



PCR REAGENTS · ISOLATION · CONSUMABLES

QUALITY PRODUCTS MADE IN AUSTRIA &
SOLD IN NORTH AMERICA BY TRAX LAB SYSTEMS



Powered By
PROCOMCURE BIOTECH
QUALITY WITHOUT COMPROMISE



ISO 9001:2015 No.21918/0
EN ISO 13485:2016 No.00322/0



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WHO ARE WE?

Trax Lab Systems works directly with our biotech partners to help develop innovative, high-tech PCR reagents and technologies for a broad range of applications. From standard endpoint PCR kits for basic experiments to highly sensitive quantitative PCR reagents to sophisticated One-Step solutions for gene expression analysis, Trax's portfolio offers a solution for any PCR-related application.

Procomcure—founded in 2007—is a biotech company located in Salzburg. A strong team of highly skilled professionals, from biochemists to molecular and cell biologists are working on innovative products and high-tech solutions.

Designer Enzymes & Premium PCR Products

Genetics & Bioengineering are at the core of what we offer and are used for directed in-vitro evolution of novel enzymes with improved properties for Research and Diagnostics.

Intellectual Property

A strong patent and IP portfolio, including proprietary methods for molecular evolution and bioprocess engineering are the guarantee for more accurate, robust, powerful polymerases and better PCR results.

Quality Management Systems

PCC-manufactured products are certified after the ISO Norms ISO 9001:2015 (for the development, distribution and production of molecular biological, cell biological and PCR products) and ISO 13485:2016 for the design, production and distribution of Medical Devices and associated Technical Services.



WHICH REAGENT IS RIGHT FOR YOUR APPLICATION?

When designing your PCR experiment, it is crucial to know the parameters that matter: Do I want to amplify a long sequence? Do I want my PCR to be fast? Am I doing endpoint or real-time PCR? Do I need extra fidelity? All of these questions need to be addressed before starting to work.

Different applications require different products to provide the best possible combination of buffer and polymerase to make your experiment a success.

To find the perfect solution, check the icons next to each product for features that are important for your experiment. If you are not entirely sure which one is best for you, refer to the icons description or contact us for *advice at techsupport@traxconnects.com*.

FEATURES



Standard

Standard enzymes are robust and reliable enzymes that are mostly used in routine applications such as colony PCR where all that matters is a clean product of a defined size. VitaTaq[®] polymerase produces single-stranded A-tails that can be used for TA-cloning, VitaProof[®] produces amplicons with blunt ends.



HotStart

HotStart polymerases are first activated upon the initial denaturation in the thermocycler. This allows for reaction setup at room temperature and increases specificity and yield. HotStart is favorable for complex DNA targets or multiplex applications or simply for convenient reaction setup.



High Fidelity

High fidelity PCR reagents work with proofreading polymerases that are capable of correcting falsely incorporated bases. They are the best choice if you have downstream applications for the amplified sequence like sequencing or cloning.



Gel Loading

Products with a gel loading feature already contain a gel tracking dye to monitor the electrophoresis process and loading aid that makes the samples sink into the gel slots. Products with gel loading features are convenient to use as the addition of a separate loading dye after the PCR is not necessary. This saves time especially when processing a larger sample number.



Multiplex

Multiplex PCR is a highly complex procedure as several different primer pairs need to anneal properly and be amplified uniformly. PCR products for multiplex have a HotStart feature for increased specificity and an optimized buffer environment that allows for specific primer annealing and efficient amplification.



Long Range

In Long Range PCR, targets are often more than 5 kb long. Therefore, reagents for long amplification contain a fast polymerase to keep reaction times at a reasonable level and a special buffer formulation that protects the enzyme during prolonged periods at higher temperature and ensures specificity over long extension.



2X Mastermix

A 2X mastermix is a convenient solution for fast, easy and reproducible reaction setup. The mastermix contains a polymerase, an optimized buffer environment and dNTPs. All there is to add is your primer and template. 2X mastermix formulations are favorable if your reaction conditions do not change much and if you want to process a large number of samples.



Plant PCR

Plant material is often tricky to analyze in PCR as the template material contains a lot of PCR inhibiting agents that often stick with the DNA even after DNA isolation. PCR reagents that are designed for plant-based PCR work with a special buffer composition, that renders many plantbased inhibitors harmless. In endpoint applications, the use of plant extracts or direct samples is possible for extra convenience.



GC-Rich

“GC-rich PCR” applies if your sequence of interest contains more than 60% GC base pairs. These sequences require higher temperatures for amplification that regular sequences and polymerases that can work under these suboptimal conditions.



Dx

Dx-Products contain VitaDx® Taq, a highly pure polymerase with all favorable features of a Taq polymerase (robust, fast and efficient amplification) but free from human, bacterial, parasitic viral and fungal DNA. The missing DNA background can reduce non-specific amplification events and increases precision of PCR analysis, an important feature when performing bacterial genome analysis.



PCC

Products labeled “PCC” are proprietary inventions. They contain enzymes that have been developed by our team of experts in-house. Through in-vitro evolution, we developed bio-engineered designer polymerases that exhibit exceptional features such as high fidelity and superior processivity.

To help you choose the right enzyme for your application, we created an at-a-glance overview that shows you which product suits your application.

Best Choice

This is our recommendation for the indicated purpose. Choose this if you have a very specific application in mind.

Good Option

Choosing this enzyme will most likely work for your purpose, but there might be a better choice. Choose this if you need the reagents for several different applications.

Suitable

Suitable means that a certain application might be possible with the enzyme but results will probably not be as good as they could be.

Not recommended

If a product is not recommended for a certain application, then you will not get the results you want (e.g. blunt ends for TA-cloning).

