VETERINARY SOCIETY OF SURGICAL ONCOLOGY

NEWSLETTER

Issue 1 | 10th July, 2020 | E-mail: VSSONewsletter@gmail.com | www.vsso.org

INTRODUCING...

Welcome to the first VSSO Newsletter! This publication will, undoubtedly, be a work in progress but with your input, we hope to provide a resource to keep you appraised of developments within the society and to shine a light on the experiences and challenges of the society's members. This first issue is, necessarily, influenced by the COVID-19 pandemic, with input from two members whose communities have been ravaged by the disease, as well as an interesting case provided by Dr. Julius Liptak. Subsequent issues will include opinion pieces regarding topics of interest to the surgical oncology community, whether directly related to surgical oncology or to allied disciplines.

We are looking forward to developing the newsletter but your participation is essential. If you have interesting cases that you would like to share with the community, please do not hesitate to get in touch at the Newsletter email address above. We also want to know more about you. Please reach out to tell us about your successes, life events, and updates.

PRESIDENT'S REVIEW

Hello VSSO Members!

The VSSO Executive Committee is thrilled to bring you this inaugural VSSO newsletter! We are hopeful that this will be an additional way that the VSSO can connect with members as well as learn more about the amazing things that are being done by our members and society as a whole. We have been planning this newsletter for quite some time; however, our emphasis has shifted over the last several months to highlight some of the challenges experienced by our members during the COVID-19 pandemic. We are excited for you to read those stories as well as many other interesting articles in this newsletter. Additionally, I would like to highlight some of the things that our VSSO Executive Committee is actively working on and pass along congratulations to some of our amazing members below.

We were all eagerly anticipating the 5th VSSO Scientific Conference entitled ***VSSO 2020: Vision,*** which was set for May. As we all know, the COVID-19 pandemic changed those plans, and the VSSO Conference Committee (led by Dr. Sarah Boston) has put in tremendous effort to reorganize the event with the goal of holding our next conference in May 2021. The conference is again planned to occur in Niagara-on-the-Lake, Ontario, Canada, and we would love to see you there! This conference is always an exciting time to hear some incredibly cutting-edge and provocative talks as well as interact with attendees and enjoy amazing social events. Please join us May 3-5, 2021 for our belated 5th VSSO Scientific Conference now entitled, ***Farsighted***!

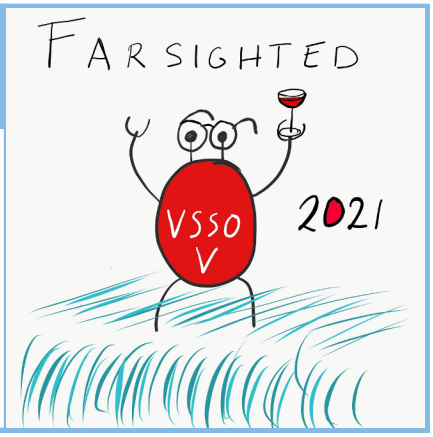
Our VSSO website has undergone a massive overhaul recently, with the hope to be able to bring you a new product that will improve the user experience and draw attention to the VSSO. Additionally, our Website Chair, Dr. Brandan Wustefeld-Janssens has been actively working on our *(continued on page 3)*

KEY DATES

VSSO IV - May 3-5, 2021

Niagara-on-the-Lake, Canada

Members with registration for the 2020 conference can have this roll over to next year. This conference is being planned as a hybrid conference to facilitate online attendance.



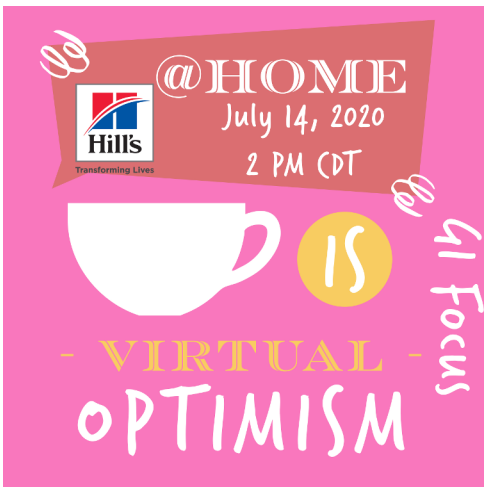
CASE HIGHLIGHT: FELINE FACIAL RECONSTRUCTION

DR. JULIUS LIPTAK

PRESENTATION

A 10-year-old, female spayed, domestic medium hair cat presented with a 2.4 cm x 3.1 cm mass involving her right nasal planum and upper lip. The mass had been present for 12 months. The mass caused mild compression of her right nostril, but she did not have any respiratory issues or eating difficulties.

