

# Urban tree- and forest health SV0015, 20112.2223

7.5 Hp Pace of study = 100% Education cycle = Basic Course leader = Michelle Cleary

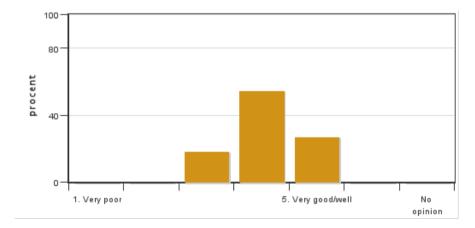
# **Evaluation report**

Evaluation period: 2023-01-11 - 2023-01-29

Answers 11 Number of students 24 Answer frequency 45 %

# **Mandatory standard questions**

# 1. My overall impression of the course is:



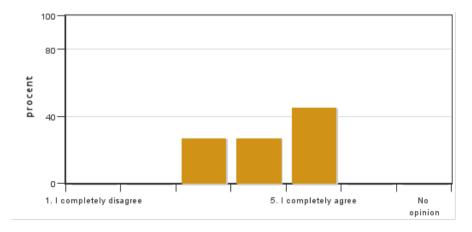
Answers: 11 Medel: 4,1 Median: 4

1: 0 2: 0 3: 2 4: 6

5: 3

No opinion: 0

## 2. I found the course content to have clear links to the learning objectives of the course.



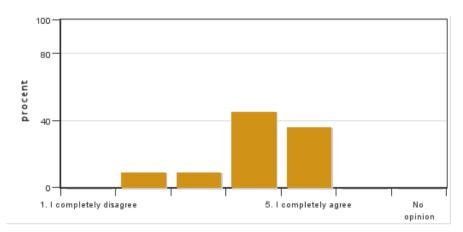
Answers: 11 Medel: 4,2 Median: 4

1: 0 2: 0 3: 3

3: 3 4: 3 5: 5

No opinion: 0

## 3. My prior knowledge was sufficient for me to benefit from the course.



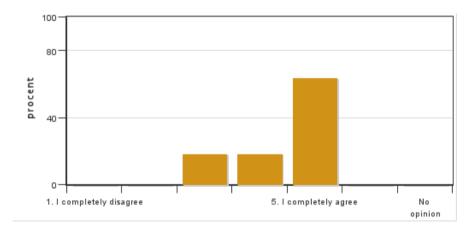
Answers: 11 Medel: 4,1 Median: 4

1: 0 2: 1

3: 1 4: 5 5: 4

No opinion: 0

# 4. The information about the course was easily accessible.



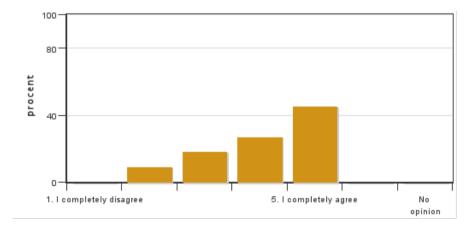
Answers: 11 Medel: 4,5 Median: 5

1: 0 2: 0

3: 2 4: 2 5: 7

No opinion: 0

# 5. The various course components (lectures, course literature, exercises etc.) have supported my learning.



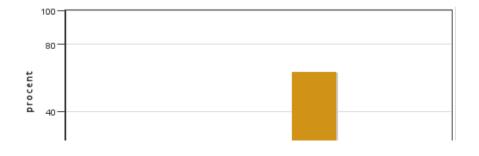
Answers: 11 Medel: 4,1 Median: 4

1: 0 2: 1 3: 2

4: 3 5: 5

No opinion: 0

#### 6. The social learning environment has been inclusive, respecting differences of opinion.



Answers: 11 Medel: 4,6 Median: 5

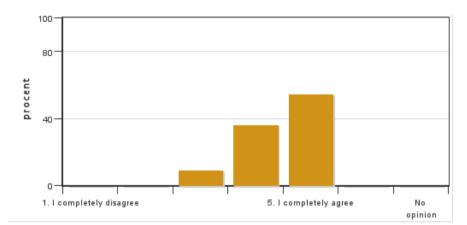
1: 0 2: 0

2: 0 3: 1

4: 2 5: 7

opinion

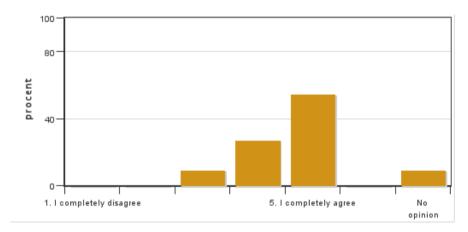
7. The physical learning environment (facilities, equipment etc.) has been satisfactory.



Answers: 11 Medel: 4.5 Median: 5 1:0 2: 0 3: 1 4: 4 5: 6

No opinion: 0

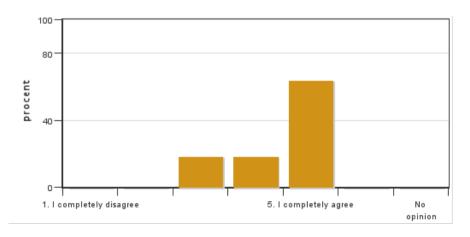
