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# Opinions of UK Rescue Shelter and Rehoming Center Workers on the Problems Facing Their Industry 

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#### Abstract

Animal shelters exist worldwide to care for and rehome unwanted or straying pets. Previous studies have examined why owners breed unwanted animals, or relinquish their pets to shelters. However, the views of shelter workers, who receive and care for these animals, have previously been largely unexplored. The aim of this study was to investigate the perceptions of animal shelter workers on the problems facing their industry. A sampling frame was constructed, consisting of every identified shelter in the UK, and a postal questionnaire sent to each. This included two open questions, soliciting respondents' views on their biggest problems, and inviting further comments. A total of 661 respondents replied to at least one question. Thematic analysis on the free text content was carried out, and basic and global themes identified. Respondents' main concerns centered on a mismatch between the continuous demand for their services and their limited resources, which has worsened during the recent financial crisis. Respondents perceived a need for increased public awareness of the commitment involved in keeping a pet, and of controlling breeding by neutering. Points of intervention, such as education programs, were suggested. Coordinating efforts with others, including local authorities, landlords, and housing associations, and a potential role for veterinary professionals working in shelter medicine were all explored by respondents. Rehoming organizations play an important role in the management of pet overpopulation, and the views and beliefs of their workers form an important contribution to the dialogue surrounding this issue. Consideration of these perspectives may suggest alternative routes to address underlying causes and management of pet overpopulation.


Keywords: attitudes, pet overpopulation, relinquishment, rescue shelter, shelter medicine

Cats and dogs are commonly kept as domestic pets in many parts of the world. It has been estimated that there are around 144 million pet dogs and cats in the USA (AVMA, 2012), and around 10 million each of dogs and cats in the UK (Murray, Browne, Roberts, Whitmarsh, \& Gruffydd-Jones, 2010). However, when owners find themselves unable or unwilling to retain their pets, these animals often enter the care of rescue shelters and rehoming centers. Assessing the numbers of animals passing through shelters has proved challenging. In the USA, the combined figure for dogs and cats has been estimated at 6-8 million annually (HSUS, 2017). In the UK, two separate surveys were conducted in 2009 and 2010 and it was estimated that between 90,000 to 130,000 dogs and 131,000 to 156,000 cats enter such organizations each year (Clark, Gruffydd-Jones, \& Murray, 2012; Stavisky, Brennan, Downes, \& Dean, 2012). Taking into account the response rates for these two surveys, the UK figures are likely to represent at least a two- to three-fold underestimate. More accurate assessment is hampered in the UK and many other countries by the lack of any statutory registration or inspection requirement for shelters. It is clear, though, that the care of these animals represents both a significant industry and charity cost, with an estimated 19,000 paid or voluntary workers and an annual spend of $£ 340$ million in the UK alone (Stavisky et al., 2012).

Animals enter shelters via a variety of routes including being found straying, born on site, or confiscated under welfare legislation (Stavisky et al., 2012). This varies in different regions, and according to the focus of the organization itself; some may be open access and receive a high proportion of strays; whilst others, including many "no-kill" organizations and breed-specific rescues, have highly selective input, with very limited admission of strays (Diesel, Brodbelt, \& Pfeiffer, 2009; Eriksson, Loberg, \& Andersson, 2009; Marston \& Bennett, 2009). However, direct relinquishment from the owner remains a primary source of shelter animals in many instances (Alberthsen et al., 2016; Eriksson et al., 2009; Moulton, Wright, \& Rindy, 1991; Stavisky et al., 2012). A number of researchers have attempted to identify factors associated with an increased risk of relinquishment, with the aim of targeting interventions to relieve pressure on shelters. Several common themes have been identified. These include owners' education and their expectations of their pets' needs (Patronek, Glickman, Beck, McCabe, \& Ecker, 1996a), pet behavioral issues (Murray \& Speare, 1995; Vučinić et al., 2009), age of the pet (Murray \& Speare, 1995; Vučinić et al., 2009), and sociodemographic factors (Dolan, Scotto, Slater, \& Weiss, 2015; New et al., 1999; Shore, Petersen, \& Douglas, 2003). While pet behavioral issues have been cited as being associated with a risk of relinquishment, there is a debate over whether these are always true behavioral disorders, or may sometimes be the expression of natural animal behaviors which owners find unacceptable (Marston \& Bennett, 2009; Patronek, Glickman, Beck, McCabe, \& Ecker, 1996b). Although repeatedly identified as a factor associated with relinquishment, the direction of impact of the age of a pet is unclear, as both young and old age have been separately associated with an increased risk of relinquishment (Murray \& Speare, 1995; Vučinić et al., 2009). This may suggest that different factors are at play, for instance excessive production of litters will increase the proportion of young animals relinquished, contrasted with relinquishment of elderly animals specifically for euthanasia in places where veterinary care may otherwise be difficult to access (Marston \& Bennett, 2009; Vučinić et al., 2009). Social and economic factors such as relationship breakdowns and moving house have also been implicated (Rowan, 1992), leading to concerns about an increased burden on charities due to the recent economic downturn (Stavisky et al., 2012), although data to support this
effect are lacking (Weng \& Hart, 2012). Whilst relinquishment is likely to be a multifactorial phenomenon, the diversity identified between studies may also be due to variations between different cultures, locations, and populations studied, as well as the methodologies used, and the substantial improvements in shelter practice over the last 20 years, particularly in the USA (Coe et al., 2014; Lambert, Coe, Niel, Dewey, \& Sargeant, 2015).

