



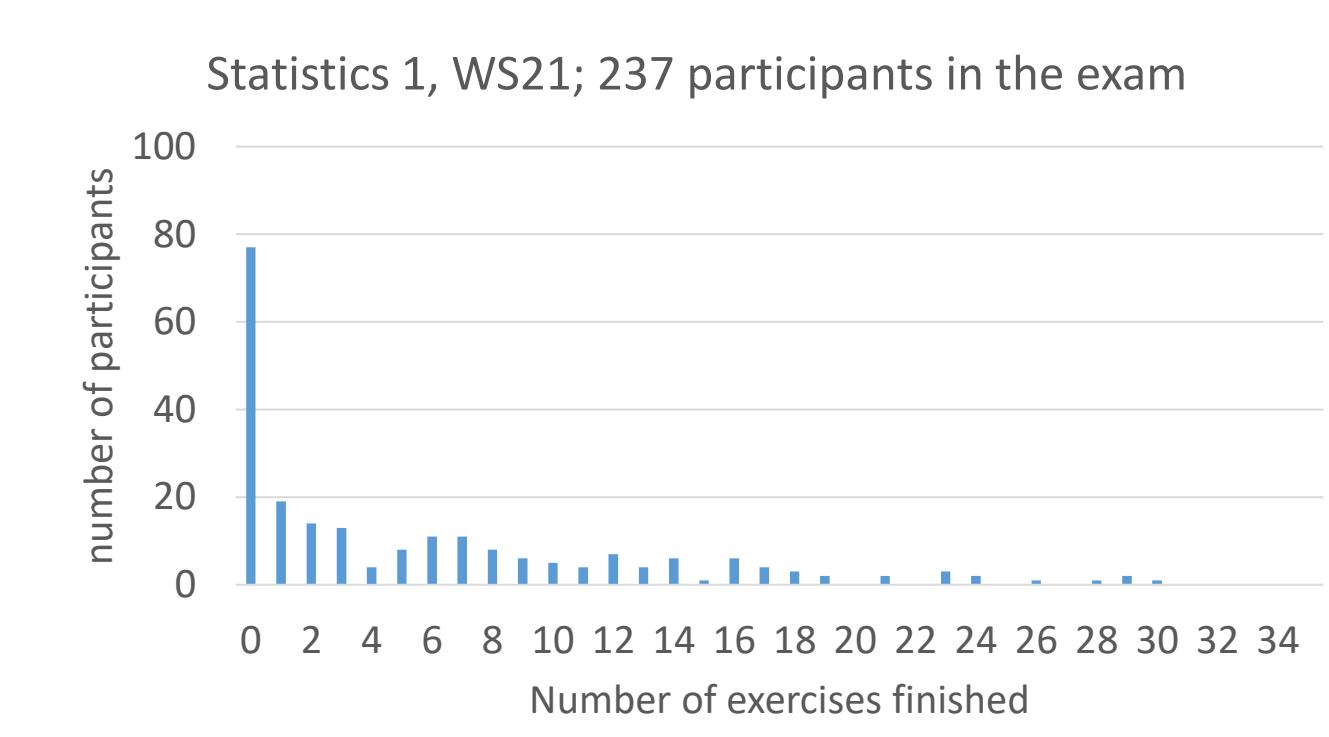
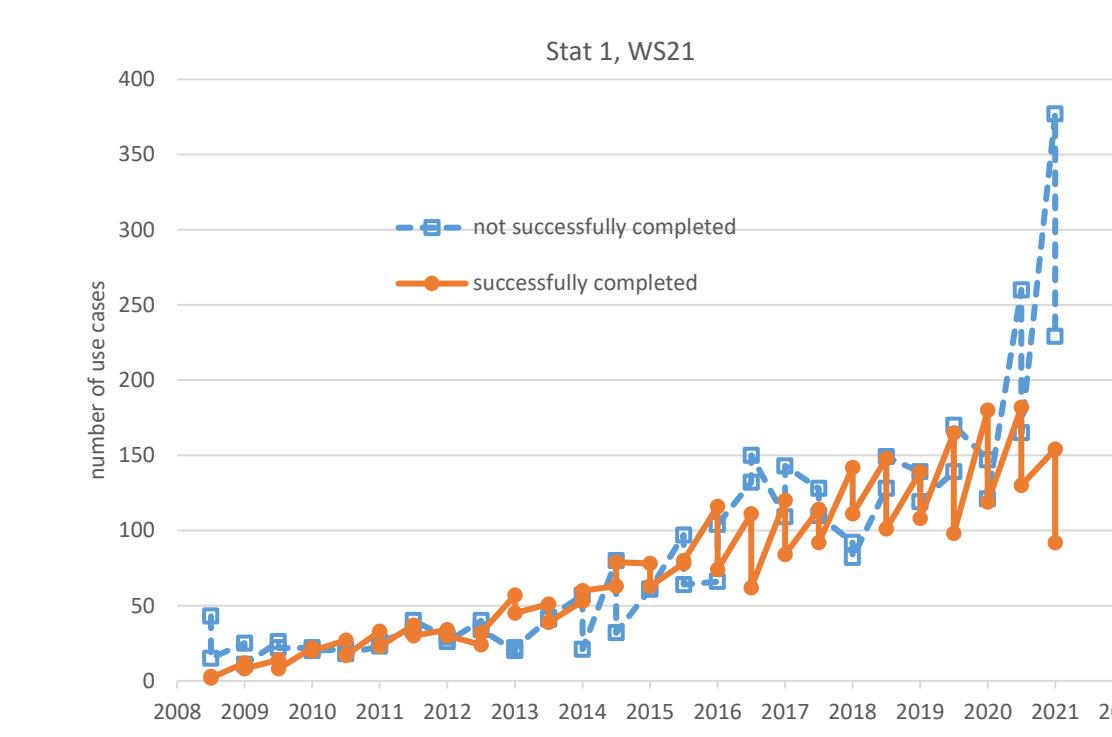
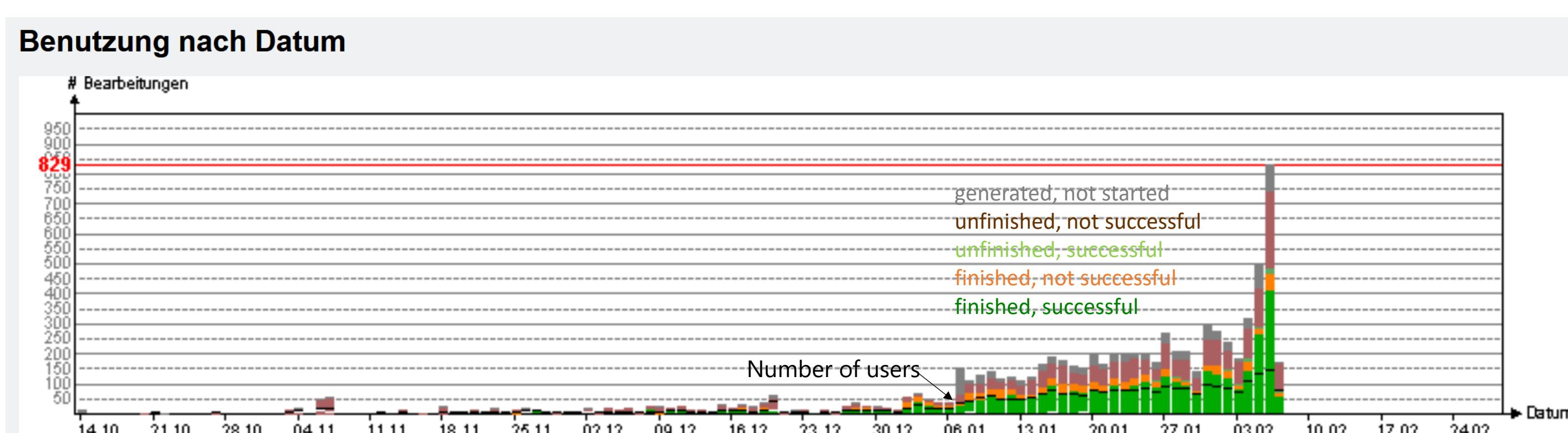
## (Under-)Utilization of a system for self-paced learning

