



Fig S4. MiR-192-5p suppressed cell migration and cell invasion in HCC cells.

(A) The schematic structure of reporter plasmids for control, Lentivirus miRZip-192 (Luc-Zip192^{pos}) and Lentivirus miR-192 (Luc-192^{pos}). Reporter Luc-Zip192^{pos} had mature miR-192 in the 3'UTR region of luciferase and reporter Luc-192^{pos} had antisense miR-192-5p in the 3'UTR region of luciferase. (B) Luciferase activities of reporter plasmid Luc-Zip192^{pos} was measured in HepG2 cells and HuH7 cells infected with miRZip-ctrl or miRZip-192. The luciferase activity was

shown as the mean \pm SD. (C) miR-192-5p expression was examined in HLF cells infected with lentivirus pmiR-Ctrl and pmiR-192 for 48 hours (Left panel). Luciferase activities of reporter plasmid Luc-192^{pos} activity was measured in HLF infected with lentivirus miR-ctrl or miR-192. The luciferase activity was shown as the mean \pm SD (Right panel). (D) Expression of a group of stem cell related genes was examined in HepG2 and HuH7 cells infected with lentivirus miRZip-ctrl or miRZip-192. (E) Expression of a group of stem cell related genes was examined in HLF cells infected with lentivirus pmiR-ctrl or pmiR-192. (F) The migration/invasion assay was performed using HuH7 cells infected with lentivirus miRZip-ctrl or miRZip-192 for 48 hours using BioCoat control insert for migration assay and BioCoat Matrigel invasion chamber for invasion assay. Cells were incubated in these inserts for 24 hours. For wound healing assay, scratches were generated in a confluent monolayer HuH7 cells and the degree of “wound remaining” was measured after 1hr, 25hr and 49hr. Orange bars showed the remaining wound gaps. (G) The migration/invasion assay was performed using HLF cells infected with lentivirus pmiR-Ctrl and pmiR-192 for 48 hours using BioCoat control insert for migration assay and BioCoat Matrigel invasion chamber for invasion assay. Cells were incubated in these inserts for 24 hours. For wound healing assay, scratches were generated in a confluent monolayer HLF cells and the degree of “wound remaining” was measured after 1hr, 12h, 24hr, 32h and 48hr. Orange bars showed the remaining wound gaps. Student’s t-test was used for statistical analysis for (B-E) **, $p < 0.01$; *, $p < 0.05$.