

# Flash-Extract<sup>™</sup> Lysis Solution

Catalog No.	Pack Size	Component
AZ-3410	100 reactions	Flash-Extract Lysis Solution
AZ-3440	400 reactions	Flash-Extract Lysis Solution

Flash-Extract<sup>™</sup> Lysis Solution provides for an ultra-fast, low-cost and highly efficient method of DNA extraction from a variety of solid tissues, including mouse tails and ear punches, plant leaves, bacteria and saliva. Flash-Extract<sup>™</sup> Lysis Solution is a proprietary single-tube extraction solution which releases genomic DNA in only 8 minutes, ready for end-point PCR, real-time PCR with SYBR Green or TaqMan Probe based chemistry, or storage at - 20° C for subsequent use.

#### Storage

Flash-Extract<sup>™</sup> Lysis Solution is shipped on blue ice and should be stored at −20° C upon receipt.

### Table 1. Recommended Starting Material for Efficient Extraction using Flash-Extract<sup>™</sup>

Sample Type	For 100 µl Lysis Solution	For 500 µl Lysis Solution
Tissue*	0.5 - 10 mg	10 – 50 mg
Plant**	2.0 - 10 mg	10 – 50 mg
Saliva	10 – 20 μl	50 – 100 μl
E. coli	1 colony (0.5 – 2 mm)	1 colony (2 – 5 mm)

\* Includes mouse tail snips, mouse ear punches, mouse organs, and chicken breast

**\*\*Includes ivy and stinging nettle** 

## **DNA Extraction Protocol**

- 1. The DNA extraction process can be carried out in 0.2 mL PCR Tubes or 0.5 mL/1.5 mL microcentrifuge tubes in a thermal cycler or heating block.
- 2. Thaw Flash-Extract<sup>TM</sup> Lysis Solution. Please note that Flash-Extract<sup>TM</sup> Lysis Solution has a cloudy appearance.
- 3. Add your sample to a tube containing 100 µl Flash-Extract<sup>™</sup> Lysis Solution. See Table 1 for guidance.
- 4. Vortex the tube containing the sample and the lysis solution for 15 seconds.
- 5. Transfer the tube to a heat block or a thermal cycler and prepare a DNA extract of PCR-ready DNA as follows:

Cycles	Temperature & Time	Notes
1	65° C, 6 minutes	Lysis Step
1	98° C, 2 minutes	Deactivates protease
1	4° C	Alternatively, cool on ice

6. The DNA extract\* is now ready for PCR or real-time PCR. DNA extracts are stable at -20 °C for 1 week or long term at -80 °C.

\* Optimal PCR reaction conditions such as amount of DNA Extract may vary and should be determined empirically. If the PCR yields are low or in the case of PCR failure, dilute the DNA extract 1:10 in PCR-grade water. DNA extracts from plant leaves should be diluted 1:10 or 1:100. In the case of DNA smearing or non-specific amplification, increase the annealing temperature or decrease the primer concentration.

### **Technical Support**

For Trouble-shooting and Technical Guidance, please contact us at tech@azuragenomics.com. This product is intended for research-use only.