

Statistical bulletin

Retail sales, Great Britain: July 2015

A first estimate of retail sales in volume and value terms, seasonally and non-seasonally adjusted.



Contact:
Kate Davies
retail.sales.enquiries@ons.gsi.
gov.uk
+44 (0)1633 455602

Release date:
20 August 2015

Next release:
17 September 2015

Table of contents

1. [Main points](#)
2. [About this release](#)
3. [Main figures](#)
4. [Sector summary](#)
5. [Internet sales in detail](#)
6. [Focus on household goods stores](#)
7. [Contributions to growth](#)
8. [Distribution analysis](#)
9. [Economic context](#)
10. [International data](#)
11. [Background notes](#)

1 . Main points

- Year-on-year estimates of the quantity bought in the retail industry grew for the 28th consecutive month in July 2015, increasing by 4.2% compared with July 2014. This was the longest period of sustained year-on-year growth since May 2008, when there were 31 periods of growth
- The underlying pattern in the data, as suggested by the 3 month on 3 month movement in the quantity bought, showed growth for the 29th consecutive month, increasing by 0.5%. This is the longest period of sustained growth since consistent records began in June 1996
- Compared with June 2015, the quantity bought in the retail industry is estimated to have increased by 0.1%. Increases were reported by department stores, other stores, household goods stores and non-store retailing offset by falls in predominantly food stores, textile, clothing and footwear stores and petrol stations
- Average store prices (including petrol stations) fell by 3.0% in July 2015 compared with July 2014; the 13th consecutive month of year-on-year price falls. All store types except textile, clothing and footwear stores reported decreases. Petrol stations again made the largest contribution, falling by 10.9%, the 23rd consecutive month of year-on-year falling petrol prices
- Amount spent in the retail industry increased by 1.0% in July 2015 compared with July 2014 but decreased by 0.2% compared with June 2015. The average weekly spend in the retail industry was £7.1 billion; non-seasonally adjusted data show this is unchanged from the previous month and the July 2014 figure
- The value of online sales increased by 13.0% in July 2015 compared with July 2014, however, there was no growth in July 2015 compared with June 2015. They accounted for 12.6% of all retail sales
- Revisions in this release were caused by the incorporation of late data. The earliest revisions point for current price, non-seasonally adjusted data was July 2014. More information on revisions can be found in the background notes

2 . About this release

This bulletin presents estimates of the quantity bought (volume) and amount spent (value) in the retail industry for the period 5 July 2015 to 1 August 2015. Unless otherwise stated, the estimates in this release are seasonally adjusted.

The figures contained in this release are estimates based on a monthly survey of 5,000 retailers, including all large retailers employing 100 people or more and those with annual turnover of greater than £60 million who employ 10 to 99 people.

The quality of the estimate of retail sales

Retail sales estimates are produced from the monthly business survey – Retail Sales Inquiry (RSI). The timeliness of these retail sales estimates, which are published just 3 weeks after the end of each month, makes them an important early economic indicator. The industry as a whole is used as an indicator of how the wider economy is performing and the strength of consumer spending. Results are revised for the previous 13 published periods. More information about the data content for this release can be found in the background notes.

Revisions are an inevitable consequence of the trade-off between timeliness and accuracy. The response rate in July 2015 was 60.8% of questionnaires, accounting for 93.9% of registered turnover in the retail industry. Therefore, the estimate is subject to revisions as more data become available.

All estimates by definition, are subject to statistical uncertainty and for the retail sales index we publish the standard error associated with the non-seasonally adjusted estimates of year-on-year and month-on-month growth in the quantity bought as a measure of accuracy. More information on these standard errors can be found in the background notes and in the [quality tables \(165.5Kb Excel sheet\)](#) of this release.

We are continually working on methodological changes to improve the accuracy of the retail sales estimates; progress on these can be found on the continuous improvement page.

The [reference tables](#) offer different ways to access the data, they include:

- non-seasonally adjusted and seasonally adjusted volume and value indexes by industry
- year-on-year and month-on-month growth rates by industry

3 . Main figures

Table 1: Main figures, all retailing, July 2015

Seasonally adjusted, percentage change, Great Britain

	Most recent month on a year earlier	Most recent 3 months on a year earlier	Most recent month on previous month	Most recent 3 months on previous 3 months
Value (amount spent)	1.0	1.2	-0.2	0.8
Volume (quantity bought)	4.2	4.3	0.1	0.5
Value excluding automotive fuel	2.1	2.1	0.2	0.7
Volume excluding automotive fuel	4.3	4.3	0.4	0.7

Source: Office for National Statistics

At a glance

In July 2015, the quantity bought in the retail industry (volume) increased by 4.2% compared with July 2014. The amount spent (value) increased by 1.0%. In July 2015, non-seasonally adjusted data show that the prices of goods sold in the retail industry (as measured by the implied price deflator) decreased by 3.0%. More information on how the implied price deflator is calculated can be found in section 3 of the background notes.

Amount spent in the retail industry

In the 4 week reporting period during July 2015, the amount spent in the retail industry was £28.5 billion (non-seasonally adjusted). This compares with £35.7 billion in the 5 week reporting period for June 2015 and £28.3 billion in the 4 week reporting period for July 2014.

This equates to an average weekly spend of £7.1 billion in July 2015, unchanged from the previous month and the July 2014 figure.

