

Package ‘gvc’

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Version 0.5.2

Title Global Value Chains Tools

Description Several tools for Global Value Chain ('GVC') analysis are implemented.

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Depends R (>= 2.10)

License GPL-3

URL <http://qua.st/gvc>, <https://github.com/bquast/gvc>

BugReports <https://github.com/bquast/gvc/issues>

Imports decompr, diagonals

Suggests testthat, knitr

VignetteBuilder knitr

RoxygenNote 5.0.0

NeedsCompilation no

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Repository CRAN

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dfddva

Domestic Final Demand Domestic Value Added

Description

Domestic Final Demand Domestic Value Added

Usage

```
dfddva(x, aggregate = FALSE)
```

Arguments

x A Leontief decomposed Inter-Country Input Output table as created by `decompr`, which should be post multiplied with final demand (using the parameter: `post="final_demand"`)

aggregate should `dfddva` be aggregated along source industries to a national sum?

Examples

```
# load the decompr package
library(decompr)

# load example data
data(leather)

# create a leontief decomposed data set
l <- decompr(inter,
             final,
             countries,
             industries,
             out,
             method = "leontief",
             post = "final_demand")

# apply dfddva
dfddva( l )
```

dfdfva

Domestic Final Demand Foreign Value Added

Description

Domestic Final Demand Foreign Value Added

Usage

```
dfdfva(x, aggregate = FALSE)
```

Arguments

x A Leontief decomposed Inter-Country Input Output table as created by `decompr`, which should be post multiplied with final demand (using the parameter: `post="final_demand"`)

aggregate should `dfdfva` be aggregated along source industries to a national sum?

Examples

```
# load the decompr package
library(decompr)

# load the example data
data(leather)

# create a leontief decomposed data set
l <- decompr(inter,
             final,
             countries,
             industries,
             out,
             method = "leontief",
             post = "final_demand")

# apply dfdfva
dfdfva( l )
```

downstream

Downstreamness

Description

Downstreamness

Usage

```
downstream(x)
```

Arguments

x an object of class "decompr" as created using the `load_tables_vectors()` function from the `decompr` package.

Examples

```
# load the decompr package
library(decompr)

# load example data
data(leather)

# create a leontief decomposed data set
l <- load_tables_vectors(inter,
                        final,
                        countries,
                        industries,
                        out      )

# apply downstream
downstream( l )
```

e2r

Exporting to Re-export

Description

Exporting to Re-export

Usage

```
e2r(x)
```

Arguments

x A Leontief decomposed Inter-Country Input Output table as created by decompr

Examples

```
# load the decompr package
library(decompr)

# load the example data set
data(leather)

# create a leontief decomposed data set
l <- decomp(inter,
            final,
            countries,
            industries,
            out)

# apply the Exporting to Re-export
e2r( l )
```

ffddva *Foreign Final Demand Domestic Value Added*

Description

Foreign Final Demand Domestic Value Added

Usage

```
ffddva(x, aggregate = FALSE)
```

Arguments

x A Leontief decomposed Inter-Country Input Output table as created by decomp, which should be post multiplied with final demand (using the parameter: post="final_demand")

aggregate should dfddva be aggregated along source industries to a national sum?

Examples

```
# load the decomp package
library(decomp)

# load example data
data(leather)

# create a leontief decomposed data set
l <- decomp(inter,
            final,
            countries,
            industries,
            out,
            method = "leontief",
            post = "final_demand")

# apply ffddva
ffddva( l )
```

gvc *Global Value Chain analysis*

Description

Several tools for Global Value Chain ('GVC') analysis are implemented.

Author(s)

Bastiaan Quast <bquast@gmail.com> Victor Kummritz

References

Wang, Zhi, Shang-Jin Wei, and Kufu Zhu. Quantifying international production sharing at the bilateral and sector levels. No. w19677. National Bureau of Economic Research, 2013.

See Also

<http://qua.st/decompr>

i2e

Importing to Export

Description

Importing to Export
Vertical Specialization
Vertical Specialisation

Usage

```
i2e(x)  
  
vertical_specialisation(x)  
  
vertical_specialization(x)
```

Arguments

x A Leontief decomposed Inter-Country Input Output table as created by decompr

Examples

```
# load the decompr package  
library(decompr)  
  
# load the example data set  
data(leather)  
  
# create a leontief decomposed data set  
l <- decompr(inter,  
             final,  
             countries,  
             industries,  
             out)
```

```
# apply the Import to Exports analysis  
i2e( l )
```

nrca *New Revealed Comparative Advantage*

Description

New Revealed Comparative Advantage

Usage

```
nrca(x)
```

Arguments

x A decomposed Inter-Country Input Output table as created by decompr

Examples

```
# load the decompr package  
library(decompr)  
  
# load the example data set  
data(leather)  
  
# perform Leontief decomposition  
l <- decompr(inter,  
              final,  
              countries,  
              industries,  
              out,  
              method = "leontief",  
              post = "exports" )  
  
# load gvc package  
library(gvc)  
  
# perform New Revealed Comparative Advantage  
nrca(l)
```

upstream

Upstreamness

Description

Upstreamness

Usage

```
upstream(x)
```

Arguments

x an object of class "decompr" as created using the load_tables_vectors() function from the decompr package.

Examples

```
# load the decompr package
library(decompr)

# load example data
data(leather)

# create a leontief decomposed data set
l <- load_tables_vectors(inter,
                        final,
                        countries,
                        industries,
                        out      )

# apply upstream
upstream( l )
```


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