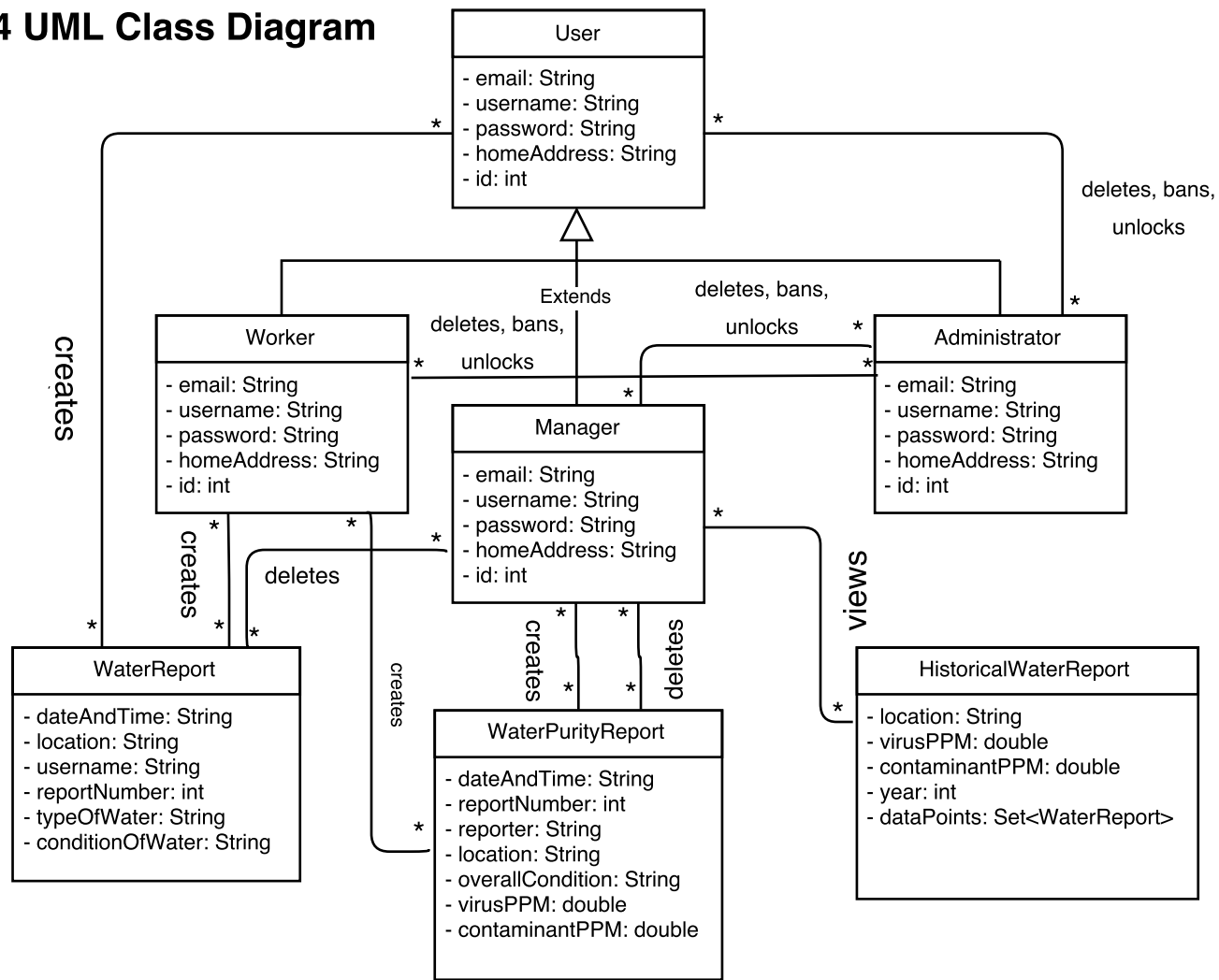


Team 14 UML Class Diagram



Singleton

- registeredUserSet: HashSet<User>

- registeredUserMap: HashMap<String, String>

- reportList: ArrayList<WaterReport>

- purityReportList: ArrayList<WaterPurityReport>

- historicalReportList: ArrayList<HistoricalWaterReport>

- securityLog: ArrayList<LogEvent>

- currUser: User

+ isEmailValid(email: String): boolean

+ isUsernameValid(username: String): boolean

+ isPasswordValid(password: String): boolean

+ isLocationValid(location: LatLng): boolean

+ addWaterReport(w: WaterReport): void

+ removeWaterReport(w: WaterReport): void

+ removeWaterPurityReport(wp: WaterPurityReport): void

+ removeHistoricalWaterReport(hwp: HistoricalWaterReport): void

+ addWaterPurityReport(wp: WaterPurityReport): void

+ addHistoricalWaterReport(hwp: HistoricalWaterReport): void

+ findWaterReportById(id: int): WaterReport

+ findAddressFromName(context: Context, address: String): Address

LogEvent

- eventType: LogEventType

- timestamp: String

- amUserID: String

- dbuUserID: String

- reportNumber: int

<<enumeration>>

LogEventType

UNKNOWN_ID_BAD_LOGIN

INCORRECT_PASSWORD_LOGIN

SUCCESS_LOGIN

DELETE_ACCOUNT

BAN_USER

UNBLOCK_ACCOUNT

DELETE_REPORT

- instance variables in LogEvent will be set depending on which LogEventType is passed in
- amUserID sets the userID of the person submitting the action when deleting accounts (admin), banning users (admin), unblocking users (admin), or deleting reports (manager)
- dbuUserID sets the userID of the person who an action is done to when either deleting, blocking, or unblocking an account