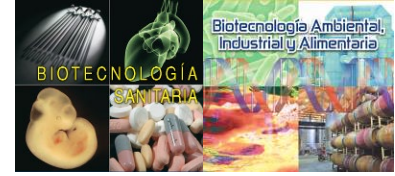


Poster

Mutagenesis in the control of virulence in *Ustilago maydis*



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ABSTRACT

Ustilago maydis is a pathogenic fungus that infects maize plant resulting in stunted plant growth and in tumors, leading to high economic losses every year. Most of the virulence related genes are clustered together in specific regions of the genome (1). As most plant fungal pathogens, *U. maydis* develops many morphological changes in order to ensure proper infection, which imply a rigorous regulation. The control of genetic programs involved in developmental changes has been typically shown to be regulated by chromatin modifying factors. The principal mechanism by which eukaryotic cells repress large chromosomal regions is through the modification of histones resulting in the formation of a transcriptionally inactive chromatin called heterochromatin. Our main aim is to know if *Ustilago maydis* owns heterochromatin too and, if through it, this fungus is able to control the expression or repression of genes related of virulence.

REFERENCES

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