



CURRICULUM VITAE (CVA)

IMPORTANT – The Curriculum Vitae cannot exceed 4 pages. Instructions to fill this document are available in the website.

CV date	29/11/2022
---------	------------

Part A. PERSONAL INFORMATION

First name	Yolanda		
Family name	Aguilera Gutiérrez		
Gender (*)	Female	Birth date	04/07/1981
Social Security, Passport, ID number	46870141M		
e-mail	Yolanda.aguilera@uam.es	https://portalcientifico.uam.es/ipublic/agent-personal/profile/iMarinaID/04-260949	
Open Research and Contributor ID (ORCID)(*)	0000-0002-8724-6796		

(*) Mandatory

A.1. Current position

Position	Senior Lecturer (Profesor Titular de Universidad)		
Initial date	3 rd October 2022		
Institution	Universidad Autónoma de Madrid (UAM)		
Department/Center	Agricultural Chemistry and Food Science (Faculty of Science)		
Country	Spain	Teleph. number	910017916
Key words	By-products valorization; dietary fiber; phenolic compounds; antioxidant capacity; <i>in vitro</i> digestion; bioactivity; technofunctional properties		

A.2. Previous positions (research activity interruptions, art. 45.2.c)

Period	Position/Institution/Country/Interruption cause
03/10/2022- Actualidad	Profesor Titular de Universidad
18/12/2015 – 02/10/2022	Profesor Contratado Doctor
12/11/2014 - 17/12/2015	Contratado Doctor Interino/ UAM/Spain
01/10/2011 - 30/09/2014	Ayudante Doctor/ UAM/Spain
01/10/2006 - 30/09/2009	Ayudante / UAM/Spain
01/09/2004 - 30/09/2006	Beca de Investigación con cargo a proyecto (Becaria de la UAM)/ UAM
01/10/2003 - 30/06/2004	Beca de colaboración (MEC) / UAM/Spain

A.3. Education

PhD, Licensed, Graduate	University/Country	Year
Ph.D. in Agricultural, Food and Environmental Chemistry	UAM / Spain	Jan. 2010
M.Sc. in Agricultural, Food and Environmental Chemistry (DEA)	UAM / Spain	Sept. 2006
B.Sc. Food Science and Technology	UAM / Spain	Jun. 2004

A.4. General indicators of the quality of scientific production

Nº Sexenios y fecha último	2 sexenios, last granted in 2018
Thesis	3

Researcher ID	B-6021-2012
Scopus Author ID	6507230295
iMarina ID:	04-260949
Índice h	25 (Scopus)
Citations	1927 (Scopus)

Part B. CV SUMMARY

PhD in the Doctorate Program in Agricultural, Agri-food and Environmental Chemistry, with outstanding qualification "cum laude" by the Universidad Autónoma de Madrid (UAM), in 2010. Associate Lecturer (PhD) in the area of Nutrition and Food Science in the Dept. of Agricultural Chemistry and Food Science. During my PhD, I studied the impact of thermal treatments on legumes as source of dietary fibre (DF), proteins, non-nutritional compounds and phenolic compounds, as well as techno-functional properties on processed flours. During this period, I did a research predoctoral stay at Instituto de Fermentaciones (CSIC), gaining knowledge on antioxidant activity of legumes flours. Additionally, I studied the protein fraction from legumes in the University of San Pablo CEU, as predoctoral stay. Regarding my postdoctoral research, I focused on developing an extraction method for melatonin analysis from several vegetal matrix and assessed the potential of by-products as ingredients rich in DF with healthy properties, mainly to prevent cardiometabolic diseases. During postdoctoral period research, I did a research stay at University of Reading, studying phenolic compounds in different vegetal matrix and later, at University of Illinois, where I evaluated several bioactive compounds from legumes.

