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ECONOMIC CONTRIBUTION OF CRUISE TOURISM TO THE DESTINATION ECONOMIES

*A Survey-based Analysis of the Impacts of
Passenger, Crew and Cruise Line Spending*

EXECUTIVE SUMMARY



Prepared for

**Florida-Caribbean Cruise Association
and
Participating Destinations**

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Business Research and Economic Advisors (BREA) was engaged by the Florida-Caribbean Cruise Association (FCCA) and participating cruise destinations to conduct an analysis of cruise-related spending and its impact on the economies of the participating destinations. This is an update of similar projects undertaken in 2006, 2009 and 2012. A total of 35 destinations participated in this study. These destinations were located in the Caribbean, Mexico and Central and South America. The participating destinations and their sponsoring organizations are shown in **Table ES-1**.

Table ES-1 – Participating Destinations and Sponsoring Organizations

Destinations	Sponsoring Agencies
Antigua & Barbuda	Antigua & Barbuda Tourism Authority
Aruba	Aruba Ports Authority
The Bahamas	Ministry of Tourism
Barbados	Barbados Port Inc.
Belize	Belize Tourism Board
Bonaire	Tourism Corporation of Bonaire
British Virgin Islands	BVI Ports Authority
Cabo San Lucas	Administracion Portuaria Integral de Cabo San Lucas SA de CV
Cayman Islands	Cayman Islands Department of Tourism
Colombia	Sociedad Portuaria Regional de Cartagena / Proexport Colombia
Costa Maya	Promociones Turisticas Majahual SA de CV
Costa Rica	Instituto Costarricense de Turismo
Cozumel	State Government of Quintana Roo
Curacao	Curacao Ports Authority
Dominica	Dominica Air and Sea Ports Authority
Dominican Republic	Ministry of Tourism
Ensenada	Administracion Portuaria Integral de Ensenada SA de CV
Grenada	Grenada Tourism Authority
Guadeloupe	Guadeloupe Islands Tourism Board
Guatemala	Inguat
Honduras	Port of Roatan
Jamaica	Jamaica Tourist Board
Martinique	Martinique Tourism Authority
Mazatlan	Administracion Portuaria Integral de Mazatlán SA de CV
Nicaragua	Nicaragua Tourism Board
Progreso	Administracion Portuaria Integral de Progreso SA de CV
Puerto Rico (San Juan)	Puerto Rico Tourism Company
Puerto Vallarta	Administracion Portuaria Integral de Puerto Vallarta SA de CV
St. Kitts & Nevis	St. Kitts Tourism Authority
St. Lucia	Ministry of Tourism, Heritage and Creative Industries
St. Maarten	Port St. Maarten Group of Companies
Tobago	Division of Tourism & Transportation
Trinidad	Tourism Development Company
Turks and Caicos	Ministry of Tourism
U. S. Virgin Islands	Department of Tourism

Economic Impacts

During the 2014/2015 cruise year¹ **cruise tourism generated \$3.16 billion in direct expenditures, 75,050 jobs and \$976 million in employee wages** among the 35 destinations included in the study (see **Table ES-2**).²

Table ES-2 – Total Economic Contribution of Cruise Tourism by Destination, 2014/2015 Cruise Year

Destinations	Total Cruise Tourism Expenditures (\$US Millions)	Total Employment	Total Employee Wage Income (\$US Millions)
Antigua & Barbuda	\$ 43.9	1,170	\$ 11.10
Aruba	\$ 71.9	1,716	\$ 29.20
Bahamas	\$ 373.1	7,954	\$ 138.50
Barbados	\$ 57.3	1,845	\$ 19.50
Belize	\$ 86.3	2,492	\$ 26.50
Bonaire	\$ 9.4	191	\$ 3.20
British Virgin Islands	\$ 26.2	465	\$ 8.70
Cabo San Lucas	\$ 22.4	587	\$ 3.90
Cayman Islands	\$ 207.6	4,454	\$ 87.00
Colombia	\$ 48.4	1,089	\$ 6.90
Costa Maya	\$ 27.6	726	\$ 4.50
Costa Rica	\$ 20.0	557	\$ 3.20
Cozumel	\$ 365.5	9,727	\$ 61.00
Curacao	\$ 51.0	903	\$ 16.70
Dominica	\$ 14.2	373	\$ 2.90
Dominican Republic	\$ 61.0	1,914	\$ 8.00
Ensenada	\$ 52.7	1,370	\$ 9.50
Grenada	\$ 12.2	342	\$ 2.30
Guadeloupe	\$ 38.2	724	\$ 6.10
Guatemala	\$ 5.6	183	\$ 0.80
Honduras	\$ 73.0	1,585	\$ 7.80
Jamaica	\$ 198.6	7,067	\$ 46.10
Martinique	\$ 22.7	453	\$ 3.70
Mazatlan	\$ 9.4	268	\$ 1.50
Nicaragua	\$ 2.9	141	\$ 0.40
Progreso	\$ 23.9	609	\$ 3.60
Puerto Rico (San Juan)	\$ 198.2	5,209	\$ 75.00
Puerto Vallarta	\$ 27.1	757	\$ 4.90
St. Kitts & Nevis	\$ 84.3	1,293	\$ 11.20
St. Lucia	\$ 57.2	1,422	\$ 11.70
St. Maarten	\$ 422.9	9,259	\$ 189.10
Tobago	\$ 2.7	124	\$ 1.50
Trinidad	\$ 0.6	30	\$ 0.40
Turks and Caicos	\$ 95.0	1,654	\$ 29.10
U. S. Virgin Islands	\$ 344.3	6,397	\$ 141.00
All Destinations	\$3,157.5	75,050	\$ 976.5

¹ The economic contribution of cruise tourism to the 35 destinations was estimated for the 12-month period from May, 2014 through April, 2015 which is referred to as the 2014/2015 cruise year throughout this report.

² All monetary figures are in U.S. dollars.

Seven (7) destinations had direct cruise tourism expenditures of \$100 million or more. Ten (10) destinations had direct expenditures between \$50 and \$100 million, ten (10) had direct expenditures between \$20 and \$50 and eight (8) had direct expenditures less than \$20 million.

St. Maarten led all destinations with nearly \$423 million, followed by the Bahamas with \$373 million, Cozumel with \$365 million, the U.S. Virgin Islands with \$344 million, the Cayman Islands with \$208 million, Jamaica with \$199 million and Puerto Rico with \$198 million. Combined, these seven destinations with \$2.11 billion in direct expenditures accounted for 67 percent of the total cruise tourism expenditures among the 35 destinations.

