

TSS:

Carcinoma, infiltrating duct, NOS 8500/3
Path Site Code: breast, upper outer quadrant C50.4
CQCF site: breast, NOS C50.9

12/29/10
lw

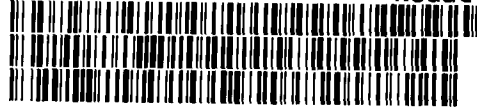
TSS:

SPECIMENS:

- A. SENTINEL LYMPH NODE #1 LEFT AXILLA
- B. SENTINEL LYMPH NODE #2 LEFT AXILLA
- C. SENTINEL LYMPH NODE #3 LEFT AXILLA
- D. SENTINEL LYMPH NODE #4 LEFT AXILLA
- E. LEFT BREAST
- F. ADDITIONAL SKIN UPPER SUPERIOR FLAP
- G. RIGHT BREAST

UUID:539FF792-534D-401D-87A6-B3B7C2BC2EFC
TCGA-E2-A1B6-01A-PR

Redacted



SPECIMEN(S):

- A. SENTINEL LYMPH NODE #1 LEFT AXILLA
- B. SENTINEL LYMPH NODE #2 LEFT AXILLA
- C. SENTINEL LYMPH NODE #3 LEFT AXILLA
- D. SENTINEL LYMPH NODE #4 LEFT AXILLA
- E. LEFT BREAST
- F. ADDITIONAL SKIN UPPER SUPERIOR FLAP
- G. RIGHT BREAST

INTRAOPERATIVE CONSULTATION DIAGNOSIS:

TPA-TPD: sentinel nodes #1-#4, left axilla: All negative for tumor cells on touch prep, called to Dr. at by Dr.

GROSS DESCRIPTION:

- A. SENTINEL LYMPH NODE #1 LEFT AXILLA
Received fresh labeled with the patient's identification of a fragment of beige tan soft tissue measuring 1 x 1 x 0.3 cm. Touch preparations are performed. The entire specimen is submitted in cassette A1.
- B. SENTINEL LYMPH NODE #2 LEFT AXILLA
Received fresh labeled with the patient's identification of a fragment of beige tan soft tissue measuring 1 x 1 x 0.3 cm. Touch preparations are performed. The entire specimen is submitted in cassette B1 and B2.
- C. SENTINEL LYMPH NODE # 3 LEFT AXILLA
Received fresh labeled with the patient's identification are two possible lymph nodes measuring 0.5 x 0.5 x 0.2 cm each. Both lymph nodes are entirely submitted separately in C1 and C2.
- D. SENTINEL LYMPH NODE # 4 LEFT AXILLA
Received fresh labeled with the patient's identification of a fragment of beige tan soft tissue measuring 0.7 x 0.7 x 0.5 cm. Touch preparations are performed. The entire specimen is submitted in cassette D1.
- E. LEFT BREAST
Received fresh labeled with the patient's identification and designated "Part E., left breast" is an orientated 399g, 18 x 17 x 3 cm mastectomy specimen with a 5.2 x 3.3 cm skin ellipse, and 1.2cm everted nipple. Ink code: Anterior/superior-blue, anterior/inferior-orange, posterior-black. Specimen is serially sectioned into 9 slices from medial to lateral with nipple in slice 3 revealing a 3.5 x 3.1 x 2 cm firm beige spiculated mass at the 12 o'clock position (slices 5-7) closest to the anterior margin at 0.9cm and located 2.2cm from the deep margin. Tissue is procured. Representatively submitted:
 - E1: Perpendicular sections, nipple
 - E2: Bisected nipple base
 - E3: Sections of skin
 - E4: Tumor, slice 5
 - E5-E8: Tumor, slice 6
 - E9: Overlying deep margin, slice 6
 - E10: Tumor, slice 7
 - E11: Tumor and closest anterior margin, slice 7
 - E12: Additional tumor, slice 7
 - E13: Upper outer quadrant
 - E14: Lower outer quadrant
 - E15: Upper inner quadrant
 - E16: Lower inner quadrant
- F. ADDITIONAL SKIN UPPER SUPERIOR FLAP
Received in formalin in a container labeled with the patient's identification is a brown tan crescent shaped excision of skin measuring 6.1 x 2.5 x 0.3 cm. A suture designates superior. The specimen is

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inked as follows: Superior-blue, inferior-orange, deep-black. The surface of the skin demonstrates no obvious gross abnormality. The specimen is serially sectioned from medial to lateral and submitted entirely for microscopic evaluation. Cassettes are submitted as follows:

F1: Medial tip

F2-F6: Serial sections

F7: Lateral tip

G. RIGHT BREAST

Received fresh labeled with the patient's identification and "Right Breast-Stitch marks axillary tail" is an oriented 339g, 23 x 14 x 3cm simple mastectomy with 5 x 3cm tan pink skin ellipse, and a 1.3cm centrally located, raised nipple. Ink Code: Anterior-Superior: Blue, Anterior-Inferior: Orange, Posterior: Black. The specimen is serially sectioned from lateral to medial into 15 slices. The nipple is located in slice 12. The cut surfaces reveal a blue dome cyst 0.8 x 0.4cm in the LC of slice 12, more than 1cm from the closest deep margin. No lesions are grossly identified. Representative sections are submitted as follows:

G1: nipple slice 12

G2: skin slice 12

G3: UOQ slice 8

G4: UOQ slice 9

G5: LOQ slice 7

G6: LOQ slice 10

G7: blue dome cyst LC slice 12

G8: LC with inferior margin slice 12

G9: UC slice 12

G10: UIQ slice 13

G11: UIQ slice 14

G12: LIQ slice 13

G13: LIQ slice 14

DIAGNOSIS:

A. SENTINEL LYMPH NODE #1, LEFT AXILLA, BIOPSY:

- ONE LYMPH NODE, NO TUMOR SEEN (0/1).

B. SENTINEL LYMPH NODE #2, LEFT AXILLA, BIOPSY:

- ONE LYMPH NODE, NO TUMOR SEEN (0/1).

C. SENTINEL LYMPH NODE #3, LEFT AXILLA, BIOPSY:

- TWO LYMPH NODES, NO TUMOR SEEN (0/2).

D. SENTINEL LYMPH NODE #4, LEFT AXILLA, BIOPSY:

- ONE LYMPH NODE, NO TUMOR SEEN (0/1).

E. BREAST, LEFT, MASTECTOMY:

- INVASIVE DUCTAL CARCINOMA, POORLY DIFFERENTIATED
(SBR GRADE 3) (SEE NOTE).

- TUMOR MEASURES 3.5 CM IN GREATEST DIMENSION.

- MARGINS, FREE OF TUMOR.

- DUCTAL CARCINOMA IN SITU (DCIS), SOLID TYPE, NUCLEAR GRADE 3,
WITH NECROSIS, MICROCALCIFICATIONS AND ASSOCIATED
LYMPHOID INFILTRATE.

- SKIN AND NIPPLE, NO TUMOR SEEN.

NOTE: Biomarkers and lymphovascular invasion status will be reported in an addendum.

F. SKIN, UPPER SUPERIOR FLAP, EXCISION:

- BASAL CELL CARCINOMA, SUPERFICIAL TYPE (SEE NOTE).

- MARGINS, FREE OF TUMOR.

NOTE: The basal cell carcinoma is focally 2 mm from the superior margin.

G. BREAST, RIGHT, PROPHYLACTIC MASTECTOMY:

- SMALL FIBROADENOMA, PSEUDOLACTATIONAL CHANGE, APOCRINE

TSS:

METAPLASIA, STROMAL FIBROSIS, AND MICROCALCIFICATIONS.
- BENIGN SKIN AND NIPPLE.

SYNOPTIC REPORT - BREAST

Specimen Type: Mastectomy

Needle Localization: No

Laterality: Left

Invasive Tumor: Present

Multifocality: No

WHO CLASSIFICATION

Invasive ductal carcinoma, NOS 8500/3

Tumor size: 3.5cm

Tumor Site: 12:00

Margins: Negative

Distance from closest margin: 0.5cm

anterior superior

Tubular Score: 3

Nuclear Grade: 3

Mitotic Score: 3

Modified Scarff Bloom Richardson Grade: 3

Necrosis: Present

Lobular neoplasia: None

Lymph nodes: Sentinel lymph node only

Lymph node status: Negative 0 / 5

DCIS present

Margins uninvolved by DCIS : 0.5cm from anterior superior margin

DCIS Quantity: Estimate 40%

DCIS Type: Solid

DCIS Location: Associated with invasive tumor

Nuclear grade: High

Necrosis: Present

Location of CA++: DCIS

Pathological staging (pTN): pT 2 N 0

CLINICAL HISTORY:

None given

PRE-OPERATIVE DIAGNOSIS:

None given

ADDENDUM:

NOTE: A CD31 stain was performed on block E6 and is negative, showing no evidence of lymphovascular invasion.

SYNOPTIC REPORT - BREAST, ER/PR RESULTS

Specimen: Surgical Excision

Block Number: E10

ER: Negative Allred Score: 0 = Proportion Score 0 + Intensity Score 0

PR: Negative Allred Score: 0 = Proportion Score 0 + Intensity Score 0

COMMENT:

The Allred score for estrogen and progesterone receptors is calculated by adding the sum of the proportion score (0 = no staining, 1 = <1% of cells staining, 2 = 1 - 10% of cells staining, 3 = 11-30% of cells staining, 4 = 31-60% of cells staining, 5 = >60% of cells staining) to the intensity score (1 = weak intensity of staining, 2 = intermediate intensity of staining, 3 = strong intensity of staining), with a scoring range from 0 to 8.

