

CS 5320/4320

Project #3: Binary Encoding

Points 100, Due: Mar 15

This project uses the same problem that you solved in Project #1, with the following changes:

- Use binary (bit-string) encoding, with 15 bits for x_1 , 20 bits for x_2 , and 25 bits for x_3 .
- The algorithm parameters (population size, crossover rate, etc.) do not have to be the same as the ones used in Project #1 and may be taken from the user on the command line or provided at the beginning of execution, or may be stored in a file to be read in.

The output should include the best, mean and standard deviation of the best-of-run fitnesses from 30 independent runs (no generation-wise details needed). Also, show the vector (the three x values) of the best of the 30 best-of-run solutions.

Submission on Canvas via file upload (instructions as before). This is a group project (instructions as before).