

Barbados

A: Identification

Title of the CPI: Index of Retail Prices

Organisation responsible: Barbados Statistical Service

Periodicity: Monthly

Index reference period: July 2001 = 100

Weights reference period: April 1998 – March 1999 Household Budget Survey.

Main uses of CPI: Indexation of wages, pensions and/or social security payment, indexation of rents, contracts and/or other payments and main inflation indicator used for monetary policy.

B: CPI Coverage

Geographical Coverage

Weights: Nation-wide

Price collection: Nation-wide

Population coverage: Resident households of nationals.

Consumption expenditure includes:

- Food consumed away from home

Consumption expenditure excludes:

- Life insurance premiums;
- Investment-related expenditures (e.g. purchase of shares/stocks)

C: Concepts, definitions, classifications and weights

Definition of the CPI and its objectives: The index of retail prices measures the change in price of a representative sample of goods and services commonly consumed by households in Barbados.

Classification: COICOP (Classification of individual consumption by purpose)

Sources of weights: Household expenditure surveys, national accounts and general census.

Frequency of weight updates: Above 5 years

D: Sample design

Sampling methods:

Outlets: Judgmental sampling

Products: Cut-off sampling (the elements with the highest sales or value of other auxiliary variable are included into the sample)

Criteria used for determining the optimal sample sizes and the coverage of localities, outlets, items and variety samples: Item selection: The estimates obtained from the total annual household expenditure on all items are used to select the items that are included in the basket of goods and services and to compute their corresponding weights. Items are therefore chosen to represent various groups and sub-group classifications on the basis of the magnitude of the estimated annual household expenditure on these items and their frequency of occurrence in the household budget survey.

Outlet selection: The selection of outlets is based on the frequency with which such outlets appear in the household budget survey. Local knowledge is used to supplement survey data in selecting these outlets and they are widely distributed throughout the island. When an outlet closes, a new one of similar size and line of products is chosen to replace it.

E: Data Collection

Approximate number of localities, outlets and price observations: Outlets: 191

Frequency with which prices are collected: Prices of perishable food items are collected weekly; prices of manufactured or processed food items are collected monthly. Cost of services and other items which are less likely to have frequent price changes in a short time interval, price data are collected quarterly.

Reference period for data collection: Perishable food items: weekly collection is every Friday or Thursday if Friday happens to be a holiday; Processed food items: monthly collections are done around the 15th (or Wednesday closest to 15th) of the month; Services: quarterly collections are done around the 15th of the middle month (i.e. around 15th of February for 1st quarter, 15th of May for 2nd quarter, 15th of August for 3rd quarter and 15th of November for 4th quarter).

Methods of Price Collection

- Personal data collection

Treatment of:

Discounts and sales prices: Discounted prices are not taken into account unless they apply to all consumers.

Period for allowing imputed missing prices: Imputed missing prices are allowed up to six months.

Disappearance of a given type or quality from the market: Items that are persistently unavailable (for six months) are substituted with new ones of similar quality, unit and price range. This is done by comparing the specifications of the old item with the in-coming one.

Quality differences: Quality changes and appearance of new products are treated as new items.

Appearance of new items: Quality changes and appearance of new products are treated as new items.

Treatment of seasonal items and seasonality

Treatment of housing

F: Computation

Formula used for calculation of elementary indices: The ratio of arithmetic mean prices (Dutot index) (Chained form)

Formula to aggregate elementary indices to higher level indices: The index is calculated using the base weighted Laspeyre's chained linked formula. In the *Laspeyre's Index (L)*, prices are weighted by the *values* associated with the base period (month) before being summed, as follows:

$$\text{Index (L)} = \frac{\sum p_1 q_0}{\sum p_0 q_0} \times 100 \quad \text{or} \quad \sum \frac{P_1}{P_0} \times W_0 \times 100$$

where

p = Price of an item;

p_1 = Current period (month or year) price;

p_0 = Base period (month or year) price;

q_0 = Base period (month or year) quantity;

Σ denotes the sum, for all items, of their individual products of p and q (or price ratios); and in the alternative expression,

W_0 is the base period weight, which equals

$$\frac{p_1 q_0}{\sum p_0 q_0}, \text{ (i.e. an item's expenditure / sum of all items' expenditure)}$$

$\frac{P_1}{P_0} \times 100$, is the price relative .

The index is therefore the average of a series of such weighted *price relatives*, with a fixed base period.

Seasonally adjusted indices: No seasonal adjustment is made.

G: Editing and validation procedures

H: Documentation and dissemination

Timeliness of dissemination of the CPI data: The index of retail prices is intended to be released by the 25th of the month following the month of reference. Currently, it is produced within 3 months after the month of reference.

Level of detailed CPI published

Paper publication: All items CPI, Division-level (12 Divisions), Group-level app. 40 groups

Online: All items CPI, Division-level (12 Divisions), Group-level app. 40 groups

Documentation

Publications and websites where indices can be found: Press release by the office of the Minister of Economic affairs; Monthly: 'Statistical Bulletin', released by the Barbados Statistical Service, 'Economic and Financial Statistics', Central Bank of Barbados; Other: Annual Statistical Digest", Central Bank of Barbados, "Economic and Social Report", presented by the Minister of Economic Affairs to the Parliament; Internet website: <http://www.barstats.gov.bb/>

Publications and websites where methodological information can be found: The methodology of the index has been published by the Barbados Statistical Service in May 2002: "Index of Retail Prices Revised (Base: July 2001=100) Methodology: Construction and Computation. The link to methodology is: <http://www.caricomstats.org/Files/Methodologies/CPI/Barbados%20CPI%20in%20Standard%20format.pdf>.

I: Other Information

Completed by ILO in 2013.