Studies regarding root causes of animal relinquishment have to date mainly concentrated on the experiences of the relinquishing pet owners (Casey, Vandenbussche, Bradshaw, \& Roberts, 2009; Diesel et al., 2009; Miller, Staats, Partlo, \& Rada, 1996; Vučinić et al., 2009). However, few data exist to describe the perceptions of workers in rescue and rehoming centers, who receive relinquished animals and are immersed in this environment on a daily basis. The work has been identified as being demanding and stressful due to its complex nature, and requires staff to take responsibility for difficult and emotional decisions, including those around euthanasia (Anderson, Brandt, Lord, \& Miles, 2013; Baran et al., 2009; Schneider \& Roberts, 2016). However, their thoughts and views on reasons for relinquishment and the other challenges that shelters face have so far been largely unexplored. The aim of this study was to investigate the perceptions of animal rescue workers on the problems facing their industry.

## Methods

A sampling frame of all identifiable organizations in the UK engaged in rehoming dogs, cats, or both was constructed, and a questionnaire distributed, as previously described, consisting of a mixture of closed and open questions regarding the organization's activities. Further detail of the methods and results of the closed questions may be found elsewhere (Stavisky et al., 2012). When the numerical data from this survey were reported previously, responses from branches of larger organizations were excluded to avoid duplication of statistics; however, in the present study all responses were included for analysis, giving a slightly different response rate (Stavisky et al., 2012). Data were collected between March and December, 2011. A qualitative grounded theory approach was taken for the analysis of the responses to the open questions of the questionnaire, and these form the basis of the present study. The questions asked were:

Question 1. What do you see as the biggest problem or problems that your organization faces?

Question 2. Do you have any further comments or suggestions?
Responses to the questions were extracted into a qualitative data management program (QSR NVivo 9) and thematic analysis was conducted. Although it was initially envisioned that the responses to the two questions would be analyzed separately, there was considerable overlap in the content and style of the responses, and it was eventually decided to treat all of the responses as a single data set. Initially, coding was performed by the first author using an inductive interactive approach (Braun \& Clarke, 2006). Five percent of the data were coded independently by a second researcher (RD) and the discrepancies discussed and used to inform future coding.

As each code was identified, data previously examined were re-checked to ensure consistency by JS (constant comparison method). Basic themes were identified and relationships between them were explored using the OSOP (one sheet of paper) method (Ziebland \& McPherson, 2006). Organizing and global themes (Attride-Stirling, 2001) were identified in discussions between JS and RD, in constant reference to the OSOPs and coded extracts.

This project was reviewed and approved by the ethics panel at the University of Nottingham School of Veterinary Medicine and Science, including matters of informed consent and Data Protection.

## Results

## Response

Overall, 2,352 potential respondents were identified as part of the sampling frame, representing 1,380 organizations. Seven hundred and thirty-five unique responses were received (overall response rate $735 / 2352,31.3 \%$ ), although not every respondent answered every question. Six hundred and sixty-one respondents answered question 1, and 267 answered question 2. Overall, 661 (89.9\%) respondents provided a response to at least one of the two questions, and these respondents and their answers form the data set for the remainder of this analysis.

Of the respondents, 235 (35.6\%) cared for dogs, 229 (34.6\%) for cats, and 159 (24.1\%) for both dogs and cats. The remaining $38(5.7 \%)$ of respondents described activities including fundraising and provision of veterinary care. When asked about staff numbers, 379 participants responded, of whom 212 (55.9\%) described only having volunteer staff, and 167 (44.1\%) had at least one paid staff member.

