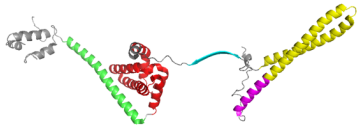
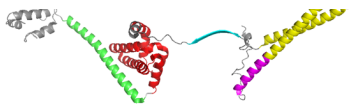
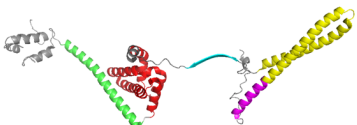
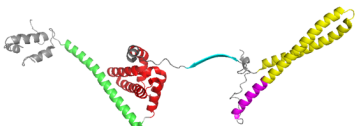
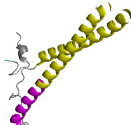
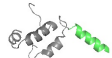

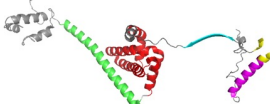

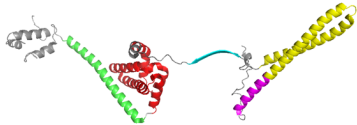
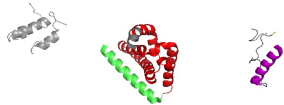



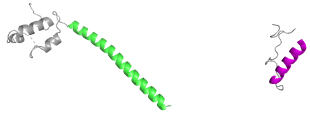
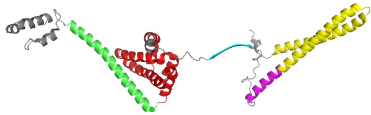
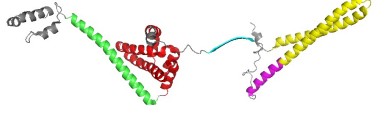
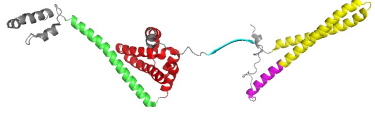


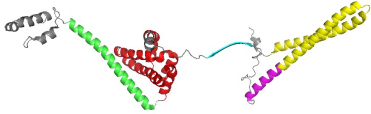
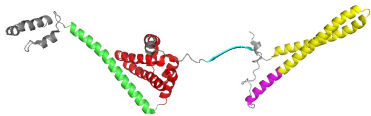
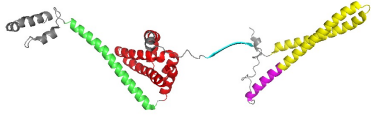
Supplementary Figure S1

Cdc37 construct	Cdc37 Structure	Binding partner	Binding parameters	Refer to Fig
Full-length		sBraf	$K_d = 1.0 \mu\text{M}$	1A
Full-length		sBrafV600E	$K_d = 0.41 \mu\text{M}$ .	1B
Full-length		sBrafV600E+ AMPPNP	NB	1C
Full-length		sBrafV600E+ ADP	NB	1D
N 1-120		sBrafV600E	$K_d = 278 \mu\text{M}$	2B
C-terminal Domain 273-348		sBrafV600E	$K_d = 104 \mu\text{M}$ .	2C
Middle domain 148-269		sBrafV600E	NB	2D
Cdc37 TrpZip		sBrafV600E	$K_d = 0.5 \mu\text{M}$ .	3A
Cdc37 $\Delta(\text{CC-}\beta\text{S})$		sBrafV600E	$K_d = 0.61 \mu\text{M}$	3B

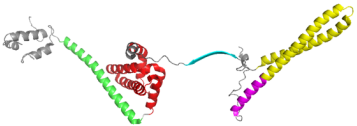
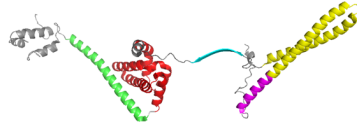
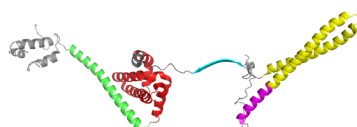
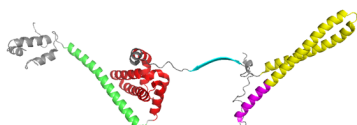
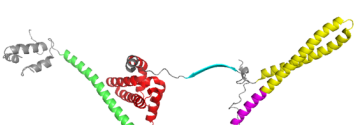
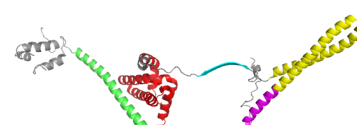
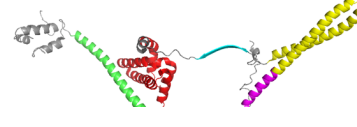
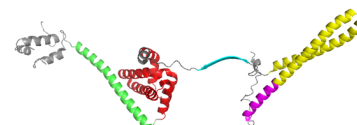
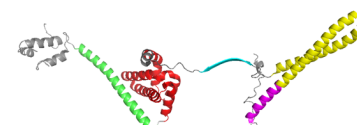
Supplementary Figure S1 continued

