## A Retrospective Study of Sterile Panniculitis in Ten Dogs: Diagnostic Evaluations and Clinical Outcomes

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**Purpose:** The purpose of this study was performed to review the causes, clinical features, cytologic findings, histopathologic findings, and treatment outcomes of panniculitis in ten dogs.

Materials and Methods: The medical records of dogs diagnosed with panniculitis at the Veterinary Medicine Teaching Hospital of Konkuk University from 2007 to 2008 were reviewed.

Results: The included breeds were Shih tzu (n=3), Yorkshire terrier (n=2), Poodle (n=2), Pekinese (n=1), Cocker spaniel (n=1), and Maltese (n=1). The mean age was  $7.4 \pm 4.1$  (mean  $\pm$  SD) years with a range from 3 to 15 years. The lesions were solitary (n=5, 55.6%) or multiple (n=4, 44.5%) deep cutaneous nodules that were not painful. The most common affected region was dorsum (n=6, 60%). Well circumscribed and firm nodules were noted in 7 cases (70%) and ill defined and soft nodules were shown in 3 cases (30%). There were histories of atopic dermatitis in 4 (40%), acute pancreatitis in 2 cases (20%), primary hypoadrenocriticism in one. Bacterial and fungal cultures of the nodule in all of the cases were negative. Even though fine needle aspiration smears revealed benign or malignant mesenchymal cells in all of the firm nodules (n=7, 70%). These cases were diagnosed as panniculitis by histopathologic examination. Pyogranulomatous inflammation or phagocytic addipose cells were shown on cytologic examinations of other cases. On histopathologic examination, panniculitises were confirmed. Topical glucocorticoids were prescribed in 5 cases including pancreatic panniculitis and systemic immune suppressive therapies were applied on 3 cases. The lesions were resolved in all cases within 1 week,

**Conclusion:** Histopathology is a core diagnostic method to confirm diagnosis and topical steroids therapy is useful in canine sterile panniculitis.

Key words: cytology, dog, histopathology, panniculitis, nodule.

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