Dataset

- id: int
- name: String
- quantity: int
- labels: ArrayList<Label>
- instances: ArrayList<Instance>
- assignments: ArrayList<Assignment>

+ Dataset(int id, String name, int quantity)
+ importFile(String filePath): boolean
+ exportOutput(): boolean
+ addLabel(Label label): bool
+ addInstance(Instance instance):bool
+ addAssignment(Assignment assignment):bool

ClassLabel

- id: int
- text: String

+ ClassLabel(int id, String text)

Instance

- id: int
- instance: String

+ Instance(int id, String instance)

Assignment

- instanceId: int
- classLabelIds: ArrayList<int>
- userId: int
- datetime: Datetime

+ Assignment(int instanceId, int userId,
 ArrayList<int> labelIds)
+ Assignment(int instanceId, int userId)
+ addClassLabel(int labelId): bool

has   has

labels

User

- id: int
- name: String
- type: String

+ User(int id, String name, String type)

LabelingMechanism {abstract}

+ label() {abstract}

KeywordLabelingMechanism

- keywords: ArrayList<String>

+ KeywordLabelingMechanism()
+ KeywordLabelingMechanism(ArrayList<String>
keywords)
+ label(Instance instance, User user,
ArrayList<ClassLabel> classLabels): Assignment

RandomLabelingMechanism

- random: Random

+ RandomLabelingMechanism()
+ RandomLabelingMechanism(Random random)
+ label(Instance instance, User user,
ArrayList<ClassLabel> classLabels): Assignment

Logger

- date: Datetime
- type: String
- operation: String

+ Logger(String type)
+ getLogText(): String

UserManager

- user: User

+ UserManager(String type,
String operation, User user)
+ getLogText(): String

DatasetAuditor

- dataset: Dataset

+ DatasetAuditor(String type,
String operation,
Dataset dataset)
+ getLogText(): String

ClassProvider

- classLabel: ClassLabel

+ ClassProvider(String type,
String operation,
ClassLabel classLabel)
+ getLogText(): String

InstanceTagger

- assignment: Assignment

+ InstanceTagger(String type,
String operation,
Assignment assignment)
+ getLogText(): String

DOMAIN MODEL

Dataset

id
...

1   1

1

*

Label

id
...

*

Assignment

instanceId
...

Instance

id
...

*

1

*

has   has

labels

1

User

id
...