
Biogenic VOC Emission Profiling of Urban Trees in Paris

Marko Keibert*¹, Aarani Mayuran², Ruben Puga-Freitas¹, Luis Leitao¹, Christophe Boissard², Lorna Foliot², Antonin Bergé², Anne Reppelin¹, Nicolas Bonnaire², Valérie Gros², and Juliette Leymarie¹

¹UPEC (iEES) – Université Paris-Est Créteil (UPEC) – France

²Chimie Atmosphérique Expérimentale (CAE) – Laboratoire des Sciences du Climat et de l'Environnement [Gif-sur-Yvette] – France

Résumé

Urban vegetation can significantly influence air quality through the emission of biogenic volatile organic compounds (BVOCs), which may contribute to the formation of secondary organic aerosols (SOAs) and ozone. Within the framework of the INTEGRREEN project, we conducted a campaign at Solange Falade Park, Paris, where we used targeted and non-targeted metabolic approaches to quantify BVOC emissions and ecophysiological parameters from nine urban tree species. This work provides essential data to inform tree selection for sustainable urban planning and air quality management

Mots-Clés: bVOC, urban tree species, Integreen campagn, PTR, MS, GC, FID, monoterpens, isoprene

*Intervenant