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# Iodine I 131 NM404

National Cancer Institute

## Source

National Cancer Institute. *iodine I 131 NM404*. NCI Thesaurus. Code C99637.

A phospholipid ether analog labeled with iodine I 131, with potential radiotherapeutic and radioimaging potential upon positron emission tomography (PET). Upon administration, iodine I 131 NM404 selectively accumulates in and retains within tumor cells for a prolonged period of time due to the decreased activity of a phospholipase D (PLD), most likely isoform 1 of PLD, in tumor cells compared to normal cells. As tumor cells are unable to metabolize and eliminate MN404, tumor cells can be visualized upon PET imaging. In addition, iodine I 131 NM404 selectively delivers a cytotoxic dose of iodine I 131 to the tumor cells. PLD is an enzyme found in the cell membrane of normal cells that degrades phospholipids.