Preoperative workup included complete blood count, serum biochemistry, incisional biopsy, and pre- and post-contrast CT scan of her head, neck, and thorax. All blood work results were within the normal reference ranges. An 8 mm punch biopsy of the mass was collected, and the mass was diagnosed as a grade I fibrosarcoma. The CT scan showed a large, heterogeneously contrast-enhancing soft tissue mass along the right maxilla and impinging on the right maxilla with no evidence of bone invasion (Figure 1). There was mild enlargement of the right mandibular lymph node, no evidence of pulmonary metastasis, and an incidental finding of a large left thyroid lobe mass.



THERAPY

The cat was anesthetized, positioned in dorsal recumbency, clipped, aseptically prepared, and draped for surgery. A ventral midline cervical approach was made to expose a 1.5 cm x 2.3 cm left thyroid mass; the right thyroid gland was grossly normal. A left-sided thyroidectomy was performed. The right mandibular lymph node was identified and extirpated. The surgical site was closed routinely in three layers.

The cat was repositioned in left lateral recumbency, aseptically prepared, and draped for surgery. The pharynx was packed to prevent aspiration of blood and surgical fluids. Resection of the right upper lip and maxilla was planned with reconstruction using a facial axial pattern flap. The facial axial pattern flap was raised prior to resection of the fibrosarcoma with parallel skin incisions along the right zygomatic arch and ventral border of the mandible (Figure 2). These two incisions were connected caudally and the facial axial pattern flap was raised. The fibrosarcoma was then resected with 1.0 cm lateral skin margins, which included an en bloc nasal planum resection (Figure 3), and a hemimaxillectomy for deep margins, which involved along the dorsal midline of the maxilla, immediately medial to the dental arcade, and caudally to connect these two osteotomies (Figure 4). The facial axial pattern flap was rotated into the defect and closed in two layers (Figure 5).

