

2006 Real-Time PCR Survey

1. Do you currently perform or plan to perform real-time PCR?

Currently use real-time PCR

Plan to use real-time PCR

Neither currently use or plan to use real-time PCR

2. What applications are you currently using real-time PCR for?

Primary validation of gene expression

Microarray detection

Pathogen detection

Cancer diagnostics

Viral load detector

SNP analysis

Other (please specify)

3. What types of real-time assays do you perform?

5' Exonuclease Assay (e.g. TaqMan probes)

DNA Dye Binding Assay (e.g. SYBR green)

Hybridization Assay (e.g. Molecular Beacons, FRET probes/primers)

Other (please specify)

4. Do you perform UNG treatment on you real-time PCR reactions?

Always

Occasionally

Never

5. What is your preferred reaction volume?

50 µl

25 µl

10 µl

Other (please specify)

6. Please specify your average number of real-time PCR reactions per run and per month.

Average # per run _____

Average # per month _____

7. On average, what is the reagent cost per real time PCR well? (consider enzymes and consumables in your estimation but do not include probes/primers, labors or overhead (choose only one))

Less than US\$ 0.25 per well

Between US\$ 0.25 - 0.50 per well

Between US\$ 0.51-0.75 per well

Between US\$ 0.76 – 1.00 per well

Between US\$ 1.01 - 1.50 per well

Over US\$ 1.50 per well

8. How much time do you currently need for one PCR run?

30 to 60 minutes

60 to 120 minutes

More than 120 minutes
Other (please specify)

9. What type of template do you use?

cDNA
Genomic DNA
Plasmid
Total RNA
mRNA
Other (please specify)

10. How often do you check the quality of your RNA sample(s) before performing real time PCR? Method to check quality may include using the A260/A280 ratio, Agilent 2100 bioanalyzer to create an RNA integrity number, etc. (choose only one)

Always (100% of my samples)
Often (up to 75% of my samples)
Sometimes (up to 50% of my samples)
Occasionally (up to 25% of my samples)
Never (0% of my samples)

11. What is the format of the source material of your template?

Bacterial cells
Commercially available cDNA
Human tissue
Insect tissue
Mammalian tissue
Plant tissue or cells
Tissue culture cells
Virus
Other (please specify)

12. Which of the following brands of SYBR real-time PCR kits and master mixes do you use?

SYBR Kits

Applied Biosystems SYBR®
Qiagen QuantiTect™
Roche Applied Science LightCycler®
Stratagene Brilliant™

SYBR Master Mixes

Applied Biosystems SYBR®
Bioneer AccuPower Greenstar
Bio-Rad iTaq™ SYBR Green Supermixes
Bio-Rad iQ™ SYBR Green Supermixes
Eurogentec qPCR MasterMix
Finnzymes DyNAmo™
Invitrogen Platinum®
MCLAB 2x HotSybr
New England Biolabs DyNAmo™
Roche Applied Science LightCycler®
Sigma-Aldrich JumpStart™

Stratagene Brilliant™

13. Which of the following brands of non-SYBR real-time PCR kits and master mixes do you use?

Non-SYBR Kits

Applied Biosystems TaqMan®
Epicentre FailSafe™
Finnzymes Oy DyNAmo™
Promega Plexor
Roche Applied Science LightCycler®
Sigma-Aldrich Jumpstart Taq™
Stratagene Brilliant™

Non-SYBR Master Mixes

Applied Biosystems TaqMan®
Bio-Rad iQ™ Supermix
Bio-Rad iTaq™ Supermix
Clontech QTaq™
Epicentre TAQurate™
Eppendorf® RealMasterMix
Eurogentec qPCR MasterMix
Invitrogen Platinum®
Jena Bioscience GmbH qPCR Master
Molecular Cloning Laboratories (MCLAB) 2x CAD PCR Reaction Mix
Roche Applied Science FastStart
Stratagene Brilliant™
Takara Mirus Bio

14. Who is the manufacturer of the real-time PCR instrument you primarily use?

AlphaHelix
Applied Biosystems
Barloworld Scientific (Techne)
Bioneer
Bio-Rad
Corbett Robotics
Cepheid
Eppendorf
Idaho Technologies
MJ Research
Roche Applied Science
Stratagene
I don't know
Other (please specify)

15. If they chose AlphaHelix then....

Which AlphaHelix instrument do you use?

