

May 28-29, 2018  
London, UKR Alami et al., J Nurs Health Stud 2018, Volume 3  
DOI: 10.21767/2574-2825-C2-006

## EVALUATION OF IMPREGNATION OF PESTICIDES IN PATIENTS ADMITTED TO THE DEPARTMENT OF ENDOCRINOLOGY IBN SINA CHU RABAT

**R Alami<sup>1, 2</sup>, M Jbilou<sup>1</sup>, Y Cherrah<sup>2</sup>, K Laarej<sup>1</sup>, H Iraqi<sup>3</sup> and M E A Faouzi<sup>2</sup>**<sup>1</sup>Research Laboratory and medical analysis of the Gendarmerie Royale, Morocco<sup>2</sup>Mohammed V University, Morocco<sup>3</sup>University Hospital Ibn Sina, Morocco

**R**epeated exposure or consumption of food contaminated with pesticide residues can cause various disorders to the human body, especially the immune and hormonal disturbances and the onset of certain cancers. Blood samples of 45 patients of endocrinology of the Rabat University Hospital were extracted by SPE C18 under the same conditions as the range calibration of 67 pesticides and controls, and then injected in the GC - MS. The pyrethroid (bifenthrin, deltamethrin and cypermethrin) were identified and assayed at 11.62% volunteer patients, 6.97% were contaminated with dimethoate, Malathion, azinphos-methyl, carbamates which were detected only in 3.65% of patients. Other assay was carried by LC - MSMS to cover polar pesticides or heat labile. After this study we found that, around 20% of patients suffering from thyroid dysfunction admitted to the department of endocrinology of the Rabat University Hospital were contaminated with pesticide residues with peaks exceeding 50 ppb especially for dimethoate and bifenthrin, while the reporting thresholds for the affectation of human health by pesticides never exceed 10 ppb for residues. Rest of complete a sufficient number of patients for biostatistical analysis and pesticide assay results by LC - MSMS; we can discuss a possible relationship between the presence of pesticide residues in human blood and development of certain endocrine diseases.

### Biography

He has done his PhD in Analytical Chemistry and Pharmacokinetics at the Faculty of Pharmacy University Clermont, FRANCE. He has DEA of basic pharmacokinetics and clinical faculty of pharmacy University Clermont in FRANCE. He is Master of Science and Biology Faculty of Science University Mohamed V Rabat. As per Professional experience, he is the Professor of Pharmacology and Toxicology, Head of Department of Toxicology Pharmacology at LRAM Royal Gendarmerie Morocco. He also founding member of the Moroccan Society of Toxicology.

mjbilou@lram-fgr.ma