The next ten destinations with expenditures between \$50 and \$100 million accounted for 22 percent of the total cruise tourism expenditures with a combined total of \$689.7 million in direct spending. Direct spending among these ten destinations ranged from \$51.0 million in Curacao to \$95.0 million in the Turks & Caicos. In addition to the Turks & Caicos, Belize (\$86.3 million), St. Kitts & Nevis (\$84.3 million), Honduras (\$73.0 million) and Aruba (\$71.9 million) had total cruise tourism expenditures in excess of \$70 million.

The next ten destinations with expenditures between \$20 and \$50 million accounted for almost 10 percent of the total cruise tourism expenditures with a combined total of \$300.4 million in direct spending. Direct spending among these ten destinations ranged from \$20.0 million in Costa Rica to \$48.4 million in the Colombia. In addition to Colombia, Antigua & Barbuda (\$43.9 million), Guadeloupe (\$38.2 million), Costa Maya (\$27.6 million), Puerto Vallarta (\$27.1 million) and the British Virgin Islands (\$26.2 million) had total cruise tourism expenditures in excess of \$25 million.

The remaining eight destinations with less than \$20 million in direct cruise tourism expenditures had a combined total of \$57.1 million in direct cruise tourism expenditures and accounted for just under two percent of the total among the 35 destinations. Cruise tourism expenditures among these destinations ranged from \$0.7 million in Trinidad to \$14.2 million in Dominica. In addition to Dominica, only Grenada (\$12.2 million) had direct expenditures in excess of \$10 million.

The analysis of cruise tourism expenditures revealed the following economic impacts³ for the top seven destinations:

- St. Maarten led all Caribbean destinations with \$423 million in cruise tourism expenditures. It also led ranked third in passenger and crew onshore visits with 2.23 million visits. These visits generated an average total expenditure of \$189 per visit⁴ across all passenger and crew visits, the highest average in the Caribbean. The \$423 million in direct expenditures, in turn, generated an estimated 9,259 jobs paying \$189 million in wage income during the 2014/2015 cruise year. This placed St. Maarten with the highest income impact and the second highest employment impact.
- The Bahamas, with 3.93 million passenger and crew visits, had the highest volume of visits in the Caribbean. It also had the second highest level of direct expenditures

³ The terms economic impacts, economic contribution and economic benefits are used interchangeably throughout this report.

⁴ The average total expenditure is calculated by dividing total direct expenditures by total passenger and crew onshore visits.

with \$373 million. Thus, each visit generated an average total expenditure of \$95 across all passenger and crew visits. As a result of the \$373 million in direct expenditures the Bahamas benefitted from the generation of 7,954 jobs paying wage income of \$138 million, the third highest totals in both categories throughout the Caribbean.

- Cozumel had the third highest level of direct cruise sector expenditures with \$366 million in spending. In addition, Cozumel had the second highest volume of onshore passenger and crew visits with 3.07 million visits. As a result of these onshore visits, Cozumel had an average total expenditure of \$119 per passenger and crew visit. The \$366 million in cruise tourism expenditures generated an estimated 9,727 jobs, the highest level among the 35 destinations, paying \$61 million in wage income during the 2014/2015 cruise year.
- The U.S. Virgin Islands had the fourth highest level of direct cruise sector expenditures with \$344 million in spending. In addition, the U.S.V.I. had the fourth highest volume of onshore passenger and crew visits with 2.19 million visits. It also had the second highest average total expenditure rate of \$157 per passenger and crew visit. The \$344 million in cruise tourism expenditures generated an estimated 6,397 jobs paying \$141 million in wage income, the second highest total in the Caribbean, during the 2014/2015 cruise year.
- The Cayman Islands had the fifth highest number of passenger and crew onshore visits with 1.67 million visits and the fifth highest volume of direct expenditures, \$208 million. The Cayman Islands also had the third highest average total expenditure of \$124 per passenger and crew visit. The \$208 million in cruise tourism spending in the Cayman Islands generated 4,454 total jobs and \$876 million in wage income during the 2014/2015 cruise year.
- Jamaica had the sixth highest level of direct expenditures with \$199 million in spending by cruise lines and their passengers and crew. Passenger and crew onshore visits totaled 1.59 million visits during the 2014/14 cruise year. On average each passenger and crew visit generated an average \$124 in total direct expenditures per visit. The \$199 million in cruise tourism spending in Jamaica generated an estimated 7,067 total jobs and \$46 million in wage income during the 2014/2015 cruise year.
- Puerto Rico benefitted from \$198 million in total cruise tourism expenditures which, in turn, generated 5,209 jobs and \$75 million in wages during the 2014/2015 cruise year. The economic impacts of cruise tourism in Puerto Rico were generated by both homeport and port-of-call visits. In fact, Puerto Rico led the Caribbean in passenger embarkations during the 2014/2015 cruise year with over 454,000 embarkations. The island destination ranked sixth in passenger and crew onshore visits with 1.63 million visits. On average each passenger and crew visit generated \$122 in total direct expenditures.

Comparisons with earlier studies are difficult because the number of participating destinations (35) is so much higher than in earlier studies. Nonetheless, some general comparisons with the 2012 study are possible. First, average passenger and crew visitation rates, i.e., the percentage of arriving passengers and crew that disembark and make an onshore visit, remained virtually unchanged at 88% for passengers and 39% for crew.

Total direct expenditures per passenger⁵ across all destinations increased by 7.6% from \$129.18 during the 2011/2012 cruise year to \$133.78 during the 2014/2015 cruise year. Average passenger expenditures per visit, including both transit and home port calls, rose by 8.25% to \$103.83 from \$95.92. The 8.25% increase in average expenditures is concentrated in three categories, shore excursions, food and beverages and local crafts and souvenirs. Cruise passengers purchasing shore excursions spent 30% more per passenger in 2014/2015 relative to 2011/2012. In addition they spent 20% more per passenger for local crafts and souvenirs. They also spent 2% more food and beverages. In addition, a higher percentage of passengers made purchases in each of these categories. In fact, more than half of all transit passengers that went ashore purchased a shore excursion and food and beverages. These increases were only partially offset by decline in the average expenditure per passenger for jewelry and clothing which declined by about 3% each.

