

**Norma Melchor Heart & Vascular Institute**  
Mountain View Campus

# The WATCHMAN™ Procedure: A Handbook for Patients



# Getting the Most from Your WATCHMAN Procedure

At El Camino Health, we provide all the information you need to understand and prepare for your heart care procedure. For the best possible outcome:

- Please take time to read this handbook to understand your heart condition and the procedure that will correct it.
- Make note of any questions you have for our team. We're available to talk with you at any point — before or after your procedure.
- Follow your doctors' directives closely for the best possible recovery.

Our cardiovascular expertise and dedication to our patients have earned us accolades, but our greatest accomplishment is helping people achieve optimal health.

## Your WATCHMAN Procedure Is Scheduled

Date and time: \_\_\_\_\_.

Please arrive at El Camino Health's Mountain View campus, 2500 Grant Road, at (time): \_\_\_\_\_.

NOTE: Sometimes surgery schedules change at short notice. If your time or date is moved, we will notify you as soon as possible.

## Before Your Procedure

**Stop** taking these medications: \_\_\_\_\_

on (date): \_\_\_\_\_.

**Stop** taking this blood thinner medication: \_\_\_\_\_

on (date): \_\_\_\_\_.

**Start** taking these medications: \_\_\_\_\_

on (date): \_\_\_\_\_.

## The Night Before Your Procedure

**Do not** eat or drink anything (including water) after midnight.

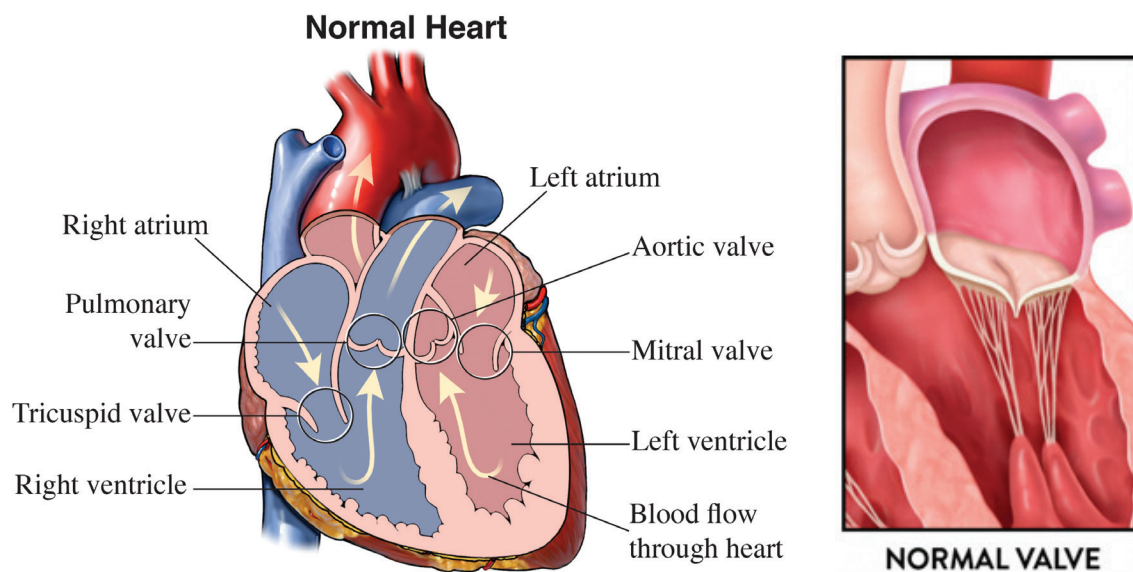
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## The Normal Heart

First, let's review how your heart works when it's healthy. The heart has four chambers. The upper chambers are called atria and the lower chambers are called ventricles. In between these chambers are valves that regulate the flow of blood through the heart. The mitral valve sits between the left atrium and left ventricle and allows oxygen-rich blood from the lungs to flow into the left ventricle. From there the blood is sent out to the body through the aortic valve.

The heart has specialized cells which produce electrical impulses that stimulate the heart muscle cells to beat and pump your blood. Normally, your heart's pumping rate is controlled by the heart's internal pacemaker that is located in the upper portion of the right atrium. This electrical stimulation causes the heart muscle to contract and pump blood through the blood vessels.



