NAUTIAGENE

Product Information

NautiaZ Cell-Free DNA Extraction Mini Kit

(100 prep)

Cat. No. : NGCF-S100

Sample : 400 µl Serum or Plasma
400 µl Urine

Yield : Up to 30 µg

NGCZ-S100	NautiaZ Culture Cell DNA Extraction Mini Kit (100 prep)
NGCZ-S300	NautiaZ Culture Cell DNA Extraction Mini Kit (300 prep)
NGBZ-S100	NautiaZ Blood DNA Extraction Mini Kit (100 prep)
NGBZ-S300	NautiaZ Blood DNA Extraction Mini Kit (300 prep)
NGBAZ-S100	NautiaZ Bacteria/Fungi DNA Extraction Mini Kit (100 prep)
NGBAZ-S300	NautiaZ Bacteria/Fungi DNA Extraction Mini Kit (300 prep)
NGPZ-S100	NautiaZ Plant DNA Extraction Mini Kit (100 prep)
NGPZ-S300	NautiaZ Plant DNA Extraction Mini Kit (300 prep)
NGTZ-S100	NautiaZ Tissue DNA Extraction Mini Kit (100 prep)
NGTZ-S300	NautiaZ Tissue DNA Extraction Mini Kit (300 prep)
NGST-S100	NautiaZ Stool DNA Extraction Mini Kit (100 prep)
NGST-S300	NautiaZ Stool DNA Extraction Mini Kit (300 prep)
NGSO-S100	NautiaZ Soil DNA Extraction Mini Kit (100 prep)
NGSO-S300	NautiaZ Soil DNA Extraction Mini Kit (300 prep)
NGCF-S100	NautiaZ Cell-Free DNA Extraction Mini Kit (100 prep)
NGPK-S100	NautiaZ Whole Blood DNA Extraction Mini Kit (100 prep)

Contents

	NGCF-S100T	NGCF-S100
CF Buffer	2 ml	50 ml
W1 Buffer	2 ml	45 ml
W2 Buffer*	0.3 ml x2	15 ml
Elution Buffer	1 ml	10 ml
GZ Column	4 pcs	100 pcs
Collection Tube	4 pcs	100 pcs
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* Add 1.2 ml x2 / 60 ml ethanol (96-100%) to W2 Buffer prior to the initial use.

Buffer Preparation

- Add ethanol (96-100%) to the Wash Solution prior to first use

	NGCF-S100T	NGCF-S100
W2 Buffer ethanol (96 ~ 100%)	300 ul x2 1.2 ml x2	15 ml 60 ml

Important Notes

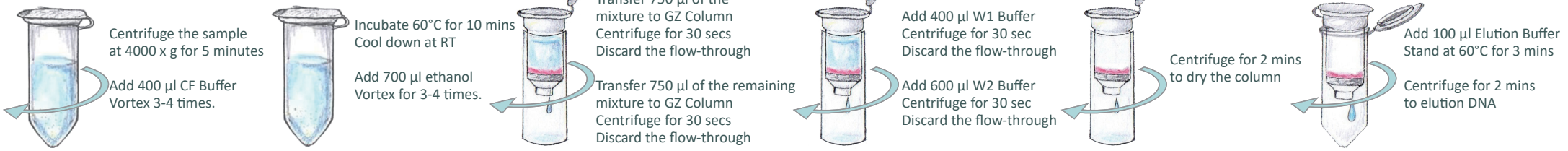
1. Buffers provided in this system contain irritants. Wear gloves and lab coat when handling these buffers.
2. Add ethanol (96- 100 %) to W2 Buffer when first open.
3. Prepare dry baths or water baths before the operation.
4. Resolve any precipitate by warming at 37°C.

Description

The NautiaZ Cell-Free DNA Extraction Mini Kit provide outer cell DNA purification from serum and Urine. Made difficult extraction to low content. The steps were simple, time-saving, and easy for subsequent experiments. The best solution is for customers who have not been able to effectively separate and remove, or the amount of extraction is unstable or too less. Using silica-based membrance spin column with special coating brings you an extremely comfort process. The final product can be used in PCR or other downstream experiments.

Storage

Store at room temperature.



PURIFICATION PROTOCOLS

STEP	PROCEDURE
1 Sample prepare	Centrifuge the urine or Serum or Plasma sample at 4000 x g for 5 minutes Transfer up to 400 µl of supernatent to a microcentrifuge-tube *(not provided).* **Add 400 µl CF Buffer** to the tube and mix by vortexing 3-4 times.
	Incubate the mixture at 60°C for 10 minutes. Pre-heat the Elution Buffer at 60°C.
	Incubate the mixture at room temperature for 3-5 minutes to cool it to room temperature.
	Add 700 µl of ethanol (96-100%) to the sample and mix by pulse-vortexing for 3-4 times.
2 DNA Binding	Place a **GZ Column** to a collection tube. Transfer **750 µl of the mixture** to **GZ Column**. Centrifuge at 14,000 x g for 30 seconds. Discard the flow-through and place **GZ Column** back in the Collection tube.
	Transfer **750 µl of the remaining mixture** to **GZ Column**. Centrifuge at 14,000 x g for 30 seconds. Discard the flow-through and place **GZ Column** back in the Collection tube.
3-1 Wash	**Add 400 µl W1 Buffer** to **GZ Column**. Centrifuge at 14,000 x g for 30 seconds. Discard the flow-through and place **GZ Column** back in the Collection tube.
3-2 Wash	**Add 600 µl W2 Buffer** (ethanol added) to **GZ Column**. Centrifuge at 14,000 x g for 30 seconds. Discard the flow-through and place **GZ Column** back in the Collection tube.
4 Dry	Centrifuge at 14,000 x g for 2 minutes to dry the column.
5 Elution	Place **GZ Column** to a clean 1.5 ml microcentrifuge tube (not provided). **Add 100 µl of pre-heated Elution Buffer** (60°C) into the center of the column matrix.
	Stand at 60°C for 3 minutes. Centrifuge at 14,000 x g for 2 minutes to elute purified DNA.
6 Pure DNA	Store the DNA fragment at 4 °C or -20 °C.