

1

2 **Supplementary 1: Table S1** The siRNA constructs were as follows

Name	(5'→3')
si-NC	UUCUCCGAACGUGUCACGUTT
si-LINC00518-1	CCGGGCTAGATGGAACCTTAGTGAACCTCGAGTTCACTAAGGTTCCATCTAGCTTTTT
si-LINC00518-2	CCGGCACCTCCAAAGTGACGACTTACTCGAGTAAGTCGTCACCTTGGAGGTGTTTTT
si-CTHRC1-1	CACAUUCA AUGGAGCUGAATT
si-CTHRC1-2	CGGAGUGUACA UUUACAAATT

3

4 **Supplementary 2: Table S2** The sequences of primers used in this study

Name	Sequence (5'→3')
LINC00518 forward	GTGAAAATCTGGCTACTCGTCCC
LINC00518 reverse	CTGACTTTTGCCACAGACTCCTG
CTHRC1 forward	GCA TGCTGTCAGCGTTGGTA
CTHRC1 reverse	TCAATGGGAAGAGGTCCTGAA
β-actin forward	CACAGAGCCTCGCCTTTGC
β-actin reverse	ACCCATGCCCAACCATCACG

5 The primer of miR-335-3p and U6 were synthesized by Ribobio (Guangzhou, China).

6

7 **Supplementary 3: Table S3** The correlation between clinicopathological features and

8 LINC00518 expression in 20 LUAD Patients.

Features	All cases	LINC00518 expression
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	Total	Low	High	P value
Total number	20	5	15	0.035*
Age				
>60	16	4	12	0.416
≤60	4	1	3	
Gender				
male	16	4	12	0.416
female	4	1	3	
Lymph node metastasis				
with	8	2	6	0.173
without	12	3	8	
Tumor size (cm)				
>5	4	2	2	0.138
≤5	16	3	13	
TNM stage				
I+II	16	5	11	0.416
III+IV	4	0	4	

9 *P < 0.05

10

11 **Supplementary 4: Table S4** The minimum lambda of the LASSO regression including 39

12 lncRNAs

ABCA9-AS1	AC015849.5	AC018529.1	AC020637.1	AC026462.3	AC027228.2
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AC034223.1	AC048383.1	AC093904.3	AC106799.3	AC108136.1	AC139722.1
AL031599.1	AL035252.2	AL161431.1	AL161938.1	AL353746.1	AL731533.2
AP000438.1	CHODL-AS1	CU639417.4	FAM83A-AS1	LINC00211	LINC00518
LINC00867	LINC01116	LINC01221	LINC01776	LINC01811	LINC02310
LINC02576	MED4-AS1	NKAIN3-IT1	NPSR1-AS1	PTGES2-AS1	SAMSN1-AS1
SATB2-AS1	TFAP2A-AS1	ZBTB20-AS3			

13

14 **Supplementary 5: Table S5** The result of IHC and clinicopathological features in 8 LUAD

