Application of a welfare assessment tool (Shelter Quality Protocol) in 64 Italian long-term dogs’ shelters: welfare hazard analysis

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Abstract

The confined environment of the dog shelter, particularly over extensive time-periods can impact severely on welfare. Surveillance and assessment are therefore essential components of the welfare protocol. The aim of this study was to generate a descriptive analysis of a sample of Italian long-term shelters and identify potential hazards regarding the welfare of shelter dogs. This was achieved through application of the Shelter Quality Protocol (SQP) to link income/outcome variables and the inclusion of sixty-four long-term shelters in Italy. Descriptive and logistic regression analyses were conducted. Key findings showed feeding regime, type of diet and access to outdoor area to be significantly associated with inadequate body condition score (BCS). The probability of observing skin lesions was shown to be influenced by bedding inadequacy and bedding type. Limiting beds to one per dog and utilising clean bedding materials was significantly associated with a reduced probability of observing dirty/wet dogs. Protection from adverse weather conditions and inadequate bedding were significantly associated with the manifestation of polypnea. Non-existent dog training facilities, outdoor access or leash walking were all found to significantly increase the likelihood of fearful or aggressive attitudes to people. Outdoor access also, in conjunction with feeding regime, was associated with the presence of diarrhoea. The SQP proved useful in identifying welfare hazards, both as regards shelter environment and shelter management. Identification of these hazards creates the opportunity for interventions to be applied, minimising the risks and improving the welfare of long-term shelter dogs.

Keywords: animal welfare, assessment, domestic dog, hazard analysis, protocol, shelter

Introduction

Many thousands of stray and abandoned dogs are held around the world in rescue shelters (Bollen & Horowitz 2008), for a variety of reasons and in either temporary or permanent confinement (Taylor & Mills 2007).

Animal shelters should have the common goal of providing a safe and comfortable environment for homeless animals, while attempting to either re-home them or reunite them with their owners.

In Italy, as is the case in several other countries (eg Germany and Greece) or regions (eg the Catalan region of Spain), laws are in place forbidding the euthanasia of animals solely because they are without an owner. In such places shelters, thus, operate a no-kill policy (Dalla Villa et al 2013) which can result in dogs spending the remainder of their lives in shelters (Cannas et al 2014). In such circumstances, shelters must ensure adequate housing and management to meet the animals’ ethological needs, guaranteeing both the highest quality of life in the case of long-term confinement, or adequate preparation to allow successful adoptions (Miller & Zawistowski 2015).

Generally speaking, confined shelter conditions, especially long term, may impact severely on the welfare of dogs (Hewson et al 2007).

Several factors influence the welfare of shelter dogs (Kiddie & Collins 2014, 2015; Cozzi et al 2016), including time spent (Wells et al 2002) and the human-animal interaction (Coppola et al 2006; Normando et al 2009). The main challenges include an unfamiliar housing environment, an altered daily routine, changes in feeding regime, unfamiliar sights, sounds and smells, social deprivation, presence of unfamiliar animals and humans, the absence of an attachment figure and the absence of environmental enrichment (Wells 2004; Taylor & Mills 2007). These factors can be considered stressors and animals will often seek to return to homeostasis through both physiological and behavioural responses.

When adaptation is impossible, the animals’ health and welfare run the risk of being compromised (Broom 2007). Individual animals respond to stressors in different ways. Many factors act to influence animals’ responses to stressors: species, age, previous experiences, health, and