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# TGFa-PE38 Immunotoxin

National Cancer Institute

## Source

National Cancer Institute. *TGFa-PE38 Immunotoxin*. NCI Thesaurus. Code C29483.

A recombinant, chimeric toxin composed of human transforming growth factor alpha (TGF-alpha) fused to a fragment of Pseudomonas exotoxin (PE38) without its cell-binding domain. The TGF-alpha moiety of the agent attaches to tumor cells expressing the epithelial growth factor receptor (EGFR); the exotoxin induces caspase-mediated apoptosis of tumor cells via a mechanism involving mitochondrial damage; it also catalyzes the transfer of ADP ribose from nicotinamide adenine dinucleotide (NAD) to elongation factor-2 in eukaryotic cells, thereby inactivating elongation factor 2 and inhibiting protein synthesis. (NCI04)