### Glossary: Learn the Medical Terms

**atrial fibrillation** – A condition where the heart does not contract in a coordinated way and the heart beat becomes irregular.

**catheter** – A thin, flexible tube inserted into the body during medical procedures.

**transesophageal echocardiogram (TEE)** – An ultrasound of your heart that makes moving pictures so your doctor can see the heart muscle and valves working. An ultrasound probe is placed in your throat to provide images of the mitral valve. This is done with anesthesia.

**femoral vein** – A large vein in the upper leg or groin.

**left atrial appendage** – A pouch-like structure that is part of the left atrium

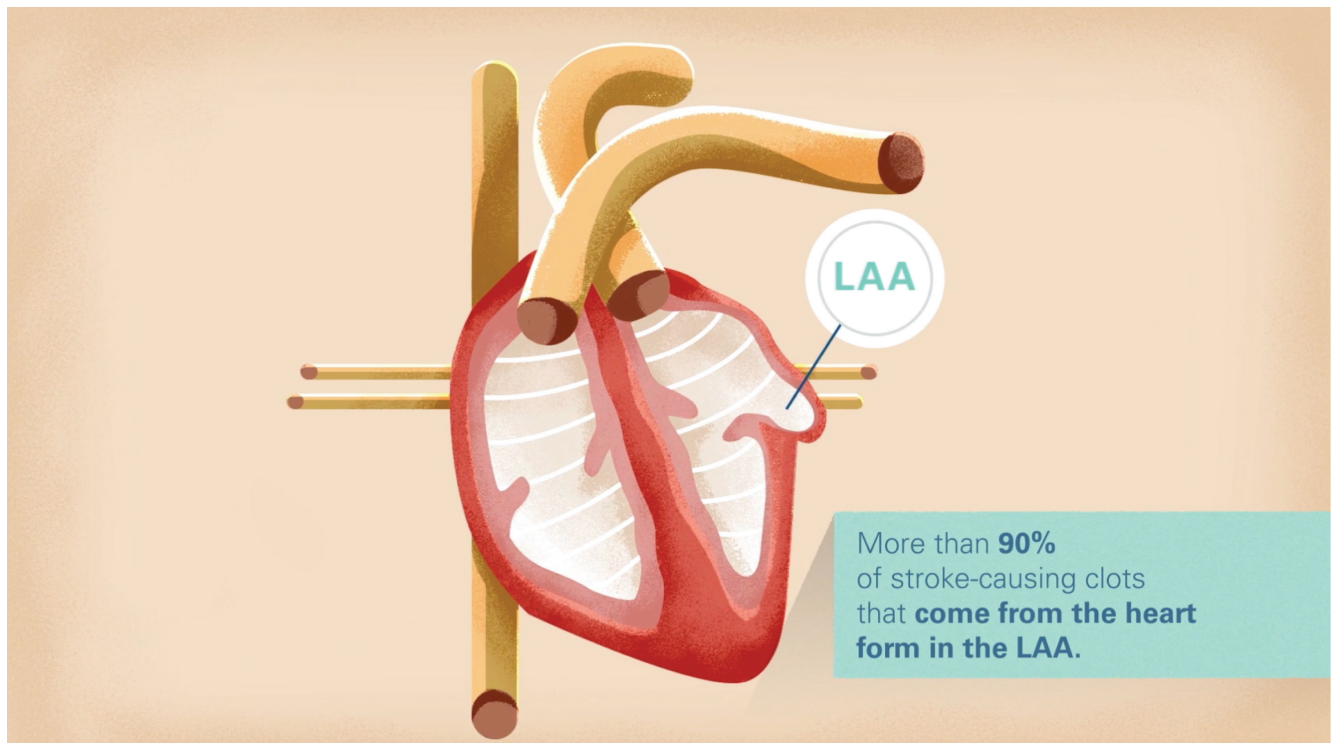
**WATCHMAN** – A small device that plugs the left atrial appendage and prevents the formation of clots.

**electrocardiogram** – Test that checks your heart's rhythm and electrical activity using sensors attached to your skin

## Atrial Fibrillation and Stroke

In atrial fibrillation, the right and left atria no longer contract together in a coordinated fashion and the heart beat becomes irregular. Because the right and left atria no longer contract normally, the blood flow within the atria can be slower than normal. This change in blood flow may also cause blood clots to form. More than 90% of the clots that come from the heart originate in the left atrial appendage (LAA), a pouch-like structure

that is part of the left atrium. If a blood clot breaks loose from the left atrial appendage and blocks a blood vessel in the brain, the part of the brain that is supplied by that blood vessel can become permanently damaged within minutes. This type of brain damage is known as a stroke. A stroke can result in the loss of a body function, weakness, a change in sensation, problems speaking or even death.



