = Per capita quantity index of food imports less P.L.-480 imports.

PCREALGDP = Per capita GDP in constant 1960 Dominican Republic pesos.

PCREALRES = Per capita foreign reserves in constant 1960 Dominican Republic pesos.

REALIMPR = Food import price index with constant 1960 Dominican Republic pesos.

PCAGPROD = Per capita domestic food production index.

PCREALAID = Per capita real value of P.L.-480 exports to Dominican Republic in 1960 Dominican Republic pesos.

Annual observations for 1960-80 are the data base of this model, and the ordinary least squares method of estimation was used. Data, however, are missing for 1974-76 when the Dominican Republic did not publish official trade statistics.

Several of the indexes were calculated:

- o PCAGPROD was obtained by adjusting the USDA agricultural production index by recalculating the index after sugar, coffee, cocoa bean, and tobacco exports were subtracted from production to represent the domestic food supply that originates from domestic agricultural production [see table 6 (13)].
- o PCQIIMP was calculated by using the quantities of imported commodities weighted by their 1965 import unit values (see tables 14 and 15.) The index was then converted to a 1960 base. Data were not available for 1974-76.
- o REALIMPR was calculated by using the import unit values of imported commodities weighted by their quantities of imports in 1965 (see tables 14 and 15). The index was then converted to a 1960 base. Data were not available for 1974-76.

Real food import prices, real income, and real reserves were highly significant in determining the demand for food imports.

$$\begin{aligned}
 \text{PCQIIMP} = & -5.105 + 8.495 \text{ PCREALRES} - 2.187 \text{ REALIMPR} \\
 & \quad \quad \quad (t = 2.882^*) \quad \quad \quad (t = -1.926^*) \\
 & + 133.738 \text{ PCREALGDP} - 6.899 \text{ PCREALAID} - 0.223 \text{ PCREALPROD} \\
 & \quad \quad \quad (t = 2.981^*) \quad \quad \quad (t = 0.807) \quad \quad \quad (t = -0.095) \\
 & + 95.845 \text{ D}_1(1964) + 96.302 \text{ D}_2(1968) - 78.471 \text{ D}_3(1971-72) \\
 & \quad \quad \quad (t = 2.822^*) \quad \quad \quad (t = 2.764^*) \quad \quad \quad (t = 3.034^*) \\
 & + 123.088 \text{ D}_4(1980) \\
 & \quad \quad \quad (t = 2.675^*)
 \end{aligned}$$

$$\begin{aligned}
 F = 23.923; R^2 = 0.964; R^2(\text{corrected}) = 0.924; \text{Durbin-Watson} \\
 = 2.385
 \end{aligned}$$

The relative importance of each variable can also be expressed by its elasticity of imports with respect to each of the independent variables.

Variable	Elasticity
REALIMPR	-0.815
PCAGPROD	-.079
PCREALAID	.054
PCREALGDP	1.560
PCREALRES	.309

The fitted equation yields income and reserves and has all the expected signs for the coefficients. Real per capita income, which best describes purchasing power, was positively correlated to food imports; its elasticity with respect to food imports was

1.56. This is not unusually high, since food imports are a relatively small share of the total food supply. Moreover, this high elasticity reflects significant shifts to high-value products despite the growing domestic output of these products.

Per capita real foreign reserves were also positively related to food imports but have a low elasticity of 0.309. The import price variable was, as expected, inversely related for food imports with an elasticity of -0.815. Both these coefficients were statistically significant. Domestic food production was inversely related to food imports but the coefficient was not significantly different from zero. The index of commercial food imports was not significantly affected by changes in the amount of P.L.-480 imports.

Different time periods in which significantly different economic and political events occur are difficult to portray in a model. For the Dominican Republic, 1964, 1968, 1971-72, and 1980 were such years. In 1964, for example, the Dominican Republic was involved in a military conflict that seriously affected the economy; 1968, 1971, and 1972 were years in which import decisions were unusually influenced by war politics; 1980 had unusually high imports when importers felt threatened by import controls. These individual years were represented by "dummy" variables and all proved to be significantly correlated with food imports.

APPENDIX B--TABLES

The following tables provide commodity details of the quantity and value of food imports by the Dominican Republic for select years through 1960-80 (app. tables 1 and 2).

