

ACVR RO Residency Training Program Application

Submission ID	3922000024406473101
Submission Date	2018-01-19 15:27:28
Date of Application	01-19-2018
Your Name:	Koichi Nagata
Your Address:	2035 Timothy Rd, Apartment A103 Athens Georgia 30606
Your Email Address:	knagat@hotmail.com

Program Director(s): (Must be a Diplomate of ACVR Recognized Veterinary Specialty of Radiation Oncology)						
	First Name	Last Name	Title/Credentials	Email	Phone #	Number of weeks per year faculty member is available to resident on a daily basis
						Fax #
	Koichi	Nagata	BVSc	knagat@hotmail.com	706-202-7712	50
						n/a

Do you have additional radiation oncologists in support of the program?	no
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Please upload the CVs of the Program Director and any supporting Radiation Oncologists (if applicable).	Nagata CV 2017.doc
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Application is made for (check one):	Standard Program
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Primary Site:	The University of Georgia
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Hospital/University:	Veterinary Teaching Hospital
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Department:	College of Veterinary Medicine
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Address:	2200 College Station Rd Athens GA 30602																							
Cooperating Institution (if applicable):	n/a																							
What is the total length of the training program?	24																							
If greater than 2 years, will this period include 24 months of continuous training in radiation oncology?	No																							
Number of months dedicated solely to radiation oncology training (excluding time on Medical Oncology service, Radiology/Imaging, etc.)	20																							
Advanced Degree:		Yes	No	Optional																				
	Masters	-	✓	-																				
	PhD	-	✓	-																				
Upload calendar of resident's activities (24 or 36 month) including required rotations and vacations	uga resident calendar3.xlsx																							
Diagnostic Radiologist(s): (Must be Diplomate(s) of the ACVR or ECVI):	<table border="1"> <thead> <tr> <th>First Name</th> <th>Last Name</th> <th>Title/Credentials</th> <th>Number of weeks per year faculty member is available to resident on a daily basis</th> <th>Faculty Member on site (yes or no)?</th> </tr> </thead> <tbody> <tr> <td>Scott</td> <td>Secrest</td> <td>DVM, MS, DACVR (radiology)</td> <td>48</td> <td>yes</td> </tr> <tr> <td>Ajay</td> <td>Sharma</td> <td>VSCs&AH, MVSc, DVM, DACVR (radiology)</td> <td>48</td> <td>yes</td> </tr> <tr> <td>Karine</td> <td>Gendron</td> <td>DMW, DECVDI, DACVR (radiology)</td> <td>48</td> <td>yes</td> </tr> </tbody> </table>				First Name	Last Name	Title/Credentials	Number of weeks per year faculty member is available to resident on a daily basis	Faculty Member on site (yes or no)?	Scott	Secrest	DVM, MS, DACVR (radiology)	48	yes	Ajay	Sharma	VSCs&AH, MVSc, DVM, DACVR (radiology)	48	yes	Karine	Gendron	DMW, DECVDI, DACVR (radiology)	48	yes
First Name	Last Name	Title/Credentials	Number of weeks per year faculty member is available to resident on a daily basis	Faculty Member on site (yes or no)?																				
Scott	Secrest	DVM, MS, DACVR (radiology)	48	yes																				
Ajay	Sharma	VSCs&AH, MVSc, DVM, DACVR (radiology)	48	yes																				
Karine	Gendron	DMW, DECVDI, DACVR (radiology)	48	yes																				
If off-site, please explain relationship:	n/a																							
Diagnostic Radiologist Faculty CVs (if applicable)	GendronCV.docx Secrest CV.docx asharmaCV2p_2017.docx																							

Medical Oncologist(s): (Must be Diplomate(s) of the ACVIM, Specialty of Oncology:

First Name	Last Name	Title/Credentials	Number of weeks per year faculty member is available to resident on a daily basis	Faculty Member on site (yes or no)?
Nicole	Northrup	DVM, DACVIM (Oncology)	48	yes
Corey	Saba	DVM, DACVIM (Oncology)	48	yes
Travis	Laver	VMD, PhD, DACVIM (Oncology)	48	yes
Dawn	Clarke	DVM, DACVIM (Oncology)	48	yes

