

Clinical Management of Anorexia in a Hua Luo Han Cichlid: A Case Study

C. M. Bhadesiya¹, R. G. Kantia², Mitesh Bhatia³, A. B. Patel⁴

¹Ph. D. Scholar, Department of Veterinary Medicine, C.V. Sc. & A.H., A.A.U., Anand, Gujarat

²M.V.Sc. Department of Surgery & Radiology, C.V. Sc. & A.H., A.A.U., Anand, Gujarat

³M.V.Sc. Scholar, Department of Surgery & Radiology, C.V. Sc. & A.H., A.A.U., Anand, Gujarat

⁴M.V.Sc. Scholar, Department of Veterinary Pathology, C.V. Sc. & A.H., A.A.U., Anand, Gujarat

Abstract: Increasing interest has been observed among Feng shui believers around areas of Anand, Gujarat to keep Hua Luo Han Cichlid, a hybrid fish. Present report describes some information about the fish and a case report of management of anorexia. The cichlid was kept in an in-house aquarium and reported to be off-feed for 6 days with observable behavioral changes. Fish was treated accordingly which resulted in uneventful clinical recovery. Since there is a lacuna in available information on diseases and disorders of this species, an effort has been made by using available resources.

Keywords: Hua Luo Han Cichlid, Anorexia, Anand, Gujarat.

I. INTRODUCTION

Hua Luo Han Cichlid:

Hua Luo Han cichlid, also popular as 'The Flowerhorn Fish' is being preferred by Feng shui believers for in-house aquariums. It is an ornamental aquarium-fish known for its color and the distinctively shaped head (*i.e.*, nuchal hump), for which it is named. The present report deals with a case of Hua Luo Han cichlid (Figure-01) with anorexia for past 6 days. Raised and managed well on commercial feed, the fish was reportedly debilitating with reduction in body size. The case was managed accordingly.



Characteristics:

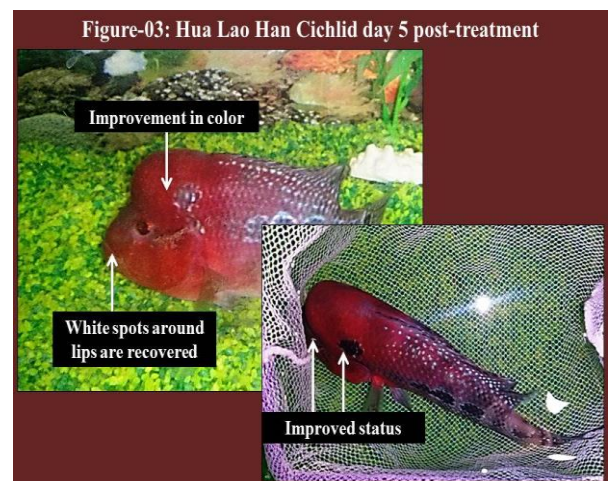
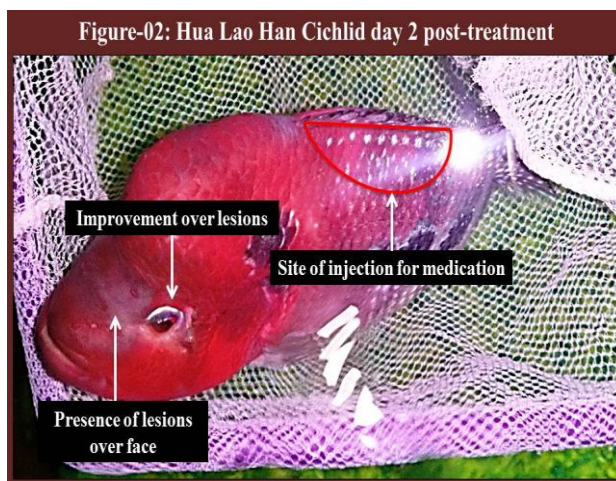
The most popular color preferred by Feng shui believers is red; however, other colors may include yellow, orange, blue and silver.

