



LABORATORY REPORT

Example Client, XYZ123
1234 Warde Road
Ann Arbor MI 48108

EXAMPLE, REPORT W

WX0000003826 F 12/05/1988 34 Y

Referral Testing

Collected: 09/25/2023 08:00

Received: 09/25/2023 08:00

Test Name	Result	Flag	Ref-Ranges	Units	Site
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Kras Mutation Analysis

Kras Mutation Analysis	DETECTED	AB			QCRL
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Reference Range:
NOT DETECTED

KRAS mutation, (c.35G>T (p.Gly12Val), 12.3%), was detected. Please see below for additional details.

Activating KRAS oncogenic mutations are detected in a wide variety of cancers including colorectal carcinomas, lung adenocarcinomas, pancreatic cancers and hematopoietic neoplasia of myeloid origin. Presence of KRAS mutation in most tumor types is associated with adverse prognosis as well as resistance to receptor tyrosine kinase-directed targeted therapies, including against EGFR. The presence of a KRAS G12C mutation has been shown to be associated with response to targeted therapy with KRAS G12C inhibitors. KRAS, along with others, is a clinically actionable biomarker in NSCLC (non-small cell lung cancer) and other tumor types. In NSCLC the KRAS G12C mutation is prevalent in approximately 13% of patients and represents nearly half (44%) of all KRAS mutations.

In fixed tissue samples, the area of tumor was grossly macrodissected prior to DNA extraction. Nucleic acid was subjected to Next generation sequencing to screen for mutations in exons 2, 3 and 4 of KRAS (NM_004985.4). The sensitivity for mutation detection of the assay is 5% mutant allele in a background of normal alleles. Insertions up to 30bp and deletions up to 48bp have been successfully detected by this assay.

This test was developed and its analytical performance characteristics have been determined by Quest Diagnostics Nichols Institute . It has not been cleared or approved by FDA. This assay has been validated pursuant to the CLIA regulations and is used for clinical purposes.

Laboratory results and submitted clinical information reviewed by
Bernard Joseph Ilagan, MD, MHA, FACMG, CGMBS.
Test Performed at:
Quest Diagnostics Nichols Institute
33608 Ortega Highway
San Juan Capistrano, CA 92675-2042 I Maramica MD, PhD, MBA

Paraffin Block Number	ABC123	QCRL
Specimen Source Kras	LIVER	QCRL

LAB: L - LOW, H - HIGH, AB - ABNORMAL, C - CRITICAL, . - NOT TESTED

F325000005
WX0000003826
Printed D&T: 09/25/23 15:15

Ordered By: KAJAL SITWALA, MD, PhD
WX00000000002353

Kajal V. Sitwala, MD, PhD - Medical Director
Form: MM RL1
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QCRL: QUEST DIAGNOSTICS REFERENCE LAB CAPISTRANO 33608 Ortega Highway San Juan Capistrano CA 92675

Performing Site:

Reported Date: 2023.09.25 8:00 KRASA

LAB: L - LOW, H - HIGH, AB - ABNORMAL, C - CRITICAL, . - NOT TESTED

F325000005
WX0000003826

Printed D&T: 09/25/23 15:15

Ordered By: KAJAL SITWALA, MD, PhD
WX00000000002353

Kajal V. Sitwala, MD, PhD - Medical Director
Form: MM RL1
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