FIGURE 1

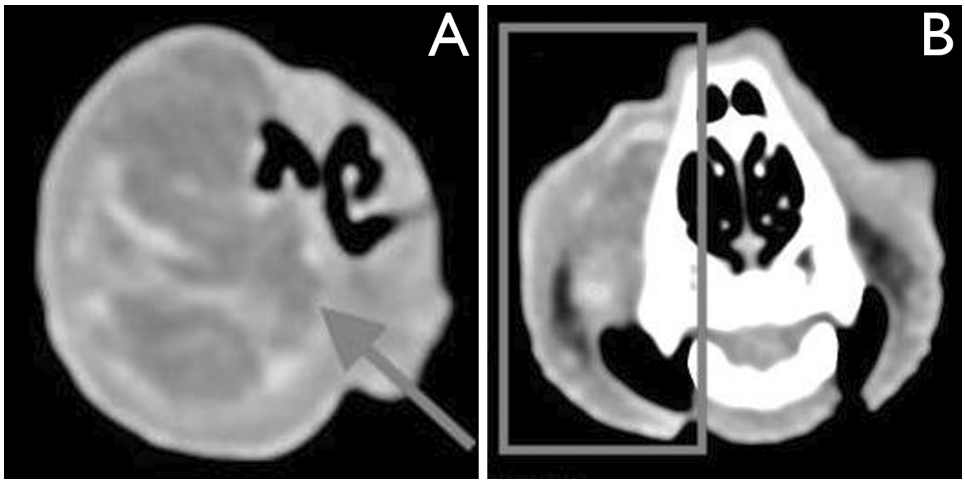
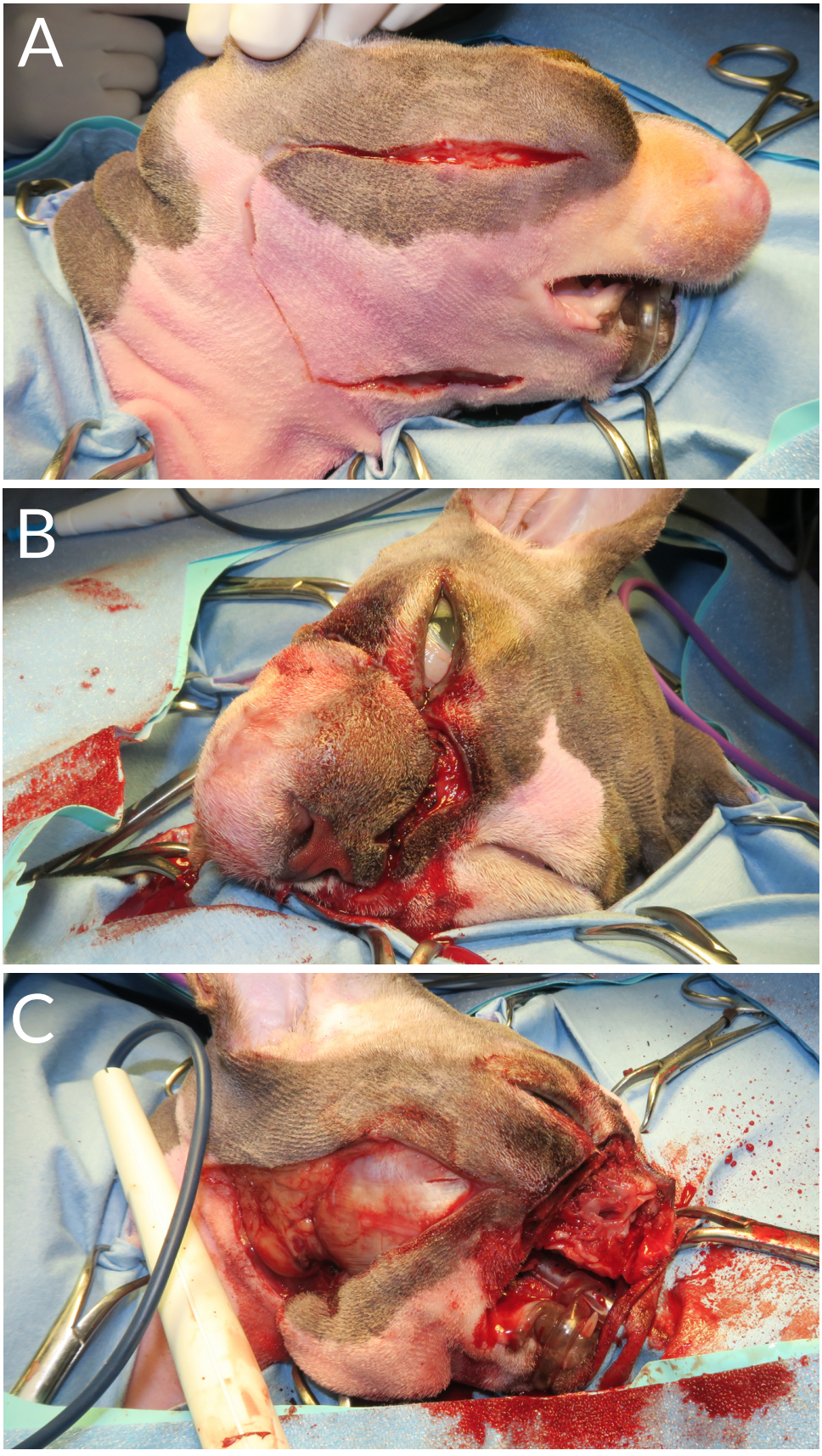


Figure 1.A. Post-contrast CT transverse image showing a large, heterogeneously contrast-enhancing soft tissue mass impinging on the nasal planum (arrow). B. Post-contrast CT transverse image showing the contrast-enhancing mass with no bone involvement. The box indicates the planned surgical approach with en bloc resection of the upper lip and maxilla.

CASE HIGHLIGHT - CONT.

FIGURE 2



OUTCOME

The cat was discharged on day 1 postoperatively after being weaned off her continuous rate infusion of remifentanil and ketamine. She was discharged with meloxicam, buprenorphine, and gabapentin. Her recovery was uneventful with no respiratory or eating issues (she did not have a feeding tube inserted), and complete survival of the facial axial pattern flap (Figure 6).

