

April  
2005

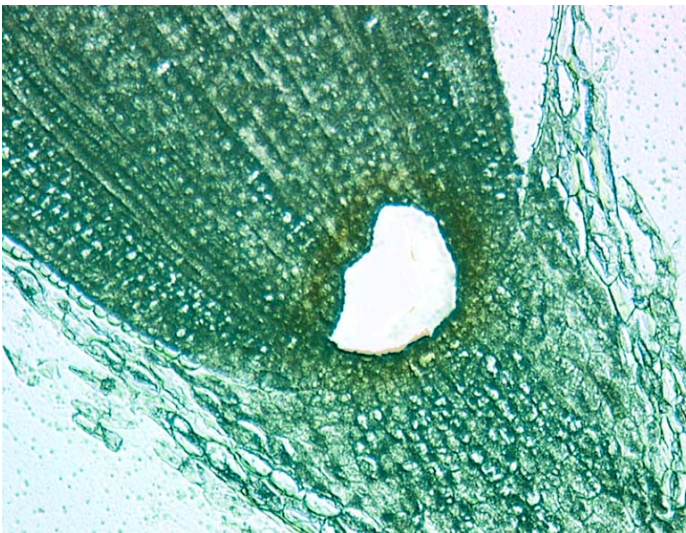
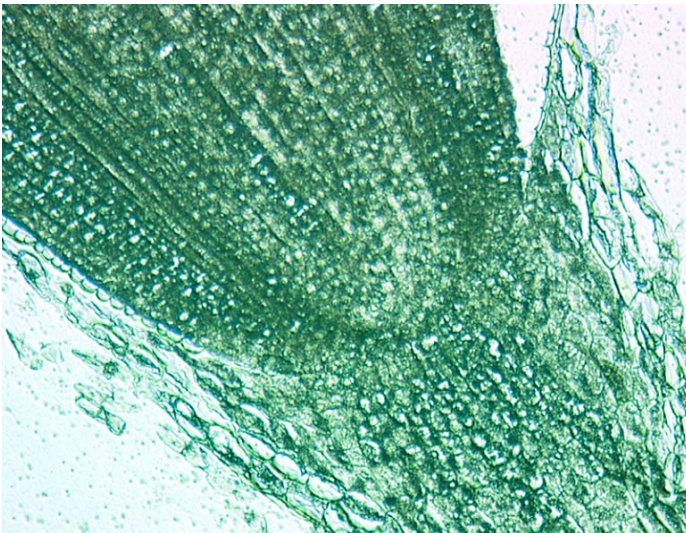
Leica Laser Microdissection  
Application Note



reSOLUTION

Laser Microdissection  
Plant Root Meristem

# Laser Microdissection of Maize Root Meristem



Use of Laser Microdissection to Isolate Plant Cells:  
Keni Jiang, Boudewijn Kruijtzter, and Lewis Feldman,  
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land Hall, University of California, Berkeley, CA 94720.

## References:

Sanders, P. M., Bui, A. Q., Le, B. H. and Goldberg, R. B.,  
Differentiation and degeneration of cells that play a  
major role in tobacco anther dehiscence, *Sexual Plant  
Reproduction*, Volume 17, 219 - 241, (2005)

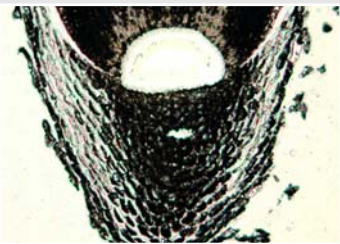
Inada, N. and Wildermuth, M. C.,  
Novel tissue preparation method and cell-specific  
marker for laser microdissection of Arabidopsis mature  
leaf, *Planta*, 2004



Direct viewing of cells recovered  
in PCR cap, 20x objective

**Laser Microdissection of different maize root regions using 20x objective.**

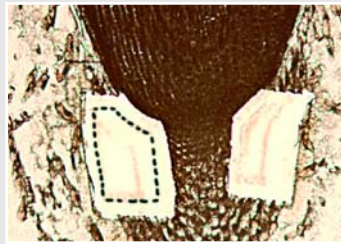
Quiescent Center



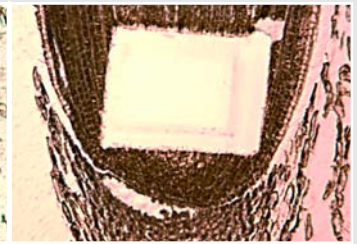
Columella



Lateral Root Cap

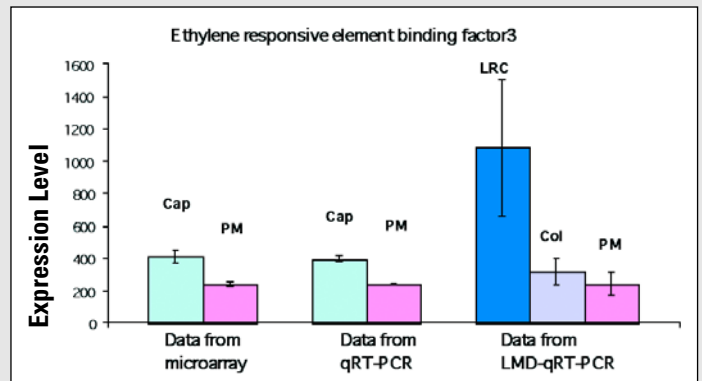
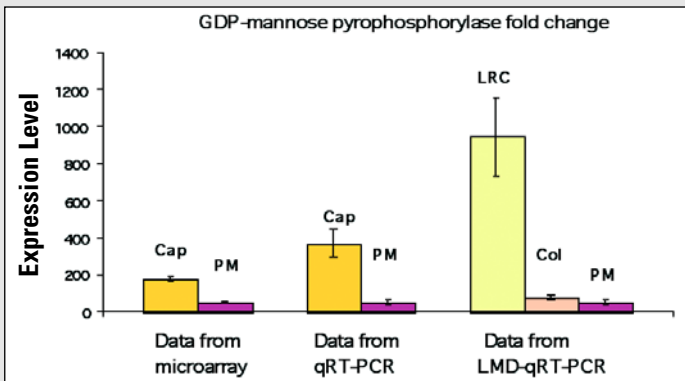


Proximal Meristem



Microdissected specimens were subjected to quantitative real-time PCR. The results of gene expression levels were compared to results obtained by conventional microarray and quantitative real-time PCR experiments.

**Data Comparison, Plant Microdissection**



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