4 . Sector summary

Main points:

- in July 2015, all store types except other stores showed increases in the quantity bought compared with July 2014
- all store types except predominantly food stores, other stores and petrol stations showed increases in the amount spent year-on-year
- in July 2015, all store types except textiles, clothing and footwear saw falls in average store price compared with June 2014

Table 2: Sector summary, July 2015

Seasonally adjusted, Great Britain

	Percentage change over 12 months			Average weekly sales (£ billion)
	Quantity bought (volume)	Amount spent (value)	Average store price	
Predominantly food stores ¹	1.3	-0.8	-2.2	2.9
Predominantly non-food stores ²	4.7	2.9	-1.6	3.0
Non-specialised stores ³	7.5	5.2	-2.2	0.6
Textile, clothing and footwear stores	3.3	4.1	0.8	0.9
Household goods stores	13.4	9.7	-3.2	0.6
Other stores	-1.3	-4.0	-2.5	0.9
Non-store retailing	18.0	14.3	-2.9	0.5
Fuel stores	3.3	-8.3	-10.9	0.7
Total	4.2	1.0	-3.0	7.1

Source: Office for National Statistics

1. Supermarkets, specialist food stores and sales of alcoholic drinks and tobacco
2. Non-specialised stores, textiles, clothing and footwear, household goods and other stores
3. Department stores

More information on how average store prices are calculated can be found in the quick guide to retail sales or in the background notes.

5 . Internet sales in detail

Seasonally adjusted internet sales data are published in the RSI internet tables and include:

- a seasonally adjusted value index
- year-on-year and month-on-month growth rates

Internet sales are estimates of how much was spent online through retailers across all store types in Great Britain. The reference year is 2011=100.

Main points:

- average weekly spending online in July 2015 was £827.1 million; this was an increase of 13.0% compared with July 2014
- the amount spent online accounted for 12.6% of all retail spending, excluding automotive fuel, compared with 11.4% in July 2014

Table 3 shows the year-on-year growth rates for total internet sales by sector and the proportion of sales made online in each retail sector.

Table 3: Summary of internet statistics, July 2015

Value seasonally adjusted, percentage rates, Great Britain

Category	Year-on-year growth	Proportion of total sales made online
All retailing	13.0	12.6
All food	12.2	4.2
All non-food	7.1	9.2
Department stores	10.1	10.6
Textile, clothing and footwear stores	9.5	12.3
Household goods stores	22.3	6.8
Other stores	-7.3	6.9
Non-store retailing	17.7	73.0

