Coursera Johns Hopkins Specialization in Data Science course dependency information

There are nine courses in the sequence plus a capstone project course. For the courses, we consider two forms of dependency

Hard dependency: Students will be *required* to know material from the prerequisite course. Taking the dependent course simultaneously will be challenging and only possible for highly motivated students willing to work ahead of the course schedule for the prerequisite. Taking hard dependent courses out of order is not possible unless the student *already knows* the material covered in the prerequisite course.

Soft dependency: Knowledge of material from the prerequisite course is recommended and useful. Concurrently taking the prerequisite course and the dependent course is possible. It is not recommended to take them out of order, but would be possible for highly motivated students willing to self teach components of the prerequisite course as needed.

The Data Scientist's Toolbox

This is the primary introductory course for the specialization. It should be taken first and has no prerequisite courses. Students should be computer literate, have programmed in at least one computer language and be motivated self learners.
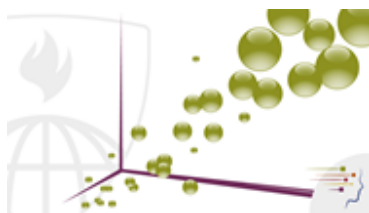
R Programming

This is the most crucial course for the remainder of the specialization. It is **softly dependent on The Data Scientist's Toolbox**. It should be taken before the remaining courses in the series.

Getting and Cleaning Data

This course has **hard dependencies on R Programming and The Data Scientist's Toolbox.**

Exploratory Data Analysis

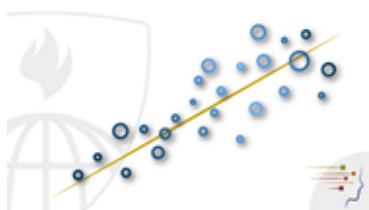This course has **hard dependencies on R Programming and The Data Scientist's Toolbox.**

Reproducible Research

This course has **hard dependencies on R Programming and The Data Scientist's Toolbox.**

Statistical Inference

This course has **hard dependencies on R Programming and The Data Scientist's Toolbox.** In addition, students will need basic (non calculus) mathematics skills.

Regression Models

This course has **hard dependencies on R Programming**, **The Data Scientist's Toolbox and Statistical Inference.**

Practical Machine Learning

This course has **hard dependencies on R Programming**, **The Data Scientist's Toolbox and Regression Models.** It has a **soft dependency on Exploratory Data Analysis.**

Developing Data Products

This course has **hard dependencies on R Programming**, **The Data Scientist's Toolbox and Reproducible Research.** It has a soft dependency of **Exploratory Data Analysis.**