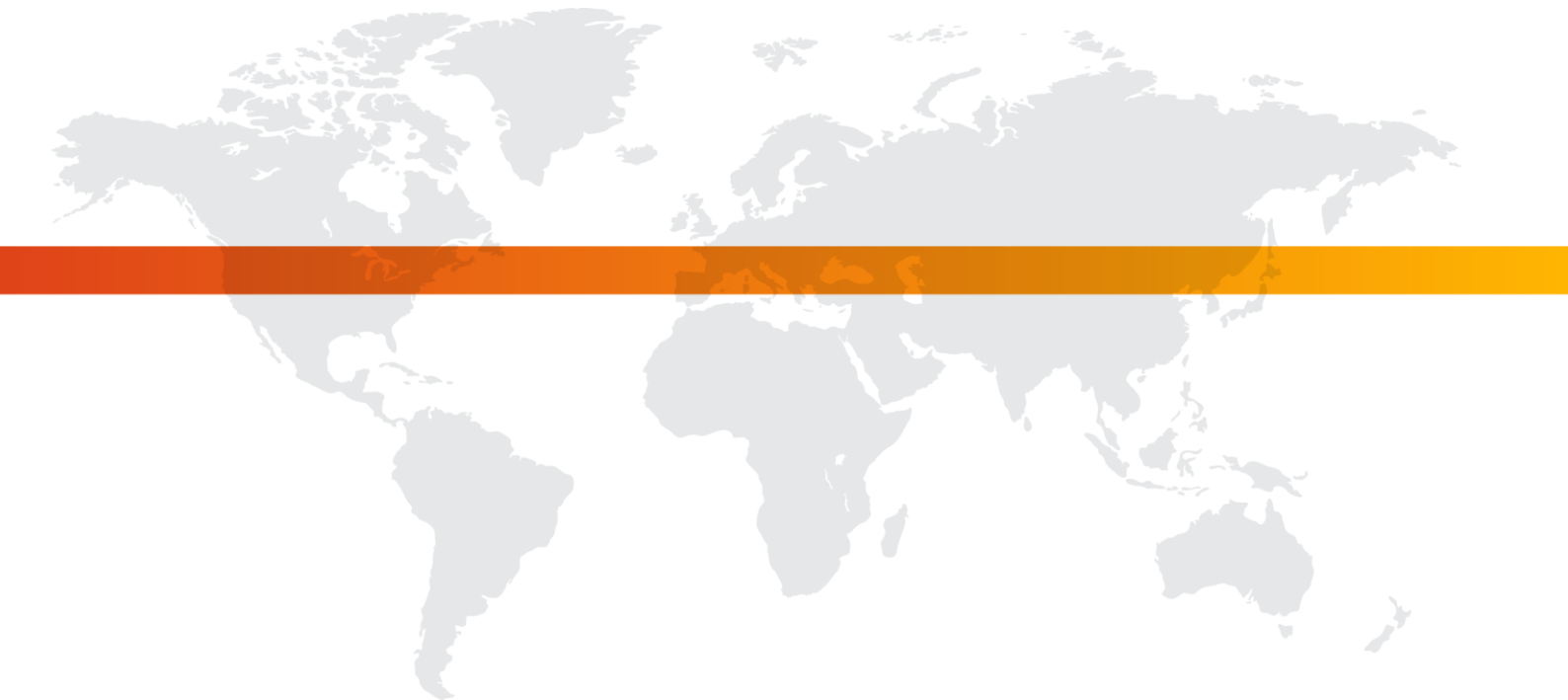![comScore logo]

GSMA MOBILE MEDIA METRICS AND MMX MP (MOBILE)

REPORTING CHANGES – MARCH 2014 DATA (APRIL)

There are 3 main changes to GSMA MMM and MMX MP (UK) coming into effect in April – with March 2014 data

1. Inclusion of Tablet data
2. Browser WIFI scaling improvements
3. Device Classification Changes

Inclusion of Tablet Data into GSMA MMM (already included within MMX MP (Mobile))

From March 2014 data onwards, the GSMA MMM universe will expand to include UK tablet data, included in the MMM reporting interface – selectable via the updated device control:
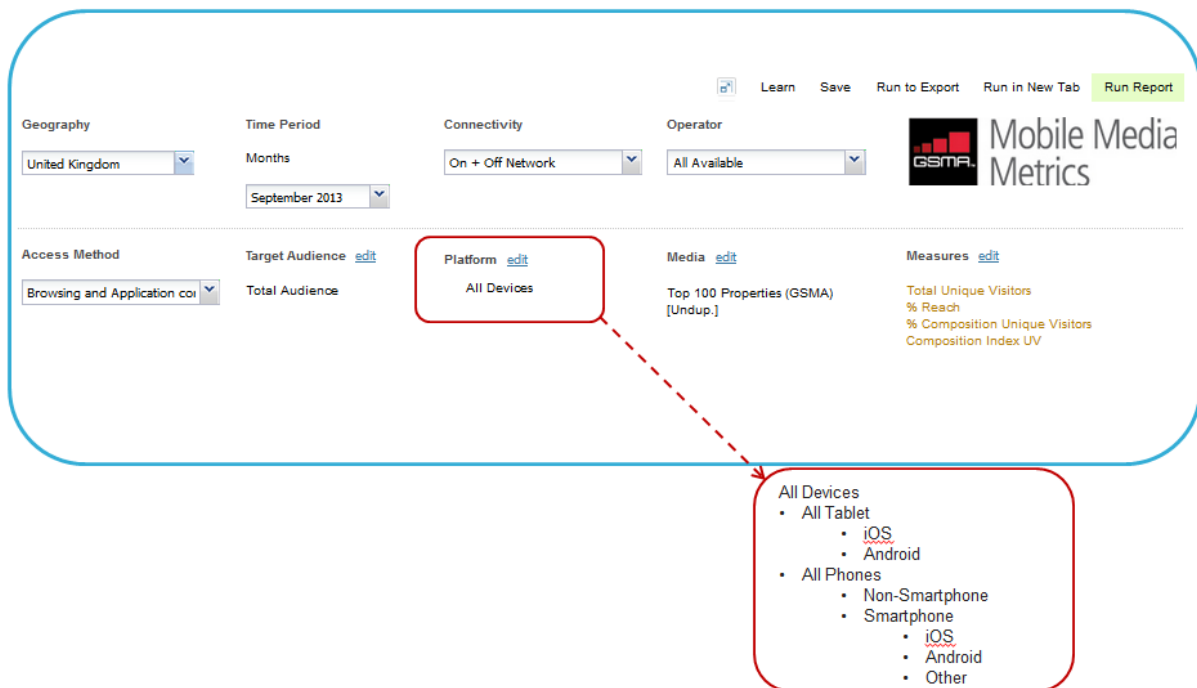
This tablet data will include tablet accessed media properties (sites and applications) within the UK. 3 GSMA MMM core reports will be affected:

