



1st INTERNATIONAL CONFERENCE OF FEE ECOCAMPUS
Getting Higher Level Education Climate Ready
26-27th April 2024

Harnessing the Power of Plants: A Study of the ESCS Green Room

Alexandra David and Cláudia Silvestre



ESCOLA SUPERIOR
DE COMUNICAÇÃO SOCIAL

Index

I. Introduction

II. The Global Goals

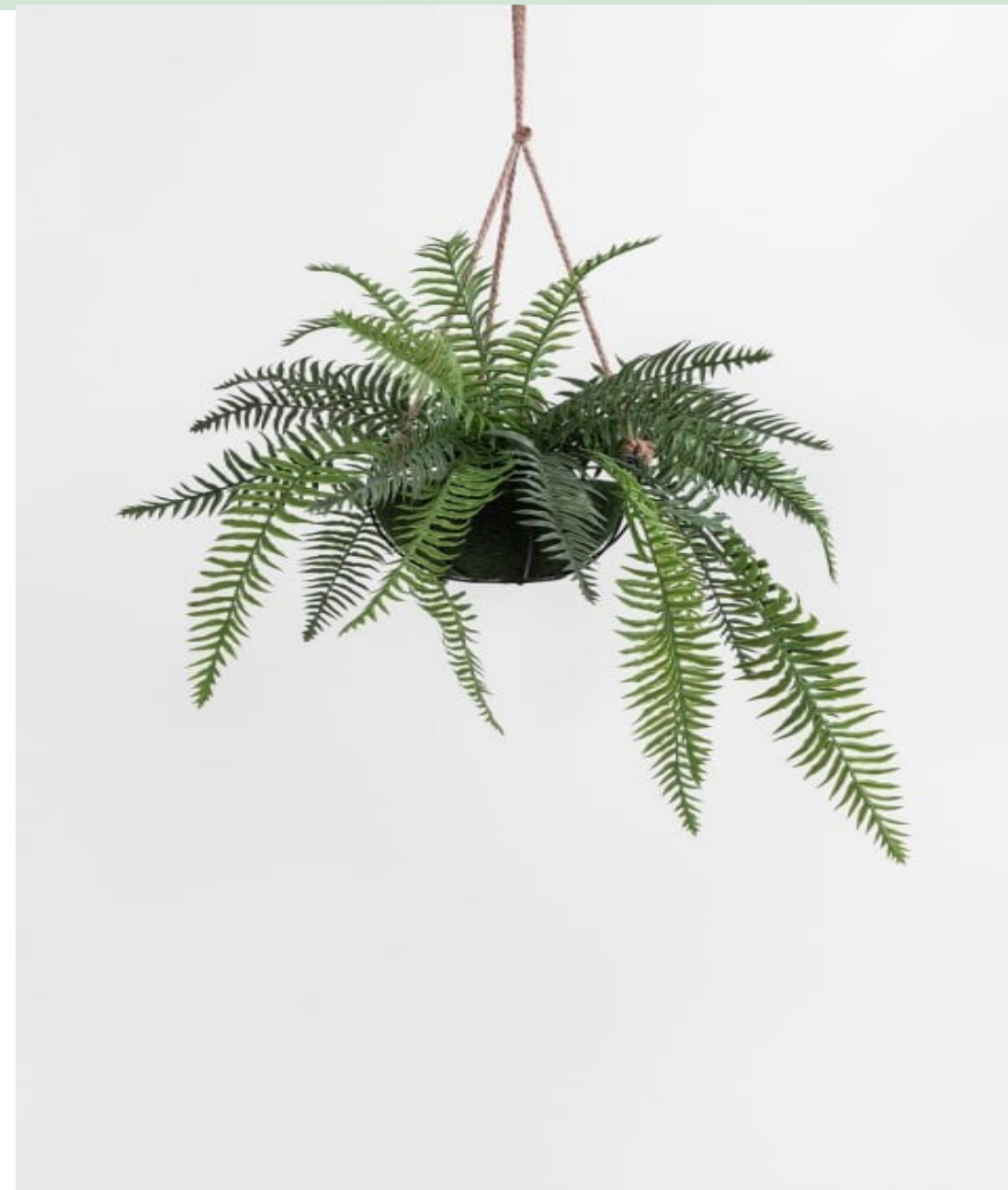
III. The benefits of plants:

- Air quality
- Psychological benefits
- Aesthetic
- Environmental sustainability

IV. The ESCS Green Room

V. Survey

VI. Conclusion



I - Introduction

In order to personalize a classroom based on the idea of sustainability, the idea of creating a green room emerged.



