The Dallas Limb Restoration Center announces the availability of the iTotal® G2 Knee Replacement System, the only patient-specific total knee replacement (TKR) available on the market today.

Studies have shown that 1 in 5 patients with a total knee replacement system are not satisfied with the results of their surgery. Issues such as implant overhang, errors in component placement and off-the-shelf implant shapes that do not match the patient's native anatomy can result in residual pain, functional limitations and a knee that does not feel natural. By preserving the core benefits of the iTotal TKR system, including an anatomic implant design with personalized fit, a patient-matched anatomic shape and greater bone preservation than traditional total knee replacements, the iTotal G2 is designed to address the drivers of patient dissatisfaction.

"The iTotal G2 is the most advanced and innovative knee system that ConforMIS has introduced," said Philipp Lang, MD, CEO of ConforMIS. "Our technology preserves more of a patient's natural anatomy and their individual shape than is possible with off-the-shelf systems. The fact that the implants are personalized, not just the instruments, is what provides the iTotal G2 with clinical advantages that other systems will not be able to replicate."

The iTotal G2 was developed on the foundation of the company's patented iFit technology for designing patient-specific implants and jigs. Each iTotal G2 is made to fit an individual patient precisely based on their CT scan. Since each implant is made to fit just one patient, surgeons avoid the sizing and fit trade-offs that are a traditional part of standard knee surgery. The implant shape and geometry also closely matches the patient's natural joint anatomy and curvatures, providing the potential for more natural knee motion. Finally, the pre-navigated disposable instruments help place the implants accurately and reproducibly.

The iTotal G2 system comes packaged in a small sterile kit that includes the implant components and all of the disposable instruments for the procedure. In contrast to an off-the-shelf total knee system which may require between six to eight trays of instrumentation, only one reusable instrument tray is required at the hospital for the iTotal G2.

For the patient population that requires a total knee replacement, the surgeon's ultimate goal is to give patients a long lasting, more natural feeling knee. With the ConforMIS iTotal Knee System, there is less bone resection, less blood loss and patients are having a quicker return to everyday activities compared to traditional knee replacements.