8. The examination(s) provided opportunity to demonstrate what I had learnt during the course (see the learning objectives).



Answers: 11 Medel: 4.5 Median: 5 1:0 2: 0 3: 1 4: 3 5:6

No opinion: 1

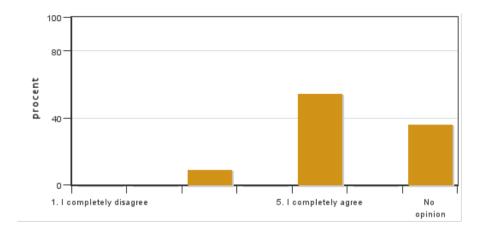
9. The course covered the sustainable development aspect (environmental, social and/or financial sustainability).



Answers: 11 Medel: 4.5 Median: 5 1:0 2: 0 3: 2 4: 2 5: 7

No opinion: 0

10. I believe the course has included a gender and equality aspect, regarding content as well as teaching practices (e.g. perspective on the subject, reading list, allocation of speaking time and the use of master suppression techniques).



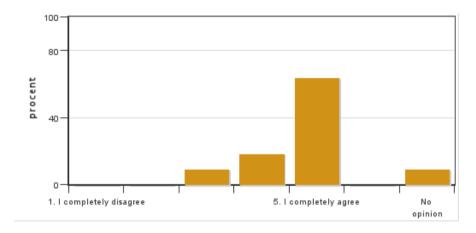
Answers: 11 Medel: 4,7 Median: 5

1: 0 2: 0

3: 1 4: 0 5: 6

No opinion: 4

#### 11. The course covered international perspectives.



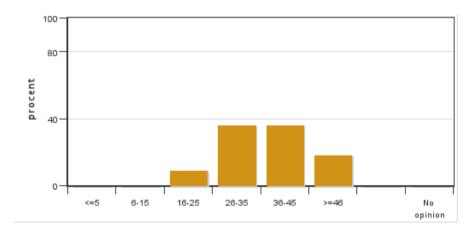
Answers: 11 Medel: 4,6 Median: 5

1: 0 2: 0 3: 1

4: 2 5: 7

No opinion: 1

#### 12. On average, I have spent ... hours/week on the course (including timetabled hours).



Answers: 11 Medel: 35,6 Median: 36-45

≤5: 0 6-15: 0 16-25: 1 26-35: 4 36-45: 4 ≥46: 2

No opinion: 0

# 13. If relevant, what is your overall experience of participating in all or part of your course online?



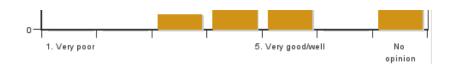
Answers: 11 Medel: 4,2

Median: 4

1: 0 2: 0 3: 1

3: 1 4: 2 5: 2

No opinion: 6



# 14. If relevant, please share what worked well when participating in teaching on distance

#### 15. If relevant, please share what worked less well when participating in teaching on distance

# Course leaders comments

This second year course in Urban Tree Health and Forest Health introduces the students to biotic agents affecting individual tree and forest ecosystem health, including damage caused by insects, pathogens, and other environmental stressors.