Source: Office for National Statistics

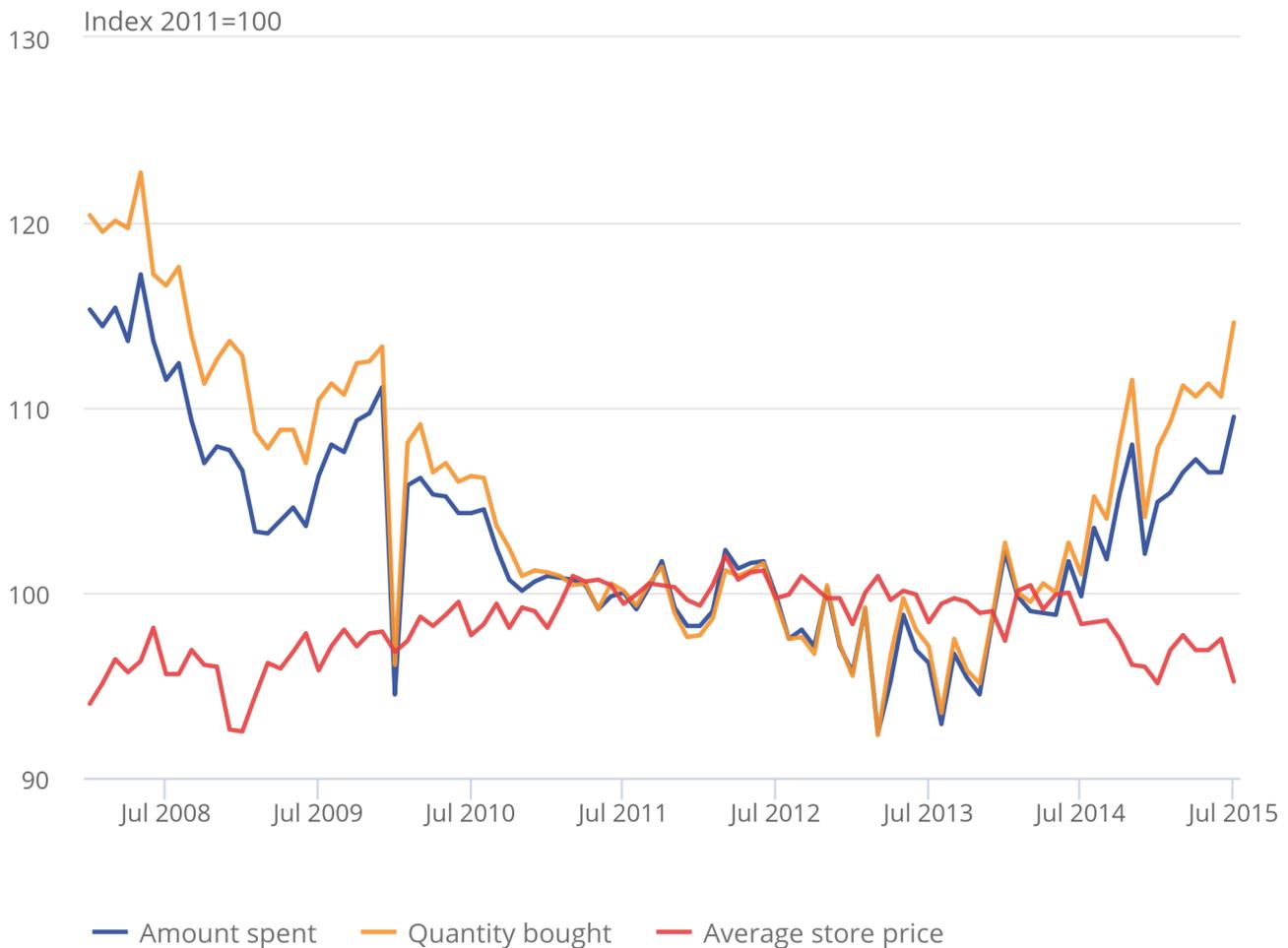
6 . Focus on household goods stores

Figure 1 shows the longer-term picture for the quantity bought, amount spent and average store price in household goods stores. There has been sustained growth since late 2013 with year-on-year increases in both quantity bought and amount spent during this period. This growth coincides with a fall in average store price, suggesting that consumers have taken advantage of lower prices in store to invest in household goods.

Figure 1: Quantity bought and amount spent (seasonally adjusted) and average store price (non-seasonally adjusted) in the household goods sector, January 2008 to July 2015

Great Britain

Figure 1: Quantity bought and amount spent (seasonally adjusted) and average store price (non-seasonally adjusted) in the household goods sector, January 2008 to July 2015



Source: Monthly Business Survey - Retail Sales Inquiry - Office for National Statistics

Source: Monthly Business Survey - Retail Sales Inquiry - Office for National Statistics

Growth continued in the latest period and in July 2015 compared with July 2014:

- the quantity bought increased by 13.4%
- the amount spent increased by 9.7%
- average store price decreased by 3.2%

Compared with June 2015:

- the quantity bought increased by 3.6%
- the amount spent increased by 2.8%
- average store price decreased by 2.4%

Table 4 shows the main year-on-year contributions to growth within this retail sector.

Table 4: Contributions to year-on-year volume and value growth in household goods stores, July 2015

Great Britain

Sector	Weights (%)	Growth rates volume (%)	Contribution to volume (percentage points)	Growth rates value (%)	Contribution to value (percentage points)
Hardware, paints and glass	3.05	4.7	1.7	2.9	1.1
Electrical household appliances	1.73	19.5	4.1	8.3	1.7
Furniture, lighting equipment and household articles not elsewhere classified	3.24	19.0	7.5	17.8	6.9
Music and video recordings and equipment	0.29	2.8	0.1	-0.6	-0.0
Total			13.4		9.7

Source: Office for National Statistics

All main sub-sectors showed year-on-year growth in the quantity bought, while 3 of the 4 main sub-sectors showed year-on-year growth in the amount spent. The largest growth in quantity bought during this period was reported by electrical household appliances which increased by 19.5%, followed by furniture, lighting equipment and household articles which increased by 19.0%. These 2 sectors combined contributed to 11.6% of the 13.4% year-on-year increase. Feedback from contributors suggests that in-store promotions have boosted sales.

7 . Contributions to growth

The retail industry is divided into 4 retail sectors:

- predominantly food stores (for example, supermarkets, specialist food stores and sales of alcoholic drinks and tobacco)
- predominantly non-food stores (for example, non-specialised stores, such as department stores, textiles, clothing and footwear, household goods and other stores)
- non-store retailing (for example, mail order, catalogues and market stalls)
- stores selling automotive fuel (petrol stations)

In July 2015, for every pound spent in the retail industry:

- 41 pence was spent in food stores
- 42 pence in non-food stores
- 7 pence in non-store retailing
- 10 pence in stores selling automotive fuel

Using these as weights, along with the year-on-year growth rates, we can calculate how each sector contributed to the total year-on-year growth in the quantity bought.

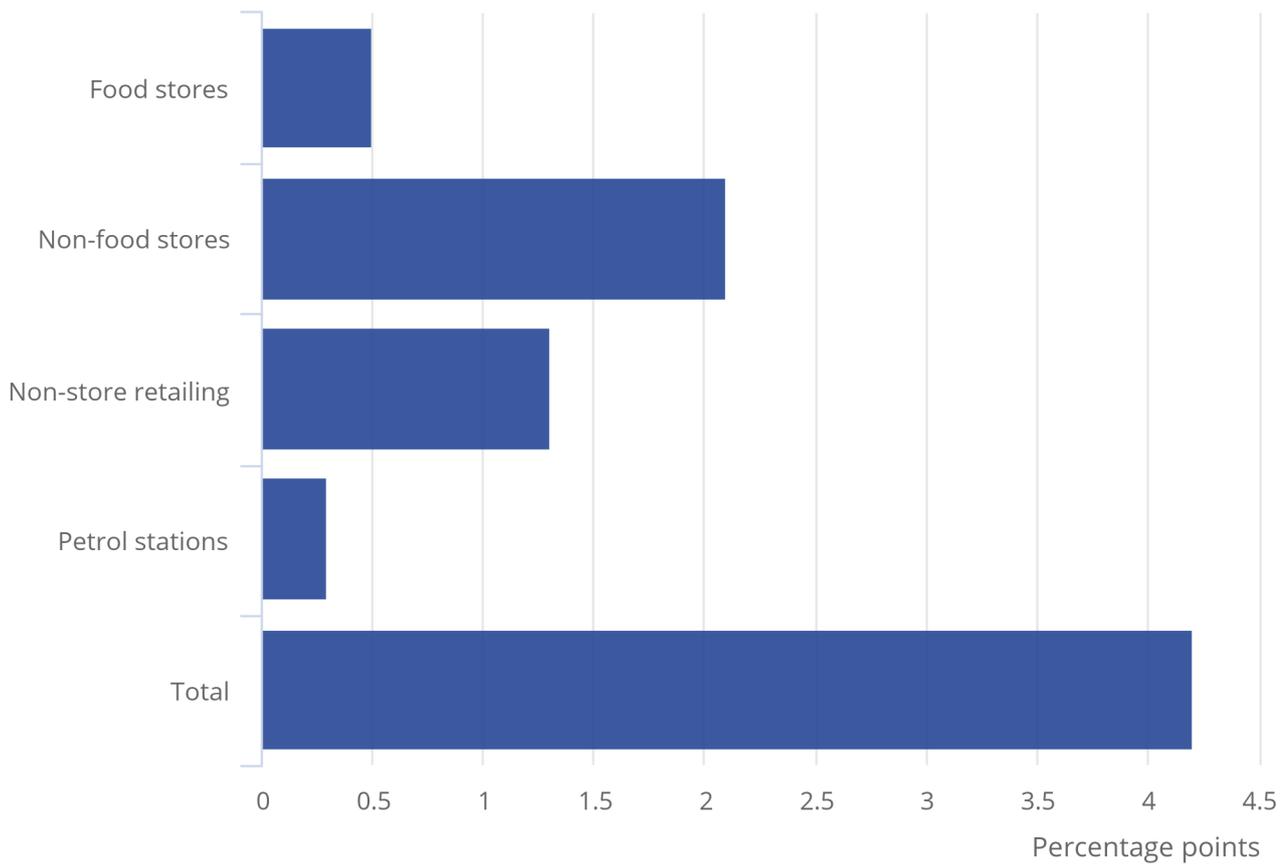
Figures 2 and 3 show the contribution of each sector to the quantity bought (volume) and amount spent (value) in the retail industry between July 2015 and July 2014.