Histopathology revealed complete histologic excision of a grade I fibrosarcoma with the histologic tumor-free margins of 1.8 mm rostrally, 0.5 mm caudally, 4.7 mm medially (including bone and cartilage deeply), 1.0 mm along the buccal mucosal margin, and 3.8 mm along the gingival mucosal margin. The lymph node was reactive and showed no evidence of metastasis. The thyroid lobe mass was consistent with a benign adenoma.

The cat remains disease-free 12 months postoperatively. She has had one episode of dyspnea 11 months following surgery, but this was believed to be unrelated to her facial reconstruction.

Figure 2. A - The facial axial pattern flap being created with parallel incisions along the zygomatic arch and ventral border of the mandible, connected caudally.

B - Wide surgical resection with 1.0 cm lateral margins around the fibrosarcoma, including an en bloc nasal planum and full thickness upper lip resection.

C - A hemimaxillectomy was performed to achieve deep margins, and this was performed en bloc with resection of the upper lip and nasal planum.

FIGURE 3

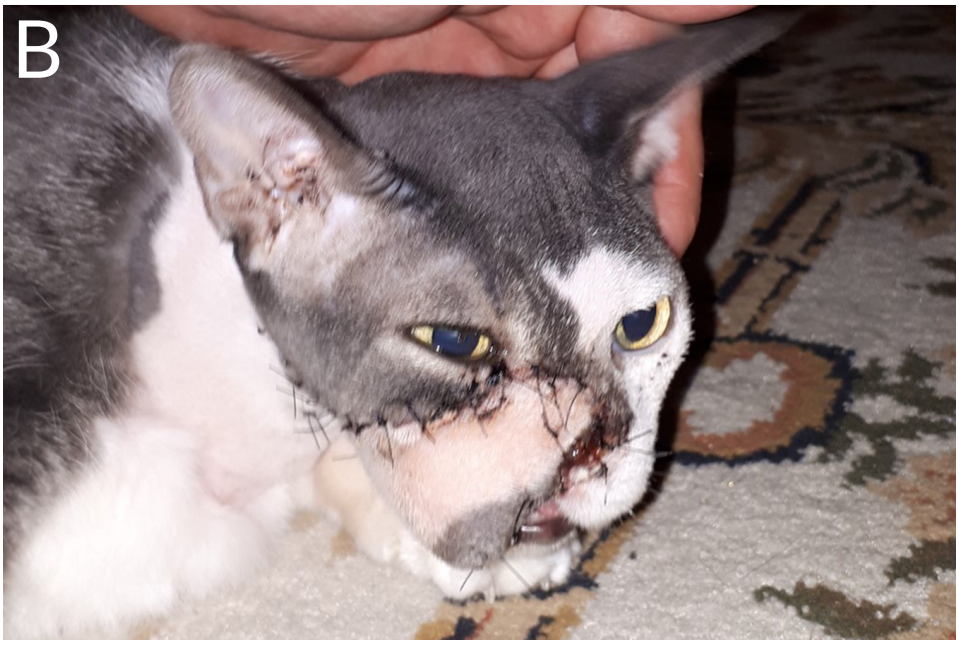


Figure 3. A - Gross appearance on postoperative day 1, showing reconstruction of the facial resection with a facial axial pattern flap.

B - Gross appearance on postoperative day 7, showing uncomplicated and complete survival of the facial axial pattern flap.

Dr. Julius Liptak, BVSc MVetClinStud FACVSc DACVS-SA DECVS, ACVS Founding Fellow - Surgical Oncology. Dr. Liptak is a surgeon at Alta Vista Animal Hospital, Ontario.

PRESIDENT (CONT.)

"Member's Section" to bring new features that will provide further benefits to VSSO Members. We are also working on podcasts that will be available via our website, and we are looking forward to providing exciting conversations about oncology-related topics.

The VSSO Research Committee, chaired by Dr. Michelle Oblak, has been working hard on VSSO grant review, VSSO study proposal review and abstract selection for VSSO Conferences. We are enthusiastic about many of the proposed directions for our Research Committee and are actively looking at ways to improve how the VSSO conducts and supports research. It is likely that we will be reaching out to our membership soon for more involvement, so please let us know if you are interested in being involved with Research Committee subgroups.

