

Organizing the Exams for Q3 – Online Exams MSE department

The letter from the Dean and Director of Education

“The third quarter is coming to an end and the examination period is approaching. As it stands, all courses throughout Q4 (including after June 1) will be given online. It is uncertain whether exams can be held at the end of Q4. To prevent the accumulation of exams and delays in the study, we ask that the exams from Q3 and retakes from Q2 will take place in the coming exam period”

1. Non-proctored online exams (via Zoom)

- When preparing an online non-proctored exam, make sure that it is always an open book exam.
- The exam questions are identical for all students to prevent differences in levels between individual exams. To make it difficult to share answers with each other:
 - a. Are there different exams with different order and numbering of the questions (for example with an exam with 4 questions $4! = 24$ different exams are possible).
 - b. Are questions chosen that do not have a simple number as an answer; preferably questions where the answer is a piece of text.
 - c. Are questions made with small variations in given number values, so that the answers are not the same. This variation can be added to the student's study number.
 - d. Is there a preference for questions at insight level because this gives more variation in the formulation of the answers.
- The invigilator will provide different questions of the exam at specific times or time-slot. This can be done via Zoom-chat channel. Pay attention to the organization of the questions. Assure they can be answered in the stipulated time.
- In the case of a large number of students. The docent can divide them into groups, and organize parallel Zoom sessions with different invigilators.
- Students should be on-time for the exam. Organize waiting-room for the students to sign-up before the official starting time of the exam. The host (docent/invigilator) grant access to the session.
- At the beginning of the examination (see annex), an integrity statement is included that the student must sign.
- Identifying the student - Students can provide a photo/scan of their campus card a priori and provide a scan during the exam (every block)
- For the case of hand-written answers. Students will respond to the questions on an A4 paper. If possible, try to use only one A4 per question.
- Finalized the stipulated time for the question/s, the student will submit the answer by making a picture with their smartphones and send it to the invigilator. Or via Zoom-chat, in case of a digital document.
- When the invigilator receives all answers, then she/he will inform about the following question and the process starts again until all questions have been answered and the exam finalized.

2. Students with official permission for extra time

- Students can participate in the exam. Extra time will be provided.
- The docent can offer an alternative format (eg. oral exam)

3. Controlling Fraud

- Students can only leave the room (break to the restroom) in the time-slot between questions.
- The possibility that students could “privately” chat with one another (e.g. to compare outcomes...). Prevent this option in Zoom - Disable private chats between exam-participants as shown in Figure 1.
- You can ask students (randomly) for screenshots of their computer and send via email.
- After the exam has ended, as a representative sample, a number of students can be phoned with the question to explain one of their answers.
- In case of evident or suspected fraud, the exam committee will be informed.

4. Requirements for the docent responsible for the course

- Inform the students via Brightspace about the exam format and the required preparation in due-time (after receiving the green-light from Board of Examiner or MSE coordinator)
- Be available to answer possible questions/doubts of the student before the exam
- Share in Brightspace the Zoom link corresponding to the exam session
- If you need to split the students in several groups. Organize in advance the number of invigilators needed, the different Zoom sessions (links) and the distribution of the students in groups.

5. Requirements for students

- Should be able to provide good quality scans/photos of their answers in a swift manner
- Should use a computer with a camera and mic, providing sufficient sound and image quality
- Should have a proper internet connection

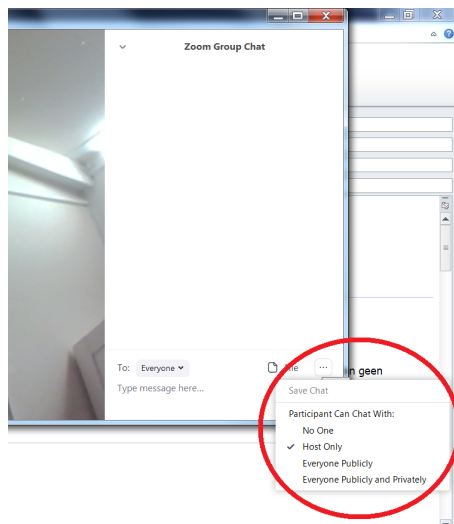


Figure 1. Disable private chat - In the “chat windows, bottom, left click on “...” and then select the option “participant can chat with host only”

Integrity statement

As a student of the 3mE faculty, I realize that following my education involves rights and obligations. These translate into mutual expectations between me as a future engineer and TU Delft. I will behave as one would expect from a good student. This means that I have an open, independent and helpful attitude, that I am focused on cooperation and that I am honest, respectful and careful. I will consider the backgrounds and feelings of everyone with whom I have a professional relationship within the study program.

I am aware that fraud can lead to this exam being declared invalid.

Student name:

Student Number: