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Austin Redilla
George Ye
Catherine Tucker, MD
Christopher Gardner
Guldeep Uppal, MD

See next page for additional authors

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Authors
Austin Redilla; George Ye; Catherine Tucker, MD; Christopher Gardner; Guldeep Uppal, MD; and Adam F. Binder, MD
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Austin Redilla, Xiangyun Ye, Catherine Tucker, MD, Christopher Gardner, Guldeep Uppal, MD and Adam F. Binder, MD*

(*) indicates primary project advisor
(***) indicates another student who is declaring the same project as primary for SI
Introduction & Objectives

• Excisional biopsy is the **gold standard** in diagnosis of suspected lymphomas

• Core Needle Biopsy (CNB) offers an alternative
  – Less expensive
  – Non-invasive
  – Fewer procedural risks

• We want to evaluate the accuracy of CNB at TJUH to provide guidance for initial workup of suspected lymphoma
Objectives & Hypothesis

• Research Question
  – What is the diagnostic accuracy of excisional and core needle biopsies at Thomas Jefferson University Hospital?

• Hypothesis
  – We expect CNB will be similar in diagnostic ability to excisional biopsy in the diagnosis of lymphomas.
Approach & Results

• Medical chart review of all suspected new diagnosis of lymphomas at Thomas Jefferson University
• January 1st, 2016 to December 31st, 2019
• All CNB and Excisional biopsies in these patients will be reviewed
  – Cases from outside hospitals referred to Jefferson were excluded
• Type of biopsy
  – Site
  – Additional CNB or excisional biopsies, if applicable
  – Final pathologic diagnosis
  – Ancillary studies used (immunohistochemistry, FISH, etc)
• Data obtained from Thomas Jefferson University pathology labs
• Adequacy and diagnostic odds ratio will be calculated for CNB and excisional biopsies
Approach and Results

• 457 cases reviewed; 339 excisional and 118 CNB
  – Excisional biopsy was adequate 97% of the time, while CNB was adequate 58%
  – CNB found to have a diagnostic odds ratio of 0.03583
• Inadequate CNB samples were found regardless of needle size
• Most common CNB sites (axillary, inguinal, supraclavicular) are easily accessible for excision
Conclusions

- Excisional biopsy should remain standard of care for initial diagnosis of lymphoma
- Use of CNB has been increasing at Jefferson from 19% in 2016 to 31.6% in 2018
  - 27.7% in 2019
- We would like to find a way to reduce these numbers
Future Directions

- A QI project is underway
- Goals:
  - Understand the reasons for ordering CNB or excisional biopsy
  - Educate the key providers involved
- Variables being considered:
  - Was surgery involved? Oncology?
  - Inpatient vs Outpatient
  - Suspected diagnosis prior to biopsy
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