



Clinical Laboratories

Colorado, USA

117809.394 Anatomic Pathology Guidelines

Copy of version 4.0 (approved and current)

**Last Approval or
Periodic Review Completed** 11/14/2021

Controlled Copy ID 373386

Location Test Catalog

**Next Periodic Review
Needed On or Before** 11/14/2023

Organization Highlands Ranch

Effective Date 11/14/2019

Author

Stephanie Allen

Comments for version 4.0

Added cytology exclusions, changed formalin to tissue ratio and added step 2f.

Approval and Periodic Review Signatures

Type	Description	Date	Version	Performed By	Notes
Periodic review	Designated Reviewer	11/14/2021	4.0	Carol Dittmann MD, MT(ASCP)	
Approval	Lab Director	11/14/2019	4.0	Carol Dittmann	
Approval	Pathologist Review	11/13/2019	4.0	Lian Zhang	
Approval	Lab Manager	11/13/2019	4.0	Sarah Miller	
Approval	Lab Director	11/1/2019	3.0	Carol Dittmann	
Approval	Pathologist Review	10/28/2019	3.0	Lian Zhang	
Approval	Lab Manager	10/27/2019	3.0	Sarah Miller	
Approval	Lab Director	7/22/2019	2.0	Carol Dittmann	
Approval	Pathologist Review	7/22/2019	2.0	Lian Zhang	
Approval	Manager	7/19/2019	2.0	Sarah Miller	
Approval	Lab Director	7/1/2019	1.0	Carol Dittmann	
Approval	Pathologist Review	7/1/2019	1.0	Lian Zhang	
Approval	Lab Manager	6/28/2019	1.0	Sarah Miller	
Approval	Manager	6/28/2019	1.0	Sarah Miller	

Version History

Version	Status	Type	Date Added	Date Effective	Date Retired
---------	--------	------	------------	----------------	--------------

4.0	Approved and Current	Major revision	11/4/2019	11/14/2019	Indefinite
3.0	Retired	Major revision	7/30/2019	11/1/2019	11/14/2019
2.0	Retired	Major revision	7/5/2019	7/22/2019	11/1/2019
1.0	Retired	Initial version	4/25/2019	7/1/2019	7/22/2019

117809.394.Anatomic Pathology Guidelines, Version 4.0.

Department of Pathology- Histology

Anatomic Pathology Guidelines

Purpose

The following guidelines delineate how specimens are received. Specific processing requirements for histological processing and examination at UC Health Highlands Ranch Hospital Histology Laboratory are described.

All tissue, appliances, or foreign bodies removed from a patient are sent to Pathology for examination with exceptions as noted in Tables 1&2 in the resource below.

Medico-legal foreign body: bullets, etc., removed intraoperatively should follow surgery protocol for chain of custody.

Policy

1. Specimen labeling
 - a. All specimens must have at least two patient identifiers (name, MRN, and/or date of birth) and specimen site on the side of the container.
 - b. All specimens are accompanied by a surgical pathology requisition, which includes patient name, medical record number, age, surgeon, specimen site, collecting time and date, pre-op diagnosis, and any relevant history.
 - i. Additional specific studies such as but not limited to microbiology culture, lymphoma protocol, or cytogenetics, if desired, must be stated on the surgical pathology requisition.
 - c. For all specimens delivered to pathology, a patient label with the same demographics as the specimen and requisition must be placed in the Pathology Receipt of Specimens Log, upon specimen arriving, by the staff delivering and receiving the specimen.
 - i. After hours, the storage location of the specimen will be documented in the Pathology Receipt of Specimens Log by the lab staff.
2. Routine Surgical Specimens
 - a. Pathology specimens are brought to Specimen Processing window at any time or the frozen section room from 8:00 am to 4:00 pm.
 - i. After hours, all specimens are brought directly to the Specimen Processing window.
 - ii. Lab processing staff will distribute specimens to the appropriate location.
 - iii. It is important that fresh specimens are delivered as soon as possible
 - iv. Formalin fixed tissue should be brought to the lab in a timely manner to facilitate processing.
 - b. Specimens are received fresh or in the appropriate fixative
 - i. When possible there should be a 10:1 formalin to tissue ratio.
 - ii. If specimen floats place paper towel soaked in formalin on top of the specimen.
 - c. Specimens should be transported in a manner that prevents exposure of health care personnel to chemicals, blood, body fluids, or other infectious materials and ensures confidentiality of personal health information.
 - d. If there is a question about whether a specimen should be placed in formalin, the pathologist should be consulted.
 - e. The specimen is accessioned by the Histology lab staff following the Accessioning Procedure.
 - f. Specimens with different anatomic locations should be submitted to pathology in separate containers.
3. Intra-Operative Consultation and Frozen Section Diagnosis specimens
 - a. Frozen section and/or intra-operative consultation must be stated on