This newsletter is the most recent addition to the offerings of the VSSO, and we hope that this will be a place to provide the latest updates of the VSSO, state-of-the-art discussions about oncological diagnostics and treatments and important research discoveries. We are also looking for other topics that you would like to see included in this newsletter, so please feel free to reach out and let us know! Dr. Owen Skinner is leading the charge, and has outlined many great ideas, but we would love to hear from you all as well.

I would like to highlight a few accomplishments for some of our members. Dr. Bernard Seguin and Dr. Simon Kudnig are working diligently on the new addition of the Veterinary Surgical Oncology textbook, and this can be expected in the near future. I am sure that this latest version of the textbook will be a fantastic addition to the veterinary literature. Also, congratulations to Dr. Laura Selmic and Dr. Vincent Wavreille on being awarded the first VSSO-sponsored grant for their project entitled: *Evaluation of Hemostasis in Dogs with Surgically-Treated Hepatocellular Carcinoma*. Additionally, the VSSO just awarded the first VSSO Innovations in Teaching Grant to Drs. Alex and Dr. Stacey Fox-Alvarez for their project entitled: *VICE Rounds - A Multi-institutional Veterinary Clinical Education Cooperative*. The goal of this proposal is to provide an innovative method for teaching, especially during challenging times such as what we are experiencing with the COVID-19 pandemic. We are excited to see what comes from these incredible projects!

We are thrilled to be working with our outstanding membership on the above projects. Please let us know if you have any other suggestions for ways to improve the VSSO and we look forward to continuing this process with you all in the future.

Sincerely,

Bill Culp

President, Veterinary Society of Surgical Oncology

PERSPECTIVE - THE UNEXPECTED GUEST

DR. FEDERICO MASSARI

COVID-19 never showed up, never asked to welcome us into our lives, never asked to be invited to our home. At the beginning of March, as the worst unexpected guest, we found him at home. China seemed so far away, the numbers of people affected, the restrictive measures, the isolation of families. In Italy it was believed that it was due to incorrect management of the disease, it was joked that the problem had been overlooked.

Then suddenly, we found ourselves in the same, if not worse, situation. I was taking a course of surgery with students in the main Italian outbreak, near Lodi, when news of patient one's arrival in the hospital ended the course early and made us all go home. As a precaution, it was said, but in 10 days the world had completely changed. People were asked to stay indoors, no one knew how and when to go out. Work ceased and people didn't know what was right to do.

As doctors, we continued to take care of our patients. We were asked to manage emergencies, serious problems, but as an oncological and surgical reference structure each patient remains an emergency. The problem wasn't the animals, but the owners. So we immediately prepared to visit with the protection systems we had. We covered ourselves as if we were administering chemotherapy to the owners, thoroughly cleaning every accessory that was not of the structure. And slowly, what seemed absurd and incomprehensible, has become the newspaper to this day.

The real terror is the ignorance of something that affects you, the choices that can influence the lives of your relatives, especially the elderly, the weakest.

The work stopped for some time, only the emergency services remained operational, but they too found themselves in a slowdown in work. People were scared, didn't know what was right and only real surgical emergencies were handled. My facility has decided to close the business as a precaution for a week, until complete standardization of medical triage and owner management.

Today we awaken to a world that months ago we would have only imagined in a movie. Instead it is our new reality. I come to work every morning and after May 4 (the end of the lockdown in Italy) I see more and more people around although it is transformed.

Social distance has become part of all of us (and we speak of Italians, people accustomed to group, hug, huddle together), we wear masks breathing an air we are not used to and we have looked at a different world behind plastic protections to prevent the contamination.

We love our job, we carried it forward trying to isolate ourselves as much as possible from people, instead hugging us close to the animals, maybe even ours at home, being the true comforters and the least dangerous disease vehicles.

The work has gone down, we have blocked all group activities both didactic and other. The courses scheduled with the various companies have all been postponed. We learned to prepare lessons online. We approached a digital world that belonged to a few and instead allowed us to discover frontiers that we will also use in the future. Who more or less has lost relatives, friends, companions in a world transformed by pain. Days went by and we counted the pandemic deaths, every evening it was a collection of numbers to inform us on how much the infection went up and how many people died every day. There has never been a real statistical investigation, only numbers and tests, tests and numbers, and every day that passed we just waited for the curve to drop, for the infection to decrease.

