



GENETIC ALGORITHM LECTURES

“İSPİNOZ”

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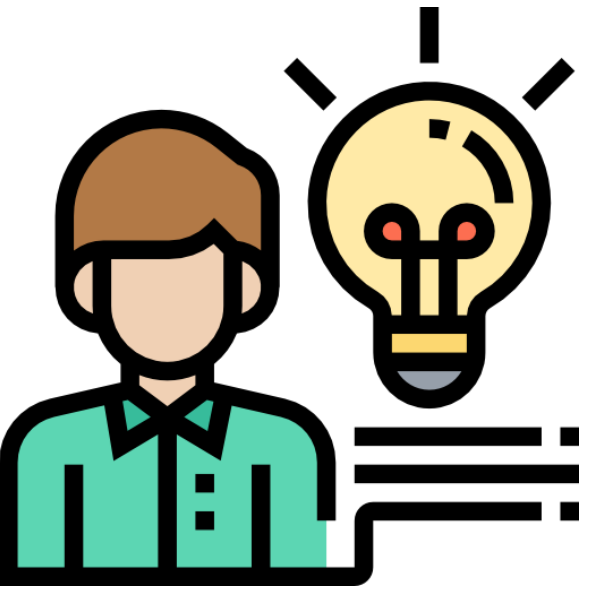
Introduction

Genetic Algorithms (GAs) are adaptive heuristic search algorithms that belong to the larger part of evolutionary algorithms. They are based on the ideas of natural selection and genetics. GA is often applied to large optimization problems and genetic knowledge is required. Therefore, it can be difficult to understand by students.



Problem Description & Motivation

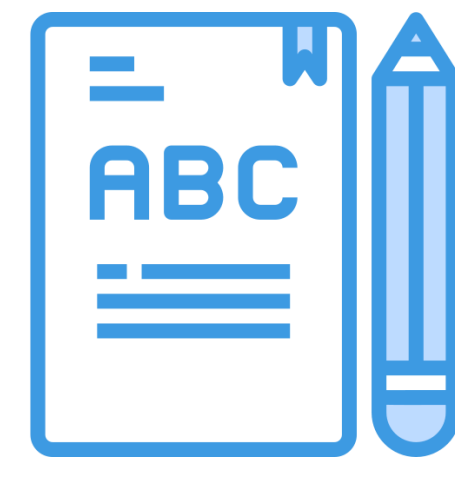
GAs have been applied to many different problems, usually with valuable results. GA is based on genetic knowledge such as crossover, mutation, fitness etc. Therefore, learning GA may not be easy. Nowadays, students mostly prefer the Internet to access information. However, there is no sufficient number of Turkish web sources to learn the GA.



