

## Title (en)

A TRUNCATED INTERLEUKIN-1 RECEPTOR GENE FOR THE TREATMENT OF ARTHRITIS.

## Title (de)

ZERSTÜMMELTES INTERLEUKIN-1-REZEPTOR-GEN ZUR BEHANDLUNG VON ARTHRITIS.

## Title (fr)

GENE RECEPTEUR TRONQUE D'INTERLEUKINE-1 UTILISE POUR LE TRAITEMENT DE L'ARTHRITE.

## Publication

**EP 0563239 A4 19941012**

## Application

**EP 92902630 A 19911209**

## Priority

- US 63098190 A 19901220
- US 9109231 W 19911209

## Abstract (en)

[origin: WO9211359A1] The subject invention concerns a method of using in vivo a gene encoding an extracellular interleukin-1 binding domain of an interleukin-1 receptor that is capable of binding to and neutralizing interleukin-1 which includes employing recombinant techniques to produce a cell line under the control of a suitable eukaryotic promoter having the gene coding for the extracellular interleukin-1 binding domain of the interleukin-1 receptor; and initiating transfection of DNA of the gene by introducing viral particles obtained from the cell line directly into synovial cells lining a joint space of a mammalian host. Alternatively, synovial cells from the patient's joint may be transduced with the retroviral vector carrying the therapeutic gene and a selectable marker for selection of only transduced cells, and the now therapeutic autologous cells may be introduced back into the joint by transplantation. Additionally, a method of preparing a gene encoding an extracellular interleukin-1 receptor binding domain of an interleukin-1 that is capable of binding to and neutralizing interleukin-1 is disclosed. A compound for parenteral administration to a patient in prophylactically or therapeutically effective amounts containing the gene of the invention and a suitable pharmaceutical carrier is also provided.

## IPC 1-7

**C12N 15/00**; C07H 15/12; A61K 31/70

## IPC 8 full level

**A61K 35/24** (2015.01); **A61K 35/32** (2015.01); **A61K 35/76** (2015.01); **A61K 48/00** (2006.01); **A61P 29/00** (2006.01); **C07K 14/715** (2006.01); **C12N 5/10** (2006.01); **C12N 7/00** (2006.01); **C12N 15/09** (2006.01); **C12N 15/867** (2006.01); **A61K 38/00** (2006.01)

## CPC (source: EP)

**A61P 29/00** (2018.01); **C07K 14/715** (2013.01); **C12N 15/86** (2013.01); **A61K 38/00** (2013.01); **C12N 2740/13043** (2013.01); **C12N 2740/13045** (2013.01)

## Citation (search report)

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- [Y] EP 0318296 A2 19890531 - IMMUNEX CORP [US]
- [Y] P. ROUX ET AL.: "A versatile and potentially general approach to the targeting of specific cell types by retroviruses: Application to the infection of human cells by means of major histocompatibility complex class I and class II antigens by mouse ecotropic murine leukemia virus-derived viruses.", PROCEEDINGS OF THE NATIONAL ACADEMY OF SCIENCES OF THE USA, vol. 86, no. 23, December 1989 (1989-12-01), WASHINGTON, DC, USA, pages 9079 - 9083
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- [A] M. TSUDA ET AL.: "Retrovirus-mediated gene transfer into mouse cerebellar primary culture and its application to the neural transplantation.", BRAIN RESEARCH BULLETIN, vol. 24, no. 6, 1990, pages 787 - 792
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- See also references of WO 9211359A1

## Designated contracting state (EPC)

AT BE CH DE DK ES FR GB GR IT LI LU MC NL SE

## DOCDB simple family (publication)

**WO 9211359 A1 19920709**; CA 2098848 A1 19920621; EP 0563239 A1 19931006; EP 0563239 A4 19941012; JP H06504440 A 19940526

## DOCDB simple family (application)

**US 9109231 W 19911209**; CA 2098848 A 19911209; EP 92902630 A 19911209; JP 50285491 A 19911209