Overall, the course scored well (4.1/5). Students felt that that course aligned well with their overall expectations and the course objectives. Students spent an average of 35 hours a week on the course and highly appreciated both theoretical and practical elements of the course.

The practical sessions in the diagnostic and molecular laboratories were a favorite among students where they got hand-on experience with classical and molecular diagnostic methods for identifying disease-causing agents on trees. The students crave even more time for laboratory practicals and this would be good to consider for this course in the future especially if the course could be expanded to a 15 HEC course. In addition, lectures were extremely informative (a bit too much information within too little timeframe) and similar recommendation to have more time for the different topics. This wish was expressed numerous times in the course evaluation in line with the strong desire of the students to be able to get a deeper knowledge on the subject of urban tree health and forest health.

Case study approaches were used for investigative group work with local and international pathogesn causing disease on urban and forest trees. The students appreciated the efforts put into lectures and materials prepared for in-class and in-lab sessions. In the future, more exercises and examinations to test their knowledge on the different lecture topics should be incorporated. An excursion to Malmö city gave students hands-on practice in hazard tree and risk assessment in urban and peri-urban environments.

Communication throughout the course via Canvas has been great and the students found Canvas very easy to navigate.

The F&L WAC guidebook and the lab manual that was created for this course was very useful and helped the students a lot with their assignments. The WAC feedback session on their laboratory report was also highly appreciated by students, and improved their final work as a result.

# Student representatives comments

#### Course evaluation for URBAN and forest tree HEALTH

Course code: SV0015

Registration code: 20112.2223

Course period: 2 Dec 2022 - 15 Jan 2023

Location: Alnarp

Response rate: 45%

1. Overall impression of the (11 students have responded out of 24 students that had registered on the course) course.

The course has shown an overall response of satisfaction, rating 4.1 out of 5. The students have said that they liked the course content, however they have felt that it was too short for so many ambitious topics (tree pathogens).

Indeed it is a very interesting and quite difficult topic to just glance, meaning that the course could easily have 15 credits instead of 7.5. High pace course with every day new information and names. The LAB was a must, the students really appreciate to have the experience to see the fungi morphology (even though it was not possible for every single group, since fungi takes time to grow and we did not have the time), then to extract the DNA and decode. It is all a great skill to have, and to be able to learn the possibilities of the pathogenic environment of trees we work with, is quite essential.

#### 2. Learning objectives were taken into account during the course.

The response was quite high, with a mean of 4.2 out of 5, where the students stated that generally, the content has been discussed and addressed along the course.

#### 3. Prior knowledge was sufficient to benefit from the course.

With a mean of 4.1 out of 5. Since there was a lot of overlap in contents they have already been covered, it was easy to follow and to benefit from it. Some pointed out that the fact that the Latin names were difficult to make it sense on which organism they relate. Prior knowledge in biology and ecology are definitely a requirement to best perform in the course.

#### 4. The information provided by the course was easily accessible.

Overall, the students said that they were prepared by rating 4.5 out of 5. Complimenting the canvas page, affirming that provided clear information that helped the student to be guided in the modules. Also, the fact that the lectures were posted on canvas beforehand really make it easier to have the ppt whilst listening to the professor, so they could go back if they lost something that was said. Another compliment is that the lectures had a start in the important topics, which was handy when studying the slides for the exam. The summarizing of each lecture really was a must! The fact that the professors actually put an effort in concluding their ideas and provide "take home messages".

