BIOGRAPHY

29th June 2012.

Title and name
Professor Pablo S. Fernández Escámez

Nationality
Spanish.

Panel
BIOHAZ.

Education
MsC in Veterinary Science, 1990, University of Murcia; PhD, University of Murcia, was awarded a mention (Premio Extraordinario), 1994.

Scientific and risk assessment experience
Since awarding his PhD in Food Microbiology, Pablo Fernandez has worked in the Consejo Superior de Investigaciones Cientificas (CSIC, Spain), Institute of Food Research (Norwich, UK), Universidad Miguel Hernandez Elche (Spain) and Universidad Politecnica de Cartagena (Spain) where he is currently the Pro-Vice-Chancellor for Research and Innovation and where he holds a chair in Food Safety and Preservation in the School of Agronomical Engineering.
Pablo Fernandez's research expertise lies in the area of microbiological food safety and physiology. He has participated in several European, national and regional projects related to food safety and microbial risk assesment of foodborne pathogenic bacteria.
He has been a member of the Spanish food safety network (SICURA) and of ILSI Europe's Publications Committee.

Main scientific publications
Predictive modelling and risk assessment of foodborne pathogenic bacteria

Microbial physiology of pathogenic bacteria

Fernández, P.S., Peck, M. W. (1999). A predictive model that describes the effect of prolonged heating at 70 to 90°C and subsequent incubation at refrigeration temperatures on growth from spores and toxigenesis by nonproteolytic Clostridium botulinum in the presence of lysozyme. Applied and Environmental Microbiology: 65: 3449-3457.

Fernández, A., Salmerón, C., Fernández, P. S., Martínez, A. (1999). Application of a Frecuency distríbution model to describe the thermal inactivation of two strains of Bacillus cereus. Trends in Food Science and Technology, 10: 158-162.

Carlin, F., Girardin, H., Peck, M.W., Stringer, S.C., Barker, G.C., Martínez, A., Fernández, A., Fernández, P., Waites, W.M., Movahedi, S., Leusden, F., Nauta, M., Moezelaar, R., Del Torre, M., Litman, S. (2000). Research on factors allowing a risk assessment of spore-forming pathogenic

bacteria in cooked chilled foods containing vegetables: a FAIR collaborative project. International Journal of Food Microbiology, 60: 117-135.

Selma, MV, Salmerón, MC, Valero, M, Fernández, P.S. (2004). Control of Lactobacillus plantarum and Escherichia coli by pulsed electric fields in MRS Broth, Nutrient Broth and orange-carrot juice. Food Microbiology, 21: 519-525.

Periago, P.M., van Zuijlen, A., Fernández, P.S, Klapwijk, P.M., ter Steeg, P.F., Corradini, M. G., Peleg, M. (2004). Estimation of the non-isothermal inactivation patterns of Bacillus sporothermodurans IC4 spores in soups from their isothermal survival data. International Journal of Food Microbiology, 95: 205-218.

Conesa, R., Fernández, P.S., Esnoz, A., Palop, A. (2009). Development of a new tool for thermal process evaluation and its validation: Thermoresistometer Mastia. Journal of Applied Microbiology, 107: 506-513.

Andre van Zuijlen, Paula M. Periago, Alejandro Amézquita, Alfredo Palop, Stanley Brul, Pablo S. Fernández. (2010).Characterization of Bacillus sporothermodurans IC4 spores; putative indicator microorganism for optimisation of thermal processes in food sterilisation b43: 1895-1901.

Munoz M, Guevara L, Palop A, Fernandez PS. (2010). Prediction of time to growth of Listeria monocytogenes using Monte Carlo simulation or regression analysis, influenced by sublethal heat and recovery conditions. Food Microbiology, 27:468-475.

Munoz-Cuevas M, Fernandez PS, George S, Pin C. (2010). Modeling the Lag Period and Exponential Growth of Listeria monocytogenes under Conditions of Fluctuating Temperature and Water Activity Values Applied and Environmental Microbiology, 76:2908-2915.

Antolinos V, Munoz-Cuevas M., Ros M, Periago PM, Fernandez PS, Lemarc Y. (2012). Modeling the effects of temperature and osmotic shifts on the growth kinetics of Bacillus weihenstephanensis in broth and food products. International Journal of Food Microbiology, accepted for publication.