

Biophoton

Sona Rezaei¹, Mojtaba Amani^{*1}

One of the natural sources of light with biological origin is biophoton, which is emitted by all living organisms. The main source of biophoton emission is the reactive oxygen species produced in mitochondria. In addition to providing information about the physiological and pathological status of living organisms, biophoton are used as a communication factor at various structural levels. Research showed that biophoton emission can be used to study the homeostasis capacity of bacteria, because of severe changes in cell metabolism cause changes in the intensity and spectrum of biophoton emission. Increased biophoton emission is also seen in plant cells under stresses such as injuries, poison, or freeze. In addition to the molecular process, cells also use biophotons as communication tools. Since changes in biophotonic activity indicate a change in mitochondrial energy production in pathological and physiological conditions, it is possible to use them to diagnose and treating diseases by comparing biophoton production.

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* Author for Correspondence, Professor, Tel: +98 45 33522437, Fax: +98 45 33522197, E-mail: mojtaba.amani@arums.ac.ir

¹ Department of medical biochemistry, School of medicine, Ardabil University of medical science, Ardabil, Iran