

Table S4. NMR validation tables for designs D9.16, D8.31, and D8.21. RMSD calculated for 20 lowest energy structures out of 100. Related to Figure 4.

	D9.16	D9.16	D9.16	D8.31	D8.31	D8.31
	DMSO	CDCI3	CDCI3	CDCI3	DMSO	DMSO
	trans-cis	trans-cis	trans-trans	cis-cis	cis-cis	cis-trans
NMR restraints						
Total NOEs	106	89	99	111	84	82
Intra-residue	38	35	41	38	26	24
Sequential i-j =1	48	31	38	59	48	47
Medium 1< i-j <5	20	23	20	14	10	11
Long i-j >=5	0	0	0	73	0	0
Hydrogen bonds	0	0	0	0	0	0
PHI dihedral restraints	5	5	5	4	4	4
Structure Statistics						
<i>Violations (mean and s.d.)</i>						
Max. distance restraint (Å)	0.10	0.14	0.41	0.35	0.07	0.74
Ave. distance restraints viol. (Å)	0.02 ± 0.02	0.03 ± 0.03	0.07 ± 0.10	0.19 ± 0.15	0.02 ± 0.02	0.09 ± 0.15
Max. dihedral angle (°)	2.53	2.45	1.18	1.26	0.30	3.68
Ave. dihedral viol (°)	0.86 ± 0.73	0.78 ± 0.67	0.36 ± 0.26	1.18 ± 0.06	0.19 ± 0.07	1.27 ± 1.19
Average pairwise RMSD						
backbone (Å)	0.21 ± 0.07	0.24 ± 0.09	0.20 ± 0.05	0.21 ± 0.10	0.14 ± 0.12	0.48 ± 0.09
heavy (Å)	0.53 ± 0.08	0.68 ± 0.12	0.73 ± 0.07	0.52 ± 0.22	0.54 ± 0.16	1.15 ± 0.16

	D8.21	D8.21	D8.21	D8.21	D8.21
	DMSO	DMSO50	DMSO50	CDCI3	CDCI3
	trans-trans	trans-trans	cis-cis	trans-trans	trans-cis
NMR restraints					
Total NOEs	84	94	66	144	94
Intra-residue	22	38	24	48	30
Sequential i-j =1	48	36	32	56	38
Medium 1< i-j <5	14	20	10	40	26
Long i-j >=5	0	0	0	0	0
Hydrogen bonds	0	0	0	0	0
PHI dihedral restraints	4	4	4	4	4
Structure Statistics					
<i>Violations (mean and s.d.)</i>					
Max. distance restraint (Å)	0.19	0.45	0.01	0.30	0.57
Ave. distance restraints viol. (Å)	0.06 ± 0.06	0.08 ± 0.08	0.01 ± 0.00	0.08 ± 0.08	0.12 ± 0.16
Max. dihedral angle (°)	2.23	2.80	1.23	3.12	4.25
Ave. dihedral viol (°)	0.46 ± 0.59	2.17 ± 0.52	0.35 ± 0.47	2.56 ± 0.34	1.53 ± 1.37
Average pairwise RMSD					
backbone (Å)	0.39 ± 0.18	0.25 ± 0.19	0.13 ± 0.03	0.21 ± 0.13	0.30 ± 0.11
heavy (Å)	1.02 ± 0.25	0.74 ± 0.23	0.68 ± 0.13	0.64 ± 0.28	0.76 ± 0.17