

VCS/ACVP OPWG Resident Cross-training Survey Results

Thank you to everyone who took the time to participate in this survey. The education committee spent a great deal of time formulating the questions and we appreciate your insights. Overwhelmingly, pathologists, oncologists and trainees value their interactions and want to strengthen their working relationship. Most respondents agree that increased exposure to the other discipline would achieve this goal. The challenge lies in how to accomplish this in a manner appropriate and realistic given the field of study and rigors of the respective programs. Clearly the matter requires further, likely animated, discussion. Hopefully the results presented below will facilitate this discourse.

Pathologist survey results

Respondent demographics: 42 total

59.5% (25) board certified anatomic pathologist
28.6% (12) board certified clinical pathologist
4.8% (2) board eligible anatomic residents
7.1% (3) clinical pathology residents

31% finished residency <5 years ago
60% finished residency >5 years ago

98% completed residency in academic setting

56.1% work in academia
31.71% work in private practice/commercial lab
2.44% industry/pharma
7.32% government agency
2.44% research only

Please describe your exposure to the oncology service during your residency training?

33 respondents
48.5% resident rounds
9% student rounds
36% teaching students/rounds
18% primary case responsibility, 15% new consults, 3% rechecks/chemo patients

12% < 1 week
0% 1-2 weeks
18% > 2 weeks
40% none of the above

What skills and knowledge did you obtain from this experience?

33 respondents

Most common responses:

Treatment options/plans, prognosis, clinical implications of pathologists' findings/reports, opportunity to learn about and communicate needs to improve yield

Do you believe you had adequate training in clinical oncology during your residency?

33 respondents

30% yes

70% no

Several respondents felt having clinical training in oncology was inappropriate or simply did not desire it. Others felt that increasing lines of communication mostly through rounds or case discussion to stay current on prognostication and diagnostics was important, but not treatments.

If applicable, please describe your current trainees' exposure to the oncology service.

19 respondents

Interactions ranged from optional rotation through the oncology service to none. Most indicated that residents attend oncology rounds with some institutions holding dedicated clin path rounds or joint courses for oncology and pathology residents.

Do you think more time on medical, surgical, and/or radiation oncology clinical rotation would be helpful?

33 respondents

70% yes

30% no

The respondents who advocated for increased exposure to oncology rotations thought it would be beneficial in terms of improving clinical knowledge base, collaboration between the two disciplines and directing comments on reports, but had concerns about time constraints/use of their trainee's time.

If yes to above, in what capacity?

35% observational

4% same as 4th year

39% same as small animal intern

21% other

What skills / knowledge should pathology residents acquire from their oncology exposure?

31 respondents

Most common responses included:

1. Understanding what oncologists need from the reports they receive and how they use the information
2. Clinical work-ups for different tumor types
3. Basic knowledge of treatment options and prognosis
4. Appreciation for communication-between pathology and oncology, oncologist and client

What percentage of your current weekly caseload involves oncology cases?

31 respondents

13% (4) <25%

29% (9) 25-50%

35.5% (11) 50-75%

16% (5) >75%

6.5%(2) not practicing

What type of questions do you receive most regarding oncology cases? Check all that apply

Diagnosis/tumor type 90%

Grade 61%

Margins 58%

Special stains 48%

Others added: mitotic index, molecular diagnostics, immunophenotyping, treatment/chemotherapy options

What type of exposure to pathology would you like oncology residents to obtain during their residency training? Check all that apply. 31 respondents

Necropsy pathology rounds	38.71%
Surgical pathology rounds	80.65%
Clinical pathology rounds	70.97%
Necropsy rotation/service	22.58%
Surgical pathology rotation/service	64.52%
Clinical pathology rotation/service	54.84%
Other (please specify)	22.58%

Respondents generally felt it important that oncology residents understand the method of tissue processing, what goes into a diagnosis and realistic expectations from a report, but stop short of in clinic examination/diagnosis. Some expressed a desire for oncology residents to have more involvement in necropsy rounds when their cases are being discussed.

In what capacity should oncology residents participate in pathology rotations/service?

