# Cyberknife of Long Island

# Robotic Radiosurgery at North Shore Radiation Therapy



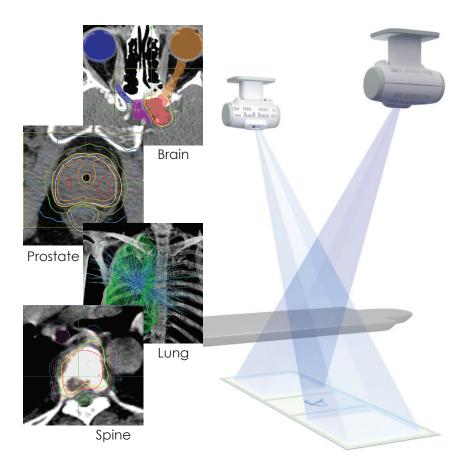


Setting the standard for innovative, compassionate cancer treatment

## What is the Cyberknife System?

The Cyberknife Robotic Radiosurgery System is a viable, non-invasive alternative for the treatment of tumors anywhere in the body. The treatment - which delivers high doses of radiation to tumors with extreme accuracy offers renewed hope to patients who have inoperable or surgically complex tumors, or who may be looking for an alternative to surgery.

The Cyberknife System uses image guidance and computer controlled robotics to deliver multiple beams of high-energy radiation to the tumor from virtually any direction. Designed to treat tumors anywhere in the body with sub-millimeter accuracy, the Cyberknife System tracks the tumor's position, detects any tumor or patient movement and automatically corrects the treatment delivery. This outpatient procedure does not require any anesthesia or invasive stabilizing frames. Most patients experience minimal recovery time and return to normal activities immediately.



## Cyberknife Patient Benefits:

- Pain Free
- Non-Invasive
- No Anesthesia Necessary
- Outpatient Treatment
- Quick Recovery, Immediate Return to Normal Activities
- No Rigid Steel Head Frames Required
- No Need to Hold Your Breath During Treatment



## What Makes the Cyberknife System Unique?

**Pinpoint Accuracy** enables clinicians to confidently treat tumors with minimal harm to surrounding healthy tissues by delivering high doses of radiation with sub-millimeter accuracy (within the width of a human hair).

**Ultra-Flexibility** offers maneuverability and versatility that is unsurpassed by traditional radiation delivery systems. By delivering radiation beams from virtually unlimited positions, the Cyberknife System can treat tumors anywhere in the body, from any angle, including the brain, spine, liver, pancreas and prostate.

**Continuous Tumor Tracking** monitors tumor position, detects any tumor or patient movement and automatically corrects the treatment delivery. Without the need to manually reposition the patient or interrupt the treatment, thereby slowing down the treatment process.

**Non-Invasive Treatment** provides a pain-free, non-invasive alternative for patients, including those diagnosed with previously inoperable or surgically complex tumors, or for patients who are looking for an alternative to surgery.

## **Treatment Process**

**Scanning -** Prior to treatment with the Cyberknife System, the patient undergoes imaging procedures to determine the size, shape and location of the tumor. The process begins with a standard high-resolution CT Scan or, for certain tumors, other imaging techniques such as MRI, angiography or PET, may be used.

**Planning -** Following the scanning, the image data is digitally transferred to the Cyberknife System's treatment planning workstation, where the physician identifies the exact size, shape and location of the tumor. A Cyberknife qualified physician and medical physicist then use the Cyberknife software to generate a treatment plan to provide the desired radiation dose to the tumor, while avoiding damage to the surrounding healthy tissue. The patient does not need to be present for this step in the process.

**Treatment -** During a Cyberknife procedure, the patient lies comfortably on the treatment table. The patient's position is then automatically adjusted. Anesthesia is not required, as the procedure is painless and non-invasive. The treatment generally lasts from 30 to 90 minutes and is typically completed in one to five visits.

**Follow-Up** - Follow-up imaging is generally performed with a combination of CT, MRI and/or PET scanning to assess the tumor's response to the delivered radiation.