- accompanying surgical pathology requisition
 - b. Specimens for frozen section diagnosis and/or intraoperative consultation are delivered fresh to the frozen section lab within the OR or the specimen processing window.
 - c. OR staff notifies frozen section room by phone/vocera as the specimen leaves the OR to be delivered to the Frozen Section Lab.
 - d. A verbal diagnosis is given by phone or face-to-face conversation directly to the surgeon by the pathologist, after verifying patient identification.
 - e. Once the frozen section report is complete the specimen(s) will be processed as a routine specimen. Frozen remnant is submitted for permanent processing the same as routine surgical tissue blocks
4. For all specimens requiring specific tests, requested tests must be stated in accompanying requisition.
- a. Cytology specimens:
 - i. Tissue must be fresh or in cytolyt solution.
 - ii. Specimen must be delivered to the lab within 60 minutes of collection.
 - b. FNA procedure requiring on site evaluation
 - i. Call histology to request on site cytology evaluation, including time and site of procedure.
 - c. Lymphoma protocol
 - i. Tissue must be fresh.
 - ii. Pathologist should be notified and consulted for every case requesting lymphoma protocol.
 - d. Tissues requiring microbiology cultures
 - i. Tissue must be fresh.
 - ii. Specimen must be delivered to the lab within 60 minutes of collection.
 - e. Medical renal biopsy
 - i. If EM studies are required, submit tissue in glutaraldehyde.
 - ii. If Immunofluorescence is required, submit tissue in Michele's Medium (Zeus).
 - f. Stone analysis
 - i. Stones must be fresh.
 - ii. Stones must be drained of any liquid prior to sending out.
 - g. EM studies
 - i. Specimen must be submitted in glutaraldehyde.
 - h. Cytogenetics
 - i. Specimen must be received fresh in a sterile container.
 - ii. Pathologist should be notified and consulted for every case requesting cytogenetics
 - i. Specimens with history of breast cancer
 - i. Collection time and cold ischemic time (the time between collection and when the specimen is placed in formalin) must be documented on the requisition.
 - ii. Specimens must be delivered to pathology within 50 minutes of removal from body and placed into formalin within 60 minutes of removal from the body.
 - j. Products of Conception
 - i. If genetic testing is requested, follow guidelines above for cytogenetics or submit sections of interest (placenta or chorionic villi) in a sterile container separate from the remainder of the specimen.
 - ii. Laboratory disposition is not available for any fetal tissue. See procedure 117809.110 regarding information on disposal of fetal tissue.
 - k. Amputated limbs
 - i. Specimen should be sealed in a biohazard plastic bag if too large for specimen container.

- ii. The biohazard bag should be labeled with a patient label and sent to pathology with a requisition.
 - 1. This applies to both surgically and traumatically removed limbs.
- iii. Patient should sign an Extremity Disposal Permit, if possible.
- iv. In the absence of pathology staff, the limb should be placed in the pathology refrigerator.
 - 1. If the limb is too large, it must be refrigerated in the morgue.
 - 2. Storage location must be documented on the Specimen Receipt Log.
- I. Specimens from patients with communicable diseases
 - i. While all specimens are considered potentially infectious and will be handled with universal precautions, pathology staff must be notified and the pathology requisition form should document when specimens are taken from a patient with a bloodborne disease.
 - 1. Including but not limited to: TB, HIV or Hepatitis B, Hepatitis C.
 - 2. Not doing so can be detrimental to the pathology staff.
- m. Foreign bodies.
 - i. Specimens are sent to pathology at the surgeon's request.

