A Guide to Mitigating the Risk of Infection in Veterinary Practices During the COVID-19 Pandemic

Disclaimer: Under the current Roadmap to Reopen framework and with the continuation of the pandemic, veterinary practices are to take appropriate measures to protect both clients and staff from COVID-19. This guide is intended to assist veterinary practices to implement appropriate measures to ensure the health and safety of both veterinary clients and practice staff.

Veterinarians are strongly encouraged to continue to use their professional judgement to determine whether services or procedures are appropriate for specific patients based on their individual circumstances and balance the need for treatment with the associated risk to the health of the client and the practice team.

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Overview

Ontario is now facing the next wave of the COVID-19 pandemic with a rapid growth in cases being driven by the Omicron variant in the province. The risk posed by COVID-19 and emerging variants will continue for some time to come, and control measures of varying forms will be required during this time. Veterinarians will need to continue to implement measures to minimize the risk of spread of SARS-CoV-2, the cause of COVID-19, as well as emerging variants associated with veterinary practice.

As COVID-19 is predominantly, if not exclusively, maintained through human-to-human transmission, the overall goal of social distancing is to reduce human-to-human contact, both by reducing the incidence of contacts and reducing the closeness and duration of any required contacts. It is recognized that complete social distancing is not possible in veterinary medicine; therefore, measures must be in place to reduce the risk of exposure when distancing is not possible.

The role of animals in transmission of SARS-CoV-2 is unclear. Zoonotic transmission, if it occurs, is presumably very rare. However, veterinarians are at the forefront of risk groups, particularly as they may have contact with animals owned by people with active COVID-19. While the risk is low, it is impossible to say that it is zero. Therefore, measures to minimize zoonotic transmission risks are indicated.

There is no standard approach to COVID-19 control in veterinary practice that would apply to all situations and practice types. Rather, there is a set of expectations and areas of consideration that veterinarians and veterinary clinics must evaluate and apply, as applicable. Below is a set of resources, tips, and best practices to help employers and employees prevent the spread of COVID-19 and work together to reopen the province. These guidelines have been updated with the recent emergence of a highly transmissible variant in the province, Omicron.

In addition to reviewing and implementing recommendations set out in this guide, employers and workers in Ontario have certain duties and rights under the Occupational Health and Safety Act (OHSA) and its regulations. Employers should also review and follow any applicable directives and guidance coming from the Chief Medical Officer of Health, the Ministry of Health, or the Local Health Unit.

Delivery of Service Considerations

In light of the rapid growth in COVID-19 cases in Ontario being driven by the Omicron variant clinics should consider offering services curbside wherever possible to reduce the risk of infection and spread. However, clinics are encouraged to continue to perform their own risk assessment when determining how they would like to offer services to their clients. These clinic-specific considerations include:
- Vaccine coverage (full vaccination with three doses) in the area
- Vaccine coverage in clinic personnel
- Variant of concern (VOC) dynamics in the area (i.e., Omicron cases)
- Ability to optimize infection control practices and ventilation, as discussed below
- Risk aversion
- Risk status of people in the clinic (e.g., presence of staff who are at increased risk of severe disease or that cannot be vaccinated for medical reasons)
- Ability to use hybrid measures to reduce overall numbers of people that enter the clinic

More details are provided in respective sections of this document, but an overview of key considerations is provided below.

The Three C’s

There are three main components that drive risk and that can be evaluated in veterinary clinics.

1) Closed spaces (with poor ventilation)
2) Crowded places
3) Close contact

Veterinary clinics should assess their overall clinic operations, considering the risks posed by these and ways to mitigate them. For example, a small examination room (closed space, potentially poorly ventilated) with veterinary personnel and owners (crowded place) who are in close proximity and talking (close contact) creates increased risk. Ways to mitigate that would included not allowing clients into the building, or if they are allowed in the building, not congregating with them in the examination room (or elsewhere). If clients are admitted directly to the examination room but the patient is quickly retrieved, evaluated by clinic personnel in another area and discussions are performed by phone or a more distanced conversation (e.g., clinician at the doorway, with the door open for ventilation), risk is mitigated. Improving ventilation and adding a HEPA filter to the examination room would further reduce the risk, all while maintaining relatively normal patient care and clinic operations.

Limiting Numbers

Minimizing the number of people in the clinic at any given time and overall will reduce the risk of an infected person entering the clinic, reducing the risk of close contact between people and facilitate distancing and other control measures. With the high transmissibility rate of the Omicron variant, clinics should consider offering curbside service wherever possible to reduce risk. Telemedicine appointments can also be considered to aid in client communication and patient care delivery.

If client entry is necessary, limiting in-clinic visits to a single owner, whenever possible, can also reduce the person-burden on the clinic.
Outdoor Activities

When possible, based on patient and pet owner issues, clinical needs, weather and availability of secure space, outdoor activities should be encouraged. This could include patient care and clinical operations (e.g., telephone calls, breaks, meetings). Issues of patient containment, pet owner comfort, staff comfort, client confidentiality and ability to provide equivalent care must be considered when choosing outdoor activities, but shifting some activities outdoors reduces the pressure within clinics. Pet owners can also be encouraged to wait outside after checking in, while their pet is being examined without them or any other time where their presence is not actively required, to avoiding congestion in the waiting area.

Clinic Occupancy Limits

As public health measures vary over time, business capacity limits change. It is important to remember that differences in clinic design and flow impact risk, and maximum numeric capacity may be more than is reasonable for clinics (e.g. clinics with small reception areas and limited examination rooms, so clients are concentrated in a small space).

The main expectation from the government is that businesses, including veterinary practices, **minimize the number of people in a facility at any given time to reduce further spread of COVID-19**. Veterinary practices will need to ensure staff and clients are able to maintain the 2-meter social distancing requirement throughout all spaces of the practice.

Maximizing Distancing

Maximizing distancing between people, both staff-staff and staff-client interactions, is important to maintain. This requires consideration of person flow within the clinic, how client visits are handled (e.g. are exam rooms used for appointments or do clients wait in an exam room while the patient is examined by clinical staff in a separate area). While 2m (6ft) distancing was focused on early in the pandemic, it is clear that this is not an absolute limit and airborne transmission can occur over greater distances. Risk decreases with greater distance but is still present with separation greater than 2m. Therefore, it is not an issue of distancing OR use of other measures (e.g. mask, ventilation), it is a matter of using distancing as much as possible ALONG with those measures.