Initially, 62 codes were identified. Codes with substantial overlap were refined to give an eventual total of 57 codes (basic themes). These were assigned into one of six organizing themes, with some degree of overlap. These were:

1. Wider social problems.
2. Problems associated with animal owners.
3. Shelter management issues.
4. Rehoming problems.
5. Breeders, breeding, and sources of animals.
6. Breed-specific issues.

These then were amalgamated into four overarching global themes:

1. The problems a shelter faces on a day to day basis (management issues, rehoming problems).
2. How these problems come about (proximal reasons; problems associated with animal owners and rehoming).
3. The perceived underlying causes of the proximal reasons (wider social problems).
4. Suggested solutions to the perceived problems.

The breed-specific issues were included in the relevant global theme, as some had more relevance to social problems (e.g., status dogs), whereas others were presented more as management issues (e.g., particular temperament of a certain breed).

## The Problems a Shelter Faces on a Day to Day Basis

For many respondents, the key problem was the overwhelming numbers of animals they were presented with, with one describing the "sheer number of requests to take in animals (I have)
approx. 150 calls a week to take in (I) may have room to take in three." Although this was a recurring theme for both dogs and cats, it was noticeable that many more of the comments regarding excessive numbers particularly pertained to cats. One respondent described their problem with "not having enough space to take all the unwanted cats in ... I am constantly telling members of the public I cannot take their cats into care," whilst another reported being "totally swamped by the number of unwanted cats/ kittens." Many respondents commented that this issue appeared to be worsening, and again this appeared to be particularly in regard to cats, with descriptions such as "the ever-increasing cat population" and an "explosion in the cat population."

The most commonly remarked upon problems were lack of resources to deal with this influx of animals. Lack of finances and difficulty in fundraising were mentioned by more respondents than any other single problem. For many, this was seen as having been intensified over recent years, following the 2008 economic crisis, describing "a severe drop in income/donations." The organizations appeared to suffer from this lack of finance whatever their scale, with some commenting on the problems of long-term planning; "raising sufficient finance to care for our animals and enable us to expand our facilities;" while others struggled to feed a few animals; "I sold all my jewellery ... to supply two foster mums (cats with kittens) with food and litter." Many worried about sustainability and financial stability, and often organizations appeared to be struggling without long-term resources; one said "we are only just managing to cover our cost;" another said the "biggest problem is sustainability, we have no continuous funding ... ;" whilst a third stated " ... our funds are running out we may well have to close in a year or two."

The respondents' organizations were often heavily dependent on volunteers, and many comments centered on the problems of finding sufficient volunteers for their activities. In particular, a shortage of people willing to foster animals was a recurring basic theme. A few offered reasons for this shortage of volunteers, suggesting the recession might have played a part, either because "everyone is trying to make money with the recession so more people are working full time and no spare time," or because of "increasing demands on time by employers." Some appeared to feel there was simply a lack of appetite for volunteering, with one stating their biggest problem was simply "getting people to help."

The quality of volunteers was also a problem, with one organization commenting on the "lack of volunteers willing to help and get their hands dirty - most want to play with kittens." Age of volunteers was of concern for a number of respondents, with one describing that "the mainstay of our organization are four volunteers, two of whom are 64 (and) one is $72 \ldots$ without new blood we will cease to exist in the next two years." However, some organizations did appear to feel their volunteers did a good job, with one commenting that although they had insufficient volunteers, "the few we have...are very dedicated."

Nurturing suitable volunteers was also described, and the challenge of "making sure all volunteers keep to policies without being too ungrateful or upsetting folk ..." The problems of negotiating with people who work on a voluntary basis was also summed up by one respondent: "the main problem however is lack of volunteers ... and the inflexible attitudes of most of the committee in accepting (or rather not accepting) the very, very few people who do offer help unless they can influence them."

Respondents' attitudes to the veterinary profession were mixed. Some evidently had a strong relationship with their vets, often influenced by cost ("my vet gives his time free to rescue"). Others worried about the spiraling cost of veterinary care, both for their own animals and
as a reason for relinquishment, with one commenting "We are seeing an increasing number of cats handed in or abandoned because of veterinary/health problems which the owner is unable to afford the care of." Some also felt that even routine care was a problem, saying that "the high costs of flea and worm preparations from the vets are a particular issue for people on low incomes." A number also felt that the veterinary profession needed to update itself in practices relevant to rescue, with one respondent identifying a need to "perhaps get more vets on board with welfare issues," and another advocating "incorporate some shelter medicine in vets' training."