II - The Global Goals



THE GLOBAL GOALS

- 3 - Good Health and Well-being
- 4 - Quality Education
- 11 - Sustainable Cities and Communities
- 12 - Responsible Consumption and Production
- 13 - Climate Action
- 15 - Life on Land



III - The benefits of plants

- Air quality
- Psychological benefits
- Aesthetic
- Environmental sustainability



■ Air quality

Plants contribute to improving air quality

- The selected plants (**Snake Plant, Peace Lily, Aloe Vera, Yucca, Ivy and Fern**) have the ability to improve air quality, being suitable for environments with high population density (Wolverton et al., 1989 and Chauhan et al., 2022).



■ Air quality

Plants contribute to improving air quality

The results of measuring CO₂ concentration levels in the:

- Green Room - 555.2 ppm
- Conventional classroom 597.6 ppm

(both empty)

Confirm this phenomenon ✓



■ Psychological benefits

Connecting with nature is consistently associated with psychological benefits

A review of the literature (Lorenzo Montero, M. E., 2023), highlighted five dimensions:

- attention restoration
- stress reduction
- psychological well-being
- mental health
- psychosocial benefits.



■ Aesthetic

Plants make spaces more beautiful

Aesthetics play a crucial role in creating inspiring academic environments and plants, as attractive visual elements, contribute to subjective perception of air quality, concentration and satisfaction, as well as objective measures of productivity (Nieuwenhuis, et al., 2014).



■ Environmental sustainability

Plants contribute to environmental sustainability

A review of the literature highlights (Danielski, et al., 2022):

- is in line with the growing global concern for the environment
- contributes to reducing the carbon footprint
- makes spaces ecologically balanced



IV - The ESCS Green Room

The green room was chosen by both teachers and students for various classes and conferences.