Figure 2: Contributions to year-on-year volume growth from the 4 main retail sectors (July 2015 compared with July 2014)

Great Britain

Figure 2: Contributions to year-on-year volume growth from the 4 main retail sectors (July 2015 compared with July 2014)

Great Britain



Source: Monthly Business Survey - Retail Sales Inquiry - Office for National Statistics

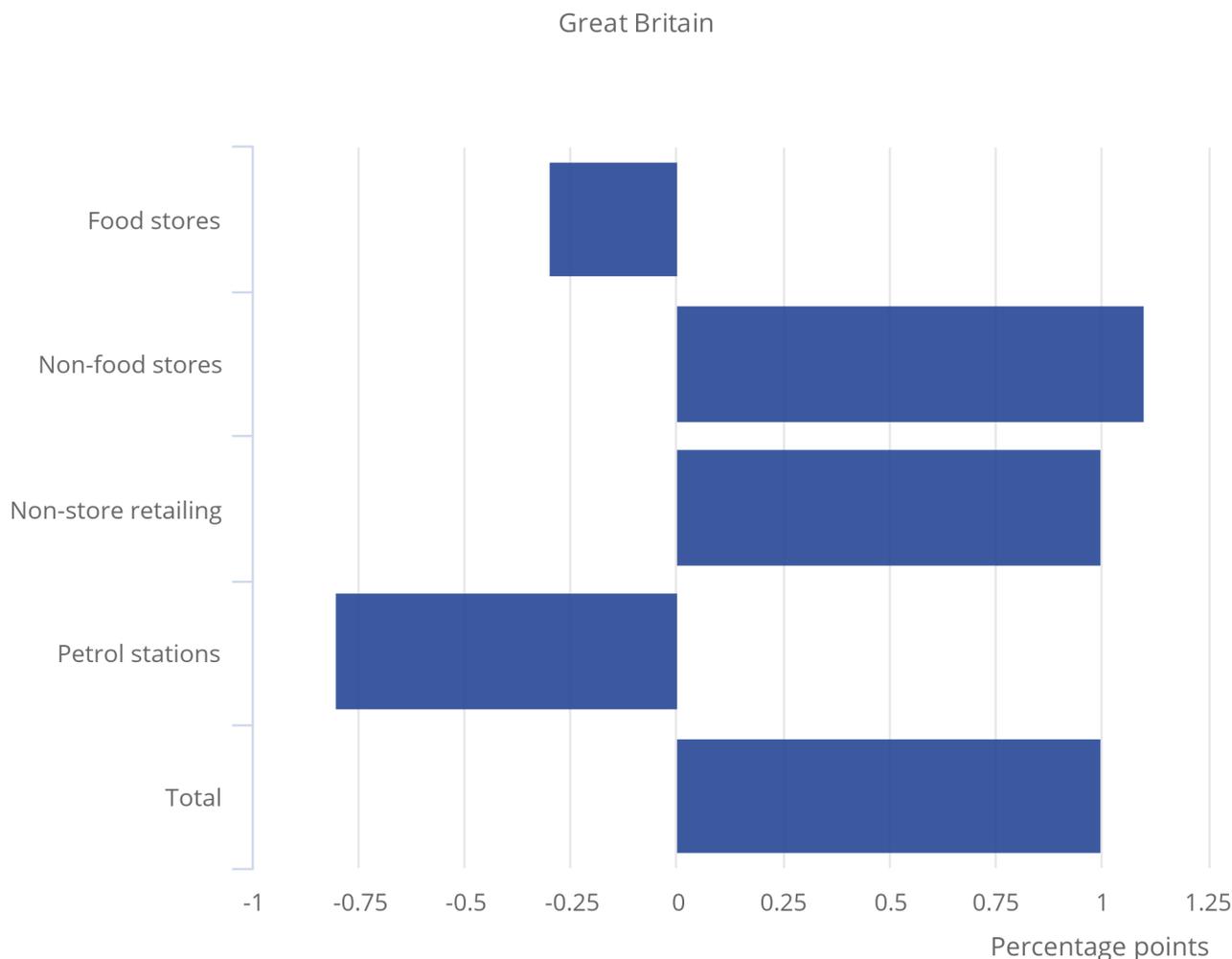
Source: Monthly Business Survey - Retail Sales Inquiry - Office for National Statistics

In July 2015, all 4 main retail sectors saw an increase in the quantity bought (volume). The largest contribution came from the non-food stores sector.

