

FYTN02, ht13

Respondents: 33
Answer Count: 22
Answer Frequency: 66,67 %

General opinion

Give your opinion in the scale 1-5.

1 = very negative

2 = negative

3 = neutral

4 = positive

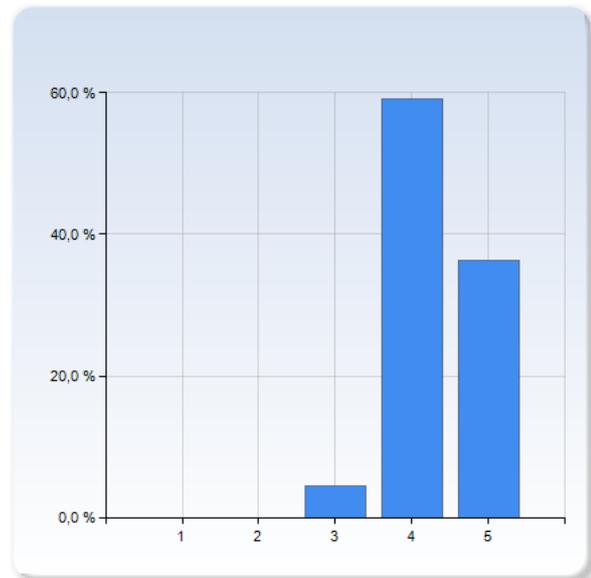
5 = very positive

The comment field in the end is very important! It will help us understand what is to be kept when the grade is good, and what to change when the grade is poor.

What is your general opinion of...

the course overall?

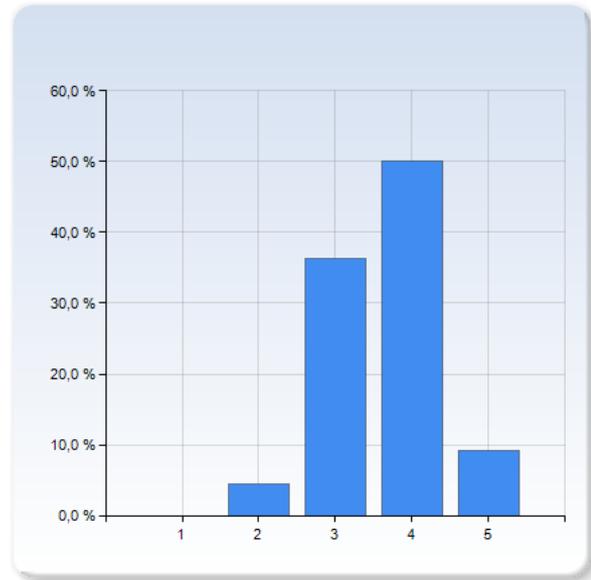
the course overall?	Number of Responses
1	0 (0,0%)
2	0 (0,0%)
3	1 (4,5%)
4	13 (59,1%)
5	8 (36,4%)
Total	22 (100,0%)



the course overall?	Mean	Standard Deviation
	4,3	0,6

Chandler's book?

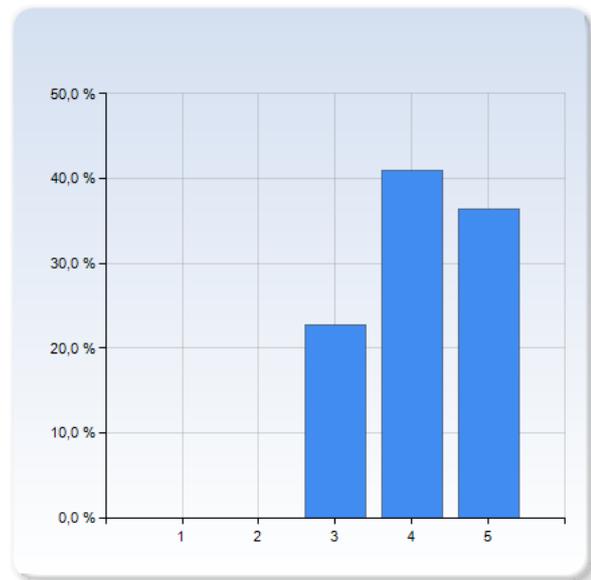
Chandler's book?	Number of Responses
1	0 (0,0%)
2	1 (4,5%)
3	8 (36,4%)
4	11 (50,0%)
5	2 (9,1%)
Total	22 (100,0%)



Chandler's book?	Mean	Standard Deviation
	3,6	0,7

the lectures?

