Highlights of The Guidelines for Standards of Care in Animal Shelters, Second Edition (2022)



13. Public Health

13.1 General

Public health promotes and protects people and the communities where they live, largely through One Health, which focuses on the connections among the well-being of animals, people, and the environment. The care that shelters provide to animals also impacts humans and the environment. Within their facilities and in the larger community they serve, shelters must take precautions to protect the health and safety of animals, people, and the environment.

13.2 Personal protective measures

Shelter personnel encounter risks to their health on a daily basis through normal work activities. Giving personnel the knowledge and equipment needed to mitigate risks is a critical component of workplace safety. Personal protective equipment (PPE) includes gloves, smocks, goggles, face masks, face shields, shoe covers, and ear plugs. PPE types and sizes must accommodate all personnel, including those with special concerns such as latex allergies.

13.2.1 Hand hygiene: Proper hand hygiene is essential to protecting human health in animal care environments. Personnel should wear gloves when handling animal waste or fluids and should wash hands frequently, especially after handling animals, and after removing PPE, and before eating, smoking, or touching their face. Personnel and visitors should be discouraged from eating, drinking, or bringing pacifiers, teething toys, or baby bottles into animal housing areas. Animals should not be present in areas designated for human food preparation or consumption.

13.3 Workplace hazards

13.3.1 Chemical hazards: Hazardous compounds such as disinfectants, medications, and pesticides are routinely encountered in shelters. When working with hazardous chemicals, eye protection or respirator face masks must be worn as indicated by the product label. A well-ventilated area or fume hood may be required for certain products. Occupational Safety and Health Administration (OHSA) requires organizations to correctly label and store chemicals to prevent spills or accidental mixing.

When allowed to accumulate or when improperly stored, animal urine and feces can become a significant source of toxic compounds such as ammonia and hydrogen sulfide. Shelters must promptly dispose of biological waste (animal waste, animal tissues, and carcasses) according to state and local regulations. Shelters must follow regulatory guidelines for the disposal of unused medications. Controlled medications must be disposed of or wasted in a manner that follows regulations, prevents environmental contamination, and prevents human diversion. Guidance to reduce waste gas exposure associated with anesthesia may be found in the ASV's Veterinary Medical Care Guidelines for Spay-Neuter Programs and from OSHA.

13.3.2 Physical hazards: Shelter personnel are commonly exposed to physical hazards, such as slippery surfaces, loud noises such as barking or clanging metal, animal scratches and bites, job requirements to lift heavy objects and animals, and exposures to needles or other sharp objects. Shelters must follow industry guidelines for the proper disposal of sharps. Supervisors must advise persons injured at the shelter or by a shelter animal to seek medical care because the severity of the injury may initially be difficult to recognize.

Noise exposure: Prolonged exposure to loud noise can damage the hearing of animals and people. Both environmental and behavioral noise abatement strategies should be used in animal housing and holding areas. Hearing protection must be worn by employees working in environments where volume is at or above 100 dB cumulatively for 15 min. When volumes exceed 85 dB at any point in time, hearing protection should be worn. Hearing protection is recommended whenever personnel have to raise their voice in order to be heard three feet away. Several decibel meters are commercially available, including phone apps. Hearing conservation programs that include training and regular hearing testing may be required by OSHA.

13.3.3 Biological hazards: Animal bites are both a physical and biological hazard of significant concern in shelters. Training in animal body language, safe handling techniques, and using sedation can reduce but not eliminate the risk of bites. All bites that break the skin carry a risk for infection, which can be reduced by immediately washing the wound. Deep penetrating punctures that close quickly, like those caused by cat bites, are at higher risk of developing serious bacterial infections. The public must be prevented from having contact with animals who pose a high risk of biting by clearly marking and restricting access to areas where these animals are held. Shelters must consider public safety when making outcome decisions regarding animals who pose a risk of serious harm. If, after a careful risk assessment, the shelter decides that an animal with a history of mild to moderate aggressive behavior is eligible for a live outcome (see Behavior), a record of all known bite incidents must be provided to adopters, fosters, or transfer partners.