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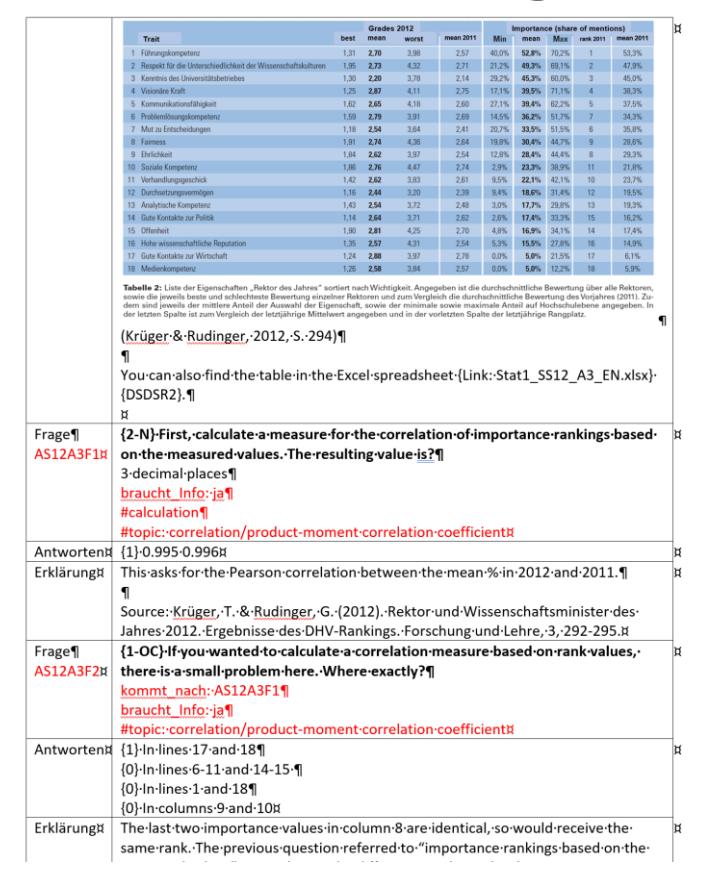
### Problem

