

KRAS Fact Sheet

If a biomarker test shows you have KRAS positive (KRAS+) nonsmall cell lung cancer (NSCLC), what does that mean? This fact sheet explains the diagnosis and how it might affect your treatment.



WHAT IS KRAS?

KRAS, which stands for **Kirsten rat sarcoma viral oncogene homolog**, is both a gene and a protein produced by the gene that play a role in controlling cell growth. A change, or mutation, in the KRAS gene can lead to the abnormal cell growth that causes cancer. The mutation is often caused by environmental factors, such as cigarette smoke or radon, and there may be other causes that are not yet known. The KRAS mutation is not only found in lung cancers, but also in some colorectal and pancreatic cancers.



WHO HAS KRAS+ LUNG CANCER?

KRAS mutations are most often found in people who smoke or have smoked in the past. One of these mutations, known as KRAS G12C, is found in about 13% of those with NSCLC most commonly in adenocarcinomas.



HOW DO DOCTORS TREAT KRAS+ LUNG CANCERS?

Chemotherapy and immunotherapy are currently given for most KRAS+ mutations in NSCLC. There are many types of KRAS positive mutations, but a targeted therapy has been approved for only one — **KRAS G12C**. It's called sotorasib (Lumakras), comes in pill form and is taken once a day.

Targeted therapy drugs, formulated for specific mutations, can keep cancer from growing and spreading, and have far fewer side effects than chemotherapy. Other targeted treatments for KRAS positive lung cancer may be available in a clinical trials.

Common side effects of these drugs include:

- Diarrhea
- Nausea
- Fatigue
- Cough

In rare cases, Lumakras may cause heart, liver, kidney, central nervous system or lung problems.