Everything You Always Wanted to Know About Cohorts (But Were Afraid to Ask)

Introducing the User Metrics API

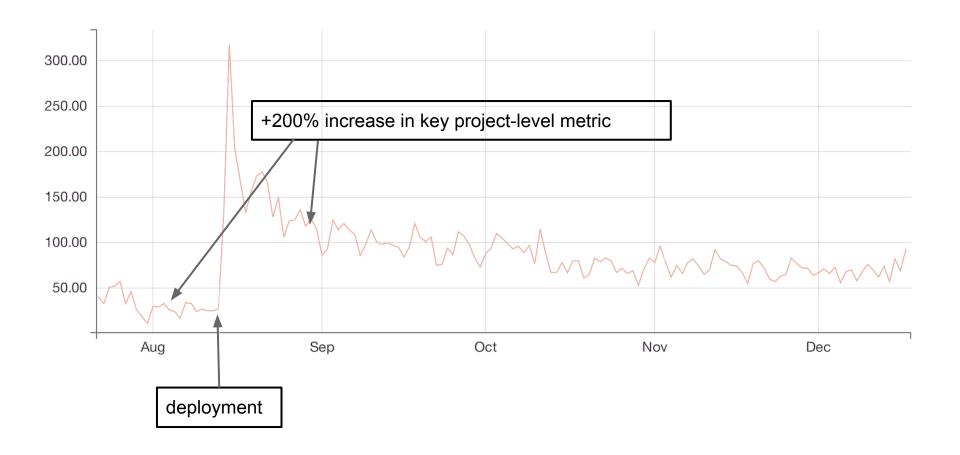
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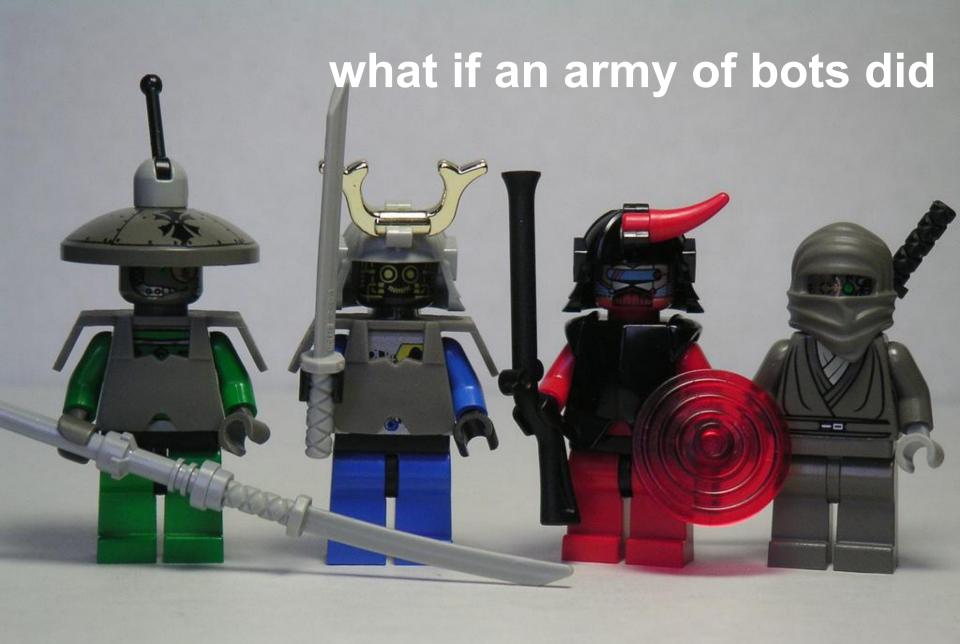
Monthly Metrics Meeting, March 7 2013

Problem

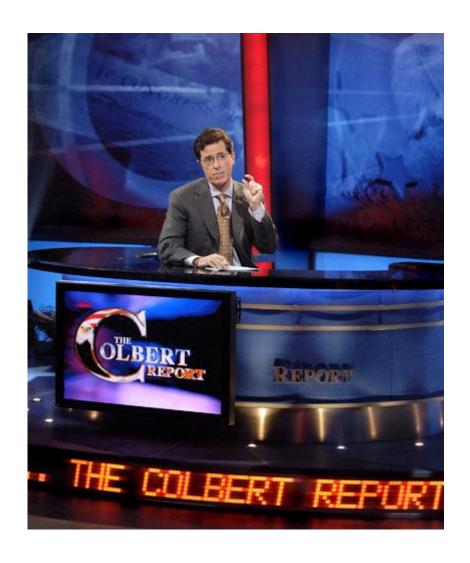
How do we know if any {program, experiment, new feature} we run to engage new editors is actually working?



did we really cause this?



what if some external event did



Cohort analysis

Measure the productivity of a cohort: a group of users sharing the same characteristic or undergoing the same treatment



What if we could

1. define a **cohort** from a list of editors

Examples

- users in an E3 experimental group
- students enrolled in a Global Education course
- members of a Wikiproject
- new editors with 10+ edits in their first month
- new users registered on mobile devices
- VisualEditor adopters

What if we could

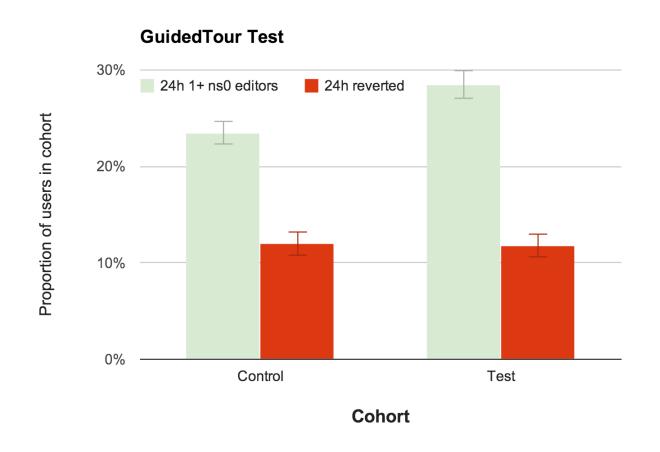
2. measure the {quality, productivity, retention} of these users via a **standard set of metrics**

threshold

measures whether a user reached a given level of activity (a number *n* of edits) within a specific time *t* since registration, in a given namespace.

What if we could

3. compare this cohort to a (meaningful) baseline.



Introducing the User Metrics API

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User Metrics API

Welcome to the Wikimedia Foundation's user metrics API homepage. This API allows you to select a set of users, also known as a "cohort" (for example, all users who signed up via the Thank You campaign), select a metric to be computed for each of these users (for example, their 7-day revert rate) with optional parameters (for example, a registration time range) and retrieve the response in JSON format.

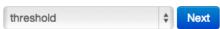
You can also compute a single, aggregate value for the cohort (like the mean revert rate for these users)

Learn more

List of cohorts



List of available metrics



Additional parameters

- · Date start date start
- Date end date_end
- · Aggregator function aggregator

Choose a Cohort.
Check the Job Queue.
See all generated requests.
View the tag definitions for cohorts.

Introducing the User Metrics API

- Standardized set of metrics, backed by extensive research and crash-tested with multiple experiments run by the E3 team.
- Supports cohorts from any Wikimedia project, beyond enwiki (including referral campaigns).
- Optimized **performance** for fast extraction of computationally demanding metrics from thousands of users.
- Returns both **individual and aggregate metrics** thanks to multiple aggregator methods. Supports **time series**.
- Easily **extensible** and fully parametrized (metrics can be fine-tuned, default parameters overridden as needed)

Get in touch

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Project home

https://github.com/wikimedia/user_metrics