My students start rather late to prepare for statistics exams, underuse previous exams provided for training, and ignore special exercises

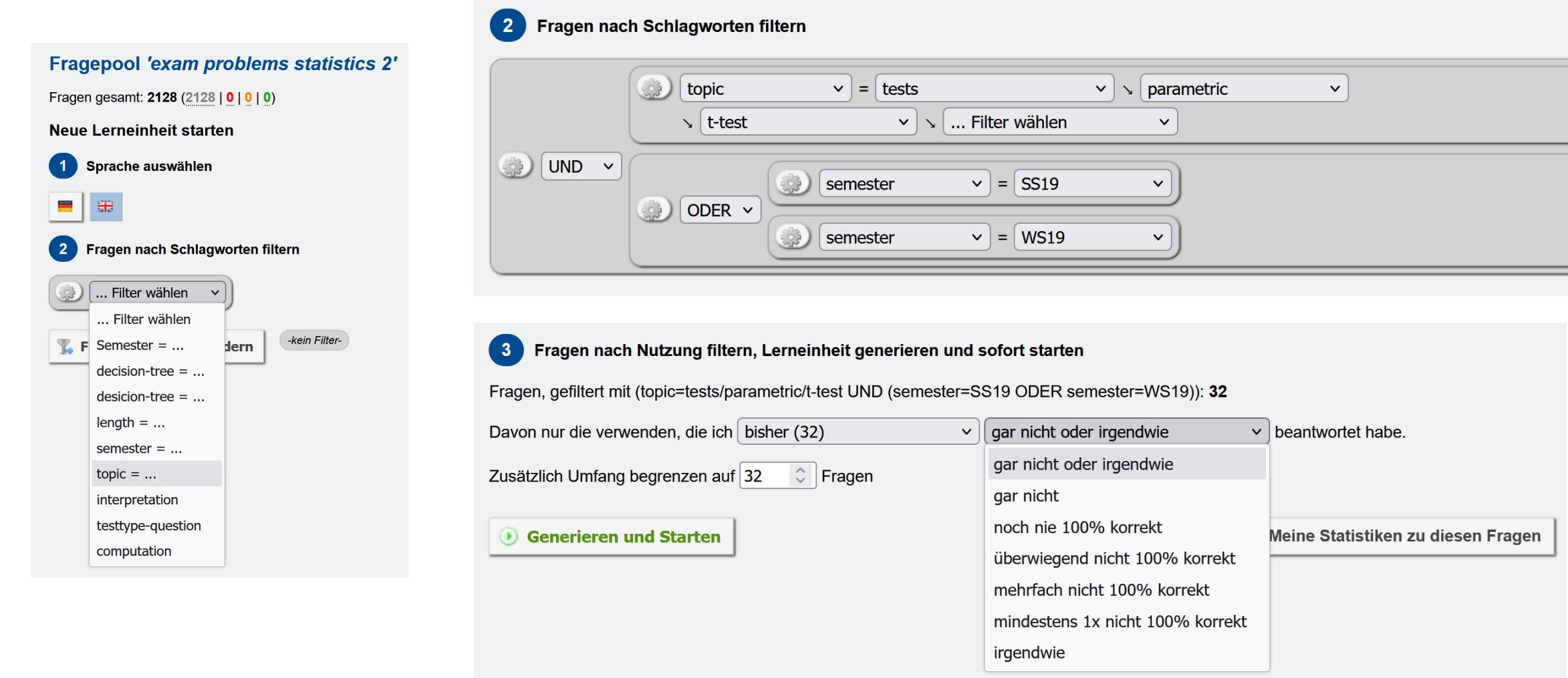


### Intervention (implemented Dec 