## How These Problems Come About (Proximal Reasons)

Lack of research by prospective owners prior to obtaining a pet was a recurrent theme. This was sometimes in reference to societal attitudes, but had several other, more distinct contexts. Some breed rescues felt a lack of awareness of the specific requirements of their breed was a concern, with comments such as "People buying dogs not realizing the time and attention needed for shepherd types."

Others focused on a perceived lack of planning for the animal's basic needs, with comments such as "(taking) on animals that they can't afford and expect others to pay for." Such lack of foresight or commitment were not perceived as valid reasons for relinquishment, and these owners were described as "expecting rescues to take their pets over genuine rescues."

Unrealistic expectations of the degree of commitment required to care for an animal from people wishing to relinquish pets were also perceived as a common problem, with some relinquishers described as "failing to learn about the needs and care involved in keeping a pet happy and healthy." This was also reflected by some respondents who described repeated cycles of "people wishing to relinquish dog- or people-aggressive dogs" due to poor training or socialization.

Some respondents felt there was a mismatch between the service they were able to provide and the service expected from them, with comments such as "members of public thinking it is their right to have their problem dealt with now and not being prepared to wait," and describing "the public's high level of expectation fostered by TV programs which imply the (organization) can accept an unwanted animal immediately. We can't, they have to go on a waiting list, and this disappoints and annoys many owners."

Owners having acquired unsuitable animals for status or fashion were also perceived to be a problem, with comments including "(the dogs) ... are being made popular by ads/celebs etc and this makes our work harder than it's ever been." Bull-type dog breeds were a very common concern, due to the volume: "Too many Staffordshire bull terriers being bred and finding their way into rescue. This unfortunate breed is clogging up rescue spaces because of the sheer numbers." Coupled with this, these breed types are perceived to be difficult to rehome and hard to manage in kennels, as described by one respondent: " ... these dogs invariably have to be housed individually. This reduces available space for other breeds."

Respondents very commonly cited owners failing to neuter their pets as being a critical issue, particularly with reference to cats, leading to being "overwhelmed during the kitten/school holiday period." Compliance with neuter vouchers was an issue, with "owners not using neutering vouchers whether they are $1 / 2$ price or full price." There were mixed views on who should take responsibility for neutering stray and feral cats, with one respondent saying that "I would like it to be made law all pets are spayed and neutered. I feed over 100 cats a day (strays)."

Breeding of cats was largely viewed as due to owners' indifference to controlling their pets' reproduction. In contrast, respondents perceived that actively choosing to breed dogs was more common; for example, one respondent commented that " ... breeding Staffies/bull breeds ... people see it as quick and easy money (as can be seen by the classified advertisements section in newspapers)."

## The Perceived Underlying Causes of the Proximal Reasons (Wider Social Problems)

Many respondents discussed the impact of the economic downturn on the difficulties of maintaining pet ownership. The drop in household income was seen as making a pet unaffordable for some: "Cats are being handed in because owners cannot afford to feed them," coupled with "fewer people able to adopt because of their own uncertain future financially." For others the impact was indirect, resulting from the recession which led to job loss, relationship breakdowns, and subsequent movement from owned to rented accommodation, with a "blanket restriction of no pets ... in the majority of rental properties." A small minority still remained positive, despite the financial situation, with one respondent commenting "We have expected a greater influence of hard times on our income than has actually materialized; people sometimes exhibit amazing kindness."

A number of respondents identified a growing tendency to regard pets with "utter carelessness," exemplified by the observation that "kittens are very popular (but) older cats (from a year old onwards) are discarded for a newer model," or that people "regard their cats as objects or disposable items that then can dump on us when the mood/allergy/baby/house move/split in relationship takes them."

Lack of education was also a recurrent basic theme. Respondents described a public lack of knowledge about animals and their core needs. One respondent characterized the issue as "lack of public education on neutering. (The) public still think a cat needs to have a season or have kittens before they can be neutered. Still don't understand why adult tom cats fight, smell, and roam. Still don't know cats have (a) breeding season and there is no shortage of kittens." Ignorance regarding the role of home breeding in perpetuating overpopulation was also identified: "The media needs to make the public aware that breeding because you want your dog to be a mummy or daddy causes one dog per minute to be euthanized." Lack of education of medical professionals regarding public health implications of animal ownership was also mentioned, leading to "people giving up cats because of misinformation e.g., because of pregnancy."

