

**Table S2** – Molecular Docking Results.

ClusPro <sup>(a)</sup> or HADDOCK <sup>(b)</sup> complexes	Receptor	Ligand	$\Delta G$ (kcal/mol)	H-Bonds	
				receptor	ligand
tLyp1 – NRP1 <sup>(a)</sup>	NRP-1	tLyp1 peptide	-8.9	ASP 320	ARG 5
				ASP 320	THR 6
				TYR 353	LYS 4
CPTLyp1 – NRP1 <sup>(a)</sup>	NRP-1	tLyp1 peptide fused to CP of TBSV	-8.7	TYR 297	LYS 4
				PRO 317	ARG 7
				ASP 320	ARG 5
				ASP 320	ARG 7
				GLU 319	GLY393 (L)
				TYR 322	ASN385
				ASN 323	LEU386
tufstin – NRP1 <sup>(a)</sup>	NRP-1	tufstin peptide (natural ligand)	-7.0	TYR 297	LYS 2
				TYR 297	PRO 3
				ASP 320	ARG 4
				LYS 351	ARG 4
CooP – FABP3 <sup>(a)</sup>	FABP3/ H-FABP	CooP peptide	-12.4	TYR 19	GLY 7
				ALA 75	LEU 6
				GLN 95	LEU 6
				ARG 126	ALA 9
CPCooP – FABP3 <sup>(a)</sup>	FABP3/ H-FABP	CooP peptide fused to CP of TBSV	-12.7	ASN 59	PRO390(L)
				ALA 75	LEU 6
OLA – FABP3 <sup>(b)</sup>	FABP3/ H-FABP	oleic acid (natural ligand)	-9.4	TYR 19	OLA 133
				TYR 128	OLA 133

Note: HADDOCK tool was used to obtain the OLA-FABP3 complex, since ClusPro is not suitable for docking chemicals, such as oleic acid (OLA), to proteins. Binding free energies ( $\Delta G$ ) and hydrogen bonds (H-Bonds) between receptors and ligands of the best ClusPro or HADDOCK derived docked complexes as calculated by Prodigy webserver.