#### 5. The lectures, course, literature, and exercises were enough to support the learning.

The mean for this was 4.1 out of 5. The professors were very enthusiastic when teaching and the lectures in general were very "great", as they describe it. Another point is to involve the theory and practice, that was good for the students to be able to have the opportunity to see the pathogen and manipulate it. Some students pointed out that they did not like the fact that the content though in the lectures was intense with dense content, which makes it difficult to assimilate, memorize and learn. As a suggestion, one student highlighted the idea of ??having general content lectures, being slowly explained and exercised, before going deeper into each disease. Another student said that perhaps a textbook would have helped, instead of studying though the slides,

#### 6. The social learning environment has been inclusive, respecting differences of opinion.

With a mean of 4.6. They affirm that the class environment is quite pleasant, and that teachers and classmates have always displayed respect and politeness among each other.

#### 7. The facilities to learn had been satisfactory.

With a mean of 4.5 out of 5, the students have some complaints about the lecture room (Articum 4) affirming that the classroom would run out of air fast, due to no openings. Another factor is that the door is beside the lecturer, so when someone arrives late, the students experience high distraction and lose their focus on the content.

#### 8. The examination provided an opportunity to demonstrate what was learned during the course.

The students have rated a mean of 4.5 out of 5. Apparently, the class prefers when there is a final exam of the content that has been though, since it is a good way to exercise what they learned. Not only that, but also the opportunity to experience the Pathogen Laboratory in SLU was a must for many to acquire skills and laboratory experience. The possibility to evaluate your classmates (peer assessment) of the components of the group that wrote together the assignment was definitely relevant to give credit to who deserved. My personal opinion is that group writing can be really difficult, because some people end up working much more than others. I guess it is something to have in mind.

# 9. The course covered the sustainable development aspect (environmental, social and/or financial sustainability).

The mean is 4.5 out of 5. Meaning that the students were highly satisfied, even though there were no further comments in the matter.

# 10. The course has included a gender and equality aspect, regarding content as well as teaching practices (eg perspective on the subject, reading list, allocation of speaking time and the use of master suppression techniques).

The mean for this answer is 4.7 out of 5. No further comments to develop why the rating. However, it is possible to highlight that the professors were extremely polite and were given space for debates and ideas.

#### 11. The course covered international perspectives.

For this one the mean was low, with 4.6 out of 5. Most of the students said that was mostly covered was US and Europe, leaving behind other continents. My personal opinion is that it is more important to focus on what we see on our everyday life, because it is likely that we would end up working and dealing with diseases that are seen in our current location.

# 12. On average, students have spent ... hours/week on the course (including timetabled hours).

The students have stated that they have spent an average of 35-45 hours per week working for the course. The mean is 35.6, the students have stated that as a general rule the course has quite a heavy load. Could be due to the short credits, perhaps if the course is longer then it is less workload on reading and studying for the students, which can cause stress and burnout.

#### 13. If relevant, what is the overall experience of participating in all or part of the course online?

The general answer was 4.2 out of 5. With at least 6 students saying that was irrelevant question, since they did not recall having lectures on zoom or any other platform online. Therefore, it was not significant. Regardless of that, most of the students prefer to have the ability to be in the classroom for the lectures and exercises.

# 14. Did you refer to the WAC guidebook during the course for your writing assignment and if so did you find it useful?

From 11 students who have done the questionnaire, 10 have answered. One student said it was not useful. The others would affirm that it is useful and they have come back to it to check for misspellings or better ways to build a sentence. Another comment from a student is that the very thing that was not clear and he/she was looking forward for an answer was not in the guidebook, but it was not specified further on in what that could be. But it was mentioned that there is a lack in the material about the style of writing (APA, MLA, Harvard, Chicago, Turubian) and "how to do" figures.

