Stan installation instructions

Please consult the installation instructions below in detail to set up `Stan` on your machine prior to the course start. A key step in working with `Stan` is that your model is compiled using `C++`, and for this step `R` needs to know where your compilers live, and the correct compiler versions of course also need to be installed. This is why you need to install and configure the chain of `C++` tools on your Linux, MacOS, or Windows system as described below, and this is why installation is a little more involved compared to installations of most other `R` packages.

Install `rstan` (will be used for practicals):

- https://github.com/stan-dev/rstan/wiki/RStan-Getting-Started
- Tip: It is strongly recommend to install `rstan` in `R` version 4.0.0 or higher;
- For MacOS, compared to previous approaches, I find the instructions through the macrtools package most helpful;
- If the above results in timeouts, install the missing software manually as described here;
- Verify your installation as described on the `RStan-Getting-Started` website.

Alternatively install `cmdstanr`:

- https://mc-stan.org/cmdstanr/
- `cmdstanr` is a recently developed lightweight alternative to `rstan`. The functions to compile, run, and access the output of Bayesian inference algorithms are very similar, but not identical to those in the `rstan` package. However, both `cmdstanr` and `stanr` read exactly the same `Stan` model files, and so `cmdstanr` is an excellent alternative if you run into installation issues with `rstan`, or if you would rather work with the most recent `R` interface to `Stan`'s algorithms;
- Verify your installation as described on the `Cmdstanr-Getting-Started` website.

Then install `bayesplot` using `install.packages("bayesplot")` in R.