Limit Contact Times

Risk increases with time of contact. There is no specific cut off, despite the 15-minute guidance that was used early in the pandemic. Short contacts can result in transmission of SARS-CoV-2, especially some VOCs. Contact times can be reduced by hybrid appointments (see details below), focus on efficient delivery of care and improving flow within the clinic to avoid personnel or client bottlenecks.
Physical Barriers

Plexiglass barriers are commonly used in retail settings yet there are concerns about the efficacy. Plexiglass barriers will provide protection from face-to-face interactions. However, they may also disrupt ventilation, creating additional risks. Areas with substantial plexiglass barriers could create high risk zones where an infected person could produce a dense ‘cloud’ of infectious virus that is not dispersed by ventilation, and which could pose a high risk to anyone else in, or entering, that zone.

Vaccination

Effective vaccination is a core component of COVID-19 control. Variants such as the Omicron are more transmissible, and three doses of the vaccine provide the best protection. Vaccination status, including ensuring three doses have been obtained, when possible, is a key component of clinic risk and control. For more detailed information on vaccinations, please see page 4-5.

Staff and Client Screening

As has been prominent since the start of the pandemic, syndromic screening of all people entering the clinic will remain a core control measure. Staff or clients with clinical signs suggestive of COVID-19 should not enter the clinic. This can be complicated during allergy season, but a cautious approach should be taken, as in-clinic exposures have occurred when staff dismissed signs as worsening of allergies.

In Room Air Filtering

HEPA filtration can reduce the amount of SARS-CoV-2 in the air and be a useful adjunct to ventilation. It is of particular use when ventilation is suboptimal and cannot be improved, as well other higher risk situations (e.g., closed spaces, small spaces, crowded environments). Filtration should not be used in lieu of other measures but should be considered, particularly for crowded areas, areas where close contact is unavoidable and if ventilation is suboptimal.

Ultraviolet-C (UV-C) light can inactivate SARS-CoV-2 and portable in-room systems can also be considered. However, less is known about the efficacy of these products and there is probably significant variation in effectiveness between commercial products.

Masks

Mask use is still mandated as per provincial guidelines. Due to the high transmissibility of the Omicron variant N95, KN95, FFP2 or equivalent masks are recommended. Where N95 are not available, a tightly fitted medical mask is the next best choice. Fit testing of N95 or equivalent masks is ideal but is not required and a non-fit-tested N95 (or equivalent) should still offer much superior protection than a medical mask. Cloth masks should NOT be used apart from potentially being used over a medical mask to provide a tighter fit of the medical mask.
Rapid Antigen Testing

Use of rapid antigen tests (RATs) is an important infection control tool that should be widely implemented where tests are available. Understanding the strengths and weaknesses of RATs is critical. RATs perform well for detection of relatively high viral loads that are present when a person is infectious. They do not detect low viral shedding, but that is of limited concern because people with low viral burdens pose limited transmission risk. RATs provide information about the current status, and this can change quickly. RATs do not guarantee that a person is not infectious (or will not become infectious shortly after testing is done) but a negative result provides reasonable assurance that the person does not currently pose a risk to others. Positive RATs indicate a very strong likelihood of active infection.

There are two main approaches:

1) **Test to stay:** In this approach, people are tested prior to work (ideally at home) to determine whether they can attend work. This can be done routinely (e.g., every day) or targeted towards higher risk times (e.g., after the person has travelled or had some other high-risk activity or exposure) or personnel (e.g., locums). If negative, the person is not deemed ‘non-infectious’ but is best considered ‘lower risk’. All regular infection control measures are still needed. If positive, the person should not attend work and should follow the direction of the local public health unit for following testing and isolation.

2) **Voluntary sporadic screening:** This approach involves testing some or all personnel on a routine but intermittent basis (e.g., Monday and Thursday), not targeting higher risk people or situations (or in conjunction with that).

RATs are not mean to indicate that a person with clinical signs or symptoms that could be attributable to COVID-19 are allowed to come to work. People with symptoms suggestive of COVID-19 should remain at home, regardless of RAT results.

Vaccinations

The Ontario government has expanded eligibility for a COVID-19 booster vaccine to all individuals aged 18 and over. Three doses of the vaccine offer the best protection against infection and severe illness.

Can a Mandatory Staff Vaccination Policy Be Used?

Many sectors in the province are now implementing mandatory vaccination policies. A vaccination policy for clinic staff is advisable given an employer’s obligation to take all reasonable precautions to protect the health and safety of their employees. However, the content of each policy will vary depending on the nature of the workplace. Should a clinic wish to implement a vaccination policy this [template](#) can be tailored to a clinic’s specific circumstances.
Considerations and appropriate accommodations must be provided for valid exemptions under the Ontario Human Rights Code (i.e., a valid medical exemption).

The requirement of a mandatory vaccination policy is a difficult question as there are many competing interests. On one hand, there is an obligation for employers to provide and maintain a safe work environment. On the other hand, employees may be entitled to refuse compulsory vaccinations on a number of grounds including, but not limited to, the:

- nature of the workplace;
- lack of a contractual obligation;
- privacy and the obligation to disclose certain medical information;
- concern about vaccine reactions;
- discrimination pursuant to human rights legislation, including sex (including those who are pregnant), a documented disability, and a religious belief, creed, or conscience objection; and/or
- Canadian Charter of Rights and Freedoms (Section 7 – Security of the Person).

Unfortunately, there have been cases of discrimination against those with differing views of the pandemic and of vaccinations. Practice owners and managers should be mindful of any pandemic-related harassment of an employee by other staff. It’s the responsibility of the employer to ensure a safe and healthy (physical and mental) workplace. If you haven’t done so already, ensure that you implement a workplace violence and harassment policy (which is mandated by the Ministry of Labour). For more information and templates, visit OVMA’s website: [Workplace Violence and Harassment web page](#) and [OVMA Member Kit: Understanding Your Obligations](#).

**Do Staff Have to Continue Masking and Social Distancing if All Staff Have Been Vaccinated?**

Currently, there is a legal requirement for mask use in workplaces, irrespective of vaccination. While current vaccines are highly effective, they are designed mainly to prevent severe disease. The appear to have reasonable protection against viral shedding but this is far from complete, and some vaccinated individuals can become infected and shed the virus, even if they do not get sick.