Figure 3: Contributions to year-on-year value growth from the 4 main retail sectors (July 2015 compared with July 2014)

Great Britain

Figure 3: Contributions to year-on-year value growth from the 4 main retail sectors (July 2015 compared with July 2014)



Source: Monthly Business Survey - Retail Sales Inquiry - Office for National Statistics

Source: Monthly Business Survey - Retail Sales Inquiry - Office for National Statistics

In July 2015, 2 out of the 4 main sectors (non-store retailing and non-food stores) contributed to the increase in amount spent (value). The largest contribution came from the non-food stores sector.

8 . Distribution analysis

Table 5 shows how sales varied among different-sized retailers. It shows the distribution of reported change in sales values of businesses (from the RSI sample), ranked by size of business (based on number of employees). Businesses with 10 to 39 employees saw the largest growth in the amount spent in July 2015 compared with July 2014 (10.9%). Businesses with 100 and over employees experienced growth of 1.3%.

Table 5: Distribution Analysis, changes in reported retail sales values between July 2014 and July 2015

Standard reporting periods, by size of business

Number of employees	Weights (%)	Growth since July 2014 (%)
100 and over	78.5	1.3
40 to 99	2.5	-0.4
10 to 39	7.0	10.9
0 to 9	11.9	-5.9

Source: Office for National Statistics

More information on the performance of the retail industry by store type and size can be found in the Business Analysis reference table. The table contains information only from businesses that reported in July 2014 and July 2015; it shows reported actual changes in their sales.

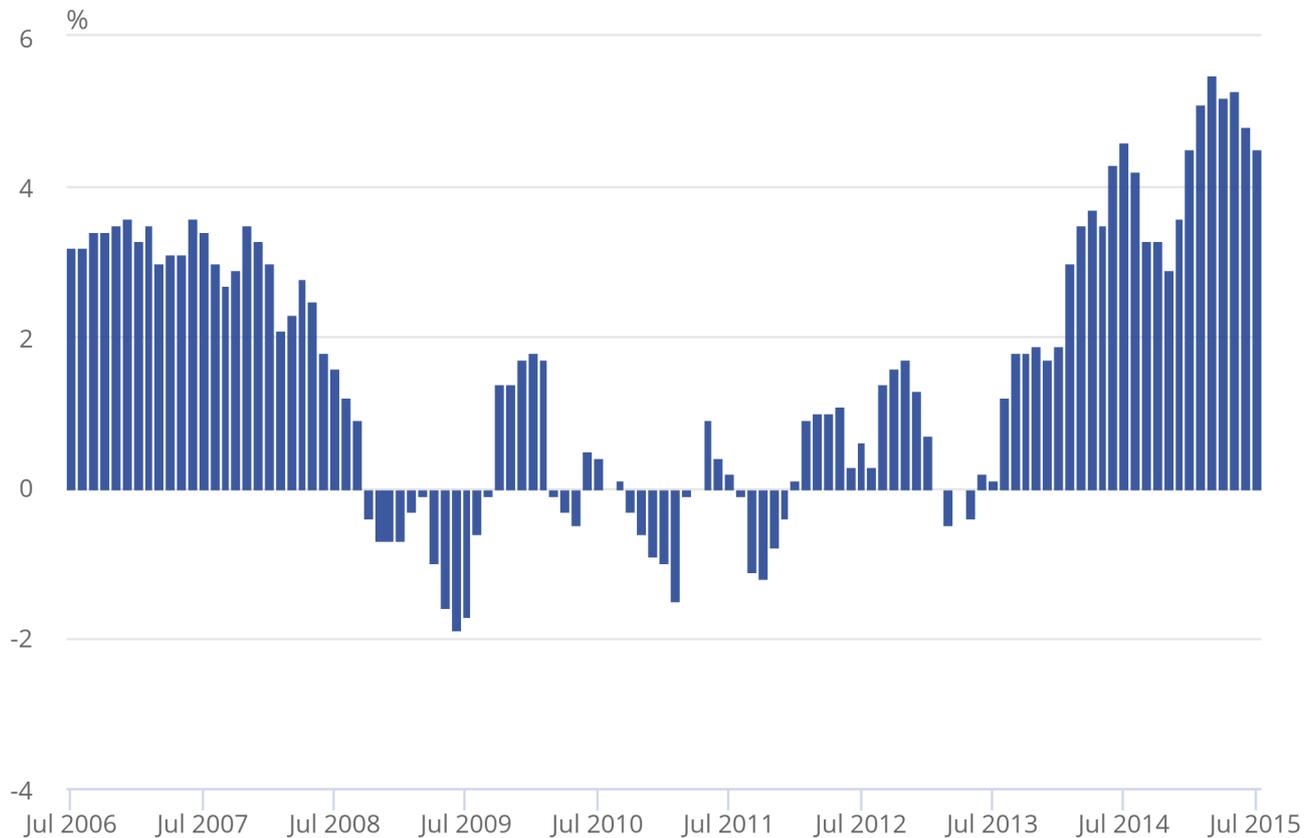
9 . Economic context

Figure 4 shows the percentage change in retail sales volume in a 3 month period with the same period in the previous year. It highlights the strong growth since 2013.

