

Komodo Hub – Spec Document

Key: **RED** = HIGH Priority

AMBER = MEDIUM Priority

GREEN = LOW Priority? = Not sure if we will implement yet

Core System

Authentication & Authorisation

- User registration
- Login/Logout
- Password reset
- Role-based access control
- Session management
- Secure password hashing, email verification

Roles:

Public, Individual User, Student, Teacher, School Admin, Community Member, Community Admin, Foundation Admin

Public Pages

- Homepage
- About page
- Browse/search endangered species
- Public programs
- Libraries
- **Articles, sighting reports**

- Student profiles are never public

School Management

School Accounts

School Admin

- Register School
- Manage school profile
- Create teacher accounts
- Generate student access codes?
- Approve student registrations
- View all school activities and statistics

School Teacher

- Create classes, syllabus, activities
- Enrole students in activities & classes
- View student submissions
 - o Leave feedback & notes
- Send messages to users within their school

Student Features:

- Register using school access code
- View enrolled activities/classes
 - o View own submissions & feedback
- Submit work to classes/activities
- Message teachers and other students within school

Community Management

Community Leader (Admin)

- Register Community
- Manage member accounts
- Manage community activities

Community Members

- Public profile
- Can Submit:
 - o Articles
 - o Essays
 - o Sighting reports
 - o Upload media
- View own contribution history and history of others
- Message all other public users

Conservation Program System?

- PLEASE COME BACK AND REWRITE THIS

Knowledge Base/Species database

- Each species has a page
- Images can be uploaded?
- Can search and filter results
- Main categories:
 - o Mammals
 - o Birds
 - o Reptiles
- Subcategories?
- Site admins can moderate and manage content

Library System?

- School Libraries:
 - o Only viewable by members of school
 - o Managed and moderated by school admins/teachers
 - o Still viewable by site admins
 - § Can remove content but cannot upload?
- Community Libraries
 - o Publicly visible
 - o Managed and moderated by community leaders and site admins (mainly community leaders)
 - o Member profiles visible

- Content will not be published until approved by appropriate admin (unless being posted by said admin)?

Messaging System

- Secure internal messaging
- We need a messaging system that allows users to communicate with each other on the website.
- Student accounts should only be able to communicate with accounts within their school
- Public accounts should be able to communicate with other public accounts

Dashboards

Each role (student, teacher, community member, school admin, community leader and site admin) needs a different dashboard.

School Admin Dashboard:

- Overview (Total teachers/students, other statistics)
- Settings

Teacher Dashboard:

- Classes
- ?Create activity
- ?Student Submissions
- ?Messages
- ?Progress Tracking

Student Dashboard

- My Activities
- My Classes
- ?Messages
- ?Progress

Community Leader Dashboard:

- Member management
- Statistics

Security Requirements

- HTTPS
- Encrypt sensitive data
- Secure file storage
- Backup/Recovery plan?
- File validation

UX/UI Requirements

- Child-friendly interface (where required)
- Fairly simple and responsive
- Clear buttons/actions
- Accessible design

Scalability

- Idfk ask Will he knows this shit

Game

Apparently we need to make a game to go on our site, we currently need to decide

- What this game will be
- How we will make it
- Where it will be

Optional Features (If we have time left over, which is unlikely because we all have the time management skills of a depressed child who's never seen a clock)

- Gamification (idk what this means but apparently it'd be good)
- Graphical maps for sighting reports/population density
- AI moderation (yeah right)

Homepage

- Navigation bar**
- Banner 'Hero' section
 - o Main Heading (e.g. 'Protecting Indonesia's Endangered Species Together')
 - o Short 'Mission Statement' (1-2 Sentences)
 - o 'Call to action' button
 - o 'Explore species' button
 - o 'Join the movement' button (shortcut to registration page)
- Brief about section
 - o Heading: What is Komodo Hub
 - o Main text (e.g. 'A digital platform designed to support conservation and species...')
 - o 'Read more'/'Learn more' button linking to the full About page
- Featured Species?
 - o Random or most endangered species with hyperlinks to their detail page
 - § All that's displayed is
 - Species Name e.g. Komodo Dragon
 - Main category e.g. Reptile
 - o 'View all species' button underneath?
- Schools & communities section
 - o Explanation of what schools and communities can do
 - o links to school and community registration pages
- Privacy statement and CTA
- Footer***

**Navigation Bar

- All pages will have the navigation bar
- It can be designed separately from the pages
- Links
 - o Komodo Hub Logo (which links to homepage)
 - o Home
 - o About
 - o Explore species
 - o Schools
 - o Communities
 - o Login/Register

***Footer

- All pages will have the footer
- It can be designed separately from the pages
- Links
 - o About
 - o Privacy Policy
 - o ToS
 - o Contact
 - o Social Links
 - o Copyright (More like CopyLeft, am I right? Or am I left? This is confusing)

Authentication Pages

- Login
- Register
- Password Reset

School Pages

School Registration Page

- School name
- Location
- Contact email
- Principal Name
- Submit Button
- Admin approval notice

School Admin Dashboard

Sections:

- Overview (statistics)
- Teachers Management
- Students Management
- Programs
- School Library
- Settings

Widgets:

- Total teachers
- Total students
- Active programs
- Recent submissions

Create Teacher Page

Fields:

- Teacher name
- Email
- Assign to class
- Create button

Student Access Code Generation Page

Features:

- Generate code button
- Expiry date option
- Copy/share code
- View active codes list

Teacher Dashboard

Sections:

- My Classes
- Create Activity
- Student Submissions
- Messages
- Progress Tracking

Create Class Page

Fields:

- Class name
- Description
- Assign students
- Save button

Create Activity Page

Fields:

- Activity title
- Description
- Select related species/program
- Due date
- Upload materials
- Publish button

Submit Work Page

Fields:

- Activity title
- Text submission box
- Upload file/photo
- Submit button

Community Pages

Community Registration Page

- Community name
- Location
- Contact email
- Admin name
- Submit button

Community Admin Dashboard Sections: – Member management – Program enrolment – Community library – Contribution approvals – Statistics

Community Member Profile Page Features: – Profile photo – Bio – Contributions list – Public visibility toggle

Submit Article / Report Page Fields: – Title – Category – Text editor – Upload images – Submit button

ADMIN & CONTENT MANAGEMENT

- Approvals, moderation, analytics