

## Emulation of teeth aging with composite resin: challenges and feasibility

The Bio-Emulation approach as written in structural analysis and visual synthesis defined the new bases to consider for replication of natural tooth structures with composite resin. The penta\_laminar concept represents the ultimate implementation of this philosophy: analyzing different aging stages to build a dynamic shade concept that adapts to nature. However, feasibility of application of this concept is compromised by its intrinsic complexity, not accessible to all clinical conditions. By analyzing the key factors of natural structure's aging process and applying this knowledge to the material selection, it is possible to simplify techniques to make them approachable in all situations. From a bi-laminar technique to the penta\_laminar technique we can learn to adapt our work in order to optimize the clinical outcome achieving cost-effective treatments to cover our patients needs and expectations.



### Javier Tapia

Javier Tapia Guadix was born in 1978 in Madrid, Spain.

He finished dental school at the European University of Madrid in 2003. Working then as associate professor in the prosthetics department during 2004. In 2005 he started his career as professional computer graphics artist, focused on illustration, animation and application development.

He founded the company Juice - Dental Media Design for this purpose. He received the Collegiate Merit Award by the Spanish College of Dentists from the 1st Region in 2005, for his collaboration in the commission of new technologies. In 2011 he founded together with Panagiotis Bazos and

Gianfranco Politano the Bio-Emulation group.

He actively collaborates with several universities across Europe and is member of GC Restorative Advisory Board.

Javier works in his private practice in Madrid, focused on restorative dentistry and esthetics.

He is an international lecturer with participation in numerous congress, hands-on courses and live courses.

He published several articles in restorative dentistry, dental photography and computers in dentistry.