In Their Own Words...

"When I was diagnosed with prostate cancer and I researched my treatment options, I was worried about the possible risks and side effects of other more invasive procedures. The Cyberknife, in my experience, allowed me to avoid these potentially devastating complications and get back to my normal life with little no side effects."

-Scott, prostate cancer patient

"I was terrified about having surgery to remove my brain tumor. The doctors told me that I would likely lose hearing in my left ear, plus I could have facial paralysis and balance problems for the rest of my life. My first thought was of my younger kids and how their lives would be affected by my long recovery and the possibility that something could go permanently wrong. But with the Cyberknife, the journey to remove my tumor was very easy. I didn't have any side effects and my quality of life never changed."

- Suzanne, acoustic neuroma/brain tumor patient

"After a long and painful recovery from the surgery that removed my first lung tumor, I elected to have the second tumor removed non-invasively using the Cyberknife System. The Cyberknife treatment was very easy. I relaxed and slept during the treatment. I was able to return to work immediately. There were no side effects. I am grateful recommended me for Cyberknife radiosurgery."

- Joan, lung cancer patient

"When I learned I had a tumor on my spinal cord, doctors told me that without surgery I would be paraplegic and that the extremely delicate and risky surgery would involve removing the ribs and intestines. I opted for treatment with the Cyberknife System and with just three, pain-free outpatient visits, I had my life back."

- Carol, spine tumor patient

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## Bringing Cyberknife to Long Island

Cyberknife of Long Island is operated by North Shore Radiation Therapy, a community radiation therapy center treating cancer patients for over 20 years. Our commitment is to treat the whole person, not just the cancer. Cyberknife of Long Island is the only center in Suffolk County, the most advanced on Long Island and easily accessible for all patients in the New York Metropolitan area.

In addition:

- Our patients have the support of a dedicated Cyberknife nurse coordinator, who communicates with all of your physicians and keeps you informed every step of the way, from consultation through treatment.
- Our expert staff is trained in the most effective up-to-date treatment approaches.
- Our multidisciplinary team includes top radiation oncologists, surgeons, oncologists, medical physicists, radiation therapists, and administrative staff.
- Our state-of-the-science technology includes the latest equipment available.

Cyberknife has been used to treat more than 60,000 patients and has been installed as the radiosurgery system of choice by more than 150 institutions globally, including many of the most prestigious cancer centers in the world. We are proud to join these ranks and make this groundbreaking technology available to patients throughout the communities we serve.

For more information, contact us at 631.864.5600 or 631.427.2273

You may also visit us on the web at www.cancer-radiation.com

## Directions to Cyberknife of Long Island (Smithtown)

#### From the Long Island Expressway (LIE Route 495):

Exit 53 Sagtikos Parkway/Sunken Meadow Parkway Northbound to Exit SM3E Jericho Turnpike (Route 25) towards Smithtown. Proceed East on Route 25 for 1.6 miles. Cyberknife of Long Island is located on your left.

#### From the Northern State Parkway:

Exit 45 Sagtikos Parkway/Sunken Meadow Parkway Northbound to Exit SM3E Jericho Turnpike (Route 25) towards Smithtown. Proceed East on Route 25 for 1.6 miles. Cyberknife of Long Island is located on your left.

## Directions to North Shore Radiation Therapy (Greenlawn)

#### From the Long Island Expressway (LIE Route 495):

Exit 51 toward Northport/Babylon Route 231. Take Deer Park Road for 5.4 and turn right on Pulaski Road. North Shore Radiation Therapy is located on your left.

#### From the Northern State Parkway:

Exit 42N toward Northport/County Route 66. Merge onto Deer Park Road. Continue for 3.6 miles and turn right on Pulaski Road. North Shore Radiation Therapy is located on your left.



## Cyberknife of Long Island

989 Jericho Turnpike Smithtown, NY 11787 Phone: 631.864.5600

## North Shore Radiation Therapy

270 Pulaski Road Greenlawn, NY 11740 Phone: 631-427-2273