|  |  |  |  |
| --- | --- | --- | --- |
| D301 | peptide | Nb sim binding stably | ΔΔW (kcal/mol) |
| 0 | TM19TM | 6 of 6 | -7.21 ± 0.05 |
| 0 | TM19int | 5 of 6 | -7.25 ± 0.03 |
| -1 | TM19\*TM | 6 of 6 | -1.21 ± 0.05 |
| -1 | TM19\*int | 3 of 6 | -7.27 ± 0.03 |
| 0 | TM31TM | 2 of 2 | -7.9 ± 0.03 |
| 0 | TM31int | 1 of 6 | -5.08 ± |
| -1 | TM31\*TM | 3 of 6 | -1.63 ± 0.05 |
| -1 | TM31\*int | 2 of 6 (Nter) | -6.38 ± 0.03 |
|  | Mouse tulp1 (1c8z) | 2 of 6 | 20 ± 0.05 |
|  | Mouse tulp1 int | 3 of 6 | -6.68 ± 0.04 |
|  | Arabidopsis 1zxu | 2 of 6 but unfold | 0.68 ± 0.05 |
|  | Arabidopsis 1zxu int | 2 of 6 | -9.45 ± 0.03 |

Sequences

TM31 288KMKAVMIGACFLIDFMFFESTGSQEQKSGVW318

TM19 288KMKAVMIGACFLIDFMFFE306

Hum.tulp1 487ALQAFAIALSSFDGKLACE505

Mouse tulp1 487ALQAFAIALSSFDSKLACE505

Arabidopsis DYAFIASLVVILDDVNR

|  |  |  |
| --- | --- | --- |
| D301 | peptide | ΔΔW (kcal/mol) |
| 0 | TM19 | -7.33 ± 0.04 |
| -1 | TM19\* | -1.26 ± 0.05 |
| 0 | TM31 | -7.77 ± 0.03 |
| -1 | TM31\* | -1.62 ± 0.05 |
|  | 1c8za | 20 ± 0.05 |
|  | Arabidopsis 1zxub | 0.68 ± 0.05 (unfolds) |

a mouse brain tubby protein, b arabidopsis tubby protein