	VitaTaq®	VitaTaq® HS	VitaProof®	Indominus™	VitaTaq®/ VitaProof® Blend	VitaDx Taq®
STANDARD PCR	Good Option	Best Choice	Good Option	Suitable	Good Option	Good Option
FAST PCR	Good Option	Good Option	Not recommended	Best Choice	Suitable	Good Option
MULTIPLEX PCR	Good Option	Best Choice	Not recommended	Good Option	Not recommended	Good Option
COLONY PCR	Good Option	Best Choice	Suitable	Suitable	Suitable	Good Option
LONG AMPLIFICATION	Suitable	Suitable	Not recommended	Good Option	Best Choice	Suitable
GC-RICH AMPLIFICATION	Good Option	Good Option	Suitable	Suitable	Suitable	Good Option
CLONING (TA)	Good Option	Best Choice	Good Option	Not recommended	Not recommended	Good Option
CLONING (BLUNT END)	Not recommended	Not recommended	Good Option	Best Choice	Not recommended	Not recommended
HIGH FIDELITY	Not recommended	Not recommended	Good Option	Best Choice	Suitable	Not recommended
DIAGNOSTICS	Not recommended	Not recommended	Not recommended	Not recommended	Not recommended	Best Choice

ENDPOINT PCR

STANDARD PCR

VitaTaq® DNA Polymerase

VitaTaq® DNA Polymerase is a robust and reliable Taq DNA polymerase suitable for all common PCR applications. It is the perfect enzyme for all kinds of standard PCR applications due to its sensitive and efficient amplification features.

VitaTaq® DNA Polymerase does not exhibit detectable DNase/RNase activity and shows purity > 95% on SDS PAGE.

For maximum flexibility, we developed VitaTaq® PCR Kit, where buffer and enzyme are delivered separately, for maximum convenience, there is 2X HS Mastermix Clear or Gold.

VitaTaq® PCR Kit & HS PCR Kit

VitaTaq® PCR Kits are classic PCR reagent sets: enzyme and buffer come separately. This allows you to adapt as much about the reaction setup as is necessary for your application. The concentrated 10X VitaTaq® Buffer leaves enough spare volume to add extra components like PCR additives if you wish.

With our optimized buffer formulation, VitaTaq® DNA Polymerase can amplify even complex target sequences with a GC-content up to 72.5% while still being highly specific and efficient.

Product	Size	SKU
VitaTaq® PCR Kit	500 units	TRAXSKU1001
	1000 units	TRAXSKU1002
	5000 units	TRAXSKU1003
VitaTaq® HS PCR Kit	200 units	TRAXSKU1032
	500 units	TRAXSKU1033
	1000 units	TRAXSKU1034

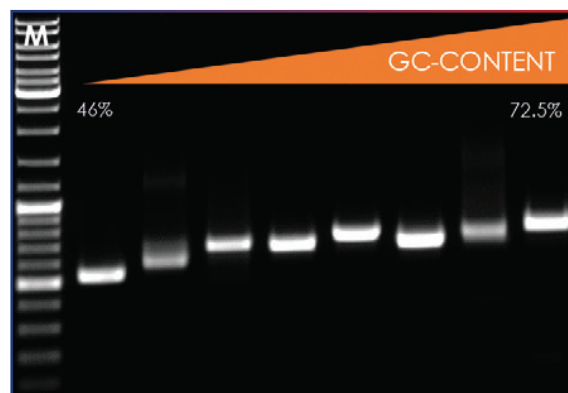
Applications

- Colony PCR
- Genotyping
- GC rich amplifications
- 3'-dA-Tailing of PCR amplicons

Did you know?

Quality dNTPs are crucial for the success of your PCR experiment! We offer high-quality dNTPs to complement our kits:

Product	Size	SKU
dNTP Mix (10 mM each)	0.5 ml	TRAXSKU1019
	1 ml	TRAXSKU1020
	2.5 ml	TRAXSKU1021



VitaTaq® PCR Kit was used to amplify 8 sequences from human genomic DNA from 584 bp to 801 bp with a GC content from 46% to 72.5%. Amplification was successful and specific for all targets.

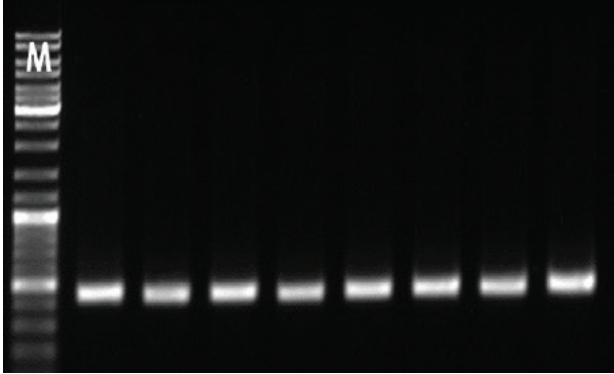
2X HS Mastermix Clear & Gold

2X HS Mastermix Clear and Gold are 2X formulations of VitaTaq® DNA Polymerase that were developed for routine applications that must be a standardized as possible and do not allow for reaction-to-reaction deviations.

2X HS Mastermix Clear is suitable for all downstream applications, including fluorescence based applications. 2X HS analyze Gold is the best choice if you want to analyse your samples by gel electrophoresis, e.g. after colony PCR. A loading agent and a tracking dye migrating saves ~50 bp make your samples ready to load and save time and extra pipetting steps.



Product	Size	SKU
2X HS Mastermix Clear	2 ml	TRAXSKU1004
	5 ml	TRAXSKU1005
	10 ml	TRAXSKU1006
2X HS Mastermix Gold	2 ml	TRAXSKU1007
	5 ml	TRAXSKU1008
	10 ml	TRAXSKU1009

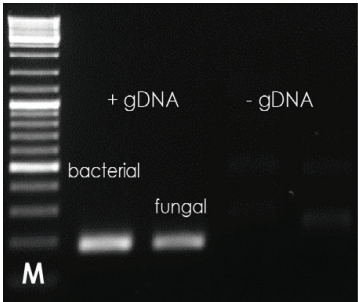


2X HS Mastermix Clear was used to amplify a plasmid-based sequence of 475 bp in 8 single reactions. Amplification was highly specific and performance showed no variations from reaction to reaction.