Average expenditures by crew experienced a 30% decline from \$97 in 2011/2012 to \$67 in 2014/2015. This decline resulted from a drop in the percentage of crew making onshore purchases in many categories such as food and beverages, electronics and other purchases. In addition, crew spent less when they did make a purchase in such categories as transportation, jewelry, clothing and local crafts and souvenirs. The net result was the average expenditures of crew declined in all major expenditure categories, except food and beverages.

Finally expenditures by cruise for port fees and services and other goods and services on a per destination basis remained virtually unchanged at \$11.5 million per destination.

⁵ Includes transit and home port passengers.

Passenger, Crew and Cruise Line Expenditures

The economic benefits of cruise tourism at each destination arise from three principal sources:

- onshore expenditures by passengers which are concentrated in shore excursions and retail purchases of clothing and jewelry;
- onshore spending by crew which are concentrated in purchases of food and beverages, local transportation and retail purchases of clothing and electronics; and
- expenditures by the cruise lines for supplies, such as food and beverages, port services, such as navigation and utility services, and port fees and taxes, such as wharfage and dockage fees.

To develop estimates of the typical or average expenditures of cruise passengers and crew during their onshore visit, surveys were conducted onboard ships of the FCCA member cruise lines.⁶ A total of **44,634** passenger surveys⁷ and **18,809** crew surveys were completed and returned for tabulation.

The passenger and crew surveys were designed to collect data for onshore spending and visit satisfaction by both passengers and crew. While the crew survey was slightly shorter than the passenger survey, both surveys were designed to collect the following information:

- hours spent ashore;
- expenditures by category, including shore tours, food & beverages, clothing, etc.;
- visit satisfaction, including shore tour, friendliness of residents, prices, shopping, etc.;
- likelihood of returning for a land-based vacation; and
- demographic characteristics, including country of residence, age group, income, etc.

The survey schedule was designed to generate a representative sample of cruise passengers by cruise line at each destination. Thus, each FCCA member cruise line was scheduled to have its passengers and crew surveyed at least once at each destination at which it had a port call during the survey period. The survey period commenced in the beginning of October 2014 and concluded at the end of May 2015.

On any given cruise itinerary, passengers and crew were surveyed following a single call. The surveys were placed in passenger cabins and crew living quarters during the day of a designated survey. Passengers and crew first viewed the survey upon their return from their onshore visit. They were asked to complete the survey in their quarters and to return the survey to a designated crew member. At the conclusion of the cruise, the surveys were returned to BREA for tabulation.

⁶ Surveys were conducted on the ships of the following cruise lines: Aida Cruises, Carnival Cruise Lines, Celebrity Cruises, Costa Cruises, Disney Cruise Line, Holland America Line, Norwegian Cruise Line, Princess Cruises, P&O Cruises, Royal Caribbean International and TUI Cruises.

⁷ This includes both port-of-call (transit) and port-of-embarkation (homeport) passengers.

Passenger Visits and Expenditures

As shown in **Table ES-3**, data collected from the participating destinations and cruise lines indicated that 23.6 million cruise passengers disembarked cruise ships and visited the participating destinations or embarked on their cruise at one of the six homeports. These passengers spent \$2.45 billion for shore excursions and other goods and services during the 2014/2015 cruise year. Average per passenger expenditures ranged from a low of \$42.58 in Trinidad to a high of \$191.26 in St. Maarten and averaged \$103.83 per passenger visit across the 35 destinations.

St. Maarten with \$355 million in total passenger expenditures led all destinations and accounted for 14 percent of total passenger spending among the 35 destinations. Six additional destinations had passenger expenditures in excess of \$100 million. Passengers spent \$304 million in Cozumel, \$276 million in the U.S. Virgin Islands, \$244 million in the Bahamas, \$167 million in the Cayman Islands, \$161 million in Jamaica and \$124 million in Puerto Rico. Combined, passenger onshore expenditures in these seven destinations accounted for 66 percent of the onshore passenger expenditures among the 35 destinations and totaled \$1.63 billion.

These seven destinations can be considered high volume destinations with more than one million passenger visits during the cruise year, ranging from 1.35 million in Jamaica to 2.94 million in the Bahamas. Average spending per passenger ranged from \$82.83 per passenger in the Bahamas to \$191.26 in St. Maarten. Of the seven destinations only the Bahamas and Puerto Rico had average passenger expenditures below the all destination average of \$103.83. Combined, the seven destinations had an average passenger expenditure of \$122.06, nearly 18 percent above the Caribbean average.

Another thirteen destinations had passenger expenditures between \$25 and \$100 million. These were: Turks & Caicos, St. Kitts & Nevis, Belize, Honduras, Aruba, St. Lucia, Barbados, Ensenada, Colombia, Curacao, Antigua & Barbuda, the Dominican Republic and Guadeloupe. Onshore passenger expenditures among these thirteen destinations totaled \$644 million and accounted for 26% of total passenger expenditures among the 35 participating destinations. Total passenger onshore spending in this group of destinations ranged from a low of \$27.8 million in Guadeloupe to a high of \$78 million in the Turks & Caicos and averaged nearly \$50 million among the thirteen destinations.

For the most part, these thirteen destinations are considered to be medium volume destinations with passenger onshore visits ranging from 400,000 to one million. The exceptions are Colombia and Guadeloupe which would be considered in the low volume spectrum. Among the eleven medium volume destinations passenger visits ranged from 476,700 in Curacao to 879,000 in the Turks & Caicos. Among the medium volume destinations per passenger expenditures averaged \$83.24 per visit, ranging from \$64.88 in Antigua to \$112.10 in St. Aruba. Among these eleven destinations, only Aruba and St. Kitts had average passenger expenditures above the Caribbean average. Thus, average per passenger expenditures for the medium volume group of destinations was about 20% below the all destination average.

