

InClover Grin® dental health for dogs, clinical data

The American Veterinary Hospital Association studies show that 80% of dogs age two and older are affected by dental disease. Many canine dental problems result from bacterial build up (plaque) that, if left unchecked, turns to tartar. Oral diseases can be quite painful, resulting in difficulty eating, drinking, and grooming. Bacteria residing in the mouth may gain access to the bloodstream and cause damage to the heart, kidneys, and liver. To combat these problems, Clover has developed a Dental health soft chew supplement for canines using a proprietary formula of green tea, anise, prebiotics and chlorophyll that work to reduce plaque buildup, support gum health and improve oral freshness.

Camellia sinensis (Green tea) has been shown to kill bacteria in the mouth and prevent the buildup of plaque and tartar (6)(7). It prevents the adherence of cariogenic bacteria namely *S. mutans*, *A. actinomycetemcomitans*, *P. gingivalis*, *P. intermedia* and *L. acidophilus* through the production of glucans and polyphenolic compounds (5)(3)(2). Polyphenols also assist in addressing the symptoms of gingivitis by stimulation of anti-inflammatory and antioxidant activities (4)(5).

Studies show that *Pimpinella anisum* (Anise) is an effective bactericide and inhibits the growth of *Actinomyces viscosus* (18), a pathogen responsible for bad breath that colonizes in the mouth (19) (20).

Organic inulin prebiotic works to stimulate the growth of beneficial native strains such as *Bifidobacterium*, a genus of bacteria considered beneficial to health (21)(22). In doing so, it fortifies the intestinal flora which aligns and freshens the healthy balance of the intestine (23).

Several studies show that plant chlorophyll is a powerful antimicrobial that inhibits the growth of common bacteria responsible for oral infections and poor dental health (24)(25). As a result chlorophyll can help to improve the overall health of the mouth as well as eliminate bad breath associated with bacterial buildup (26).

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