

How Sticky is YouTube?

YouTube metrics for August-December 07

Introduction:

2007 has been a year of massive growth for YouTube, with Nielsen Online recently reporting massive growth in viewership of several online video sites, with certain sites doubling since the Writers Guild of America (WGA) began to strike in the US on November 5thⁱ.

US Pew Internet have also shown dramatic increases in the number of people viewing online video sites, with daily users appearing to double over the past yearⁱⁱ.

The results we present here are from our own research into YouTube in the final quarter of 2007. We have studied how the average number of views per day have varied over this time across a wide range of videos on the site. We find that the average number of views per video appears to have nearly doubled in the final quarter alone.

Layout of this Document:

We first present an overview of our results with some general comments about how to read the data.

After this we further analyse the effects of two significant factors over the past year - the release of several incredibly popular "Viral" videos, and the WGA strike.

In our final sections we draw some potential conclusions from this data, and give a little more information about how this study was performed and the significance of our results.

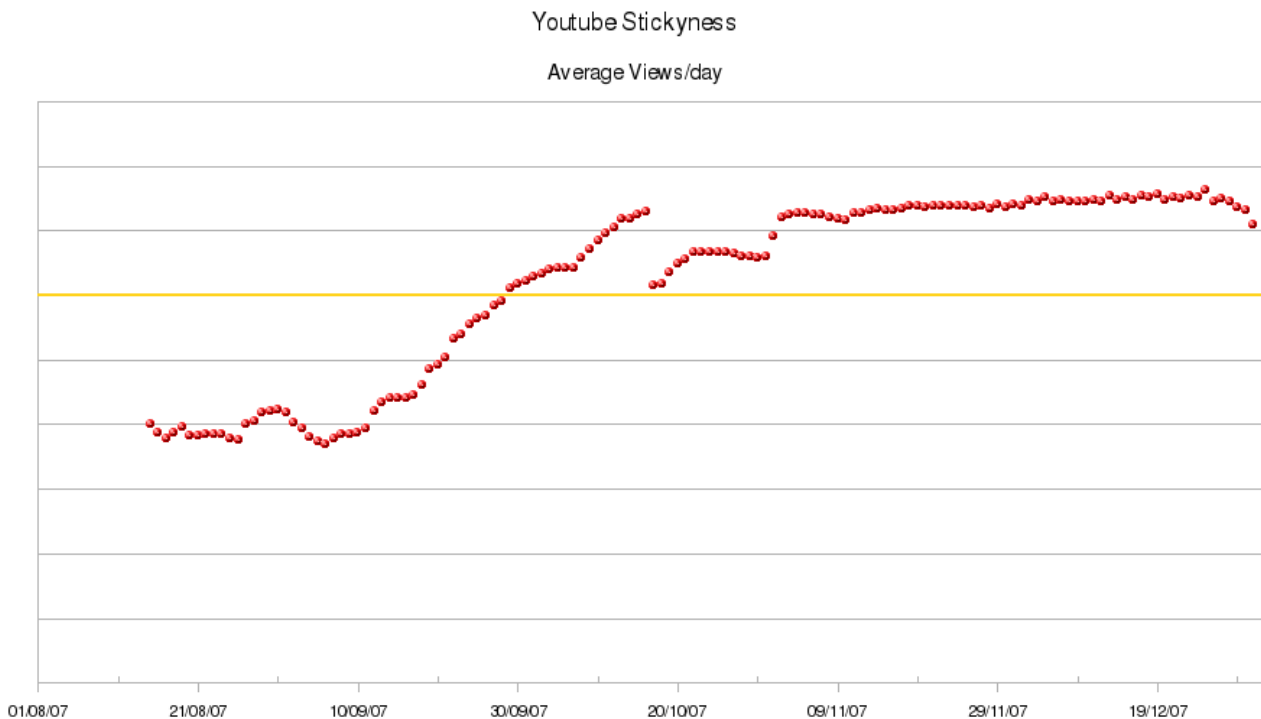
Results:

In the figure below we plot the average number of views a posted video received per day over time.

Dates are formatted in the format dd/mm/yy, and are taken on Coordinated Universal Time (UTC).

Our data suggests that the final quarter of 2007 saw a notable increase in the average number of views per day (per video) on YouTube (almost doubling the value at the beginning of the quarter), although it is unclear whether this is due to a reduction in the number of videos posted, an increase in the number of viewers available, or an increase in the average number of videos watched per person.

