XpressDNA™ Soil Mini Kit Protocol

1. Add 0.3g of soil sample to 2ml screw cap tube.
2. Add 500µl of **solution S1** and vortex for 30s.
3. Add 100µl of **solution S2.**
4. Keep the tubes horizontally on a vortexer.

(Note: Fasten the tubes properly during vortexing and make sure the contents of the tubes are shaken vigorously.)

5. Vortex at maximum speed for 20min.
6. Add 250µl of **solution S3** and by keeping the tube horizontally on a vortexer , vortex for 10min.
7. Centrifuge the tubes at 14000 rpm 5 min.
8. Transfer **650µl of supernatant** to a 1.5ml tube.
9. Add 300µl of **solution S4** and vortex for 5s. Incubate on **ice for 10min**.
10. Centrifuge the tubes for 5 min at 14500rpm.
11. Transfer **750µl of supernatant** to a clean 1.5ml tube.
12. Add **200µl of solution S5** and vortex for 5s. Incubate on **ice for 10min.**
13. Centrifuge the tubes for 5 min at 14500rpm.
14. Transfer **750µl of supernatant** to a clean 1.5ml tube.

BINDING AND WASHING OF DNA

(Before starting vortex the MagNa Mix thoroughly)

15. Add **350µl of MagNa Mix** to the supernatant.
16. Gently mix the contents by inverting the tube for 8-10 times.
17. Incubate at RT for 5 min.
18. Place the tube on MagNa Stand for 5 min.
19. Carefully discard the supernatant without removing the tube from the MagNa Stand. (***Make sure that the pellet is not disturbed***).
20. Add 1ml of **Wash Buffer-1** and remove the tube from MagNa Stand.
21. Resuspend the pellet by pipette mixing for about 10-12 times.(***Ensure complete***

dispersion of the particles).

22. Place the tube back on MagNa Stand. Keep it until the solution becomes clear (***30s-60s***).

23. Carefully discard the supernatant keeping the tube on the MagnaStand (***make sure the pellet is not disturbed***).

24. Add 750 **µl of Wash Buffer-2** and gently invert the tube placed on MagNa Stand for 5-6 times to wash the pellet (***only surface wash***).

25. Discard the supernatant without disturbing the pellet.

26. Repeat the step 24-25.

27. Air dry the pellet with the tube on MagNa Stand at RT for 10-12 min.
(***NOTE: Do not over dry the pellet***)

ELUTING DNA

28. After drying, remove the tube from MagNa Stand.

29. Add **50 µl of elution buffer**.

30. Resuspend the pellet by pipette mixing. (***10-12 times***)

31. Incubate at **56°C for 10 min** with intermittent tapping.

32. Place the tube on MagNa Stand for 5 min or until the solution gets cleared.

33. Carefully transfer the supernatant containing DNA to a sterile microcentrifuge tube, with the tube on MagNa Stand (***Make sure that the pellet is not disturbed***).

34. Discard the MagNa particles.

Note: In the elution step, if the MagNa particles take more than 10minutes for clearing , then spin the tube at 14,000 rpm for 5minutes and collect the supernatant for pure DNA.