

# 3<sup>rd</sup> International Summit on **GMP, GCP & Quality Control** September 25-26, 2014 Valencia Convention Centre, Spain

## Industrial design: Disrupting the established protocol in the pharmaceutical and medical device research and development

**Oscar J Acosta**

IsoTech Design Canada Inc., Canada

The Industrial Design incursion into the Life Science scenario has been relatively new, and as such, the impact remains uncertain on extension and implications. On the Medical Devices as on the Pharmaceutical Equipment Research and Development, insertion has been gradual and limited to non invasive class I devices for FDA, CE - Health Canada Directives (93/42/EEC - GHTF), GMP as well as QbD have been limited to form, ergonomics, anthropometrics and to some non-critical task materials definitions. Some of the aforementioned applications can be found on MRI equipment, X-Ray machines, culture and sample collecting vials as well as test tubes, some diagnostics and monitoring devices including support furniture for hospitals and medical wards. This limited insertion might be in part attributable to a wide scope on non critical product development on part of the discipline as well as a non clear informative background available to the Medical Device and Pharmaceutical Equipment Development communities on the far reach of Industrial Design, there is a rich source of readily available information currently at the disposition of specialized audiences through publications and digests that are precisely aimed at them, this same sources might be a rich source of insight on the adaptability and potential insertion of the discipline. Industrial Design, being a human centered discipline per se finds its main focus on the human body and its performance under a variety of circumstances. Addressing precise objectives and limitations have been challenges of every device developed either by engineering approach or the relatively new incursion of Industrial Design on the Medical and Pharmaceutical fields. Normally regarded more as a liberal discipline than a

scientific one, the industrial design approach towards the medical device and pharmaceutical equipment development addresses challenges under different directives and considerations taking into account its natural tendency to be a highly adaptive discipline within the ranks of well determined constraints. It can be stated that the first results achieved that might lead the way towards a more profound and intelligible involvement into the life sciences fields have been up until this point quite satisfactory with a wider prospect of insertion and quite positive repercussions.

### Biography

Oscar J Acosta has completed his MSc by research at the age of 32 years from University of Technology, Sydney., holds a top management diploma from Universidad Iberoamericana as well as B.I.D. By thesis From Universidad Iberoamericana. He currently holds the position of Senior Industrial Designer at IsoTech Design Canada Inc. a cutting edge isolator and pharmaceutical equipment developer and manufacturer, has worked as a research engineer at Pega Medical Inc. in Montreal, Canada where he participated in the development of diverse orthopaedic surgical systems (class IIa and IIb) and surgical techniques including class IIa cardiovascular equipment, he also has extensive experience in the aerospace industry developing jet turbines for GEAE. Acosta has been published by the Journal of the Australasian Ceramic Society. He is an active member of Quebec's Industrial Designers Society (ADIQ) and the Association of Canadian Industrial Designers (ACID).

[oscar.acosta.palacios@gmail.com](mailto:oscar.acosta.palacios@gmail.com)