At present, I join the multidisciplinary research group Food, Oxidative Stress and Cardiovascular Health (FOSCH), recognized as UAM Research group, and researching in the project granted to FOSCH by the Spanish Ministry of Economy and Competitiveness through the call Knowledge Generation R&D Projects and R&D&I Research Challenges Projects 2018, titled Novel antioxidant ingredients from coffee and cocoa by-products as a strategy to reprogram cardiometabolic disease through lactation (COCARDIOLAC) (RTI2018-097504-B-100). The main research lines are based on the identification of bioactive compounds that are influenced by oxidative stress. I focused on the study of antioxidant bioactive compounds, as well as evaluating its potential physiological effects (in vitro antidiabetic and hypolipidemic effects) in different by-products after the digestion process to evaluate its healthy properties. It has been published a total of 48 scientific articles (including books and book chapters) (h=23), the majority being published in journals indexed in the JCR and ranking in the first quartile (Q1) and with a quotation rate that grows year by year. As a result of my research activity, I have been awarded 2 "sexenios" (2007-2012 and 2013-2018 sections). I have also participated in several International and National Projects, as well as in International Congresses. Moreover, I have supervised 3 Doctoral thesis and 1 ongoing and participated in research evaluation committees.

In addition, I am involved in important teaching commitments, recognized by the accreditation of 2 "quinquenios" (the last recognized in the 2012-2016 section) and the evaluation of merits through the Docentia-UAM Program, with a score of 99 points in the last evaluation, and with a Category A, (2011-2021). I collaborate in 3 Degrees (Food Science and Technology, Human Nutrition and Dietetics and Tourism) and 2 Master's Degrees (New Foods and Agri-Food and Agri-Environmental Sciences). At present, I coordinate the 4th year of Food Science and Technology Degree in the Science Faculty.

Part C. RELEVANT MERITS

C.1. Publications

1. **Y. Aguilera**, V. Benítez. Special Issue "Phytochemicals: Dietary Sources, Innovative Extraction and Health Benefits". *Foods* ISSN 2304-8158, **2022**.
2. **Y. Aguilera**, I. Pastrana, M. Rebollo-Hernanz, V. Benítez ..., M.A. Martín-Cabrejas. (4/8) Investigating edible insects as a sustainable food source: Nutritional value and techno-functional and physiological properties. *Food Funct.*, **2021**, 12(14), 6309–6322. **SCI₂₀₁₉: 4.171 JCI Rank: 24/139 (Q1)**
3. Rebollo-Hernanz, M., Cañas, S., Taladrid, D., ...**Aguilera, Y.**, Martín-Cabrejas, M.A. Extraction of phenolic compounds from cocoa shell: Modeling using response surface methodology and artificial neural networks. *Sep. Pur. Technol.*, **2021**, 270, 118779
4. M. Rebollo-Hernanz, S. Cañas, D. Taladrid, V. Benítez, B. Bartolomé, **Y. Aguilera**, M. A. Martín-Cabrejas (4/7). Revalorization of Coffee Husk: Modeling and Optimizing the Green Sustainable Extraction of Phenolic Compounds. *Foods*, **2021**, 10(3), 653. **SCI₂₀₁₉: 4.092. JCI Rank: 27/139 (Q1)**
5. Rebollo-Hernanz, M., Cañas, S., Taladrid, D., ...**Aguilera, Y.**, Martín-Cabrejas, M.A. Revalorization of coffee husk: Modeling and optimizing the green sustainable extraction of phenolic compounds. *Foods*, **2021**, 10(3), 653
6. M. Rebollo-Hernanz; S. Cañas; **Y. Aguilera**; et al; Validation of Cocoa Shell as a Novel Antioxidant Dietary Fiber Food Ingredient: Nutritional Value, Functional Properties, and Safety Current Developments in Nutrition. Oxford University Press. 2020. 4-2, pp.773.
7. **Aguilera, Y.**, Rebollo-Hernanz, M., Cañas, S., Taladrid, D., Martín-Cabrejas, M.A. Response surface methodology to optimise the heat-assisted aqueous extraction of phenolic compounds from coffee parchment and their comprehensive analysis. *Food and Funct.*, **2019**, 10(8), pp. 4739–4750
8. V. Benítez, M. Rebollo-Hernanz, **Y. Aguilera**, S. Bejerano, S. Cañas, M.A. Martín-Cabrejas. (1/6). Extruded coffee parchment shows enhanced antioxidant, hypoglycaemic, and hypolipidemic properties by the release of phenolic compounds from the fibre matrix. *Food Funct.*, **2021**, 12, 1097-1110. **SCI₂₀₁₉: 4.171 JCI Rank: 24/139 (Q1)**
9. M. Rebollo-Herranz; **Y. Aguilera**; T. Herrera; M.A. Martín-Cabrejas. Bioavailability of melatonin from lentil sprouts and its role in the plasmatic antioxidant status in rats *Foods*. Multidisciplinary Digital Publishing Institute (MDPI). **2020**. 9-3.
7. **Y. Aguilera**, T. Herrera, V. Benítez, S.M. Arribas, A.L. Lopez de Pablo, R.M. Esteban, M.A. Martín-Cabrejas. (3/7). Estimation of scavenging capacity of melatonin and other antioxidants: Contribution and evaluation in germinated seeds. *Food Chem.* **2015**, 170, 203-211. **SCI=4,052. JCI Rank: 7/125 (D1)**