V - Survey

Green Room through the Participants' Eyes



■ The participants



120 responses

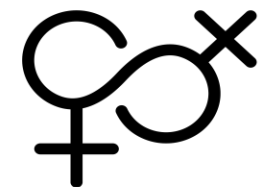
109 students

11 teachers

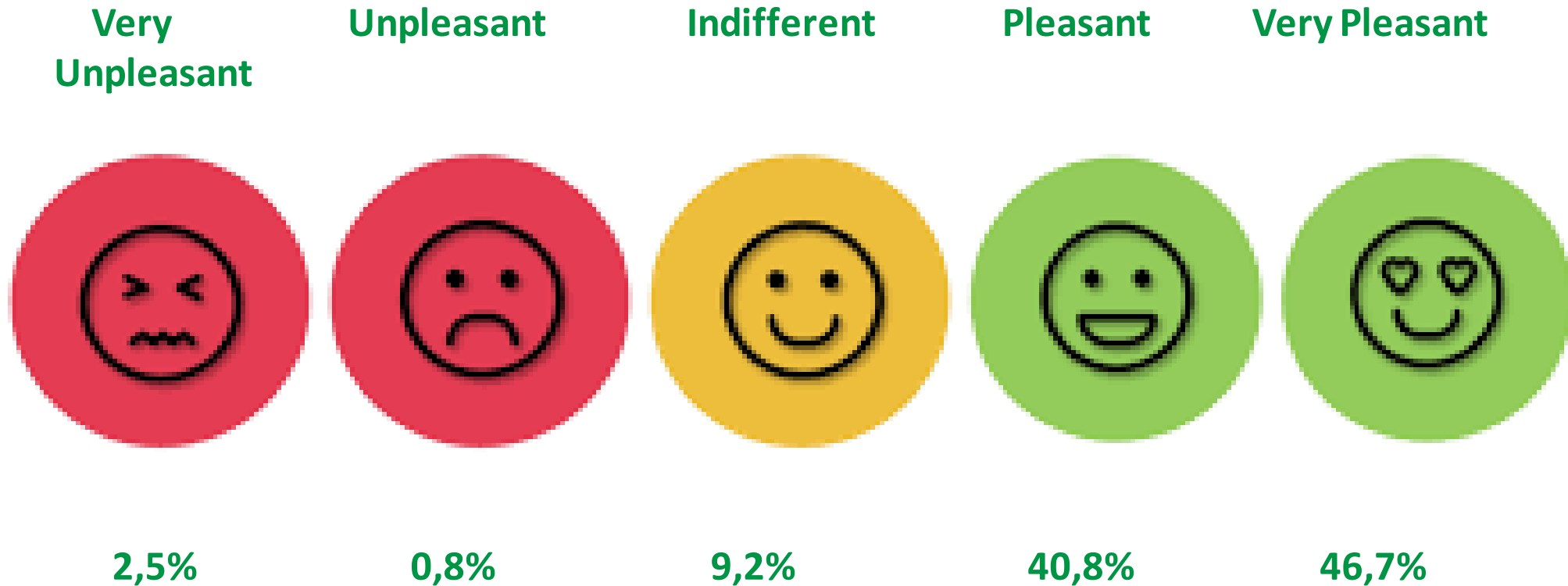
65% Female

30% Male

5% Other

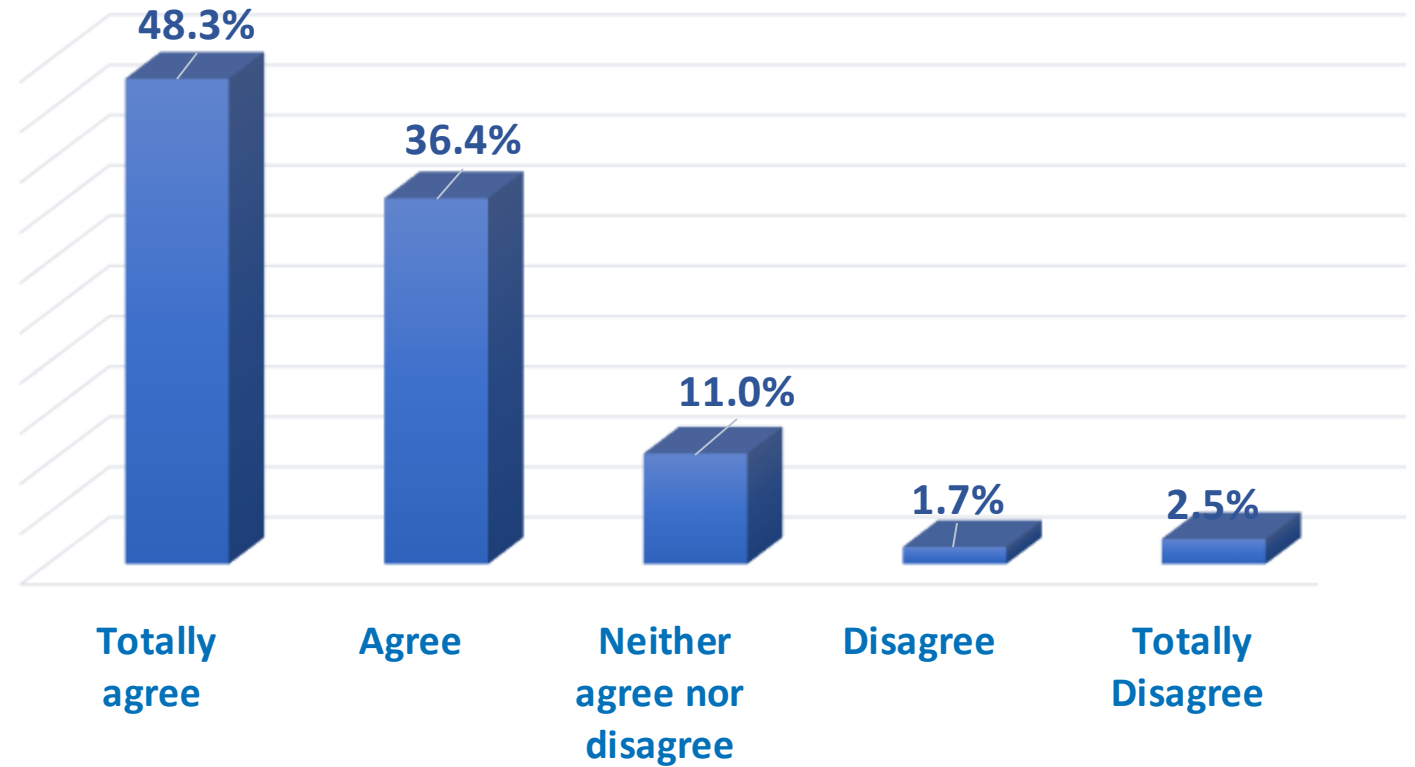


Overall perception of the room

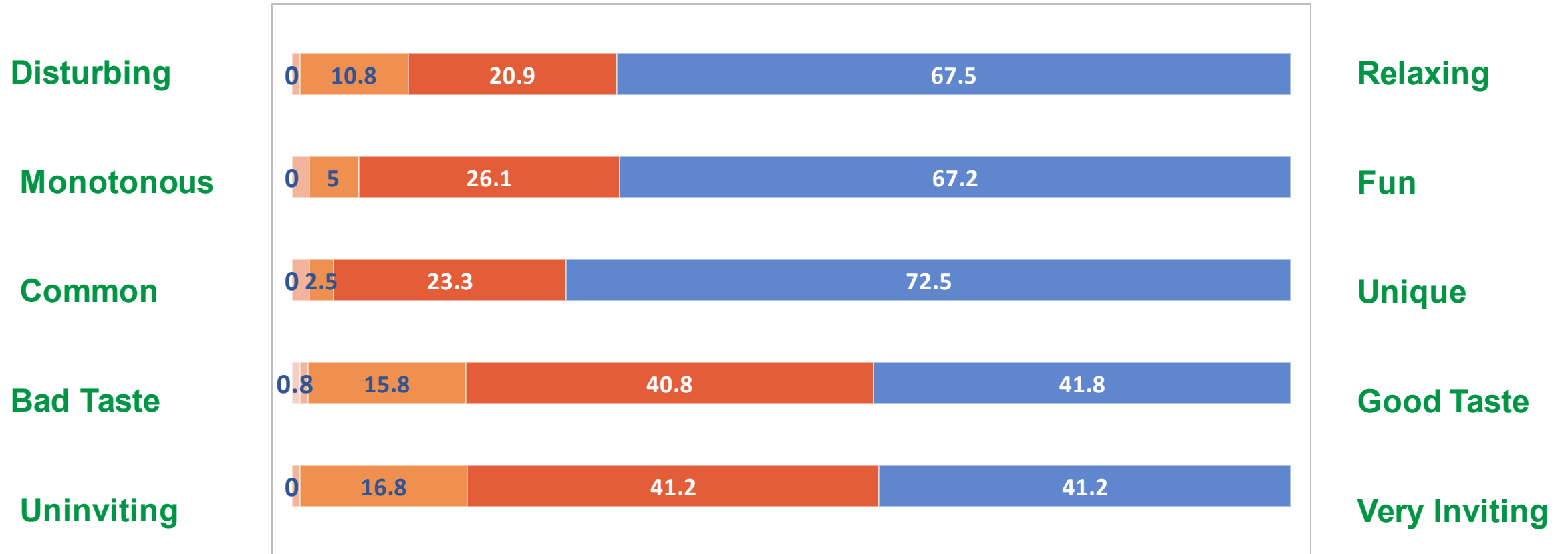




- **The plants in the classroom contribute to a healthier environment.**



- The plants in the classroom contribute to a more relaxing environment.



VI - Conclusion

The Green Room appears as a space that offers tangible benefits for air quality, well-being, aesthetics and sustainability, promoting a more stimulating academic environment and aligned with sustainable development objectives.



Step into the spirit of the Green Room!



THANK YOU



SUPPORTED BY:

