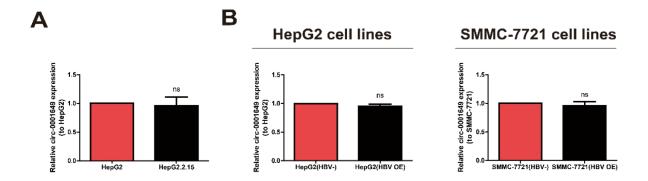
SUPPLEMENTARY MATERIAL

Supplementary Table 1. Relationship between circ-0001649 expression and clinicopathological characteristics of HCC patients.

Clinicopathological characteristics	n	High expression	Low expression	χ^2	P value
Total	84	42	42		
Gender				0.263	0.608
Male	64	31	33		
Female	20	11	9		
Age (years)				0.048	0.823
≤54	41	21	20		
>54	43	21	22		
Grade of differentiation				7.336	0.026^{*}
Low	32	10	22		
Middle	30	18	12		
High	22	14	8		
Tumor diameter (cm)				0.191	0.662
≤5	40	21	19		
>5	44	21	23		
Liver function				0.001	0.776
(Child-Pugh stage)				0.081	0.776
A	69	35	34		
B or C	15	7	8		
Hepatocirrhosis				0.933	0.334
Absent	24	14	10		
Present	60	28	32		
HBV infection				0.808	0.369
Absent	32	18	14		
Present	52	24	28		
HCV infection					1.000
Absent	83	42	41		
Present	1	0	1		
AFP (ng/ml)				0.763	0.382
≤20	44	24	20		
>20	40	18	22		
Tumor satellite				7.244	$\boldsymbol{0.007}^*$
Absent	61	36	25		
Present	23	6	17		

Two-sided $\chi 2$ for all variables except HCV infection between Low expression group and High expression group, HCV infection was evaluated using Fisher's exact test, *P<0.05.



Supplementary Figure 1. Differential expression of circ-0001649 in HBV-related HCC cells. pHBV1.3 copy (the HBV1.3 expression plasmid) transfected into HepG2/SMMC-7721 cells, namely HepG2 (HBV OE) and SMMC-7721 (HBV OE), respectively. (A) The expression level of circ-0001649 in the stable HBV-producing cell line HepG2.2.15 was similar to that in its parental cell line HepG2. (B) After transfected with pHBV1.3 copy (the HBV1.3 expression plasmid), mRNA levels of circ-0001649 were detected by qRT-PCR. ns: no significant difference, data represent the mean ± SD.