



DNA extraction (BOMB) V.2

Tsu-Chun Hung¹, Yin-Tse Huang¹

¹KMU

Version 2 ▼

Jul 18, 2022

1 Works for me

Share

This protocol is published without a DOI.



Yin-Tse Huang

ABSTRACT

DNA extraction (BOMB)

PROTOCOL CITATION

Tsu-Chun Hung, Yin-Tse Huang 2022. DNA extraction (BOMB). **protocols.io**

<https://protocols.io/view/dna-extraction-bomb-cdk7s4zn>

Version created by Yin-Tse Huang



LICENSE

————— This is an open access protocol distributed under the terms of the [Creative Commons Attribution License](https://creativecommons.org/licenses/by/4.0/), which permits unrestricted use, distribution, and reproduction in any medium, provided the original author and source are credited

CREATED

Jul 18, 2022

LAST MODIFIED

Jul 18, 2022

PROTOCOL INTEGER ID

66943

Sample Collection

3m

1 Add  **200 µL** of **1mm beads** to 2ml enppendorf tube

30s

2 Add  **200 µL** of **0.5mm beads** to 2ml enppendorf tube

30s

- 3 Add  **225 µL** of **TE buffer** to 2ml enppendorf tube 30s

TE buffer is in 4°C fridge

- 4 Add  **375 µL** of **lysis buffer** to 2ml enppendorf tube 30s

Lysis buffer is in 4°C fridge

- 5 Add  **267 µL** of **10M ammonium acetate** to 2ml enppendorf tube

10M ammonium acetate is in 4°C fridge

- 6 Collect  **10-20 mg** of **sample** to 2ml enppendorf tube 1m


Sample crush 4m

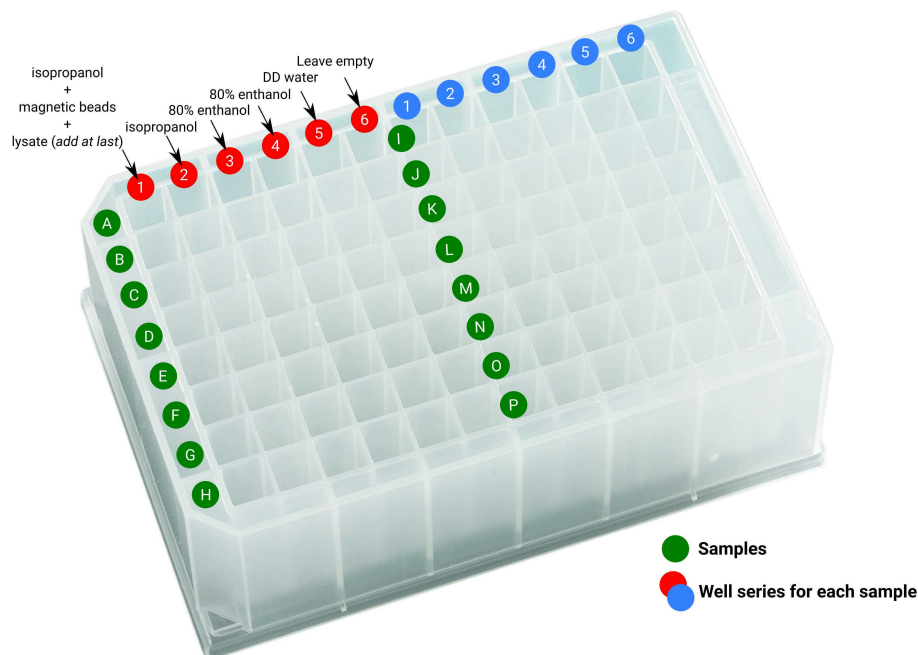
- 7 Put 2ml enppendorf tube in mixmill for sample crush, at this condition: 30 rpm/s, for 4mins 4m
🕒 **00:04:00**


Centrifugation 3m

- 8 Put 2ml enppendorf tube in centrifuge for centrifugation, at this condition: 3m
🌀 **17.0 x g, 25°C, 00:03:00**


DNA purification 37m 30s

- 9 Add  **350 µL** of **isopropanol** to the 1st well of 96 well plate 30s



- 9.1 Add  **125 μ L** of **magnetic beads** (10 mg/ml) to the 1st well of 96 deep well plate 30s





Shake the bottle and pipetting before using magnetic beads

- 9.2 Add  **200-300 μ L** of the **sample (lysate)** from the 2ml centrifuged tube to the 1st well of 96 deep well plate 30s

Pipetting **as much lysate as you can**, as long as it's free of any cell debris (no solids in your tip)

USUALLY ADD at LAST

- 10 Add  **400 μ L** of **isopropanol** to the 2nd well of 96 deep well plate 30s

- 11 Add  **300 μ L** of **80% ethanol** to the 3rd well of 96 deep well plate 30s
- 12 Add  **300 μ L** of **80% ethanol** to the 4th well of 96 deep well plate 30s
- 13 Add  **100 μ L** of **DD water** to the 5th well of 96 deep well plate 30s
- 14 Put the prepared 96 deep well plate in the automated DNA extraction machine 34m
- 15 After the extraction is done, collect  **50 μ L** of the **eluted sample** as the DNA template for downstream experiments