



Supplementary material

Treatment of Winery Wastewater by Combined Almond Skin Coagulant and Sulfate Radicals: Assessment of HSO₅⁻ Activators

Nuno Jorge ^{1,2,*}, Ana R. Teixeira ², Lisete Fernandes ², Sílvia Afonso ³, Ivo Oliveira ³, Berta Gonçalves ³, Marco S. Lucas ² and José A. Peres ²

¹ Escuela Internacional de Doctorado (EIDO), Campus da Auga, Campus Universitario de Ourense, Universidade de Vigo, As Lagoas 32004, Ourense, Spain

² Centro de Química de Vila Real (CQVR), Departamento de Química, Universidade de Trás-os-Montes e Alto Douro (UTAD), Quinta de Prados 5000-801, Vila Real, Portugal

³ Centre for the Research and Technology of Agro-Environmental and Biological Sciences—CITAB, University of Trás-os-Montes e Alto Douro, UTAD, Quinta de Prados, 5000-801 Vila Real, Portugal

* Correspondence: jperes@utad.pt (J.A.P.)

Table S1. Concentration of total phenolic, flavonoids, O-diphenol and DPPH present in almond skin extract.

	Total phenolic	Flavonoids	O-diphenol	DPPH
	mg GAE/g	mg CE/g	mg CAE/g	µg Trolox/g
ASE	6.51 ± 0.62	4.30 ± 0.16	0.65 ± 0.05	8.93 ± 0.34

Table S2. Analysis of variance.

Source	DF	Adj SS	Adj MS	F-Value	P-Value
Model	9	4308.97	478.77	6.43	0.027
Linear	3	3419.70	1139.90	15.30	0.006
PMS	1	2204.48	2204.48	29.59	0.003
Co ²⁺	1	846.66	846.66	11.36	0.020
Radiation	1	368.56	368.56	4.95	0.077
Square	3	432.91	144.30	1.94	0.242
PMS*PMS	1	229.71	229.71	3.08	0.139
Co ²⁺ *Co ²⁺	1	219.63	219.63	2.95	0.147
Radiation*Radiation	1	36.93	36.93	0.50	0.513
2-Way Interaction	3	456.35	152.12	2.04	0.227
PMS*Co ²⁺	1	408.04	408.04	5.48	0.066
PMS*Radiation	1	0.01	0.01	0.00	0.991
Co ²⁺ *Radiation	1	48.30	48.30	0.65	0.457
Error	5	372.52	74.50		
Lack-of-Fit	3	372.52	124.17	*	*
Pure Error	2	0.00	0.00		
Total	14	4681.49			

Table S3. Model summary.

Standard deviation (SD)	R-squared	Adj R-squared	Predicted R-squared
8.63160	92.04%	77.72%	0.00%