

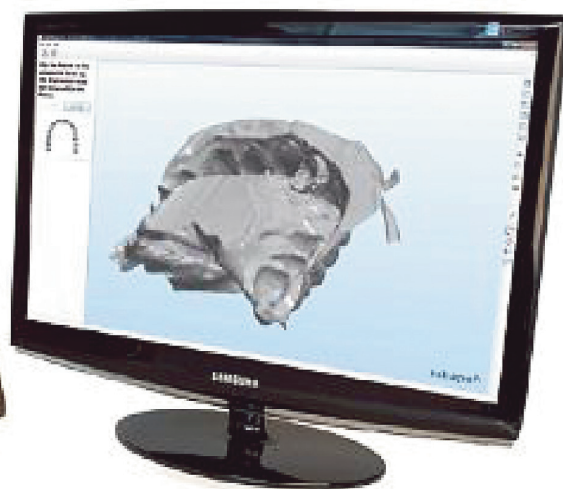
Appliance Fabrication MADE EASY

By Gary Johnson

Every decade or so, some form of technology develops that completely changes the way business is done or the way society functions. In 1991, that technology was email. In 2001, it was the iPod. In 2011, that technology is digital orthodontics.

"We are at the beginning of a complete transformation of the way in which orthodontic appliances are fabricated," said Darren Buddemeyer, president of DynaFlex. "Every orthodontist has been contemplating digital scanners for model storage and/or analysis for some time now. What most have been waiting for is an affordable way not only to remove plaster models from their practice but also alginate. That time has finally arrived."

DynaFlex, a 45 year old orthodontic laboratory located in St. Louis, MO recently launched its state-of-the-art division called 3D.Ortho. This division has been formed to allow DynaFlex to provide clients with a one stop digital solution that can completely eliminate the need for impression material. The laboratory is set up to accept stereo lithography files (.stl) from a



multitude of companies including 3 Shape. The company is also doing pilot testing with Cadent, MotionView and Sure Smile. With new intra oral scanning, the doctor can scan the arch digitally and then upload that file directly to DynaFlex. Once the file is received, it is printed on the Objet, Rapid prototyping printer (the same technology used in manufacture of jet fighters and automobiles) and then sent to the lab technicians for appliance fabrication. The same way it was done in the old days with plaster models.

Once the model is printed, it is sent to the lab for appliance fabrication. The same way it was done in the old days with plaster.

"The accuracy and ease of use will completely revolutionize the orthodontic practice," said Buddemeyer. "The way orthodontic appliances are made and delivered in the lab will change

forever. That is because we have eliminated one of the most dreaded processes in the orthodontic office: taking impressions and pouring models. With a few passes of the intra-oral scanning wand, the assistant has created a 3D rendering of the patient's upper and lower arch that is accurate to 20 microns."

DynaFlex® is so enthusiastic about the future of this technology, they have opened a new division called 3D.Ortho to handle distribution and sales of digital model storage, digital model scanners and digital model appliance fabrication. The technology will be the focal point of DynaFlex® and will be a main attraction at the AAO in Hawaii in 2012. Buddemeyer concluded, "It's difficult in such a short article to explain all of the benefits this technology will provide to the laboratory, the orthodontist staff and especially the patient. You can contact DynaFlex® for more information at 3dortho@dynaflex.com.