Vita DxTaq® HS PCR Kit

Vita DxTaq® is a unique designer polymerase that was developed exclusively for applications that require exceptional specificity and precision. This is achieved through a total lack of bacterial, fungal and human background DNA, making it the perfect choice for sophisticated diagnostic applications where results must be absolute. The antibody-mediated HotStart feature allows for reaction setup at room temperature and grants full control over the reaction start.

Vita DxTaq® is completely free from bacterial, viral, parasitic, fungal and human DNA.



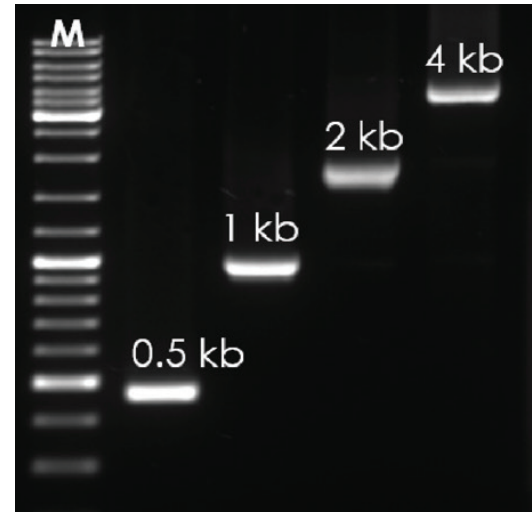
Product	Size	SKU
Vita DxTaq® HS PCR Kit	100 units	TRAXSKU1035
	500 units	TRAXSKU1036
	2500 units	TRAXSKU1037

Vita DxTaq® was tested in endpoint PCR with and without bacterial & fungal gDNA with primers specific for a 200 bp pan-bacteria / pan-fungi sequence. No amplification occurred after 50 cycles without added template DNA.

VitaFast 2X Mastermix

VitaFast 2X Mastermix is the ideal choice for standard PCR applications where you want quick results, e.g. in colony PCR. Reaction setup is fast due to the 2X Mastermix formulation, amplification happens within 15 seconds per kb and variation between reactions is minimized.

ST HS 2X



A 4 kb target sequence could be amplified with Vita Fast 2X Mastermix in as little as 60 seconds extension.

Did you know?

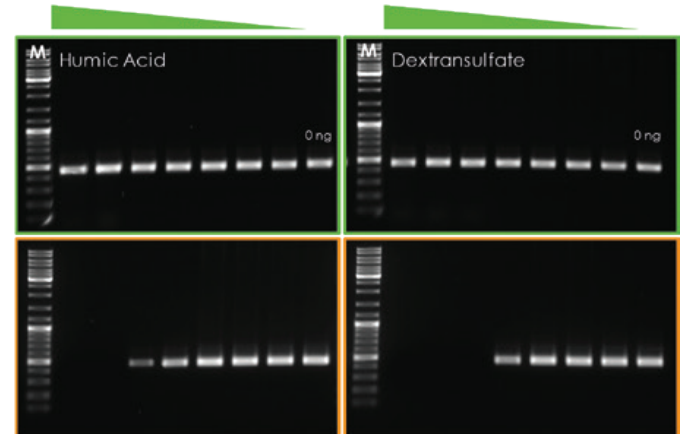
We additionally offer a T4-Ligase for your routine cloning application and further nucleases and modifying enzymes like RNase A, DNase I, RNase Inhibitor and Proteinase K for several sample preparations steps.

Product	Size	SKU
VitaFast 2X Mastermix	2 ml	TRAXSKU1028
	5 ml	TRAXSKU1029

Vita Plant Kit

Vita Plant Kit was developed and optimized for the challenging analysis of plant derived samples in endpoint PCR. Be it DNA isolates from plant sources or PCR from crude plant extract, Vita Plant Kit provides convenient solutions for your application.

2X PL HS



It provides:

- Efficient & highly specific target amplification
- Fast analysis from crude extracts
- Superior resistance against plant-derived inhibitors
- Additional 10X Plant Enhancer for extra-persistent samples
- Convenient 2X mastermix formulation

Product	Size	SKU
Vita Plant Kit	2 ml	TRAXSKU1022
	5 ml	TRAXSKU1023

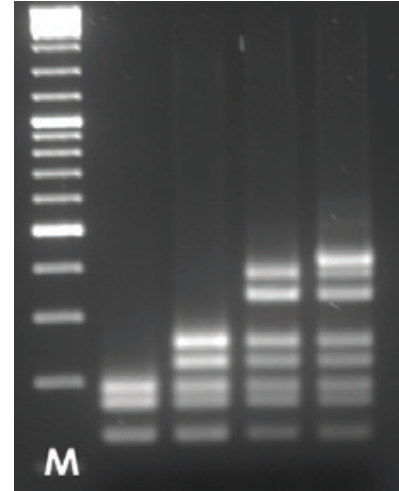
VitaPlant Kit was used to amplify a 500 bp target sequence in the presence of an increasing concentration of humic acid and dextransulfate (up to 200 ng / μ l). VitaPlant Kit could successfully amplify the target sequence even at the highest tested concentration while a competitor product showed a loss in performance at higher concentrations.

VitaTaq® HS Multiplex Kit

VitaTaq® HS Multiplex Kit is a convenient multiplex formulation of the robust & efficient VitaTaq® DNA Polymerase optimized for applications with multiple primer pairs in one reaction.