For a few days it seems that the world is starting up again. People know the risk, they know how to behave. We only live in fear of returning to 2 months ago, with a curve that instead of going down, goes up. Let's just hope that everything goes quickly, that this pandemic has taught us how to behave and how to stay united even in difficult times. We learned to work in difficult situations, to take care of animals even from a distance and to diagnose problems without having contact with people, collecting anamnesis and symptoms over the phone.

Today we start again, more and more motivated, but equally attentive, hoping that everything remains only a bad memory, but that it also teaches us that if we remain united, as Doctors and as Veterinarians, then even a pandemic can frighten us but cannot stop us.

Dr. Federico Massari, GP Cert. SASTS, Dipl.ECVS. Dr. Massari is a surgeon at DOCVET, Clinica Veterinaria Nervianese near Milan.

PERSPECTIVE - YEARNING TO BREATHE FREE

DR. KATIE KENNEDY

The city that never sleeps is taking a nap.

This was my uncle's summary of things when we were first talking about the state of New York City amid the shutdown. And he wasn't wrong. Times Square and Rockefeller Center were empty, the lights of Broadway were off, culinary diversity was reduced to that delivered by e-bike, there were more squirrels than people in Central Park, and it turns out you could actually hear birds chirping in the mornings when the car horns were silent in their garage. The huddled masses were nowhere to be found, but Lady Liberty still presided over the tired and the poor; just head to the nearest hospital or unemployment line to find them.

The economic toll, the reduced case load, and the increase in financial constraints among our clients were things that we have all likely experienced to one degree or another. No clients were allowed in the hospital, aside from those euthanizing a pet, which meant setting up heated tents in our parking garage, because most of our owners couldn't just wait in the car during their appointment. In those first weeks especially, there was a new protocol every day about how to handle cases, mechanisms for getting animals into the hospital, who to call to discharge them, and cleaning measures to protect our staff. One of the biggest challenges as a surgeon was trying to choose the cases that counted as essential and what that even meant. Depending on which guideline from which entity, it could be emergency procedures only, any urgent procedures, or all procedures to reduce suffering or for public health purposes, including spays. This vagueness meant that interpretation very much rested on our shoulders, with the need to conserve medical supplies and protect staff on one side and the need to treat illness and keep the doors open on the other. The number of people scrubbing into surgeries was limited, surgical masks were re-used until they were soiled, anesthesia protocols were modified to conserve the medications on national shortage. Some people chose not to come to work, either because they were at-risk or because they were scared, but some people didn't have that choice; the option was instead to continue to work or don't pay the rent.

There was a generalized apprehension about what the latest guidelines were from the department of health, what would happen IF someone got sick. It separated the idealists from the realists, that IF. Because it was not an IF, it was a WHEN. And when it happened, it was happening throughout the hospital and across the entire city. What started as a single confirmed case quickly spiraled into entire services out sick and rumors flying about George being on a ventilator or Nancy's elderly babysitter who had just died from COVID. Everyone lived at a heightened level of anxiety, with chapped hands from all the washing and a thermometer on their nightstand, waiting for the news of friends and co-workers. We had entered the community transmission phase, meaning that it was just assumed that everyone in the entire city was infected. Contact tracing was no longer a priority. If you were sick, you didn't get tested; you just stayed home to keep everyone else safe and thereweren't enough tests anyway. If you needed to be hospitalized, then you could go and seek treatment, and you might be admitted to the ICU. Or you might have a bed in an OR that had been converted into a treatment area, or be in a tent in the East Meadow of Central Park. If you needed a ventilator,it might even be one that our veterinary hospitals had lent to our human counterparts, a telling turn of events in a world where some human medical companies won't even sell to veterinarians anymore. It would be great if those semi-trailers in hospital parking lots were a constant supply chain bringing much needed personal protective equipment and medications to our healthcare workers. The reality of overflowing morgues and the sheer number of loved ones separated from their families first by windows and then by refrigeration trucks is much harder to comprehend.