Table ES-3 – Passengers Onshore Visits and Expenditures by Destination, 2014/2015 Cruise Year

Destinations	Passenger Onshore Visits (Thousands)	Average Expenditure per Passenger	Total Passenger Expenditures (\$US Millions)
Antigua & Barbuda	527.6	\$ 64.88	\$ 34.2
Aruba	546.6	\$ 112.10	\$ 61.3
Bahamas ^①	2,940.0	\$ 82.83	\$ 243.5
Barbados ^②	554.4	\$ 78.03	\$ 43.3
Belize	867.6	\$ 77.87	\$ 67.6
Bonaire	146.7	\$ 54.22	\$ 8.0
British Virgin Islands	307.8	\$ 69.43	\$ 21.4
Cabo San Lucas	211.4	\$ 85.98	\$ 18.2
Cayman Islands	1,446.3	\$ 115.60	\$ 167.2
Colombia ^②	306.6	\$ 120.70	\$ 37.0
Costa Maya	361.7	\$ 61.47	\$ 22.2
Costa Rica	187.7	\$ 82.84	\$ 15.6
Cozumel	2,538.1	\$ 119.89	\$ 304.3
Curacao	476.7	\$ 77.55	\$ 37.0
Dominica	226.0	\$ 50.81	\$ 11.5
Dominican Republic ^②	480.6	\$ 66.41	\$ 31.9
Ensenada	610.7	\$ 65.10	\$ 39.8
Grenada	201.5	\$ 46.55	\$ 9.4
Guadeloupe ^②	308.2	\$ 90.06	\$ 27.8
Guatemala	73.4	\$ 63.62	\$ 4.7
Honduras	738.1	\$ 86.51	\$ 63.8
Jamaica	1,349.1	\$ 119.29	\$ 160.9
Martinique ^②	263.7	\$ 68.99	\$ 18.2
Mazatlan	109.4	\$ 64.85	\$ 7.1
Nicaragua	43.0	\$ 54.94	\$ 2.4
Progreso	289.4	\$ 57.88	\$ 16.8
Puerto Rico (San Juan) ^②	1,393.9	\$ 88.95	\$ 124.0
Puerto Vallarta	223.8	\$ 95.43	\$ 21.4
St. Kitts & Nevis	676.5	\$ 111.30	\$ 75.3
St. Lucia	603.2	\$ 78.44	\$ 47.3
St. Maarten	1,854.4	\$ 191.26	\$ 354.7
Tobago	30.9	\$ 74.18	\$ 2.3
Trinidad	10.8	\$ 42.58	\$ 0.5
Turks and Caicos	879.0	\$ 88.75	\$ 78.0
U. S. Virgin Islands	1,839.7	\$ 150.21	\$ 276.3
All Destinations	23,624.5	\$103.83	\$2,452.8

① Only includes passenger visits at Nassau and Freeport.

② Includes passengers aboard both port-of-call and homeport cruise ships.

Colombia and Guadeloupe have home port calls in addition to transit calls. As a result of these homeport calls, total passenger onshore expenditures came to \$37 million in Colombia and \$27.8 million in Guadeloupe. With higher spending by home port passengers, passenger spending averaged \$120.70 in Colombia (16% above the Caribbean average) and \$90.06 in Guadeloupe (8% above the medium volume destination average).

Passenger onshore expenditures in the remaining fifteen destinations totaled \$179.3 million and accounted for 7% of total passenger expenditures among the 35 participating destinations. Passenger spending in this group averaged nearly \$12 million per destination, ranging from \$0.5 million in Trinidad to \$22.2 million in Costa Maya.

Including Colombia and Guadeloupe, these seventeen destinations are considered to be low volume destinations with cruise year passenger visits of less than 400,000. Among these destinations passenger visits ranged from 10,800 in Trinidad to 361,700 in Costa Maya. Among the low volume destinations per passenger expenditures averaged \$73.92 per visit, 29 percent below the Caribbean average. Average passenger expenditures ranged from \$42.58 in Trinidad to \$120.7 in Colombia. Colombia was the only destination in this group with an average passenger expenditure above the Caribbean average.

Passenger Expenditures by Category

The passenger survey requested data on their cruise party (passengers in the same cabin) expenditures for a variety of categories as shown in **Table ES-4**. The per party expenditures in each category were divided by the average size of the expenditure party (average number of passengers per cabin) to arrive at the average spend per passenger. The average size of a cruise expenditure party across all destinations was 2.02 passengers and ranged from 1.90 to 2.24 passengers among the 35 destinations. The per passenger expenditure for each category was then multiplied by the percentage (share) of all onshore visitors who actually made a purchase in that category to arrive at the weighted average spend per passenger visit. This figure was multiplied by 23.62 million total passenger visits (transit visits + embarkations) to arrive at total passenger expenditures by category.

For example, those cruise parties that reported purchasing food and beverages in a restaurant or bar spent an average of \$32.12 during a single onshore visit. Since the average party size was 2.02 passengers, the average spend for food and beverages was \$15.90 per passenger ($32.12 \div 2.02$). However, not all cruise parties made such a purchase at each destination. The survey data indicated that at any individual cruise call an average of 50.4% of the cruise parties actually purchased food and beverages. Thus, the weighted spend per passenger across all onshore passenger visits was \$8.01 ($\$15.9 \times .504$). Finally, total estimated passenger purchases of food and beverages across all 35 destinations for the entire 2014/2015 cruise year was estimated by multiplying the weighted average spend per passenger (\$8.01) by the total number of onshore visits (23.62 million). Thus, total passenger purchases of food and beverages for the 2014/2015 cruise year across all 35 destinations were estimated to be \$189.3 million. Similar calculations were made for each category.

The analysis of the passenger surveys showed the following major attributes of passenger onshore spending:

- The typical cruise passenger spent an average of \$103.83 at each destination call during their cruise vacation with total passenger expenditures in the 35 destinations reaching \$2.45 billion during the 2014/2015 cruise year.
- Just over 75 percent of passenger expenditures were made in four categories: watches and jewelry (\$877 million), shore excursions (\$551 million), clothing (\$238 million), and food and beverages (\$189 million). Combined, cruise passengers spent an estimated \$1.86 billion in these four categories.
- The most popular expenditure category was shore excursions with over half (53 percent) of all passengers making such a purchase at each destination. Local tour operators received an average of \$43.99 per passenger directly from cruise passengers and cruise lines (**see Note below table**). The weighted average expenditure was \$23.33 per passenger. Total payments to tour operators in the 35 participating destinations were an estimated \$551 million.

