

Milk DNA Preservation and Isolation Kit

Norgen's Milk DNA Preservation and Isolation Kit is an all-in-one solution designed for 1) preservation of DNA in milk samples at ambient temperature; and 2) isolation of high quality DNA within a laboratory setting. The kit is provided with a Preservation Solution that allows for either immediate processing of milk samples, or allows for the storage of the milk samples for up to 1 month at room temperature prior to DNA isolation. Genomic DNA extracted from somatic cells and bacteria found in milk can be used in various applications. The isolated DNA can be used for the detection of biomarkers to diagnose a disease, follow the

diseases progress or monitor the effects of a particular treatment. Milk DNA can also be used to diagnose particular types of infections. Milk DNA purified using Norgen's kit is of the highest quality, and is compatible with a number of downstream applications including PCR, Southern Blot analysis, sequencing and microarray analysis.



Kit Specifications			
Maximum Milk Input	0.5 mL	Time to Complete 10 Purifications	80 minutes (20 minutes hands on)

Milk DNA Preservation and Isolation Kit

No need to immediately process samples	The Milk DNA Preservation Reagent eliminates the need to immediately process or freeze samples.
Convenient, all-in-one kit	Milk preservation and DNA isolation all with one convenient, affordable kit.
Fast and easy processing	Isolate DNA rapidly using a convenient spin column format.
DNA is stable for up to 1 month at room temperature	Intact, biologically active DNA has been isolated from samples stored in the Milk DNA Preservation Reagent for up to 1 month at room temperature.
High quality DNA	Purified DNA is of the highest quality and free from inhibitors, and can be used in sensitive downstream applications including PCR, qPCR, sequencing, SNP analysis, microarrays, and Southern Blot Analysis

Milk DNA Preservation and Isolation Kit

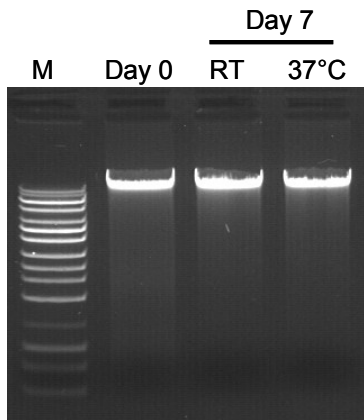


Figure 1. Stability of DNA after One Week Storage at Room Temperature. Milk samples (250 µL) were spiked with 0.5 million HeLa cells and preserved in the Milk DNA Preservation Solution. Samples were incubated at room temperature and 37°C for one week. The DNA was then isolated using Norgen's Milk DNA Preservation and Isolation Kit. Ten microlitres from the isolated 100 µL DNA was loaded on 1% agarose gel. Samples showed good integrity after the incubation period at both room temperature (RT) and 37°C. M is Norgen's UltraRanger DNA Ladder.

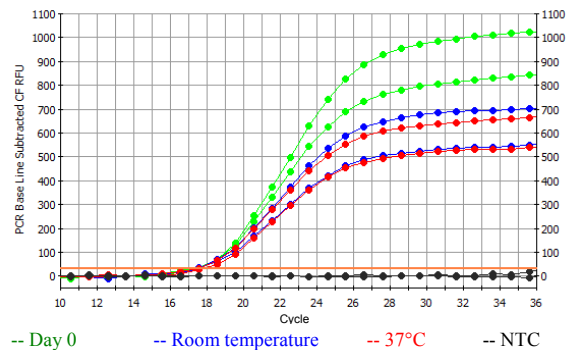


Figure 2. Amplification of GAPDH Gene from Preserved Milk Samples. Milk samples (250 µL) were spiked with 0.5 million HeLa cells and preserved in the Milk DNA Preservation Solution. Samples were incubated at room temperature and 37°C for one week. The DNA was then isolated using Norgen's Milk DNA Preservation and Isolation Kit. Two microliters from 100 µL isolated DNA were used in a 20 µL qPCR reaction using Norgen's SYBR Green/Fluorescein qPCR Master Mix with specific primers for GAPDH gene. As it can be seen, all the DNA templates were successfully amplified without any loss to the quality of the template.

Milk DNA Preservation and Isolation Kit Contents

1. Preservation Solution E
2. Proteinase K
3. Purification Additive
4. Buffer SK
5. Wash Solution A
6. Elution Buffer B
7. Mini Spin Columns
8. Collection Tubes
9. Elution tubes (1.7 mL)
10. Product Insert

Customer-Supplied Reagents and Equipment

- Microcentrifuge tubes
- Benchtop microcentrifuge
- Micropipettors
- 55°C incubator
- 37°C incubator (for Gram positive strains only)
- Lysostaphin (Optional for Gram positive strains only)
- 96 – 100% ethanol
- Cotton swab

Cat #	Description	Quantity
44800	Milk DNA Preservation and Isolation Kit	25 preps