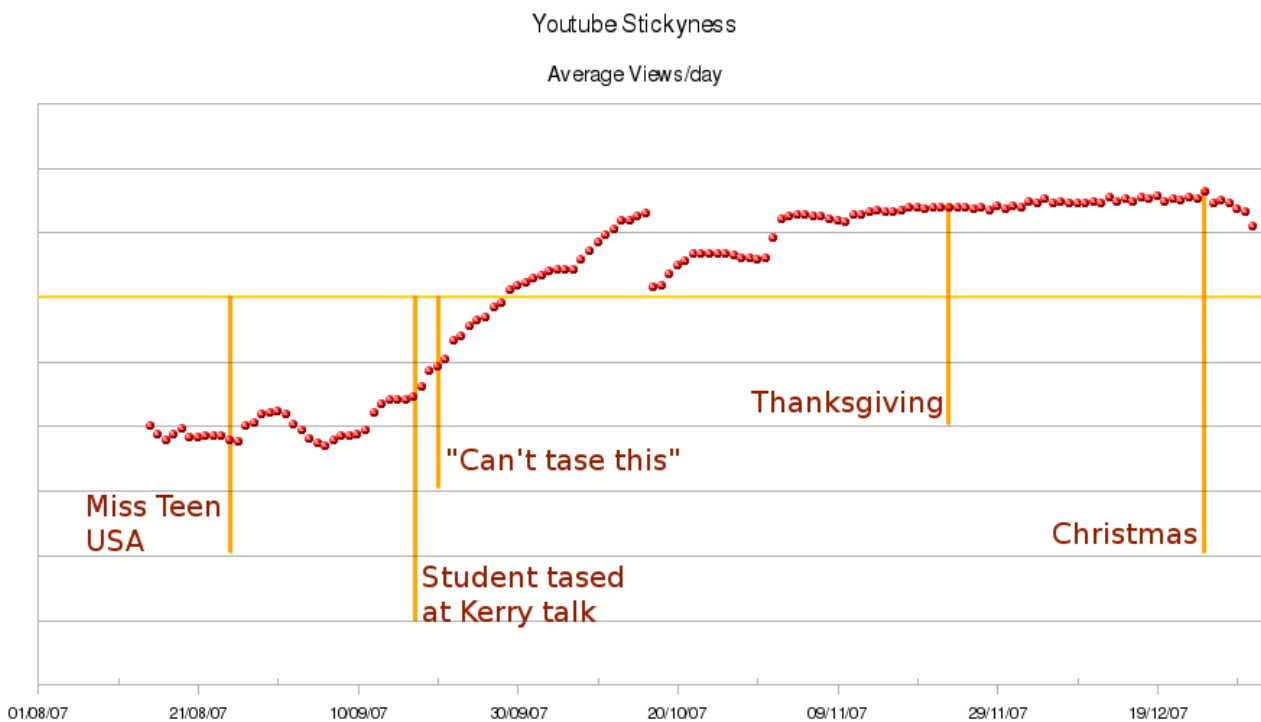
Our data does show one unexplainable discontinuity in the data, between the 17th and 18th of October 2007 (UTC). An explanation for this discontinuity is not offered.



Comparison with release of popular “Viral” Videos:

On the graph below we have added some of the most popular viral videos of this quarter (and public holidays). It is notable that the number of views per day within our sample appeared to spike quite significantly following the Miss Teen USA viral being posted. There is not, however, a strong enough correlation for us to suppose the increase in the first part of the quarter was driven purely by the publicity of such videos.

