**Server-side Development Guide (AWS)**

**Database:**

We are using MySQL 8.0 on AWS RDS. Please create the following three tables.

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**Storage:**

We are using AWS S3. Please create two folders, qrcodes and zips, under your project**.**

**Graphical user interface, text, application

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**Instance:**

We are using AWS EC2 on which we do two things: hosting a Flask based portal webpage and converting periodic keys to a special formatted ZIP file. To achieve the second goal, you will need to set up the GO environment and use Google’s sample code. The aim of adding this step is to make sure HMS keys are compatible with GMS and iOS keys, thus make contact tracing via mobile devices more practical. Here are some guide to set up the environment.

Download GO language and set GO environment

Update yum: sudo yum update

Install wget: sudo yum install wget

Download GO: wget <https://golang.org/dl/go1.14.6.linux-amd64.tar.gz>

UnZIP: tar -xzf go1.14.6.linux-amd64.tar.gz

Export path: vi ~/.bash\_profile

* add two lines to the bash\_profile
* export GOPATH=$HOME/go
* export PATH=$GOPATH/bin:$GOROOT/bin:$PATH

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Source Profile: source ~/.bash\_profile

Check installation: go

Here we go:

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Clone Google’s sample server: git clone https://github.com/google/exposure-notifications-server.git

Generating a Public-Private Key Pair: <https://github.com/google/exposure-notifications-server/blob/main/examples/export/README.md>

**Serverless Functions:**

We use lambda Functions for Python3. You can find all the codes in lambda\_functions.py. Be sure to replace the database configurations and the invoke URL of function verify tan in Function upload periodic keys.