

Testimony of C. Parr Rosson, III, PhD<sup>1</sup>  
before the

Senate of the United States  
Committee on Agriculture, Nutrition and Forestry

Hearing on Opportunities and Challenges in Agriculture Trade with Cuba

April 21, 2015

Mr. Chairman and esteemed members of the Committee, I thank you for the opportunity to testify on the opportunities and challenges for agricultural trade with Cuba. I am Parr Rosson, Professor and Department Head in the Agricultural Economics Department at Texas A&M University. I have been at Texas A&M since 1989. From 1997 and until becoming Department Head in 2012, I was the Director of the Center for North American Studies (CNAS) at Texas A&M. I have been involved in research and extension education related to Cuba for 15 years. In that capacity, I conducted dozens of economic impact analyses examining how increasing U.S. food and agricultural exports to Cuba will impact the U.S. economy and the economies of the states that produce those goods for export. During 2010 as the House Agriculture Committee was considering HR 4645, we conducted 16 analyses at Committee staff request describing how the relaxation of travel restrictions and financing regulations would increase U.S. exports and stimulate business activity and job growth throughout the U.S. economy. Since then, I have continued to investigate changes in Cuba and how they affect U.S. agriculture. In general, we find that exports create jobs, and exports to Cuba are no exception. For every \$73,600 in U.S. food and agricultural exports to Cuba, one job is created in the United States and an additional \$170,000 in economic activity is required to support those additional exports.

#### Opportunities and Market Potential

Cuba has the potential to become a major market for U.S. agricultural exports and to develop into a market that is quite diverse, with bulk staple products, such as corn, wheat, soybeans and rice, being important in the near term. But, over time as the market grows, and the tastes and preferences of the average Cuban become more sophisticated, U.S. exports will be well positioned to capture a growing share of the high-value food market. So as to not overemphasize the present size of the Cuban market, U.S. exports to Cuba of \$286 million represented less than one percent of total U.S. agricultural exports of \$169 billion in 2014.

Our previous research indicates that U.S. export potential could exceed the record \$709 million set in 2008. With a more open economy, less regulation by both governments, strong tourism and remittances, U.S. food and agricultural exports have the potential to exceed \$1.2 billion annually within five years (Rosson, Adcock and Manthei). While much of this additional export volume may be consumed by international visitors, a

---

<sup>1</sup> Professor and Department Head, Department of Agricultural Economics, Texas A&M University.

growing share will also make its way into the Cuban populace, spurring additional demand for U.S. products.

In 2014, U.S. exports to Cuba were \$286 million, supported \$867 million in total business activity and provided employment for 3,885 workers throughout the U.S. economy. U.S. agriculture receives economic gains from increased agricultural exports, with benefits accruing to non-agricultural sectors such as business and financial services, real estate, wholesale and retail trade and health care. Approximately 45 percent of the gains in business activity go to non-agricultural sectors, while the majority of gains, 55 percent, go to agricultural producers, agribusinesses and related firms.

These most recent exports have been concentrated in poultry, the soybean complex and corn. Major exports included frozen leg quarters and other poultry (\$148 million), soybeans and soybean meal (\$98 million) and corn (\$28 million). Together these three product categories represented 96 percent of U.S. agricultural exports to Cuba in 2014. Other U.S. exports were feeds/fodders (\$9.4 million), dairy products (\$1.4 million), pork (\$1.3 million) and fresh fruit, prepared and snack foods (\$379,000). U.S. poultry claimed 73 percent of the poultry market in Cuba, while the soy complex represented 20 percent and corn one-half of the market. Cuba is now the seventh largest market for U.S. exports in the Caribbean/Central American region, but has potential to become more important.

Cuba is a centrally-planned economy located 90 miles south of Key West, Florida. The proximity to the United States makes Cuba economically, socially and politically important. Since the U.S. embargo was implemented in 1962, effectively severing diplomatic and economic relations, U.S. firms have been prohibited from doing business there.

