Package 'akiFlagger'

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Title Flags Acute Kidney Injury (AKI)

Version 0.3.0

Description Flagger to detect acute kidney injury (AKI) in a patient dataset.

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Encoding UTF-8

LazyData true

RoxygenNote 7.1.1

Imports dplyr, data.table, zoo, shiny

Suggests testthat

Depends R (>= 3.5.0)

URL https://github.com/isaranwrap/akiFlagger

BugReports https://github.com/isaranwrap/akiFlagger/issues

NeedsCompilation no

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Repository CRAN

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R topics documented:

`returnAKIpatients` *Flag patients for AKI*

Description

Add in the AKI column in a patient dataframe according to the KDIGO criterion

Usage

```
returnAKIpatients(
  dataframe,
  HB_trumping = FALSE,
  eGFR_impute = FALSE,
  window1 = as.difftime(2, units = "days"),
  window2 = as.difftime(7, units = "days"),
  padding = as.difftime(0, units = "days"),
  add_min_creat = FALSE,
  add_baseline_creat = FALSE,
  add_imputed_admission = FALSE,
  add_imputed_encounter = FALSE
)
```

Arguments

`dataframe`	patient dataset
`HB_trumping`	boolean on whether to have historical baseline creatinine values trump the local minimum creatinine values
`eGFR_impute`	boolean on whether to impute missing baseline creatinine values with CKD-EPI equation
`window1`	rolling window length of the shorter time window; defaults to 48 hours
`window2`	rolling window length of the longer time window; defaults to 162 hours
`padding`	padding to add to rolling windows; defaults to 0 hours
`add_min_creat`	boolean on whether to add the intermediate columns generated during calculation
`add_baseline_creat`	boolean on whether to add the baseline creatinine values in
`add_imputed_admission`	boolean on whether to add the imputed admission column in
`add_imputed_encounter`	boolean on whether to add the imputer encounter id column in

Value

patient dataset with AKI column added in

#Imports

Examples

```
returnAKIpatients(toy)
```

`runGUI` *GUI Shiny App*

Description

GUI Shiny App

Usage

```
runGUI()
```

`toy` *Toy dataset*

Description

Since real patient data is probably protected health information (PHI), this toy dataset contains all the relevant columns the flagger takes in.

Usage

```
toy
```

Format

A data frame (1078 x 6) consisting of relevant AKI measurements for patients

patient_id int, the patient identifier

inpatient boolean, whether or not the creatinine measurement taken was an inpatient measurement

time POSIXct, the time at which the creatinine measurement was taken

creatinine float, the creatinine value of the measurement taken @source http://akiflagger.readthedocs.io/

`toy.demo` *Toy dataset*

Description

Since real patient data is probably protected health information (PHI), this toy dataset contains all the relevant columns the flagger takes in.

Usage

```
toy.demo
```

Format

A data frame (1078 x 6) consisting of relevant AKI measurements for patients

patient_id int, the patient identifier

age float, the age of the patient

sex boolean, whether the patient is female or not

race boolean, whether the patient is black or not

inpatient boolean, whether or not the creatinine measurement taken was an inpatient measurement

time POSIXct, the time at which the creatinine measurement was taken

creatinine float, the creatinine value of the measurement taken @source http://akiflagger.readthedocs.io/

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