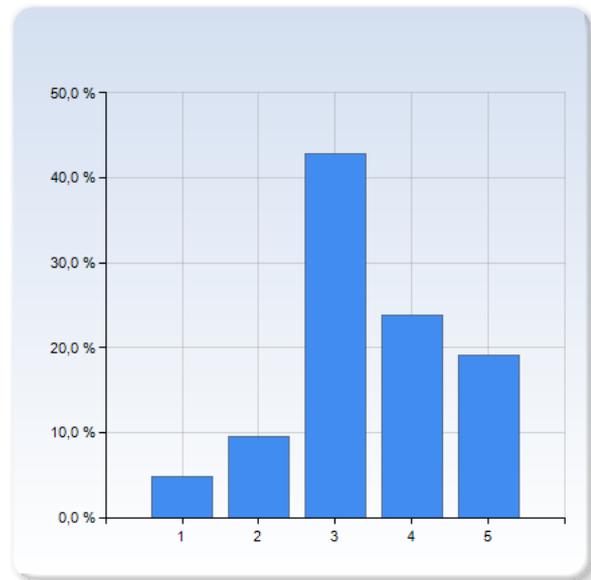
the lectures?	Number of Responses
1	0 (0,0%)
2	0 (0,0%)
3	5 (22,7%)
4	9 (40,9%)
5	8 (36,4%)
Total	22 (100,0%)



the lectures?	Mean	Standard Deviation
	4,1	0,8

the problem solving classes?

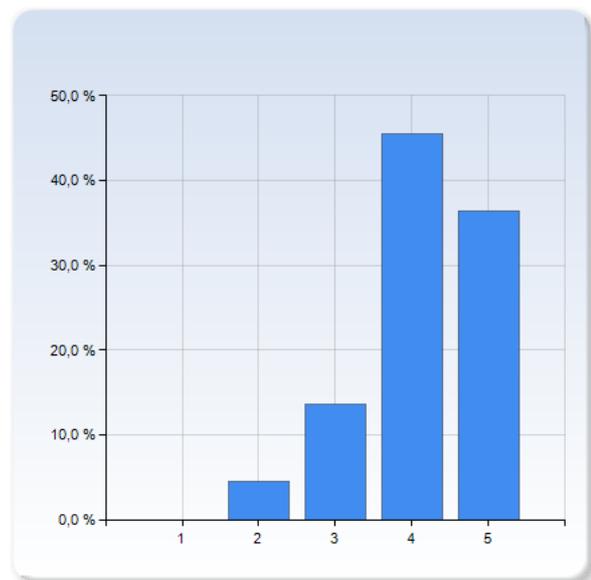
the problem solving classes?	Number of Responses
1	1 (4,8%)
2	2 (9,5%)
3	9 (42,9%)
4	5 (23,8%)
5	4 (19,0%)
Total	21 (100,0%)



the problem solving classes?	Mean	Standard Deviation
	3,4	1,1

the hand-in exercises?