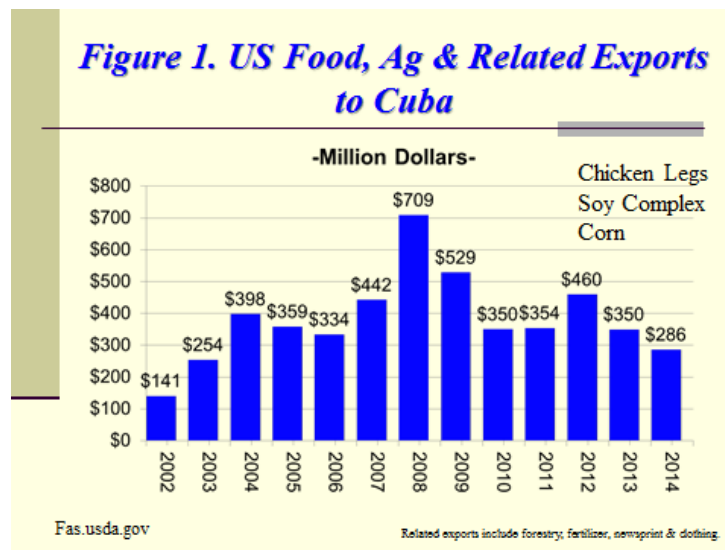
Nearly three-fourths of the labor force is employed by the government of Cuba (GOC) at a wage of approximately \$20/month. The literacy rate is estimated at 99.8 percent, the highest in the Western Hemisphere (CIA). The GOC, however, is involved in virtually every aspect of the business and personal lives of its citizens. Trade and investment are strictly limited and controlled by government regulation. Further, food and agricultural imports are required to enter the country through Empresa Comercializadora de Alimentos (ALIMPORT).

International trade between the United States and Cuba is strictly regulated by both governments. U.S. firms may export foods, agricultural good and medicines to Cuba. Recent regulatory changes allow the importation of selected Cuban products, but these products must be purchased from private businesses, not the Cuban government. So, while some relaxation of regulation has occurred, there are significant regulatory impediments to trade in food and agricultural products.

However, a combination of factors led to the growth of U.S. food and agricultural exports to Cuba during the early 2000s. First, passage of the Trade Sanctions Reform and Export Enhancement Act of 2000 allowed U.S. firms to legally export their agricultural products to Cuba and travel there for business purposes. Second, the rapid onset of hurricane

Michelle in 2001 led to the destruction of most food crops in Cuba, and subsequently to acute food shortages. This prompted Cuba to begin the importation of U.S. food and agricultural products on a commercial basis for the first time since the embargo was imposed.

From modest beginnings of \$141 million in 2002, U.S. exports grew to \$398 million in 2004 and peaked at \$709 million in 2008. U.S. exports then fell to \$460 million in 2012, \$350 million in 2013 and \$286 million in 2014 (Figure 1). For January and February, 2015 U.S. exports to Cuba were down 56 percent from the same period last year to \$35 million (Foreign Agricultural Service, USDA).



This recent export performance is in sharp contrast to 2009, when a much larger and more diverse mix of U.S. products were exported to Cuba. In 2009, U.S. agricultural exports to Cuba of \$529 million required 8,588 jobs and generated \$1.6 billion in total economic activity. Major U.S. exports were frozen broilers/turkeys and other poultry (\$144 million), soybeans and soybean products (\$133 million) corn (\$120 million), and wheat (\$73 million). These four product categories represented 89 percent of total U.S. agricultural exports to Cuba. Other important U.S. exports were animal feeds (\$26 million), pork (\$11 million), dry beans (\$4.3 million), and processed foods and phosphate fertilizers (\$3 million) each. Minor exports were apples, pears and grapes (\$2.6 million), margarine (\$2.2 million), and treated poles (\$1.7 million).

There are several reasons for this sharp decline in U.S. exports. First, Cuba has diversified its food suppliers by shifting away from U.S. products in favor of those from Brazil, Canada, Argentina, Mexico, Spain, France, Ukraine, and Vietnam. Credit terms are offered by some of these countries, allowing ALIMPORT to conserve hard currency and use credit to make larger purchases over periods of several months or longer. Sustained high prices for many agricultural commodities and a strong U.S. dollar also negatively impacted U.S. exports over the last several years. Lower earnings from tourism, and nickel exports also hampered the GOC from continuing large cash expenditures on imported food. Perhaps another reason may have been the deliberate

decision by the GOC to move away from the United States as a food supplier. After a decade of trying to influence U.S. policy and failing, persistence may have waned. The net result was a loss of U.S. competitiveness and market share, followed by a precipitous 59 percent decline in U.S. exports between 2008 and 2014.

Cuba, however, does have potential for growth as a market for U.S. food and agricultural exports. With a population of 11 million, Cuba is similar in demographic composition and structure to the Dominican Republic, the largest U.S. market in the Caribbean/Central American region. Cuba also mirrors Guatemala, a market that has grown 38 percent since over the past five years.