Figure 4: 3 month on 3 month a year earlier growth in the volume of retail sales, 3 months to July 2006 to 3 months to July 2015

Great Britain

Figure 4: 3 month on 3 month a year earlier growth in the volume of retail sales, 3 months to July 2006 to 3 months to July 2015
Great Britain



Source: Monthly Business Survey - Retail Sales Inquiry - Office for National Statistics

Source: Monthly Business Survey - Retail Sales Inquiry - Office for National Statistics

Figure 4 shows 3 distinct periods. Between July 2006 and July 2008 there was continuous growth in retail sales volume, it increased by 2.3% over the period. Growth in inflation ([Consumer Prices Index \(CPI\)](#)) was consistently lower than average weekly earnings over most of this period, meaning real earnings grew, which possibly increased the purchasing power of consumers.

However, between August 2008 and May 2013, the volume of retail sales changed between periods of contraction and expansion, and as a result broadly the same volume of sales were recorded toward the beginning and end of the period. This weakness may be partly explained by the economic climate. Growth in average weekly earnings had been lower than inflation over most of the period, which implies that earnings fell in real terms. However, the value of retail sales continued to grow, increasing by 12.8%, reflecting rising prices between these dates.

From June 2013, growth in volume terms began to increase notably, despite average weekly earnings growing at a slower rate than CPI until September 2014. The volume of retail sales in July 2015 was 7.9% higher than it was in June 2013. In 2013 prices in retail outlets began to fall and this accelerated throughout 2014; this coincided with increased growth in the volume of retail sales. This upturn in spending was accompanied by a decline in the savings ratio, from an average of 8.5% over the period 2008 to 2012, to an average of 6.1% in 2014.

A notable feature of retail sales over the past year has been that prices (as measured by the implied deflator) have been declining. [Retail Sales, March 2015](#) examined the difference between the implied deflator and the Consumer Prices Index (CPI). However, the change in prices has differed between store types. Figure 5 shows the year-on-year growth in the implied deflator for clothes stores, against the range of growth rates in deflators for all other store types, excluding petrol stores.

Figure 5: Month on same month a year earlier growth in implied deflators, in clothing stores and range of other store types (excluding petrol), January 2014 to July 2015

Great Britain

Chart unavailable

Source: Monthly Business Survey - Retail Sales Inquiry - Office for National Statistics

For all other store types, inflation has been decreasing throughout most of the period, and has been consistently negative since September 2014. However, for clothing stores, this trend has been less noticeable. While inflation in clothing stores has been negative for most periods since mid-2014, there have been periods of positive inflation, including the most recent period of July 2015. The [CPI July 2015 release](#) noted that the biggest upward contribution to the CPI 12 month rate came from clothing and footwear. Most years see a decline in prices in this store type between June and July as a result of an increase in summer sales. However, in 2014 the fall was larger than usual, leading to an increase in prices this July relative to the previous year.

10 . International data

The only international estimate of retail sales available for July 2015 was published by the US Census Bureau on 13 August 2015. In its advanced retail sales estimates for July 2015, the amount spent in the US retail industry, including motor vehicles and parts and food services, increased by 0.6% from the previous month and increased by 2.4% compared with July 2014. Total sales for the 3 months to July 2015 were up 2.3% from the same period a year ago.

The latest estimates of the volume of retail trade across the European Union, from Eurostat for June 2015, show a 0.6% decrease in the euro area (EA19) and a 0.5% decrease in the EU28 when compared with May 2015. Compared with June 2014, the retail sales index increased by 1.2% in the EA19 and by 2.0% in the EU28. Note that an accurate comparison cannot be made as Eurostat data are calculated on a 2010 = 100 basis, while data for Great Britain are calculated on a 2011 = 100 basis.

11. Background notes

1. Future improvements

We are currently reviewing the implied deflator series prior to 2002; this will be updated in the next statistical bulletin released on 17 September 2015.

We are currently updating the RSI workplan for the next 12 months, if you have any feedback on potential improvements please e-mail retail.sales.enquiries@ons.gsi.gov.uk.

2. Relevant links

A [subset of the retail sales dataset](#) will be published on our Data Explorer page. Please note the link will not work until the data are published.

[Disclosure control policy](#)

[Comparability of RSI Sales and External Indicators](#)

[RSI Workplan](#)

[RSI Quality and Methodology Information paper](#)

[Revisions to the Retail Sales Index](#) details why revisions to the non-seasonally adjusted and seasonally adjusted data can occur. Revisions triangles can be found under section 5, Quality, in the background notes.

[Has 2014 been a good year for retailers](#)

[Overview of internet retail sales in 2014](#)

[BRC Sales Monitor July 2015](#)

[International Measures of Retail Sales](#)

[National Accounts Workplan](#)

[Why is the retail sales revisions policy different from the National Accounts revisions policy?](#)

[14 ways ONS statistics help you understand the economy - A closer look at the circular flow of income](#)

[Impact of quarterly employment question on the monthly survey response](#)

[Investigating the effect of quarterly collection of employee jobs data on the estimated standard error of change for total turnover on the Monthly Business Survey](#)

[Government Statistical Service \(GSS\) uncertainty guidance](#)

3. Understanding the data

1. [Quick Guide to the Retail Sales Index](#)