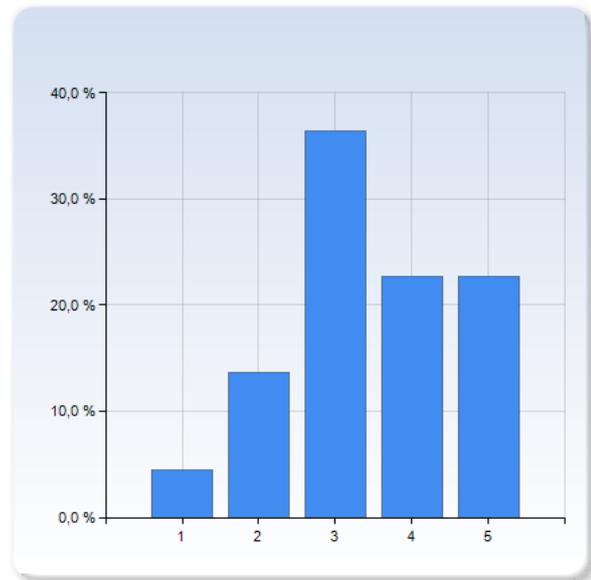
the hand-in exercises?	Number of Responses
1	0 (0,0%)
2	1 (4,5%)
3	3 (13,6%)
4	10 (45,5%)
5	8 (36,4%)
Total	22 (100,0%)



the hand-in exercises?	Mean	Standard Deviation
	4,1	0,8

the seminar presentation?

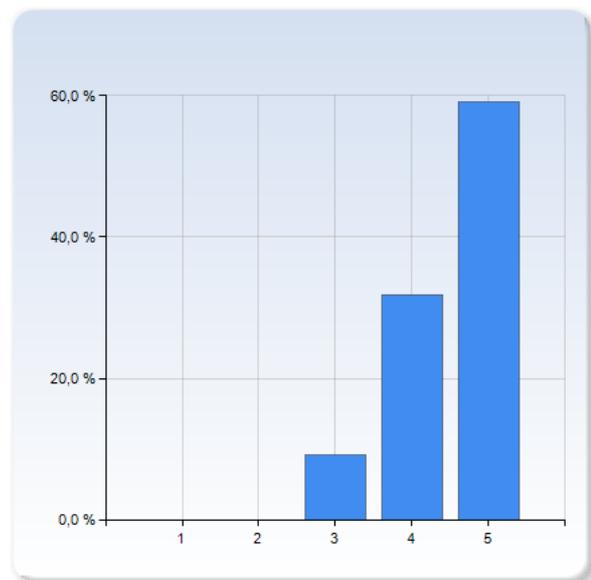
the seminar presentation?	Number of Responses
1	1 (4,5%)
2	3 (13,6%)
3	8 (36,4%)
4	5 (22,7%)
5	5 (22,7%)
Total	22 (100,0%)



	Mean	Standard Deviation
the seminar presentation?	3,5	1,1

the oral exam?

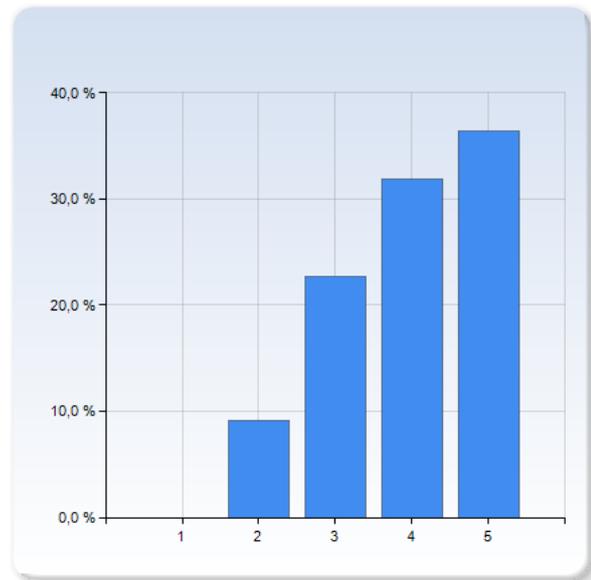
the oral exam?	Number of Responses
1	0 (0,0%)
2	0 (0,0%)
3	2 (9,1%)
4	7 (31,8%)
5	13 (59,1%)
Total	22 (100,0%)



	Mean	Standard Deviation
the oral exam?	4,5	0,7

the information about the course when it started?