## Suggested Solutions to the Perceived Problems

A number of respondents proposed solutions to help the pet overpopulation problem and burden on shelters. The most common suggestion was to improve education of the public regarding how to be a good owner and the need to neuter. There were few specific methods of targeting this mentioned, although one respondent suggested "animal care to form compulsory part of (school) curriculum." There was a sense that although education was seen as essential for a better future, it was difficult for organizations to spare the resources to invest themselves, with comments such as "(would make a) bigger effort on education if time and resources would allow."

There were frequent suggestions that the government should contribute more, typically by introducing or enforcing legislation, such as "must make it law for all dogs to be
microchipped and insured/neutered. Councils/housing associations to be more insistent on cats/dogs being neutered. Benefit fraud department to follow up and prosecute when we report people on benefit selling puppies/kittens and not declaring it ( 1 litter of dogs sells at £200 each)."

Some also suggested the government should bear some financial responsibility toward rescues: "Government funding should be made available to charities that care for animals as well as to those caring for humans. We help people by taking their unwanted pets and by providing veterinary care to those on low incomes wherever possible."

Help by authorities in pressing for private landlords and social housing to allow people to keep pets and encourage neutering was seen as a positive step by some: "We are working toward responsible pet ownership in (our area) with the council and housing providers. The goal is all pet owners in social housing to register their pets and numbers ... restricted to two for new tenants and all existing tenants' pets must be neutered."

## Discussion

This study provides an insight into the concerns and perceived pressures within the animal rescue community. The picture that emerges is one of feeling consistently pressured for time and resources to deal with an unremitting influx of animals. The recession has squeezed this sector on all sides, resulting in reduced income from donations and legacies, and simultaneously increased demand from people no longer able to keep their pets, whilst at the same time, volunteering has faltered.

The causes of the pet overpopulation were variously attributed to poor awareness of a pet's needs, social and financial pressures, and a shift to viewing pets as commodities to be disposed of when no longer convenient. Lack of knowledge and understanding of basic animal biology and behavior have been previously identified to be correlated with risk of relinquishment to shelters; in one study, relinquishing pet owners were found to be significantly more likely than non-relinquishers to have misconceptions around topics such as a female animal's perceived need to have a litter or it being beneficial to rub a dog's nose in its "mess" as a cure for house-soiling (New et al., 1999).

Unintended over-breeding of cats was also a recurrent theme, and agrees with a 2013 UK study which showed that $80 \%$ of litters of kittens were unplanned, with $49 \%$ of owners believing that it might be beneficial for a cat to have a litter, and $38 \%$ believing that un-neutered, related cats would not mate, or were not sure (Welsh, Gruffydd-Jones, Roberts, \& Murray, 2013). Owners' choices around neutering their pets have been shown to have complex influences, including perceived positive and negative impacts on their pets' health, practical management considerations (e.g., of females in estrus), perception of responsible ownership in the context of pet overpopulation, and veterinary advice (Downes, Devitt, Downes, \& More, 2015). Given that veterinary recommendations on neutering have been shown to be quite variable (Diesel, Brodbelt, \& Laurence, 2010; Murray, Skillings, \& Gruffydd-Jones, 2008), it is possible that greater consensus within the veterinary community on this topic may represent one way of encouraging appropriate and timely choices regarding neutering.

There was conflict in the ways in which respondents viewed relinquishers. For some, giving up a pet was viewed as a last resort by people made desperate by society's failings in providing economic stability and opportunities for accommodation for pet owners, whereas for others, the narrative around relinquishers was one of lack of knowledge, care, and responsibility.

The perceived polarization by some respondents of pet owners into categories of "good" adopting owners and "bad" relinquishing owners is increasingly being recognized as likely to be an oversimplification. Whilst irresponsible ownership and commodification of pets does exist, there is a growing body of data to suggest that enabling owners to keep their animals may present a viable, efficient, and cost-effective approach for some types of relinquishment. Strategies such as increasing the availability of pet-friendly rental accommodation or access to low-cost veterinary care have been suggested as potential points of intervention (Dolan et al., 2015). If rental or social housing agreements allowing pets are coupled with requirements for vaccination and neutering, then accompanying facilitation of access to low cost and accessible care will be likely requirements for success. Whilst in the UK a long tradition of charitable veterinary care exists, and charitable provision is generally welcomed by private practitioners, barriers to access still exist in some communities, and charitable care is regarded with suspicion in other parts of the world, due to concerns about unfair competition with commercial practice.

