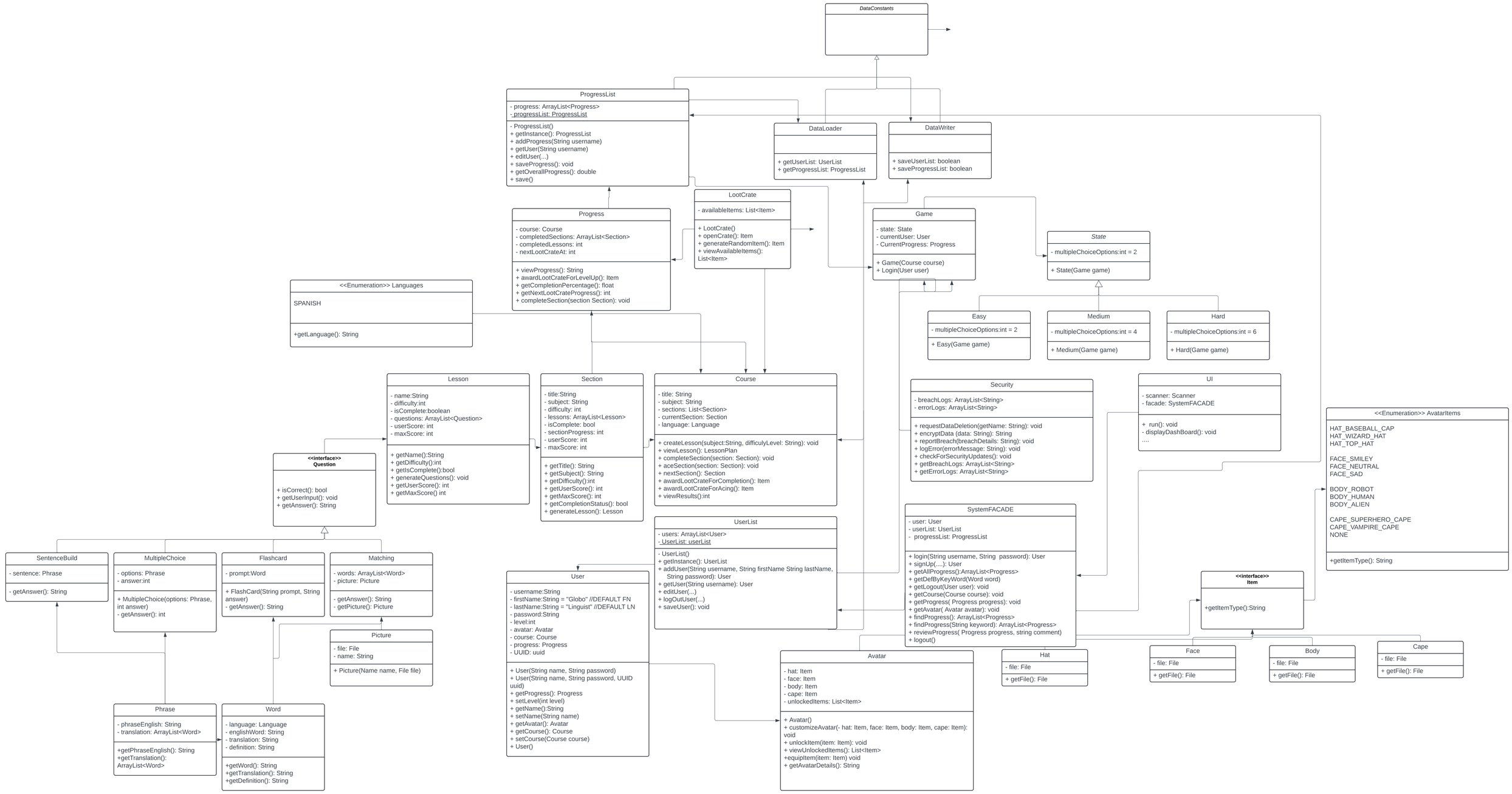
DataConstants
ProgressList
- progress: ArrayList<Progress>
- progressList: ProgressList
- ProgressList()
+ getInstance(): ProgressList
+ addProgress(String username)
+ getUser(String username)
+ editUser(...)
