

UPGRADING TO GA4: WHY AND HOW

Presented to the Seattle Search Network

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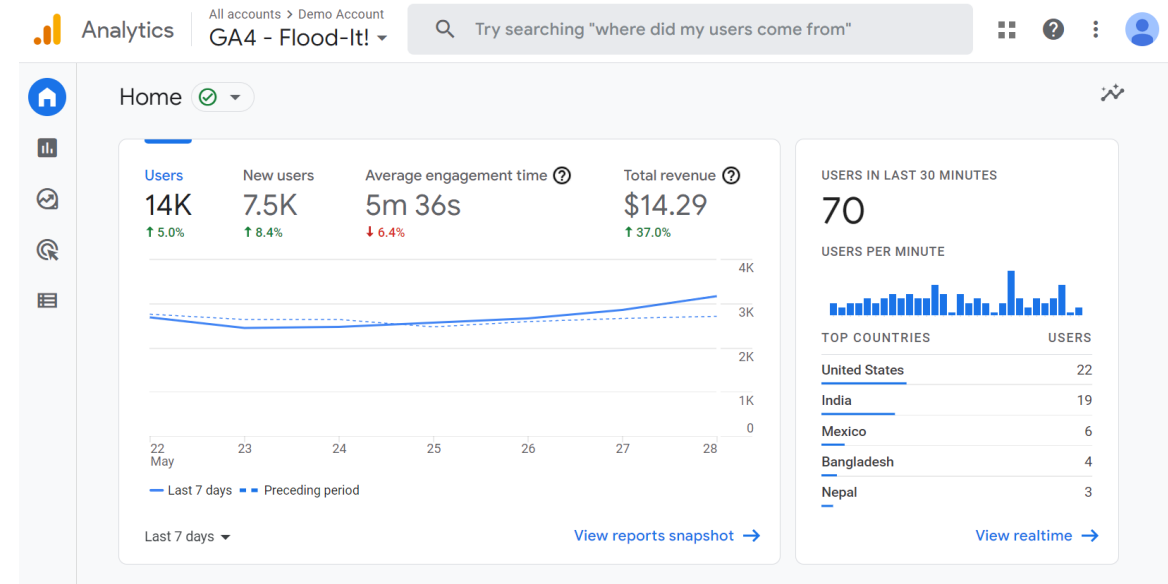
About Shawn Livengood



- Digital Marketing Supervisor at RSM US.
- Digital Marketing professional for 12+ years.
- Master's Degree in Information Studies from the University of Texas at Austin.
- Passionate about web analytics!
- Lives on the Oregon Coast, and is also passionate about remote working!

What Is Google Analytics 4?

- Google Analytics 4 (GA4) is the latest version of Google Analytics that improves data collection and configuration and allows for combined analytics of web + app properties.
- It will replace the current iteration of Google Analytics (Universal Analytics, or UA) on July 1st, 2023.






Why Upgrade?

- GA4 is better suited for the evolving web + mobile model of internet usage.
- Instances of Universal Analytics will stop collecting new data on 7/1/23, so it is imperative that all users of Google Analytics upgrade to GA4 before then.
- Implementing GA4 involves creating a new GA property, which begins a new record of historical data. The sooner you upgrade, the more historical data you will have.
- More details: <https://technologyblog.rsmus.com/ecommerce/why-you-should-upgrade-to-google-analytics-4/>

