Supplementary data to article **PTI-1: novel way to oncogenicity** <sup>1</sup>Vislovukh A. A., <sup>1</sup>Shalak V. F., <sup>1</sup>Savytskyi O. V., <sup>1</sup>Kovalenko N. I., <sup>1, 2</sup>Gralievska N. L., <sup>1</sup>Negrutskii B. S., <sup>1</sup>El'skaya A. V. <u>Biopolymers and Cell</u>. 2012; 28(5): 404-410 <u>http://dx.doi.org/10.7124/bc.00006C</u>

## Suppl. Table 1 – Comparison of mRNA translation efficiency and protein half-life of the PTI-1 and uPTI-1 proteins based on N-end rule.

Prediction was performed using TermiNator [33, 34].

Protein	N-terminal sequence or entry code (first20 characters)	Predicted N- terminus of the mature protein	Likelihood (%)	Translation efficiency	Predicted Half-life (hours)
PTI-1	MQSERGITIDISLWKFETSK	M(1)	89	1	5-31
uPTI-1	MAASSCTDYNQTPNTIKIKL	Ac-A(2)	83	5	220

Suppl.	Table 2 –	Prediction	of cellular	localization	of uPTI-1	nentide
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Program	used	to	predict	subcellular	Predicted localization
localization	n				
Euk-mPLo	c 2.0				extracellular
MultiLoc2					secretory
WoLF PSC	DRT				extracellular



**Suppl. Fig. 1**- Schematic representation of upstream ORFs in the PTI-1 mRNA. Kozak context elements marked with bold type.



**Suppl. Fig. 2**- Ensemble of 5000 structures (uPTI-1) was generated in Modeller 9.8. Five structures were selected using the Modeller Objective Function (MOF) and the Discrete Optimized Protein Energy (DOPE) score. The structure of uPTI-1 1723 was selected as the best from the ensemble.