15 Patients.

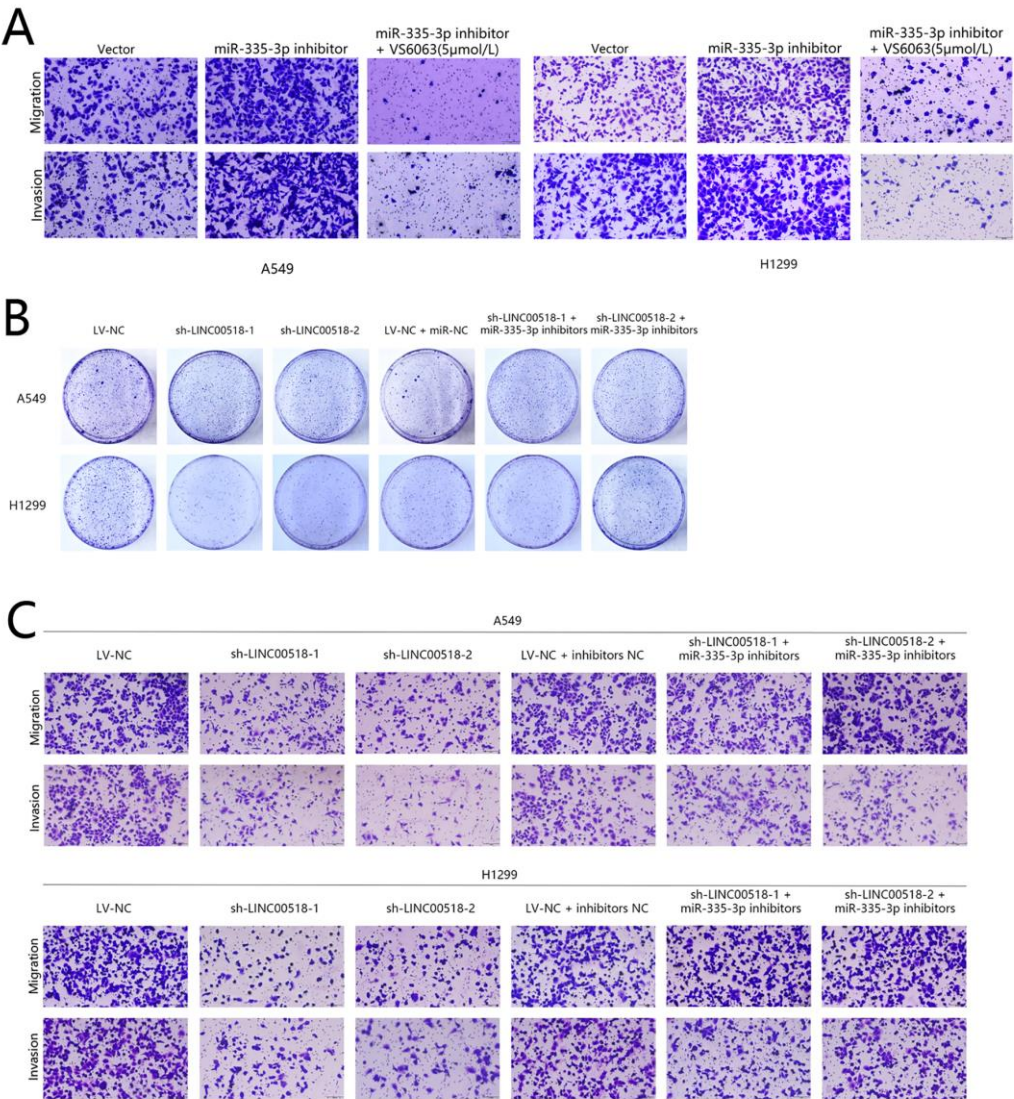
Gender	Age	TNM stage	Tissue	Positive Area percent (%)						H-score		
				CTHRC1			Integrin β3					
				1 week	2 week	3 week	1 week	2 week	3 week	CTHRC1	Integrin β3	
1	Male	74	T1N0M0	Tumor	76.83769687	8.386218237	0.141311888	68.76631	3.205367	0.111815	14.63477	75.51249
				Normal	47.64284305	9.356302189	0.302452495	19.25795	0.530035	0	42.6984	20.31802
2	Male	58	T1N0M0	Tumor	71.86653856	12.16409002	0.005822925	29.54856	0	0	15.96355	29.54856
				Normal	59.35152405	6.368189276	0.112252828	6.189555	0	0	34.16803	6.189555
3	Female	65	T2N0M0	Tumor	74.72647206	7.232033414	0.313251918	63.64573	1.441813	0	17.72824	66.52935
				Normal	80.7640112	6.846071666	0.098172263	62.40538	0.756939	0	12.29174	63.91926
4	Female	67	T1N0M0	Tumor	92.66470732	5.963752143	0.036737693	81.38298	0.531915	0	1.334803	82.44681
				Normal	66.45116601	14.43084738	0.230893558	33.33333	2.259887	0	18.88709	37.85311
5	Male	50	T2N0M0	Tumor	58.33751883	5.713209442	0.037669513	34.65553	1.670146	0	35.9116	37.99582
				Normal	60.0251076	18.27474892	1.380918221	37.83784	0.675676	0	20.31923	39.18919