**Do Clients Still Have to be Masked and/or Practice Social Distancing if They are Vaccinated?**

As above, there is a legal requirement for mask use in workplaces, irrespective of vaccination. Vaccination of clients will significantly reduce the risks they pose to clinic personnel, but risks will not be eliminated.
What Happens if a Client Doesn’t Want to Wear a Mask Because They are Vaccinated?

Exemptions to legally mandated mask use do not include vaccination. It is the duty of the workplace to ensure compliance with mask use requirements.

Time Off Work for At-Risk Employees

One of the keys to protecting a practice from a COVID-19 outbreak is to ensure that any employees who have COVID-19 symptoms or who have had close contact with someone who has tested positive for COVID-19 stay away from the practice. The best way to encourage employees to stay home when advisable is to limit the cost to the employee in terms of lost wages, when they are absent from work.

Employees who are unable to work due to required self-isolation or who have fallen ill due to COVID-19 could be eligible for $500 per week for up to two weeks under the Canada Recovery Sickness Benefit which has been extended to May 7, 2022. For more information, go to https://www.canada.ca/en/revenue-agency/services/benefits/recovery-sickness-benefit.html.

Employees who are taking care of a child under 12 years of age or a family member with a disability may be eligible for the Canada Recovery Caregiving Benefit which has been extended to May 7, 2022. The benefit provides $500 per week for up to 38 weeks per household. For more information, go to https://www.canada.ca/en/revenue-agency/services/benefits/recovery-caregiving-benefit.html.

The Ontario COVID-19 Worker Income Protection Benefit allows employers to be reimbursed for the amount of infectious disease emergency leave pay that they paid to their employees, up to $200 per employee per day taken. For more information go to https://www.ontario.ca/page/covid-19-worker-income-protection-benefit.

Many practices are also choosing to provide paid sick leave for employees exhibiting COVID symptoms, or who have had close contact with someone who has tested positive for COVID-19. Practices are encouraged to review their current sick leave policy to determine how they will handle employees who may develop COVID-19 symptoms or who have close contact with someone who has tested positive for COVID-19.
General Concepts

Measures to reduce risk include:

- Limiting the number of people that enter the clinic (maximizing care that does not involve the client entering the clinic)
- Limiting the number of people that are in the clinic at any given time
- Limiting contact between animal owners and clinic personnel or other owners
- Minimizing the duration of contact between animal owners and clinic personnel
- Minimizing or avoiding contact in closed spaces
- Maximizing the use of physical barriers (e.g., plexiglass shields)
- Maximizing the use of personal protective equipment (e.g., masks)
- Physical distancing
- Cleaning and disinfection
- General infection prevention and control
- Evaluating clinic personnel interactions (e.g., ‘clinic bubbles’)
- Maximizing ventilation

SARS-CoV-2 Infection in Animals

Thorough discussion of SARS-CoV-2 infection in animals is beyond the scope of this document; however, a few important points must be considered.

- Human-pet transmission may be relatively common in households.
- Most infected animals likely have clinically inapparent infections.
- Cats can develop a range of (usually mild) respiratory tract or GI manifestations. Dogs seem to be resistant to clinical disease but may have mild disease (e.g., transient anorexia and depression).
- Cat-cat transmission can occur, so cat-human transmission should be considered possible.
- Dogs are less effective hosts and, when infected, likely pose a much lower transmission risk than cats.
- Ferrets are likely quite susceptible to infection, and presumably pose some risk of zoonotic transmission.
- Common livestock species appear to be minimally susceptible or non-susceptible.
- Susceptibility of horses is unclear.
- Mink are of particular concern because of their susceptibility, ability to transmit the virus back to people and the potential for mutation of the virus with widespread transmission on farms.
- Wildlife susceptibility is variable and inadequately understood. Most urban wildlife species seem to have limited susceptibility but some (e.g., deer mice, deer) can be infected and transmit the virus.
Allowing Clients in the Practice

As we face this new wave and exponential growth in COVID-19 cases in Ontario being driven by the Omicron variant, limiting the number of people in the clinic is a key control strategy. There is a need to balance patient care, client satisfaction, clinic efficiency and COVID-19 control, something that is a challenge. Ideally, the default should continue to be to use curbside drop-off, with client access to the clinic considered on an as-needed basis. This will reduce the risk through reducing in-clinic contacts and is also critical for other control measures such as direct admission to exam rooms (which require fewer people in the clinic if normal caseloads are maintained).

A common question is, ‘how do I know when it is safe to allow clients into clinic?’ There is no definitive answer to that question. “Safe” is subjective and a moving target and gradations of risk will be present. The more prolonged and closer the contact, the greater the risk. Having a client in the clinic is riskier than having them outside. The epidemiology of disease in the area will impact risk, and that is a dynamic situation. While the odds of any client being infectious are low, the risk is not zero, and measures should be in place to reduce the risk to clinic personnel and other clients.

The decision concerning whether to allow clients in the clinic for patient visits should be informed by:

- The epidemiology of COVID-19 and variants in the local area (see your local public health unit website for the current case count);
- The extent to which the layout of the practice and COVID-19-related enhancements (e.g., plexiglass barriers, six-foot decals on the floor) allow for appropriate social distancing;
- Practice staff’s comfort level with having clients in the clinic practice; and
- Whether effective alternative approaches are available.

If the practice decides to allow clients in the clinic for patient visits, it may choose not to do so for all visits. The following limitations may be considered:

- Restricting the number of clients attending the appointment with an animal. Attendance of a single owner should be encouraged (or mandated) for routine visits.
- Limiting client visits to instances where it is necessary for the owner to make a patient care decision (e.g., clients would not be allowed in the practice for routine wellness exams).
- Limiting hospital visits only to compassionate situations (e.g., pre-euthanasia).
Whenever a client is allowed in the practice:

- Ensure the client has self-screened and has no signs or symptoms suggestive of COVID-19.
- Require the client to wear a mask.
- Upon entering the practice, hand sanitization stations need to be available for client use.

In-clinic client visits should still be discouraged for product pick-up. If clients are allowed into the clinic to pick up product, clients should be required to call upon arrival to ensure the product is readily available and that there is no reception congestion. If there will be a delay in preparing the product or if the reception area is at capacity, clients should be instructed to wait outside until called, so that the time in the clinic and number of people in the clinic can be limited.