### Anticoagulants

Blood-thinning medications called anticoagulants reduce the chance that blood clots form and are effective in lowering the risk of stroke in atrial fibrillation patients. Most patients can take these medications for decades without serious side effects. However some patients find that anticoagulants can be difficult to tolerate and even dangerous as they increase the risk of bleeding problems. Often the bleeding events are minor, such as a nose bleed, but they may also be serious, requiring hospitalization, transfusions and even cause death if there is bleeding into the brain.

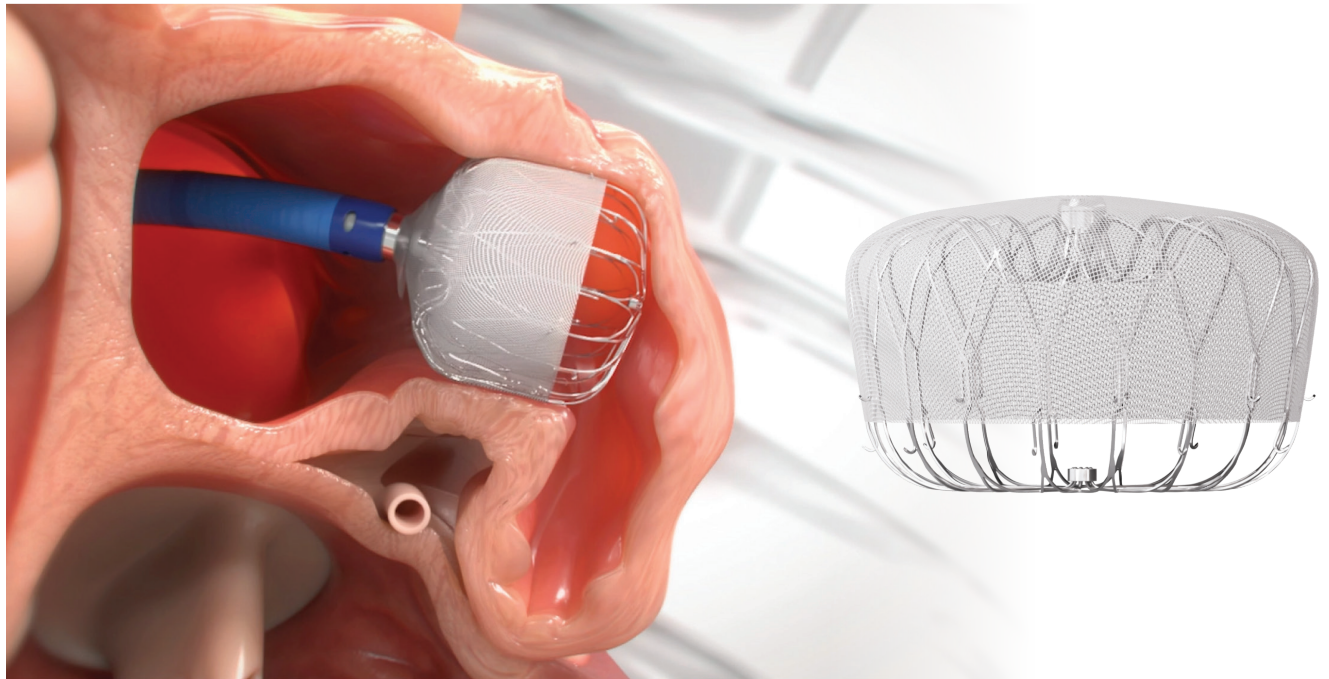
## WATCHMAN

WATCHMAN works by closing off the LAA to prevent clots from developing there. This can reduce your risk of stroke significantly without taking blood thinners. A clinical trial showed 98% of people who received the WATCHMAN implant were able to stop taking blood thinners within 45 days.

This one-hour procedure is done with general anesthesia. A transesophageal echo (TEE) probe is placed in your throat to help guide the doctor during placement of the WATCHMAN. A small cut is made in the upper leg and a flexible tube (catheter) is inserted into your femoral vein and guided to your heart. The catheter is moved from the right to the left side of your heart where the WATCHMAN device, which is the size of a quarter, is placed into the LAA to close it off. Patients generally go home the same day. Some may remain overnight for further observation. The

WATCHMAN device has a nitinol (nickel and titanium) frame with a polyester cover and is available in five sizes. Your doctor will decide which size works best for you.

Your physician may alter your post-procedure anticoagulation regime depending on your bleeding risk. However, with the standard protocol, after the procedure you will continue to take your anticoagulant and an aspirin for 45 days. At that point you are required to have a repeat TEE to check your WATCHMAN device. It is necessary to determine if the device has sealed off. If the device has sealed off the opening to the LAA you will be able to stop your anticoagulant and start Plavix (Clopidogrel) for 4.5 months. Another echo will be performed at 6 months and if the device is stable you will stop taking Plavix and remain permanently on aspirin.



## Benefits and Risks of WATCHMAN

Benefits include:

- Stopping your anticoagulant
- Reduced risk of stroke
- Reduced risk of bleeding

It is always wise to discuss the risks of any procedure with your doctor. Left atrial appendage occlusion (LAAO) is considered safe and effective, but like all procedures it carries some risks. Your physician will discuss your individual risks during your clinic consultation.

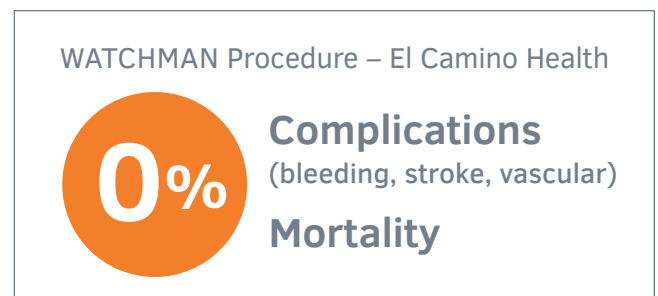
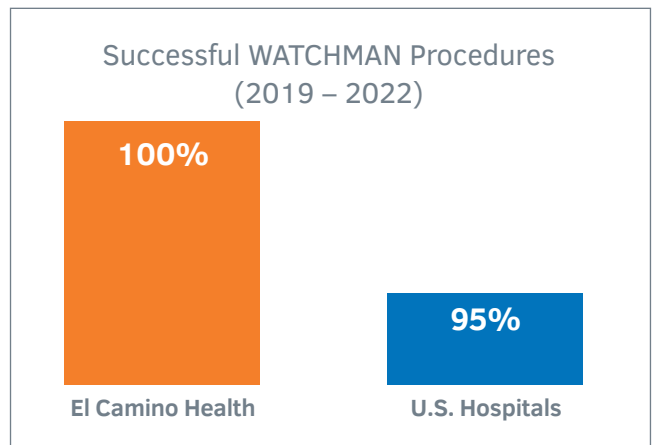
## Learn More: Educational Resources

For more details about what happens during the WATCHMAN procedure, visit the Boston Scientific website: [watchman.com](https://www.watchman.com)



## Experience Counts: Quality and Safety Data

El Camino Health has always been at the forefront of WATCHMAN innovation. We were among the first hospitals in the Bay Area to create a WATCHMAN program and have placed over 275 since 2016. We are currently involved in research to determine if this ground-breaking therapy could be made available to all patients with atrial fibrillation. When it comes to patient outcomes, we are consistently superior to the national benchmarks as compared to the outcomes from all patients across the U.S. tracked by the ACC/NCDR LAAO (left atrial appendage occlusion) registry.



# How to Prepare for Your WATCHMAN Procedure

Careful preparation on your part helps ensure a successful procedure and smooth recovery.

## One Month Before Procedure

### Stop smoking.

Smoking prevents your body from receiving the oxygen it needs. If you continue smoking, it may take longer for you to recover from your procedure. Quitting may be difficult, but you must do it. Talk to your doctor if you need help managing nicotine cravings and withdrawal symptoms.

### Report new health problems.

Stay in the best health possible. If you develop any new health problems in the month leading up to the procedure, let your doctor know as soon as possible. This includes a fever, cough, sore throat, cold, urinary tract infection, or if a doctor or dentist has started you on an antibiotic.

Dental procedures should be completed prior to your WATCHMAN procedure. Otherwise, you will need to wait until six months after the WATCHMAN procedure to schedule a dental procedure.

## The Week Before Procedure

**Stop taking medications as instructed by your doctor.**

**Continue taking antiplatelet medications such as:**

- Aspirin (Ecotrin®)
- Clopidogrel (Plavix®)
- Prasugrel (Effient®)
- Ticagrelor (Brilinta®)

## One Day Before Procedure

**Pack your hospital bag.** Wear comfortable clothing to the hospital. You can wear the same outfit on your return home. Please pack lightly as storage is minimal. See below: “What to Pack.”

**Stop food and drink at midnight.** Do not eat or drink anything (including water) after midnight the night before your procedure.

**Remove all jewelry, makeup and nail polish.** These may interfere with the procedure and any tests you need.

## What to Pack: Travel Light

At the hospital, you will receive a gown, pajama bottoms and a pair of non-skid slipper socks. Bring only:

### Toiletries

- Dental care items
- Shaving items
- Lip balm
- Hairbrush or comb

### Clothing

- Change of underclothing
- Bathrobe, if desired

### Personal Items

- Dentures
- Glasses
- CPAP (continuous positive airway pressure) mask
- Hearing aids with extra batteries

**Do not bring jewelry, valuables or personal medications.**



# About Your Hospital Stay

## On the Morning of Your WATCHMAN Procedure

Come directly to El Camino Health's Mountain View campus as instructed. Family members may wait with you in the pre/post-procedure room. You will be there for about an hour. While you are there:

- A nurse will review your medical information, start an intravenous (IV) line in your arm, draw blood and give you an aspirin.
- You will undergo an electrocardiogram (to check your heart's rhythm and electrical activity using sensors attached to your skin).
- The anesthesiologist will answer any questions you may have.

## During the Procedure

- In the procedure room, a nurse will greet you, check the name on your wristband and review vital information.
- Your anesthesiologist will give general anesthesia. You will be asleep during your procedure.
- The interventional cardiologist will insert a catheter in your right groin area. A transesophageal echo probe will be placed during the procedure. If the TEE reveals clots in the left atrial appendage, then the procedure will be cancelled. Your physician will determine when it will be safe to proceed with the WATCHMAN at a later date.
- You will be in the procedure room approximately one hour, but time varies by patient. Your team will keep you, your loved ones and caregivers informed of any delays.

## After the Procedure

- Nurses will take you back to the post-procedure room, attached to a cardiac monitor and IV.
- They will frequently check your blood pressure, mental state and the pulses in your legs.
- Your heart rhythm will be continuously monitored.
- About two hours later, you will be moved to your hospital room.
- To reduce any chance of bleeding from the incision site in your groin, you will be required to lie flat for two to three hours.
- After four to six hours, a nurse will assist you out of bed and encourage you to walk as part of your recovery.
- You will resume your normal medication.