The 5X reaction buffer supports efficient & selective annealing of all primers to the template DNA and protects the enzyme during long PCR experiments and under harsh cycling conditions. The HotStart antibody ensures full control over the amplification start and prevents non-specific amplification.

Product	Size	SKU
VitaTaq® HS Multiplex Kit	100 rxn / 50 µl	TRAXSKU1010
	200 rxn / 50 µl	TRAXSKU1011
	500 rxn / 50 µl	TRAXSKU1012



A set of validated multiplex primers was used with VitaTaq® HS Multiplex Kit. Reactions contained a 3-/5-/7-/9-plex of primers; all were amplified successfully and uniformly.

HIGH FIDELITY PCR

Vita High Fidelity Kit

Vita High Fidelity Kit provides an increased level of fidelity in comparison to PCR with a regular Taq polymerase. It contains a blend of Taq and proofreading polymerase that is highly processive and—at the same time—capable of correcting amplification errors. That makes it 5 times more precise than reagents with Taq polymerase alone.

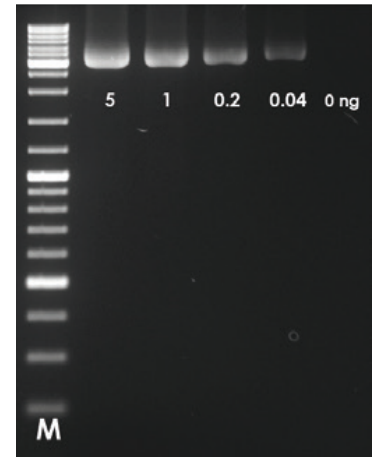
Vita High Fidelity reagents are a reasonable option when extra precision is required, e.g., in sample preparation for sequencing or cloning.

Product	Size	SKU
Vita High Fidelity Kit	100 rxn / 50 µl	TRAXSKU1024
	200 rxn / 50 µl	TRAXSKU1025



Vita LongRange Kit

Vita LongRange Kit provides a sensitive and fast option for the amplification of long targets up to 15 kb. The balanced enzyme blend combines the best features of VitaTaq® and VitaProof®: short extension times of 30 seconds / kb combined with the increased fidelity of VitaProof®. This makes Vita LongRange Kit the ideal choice for the amplification of long targets e.g. for sequencing.



Vita LongRange Kit was used to amplify a 4 kb target sequence with a serial dilution of template DNA (5 to 0.04 ng / rxn). Even with only 40 pg of template, a specific and correct amplicon was obtained.

Product	Size	SKU
Vita LongRange Kit	100 rxn / 50 µl	TRAXSKU1013
	200 rxn / 50 µl	TRAXSKU1014
	500 rxn / 50 µl	TRAXSKU1015

VitaProof® PCR Kit

VitaProof® is a high-fidelity proofreading DNA polymerase that (additionally to the 3'-5' polymerase activity) exhibits a 3'→5' exonuclease activity. This feature allows the removal of falsely incorporated nucleotides making VitaProof® PCR Kit the ideal choice for applications that require an elevated level of fidelity in comparison to VitaTaq® DNA polymerase (10X Taq).



Product	Size	SKU
VitaProof® PCR Kit	250 units	TRAXSKU1016
	500 units	TRAXSKU1017
	2500 units	TRAXSKU1018

Did you know?

We develop not only polymerases but also our own **HotStart antibody!** It is an artificial designer protein that blocks polymerase even more efficiently than other commercially available antibodies. It is not only useful for PCR but also for Western Blots and ELISA applications!



Product	Size	SKU
HotStart Antibody (mouse)	250 units	TRAXSKU1029
	1000 units	TRAXSKU1030

Indominus™ Ultra-Fi PCR Kit

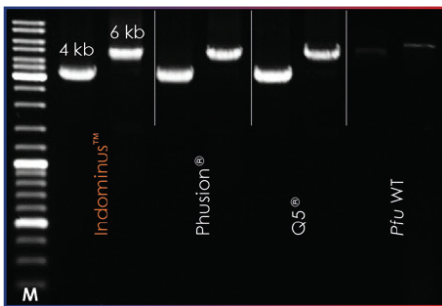
Our recently developed Indominus™-Polymerase is a next-generation designer proofreading polymerase that combines exceptional speed and efficiency with a high amplification fidelity. It is an all around talent for many applications but especially recommended for high fidelity applications like cloning or NGS. In contrast to well-known market-leading products, Indominus™ is no Sso7D-fusion protein but a whole new generation of proofreading polymerase.



The kit comes with a 50X Enzyme Solution and 2 different 5X buffers including dNTPs to fit all applications.

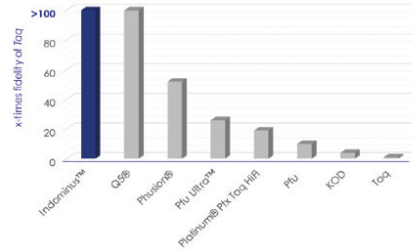
Product	Size	SKU
Indominus™ PCR Kit	100 rxn / 50 µl	TRAXSKU1040
	500 rxn / 50 µl	TRAXSKU1041

LongRange PCR



Indominus™ (1) was tested in direct comparison to the gold-standard enzymes Phusion® (ThermoFisher) and Q5® (NEB) and wildtype Pfu-polymerase (4) for amplification of a 4kb and 6 kb amplicon. All enzymes were tested in their respective buffers under their optimal conditions. PCR was run with 1ng template/ 25 µl rxn for 30 cycles.