Identification of High-Risk Clients

Querying the health status of animal owners prior to them attending a veterinary practice should remain a standard practice. While this does not assure that encountered individuals are not infected, because of asymptomatic, paucisymptomatic (very mild disease) and pre-symptomatic infections (shedding of SARS-CoV-2 prior to the onset of disease), it will identify a subset of higher risk situations. This will enable decisions regarding whether the appointment should be rescheduled or whether additional protective measures and approaches should be used. As the epidemiology of disease evolves over time and as other activities such as travel restart, the specific approach to querying health status may similarly evolve. The key aspect is having a structured approach to query the risk status of any person that will enter the clinic and every pet’s household contacts. Currently, this focuses on whether people have signs and symptoms potentially attributable to COVID-19.

Monitoring Temperatures

Routine testing of body temperature through distanced methods (e.g., infrared forehead temperature sensor) is used in some facilities; however, fever is a poorly sensitive indicator of COVID-19. Further, hot, or cold environmental temperatures can influence skin surface temperature screening. Temperature screening can be considered but does not replace any other precautions. Lack of fever cannot be taken as an indication of lack of risk of infection and temperature monitoring is a generally ineffective screening tool.

Client Communication

To reduce the likelihood that a client becomes upset because they cannot enter the practice or because they have a different experience in-clinic:

- Inform all clients of the rising cases of COVID-19 and Omicron variant in the province
- Inform all clients about the practice’s policy regarding in-clinic visits by broadcast email or text message, if possible.
- Let individual clients know whether they will be allowed in the practice prior to their arrival. This should be done when the appointment is confirmed and when appointment reminders are provided, whether by phone, email or text message.
If clients are allowed in the clinic, inform them about any measures they must take (e.g., wear a mask, complete a self-screening assessment).

Appointment Only

The current provincial recommendation indicates that veterinary care should be delivered by appointment only. Predictability is important to maintain flow and distancing. People that arrive without an appointment (for veterinary care, purchases or other reasons) can disrupt measures taken to minimize the number of people in the clinic and structured flow. This does not mean everything must be scheduled well in advance. Emergency patient care and spontaneous visits (e.g., last minute food purchases) can be facilitated; however, having clients call first allows staff to be prepared and to alter client arrival times, as needed (e.g., “Our reception area is at capacity now, but if you arrive in 15 minutes you can pick up your pet’s food”).

Clinic Entrance

- Signage should be placed indicating relevant practices (e.g., when/how to enter, hand hygiene requirement, mask requirement, physical distancing requirements, indication to not enter the building if sick, telephone/text information to contact clinic personnel from outside).
- A hand hygiene station should be positioned at the door.
- If use of a mask by clients entering the building is required (as is recommended), masks can be made available for clients that arrive without one. This could include disposable non-medical masks or re-usable cloth masks. If re-usable masks are provided, clean masks should be in individual sealed bags to indicate they are clean and prevent cross-contamination. A receptacle for used cloth masks for re-processing should be placed at the exit. If disposable masks are used, a garbage container should be placed at, or just outside, the door.
- Controlled entrance (e.g., locked door with buzzer access controlled by reception) should be considered to control numbers of people in the reception area.

Reception

- Reception areas should be viewed as processing areas, not ‘waiting rooms’. Congregation of people in reception areas should be minimized.
- Maximum occupancy of the reception area should be determined based on the realistic likelihood of people maintaining a 2-metre distance between each other and clinic personnel.
- Room use and layout should be reviewed, including moving seating areas to facilitate 2-metre distancing between clients, and between clients and staff.
- Consideration should be given to installing clear partitions in reception areas to protect front office staff.
- Floor signage should be considered to maintain distancing while waiting in reception areas. This could consist of signs (e.g., footprints) indicating where to stand while waiting.
- Room design should be evaluated and, if needed, altered, to facilitate client flow, with a goal of maintaining a consistent, one-way flow, preventing unnecessary contact of client
with staff and other clients. This can include creating central barriers or displays to disrupt open concept areas, use of crowd control ropes/belts to direct flow.

- Magazines, toys, and other items that might be handled by multiple people should be removed.
- Mandatory mask use by clients is recommended. Personnel must facilitate this by requiring that clients wear masks properly in the clinic.
- The number of staff working at reception should be minimized. If more than one person is required, 2-metre distancing should be arranged.

Examination Rooms

High risk situations for SARS-CoV-2 transmission involve spending time with people in close spaces, with talking or other activities that produce droplets (e.g., yelling, coughing). Examination rooms should be considered high risk areas, because of the typically small space, inability to maintain 2-metre distancing, potential for owners to get close to personnel (e.g., stepping in to help restrain an animal) and talking that inevitably occurs. If clients are allowed in the clinic with their pet, time spent with clinic personnel and owners in examination rooms should be minimized. Examination rooms are ideally client waiting rooms, whereby the client comes in with the animal, most discussion has already occurred by phone or electronically, the pet is taken to a treatment area for any procedures, and the pet is then returned to the client. If the pet and client must remain together, clients should wear a mask and be instructed to stay back. Providing a chair or indicating a standing area through floor signage should be considered. Clinic personnel should be available for restraint so that clients do not have (or feel the need) to approach personnel during patient care.

Streamlining Owner/Patient Processing

Activities that occur in reception and examination rooms should be reviewed to identify those that can be done remotely. Some, such as patient registration, can be done prior to the owner’s arrival, limiting the need for the owner to enter the clinic or the time that they must spend in the clinic. Other considerations might include billing and obtaining informed consent, which can potentially be done before or after the visit.

The overall goal should be to minimize any time spent in the clinic not actively engaged in a necessary process. This can improve clinic efficiency and owner satisfaction, while minimizing the number of people in the clinic. This can improve overall clinic function and optimize the ability to maintain normal patient caseload numbers by avoiding bottleneck situations where delays occur because reception areas are at maximum occupancy or examination rooms are occupied by waiting clients.
Alternate Service Delivery

Methods to reduce the need for in-person contact with clients and animals will need to be emphasized for the foreseeable future.

Telemedicine

Having an animal visit the clinic or a veterinarian visit the farm or household will be necessary in many situations. However, telemedicine should be approached as the default method to deal with a patient or farm question. A triage approach should be used, whereby telemedicine options are considered first, and in-person visits are used when telemedicine is not appropriate. Veterinarians should remain apprised of College of Veterinarians of Ontario (CVO) guidance on telemedicine.

