Accepted Manuscript

Title: Interleukin 2 and interleukin 10 function synergistically to promote CD8⁺ T cell cytotoxicity, which is suppressed by regulatory T cells in breast cancer

Authors: Xiaogang Li, Ping Lu, Bo Li, Wanfu Zhang, Rong Yang, Yan Chu, Kaiyuan Luo

PII: \$1357-2725(17)30049-3

DOI: http://dx.doi.org/doi:10.1016/j.biocel.2017.03.003

Reference: BC 5089

To appear in: The International Journal of Biochemistry & Cell Biology

Received date: 16-11-2016 Revised date: 31-1-2017 Accepted date: 3-3-2017

Please cite this article as: Li, Xiaogang., Lu, Ping., Li, Bo., Zhang, Wanfu., Yang, Rong., Chu, Yan., & Luo, Kaiyuan., Interleukin 2 and interleukin 10 function synergistically to promote CD8+ T cell cytotoxicity, which is suppressed by regulatory T cells in breast cancer. *International Journal of Biochemistry and Cell Biology* http://dx.doi.org/10.1016/j.biocel.2017.03.003

This is a PDF file of an unedited manuscript that has been accepted for publication. As a service to our customers we are providing this early version of the manuscript. The manuscript will undergo copyediting, typesetting, and review of the resulting proof before it is published in its final form. Please note that during the production process errors may be discovered which could affect the content, and all legal disclaimers that apply to the journal pertain.



Interleukin 2 and interleukin 10 function synergistically to promote CD8⁺ T cell cytotoxicity,

which is suppressed by regulatory T cells in breast cancer

Xiaogang Li¹, Ping Lu², Bo Li¹, Wanfu Zhang¹, Rong Yang¹, Yan Chu¹, Kaiyuan Luo¹

¹Department of General Surgery, The Second People's Hospital of Yunnan Province, Kunming,

Yunnan 650021, China

²Science and Education Division, The Second People's Hospital of Yunnan Province, Kunming,

Yunnan 650021, China

Corresponding author

Ping Lu

Science and Education Division,

The Second People's Hospital of Yunnan Province,

176 Qingnian Road, Kunming, Yunnan 650021, China

Email: pinglukm003@qq.com

Short title: IL-10 and breast cancer.

Abstract

The precise role of interleukin (IL)-10 in breast cancer is not clear. Previous studies suggested a

tumor-promoting role of IL-10 in breast cancer, whereas recent discoveries that IL-10 activated

and expanded tumor-resident CD8⁺ T cells challenged the traditional view. Here, we investigated

the role of IL-10 in HLA-A2-positive breast cancer patients with Grade III, Stage IIA or IIB in-situ

and invasive ductal carcinoma, and compared it with that of IL-2, the canonical CD8⁺ T cell

growth factor. We first observed that breast cancer patients presented higher serum levels of IL-

2 and IL-10 than healthy controls. Upon prolonged TCR stimulation, peripheral blood CD8⁺ T cells

Download English Version:

https://daneshyari.com/en/article/5511391

Download Persian Version:

https://daneshyari.com/article/5511391

<u>Daneshyari.com</u>