2022-June 2023)

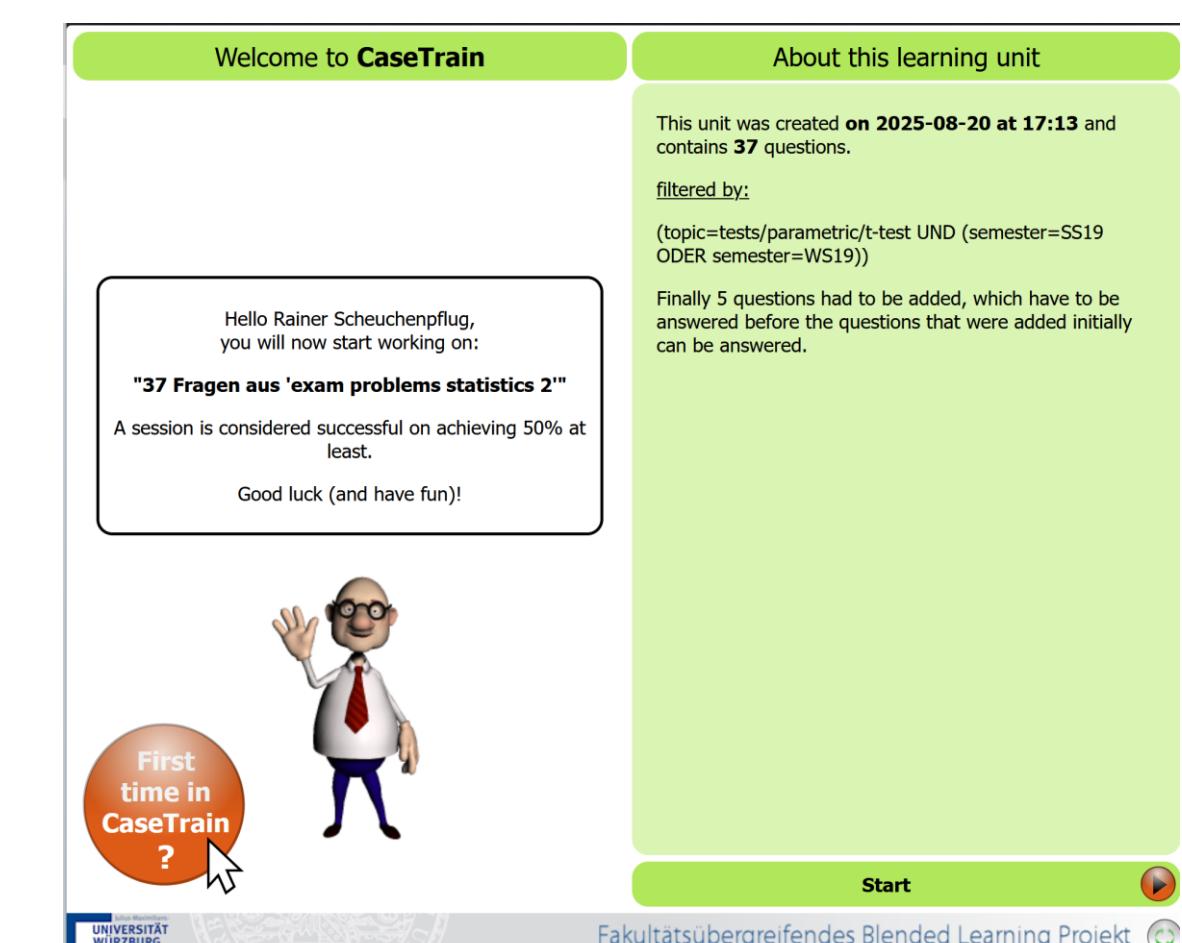
Divide previous exams into single problems, augmented with metadata



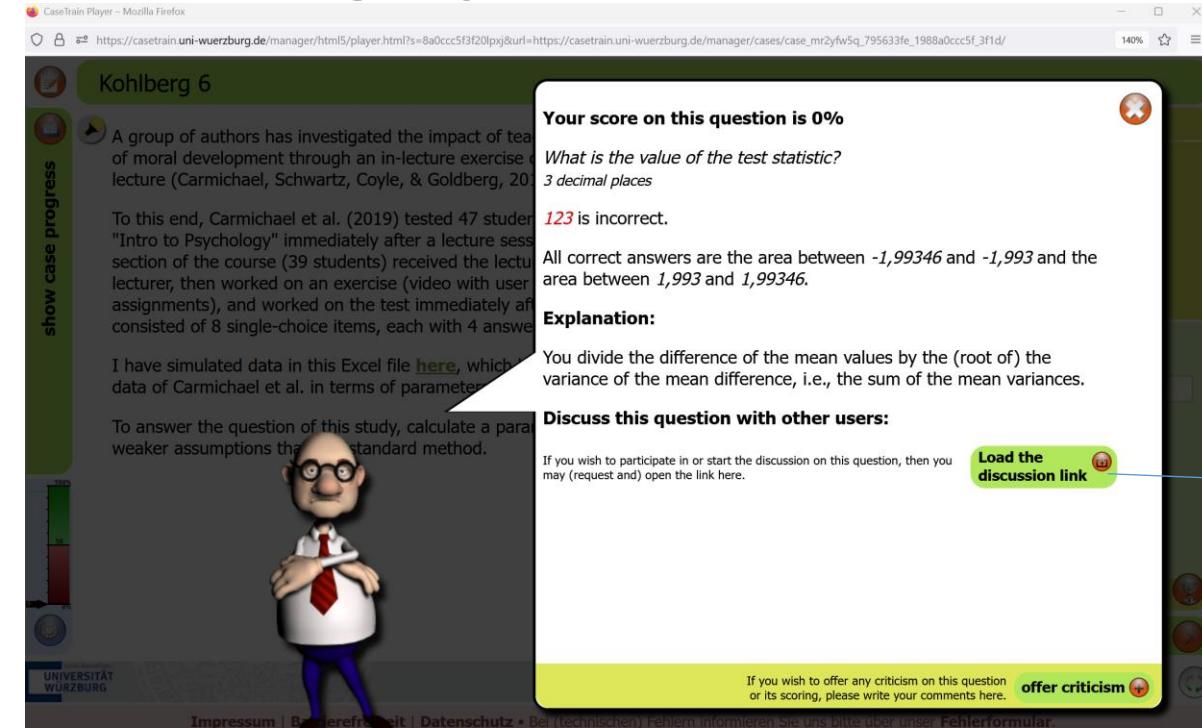
Create new interface in e-learning system



