Discussion Guide

Questions to discuss with your healthcare team about EGFR-positive non-small-cell lung cancer (NSCLC)

EGFR-positive NSCLC is NSCLC caused by a change, (or "mutation") to the gene that produces epidermal growth factor receptor (EGFR), a protein that helps cells to grow and divide. Mutations to EGFR can cause cancer cells to grow and spread throughout the body.[1] Investigational medications are currently being developed that aim to specifically target cells with EGFR mutations, with the hope that one day more treatment options become approved for EGFR-positive NSCLC.

How do I know if my NSCLC is EGFR positive?

After you are diagnosed with NSCLC, your doctor can perform a biomarker test (sometimes called a "gene test" or "molecular test") to see if you have a mutation that can be targeted, such as EGFR. It's important to speak with your doctor about performing biomarker testing so that you can better understand your potential options. Your results may also provide an opportunity for you to participate in clinical research.

Here are some questions you can ask your doctor or medical team about EGFR-positive NSCLC, biomarker testing and possible treatment options and clinical studies.

If you DO NOT know whether your NSCLC is EGFR-positive			Notes
Do we know which gene mutation is causing my cancer?	NO	• Should I have a biomarker test to find out if a "targetable" mutation is causing my NSCLC? • Could a biomarker test help us make informed decisions about my potential treatment options? • Could a biomarker test help us identify opportunities to participate in a research study?	
	YES	• Is an investigational medicine an option for me? • Would participation in a research study be an option for me?	

Source: [1] https://www.verywellhealth.com/lung-cancer-with-an-egfr-mutation-4097338

If you DO know whether your NSCLC is EGFR-positive			Notes
Am I currently on a targeted therapy?	NO	• Is a targeted therapy an option for me? • How are targeted therapies different from other treatments? • Which therapies specifically target EGFR-positive NSCLC? • Would participation in a research study for people with EGFR-positive NSCLC be an option for me?	
	YES	• How does this treatment specifically target EGFR-positive NSCLC? • How is this targeted treatment different from other treatments?	

If your doctor orders a biomarker test:	Notes
Before the biomarker test: • How will the test be administered? • What do I need to do to prepare for the test? • How long will it take to get the results? • Will insurance pay for the test? **After the biomarker test:** • What are the results of these tests? • How will the results affect my treatment? • Are there any medications that target my type of NSCLC? • Are there any clinical studies open to me based on these results?	

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Glossary

Common terms related to EGFR-positive non-small-cell lung cancer (NSCLC)

"EGFR-positive NSCLC" is NSCLC that tests positive for a change (or mutation) in the gene that makes a protein involved in cell growth called epidermal growth factor receptor (EGFR). Research studies are currently being conducted on investigational medications specifically for EGFR-positive NSCLC to test how safe and effective they are.

Your doctor can help you decide whether you should get a biomarker test to find out if your NSCLC is EGFR-positive, so you can better understand your potential options or whether participation in a certain research study is right for you.

This guide can help you become more comfortable with important words and terms, and help you prepare for your next conversation with your doctor.

Term:	Definition:
Biomarker test	Also called a "gene test" or "molecular test." Given to find out which gene mutation (EGFR, for example) is causing the cancer. The test may require a sample of lung tissue or a blood sample.[1]
EGFR	Epidermal growth factor receptor. A protein on the surface of cells that helps the cells grow and divide.[2] It is made by the EGFR gene.[3]
EGFR-positive NSCLC	NSCLC that tests positive for a mutation to the gene that produces EGFR. This mutation can cause cancer cells to grow and spread in the body.[4]
Exon 19 deletion	A relatively common type of EGFR mutation in people with NSCLC.[5] An **Exon** (such as Exon 19) is a specific part of the EGFR gene.[6] **Deletions** are reductions in parts of the gene, which can change the way that it functions.[7,8]
Exon 20 insertion	A rare type of EGFR mutation in people with NSCLC.[4] An **Exon** (such as Exon 20) is a specific part of the EGFR gene.[5] **Insertions** are additions to the gene, which can change the way that it functions.[7,9]
Exon 21 L858R substitution	A relatively common type of EGFR mutation in NSCLC.[4] An **Exon** (such as Exon 21) is a specific part of the EGFR gene.[5] **Substitutions** replace one part of the gene with another, which can change the way it functions.[10,11]
Gene mutation	Genes tell cells what to do and how to do it. Changes (mutations) to genes can cause cells to stop their normal function and may allow them to become cancerous.[12]
Investigational medication	A medication that has been tested in the laboratory and has obtained permission for further testing in research studies with people.[13]
Metastasised	When cancer cells have spread from the part of the body where they started to another part of the body.[14]

Term:	Definition:
NSCLC	Non-small-cell lung cancer. A disease in which cancer cells form on the tissue of the lungs. About 80-85% of lung cancers are NSCLC.[15]
Research study	Also called a "clinical study" or "clinical trial." The primary way that researchers find out if an investigational medication is safe and effective.[16]
Small cells	Cancer cells that appear small and round under a microscope. Non-small cells appear larger.[17]
Standard of care	Treatment that most medical experts agree is an appropriate choice and that is widely used by healthcare professionals.[18]
Targeted therapy	A type of cancer treatment that uses medications designed to "target" cancer cells with less harm to normal, healthy cells.[19]

Sources:

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