## Before You Go Home

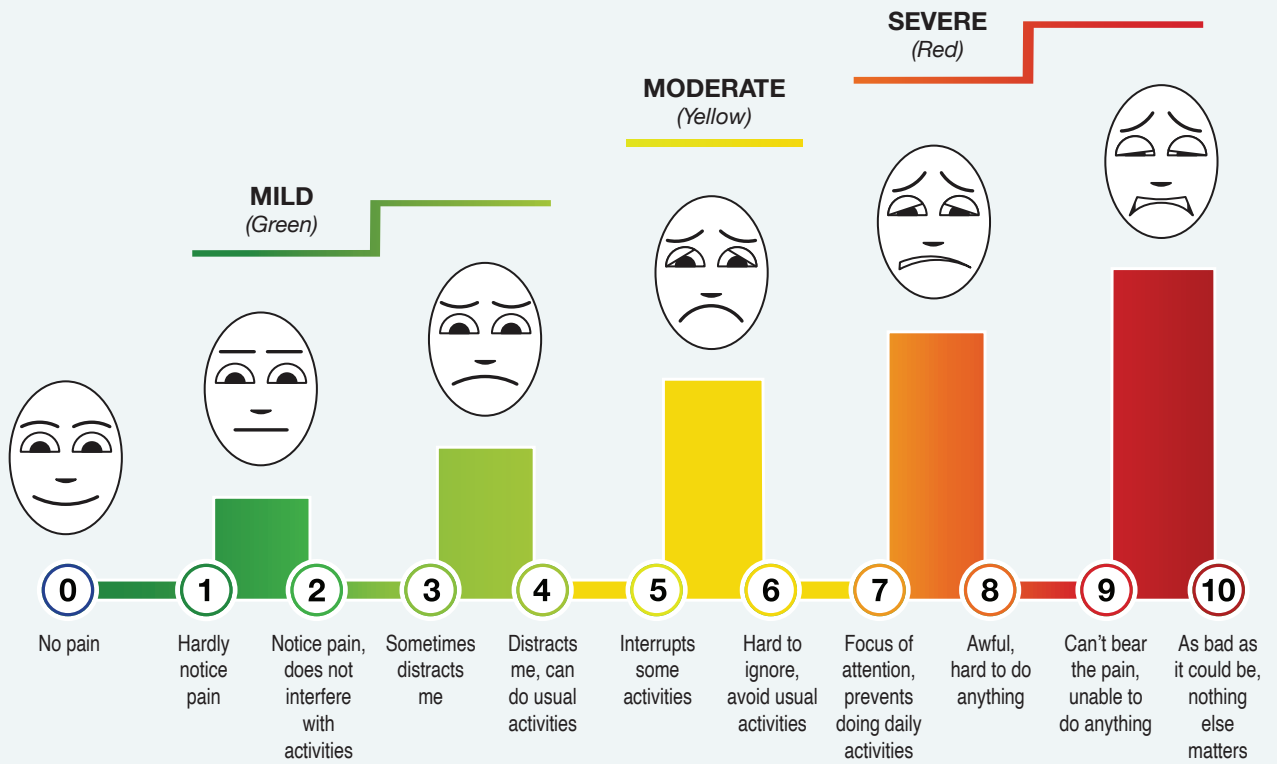
Patients are usually discharged one day after the procedure. Before you return home:

- Your care team will provide you with a list of discharge medications.
- An appointment will be scheduled for 45 days after your procedure and will include a transesophageal echocardiogram. A second appointment will be scheduled 4.5 months later for a repeat echocardiogram.
- Following this appointment, you will return to the care of your primary cardiologist.

## Pain Management

While pain and discomfort are minimal following a WATCHMAN procedure, the experience is different for every patient. Your nurse will ask you to describe any discomfort using the Pain Assessment Scale. Our goal for your pain management is to keep your pain at a comfort level that allows you to do activities that are important to your recovery and quality of your life.

### PAIN ASSESSMENT SCALE



DVPRS Pain Scale

v 2.0

## Taking Care of Yourself at Home

### Watch for Danger Signs

You may experience mild discomfort at the incision (puncture) sites in your groin. However, if you experience any of the following signs or symptoms, call your doctor:

- Bloody drainage from the incisions. If this occurs, first apply manual pressure over the site for 10 minutes. If drainage does not stop after 10 minutes, call your doctor.
- Chest pain or angina symptoms not relieved by rest — angina symptoms include pain in your arms, neck, jaw, shoulder or back.
- Dizziness or faintness.
- Numbness, tingling or cold feeling in feet or legs.
- Rapid or irregular heart rate.
- Shortness of breath not relieved by rest.
- Signs of infection (running a fever greater than 101°F).
- Swelling or increased bruising near the incision sites in your groin.

### Eat a Healthy Diet

Healthy food and beverages will help you recover more quickly. Aim for meals that are low in saturated fat and high in fiber. Avoid adding salt. Enjoy alcohol and coffee in moderation.

### Take Your Medication

Know your medications and take them as prescribed.

### Restrictions on Activity

**Bathing.** Use caution with hot water because it can make you feel lightheaded. Shower using warm water and mild soap. Do not scrub or apply pressure to the incision areas. Pat those areas dry with a towel — do not rub. Do not submerge your incisions in water. Do not take a bath, swim in a pool or soak in a hot tub until you are completely healed.

**Driving.** 48 hours after your procedure, you may drive a car.

**Lifting.** Avoid strenuous activity and do not lift anything heavier than 10 pounds for one week.

**Sex.** You may resume sexual activity within seven to 10 days.

**Working.** In one week, you may return to work.

### Prevent Infection

People who have had a WATCHMAN implanted are at risk for developing bacterial endocarditis, an infection that causes destruction or scarring of the heart valves. It may occur as a result of dental work, skin infections or surgery.