Both, males and females have kock or nuchal hump on forehead region. Mouth parts of males are more pronounced than females. Males are larger and brighter as compared to females. Male fish have more vivid colors while female fish have black dots on their dorsal fins. Males have longer anal and dorsal fins as compared to females. During breeding time, belly region of female may appear orange in color.

Factors to be considered:

Various factors including temperature, pH of water, oxygenation, feeding, tank environment, filtration system etc. should be considered before raising a Hua Luo Han cichlid in an in-house aquarium. It is very aggressive and territorial in nature and hence, coexistence of other fish should be avoided.

The aquarium should be well equipped with effective filtration system. Ideally, the filtration system should be regularly cleaned and should be protected from clogging. Due to presence of factors like feed in excreta, no filtration system will be able to clean water 100% and frequent changes in water of aquarium becomes must. At least 20% of water should be replaced daily.



A well-known fact is the coloration of the body in this cichlid is associated with diet being offered. Hua Luo Han cichlid has good appetite and a well-developed digestive system and it can easily be raised on commercial food or live food. Mixture of live food as well as pallet can also improve health status. Small quantity of food several times a day should be offered to the fish for better outcomes.

The pH of the water should be checked on regular basis as the food provided to the fish, excreta as well as some environmental contaminants (especially aquarium without cover) can alter the pH which may further affect normal behavior of the fish. A stressed fish can show reduced color intensity, reduced size of head and stunted growth.

It becomes essential to provide the cichlid an environment 'at home' for which, aquarium salts can be preferred. Addition of salts not only acts as disinfectant but also kills certain parasites. Deworming should be practiced on monthly basis.

The cichlid can be affected by various infectious as well as non-infectious conditions including white spot disease, hole-in-the-head disease, fungal diseases, dropsy, fin and tail rot disease, velvet disease, air bladder disease, etc. However, little scientific information is available in literature regarding status of various diseases and disorders of Hua Luo Han cichlid.

II. MATERIALS AND METHODS

The clinical approach included anamnesis, clinical examination, observation of aquarium management and therapy. Anamnesis included the fish being off-feed from a long period, peculiar change in behavior as to seek corners of the aquarium and change in color as shown in Figure-01.

Commercial diets being offered to the fish and aquarium were evaluated for assessing management practices.

The fish was treated with multivitamins intramuscularly (Figure-02). Owners were advised for feeding, housing and management practices and to strictly follow the therapeutic regimen.

III. RESULTS AND DISCUSSION

The fish can survive in a temperature ranging between 25°C - 32°C. The temperature in aquarium was 27°C. Pure water ideally will have neutral pH; however, this cichlid can survive in aquarium water with alkaline pH ranging between 7.5 and 8.0. The pH of aquarium water was 7.1. Both, temperature and pH in aquarium were appropriate for maintaining natural growth in this aquarium, but the electric current supply for the light provided inside the aquarium was functioning improperly, directly affecting the fish. Right pectoral fin was underdeveloped with less mobility. Water inside the aquarium was apparently clean but on evaluation, was reported to have certain solutes. These three factors were responsible for change in behavior of the fish. Considering anorectic condition, the fish was injected with multivitamins for 5 days, intramuscularly. A combination of therapy with multivitamins as well as change in aquarium management lead to uneventful clinical improvement with a well regained normal behavior on 5th day post-treatment (Figure-03).

IV. CONCLUSIONS

Keeping Hua Luo Han cichlid as a pet or companion has made it prone and vulnerable to different diseases and disorders. Lack of knowledge among keepers can be one of the primary reasons for this. Awareness should be created among keepers regarding aquarium and feeding management of Hua Luo Han cichlid. Present report deals with a single case management. Further research may reveal significant

REFERENCES

- [1]. R. H. Devlin and Y. Nagahama, "Sex determination and sex differentiation in fish: an overview of genetic, physiological and environmental influences," *Aquaculture*, Vol. 208, pp. 191-364, 2002.
- [2]. R. E. Gozlan, R. E. Britton, I. Cowx and G. H. Copp, "Current knowledge on non-native freshwater fish introductions," *Journal of Fish Biology*, Vol. 76, pp. 751-786, 2010. Information upon similar type of investigations on large scale.