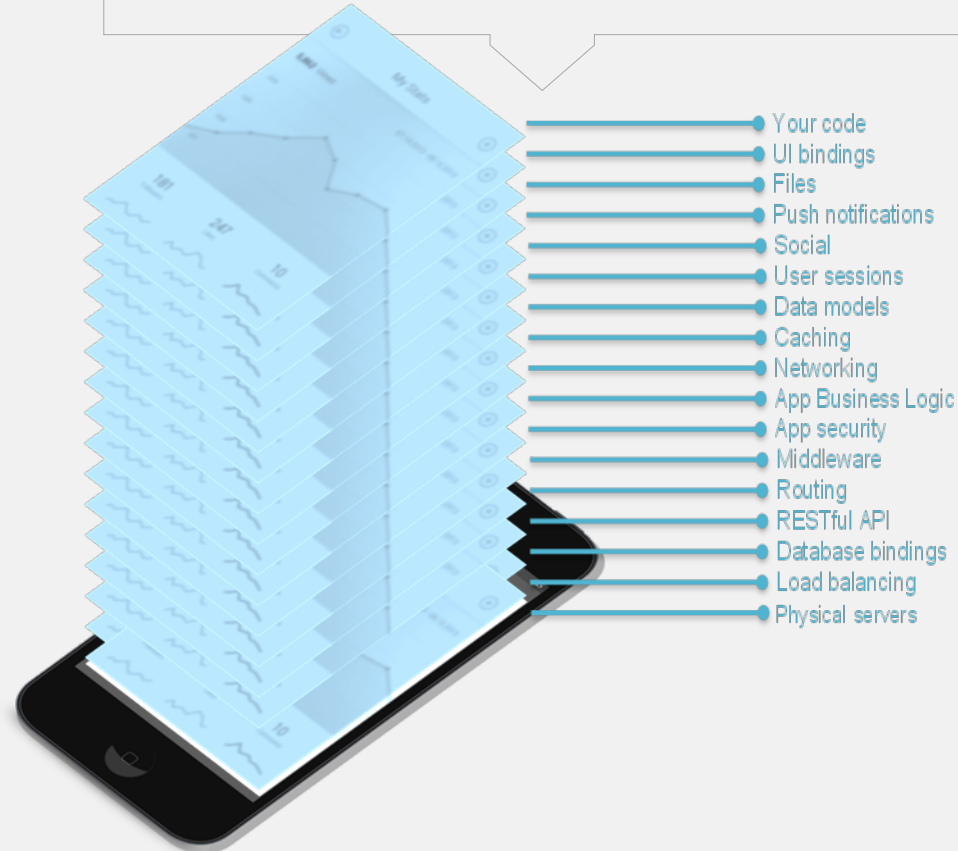# CLOUD COMPUTING APPLICATIONS

Mobile Backend as a Service

Roy Campbell & Reza Farivar

Why MBaaS?

When you are thinking to develop a new app, you have lot of steps like server setup, database creation, routing, social integration, UI binding, file management, etc. that need to be solved:

Just imagine, you focus only on your frontend code and the rest will bind together as a service as follows:

Your code
UI bindings
Files
Push notifications
Social
User sessions
Data models
Caching
Networking
App Business Logic
App security
Middleware
Routing
RESTful API
Database bindings
Load balancing
Physical servers

Your code

MBaaS

Introduction to MBaaS

- General idea: mobile apps need common services that can be shared among apps instead of being custom developed for each

- Enable web and mobile app developers to link their applications to backend cloud storage and backend APIs
  - Cloud storage
  - User management
  - Push notifications
  - Integration with social networking services

- Provide all of these in a one-shop model

MBaaS Examples

- Appcelerator, AnyPresence, Appery, Built.io, FeedHenry, Kinvey, TruMobi, Apple CloudKit (iCloud), etc.
- Many commonalities
  - E.g. many use MongoDB to serve JSON objects
  - REST API common
  - MicroServices
  - DevOps
  - Frontend design framework
- Different levels of enterprise integration
- Either on-premise or in private clouds
- Some support compliance with HIPAA, PCI, FIPS, and EU data security standards