Giving up a pet to a shelter has been identified as a painful and emotional experience (Shore et al., 2003). Likewise, for shelter workers, accepting relinquished animals has been identified as a significant stressor, particularly in shelters with high euthanasia rates, where it has been linked with high employee turnover (Rogelberg et al., 2007). Even where a link with staff turnover was not reported, selecting animals for and carrying out euthanasia in a shelter have been identified as causes of feelings of anger, grief, and emotional burnout (Anderson et al., 2013). Compassion fatigue is considered a risk of animal welfare work (Smith, 2016). Displacing and diffusing blame have been previously identified as strategies used by shelter workers to manage their emotions (Frommer \& Arluke, 1999). It is conceivable that a similar strategy was at play in some of the respondents' comments, to help them to cope with constant exposure to difficult decisions regarding the limits of the care they could provide. This may, in part, explain some of the different viewpoints respondents took regarding the moral standing of relinquishers.

Whilst much of the responsibility for pet overpopulation and relinquishment was apportioned to factors such as social apathy and lack of Government interventions, there were some suggestions that shelters might also be able to offer other solutions. Shelters were aware that in the long term, campaigning and education could offer more long-term solutions, but often felt unable to prioritize these types of initiatives themselves. This dissonance over responsibility is shown by the respondent who fed "100 strays" but did not feel responsible for neutering, and was likely perpetuating overpopulation as, in cats, fecundity is related to availability of food resources (Robertson, 2008; Schmidt, Lopez, \& Collier, 2007). The potency of some respondents' perceptions is exemplified by the comment about "one dog per minute [being] euthanized." If this were true, this would imply that over half a million unwanted dogs were euthanized every year, which is certainly many orders of magnitude higher than the true UK figure.

It is possible that for some respondents, these types of extreme perceptions could actually negatively impact on their work. Shelter practices may need to be re-examined in the light of both the beliefs underpinning them, and the outcomes they result in. For example, barriers to rehoming such as home checks or refusal of working people or families occur in many shelters. Whilst these may come from a desire to find an ideal home for an animal which has already experienced difficulties, these practices can significantly reduce turnover, resulting in a prolonged length of stay in a shelter, with its associated welfare impact, and potentially in increased euthanasia for animals which do not get the opportunity to be admitted to the shelter as a result of lower than ideal throughput. Long-held dogma within the animal welfare community, such as the inadvisability of giving animals as gifts, is being challenged (Weiss,

Dolan, Garrison, Hong, \& Slater, 2013; Weiss \& Gramann, 2009). This suggests that, at least to an extent, there may be an opportunity for those working in the field to examine their longterm aims, and whether their current strategies are best tailored to achieve them.

## Limitations

This study was a cross-sectional snapshot of views of shelter workers. Other methodologies such as face-to-face interviews and focus groups would allow more in-depth exploration of these ideas and potentially invite fuller responses. There are biases inherent in the study, as respondents were answering a postal questionnaire about shelter practice, not specifically to suggest solutions to the perceived problems, and clearly the response rate of $31.3 \%$ suggests that there may be some limitations on the transferability of the research. The views of those who failed to respond at all to the questionnaire cannot be assessed, and within the pool of respondents, it is possible that those who had the strongest opinions would have been more likely to provide more detailed comments. The extent to which respondents' organizations were volunteer-led or professional was indirectly assessed, and this question was only answered by just over half of the participants. However, of those who did reply, over half were from volunteer-led organizations, which may have skewed the responses to their particular concerns. Additionally, the pooling of all responses to both questions may have affected the interpretation of them. However, given the repeated responses around specific themes, it is likely that the results are dependable and credible as reflections of the respondents' opinions and feelings.

## Conclusions

In conclusion, this study represents an examination of the perceptions of shelter workers of the problems they face. Their main concerns were around a mismatch between the large numbers of animals presented to them and the limited resources available to look after them. This mismatch appears to have intensified during the recent financial crisis. Respondents perceived a need for increased public awareness of the commitment involved in keeping a pet, and the importance of controlling breeding by neutering. Points of possible intervention, such as education programs, were identified. Coordinating efforts with others, including local authorities, landlords, and housing associations, and a potential role for veterinary professionals working in shelter medicine, were all explored by respondents.

The thoughts and themes revealed in this work bear further exploration. The people involved in this type of animal welfare work clearly have a range of insights into the pet overpopulation problem which have hitherto been largely unexamined. More in-depth study of the views and experiences of those most closely involved in caring for shelter animals has the potential to reveal previously unexplored strategies to ameliorate this longstanding and intractable animal welfare problem.

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## Conflict of Interest

The authors declare no conflict of interest.

