



Here's the information you should know before undergoing a low-dose CT scan.

Should I be screened?

Currently, lung cancer screening is recommended and covered by most insurance plans and Medicare for specific high-risk individuals. A CT scan is currently covered for those who meet the following criteria:

- * Are age 55 to 77
- * Currently smoke or have quit smoking within the last 15 years
- * Have a tobacco smoking history of at least 30 "pack years" (an average of one pack a day for 30 years, 2 packs a day for 15 years and so on)

What are the risks and benefits of screening?

The CT combines special X-ray equipment with sophisticated computers to produce multiple cross-sectional images of the inside of the body.

Risks: Cancer screenings are not perfect. Many people who have smoked have small nodules (a relatively round area of abnormal tissue) in their lungs. Mostly, these are not lung cancer. Sometimes, a test appears to be abnormal, but no lung cancer is found (this is called a false-positive finding). These findings may require additional testing, such as another CT (most likely) or a biopsy (less likely) to determine whether or not cancer is present.

With a low-dose CT scan (LDCT) there is minimal risk of any effects from radiation exposure. The machine uses about one-fifth the amount of ionizing radiation as a standard chest CT scan. The amount of radiation from a LDCT scan is about the same as an average American receives in six months from natural background radiation by living on planet Earth.

Benefits: LDCTs are painless and noninvasive procedures that can find lung cancer when it's in early stages with a good chance for a cure.

So You're Coming in for Lung Cancer Screening

How effective is a CT scan?

Because CT scans can detect even very small nodules in the lung, they are especially effective for diagnosing lung cancer at its earliest, most treatable stage. In fact, about 80 percent of lung cancers are found at an early stage when there is a good chance of a cure. Without screening, more than 70 percent of lung cancers are found at a late stage with little chance of a cure.

How will the exam be performed?

The technologist will position you, often lying flat, on the exam table. You will be asked to raise your arms over your head. Then, the table will move more slowly through the machine as the CT scan is performed. You'll hold your breath while the machine is scanning, usually for about 5 to 10 seconds. This ensures that your lungs do not move, creating a more clear image. The entire exam should take around ten minutes total.

What will happen after my scan?

After your appointment, the radiologist will look at the results, search for anything of concern, put together a report that discusses anything unusual that showed up in the images, and make recommendations for any follow-up care. The radiologist then sends the report to the physician who referred you for the screening.

What if the radiologist detects something?

If the radiologist detects anything of concern, he or she will likely recommend a follow-up CT scan several months later to check that the nodule does not change in size. If you have an infection or any inflammation in your lungs when you get your LDCT, you will likely be recommended to have a follow-up scan in about a month to make sure the issue went away and is not something else. For the small percentage of people with abnormalities that are concerning for lung cancer, more immediate testing, such as a PET scan, may be necessary, as well as a referral to a specialist such as a pulmonologist. Sometimes the scan will find something else that is not lung cancer but may be significant to your health. In most cases, these are not serious, but your physician may recommend additional tests such as an ultrasound to get more information. Your physician may also refer you to a specialist.

- * Get information about lung cancer screening and other medical imaging at Radiologyinfo.org and the American Lung Association's Lung.org.
- * Visit ShouldIScreen.com to decide if lung cancer screening is right for you.