Technology for growth
The future of mobile editing
Why mobile?
Traffic has shifted

In December 2017, mobile pageviews overtook desktop pageviews.
Mobile editing is growing

During 2018, of the top 20 wikis:
- 10 had more than 10% of edits coming from mobile
- 2 have more than 20%

For **some** of these **wikis**, **mobile editing** has **increased** by more than 20% since last year.
Preferences and access

For a growing number of people, mobile is their preferred or only device for contributing.

This is crucial to community growth: we need to meet contributors where they are and where they prefer to be.
But... mobile not optimised for editing

- Important editing functionality not available or hidden
- Special pages were broken
- Core editing features were unusable
- Editing was not accessible to newcomers
Key questions

- What needs to be considered before mobile VE is the first editor newcomers see?
- How do we build for contributors with different levels of experience?
Two approaches

1) Make common editing workflows simpler on mobile

2) Expand the functionality to more closely resemble the desktop version of the site
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Why visual editing?

“I find that VE has cut my Editathon training time in half: you don't have to explain, and reinforce the skills of adding things like references or bolding.”

“As a volunteer in Ecuador, I only recommend using VE to the newbies that attend our events. It's just inconceivable to me to even try to train people to learn code in 2018.”

“In the last few years, I've always recommended new editors to immediately turn on the VE in their preferences.”
Mobile wikitext typing race

Open a blank document/email on your phone...
[[Cats & dogs|rain]] {{cn}}
VisualEditor was built with mobile support in mind

- Uses ContentEditable edit surface (unlike Google Docs)
- Avoids desktop-only interactions, such as mouse hover or keyboard arrows
- Flexible UI architecture
The end
The end
Listening, watching, and testing

Service blueprint of Contributor journey,
Jess Klein CC0
Design principles

1. Do one thing at a time
2. Set the stage
3. Reduce stimulation
4. Work efficiently
Problem:
The editor feels slow to load
Solution

A smoother transition between reading and editing.
Problem

It’s hard to find what you want to edit.

Stockholm has hosted the Stockholm Open, an ATP World Tour 250 series professional tennis tournament annually since 1969. Each year since 1995, the tournament has been hosted at the Kungliga tennishallen.\footnote{78}

**Cuisine**

There are over 1000 restaurants in Stockholm.\footnote{79} As of 2019 Stockholm boasts a total of ten Michelin star restaurants, two with two stars and one with three stars.

**Yearly events**

[Stockholm Marathon, near Kungsträdgården in 2008]
Cuisine

There are over 1000 restaurants in Stockholm. As of 2019, Stockholm boasts a total of ten Michelin star restaurants, two with two stars and one with three stars.

Solution

Remove all distracting text to allow for editing of this section.
Performance

~40% faster in some cases

Example: Article of the day on a Nexus 5X
Problem

The editor feels cramped.
Solution

Create more space by changing how and where edit actions are shown.
Problem

Editors can’t find the tools they need.
Solution

A single toolbar with all tools visible.
Switches seamlessly with changes  Switches into a different mode  Can't switch without losing changes  Prompts before switching with changes

<table>
<thead>
<tr>
<th>Visual</th>
<th>Desktop</th>
<th>Mobile</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Full doc</td>
<td>Section*</td>
</tr>
<tr>
<td></td>
<td>Unmodified</td>
<td>Modified</td>
</tr>
</tbody>
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* Desktop section editing written by not yet enabled (T221908), arrows show potential behaviour
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Results

- 78% increase in edit completion rate
- 95% increase in number of edits
- 17% reduction in revert rate
- Strong positive responses in user testing
- 3% edit completion increase when we A/B tested a single intervention, section editing
Where next?
Visual first on mobile for new users

- A/B test in progress
- Preferred editor remembered for existing users
Two approaches

1) Make common editing workflows simpler on mobile

2) Expand the functionality to more closely resemble the desktop version of the site
Advanced mode on mobile demo
Background

In the past, **editing on mobile was extremely limited**, special pages were unavailable and a lot of editors had to resort to using the desktop version of the site on their phones.
What is Advanced Mode?

