浅谈蜂产品的化学成分和生物学功能

摘 要:

关键词:

Discussion on the Chemical Constituents and Biological Functions of Bee Products

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Abstract: Bee products are products of bees, which can be divided into three categories based on their source and formation, including: honey, propolis, and bee pollen collected by bees; Bee secretions: royal jelly, beeswax, and bee venom; Bees grow and develop their own bodies in various insect states: bee larvae, bee pupae, etc. In this article, bee products mainly explore two types of substances: bee collections and bee secretions. Bee products have unique biological functions, and research has shown that natural bee products play an important role in promoting digestion, enhancing immunity, improving sleep quality, and improving skin condition. These biological characteristics are related to the flavonoid compounds they contain, such as poplar extract, apigenin, kaempferol, quercetin, galangin, and naringin. The chemical components of bee products directly affect their biological functions. This article will review the research progress of chemical components in bee products, providing reference for further research on the nutritional value and biological functions of bee products.

Key words: bee products; flavonoids; chemical composition; nutritional value; biological functions

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3 蜂花粉的化学成分和生物学功能

2 蜂胶的化学成分和生物学功能

5 蜂蜡的化学成分和生物学功能

4 蜂王浆的化学成分和生物学功能

6 蜂毒的化学成分和生物学功能

7 结语

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高效液相色谱——串联质谱法在蜂王浆高风险药物残留检测中的应用

摘 要：

关键词：

Application of high performance liquid chromatography-tandem mass spectrometry in royal jelly high-risk drug residue detection

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Abstract: As a kind of natural green health product, royal jelly is favored by consumers at home and abroad. Along with the domestic and foreign standard to the high-risk drug residue limit request enhancement in the royal jelly, the demand for its detection technology is also getting higher and higher. High performance liquid chromatography-tandem mass spectrometry (HPLC-MS/MS), with its advantages of rapidity, high sensitivity, high selectivity, is widely used in royal jelly high-risk drug residue detection. This technology has played a unique technical advantage in the detection of trace components in complex matrix of royal jelly. This paper reviewed the application and progress of HPLC-MS/MS in royal jelly high-risk drug residue detection, and prospected its future application potential and development prospects, so as to provide reference for the promotion and application of HPLC-MS/MS technology in the field of royal jelly high-risk drug residue detection.

Key words: high performance liquid chromatography-tandem mass spectrometry; royal jelly; high-risk; drug residues

1 引言