

Supplementary materials for
Effects of *Bacillus subtilis* natto NB205 and Its Mutant NBMK308 on Egg Quality in Aging Laying Hens.

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Table S1. Primers used in this study for qRT-PCR, F: forward, R: reverse.

Primer	Sequence (5'-3')
β -actin F	CAACACAGTGCTGTCTGGTGGTAC
β -actin R	CTCCTGCTTGCTGATCCACATCTG
Ovalbumin F	ttattcggtcagccttgc
Ovalbumin R	tttctccacagtccttt
claudin-1 F	CATACTCCTGGGTCTGGTTGGT
claudin-1 R	GACAGCCATCCGCATCTTCT
occludin F	ACGGCAGCACCTACCTCAA
occludin R	GGGCGAAGAAGCAGATGAG
ZO-1 F	CTTCAGGTGTTTCTCTTCCTCCTC
ZO-1 R	CTGTGGTTTCATGGCTGGATC
Mucin-2 F	TTCATGATGCCTGCTCTTGTG
Mucin-2 R	CCTGAGCCTTGGTACATTCTTGT
TLR-4 F	CCACTATTCGGTTGGTGGAC
TLR-4 R	ACAGCTTCTCAGCAGGCAAT
MyD88 F	TGCAAGACCATGAAGAACGA
MyD88 R	TCACGGCAGCAAGAGAGATT
PAK1 F	GCTACAGGACAGGAGGTTGC
PAK1 R	ACGACATCTGTTAGGGAGCC
NF- κ b F	TGGAGAAGGCTATGCAGCTT
NF- κ b R	CATCCTGGACAGCAGTGAGA
TNF- α F	GAGCGTTGACTTGGCTGTC
TNF- α R	AAGCAACAACCAGCTATGCAC
AvBD10 F	TAAACTGCTGTGCCAAGATTCCG
AvBD10 R	AGCTCCTCAAGGCAGTGGA
IL-4 F	GCTCTCAGTGCCGCTGATG
IL-4 R	GAAACCTCTCCCTGGATGTCAT
IL-6 F	CGCCCAGAAATCCCTCCTC
IL-6 R	AGGCACTGAAACTCCTGGTC
IL-8 F	ATGAACGGCAAGCTTGGAGCTG
IL-8 R	TCCAAGCACACCTCTCTTCCATCC
IL-15 F	TGGAGCTGATCAAGACATCTG
IL-15 R	CATTACAGGTTCTGTCCTGTC
IL-18 F	TGATGAGCTGGAATGCGATG
IL-18 R	TGATGAGCTGGAATGCGATG
IL-22 F	GGTTGTCTTCTGCTGTTGTTGCTG
IL-22 R	GCCAAGGTGTAGGTGCGATTCC
CDC42 F	AGCCCATAACTCCAGAGACG
CDC42 R	CATTCTTTAGGCCTTTCTGCGT
Caspase-1 F	GTGAGGCAGTACGGTGGTGT
Caspase-1 R	TGTCCCCTTTGGGTTCTCTGT

Bax F	ATCGTCGCCTTCTTCGAGTT
Bax R	ATCCCATCCTCCGTTGTCCT
Bcl-2 F	TCGCGCCGCTACCAGAGGGACTTC
Bcl-2 R	CCGGTTGACGCTCTCGACGCACAT
MGP F	GGCCAATGGCTTCATACGAG
MGP R	ATCTCCCTCTGACGTTCTGA
Periostin F	GCAGGGAGCTGGAAGTGA
Periostin R	CTTGCTGATCCCCCTTGTGT
PROS F	TAGGTGGCCTGCCAGATGTTC
PROS R	CCAGCTGTCTGCTGTTGACC
protein C F	GTGTCTGATGGCAAGGGGAG
protein C R	CAGCAGAAGTCCCCAGCAG

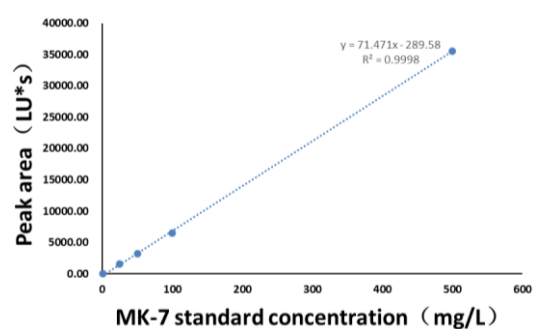


Figure S1. Calibration curves used for MK-7 quantification for Figure 1b ([28]).