				Tumor	66.14785992	5.7230869	0.859273671	52.63158	2.631579	0.877193	27.26978	60.52632
6	Male	72	T2N0M0	Normal	61.13851419	11.95892893	0.342258909	40.56902	0.948367	0	26.5603	42.46575
				Tumor	48.89519259	5.98686175	0.01492983	31.5678	0.423729	0	45.10302	32.41525
7	Female	65	T1N0M0	Normal	76.62427462	8.495857728	0.173187029	52.27092	1.533865	0.01992	14.70668	55.39841
				Tumor	51.52894652	7.872350209	0.018393342	27.53404	2.420575	0.151286	40.58031	32.82905
8	Male	64	T2N1M0	Normal	66.90396804	15.42534018	1.057342825	30.77314	1.220753	0.178026	16.61335	33.74873

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17

18 **Supplementary 6:**



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20 **Figure S1.** (A) As is shown in Transwell assays that miR-335-3p inhibited cells migration and

21 invasion following VS6063 (5 μmol/L). (B) Colony formation analysis was aimed to detect the

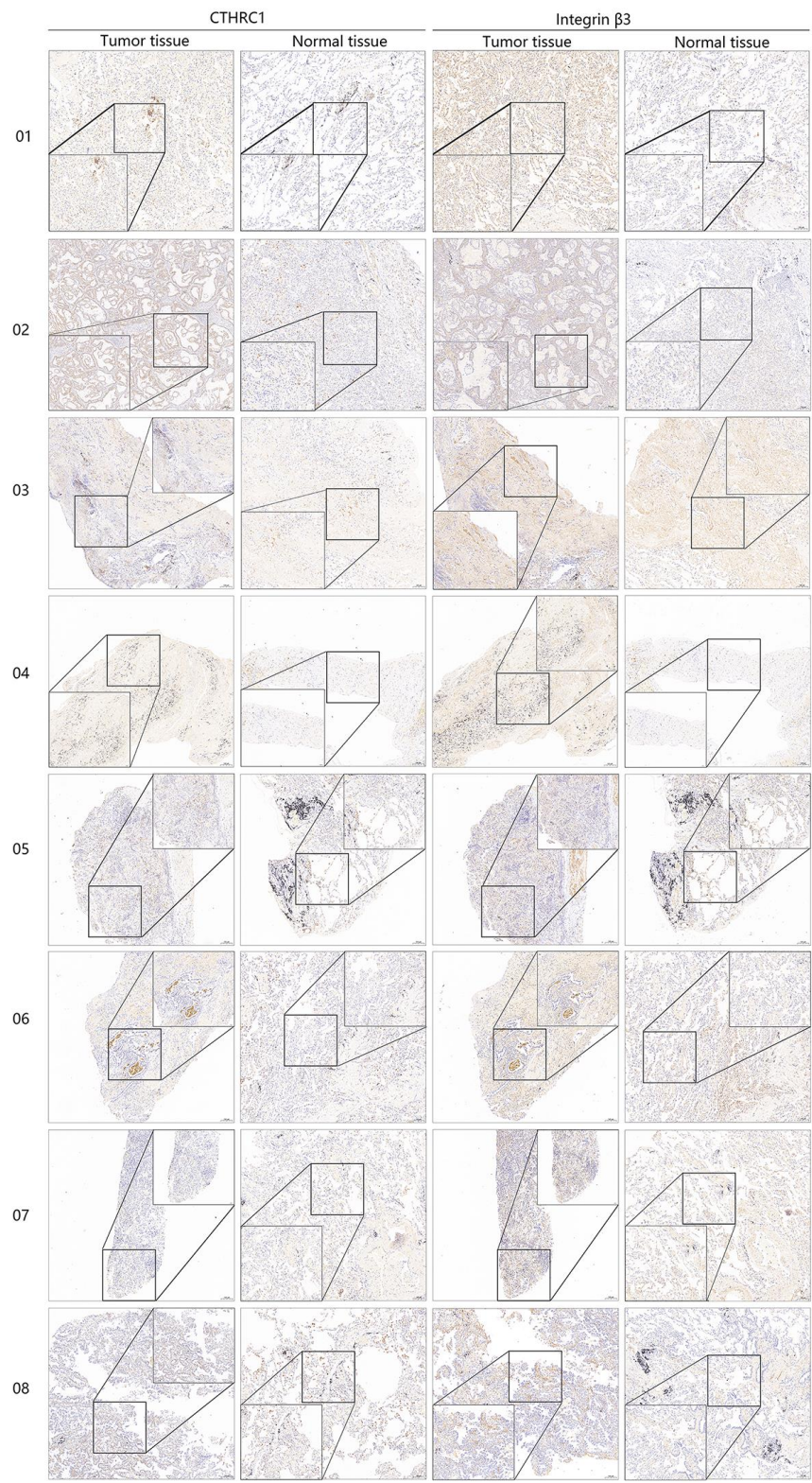
22 proliferation of A549/H1299 cells transfected with LINC00518 shRNA, LINC00518 shRNA plus