Table ES-4 – Average Passenger Expenditures by Category – All 35 Participating Destinations

Purchase Categories	Average Spend per Passenger (\$US)	Share of All Onshore Visits ^①	Weighted Average Spend per Passenger	Total Passenger Expenditures (\$US Millions)
Shore Excursions ^②	\$ 43.99	53.0%	\$ 23.33	\$ 551.2
F&B at Restaurants & Bars	\$ 15.90	50.4%	\$ 8.01	\$ 189.3
Clothing	\$ 23.24	43.4%	\$ 10.08	\$ 238.0
Local Crafts & Souvenirs	\$ 16.07	44.4%	\$ 7.13	\$ 168.4
Taxis/Ground Transportation	\$ 15.36	23.7%	\$ 3.64	\$ 85.9
Watches & Jewelry	\$ 187.64	19.8%	\$ 37.11	\$ 876.6
Other Purchases	\$ 41.27	20.5%	\$ 8.44	\$ 199.4
Retail Purchases of Liquor	\$ 20.78	10.8%	\$ 2.25	\$ 53.1
Perfumes & Cosmetics	\$ 30.09	3.4%	\$ 1.02	\$ 24.2
Entertainment/Night Clubs	\$ 33.92	1.5%	\$ 0.51	\$ 12.0
Lodging ^③	\$ 139.98	1.3%	\$ 1.79	\$ 42.4
Telephone & Internet	\$ 10.48	1.4%	\$ 0.15	\$ 3.4
Electronics	\$ 69.87	0.5%	\$ 0.38	\$ 9.1
Total			\$103.83	\$2,452.8

① For the purposes of this table we have combined the expenditure data for both transit and homeport passengers. The expenditures of each group are analyzed separately elsewhere in this report.

② This is the effective average onshore expenditure and is a weighted average of the onshore purchases and the portion of the onboard and travel agent purchases paid to local tour operators. Actual reported average spending for shore excursions by source is as follows: cruise lines - \$66.36 per passenger; travel agents/other - \$57.71; and onshore tour operators - \$28.85. The weighted average actual spend across all sources was \$60.07.

③ Lodging expenditures only apply to those passengers who embarked on cruises in San Juan, Barbados, the Dominican Republic, Guadeloupe, Martinique and Cartagena. For purposes of this table the weighted average has been calculated across all passengers.

- Passengers who purchased watches and jewelry spent an average of \$187.64 on such purchases. Since only 19.8 percent of passengers purchased watches and jewelry the average jewelry expenditure per passenger was \$37.11. Total expenditures on watches and jewelry were an estimated \$877 million.
- On average half (50.4%) of cruise passengers purchased food and beverages. The typical passenger spent an average of \$15.90 when they purchased food resulting in a weighted average expenditure of \$8.01 per passenger. Purchases of food and beverages totaled \$189 million across all destinations.

- On average, just under half of the cruise passengers purchased clothing and local crafts and souvenirs at each destination call. Visiting passengers spent a weighted average of \$10.08 on clothing and \$7.13 for local crafts and souvenirs at each port call. Combined, passengers spent an estimated total of \$406 million in these two categories, 17 percent of total passenger expenditures.

Crew Visits and Expenditures

As shown in **Table ES-5**, the estimated 4.5 million crew members that visited the 35 participating destinations spent an estimated \$302 million for goods and services during the 2014/2015 cruise year. Average expenditures per crew ranged from a low of \$21.50 in Trinidad to a high of \$149.44 in Puerto Rico and averaged \$67.10 across all destinations. Unlike passengers, shore excursions are not a focus of crew spending; rather, crew expenditures are more heavily weighted toward food and beverages, jewelry, and electronic goods. These were followed by spending for clothing and entertainment.

The analysis of the crew surveys showed the following major attributes of crew onshore spending for the top five destinations:

- Crew visiting the Bahamas spent an estimated \$59.7 million, the highest level of crew expenditures among the 35 participating destinations. A total of 994,900 crew were estimated to have made an onshore visit during the 2014/2015 cruise year, the highest number of visits among the 35 participating destinations. Crew spent an average of \$60 per visit. Crew expenditures were concentrated in restaurants and bars and clothing and jewelry stores which accounted for nearly 60 percent of their spending in the Bahamas.
- Puerto Rico had the highest crew expenditure rate of \$149.44 and 234,400 crew onshore visits. As a result, the crew visits to the island generated the fourth highest level of crew onshore expenditures of \$35.0 million during the 2014/2015 cruise year. In Puerto Rico crew expenditures were concentrated on retail purchases of clothing and electronics and purchases of food and beverages, which accounted for 50% of their total expenditures in Puerto Rico. These were followed by purchases of jewelry, ground transportation and cosmetics. Combined these three categories accounted for another 20 percent of their total expenditures.
- With the second highest average expenditure of \$119.13 per crew visit and the third highest number of crew onshore visits (377,400), St. Maarten had the second highest total expenditure among the 35 participating destinations, \$45.0 million. In St. Maarten crew expenditures were also concentrated on retail purchases of electronics and jewelry. These were followed by spending for food and beverages and clothing. These four categories accounted for 70 percent of total crew spending in St. Maarten.
- The U.S. Virgin Islands had the third highest crew expenditure rate of \$110.27 and the fourth highest number of estimated crew onshore visits, 351,100. As a result, the crew visits to the island generated the third highest level of crew onshore expenditures of \$38.7 million during the 2014/2015 cruise year. In the U.S.V.I. crew expenditures were concentrated on retail purchases of jewelry and clothing and purchases of food and beverages which accounted for 54% of their total expenditures in the U.S. Virgin Islands.

