# Bioinformatics II Exercises

| Johnson Family | Transformation | Parameter Conditions | X Condition |
|---|---|---|---|
| $S_B$ | $Z = \gamma + \eta ln(\frac{X-\epsilon}{\lambda+\epsilon-X})$ | $\eta, \lambda > 0, -\infty < \gamma, \epsilon < \infty$ | $\epsilon < X < \epsilon + \lambda$ |
| $S_L$ | $Z = \gamma + \eta ln(X - \epsilon)$ | $\eta > 0, -\infty < \gamma, \epsilon < \infty$ | $X > \epsilon$ |
| $S_U$ | $Z = \gamma + \eta \sinh^{-1}(\frac{X-\epsilon}{\lambda})$ | $\eta, \lambda > 0, -\infty < \gamma, \epsilon < \infty$ | $-\infty < X < \infty$ |

## Introduction

All exercises for the lecture Bioinformatics II are provided on this web page.

The exercises complement the lecture slides and aim to improve your understanding of the diverse topics of this course.

! We highly recommend doing these exercises.

## Setup

Exercises are made up of two parts:

- standard theory and calculation questions
- programming assignments.

Standard questions can be found on this web page.

Programming assignments are available via Github Classroom. Links to the appropriate programming assignments will be provided in the according exercise sheet.

Exercises are designed for self-teaching. Every week there will be a exercise session where questions about the current exercise sheet will be answered and discussed. Please check the Bioinformatics II Ilias course page for more information about dates and times.