

User Testing

User Testing Report

Overview

As part of our quality assurance and usability evaluation, we conducted user testing sessions with **30 participants** from diverse professional backgrounds, including **traffic engineers**, **data analysts**, **software engineers**, **marketing professionals**, **and laypersons**.

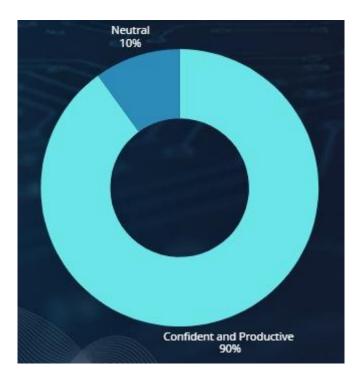
The goal was to assess user satisfaction, usability, and productivity when interacting with the *Swift Signals* application.

Actual Google form questionnaire:

https://forms.gle/4ugcTusRCHX5Wik49

Key Findings

- Overall Satisfaction Rating: 4.54 / 5
- Confidence & Productivity:
 - o 27 users reported feeling **confident and productive** while using the application.
 - o 3 users reported feeling **neutral**.



What Users Liked Most

Participants highlighted the following as their favourite aspects of *Swift Signals*:

- **User-Friendly Interface** easy to navigate and intuitive.
- **Map Selection for Intersections** users enjoyed the interactive way of creating intersections.
- Frontend Layout and Design praised for being visually appealing and well-structured.

User Suggestions & Implemented Fixes

Suggestion	Action Taken
Chart titles not visible in light mode	Fixed – titles now display correctly.
Add tooltips in "Create Intersection" modal	Implemented – tooltips now available.
Map intersection selection overriding intersection name	Fixed – names are preserved correctly.
Add password constraints on signup page	Implemented – stronger password rules enforced.
Replace raw backend errors with user- friendly messages on signup	Fixed – clear and readable error messages now displayed.
Hide Users page for non-admins	Implemented – page is only accessible to admins.
Some tutorials displaying errors	Fixed – tutorials are now context-specific and restricted where necessary.

Conclusion

The Swift Signals application received **high satisfaction ratings** and positive feedback across a diverse group of testers. Users particularly valued its **ease of use, modern design, and interactive map features**.

All identified improvement areas have been addressed, ensuring that the application is now more **user-friendly**, **accessible**, **and reliable**.

The feedback collected during this testing phase has been invaluable in refining *Swift Signals* and will continue to guide future improvements.

