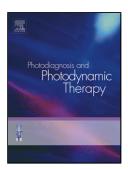
Accepted Manuscript

Title: In vitro effects of photodynamic therapyinduced by chloroaluminum phthalocyanine nanoemulsion

Author: Leonardo Pereira Franch Camila F. Amantino Maryanne T. Melo Ana Paula de Lima Montaldi Fernando L. Primo Antonio Claudio Tedesco



PII:	S1572-1000(16)30143-0
DOI:	http://dx.doi.org/doi:10.1016/j.pdpdt.2016.09.003
Reference:	PDPDT 828
To appear in:	Photodiagnosis and Photodynamic Therapy
Received date:	30-7-2016
Revised date:	30-8-2016
Accepted date:	4-9-2016

Please cite this article as: {http://dx.doi.org/

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.

ACCEPTED MANUSCRIPT

<AT>In vitro effects of photodynamic therapyinduced by chloroaluminum phthalocyanine nanoemulsion

<AU>Leonardo Pereira Franch^a, Camila F. Amantino^a, Maryanne T. Melo^a, Ana Paula de Lima Montaldi^b, Fernando L. Primo^c, and Antonio Claudio Tedesco^{a*} ##Email##atedesco@usp.br##/Email## <AU>

<AFF>^aDepartment of Chemistry, Faculty of Philosophy, Sciences and Letters of Ribeirão Preto; USP, RibeirãoPreto– SP – Brazil

<AFF>^bDepartment of Biology, Faculty of Philosophy, Sciences and Letters of RibeirãoPreto; USP, RibeirãoPreto– SP – Brazil

<AFF>^cDepartment of Bioprocess and Biotechnology, School of Pharmaceutical Sciences of Araraquara; UNESP, Araraquara– SP– Brazil

^{<PA>}Tel.: +55 16 33153751 – Address: Center of Nanotechnology and Tissue

Engineer, Photobiology and Photomedicine Research Group-Department of Chemistry,

Faculty of Philosophy, Sciences and Letters of Ribeirão Preto, University of São Paulo. Av.

Bandeirantes, 3900, Monte Alegre, Zip Code: 14049-900, Ribeirão Preto, SP, Brazil.

<ABS-Head><ABS-HEAD>Graphical abstract <ABS-P>

<ABS-P><xps:span class="xps_Image">fx1</xps:span>

 $\Box < ABS-HEAD > Highlights \blacktriangleright$ The photodynamic therapy (PDT) induced more cell death in HeLa compared to A549 cells \blacktriangleright Apoptosis was the main cell death pathway detected in HeLa cells \blacktriangleright The APE1 protein impairment increases the efficacy of PDT

<ABS-HEAD>Abstract

<ABS-P><ST>Background</ST> The photodynamic therapy (PDT) has been used to treat cancer mainly by inducing oxidative stress. Our aim was to evaluate the effect of PDT and its combination with methoxyamine (MX), a blocker of base excision repair (BER), in cells expressing high levels of the APE1 protein, which is involved in cell oxidative damage response.

<ABS-P><ST>Methods</ST> The HeLa and A549 cells were treated for 3 h with chloroaluminum phthalocyanine incorporated into a well-designed nanoemulsion (ClAlPc/NE); and then irradiated by visible light (@670 nm) with doses of 0.1, 0.5 and 1.0

Download English Version:

https://daneshyari.com/en/article/8765619

Download Persian Version:

https://daneshyari.com/article/8765619

Daneshyari.com