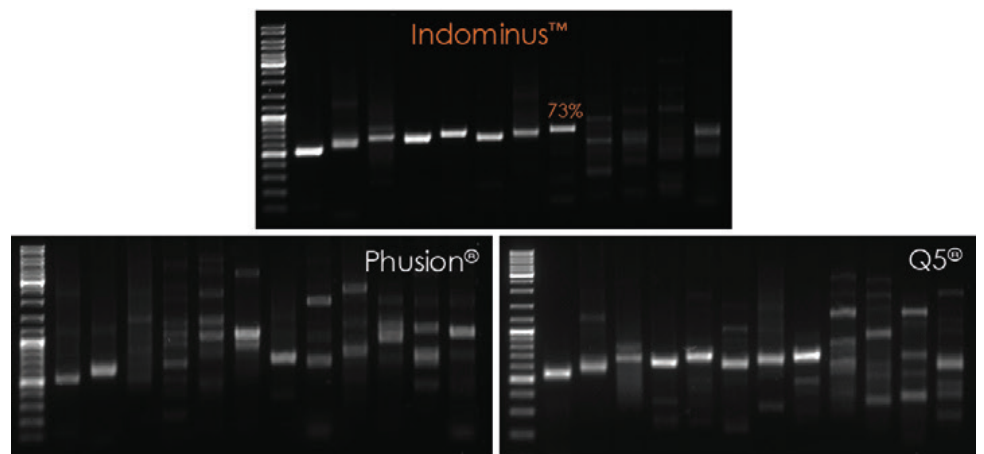
Fidelity



Fidelity of Indominus™ was determined with a sequencing based approach and found to be **>100 X the fidelity of Taq polymerase.** Fidelity data for other suppliers were plotted according to the manufacturer's data.

GC-Rich PCR

Indominus™ was tested for GC-rich PCR performance with a set of 12 primers for hgDNA. Sequences were selected for a length of 500 to 850 bp and a GC-content of 45% to 80%. PCR was run for 40 cycles with 20 ng hgDNA / rxn as template and 2 U enzyme / 25 µl rxn. For evaluation, Phusion® (ThermoFisher) and Q5® (NEB) were tested in the same assay with their respective GC-buffer or enhancer and identical conditions.



VitaScript™ 1Step RT-PCR Kit

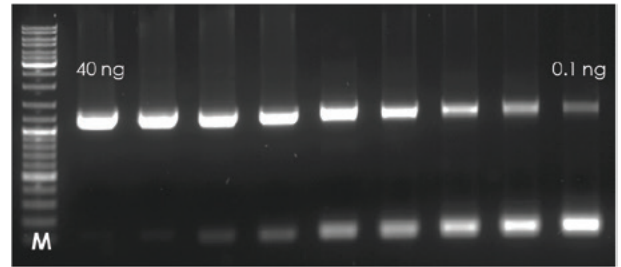
VitaScript™ 1Step RT-PCR Kit is a combined solution for reverse transcription and subsequent endpoint PCR analysis, both reactions happen in one tube during one experiment.

VitaScript™ 1Step RT-PCR Kit is right for you if

- You analyze long amplicons
- You need high fidelity for downstream applications
- You need the amplicons for further analysis

For total control over the reaction start, VitaScript™ 1Step RT-PCR Kit works with a 2-Phase HotStart feature: polymerase and reverse transcriptase are only activated upon heating of the sample granting superior specificity.

VitaScript™ 1Step RT-PCR Kit produces highly specific transcripts with as little as 0.1ng of total RNA input per reaction.



VitaScript™ 1Step RT-PCR Kit was tested in a dilution series from 40ng RNA to 0.1ng RNA per reaction for detection of a 1.2kb target sequence. The sequence could be amplified specifically in all reactions. Depending on primer and template sequence, detection is possible down to 1fg of total RNA input.

Product	Size	SKU
VitaScript™ 1StepRT-PCR Kit	25 rxn / 50 µl	TRAXSKU1002
	100 rxn / 50 µl	TRAXSKU1003

PATHOGEN DETECTION KITS

Mycoplasma Mix

PhonenixDx® Mycoplasma Mix is a fast, reliable and highly specific qPCR solution for the detection of mycoplasma contamination for example in cell culture. More than 130 different mollicute species can be detected via a specific sequence on the 16s rDNA

Mycoplasma Mix includes

- Primer for the amplification of the 16s rDNA
- A PCR Positive Control and a Target Positive Control
- FAM Probe for the detection of mollicutes
- HEX Probe for the detection of the PCR Positive Control
- DUTP for optional UNG treatment
- TAQ-ANTIBODY and VitaTaq Polymerase

- Optimized Buffer System
- Universal ROX concentration for maximum instrument compatibility



Product	Size	SKU
PhoenixDx® Mycoplasma Mix	1 ml	TRAXSKU1529

REAL-TIME PCR

SYBR & PROBE MIX

2X Magic SYBR & Probe Mix

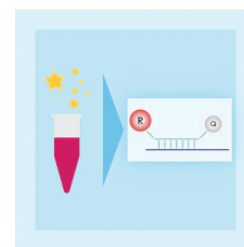
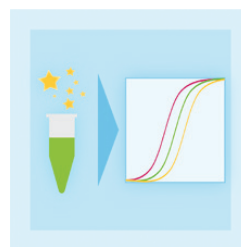
2X Magic SYBR & Probe Mixes are allround-qPCR reagents optimized for a broad range of applications.

They include:

- a HotStart feature for maximum control over the reaction start
- a dUTP/dTTP blend to eliminate amplicon carry-over contamination
- a universal ROX concentration suitable for all common cyclers
- improved performance in the presence of PCR inhibitors

While 2X Magic SYBR Mix is used for dye-based detection, 2X Magic Probe Mix was developed for use with probe-based applications. Here, the amplification signal comes from hydrolyzation of a fluorescence-labeled probe upon amplification of the target sequence.

While dye-based detection is more cost-effective, probe-based assays usually offer a way higher specificity and is more sensitive. The choice is dependent on your application.