If off-site, please explain relationship:

n/a

Medical Oncologist Faculty CVs (if applicable)

[ClarkeDawn NIHBio 2018.doc](#)
[Laver CV UGA 2p.docx](#)
[Saba CV Dec 2017.docx](#)
[northrup new 2018 cv.doc](#)

Surgeon(s): (Must be Diplomate(s) of the ACVS:

First Name	Last Name	Title/Credentials	Number of weeks per year faculty member is available to resident on a daily basis	Faculty Member on site (yes or no)?
Steve	Budsberg	DVM, MS, DACVIS	48	yes
Kevin	Clarke	DVM, DACVS	48	yes
Janet	Grimes	DVM, MS, DACVS	48	yes
Spencer	Johnston	VMD, DACVS	48	yes
Mandy	Wallace	DVM, MS, DACVS	48	yes
Chad	Schmiedt	DVM, DACVS	48	yes

If off-site, please explain relationship:

n/a

**Pathologist(s): (Must be
Diplomate(s) of the ACVP:**

First Name	Last Name	Title/Credentials	Drop down	Number of weeks per year faculty member is available to resident on a daily basis	Faculty Member on site (yes or no?)
Cathy	Brown	VMD, PhD, DACVP	Anatomic Pathology	48	yes
Corrie	Brown	DVM, PhD, DACVP	Anatomic Pathology	48	yes
Melinda	Camus	DVM, DACVP	Clinical Pathology	48	yes
Bridget	Garner	DVM, PhD, DACVP	Clinical Pathology	48	yes
Nicole	Gottdenker	DVM, MS, PhD, DACVP	Anatomic Pathology	48	yes
Ian	Hawkins	DVM, MRCVS, DACPVP	Anatomic Pathology	48	yes
Elizabeth	Howerth	DVM, PhD, DACVP	Anatomic Pathology	48	yes
Marcia	Ilha	DVM, DACVP	Anatomic Pathology	48	yes
Paula	Krimer-Rollinson	DVM, DVSc, DACVP	Clinical Pathology	48	yes
Kristina	Meichner	DVM, DECVIM-CA, DACVP	Clinical Pathology	48	yes
Doris	Miller	DVM, PhD, DACVP	Anatomic Pathology	48	yes
Tamas	Nagy	DVM, PhD, DACVP	Anatomic Pathology	48	yes
Pauline	Rakich	DVM, PhD, DACVP	Anatomic Pathology	48	yes
Daniel	Rissi	DVM, MS, PhD, DCVP	Anatomic Pathology	48	yes
Kaori	Sakamoto	DVM, PhD, DACVP	Anatomic Pathology	48	yes
James	Stanton	DVM, PhD, DACVP	Anatomic Pathology	48	yes
Jaime	Tarigo	DVM, PhD, DACVP	Clinical Pathology	48	yes
Elizabeth	Uhl	DVM, PhD, DACVP	Anatomic Pathology	48	yes
Moges	Woldemeskel	DVM, PhD, DACVP	Anatomic Pathology	48	yes

If off-site, please explain relationship:

n/a

Please list all additional board certified specialists in direct support of the program. If offsite, please explain relationship:

Name	Certifying College/Board	Subspecialty (if applicable)	If offsite, please explain relationship
Frane Banovic	DECVD	dermatology	
Renee Barber	DACVIM	neurology	
Joseph Bartges	DACVIM	internal medicine	
Fiona Bateman	DACVD	dermatology	
Benjamin Brainard	DACVECC	emergency and critical care	
Scott Brown	DACVIM	Internal Medicine	
Andrew Bugbee	DACVIM	Internal Medicine	
Amy Dixon-Jimenez	DACVIM	Cardiology	
Amanda Coleman	DACVIM	Cardiology	
Jennifer Good	DACVECC	emergency critical care	
Marc Kent	DACVIM	neurology	
Amie Koenig	DACVECC	emergency critical care	
Selena Lane	DACVECC	emergency critical care	
Joerg Mayer	DECZM, DACZM, DABVP(ECM)	exotic zoo medicine	
Stephen Divers	DECZM, DACZM	exotic zoo medicine	
Kate Myrna	DACVO	ophthalmology	
Simon Platt	MRCVS	neurology	
Jane Quandt	DACVAA	anesthesiology	
Gregg Rapoport	DACVIM	cardiology	
Jo Smith	DACVIM	internal medicine	
Cynthia Ward	DACVIM	internal medicine	