Cdc37 construct	Cdc37 Structure	Binding partner	Binding parameters	Refer to Fig
Full-length		sBrafV600E	$K_d = 0.41 \mu\text{M}$ .	1B
Cdc37 $\Delta(7\text{-CC-}\beta\text{S-272-285})$		sBrafV600E	$K_d = 1.03 \mu\text{M}$ .	3C
Cdc37 N <sup>m</sup> C		sBrafV600E	$K_d = 145 \mu\text{M}$ .	3D
Cdc37 N <sup>m</sup> (+14)-C		sBrafV600E	$K_d = 8.7 \mu\text{M}$	4A
Cdc37 N <sup>m</sup> (+6)-C		sBrafV600E	$K_d = 18 \mu\text{M}$	4B
Cdc37 N <sup>m</sup> (+41)-C		sBrafV600E	$K_d = 1.99 \mu\text{M}$	4C
Cdc37 1-343		sBrafV600E	$K_d = 0.76 \mu\text{M}$	5A
Cdc37 V343A		sBrafV600E	$K_d = 0.9 \mu\text{M}$ .	5B
Cdc37 V343R		sBrafV600E	$K_d = 1.3 \mu\text{M}$ .	5C

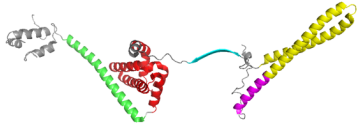
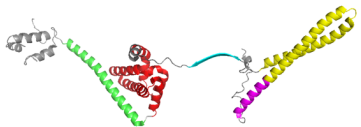
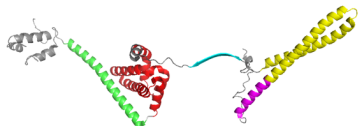
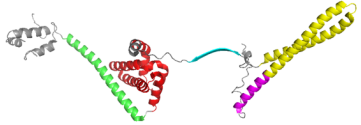
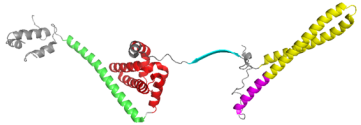
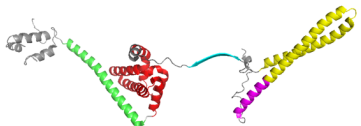
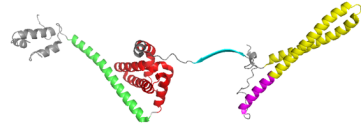
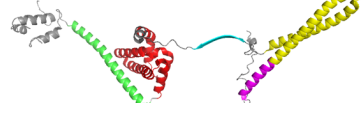
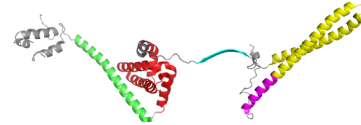
Supplementary Figure S1 continued

Cdc37 construct	Cdc37 Structure	Binding partner	Binding parameters	Refer to Fig
Full-length		sBrafV600E	$K_d = 0.41 \mu\text{M}$	1B
Cdc37 1-342		sBrafV600E	$K_d = 45.7 \mu\text{M}$	5D
Cdc37 W342A		sBrafV600E	$K_d = 94.3 \mu\text{M}$	5E
Cdc37 W342R		sBrafV600E	NB	5F
Full-length S13E		sBrafV600E	$K_d = 0.30 \mu\text{M}$	6A
Cdc37 N22A		sBrafV600E	$K_d = 27.3 \mu\text{M}$	7A
Cdc37 N22R		sBrafV600E	$K_d = 14.2 \mu\text{M}$	7B

Supplementary Figure S1 continued

Cdc37 construct	Cdc37 Structure	Binding partner	Binding parameters	Refer to Fig
Full-length		sBrafV600E	$K_d = 0.41 \mu\text{M}$	1B
Full-length L28R		sBrafV600E	NB	8B
Full-length L28A		sBrafV600E	$K_d = 16.9 \mu\text{M}$ .	8C
Full-length W31K		sBrafV600E	NB	8D
Full-length W31A		sBrafV600E	$K_d = 2.1 \mu\text{M}$	8E
Full-length S27K		sBrafV600E	NB	8F
Full-length S27A		sBrafV600E	$K_d = 1.6 \mu\text{M}$ .	8G
Full-length Q47R		sBrafV600E	$K_d = 0.3 \mu\text{M}$	8H
Full-length Q347A		sBrafV600E	$K_d = 0.35 \mu\text{M}$ .	8I

Supplementary Figure S1 continued

Cdc37 construct	Cdc37 Structure	Binding partner	Binding parameters	Refer to Fig
Full-length		sBrafV600E	$K_d = 0.41 \mu\text{M}$	1B
Full-length		sBrafV600E T599E-V600E-S602D	$K_d = 0.47 \mu\text{M}$	9A
Full-length		sBrafV600E T599W-V600E	$K_d = 0.23 \mu\text{M}$	9B
Full-length		sBraf F595A	$K_d = 0.5 \mu\text{M}$	10A
Full-length		sBraf F595R	$K_d = 1.4 \mu\text{M}$	10B
Full-length		sBraf D594V	$K_d = 1.2 \mu\text{M}$	10C
Full-length		sBraf L597A	$K_d = 0.23 \mu\text{M}$	10D
Full-length		sBraf L597R	NB	10E
Full-length		sBraf L597R-V600E	$K_d = 0.34 \mu\text{M}$	11D

**Supplementary Figure S1 Constructs used in this study.**

**Refer to Figure 2A for amino acid positions of the various structural elements of Cdc37. *K<sub>d</sub>* values and the figure that each experiment represents is indicated.**