Package 'bmd'

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Title Benchmark dose analysis for dose-response data

LazyLoad yes

LazyData yes

Version 0.1

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Description Benchmark dose analysis for continuous and quantal dose-response data.

License GPL (>= 2)

Depends R (>= 2.6.0), drc

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R topics documented:

bmd *Calculation of benchmark doses*

Description

Calculation of benchmark doses based on continuous or qunatal dose-response data.

Usage

```
bmd(object, level, def = c("excess", "additional"), interval = c("delta"))
```

Arguments

object	object of class drc
level	numeric vector of response levels for which to calculate benchmark doses
def	character string specifiying the definition of benchmark dose to use
interval	character string specifying the type of confidence interval to use

Details

This package project just started and is still under development. The aim to provide an R package calculating the benchmark dose (BMD) and the lower limit of the corresponding 95% confidence interval (BMDL) for continuous and quantal dose-response data for a range of dose-response model based on the available definitions of the benchmark dose concepts.

Value

A matrix with two column, one containing BMD and the other containing BMDL.

Author(s)

Christian Ritz

cleft.palate *Dose-response data on cleft palate*

Description

Developmental dose-response data on cleft palate for two compounds believed to operate via similar mechanisms of action.

Usage

```
data(cleft.palate)
```

Format

A data frame with 9 observations on the following 4 variables.

dose a numeric vector

affected a numeric vector

total a numeric vector

compound a factor with levels `2,3,7,8-TCDD1` `2,3,7,8-TCDD2`

Details

The data are part of a larger collection of datasets reported in Sand et al. (2002).

Source

Sand, S., Falk Fillipsson, A. and Victorin, K. (2002) Evaluation of the Benchmark Dose Method for Dichotomous Data: Model Dependence and Model Selection, *Regulatory Toxicology and Pharmacology*, **36**, 184–197.

Examples

```
cleft.palate
```

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