

Second in The World to Achieve Benchtop Stability of PCR Mix !!

48-hr Benchtop Stability for High Throughput Handling and Easy Operation

GDSBio has been carefully designed to maintain high levels of performance for up to 48 hours in preassembled reactions. The stability of these mixtures provide users of high-throughput liquid handling systems with the assurance that the results on the first plate will be similar to those on the last plate.

not have high throughput requirements, the enhanced stability of these premixes provide an overall convenience for your workflow, as you are no longer limited to running the plate immediately after assembly on the ice box, and users are able to use it with confidence and flexibility in numerous workflow scenarios.

Benchtop Stability Test of Multiplex Probe qPCR Mix Plus U

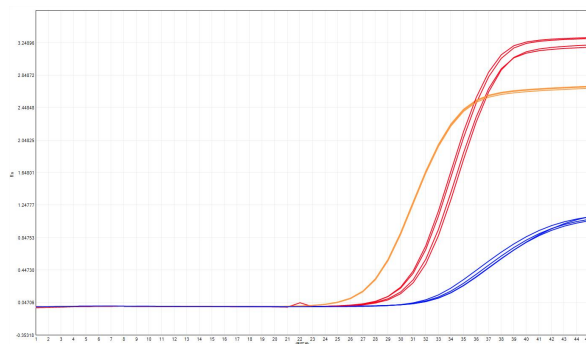


Fig.1: P2701-0hr
Fig.3: supplier T-0hr

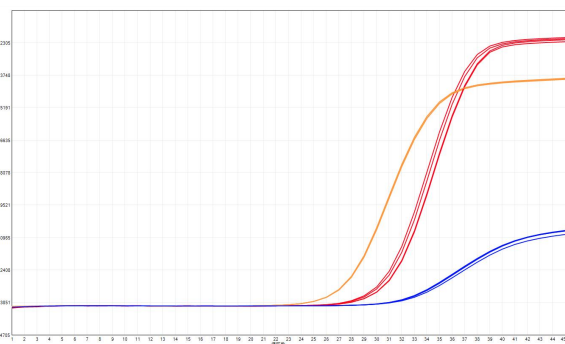


Fig.2: P2701-48hr
Fig.4: supplier T-48hr

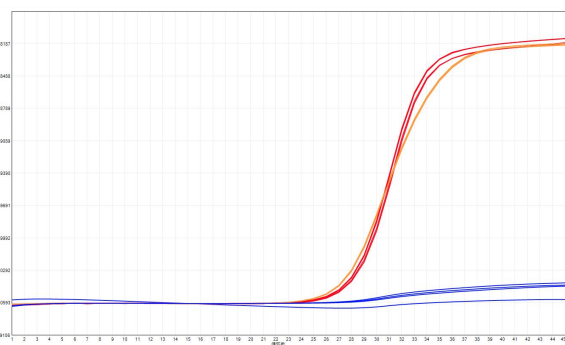
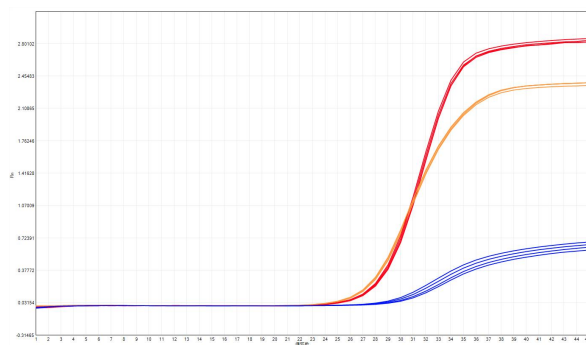


Table 1

Target	Ct Value-P2701		Ct Value-supplier T	
	0 hr	48hr	0 hr	48hr
CY5	29.18	29.26	27.01	27.05
FAM	33.05	33.09	33.15	36.28
ROX	26.24	26.21	26.46	26.45

Human genome DNA (0.1ng/μl) was used as template for gene detection by Multiplex Probe qPCR Mix Plus U. FIG. 1 and FIG. 2 show the amplification curves of 0 hr (detected immediately after preassembly) and 48 hr (detected 48 hr after preassembly and being placed at RT), respectively. At the same time, a comparative test was conducted with similar products of manufacturer T. FIG. 3 and FIG. 4 show the amplification curves of manufacturer T. Table 1 shows the Ct values of Multiplex Probe qPCR Mix Plus U and manufacturer T at 0 hr and 48 hr. It can be seen that the Multiplex Probe qPCR Mix Plus U still has excellent amplification performance after being placed at room temperature for 48 hours.

