

5th World Congress on **Diabetes & Metabolism**

November 03-05, 2014 Embassy Suites Las Vegas, USA

Interactions between diabetes and sleep, highlighting melatonin's role

Mark T U Barone
Universidade de Sao Paulo, Brazil

Strong associations of diabetes mellitus with sleep impairment have been frequently reported. Several groups have studied the associations between metabolic syndrome and type 2 diabetes with sleep disorders. In our group we have focused mainly on the relationships between type 1 diabetes and sleep. The associations found corroborate the previously vicious circle described in type 2 diabetes, where sleep disorders favor the development of type 2 diabetes or exacerbate the metabolic control of both types of diabetes, whereas diabetes itself, especially when associated with poor metabolic control, is often followed by sleep disorders. Our current interest is on the factor linking such conditions. Novel findings concerning the neuro-endocrine-metabolic mediation of the mentioned circle start to be revealed. Melatonin is surely one of those factors that deserve special attention. Our studies point toward a difference in terms of night melatonin levels in individuals with poor glycemic control, when comparing with control subjects. Moreover, insulin and melatonin were shown to have a complementary action in regulating each other and the metabolism as a whole. Therefore, our intention in this speech is to review the theme, present new data from our laboratory, and comprehend the importance of considering sleep and melatonin levels as part of the diabetes mellitus prevention and treatment.

Biography

Mark Barone has completed his Ph.D. in 2011 from Institute of Biomedical Sciences, University of Sao Paulo (ICB-USP), and is currently working on his postdoctoral studies at the same University. He has been researching on type 1 diabetes and sleep since 2003, and has prominent work and publications on diabetes education, since 1999.

markbarone17@hotmail.com