



Department of Economics and Management
Institute for Operations Research (IOR)
Optimization under Uncertainty
Prof. Dr. Steffen Rebennack

Excercise Submission
Winter Semester 2024/25

First Name Last Name
Student ID:
Study Program (B.Sc.)

und

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Solutions to Task 1

Task Part a

The source code can be found in the file Aufgabe1.gms.

Task Part b

The corresponding execution can be viewed at Aufgabe1.lst. From this, it can be deduced that the optimal value is 5.169180 Euros and the optimal point is

$$\begin{pmatrix} \text{Apple} \\ \text{Cornflakes} \\ \text{Carrots} \\ \text{Potatoes} \\ \text{Cheese} \\ \text{Milk} \\ \text{Chocolate} \\ \text{Spinach} \\ \text{Steak} \end{pmatrix}^T = \begin{pmatrix} 0 \\ 3 \\ 4 \\ 0.4512 \\ 0 \\ 0 \\ 2.0111 \\ 0 \\ 1 \end{pmatrix}^T .$$