31 respondents

Observational	58.06%
Same as 4th year veterinary students	19.35%
Same as pathology residents	16.13%
Other (please specify)	19.35%

Most respondents advocated for limited exposure to pathology service/rotations unless the individual has particular interest.

What skills would you like oncology residents to acquire from their pathology exposure during residency?

28 respondents

Most common concerns in no particular order:

1. Proper sample submission/preparation-history, orientation of surgical margins
2. Understanding limitations and complexity of cytology and histopathology
3. MARGINS-what they mean, how they are obtained
4. Basic knowledge of tumor types and diagnostic criteria
5. Understanding of sample processing

Oncology Survey

Respondent demographics: 31 total

- Board certified medical oncology 90.32%
- Board eligible medical oncologist 3.23%
- Medical oncology resident 6.45%
- Radiation oncology 3.23%
- Finished residency >10 yo 46.67%
- Academic residency 76.67%
- Currently work in private practice 53.3% vs academia 46.7%

Answers to Questions

Please describe your exposure to clinical pathology during your residency. Include total number of weeks, format (e.g. courses, service time), responsibilities, etc. Mark all that apply and provide additional information in the text box below.

- Reading cytology 76%
- Resident rounds 70%
- Reading and interpreting hematology 50%
- >2 weeks 53.3%
- 1-2 weeks 26.7%
- Less than 1 week 6.7%

Please describe your exposure to anatomic pathology during your residency. Include total number of weeks, format (e.g. courses, service time), responsibilities, etc. Mark all that apply and provide additional information in the text box below.

- Rounds/reading histopathology 83.3%
- Necropsy 50%
- Specimen trimming necropsy 10%
- Specimen trimming biopsy 10%
- > 2weeks 26.7%
- 1-2 weeks 46.67%
- < 1 week 13.3%

What skills and knowledge did you obtain from your clinical and anatomic pathology experience? Check all that apply.

- Improved recognition of cell features and criteria for cytological diagnoses 86%
- Microscopic description 72%
- Sample preparation 27.5%
- Writing pathology reports 17.2%

Do you believe you had adequate training in / exposure to pathology during your training?

- Yes 51%
- Justify Answer 34%
 - Many commented they could have more time/exposure to anatomic pathology
 - Clinical pathology learned on the “fly” during residency
 - More time with pathologist

As a practicing oncologist (medical, surgical, radiation), what skills in or exposure to pathology would you like to have had during your residency training? (Leave blank if you are a resident)

- 22 answered
- Tissue trimming and preparation
- IHC
- Reading/evaluating histology and cytology samples
- Some said training was adequate

If applicable, please describe your current trainees' exposure to clinical and anatomic/surgical pathology (leave blank if not applicable)

- 10 answered
- 1-2 weeks of cytology and 1-2 weeks for anatomic pathology
- Rounds
 - Weekly and biweekly
- Histology part of Master's requirement
- Meet GIG ACVIM requirements

If applicable, what skills would you like your trainees to acquire from their pathology exposure? (leave blank if not applicable)

- 9 answered
- Basic knowledge of cytology
- Know how to read/interpret histology reports
- Being comfortable calling and discussing reports with pathologists

What type of oncology exposure would you like clinical and anatomic pathology residents to receive during their residency training? Check all that apply.

- Oncology rounds 81.4%
- Medical oncology rotation 55.5%
- Surgical oncology rotation 37%
- Radiation oncology rotation 25.9%

In what capacity should pathology residents participate in the oncology service?

- Observational 37%
- Intern level 29.6%
- 4th year veterinary students 7.41%

What additional information, if any, would you like included on surgical biopsy and cytology reports?

- 25 answered
- Always have microscopic description
- No comments on biologic behavior and treatment—Concern this is not always correct, outdated, or adequate
- Margins, vascular invasion, MI
- Standardize mitotic index (/10hpf)
- Many were happy with their current pathologists

Please provide any additional comments regarding pathology exposure for oncology residents or oncology exposure for pathology residents.

- 25 Answered
- Interactive rounds for cytology, histopathology, and oncology
- Sample collection
- How results, grading, and recommendations effect treatment recommendations
- Many said “none”

Regardless of how it is accomplished, pathologists and oncologists value and wish to maintain/increase interdisciplinary communication.

Again, thank you for your participation!

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