



Figure S1. Generation of the *MoADE12* deletion mutants and the complement transformants. (A) Insertion site of T-DNA in the mutant M76.8 (B) Schematic diagram of *MoADE12* gene knockout. The 2.6-kb fragment including the *MoADE12* coding region was replaced with the hygromycin B (hph) cassette by homologous recombination. (C) PCR screening for gene knockout mutants. Lane M: DNA Marker III (Tiangen, Beijing, China). Lane 1-3: PCR amplification products using primer pairs Ade12-inF1/Ade12-inR1. Lane 4-6: PCR amplification products using primer pairs Ade12-sycz/Hph-sycz. Lane 7-9: PCR amplification products using primer pairs Ade12-xycz/Hph-xycz. Lane 1, 4 and 7: Guy11; Lane 2, 5 and 8: the $\Delta moade12$ mutant; Lane 3, 6 and 9: Another one of the *MoADE12* gene knockout mutants. (D) Expression of *MoADE12* gene in mycelia of tested strains. Lane 1: Guy11, Lane 2: the $\Delta moade12$ mutant, Lane 3: the reintroduction mutant $\Delta moade12/MoADE12$.

Table. S1 Primers used in this study

Primers	Sequence: 5'-3'	Comments
Ade12-uF	cacacattattatggagaaactcgagtcacactgaactattcaccgaactg	pKO-MoADE12 construction
Ade12-uR	gtaccgagctcgaattcgaatccattggtttatcttgctgctacctg	
Ade12-dF	cctctagagtcgacctgcaggcagtgaaacttgctttatcgcaagacg	pKO-MoADE12 construction
Ade12-dR	gtaaacgacggccagtgccaagcttctctccgaccaagtactagtatagtc	
Ade12-comF	cagctatgacctgattacgaattcactgaactattcaccgaactg	pBAR-Ade12R construction
Ade12-comR	aacgacggccagtgccaagctcaaggctgatacaacgcagcgtcg	
Ade12-inF1	acaactacgtaggccttcaca	For <i>MoADE12</i> gene complementation construction
Ade12-inR1	cgcatctcggaagtctttga	
Ade12-sycz	acgcgtgcaaacacagtacc	Identification of recombination events in the $\Delta moade12$ mutants
Hph-sycz	cgtgcaccaagcagcagatg	
Ade12-xycz	ctgcaggtcttaccgat	Identification of recombination events in the $\Delta moade12$ mutants
Hph-xycz	ctgggtgacggcaattcg	
Ade12q-F1	ggggatgaaggcaagggaa	<i>MoADE12</i> gene expression analysis
Ade12q-R1	gccgatcaggttcagca	
Tub-F1	ggccaatgctggcaaccaa	MGG_00604 gene expression analysis
Tub-R1	aggacagcacgggaaca	