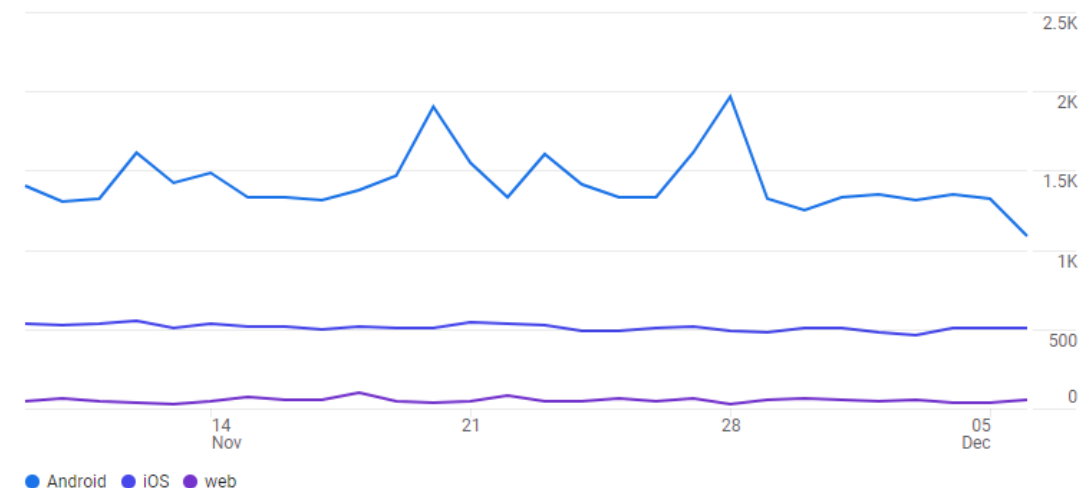
GA4 vs. Universal Analytics: Data Streams

One major change in GA4 is the idea of “streams.” Universal Analytics tracks data from wherever you installed the universal tracking code snippet. GA4 distinguishes between web, iOS, and Android traffic data streams.

Data Streams

All	iOS	Android	Web	Add stream
	Flood-It! Android com.labpixies.flood	Receiving traffic in past 48 hours.	>	
	Flood It! iOS com.google.flood2	Receiving traffic in past 48 hours.	>	
	Flood-It! Web http://flood-it.app	Receiving traffic in past 48 hours.	>	

Users by Platform over time



GA4 vs. Universal Analytics: Hits and Events

Another major change between UA and GA4 is hit types. UA had a variety of hit types: a hit could be a page view, an event, eCommerce transactions, user interactions, etc. In GA4, **every hit is an event**. This greatly simplifies user action tracking in the platform.

Some hit types are [captured automatically in GA4](#). In Universal Analytics, custom events needed to be configured to track these actions. Automatically generated events in GA4 include:

- Clicks on external links
- File downloads
- In-app purchases
- Site searches
- Video starts

In a Universal Analytics property, a hit type ...	is captured in a Google Analytics 4 property as an ...
Page View	Event
Event	Event
Social	Event
Transaction/e-commerce	Event
User timing	Event
Exception	Event
App/screen view	Event

Universal Analytics vs. GA4

Feature	Universal Analytics	GA4	Notes
Hit Tracking	Multiple categories	Everything is an event.	Event tracking is simplified so that only one type of hit (event) is recorded in GA4. Most notably, ecommerce transactions are no longer their own type of "hit" and are now classified as an event.
Event Labeling	Category, Action, and Label	Events are not labeled, but you can create custom parameters and user properties to add more depth to your reports.	Customers that rely on Category, Action, and Label in their current reporting model will need to rethink how they track events in GA4.
Automatically Collected Events	None	https://support.google.com/analytics/answer/9234069	Some events in GA4 are collected automatically and do not require configuration.
Web + App Tracking	Web Only	Web + App	
Session Measurement	Counts page views, events, social interactions, and ecom transactions.	Only counts the new session_start event.	Session tracking is more streamlined in GA4, but can lead to session discrepancies in UA/GA4 profiles for the same website.
Session Counting Window	Counts hits up to 4 hours late	Counts hits up to 72 hours late	
User Activity Detection	Requires configuration	Automatic	
User ID Tracking	Requires separate User ID reporting view	Incorporates User ID natively	

GA4 REPORTING – LIVE DEMO



If you have a Google Analytics account, follow the instructions on [this page](#) to add a GA4 demo account to your login so you can get familiar with how GA4 reporting works.