As an alternative to allowing clients in the building, practices may offer clients the ability to view and participate in the patient visit while they wait in their car via Facetime, Skype or a dedicated telemedicine application.

Hybrid Appointments

There are many situations where telemedicine cannot be used as the sole approach but could still be an effective means of limiting client contact during an appointment. For example, a new puppy appointment could be first conducted via telemedicine, to obtain the history and discuss various issues. This could be followed by a shorter clinic visit for physical examination and vaccination. Since the discussion was already had, the animal’s visit could effectively be performed without the owner present in the clinic.

Food/Medication Delivery

Measures to reduce the need for animal owners to come to veterinary practices are important, irrespective of measures that are used to minimize contacts during those visits. Methods to ship or deliver food, medications and other supplies should be used, when possible. This is particularly important for clients at increased risk of being infectious and clients at increased risk of complications or severe disease, should they be exposed.

Food/Medication Pickup

As per physical distancing recommendations, when clients must visit a clinic to pick up food, medication or other supplies, approaches to prevent or limit contact should be used. Curbside pickup with pre-order and pre-payment has been widely adopted by many businesses and can be easily performed in veterinary medicine. Contact-free procedures (e.g., placing the items in the client’s trunk while they remain in the vehicle, placing items on a table for clients to pick up) are feasible in most situations.
Practice Visitors

A visitor policy should be created for each clinic. If possible, visits should be done virtually. However, some visits may be important for clinic function (e.g., repairs, continuing education) or for the broader profession (e.g., veterinary and technician student placements, pharmaceutical reps). However, there is always some inherent risk associated with entrance of any new person.

Considerations for short term visits include:
- No drop-in visits should be allowed. Visits should be by appointment only.
- The time and location of the visit should be clearly described.
- Visitors should self-screen for signs and symptoms of COVID-19 on the day of visit.
- Visitors should be admitted directly to the location of the visit and should avoid taking up space in reception areas.
- PPE requirements should be determined. Mask use by visitors is recommended.
- Visits should be structured so that a 2-metre distance is maintained.
- A visitor log should be maintained for contact tracing purposes. The log should include visitor name, contact information, date and time of their visit and purpose of their visit.

All the above cannot apply for longer term visits (e.g., student placements). Long term visitors likely pose increased risk because of the longer time in the clinic and closer contact with clinic personnel. More scrutiny can therefore be applied to their risk and health status. People from areas with increased rates of COVID-19, people that have not practiced responsible social distancing and people that have recently travelled may pose higher risks. Clinic practices can limit the impact of those, such as through prioritizing people from the same area, interviewing to develop confidence in the person’s social distancing efforts and to outline clinic requirements. If longer term visitors are coming from higher risk situations, a 14-day period away from the clinic after arrival could be considered.

General Infection Prevention and Control

Ensuring Physical Distancing

Social/physical distancing is critical and is likely the most important and effective approach to COVID-19 control. The overall goal of social distancing is to reduce human-to-human contact, both by reducing the incidence of contacts and reducing the closeness and duration of any required contacts. This includes contacts with clients, farm personnel, delivery personnel, clinic personnel and anyone else that might be encountered. Specific application can vary in different veterinary situations, but the same principle remains; use of basic measures to maintain separation of 2-metres from others. With that, and droplet reducing measures such as cough etiquette, transmission risks can presumably be markedly reduced.

Distancing of clinic personnel within the clinic must be maintained. This can include:
- Emphasizing the importance of 2-metre distancing whenever feasible.
- Advanced planning and provisioning for procedures that will require close contact (e.g., blood collection, catheter placement) to minimize the contact time.
- Efficient performing of procedures that require people to be in close contact.
- Reviewing scheduling practices to avoid waiting area congestion.
- Reviewing clinic layout and operations to facilitate separation (e.g., seating arrangement in reception areas, offices, meeting/break rooms, separation of procedure or treatment areas in common treatment rooms).
- Maintaining some use of curbside drop off and pickup (animals and supplies) to facilitate limiting the number of people in the clinic.

An additional consideration is distancing from other people that may visit the clinic, such as couriers. A clinic-based approach to receipt of goods should be in place to minimize contact and protect staff. This can include having contactless deliveries made by depositing goods inside a door with no one around or dropping items off outside the clinic. Signatures should be avoided as much as possible, and masks worn for any required contact. Good hand hygiene practices should be used after contact with items handled by external individuals.

Distancing from animal owners is critical, as owners pose the greatest risk of SARS-CoV-2 exposure. Measures to reduce or prevent owners from entering clinics will continue to be a key control measure, and many of those are discussed above. Additional or related approaches include:

- Contactless patient drop-off and return through leaving carriers or attaching leashes to secure hooks in unoccupied entrances.
- Documentation of verbal consent rather than requiring signatures.
- Using contactless electronic payment whenever possible.
- Altering owner and personnel flow within the clinic.
- Altering waiting room layout (if people are allowed to wait), such as reducing and spacing seating.

Hand Hygiene

Hand hygiene should be encouraged for personnel, clients, and visitors. A key aspect of this is ensuring that hand hygiene supplies are present throughout the clinic, including at the entrance and any areas where staff and owners may mix. Alcohol based hand sanitizers and hand washing are equally effective; however, hand sanitizers are easier to add throughout the clinic. Hand sanitizers should be at least 70% alcohol.

Personal Protective Equipment

Proper use of PPE is an important aspect of COVID-19 control and will remain so for some time. Personal protective equipment is used for two main purposes - to protect the user, and to protect others from the user. With the increased transmissibility of the Omicron variant, N95 masks or equivalent respirators are recommended for clinic staff.
The goal for PPE use (protection of, or protection from, the user) is critical to consider when deciding what PPE to require and when to require it. While the field efficacy of routine cloth masks for prevention of COVID-19 transmission is unclear, routine mask use is increasingly common and is a reasonable consideration in veterinary situations. These are used to reduce the spread of droplets from the wearer. Therefore, they are a population protection measure, and for effective use within a population (e.g., veterinary clinic, on farm), they must be worn by all personnel.

