Test Definition: HEMMF

Hematologic Specified FISH, Varies

Overview

Useful For

The detection of specific chromosomal abnormalities in hematologic malignancies

Reflex Tests

Test Id	Reporting Name	Available Separately	Always Performed
HEMMB	Probe, Each Additional (HEMMF)	No, (Bill Only)	No

Testing Algorithm

This test includes a charge for the probe application, analysis, and professional interpretation of results for one probe set (2 individual fluorescence in situ hybridization probes). Additional charges will be incurred for all additional probe sets performed.

Appropriate ancillary probes may be performed at consultant discretion to render comprehensive assessment. Any additional probes will have the results included within the final report and will be performed at an additional charge.

Method Name

Fluorescence In Situ Hybridization (FISH)

NY State Available

Yes

Specimen

Specimen Type

Varies

Ordering Guidance

Consult with the laboratory before ordering this test.

The fluorescence in situ hybridization (FISH) probes to be analyzed must be specified on the request when ordering, otherwise test processing may be delayed in order to determine the intended analysis. **If specific probes are not provided, this test may be canceled by the laboratory**.

If testing paraffin-embedded tissue, bone marrow, or blood specimen for specific nonhematologic malignancies is desired, order MISCF / Miscellaneous Studies Using Chromosome-Specific Probes, FISH. If this test is ordered in this situation, it will be canceled and MISCF ordered and performed as the appropriate test.

Necessary Information

1. **A list of probes requested for analysis is required.**
2. A reason for testing should be submitted with each specimen. The laboratory will not reject testing if this information is not provided, but appropriate testing and interpretation may be compromised or delayed. If this information is not provided, an appropriate indication for testing may be entered by Mayo Clinic Laboratories.
3. A pathology and/or flow cytometry report may be requested by the laboratory to optimize testing and aid in interpretation of results.

Specimen Required

Submit only 1 of the following specimens:

Preferred
Specimen Type: Bone marrow
Container/Tube:
Preferred: Yellow top (ACD)
Acceptable: Green top (heparin) or lavender top (EDTA)
Specimen Volume: 2-3 mL
Collection Instructions:
1. It is preferable to send the first aspirate from the bone marrow collection.
2. Invert several times to mix bone marrow.
3. Send bone marrow specimen in original tube. **Do not aliquot.**

Acceptable
Specimen Type: Whole Blood
Container/Tube:
Preferred: Yellow top (ACD)
Acceptable: Green top (heparin) or lavender top (EDTA)
Specimen Volume: 6 mL
Collection Instructions:
1. Invert several times to mix blood.
2. Send whole blood specimen in original tube. **Do not aliquot.**

Specimen Minimum Volume

Blood: 2 mL
Bone marrow: 1 mL

Reject Due To

All specimens will be evaluated at Mayo Clinic Laboratories for test suitability.

Specimen Stability Information

Specimen Type	Temperature	Time	Special Container
Varies	Ambient (preferred)		
	Refrigerated		

Clinical & Interpretive

Clinical Information
Fluorescence in situ hybridization using gene-specific probes and various probe strategies can help characterize chromosome abnormalities in hematologic malignancies for diagnostic, prognostic, and therapeutic purposes.

Reference Values
An interpretive report will be provided.

Interpretation
A neoplastic clone is detected when the percent of cells with an abnormality exceeds the normal reference range for any given probe.

The absence of an abnormal clone does not rule out the presence of a neoplastic disorder.

Cautions
This test is not approved by the US Food and Drug Administration, and it is best used as an adjunct to existing clinical and pathologic information.

Bone marrow is the preferred specimen type for this fluorescence in situ hybridization test. If bone marrow is not available, a blood specimen may be used if there are malignant cells in the blood specimen (as verified by a hematopathologist).

Clinical Reference
Swerdlow SH, Campo E, Harris NL, et al, eds.: WHO Classification of Tumours of Haematopoietic and Lymphoid Tissues. IARC Press; 2017

Performance

Method Description
This test is performed using commercially available and laboratory-developed probes. For enumeration and break-apart strategy probe sets, 100 interphase nuclei are scored; 200 interphase nuclei are scored when dual-color, dual-fusion fluorescence in situ hybridization probes are used. All results are expressed as the percent abnormal nuclei.(Unpublished Mayo method)

PDF Report
No

Day(s) Performed
Monday through Friday

Report Available
9 to 12 days

Specimen Retention Time

4 weeks

Performing Laboratory Location

Rochester

Fees & Codes

Fees

- Authorized users can sign in to Test Prices for detailed fee information.
- Clients without access to Test Prices can contact Customer Service 24 hours a day, seven days a week.
- Prospective clients should contact their account representative. For assistance, contact Customer Service.

Test Classification

This test was developed and its performance characteristics determined by Mayo Clinic in a manner consistent with CLIA requirements. It has not been cleared or approved by the US Food and Drug Administration.

CPT Code Information

88271 x 2, 88275, 88291-FISH Probe, Analysis, Interpretation; 1 probe set
88271 x 2, 88275-FISH Probe, Analysis; each additional probe set (if appropriate)

LOINC® Information

Test ID	Test Order Name	Order LOINC® Value
HEMMF	Hematologic Specified FISH	In Process

Result ID	Test Result Name	Result LOINC® Value
614267	Result Summary	50397-9
614268	Interpretation	69965-2
614269	Result Table	93356-4
614270	Result	62356-1
GC117	Reason for Referral	42349-1
GC118	Probes Requested	78040-3
GC119	Specimen	31208-2
614271	Source	31208-2
614272	Method	85069-3
614273	Additional Information	48767-8
614274	Disclaimer	62364-5
614275	Released By	18771-6