Table ES-5 Crew Visits and Expenditures by Destination, 2014/2015 Cruise Year

Destinations	Crew Visits (Thousands)	Average Expenditure per Crew	Total Crew Expenditures (\$US Millions)
Antigua & Barbuda	84.8	\$ 54.17	\$ 4.6
Aruba	83.2	\$ 71.99	\$ 6.0
Bahamas	994.9	\$ 60.00	\$ 59.7
Barbados	110.5	\$ 40.35	\$ 4.5
Belize	88.1	\$ 52.34	\$ 4.6
Bonaire	17.5	\$ 30.40	\$ 0.5
British Virgin Islands	46.7	\$ 44.90	\$ 2.1
Cabo San Lucas	41.1	\$ 49.42	\$ 2.0
Cayman Islands	224.6	\$ 47.94	\$ 10.8
Colombia	35.6	\$ 59.36	\$ 2.1
Costa Maya	77.5	\$ 44.35	\$ 3.4
Costa Rica	40.0	\$ 36.21	\$ 1.4
Cozumel	533.4	\$ 52.02	\$ 27.7
Curacao	82.1	\$ 70.15	\$ 5.8
Dominica	31.5	\$ 34.21	\$ 1.1
Dominican Republic	49.4	\$ 42.38	\$ 2.1
Ensenada	95.1	\$ 40.37	\$ 3.8
Grenada	34.6	\$ 47.18	\$ 1.6
Guadeloupe	45.1	\$ 45.04	\$ 2.0
Guatemala	12.8	\$ 29.01	\$ 0.4
Honduras	83.3	\$ 32.37	\$ 2.7
Jamaica	244.3	\$ 50.58	\$ 12.4
Martinique	37.9	\$ 46.45	\$ 1.8
Mazatlan	17.5	\$ 42.70	\$ 0.7
Nicaragua	6.4	\$ 24.15	\$ 0.2
Progreso	40.2	\$ 44.35	\$ 1.8
Puerto Rico (San Juan)	234.4	\$ 149.44	\$ 35.0
Puerto Vallarta	31.1	\$ 51.46	\$ 1.6
St. Kitts & Nevis	94.3	\$ 41.55	\$ 3.9
St. Lucia	107.4	\$ 44.89	\$ 4.8
St. Maarten	377.4	\$ 119.13	\$ 45.0
Tobago	6.0	\$ 24.79	\$ 0.1
Trinidad	2.5	\$ 21.50	\$ 0.1
Turks and Caicos	140.9	\$ 50.41	\$ 7.1
U. S. Virgin Islands	351.1	\$ 110.27	\$ 38.7
All Destinations	4,503.3	\$67.10	\$302.2

① Only includes crew visits at Nassau and Freeport.

② Includes crew aboard both port-of-call and homeport cruise ships.

- Crew visiting Cozumel spent an average of \$52.02. With an estimated 533,400 onshore visits, the second highest total among the 35 destinations, crew spent an estimated \$27.7 million in Cozumel during the 2014/2015 cruise year. Crew spending in Cozumel was concentrated in food and beverages and ground transportation. Combined these two categories accounted for 57 percent of total crew expenditures in Cozumel.

- Crew visiting Jamaica spent an estimated \$12.4 million, the sixth highest level of crew expenditures among the 35 participating destinations. A total of 244,300 crew were estimated to have made an onshore visit during the 2014/2015 cruise year. Crew spent an average of \$50.58 per visit. Crew expenditures were in concentrated restaurants and bars and clothing and jewelry stores which accounted for 55 percent of their spending in Jamaica.
- Crew visiting the Cayman Islands spent an average of \$47.94. With an estimated 224,600 onshore visits, crew spent an estimated \$10.8 million during the 2014/2015 cruise year. Crew spending was concentrated in food and beverages, clothing, jewelry and shore excursions. Combined, these four categories accounted for 73 percent of total crew expenditures in the Cayman Islands.

Among the remaining 28 destinations total crew expenditures averaged \$2.6 million per destination. Seven destinations, Turks & Caicos, Aruba, Curacao, St. Lucia, Belize, Antigua and Barbados had crew expenditures of \$4 million or more. Aruba (\$71.99) and Curacao (\$70.15) had average crew expenditure rates above the Caribbean average of \$67.10. Other destinations with average crew spending visit above \$50 were the Turks & Caicos (\$50.41), Belize (\$52.34) and Antigua (\$54.17).

Cruise Line Expenditures

In addition to net payments to local tour operators, cruise lines also provided data for two other categories: 1) payments to ports for passenger taxes and port services, such as navigation and utility services, and 2) payments to local businesses for supplies and services, such as food and beverages and other stores.

As shown in **Table ES-6**, total expenditures for port fees and local supplies varied considerably across destinations. This reflects the differences in the structure of port fees, the volume of cruise calls, and the availability of and need for ship supplies in each destination. In total, the cruise lines spent an estimated \$400.8 million in the 35 participating destinations during the 2014/2015 cruise year for port fees and taxes, utilities, navigation services and ship supplies.

The analysis of cruise line expenditures revealed the following impacts for the top five destinations:

- The Bahamas had the highest total of expenditures by cruise lines among the 35 participating destinations, \$69.9 million. The expenditures by cruise lines in the Bahamas were concentrated in port fees and services which accounted for over 95 percent of total cruise line expenditures.⁸
- Puerto Rico had the second highest level of cruise line expenditures at \$39.2 million. As the major Caribbean homeport, the purchase of ship supplies is more important than in most other destinations accounting for about one-third of the total expenditures made by cruise lines.

⁸ This figure includes passenger head taxes paid for passenger arrivals at the private islands of the cruise lines.

Table ES-6 –Total Expenditures by Cruise Lines by Destination, 2014/2015 Cruise Year

Destinations	Estimated Expenditures (\$US Millions)
Antigua & Barbuda	\$ 5.1
Aruba	\$ 4.6
Bahamas	\$ 69.9
Barbados^①	\$ 9.6
Belize	\$ 14.1
Bonaire	\$ 0.9
British Virgin Islands	\$ 2.8
Cabo San Lucas	\$ 2.2
Cayman Islands	\$ 29.6
Colombia^①	\$ 9.3
Costa Maya	\$ 2.0
Costa Rica	\$ 3.0
Cozumel	\$ 33.5
Curacao	\$ 8.3
Dominica	\$ 1.6
Dominican Republic^①	\$ 27.0
Ensenada	\$ 9.1
Grenada	\$ 1.2
Guadeloupe^①	\$ 8.4
Guatemala	\$ 0.6
Honduras	\$ 6.4
Jamaica	\$ 25.3
Martinique^①	\$ 2.7
Mazatlán	\$ 1.6
Nicaragua	\$ 0.4
Progreso	\$ 5.4
Puerto Rico (San Juan) ^①	\$ 39.2
Puerto Vallarta	\$ 4.1
St. Kitts & Nevis	\$ 5.1
St. Lucia	\$ 5.1
St. Maarten	\$ 23.3
Tobago	\$ 0.3
Trinidad	\$ 0.1
Turks and Caicos	\$ 9.9
U. S. Virgin Islands	\$ 29.2
All Destinations	\$400.8

① Includes both port-of-call and homeport cruise ships.

- Cozumel had the third highest level of cruise line expenditures at \$33.5 million. Over 95 percent of these expenditures were for port and navigation fees.
- The Cayman Islands were fourth with \$29.6 million in cruise line expenditures during the 2014/2015 cruise year. Port and navigation fees, including passenger-based fees, accounted for 90 percent of cruise line spending in the Cayman Islands.