+ saveProgress(): void
+ getOverallProgress(): double
+ save()
DataLoader
+ getUserList: UserList
+ getProgressList: ProgressList
DataWriter
+ saveUserList: boolean
+ saveProgressList: boolean
LootCrate
- availableItems: List<Item>
+ LootCrate()
+ openCrate(): Item
+ generateRandomItem(): Item
+ viewAvailableItems(): List<Item>
Progress
- course: Course
- completedSections: ArrayList<Section>
- completedLessons: int
- nextLootCrateAt: int
+ viewProgress(): String
+ awardLootCrateForLevelUp(): Item
+ getCompletionPercentage(): float
+ getNextLootCrateProgress(): int
+ completeSection(section Section): void
Game
- state: State
- currentUser: User
- CurrentProgress: Progress
+ Game(Course course)
+ Login(User user)
State
- multipleChoiceOptions:int = 2
+ State(Game game)
<<Enumeration>> Languages
SPANISH
+getLanguage(): String
Easy
- multipleChoiceOptions:int = 2
+ Easy(Game game)
Medium
- multipleChoiceOptions:int = 4
+ Medium(Game game)
Hard
- multipleChoiceOptions:int = 6
+ Hard(Game game)
Lesson
- name:String
- difficulty:int
- isComplete:boolean
- questions: ArrayList<Question>
- userScore: int
- maxScore: int
+ getName():String
+ getDifficulty():int
+ getIsComplete():bool
+ generateQuestions(): void
+ getUserScore(): int
+ getMaxScore() int
Section
- title:String
- subject: String
- difficulty: int
- lessons: ArrayList<Lesson>
- isComplete: bool
- sectionProgress: int
- userScore: int
- maxScore: int
+ getTitle(): String
+ getSubject(): String
+ getDifficulty():int
+ getUserScore(): int
+ getMaxScore(): int
+ getCompletionStatus(): bool
+ generateLesson(): Lesson
Course
- title: String
- subject: String
- sections: List<Section>
- currentSection: Section
- language: Language
+ createLesson(subject:String, difficulyLevel: String): void
+ viewLesson(): LessonPlan
+ completeSection(section: Section): void
+ aceSection(section: Section): void
+ nextSection(): Section
+ awardLootCrateForCompletion(): Item
+ awardLootCrateForAcing(): Item
+ viewResults():int
Security
- breachLogs: ArrayList<String>
- errorLogs: ArrayList<String>
+ requestDataDeletion(getName: String): void
+ encryptData (data: String): String
+ reportBreach(breachDetails: String): void
+ logError(errorMessage: String): void
+ checkForSecurityUpdates(): void
+ getBreachLogs: ArrayList<String>
+ getErrorLogs: ArrayList<String>
UI
- scanner: Scanner
- facade: SystemFACADE
+ run(): void
- displayDashBoard(): void
....
<<Enumeration>> AvatarItems
HAT_BASEBALL_CAP
HAT_WIZARD_HAT
HAT_TOP_HAT
FACE_SMILEY
FACE_NEUTRAL
FACE_SAD
BODY_ROBOT
BODY_HUMAN
BODY_ALIEN
CAPE_SUPERHERO_CAPE
CAPE_VAMPIRE_CAPE
NONE
+getItemType(): String
<<interface>>
Question
+ isCorrect(): bool
+ getUserInput(): void
+ getAnswer(): String
UserList
- users: ArrayList<User>
- UserList: userList
- UserList()
+ getInstance(): UserList
+ addUser(String username, String firstName String lastName, String password): User
+ getUser(String username): User
+ editUser(...)
+ logOutUser(...)
+ saveUser(): void
SystemFACADE
- user: User
- userList: UserList
- progressList: ProgressList
+ login(String username, String password): User
+ signUp(....): User
+ getAllProgress():ArrayList<Progress>
+ getDefByKeyWord(Word word)
+ getLogout(User user): void
+ getCourse(Course course): void
+ getProgress( Progress progress): void
+ getAvatar( Avatar avatar): void
+ findProgress(): ArrayList<Progress>
+ findProgress(String keyword): ArrayList<Progress>
+ reviewProgress( Progress progress, string comment)
+ logout()
SentenceBuild
- sentence: Phrase
- getAnswer(): String
MultipleChoice
- options: Phrase
- answer:int
+ MultipleChoice(options: Phrase, int answer)
- getAnswer(): int
Flashcard
- prompt:Word
+ FlashCard(String prompt, String answer)
- getAnswer(): String
Matching
- words: ArrayList<Word>
- picture: Picture
- getAnswer(): String
- getPicture(): Picture
Picture
- file: File
- name: String
+ Picture(Name name, File file)
User
- username:String
- firstName:String = "Globo" //DEFAULT FN
- lastName:String = "Linguist" //DEFAULT LN
- password:String
- level:int
- avatar: Avatar
- course: Course
- progress: Progress
- UUID: uuid
+ User(String name, String password)
+ User(String name, String password, UUID uuid)
+ getProgress(): Progress
+ setLevel(int level)
+ getName():String
+ setName(String name)
+ getAvatar(): Avatar
+ getCourse(): Course
+ setCourse(Course course)
+ User()
<<interface>>
Item
+getItemType():String
Avatar
- hat: Item
- face: Item
- body: Item
- cape: Item
- unlockedItems: List<Item>
+ Avatar()
+ customizeAvatar(- hat: Item, face: Item, body: Item, cape: Item): void
+ unlockItem(item: Item): void
+ viewUnlockedItems(): List<Item>
+equipItem(item: Item) void
+ getAvatarDetails(): String
Hat
- file: File
+ getFile(): File
Face
- file: File
+ getFile(): File
Body
- file: File
+ getFile(): File
Cape
- file: File
+ getFile(): File
Phrase
- phraseEnglish: String
- translation: ArrayList<Word>
+getPhraseEnglish(): String
+getTranslation(): ArrayList<Word>
Word
- language: Language
- englishWord: String
- translation: String
- definition: String
+getWord(): String
+getTranslation(): String
+getDefinition(): String