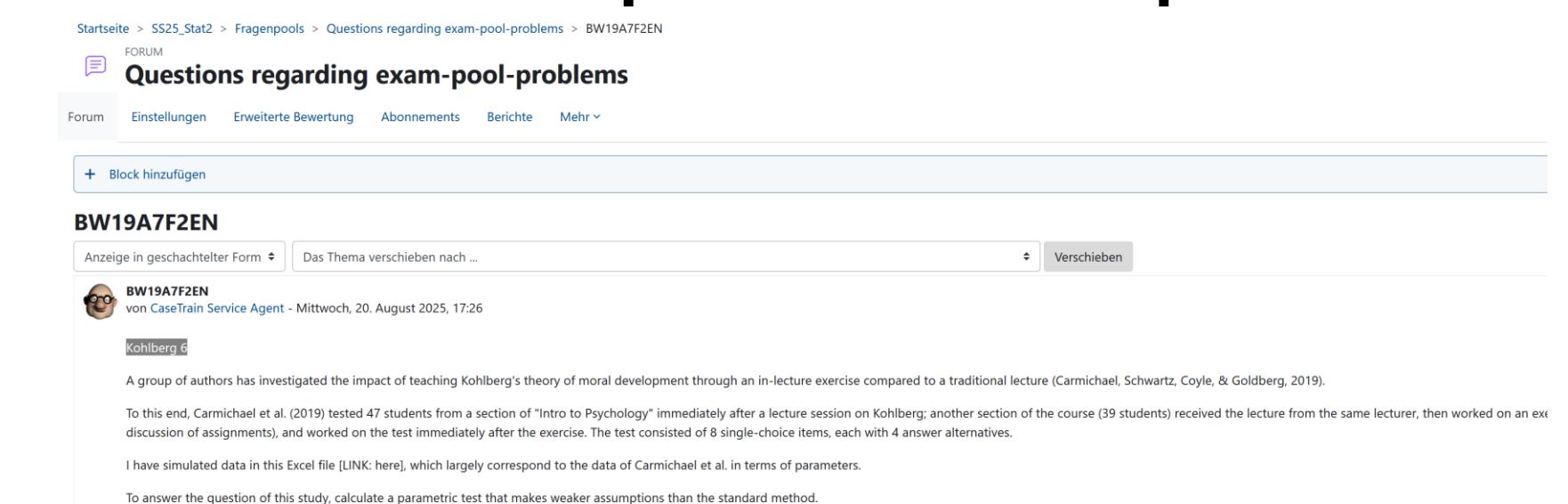
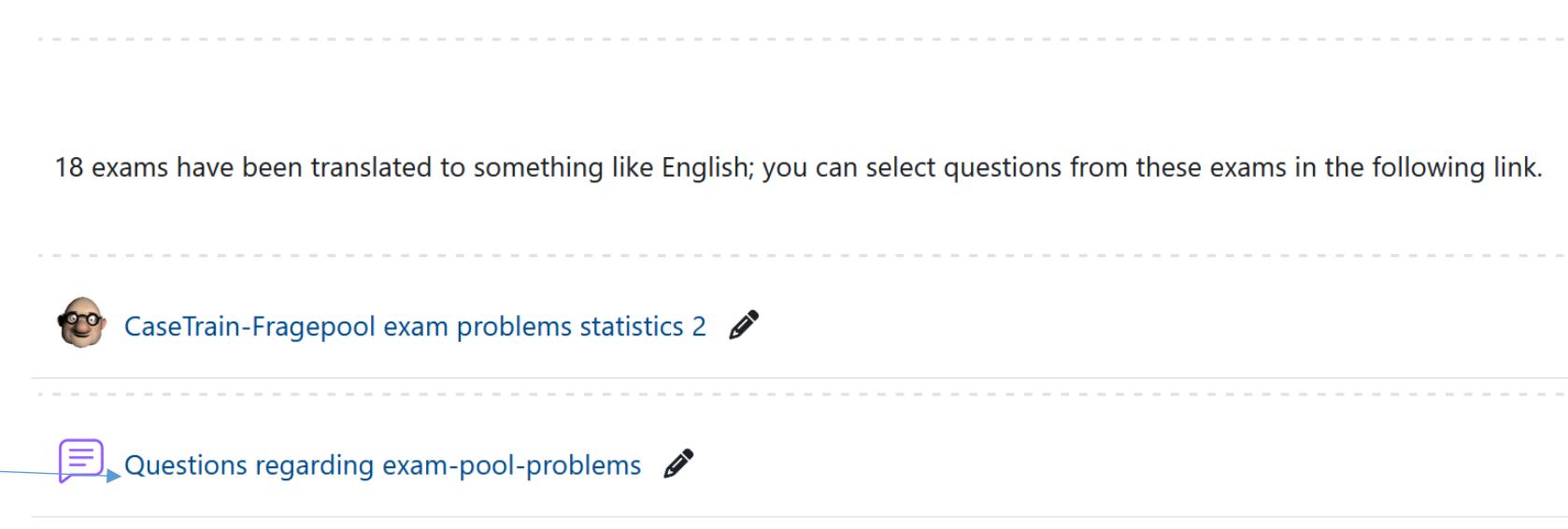
→ Students can create individual problem collections