Methodology



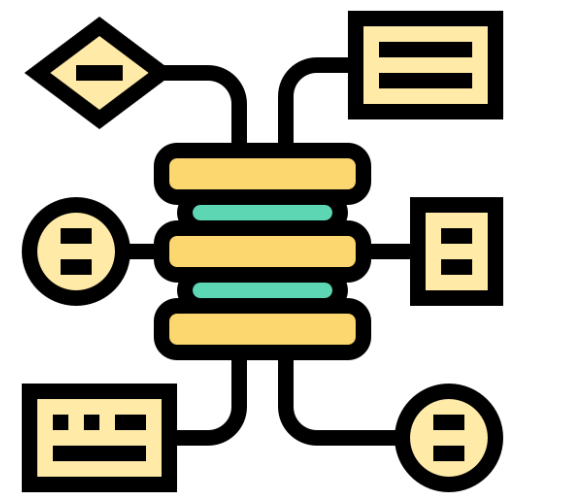
Genetic Algorithm Lectures



Quizzes

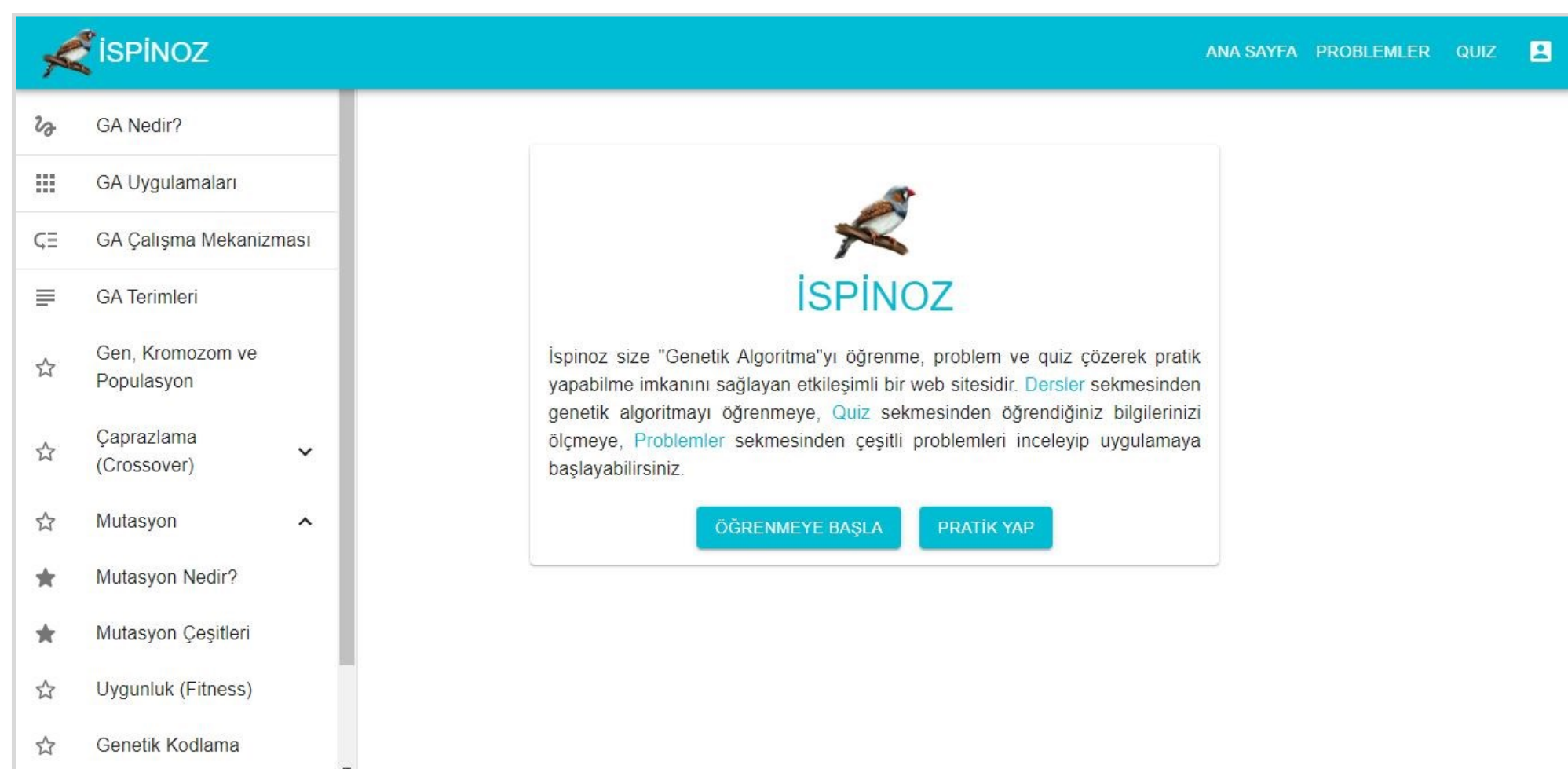


İspinoz

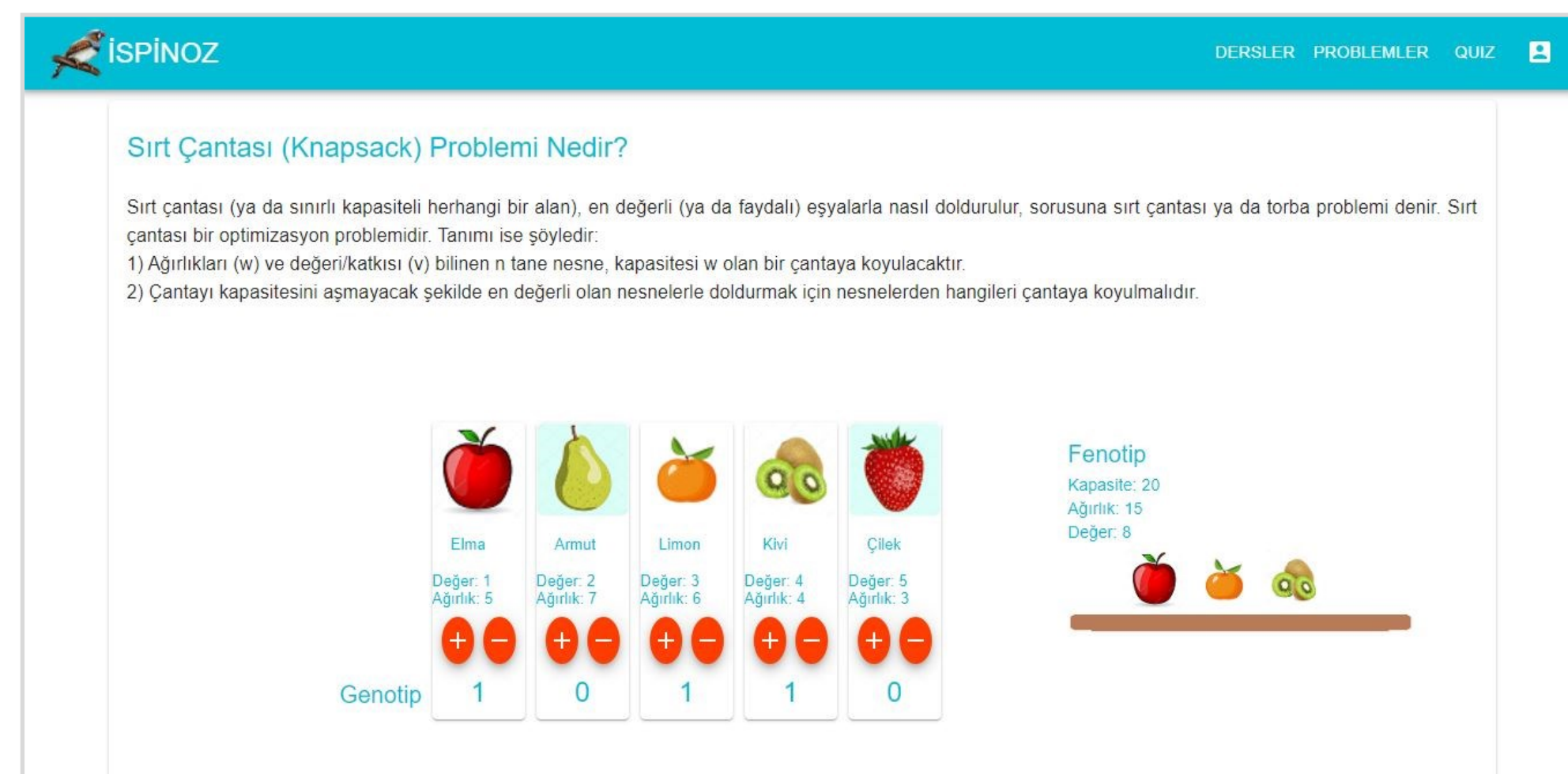