In 2014, the Dominican Republic had a population of 10 million, with a labor force of 4.9 million. The proportion of the population between the ages of 25-54 was 39 percent. Per capita gross domestic product (GDP) was estimated at \$9,200. GDP was composed of 15 percent agricultural production, 22 percent industrial production and 63 percent services (CIA). In 2014, the Dominican Republic imported \$1.4 billion from the United States, compared to \$1.1 billion in 2010, an average annual growth rate of nearly seven percent.

Cuba, by contrast, had a labor force of 5.2 million in 2010 (CIA). Per capita GDP was estimated to be \$10,200. This figure includes adjustment for government subsidized food, housing, transportation and medical care. Agriculture accounted for four percent of GDP, while industrial production was 22 percent and services was 74 percent. The proportion of the population between the ages of 25-54 was 47 percent, higher than the Dominican Republic and positive in terms of U.S. export growth potential since that age group tends to experience the highest levels of expenditure on food and other consumer products. These demographic comparisons give some idea of the potential the Cuban food market could have if it becomes more market oriented, less restricted by government regulation and experiences investment in business and infrastructure.

Currently and likely for the near future, three key factors will influence the volume and mix of U.S. food and agricultural exports to Cuba. First, remittances to Cuba, largely from Cuban-Americans in the United States, represent a major source of income and purchasing power for about 60 percent of Cuban households and an important source of foreign exchange for the GOC.

Cuba's exports are also important for sustaining the economy and the ability to import food. With imports representing as much as 80 percent of food consumption in some years, access to foreign exchange is crucial. Tourism (\$1.9 billion), nickel/cobalt (\$1.0 billion) and pharmaceuticals (\$547 million) were Cuba's three most important exports out of a total of \$5.3 billion in 2013. Other major exports included sugar (\$449 million), tobacco (\$245 million) and rum (\$154 million). Cuba's ability to purchase food fluctuates widely as global markets for these products influence prices and volumes traded.

Finally, U.S. export success is heavily influenced by decisions on the part of the GOC and ALIMPORT related to which products to purchase, at what price and in what

volumes. As relations between the two countries improve, there is reason to be optimistic that U.S. exports will expand, leading to a more robust and competitive market.

The present product mix of frozen leg quarters, soybean meal and corn could certainly increase to include more processed foods and high value products such as pork, beef, prepared meats such as sausage and hot dogs, along with condiments such as sauces, seasonings, mayonnaise, mustard and other products. Dairy products, rice and wheat also have strong potential in the market. Snack foods, frozen desserts, soups, gelatins and canned fruit and vegetables all have potential. Raisins, nuts, fresh fruit and vegetables, along with gum, bottled water, wine, beer and spirits all have potential. These products were exported to Cuba to some degree until 2012 when the Cuban government began to make substantial food purchases from other suppliers.

### Challenges Facing U.S. Exports to Cuba

There are several constraints that may limit the performance of U.S. exports to Cuba. Consumer incomes, infrastructure/logistics, and policy and regulation are among the most important. Consumer income growth is one of the critical factors affecting market potential in Cuba. With the large majority of the population on fixed, low incomes, consumer disposable incomes are limited. Remittances, largely from Cuban-Americans in the United States are an important component of household income. These funds are transferred directly to Cubans and represent a substantial boost to consumer purchasing power. Estimated to increase eight percent from \$2.77 billion in 2013 to \$3.0 billion in 2014, remittances are likely to have a substantial positive economic effect on the Cuban economy and U.S. exports, spurring expenditures by those who receive them and fostering additional investment in small business ventures (Cuba Standard). Should remittances decline, however, there would be direct negative impacts on Cuban consumers and followed by lower purchases of U.S. food products.

Tourism is also an important income source for those Cubans who work in restaurants, hotels and other tourist related businesses, such as transportation. With a record 3.0 million visitors in 2014, spending an average of \$629/trip, tourism represents a key component of the Cuban economy that generated \$1.9 billion last year (Carrillo). Approximately 40 percent of all visitors to Cuba are from Canada, followed by Germany, England, Italy, France and Mexico (ONE). Allowing U.S. visitors to use credit cards will also have a positive economic impact, but the exact amount is uncertain and more research is required.

Cuba also relies on exports of nickel and cobalt, pharmaceuticals, sugar and rum. International market volatility due to wide swings in commodity prices can limit the amount of currency available for food purchases, and certainly dampen U.S. export potential.

Infrastructure and logistics pose special problems for U.S. exporters. Internet access in Cuba is severely limited, with only an estimated five percent of the population having access. While some tourist hotels provide internet access in rooms and terminals in the

lobby, many have limited access or none at all. This can hamper U.S. business operations and communications with ALIMPORT officials since some may not have consistent access to email or internet communications. Lack of internet and email can certainly have a negative effect on communications between Cuban officials and U.S. businesses after deals are made and the U.S. representative returns home.