E-learning system is connected to CMS



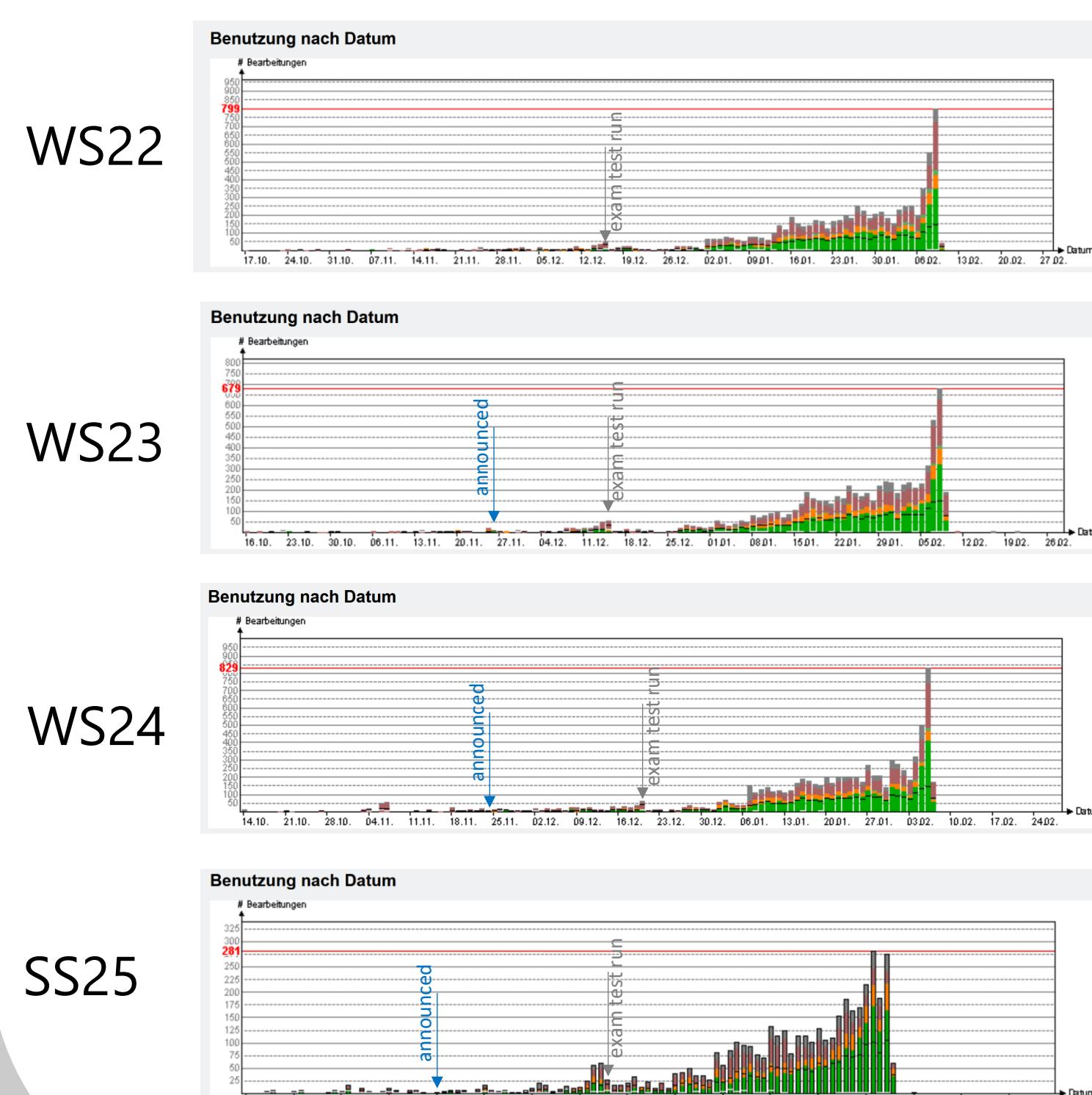
→ Students can create discussion threads to specific exam questions



