

Comment on Stilbene Levels in Grape Cane of Different Cultivars in Southern Chile: Determination by HPLC-DAD-MS/MS Method

In their paper, Vergara et al.¹ determine the levels of various stilbenes, including the well-known *trans*-resveratrol, in grape canes from various cultivars in Chile. Vergara et al.¹ make the following statement: “The stilbene concentrations range between 2 and 5 g kg⁻¹ dry weight in grapevine cane, and according to Rayne et al.¹⁸ the commercial value of resveratrol is between U.S. \$2000 and U.S. \$3000 per kilogram. Stilbene yields from cane waste could represent an agricultural byproduct valued between U.S. \$2000 and U.S. \$3000 per hectare.¹⁸ However, a recent Web search of market prices for bulk grape resveratrol extracts from grapes showed a range between U.S. \$300 and U.S. \$970 for 1 kg of resveratrol, depending of its origin and degree of purity.^{19,20}” References 19 and 20 that Vergara et al.¹ cite are the following Web links: ref 19 in ref 1 is <http://www.service-1.org>; ref 20 in ref 1 is <http://purebul.com/resveratrol>. As of this date, ref 19 in ref 1 is a generic search Web site that does not appear to have anything to do with the commercial prices of pure resveratrol, and ref 20 in ref 1 is a nonfunctional Web site. Furthermore, the target chemical market we were discussing in ref 2 (i.e., ref 18 in Vergara et al.¹) was not restricted to “bulk grape resveratrol extracts from grapes”. Rather, the interest is in potentially obtaining purified *trans*-resveratrol from grape cane extracts. A search of current pure *trans*-resveratrol costs on the Sigma-Aldrich Canada Web site (<http://www.sigmaaldrich.com/canada-english.html>) as of the date of writing obtains the following price: resveratrol, ≥99% (GC) (Sigma), R5010-500MG, CAD \$431.00. Thus, pure resveratrol is selling for \$431.00 per 0.5 g, or \$862,000 per kg assuming no economies of scale. It appears that Vergara et al.¹ need to reassess their economic analysis.

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Notes

The authors declare no competing financial interest.

■ REFERENCES

- (1) Vergara, C.; von Baer, D.; Mardones, C.; Wilkens, A.; Wernekinck, K.; Damm, A.; Macke, S.; Gorena, T.; Winterhalter, P. Stilbene levels in grape cane of different cultivars in southern Chile: determination by HPLC-DAD-MS/MS method. *J. Agric. Food Chem.* **2012**, *60*, 929–933.
- (2) Rayne, S.; Karacabey, E.; Mazza, G. Grape cane waste as a source of *trans*-resveratrol and *trans*-viniferin: High-value phytochemicals with medicinal and anti-phytopathogenic applications. *Ind. Crops Prod.* **2008**, *27*, 335–340.

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