## Plotting FLR objects with ggplot2 Iago Mosqueira, EC JRC - FLR Project 2013

Using ggplot2 with FLR objects

The ggplot2 <sup>1</sup> package provides a powerful alternative paradigm for creating simple and complex plots in R using the *Grammar of Graphics* <sup>2</sup>

To facilitate the use of ggplot2 methods in FLR, ggplotFL has been created. The main resources on offer in this package are overloaded versions of the ggplot() method that take directly certaing FLR classes, a new set of basic plots for some FLR classes, based on ggplot2 instead of lattice, and some examples and documentation on how best make use of ggplot2's powerful paradigm and implementation to obtain high quality plots for even farly complex data structures.

http://ggplot2.org/

<sup>2</sup> Wilkinson, L. 1999. *The Grammar of Graphics*, Springer. ISBN 0-387-98774-6.

The overloaded ggplot method

```
FLQuant
```

```
ggplot(data = catch(ple4), aes(year, data)) + geom_point() +
   geom_line()
```

**FLQuants** 

**FLStock** 

*plot() for FLR classes* 

**FLStock** 

Converting to data.frame

Some extra examples

More information

 The latest version of ggplotFL can always be installed using the devtools package, by calling

```
library(devtools)
install_github("ggplotFL", "flr")
```

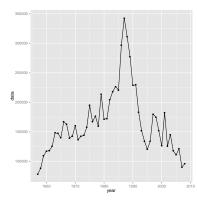


Figure 1: Combined line and point plot of a time series from an FLQuant object.

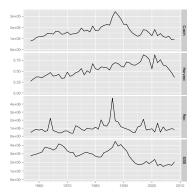


Figure 2: ggplot2 version of the standard plot() for FLStock, as applied to ple4

- Learn about ggplot2
- reshape

## Version

- R: R version 3.0.1 (2013-05-16)
- ggplot2: 0.9.3.1