Problem Practice

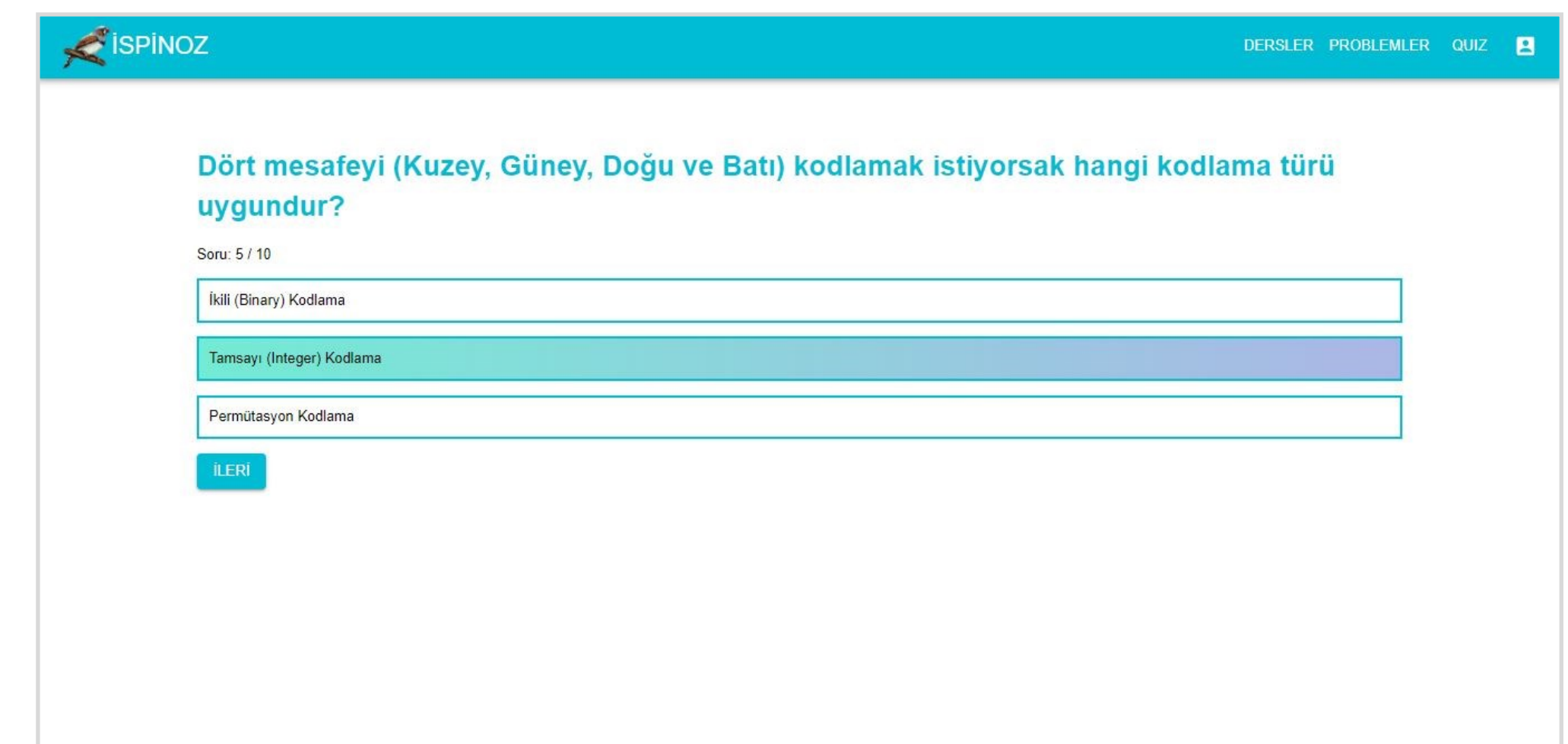
Web Interfaces of “İspinoz”