Electrical power, while adequate most of the time, does have limitations. Intermittent outages and complete loss of power are common occurrences. When this occurs, perishable food products located in warehouses, at Cuban Customs, or in groceries or restaurants may be subject to damage, partial spoilage or complete loss. Additional investment in power infrastructure will be an important factor in determining the amount of U.S. perishables that can be imported and retained in storage. Bulk cargoes, such as corn, soybeans, wheat and rice also face constraints due to antiquated unloading facilities at ports, limited vessel size constraints and slow loading capacities. The development of an efficient, reliable supply chain is crucial to future U.S. export success.

Many U.S. competitors in the Cuban market offer some type of credit terms to ALIMPORT for food purchases. U.S. firms are precluded from doing so and also face an added constraint of being required to offer only cash-in-advance sales, or cash against documents. U.S. exporters cannot use letters of credit to facilitate sales and manage risk, raising the cost of U.S. products and making them less competitive relative to Spain, Canada, Brazil, China and Vietnam. Reducing the cost and time necessary to process payment for U.S. exports to Cuba would have positive economic impacts in terms of increased exports and economic activity. U.S. exports to Cuba would be expected to rise by \$271.2 million/year, requiring an additional \$561.9 million in business activity for a total economic impact of \$833.1 million and supporting 4,478 new jobs (Rosson, Adcock and Manthei). In summary, consistent, transparent and facilitative policies related to export finance for U.S. exports to Cuba would have positive economic impacts on U.S. exports and the U.S. economy.

#### Background on Agriculture in Cuba

Agriculture (including sugar) accounts for 4.2 percent of Cuba gross domestic product (GDP), compared to 18 percent for repairs, 17 percent for public health and manufacturing at 15 percent (ONE). Cuba has a moderate, subtropical climate with an average of 330 days of sunshine annually. The island's weather is characterized by a dry season (November-April) and a rainy season (May-October). The average temperature ranges from 75 degrees in the West to 80 degrees in the East. Humidity averages about 80 percent and average annual rainfall is 52 inches, with about 39 inches falling during the rainy season (Cuba Weather).

Roughly 50 percent of Cuba's land is classified as agricultural, with 75 percent of that land area in relatively flat to gently rolling terrain and suitable for tropical and subtropical agricultural production (USDA). According to the Food and Agriculture Organization of the United Nations, however, about 70 percent of Cuba's arable land has low organic matter content, while 45 percent is characterized by low fertility, 42 percent is eroded and

40 is poorly drained. These soil conditions are attributed to poor land management, including continuous tillage, overgrazing, and inadequate or improper use of irrigation and drainage systems.

Agricultural in Cuba land is evenly distributed between cropland (46 percent) and pasture (54 percent) (USDA). Recently, a large, but so far undocumented, amount of Cuba's cropland was taken out of permanent crop production and placed in native, unimproved pasture. It is suspected that this was done in an attempt to increase milk production, which has declined about 10 percent since 2003. This occurred as milk output per cow actually increased 25 percent over the same period (ONE). Cereals (rice and corn), sugar cane, tropical fruits, and vegetables accounted for 84 percent of harvested area in 2013.

Cuba's field crop yields, harvested area and production have varied widely over the past decade. Corn yields averaged 47 bushels/acre in 2013, compared to 160 bushels/acre in the United States. These yields, however, were up 20 percent from 41 bushels/acre in the period from 2003-08. Harvested area for corn declined from 556,000 acres in 2010 to 440,000 acres in 2013. In 2013, Cuba rice yields averaged 3,000 pounds per acre, compared to 7,400 in the United States. Harvested area for rice was down five percent to 489,000 acres. Rice production was up in 2013 to 677,000 metric tons, however, nearly 20 percent more than 2010.

Because of poor soil conditions, high humidity, timing and amounts of rainfall, high insect infestation and lack of pesticide or biological controls, Cuba's ability to produce grain and oilseed crops is limited and likely to remain so over the long term. According to FAO, 42 percent of Cuba's agricultural land is affected by medium to highly erodible soils. Poor drainage and low fertility affect 40 to 44 percent of soils, while 70 percent experience low organic matter. As a result, Cuba will remain one of the top grain and oilseed product markets in the Caribbean region.

