

Product: PrimeTime Gene Expression Master Mix, 500 mL

Product number: 1072102

Kit batch number: 0000488554

Master mix lot number: 387866

Expiration date: 2020-AUG-14

Test	Specification	Results
	Functional testing*	
Master mix is tested in single	eplex and duplex assays using nucleic acid temp	olates.
Singleplex efficiency	90–110%	Pass
Singleplex R <sup>2</sup>	>0.990	Pass
Duplex efficiency	90–110%	Pass
Duplex R <sup>2</sup>	>0.990	Pass
Cq difference singleplex vs. duplex	C <sub>q</sub> difference ≤0.50	Pass
Antibody-mediated Taq	<5% increase in fluorescence over 10 min at	Pass
polymerase inactivation <sup>†</sup>	60°C	F455
	Analytical testing	
рН	8.40 ±0.10 pH units	Pass
dNTP concentration	3.2 ±0.4 mM	Pass
RNase contamination <sup>‡</sup>	<1 ng/mL RNase A	Pass
	<12.5 ng/mL RNase T1	
	<70 ng/mL RNase I	
DNase contamination§	<2 U/µL	Pass
ss exonuclease activity	90-110% normalized fluorescence at 24 hrs	Pass
ds exonuclease activity	90-110% normalized fluorescence at 24 hrs	Pass
E. coli DNA contamination	≤10 copies/µL	Pass

<sup>\*</sup> Functional testing: efficiency and R<sup>2</sup> determined through evaluation of serial dilutions of cDNA template (50-0.0032 ng cDNA per rxn) using PrimeTime Assays (one FAM-ZEN and one HEX-ZEN assay) in both singleplex and duplex reactions using cycling conditions of 3 min. 95°C, 45 x (5 sec. 95°C, 30 sec. 60°C).

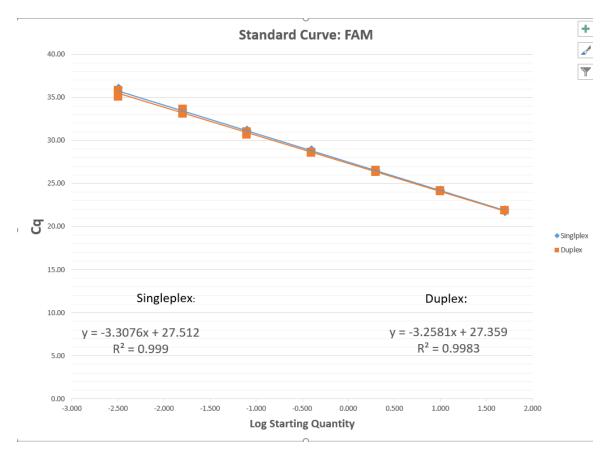
<sup>&</sup>lt;sup>†</sup> Polymerase inhibition: measured by incubation of FAM-labeled substrate with master mix for 10 min at 60°C.

<sup>&</sup>lt;sup>‡</sup> RNase contamination: measured using IDT RNaseAlert® reagents.

<sup>§</sup> DNase contamination: measured using IDT DNaseAlert reagents.

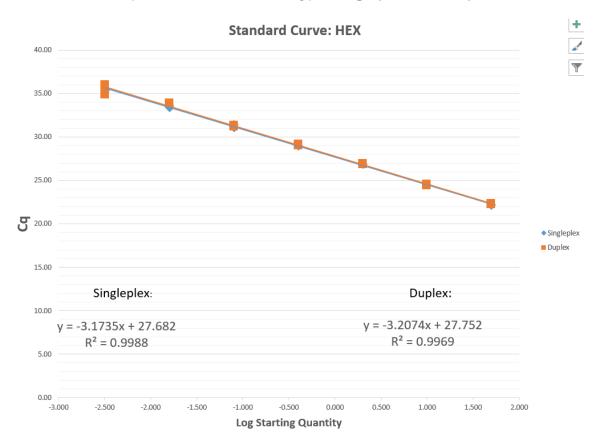


## Standard curve (FAM-ZEN-based assay) – singleplex and duplex





## Standard curve (HEX-ZEN-based assay) - singleplex and duplex



**Storage:** Store PrimeTime Gene Expression Master Mix in a sealed container at -20°C.

Verified by: Ekaterina Carlson Quality release date: 2019-DEC-11

IDT verifies that the information contained herein is true and correct to the best of our knowledge. This document was produced electronically and is valid without signature.

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