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游离棉酚对鸡蛋品质的影响及其脱除方法研究进展

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Research Advances on the Effects of Free Gossypol on Egg Quality and Its Removal Method

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摘要 棉籽粕为工业提取棉籽油后的残渣, 含较高粗蛋白质和代谢能, 是家禽饲料中较理想的豆粕替代品。但其中的游离棉酚 (FG) 会沉积于鸡蛋中, 恶化蛋品质, 严重影响鸡蛋的可接受性, 并可能危害人体健康; 同时也限制了棉籽粕在家禽饲料中的用量。因此, 本文拟对棉酚的结构及毒性、FG对鸡蛋品质的影响及其脱除方法做一简要综述, 并进一步指出需要解决的问题, 为FG在蛋品质方面的后续研究提供参考。

关键词: 蛋品质 棉籽粕 游离棉酚 脱毒

Abstract: The residue of cottonseed after oil extraction processing known as cottonseed meal is a fairly good source of protein and metabolizable energy. But free gossypol (FG) seriously affects the acceptability of the egg, and even further endangers human health, as well as seriously lowers the application of cottonseed meal in layer diets. In this paper, the structure and toxicity of gossypol, and the effects of FG on egg quality and its removal method were summarized.

Keywords: egg quality, cottonseed meal, free gossypol, detoxification

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