Lung Screening: FAQ for Patients

What is the lung cancer screening test?
Lung cancer is detected using a screening test called a low-dose CT scan (LDCT). The LDCT is a new lung screening procedure that has the potential to detect lung cancer at earlier stages.

Am I eligible for lung cancer screening?
You are eligible for an annual low-dose CT scan (LDCT) to screen for lung cancer if you meet these criteria:
» Age 55 to 77 years old
» A 30 “pack year” or greater history of smoking
» A “pack year” is calculated from multiplying the number of packs of cigarettes smoked per day by the number of years you have smoked
» Either currently smoke or have quit in the past 15 years
» No symptoms of lung cancer such as cough, shortness of breath or chest pain
» Able and willing to tolerate treatment if lung cancer is discovered

What are the benefits of lung cancer screening?
Lung cancer may be cured if it is discovered early before it causes symptoms. Unfortunately, once a person develops symptoms, the lung cancer may have advanced to a stage that prevents cure.

A recent study funded by the National Cancer Institute, the National Lung Screening Trial (NLST), found that low-dose CT (LDCT) screening resulted in 20% fewer lung cancer deaths compared to screening with a standard chest X-ray. More of the lung cancers detected by LDCT were at an earlier stage than those detected by chest X-ray.

You will only benefit fully if you continue with annual screening until age 77 or until you have quit smoking for 15 years. If you are a current smoker, the best action that you can take to reduce your risk of lung cancer is to stop smoking. Massachusetts has a number of programs to help. Please talk to your doctor or contact the Massachusetts Department of Public Health’s Smokers’ Helpline (free and confidential) at 1-800-QUIT-NOW (800-784-8669).

How can I get screened for lung cancer?
Low-dose CT (LDCT) screening for lung cancer requires a referral from your doctor. Talk to your doctor about your risk for the disease and discuss your eligibility for screening.

Can I refer myself for a CT to screen for lung cancer?
No, your doctor will order the CT scan. He or she can discuss the risks and benefits of the test, explain the results and organize any further follow-up.
What preparation do I need for lung cancer screening?
There is no preparation needed for a low-dose CT scan (LDCT) to screen for lung cancer. You do not need to fast or take oral contrast. You may continue all your medications and eat and drink normally. It is advised that all jewelry from the neck to the upper abdomen be removed as this can affect the image quality.

What happens when I have my lung cancer screening?
You will lie on your back on the CT scan table with your hands above your head. The table will move in and out of a donut-shaped ring where X-rays are generated and detected. You will be asked to hold your breath for a few seconds. You will not need an injection or dye. The procedure takes approximately two minutes, and you may leave once it is completed; you do not wait for the results.

What risks are associated with lung cancer screening?
The risks of low-dose CT scans (LDCT) can be divided into false positive or negative findings, over diagnosis, incidental findings, radiation exposure and anxiety.

False Positive Findings: While LDCT screening for lung cancer can save lives, it has a high number of false positives, findings that appear abnormal but turn out to be non-cancerous. An example is a nodule caused by a scar or old infection. Up to one quarter of patients screened will have a finding in the lungs that requires further testing, but the majority of these findings do not represent cancer. You may need further tests, most commonly a repeat CT scan. Your doctor may refer you to specialists at a multidisciplinary nodule clinic or request a PET scan, lung biopsy or surgery.

False Negative Findings: Screening may not pick up some cases of lung cancer. In the National Lung Screening Trial (NLST), about 4% of lung cancers were not detected at screening.

Over Diagnosis: Screening can discover small lung cancers that may not cause you any harm in your lifetime but can result in further testing or surgery.

Incidental Findings: Other findings may be discovered in organs that are also imaged during LDCT, such as the heart, abdomen, blood vessels and thyroid gland. You may already be aware of some, and some might be new findings. These findings may require further testing.

Radiation Risk: As with all CT exams, LDCT screening for lung cancer exposes you to radiation. The dose is equal to about a quarter of the naturally occurring background radiation received at sea level per year. This dose is about one quarter of a standard chest CT and about the same as a mammogram. It is difficult to document the exact amount of increased risk from radiation, but studies suggest that radiation slightly increases your incidence of cancer. Our team has extensive experience using the latest technology to detect lung cancer, and we are committed to minimizing radiation exposure for all exams.

Anxiety: Having an LDCT, waiting for the results and further evaluation for positive or incidental findings may cause stress and anxiety in some patients. Your doctor can discuss these risks with you and answer any questions that you may have.
Is lung cancer screening covered by insurance?
Low-dose CT (LDCT) to screen for lung cancer is covered by Medicare and private insurance plans for qualifying patients.

Do previous chest CT scans help in lung cancer screening?
Your prior chest CT scans are very helpful for interpreting your screening scan because they may tell us if a finding is new or stable. Studies performed at Mass General are available to the radiologist at the time of reporting your low-dose CT scan (LDCT).

If you have had a previous chest CT at another hospital, please notify your doctor and obtain a copy of the scan before you have your screening CT.

How and when do I get my results?
A specialist thoracic radiologist will report your low-dose CT scan (LDCT), using any prior scans you have had for comparison. The results will be sent to your doctor who may contact you within four weeks and make recommendations for next steps if needed.