Tianyu Meng
Android Developer

Saint Charles, IL - Email me on Indeed: indeed.com/r/Tianyu-Meng/4938b4c4713ebf1d

➢ Over 5 years of IT development experience including 4+ years of Android Mobile Applications development.
➢ Expertise in Android core application development, deep understanding of Activity, Service, Broadcast Receiver and Content Provider.
➢ Expertise in Google Cloud Message (GCM/FCM) and Bluetooth LE technology.
➢ Very Experienced in Server-Client / RESTful structure development.
➢ Experienced in new concepts in latest Android 6.0 (Marshmallow), such as Finger Print API, Runtime Permission, Accessibility etc
➢ Flexible in UI design, good knowledge of using Fragments, Tabs and Recycler View.
➢ Experienced in Multi-thread development, skilful in using AsyncTask, Intent service, handler
➢ Good understanding of Design Patterns like MVC, MVP, MVVM
➢ Has knowledge of Android security, such as Key Store, security in shared preference, has experience on security-oriented app.
➢ Master in Push Notifications and Notification Action handle.
➢ Experience in optimizing for multiple device screen sizes and Android versions
➢ Exploring different Google Service APIs. Worked with Ad Mob, GCM/FCM, Analytics and Maps in previous project.
➢ Comfortable to using third-party API. Worked with Face++ API's to do face recognition. (http://www.faceplusplus.com) . Has experience in social App integration, such as Facebook, twitter.
➢ Strong knowledge of SQL, JSON, HTML5 etc, which may need in Android app development. Has knowledge of C/C++ as well.
Willing to relocate: Anywhere
Authorized to work in the US for any employer

WORK EXPERIENCE

Android Developer
Altus Mobile - Fremont, CA - December 2015 to September 2016

Crossmatch is a world leader in biometric identity management solutions.
Description:
This application is designed as a Two-factor authenticator which can provide user a second-level password generated by user's secret. User can add his secret to the app by scanning the QR code given by issuer. After that, user will get a 6-digit pin code every 30 seconds. The pin code is generated by the secret and can be using to log in anything that also use this technique and share the same secret. (Check RFC 6238 time-based one time password). If the issuer is Crossmatch, then user can get more services like authenticating by using Bluetooth LE and push notifications. By using these two technologies, user even do not need to type in the 6-digit code manually. App will check if the user is registered and pop out the button to ask user if he wants to authenticate or not. Just a simple click on cellphone can make computer/workstation side signed in. The communication to the server side will be done through Wi-Fi/Bluetooth when using push notification/ Bluetooth LE.

Responsibilities:
• Implement the pin code generator based on algorithm mentioned in RFC 6238 time-based one time password.

• Design UI structure. Handle animation and data presenter. Make it works with different size of devices.
• Work out secure storage mechanism to save the user secrets, the key of the container will be encrypted and saved in the Keystore to make sure the secrets are safe.
• Implement the QR code Scanner to scan QR code by using camera.
• Implement RESTful structure to communicate with CPNS server (Crossmatch server), including register/ unregister/notify.
• Implement Google Cloud Message services to allow CPNS server send notification/sign in request to our app. Allow app sends back the "Approve" or "Deny" response to CPNS server.
• Implement Bluetooth LE to allow user send pin code to Crossmatch workstation by using Bluetooth.
• Implement Finger print sign in for android 6.0 devices and Samsung 5.X devices which supports Samsung Pass.
• Implement the background UI handler to Sync data between Server/Client and update UI in time.
• Implement animation to make the UI beautiful.

Android Developer

Android Face Recognition App - Chicago, IL - August 2015 to November 2015

Digitas is a global marketing and technology agency that transforms businesses for the digital age. Digitas exist to help brands embrace the creative and technological changes revolutionizing all aspects of their business.

Description:
This application was designed on the lines of social networking where a photo of a friend is taken via phone and uploaded on the server with some of his information. Next time the picture of that friend is clicked from any photograph or facebook or any other source, the APP will recognize it and gives information of his with his current physical location shown on the google map. It also tells the distance between you and your friend. Each User has to log in and after that will be assigned to a "face group". In his "face group" he can find all photos of his friends that he has uploaded before. Each user has his own face group and others will not be able to see it.

Responsibilities:
• Use Google map API to do the locating.
• Use Face++ API to do the Train/Recognition.
• The photos uploaded are saved in Face++ server.
• The user information is saved in our own server. (User name, password, and the face group he can visit.)
• Displaying the information of the user on a list view using custom adapters.
• The communication now is using SMS Manager.
• Supported multiple screen resolutions implementing different layouts for portrait and landscape.
• Used DDMS and Logcat for debugging and testing the application.
• Used the JIRA bug tracking tool for quality control and to view and resolve pending tickets.
• Used tortoise SVN for updating and managing the code.
• Responsible for build process and deployment of the mobile application on Google Play Store.

EDUCATION

Meng in Student Research Day

Purdue University Calumet
2011

M.S. in Computer Science

Iowa State University - Ames, IA

B.S. in Software Engineering

Sichuan University

LINKS

https://play.google.com/store/apps/details?id=crossmatch.com.otpapp

ADDITIONAL INFORMATION

Technical Skill Set
Languages: Core Java, Android, C/C++.
IDE: Eclipse, Android Studio.
Building Tools: Gradle
OS: Windows, Linux.
Web Services: REST, JSON, XML.
Web Technologies: HTML 5, CSS, Javascript and PHP
API: Google Services (Including Map, Ad Mob, Cloud Message etc), Bluetooth, Finger Print, a lot of third party APIs.
Social App Integration: Facebook, Twitter, Google+
Version Control Tools: GitHub, SVN

Methodologies: Object oriented methodology, Design Patterns, Agile
Databases: SQLite, MySQL