Simple UML diagram of system.
NB: only public methods and fields are notated in order to keep it simple and understandable.
INHERITED METHODS ARE NOT INCLUDED!

Response
+Data: List<AbstractEntity>
+Metadata: HashMap<string, string>
+ErrorMessage: string
+ErrorCode: int

Request
+url: string
+data: HashMap<string, string>
+user: User

Permissions
+Permissions(User user)
+CanDo(Action action, int id)
Responsibilities
-- Check user permissions

DatabaseConnector
+Query(HashMap<string,string> data, PreparedStmt stmt): SqlDataReader
+Command(HashMap<string,string> data, PreparedStmt stmt): void
+Prepare(string query): PreparedStmt
+StartTransaction(): void
+Rollback(): void
Responsibilities
-- Connect to the database
-- Execute Queries
-- Open and close connections

«interface»
iRestServiceImpl
"all methods as described in spec"

UserController
Responsibilities
-- Interpret call
-- Assemble response

MainController
Responsibilities
-- Call Validation
-- User Authentication
-- User to request object
-- Route call to correct controller

RestServiceImpl
Responsibilities
-- Public interface
-- URL-structure
-- Url+Data to Request object

UserHandler
Responsibilities
-- Query or manipulate
   user data
-- Query and manipulate user related
   data via other relevant handlers

User

Action

Media

«abstract»
AbstractEntity
+id: int
Responsibilities
-- Data structure for WS return types

MediaHandler
Responsibilities
-- Query or manipulate
   media data
-- Query and manipulate media related
   data via other relevant handlers

«Interface»
iController
+Call(Request request): Response

«abstract»
AbstractHandler
+AbstractHandler(Permissions permissions)
+Create(HashMap<string, string> data): void
+Read(int id): AbstractEntity
+Update(int id, HashMap<string, string> data): void
+Delete(int id): void
+Search(HashMap<string, string> data): List<AbstractEntity>
Responsibilities
-- All basic entity methods
-- CRUD for single entities
-- Read multiple entities