

## 玉米CMS分子生物学研究进展

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收稿日期 修回日期 网络版发布日期 接受日期

**摘要** 本文对玉米CMS研究已获得的、并为普遍接受的分子生物学研究结果进行了粗略总结;对近年来在玉米细胞质雄性不育育性相关核基因的分子标记定位、克隆及辅助选择,育性相关胞质基因的克隆与表达方面的研究进展进行了简要概述;我们认为在今后一段时期,玉米CMS研究将着重围绕核不育基因的克隆及表达模式、线粒体功能基因组、育性相关胞质基因与核育性基因相互作用等方向进行研究,以期阐述玉米CMS的形成机理。

Progress of Molecular Biology of CMS in Maize

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**Abstract:**In the paper, we have summarized the molecular biological accomplishment acquired and accepted by most of maize researchers on CMS of maize. A brief review of current molecular biological progress of CMS of maize are displayed in the paper. These progresses concern in the positioning, cloning and marker-assisted selection of nucleic genes associated with fertility, expression and cloning of cytoplasmic genes associated with male sterility. In order to elucidate the molecular mechanism of CMS of maize, the areas about cloning and expression profiling of male sterile nucleic genes, and functional genomics of mitochondria, and interaction cytoplasmic genes with nucleic genes will need to be researched in the future.

**Key words:** maize (*Zea mays* L.); CMS; mtDNA; gene associated with fertility

**关键词** [玉米 \(\*Zea mays\* L.\)](#) [CMS](#) [mtDNA](#) [育性基因](#)

分类号

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#### Abstract

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