

## Additional Material

**Table S1. Oligonucleotide primers used in this study.**

Primer names	Primer sequences
NMA0036MMEF	5'- CCAAGTGACAGCGGATT -3'
NMA0036MMER	5'- CTTGAGTTTGCCGTTGTC -3'
<i>nuoLMMMEF</i>	5'- CTATGGTGTTCGGCGTAT -3'
<i>nuoLMMMER</i>	5'- CGGACGTTTCTGAATGAC -3'
<i>nuoLMMMEMS11F</i>	5'- GGAAGTTCTCAAGGGCGTGC -3'
<i>nuoLMMMEMS11R</i>	5'- GGCGTGTATCACGTTCCGGC -3'
<i>nuoLMMMEMS11d1F</i>	5'- GCCAGAGTCGTGGGTGGG -3'
<i>nuoLMMMEMS11d2F</i>	5'- ATTGGTACGTCAGGAATTGGGC -3'
<i>nuoLMMMEMS11d3R</i>	5'- GACGTAAACCCGCTGGATAATCC -3'
<i>nadCxthAMMEF</i>	5'- GCTATCTGACCCACAGCA -3'
<i>nadCxthAMMER</i>	5'- GCCGTTGTAGGTTTTCTG -3'
<i>nadCxthAMMEFA19F</i>	5'- GGGACGGCAGTTTTATGCCG -3'
<i>nadCxthAMMEFA19R</i>	5'- CGGCATAAAACTGCCGTCCC -3'
<i>hypoaspAMMEF</i>	5'- GTCATCGCCCAATGTATG -3'
<i>hypoaspAMMEGCF</i>	5'- CGGACAGGTAGTTTTCCA -3'
<i>hypoaspAMMER</i>	5'- GGTTTTGCCGGTATGA -3'
<i>hypoaspAMMEv2F</i>	5'- TAGGGACGCTTTCGGGCGC -3'
<i>hypoaspAMMEv2R</i>	5'- GAACTTCTCAAACGCGGGCGGC -3'
<i>pilinAzlCMMEF</i>	5'- GGCTATCAGTCCCAGCTT -3'
<i>pilinAzlCMMER</i>	5'- GGAACCTCTGCCGATACT -3'
<i>pilinAzlCMMEFA19F</i>	5'- GAGACGGTGGTTGTGAAGCC -3'
<i>pilinAzlCMMEFA19R</i>	5'- TGGGAATGACGGCGGAGC -3'
NMA1360F	5'- GACGCTTCTCCGGCGGC -3'
NMA1360R	5'- GGCAGGGCGCAGCAATATGC -3'
NMA1360FA19F	5'- TCATCGGGGTCGGCGGC -3'
NMA1360FA19R	5'- GCCCGAATACGACATCCGCG -3'
<i>ribABhypoMMEF</i>	5'- GGGCTACAAGGCATACAA -3'
<i>ribABhypoMMER</i>	5'- TGGGACAGCAAAAGCTAC -3'
<i>ribABhypoMMEMS11F</i>	5'- GGATGAATTCAAGCAAGGAGAGG -3'
<i>ribABhypoMMEMS11R</i>	5'- GCCCGAACCACTATCCGGC -3'
<i>hypopglBMMEF</i>	5'- TTTCAACGGTCTGGACAC -3'
<i>hypopglBMMER</i>	5'- CGGTCGTCCAGAAAAAC -3'
<i>hypohypoMMEF</i>	5'- GCATCCGACCGAAATTA -3'
<i>hypohypoMMER</i>	5'- ATCCAGCCAAACCTCTTC -3'
<i>hypohypoMMEFA19F</i>	5'- TGCAGGGGCTTGCCGGC -3'
<i>hypohypoMMEFA19R</i>	5'- GGCTTCTGCCCGATCCGGC -3'
<i>uvrAhypoMMEF</i>	5'- GGAAGTCATAGGCCGTCT -3'
<i>uvrAhypoMMER</i>	5'- GCCGGAGTAGGAATAAT -3'
<i>uvrAhypoMMEFA19R</i>	5'- AGTGAAAAATATGAAGCTTCCTCAG -3'
<i>uvrAhypoMMEFA19d1R</i>	5'- GGAAGGAAGCCATACCAATGCG -3'
<i>uvrAhypoMMEFA19d2F</i>	5'- GAATGGGCTAAAAGTTCGCC -3'
<i>uvrAhypoMMEFA19d3R</i>	5'- GCAGTTTCTGTAATCCTGTCTC -3'
<i>uvrAhypoMMEFA19d4F</i>	5'- GGATTGCTGGAAAATCATCGAGC -3'
<i>uvrAhypoMMEFA19d5F</i>	5'- GAACCATAGCCACATTCCC -3'