

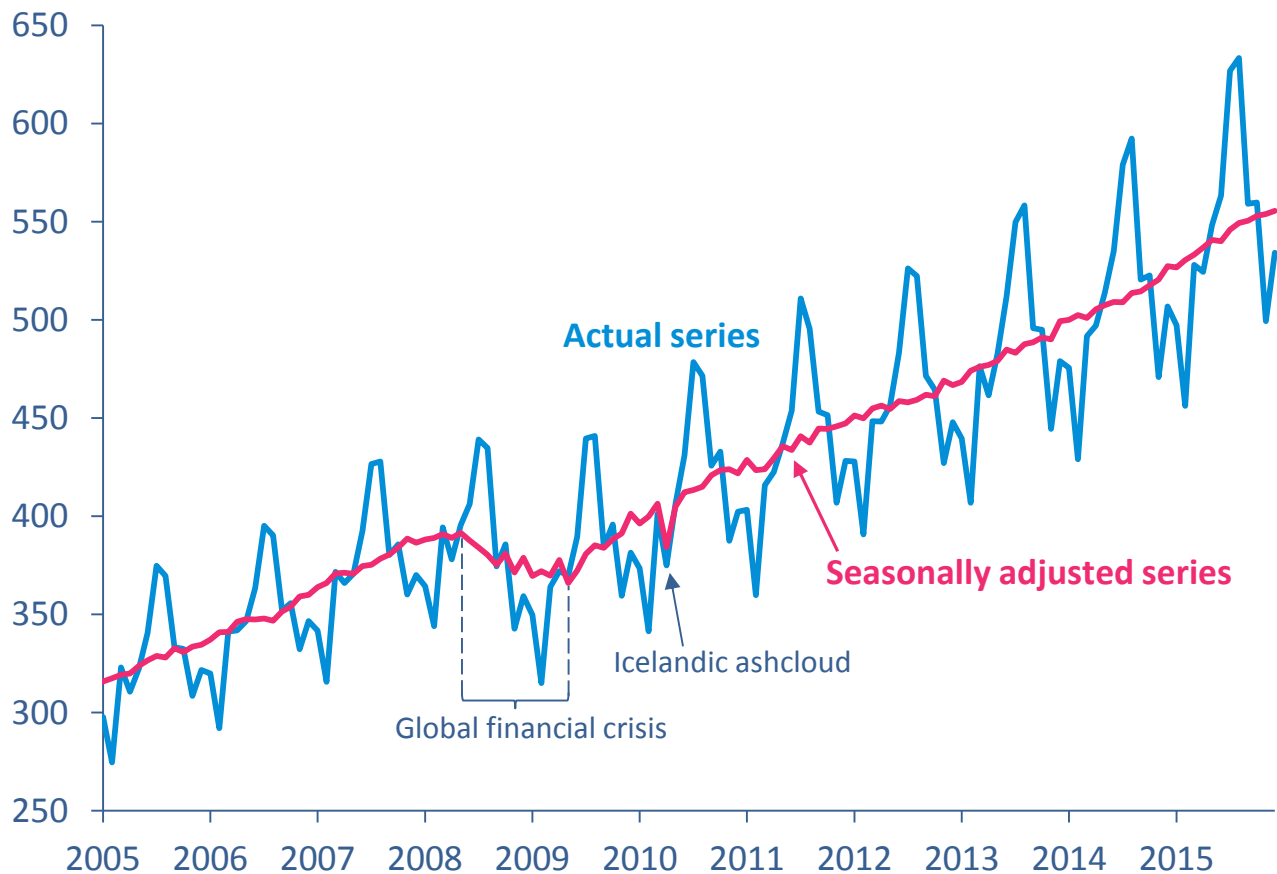


IATA ECONOMICS' CHART OF THE WEEK

12 FEBRUARY 2016

SEASONING TO TASTE – HOW TO COPE WITH SEASONAL FLUCTUATIONS

Industry revenue passenger kilometres (billions per month)



Source: IATA [Monthly Statistics](#)

- The pattern of demand in the air passenger industry is highly seasonal (as shown by the blue line on today's chart). The low point for demand is in February, during the depths of the Northern hemisphere's winter, while the peak period is in the summer months of July and August. The variation in global traffic between the peak and low months is stark: indeed, the amount of RPKs performed in February 2015 was just 72% of the level performed in August.
- So how does one go about analyzing trends in the industry in the face of such seasonal variation? The most straightforward approach is to compare the level of activity each month with that seen in the same month the previous year – that is, to look at year-on-year growth rates. This is helpful but not infallible, as the year-on-year growth rate can be affected as much by changes in the trend *last year* as it is by changes in the current trend (so-called 'base' effects).
- An alternative approach is to employ standard statistical techniques to remove the seasonal pattern in the underlying data to leave just the 'seasonally adjusted' series (the pink line). This makes it much easier to focus on the underlying trend within the actual series, and also to spot turning points in the trend much earlier than you would be able to by looking at annual growth rates alone.

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