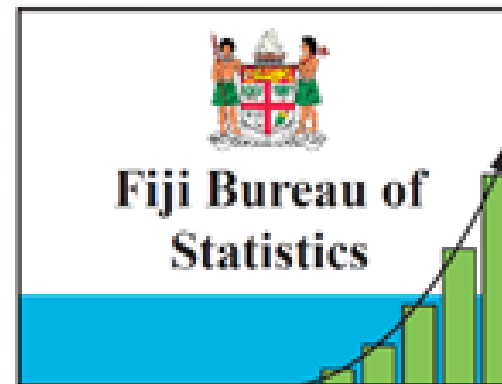


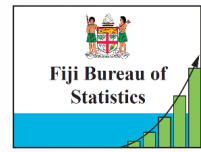
UTILIZATION OF ICT FOR OFFICIAL STATISTICS



COMPUTER-ASSISTED PERSONAL INTERVIEW
USING SURVEY SOLUTIONS FOR THE FIJI 2017 POPULATION
AND HOUSING CENSUS

FIJI BUREAU OF STATISTICS

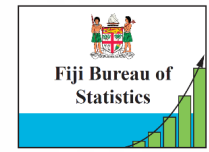




CONTENTS

- Introduction
- World Bank Survey Solutions
- Data Collection Using Survey Solutions
- Monitoring Process
- Interviewer
- Supervisor
- Headquarter (Census Progress)
- Highlights / Challenges

INTRODUCTION



Census data collection history

Manual process: Paper-based questionnaire

- manual counting
- Use of computers for manual data entry
- Scanning

CAPI: Computer Assisted Personal Interview

- Result of advanced technology and improved network infrastructure
- Use of Laptops / Hand-held device / Tablets / phones
- Availability of software – CPro (android version), Survey123, WB Solutions and many others

WB SURVEY SOLUTIONS

- Enables better communication between the enumerators and supervisors - monitoring
- Enables more reliable statistics due to checks performed during the interview
- Enables more up to date statistics due to a reduced time lag between data collection and data analysis.

WB SURVEY SOLUTIONS – CONT.’

- Used worldwide with million populations
- Use Android devices - tablets/phones etc.
- Main Components
 - Questionnaire Designer
 - Tester Application
 - Server
 - CAPI tablets (Interviewer)
 - Supervisor
 - Headquarters

QUESTIONNAIRE DESIGNER

- Free registration - <https://solutions.worldbank.org>
- User-friendly, easy to design questionnaires
- Uses structural design for easy flow of information and capturing
 - Use of rosters and even rosters within rosters
 - Use of sections and sub-sections
 - Free uses of titles for easy reference
- Uses C language for the skips, logics and filtering questions.

TESTER APPLICATION

- Downloaded from App Store
- Test your questionnaire while designing
- Test skip patterns, logic checks, filtering questions etc. etc.
- Test flow of information – consistent and clear
- Android-based apps available for computers e.g. BlueStack
- No data is saved – only a tester

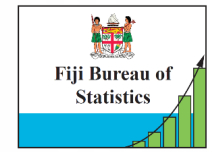
WORLD BANK SERVER

- FREE – will need administrators to coordinate with WBSS technical staff for access and usage
 - Hosted in the cloud - amazon
 - Could have free space for trial and testing
- Upload final version of the questionnaire
- Data is stored – encrypted, safe and secure
- Administrator assigns users – enumerators, supervisors, headquarters
- Easy to download data whenever required

DATA COLLECTION

- 3 Main components of data collection
 1. Interviewer App (tablet)
 2. Supervisor Interface (tablet or computer)
 3. Headquarters (tablet or computer)

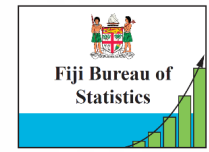
MONITORING - INTERVIEWER



- Interviewer
- Data collection in the field
- Validation checks in the questionnaire – skips, logics and filtering. Ease in filling in the information.
- Use of different screen colours to differentiate data input
 - RED – has errors
 - BLUE – not completed
 - GREEN - completed
- Allows to continue data entry if there is error
- Shows data summary before synchronizing
 - - Number of completed questions
 - - Number of errors
 - - Number of unanswered questions
- Can continue data entry without internet access?
- Yes and No
 - Yes, can continue data entry without internet
 - No, need internet to login/sync