#### 15. Was the feedback you received during the WAC evaluation constructive and helpful?

Most of the answers were that it has been helpful. The students prefer to have their paper checked always, if possible. This is because it gives them the feedback they need and provides room for improvement. It is important to have the reader's view on any missing information and comments on how something can be written better or framed better. The quality of the paper improves together with the abilities of the student to write, so he/she will perform better in the next.

#### 16. How did you find the Lab practical for Diagnostic (Isolation) Methods?

The general answer was 4.7 out of 5. They really enjoyed the experience to be able to isolate fungi and observe in the microscope the disease that was assigned to them. They mentioned that it would be better if there was more time, so then they could go through with major detail and practice more the pipettes and the material.

# 17. How did you find the Lab practical for Molecular Methods (DNA extraction)?

The general answer was 4.6 out of 5. Most of them liked to use the lab and to do the DNA extraction. One student felt lost in both methods (Isolation and DNA), stating that it was difficult to focus since he did not have any familiarity with the topic. Again, the students said that it would be much more fruitful if they had more time to perform the experiments in the lab.

#### 18. How did you find the Lab practical for Molecular Methods (PCR/electrophoresis and sequence analysis)?

With a mean of 4.4 out of 5, the students have some complaints about the structure of the practical lecture, affirming that it was confusing in some moments (for the electrophoresis) for the PCR, however, it was mostly following the protocol EZNA and getting the result based on the experiment. Some students have criticized the fact that we did not actively separate the material that was in the tubes when we arrived, so many would have preferred to have done that step on their own. Whereas another group of people would have preferred to have the majority done by other scientists and have just the results sent to them. Again, the time was an issue. More time would have been better

#### 19. How did you find the field excursion for Urban Tree Hazard and Risk Assessment?

The students have rated a mean of 4.4 out of 5. They really enjoyed the field work (excursion) and to be able to access urban trees in an urban environment. They also said that the lecture was fruitful and engaging with so many pauses and a good pace of teaching.

#### 20. What did you like best about the course?

"The arrangement of the laboratory and excursion was great to practice my knowledge." "The conjunction of practical and theoretical work." "Learn how different diseases that can affect trees can be very beneficial if the goal is to follow research further ahead." "To acquire knowledge about pathogens that I was not aware of and to develop a better critical view about the trees, needles and even my plants from home."

#### 21. What would you like more of?

The students said that they would prefer to have more breaks, since they though that the lectures were long and could go over an hour long sometimes. That would make them feel tired and unfocused. The fact that we had lectures both in the morning and afternoon was directly affecting the afternoon lecturer that had students really were off after a long day and the information was not being processed any more, which was unfair with the lecturer and the student. The students' request is to have a break every 45 minutes in order to optimize their learning experience. To be able to stretch their legs and get some air to be able to get oxygen circulation would help them to improve their focus, since they would be slightly energized. One student mentioned the urban part of the course was not really covered, wishing for the upcoming course that this topic is more often brought up so then the student perspective is enlarged. There were suggestions from students to improve the pace of the course to use bullet points in the presentations and less text, letting it be explored orally by the lecturer. Start with definitions, then some sort of matrix where you can see every disease that can affect coniferous and all that can affect deciduous and then both and how to recognize and then how to "solve". Again, the students pointed out the necessity to have more time and enlarged the credits of the course, changing form 7.5hp to 15h, and as a suggestion to separate at least 7.5hp only for fungi. The students have brought up that another course promoted earlier in the FLAP Program - Forest and Landscape Governance (LK0424) could be shortened out to 7.

## 22. Space for further comments

As a suggestion: perhaps an excursion to look at the trees and try to identify pathogens would be a good visual exercise, since we have so many students who have visual learning. For some the fact that the disease was being given in English and not covered in Swedish makes it hard for them to relate that with their prior knowledge, so they suggest to have a side list with the diseases in Swedish.

Kontakta support: support@slu.se - 018-67 6600