### System utilization

Timing of training does not change

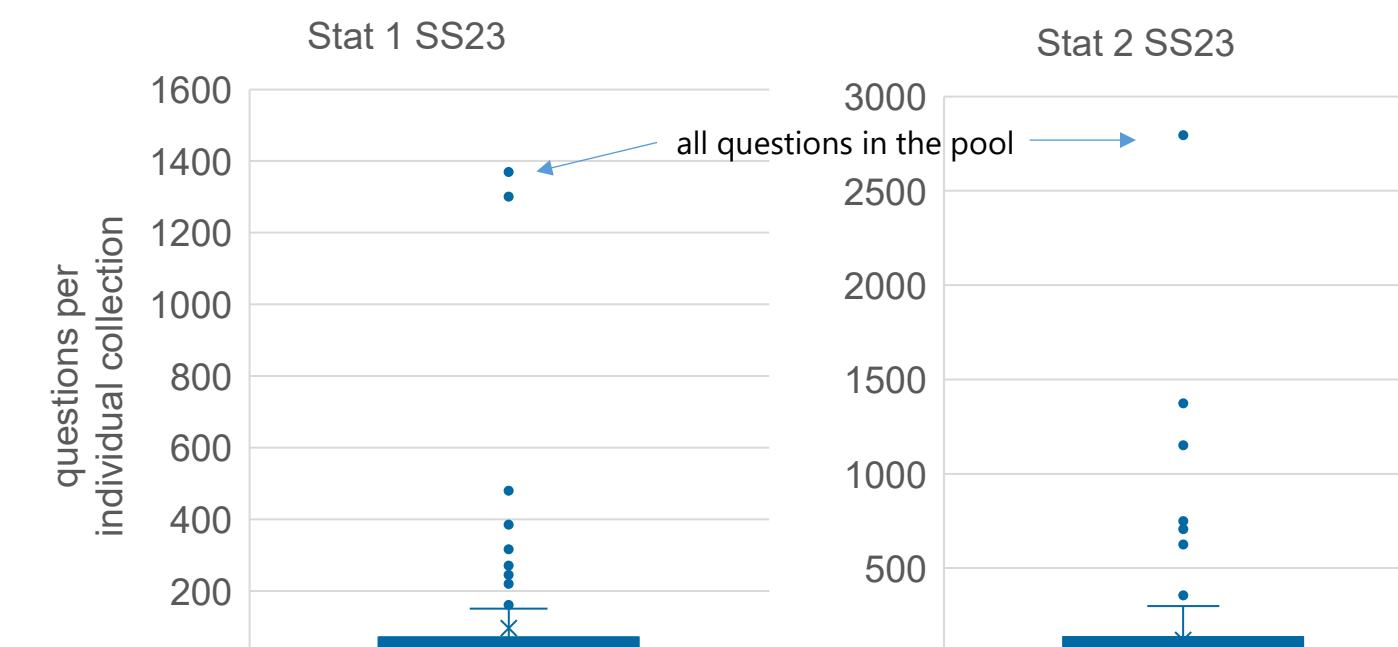
Utilization of exercises and old exams, Stat 1   Utilization of individual problem sets