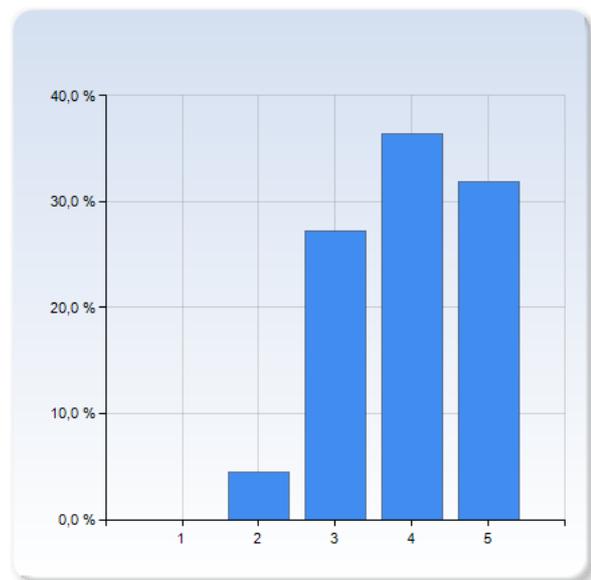
the information about the course when it started?	Number of Responses
1	0 (0,0%)
2	2 (9,1%)
3	5 (22,7%)
4	7 (31,8%)
5	8 (36,4%)
Total	22 (100,0%)



	Mean	Standard Deviation
the information about the course when it started?	4,0	1,0

the information about what was expected of you?

the information about what was expected of you?	Number of Responses
1	0 (0,0%)
2	1 (4,5%)
3	6 (27,3%)
4	8 (36,4%)
5	7 (31,8%)
Total	22 (100,0%)



	Mean	Standard Deviation
the information about what was expected of you?	4,0	0,9

Comment (help us interpret your grades!)

It was a good course. The book is not perfect, but no book will be. Chandler leaves out a lot of steps in his calculations which makes it difficult at times. The same goes for his explanations: sometimes they are just too short. This is of course where the lecture notes come in handy. Anders does explain a few things better. But they lack of lecture details beforehand made it impossible to do any preparations for the lectures. Thus I did not know which parts of the book needed extra explanation during the lecture. I'd like to request some overall plan of what each lecture will be about. No need to have it set in stone, just overall what chapters are discussed. The best thing about the course was the hand-in exercises. They really forced you to work through some problems and I learned the most from them. The seminar presentations were more useless (to me). If possible, let people choose their topic more freely. For example if they have used Monte Carlo in their work they could talk about that instead. Would probably make for some more interesting presentations.

The lectures, hand-in exercises and the oral exam followed the book well, and also explained it. All in all it was a very good combination. The weekly exercises was a good idea, but there was little time, and sometimes it was quite hard to follow in the exercise sessions.

The problem solving sessions were Nice, but I think another concept would help improve them. The concept on FYTA11/12 is good, i.e. actually solving the exercises at the session after which a solutions are presented by the students. (E.g. having two students solve one or two exercises together and then present it)

Chandler's book has got the disadvantage that I often had difficulties finding e.g. a formula or a discussion. Often the computations are rather held short which is challenging if one does not see where a step comes from. In the lectures this was done much better. Moreover the book did not cover all topics we did in the lecture e.g. the transfer matrix method or discussions about the reciprocal lattice (of cours these are rather minor parts of the lecture, but still it would be nice to have all approaches at hand when looking up something). From time to time I didn't have time to look at the weekly problems. Then the problem solving classes where somewhat useless to me. This could easily be avoided if the one writing the solution just would say one sentence about what the task was and e.g. what notation he uses or where formulae come from. Then everyone could follow the discussion.

