**Long noncoding RNA LINC00707 promotes osteogenesis of** **human bone marrow-derived mesenchymal stem cells via the miR-370-3p/WNT2B axis.**

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**Figure S1** Flow cytometry analysis of HBMSCs. CD marker analysis by flow cytometry revealed that 98.9%, 98.1% and 97.6% of cells were positive for BMSC markers CD29, CD44 and CD90, respectively.

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**Figure S2** Quantitative analysis of ALP staining and ARS staining after interference or overexpression of LINC00707 in transfected HBMSCs after 7 days osteogenic induction.



**Figure S3** (A and B)Quantitative analysis of ARS staining and ALP staining in HBMSCs co-transfected with LINC00707/NC and miR-370-3p mimics/mimics NC after osteogenic induction for 7 days. (C and D) ARS staining and ALP staining in HBMSCs co-transfected with LINC00707/NC and miR-370-3p mimics/mimics NC after osteogenic induction for 7 days.



**Figure S4** ARS staining and ALP staining in HBMSCs transfected with si-WNT2B after oncogenic induction for 7 days.

**Table S1** Sequences of PCR primers used in this study.

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| LINC00707 | Forward(5’-3’) | TGGAAAGTAAGCCTATTACATATAC |
| Reverse(5’-3’) | GGTATCACCAACAACCCTGA |
| RP11-348J24.2 | Forward(5’-3’) | CACCGTCCAGCCACAAACC |
| Reverse(5’-3’) | AATCCCTACTGCTGTATGGCATC |
| lnc\_1369 | Forward(5’-3’) | ACCAGTTACTTTGTGCCATACC |
| Reverse(5’-3’) | TTTCAAGAAAGGATCCAATGG |
| lnc\_554 | Forward(5’-3’) | TCTTCAGATGCCTCCTGTGGT |
| Reverse(5’-3’) | AACCTGGTTAGACCTTGAGTG |
| lnc\_1269 | Forward(5’-3’) | ATGAAGGGCACGGCATAGGT |
| Reverse(5’-3’) | TGACGCTCGGAAGACAACG |
| lnc\_1307 | Forward(5’-3’) | AGATTCCAGTGAGATTGAGGGTC |
| Reverse(5’-3’) | TTATCAGAAGGCATAGCACCC |
| β-actin | Forward(5’-3’) | AATCGTGCGTGACATTAAGGAG |
| Reverse(5’-3’) | ACGTGTTGGCGTAACAGGTCTT |
| RUNX2 | Forward(5’-3’) | GGCGGGTAACGATGAAAAT |
| Reverse(5’-3’) | TCTGTAATCTGACTCTGTCCTTGTG |
| ALP  | Forward(5’-3’) | GACGCTGGGAAATCTGTGG |
| Reverse(5’-3’) | ATGAAGTGGGAGTGCTTGTATCT |
| OCN | Forward(5’-3’) | CCTCACACTCCTCGCCCTAT |
| Reverse(5’-3’) | CTCCTGAAAGCCGATGTGGT |
| WNT2B | Forward(5’-3’) | GCTGGACCAAACCTGAAC |
| Reverse(5’-3’) | CAAGAAGTATCGGGAAGC |
| MiR-370-3p | Forward(5’-3’) | CTGCTGGGGTGGAAC |
| Reverse(5’-3’) | GGTCCAGTTTTTTTTTTTTTTTACCA |