2. Interpreting the data

- The Retail Sales Index (RSI) is derived from a monthly survey of 5,000 businesses in Great Britain. The sample represents the whole retail sector and includes the 900 largest retailers and a representative panel of smaller businesses. Collectively all of these businesses cover approximately 90% of the retail industry in terms of turnover
- The RSI covers sales only from businesses classified as retailers according to the Standard Industrial Classification 2007 (SIC 2007), consistent with the international NACE Rev 2 classification of industries. The retail industry is division 47 of the SIC 2007 and retailing is defined as the sale of goods to the general public for household consumption. Consequently, the RSI includes all internet businesses whose primary function is retailing and also covers internet sales by other British retailers, such as online sales by supermarkets, department stores and catalogue companies. The

RSI does not cover household spending on services bought from the retail industry as it is designed to only cover goods. Respondents are asked to separate out the non-goods elements of their sales, for example, income from cafes. Consequently, online sales of services by retailers, such as car insurance, would also be excluded

- The monthly survey collects 2 figures from each sampled business: the total turnover for retail sales for the standard trading period, and a separate figure for internet sales. The total turnover will include internet sales. The separation of the internet sales figure allows an estimate relating to internet sales to be calculated

3. Definitions and explanations

- The **value** or current price series records the growth of the value of sales “through the till” before any adjustment for the effects of price changes
- The **volume** or constant price series are created by removing the effect of price changes from the value series. The Consumer Prices Index (CPI) is the main source of the information required on price changes. In brief, a deflator for each type of store (5-digit SIC) is derived by weighting together the CPI components for the appropriate commodities, the weights being based on the pattern of sales in the base year. These deflators are then applied to the value data to produce volume series
- The **implied deflator** or the **estimated price of goods** is derived by dividing the non-seasonally adjusted value and volume data to leave a price relative. In general, this implied price deflator should be quite close to the retail component of the CPI. More information on the implied price deflator can be found in the [Quick Guide to Retail Sales](#)

4. Use of the data

The value and volume measures of retail sales estimates are widely used in private and public sector organisations, both domestically and internationally. For example, private sector institutions such as investment banks, the retail industry itself and retail groups use the data to inform decisions on the current economic performance of the retail industry. These organisations are most interested in a long-term view of the retail sector, taken from the year-on-year growth rates. Public sector institutions use the data to help inform decision and policy making. They tend to be most interested in a snapshot view of the retail industry, which is taken from the month-on-month growth rates.

In a recent survey users found the Retail Sales Index statistics important to their work. It was found crucial for financial modelling of sectors and recognised as a timely indicator for the economy. It has been used as a comparative tool with BRC and other market sources to boost context. Practically, it has been utilised as a comparative tool for business performance and the ability to access internet retail sales has been particularly beneficial to some. On a non-industry level, the RSI was perceived as important for informing political opinions or simply for curiosity by individuals who were not necessarily utilising it as a reference for work purposes.

The Retail Sales Index feeds into estimates of gross domestic product (GDP) in two ways. Firstly it feeds into the services industries when GDP is measured from the output approach. Secondly it is a data source used to measure household final consumption expenditure which feeds into GDP estimates when measured from the expenditure approach.

The data feed into the [first \(or preliminary\) estimate of GDP](#), the [second estimate of GDP](#) and the third estimate, published in the [Quarterly national accounts](#).

4. Methods

Information on [retail sales methodology](#) is available on our website

1. Composition of the data

Retail sales estimates are based on financial data collected through the monthly Retail Sales Inquiry. Response rates at the time of publication are included for the current month, and the 3 months prior. The response rates for those historical periods are updated to reflect the current level of response, incorporating data from late returns. There are 2 response rates included with 1 percentage for the amount of turnover returned, and the other percentage for the amount of questionnaire forms. Historical response rates are available in the quality information reference table.

Table 6: Overall response rates (%), April 2015 to July 2015

April 2015 to July 2015

Great Britain

Year	Period	Turnover	Questionnaire
2015	July	93.9	60.8
	June	97.7	74.0
	May	99.0	77.3
	April	98.7	77.5

2. Seasonal adjustment

Seasonally adjusted estimates are derived by estimating and removing calendar effects (for example, Easter moving between March and May) and seasonal effects (for example, increased spending in January as a result of Christmas) from the non-seasonally adjusted (NSA) estimates. Seasonal adjustment is performed each month and reviewed each year, using the standard, widely used software, X-13-ARIMA-SEATS. Before adjusting for seasonality, prior adjustments are made for calendar effects (where statistically significant), such as returns that do not comply with the standard trading period (there is more information in the Methods, Calendar effects section), bank holidays, Easter and the day of the week on which Christmas occurs.

The data collected from the retail sales survey estimate the amount of money taken through the tills of retailers; these are non-seasonally adjusted data. These data consist of 3 components:

- **trend** which describes long-term or underlying movements within the data
- **seasonal** which describes regular variation around the trend, that is, peaks and troughs within the time series (the most obvious is the peak in January and the fall in February)
- **irregular** or “noise”, for example, deeper falls within the non-seasonally adjusted series due to bad weather impacting on retail sales

To ease interpretation of the underlying movements in the data, the seasonal adjustment process estimates and removes the seasonal component. It leaves a seasonally adjusted time series made up of the trend and irregular components.

In the non-seasonally adjusted RSI we see large rises in January each year and a fall in the following February, but these are not evident in the seasonally adjusted index. This peak in January is larger than the subsequent fall, but the trend and irregular components in both months are likely to be similar. This means that the movements in the unadjusted series are almost completely a result of the seasonal pattern.

3. Calendar effects

The calculation of the RSI has an adjustment to compensate for calendar effects that come from the differences in reporting periods. The reporting period for July 2015 was 5 July 2015 to 1 August 2015, compared with 6 July 2014 to 2 August 2014 in the previous year. Table 7 shows the differences between the calendar and seasonally adjusted estimates.