MONITORING - SUPERVISOR

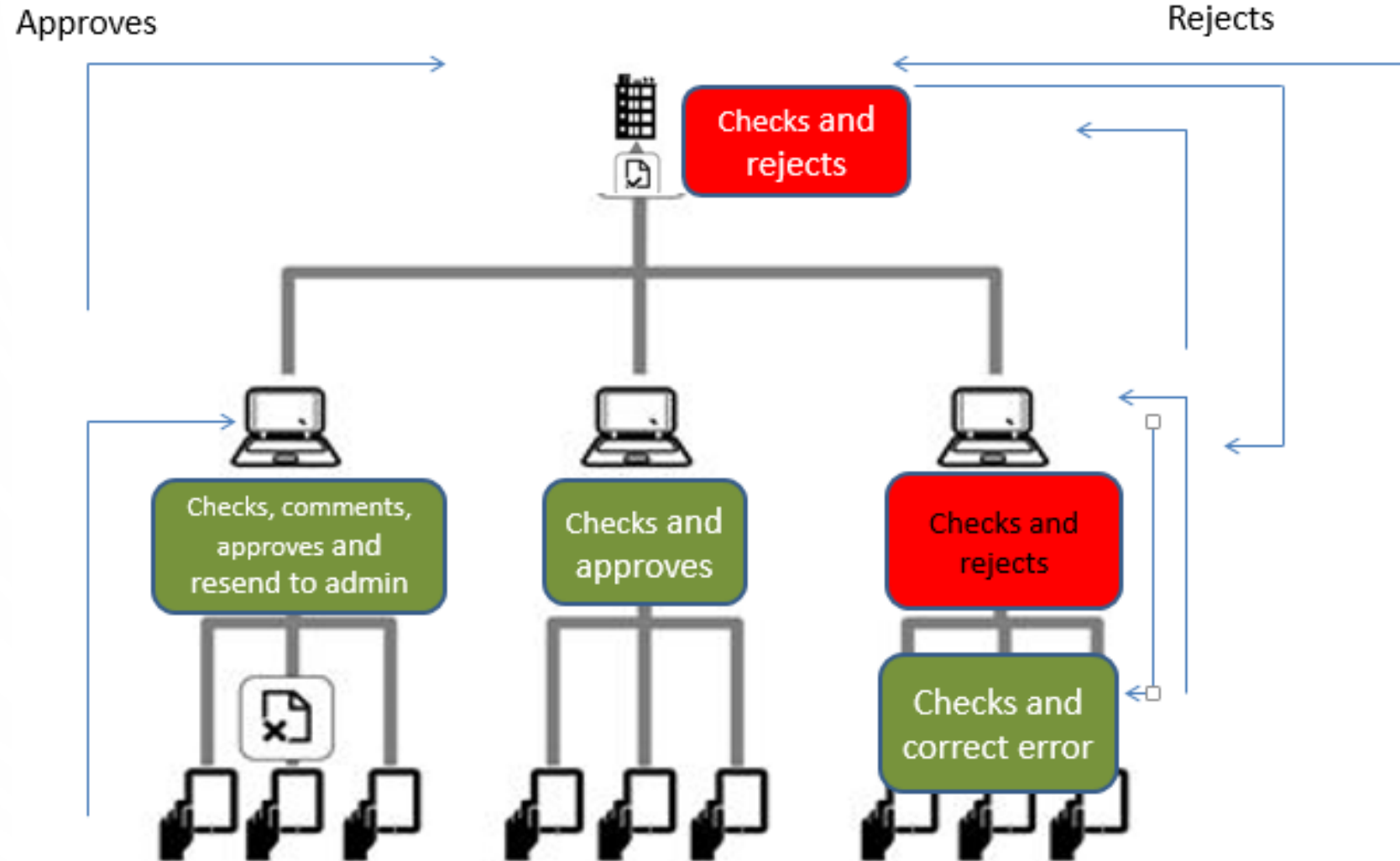
- Supervisor monitoring
 - Monitors his/her enumeration team
 - Monitors progress and performance of each enumerator
 - * Number of households completed
 - * How long it takes to complete each household
 - * Number of errors submitted / unanswered questions
 - * Enumerator connection – has started or not
 - * Rejects and approves questionnaire
 - * Make comments/instructions/solutions on errors
 - * Keeps a record of all the comments



