Brazilian Oral Research
Print version ISSN 1806-8324

Abstract

NUNES, F醬io Daumas et al. Localization of *Bmp-4*, *Shh* and *Wnt-5a* transcripts during early mice tooth development by *in situ* hybridization. *Braz. oral res.* [online]. 2007, vol.21, n.2, pp. 127-133. ISSN 1806-8324. doi: 10.1590/S1806-83242007000200006.

A comparative nonisotopic *in situ* hybridization (ISH) analysis was carried out for the detection of *Bmp-4*, *Shh* and *Wnt-5a* transcripts during mice odontogenesis from initiation to cap stage. *Bmp-4* was expressed early in the epithelium and then in the underlying mesenchyme. *Shh* expression was seen in the odontogenic epithelial lining thickening, being stronger in the enamel knot area, during the cap stage. *Wnt-5a* transcripts were expressed only in the mesenchyme during the initiation, bud and cap stages, with strong expression in the dental mesenchyme during the bud stage. The present results showed that *Bmp-4*, *Shh* and *Wnt-5a* are expressed since the very early stages of tooth development, and they suggest that the *Wnt-5a* gene is expressed in different cell populations than *Bmp-4* and *Shh*.

Keywords : Odontogenesis; Tooth germ; Wnt proteins; Bone morphogenetic proteins.

?abstract in portuguese ?text in english ?pdf in english

services

custom services
Article in pdf format
Article in xml format
Article references
How to cite this article
Access statistics
Cited by SciELO
Similars in SciELO
Automatic translation
Show semantic highlights
Send this article by e-mail

Sociedade Brasileira de Pesquisa Odontol醬ica

Av. Lineu Prestes, 2227
Caixa Postal 8216
05508-900 S鋓 Paulo SP - Brazil
Tel./Fax: +55 11 3091-7810
e-Mail
bor@sbpqo.org.br