**Routine use of masks in clinics, in vehicles and on farms, even when outdoors, is strongly recommended and is legally required in workplaces, apart from specific situations (e.g., when eating or drinking, while maintaining distancing).** Masks will reduce the risk that an unknown infected person will infect others. In a clinic situation, where contacts might be unpredictable, it is recommended that cloth/non-surgical masks be worn by all clients that are in the clinic, and by all personnel apart from times when they can be assured that they will not potentially pass or share an airspace with others (e.g., alone in an office). Face shields offer some protection from a user’s droplets, but less than what is provided by a mask. Face shields should be reserved as the sole PPE item for people that cannot wear a mask for health reasons.

While cloth/non-medical masks are mainly intended to protect *from* the user’s droplets, they offer some degree of personal protection. Face shield or goggles offer an additional level of personal protection and can be approached as an elective additional tool for people at increased risk of severe disease or that are particularly concerned about exposure. Mandatory use of additional protection should as a face shield or goggles (with a mask) can be considered for situations where close contact is required, especially if contact might be prolonged and associated with higher risk activities (e.g., talking, struggling to restrain a patient). Examples may include placing an intravenous catheter in a patient, where the person placing the catheter and the person restraining may be in very close contact and be talking to one another, creating aerosols with limited distancing options.

There are no standard approaches to routine PPE use, and clinics should develop their own specific practices. Suggested approaches are outlined in Appendix B.

### Animals as Fomites

While there was concern about the role of surfaces in transmission of SARS-CoV-2 early in the pandemic, surfaces and objects appear to play little role in the epidemiology of COVID-19. While there is the potential that an actively infected person could deposit viable virus on an animal’s haircoat, persistence of viable virus on the haircoat is expected to be of short duration. Hand hygiene, glove use and other routine infection control practices would reduce the risk. Screening owners for higher risk situations (households with active or suspected COVID-19 in people) and use of enhanced barriers in those situations to reduce the risk of exposure from an infected animal would be equally effective at mitigating any risk from haircoat contamination. While not contraindicated in most situations, wiping an animal’s haircoat with an animal-safe biocide is not recommended as a routine practice.
Facility Management

There are a variety of ways that practices can reduce the likelihood of disease transmission through effective facility management.

Clinic Flow and Barriers

Overlapping flow of owners and clinically personnel is not typically a major consideration in clinic design. As a result, there are often various common contact points of bottlenecks that increase client-staff and client-client contacts. While major infrastructure changes are impractical in most facilities, there are potential options to modify movement and facilitate distancing.

Clinic layout should be reviewed with respect to clinic flow. Ideally, clients enter and flow through the clinic in a specific manner, never having unintended exposure to clinic personnel or crossing paths with other clients. This can be facilitated through means such as one-way flow through reception areas or having clients exit through a side/back door. Completing all visit activities, including dispensing and billing, while the client is in the examination room should be considered to facilitate flow, minimize reception area congestion and facilitate clear planning of reception area occupancy (e.g., avoiding unexpected return of clients to the reception area to wait for something).

Physical barriers can be used to reduce droplet transmission (e.g., plexiglass shields), enforce distancing (e.g., barrier preventing clients from getting close to reception desk personnel) or modify flow (e.g., re-arranging furniture, use of rope barriers to modulate traffic flow). Signage can be used to designate standing and waiting areas, and the maintain distancing in lines or from stationary personnel (e.g., reception). Clinic procedures such as modifying where clients are greeted, how they are flowed through the clinic and where they wait can be designed to minimize contacts. There are no standard specific approaches because of the marked variation in clinic design but virtually any clinic can make physical or procedural alterations to improve flow and contacts. However, the use of barriers must be considered in the context of ventilation. There is evidence that plexiglass barriers could increase the risk in some situations, likely because they reduce ventilation and allow for accumulation of infectious clouds. Plexiglass barriers at reception desks probably provide useful protection for clinic staff from transient client contacts. However, if there are multiple personnel in the same area behind the barrier(s), their risk could be heightened if ventilation in their area is reduced. Similarly, if barriers impact effective ventilation of the client area, risk to clients and personnel that enter that area could be enhanced. Overall, plexiglass barriers are probably useful in most situations but are best when ventilation is still optimized and where no more than one person works behind the barriered area.

Cleaning and Disinfection

Routine cleaning and disinfection practices are adequate for inactivation of SARS-CoV-2. Any routine disinfection will be effective, but those with shorter contact times and less inhibition by
organic debris are preferred. The main issue pertaining to disinfection is ensuring that it is done properly.

In addition to routine clinic cleaning and disinfection, increased attention should be focused on common human hand contact surfaces, particularly those touched by many different people (e.g., areas that clinic personnel, animal owners and visitors such as couriers may all touch).

There is no standard approach for the frequency of disinfection, but a general concept is that more commonly touched sites should be disinfected more frequently. Disinfection of high-touch areas multiple times per day is reasonable.

Disinfection duties should be specifically assigned to facilitate compliance. Measures to record disinfection (e.g., wall sign-off sheet) of highest risk areas should be considered, as are commonplace in areas like public restrooms. They also provide an indication to clients of the measures that are being taken to protect them.

Commercial systems that can disinfect empty rooms are available and are being aggressively marketed in some areas. These systems can use disinfectant aerosols or vapours or emit UV-C light. These will effectively disinfect areas that are reached (e.g., UV-C cannot kill contaminants that are shaded from the light source). They can be effective environmental disinfection tools but for routine veterinary clinic use probably offer limited benefits over good routine cleaning and disinfection and UV-C is potentially harmful if not used properly. They are reasonable to consider but should be approached as a supplemental tool that is used periodically (e.g., end of day, weekly), not as a replacement for routine practices. Currently, CDC only recommends chemical disinfectants.

Ventilation and Air Management

Ventilation is increasingly being recognized as a critical and often overlooked control too. Clinics should optimize ventilation, as is discussed in more detail below. Increasing airflow, the HVAC systems, opening windows, opening doors within the clinic, and using fans is likely a critical protective factor.

