

CCND1-WT

NM_053056-3utr(mir-20b)-3

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CCTTTTCTACCCAACGGCCCTGCAGCCAGCTCACGTCCAGGTTCAACCCACAGCTACTTGGTTTGT
GTTCTTCTTCATATTCTAAAACCATTCATTCCAAGCACTTTCAGTCCAATAGGTGTAGGAAATAGC
GCTGTTTTTGTGTTGTGTGTGCAGGGAGGGCAGTTTTCTAATGGAATGGTTTGGGAATATCCATGTACT
TGTTTGCA

CCND1-MT

NM_053056-3utr(mir-20b)-3mu

TTT TAGGTAGAAAACATATTCTTGTGCTTTTCCTGATAAAGCACAGCTGTAGTGGGGTTCTA
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AGGTAGATGTGTAACCTCTTCACCTTATTCATGGCTGAAGTCACCTCTTGGTTACAGTAGCGT
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CTTGGTTTGTGTTCTTCTTCATATTCTAAAACCATTCATTCCAACAGTCCAATAGGTGTAGG
AAATAGCGCTGTTTTTGTGTTGTGTGTGCAGGGAGGGCAGTTTTCTAATGGAATGGTTTGGGAAT
ATCCATGTACTTGTTTGCA

E2F1-WT

NM_005225-3utr(mir-20b)-3

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GGTCCCACAAGGCCAGGGCAGTGCCTGCTCCCAGAATCTGGTGCTCTGACCAGGCCAGGTG
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TCCCTCCTGCAGTGTCTGAAGCGCCTGCCTCCCCACTGCTCTGCCCCACCCTCCAATCTGCAC
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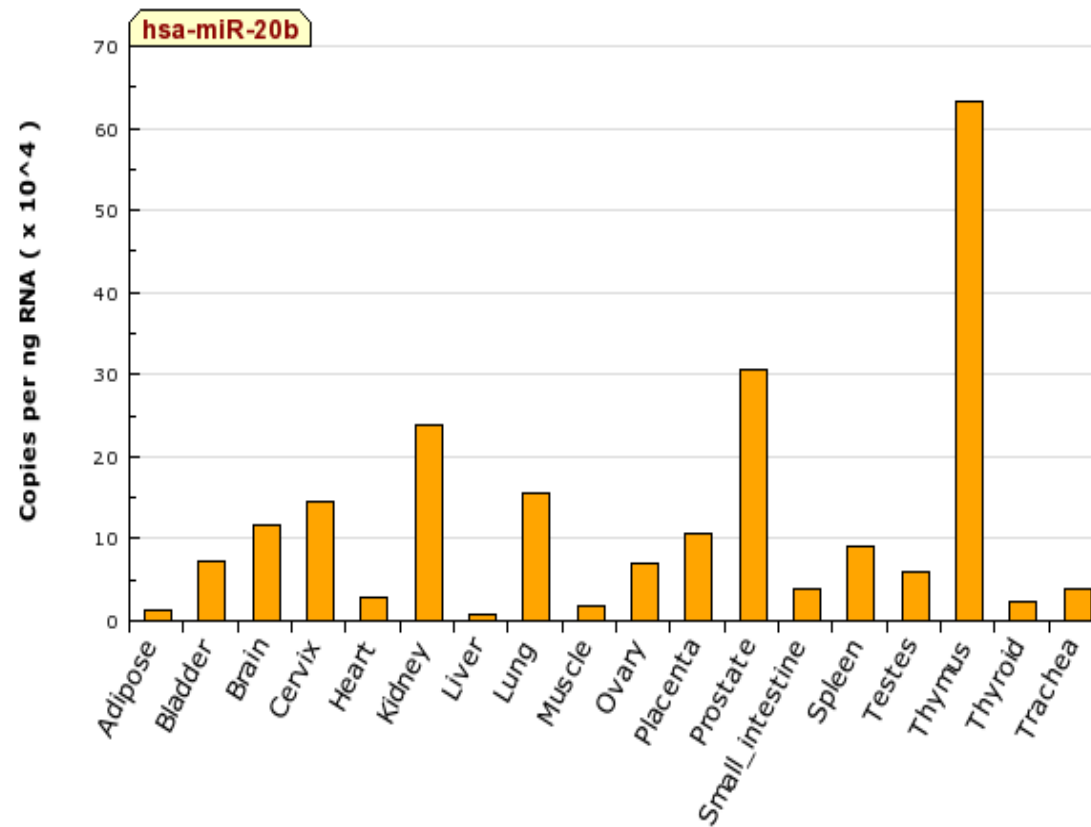
E2F1-MT

