Publications de la plateforme analytique de l'UMR SVQV 2008-2025

(revues internationales à comité de lecture)

Tavernier F. *et al.* (2025) The single-berry metabolomic clock paradigm reveals new stages and metabolic switches during grapevine berry development. ***Journal of Experimental Botany*** eraf038, https://doi.org/10.1093/jxb/eraf038

Louis A. *et al.* (2025) Green Extraction Method: Microwave-Assisted Water Extraction Followed by HILIC-HRMS Analysis to Quantify Hydrophilic Compounds in Plants. ***Metabolites*** 15, 223. https://doi.org/10.3390/metabo15040223

Verdier M. *et al.* (2024) The Turnip Yellows Virus Capsid Protein Promotes Access of Its Main Aphid Vector Myzus persicae to Phloem Tissues. ***Plant, Cell and Environment***. https://doi.org/10.1111/pce.15303

Claudel P. *et al*. (2024) A test-tube vinification method for high-throughput characterisation of the oenological and aromatic potential of white wines. ***OENO One*** 58 (1). https://doi.org/10.20870/oeno-one.2024.58.1.7698

Leschevin M. *et al.* (2024) Photosystem rearrangements, photosynthetic efficiency, and plant growth in far red-enriched light*.* ***Plant Journal*** 120(6): 2536-2552. https://doi.org/10.1111/tpj.17127

Brulé D. *et al*. (2024) Increasing vineyard sustainability: innovating a targeted chitosan-derived biocontrol solution to induce grapevine resistance against downy and powdery mildews. ***Front Plant Sci.*** 15: 1360254 https://doi.org/10.3389/fpls.2024.1360254

Djennane S. *et al.* (2024) CRISPR/Cas9 editing of Downy mildew resistant 6 (DMR6-1) in grapevine leads to reduced susceptibility to Plasmopara viticola. ***Journal of Experimental Botany*** 75(7): 2100-2112. https://doi.org/10.1093/jxb/erad487

Krieger C. *et al*. (2023) An Aphid-Transmitted Virus Reduces the Host Plant Response to Its Vector to Promote Its Transmission. ***Phytopathology*** 113(9): 1745-1760. https://doi.org/10.1094/PHYTO-12-22-0454-FI

Platel, R. *et al.* (2023) Deciphering immune responses primed by a bacterial lipopeptide in wheat towards Zymoseptoria tritici. ***Front Plant Sci.*** 13, 1074447. https://doi.org/10.3389/fpls.2022.1074447

Olazcuaga, L. *et al.* (2023) Metabolic consequences of various fruit-based diets in a generalist insect species. ***eLife*** 12, e84370. https://doi.org/10.7554/elife.84370

Koutouan, C. *et al.* (2023) Co-Localization of Resistance and Metabolic Quantitative Trait Loci on Carrot Genome Reveals Fungitoxic Terpenes and Related Candidate Genes Associated with the Resistance to Alternaria dauci. ***Metabolites*** 13, 71. https://doi.org/10.3390/metabo13010071

Flubacher, N. *et al.* (2023) The fungal metabolite 4-hydroxyphenylacetic acid from Neofusicoccum parvum modulates defence responses in grapevine. ***Plant, Cell and Environment*** 46(11): 3575-3591. https://doi.org/10.1111/pce.14670

Rodrigues, M. *et al.* (2023) Metabolic and Molecular Rearrangements of Sauvignon Blanc (Vitis vinifera L.) Berries in Response to Foliar Applications of Specific Dry Yeast. ***Plants***,12,3423. https://doi.org/10.3390/plants12193423

Zhang C. *et al*. (2023) MYB24 orchestrates terpene and flavonol metabolism as light responses to anthocyanin depletion in variegated grape berries. **Plant Cell** 35(12): 4238-4265. https://doi.org/10.1093/plcell/koad228

Allario, T. *et al.* (2023) Analysis of defense-related gene expression and leaf metabolome in wheat during the early infection stages of Blumeria graminis f.sp. tritici. ***Phytopathology*** . https://doi.org:10.1094/phyto-10-22-0364-r

Schilling, M. *et al.* (2022) Wood degradation by Fomitiporia mediterranea M. Fischer: Physiologic, metabolomic and proteomic approaches. ***Front Plant Sci.*** 13, 988709. https://doi.org:10.3389/fpls.2022.988709

Platel, R. *et al.* (2022) Bioinspired Rhamnolipid Protects Wheat Against Zymoseptoria tritici Through Mainly Direct Antifungal Activity and Without Major Impact on Leaf Physiology. ***Front Plant Sci.*** 13, 878272. https://doi.org:10.3389/fpls.2022.878272

Negrel, L. *et al.* (2022) Comparative Metabolomic Analysis of Four Fabaceae and Relationship to In Vitro Nematicidal Activity against Xiphinema index. ***Molecules*** 27, 3052. https://doi.org:10.3390/molecules27103052

Koschmieder, J. *et al.* (2022) Color recycling: metabolization of apocarotenoid degradation products suggests carbon regeneration via primary metabolic pathways. ***Plant Cell Reports*** 41, 961 - 977. https://doi.org:10.1007/s00299-022-02831-8

de Borba, M. *et al.* (2022) A Laminarin-Based Formulation Protects Wheat Against Zymoseptoria tritici via Direct Antifungal Activity and Elicitation of Host Defense-Related Genes. ***Plant Disease*** 106, 1408-1418. https://doi.org:10.1094/pdis-08-21-1675-re

Martin, I. R. *et al.* (2021) Severe Stunting Symptoms upon Nepovirus Infection Are Reminiscent of a Chronic Hypersensitive-like Response in a Perennial Woody Fruit Crop. ***Viruses*** 13, 2138. https://doi.org:10.3390/v13112138

de Borba, M. C. *et al.* (2021)The Algal Polysaccharide Ulvan Induces Resistance in Wheat Against Zymoseptoria tritici Without Major Alteration of Leaf Metabolome. ***Front Plant Sci.*** 12, 703712. https://doi.org:10.3389/fpls.2021.703712