### International Visitors in Cuba

A record 3.0 million international visitors traveled to Cuba in 2014, up from 2.0 million in 2004. Slightly more than 90,000 international visitors were U.S. business representatives and other approved categories. Revenue from international visitors is a major source of foreign exchange for the government of Cuba (GOC), ranked third behind technical services and remittances. It is also an important source of income for Cubans working in tourism such as wait staff, taxi drivers and tour operators. This revenue was equivalent to 57 percent of all merchandise exports in 2009 and 28 percent of the balance of all services trade for 2007. Further, as Cuban tourism earnings increased by six percent from 2006 to 2008, U.S. exports doubled. As earnings from tourism declined 11 percent in 2009, U.S. exports fell by 25 percent. The potential increases in U.S. food and agricultural exports to Cuba due to increased travel range from \$48 million to \$366 million/year, creating up to 5,500 new jobs, these estimates include only the additional spending by new U.S. visitors to Cuba (Rosson, Adcock and Manthei).

Changes implemented by the GOC in April 2008 allow Cubans to stay at some tourist hotels and resorts (Dominican Today). Many of the 4 and 5 star facilities are out of the price range of most locals who earn the equivalent of about \$20/month. During the low season of 2009 (August), however, some of the 2 and 3 star hotels in Varadero, Cuba's major tourist beach resort area, were booking one-week stays to locals for around \$200/week (Global Post). With about 60 percent of Cubans having access to hard currency (Calgary Herald) either from remittances, factory and farm bonuses, or tips, these 'new' tourists, are creating some additional demand for U.S. food products.

While many other forces also influenced U.S. exports, and cause-effect may be debatable, there does appear to be a fairly strong linkage between the amount of money Cuba earns from visits to the island and the amount of food it can afford to import from the United States and other suppliers. USDA estimated in 2008 that the proportion of imported foods supplying the tourist trade in Cuba was between 25 and 33 percent. CNAS estimates indicate that the U.S. share of the Cuban food market for international visitors is about 40 percent, implying that each tourism dollar spent in Cuba generates an additional \$0.10 to \$0.13 in U.S. food exports needed to supply the Cuban tourist trade.

In conclusion, the Cuban market for U.S. food and agricultural exports has potential for growth. From modest beginnings, the market has shown strong growth at times, but also weakness. Our estimates indicate that U.S. food and agricultural exports to Cuba have the potential to exceed \$1.0 billion annually. These additional exports would support the creation of 6,000 new jobs throughout the U.S. economy. For this potential economic impact to be realized, however, several challenges lie ahead. First, income growth and economic prosperity for Cubans is needed. Second, infrastructure improvement and investment will be necessary to improve the efficiency of existing supply chain and the creation of new cold chains to handle processed foods. Finally, policies and regulations that facilitate trade, and that are transparent and consistent are an absolute necessity. Open trade would certainly lead to more rapid growth, but absent free trade, less regulation of financing, the use of letters of credit and improvements in banking conditions in Cuba would stimulate U.S. export growth. Thank you again for allowing me to testify on the opportunities and challenges affecting U.S. agriculture trade in Cuba.

#### References Cited

- Calgary Herald. *Cubans Allowed to Stay at Tourist Hotels*. March 31, 2008. [www.canada.com/calgaryherald](http://www.canada.com/calgaryherald)
- Carrillo, Venus. *Tourism in Cuba, So Far So Good*, OnCuba, Fuego Media Group, March 15, 2015.
- Central Intelligence Agency of the United States. *World Factbook*, Cuba and the Dominican Republic, April 2015.
- Cuba Standard. March 19, 2014. Cubastandard.com.
- Dominican Today. *Cubans Can Stay in Hotels*. April 1, 2008. [www.dominicantoday.com](http://www.dominicantoday.com).
- Food and Agriculture Organization of the United Nations. *Land Resources Information Systems in the Caribbean*. 2000.



Foreign Agricultural Service, USDA. Global Agricultural Trading System (GATS), online database. [www.fas.usda.gov](http://www.fas.usda.gov).

Global Post. *At Cuban Resorts, the of Tourism Apartheid*. August 10, 2009. [www.globalpost.com](http://www.globalpost.com).

Office of Global Analysis, Foreign Agricultural Service, USDA. *Cuba's Food and Agriculture Situation Report*, March 2008.

Oficina Nacional de Estadísticas (ONE). Republic of Cuba, 2008 and 2015 Series. Located at [www.one.cu](http://www.one.cu).

Rosson, C. Parr, Flynn J. Adcock and Eric Manthei. *Estimated Economic Impacts of the Travel Restriction Reform and Export Enhancement Act of 2010* by the Center for North American Studies, Texas A&M AgriLife Research, Texas A&M University, submitted for the record to the House Committee on Agriculture, United States House of Representatives, March 11, 2010. [www.cubaweather.org/cu](http://www.cubaweather.org/cu).