

## Spin Doctor Buccal Swab DNA Isolation Kit PROTOCOL

**Description:** The Spin Doctor Buccal Swab DNA Isolation Kit provides for rapid and consistent isolation of genomic DNA.

## SPIN DOCTOR BUCCAL SWAB DNA ISOLATION KIT PROTOCOL

### Important

Thoroughly rinse the subject's mouth twice with water. We also recommend that subjects abstain from drinking coffee before tissue collection.

DNA contained in the buccal swab can be extracted immediately, or stored up to 1 month by allowing the brush to air dry for 10-15 minutes at room temp and stored at 22-37 °C. For longer term storage keep at -20 °C.

**This kit is for research use only; it is not for diagnostic use.**

### Protocol

1. Collect tissue by rubbing the buccal swab brush firmly on the inside of the cheek, approximately 20 times on each side of the brush. Be sure to move the brush over the entire cheek.
2. Place the swab into a Genomic Isolation Tube and snap off the handle at the break point. The swab should now fit entirely inside the tube allowing the cap to close.
3. Resuspend the Genomic Isolation Tube using 500 uL of Genomic Re-suspension Buffer.
  - A. Mix by vortexing briefly.
  - B. **OPTIONAL:** at this point you can add RNase A (not included), use 2uL of a 20mg/mL solution.
4. Incubate at 57° C for 15 minutes.
5. Remove the swab using a pair of tweezers.
  - A. Clean the tweezers using Ethanol before use.
6. Add 800 uL of Wash Buffer and mix by inverting 30 times.
7. Add 600 uL of Isopropanol and mix by inverting 30 times.
8. Spin at 14,000 g for 5 minutes.
  - A. Decant supernatant by pouring it off and then pipetting off remains.
  - B. Allow samples to air dry for at least 30 seconds.
9. Resuspend in 200 uL of DNA Resuspension Buffer.
  - A. Vortex to resuspend DNA.
  - B. **Optional:** to increase yields incubate at 57° C for 5 minutes.
10. **OPTIONAL:** Spin at 14,000-16,000 g for 5 minutes to pellet any solid material which might remain.
  - A. Transfer 150uL of the supernatant into a clean tube - use care not to transfer any solids.



The supernatant contains clean genomic DNA –solids can be discarded