

Goal and idea - Module 11

GOAL:

Given a second-order linear DE, we've learned that we need two linear independent solutions to form a fundamental set of solutions for the DE. It is common, however, that in a process of solving the DE, we only find one solution. Luckily, we are able to

- develop a method called "reduction of order" that allows us to bootstrap this solution in a way to find another.

IDEA:

By modifying one solution of a second-order DE and running entering this into the DE we are often able to procure another (linearly independent!) solution.