- Key Measures
- Media Trend
- % Change Media Trend

Users of the service can run reports splitting audience and activity across the 2 device form factors (tablets and phones) separately, by platform and as a de-duplicated total.

For now and until Q4 2014, tablet data will be limited to tagged media properties (those that have deployed comscore site and application tags). comScore intends to recruit an iPad tablet panel before the end of 2014. This panel will then provide tablet only demographics and visibility into the consumption for untagged properties.

A new duration methodology for Census Only Tablet reporting will be introduced as part of April release (March 2014 data). The new approach - **sequential method** - is based on a calculation of time difference applied to sequentially observed requests (valid PVs) with capping rules

implemented to account for a maximum time spent during the course of an engaged period of time on the device (browser-access).

The effect of this new duration methodology will be noticeable in MMX MP (UK) Mobile

App duration will reported directly on the basis of SDK (the new SDK is needed - version 2.1307.01 or later). Tablet applications that are using the most up-to-date SDK's and are classified in the CFD will have application visitors and duration contributing to parent entities in MMM and MMX Multi-Platform. Tablet applications that are NOT using the duration versions of the comScore SDK (released in July 2013 or later) will NOT have visitors contributing to parent entities as well as no duration

Each of the methodology improvements detailed (below and above) have been fully evaluated and approved by the UKOM Technical Group

Browser WIFI Scaling Improvements

2 methodological changes will occur changing how incremental browser phone WIFI audience (UV) is modeled. These important changes will affect many sites' audience numbers (and in different ways) – both changes are designed to improve incremental browser WIFI audience accuracy by:

1. Addressing the multiplicative effect of iOS cookies dropped onto 3rd party browsers, embedded browsers within applications and Safari browser.
2. To broaden the cookie consideration set – in line with comScore's other reporting methodologies

1. comScore has noticed a growing impact to the browser WIFI audience scaling model – mainly caused by the phenomenon of browsers embedded in applications (found in many popular apps like LinkedIn, Facebook or Twitter).

   Below we see the Facebook app on an iPhone – rendering 3rd party content – in this case BBC News.

In this situation – even though the Application is clearly Facebook, if the 'browsed' content requested is tagged and the User Agent looks like a browser – a cookie is dropped. If the user visits the same site via Safari – then there are 2 cookies and the potential to count a unique device multiple times exists.

To counter the growing trend of embedded browsers and multiple cookies, we are limiting the cookie consideration set to those cookies dropped on safari browser for the purposes of the Wi-Fi methodology. All consumption via browsers and applications will continue to be represented in GSMA MMM reporting – this methodology improvement simply mitigates the potential for duplicative inclusion of a single device in the wi-fi methodology.
Please note – that this change is limited to iOS cookies only – Android/other cookies are not affected.

2. Currently a cookie is considered in for purposes of Off Network estimation <u>only if it is persistent</u>. Persistency is currently defined as 'seen 10 times over the period of the same month'.

To bring this methodology in line with comScore's standard persistent cookie logic – and because new tag data is available (birth of cookie date) we are proposing to widen the consideration set to include cookies that have been seen at least once in the last 7 days of the month and at least once prior to the month.

The effect of these changes will be on audience numbers in both GSMA and MMX MP and will vary significantly depending on entity.

Device Classification Changes

This is an improvement to the current user agent classification methodology – with a number of advantages. The new process:

1. is a more comprehensive and complete representation of "phone browser" activity
   a. by including previously not included third party browsers, mobile browsing in desktop mode, and activity with an OS in the User agent field, but not a model
2. more accurately leaves "phone application" user agents to be counted as applications

The effect of these changes will be minimal and will slightly (but positively) affect all measures in both GSMA and MMX MP.

Please note that all the above changes will affect the mobile portion of MMX MP, as well as GSMA MMM.

comScore have worked alongside the UKOM Technical Group (comprised of digital media industry representatives (media owners, media agencies and industry agencies like AOP, IAB, IPA)) for the past 6 months to make sure the above changes continue to represent mobile audience numbers in the UK as accurately as possible.

For more information on UKOM – please visit http://www.ukom.uk.net.

For questions related to any of the above changes – please contact your comScore client service team.