Risks are highest within closed spaces with poor ventilation, can reduce dispersion of infectious droplet clouds and facilitate accumulation of aerosols. The increased transmissibility of new VOCs heightens this concern, creating increased risk over longer distances and shorter times. Ventilation standards are not clear, but it has been suggested that the risk of transmission is low if ventilation can be maintained at 8L/person/second, while risk is high if flow is <3L/person/second. Maximizing flow rates while minimizing use of recirculated air should be the goal. This can be challenging with some ventilation systems and reducing re-circulated air can be particularly difficult in some climates. However, the concept of ‘more is better’ clearly applies to airflow. Regardless, clinics should aim to increase ventilation of increase dispersal of any infectious aerosols that have been created by an infected person. This can include opening windows, avoiding closing doors within the clinic except when required (e.g., surgery), increasing

CO2 Monitoring

CO2 monitoring should be implemented where possible to evaluate a clinic’s ventilation quality. CO2 levels reflect the presence of individuals (human or animal) in an airspace and dispersion of the CO2 that they produce. Low-cost CO2 monitors can be obtained to evaluate ventilation in a clinic. Outdoor air is typically ~400 ppm. Indoor air in a highly ventilated space can have similar CO2 levels; however, well ventilated areas may have moderately higher CO2 levels (e.g., 600 ppm). Greater than 1000 ppm CO2 indicates poor ventilation. The goal should be to minimize CO2 levels, within reason, maintaining all areas well under 800 ppm (ideally <600 ppm). If CO2 is 800-1000 ppm, mitigation measures such as improving ventilation are needed. If CO2 is >1000 ppm, this indicates a high-risk status that should be immediately addressed through marked improvement in ventilation and reduction of numbers of people in the area. Addition of HEPA filters should be considered anytime, but particularly in areas where CO2 is >600 ppm. CO2 monitoring can identify the current status of a facility, identify higher risk areas within the facility that need specific attention and evaluate the impact of changes (e.g., opening doors or windows, use of fans, changing HVAC settings).

Air Filtering and Treatment

In-room HEPA filters are readily available and can reduce viral loads in the air. These are particularly useful when there are undesirable components of the ‘3 Cs’, (small spaces, poor ventilation, rooms where many people are present, rooms where higher risk activities occur such as talking). They may be particularly important when ventilation is poor and/or in areas where masks are temporarily removed (e.g., lunch/break rooms). Above room UV-C or HEPA systems (mounted within the room, above head level) may also be useful but are more complex and expensive.

There is no evidence that in duct systems (e.g., UV light, HEPA filters) are necessary. Similarly, systems that can be used in rooms after people vacate (e.g., UV-C) are not likely effective over routine surface cleaning and disinfection, and active in-room filters.

Staff Management

Because of the prolonged close contact that occur, inter-staff transmission of SARS-CoV-2 is a significant concern, and numerous clinic outbreaks of COVID-19 have been encountered. In human healthcare, it has been suggested that more occupational infections of healthcare workers occurred in common (e.g., lounge, office) areas than from patient care, highlighting the potential for transmission between personnel, particularly when preventive measures are relaxed in non-patient-care areas. This supports the need for continued measures to distance and protect from other clinic personnel, not just clients. Physical distancing is a key component. When full distancing is not possible, steps can be taken to minimize the frequently and duration
of close contacts. Routine use of non-medical masks by staff is encouraged to reduce inter-clinic transmission.

There are a variety of ways that staffing can be reorganized to reduce the likelihood of disease transmission.

Minimizing Clinic Staffing

Reducing the number of people in the clinic at any time facilitates physical distancing by reducing the number of potential contacts and making distancing and flow measures more practical. Where possible, personnel should work at home. This could include telemedicine, time spent doing client follow-up calls and various practice management activities.

Cohorting

An individual who has been in close, prolonged contact with an infected person may be required to self-isolate. When feasible, measures should be taken to reduce the number of different contacts within veterinary practices. This is not usually possible but when it can be implemented, it should be considered to reduce the number of different human-human contacts and reduce the potential impact of an infected person in the clinic.

Self-Monitoring

Self-monitoring by all veterinary personnel is a critical tool to reduce intra-clinic and veterinary-client spread of SARS-CoV-2. Personnel must be cognizant of their health and err on the side of caution if they may be ill. The signs and symptoms of COVID-19 (e.g., fever, cough, chills, sore throat, vomiting, diarrhea) are similar to other illnesses, including the cold and flu, which complicates matters. However, personnel with symptoms related to cold, flu or COVID-19 be sent home and/or not be allowed to visit farms, households or facilities. People with signs or symptoms potentially compatible with COVID-19 should use Ontario’s online self-assessment or call Telehealth (1-866-797-0000) or their primary healthcare provider.

Exposed Personnel

The approach to exposed personnel may vary and guidance is provided via Ontario’s online self-assessment and the local Public Health Unit. The type of contact, duration of contact, vaccination status and use of masks (and mask type) or other preventive measures may influence recommendations. Contact with local public health is required to clarify the need for self-isolation and recommended testing.

Infected Personnel

Infected personnel must self-isolate as directed by their local Public Health Unit.
Impact of Infected Employee on Practice

Several OVMA members have asked, “Will I have to close my practice if a staff member becomes infected?” Although there is no one-size-fits-all answer to this question businesses are not being asked to close just because they have an infected employee. If a staff member becomes infected, contact your local health unit. The health unit will assess the situation and determine next steps. The extent to which the practice might be affected will depend to at least some extent on the degree to which the practice had implemented and enforced social distancing, masking, and other measures to protect against the spread of COVID-19.

Recovered Personnel

Recovery from COVID-19 likely provides reasonable immunity, at least in the short term. However, re-infections have been documented. Therefore, people that have had COVID-19 previously must use the same preventive measures as everyone else.

COVID Alert Mobile App

A free, anonymous COVID tracking app continues to be available. This app anonymously registers contacts with other people using the app. If a user tests positive, they enter a code into the app, and anyone that they have had contact with receives an alert that they were exposed to someone that was positive, without providing any specific information about who was positive. This app does not work on all devices (it does not work on older models) but is a useful monitoring tool in veterinary clinics. It is recommended that all clinic personnel download the app, if it is compatible with their device. This will allow early intervention if there is exposure in the clinic.

Outside the Physical Practice

Identification of High-Risk Clients and Facilities

Querying the health status of animal owners prior to veterinary personnel visiting a farm, household or facility should remain a standard practice. This will enable decisions regarding whether the appointment should be rescheduled or whether additional protective measures and approaches should be used.