Sun, P. *et al.* (2020) Functional diversification in the Nudix hydrolase gene family drives sesquiterpene biosynthesis in Rosa × wichurana. ***Plant Journal*** 104, 185-199. https://doi.org:10.1111/tpj.14916

Koschmieder, J. *et al.* (2020) Plant apocarotenoid metabolism utilizes defense mechanisms against reactive carbonyl species and xenobiotics. ***Plant Physiology*** 185, 331-351. https://doi.org/10.1093/plphys/kiaa033

Koutouan, C. *et al.* (2019) Carrot resistance against Alternaria leaf blight: potential involvement of terpenes and flavonoids. ***Acta Horticulturae***, 191-198. https://doi.org/10.17660/ActaHortic.2019.1264.23

Plomion, C. *et al.* (2018) Oak genome reveals facets of long lifespan. ***Nature Plants*** 4, 440-452. https://doi.org/10.1038/s41477-018-0172-3

Negrel, L. *et al.* (2018) Identification of lipid markers of Plasmopara viticola infection in grapevine using a non-targeted metabolomic approach. ***Front Plant Sci.*** 9, 1-11. https://doi.org/10.3389/fpls.2018.00360

Koutouan, C. *et al.* (2018) Link between carrot leaf secondary metabolites and resistance to Alternaria dauci. ***Scientific Reports*** 8, 13746. https://doi.org/10.1038/s41598-018-31700-2

Ilc, T. *et al.* (2018) Annotation, classification, genomic organization and expression of the Vitis vinifera CYPome. ***PLoS ONE*** 13, e0199902. https://doi.org/10.1371/journal.pone.0199902

Claudel, P. *et al.* (2018) The Aphid-Transmitted Turnip yellows virus Differentially Affects Volatiles Emission and Subsequent Vector Behavior in Two Brassicaceae Plants. ***International Journal of Molecular Sciences*** 19. https://doi.org/10.3390/ijms19082316

Akaberi, S. *et al.* (2018) Grapevine fatty acid hydroperoxide lyase generates actin-disrupting volatiles and promotes defence-related cell death. ***Journal of Experimental Botany*** 69, 2883-2896. https://doi.org/10.1093/jxb/ery133

Ilc, T. *et al.* (2017) A grapevine cytochrome P450 generates the precursor of wine lactone, a key odorant in wine. ***New Phytologist*** 213, 264-274. https://doi.org/10.1111/nph.14139

Sun, P. *et al*. (2016) My way: noncanonical biosynthesis pathways for plant volatiles. ***Trends in Plant Science*** 21, 884-894. https://doi.org/10.1016/j.tplants.2016.07.007

Koechler, S. *et al.* (2016) Arsenite response in Coccomyxa sp. Carn explored by transcriptomic and non-targeted metabolomic approaches. ***Environmental Microbiology*** 18, 1289--1300. https://doi.org/10.1111/1462-2920.13227

Magnard, J.-L. *et al.* (2015) Biosynthesis of monoterpene scent compounds in roses. ***Science*** 349, 81-83. https://doi.org/10.1126/science.aab0696

Duan, D. *et al.* (2015) Genetic diversity of stilbene metabolism in Vitis sylvestris. ***Journal of Experimental Botany*** 66, 3243-3257. https://doi.org:10.1093/jxb/erv137

Guillaumie, S. *et al.* (2013) Genetic analysis of the biosynthesis of 2-methoxy-3-isobutylpyrazine, a major grape-derived aroma compound impacting wine quality. ***Plant Physiology*** 162, 604-615. https://doi.org/10.1104/pp.113.218313

Fischer, M. *et al.* (2013) Determination of amino-acidic positions important for Ocimum basilicum geraniol synthase activity. ***Advances in Bioscience and Biotechnology*** 2013, 242-249. http://dx.doi.org/10.4236/abb.2013.42033

Fischer, M. *et al.* (2013) Specificity of Ocimum basilicum geraniol synthase modified by its expression in different heterologous systems. ***Journal of Biotechnology*** 163, 24-29. https://doi.org/10.1016/j.jbiotec.2012.10.012

Parage, C. *et al.* (2012) Structural, Functional, and Evolutionary Analysis of the Unusually Large Stilbene Synthase Gene Family in Grapevine. ***Plant Physiology*** 160, 1407-1419. https://doi.org/10.1104/pp.112.202705

Fournier-Level, A. *et al*. (2011) Genetic mechanisms underlying the methylation level of anthocyanins in grape (Vitis vinifera L.). ***BMC Plant Biology*** 11, 1-14. https://doi.org/10.1186/1471-2229-11-179

Hugueney, P. *et al.* (2009) A novel cation-dependent o-methyltransferase involved in anthocyanin methylation in grapevine. ***Plant Physiology*** 150, 2057-2070. https://doi.org/10.1104/pp.109.140376

Chong J. *et al*. (2009) Metabolism and roles of stilbenes in plants. ***Plant Science*** 177, 143-155. https://doi.org/10.1016/j.plantsci.2009.05.012

Schmidlin, L. *et al.* (2008) A stress-inducible resveratrol O-methyltransferase involved in the biosynthesis of pterostilbene in grapevine. ***Plant Physiology*** 148, 1630–1639. https://doi.org/10.1104/pp.108.126003

Scalliet, G. *et al.* (2008) Scent evolution in Chinese roses. ***Proceedings of the National Academy of Sciences of the United States of America*** 105, 5927-5932. https://doi.org/10.1073/pnas.0711551105