AlphaHelix QuanTyper™
AlphaHelix MegaCycler™
Other (please specify)

If they chose Applied Biosystems then....

Which Applied Biosystems instrument do you use?

Applied Biosystems Prism® 7000

Applied Biosystems 7300
Applied Biosystems 7500
Applied Biosystems 7500 Fast
Applied Biosystems 7900HT Fast
Other (please specify)

If they chose Barloworld then....
Which Barloworld instrument do you use?

Barloworld (Techne) Quantica®
Other (please specify)

If they chose Bioneer then....
Which Bioneer instrument do you use?

Bioneer Exicycler™
Other (please specify)

If they chose Bio-Rad then....
Which Bio-Rad instrument do you use?

Bio-Rad Chromo™ 4 (formerly MJ Research)
Bio-Rad DNA Engine Opticon 2 (formerly MJ Research)
Bio-Rad Opticon (formerly MJ Research)
Bio-Rad MiniOpticon
Bio-Rad iCycler iQ
Bio-Rad iQ5
Bio-Rad MyiQ Single Color
Other (please specify)

If they chose Cepheid then....
Which Cepheid instrument do you use?

Cepheid Smart Cycler 1600
Cepheid Smart Cycler 3200
Cepheid Smart Cycler 4800
Cepheid Smart Cycler 6400
Cepheid Smart Cycler 8000
Cepheid Smart Cycler 9600
Cepheid Smart Cycler® TD
Other (please specify)

If they chose Corbett then....
Which Corbett instrument do you use?

Corbett Roto-Gene™ 6000
Other (please specify)

If they chose Eppendorf then....
Which Eppendorf instrument do you use?

Eppendorf Mastercycler® ep realplex
Other (please specify)

If they chose Idaho Technology then....
Which Idaho Technology instrument do you use?

Idaho Technology R.A.P.I.D.
Idaho Technology RapidCycler® 2
Idaho Technology RAZOR™ Instrument
Other (please specify)

If they chose MJ Research then....

Which MJ Research instrument do you use?

- Bio-Rad Chromo™ 4 (MJ Research)
- Bio-Rad DNA Engine Opticon 2 (MJ Research)
- Bio-Rad DNA Engine Opticon (MJ Research)
- Other (please specify)

If they chose Roche Applied Science then....

Which Roche Applied Science instrument do you use?

- Roche LightCycler
- Roche LightCycler® 2.0
- Roche LightCycler® 480
- Other (please specify)

If they chose Stratagene then....

Which Stratagene instrument do you use?

- Stratagene Mx3000P
- Stratagene Mx3005P
- Stratagene Mx4000
- Other (please specify)

16. How long ago did your lab purchase your primary real-time PCR instrument?]

- Less than 6 months ago
- 6 months to 1 year ago
- 1 to 2 years ago
- 2 to 3 years ago
- 3 to 4 years ago
- 4 to 5 years ago
- More than 5 years ago

17. Please indicate how satisfied you are with the following features of your primary real-time PCR instrument?

Very Satisfied	Satisfied	Neutral	Dissatisfied	Very Dissatisfied
5	4	3	2	1
Linear dynamic range				
Price				
Sensitivity				
Footprint (size of instrument)				
High-throughput ability				
User-friendly controls/software interface				
Multiplexing capability				
Online analysis capability				
Uniform temperature across the block/blocks				