NM_005225-3utr(mir-20b)-3mu

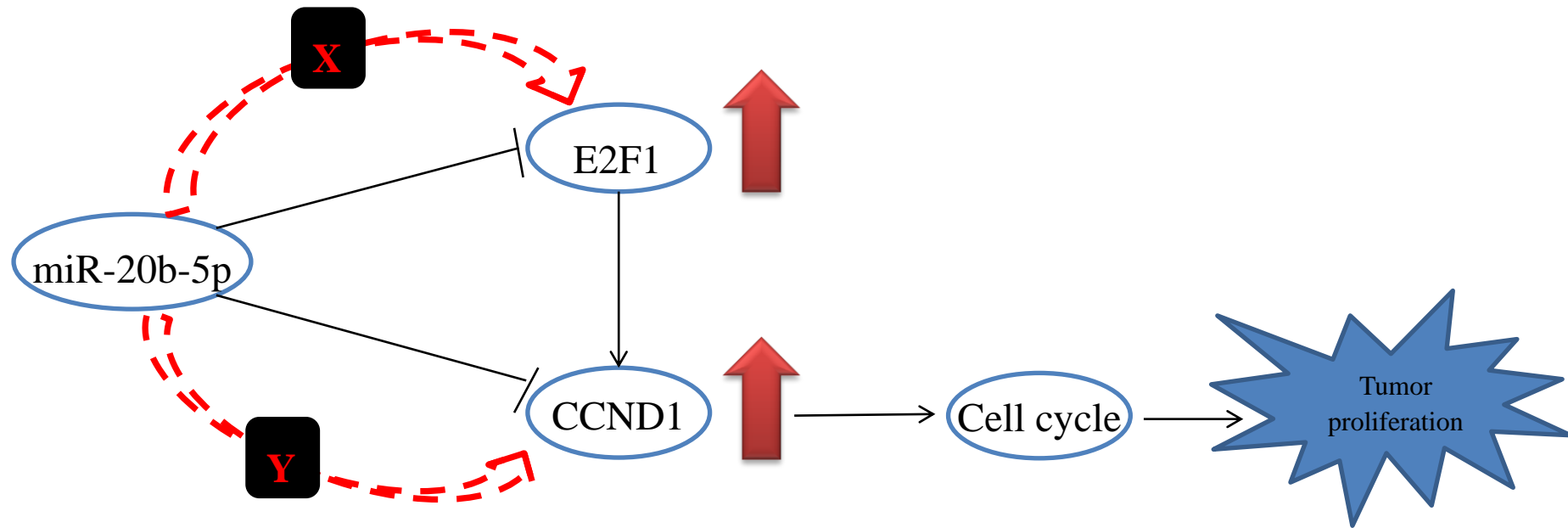
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GCCCAGGGCAGTGCCTGCTCCCAGAATCTGGTGCTCTGACCAGGCCAGGTGGGGAGGCTTTGGC
TGGCTGGAGGAGGGGTGGTGAAGGCCTCCCCCAGCCCAGACCCTGTGGTCCCTCCTGCAGTGTC
TGAAGCGCCTGCCTCCCCACTGCTCTGCCCCACCCTCCAATCTGATTTGCTTCCTAACAGCTCTGT
TCCCTCCTGCTTTGGTTTTAATAAATATTTTGATGACGTTTGGGCCGGGTTTTGGGACTCTGTTGG
GAACATTTCGG

Supplementary figure 1: A: The sequences of CCND1(19068-1) CCND1 NM_053056-3utr(mir-20b)-3mu GV306 and CCND1(24297-2) CCND1 NM_053056-3utr(mir-20b)-3 GV306; B: The sequences of E2F1(19067-1) E2F1 NM_005225-3utr(mir-20b)-3mu GV306 and E2F1(19070-2) E2F1 NM_005225-3utr(mir-20b)-3 GV306

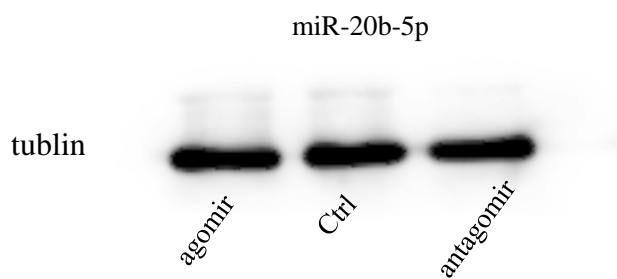
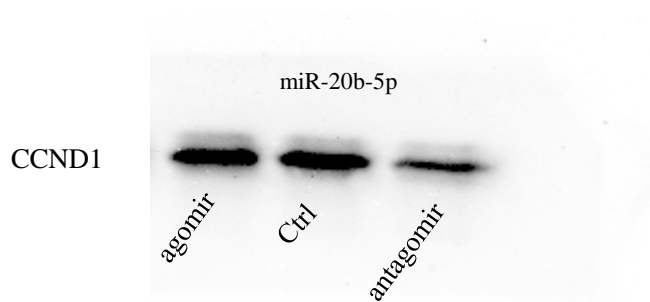
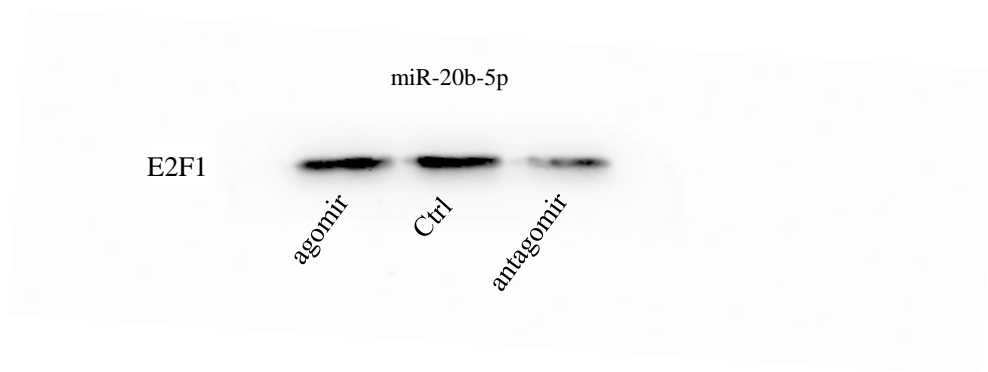
Supplementary figure 2: The predicted binding site and binding free energy between miR-20b-5p and the targets CCND1 (A) and E2F1 (B).



Supplementary figure 3: The expression of miR-20b in normal tissues.



Supplementary figure 4: The putative regulatory mechanism between miR-20b-5p and two target genes CCND1 and E2F1, X is the intermediate molecule of E2F1 indirectly regulated by miR-20b-5p, Y is the intermediate molecule of CCND1 indirectly regulated by miR-20b-5p.



Supplementary figure 5: Uncropped full-length gels and western blot assay.