Please describe the role of the radiation oncology resident and the radiation oncology service in the daily clinical management of patients and clients:

The residents' time will be divided between daily care of radiation oncology patients and management of radiation side effects, treatment planning and contouring, primary case management of radiotherapy patients, communication with the owners, and consultation with referring veterinarians. The resident will see both new appointments and recheck appointments as well. The resident is expected to attend the rounds and journal clubs identified in the table below. The resident may attend additional rounds, such as Case Presentation Conference (CPC) and ACVIM journal club, if desired, but this is not required. More details are shown below.

Mon: 4-5pm medical and radiation oncology case rounds (mandatory)

Tue: 8-9a medical oncology and radiation oncology journal club (mandatory); 4-5pm medical and radiation oncology case rounds (mandatory)

Wed 4-5pm oncology and radiation oncology case rounds (mandatory)

Th 8-9 am ACVIM rounds (optional); 4-5pm oncology and radiation oncology case rounds (mandatory)

Fri 8-9 am intern/resident grand rounds (mandatory); 12-1pm cytology rounds (optional); 1-1:30 pm radiation therapy rounds (mandatory); 3-4 pm pathology rounds (optional)

Technical Foundations in radiation therapy – 6 weeks (07/15 – 08/31 of the first year) – During this time, the resident will be accompanying two veterinary technicians (a therapist and an anesthetist) during all treatments. The resident will take this time to learn about the equipment used in daily treatments and anesthesia. It is expected that the resident will be performing the treatments during the last 2 weeks of this rotation. The trainee will also participate in patient set-ups and learn the basics of the treatment planning software. The goal of this rotation is for the resident to understand the equipment well enough to carry out the routine duties of the therapist and anesthetist. After this rotation, the resident should be able to perform the duties of any radiation oncology staff in the event they are unable to perform their standard duties.

Shadowed radiation oncology training – 9 weeks (09/01 – 11/01 of the first year)

This time will be spent performing standard radiation oncology duties. During this shadowed period, however, the resident will not have primary case responsibility, and will accompany the attending radiation oncology clinician on case consults and during treatment planning. The resident is expected to gain familiarity with the treatment planning system during this time.

Therapy Expectations – The resident is expected to be the conduit of communication between the radiation therapy team and the medical oncology staff. To facilitate this communication, the resident should muster first thing in the morning with the therapy staff before attending rounds or other obligations, to discuss any questions regarding current or upcoming cases and the status of any pending plans. This will also allow the resident to address any concerns raised during the QA process, and also to plot out a rough schedule and plan for the day, including the tentative availability of the resident to the staff. The resident should be familiar with the Aria record and verify station, and should review any concerns regarding the system. The resident should be in communication with the radiation therapist to coordinate treatment delivery and CT setups, and should have an awareness of the CT setups taking place throughout the day.

Planning Expectations – Overall treatment turnaround time should be 48-72 hours. This allows 24 hours for resident planning, 24 hours for faculty review, and 24 hours to prepare for the new start (IMRT/SRT QA plans made by the medical physicist). To facilitate this time frame, the resident should have a CT contoured and at least a basic plan developed within 24 hours of the "Authorization for RT Planning" request. The resident and faculty are responsible for all plans. If the resident believes that they are unable to complete the plans within this time frame, they should be in communication with the faculty members involved to ensure a timely completion of the plan.

Case Responsibilities – The resident is expected to spend a portion of their radiation oncology time with primary case responsibility for radiotherapy patients. This will include keeping accurate and timely medical records, daily patient assessments, communicating with the owners, and student teaching pertaining to case management, oncology, and radiotherapy. The resident is also expected to attend and participate in daily afternoon case rounds and consult with other services within the VMC, as well as referring veterinarians.

Out-Rotations – At least 4 weeks any time during the 2nd year of the residency program. "Out-rotation" is defined as visiting another radiation therapy facility for training purposes. The facility may be either human or veterinary.

