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(71) Applicants and
(72) Inventors: **BAE, Suk-Chul** [KR/KR]; #107-302 Samik Apt., Gaesin-dong, Heungduck-ku, Cheongju-si, Chungcheongbuk-do 361-240 (KR). **ITO, Yoshiaki** [JP/JP]; Department of Viral Oncology Institute for Virus-Research, Kyoto University, Sakyo-ku, Kyoto 606-8507 (JP).

(74) Agent: **LEE, Won-Hee**; 8th Fl., Sung-ji Heights II 642-16 Yoksam-dong, Kangnam-ku, Seoul 135-080 (KR).

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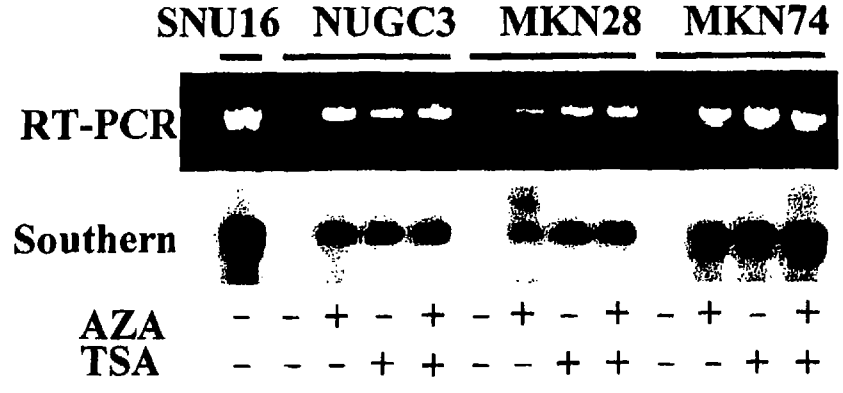
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(54) Title: RUNX3 GENE SHOWING ANTI-TUMOR ACTIVITY AND USE THEREOF



(57) Abstract: The present invention relates to a RUNX3 gene showing anti-tumor activity which is essentially involved in TGF-β dependent-programmed cell death (apoptosis) and use thereof. In addition, the present invention finds that the RUNX3 gene expression is suppressed in the various gastric cancer and lung cancer cell lines. The suppression of the RUNX3 gene expression is due to hyper-methylation of CpG island located around RUNX3 exon (1). The RUNX3 gene and its gene product of the present invention can be used effectively for the development of anti-cancer agents. CpG island around RUNX3 exon (1) could also be used not only for the development of anti-cancer agents which regulate the abnormal DNA methylation and there by induce RUNX3 expression but also for the development of methods for cancer diagnosis by measuring the abnormal DNA methylation.

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