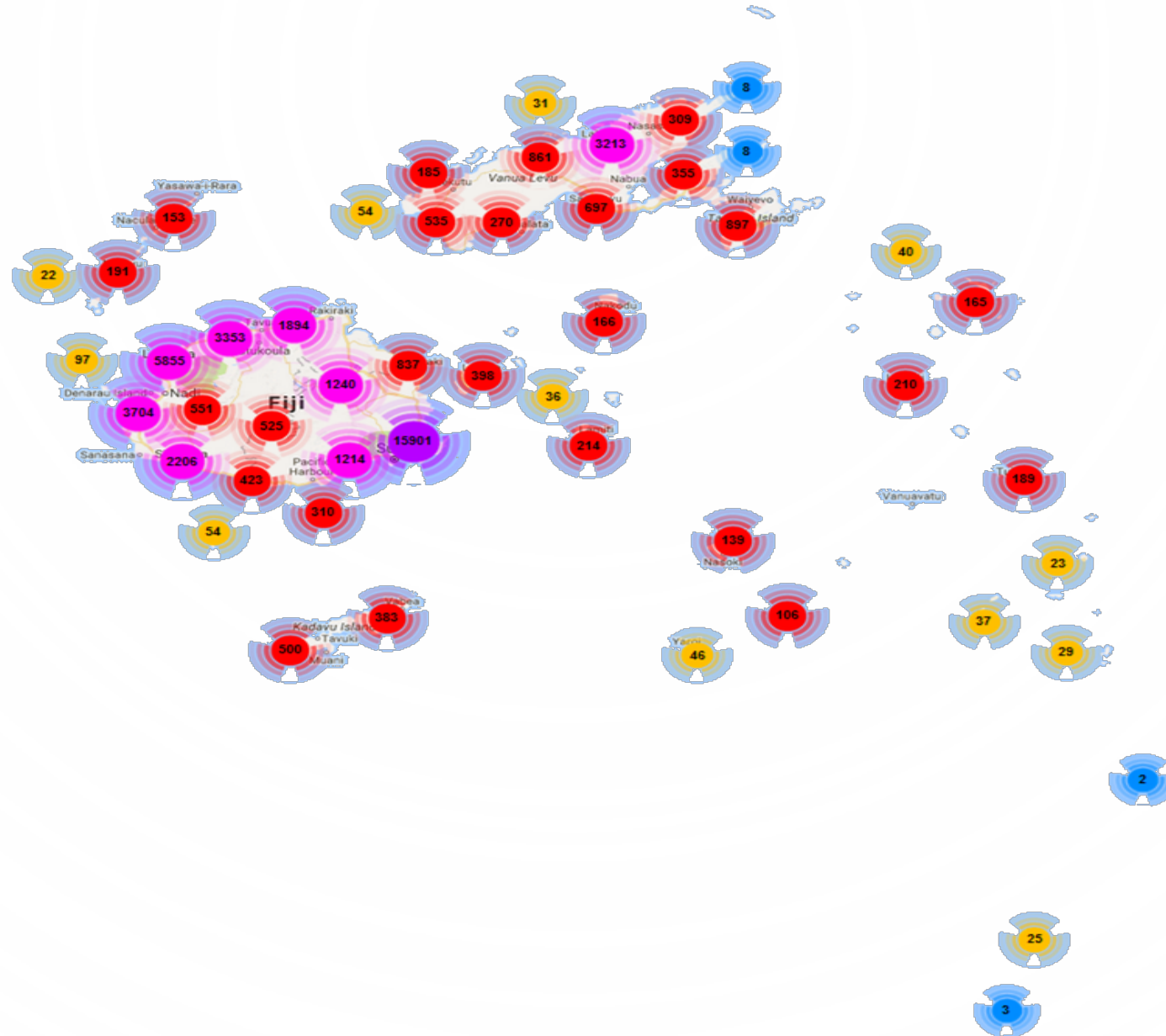
MONITORING – HEADQUARTER

- Headquarter monitoring
 - Monitors the supervisors performance
 - They have access to the questionnaires as well
 - They will only action once the supervisor approves a questionnaire
 - Have same access as supervisor on interviewers but with extra functions:
 - *Map GPS points on map
 - *Generate graph of progress
 - *Export data anytime – delimiter, STATA, SPSS