On Farms

The approach to farms involves the same concepts as those in clinics. The goal is to minimize the number and closeness of contacts. Visits should be coordinated such that close contact (<2 metres) with owners or farm personnel is avoided as much as possible. Contact may be
unavoidable in some situations (e.g., restraint of an animal when a technician or assistant is not available or adequate). In those situations, the following can be considered:

- Using the lowest risk person on the facility based on their health and exposure status.
- Minimizing duration of close proximity through proper planning and organization, and efficient performing of a procedure.
- Asking the person to wear a mask. If they do not have one and clinic supplies are adequate, they could be provided with a mask.
- Use of PPE by veterinary personnel (e.g., mask and eye protection).

**Mobile Companion Animal Practices**

The general approach in mobile practices is similar to those for companion animal clinics and farm visits, with the understanding that mobile practices may pose a higher risk because they entail entering a client’s house. They also often require closer contact with animal owners for restraint. Therefore, identifying and avoiding higher risk situations (see below) is particularly important. Other considerations would include:

- Examining the animal outside of the household (e.g., in vehicle, garage, fenced yard, enclosed porch) where safe for the veterinarian and where escape of the animal can be prevented.
- Using the lowest risk person in the household for restraint, based on querying health and exposure status.
- Minimizing duration of close proximity through proper planning and organization, and efficient performing of a procedure.
- Asking the animal owner(s) to wear a mask. If they do not have one and clinic supplies are adequate, they could be provided with a mask.
- Use of PPE by veterinary personnel (e.g., mask and eye protection).

In some situations, it may be prudent to reschedule or divert the appointment to a physical veterinary clinic where safe handling of the animal without owner involvement can be performed.

**Resources**

A comprehensive resource for small animal clinics is the *OAHN Best Practices for Infection Control in Small Animal Veterinary Clinics*.

Information for farms is available through the Canadian Food Inspection Agency’s *National Biosecurity Standards documents for different species groups*.
Appendix A

Recommended COVID-19-Related Use of Masks in Veterinary Practice

*Please note that with the high transmissibility rate of the Omicron variant it is recommended to use an N95 or equivalent mask wherever possible.

<table>
<thead>
<tr>
<th>Item</th>
<th>Use/comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>N95/KN95/FFP2 mask</td>
<td>▪ Ideal choice for best protection</td>
</tr>
<tr>
<td></td>
<td>▪ Protection both OF and FROM the user.</td>
</tr>
<tr>
<td>Cloth/non-medical mask</td>
<td>▪ Not recommended</td>
</tr>
<tr>
<td>Medical/surgical mask</td>
<td>▪ Best second choice if N95 not available</td>
</tr>
<tr>
<td></td>
<td>▪ If used, it is best for low risk situations where there are few human-human interactions, good distancing and good ventilation.</td>
</tr>
<tr>
<td></td>
<td>▪ Should be tight fitting</td>
</tr>
<tr>
<td></td>
<td>▪ Mainly to protect FROM the user’s droplets.</td>
</tr>
<tr>
<td>Face shield</td>
<td>▪ Potential added layer of protection that can be used in close contact situations. Not necessary at all times, especially if using a N95 or equivalent mask.</td>
</tr>
<tr>
<td>Goggles</td>
<td>▪ Excellent eye protection if using appropriate goggles. Goggles intended for protection against droplets should be used when eye protection is indicated.</td>
</tr>
<tr>
<td></td>
<td>▪ Unlike masks, goggles do not provide additional respiratory protection or prevent hand contact with masks.</td>
</tr>
<tr>
<td></td>
<td>▪ Regular safety glasses provide impact protection but not the same level of protection against droplets.</td>
</tr>
<tr>
<td></td>
<td>▪ Eyeglasses offer some protection are not considered adequate protection from droplets.</td>
</tr>
</tbody>
</table>
Appendix B

Recommended COVID-19-Related Use of PPE in Veterinary Practice

*Please note that recommendations have changed due to the high transmissibility of the Omicron variant.

<table>
<thead>
<tr>
<th>Situation</th>
<th>Gloves</th>
<th>Mask</th>
<th>Outerwear</th>
<th>Eye protection</th>
</tr>
</thead>
<tbody>
<tr>
<td>Daily activities in the clinic</td>
<td></td>
<td>N95 if possible</td>
<td>Routine (e.g., lab coat, coveralls)</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Tight fighting</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>medical mask</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>acceptable</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Contact with a healthy animal that has no known SARS-CoV-2 exposure</td>
<td></td>
<td>N95 if possible</td>
<td>Routine</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Tight fighting</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>medical mask</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>acceptable</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Contact with a healthy animal of a species that can be infected by SARS-CoV-2 (e.g., cat, dog, ferret) that has had known or suspected contact with a person with COVID-19 in the past 14 days</td>
<td>Yes</td>
<td>N95 if possible</td>
<td>Dedicated*</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Tight fighting</td>
<td></td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td></td>
<td>medical mask</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>acceptable</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Contact with a healthy animal of a species not known to be susceptible to infection but that has had known or suspected contact with a person with COVID-19 in the past 3 days</td>
<td>Yes</td>
<td>N95 if possible</td>
<td>Dedicated</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Tight fighting</td>
<td></td>
<td>+/-</td>
</tr>
<tr>
<td></td>
<td></td>
<td>medical mask</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>acceptable</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Contact with an animal of a species that can be infected by SARS-CoV-2 (e.g., cat, dog, ferret) that has had known or suspected contact with a person with COVID-19 in the past 14 days and which has signs potentially compatible with COVID-19 (acute respiratory or gastrointestinal disease)</td>
<td>Yes</td>
<td>N95 if possible</td>
<td>Single use, impermeable***</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Tight fighting</td>
<td></td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td></td>
<td>medical mask</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>acceptable</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Aerosol generating procedure (e.g., intubation, dental examination, close contact with the face of a panting dog) involving an animal of a species that can be infected by SARS-CoV-2 (e.g., cat, dog, ferret) that has had known or suspected contact with a person with COVID-19 in the past 14 days and which</td>
<td>Yes</td>
<td>N95 ideal</td>
<td>Single use, impermeable</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Yes</td>
</tr>
</tbody>
</table>
has signs potentially compatible with COVID-19

* Dedicated means in item used only for that patient. This could include a laboratory coat that is laundered after use.
** Note: The species range that is susceptible to COVID-19 is still poorly understood. The risks are thought to be highest with cats and ferrets. The risk related to dogs is unclear and likely much lower than cats and ferrets. The list of higher risk species may change over time and veterinarians should follow ongoing developments.
*** E.g., surgical gown.