Invasive species modelling in New Zealand forests

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2019-07-01

# Prerequisites

This is a *sample* book written in **Markdown**. You can use anything that Pandoc’s Markdown supports, e.g., a math equation .

The **bookdown** package can be installed from CRAN or Github:

install.packages("bookdown")  
# or the development version  
# devtools::install\_github("rstudio/bookdown")

Remember each Rmd file contains one and only one chapter, and a chapter is defined by the first-level heading #.

To compile this example to PDF, you need XeLaTeX. You are recommended to install TinyTeX (which includes XeLaTeX): <https://yihui.name/tinytex/>.

## This template

For this template I have divided the “chapters” into key sections needed to build and troubleshoot bookdown for graduate research projects. The aim of this bookdown is to provide a working archive of code for the bookdown package use with the statistics network.

You can reference chapters like so: |———————-| | Chapter 2| | Chapter 4 | | Chapter 3 | | Chapter ?? | | Chapter ?? | |—————————|

## Additional notes

… check out the website for more resources [here](https://www.ssnhub.com)

# Introduction

You can label “chapter” (or any top level devision of your documents) and section titles using {#label} after them, e.g., we can reference Chapter 2. If you do not manually label them, there will be automatic labels anyway, e.g., Chapter 4.

Figures and tables with captions will be placed in figure and table environments, respectively.

par(mar = c(4, 4, .1, .1))  
plot(pressure, type = 'b', pch = 19)

Figure 1: Here is a nice figure!

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Reference a figure by its code chunk label with the fig: prefix, e.g., see Figure 1. Similarly, you can reference tables generated from knitr::kable(), e.g., see Table 1.

knitr::kable(  
 head(iris, 20), caption = 'Here is a nice table!',  
 booktabs = TRUE  
)

Table 1: Here is a nice table!

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Sepal.Length | Sepal.Width | Petal.Length | Petal.Width | Species |
| 5.1 | 3.5 | 1.4 | 0.2 | setosa |
| 4.9 | 3.0 | 1.4 | 0.2 | setosa |
| 4.7 | 3.2 | 1.3 | 0.2 | setosa |
| 4.6 | 3.1 | 1.5 | 0.2 | setosa |
| 5.0 | 3.6 | 1.4 | 0.2 | setosa |
| 5.4 | 3.9 | 1.7 | 0.4 | setosa |
| 4.6 | 3.4 | 1.4 | 0.3 | setosa |
| 5.0 | 3.4 | 1.5 | 0.2 | setosa |
| 4.4 | 2.9 | 1.4 | 0.2 | setosa |
| 4.9 | 3.1 | 1.5 | 0.1 | setosa |
| 5.4 | 3.7 | 1.5 | 0.2 | setosa |
| 4.8 | 3.4 | 1.6 | 0.2 | setosa |
| 4.8 | 3.0 | 1.4 | 0.1 | setosa |
| 4.3 | 3.0 | 1.1 | 0.1 | setosa |
| 5.8 | 4.0 | 1.2 | 0.2 | setosa |
| 5.7 | 4.4 | 1.5 | 0.4 | setosa |
| 5.4 | 3.9 | 1.3 | 0.4 | setosa |
| 5.1 | 3.5 | 1.4 | 0.3 | setosa |
| 5.7 | 3.8 | 1.7 | 0.3 | setosa |
| 5.1 | 3.8 | 1.5 | 0.3 | setosa |

You can write citations, too. For example, we are using the **bookdown** package (Xie [2019](#ref-R-bookdown)) in this sample book, which was built on top of R Markdown and **knitr** (Xie [2015](#ref-xie2015)).

# Literature

Here is a review of existing methods.

# Methods

We describe our methods in this chapter.

# Applications

Some *significant* applications are demonstrated in this chapter.

## Example one

## Example two

# Final Words

We have finished a nice book.

Xie, Yihui. 2015. *Dynamic Documents with R and Knitr*. 2nd ed. Boca Raton, Florida: Chapman; Hall/CRC. <http://yihui.name/knitr/>.

———. 2019. *Bookdown: Authoring Books and Technical Documents with R Markdown*. <https://github.com/rstudio/bookdown>.