



Principles of Distributed Computing

”Testat”

Attestation Criterion

Your task is to create an exam question including a (correct) solution for one of the topics. If your question is extraordinary, then we might use (a modified version of) it in the actual exam. Please note the following facts:

- The deadline to submit your exam question is the June 9.
- Send your exam question either as pdf or as correct \LaTeX code.
- Send your exam question to the responsible assistant for that chapter (see <http://www.dcg.ethz.ch/lectures/podc/>).
- It should be a non-trivial question (i.e., not a pure knowledge question).
- You will not receive feedback before June 9. A few days later, we will inform you whether you have passed. If you did not pass, you will be able to revise your submission and resubmit it once.

If your testat is not accepted, it is usually because one or more of the following reasons:

1. Question too short: Usually there will be 6 questions in the exams and 120 minutes to solve them. That means a perfect student who can achieve full score should still need 20 minutes to solve your question.
2. Question too easy: same as above, but the student should not be occupied with writing for 20 minutes. If the solution can be solved (even without knowledge of a top student) while reading the question, we would probably not state it in an exam.
3. Off Topic: we do not accept questions that deal with sequential algorithms or on details of implementing algorithms from the lecture in real life, say on sensor nodes.
4. Question has no solution: E.g. asking for an algorithm that sorts N items on two computers in time $O(N)$ does not count when each of them needs at least $\Omega(N \log N)$.
5. The solution to the question should be correct and complete. Write it as if it was your solution to the real exam.
6. Question formulated in a way that it is unnecessarily hard to understand. Still it is allowed to play some tricks: e.g. you can mention very shortly (say at most) one thing that is not really needed for the solution, e.g. some space-constraints that are always fulfilled in any good solution
7. Questions that need advances knowledge from other lectures that cannot be expected in our exam. E.g.: implement a cryptographically secure MIS algorithm on a distributed quantum computer using no entangled states such that in the end each node is covered by some node in the MIS but does not know by whom.
8. If you get inspired by our exercise sheets or by problems in the lecture, your question should differ at least in some interesting aspect from that. This difference should be significant enough such that especially items 1 and 2 are satisfied.
9. If you submit a Testat and instead of rejecting immediately, we are so kind to ask you to change something, please do so. Just resubmitting a Testat that has minor changes that do not relate to our suggestions does not count. Still, if the implementation of our suggestions was not good, we might reject it. We will only provide these suggestions in some cases.
10. Please check our previous exams: http://www.dcg.ethz.ch/lectures/fs11/podc/exam/PODC_ss2003.pdf
http://www.dcg.ethz.ch/lectures/fs11/podc/exam/PODC_ss2004.pdf (maybe questions one are not that good examples)
11. The question and the answer should not be copied from somewhere else. Come up with your own questions.
12. Do not assume that all students memorized every exercise question. If you want to use similar definitions like in an exercise, write them down again.
13. Do not be ambiguous in your questions. If you are not sure about this, give your question to fellow students to double-check.