

# Cytotoxic Activity of Platinum(II) and Palladium(II) Complexes of *N*-3-Pyridinylmethanesulfonamide: the Influence of Electroporation

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The series of complexes: *cis*-[Pd(PMSA)<sub>2</sub>X<sub>2</sub>], *cis*-[Pt(PMSA)<sub>2</sub>X<sub>2</sub>], *trans*-[Pt(PMSA)<sub>2</sub>I<sub>2</sub>] and [Pt(PMSA)<sub>4</sub>]Cl<sub>2</sub> (PMSA = *N*-3-pyridinylmethanesulfonamide; X = Cl, Br, I), previously synthesized and characterized by us, as well as the free ligand PMSA, were tested for their cytotoxic activity without electroporation – against murine leukemia F4N and human SKW-3 and MDA-MB-231 tumour cell lines – and with electroporation – against the latter two cell lines. The majority of the complexes exhibited cytotoxic effects (IC<sub>50</sub> < 100 μmol/l) under the conditions of electroporation. Both *cis*- and *trans*-[Pt(PMSA)<sub>2</sub>I<sub>2</sub>] had pronounced cytotoxic effects (29–61 μmol/l against MDA-MB-231 cells).

**Key words:** Platinum Complexes, Sulfonamides, Cytostatic Agents, Electroporation