




**بیست و یکمین کنگره بین المللی فیزیولوژی و فارماکولوژی ایران**  
 ۱ تا ۵ شهریور ۱۳۹۲  
 دانشگاه علوم پزشکی تبریز

**21st International Iranian Congress of Physiology and Pharmacology**  
 23-27 August 2013  
 Tabriz University of Medical Sciences



ID :	10109
Themes :	علوم اعصاب
Title :	The role of capsaicin receptor in locus coeruleus on morphine-induced analgesia in normal morphine non-dependent rats
Authors :	Azam naderi <a href="#">farjam1</a> , Abdolrahman Sarihi <sup>2</sup> , Masoomeh Taheri <sup>1</sup> , Talieh Shirafkan <sup>1</sup> , Alireza Komaki <sup>2</sup>
Address :	1. Department of biology, Faculty of Basic Sciences- Islamic Azad University, Hamadan Branch, Hamadan, Iran 2. Neurophysiology Research Center, Hamadan University of Medical Sciences, Hamadan, Iran Nadery.azam@yahoo.com
Abstract :	<p>Introduction: Morphine inhibits activity of locus coeruleus (LC) nucleus neurons which are involved in pain modulation. Vanilloid type 1 receptors activation (TRPV1) by using different doses of capsaicin can affect time and duration of analgesia. Capsaicin (Cap) receptor (TRPV1) expressed in several brain nuclei involved in pain perception including LC nucleus. This study was done to examine the role of TRPV1 in LC on morphine-induced analgesia in normal morphine non-dependent rats.</p> <p>Methods: This study was performed on male Wistar rats. Morphine sulfate was injected intraperitoneally (10 mg/kg) once a day. Using tail flick, Von Frey and hot plate tests we investigated the role of TRPV1 receptors (Cap 10 nmol) into LC in morphine analgesia in normal rats.</p> <p>Results: Our results indicated that activation of TRPV1 receptors in LC, has no effects on morphine analgesia in normal morphine non-dependent rats ingestion.</p> <p>Conclusion: The results of present study can be used in pharmacological therapy by activation of Capsaicinoid system in patients.</p>
Keywords :	Keywords: Pain, Capsaicin, Morphine, locus coeruleus, Tail flick