Proceedings

10. C. Braojos, M. Rebollo-Hernanz, V. Benítez, S. Cañas, **Y. Aguilera**, S. M. Arribas, and M. A. Martín-Cabrejas. (3/7) Simulated Gastrointestinal Digestion Influences the *In Vitro* Hypolipidemic Properties of Coffee Pulp, a Potential Ingredient for the Prevention of Non-Alcoholic Fatty Liver Disease. *Proceedings* **2020**, 61(1), 19; <https://doi.org/10.3390/IECN2020-06997>

C.2. Congress

I have participated in **55 International and National Conferences**

C.3. Research projects

1.- Project Title: Nuevos ingredientes antioxidantes de subproductos de café y cacao como estrategia para reprogramar la enfermedad cardiometabólica a través de la lactancia (**RTI2018-097504-B-I00**).

Funding Body: Ministerio de Ciencia Innovación y Universidades

Participating Institutions: Universidad Autónoma de Madrid.

Duration: 1/1/2019-31/12/2021

Budget: 108.500 €

Principal Researchers: Dr M^a Angeles Martín Cabrejas and Dr Silvia M^a Arribas Rodríguez

Type of Participation: Researcher Team

2.- Project Title: Producción y consumo sostenibles del café: validación de subproductos como ingredientes alimentarios (**AGL2014-57239-R**).

Funding Body: Ministerio de Ciencia Innovación y Universidades (Programa Retos de Investigación)

Participating Institutions: Instituto de Investigación en Ciencias de la Alimentación and Universidad Autónoma de Madrid.

Duration: 1/1/2015-31/12/2018

Budget: 198.500 €

Principal Researchers: Dr M^a Angeles Martín Cabrejas and Dr. M^a Dolores Del Castillo Bilbao

Type of Participation: Researcher Team

3.- Project Title: Alianza interuniversitaria (UAM-Universidad de Texas Health-Universidad de Illinois Urbana Champaign) como estrategia para el desarrollo de ingredientes alimentarios sostenibles (2017/EEUU/13).

Funding Body: 2^a Convocatoria de Proyectos de Cooperación Interuniversitaria

Participating Institutions: Universidad Autónoma de Madrid-Banco Santander con EEUU.

Duration: 01/07/2017-31/12/2018.

Budget: 12.750 €

Type of Participation: Researcher Team

Principal Researcher: Dr Yolanda Aguilera

C.4. Contracts, technological or transfer merits

Project Title: Validación de nuevos ingredientes alimentarios sostenibles para el desarrollo de nutracéuticos anti-obesidad (**PFTC-19**)

Company: AORA Health S.L.

Duration: 9/9/2019- 9/01/2021 **Budget:** 33.000 €

Type of Participation: Research team (IPs: Dr M^a Angeles Martín Cabrejas and Dr Silvia M^a Arribas Rodríguez)

Project Title: Caracterización de Compuestos Bioactivos en la Leche Materna para la Mejora de Fórmulas para Lactantes (**PFTC-20**)

Company: Alter Farmacia SA-Nutribén

Duration: 18/12/2020 - 17/06/2022 **Budget:** 33.000 €

Type of Participation: Research team (IPs: Dr M^a Angeles Martín Cabrejas and Dr Silvia M^a Arribas Rodríguez)