Appendix table 1--Dominican Republic: Quantity of food imports, by commodity

Commodity	1960	1965	1970	1973	1978	1979	1980
	<u>Metric tons</u>						
Livestock and live-							
stock products:							
Chicks, day old	0	0	0	42	62	138	190
Beef	10	5	30	61	42	70	57
Pork	0	0	0	0	7	778	5,459
Poultry improved	0	24	644	47	32	1,816	6,974
Poultry, other	0	2	24	0	0	0	0
Ham, canned	52	63	116	0	46	31	26
Ham, other	31	25	102	45	19	116	328
Dairy products:							
Milk for babies	0	0	0	0	1,087	961	882
Milk, evaporated	4	890	2,924	0	0	0	0
Milk, condensed	0	2,013	1,814	0	263	121	88
Milk, dried	120	2,575	6,940	2,969	6,324	6,948	8,995
Milk, other	0	0	0	0	513	771	0
Cheese, common	64	187	135	88	138	102	154
Cheese, fancy	0	44	50	0	154	127	194
Eggs, fresh	0	26	0	0	16	1	0
Eggs, hatching	0	0	1,057	1,682	373	1,206	1,427
Fishery products:							
Herring	1,541	1,380	1,438	4,823	2,573	2,516	2,245
Tuna, canned	15	274	433	0	93	122	174
Salted codfish	2,955	3,665	5,874	4,735	4,644	6,136	6,166
Mackerel	9	53	2,197	0	1,040	2,631	566
Salmon, canned	13	43	50	0	21	35	60
Sardines	268	1,114	1,543	5,956	2,763	3,010	8,069
Grain products:							
Corn	0	0	3,209	31,835	86,879	101,749	171,109
Wheat	25,849	35,376	40,450	63,253	156,036	141,819	157,611
Wheat, durum	0	0	0	0	6	0	20
Oats	708	951	4,142	2,470	1,273	1,609	2,391
Rice, polished	0	83	0	34,491	18,427	491	33,043
Rice, other	0	0	0	0	0	0	0
Corn meal	0	1,544	2,982	0	1,165	1,079	748
Wheat flour	7,317	10,415	1,817	3,960	1,915	1,229	226
Wheat flour, durum	0	1,814	0	0	0	0	0
Oats, rolled	0	0	916	0	0	0	0
Oat flour	0	0	0	0	467	250	0
Other flour	0	0	0	0	5,076	0	0
Oats semolina	0	0	0	0	264	0	0
Wheat semolina	1,190	2,088	676	8,332	658	0	0
Corn semolina	262	365	979	0	0	0	0
Oats, pearled	0	0	0	0	1,176	1,541	1,117
Malt	1,140	799	5,420	7,253	8,095	13,553	12,838
Malt extract	279	847	1,387	368	1,161	653	776
Cereal base food preparations	49	187	141	3,903	1,561	2,326	6,117
Food for children, cereal or milk	83	218	291	0	105	517	198
Other food for children	0	0	0	0	1,316	1,161	245
Corn starch	0	0	0	1,302	1,538	2,645	1,665
Corn gluten	0	0	0	0	0	1,243	347

Continued--

Appendix table I--Dominican Republic: Quantity of food imports, by commodity (continued)

Commodity	1960	1965	1970	1973	1978	1979	1980
	<u>Metric tons</u>						
Fruit:							
Apples	301	602	781	658	1,683	1,322	1,698
Grapes	180	295	138	374	569	543	674
Raisins	0	0	0	0	174	152	245
Vegetables:							
Garlic	0	0	0	592	683	169	335
Onions	996	1,578	67	0	0	461	90
Potatoes, fresh	315	657	0	0	383	3,000	0
Potatoes, seed	435	469	1,175	0	0	0	0
Beans, dried	0	2,174	5,706	9,366	3,241	6,702	5,373
Tomatoes, canned	1,711	1,911	1,635	0	0	0	0
Tomato sauce	55	145	434	0	1,048	623	3
Mayonnaise	20	31	172	296	425	368	532
Meat soup	14	162	276	2,292	2,919	3,717	3,971
Tomato soup	15	87	25	0	0	0	0
Vegetable soup	34	566	552	0	0	0	0
Feeds:							
Poultry feed	656	1,872	9,074	0	0	13	0
Animal feed, other	89	2,254	5,094	3,072	0	294	0
Soybean meal	0	0	0	777	28,274	31,421	37,752
Oilseeds:							
Soybeans	0	0	36,473	9,671	22,805	1,100	36,473
Fats and oils:							
Animal fats	0	0	1,242	0	3,976	8,879	11,803
Animal fats, other	0	54	0	8,661	6,766	4,127	2,781
Animal fats, in- edible	2,812	2,697	7,045	155	1,279	2,726	1,306
Soybean oil, crude	0	0	0	25,219	12,833	18,330	16,010
Cottonseed oil, crude	0	289	0	0	8,700	34,364	26,006
Peanut oil	0	15,044	0	0	2,248	0	0
Soybean oil, re- fined	0	0	0	445	78	796	6,392
Cottonseed oil	0	0	541	0	220	0	3,000
Olive oil	247	129	388	0	418	449	484
Animal oils	0	0	0	0	2,112	2,290	2,387
Other food products:							
Vegetable oils, refined	0	0	0	0	260	164	704
Glucose	238	306	1,348	1,484	2,649	2,557	3,054
Wheat, puffed, and corn flakes	0	0	0	1,446	570	801	413
Fruit preserves	0	0	0	1,711	2,046	2,756	2,860

