

OPINION ARTICLE

Telemedicine, Access to Veterinary Healthcare, and Animal Welfare

Brian A. DiGangi¹*, Jennifer Hobgood² and Camille DeClementi²

¹University of Florida, College of Veterinary Medicine, Department of Small Animal Clinical Sciences, Gainesville, FL, USA;

he current shortage of veterinary medical professionals in the work force is poised to worsen long-standing barriers to accessible veterinary care. A September 2020 study found that 75 million pets in the U.S. could be without veterinary care by 2030 if we do not update our approach to providing these services. Undoubtedly this problem will be experienced more acutely by those in shelter and community medicine practice. Expanding the availability and use of telemedicine is one way to help relieve this burden expeditiously and conversations around this tool have become more prominent in both veterinary professional organizations and state legislatures around the country. Embracing the role of telemedicine in the modern practice of veterinary medicine is good for veterinarians, clients, and, most importantly, for patients.

Expanding the Toolkit

The American Medical Association has identified telehealth as 'critical' to the future of human healthcare and is working aggressively to expand policy, research, and resources to ensure its success.² One reason for this approach is recognition that these services can improve access to and reduce inequities in healthcare when used effectively.³ As veterinary medicine confronts similar service barriers, animal welfare professionals dedicated to shelter and community animal health have opportunities to lead the way and reap a fair share of the long-term benefits.

At the heart of many veterinarians' hesitation is the establishment of the veterinarian-client-patient relationship (VCPR) and the role of the hands-on physical examination in doing so.⁴ Human healthcare has addressed this concern and can serve as a reputable model for veterinary medicine. The Federation of State Medical Boards' newly updated policy statement on the use of telemedicine states, 'the [physician-patient] relationship is clearly established... whether or not there has been an in-person encounter between the physician...and patient.' Traditional ideas about the importance of 'the laying on of hands' have no place in a modern, scientific, evidence-based profession. Regardless, a number of Veterinary Medical Associations have continued to pursue laws requiring veterinarians to conduct physical examinations before they may legally

diagnose or treat patients.⁶ Carefully selected, highly trained, experienced, knowledgeable, and skilled practitioners are more than capable of formulating a preliminary medical diagnosis and recommending a logical first-line course of treatment using modern technology.

Of course, the hands-on physical examination is a valuable diagnostic tool – and one of many that veterinarians may employ in care of their clients and patients. And yet, veterinarians around the world engage in remote assessment, diagnosis, and treatment daily with their clients' pets, those of family and friends, and across social media platforms. Indeed, it is expected and legally permitted for veterinarians to use telecommunication technologies when it comes to animal emergency triage, poison control, and herd health – some of the most critical areas of practice, where the risk of misdiagnosis can have grave consequences for both animal and human health.

In many jurisdictions, with the exception of lost animals temporarily held by shelters during a stray hold period, shelter animals are the physical property of the owner (i.e. the shelter), particularly after expiration of any required holding periods, and therefore veterinarians employed by the shelter may not be required to formally establish a VCPR the same way as when working with pets owned by a third party. This reality of shelter work allows shelter veterinarians to practice telemedicine and speak first-hand about its impact. Shelter practitioners also frequently advise and consult on the management of population health protocols without individual animal hands-on examination - much like that done in food and production animal medicine. Indeed, this is expressly encouraged in published recommendations by shelter medicine subject matter experts as well as in the Association of Shelter Veterinarians' position statement on Veterinary Supervision in Animal Shelters.7

Licensed veterinarians should be legally and professionally empowered to determine when to use telemedicine in their scope of practice. The Association of Shelter Veterinarians believes that 'veterinarians should be able to use their professional discretion to determine whether telemedicine is an appropriate examination modality to generate a diagnosis or to make medical judgements, just

²American Society for the Prevention of Cruelty to Animals, New York, NY, USA

as they determine their own comfort and capability when diagnosing and treating animals or populations examined in person.'8 The American Association of Veterinary State Boards' 2019 revised 'Veterinary Medicine and Veterinary Technology Practice Act Model' enables licensed veterinarians to establish VCPRs using telemedicine technology.9 In addition, despite broader use, particularly during the COVID-19 pandemic, no reports of veterinary telemedicine resulting in inadequate or substandard care have emerged.^{10,11} However, at least 10 states specifically forbid veterinarians from using telemedicine technologies with new patients, often going so far as to classify such activities as 'unprofessional conduct' for which veterinarians can be officially disciplined. Similarly, a newly formed coalition of dozens of veterinary medical organizations and industry members reportedly seeks to support the integration of telehealth into veterinary practice, vet expressly limits its use to cases with physically established VCPRs using unsupported claims of enhanced safety and efficacy.12