Benchtop Stability Test of SYBR Green qPCR Mix

Table 2

Conc. of cDNA (ng/μl)	Ct Value		ΔCt _{48hr-0hr}
	0 hr	48hr	
10	25.26	25.01	-0.25
1	28.12	28.37	0.25
0.1	30.77	30.81	0.04
0.01	32.01	31.96	-0.05

cDNA was generated by reverse transcription of lettuce RNA as template, and diluted to 10ng/μl, 1ng/μl, 0.1ng/μl, 0.01ng/μl in 4 gradients. EIF2A gene was detected by SYBR Green qPCR Mix. Table 2 shows Ct values of 0 hr (detected immediately after preassembly) and 48 hr (detected 48 hr after preassembly and being placed at RT) for each concentration gradient, and the difference between Ct values. It can be seen that SYBR Green qPCR Mix still has excellent amplification performance after being placed at room temperature for 48 hours.

Benchtop Stability Test of DSPath NGS Multiplex PCR Master Mix II

DSPath NGS Multiplex PCR Master Mix II can not only meet the needs of tNGS micro-sequencing, but also show excellent benchtop stability to meet the needs of simultaneous sequencing of a large number of samples, minimizing the difference caused by sample addition sequence. FIG. 5-8 respectively shows the various indexes of the reaction system after 0hr and 48hr at room temperature. It can be seen that the performance is basically the same, indicating that the DSPath NGS Multiplex PCR Master Mix II can meet the 48-hour benchtop stability.



Fig.5: output

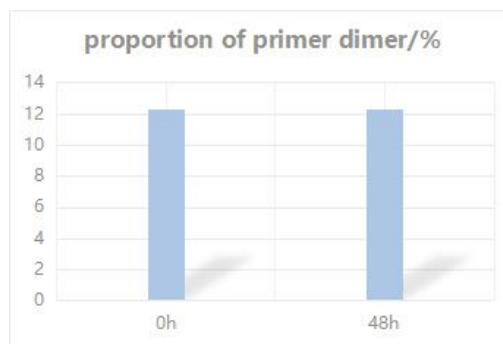
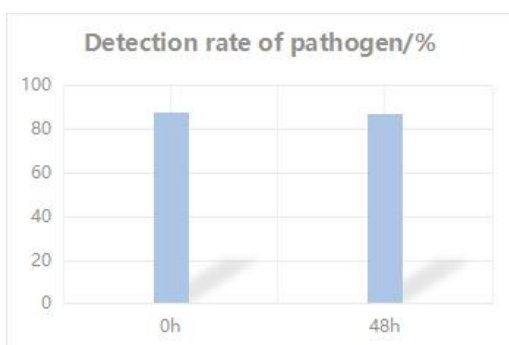


Fig.6: primer dimer

Fig.7: detection rate

Fig.8: target reads



PCR Master Mix with Benchtop Stability

Application	Product Name	Cat. No.	Spec. *
Dye-based qPCR	SYBR Green qPCR Mix	P2091/P2092	1 ml/1 ml×5
Probe-based multiplex qPCR	Multiplex Probe qPCR Mix Plus U	P2701/P2702	1 ml/1 ml×5
Digital PCR	Super Probe ddPCR Mix	P2901/P2902	1 ml/1 ml×5
NGS PCR with high sensitivity	DSPath NGS Multiplex PCR Master Mix II	K031-A/K031-B	80 rxns/400 rxns
NGS PCR enrichment	NGS Multiplex PCR Master Mix II	NM2001/NM2002	40 rxns/400 rxns

* For more specifications, please consult the salesman