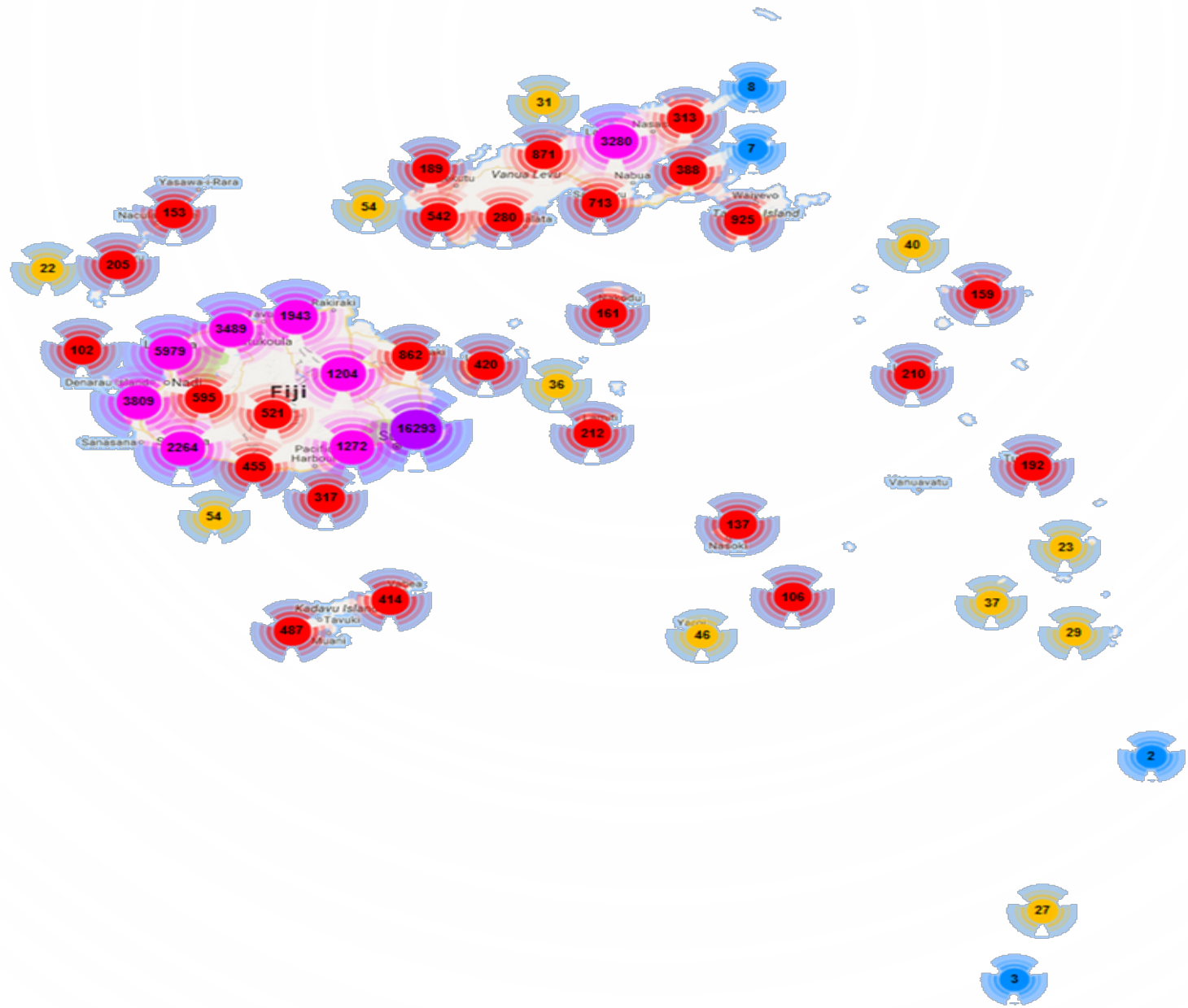
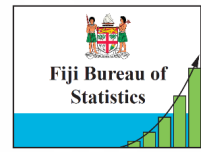
SCENARIO – MONITORING