System not yet available

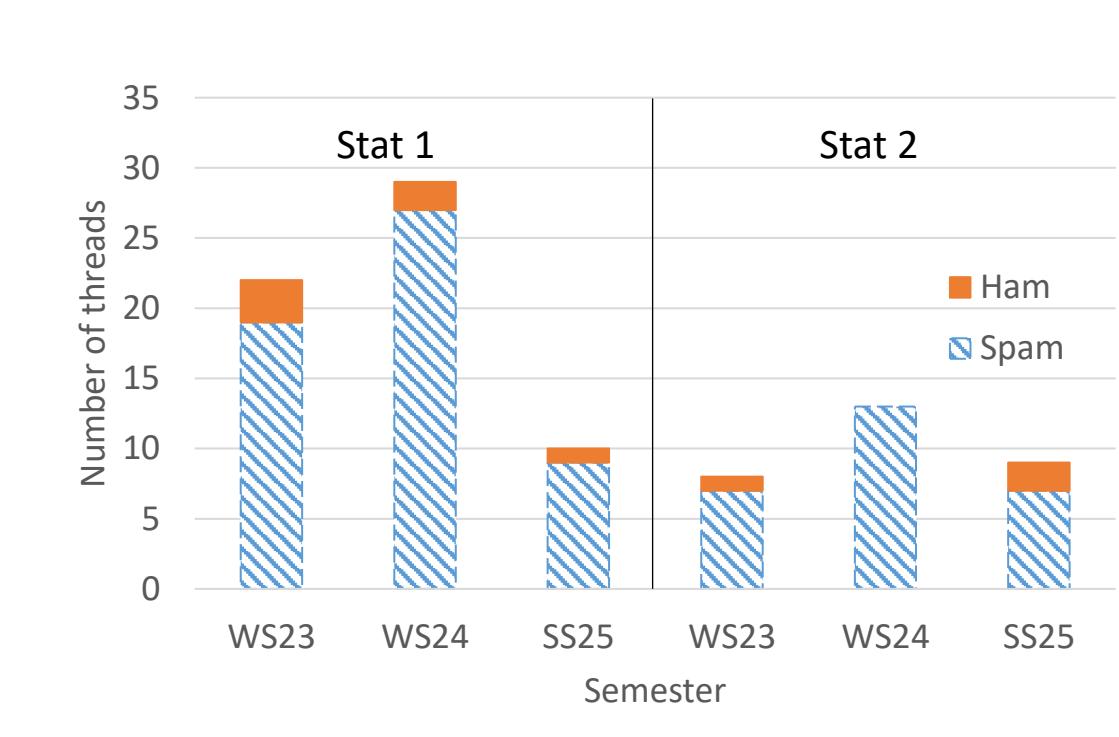


Some problem sets are huge



→ huge problem sets take a few minutes to create  
→ impatient students repeatedly click "generate set" button  
→ server becomes unresponsive  
→ Problem set size restricted to 50 questions in WS24

Discussions are not used (properly)



Most students only click "discussion link" without describing their question/problem, spamming other participants' inboxes

New system is announced and demonstrated early in the semester

Uses of discussion feature is also instructed with screenshots

Student TAs also demonstrate and use the system

But: no part of the grade, no extra credit

### Discussion

Data from students of Psychology and Human-Computer-Studies, University of Würzburg, Germany, Statistics 1 (WS22-WS24) or from students of Media Communication and Psychology (SS25). About 200 participants per exam.

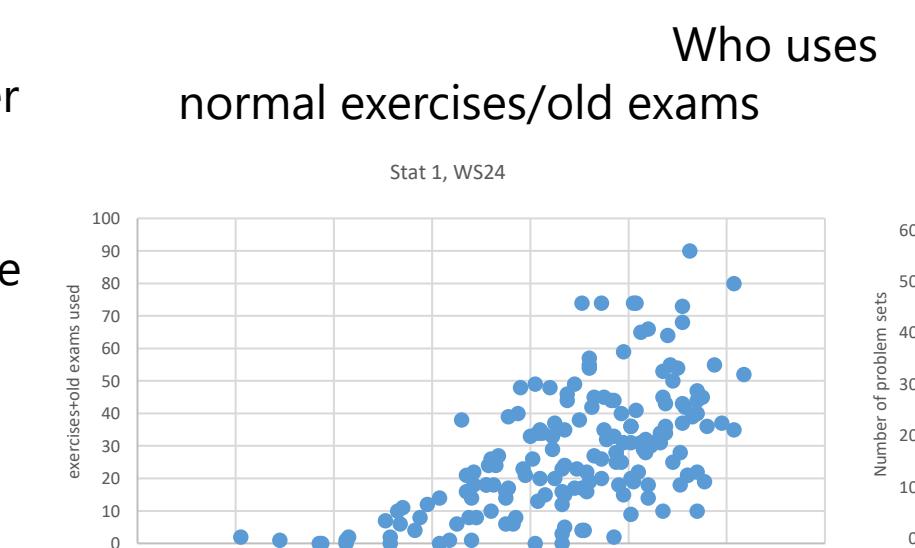
Exercises are created and presented in a special software system (CaseTrain), which is also used to run the online electronic exam. Course, exam and system language is German by default.

To familiarize students with the exam, in Stat 1 a test run is provided in the middle of the semester consisting of appropriate questions from the previous exam not yet published. Students are instructed to prepare for this test run, and receive feedback on their performance (not relevant for the final grade).

The new system was created based on student wishes and didactic considerations. Students did basically not provide feedback on new system utility (n=1).

### Further details

Who uses normal exercises/old exams



individual problem sets?