During this period, the resident is encouraged to spend time at a separate facility to augment their training in radiation oncology. Possible suggestions include time spent in a private practice facility, a human therapy facility, or a radiobiology or cancer biology laboratory.

How will the resident receive training in Medical Oncology? What is the time allotted to this training? Please provide description of formal and informal training experiences as well as description of the resident's role while rotating on a medical oncology service:

4 weeks * 2 (11/2-11/29 during the first and 2nd year) = 8 weeks total

During this time the resident will function as a resident-clinician on the medical oncology service. This training should not focus on patients that will or are receiving radiation therapy, but should include all types of cases. The resident should understand the mechanisms of action of the frequently administered chemotherapy agents, and should be familiar with the management of chemotherapy-related side effects.

The resident is expected to be proficient in all of the skills and techniques described in the ACVR/ACVIM Resident Training Objectives Ad Hoc Committee 2015 Report.

How will the resident be trained in diagnostic imaging? What time is allotted for this training? Please provide description of formal and informal training experiences. Please specify if the resident is required to generate imaging reports while on diagnostic imaging rotation:

Diagnostic Radiology – 4 weeks (2/08-3/7 on the 2nd year)

During this time, the resident will participate in formal training of diagnostic imaging. The resident is expected to participate in daily image review rounds, and be exposed to different imaging techniques, including CT, MR, nuclear medicine, and diagnostic ultrasound. The resident is expected to review and provide written interpretations of radiographs and CT scans. Particular care should be taken to review imaging associated with patients receiving radiotherapy.

Will the resident be provided with training in anesthesia? If yes, please include a description of the training:

The radiation oncology resident will take part in deciding the anesthetic protocol for each radiation therapy patient.

When the patient is at an anesthetic risk, the radiation therapy resident will seek guidance from the board-certified anesthesiologists on site.

The radiation oncology resident will review the basics of anesthesiology with the mentor (radiation oncologist).

How will the resident be trained in radiation biology? Please provide description of formal and informal training experiences:

The radiation oncology resident will read the entire radiobiology textbook “Radiobiology for the Radiologist (Eric J Hall)”. The mentor (radiation oncologist) will quiz the radiation oncology resident on the contents of the book.

The radiation oncology resident will also learn radiobiology from multiple different sources (scientific journals, oncology textbooks, attending seminars, solving).

The schedule for the Hall's book is shown below.

Radiobiology for the Radiologists (7th edition, Eric Hall):

1. 1st year 7/15-8/31: Chapter 1 through Chapter 17 + quiz (made by Nagata) for each chapter
2. 1st year 9/1 -9/20: Chapter 18 through the end of the book + quiz for each chapter

How will the resident be trained in cancer biology? Please provide a description of formal and informal training experiences:

The radiation oncology resident will learn cancer biology via textbooks on cancer biology (Basic Science of Oncology [Tannock and Hill], The Biology of Cancer [Robert Weinberg]), attending Medical Oncology journal clubs, and attending scientific meetings such as the Veterinary Cancer Society and ACVR annual meetings. The resident will take quiz made by the mentor (radiation oncologist).

How will residents be trained in radiation oncology physics? Please include a description of the medical physics support for your program and the role of medical physicist(s) in the training of the resident:

The resident will read the textbook of radiation physics (The Physics of Radiation Therapy [Faiz M. Kahn]) and take Raphex Medical Physics Examination questions. The mentor (radiation oncologist) will also teach the basic concepts of radiation physics and how to hand-calculate the dose for typical radiation setups (parallel opposed photon beam treatments and electron beam treatments, extended SSD setups).

The University of Georgia works with an off-site certified medical physicist who performs monthly and annual quality assurance tests on the linear accelerator and generates IMRT QA plans. The medical physicist will also provide technical assistance with the treatment planning software (Eclipse ver 13.0) and troubleshooting of the linear accelerator (Trilogy, Varian). He will also participate in teaching (approximately 6 hours total) regarding the QA, radiation safety, the use of a LINAC, radiation planning software (Eclipse ver. 13.0)

The schedule for the physics textbook and Raphex exams:

The Physics of Radiation Therapy (4th edition, Faiz Khan)

1. 1st year 9/21 – 10/5: Basic Physics: Chapter 1-8
2. 1st year 10/6-10/18: Classical RT: Chapter 9-18
3. 1st year 10/19-11/1: Modern RT: Chapter 19-26

Raphex exams:

1. 1st year 11/30-12/13: General/Therapy Questions : latest 5 years
2. 1st year 12/14-12/28: General/Therapy Questions: latest 10 to the latest 5 years.