ER/PR positive is defined as an Allred score of >2 and ER/PR negative is defined as an Allred score of less than or equal to 2.

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METHODOLOGY:

Tissue was fixed in 10% neutral buffered formalin for no less than 8 and no longer than 24 hours. Immunohistochemistry was performed using the mouse anti-human ER (ER 1D5, 1:100) and PR (PGR 136, 1:100) provided by Dako following the manufacturer's instructions. This assay was not modified. Interpretation of the ER/PR immunohistochemical stain is guided by published results in the medical literature, information provided by the reagent manufacturer and by internal review of staining performance.

SYNOPTIC REPORT - BREAST HER-2 RESULTS

Specimen: Surgical Excision

Block Number: E10

Interpretation: EQUIVOCAL

Intensity: 2+

% Tumor Staining: 15%

Fish Ordered: Yes, on Date

METHODOLOGY:

Tissue was fixed in 10% neutral buffered formalin for no less than 8 and no longer than 24 hours. Her2 analysis was performed using the FDA approved Dako HercepTest (TM) test kit C using rabbit anti-human HER2. This assay was not modified. External kit-slides provided by the manufacturer (cell lines with high, low and negative HER2 protein expression) and in-house known HER2 amplified control tissue were evaluated along with the test tissue. Adequate, well preserved, clear-cut invasive carcinoma was identified for HER2 evaluation. Interpretation of the HER2 immunohistochemical stain is guided by published results in the medical literature, information provided by the reagent manufacturer and by internal review of staining performance.

This assay has been validated according to the joint recommendations and guidelines from ASCO and CAP and from the NCCN HER2 testing in Breast Cancer Task Force. The Pathology Department takes full responsibility for this test's performance. PathVysion HER-2 DNA Probe Kit

Case No

Analytical Interpretation of Results: HER-2 NOT AMPLIFIED

Clinical Interpretation of results

Amplification of the HER-2 gene was evaluated with interphase fluorescence in-situ hybridization (FISH) on formalin-fixed paraffin embedded tissue sections using a chromosome 17 centromeric probe and a HER-2 probe that spans the entire HER-2 gene in the by Dr. A majority of tumors cells displayed 2 chromosome 17

signals and 2 HER-2 signals, with a HER-2/CEP 17 Ratio ≤ 2.0 , consistent with no amplification of the HER2/neu gene.

Block used E10 Source of case:

Tissue fixation formalin-fixed tissue Outside Case No: NA

Tissue source breast Results interpreted: yes

HER2/CEP17 ratio: 1.03

This ratio is derived by dividing the total number of LSI HER-2/neu signals by the total number of CEP17 signals in at least 20 interphase nuclei with nonoverlapping nuclei in the neoplastic mammary epithelial cells. Cells with no signals or with signals of only one color are disregarded.

Method of ratio enumeration: manual count

Limitations

The Vysis PathVysion Kit is not intended for use to screen for or diagnose breast cancer. It is intended to be used as an adjunct to other prognostic factors currently used to predict disease-free and overall survival in stage II, node-positive breast cancer patients. In making decisions regarding adjuvant CAF treatment, all other available clinical information should also be taken into consideration, such as tumor size, number of involved lymph nodes, and steroid receptor status.

No

treatment decision for stage II, node-positive breast cancer patients should be based on HER-2/neu gene amplification status alone.

Overview of this test

FDA APPROVED REAGENT

PathVysion HER-2 DNA Probe Kit is FDA approved for selection of patients for whom Herceptin® therapy is being considered. These tests were performed in the

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under the direction
of Dr. The results of these studies should always be interpreted in the context of the
clinical, morphological, and immunophenotypic diagnosis.

Gross Dictation: Pathologist,
Microscopic/Diagnostic Dictation: Pathologist, 1
Final Review: Pathologist,
Final Review: Pathologist,
Final: Pathologist, C
Addendum: Pathologist,
Addendum Final: Pathologist,
Addendum: Pathologist,
Addendum Final: Pathologist.

Criteria	Yes	No
Diagnosis Discrepancy		/
Primary Tumor Site Discrepancy		/
HIPAA Discrepancy		/
Prior Malignancy History		/
Dual/Synchronous Primary Noted		/
Case is (circle): <u>QUALIFIED</u> <u>DISQUALIFIED</u>		
Reviewer Initials: <u>[Signature]</u> Date Reviewed: <u>2/12/10</u>		