Table 7: Calendar effects, July 2015

	Year-on-year percentage change	
	Value	Volume
Calendar adjusted	1.0	3.7
Seasonally adjusted	1.0	4.2

5. Quality

1. Basic quality information

- The standard reporting periods can change over time due to the movement of the calendar. Every 5 or 6 years the standard reporting periods are brought back into line by adding an extra week. For example, January is typically a 4 week standard period but January 1986, 1991, 1996, 2002, 2008 and 2014 were all 5 week standard periods. The non-seasonally adjusted estimates will still contain calendar effects. If the non-seasonally adjusted estimates are used for analysis, this can lead to a distortion depending on the timing of the standard reporting period in relation to the calendar, previous reporting periods and how trading activity changes over time
- The non-seasonally adjusted series contain elements relating to the impact of the standard reporting period, moving seasonality and trading day activity. When making comparisons users should focus on the seasonally adjusted estimates as these have the systematic calendar-related component removed. Due to the volatility of the monthly data, growth rates should be calculated using an average of the latest 3 months of the seasonally adjusted estimates
- When interpreting the data, the relative weighted contributions of the sectors in the all retailing series should be considered. Based on SIC 2007 data, total retail sales consists of: predominantly food stores 40.9%, predominantly non-food stores 42.0%, non-store retailing 7.0% and automotive fuel 10.1%

2. Standard error

- Standard errors determine the spread of possible movements and are a means of assessing the accuracy of the non-seasonally adjusted month-on-month and year-on-year estimates of all retail sales volumes. The lower the standard error, the more confident we can be that the estimate is close to the true value for the retail population
- The standard error of year-on-year movement for "All Retailing" is 1.0%. It has remained at 1.0% since May 2015. It was lower at 0.9% from June 2014 onwards with the only other decrease in May 2014, at 0.8%. Before this period, the year-on-year movements mostly remained at 0.9% with the only other fluctuations occurring in August 2013 and September 2013, where there was a standard error of 1.0%
- Table 8 shows the year-on-year movement for the non-seasonally adjusted chained volume measure alongside the standard error, across the published sector breakdowns for July 2014 and July 2015. The differences between July 2014 and July 2015 highlight that the standard error has increased the most in "Non-store retailing". The greatest decreases are for "Textiles, clothing and footwear stores"

More information on standard errors can be found in the "[Retail Sales Quality Tables](#)" reference tables, which are part of this release.

Table 8: Year-on-year estimates and standard errors, July 2014 and July 2015

Chained volume measure, non-seasonally adjusted

Sector	July 2014	July 2015
--------	-----------	-----------

	12-month movement (percentage change)	Standard error of 12-month movement, median (percentage points)	12-month movement (percentage change)	Standard error of 12-month movement, median (percentage points)
All retailing	2.7	0.9	3.9	1.0
Predominantly food stores	-1.4	0.6	1.4	0.6
Predominantly non-food stores	7.4	1.1	4.3	1.1
Non-specialised stores	7.0	1.6	7.4	1.7
Textile, clothing and footwear stores	5.3	1.4	3.1	1.2
Household goods stores	4.0	1.6	13.3	1.7
Other stores	11.9	2.7	-1.9	2.8
Non-store retailing	8.8	4.5	17.5	5.2
Automotive fuel	-2.7	3.9	3.1	4.0

Source: Office for National Statistics

3. Summary quality report

The [RSI Quality and Methodology Information paper](#) details the intended uses of the statistics in this bulletin, their general quality and the methods used to produce them.

4. Revisions triangles

Revisions to data provide one indication of the reliability of key indicators. Table 9 shows summary information on the size and direction of the revisions made to the volume data covering a 5 year period. Note that changes in definition and classification mean that the revision analysis is not conceptually the same over time.

Table 9: Revisions triangles summary, all retailing, July 2015

Volume seasonally adjusted

	Growth in latest period (%)	Revisions between first publication and estimates twelve months later (percentage points)	
		Average over the last five years (mean revision)	Average over the last five years without regard to sign (average absolute revision)
Latest three months compared with previous three months	0.5	-0.19	0.29
Latest month compared with previous month	0.1	-0.13	0.35

The data section of this bulletin provides these estimates and the calculations behind the averages in the table.

6. Publication policy

Details of the policy governing the release of new data are available from our Media Relations Office. Also available is a list of the organisations given [pre-publication access](#) to the contents of this bulletin.

Accessing data

The complete run of data in the tables of this statistical bulletin is available to view and download in electronic format using our Time Series Data service. Users can download the complete bulletin in a choice of zipped formats, or view and download their own sections of individual series.

Alternatively, for low-cost tailored data call 0845 601 3034 or email info@ons.gsi.gov.uk

Next publication: Thursday 17 September 2015

Issued by: Office for National Statistics, Government Buildings, Cardiff Road, Newport NP10 8XG

Media contact: Tel Media Relations Office 0845 6041858 Emergency on-call 07867 906553 Email media.relations@ons.gsi.gov.uk

Statistical contact: Tel Jayne Edwards +44 (0)1633 455602 Email retail.sales.enquiries@ons.gsi.gov.uk

Contact us: Tel 0845 601 3034 Email info@ons.gsi.gov.uk [Website](#) [Twitter](#)

7. Details of the policy governing the release of new data are available by visiting www.statisticsauthority.gov.uk/assessment/code-of-practice/index.html or from the Media Relations Office email: media.relations@ons.gsi.gov.uk