The course overall: more interesting than expected, but also difficult and rather abstract. Points subtracted due to below. The book: sometimes the fact that the lectures followed different paths to conclusions and derivations than the book did made it unhelpful to read the book in order to learn the course material. Lectures: good. No points for great pedagogics, but very few such are worth giving out at LU. Problem-solving classes: not of much use. Too little time to solve these problems in parallel with another problem-oriented course, so the classes were more useful for actually seeing the problems solved (which in itself has some educational value). Hand-ins: fairly difficult problems and FAR too little time for students with another course in parallel. Particularly the christmas set, as these collide with the oral exam repetition and the one chance the students have to catch their breath before the next 5 months of studies, not to mention if one has Another exam after christmas as well. This notion among lecturers, that such heavy assignments along with content-heavy oral exams can be placed right after the so-called holidays without seriously impacting the students, needs to change ASAP. Seminars: Interesting things to learn in one's own project when one learns it over a period of time; far too rushed to really learn from during the presentations. The exam: more demanding for the higher grade than any other oral exam I've ever taken; however, good structure and a good way of answering questions. Pre-information: All major topics are listed, but without explanation, how on Earth would a student get a grip on what the course is about BEFORE taking it? Info of expectations: my only negative remark is that the Lagrange formalims seemed to be expected of us, which I did not find any information about being needed.

The problem solving classes can get a little chaotic, because some students write in a really poorly way at the backboard - solutions could be handed out on sheets?

Sometimes the lectures were a little bit confusing, more in the first weeks of the course, less at the end. A better integration into the overall context of the topics covered in the lectures as well as of the exercises discussed in the problem solving classes would be great. So more comments on that would do it. The seminar presentation was too long and there were too much information to stay concentrated. Furthermore the quality of the presentations varied - what is NOT the fault of the professor - so it would be good to give the class some comments and a summary after each presentation.

Did not attend problem solving classes, as I tried to restrict hours I spent on this course. Seminar presentations seemed to make students learn their chapters, but not to educate the rest of us.

I think the course had an appropriate speed for being a master's level course and the topics discussed were well-chosen. I especially liked the second half, i.e. the discussion Transfer Matrix and renormalization group methods. The thermodynamics part in the beginning was brief but, at least in my opinion, are very clear and good recap of the subject. The methods were very well introduced in the lectures and I found the (hand-in) exercises to be well-chosen as an exercise in using these methods.

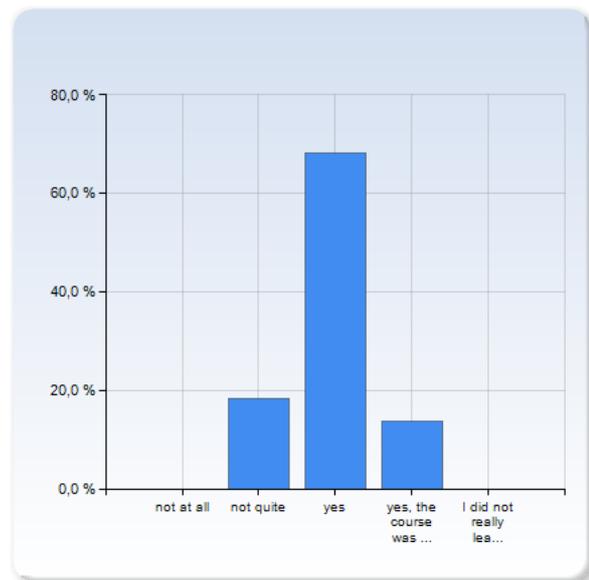
The book was good associated the lectures, but as an alone source of information to compact. It would be great to have headlines for the chapters in the lectures which would give a better structure. Without the solution manual a lot of the problems are nearly unsolvable.

It would have been good to have more problem sets; once a week or once every two weeks would probably be a suitable frequency.

The excercises taken from the book for the problem solving classes had a good level. Some were easy to solve with the lectures, some were quite challenging. The hand-in excercises had a very good level and prepared me well for the exam. The speed of the lectures was really good. The seminar presentation day was very long. It was sometimes difficult to follow the explanation of a chapter that required a deeper understanding. I think the presentation of a little topic, not as a section of the book but as an independent presentation is a better way.