## References

Alberthsen, C., Rand, J., Morton, J., Bennett, P., Paterson, M., \& Vankan, D. (2016). Numbers and characteristics of cats admitted to Royal Society for the Prevention of Cruelty to Animals (RSPCA) shelters in Australia and reasons for surrender. Animals, 6. doi:10.3390/ani6030023.
Anderson, K. A., Brandt, J. C., Lord, L. K., \& Miles, E. A. (2013). Euthanasia in animal shelters: Management's perspective on staff reactions and support programs. Anthrozoös, 26, 569-578. doi:10.2752/ $175303713 \times 13795775536057$.
Attride-Stirling, J. (2001). Thematic networks: An analytic tool for qualitative research. Qualitative Research, 1, 385-405. doi:10.1177/146879410100100307.
AVMA. (2012). U.S. Pet ownership \& demographics sourcebook. Schaumburg, IL: American Veterinary Medical Association.
Baran, B. E., Allen, J. A., Rogelberg, S. G., Spitzmuller, C., DiGiacomo, N. A., Webb, J. B., \& Walker, A. G. (2009). Euthanasia-related strain and coping strategies in animal shelter employees. Journal of the American Veterinary Medical Association, 235, 83-88.
Braun, V., \& Clarke, V. (2006). Using thematic analysis in psychology. Qualitative Research in Psychology, 3, 77-101.
Casey, R. A., Vandenbussche, S., Bradshaw, J. W. S., \& Roberts, M. A. (2009). Reasons for relinquishment and return of domestic cats (Felis silvestris catus) to rescue shelters in the UK. Anthrozoös, 22, 347-358. doi:10.2752/089279309×12538695316185.
Clark, C. C., Gruffydd-Jones, T., \& Murray, J. K. (2012). Number of cats and dogs in UK welfare organisations. Veterinary Record, 170, 493. doi:10.1136/vr. 100524.
Coe, J. B., Young, I., Lambert, K., Dysart, L., Nogueira Borden, L., \& Rajic, A. (2014). A scoping review of published research on the relinquishment of companion animals. Journal of Applied Animal Welfare Science, 17, 253-273. doi:10.1080/10888705.2014.899910.
Diesel, G., Brodbelt, D., \& Laurence, C. (2010). Survey of veterinary practice policies and opinions on neutering dogs. Veterinary Record, 166, 455-458. doi:10.1136/vr.b4798.
Diesel, G., Brodbelt, D., \& Pfeiffer, D. U. (2009). Characteristics of relinquished dogs and their owners at 14 rehoming centers in the United Kingdom. Journal of Applied Animal Welfare Science, 13, 15-30. doi:10.1080/10888700903369255.
Dolan, E. D., Scotto, J., Slater, M., \& Weiss, E. (2015). Risk factors for dog relinquishment to a Los Angeles municipal animal shelter. Animals, 5, 1,311-1,328. doi:10.3390/ani5040413.
Downes, M. J., Devitt, C., Downes, M. T., \& More, S. J. (2015). Neutering of cats and dogs in Ireland; pet owner self-reported perceptions of enabling and disabling factors in the decision to neuter. PeerJ, 3, e1196. doi:10.7717/peerj. 1196.
Eriksson, P., Loberg, J., \& Andersson, M. (2009). A survey of cat shelters in Sweden. Animal Welfare, 18, 283-288.
Frommer, S. S., \& Arluke, A. (1999). Loving them to death: Blame-displacing strategies of animal shelter workers and surrenderers. Society \& Animals, 7, 1-16.
HSUS. (2017). Pets by the numbers; U.S. pet ownership, community cat and shelter population estimates. Retrieved from http://www.humanesociety.org/issues/pet_overpopulation/facts/pet_ownership_statistics.html.
Lambert, K., Coe, J., Niel, L., Dewey, C., \& Sargeant, J. M. (2015). A systematic review and meta-analysis of the proportion of dogs surrendered for dog-related and owner-related reasons. Preventive Veterinary Medicine, 118, 148-160. doi:10.1016/j.prevetmed.2014.11.002.
Marston, L., \& Bennett, P. (2009). Admissions of cats to animal welfare shelters in Melbourne, Australia. Journal of Applied Animal Welfare Science, 12, 189-213.
Miller, D. D., Staats, S. R., Partlo, C., \& Rada, K. (1996). Factors associated with the decision to surrender a pet to an animal shelter. Journal of the American Veterinary Medical Association, 209, 738-742.
Moulton, C., Wright, P., \& Rindy, K. (1991). The role of animal shelters in controlling pet overpopulation. Journal of the American Veterinary Medicine Association, 198, 1,172-1,176.
Murray, J. K., Browne, W. J., Roberts, M. A., Whitmarsh, A., \& Gruffydd-Jones, T. J. (2010). Number and ownership profiles of cats and dogs in the UK. Veterinary Record, 166, 163-168. doi:10.1136/vr.b4712.

