Supplementary information, Table S1 Oligos used in this study

Oligonucleotides	**Name**	**sequence(5'-3')**
Telomeric DNA oligos for Crystallization	TTAGGG-f(18bp)	GGTTAGGGTTAGGGTTAG
	TTAGGG-r(18bp)	CCTAACCCTAACCCTAAC
oligos for Fluorescence polarization assays	TTAGGG-fam(WT)	fam-GGTTAGGGTTAG
	TTAGGG-r	CTAACCCTAACC
	TCAGGG-fam	fam-GGTCAGGGTCAG
	TCAGGG-r	CTGACCCTGACC
	TTGGGG-fam	fam-GGTTGGGGTTGG
	TTGGGG-r	CCAACCCCAACC
	TGAGGG-fam	fam-GGTGAGGGTGAG
	TGAGGG-r	CTCACCCTCACC
	CTAGGG-fam	fam-GGCTAGGGCTAG
	CTAGGG-r	CTAGCCCTAGCC
	TTAAGG-fam	fam-GGTTAAGGTTAA
	TTAAGG-r	TTAACCTTAACC
	TTAGAG-fam	fam-AGTTAGAGTTAG
	TTAGAG-r	CTAACTCTAACT
	TTAGGA-fam	fam-GATTAGGATTAG
	TTAGGA-r	CTAATCCTAATC

Supplementary information, Table S2 Data collection, and refinement statistics

	TZAP-Telomeric DNA
Wavelength(Å)	0.978
Space group	$P4_32_12$
Cell parameters	
a, b, c (Å)	56.7, 56.7, 226.2
α, β, γ (°)	90, 90, 90
Resolution(Å)	40.00-2.85(2.92-2.85)
R_{merge} (%)	7.1(98.3)
$I/\sigma I$	37.6(2.0)
Completeness (%)	100.0(100.0)
Average redundancy	23.7(21.2)
Refinement(F>0)	
No. reflections (overall)	9190
No. reflections (test set)	446
R_{work}/R_{free}(%)	22.61/26.78
Number of atoms	
Protein/Znf10/Znf11-C	1093/350/743
DNA	732
ZN	4
B factors (Å^2)	
Protein/Znf10/Znf11-C	105.48/139.79/89.32
DNA	87.99
ZN	88.43
r.m.s. deviations	
Bond lengths (Å)	0.004
Bond angles (°)	0.590
Rampage plot % residues	
Favored	89.39
Allowed	10.61
Outliers	0

[a] Values in parentheses are for highest-resolution shell.