



Health is for growth

Mako

**robotics
arm-assisted
surgery**

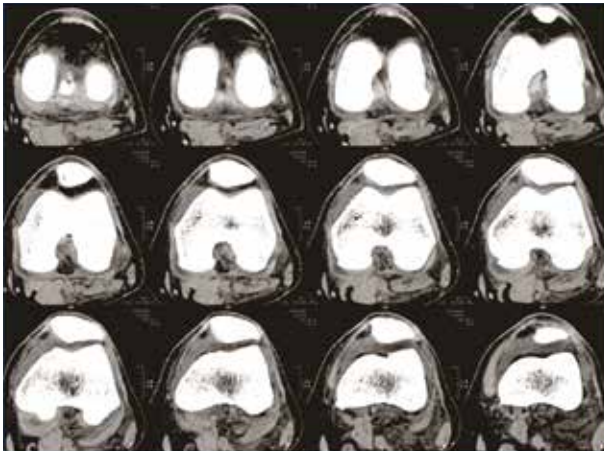


How Does

Mako Technology work?

Before surgery:

It all begins with a CT scan of your knee joint that is used to generate a 3D virtual model of your unique anatomy. This virtual model is loaded into the Mako System software and is used to create your personalized pre-operative plan.



CT SCAN

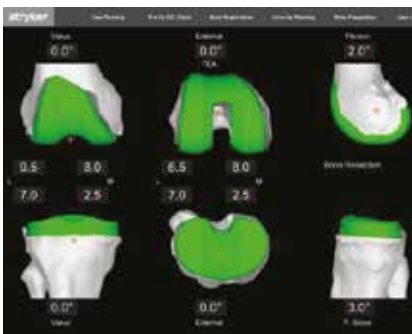
How Does

Mako Technology work?

In the operating room:

In the operating room, your surgeon will use the Mako System to assist in performing your surgery based on your personalized pre-operative plan. With the use of navigation, CT model (which is static) is converted to a dynamic model. Which means the knee will look as it is in motion.

After this, a plan is created for a satisfactory correction of deformity by minimizing bone cuts & minimizing soft tissue dissection. When the surgeon prepares the bone for the implant, the Mako System helps the surgeon stay within the planned boundaries that were defined when the personalized pre-operative plan was created. The Mako System also allows your surgeon to make adjustments to your plan during surgery as needed. In a laboratory study, Mako Technology demonstrated accurate placement of implants to a personalized surgical plan. This study also showed that Mako Total Knee replacement demonstrated soft tissue protection to the ligaments around the knee.



PERSONALIZED PLANNING

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After surgery:

After surgery, your surgeon, nurses and physical therapists will set goals with you to get you back on the move. They will closely monitor your condition and progress. Your surgeon may review a post-operative x-ray of your new knee with you.



POST-OPERATIVE X-RAY

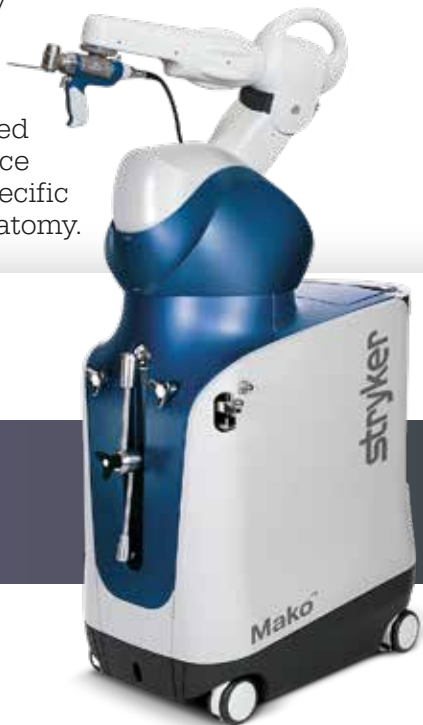
Mako

Robotic-Arm Assisted Surgery

Over the years, knee replacement techniques and instrumentation have undergone countless improvements. Mako Robotic-Arm Assisted Technology is an example of how technology is transforming the way joint replacement surgeries are being performed.

When you hear 'Robotic-Arm Assisted Technology,' it's important to understand that the Mako Robotic-Arm doesn't perform the surgery. Surgery is performed by an orthopaedic surgeon, who uses the Mako System software to pre-plan your surgery. Your orthopaedic surgeon will guide the Mako robotic-arm to remove diseased bone and cartilage.

Mako Technology was designed to help surgeons provide patients with a personalized surgical experience based on their specific diagnosis and anatomy.



Mako

Frequently asked questions

Did you know?

Knee replacement patients may return to driving in 4-6 weeks.



Q: Is Mako covered by health insurance providers?

A: We understand that making sure your total knee replacement is covered by health insurance is important to you. Check with your health insurance provider to verify your specific coverage.

Q: How long has the Mako procedure been available?

A: The first Mako procedure was a partial knee replacement performed in June of 2006.

Q: Does the Mako robotic-arm actually perform surgery?

A: No, the robotic-arm doesn't perform surgery, nor can it make decisions on its own or move without the surgeon guiding it.

Q: How long do knee implants last?

A: Individual results vary and not all patients will have the same postoperative recovery and activity level. The lifetime of a knee replacement is not infinite and varies with each individual.