INSTALLING GA4 VIA GOOGLE TAG MANAGER (GTM)



GA4 Installation Process

1. Create a GA4 Property
2. Set up your Data Streams in GA4
3. Set up your GA4 Configuration Tag in Google Tag Manager. Use your measurement ID and set this tag to fire on all pageviews.
4. Set up GA4 event tags for each user action you want to track.
 - Fire triggers to activate your tags (you might be able to re-use triggers you had for UA!)
 - Pull in information from variables to populate reports.

Installing GA4 Via Google Tag Manager (GTM)

While it is possible to install GA4 by adding a code snippet directly to your website, I highly recommend using [Google Tag Manager](#) as your installation method. This makes both the installation process and the event tag setup much easier and is more efficient in the long run.

GTM uses Tags, Triggers, and Variables to capture data from your site and send this data to Google Analytics or other platforms for use in reporting.

Tags are snippets of code that execute on a website or app. When executed, they send information to another platform (like Google Analytics) for measurement.

Triggers are specific conditions on which a tag will activate. Common triggers are purchases, lead form completions, and newsletter signups.

Variables capture specific data that is stored and then used to populate reports. You can capture variables from your data layer, calculate your own metrics in a variable, or store information from your website, like a page URL.

Install GTM base container code on your website

Add your GA4 configuration tag as your first tag

Set up a trigger to fire your configuration tag on every page view

Set up additional event tags that fire on different triggers, like purchases, file downloads, or lead forms.

GA4 Base Tag Installation

Choose tag type

Discover more tag types in the Community Template Gallery

Featured

- Google Analytics: Universal Analytics
Google Marketing Platform
- Google Analytics: GA4 Configuration**
Google Marketing Platform
- Google Analytics: GA4 Event
Google Marketing Platform
- Google Ads Conversion Tracking
Google Ads
- Google Ads Remarketing
Google Ads
- Floodlight Counter
Google Marketing Platform
- Floodlight Sales
Google Marketing Platform
- Conversion Linker
Google
- Google Optimize
Google Marketing Platform
- Google Surveys Website Satisfaction
Google Marketing Platform
- Featured Community CMP Templates
Discover featured CMP templates that deeply integrate with GTM's consent configuration

Tag Configuration

Tag Type

Google Analytics: GA4 Configuration
Google Marketing Platform

Measurement ID ?

G-1J5H617MC0

Send a page view event when this configuration loads

Send to server container ?

> Fields to Set

> User Properties

> Advanced Settings

Triggering

Firing Triggers

All Pages
Page View

GA4 Event Tag Installation

Choose tag type

Discover more tag types in the Community Template Gallery

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Tag Configuration

Tag Type

Google Analytics: GA4 Event
Google Marketing Platform

Configuration Tag ?

GA4 Configuration Tag

Event Name ?

event_name

> Event Parameters

> User Properties

> Advanced Settings

Triggering

Choose a trigger to make this tag fire...

[Learn More](#)

GA4 Event Tag Installation – Parameters & User Properties

Tag Configuration

Tag Type
Google Analytics: GA4 Event
Google Marketing Platform

Configuration Tag
GA4 Configuration Tag

Event Name
Purchase

Event Parameters

Parameter Name	Value
transaction_id	{{SCA.GoogleTagManager.Variable.Data.Transactic}}
value	{{SCA.GoogleTagManager.Variable.Data.Transactic}}
tax	{{SCA.GoogleTagManager.Variable.Data.Transactic}}
shipping	{{SCA.GoogleTagManager.Variable.Data.Transactic}}

Add Row

User Properties

Property Name	Value
user_location	{{(user-geolocation)}}

Add Row

Set up parameters here...

...and they show up in reports here.

EVENTS IN LAST 30 MINUTES
1,284

PARAMETER NAME

PARAMETER NAME	COUNT	%
engagement_time_msec		
entrances	83	13%
firebase_event_origin	31	5%
firebase_previous_class	28	4%
firebase_previous_id	25	4%
firebase_previous_screen	22	3%
firebase_screen		

View realtime →

GA4 TAG SETUP – LIVE DEMO



Q & A

Find me on LinkedIn: <https://www.linkedin.com/in/slivengood/>

Email me with questions/comments: shawn.livengood@gmail.com