

A Case Report on Aspiration Pneumonia in Mare

Neelam*, Jai Bhagwan, Ricky Jhambh and V. K. Jain

Department of Veterinary Medicine

LLR University of Veterinary and Animal Sciences, Hisar – 125004, Haryana

*Corresponding Author E-mail: neelamaps2011@gmail.com

Received: 7.01.2019 | Revised: 10.02.2019 | Accepted: 15.02.2019

ABSTRACT

A mare of about four years age was presented to VCC, LUVAS, Hisar with the history of inappropriate administration of medication. On admission the mare was dull, anorectic, pyrexia, tachypnoeic, tachycardiac, dyspnoeic and coughing. Auscultation of the lungs revealed crackling sounds and radiographic examination revealed pneumonic changes in lungs. The mare was treated with inj. ceftriaxone 10 mg/kg b.wt. I/M inj flunixin meglumin 1mg/kg b.wt I/M, inj Ascorbic acid 20 mg/kg b.wt. I/M and steam inhalation with levolin capsules; along with oral administration of electrolyte cough and catone powder for seven days. Mare started feeding after two days of treatment and recovered completely after fourteen days of treatment.

Key words: Respiratory; Aspiration; Pneumonia; Treatment; Ceftriaxone.

INTRODUCTION

Aspiration pneumonia is a common and serious disease of animals. Pneumonia is inflammation of the pulmonary parenchyma usually it is accompanied by involvement of bronchioles (Broncho-pneumonia) and often pleurisy (Pleuro-pneumonia). Clinically, it is manifested by an increase in the respiratory rate, changes in the depth and character of respirations, coughing, abnormal breath sounds in auscultation. Based up on the etiology pneumonia may be of various types eg. bacterial viral, parasitic, aspiration, allergic, hypo plastic etc. Among all other diseases, pneumonia causes high mortality in

animals¹. The most common cause of aspiratory pneumonia is inappropriate administration or improper drenching technique of medicine by inexperienced persons. Administration of liquids by drench or dose syringe must not be given faster than the swallowing capacity of animals, and drenching is particularly dangerous when the animals tongue is drawn out, when the head is held high, and when the animal is coughing or bellowing². Inappropriate administration leads to passage of liquid into lungs and liquid penetrates to the depth of alveoli and run freely into the dependent portions and, aspiratory pneumonia often results³.

Cite this article: Neelam, Bhagwan, J., Jhambh, R. and Jain, V. K., A Case Report on Aspiration Pneumonia in Mare, *Int. J. Pure App. Biosci.* 7(1): 154-156 (2019). doi: <http://dx.doi.org/10.18782/2320-7051.7306>

The animal owners are fully ignorant about the consequences of forceful administration of feeds and medicines to the animals⁴. The present case represents the aspiratory pneumonia in mare and its treatment.

CASE HISTORY AND LABORATORY FINDINGS

A four years old mare was presented to VCC, LUVAS Hisar with the history of inappropriate administration of medication. One day before mild colic signs were observed by owner and the mare was treated for the same. Owner inappropriately (through nares) and forcefully administered a commercially available liquid of surfactant and antiflatulent 100 ml. During administration, mare struggled and it got external injury on nares (Figure1), and during struggling spillage of some liquid occurred. After that the mare was dull, anorectic, pyrexia (103°F), tachypnoeic, tachycardiac, dyspnoeic and coughing. Auscultation of the lungs revealed crackling sounds over the lower half area of the both lungs. On clinical examination respiration rate was found to be 40 per minute and pulse rate 60 per minute. Blood sample was collected for haematological examination from jugular vein in ethylenediamine-tetraacetic acid (EDTA) vial. Haematological analysis revealed haemoglobin - 11.3 gram per cent, total leucocyte count (TLC) – 12.17 x 1000 cmm, relative differential leucocyte count revealed (DLC) N - 84, L-16, M-0 and E-0. On microscopic examination of blood smear no haemoprotozoan parasite was observed. Radiographic examination of thoracic region was also conducted to find any abnormality. It

revealed ground glass appearance in thoracic cavity, which indicates presence of cells or fluid filling the alveolar space representing the pneumonic condition (Figure 2).

TREATMENT AND DISCUSSION

Clinical history and clinical examination of mare revealed dullness, anorexia, tachypnoea tachycardia, dyspnoea and coughing. Haematological analysis revealed neutrophilia. Scarratt *et al*³. also observed neutrophilia in a 14-month-old filly, which was inappropriately administered by the owner. The mare was presented with the history of colic therefore it was administered flunixin meglumin 1 mg/kg b.wt. I/M immediately and after haematological analysis the animal was treated with inj. ceftriaxone 10 mg/kg b.wt. I/M, inj. flunixin meglumin 1 mg/kg b.wt I/M, inj ascorbic acid 20 mg/kg b.wt I/M (for seven days) and steam inhalation to the animal was recommended with levolin capsules. An indigenous preparation of stomachic powder (catone powder) 50 gm b.i.d. per oral was recommended to alleviate anorexia, microbial imbalance and indigestion. Electuary catcough was recommended 25 gm b.i.d. per oral for seven days.

Colic signs were not observed after administration of therapy. Mare started feeding after two days and respiratory distress started to resolve slowly. After five days of treatment mare showed good appetite and respiration become almost normal but slight coughing was observed. Steam inhalation with levolin capsules was continuously given until the cough resolved. Mare completely cured in fourteen days.



Figure 1



Figure 2

CONCLUSION

This case report represents a bad practice of animal owner's of inappropriate administration of medications leading to aspiration pneumonia in animals. The animals should be restrained adequately and nasogastric intubation should be performed by experienced veterinarians to prevent unnecessary suffering to animals. The successful outcome of the therapy may be helpful to the field veterinarians in treating the cases of aspiration pneumonia.

REFERENCES

1. Chakrabarti, A., Text Book of Clinical Veterinary Medicine. 3rd Edition. Kalyani Publishers, New Delhi-110002. pp. 360-419 (1994).
2. The Merck Veterinary Manual, Aspiration Pneumonia. 7th Edition. Merck and Co., Inc. Rahway, N. J., USA. 709-710 (1991).
3. Radostits, O. M., Gay, C. C., Hinchcliff, K. W. and Constable, P. D., *Veterinary Medicine: A textbook of the diseases of cattle, horses, sheep, pigs and goats*, 10th Edition, Elsevier, Philadelphia. (2007).
4. Ahsan, M. M., Hasan, M. B. and Biswas, M. A. A., A case report on aspiration pneumonia of a jamunapari buck. *Int. J. Sustain. Agril. Tech.* **6(7)**: 19-21. (2010).
5. Scarratt, W. K., Moon, M. L., Sponenberg, D. P. and Feldman, B., Inappropriate administration of mineral oil resulting in lipoid pneumonia in three horses. *Equine Vet. J.* **30(1)**: 85-88 (1998).