- Please avoid any dental procedures, including cleaning, for six months after your WATCHMAN.
- To prevent infection from dental work or surgery beyond six months, request a prescription from your doctor for the appropriate antibiotic.
- Inform your doctor of any skin conditions, cuts or abrasions that could become infected.

# WATCHMAN Procedure: Frequently Asked Questions

- 1. How long does the WATCHMAN procedure take?**  
The procedure takes about one hour.
- 2. How long is the recovery period?**  
Patients must lie flat for two to three hours directly after the procedure. Recovery takes about one to two days for most patients.
- 3. How long is the hospital stay?**  
Patients are typically discharged after one day.
- 4. What restrictions should I expect?**
  - No driving for at least 48 hours.
  - No lifting anything heavier than a gallon of milk (or about 10 pounds) for one week.
  - No exercise that engages the abdomen for one week.
- 5. Should I fast before the procedure?**  
The day before the procedure, patients should not eat or drink anything after midnight.
- 6. Do I need to stop my medications?**  
You will be given specific instructions during your cardiology consult appointment.
- 7. When may I start exercising again?**  
We encourage you to walk as much as you are able during your recovery and return to your regular exercise activity in a week.
- 8. Will I be awake for the procedure?**  
No, the procedure is done under general anesthesia.
- 9. Who will perform the procedure?**  
The WATCHMAN procedure is performed by the interventional cardiologist.
- 10. What are the major complications related to the procedure?**  
Your doctor will discuss your personal risks related to the procedure. Generally, your risks include:
  - Bleeding
  - Pericardial tamponade
  - Infection
  - Injury to the blood vessels
  - Death
- 11. When do I follow up with the doctor after discharge?**  
A 45-day follow-up appointment and a transesophageal echocardiogram will be scheduled with your cardiologist. Another appointment will be arranged six months following your procedure.
- 12. Will my pacemaker be turned off during the WATCHMAN procedure?**  
No, your pacemaker will remain on.
- 13. After the procedure, will I need antibiotics before going to the dentist?**  
We recommend that you do not have any dental work, including cleaning, for six months after the procedure. After that, yes, you will need to take antibiotics prior to any dental work.
- 14. Will I need help at home after the procedure?**  
We recommend that you have someone spend the first night at home with you.
- 15. Can I get an MRI with my WATCHMAN?**  
Yes, you can safely have an MRI with your WATCHMAN.
- 16. Will my WATCHMAN set off alarms at the airport?**  
Your WATCHMAN will not cause problems with airport security.



# At-a-Glance Summary of Your WATCHMAN Journey

## Attend the Cardiology Consult Appointment

- **An interventional cardiologist evaluates** your history and your treatment options are discussed with you.
- **If a WATCHMAN is right for you**, the clinic coordinator schedules your procedure.
- **A nurse will call you to review your educational material and answer any additional questions.**

## Undergo the Procedure at El Camino Health's Mountain View Campus

- **One to two hours before procedure**, you see the cardiologist who will perform your procedure.
- **Your team performs the procedure** which takes about one hour.
- **You rest in the recovery area** for about one hour.
- **Your WATCHMAN cardiologist sees you** in the recovery area.
- **You will be discharged** later that day unless your physician wishes for you to remain overnight.
- **The day after the procedure**, you are evaluated by your WATCHMAN cardiologist and the cardiology physician assistant (PA).

## Visit Your Doctors for Follow-Ups

- **45 days after**, you follow up with your WATCHMAN doctor and have another transesophageal echocardiogram. A follow up appointment is scheduled 4 ½ months later with an echo.
- **Following your 45 day-after appointment**, you visit your regular cardiologist, the one who referred you to us for treatment.







## About El Camino Health

El Camino Health provides a personalized healthcare experience at two not-for-profit hospitals as well as primary care, multi-specialty care, and urgent care locations across Santa Clara County.

Bringing together the best in technology and advanced medicine, our network of physicians and care teams delivers high-quality, compassionate care.



### **Mountain View Campus**

2500 Grant Road  
Mountain View, CA 94040

### **Norma Melchor**

**Heart & Vascular Institute**

[elcaminohealth.org/heart](https://elcaminohealth.org/heart)