- The U.S. Virgin Islands were fifth with \$29.2 million in cruise line expenditures. Even though the Virgin Islands is primarily a port-of-call, the purchase of ship supplies accounted for 30 percent of the total expenditures made by cruise lines.
- The Dominican Republic was sixth with \$27.0 million in cruise line expenditures during the 2014/2015 cruise year. Benefitting from both home port and transit calls, the purchase of ship supplies accounted for almost half of the expenditures made by cruise lines.
- Jamaica was seventh with \$25.3 million in cruise line expenditures during the 2014/2015 cruise year. Over 95 percent of these expenditures were for port and navigation fees.
- St. Maarten was eighth with \$23.3 million in cruise line expenditures during the 2014/2015 cruise year. Over 90 percent of these expenditures were for port and navigation fees.

In each of the remaining 27 destinations expenditures by cruises lines during the 2014/2015 cruise year were under \$20 million, ranging from a low of \$100,000 in Trinidad to a high of \$14.1 million in Belize. Overall, the cruise lines spent \$123.8 million in the 27 destinations for an average of \$4.6 million per destination.

Passenger Attributes and Satisfaction

A total of 43,045 transit passenger surveys were completed and returned for tabulation. While the characteristics of passenger visits varied by destination, **Table ES-7** shows the major attributes of the transit passenger visits across all destinations as derived from the passenger surveys.⁹

Table ES-7 – Major Attributes of Port-of-Call Passenger Visits – All Destinations¹⁰

	Number	Percent
Total Respondents	43,045	
Number Making First Visit	27,118	63.0%
Number Ashore	40,330	93.7%
Number Making Onshore Purchases:	26,215	65.0%
Average Hours Ashore	4.38	
Average Size of Expenditure Party (Persons)	2.02	
Average Onshore Expenditure per Party^①	\$127.84	
Purchased a Shore Excursion (Tour)	22,383	55.5%
Purchased Onshore Tour from:		
Cruise Line	16,563	74.0%
Onshore from Tour Operator	3,134	14.0%
Travel Agent/Other	2,686	12.0%
Average Cost of Shore Excursion per Party^②	\$144.13	

^①This figure excludes the purchases of shore excursions which are reported at the bottom of the table.

^②This figure includes the value of shore excursions purchased onboard cruise ships and is not adjusted for fees retained by the cruise lines.

The major attributes of passenger visits are:

- Of the 43,045 cruise parties that completed the surveys 63.0 percent stated that this had been their first visit to the destination.
- Ninety-four percent (94 percent) of the cruise parties that completed the surveys disembarked their cruise ship to visit the destination.
- Of the cruise parties that went ashore, 65 percent made at least one purchase while ashore, excluding shore excursions. The typical cruise party consisted of 2.02 passengers and spent an average of 4.38 hours ashore.
- The responding cruise parties reported spending an average of \$127.14 while ashore (excludes shore excursions).
- Fifty-five percent (55 percent) of the cruise parties that went ashore purchased a shore excursion. Seventy-four percent (74%) of passengers who purchased a tour did so through their cruise line, 14 percent purchased their tour onshore and 12 percent purchased their tour through their travel agents or other means.

⁹ Homeport surveys were conducted on cruise ships embarking on their cruises from Barbados and San Juan, PR. The attributes of these homeport passengers are discussed in the destination analyses.

¹⁰ These data are the unweighted results summed across all surveys collected. The passenger attributes and satisfaction scores for each destination are reported in Volume II of this study.

- The typical cruise party that purchased a shore excursion spent \$144.13 for their tour.

The passenger survey also asked the passengers to rate their satisfaction with their destination visit for a number of parameters, as shown in **Table ES-8**. A 10-point scale was used with 10 being the highest score, i.e., extremely satisfied, and 1 being the lowest score, i.e., not at all satisfied.

Table ES-8 – Passenger Satisfaction with Destination Visits* – Average for All Destinations

Visit Attributes	Mean Score
Overall Visit	7.64
Visit Met Expectations	7.05
Initial Shoreside Welcome	7.82
Guided Tour	8.33
Historic Sites/Museums	7.46
Variety of Things to See and Do	6.96
Friendliness of Residents	8.07
Overall Shopping Experience	6.98
Courtesy of Employees	8.33
Variety of Shops	6.83
Overall Prices	6.77
Taxis/Local Transportation	7.46

* Scale is 1 to 10 with 10 being the highest score. The mean scores can be interpreted as follows:
 Extremely Satisfied: 10-9; Very Satisfied: 8-7; Somewhat Satisfied: 6-5; Not Too Satisfied: 4-3;
 Not At All Satisfied: 2-1.

Among other key conclusions concerning visit satisfaction were the following:

- Cruise passengers were very satisfied with their overall destination visit with a mean score of 7.64. While destination visits did not score as high in terms of meeting expectations, the mean score for "Visit Met Expectations" of 7.05 implied that the visit exceeded expectations.
- "Guided Tours" (or Shore Excursions) received the highest score of all visit attributes with a mean score of 8.33. Thus, cruise passengers were very satisfied with their shore excursions.
- Passenger interactions with residents and store employees were very positive with "friendliness of residents" and "courtesy of employees" having respective mean scores of 8.07 and 8.33.
- Categories with slightly lower scores but still above 7.0 (Very Satisfied) were: initial shoreside welcome, historic sites/museums and local transportation.
- Categories with average scores between 6.0 and 7.0 (Somewhat Satisfied) were given for variety of things to see and do and the overall shopping experience, including the variety of shops and overall prices. Thus, while passengers thought shop employees

were very courteous, the overall score for their shopping experience was brought down by lower perceptions on the variety of shops and overall prices.

Comparison to the 2012 Study

The current study has significantly more destinations than the 2011/2012 study, 35 versus 21 destinations. As shown in **Table ES-9**, due to the higher number of destinations analyzed in the current study, the total value of cruise tourism expenditures and their subsequent economic impacts are generally higher than those reported in the previous study. As shown in the table, we have estimated that direct cruise tourism expenditures totaled \$3.16 billion during the 2014/2015 cruise year among the 35 participating destinations. This is nearly 60 percent higher than the \$1.99 billion in direct cruise tourism expenditures estimated for the 21 participating destinations during the 2011/2012 cruise year. Similarly, the number of passenger onshore visits and the employment impacts are also higher for the current study.