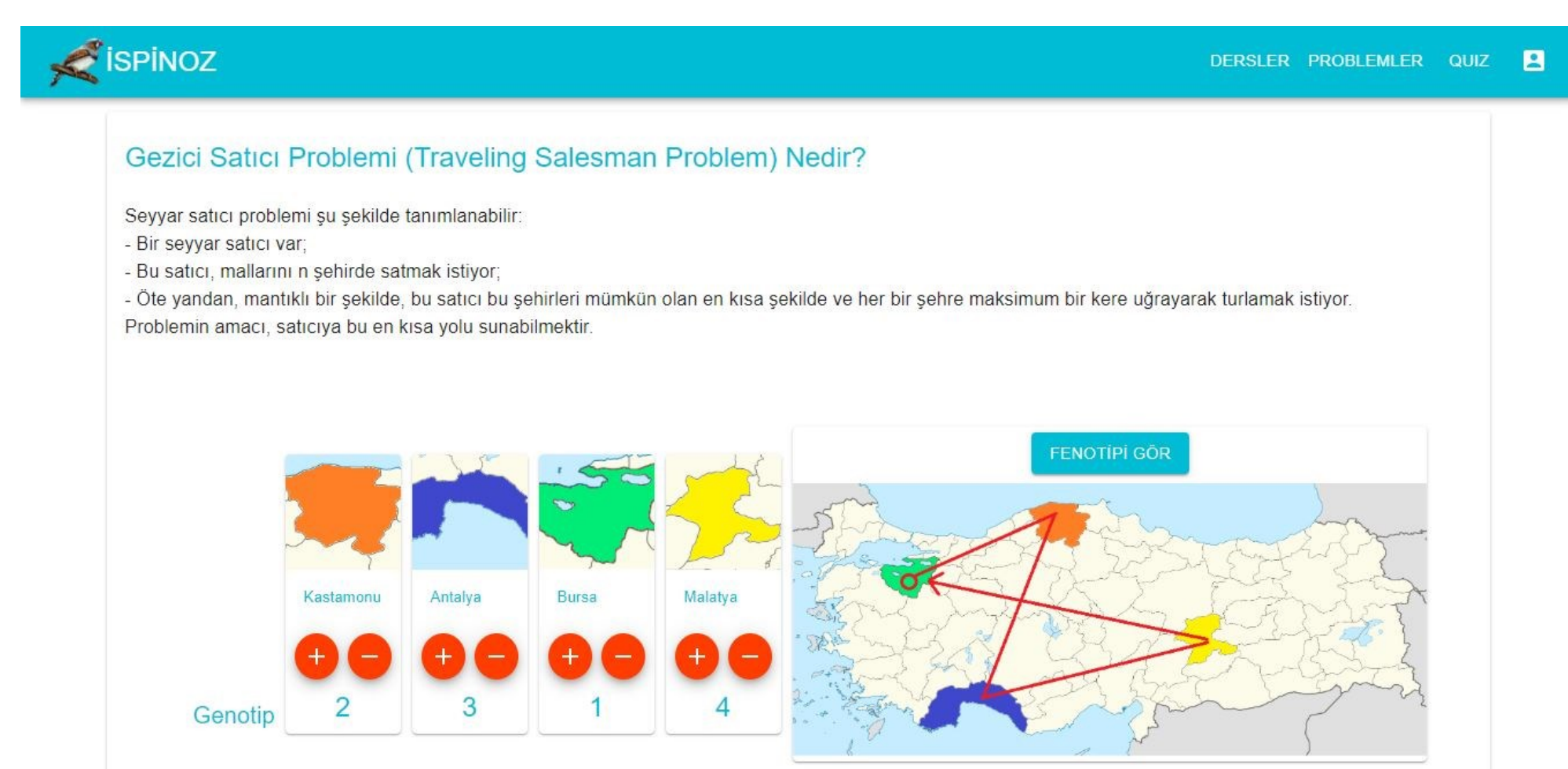
Home Page



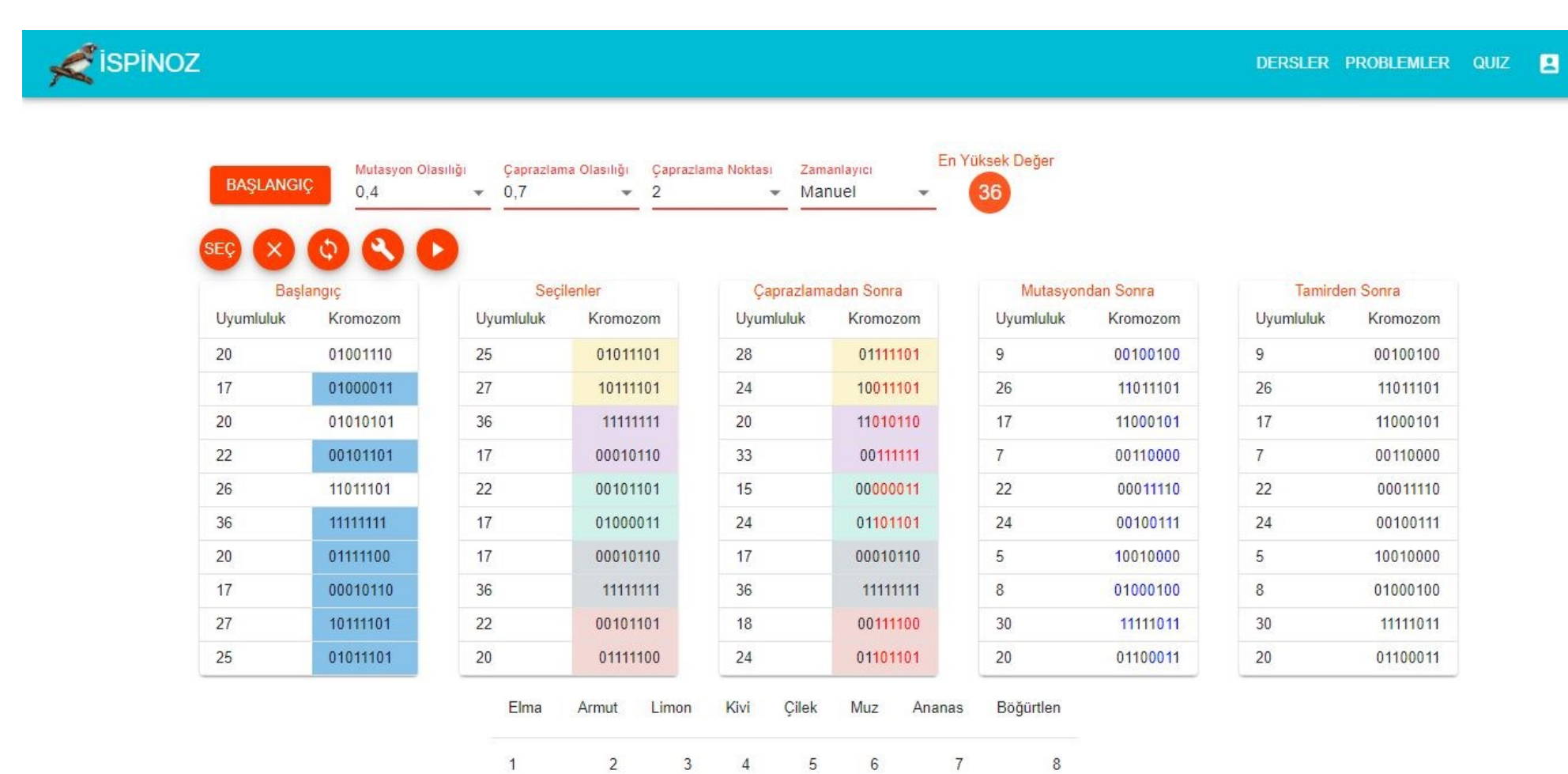
Knapsack Problem Study Page



Quiz Page



Travelling Salesman Problem Study Page



Knapsack Problem Practice Page



References Page

Used Technologies



References

- A.E. Eiben and J.E. Smith, Introduction to Evolutionary Computing (2nd Edition)
- MathWorks ,Genetic Algorithm