

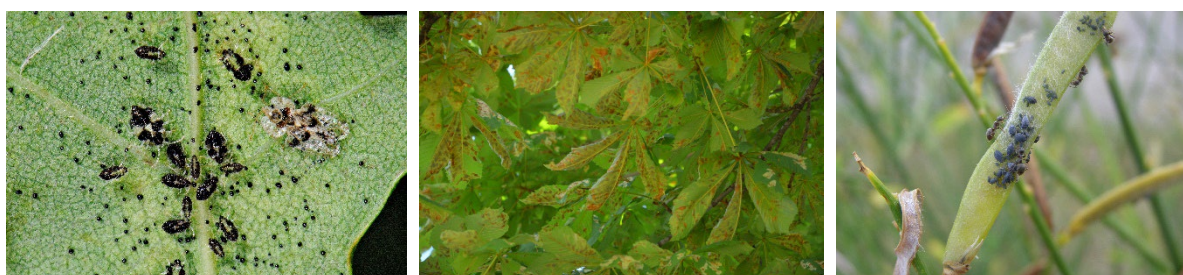
COST Action CA20132 “UrbanTreeGuard” Training school

INSECTS PESTS AND URBAN TREE HEALTH current challenges and solutions



Ljubljana, Slovenia, August 26-30, 2024

(Preliminary information)



Urban trees provide essential ecosystem services, including temperature regulation, cultural and aesthetic values, and support for biodiversity. However, due to global trade and climate change, there is an increasing pressure by native and nonnative tree insect pests on urban trees and forests.

The CA20132 Training School aims to provide the participants with an updated scientific background regarding biology, diagnosis, and management of insect tree pests.

Day 1: Introduction

Goals: *get to know each other and understand motivations for organizing and attending the training school; discover Ljubljana and (part of) its urban forest.*

- Excursion from city center to the venue (Slovenian Forestry Institute)

Presentations:

- Introduction of training school and all participants (through Flash talks).
- Presentations: What are urban forests?
- Presentations: Pests in urban forests.

Day 2: Insects

Goals: Get an overview of the diversity of insects in cities; understand the ecological mechanisms structuring insect communities in cities; gain knowledge on the main urban pests, including the “most unwanted species” that represent major threats to urban forests.

Presentations:

- Discover and understand the diversity of insects in urban environments.
- Understand the ecology of the main groups of urban tree pest insects, including native and alien invasive species:
 - o sap sucking insects,
 - o bark beetles and other woodboring insects,
 - o leaf miners and defoliators,
 - o urticating caterpillars.
- Get introduced to quarantine priority pests.

Practical: Determination of insects in the lab, presentation of trapping methods.

Social dinner

Day 3: Innovative approaches and technologies

Goals: Introduce the diversity of lethal and non-lethal methods used for early detection and monitoring of urban tree pest insects; understand advantages and limitations of each method.

Presentations:

- Determination methods (traditional)
- Citizen science
- Traps
- AI
- Molecular methods

Practical: Bioblitz

Day 4: Management of insects in urban areas

Goals: Understand basic principles of the management of urban tree health; integrate ecological, social, ethical, and legal perspectives; elaborate joint papers.

Presentations:

- Traditional approach
- Innovative approach
- Conservation approach

- Social science, communication with the general public

Excursion: Presentation of park manager

Group work: Preparation of a review and a joint study.

Day 5:

- Preparation of a structure for a review article.
- Discussion for a joined experiment.

Organizers:

- **Maarten de Groot**, *Slovenian Forestry Institute (SFI), Ljubljana, Slovenia*
- **Leopold Poljaković-Pajnik**, *Institute of Lowland Forestry and Environment (ILFE), Novi Sad, Serbia*
- **Bastien Castagneyrol**, *INRAE – University of Bordeaux, France*
- **Tine Hauptman**, *Slovenian Forestry Institute (SFI), Ljubljana, Slovenia*

The Training school venue:

Gozdarski inštitut Slovenije - Slovenian Forestry Institute

Večna pot 2, 1000 Ljubljana



Local organizers contact persons:

Dr Maarten de Groot (maarten.degroot@gozdis.si)

Dr Tine Hauptman (tine.hauptman@gozdis.si)