

## **Exercise 1**

### **HISTORY & PHYSICAL EXAMINATION**

**HISTORY:** Patient is a 56-year-old female with a history of classical Hodgkin lymphoma, nodular sclerosing type back in 2002. Patient has been disease free for the past seven years. The patient presents today due to cervical adenopathy. Over the last six months the patient has lost 10 pounds, had a low-grade fever, and experienced some night sweats.

**FAMILY HISTORY:** N/A

**SOCIAL HISTORY:** Patient denies any personal history of smoking or alcohol use.

**PHYSICAL EXAMINATION:** Physical exam is unremarkable except for significantly enlarged palpable tender left supraclavicular lymph nodes measuring more than 2.5 cm. No axillary lymphadenopathy. Heart and lungs and abdomen are unremarkable. No edema of the legs. All other systems are normal.

### **IMAGING**

*11/21/2011* CT scan of chest: Multiple soft tissue densities in the bilateral supraclavicular areas. Suspect lymphoma.

*11/21/2011* CT abdomen/pelvis: Unremarkable.

*11/23/2011* Echocardiogram: Normal function and ejection fraction.

### **LABORATORY**

CBC: Hemoglobin 9.2, platelet count 596,000.

PT/PTT, electrolytes, BUN and creatinine are normal. Alkaline phosphatase is 130. Total protein is 9.4.

### **PROCEDURES**

*11/23/2011* Excisional biopsy of left cervical node

### **PATHOLOGY**

*11/23/2011*

FINAL DIAGNOSIS:

Final pathologic diagnosis: Follicular lymphoma, grade 2

### **ONCOLOGY**

*1/12/2012*

Patient has completed two courses of CHOP+rituximab.

| FIELD NAME                 | CODE | RATIONALE/DOCUMENTATION |
|----------------------------|------|-------------------------|
| Patient Name               |      |                         |
| Diagnosis Date             |      |                         |
| Primary Site               |      |                         |
| Histology                  |      |                         |
| Behavior                   |      |                         |
| Sequence                   |      |                         |
| Grade                      |      |                         |
| Grade system type          |      |                         |
| Grade system value         |      |                         |
| Lymph-vascular<br>invasion |      |                         |
| CS Mets at Dx - Bone       |      |                         |
| CS Mets at Dx - Lung       |      |                         |
| CS Mets at Dx - Liver      |      |                         |
| CS Mets at DX - Brain      |      |                         |
| CS Tumor Size              |      |                         |
| CS Extension               |      |                         |
| CS Tumor Size/Ext Eval     |      |                         |
| CS Lymph Nodes             |      |                         |
| CS Lymph Nodes Eval        |      |                         |
| Regional Nodes<br>Positive |      |                         |
| Regional Nodes<br>Examined |      |                         |

CS Mets at Dx

CS Mets Eval

CS Site-Specific Factor 1

CS Site-Specific Factor 2

CS Site-Specific Factor 3

CS Site-Specific Factor 4

CS Site-Specific Factor 5

Diagnostic Staging  
Procedure

Surgery of Primary Site

Scope of Regional  
Lymph Node Surgery

Chemotherapy

Hormone

Immunotherapy

## Hematopoietic case, #2

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### PROGRESS NOTE, #1

01/22/2011

Reason for Visit and Comments: Blood disorder follow-up

Additional Progress Note:

The patient is a 73-year-old female who is seen for evaluation of chronic lymphocytic leukemia.

Review of patient's past medical history indicates:

Mixed hyperlipidemia

Comment: hyperlipidemia

Post-menopausal hormonal replacement

Relative lymphocytosis

Chronic lymphatic leukemia no mention remission

Comment: Chronic lymphatic leukemia diagnosed by flow and bone marrow in January 2011 was c/w b-cell CLL.

Review of Systems: WNL

WBC (x10)

| Date       | Value | Low | High | Status |
|------------|-------|-----|------|--------|
| 12/11/2008 | 12.7* | 3.9 | 11.6 |        |
| 10/02/2008 | 10.6  | 3.9 | 11.6 |        |

HGB (g/dl)

| Date       | Value | Low  | High | Status |
|------------|-------|------|------|--------|
| 12/11/2008 | 14.0  | 11.9 | 16.1 |        |
| 10/02/2008 | 14.4  | 11.9 | 16.1 |        |

HCT (%)

| Date       | Value | Low | High | Status |
|------------|-------|-----|------|--------|
| 12/11/2008 | 42    | 35  | 47   |        |
| 10/02/2008 | 41    | 35  | 47   |        |