TABLE 1 – TISSUE REQUIRING LIMITED PATHOLOGIC EXAMINATION	
The following surgically removed specimens require only a gross examination. A microscopic examination may be performed upon request by the surgeon and/or the pathologist's discretion, as clinically indicated.	
General Surgery	Foreign body, i.e., IUD, wood, glass, tubes, non-urological stents, etc.
	Supernumerary digits
	Prosthetic valves unless porcine valve
Urology	Foreskins (age \geq 18 years old)
Orthopedic	Foreign body
	Acromion/distal clavicle
	Disc
Plastic Surgery	Foreign body
ENT	Auditory ossicles

TABLE 2 – TISSUE EXCLUDED FROM ROUTINE SUBMISSION FOR PATHOLOGY	
The following surgically removed specimens do not require any pathology examination. A gross and/or microscopic examination may be performed upon request by the surgeon and/or the pathologist's discretion, as clinically indicated.	
The laboratory requests that the surgeon document, in the medical record, his/her decision to submit, or not submit, any of the following specimens for pathologic examination.	
General Surgery	Redundant skin and subcutaneous tissue, except from breast of female or unless patient has a history of malignancy in the same anatomical area.
	Toenails not for diagnosis
	Foreign bodies removed from aero digestive tract
	Portion of rib removed for operative exposure
	Vein graft
	Dialysis graft
	Pacemakers
Batteries	
Urology	Penile foreskins (age <18 years old)
	Ureteral stents
	Penile prosthetic devices

	Stones (kidney, bladder, ECT., stone for analysis are ordered and sent to the clinical lab)
Orthopedic	Appliances and hardware
	Bunions
	Ligamentum flavum
	Meniscus
Plastic Surgery	Skin scars – unless patient has a history of malignancy in same anatomic area
	Redundant skin and subcutaneous tissue, except from female breast area
	Toenails
ENT	Bone and cartilage from nasal reconstruction (septoplasty)
OPHTH	Crystalline lens (cataracts)
	Eyelid skin from blepharoplasty
	Muscle from strabismus
OB/GYN	Placentas from normal deliveries
	Placentas from repeat C-section
	Placentas from C-sections for cephalopelvic disproportion
	Post C-section scar
	Vaginal mucosa from strictly structural repair
Dental	Teeth – unless associated with adherent soft tissue, cyst or tumor development
	Hard and soft tissue removed at time of reconstructive or orthognatic procedures
	Hardware
Medico-Legal Foreign Body	Bullets, etc., removed intraoperatively should follow surgery protocol for chain of custody

TABLE 3 – TISSUE THAT MAY BE EXCLUDED FROM CYTOPATHOLOGY	
The following cytology specimens may be excluded from cytological processing and review, if there is relevant clinical history to indicate that a specimen falls into the exclusion category. A microscopic examination may be performed upon request by the surgeon and/or the pathologist’s discretion, as clinically indicated.	
Body fluids for which pathology is not suspected or for which prior samples have been sent to cytopathology (CSF, plural, peritoneal, pericardial)	
Fluid samples derived by FNA, for which additional FNA procedure is performed on the same site or there is no suspected pathology (clear fluid derived from a breast cyst)	
Fluid samples with abundant blood contamination (in the opinion of the qualified party) that routine cytopathology examination would not be of use (e.g. hemoperitoneum).	

Notes

1. The pathology department requests that the surgeon documents, in the medical record, their decision to submit or not submit any specimen on this list for microscopic evaluation
2. The cytology department will make every effort to process all specimens that arrive with orders for cytology testing under the assumption that the submitting provider wishes for a full evaluation.
3. If the cytopathologist on service determines that an “exclusion specimen” has been received inappropriately, she or he may choose to notify and educate the submitting provider and receive consent to discard the specimen without processing.

References

- 1. CAP Anatomic Pathology Checklist ANP 10032
- 2. CAP Anatomic Pathology Checklist ANP 10016
- 3. CAP Anatomic Pathology Checklist ANP.11716
- 4. CAP All Common Checklist COM.06100
- 5. CAP All Common Checklist COM.06200
- 6. CAP General Checklist GEN.40492
- 7. CAP General Checklist GEN.40499
- 8. CAP Cytology Checklist CYP.01650