

Bioreduction of nitroxides in murine tumors with blocked thiols in the light of the *in vivo* ESR data

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The treatment with sulfhydryl blockers caused the decrease in the rate of nitroxide free radical (NFR) reduction in melanoma cells under *in vitro* conditions and in the neoplastic tissue *in vivo*. The tested blockers: Diamid (diazene dicarboxylic acid 1,1-azobis-N,N-dimethylamid) and DEM (diethyl maleate) were equally effective in B16 cells *in vitro*, whereas in B16 tumors *in situ* DEM was more efficient. It was demonstrated that it is possible to alter the redox state of both cells and tumors by modifying the level of cellular thiols.