

MitraClip: Taking Technology to Heart

For Tom Saupe, retirement is filled with family, snowbird trips to Texas, and golf. Lots of golf. Because of his active schedule, the 81-year-old was shocked when a routine doctor's appointment uncovered a heart murmur, which was later diagnosed as a leaky mitral valve in his heart, or mitral regurgitation.

"It caught me totally by surprise I didn't understand how serious it was," reflected Saupe. "I knew I was short of breath; I knew I was struggling a little bit because I play golf all the time, and getting around 18 holes was getting to be a chore."

The mitral valve is a small flap in the heart that stops blood from flowing the wrong way. With mitral regurgitation, the flap doesn't close tightly, allowing blood to flow backward in the heart. Mitral valve regurgitation does not always have symptoms, but if the issue is significant, blood can't move through the body as efficiently, making someone feel tired or out of breath. If unaddressed, it can eventually lead to heart failure.

"People can have valve problems for multiple years, and when they start to have symptoms, which is like shortness of breath or feeling fatigued and tired, the common response we get from people is, 'Oh I'm just getting old. I'm getting tired. I'm getting short of breath.' It could be that, but not necessarily only that, because valvular problems, whether aortic stenosis or leaky mitral valve can cause shortness of breath, and that's actually the first sign of coming heart failure," said Dr. Sudhir Mungee, interventional cardiologist, OSF HealthCare Cardiovascular Institute.

For years, the standard procedure to fix a leaky mitral valve has been valve repair or total valve replacement, which requires open heart surgery and a long recovery for the patient.

However, the structural heart team at OSF HealthCare Saint Francis Medical Center is now offering a minimally invasive treatment option called the MitraClip.

"We were able to bring the technology, which is called the MitraClip, which is basically clipping the mitral leaflet, which is not closing properly and causing leakiness of the valve, so the heart has to work extra," explained Dr. Mungee. "And when the heart has to work extra, it's going to tire out, and that's when patients develop heart failure symptoms."

Delivered by a catheter, the MitraClip attaches to the mitral valve and enables it to close more completely, helping to restore normal blood flow.

According to Dr. Mungee, the MitraClip is a promising look into the future of structural heart treatments and interventions. Providing lifesaving heart treatments without an incision, or percutaneously, allows patients to regain quality of life, without many of the risks that come with open heart surgery.

"The future of structural heart intervention is extremely promising," said Dr. Mungee. "We are moving from open procedures. We are moving from long duration of hospitalization to a minimalistic approach. Even in surgery, we are doing a lot of minimal approach surgeries, but I think percutaneously structural intervention, whether aortic valve, mitral valve, tricuspid valve, is going to lead the way."

As for Tom Saupe, the successful MitraClip procedure meant breathing easier on the golf course, and a challenge for Dr Mungee.

“I did a lot of research on him. I told him I did. I told him I heard he wasn’t a very good golfer, so he told me this summer we’ll get together and find out,” smiled Saupe.

To learn more about MitraClip and all of the innovative services provided by the team at OSF HealthCare Cardiovascular Institute, visit osfhealthcare.org/heart.