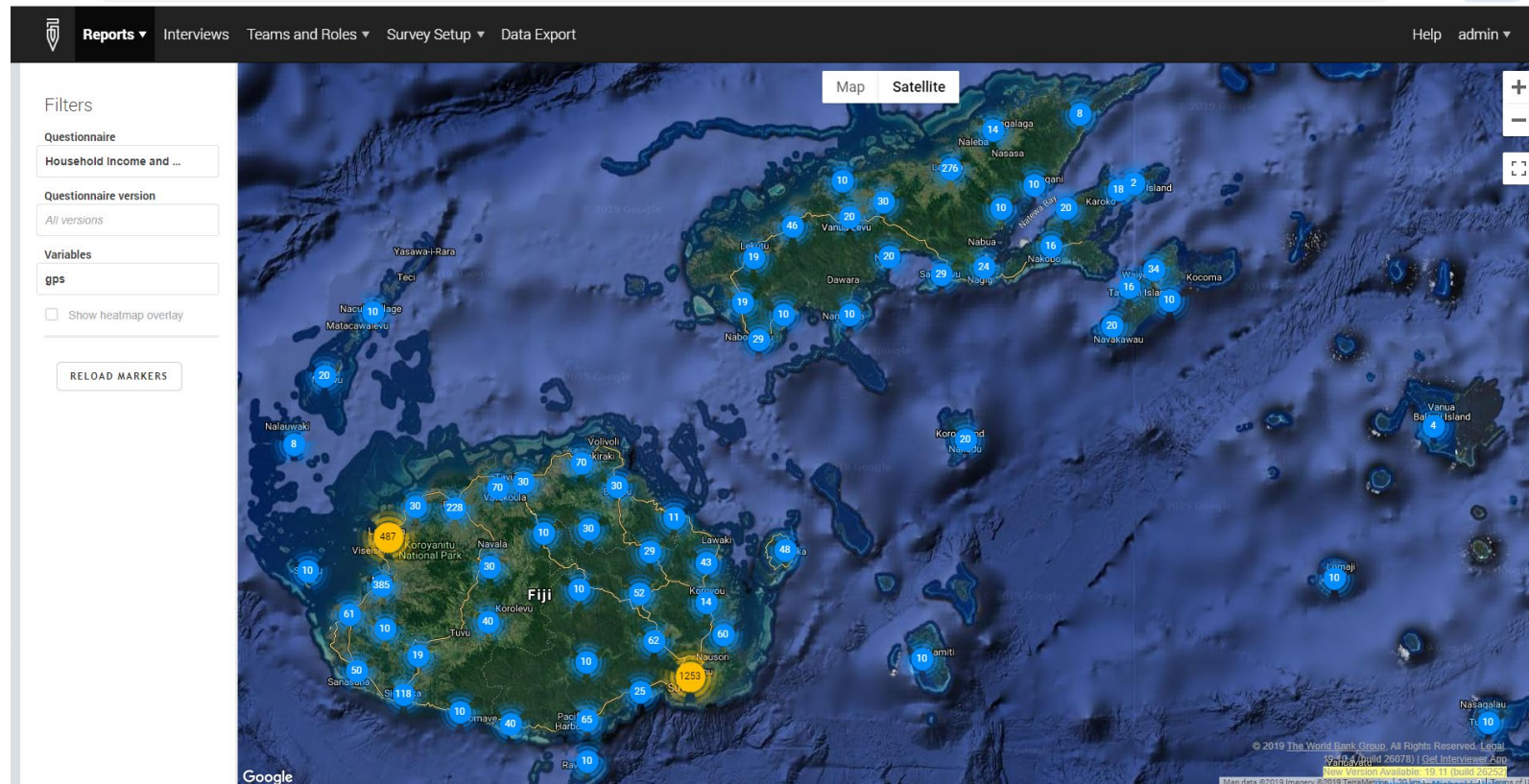
CONT...DAY 3



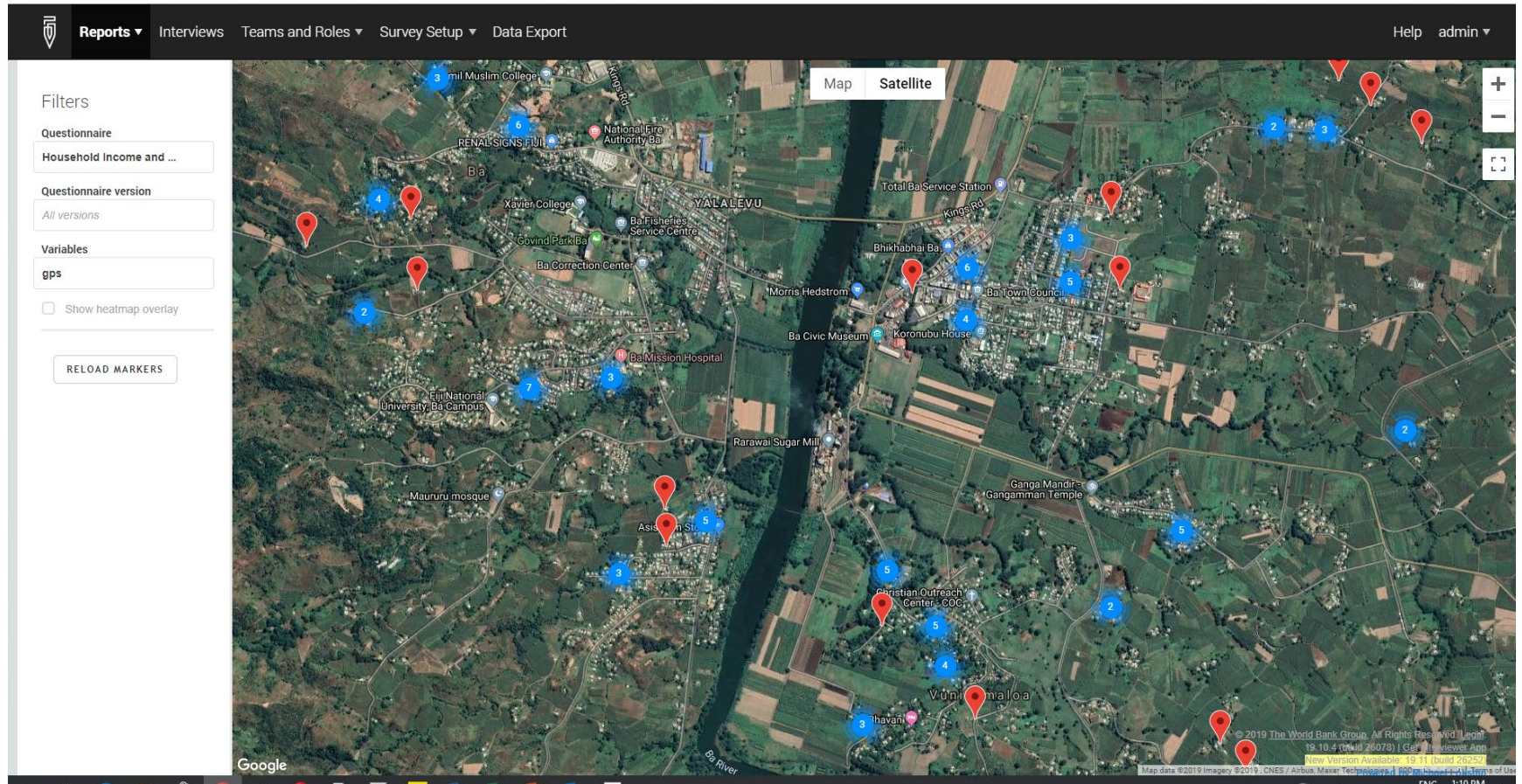
CONT...DAY 4



SATELLITE VIEW



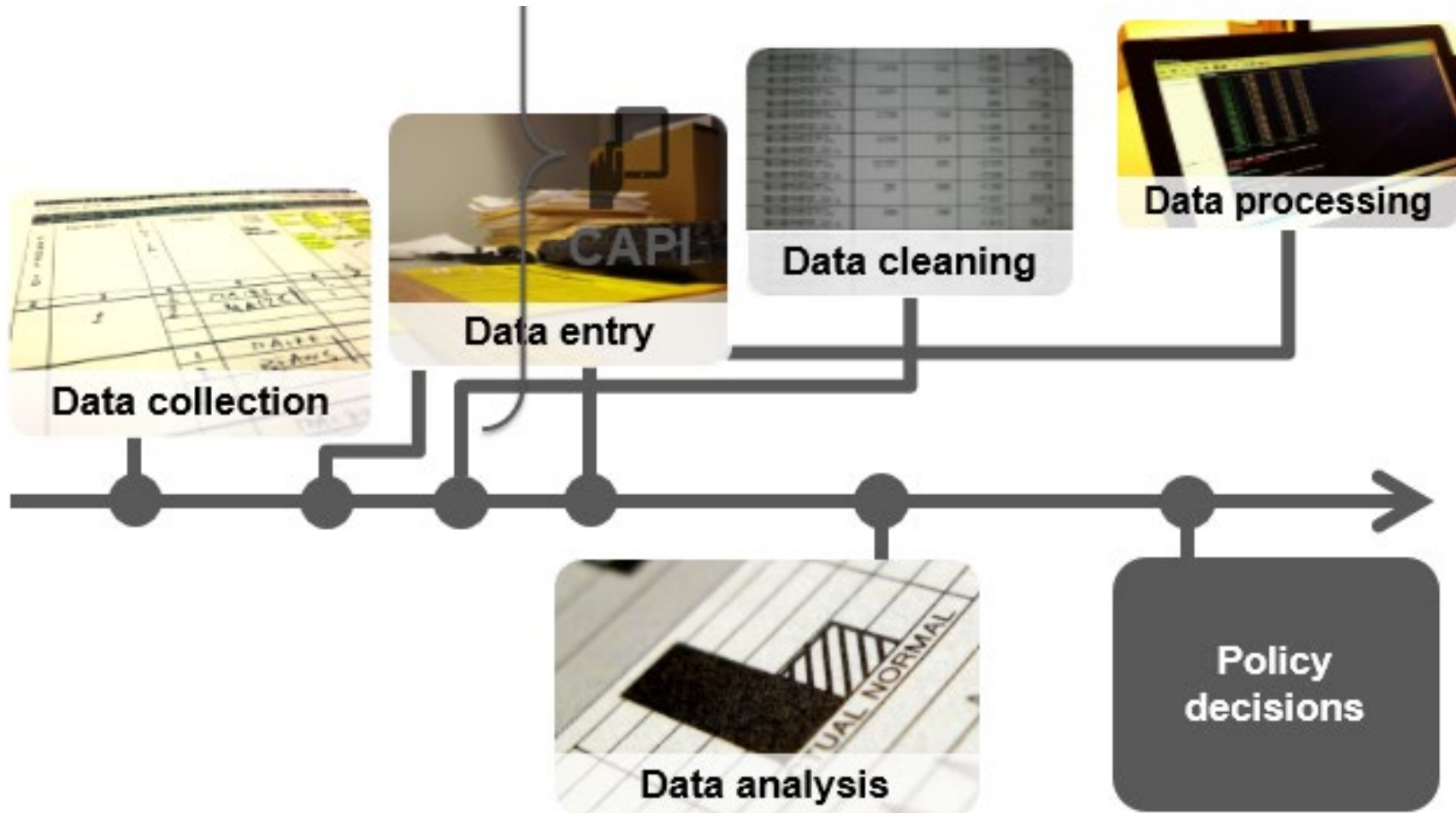
MONITOR THE SURVEY BY CHECKING THE GPS LOCATION OF WHERE AND WHEN THE INTERVIEW TOOK PLACE.



OTHER MONITORING TOOLS

- Photo of dwelling
- APN (Access Point Name)
 - Lock updates
 - Block the use of other apps – Facebook, YouTube etc.
 - Daily report updates on data usage for each enumerator and supervisor
- CUG – Closed User Group using Network service provider in your area.
 - Improved communication
 - Efficiently address issues in the field

TIMELINESS

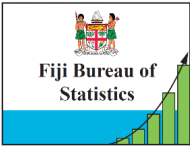


From data collection to policy: 2-3 months

HIGHLIGHTS / CHALLENGES

- Improve data quality by correcting survey process during the field operation
- System records all events with timestamps that happen on a tablet: Data entry, Data correction, Responsibility changes, etc.
- Analysis of time per interview, time per question, section.
- Changes in productivity over time, for different interviewers, teams
- Quality control, monitoring and evaluation
- Put all the checks in the questionnaire, data is almost edited and final when field work is completed.

HIGHLIGHTS IN SUMMARY



Ensure data quality and comparability

Allow collection of new types of information/data

Cost-effective, sustainable solution for NSOs



Improve timeliness of data collection

THANK YOU