Good for Clients

Many pets don't see a veterinarian regularly, often because their owners confront significant barriers to obtaining veterinary care including, but not limited to, cost. A growing number of reports identify that financial barriers can result in pet owners foregoing or postponing treatment or relinquishing their pet:

- In 2020, the chief economist for the AVMA estimated that over 50 million pets, approximately one-third, do not see a veterinarian at least once a year.¹²
- A study of veterinary care usage found that the size and frequency of increasing costs contributed to a decrease in visits and that more predictable and competitive pricing would lead pet owners to their veterinarian more often.¹³
- A national study showed that low-income owners who rehomed their pets reported as much as 40% of the time that access to affordable vet care would have helped them keep their pet.¹⁴

While finances are a frequently cited obstacle for obtaining veterinary care, many people live in areas with few or no veterinary services or face other logistical obstacles. ¹⁵ Conversely, the presence of one (or many) veterinary clinics in a given community does not equate to accessible care. Beyond cost and proximity, truly accessible care overcomes barriers such as language, literacy, fear of judgment, time, transportation, physical abilities, animal behavior, and many others. Especially when combined, such factors can force families to decide to forgo basic veterinary preventive care, leading to more urgent and more costly medical conditions – both in dollars and animal welfare. ¹⁶

While telemedicine is not a panacea, it is an important tool that can mitigate many barriers and expand access.¹⁰ Telemedicine has the potential to:

- Mitigate financial barriers by providing a cost-effective option for many pet owners;^{17,18}
- Help pet owners avoid travel expenses and time off work to seek care:¹⁹
- Address geographic and logistical problems with bringing pets to the clinic for senior citizens, individuals with disabilities, those lacking transportation, and those who live in underserved urban or remote areas:¹⁹
- Overcome challenges associated with transporting large or aggressive animals.

Good for Patients

A primary argument made by those in favor of legislation to restrict telemedicine is that animals cannot articulate symptoms like humans, making a physical examination necessary to properly diagnose animal ailments. However, no states require licensed physicians to conduct physical examinations of infants and other non-verbal humans before providing treatment. More directly, since animals cannot communicate verbally and often mask signs of illness or pain in the clinic or under stress, veterinary clinicians must rely heavily on the interpretation of behavioral signals to formulate a diagnostic assessment. One veterinarian suggests that claims regarding animals' and humans' differential abilities to communicate may be more about protectionist, political subterfuge than quality care.

Clinical veterinary examinations are stressful for most dogs and cats, particularly when conducted in the absence of owners, which can impact physiological parameters and physical examination findings.^{23–26} One study reported that almost 78% of dogs showed fearful behavior during a standardized clinical examination, with 13% so frightened they had to be physically dragged or carried into the examination room.²⁷ Data such as these help to explain an ongoing decline in veterinary visits and pet owners' descriptions of the experience as 'highly stressful for the animal and themselves.'13 In addition to decreasing fear and stress in healthy patients, palliative care and end-oflife or hospice care supported via telemedicine have the potential to reduce unnecessary clinic visits, minimize stress, support the human-animal bond, and lessen animal suffering for senior or terminal animal patients.

For these reasons, the use of pre-visit pharmaceuticals is increasingly recognized as a key tactic in reducing fear, anxiety, and stress in veterinary patients.²⁸ Despite widespread recognition and encouragement of this practice by veterinary and behavior specialists,²⁹⁻³¹ these pharmaceuticals are not available for a new patient under many existing veterinary laws that require a hands-on physical

examination as a prerequisite to prescribing.⁶ Expanding access to telemedicine, including pre-visit pharmaceuticals, may be beneficial for animals, veterinarians, and clients alike.

Conclusions

Shelter and community animal veterinarians must engage in efforts to legalize and normalize the responsible use of veterinary telemedicine now or risk being left out of the conversation as this work moves forward with only the perspectives of professional membership organizations that don't represent our interests, corporate entities, practice owners, and political lobbies. Whether engaging in legislative advocacy, attending local veterinary medical association meetings to represent the interests of our field, or inviting our colleagues in general practice to experience the differing barriers to care faced by our clients, the time to participate in these conversations is now. Expanded use of telemedicine technology can help bridge gaps in care caused by workforce shortages, increase access to the veterinary healthcare system, help keep pets and people together, and improve animal welfare.

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Conflict of Interest

J.H. and C.D. are employees of the American Society for the Prevention of Cruelty to Animals.

Authors' Contributions

Conceptualization, B.D., J.H.; Writing – original draft, B.D.; Writing – reviewing and editing, B.D., J.H., C.D.

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*Brian A. DiGangi

2015 SW 16th Avenue Gainesville FL 32608 USA Email: digangib@ufl.edu

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