Murray, J. K., Skillings, E., \& Gruffydd-Jones, T. J. (2008). Opinions of veterinarians about the age at which kittens should be neutered. Veterinary Record, 163, 381-385. doi:10.1136/vr.163.13.381.
Murray, R. W., \& Speare, R. (1995). Unwanted pets: Disposal of dogs and cats in a provincial Australian city. Australian Veterinary Practitioner, 25, 68-72.
New, J. J. C., Salman, M. D., Scarlett, J. M., Kass, P. H., Vaughn, J. A., Scherr, S., \& Kelch, W. J. (1999). Moving: characteristics of dogs and cats and those relinquishing them to 12 U.S. animal shelters. Journal of Applied Animal Welfare Science, 2, 83-96.
Patronek, G., Glickman, L., Beck, A., McCabe, G., \& Ecker, C. (1996a). Risk factors for relinquishment of cats to an animal shelter. Journal of the American Veterinary Medical Association, 209, 582-588.
Patronek, G. J., Glickman, L. T., Beck, A. M., McCabe, G. P., \& Ecker, C. (1996b). Risk factors for relinquishment of dogs to an animal shelter. Journal of the American Veterinary Medical Association, 209, 572-581.
Robertson, S. A. (2008). A review of feral cat control. Journal of Feline Medicine and Surgery, 10, 366-375. doi:10.1016/j.jfms.2007.08.003.
Rogelberg, S. G., Reeve, C. L., Spitzmuller, C., DiGiacomo, N., Clark, O. L., Teeter, L., \& Carter, N. T. (2007). Impact of euthanasia rates, euthanasia practices, and human resource practices on employee turnover in animal shelters. Journal of the American Veterinary Medical Association, 230, 713-719.
Rowan, A. (1992). Companion animal demographics and unwanted animals in the United States. Anthrozoös, 5, 222-225.
Schmidt, P. M., Lopez, R. R., \& Collier, B. A. (2007). Survival, fecundity, and movements of free-roaming cats. Journal of Wildlife Management, 71, 915-919. doi:10.2193/2006-066.
Schneider, M., \& Roberts, J. (2016). Shelter-specific occupational stress among employees in animal shelters. Human-Animal Interaction Bulletin, 4, 19-38.
Shore, E. R., Petersen, C. L., \& Douglas, D. K. (2003). Moving as a reason for pet relinquishment: A closer look. Journal of Applied Animal Welfare Science, 6, 39-52.
Smith, P. (2016). Compassion Fatigue Awareness Project. Retrieved from http://www.compassionfatigue.org /index.html.
Stavisky, J., Brennan, M., Downes, M., \& Dean, R. (2012). Demographics and economic burden of un-owned cats and dogs in the UK: Results of a 2010 census. BMC Veterinary Research, 8, 163. doi: 10.1186/1746-6148-8-163.
Vučinić, M., Djordjevic, M., Teodorović, R., Janković, L., Radenković-Damnjanović, B., \& Radisavuević, K. (2009). Reasons for relinquishment of owned dogs in a municipal shelter in belgrade. Acta Veterinaria, 59, 309-317. doi: 10.2298/avb0903309v.
Weiss, E., Dolan, E. D., Garrison, L., Hong, J., \& Slater, M. (2013). Should dogs and cats be given as gifts? Animals, 3, 995-1,001. doi:10.3390/ani3040995.
Weiss, E., \& Gramann, S. (2009). A comparison of attachment levels of adopters of cats: Fee-based adoptions versus free adoptions. Journal of Applied Animal Welfare Science, 12, 360-370.
Welsh, C. P., Gruffydd-Jones, T. J., Roberts, M. A., \& Murray, J. K. (2013). Poor owner knowledge of feline reproduction contributes to the high proportion of accidental litters born to UK pet cats. Veterinary Record, 174, 118. doi:10.1136/vr. 101909.
Weng, H.-Y., \& Hart, L. (2012). Impact of the economic recession on companion animal relinquishment, adoption, and euthanasia: A Chicago animal shelter's experience. Journal of Applied Animal Welfare Science, 15, 80-90.
Ziebland, S., \& McPherson, A. (2006). Making sense of qualitative data analysis: An introduction with illustrations from DIPEx (personal experiences of health and illness). Medical Education, 40, 405-414. doi:10.1111/j.1365-2929.2006.02467.x.

