Package 'ncpen'

August 8, 2017

Type Package

Title Nonconvex penalty estimation

Version 0.1.4

Date 2017-08-08

Author Dongshin Kim, Sunghoon Kwon, Sangin Lee

Maintainer Dongshin Kim <dongshin.kim@outlook.com>, Sunghoon Kwon <a@b.edu>

Description Estimates nonconvex penalty

License GPL (>= 2)

LazyLoad yes

LazyData TRUE

Imports Rcpp (>= 0.12.12)

LinkingTo Rcpp, RcppArmadillo

RoxygenNote 6.0.1

Archs i386, x64

R topics documented:

`cpp.p.ncpen.fun` *Quadratic LASSO estimation.*

Description

`qlasso.fun` returns .....

This is a generic function: methods can be defined for it directly or via the `Summary` group generic. For this to work properly, the arguments `abc` should be unnamed, and dispatch is on the first argument.

Usage

```
cpp.p.ncpen.fun(y.vec, x.mat, b.vec, w.vec, lam, gam, tau, iter.max, b.eps,
  k.eps, p.eff, r.eff, family, penalty)
```

Arguments

`q.mat`	A numeric matrix....
`l.vec`	A numeric vector....

Value

This returns..... If integer overflow http://en.wikipedia.org/wiki/Integer_overflow occurs, the output will be NA with a warning. Otherwise it will be a length-one numeric or complex vector.

Zero-length vectors have sum 0 by definition. See http://en.wikipedia.org/wiki/Empty_sum for more details.

Note

Leave some notes here.

Author(s)

Sunghoon Kwon, Dongshin Kim

References

Paper 1 by Big Name

See Also

See this also....

Examples

```
fam = "lin"
pen = "scad"

a = 3 + 4;
a

## Not run:
qlasso.fun("a")

## End(Not run)
```

cpp.qlasso.fun *NCPEN.Fun*

Description

qlasso.fun returns .....

This is a generic function: methods can be defined for it directly or via the Summary group generic. For this to work properly, the arguments abc should be unnamed, and dispatch is on the first argument.

Usage

```
cpp.qlasso.fun(q.mat, l.vec, b.vec, w.vec, lam, iter.max, b.eps, k.eps, p.eff,
  q.rank)
```

Arguments

q.mat	A numeric matrix....
l.vec	A numeric vector....

Value

This returns..... If integer overflow http://en.wikipedia.org/wiki/Integer_overflow occurs, the output will be NA with a warning. Otherwise it will be a length-one numeric or complex vector.

Zero-length vectors have sum 0 by definition. See http://en.wikipedia.org/wiki/Empty_sum for more details.

Note

Leave some notes here.

Author(s)

Sunghoon Kwon, Dongshin Kim

References

Paper 1 by Big Name

See Also

See this also....

Examples

```
fam = "lin"
pen = "scad"

a = 3 + 4;
a

## Not run:
qlasso.fun("a")

## End(Not run)
```

`hello` *Hello, World!*

Description

Prints 'Hello, world!'.

Usage

```
hello()
```

Examples

```
hello()
```

`print.ncpen` *NCPEN.*

Description

`qlasso.fun` returns .....

This is a generic function: methods can be defined for it directly or via the `Summary` group generic. For this to work properly, the arguments `abc` should be unnamed, and dispatch is on the first argument.

Usage

```
## S3 method for class 'ncpen'
print(x)
```

Arguments

`q.mat`	A numeric matrix....
`l.vec`	A numeric vector....

Value

This returns..... If integer overflow http://en.wikipedia.org/wiki/Integer_overflow occurs, the output will be NA with a warning. Otherwise it will be a length-one numeric or complex vector.

Zero-length vectors have sum 0 by definition. See http://en.wikipedia.org/wiki/Empty_sum for more details.

Note

Leave some notes here.

Author(s)

Sunghoon Kwon, Dongshin Kim

References

Paper 1 by Big Name

See Also

See this also....

Examples

```
fam = "lin"
pen = "scad"

a = 3 + 4;
a

## Not run:
qlasso.fun("a")

## End(Not run)
```

---

rcpp_hello *Hello, Rcpp!*

Description

Returns an R `list` containing the character vector `c("foo", "bar")` and the numeric vector `c(0, 1)`.

Usage

```
rcpp_hello()
```

Examples

```
rcpp_hello()
```

Index