

KEEPING FISH AS PETs: PERCEPTIONS FROM FISH OWNERS IN NALLUR, JAFFNA, SRI LANKA

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1. INTRODUCTION

Having a display of colorful and fancy fish is generally known as ornamental or aquarium fish keeping (Heenatigala, 2012). Keeping fish as pets is one of the oldest, popular and a calming (Ghosh, *et al.*, 2003) hobby in the world (Heenatigala, 2012). Owning an animal as a pet and caring for its welfare is known as pet ownership (Langfield, *et al.*, 2009). Fish keeping has been practiced all over the world for many years (Balon, 2004), because fish possess an attractive shape, size and colour, suitable for a diverse environment and also offer ease of maintenance (Langfield, *et al.*, 2009). Having a home aquarium gives benefits to humans' life and health. Perceived health benefits are relief from cardio vascular diseases, welfare calmness, happiness and relaxation, induction of neurotransmitters in the brain, benefits hypearactive children and develops eyesight. The benefits of fish keeping on life also contribute to promote education and enhance the inner prettiness of households (UK essays, 2018).

In Sri Lanka, people show an interest in keeping fancy dazzling and coloured fish in houses and public places such as hospitals, military camps, banks, and many governmental and non-governmental offices. The pet shops are available in the chief cities and villages in Sri Lanka (Wijesekara and Yakupitiyage, 2001). People in Sri Lanka have kept ornamental fish in their homes for many years (Wijesekara and Yakupitiyage, 2001). But not all the fish owners have common insights on it, they have different perceptions, attributes and norms related to keeping fish in their home.

The present study aimed to collect basic information on owners' perceptions of keeping pet fish and various preferences of pet fish holders, potential constraints and challenges in aquarium keeping and possible recommendations for the identified constraints.

2. MATERIALS AND METHODS

The current study was carried out in the Nallur Divisional Secretary's area (Figure 1). Most residents of this area are Sri Lankan Tamils with the majority being Hindus and Catholics. Agriculture, government jobs and self-employment are the major economic activities in these areas.



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Figure 1: Location map of the study area (Source: Google Earth).

A qualitative study was performed for a period of three months, from September 2016 to December 2016. A draft questionnaire was prepared, pretested, and finalized by including needed relevant new information with the objectives of this study. Primary data were gathered by providing questionnaires from randomly selected pet fish owners (n = 70) in the selected study area. More detailed information were collected from books, journals and NAQDA station. The collected data were represented in the form of pie charts and tables by using Microsoft Excel (2013) analytical tool.

3. RESULTS AND DISCUSSION

The following results were obtained during the current study.

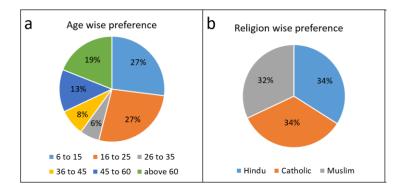


Figure 2: Preference of housekeeping aquaria according to age (a) and preference of housekeeping aquaria according to the religion (b), in 2016.

Age-wise preference

The study found that those in age group category 6 - 25 (27%) preferred to have a home aquarium (Figure 2a). This age category mainly includes school going and university students where they are interested in aquarium keeping as a hobby and leisure time activity. 19% of the elders (above 60) are interested in housekeeping aquaria. Most of them are pensioners and senior citizens, who spend their time on household aquaria for their relaxation. The lowest percentage (6%) falls into the age category 26 to 35, as they spent more time on their profession.

Religion-wise preference

The present study revealed that housekeeping aquaria are popular among the different religious people as it is a stress relief and enjoyable hobby (Figure 2b). Almost all individuals have the same involvement in keeping household aquarium.

Type of water medium

It was found that freshwater was the most desired medium for keeping aquarium fish in the studied area, the percentage was 100%. The home aquarium owners are not interested in keeping marine or brackish water fish because of the problems in accessibility, proximity and transportation of water. Groundwater is the only freshwater resource in the Jaffna peninsula which is readily available. Kidd and Kidd (1999) found that marine aquaria are expensive, time consumable and need wide knowledge and skills to operate and maintain at home.

Types of fish

The studied population (Figure 3a) were interested in keeping as pets Goldfish (17%), Guppy (15%), Dwarf Gourami (15%) and Angel (14%) in housekeeping aquaria. The preference is ordered according to the colour, size, price, performance, sex and food and feeding. The lowest demanded was shown for Lucky fish, because of its highest price. Wijesekara and



Yakupitiyage (2001) reported that in the Sri Lankan local market, the highest demand is for goldfish, followed by swordtails, guppies, carps and platies. Fighters, sharks and catfish are in less demand, mainly due to their high prices. Marine fish breeding is a difficult task to achieve at breeding centers, because of that they mainly depend on the wild catch. Due to this limited supply of marine ornamental fish their price is high, because of that there is a low local demand for such fish and only a limited number of people in Sri Lanka keep them at home.

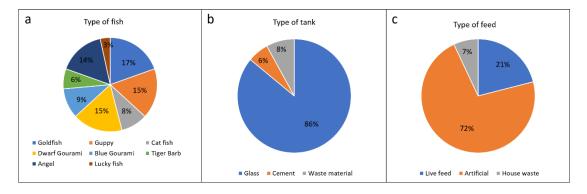


Figure 3: Types of fish kept by respondents (a), Types of tanks kept by respondents (b) and Types of feed used by respondents (c) in 2016.

Types of tanks

Most of the surveyed preferred glass tanks (86%) for housekeeping aquaria (Figure 3b) because of accessibility, transparency, ease of maintenance and less construction cost. A smaller proportion (6%) used cement tanks, due to high construction cost, immobility and the non-visibility of fish.

Types of food and methods of feeding

Most of breeders chose artificial feed (72%) (Figure 3c) because of its feed-ability, presence of adequate nutrition availability and accessibility in the market. 7% of the target group used house waste as feed for a variety of fish due to lack of knowledge.

Reasons for keeping fish as pets

Table 1: Reasons for keeping fish as pet

Percentage (%)	
18	
66	
05	
03	
08	
	18 66 05 03

Most of the participants engage in fish ownership as a hobby (Table 1), because it gives happiness, calmness, peace and escape from the competitive challenging world. Miller – Mogan (2010) listed fish keeping as the second most popular hobby in United states. The changes in human lifestyle, availability of ornamental fish, less initial installation and maintenance cost are the reasons for the fondness of aquarium keeping as a hobby. Aquariums have become a sought-after hobby in the world as limitations on keeping pets such as cats and dogs in concentrated apartments (Dey, 2016) have posed a challenge for its popularity.



Identified Constraints

Fish owners who responded to the survey reported that diseases, lack of proper knowledge in maintenance of aquarium fish especially monitoring the changes of water quality, proper interval feeding, cleaning and requirement of cost for purchasing accessory equipment such as aerators and filters are the major challenges faced in pet fish ownership.

Solutions for identified Constraints

Providing proper awareness for home aquarium owners through brochures, leaflets, videos and newspapers, creating paid jobs related to fish tank maintenance to provide a worthy service for pet owners, promoting animal welfare and health and functioning a separate unit at pet shops to educate buyers regarding management and maintenance of aquariums in the home will be the possible solutions to overcome the challenges faced by the pet fish keepers.

4. CONCLUSION

This study has found that fish pet owning is a popular hobby practiced in Jaffna. The findings reveal that people of the younger age category choose to be involved in this ornamental fish guardianship. This study leads to the understanding that most of the surveyed prefer freshwater glass tanks, artificial feed and low-cost fancy fish in home aquarium.

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