

## Chiara Dal Bosco

### WORK EXPERIENCE

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- 04/05/2009–29/10/2010 **Scientific collaborator**  
Ars Mensurae, Rome (Italy)  
Physico-chemical analysis on paintings (imaging techniques: UV light, IR reflectography, X-radiography; spectroscopic techniques: X-ray fluorescence, Raman)

### EDUCATION AND TRAINING

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- 01/12/2021–Present **Research grant**  
Sapienza University, Chemistry Department, Rome (Italy)  
Analysis of vitamins in foodstuff cooked through traditional methods or with solar oven
- 01/11/2018–Present **PhD in Chemical Sciences**  
Sapienza University, Rome (Italy)  
Solutions for green sample preparation methods
- 30/03/2021–31/05/2021 **Tutoring assignment**  
Sapienza University, Chemistry Department, Rome (Italy)  
Support activity in Analytical Chemistry teaching with laboratory for students of Chemistry and Industrial Chemistry courses
- 01/06/2018–31/10/2018 **Research grant**  
Sapienza University, Chemistry Department, Rome (Italy)  
Development of cellulosic materials as substrates for electrolytic membranes and advanced devices
- 01/05/2017–30/11/2017 **Research fellowship**  
Sapienza University, Chemistry Department, Rome (Italy)  
Analytical method development and validation for the determination of oxidative-stress biomarkers in biological matrices
- 01/04/2016–30/09/2016 **Research fellowship**  
Sapienza University, Chemistry Department, Rome (Italy)  
Development and validation of analytical methods for quantitation of fat-soluble vitamins and carotenoids in foodstuffs and biological samples
- 01/12/2013–31/03/2015 **Post-Master degree specialization in "Analytical Chemistry and Quality Control"**  
Sapienza University, Rome (Italy)
- 01/11/2004–28/09/2012 **Bachelor and Master Degrees in "Science and Technology for the Conservation of Cultural Heritage"**  
Sapienza University, Rome (Italy)

## PERSONAL SKILLS

Mother tongue Italian

## Foreign languages

	UNDERSTANDING		SPEAKING		WRITING
	Listening	Reading	Spoken interaction	Spoken production	
English	B1	B2	A2	A2	B2
French	B1	B2	A2	A2	B1

Digital skills European Computer Driving Licence

## ADDITIONAL INFORMATION

## Publications

- [1] G. D'Orazio, A. Gentili, S. Fanali, C. Fanali, C. Dal Bosco. Innovative solutions for the extraction of vitamins from pharmaceutical and biological samples. *Current Analytical Chemistry* 17 (2021) 1114-1132.
- [2] I. Silvestro, C. Ciarlantini, I. Francolini, P. Tomai, A. Gentili, C. Dal Bosco, A. Piozzi. Chitosan–graphene oxide composite membranes for solid-phase extraction of pesticides. *International Journal of Molecular Sciences* 22 (2021) 8374.
- [3] C. Dal Bosco, V. Di Lisio, P. D'Angelo, A. Gentili. Hydrophobic eutectic solvent with antioxidant properties: application for the dispersive liquid–liquid microextraction of fat-soluble micronutrients from fruit juices. *ACS Sustainable Chemistry & Engineering* 24 (2021) 8170-8178.
- [4] V. Gallo, P. Tomai, V. Di Lisio, C. Dal Bosco, P. D'Angelo, C. Fanali, G. D'Orazio, I. Silvestro, Y. Picò, A. Gentili. Application of a low transition temperature mixture for the dispersive liquid-liquid microextraction of illicit drugs from urine samples. *Molecules* 26 (2021) 5222.
- [5] G. D'Orazio, C. Fanali, C. Dal Bosco, A. Gentili, S. Fanali. Chiral separation and analysis of antifungal drugs by chromatographic and electromigration techniques: Results achieved in 2010–2020. *Reviews in Analytical Chemistry* 40 (2021) 220-252.
- [6] V. Spinelli, A. Ceci, C. Dal Bosco, A. Gentili, A. M. Persiani. Glyphosate-eating fungi: study on fungal saprotrophic strains' ability to tolerate and utilise glyphosate as a nutritional source and on the ability of *Purpureocillium lilacinum* to degrade it. *Microorganisms* 9 (2021) 2179.
- [7] E. Brasili, I. Bavasso, V. Petrucci, G. Vilardi, A. Valletta, C. Dal Bosco, A. Gentili, G. Pasqua, L. Di Palma. Remediation of hexavalent chromium contaminated water through zero-valent iron nanoparticles and effects on tomato plant growth performance. *Scientific Reports* 10 (2020) 1920.
- [8] L. Chronopoulou, C. Dal Bosco, F. Di Caprio, L. Prosini, A. Gentili, F. Pagnanelli, C. Palocci. Extraction of Carotenoids and Fat-Soluble Vitamins from *Tetrademus Obliquus* Microalgae: An Optimized Approach by Using Supercritical CO<sub>2</sub>. *Molecules* 24 (2019) 2581.
- [9] C. Dal Bosco, A. Gentili. Vitamins I Overview. In Worsfold, P., Townshend, A., Mirò, M. (Eds.), *Encyclopedia of Analytical Science* 10 (2019) 164-179, Elsevier.
- [10] A. Gentili, C. Dal Bosco, S. Fanali, C. Fanali. Large-scale profiling of carotenoids by using non aqueous reversed phase liquid chromatography – photodiode array detection – triple quadrupole linear ion trap mass spectrometry: Application to some varieties of sweet pepper (*Capsicum annuum* L.). *Journal of Pharmaceutical and Biomedical Analysis* 164 (2019) 759-767.
- [11] C. Dal Bosco, S. Panero, M. A. Navarra, P. Tomai, R. Curini, A. Gentili. Screening and assessment of low molecular weight biomarkers of milk from cow and water buffalo: an

alternative approach for the rapid identification of adulterated water buffalo mozzarellas. *Journal of Agricultural and Food Chemistry* 66 (2018) 5410-5417.

[12] S. Rocchi, F. Caretti, L. Mainero Rocca, V. Pérez-Fernández, P. Tomai, C. Dal Bosco, R. Curini, A. Gentili. Sub-critical water extraction of thyreostats from bovine muscle tissue followed by liquid chromatography-tandem mass spectrometry. *Food Additives and Contaminants part A* 35 (2018) 1472-1483.

[13] C. Dal Bosco, M.A. Navarra, S. Panero, A. Paolone, J. Serra Moreno, F.M. Vitucci. Sintesi e caratterizzazione di elettroliti gelificati a base di cellulosa. *Atti del Settimo Convegno Giovani "Le frontiere della chimica nel nuovo millennio", Dipartimento di Chimica dell'Università di Roma "La Sapienza", 14-15 giugno 2016*, edito da: Nuova Cultura, Roma; ISBN: 9788868126858 (2016) 109-110.

[14] M.A. Navarra, C. Dal Bosco, J. Serra Moreno, F.M. Vitucci, A. Paolone, S. Panero. Synthesis and characterization of cellulose-based hydrogels to be used as gel electrolytes. *Membranes* 5 (2015) 810-823.

I hereby authorize the processing of the personal data contained in this CV in compliance with the European Regulation (UE) 2016/679.

Roma, 10<sup>th</sup> January 2022