

MiniFormat

Genomic DNA Extraction Kit (Blood/Bacteria/Cultured Cells)

Genomic DNA Extraction Kits (Blood/Bacteria/Cultured Cells) provides a fast and economical method for purification of total DNA (including genomic, mitochondrial and viral DNA) from whole blood, plasma, serum, buffy coat, other body fluids, lymphocytes and cultured cells. This kit is also ideal for bacteria and cultured cells. The blood protocol utilises RBC lysis buffer, GB buffer and a rapid heating step to release DNA into solution. DNA in the chaotropic salt solution binds to the glass fiber matrix of column. After washing off the contaminants, the purified DNA is eluted by low salt elution buffer or water. There is no requirement for phenol/chloroform extraction or alcohol precipitation. Purified DNA of approximately 20-30 kb is suitable for PCR or other enzymatic reactions.

Applications

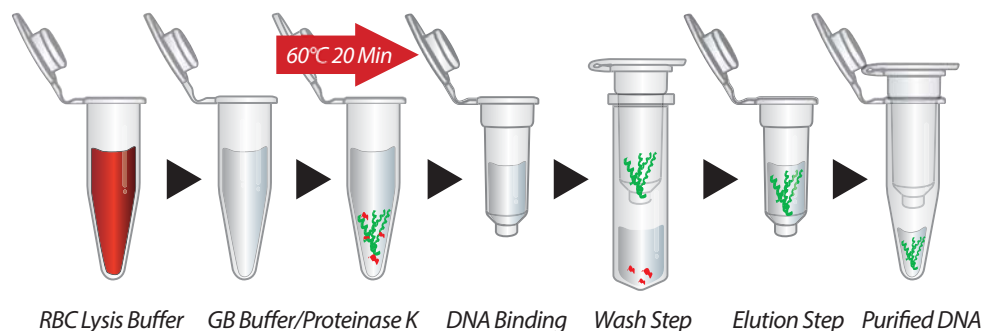
PCR, Southern blotting, RAPD/ AFLP

Product Intended Use (Research/Clinical Application)

The Genomic DNA Blood Extraction Kit is a general purpose device. RBC Bioscience have not validated in clinical application for any particular system or organism and therefore offer no specific claims for uses in prognostics, diagnostics, blood banking etc. This device may be used in clinical diagnostics laboratory systems for molecular assays after the laboratory has validated their complete system as required by CLIA '88 regulations in the U.S. or local equivalents in other countries. All due care and attention should be exercised in handling this product.

Protocol

Genomic DNA Mini Kits	
Sample (Protocols Included):	300 µl Whole Blood (up to 1 ml), 10 ⁷ Cultured Cells, 10 ⁹ Bacteria (Gram +/-), 10 ⁷
Yeast Average Yields:	200µl Whole Blood - 6µg, 200µl Buffy - 50µg, 5 x 10 ⁶ Lymph. / Cult. Cells - 50µg
Genomic DNA Maxi Kits	
Sample (Protocols Included):	Fresh/ Frozen Blood
Yeast Average Yields:	Fresh Blood : 140µg. Frozen Blood : 75µg



Storage and Stability

This kit should be stored at room temperature.

Reference

Vogelstein, B., and Gillespie, D. (1979) Proc. Natl. Acad. Sci. USA 76, 615.

Additional Requirements:

1.5 ml microcentrifuge tube, Ethanol (96-100%), RNase A (10 mg/ml)

Cat.No. YGB50

50 mini preps/kit

Cat.No. YGB100

100 mini preps/kit

Cat.No. YGB300

300 mini preps/kit

Performance

Comparison:

Genomic DNA Mini Kit (Blood/Cultured Cells) vs Brand Q
Genomic DNA Extraction Kit

Sample:

2×10^9 gram negative bacteria



RBC Bioscience Labs

Lane 2-3 Brand Q DNA Mini Kit

Lane 4-5 RBC Real Genomics



Quality Nucleic Acid Purification Systems

RBC Real Genomics DNA/RNA Purification



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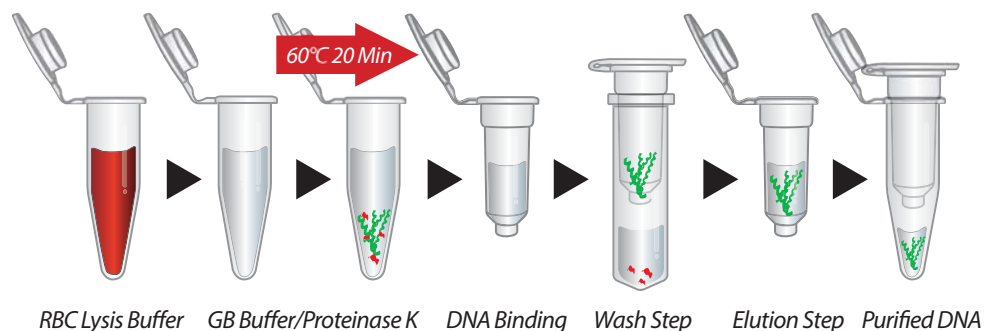
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Cat.No. YGB50

50 mini preps/kit
RBC lysis buffer: 100ml
GT Buffer: 15ml
GB Buffer: 15ml
W1 Buffer: 25ml
Wash Buffer (Concentrated): 25ml
Elution Buffer: 30ml
Proteinase K: 11mg
2 ml Collection: 50pcs
GD Column: 50pcs

Cat.No. YGB100

100 mini preps/kit
RBC lysis buffer: 200ml
GT Buffer: 30ml
GB Buffer: 30ml
W1 Buffer: 50ml
Wash Buffer (Concentrated): 25ml
Elution Buffer: 30ml
Proteinase K: 11mg x 2 Tube
2 ml Collection: 100pcs
GD Column: 100pcs

Cat.No. YGB300

300 mini preps/kit
RBC lysis buffer: 500ml
GT buffer: 100ml
GB buffer: 100ml
W1 buffer: 130ml
Wash buffer (concentrated): 40ml
Elution buffer: 60ml
PK: 11mg x 6 tubes
GD column: 300pcs
2 ml Collection tube: 300pcs

Performance

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Genomic DNA Extraction Kit

Sample:

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RBC Bioscience Labs

Lane 2-3 Brand Q DNA Mini Kit

Lane 4-5 RBC Real Genomics



Quality Nucleic Acid Purification Systems

RBC Real Genomics DNA/RNA Purification



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