23 miR-335-3p inhibitor, or the control. (C) As is shown in the transwell assay the effect on LUAD cell

24 migration and invasion following transfection is described before.

25

26 **Supplementary 7:**



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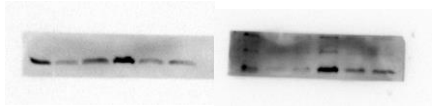
28 **Figure S2.** The NSCLC samples were immunostained with anti-CTHRC1 and anti-integrin β3

29 antibodies (scale bar, 100 μm, 50 μm).

30 **Supplementary 8: The original western blotting**

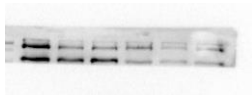
31 Fig.5C

32 CTHRC1



33

34 β 3



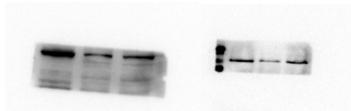
35

36 Pfak



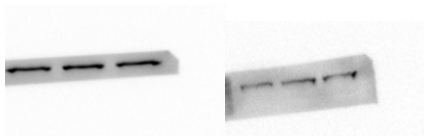
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38 MMP9



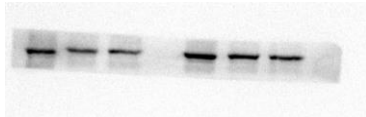
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40 FAK



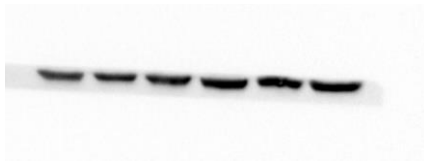
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42 CD1



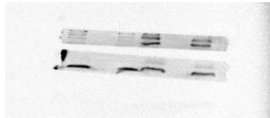
43

44 Actin



45

46 Fig.5D



47

48 Fig.5J

49 Actin



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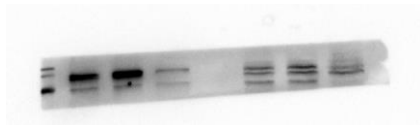
51 CTHRC1



52

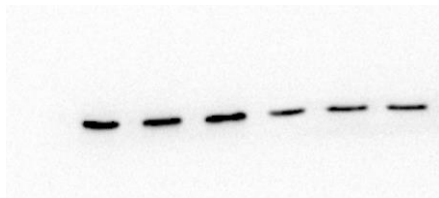
53

54 Pfak



55

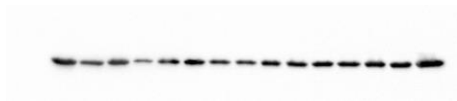
56 Fak



57

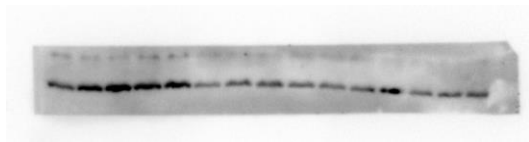
58 Fig.6E

59 actin



60

61 CTHRC1



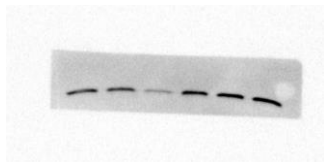
62

63 Fig.7E

64 CTHRC1

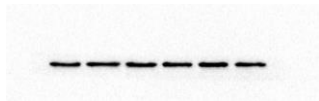


65



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67 ACTIN



68



69

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71