The trauma and fear and loss will not be an emotional wound that is soon healed. And yet, the healing has already begun.New bonds are formed to take on these tasks which we never could have imagined and now step up to answer on a near daily basis. I have felt closer to my fellow surgeons than ever before as we shared common goals to take on these challenges. Once monthly meetings were sometimes several times a week virtual meetings as adjustments are made and decisions change. Five day per week schedules became 7-day schedules with alternating teams, because that was how we could best serve our patients and our community; who knows what day it was anyway. Every business now looks like bank teller, with plastic barriers between you and those at the desk or counter. Restaurants have curated to-go meals with drink pairings and boxes of specialty goods available for the newly minted home chef. The grocery stores are stocked, even with toilet paper, although the days of quilted 3-ply still seem beyond us. The flowers of Spring are blooming and these huddled masses are once again yearning to breathe free.

Dr. Katie Kennedy, DVM , DACVS-SA, ACVS Fellow - Surgical Oncology. Dr. Kennedy is a surgeon at the Animal Medical Center, New York.

TRANSLATION

Minimially Invasive versus Abdominal Radical Hysterectomy for Cervical Cancer. Ramirez PT et al. N Eng J Med 2018; 379: 1895-1904.

Summary: This study evaluated outcomes in women with cervical cancer managed with radical hysterectomy, randomised to either minimally invasive or open surgical approaches. While retrospective studies have associated minimally invasive radical hysterectomy with decreased blood loss, duration of hospitalisation, and post-operative complications than open surgery, prospective data are lacking. This study was a multi-centre, non-inferiority trial, conducted at 33 centres between 2008 and 2017.

631 patients were enrolled (319 minimally invasive, 312 open). Treatment groups were largely balanced regarding demographics and disease characteristics. Rates of adjuvant therapy were similar (28.8% within the minimially invasive group and 27.6% in the open group).

Disease-free survival was 86.0% at 4.5 years in the minimally invasive group, compared to 96.5% in the open surgery group. Both deaths from cervical cancer (4.4% v 0.6% and locoregional recurrence (6.7% v 1.7%) were higher in the minimally invasive group.

Comment: While this study was not powered to explore the reasons for failure in the minimally invasive group, it has led to re-appraisal of operative techniques within the field of gynecological oncology. Minimally invasive surgery holds great promise in both veterinary and human medicine but equivalency (or superiority) in outcomes in one area are no guarantee of success in another, while retrospective data can be misleading due to selection.

SURGICAL ONCOLOGY CLINICAL STUDIES

Evaluation of imaging and intraoperative techniques for the identification of sentinel lymph nodes in dogs with oral tumours — **Open**

University of Guelph (lead)
University of California Davis
University of Minnesota
University of Missouri
The Ohio State University

Funded by: Intramural grant at University of Guelph

Dr. Michelle Oblak. E-mail: moblak@uoguelph.ca

Optical Coherence Tomography for Surgical Margin Assessment of Skin and Subcutaneous Tumors — **Open**

The Ohio State University

Funded by: The American Kennel Club Canine Health Foundation

Dr. Laura Selmic. E-mail: selmic.1@osu.edu

Prospective Evaluation of Thyroid Carcinoma Lymph Node Metastasis — **Open**

University of Missouri (lead)
Animal Medical Center
Cornell University
University of Florida
University of Guelph
North Carolina State University
The Ohio State University
Texas A&M

Funded by: Intramural grant at University of Missouri

Dr. Owen Skinner E-mail: skinnero@missouri.edu

Tell us about your prospective studies! Publicising your research to colleagues within the field may allow increased enrollment or facilitate collaboration. Email us at VSSONewsletter@gmail.com to add your study or trial.

Unless otherwise stated, studies are not endorsed or evaluated by the VSSO.

ANNOUNCEMENTS

The Margin Podcast

VSSO has a podcast! The first episode, featuring Dr. Sarah Boston is available at https://vsso.org/podcast.

Keep an eye out for the next episode, which will explore surgical oncology fellowship training.

If you have any topics you would like to hear explored in subsequent episodes, please contact Dr. Brandan Wustefeld-Janssens. at bjanssens@cvm.tamu.edu.

VSSO VETERINARY SOCIETY OF SURGICAL ONCOLOGY