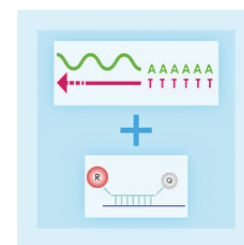
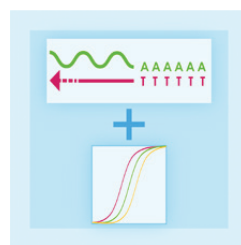
Product	Size	SKU
2X Magic SYBR Mix	2 ml	TRAXSKU1107
	5 ml	TRAXSKU1108
2X Magic Probe Mix	2 ml	TRAXSKU1109
	5 ml	TRAXSKU1110

1Step Magic SYBR & Probe Kit

The 1Step Magic SYBR & Probe Kits were optimized to allow reverse transcription and real-time PCR analysis to take part in one reaction saving time and minimizing handling steps. 1Step Magic SYBR Kit works with dye-based detection while 1Step Magic Probe Kit uses probe-based detection.

Performing 1Step analysis is recommended if

- You are screening a high sample number
- You are only interested in few target sequences
- You want a more accurate representation of copy numbers
- Do not need to stock the cDNA



Product	Size	SKU
1Step Magic SYBR Kit	200 rxn / 20 µl	TRAXSKU1201
	600 rxn / 20 µl	TRAXSKU1202
1Step Magic Probe Kit	200 rxn / 20 µl	TRAXSKU1203
	600 rxn / 20 µl	TRAXSKU1204

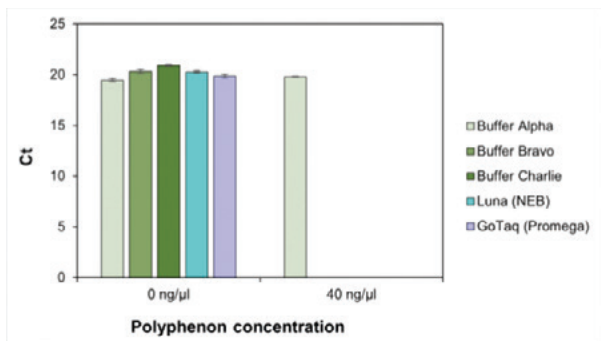
ABC Mastermixes

ABC qPCR Mastermixes contain everything necessary for a successful qPCR or RT-qPCR experiment.

They include:

- 2X qPCR Mixes: dNTPs, MgCl₂ and optimized buffer formulation
- 20X Enzyme Mix: a HotStart feature for maximum control over the reaction start and VitaTaq DNA Polymerase
- 20X RT Enzyme Mix: additionally VitaScript® Reverse Transcriptase, RNase Inhibitor
- A universal ROX concentration suitable for all common cyclers
- improved performance in the presence of PCR inhibitors

ABC Mastermixes are designed for probe-based qPCR and therefore dye-free. While dye-based detection is more cost-effective, probe-based assays usually offer a way higher specificity and is more sensitive. The ABC Mastermixes contains three different buffers for different sample types. The choice is dependent on your application.



ABC Buffer were tested with 0 ng/μl and 40 ng/μl Polyphenon to demonstrate the robustness of Buffer Alpha. For evaluation, NEB and Promega were tested in the same assay.

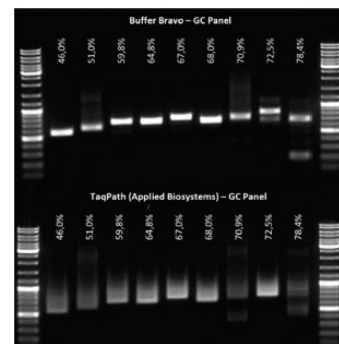
- **Buffer Alpha Robust**
- **Buffer Bravo Performance**
- **Buffer Charlie Allrounder**



Mastermix Alpha is highly resistant to a broad field of PCR inhibitors such as heparin (blood samples), serum or humic acid (soil/ plant samples). This makes it a flexible solution compatible with many different sample types and can be used for many qPCR-based applications such as gene expression studies, pathogen detection and many more.

Mastermix Bravo is optimized for fast amplifications and multiplex applications making it the best option when high throughput and performance is required and remains stable over different GC contents.

Mastermix Charlie is the “all around” which can be used for any PCR related application amplifying short and longer sequences reliably.



Buffer Bravo was tested for GC-rich PCR performance with a set of 9 primers for hgDNA. Sequences were selected for a length of 500 to 850 bp and a GC-content of 46% to 80%. PCR was run for 40 cycles with 20 ng hgDNA / rxn as template and 2 U enzyme / 25 μl rxn. For evaluation, TaqPath was tested in the same assay with their respective GC-buffer or enhancer und identical conditions.

Product	Size	SKU
PhoenixDx® qPCR Mastermix Alpha	5 ml 2X Mastermix	TRAXSKU12012
PhoenixDx® qPCR Mastermix Bravo	5 ml 2X Mastermix	TRAXSKU12013
PhoenixDx® qPCR Mastermix Charlie	5 ml 2X Mastermix	TRAXSKU12014
PhoenixDx® RT-qPCR Mastermix Alpha	5 ml 2X Mastermix	TRAXSKU12015
PhoenixDx® RT-qPCR Mastermix Bravo	5 ml 2X Mastermix	TRAXSKU12016
PhoenixDx® RT-qPCR Mastermix Charlie	5 ml 2X Mastermix	TRAXSKU12017
PhoenixDx® ABC qPCR Mastermix	1.25 ml 2X Mastermix each	TRAXSKU12011

REVERSE TRANSCRIPTION

VitaScript™ FirstStrand cDNA Synthesis Kit

VitaScript™ FirstStrand cDNA Synthesis Kit is a set of reagents for transcription of RNA template into cDNA. This step is often found in gene expression analysis where whole RNA pools are transcribed and then subsequently analyzed in quantitative PCR.

