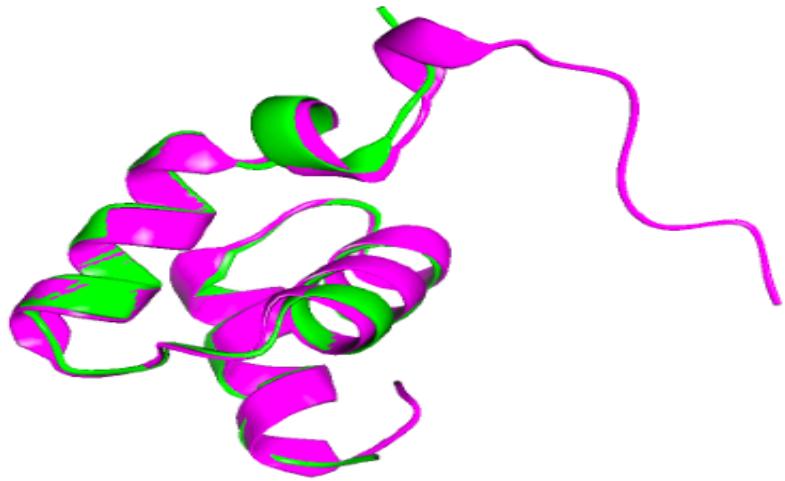


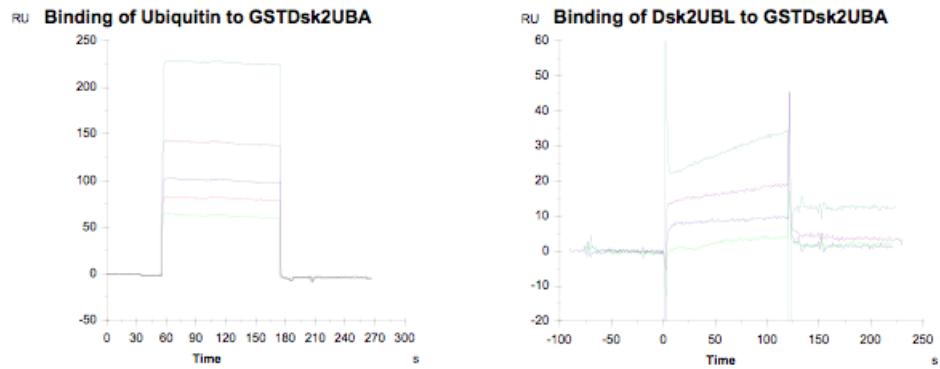


Supplementary Figure 1: Superposition of Dsk2 UBL (green) with HHR23A (magenta) and HHR23B cyan).



Supplementary Figure 2: Comparison of the Dsk2 UBA structures solved by X-ray Diffraction (green) and NMR (magenta).

Supplementary Figure 3.
Representative corrected sensorgrams showing binding of Ub and Dsk2 UBL to captured GST Dsk2 UBA



Concentrations of analyte used:
Ub: 625nM, 1.2 μ M, 3.12 μ M, 6.25 μ M, 12.5 μ M
UBL: 5.7 μ M, 16.7 μ M, 50 μ M, 150 μ M

Table S1. Comparison of contacts between Dsk2 UBA and Dsk2 UBL domains (this work) and between Dsk2 UBA domain and Ub (Ohno et al. 2005)

Dsk2 UBL	Dsk2 UBA	Ub	Dsk2 UBA
Hydrogen bonds (<3.3 Å)			
R43 NH1	D366 OD2 (3.3)	K6 NZ	D341 OD1 (2.8)
G48 N	M342 O (2.6)	K6 NZ	Q338 OE1 (2.8)
		T7 O	Q338 NE2 (2.9)
		L8 O	Q338 NE2 (2.8)
		G47 N	M342 O (2.8)
Van der Waals interactions (< 4.5 Å)			
R43	D366	K6	Q338, D341
I45	M342, L365, L369	T7	Q338
S47	M342, N370, G371	L8	Q338, V361, M342
G48	M342, G343, F344, L369	T9	Q338
I50	L369	G10	Q338
H69	D341, M342	I44	M342, L365
V71	Q362, L365	A46	M342
		G47	M342, G343, F344, L365, L369
		H68	Q338, D341, M342
		V70	Q362