Appendix table 2--Dominican Republic: Value of food imports, by commodity

Commodity	1960	1965	1970	1973	1978	1979	1980
	<u>1,000 pesos</u>						
Livestock and livestock:							
products:							
Chicks, day old	0	0	0	316	626	987	1,729
Beef	9	8	0	104	133	237	219
Pork	0	0	0	0	11	986	7,747
Poultry improved	0	38	218	33	30	1,954	7,509
Poultry, other	0	4	0	0	0	0	0
Ham, canned	22	73	113	0	46	36	28
Ham, other	11	28	112	79	44	204	678
Dairy products:							
Milk for babies	0	0	0	0	1,911	1,926	2,273
Milk, evaporated	2	264	702	0	152	99	73
Milk, condensed	0	907	616	0	0	0	0
Milk, dried	74	1,374	4,398	2,407	4,118	5,080	9,119
Milk, other	0	0	0	0	353	515	708
Cheese, common	38	138	89	97	184	148	177
Cheese, fancy	0	34	37	0	163	149	235
Egg, fresh	0	29	0	0	0	0	0
Eggs, hatching	0	0	1,063	1,968	548	2,083	2,613
Fishery products:							
Herring	169	364	713	3,804	2,716	3,298	3,002
Tuna, canned	5	159	372	0	245	250	484
Salted codfish	516	1,696	2,889	3,732	7,824	11,259	14,966
Mackerel	1	18	810	0	774	1,845	434
Salmon, canned	10	31	49	0	26	66	111
Sardines	65	460	711	2,526	2,148	2,553	7,499
Grain products:							
Corn	0	0	188	2,388	9,384	11,176	20,648
Wheat	1,127	2,392	2,657	24,182	23,246	21,213	28,564
Wheat, durum	0	0	0	1	1	0	0
Oats	47	289	663	367	305	460	683
Rice, polished	0	21	0	12,859	4,989	174	15,005
Rice, other	0	0	0	0	0	170	0
Corn meal	0	125	320	0	242	369	101
Wheat flour	183	910	156	624	495	297	66
Wheat flour, durum	0	176	0	0	0	0	0
Oats, rolled	0	0	129	0	0	0	0
Oat flour	0	0	0	0	179	17	44
Other flour	0	0	26	0	512	76	13
Oat semolina	0	0	0	0	100	0	0
Wheat semolina	130	222	80	1,767	183	61	68
Corn semolina	25	49	116	0	0	0	0
Oats, pearled	0	0	0	0	515	743	525
Malt	120	102	650	962	2,444	3,313	4,025
Malt extract	3	165	369	1459	595	497	521
Cereal base food preparations	0	97	110	1,727	1,401	2,326	3,117
Food for children, cereal or milk base	38	188	247	0	82	267	223
Food for children, other	0	0	0	0	469	581	412
Corn starch	0	0	0	251	378	787	507
Corn gluten	0	0	0	0	125	444	108

Continued--

Appendix table 2—Dominican Republic: Value of food imports, by commodity (continued)

Commodity	1960	1965	1970	1973	1978	1979	1980
	<u>1,000 pesos</u>						
Fruit:							
Apples	15	161	195	194	504	448	600
Grapes	10	102	0	184	159	219	317
Raisins	0	0	138	0	130	108	167
Vegetables:							
Garlic	0	0	139	342	598	179	386
Onions	21	155	9	0	0	103	26
Potatoes, fresh	20	64	0	0	25	658	0
Potatoes, seed	13	60	148	0	0	0	0
Beans, dried	0	631	1,721	4,360	1,603	4,294	4,385
Tomatoes, canned	300	649	504	0	0	0	0
Tomato sauce	6	47	145	204	577	379	0
Mayonnaise	5	19	93	0	402	359	476
Meat soup	36	198	498	2,619	5,024	7,469	8,840
Tomato soup	5	30	10	0	0	0	0
Vegetable soup	2	218	228	0	0	0	0
Feeds:							
Poultry feed	44	279	1,414	0	0	0	0
Animal feed, other	0	332	734	832	0	0	0
Soybean meal	0	0	0	307	6,757	6,976	7,979
Oilseeds:							
Soybeans	0	0	697	1,892	5,772	298	10,221
Fats and oils:							
Animal fats	0	0	167	0	4,157	5,107	6,737
Animal fats, other	0	10	938	1,439	3,831	2,562	1,377
Animal fats, inedible	225	495	0	145	699	1,678	743
Soybean oil, crude	0	0	0	11,923	7,161	27,257	9,373
Cottonseed oil, crude	0	80	0	0	5,821	0	15,478
Peanut oil	0	4,846	0	0	2,006	0	0
Soybean oil, refined	0	0	0	287	67	616	3,442
Cottonseed oil	0	0	191	0	1,288	0	1,563
Olive oil	79	90	283	0	228	237	262
Animal oils	0	0	0	0	2,513	2,749	4,574
Other food products:							
Vegetable oils, refined	0	0	0	0	245	211	595
Glucose	10	43	133	719	611	651	812
Puffed wheat and corn flakes	0	0	0	555	680	797	606
Fruit preserves	0	0	0	728	1,330	1,924	2,261