18. Do you plan to purchase a real-time PCR instrument and what is your purchasing timeframe?

- Yes: Within 3 to 6 months
- Yes: Within 6 to 9 months
- Yes: Within 9 to 12 months
- Yes: In more than 12 months
- No: I have no plans to purchase a real-time PCR instrument

19. Which brand of real-time PCR instrument are you most likely to purchase?

AlphaHelix
Applied Biosystems
Barloworld Scientific (Techne)
Bioneer
Bio-Rad
Corbett Robotics
Cepheid
Eppendorf
Idaho Technologies
MJ Research
Roche Applied Science
Stratagene
I don't know yet
Other (please specify)

20. Which instrument model are you most likely to purchase?

List of models will appear based on brand selected in previous question

21. Please rank the following features in order of importance to you when choosing a thermal cycler for real-time PCR. (1 = least important, 8 = most important)

Linear dynamic range
Price
Sensitivity
Footprint (size of instrument)
High-throughput ability
User-friendly controls /software interface
Multiplexing capability
Uniform temperature across the block/blocks

22. Do you use the real-time PCR reagents sold by your instrument's manufacturer or sold by another company?

I ONLY use kits and reagents for real-time PCR sold by my instrument's manufacturer
I use kits and reagents for real-time PCR sold by a company OTHER than my instrument's manufacturer
I use kits and reagents for real-time PCR sold by BOTH my instrument's manufacturer and a company other than my instrument's manufacturer

23. Those who answered 'Other company' will be asked...

What does the company you purchase real-time reagents from offer that your instrument's manufacturer does not offer?

Lower prices
Wider selection of novel kits
Better quality reagents
Faster delivery
Better technical support/customer service
My instrument's manufacturer does not offer kits and reagents
Other (please specify)

24. Are you performing or planning to perform high throughput real-time PCR?

Yes: Currently perform high throughput real-time PCR
No: But plan to in the next 12 months

No: Do not plan to perform high throughput real-time PCR

25. Do you perform multiplex real-time PCR reactions?

Yes: Currently perform multiplex reactions

No: But plan to in the next 12 months

No: Do not plan to perform multiplex reactions

26. Why do you perform real-time multiplex PCR? (check all that apply)

To increase throughput

To obtain more reliable results (endogenous control and target amplified in the same tube)

To save time

To save costs per reaction

Other (please specify)

27. Which of the following best describes your familiarity with high resolution melting (HRM) for real-time PCR?

I currently use HRM

I am familiar with HRM and **plan** to use it in the next 12 months

I am familiar with HRM and **do not plan** to use it in the next 12 months

I am not familiar with HRM but **am interested** in learning more about it

I am not familiar with HRM and **am not interested** in learning more about it

28. Do you perform fast-cycling reactions?

Yes – all the time

Yes - sometimes

Not at all

29. What types of webinars or seminars would you be interested in attending? (check all that apply)

Troubleshooting

"Basics - How To"

Applications

Demographic Questions

30. In which type of institution do you work?

Academic

Biotechnology

Pharmaceutical

Government

Private Research

Clinical Diagnostic Testing

Other (please specify)

31. Which title best applies?

Professor/Instructor

Process Engineer

Business Development Director/Manager

Research Director/VP of Research

Department Head

Technician/Research Assistant

Account Manager

Graduate Student

Staff Scientist
Principal Investigator
President/CEO/Owner/VP
Lab Director/Chief Scientist
Postdoctoral Fellow
Procurement Manager
Consultant
Other

32. Which of the following are your key areas of research or work?

Bioinformatics
Microbiology/Virology
Immunology
Genomics/Genetics
Cell Biology
Diagnostics/Pathology
Drug Discovery
Administration
Biochemistry
Marketing/Sales
Pharmacology/Toxicology
Molecular Biology
Bioengineering
Neuroscience
Proteomics
Purchasing
None of the Above
Other (please specify)

33. Which best describes your purchasing authority?

Authorize
Recommend
Evaluate
No Purchase Role