# **Physiology of Domestic Rabbits**

## Visaria Gitelman\*

Department of Veterinary Medicine, Iowa State University, Iowa, USA

## Editorial

Received: 06-Jan-2022, Manuscript No. JVS-22-52181; Editor assigned: 10-Jan-2022, PreQC No. JVS-22-52181(PQ); Reviewed: 20-Jan-2022, QC No. JVS-22-52181; Accepted: 24-Jan-2022, Manuscript No. JVS-22-52181(A); Published: 31-Jan-2022, DOI: 10.4172/2581-3897.6.1.005

#### \*For Correspondence:

Visaria Gitelman, Department of Veterinary Medicine, Iowa State University, Iowa, USA

#### E-mail: visaria.gitelmen@gmail.com

## DESCRIPTION

A domestic rabbit (*Oryctolagus cuniculus*) is a subspecies of European rabbit that is commonly known as a pet hare, rabbit or bunny. A buck is a male hare; a doe is a female, and a young bunny. A pet hare that lives among the lagomorphs is not the same as a pet rat. The Greeks used rabbits for food and hide, and since the eighteenth century, they have been kept as pets in Western countries <sup>[1-3].</sup>

Rabbits can be placed in experimental cages, but in recent years, internet media has campaigned for free roaming in a hare-sealed zone. Beginning in the 1980s, the idea of a home grown rabbit as a house companion, a putative house hare similar to a house feline, was floated. Bunnies can be litter box trained and taught to come when called, but they take time to master and can do damage to a home that has not been "hare sealed" due to their natural desire to bite. Some of them are eventually adopted and become household pets in various forms. Pet hares are prohibited in Queensland because they have gotten too obtrusive in Australia <sup>[4-6].</sup>

## **Research & Reviews: Journal of Veterinary Sciences**

Bucks are male hares, whereas does are female hares. Coney is a more common phrase for an adult hare, whereas rabbit used to refer solely to young animals. A young bunny is called a leveret, and a young hare is also called a leveret from time to time. A "province" or a "home" is a gathering of hares <sup>[7]</sup>.

#### Digestion

Bunnies have an expanded cecum because they are hindgut fermenters. After a hare eats, the food passes down the throat and through the cardia, a little valve. This valve is very articulated in bunnies, and it prevents the hare from regurgitating. After passing through the cardia, the food enters the stomach. The food next travels to the stomach and small intestine, where the majority of supplement extraction and assimilation occurs. The food then goes into the colon and finally into the cecum. Stringy and non-sinewy particles are separated by peristaltic muscle constrictions (floods of movement).

The non-stringy particles are next sent into the colon, *via* the illeo-cecal valve, and into the cecum in reverse order. Harmonious tiny organisms in the cecum aid in the further breakdown of non-stringy particles into a more metabolically useful substance. A fragile waste "pellet" termed a cecotrope is ejected from the bunny's butt after only three hours. The bunny swallows these grape-like pellets without biting them, which keeps the mucous covering in perfect condition. This covering protects the nutrient and supplement-rich microorganisms from stomach corrosive bacteria until they reach the tiny digestive system, where the cecotrope's supplements can be absorbed <sup>[8].</sup>

The delicate pellets include a sufficient amount of essential supplements for the bunny's health. Vitamin B and several vitamins are abundant in this sensitive stool. Coprophagy is critical to a bunny's stomach-related well-being since it is one of the primary ways that a hare obtains vitamin B in a form that is beneficial to its stomach-related well-being. Occasionally, the hare could leave these pellets lying around its enclosure; this activity is benign and often related with an abundant food supply <sup>[9].</sup>

Discontinuous delicate cecotropes are formed when caecal pellets are wet and runny (semi-fluid) and attach to the hare and its surroundings. This is different from regular loose bowels, and it's usually caused by a diet that's too high in carbs or too low in fibre. Lettuce, cucumbers, and tomatoes, for example, are delicate natural products or salad ingredients that could be a source of contamination <sup>[10,11]</sup>.

## REFERENCES

1. Caporgno MP, et al. Trends in microalgae incorporation into Innovative food products with potential health benefits. Front Nutr. 2018;5:58.

2. Newman DJ, et al. Natural products as sources of new Drugs over the nearly four decades from 01/1981 to 09/2019. J Nat Prod. 2020;83:770-803.

# **Research & Reviews: Journal of Veterinary Sciences**

3. Sansone C, et al. Promises and challenges of microalgal antioxidant production. Antioxidants (Basel). 2019;8:199.

4. Galasso C, et al. Microalgal derivatives as potential nutraceutical and food supplements for human health: A focus on cancer prevention and interception. Nutrients. 2019;11:1226.

5. Falaise C, et al. Antimicrobial compounds from eukaryotic microalgae against human pathogens and diseases in aquaculture. Mar Drugs. 2016;14:159.

6. Carbone DA, et al. Evaluation of microalgae antiviral activity and their bioactive compounds. Antibiotics (Basel). 2021;10:746.

7. Tabarzad M, et al. Anti-inflammatory activity of bioactive compounds from microalgae and cyanobacteria by focusing on the mechanisms of action. Mol Biol Rep. 2020;47:6193-6205.

8. Gomez-Zorita S, et al. Anti-Obesity effects of macroalgae. Nutrients. 2020;12:2378.

9. Dahms I, et al. Safety of a novel feed ingredient, algal oil containing EPA and DHA, in a gestation-lactation-growth feeding study in beagle dogs. PLoS One. 2019;14:e0217794.

10. Saadaoui I, et al. Microalgal-based feed: promising alternative feedstocks for livestock and poultry production. J Anim Sci Biotechnol. 2021;12:76.

11. Vuorinen A, et al. Safety of algal oil containing EPA and DHA in cats during gestation, lactation and growth. J Anim Physiol Anim Nutr (Berl). 2020;104:1509-1523.