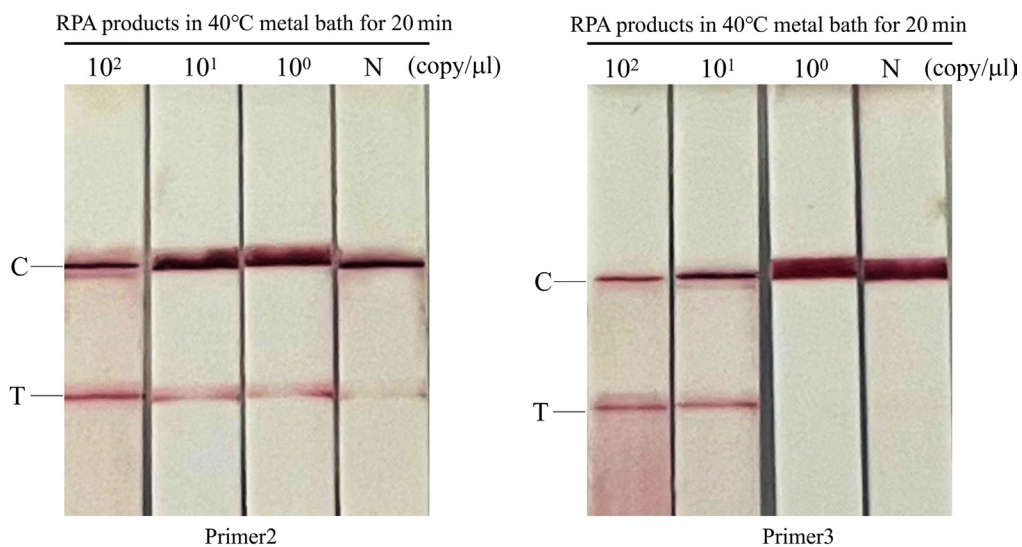


Supplementary Table 1. Primers and probes used in this study

Primer name	Sequence (5'-3')
CPMMV-CP-F	ATGGAGTCAGTATTTGATTT
CPMMV-CP-R	CTACTTCTTGGCGTGATTGAA
M13F	CAGGAAACAGCTATGAC
M13R	GTAAAACGACGGCCAGT
CPMMV-PCR-F1	AGTTAGTGGATAGCGAGATG
CPMMV-PCR-R1	TTTCTCAGCTGTGGCCAT
CPMMV-PCR-F2	CCCTTCCAGACATTGATGCTG
CPMMV-PCR-R2	TTTCTCAGCTGTGGCCATGT
CPMMV-PCR-F3	CCCTTCCAGACATTGATGCTG
CPMMV-PCR-R3	TCCATGAAGCTTGAGGAACT
CPMMV-PCR-F4	TCAAATAACATGGCCAC
CPMMV-PCR-R4	CCCAATCAGAAGGTGGT
CPMMV-RAA-F1	TTTGATTTAAATAAGTTAGTGGATAGCGAGATG
CPMMV-RPA-AGE-R1	TTTCTCAGCTGTGGCCATGTTATTTGATATT
CPMMV-RPA-F2	CCCTTCCAGACATTGATGCTGAATTGCAAAAAG
CPMMV-RPA-AGE-R2	TTTCTCAGCTGTGGCCATGTTATTTGATATT
CPMMV-RPA-F3	CCCTTCCAGACATTGATGCTGAATTGCAAAAAG
CPMMV-RPA-AGE-R3	TCCATGAAGCTTGAGGAACTAACATCTTTG
CPMMV-RPA-F4	TTCAAAGAAAATATCAAATAACATGGCCAC
CPMMV-RPA-AGE-R4	TTGAAACCCATGGCGGCCCAATCAGAAGGTGGT
CPMMV-RPA-LFS-R2	Biotin-TTTCTCAGCTGTGGCCATGTTATTTGATATT
CPMMV-RPA-LFS-R3	Biotin-TCCATGAAGCTTGAGGAACTAACATCTTTG
CPMMV-probe-2	FAM-CCAGCATTGAAAGAGTCCACGTTTAATTCAG(THF) ACAATCATACCCATATTT-Spacer
CPMMV-probe-3	FAM-GCTTAGCCGAATAGTCCCAAAGAAAATATCA(THF) AATAACATGGCCACA-Spacer

CPMMV, cowpea mild mottle virus.



Supplementary Fig. 1. False-positive test of RPA primer and probe pairs 2 and 3. Ten-fold dilutions of recombinant plasmid of CPMMV *CP* gene (6×10^2 – 6×1 copies/ μ l) were used to evaluate whether primer and probe pairs 2 and 3 have false-positive results. Healthy leaf extracts were used as a negative control in RPA-LFS assay. N, negative control; C, quality control band; T, test band. Only primer and probe pairs 2 showed false-positive results. RPA, recombinase polymerase amplification; CPMMV, cowpea mild mottle virus; *CP*, coat protein; LFS, lateral flow strips.