3.1 [0.5/1]

The solution is mostly correct

Realizability assumption is used which is the key element of the solution, but there should be more explanation of why A does not mislabel any negative examples. You can explain that by saying/showing that the rectangle produced by A should be inside of the rectangle from the realizability assumption.

3.2 [1/1]

The solution is correct.

The phrase “R\* is an arbitrary rectangle generated” is a bit weird, since it is the rectangle that generates the labels and it is not arbitrary with respect to those labels. The more appropriate explanation for why R(S) ⊆ R\* would be just citing the solution from Part 1 of the exercise.

The rest of the solution is correct and contains proper citations.

3.3 [0.5/1]

The answer is correct, but there should be more explanation on how the case corresponds to the case. How do you define Ri in the d-dimensional case? How many Ri do you have? Answers to those two questions explain where does the 2d in the answer come from, however they are not addressed in the solution.

3.4 [0.5/1]

It is shown that the runtime of applying the algorithm A mentioned earlier is polynomial in d, but there is no mention of or .

Total: 2.5/4