Did you have enough prior knowledge for this course?

Did you have enough prior knowledge for this course?	Number of Responses
not at all	0 (0,0%)
not quite	4 (18,2%)
yes	15 (68,2%)
yes, the course was a bit easy	3 (13,6%)
I did not really learn anything new	0 (0,0%)
Total	22 (100,0%)



	Mean	Standard Deviation
Did you have enough prior knowledge for this course?	3,0	0,6

If your prior knowledge was not fairly appropriate, please comment!

What prior knowledge was missing/overlapping?

What is your background (year of higher education, relevant courses)?

I was a bit unfamiliar (not entirely) with bracket-notation. Relevant background would be physics2.

This is my 5th semester of Bachelor's studies. I did not hear any lecture on thermodynamics before so it took me some time to get the concepts of classical thermodynamics before I could follow the rest of the course. Why don't make two lectures out of this, one just thermodynamics and one (more advanced) just statistics?

What is missing, as said above, is the Lagrange formalism, some mathematical trickery and a little bit of actual statistics. Apart from that, I knew all I needed in order to take' on the course. I am currently on my 4th year at the Faculty of Science, Dept. of Physics, and the only relevant course since Physics 2 is Th.Biophysics.

I did not have so much thermodynamics prior to this course, but that did not hurt badly.

I had a course at my home university, that was a mandatory course for bachelor students, that covered a lot of the content of this course.

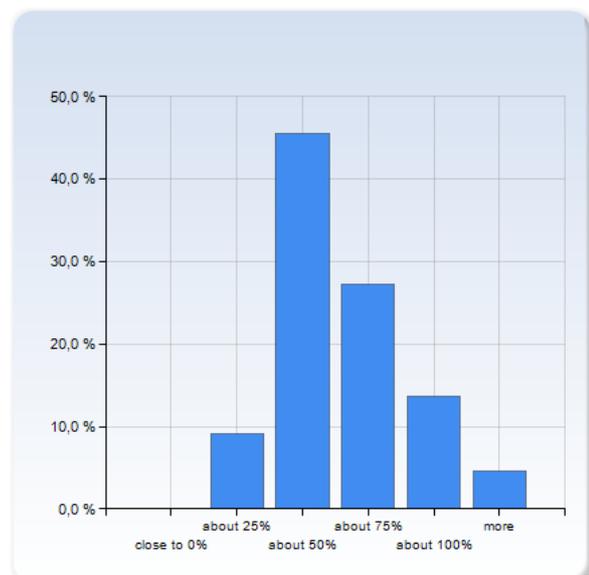
3. year of higher education, 3 semesters of mathematical education, a course about theoretical quantum mechanics.

I had already heard a course on statistical physics before and saw this more as a repetition (thermodynamics, ensembles). However, the 2nd half was new to me and I consider it a very good introduction to the more advanced concepts (see above).

It would be nice to focus a bit mehr on the ensembles to get a better understanding of it which would be useful for the whole course.

How much time have you spent on this course? (100% means 9-10 weeks, 20 hours per week, adding up to roughly 25 work-days or 200 hours working time)

How much time have you spent on this course? (100% means 9-10 weeks, 20 hours per week, adding up to roughly 25 work-days or 200 hours working time)	Number of Responses
close to 0%	0 (0,0%)
about 25%	2 (9,1%)
about 50%	10 (45,5%)
about 75%	6 (27,3%)
about 100%	3 (13,6%)
more	1 (4,5%)
Total	22 (100,0%)



	Mean	Standard Deviation
How much time have you spent on this course? (100% means 9-10 weeks, 20 hours per week, adding up to roughly 25 work-days or 200 hours working time)	3,6	1,0

Comment

More, counting my christmas holidays which were mostly spent working on this course, to a greater extent than listed above. :(

As said, I had already studied some of the topics, so my workload wasn't as large.