MCV (um)

| Date       | Value | Low | High | Status |
|------------|-------|-----|------|--------|
| 12/11/2008 | 94.0  | 80  | 100  |        |
| 10/02/2008 | 92.8  | 80  | 100  |        |

PLTS (x10)

| Date       | Value | Low | High | Status |
|------------|-------|-----|------|--------|
| 12/11/2008 | 271   | 140 | 440  |        |
| 10/02/2008 | 237   | 140 | 440  |        |

Physical Exam: WNL

CSv2 Training Materials

## Hematopoietic case, #2

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### Impression:

Chronic lymphocytic leukemia with no need for chemotherapy now. Risks and benefits of chemotherapy were discussed in detail. When WBC rises to 80,000 or so will consider chemotherapy then. She does not get frequent infections and does not require iv'ing now.

### **PROGRES NOTE, #2: TELEPHONE**

01/03/2011

Reason for Call: Telephone—patient questions  
Please call patient with results of bone marrow biopsy.

Date: 01/04/2011

Called patient. Positive for chronic lymphocytic leukemia.

### **PROGRESS NOTE, #3**

10/03/2010

### Patient Education:

Patient/guardian verbalized understanding of instructions. Post procedure handouts given and reviewed. Verbal instructions given to patient.

### Subjective:

She is here for follow-up on her blood work. She reports she has been having some blood test every 3-4 months to monitor her CBC closely. She states did not see any until last year that she began seeing the physician.

She says because of dental work she was not able to eat as much as she used to eat, lost some weight for a while then became stable. Good appetite. No night sweats, no f/c, no abdominal pain, no back pain, no skin itchiness.

Review of patient's past medical history indicates mixed hyperlipidemia

Comment: Hyperlipidemia

Post menopausal hormonal replacement; relative lymphocytosis.

Physical: WNL

WBC Disease NEC (primary encounter diagnosis):

Note: reviewed chart; lymphocytosis since September of 2010; consider myeloplasmic syndrome? Leukemia?; patient is not anemic and normal wbc.

Plan: Consult, hematology

Hyperlipidemia NEC/NOS

Note: reviewed her lipid

Plan: low cholesterol/Tg diet

## Hematopoietic case, #2

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### LAB

#### Bone Marrow

##### Bone Marrow Clinical Information:

The patient is a 73-year-old female with mild lymphocytosis. No CBC is available for review. The specimen is taken from the left posterior iliac crest.

##### Bone Marrow Peripheral Blood:

Differential Count: Segs 42%, Baso 1%, Monos 7%, Lymphs 50%

Blood Smear: The white blood cells show a lymphocytosis. The lymphocytes comprise a heterogeneous population, and are predominantly mature. The red blood cells appear normocytic and normochromic. Platelets appear to be decreased in number and normal in morphology.

##### Bone Marrow Microscopic Description:

###### Aspiration smear:

Myeloblast 0.5(0.1-1.7) RBC (15.0-36.2) Lympho 31.6 (8.6-23.8)

Promyelo 1.7 (1.9-4.7) Pro 0.5 (0.1-1.1) Plasma 0 (0.0-3.5)

Myelo 3.5 (8.5-16.9) Baso 1.2 (0.4-2.4) Mono 0.3 (0.0-0.6)

Band 10.2 (9.4-15.4) Ortho 7 (0.3-3.7)

###### Other:

Seg 21.7 (3.8-11.0)

Eos 1.8 (1.1-5.2)

Baso 0 (0.0-0.2)

M;E Ratio 2.11 (1.1-3.5)

##### Morphologic Summary:

The bone marrow aspirate is an adequate specimen. There is trilineage hematopoiesis. The myeloid and erythroid precursors show complete and synchronous maturation. Megakaryocytes are identified and are normal in morphology. Lymphocytes are slightly increase in percentage of nucleated cells (31.7%).

##### Histologic Section: (Clot Section and/or Biopsy)

The bone marrow clot section is an adequate specimen. There is trilineage hematopoiesis and increased numbers of mature-appearing lymphocytes. The bone marrow core biopsy is an adequate specimen. There is significant hemorrhage. However, the specimen appear hypercellular for age with a cellularity of approximately 50%. There are clusters of small lymphoid cells present in the interstitium and focally in a paratrabecular location.

##### Bone Marrow Final Diagnosis:

Peripheral blood smear: Lymphocytosis

Bone marrow aspirate, particulate clot section and bone marrow core biopsy:

Hypercellular bone marrow with trilineage hematopoiesis and involvement by chronic lymphocytic leukemia/small lymphocytic lymphoma.

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