

Package ‘decomposedPSF’

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Type Package

Title Time Series Prediction with PSF and Decomposition Methods (EMD and EEMD)

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Description Predict future values with hybrid combinations of Pattern Sequence based Forecasting (PSF), Autoregressive Integrated Moving Average (ARIMA), Empirical Mode Decomposition (EMD) and Ensemble Empirical Mode Decomposition (EEMD) methods based hybrid methods.

License GPL

Imports PSF, Rlibeemd, forecast, tseries

Encoding UTF-8

RoxygenNote 7.1.2

Suggests knitr, rmarkdown

VignetteBuilder knitr

NeedsCompilation no

Repository CRAN

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eemdarima*Function to predict with EEMD-ARIMA model*

Description

Function to predict with EEMD-ARIMA model

Usage

```
eemdarima(data, n.ahead)
```

Arguments

data	as input time series data
n.ahead	as horizon of values to be predicted

Value

predicted values with EEMD-ARIMA model

Examples

```
# eemdarima(data = nottem, n.ahead = 6)
```

eemdpsf*Function to predict with EEMD-PSF model*

Description

Function to predict with EEMD-PSF model

Usage

```
eemdpsf(data, n.ahead)
```

Arguments

data	as input time series data
n.ahead	as horizon of values to be predicted

Value

predicted values with EEMD-PSF model

Examples

```
# eemdpsf(data = nottem, n.ahead = 6)
```

eemdpsfarima

Function to predict with EEMD-PSF,ARIMA model

Description

Function to predict with EEMD-PSF,ARIMA model

Usage

```
eemdpsfarima(data, n.ahead)
```

Arguments

data	as input time series data
n.ahead	as horizon of values to be predicted

Value

predicted values with EEMD-PSF,ARIMA model

Examples

```
# eemdpsfarima(data = nottem, n.ahead = 6)
```

emdarima

Function to predict with EMD-ARIMA model

Description

Function to predict with EMD-ARIMA model

Usage

```
emdarima(data, n.ahead)
```

Arguments

data	as input time series data
n.ahead	as horizon of values to be predicted

Value

predicted values with EMD-ARIMA model

Examples

```
# emdarima(data = nottem, n.ahead = 6)
```

emdpsf*Function to predict with EMD-PSF model***Description**

Function to predict with EMD-PSF model

Usage

```
emdpsf(data, n.ahead)
```

Arguments

data	as input time series data
n.ahead	as horizon of values to be predicted

Value

predicted values with EMD-PSF model

Examples

```
# emdpsf(data = nottem, n.ahead = 6)
```

emdpsfarima*Function to predict with EMD-PSF,ARIMA model***Description**

Function to predict with EMD-PSF,ARIMA model

Usage

```
emdpsfarima(data, n.ahead)
```

Arguments

data	as input time series data
n.ahead	as horizon of values to be predicted

Value

predicted values with EMD-PSF,ARIMA model

Examples

```
# emdpsfarima(data = nottem, n.ahead = 6)
```

lpsf

Function to restrict the length of dataset in multiples of 24

Description

Function to restrict the length of dataset in multiples of 24

Usage

`lpsf(data, n.ahead)`

Arguments

<code>data</code>	as input time series
<code>n.ahead</code>	as horizon of values to be predicted

Value

returns the predicted results

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