

MÓNIKA VALDENEGRO ESPINOZA

*Escuela de Agronomía, Pontificia Universidad Católica de Valparaíso,
Calle San Francisco s/n, La Palma, Quillota, Chile*

I. PUBLICACIONES (2015 – presente)

Publicaciones en revistas indexadas (ISI)

1. **Valdenegro M**, Fuentes L, Bernales M, Huidobro C, Monsalve L, Hernández I, Schelle M, Simpson R (2022). Antioxidant and Fatty Acid Changes in Pomegranate Peel With Induced Chilling Injury and Browning by Ethylene During Long Storage Times. *Frontiers in Plant Science* 13; doi: 10.3389/fpls.2022.771094
2. Monsalve L, Bernales M, Ayala-Raso A, Álvarez F, **Valdenegro M**, Alvaro JE, Figueroa CR, Defilippi BG, Fuentes L (2022). Relationship between Endogenous Ethylene Production and Firmness during the Ripening and Cold Storage of Raspberry (*Rubus idaeus* ‘Heritage’) Fruit. *Horticulturae* 8(3); doi: 10.3390/horticulturae8030262
3. Mondaca P, Valenzuela P, Roldán N, Quiroz W, **Valdenegro M**, Celis-Diez JL (2022). Remediation of Agricultural Soils with Long-Term Contamination of Arsenic and Copper in Two Chilean Mediterranean Areas. *Agronomy* 12(1); doi: 10.3390/agronomy12010221
4. **Valdenegro M**, Bernales M, Knox M, Vinet R, Caballero E, Ayala-Raso A, Kučerová D, Kumar R, Viktorová J, Ruml T, Figueroa CR, Fuentes L (2021). Characterization of fruit development, antioxidant capacity, and potential vasoprotective action of peumo (*Cryptocarya alba*), a native fruit of Chile. *Antioxidants* 10(12); doi: 10.3390/antiox10121997
5. Lindh V, Uarrota V, Zulueta C, Alvaro JE, **Valdenegro M**, Cuneo IF, Mery D, Pedreschi R (2021). Image analysis reveals that lenticel damage does not result in black spot development but enhances dehydration in persea americana mill. Cv. hass during prolonged storage. *Agronomy* 11(9); doi: 10.3390/agronomy11091699
6. Viktorová J, Kumar R, Řehořová K, Hoang L, Ruml T, Figueroa CR,

- Valdenegro M**, Fuentes L (2020). Antimicrobial activity of extracts of two native fruits of Chile: Arrayan (*Luma apiculata*) and peumo (*Cryptocarya alba*). *Antibiotics* 9(8) doi: 10.3390/antibiotics9080444
7. Bernales M, Monsalve L, Ayala-Raso A, **Valdenegro M**, Martínez JP, Travisany D, Defilippi B, González-Agüero M, Cherian S, Fuentes L (2019). Expression of two indole-3-acetic acid (IAA)-amido synthetase (GH3) genes during fruit development of raspberry (*Rubus idaeus* Heritage). *Scientia Horticulturae* 246; doi: 10.1016/j.scienta.2018.09.077
 8. Fuentes L, Figueroa CR, **Valdenegro M**, Vinet R (2019). Patagonian berries: Healthy potential and the path to becoming functional foods. *Foods* 8(8); doi: 10.3390/foods8080289
 9. Fuentes L, Figueroa CR, **Valdenegro M** (2019). Recent advances in hormonal regulation and cross-talk during non-climacteric fruit development and ripening. *Horticulturae* 5(2); doi: 10.3390/horticulturae5020045
 10. Schele M, Huidobro C, Monsalve L, Simpson R, Fuentes L, **Valdenegro M** (2018). Biochemical and functional changes in pomegranate fruit (*Punica granatum*) during cold storage. En F. Artes, F. Artes-Hernandez, E. Aguayo, & P. A. Gomez (Eds.), *8th International Postharvest Symposium: Enhancing Supply Chain and Consumer Benefits - Ethical and Technological Issues*; doi: 10.17660/ActaHortic.2018.1194.64
 11. Monsalve L, Ayala-Raso A, Bernales M, **Valdenegro M**, Defilippi B, González-Agüero M, Cherian S, Fuentes L (2018). Dataset on quality and physiological changes of raspberry fruit during their development and under auxin in-vitro assay. *Data in Brief* 21; doi: 10.1016/j.dib.2018.10.089
 12. Vega O, Carvajal L, Rodríguez F, Marín M, Ramírez C, Simpson R & **M Valdenegro** (2017) Effect of thermal pretreatments and cooking characteristics on physicochemical, rheological, and sensorial properties of food products based on cassava (*Manihot esculenta* Crantz). *Journal of Food Process Engineering*, 41, e12612; doi: 10.1111/jfpe.12612.
 13. Galaz P, **M Valdenegro**, C Ramirez, H Nunez, S Almonacid & R Simpson (2017) Effect of drum drying temperature on drying kinetic and polyphenol contents in pomegranate peel. *Journal of Food Engineering* 208: 19-27; doi: 10.1016/j.jfoodeng.2017.04.002
 14. Fuentes L, **M Valdenegro**, MG Gómez, A Ayala-Raso, E Quiroga, JP Martínez, R Vinet, E Caballero & CR Figueroa (2016) Characterization of fruit development and potential health benefits of arrayan (*Luma apiculata*), a native berry of South America. *Food Chemistry* 196: 1239-1247; doi:

10.1016/j.foodchem.2015.10.003

15. Fuentes L, L Monsalve, L Morales-Quintana, **M Valdenegro**, JP Martínez, BG Defilippi & M González-Agüero (2015) Differential expression of ethylene biosynthesis genes in drupelets and receptacle of raspberry (*Rubus idaeus*). ***Journal of Plant Physiology*** 179:100-105; doi: 10.1016/j.jplph.2015.02.005

II. EXPERIENCIA EN PROYECTOS DE INVESTIGACION (2015 – presente)

Proyectos con fondos concursables

2020 – 2023 **Co-I FONDECYT REGULAR N°1201662**. Regulation of firmness loss in raspberry fruit: role of annexin and calmodulin and their regulation by abscisic acid, ethylene, and calcium.

2018 – 2020 **FONDEF N° ID17AL0056, CONIYT**. Control y disminución de metales en hortalizas cultivadas en la Región de Valparaíso a través del uso de enmiendas.

2014 - (2016) Study of physiological, biochemical and molecular responses associated to chilling injury in pomegranate fruit (*Punica granatum*).