Normalizing the expenditures on a per passenger basis shows that per passenger spending across the 35 destinations included in the current study are nearly 4 percent higher than among the 21 destinations in the 2012 study. The \$3.16 billion in total expenditures among the 35 destinations of the current study equates to \$133.78 per onshore passenger visit; whereas, in the 2011/2012 study, the \$1.99 billion in total expenditures among the 21 destinations equated to \$128.99 per onshore passenger visit. The increase is primarily the net result of the 8.25 percent increase in average per passenger spending by passengers and the 30 percent decrease in average per crew expenditures.

Table ES-9 – Comparison of Cruise Tourism Expenditures – All Destinations

	2014/2015 Cruise Year	2011/2012 Cruise Year	Percent Difference
Number of Participating Destinations	35	21	--
Total Direct Cruise Tourism Spending (US \$ Billions)	\$3.16	\$1.99	58.79%
Total Passenger Onshore Visits (Millions)	23.62	15.44	52.98%
Total Expenditures per Passenger (US \$)	\$133.78	\$128.89	3.80%
Total Employment Impact	75,050	45,225	65.95%
Total Income Impacts (US \$ Millions)	\$976.50	\$728.10	34.12%
Average per Passenger Expenditures	\$103.83	\$95.92	8.25%
Average Per Crew Expenditures	\$ 67.10	\$96.98	-30.81%

Looking at just the 20 destinations that are common to the two studies¹¹ the total direct cruise tourism expenditures increased by 15 percent from \$1.99 billion in 2011/2012 to \$2.29 billion in 2014/2015 (see **Table ES-10**). This was the combined result of a 7.2 percent increase in cruise passenger onshore visits and a 7.6 percent increase in average total spend per passenger. The normalized total expenditures per passenger in the 20 common destinations rose from \$129.18 in the 2011/2012 cruise year to \$138.94 in the 2014/2015 cruise year. As indicated in Table 18, the increase in the average total spend per passenger is the net result of a 9.2 percent increase in the average onshore spending by passengers and a 23 percent decline in the

¹¹ These destinations are Antigua, Aruba, the Bahamas, Barbados, Belize, BVI, the Cayman Islands, Colombia, Costa Rica, Curacao, Dominica, the Dominican Republic, Grenada, Honduras, Nicaragua, Puerto Rico, St. Kitts, St. Maarten, the Turks and Caicos, and the U.S.V.I.

average crew expenditures. As a result of the 15 percent increase in total direct cruise tourism expenditures among the 20 destinations, the employment and income increased by 12.6 percent and 11.9 percent respectively.

Table ES-10 – Comparison of Cruise Tourism Expenditures – Common Destinations

	2014/2015 Cruise Year	2011/2012 Cruise Year	Percent Difference
Number of Participating Destinations	20	20	--
Total Direct Cruise Tourism Spending (US \$ Billions)	\$2.29	\$1.99	15.08%
Total Passenger Onshore Visits (Millions)	16.49	15.38	7.22%
Total Expenditures per Passenger (US \$)	\$138.94	\$129.18	7.56%
Total Employment Impact	50,812	45,145	12.55%
Total Income Impacts (US \$ Millions)	\$814.10	\$727.30	11.93%
Average per Passenger Expenditures	\$109.00	\$99.81	9.21%
Average Per Crew Expenditures	\$ 74.80	\$97.17	-23.02%

The analysis of expenditures by category indicates that the increase in passenger expenditures on a per passenger basis among the common destinations in both studies was the net result of an increase in per passenger spending in most expenditure categories, primarily shore excursions, food and beverages, and retail purchases of clothing, jewelry and local crafts that was partially offset by a decrease in the percentage of passengers making purchases in many of those categories, most importantly retail purchases of clothing, jewelry and local crafts. Thus, it appears that a smaller percentage of passengers that made onshore visits made purchases in many categories during 2014/2015, but in those categories cruise passengers made higher value purchases relative to 2011/2012. This is especially true for the major retail categories of clothing and jewelry. In the case of shore excursions and purchases of food and beverages, both the percentage of passengers making purchases and their average expenditure increased relative to 2011/2012.

Finally, average crew spending declined by 30% from 2011/2012 to 2014/2015 and 23% among the common destinations. This decline was primarily the result of significant declines in the percentage of crew making retail purchases which was augmented by an equally significant decline in the value of retail purchases made by crew. This decline in retail purchases by crew was only partially offset by an increase in the value of purchases of food and beverages.

In conclusion, the increase in the economic impacts during the 2014/2015 cruise year relative to the 2011/2012 cruise year is primarily the result of the increase in the volume of participating destinations but it was augmented by an increase in the average per passenger expenditure rate.



BREA specializes in custom market analyses for clients throughout the private and public sectors. These unique market analyses integrate economic, financial, and demographic trends with primary market research, proprietary client data, and advanced statistical and modeling techniques. This approach results in comprehensive and actionable analysis, databases and models, designed to support planning, sales and marketing, and education within client organizations.

Dr. Moody, President of BREA, has more than twenty-five years of experience in consulting and forecasting with a wide range of international product and service companies, including consumer products, leisure, retailing, gaming, business services, telecommunications, and utility and financial services. Typical consulting assignments provide critical analysis and insight into market dynamics, product demand, economic trends, consumer behavior and public policy.

BREA has provided specialized consulting support, including market research, economic impact studies and demand analyses, to the cruise lines, port service providers and industry associations. Among BREA's recent clients are: Port of Philadelphia and Camden, Tampa Port Authority, Port of San Diego, Royal Caribbean Cruises Ltd., Carnival Corp., P&O Ports of North America, and the International Council of Cruise Lines. Since studies are designed to meet the specific needs of each client, they can incorporate many dimensions of the market and include a variety of ancillary services.

BREA provides the following services:

Market Research: design and implementation of primary market research instruments using telephone, mail, and intercept surveys. Test instruments are designed to collect information on product demand, attributes of consumers and users, perceived product attributes, and customer satisfaction.

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Statistical and Econometric Modeling: developing quantitative models relating market and product demand to key economic factors and demographic market/consumer attributes. Models can be used for forecasting, trend analysis and divergence/convergence analysis.

Market Studies and Trend Analyses: detailed descriptions of markets (defined as products, regions, industries, consumer segments, etc.) and comprehensive analyses of underlying market forces (such as economic and financial conditions, competitive environment, technology, etc.).