Human rabies exposure: Animal bites can, rarely, transmit rabies virus. To allow for appropriate follow-up by public health authorities, shelters must follow regulations for reporting animal bites to humans. At intake, shelter personnel must ask owners or finders if the animal being admitted has bitten anyone within the past 10 days. Because aggression may be a symptom of rabies, all animals who have bitten a human must be managed according to state and local regulations, including guarantine or euthanasia. Because animals who are symptomatic for rabies succumb to their illness rapidly, the rabies guarantine period is typically 10 days. In some cases, euthanasia and testing may be preferred, especially if the animal is suffering physically or emotionally, or presents a danger to others. If a dog, cat, or ferret dies for any reason within 10 days of a bite, testing for rabies is mandated. Because the consequences of rabies exposure are deadly, personnel who routinely work with animals should receive pre-exposure vaccinations against rabies in accordance with the current recommendations of the Advisory Committee on Immunization Practices.

Animal rabies exposures: Shelters frequently admit animals with injuries or neurological symptoms of unknown cause, which, though rare, could be indications of rabies virus infection. At intake, shelter personnel must ask owners and finders of incoming animals about recent wildlife bites or exposures and document evidence of wounds that could indicate a potential rabies exposure. Determining the appropriate quarantine period for an animal potentially exposed to rabies depends on species, previous rabies vaccination, and local regulations. Animals who have potentially been exposed to rabies must be managed with guidance from the NASPHV Rabies Compendium, and in accordance with state and local health regulations. Shelters should vaccinate all eligible animals for rabies prior to leaving the shelter. Community cat vaccination is important because cats are the domestic animal most likely to acquire and transmit rabies in the U.S. and Canada.

Zoonotic diseases are transmitted from animals to people. Although all people are at risk of zoonotic disease, those with exposure to animals, and those with delayed or weakened immune responses due to young or old age, disease, pregnancy, or medical treatments have an increased risk. Many common pathogens in the shelter can pass from animals to humans, including internal parasites (roundworms, hookworms, and toxoplasma), external parasites (mites), fungal diseases (ringworm), and bacterial diseases (*Bordetella, Chlamydia*, and *Leptospira*). Viral diseases (rabies, influenza, and COVID-19) are less commonly transmitted to people. Timely treatment and management of animals with zoonotic pathogens help prevent spread to people and other animals. Training personnel to recognize zoonotic diseases is a key step in prevention. In addition to the general infectious disease control measures described in this document (see Medical Health), shelters should have a protocol for responding to zoonotic diseases, including communication regarding potential exposures. Reporting of some zoonotic diseases is mandated by local, state, and national regulations. Access to animals with known zoonotic conditions should be limited to those necessary to provide appropriate care. Enclosures of animals with suspected zoonotic disease must be clearly marked to indicate the condition and necessary precautions, such as PPE, handling, and sanitation practices. Shelters must disclose the risk of known zoonotic disease to personnel, transport partners, foster care providers, and adopters. Some states prohibit relocation of animals with zoonotic disease.

Antimicrobial resistance and emerging pathogens: A key factor in slowing the development of resistance is to use antimicrobials only when truly needed. Routinely using antimicrobials to prevent infection in healthy animals is unacceptable. Antimicrobial use must be tailored to appropriate clinical conditions, used judiciously, and evaluated for therapeutic effect. It is vital that antibiotics are only prescribed when they are effective against the pathogen of concern. In a shelter, treatment protocols for common conditions need to be evidence-based and include specific criteria for diagnosis; which antibiotic, dosage, and duration to use; any follow-up considerations; and when to consult the veterinarian. Diagnostic testing is strongly recommended when animals do not respond to treatment or display unusual or severe signs of infection.

Some emerging diseases with the potential to infect people, such as influenza, were first identified in animal shelter populations. Because shelter populations can be sentinels for emerging diseases, animal shelters should monitor their populations for signs of unusual or severe disease. Poor sanitation practices, close housing of multiple species, housing diseased animals in the general population, and operating over capacity for care can facilitate the spread of disease. Animal population management should be used to reduce the risk of developing novel or emerging pathogens.

13.4 Human well-being

Shelter employees have been shown to have high levels of compassion fatigue, secondary traumatic stress, suicidal ideation, and burn-out as a result of their daily work. When mental health concerns are communicated or observed, personnel should be encouraged to seek professional help. Ensuring personnel have the skills and resources to provide appropriate care for shelter animals improves job satisfaction and human, animal and population health.

See the full guidelines for references and supporting documents: https://jsmcah.org/index.php/jasv/issue/view/2