

Supplemental Table 1: Antibodies used in this study

Antibody	Vendor	Catalog #	Dilution
γ-Tubulin	Thermo Fisher	MA1-850	1:1000 (WB)
Lactate Dehydrogenase	Santa Cruz Biotechnology	SC-133123	1:250 (WB)
Lamin B	Santa Cruz Biotechnology	SC-6216	1:200 (WB)
MAT Iα/IIα	Santa Cruz Biotechnology	SC-166452	1:500 (WB)
METTL16	Bethyl Laboratories	A304-192A	1:2000 (WB)

Supplemental Table 2: PCR primers used to produce mutations in METTL16 sequence-containing plasmid

METTL16 Mutant	Site-Directed Mutagenesis Forward Sequence	Site-Directed Mutagenesis Reverse Sequence
CRISPR-Resistant	caacctcaacGGAAGAGTGAGCCTTAATTTTAAAG	attgcacgtgCTGCTTAAAATCTGGATATTG
N-terminal RNA binding	aatgcatacgcgagcgaCCTCCTGACTTTGCATATCTG	tgctgcatgcattgatgcACTCAGAGCCATGGCGAT
PP185/186AA Methylation	CATGTGCAACgcagccTTTTTGCCAATC	CAAAAGTCATAGATTATCTCAGATTC
N184A Methylation	TTGCATGTGCcgcCCTCCCTTTTTTG	AAGTCATAGATTATCTCAGATTCTTC
Δ-Linker	GGAGTGGCCGGACAGTAC	CTTTTCTCTTCCAAGGCCTGAATG

Supplemental Table 3: Plasmids and guide RNA sequences used in this study

Plasmid	gRNA sequence	Catalog #
Scrambled CRISPR	GGCTTCGCGCCGTAGTCTTA	CS-CCPCTR01-CG12-01-10
METTL16 CRISPR	CATG TTCAGATAAAATCTGAA	CS-HCP218894-CG12-3-10-A
METTL16 ORF	-	RC208648

Supplemental Table 4: Real-time PCR primers used in this study

Gene	Forward (5'-3')	Reverse (5'-3')
ATXN10	GATACGATTGGTGTGCTGTTG	GTCTATTGTTTGGGTGCATGC
CCND1	CATCTACACCGACAACCTCCATC	CGGATGATCTGTTTGTTCTCCT
CDKN3	CCCAAACCTTCTGGATCTCTAC	TATGGAGGACTTGGGAGATCT
GPR50	GAATACCCACCGGCTCTAATC	TCTTCGTGGTCAGTCTCTCT
MALAT1	GAATTGCGTCATTTAAAGCCTAGTT	GTTTCATCCTACCACTCCCAATTAAT
MAT2A	CTGCTGTTGACTACCAGAAAGT	GCTACCAGCACGTTACAAGT
MYC	GCTGCTTAGACGCTGGATTT	GAGTCGTAGTCGAGGTCATAGTT
PNPLA4	CGTTGGTTGCTTCTGTTCTG	GACTAAGAAGTGGGATGGAGTC
RHO D	GCAGGGCAAGATGACTATGA	CAAGAAGGTACCCATCATCGT
RTRAF	ACAGGATGCAGTTGCTAAGG	TAGCTCTCTGAGCTCCTCTATG
U1	CCATGATCACGAAGGTGGTTT	ATGCAGTCGAGTTTCCCACAT
U6	CTCGCTTCGGCAGCACA	AACGCTTCACGAATTTGCGT
UBE2C	GCAGTTGCAGTCGTGTTCTC	TACAGCAGGAGCTGATGACC