Advanced mode is a feature set that adds contributor features to the mobile web website. Advanced mode expands the navigation and adds access to special pages to more closely resemble the desktop version of the site.
Our process

1. Interviewed editors at the hackathon and Wikimania
2. Collected and prioritized a list of missing features
3. Worked on adapting them to mobile in an easy and quick way
4. Created prototype and gathered feedback from more than 60 editors

57 Positive/support
4 Neutral
0 Negative/oppose
Features
Pluto (minor planet designation: 134340 Pluto) is a dwarf planet in the Kuiper belt, a ring of bodies beyond Neptune. It was the first Kuiper belt object to be discovered and is the largest known plutoid (or ice dwarf).
Stockholm (Swedish pronunciation: [ˈstɔ̂kholːm] (listen)) is the capital of Sweden and the most populous urban area in the Nordic countries, with 1.6 million people living within the metropolitan area. Approximately 1.6 million people live in the municipality, and 2.4 million in the metropolitan area. The city stretches across fourteen islands where Lake Mälaren flows into the Baltic Sea. Outside the city to the east, and along the coast, is the island chain of the Stockholm archipelago. The area has been settled since the Stone Age, in the 6th millennium BC, and was founded as a city in 1252 by Swedish statesman Birger Jarl. It is also the county seat of Stockholm County, which is Sweden's most populous county.
Recent changes

Recent changes
This is a list of recent changes to Wikipedia.

Recent changes options
Show last 50 | 100 | 250 | 500 changes in last 1 | 3 | 7 | 14 | 30 days
Hide registered users | Hide unregistered users | Hide my edits | Show bots | Hide minor edits | Show page categorization | Show Wikidata | Hide probably good edits
Show new changes starting from 22:50, 13 September 2018

Tag filter:

13 September

List of abbreviations (help): [hide]

16 August 2019
(diff | hist) List of T.U.F.F. Puppy episodes
14:21 -8 2602:306:cebf:49a0:75ef:99c0:81b3:c50b (talk)

(diff | hist) Talk:Touch the Sky (Kanye West song)
14:21 -6.887 Another Believer (talk | contribs)
Watchlist
*coming soon

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Namespace: [all] Invert selection Associated namespace

Tag filter: Show

16 August 2019
(diff | hist) List of T.U.F.F. Puppy episodes
14:21 -8 2602:306:cebf:49a0:75ef:99c0:81b3:3c50b
(talk)

(diff | hist) Talk:Touch the Sky (Kanye West song)
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Demo:
Advanced mode
# Deployments

Started with wikis with large mobile editing rates, where smaller changes would be **useful immediately**:

<table>
<thead>
<tr>
<th>Stage 1: basic functionality</th>
<th>Stage 2: medium functionality</th>
<th>Stage 3: full functionality</th>
</tr>
</thead>
<tbody>
<tr>
<td>Spanish Wikipedia</td>
<td>Japanese Wikipedia</td>
<td>All other Wikis</td>
</tr>
<tr>
<td>Arabic Wikipedia</td>
<td>Italian Wikipedia</td>
<td>Outreach</td>
</tr>
<tr>
<td>Indonesian Wikipedia</td>
<td>Persian Wikipedia</td>
<td>Further data analysis and improvements</td>
</tr>
<tr>
<td></td>
<td>Thai Wikipedia</td>
<td></td>
</tr>
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Metrics and feedback

- Overwhelmingly positive feedback on prototype
- Retention is currently at 81% (our target was 60%)
- Now that we’re deployed everywhere, we will be looking at:
  - Feature retention on all wikis for target audience
  - Increase in moderation actions on mobile (undo, rollback, blocking, unblocking, etc)
  - Increase of pageviews to special pages on mobile
After Advanced Mode

- What AMC functionality should we move to all logged-in users?
- How does this work inform and feed into upcoming changes to the desktop experience?
Discussion prompts:

- Which features from advanced mode would benefit all logged-in users?
- How can we bring our learnings back to desktop?
- What needs to be considered before mobile VE is the first editor newcomers see?
- How do we build for contributors with different levels of experience?
Discussion
Attribution

Text and images from screenshots of the following pages:

- [https://en.wikipedia.org/wiki/Pluto](https://en.wikipedia.org/wiki/Pluto)
- [https://en.wikipedia.org/wiki/Fran%C3%A7oise_Hardy](https://en.wikipedia.org/wiki/Fran%C3%A7oise_Hardy)

Additional images

- [https://commons.wikimedia.org/wiki/File:People_concentrating_on_phones.jpg](https://commons.wikimedia.org/wiki/File:People_concentrating_on_phones.jpg) Rawpixel [CC0]