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Opening Remarks

Bandi is a social networking platform for musicians looking to meet local musicians and bands.



User Stories to Demo

Musician Profile

As a user, I want to be able to have all my Bandi information in one centralized place, so that I can see what my profile looks like to others, who my friends are, and what bands I am a member of.

Musician/Band Search

As a user, I want to be able to filter profiles based on a set of similar interests and/or geographic proximity to me so that I can connect with those users.

Instant Messaging

As a user, I want to be able to chat with other users that I connect with so that we can discuss our tastes, see if we are a good fit, and arrange to meet in person without having to exchange personal contact information.

Speed Dating

As a user, I want to be able to browse and register for speed-dating events that are happening in my area so that I can quickly meet a lot of people with similar interests and see if we might be a good match.

Song of the Week Challenge

As an admin, I want to create "song-of-the-week" events that chooses a song high in the latest charts so that musicians can showcase their talents.

As a user, I want to upload my SOTW submission to this week's event so I can view my submission on the event's dashboard.

Live Demo

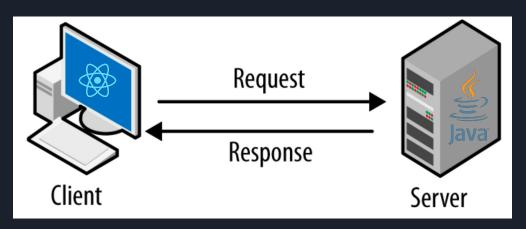
Our Tech

Tech Stack

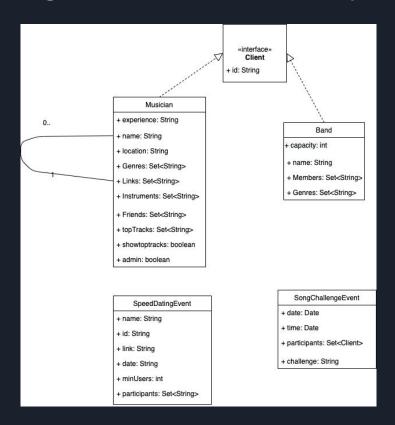
- Java backend (Spark + Sql2o)
- ReactJS frontend
- PostgreSQL Database (normalized form for list-valued attributes)
- Heroku deployment

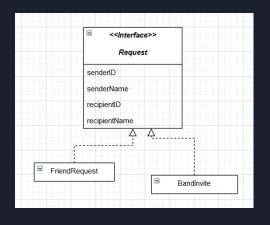
Third-party APIs/Data Source:

- Spotify Web API
- CometChat API
- Shazam Chart Data
- Location API



High-Level Overview (UML)





Complex algorithms, technologies, tools we implemented

- Search feature
 - 1) Logged in users can search for fellow musicians by Name, Genre, Instrument and Distance (in miles)
 - 2) Logged in users can search for Song-Of-The-Week Events by choosing a genre and week from a calendar widget.
- Scheduling CRON jobs
 - 1) At a specific time every Sunday, the frontend Application runs a cron-job seeking to create new events by interfacing with the backend Java API.
- Interfacing with Third Party APIs/Services
 - 1) User login with SSO authorization via Spotify
 - 2) User Top Track information via Spotify
 - 3) Song Of The Week pulls latest chart data from Shazam
 - 4) Chat functionality using Comet-Chat

Closing Remarks

Limitations

- Some bugs (e.g. editing user profiles, band search, band creation, speed dating, ...)
- Strictly geared toward COVID-friendly networking at the moment

Future Work

- Bug fixes and tying up loose ends
- Song of the Week play-along
- Automating and extending Speed-Dating functionality
- User-Registration independent of Spotify
- College student filter

Project Take-Away(s)

- The little things matter (and aren't even as little as they seem)
 - Git, code style, documentation, testing, communication, etc.
- Deployment is non-trivial. Reserve time to resolve bugs.
- Keep an eye on the big picture at all times