Performing reverse transcription in a separate step is recommended if

- You want high flexibility in your reaction setup
- You want to analyze rare targets: the use of random primers increases template coverage
- You want high sensitivity: longer reverse transcription protocols for a more complete coverage of the RNA pool
- You want to store the cDNA library for further studies



Product	Size	SKU
VitaScript™ FirstStrand cDNA Synthesis Kit	50 rxn	TRAXSKU1301



DNA/RNA ISOLATION

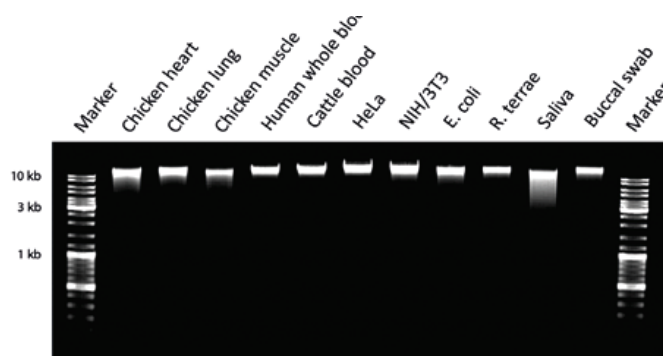
Nuclefy Spin Column-Based Isolation

Spin Column-Based Nucleic Acid Extraction

The Nuclefy Genomic DNA Purification Kit is designed for rapid and reliable sample lysis, RNA removal and purification of intact genomic DNA from a variety of biological sample types.

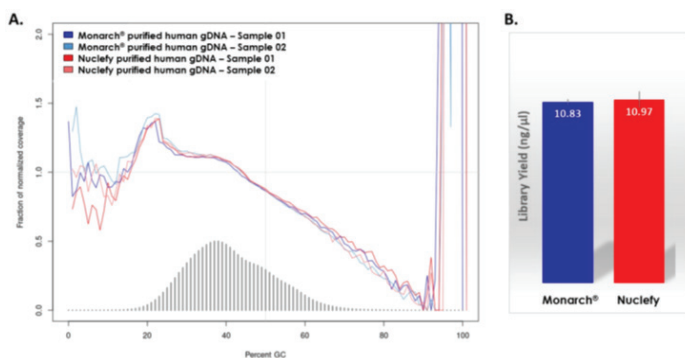
The protocol utilizes specially formulated buffer systems allowing to process blood, tissues, and cultured cells. Supplemental protocols allow to process clinically relevant samples such as saliva and buccal swabs, as well as bacteria, yeast and insects. In addition, it can also be used for classic gDNA clean up.

Purified gDNA has high quality metrics, including $A_{260}/_{280} > 1.8$ and $A_{260}/_{230} > 2.0$, high DNA DIN scores and minimal residual RNA. The purified gDNA is suitable for numerous downstream applications such as qPCR, end-point PCR, SNP analysis, genotyping, microarray analysis and library preparation for NGS sequencing.



Genomic DNA samples were analyzed regarding DNA integrity by loading 50 ng on a 1 % agarose gel. Genomic DNA purification was performed following the appropriate purification protocols. Three representative DNA obtained from tissue (chicken heart, lung and muscle), human whole blood, cattle blood, HeLa and NIH/3T3 cells, E.coli, R. terrae, saliva as well as buccal swab are shown.

Product	Size	SKU
Nuclefy Genomic DNA Purification Kit	150 Isolations	TRAXSKU16074



NGS Library Preparation

Genomic DNA was isolated from whole human blood with Nuclefy Genomic DNA Purification Kit and Monarch® Genomic DNA Purification Kit (NEB #T3010). Duplicate libraries were prepared from 200 ng human genomic DNA using the NEBNext Ultra II FS DNA Library Prep Kit for Illumina (NEB #E7805). Libraries were sequenced on an Illumina MiSeq®. Reads were mapped using BWA and GC coverage was calculated using Picard's CollectGCBiasMetrics (v2.26.2). Library yields of the samples were assessed on a Caliper Labchip GX II using a High Sensitivity DNA Kit.

Magnetic Bead-Based Purification Kits

The reagents are either provided in pre-filled plates or in bulk. Use them for manual extraction or load for automated extraction systems. Or reagents are pre-aliquoted in appropriate plastic consumables allowing for automated extraction systems. Reduce pipetting steps and make extractions more consistent. Simply peel off cover foil, add your sample, and load into the extraction device. Further information about Kit Size and extraction devices are listed on the Website www.traxlabsystems.com.

SphaeraMag® DNA/RNA Isolation Kit

The SphaeraMag® DNA/RNA Isolation Kit is designed for rapid and reliable isolation of total nucleic acids from saliva, nasopharyngeal swabs, nasopharyngeal aspirates, bronchoalveolar lavage samples in Universal Transport Medium (UTM) / Viral Transport Medium (VTM) and swab samples.



SphaeraMag® Genomic DNA Saliva Purification Kit

The SphaeraMag® Genomic DNA Saliva Purification Kit is designed for rapid and reliable isolation of genomic DNA from saliva samples.



SphaeraMag® Genomic DNA Blood Purification Kit

The SphaeraMag® Genomic DNA Blood Purification Kit is designed for rapid and reliable isolation of genomic DNA from blood samples (compatible with anticoagulants EDTA, Heparin, Citrate).