Please list any formal courses and their instructors included in the residency training curriculum. Please attach syllabi and instructor credentials for each listed course. NOTE: Please ensure syllabi are up-to-date within the last year:

n/a

However, the radiation oncologist will ask the radiation oncology residents to make a summary of veterinary radiation-oncology related manuscripts and quiz the residents. Sample summary with questions are attached.
The schedule is as follows;

Journal articles related to veterinary RO:

1. 1st year Jan/4 - Jan/24 : Nasal tumors, Oral tumors, abdominal/perianal tumors + quiz (made by Nagata) for each topic
2. 1st year 3/8-4/4: Intracranial tumors, thyroid tumors, mast cell tumors + quiz for each topic
3. 1st year 4/5-4/25: osteosarcomas, strontium-90, soft-tissue sarcomas, feline injection-site sarcomas + quiz for each topic
4. 1st year 4/26-5/9: all other veterinary RO related articles + quiz for each topic

Upload syllabi here:

[BRAIN and Pituitary RT.docx](#)
[LSA RT.doc](#)
[chapter 1 Hall quiz.docx](#)

Will the resident participate in clinical rounds on a daily basis while on clinical rotations?

yes

Is a supervising Diplomate available for the majority of rounds?

yes

If no, please describe how rounds are attended and supervised:	n/a
Are formal conferences, such as clinicopathologic conferences, journal clubs, or seminars held on a weekly basis?	yes
Comments:	n/a
Please provide a description of the conferences, etc., that are provided and the typical schedule. Please specify which conferences are mandatory vs. optional:	<p>The resident may attend additional rounds, such as Case Presentation Conference (CPC) and ACVIM journal club, if desired, but this is not required. More details are shown below.</p> <p>Mon: 4-5pm medical and radiation oncology case rounds (mandatory) Tue: 8-9a medical oncology and radiation oncology journal club (mandatory); 4-5pm medical and radiation oncology case rounds (mandatory) Wed 4-5pm oncology and radiation oncology case rounds (mandatory) Thr 8-9 am ACVIM rounds (optional); 4-5pm oncology and radiation oncology case rounds (mandatory) Fri 8-9 am intern/resident grand rounds (mandatory); 12-1pm cytology rounds (optional); 1-1:30 pm radiation therapy rounds (mandatory); 3-4 pm pathology rounds (optional)</p> <p>Other teaching opportunities and schedules of radiobiology, physics, and veterinary RO related articles were mentioned previously.</p>
Is the resident required to give one or more formal presentations at a conference or in an educational setting on a yearly basis?	yes
If yes, please provide a description of the requirement:	The radiation oncology resident is expected to give a 45 minute formal lecture once a year to the students and faculty members at the University of Georgia.
How many major veterinary medical or medical meetings is each resident able to or expected to attend during his/her training program?	Two
Comments:	At least one ACVR meeting and possibly one Veterinary Cancer Society meeting
Does the training program require a research project?	No
Are one or more publications required as part of the training program?	No

Do you have a megavoltage teletherapy machine available?	Yes
Is the megavoltage teletherapy machine on-site?	Yes
Please specify the manufacturer and model:	Varian Trilogy
Do you have a multileaf collimator available?	Yes
Is the multileaf collimator on-site?	Yes
Please specify number of leaves and width of leaves:	120 leaves, 2.5 mm
Do you have an on-board portal or CT imaging available?	Yes
Is the on-board portal or CT imaging on-site?	Yes
Please specify type:	kV radiographs, MV radiographs, cone-beam CT scan
Do you have a 3D - computer based treatment planning system available?	Yes
Is the 3D - computer based treatment planning system on-site?	Yes
Please specify manufacturer and model:	Eclipse ver 13
Do you have a 2D or 2 1/2D computer based treatment planning system available?	No
Is the 2D or 2 1/2D computer based treatment planning system on-site?	No
Do you have intensity modulated radiation therapy available?	Yes
Is intensity modulated radiation therapy on-site?	Yes