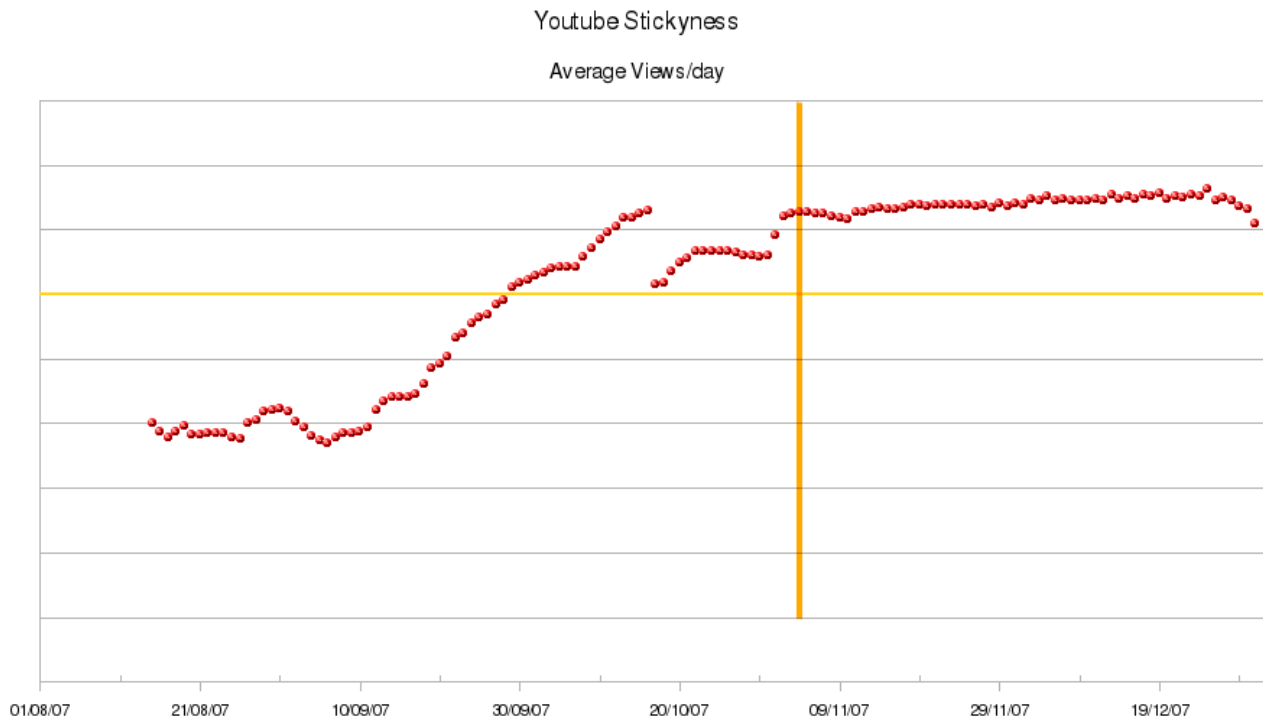
Further, there is surprisingly little change noticed over the major public holidays, although it does appear that several families may have been sitting down around their computer this Christmas day, rather than (or possibly as well as) watching the traditional Christmas television shows.



The effect of the WGA Strike:

On the chart below we have added the start date for the WGA strike. It is interesting to note that although there was an initial spike around the beginning of November (possibly due to news beginning to spread about the chances of a WGA strike), most of the growth that we have recorded for the quarter took place before this date.

The rate of growth since this date seems entirely linear, once a drop at the end of the year (which is assumed to be seasonal) is removed.



Conclusions:

Online video sharing, and in particular YouTube, continues to be a high growth area, both in terms of the number of viewers and in terms of the potential to get content viewed by the masses.

Our research appears to show growth in the average number of viewers for a video on YouTube at a significant rate - doubling over a three month period.

Surprisingly, for the metric we are measuring (number of views per video), the WGA strike has not had so much of a short-term effect as the effect caused by popular viral content on the site (The spike caused by the Miss Teen USA video was significantly larger than the initial spike caused by news of the WGA strike, although this news may have taken longer to filter through to the public.)

Further, given that this metric appears to have been showing linear growth

towards the end of the year, it seems that 2008 will continue to show growth in the online video sharing sector, especially while the WGA strike continues.

About this study and significance:

This study was performed By Tim Wintle for [Rubber Republic](#), a part of [Team Rubber](#). For more viral statistics and metrics, please view <http://www.viralmanager.com/strategy>.

Development of the systems used to record and analyse this data was funded in part by the South West Screen Alliances for Convergence Programme 2007ⁱⁱⁱ.

We studied the number of views per day for a wide range of YouTube videos, both on youtube.com and youtube.co.uk over the quarter August-Dec 2007.

The sample itself was allowed to vary during the process to retain a similar distribution of age and popularity of videos within our sample.

The sample size was large enough (we will retain the exact numbers) for us to claim a comfortable level of significance in this study, although we shall make a cautionary note that there may be some linear factor in place due to the development of our measurement systems during the quarter. We have also removed outliers from this data and performed some simple smoothing.

- i <http://news.bbc.co.uk/1/hi/technology/7180889.stm> - Americans turn to online videos - fetched 12 Jan 2008
- ii http://www.pewinternet.org/PPF/r/232/report_display.asp - Increased use of video-sharing sites - fetched 13 Jan 2008
- iii <http://www.swscreen.co.uk/WhatWeFund/169.aspx> - Alliances for Convergence Programme 2007 - fetched 13 Jan 2008