The necessary time was appropriate.

What did you particularly like with the course?

What did you particularly like with the course?

Good and clear lectures.

The handin exercises. Forcing me to sit a good amount of hours with the problems and the book was just the kick I needed to get through the course.

You were encouraged to work with your classmates, which made it easier and more fun to learn.

Anders' lectures were inspiring and fun. Also, the hand-in exercises were interesting, especially the second set

It was nice to have great freedom what to choose as a topic for the seminar presentation.

It actually dealt with physically observable systems, such as the spin systems in ch. 5. For a course reputed to be a bit on the dull side, it was actually very interesting, mainly because it was so diverse. Also, the problems were highly relevant to the actual course content, which is not to be taken for granted here at LU. It's a shame I had so little time for them, see above.

That there was no 6 h exam in teh end. The very kind and friendly professor.

The lectures where very interesting and the content of the course was presented nicely.

The topic, the style of the course.

It was nice to spend so much time on magnetization as I am working in solid state physics.

Lectures was pedagogical

-> lectures, esp. 2nd half (1st one good as well though) -> hand-in exercises, both in style and amount of work -> general idea of the problem sessions

fair oral exam

The practice questions summed up the whole course and it was a good way of preparing for the exam.

It was a very nice course in most aspects. The lectures were well done. The seminars were also very nice.

It covered a lot of interesting material.

Beginning with certain topics of thermodynamics, and by that with "old" content was a very good way to have start the lectures. Anders was a very good teacher, it was possible to feel, that he likes the topic. The preparation questions for the oral exam were a good way to learn all the main topics of the lecture and prepared me well for the exam.

What in the course do you think could improve?

What in the course do you think could improve?

Lectures - some topic information beforehand Seminars - more freedom in choice of topic (and then not being forced into a group) Exercises - It's pointless to copy the solution of someone that has solved the problem. Perhaps instead we should discuss where, and most importantly, why people got stuck. It is quite likely that the same problems will manifest themselves over and over again. Fixing them could go a long way to help with future exercises/courses. Examples of issues I had: * Misread the question in the book * Mistakes in calculations early gave large errors later * Spent my efforts looking for a 'trick' when the solution was just to solve the equation with 'brute-force'.

the seminar presentation might be stretched to more seperated days, cause it was hard to follow all presentations. moreover i felt that the overall quality of the presentation was rather weak. so maybe it would be good to organise a meeting with the prof before the presentation to go through the topics clarify problems ...

The exercise session concept, to that described above

It was a bit unfortunate to have two different lecture rooms, I nearly always went to the wrong one first.

That should be fairly clear from the above.

It is always good to prepare a presentation but one learns not so much from presentations of other students...

See comments above (especially seminar presentation)

I still have a hard time putting the critical exponents in context with the rest of the course material. There was a lot of focus on phase transitions which was good but the critical exponents was the hardest thing to understand.

The second hand-in exercise was hard.

-> seminar presentations: I think the current way of doing the presentations doesn't work too well. A whole day of talks is just tedious for both listeners and later speakers as people get noticeably inattentive (and I cannot blame them). I know that there's no easy fix for the whole topic. It might help to either do two sessions à 3 hours each. Or do the talks as directly-graded talks to professor only (the lack of feedback was a little disappointing, anyway). Or have at least one meeting with each group separately before the talks take place as it seemed as if everyone just did his subsection on his own, which did not help the coherence of different talks within one chapter. -> problem sessions: I think it might help to summarize the main point/conceptual idea of every (longer) exercise once it has been presented. It happened on multiple instances that someone would present his solution that was more or less correct but he/she had a bad handwriting, a confusing style or did not really explain what he/she is doing and why. I don't expect students to be able to easily summarize the main point of an exercise, so I guess it would be good if that was done by the professor if needed.

The course website could be a bit more informative.

I think it would have been good to have a traditional written exam and/or put more emphasis on hand-in assignments. The seminar presentation was worth too many credits compared to the effort it required.