Do you have stereotactic radiation therapy or radiosurgery available?	Yes
Is stereotactic radiation therapy or radiosurgery on-site?	Yes
Do you have strontium-90 plesiotherapy available?	Yes
Is strontium-90 plesiotherapy on-site?	Yes
Do you have LDR brachytherapy treatment and planning available?	No
Is LDR brachytherapy treatment and planning available on-site?	No
Do you have HDR brachytherapy treatment and planning available?	No
Is HDR brachytherapy treatment and planning available on-site?	No
Do you have diagnostic radiology/imaging services available?	Yes
Is diagnostic radiology/imaging services available on-site?	Yes
Do you have conventional radiography available?	Yes
Is conventional radiography available on-site?	Yes
Do you have fluoroscopy available?	Yes
Is fluoroscopy available on-site?	Yes
Is ultrasound available?	Yes
Is ultrasound available on-site?	Yes

Is nuclear medicine available?	Yes
Is nuclear medicine available on-site?	Yes
Do you have computed tomography available?	Yes
Do you have computed tomography available on-site?	Yes
Do you have magnetic resonance imaging available?	Yes
Do you have magnetic resonance imaging available on-site?	Yes
Do you have positron emission tomography available?	No
Do you have positron emission tomography available on-site?	No
Do you have an intensive care facility (24 hours) available?	Yes
Do you have an intensive care facility (24 hours) available on-site?	Yes
Do you have clinical pathology capabilities (includes CBC, serum chemistries, blood gases, urinalysis, cytology, parasitology, microbiology and endocrinology) available?	Yes
Do you have clinical pathology capabilities (includes CBC, serum chemistries, blood gases, urinalysis, cytology, parasitology, microbiology and endocrinology) available on-site?	Yes

Do you have a veterinary library with literature searching capabilities available?	Yes
Do you have a veterinary library with literature searching capabilities available on-site?	Yes
Do you have a medical library with literature searching capabilities available?	Yes
Do you have a medical library with literature searching capabilities available on-site?	Yes
Do you have computerized medical records with searching capabilities available?	Yes
Do you have computerized medical records with searching capabilities available on-site?	Yes
Megavoltage Gamma/X-ray teletherapy:	85
Intensity modulated radiation therapy:	73
Stereotactic radiation therapy or radiosurgery:	27
LDR brachytherapy:	0
HDR brachytherapy:	0
Injectable radionuclide therapy:	0
Radioiodine:	0
Stronium plesiotherapy:	13
Describe procedures for resident record recording of radiation treatment details of all patients.	At the University of Georgia, Record&Verify software (Aria) is in use. This software records the details of how the teletherapy beams were delivered. Other records will also be kept by the resident, including the patient setup. For hand calculations, the resident is expected to record the details of beam delivery (energy, modality, gantry angle, collimator angle, monitor units used, TMR/PDD at the specific depth, bolus type and thickness, patient setup, field size etc.).

What procedures are in place to facilitate collection of follow up information of patients treated? What is a standard recheck schedule for patients? In the absence of routine patient rechecks at the facility, is there a system in place to obtain follow-up?

All the treated patients are encouraged for follow-up visits at the University of Georgia small animal hospital. The standard recheck schedule is every 3 months during the first 1 year post RT, followed by every 6 months. If the patient cannot come back for a follow-up, a phone call to the owner at the aforementioned intervals.

By what mechanisms and how often will trainees be evaluated? Please comment on radiation therapy specific evaluation as well as general clinical evaluation.

Please see the form attached.
The resident will be evaluated every 6 months.

Please upload form used in evaluations.

[Residency Evaluation Form.doc](#)

If applicable, please list the residents who have completed the training program within the last five years, including the year that each individual's training program ended. If at all possible, please provide an address, and any information you have on the status if each individual with respect to the board certification process.

n/a

Please list any additional information of interest in support of this residency application.

n/a