Product	Size	SKU
SphaeraMag® DNA/RNA Isolation Kit - Universal	96 / 2 x 96 / 10 x 96 preps	TRAXSKU160-07/20/42
SphaeraMag® DNA/RNA Isolation Kit - pre-filled 32	80 preps for Phoenix-Pure-32 & Auto-Pure-32	TRAXSKU16004
SphaeraMag® DNA/RNA Isolation Kit - pre-filled 96	96 preps for Phoenix-Pure-96 & Auto-Pure-96	TRAXSKU16006
SphaeraMag® DNA/RNA Isolation Kit pre-filled Mini	80 preps for Auto-Pure-Mini	TRAXSKU16072
SphaeraMag® Saliva DNA Purification Kit - Universal	96 preps	TRAXSKU16081
SphaeraMag® Saliva DNA Purification Kit - pre-filled	80 preps for Phoenix-Pure-32 & Auto-Pure-32	TRAXSKU16082
SphaeraMag® Saliva DNA Purification Kit- pre-filled	96 preps for Phoenix-Pure-96 & Auto-Pure-96	TRAXSKU16083
SphaeraMag® Saliva DNA Purification Kit-filled Mini	80 preps for Auto-Pure-Mini	TRAXSKU16084
SphaeraMag® Blood DNA Purification Kit - Universal	Universal 96 preps	TRAXSKU16067
SphaeraMag® Blood DNA Purification Kit- pre-filled 32	80 preps for Phoenix-Pure-32 & Auto-Pure-32	TRAXSKU16068
SphaeraMag® Blood DNA Purification Kit- pre-filled 96	96 preps for Phoenix-Pure-96 & Auto-Pure-96	TRAXSKU16069
SphaeraMag® Blood DNA Purification Kit - pre-filled Mini	80 preps for Auto-Pure-Mini	TRAXSKU16070

REACTION PLATES & CONSUMABLES

PCR PLATES

Aegis 96-Well PCR Plates

Aegis 96-well PCR plates are suitable for endpoint and qPCR. The clear polycarbonate shell and semiskirted style provide sturdiness for handling with automated systems, the cut corner at A12 allows for at-a-glance identification of the correct plate orientation. Easy-to-read black row/column labeling adds to the convenient handling.

Features

- DNA/RNA/RNase free
- Max. volume 200 µl allows preparative applications
- Ideal choice for use with automated/robotic systems
- Wells: polypropylene, shell: polycarbonate
- Available in clear and white
- AegisWhite: white wells for improved fluorescence sensitivity



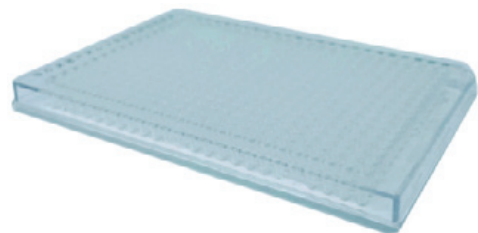
Product	Size	SKU
Aegis 96-well PCR Plates	10 pcs./box	TRAXSKU30001
AegisWhite 96-well PCR Plates	10 pcs./box	TRAXSKU30007

Aegis 384-Well PCR Plates

Aegis 384-well PCR plates upgrade the Aegis 96-well PCR plates to 384-well format. The two-component manufacturing minimizes distortion of the plates and makes them the ideal choice for robotic systems

Features

- DNA/RNA/RNase free
- Skirted for sturdiness & robotic handling
- Corner cut at well A12 for easy orientation
- Working volume max. 30 µl, capacity 55µl
- Ideal choice for use with automated/robotic systems
- Wells: polypropylene, shell: polycarbonate



Product	Size	SKU
Aegis 384-well PCR Plates	10 pcs./box	TRAXSKU30009

Aegis Fast 96-Well PCR Plates

Aegis Fast 96-well PCR plates are designed to withstand the strain of fast PCR programs with their fast temperature changes, high ramp speed and short hold time. The lower height of the plates reduces evaporation and improves thermal conductivity.

- DNA/RNA/RNase free
- Low profile
- Easy-to-read, black well identification
- Corner cut at well A12 for easy orientation
- Max. volume 100 μ l allows fast PCR programs
- Polypropylene



Product	Size	SKU
Aegis Fast 96-well PCR Plates	10 pcs./box	TRAXSKU30010

ISOLATION

Tip Combs-96

Single use consumables for use with automatic nucleic acid isolation systems such as

- Allsheng AutoPure-96
- Phoenix AutoPure-96
- ThermoFisher KingFisher

Tip combs protect the magnetic rods of the device and prevent cross-contamination between isolation runs.



Product	Size	SKU
Tip Combs-96	60 pcs./box	TRAXSKU30014

Aegis 96-Deepwell Plates

Aegis 96-Deepwell Plates are ideal for sample collection, storage, combinatorial chemistry and library applications and can also be used for in nucleic acid isolation.

- Alpha-numeric grid for quick sample identification
- Skirted for sturdiness & robotic handling
- corner cut at well A1 for easy orientation
- V-bottom design for optimal sample recovery
- Max. capacity 2.2 ml
- Polypropylene

Aegis 96-Deepwell Plates can be used for automated nucleic extraction with

- Allsheng AutoPure-96
- Phoenix AutoPure-96
- ThermoFisher KingFisher



Product	Size	SKU
Aegis Fast 96-Deepwell plates	50 pcs./box	TRAXSKU30002

SEALS

Aegis Optical qPCR Films for sealing real time PCR plates and storage plate sealing.

- Adhesive
- High Clarity
- DNase/RNase Free

Product	Size	SKU
Aegis Optical qPCR Films	100 pcs./box	TRAXSKU30012



CUSTOM SOLUTIONS & SUPPORT

Still not sure which reagent is right for you?

Feel free to contact our team of experts. All of our new customers receive a complimentary tech call with our highly skilled team!

E-mail us at techsupport@traxconnects.com to schedule your free consultation!



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LAB SYSTEMS

CONTACT & ORDERING

Would you like to place an order?

- Visit us at www.traxlabsystems.com
- E-mail us at sales@traxconnects.com

Should you require assistance, have questions or would like to leave product feedback, let us know via techsupport@traxconnects.com.



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