GeoTesting Express, Inc. (GTX), provides state-of-the-art cyclic and dynamic soil testing services for many applications.

Our cyclic and dynamic soil testing laboratory is equipped with the best automated equipment in the industry. These devices work around the clock, seven days a week to provide fast turn around of high quality results.

GTX is one of a few commercial labs in the world equipped to perform resonant column, torsional shear, cyclic triaxial, and cyclic simple shear testing.

Cyclic/Dynamic Testing Capabilities

**Post-shaking undrained residual strength can be performed on all of the above**

Cyclic/Dynamic Testing Capabilities

- P-S wave (10^-5 % shear strain) GTX S1085
  - Very small-strain shear modulus
  - Shear wave velocity and proportional wave velocity
  - Can be performed in conjunction with all testing below

- Resonant column (10^-5 % up to 0.1%) ASTM D4015
  - Small-strain shear modulus, damping ratio

- Torsional shear (10^-3 % up to 10%) GTX S1082
  - Shear modulus, damping ratio, cyclic strength
  - Strain or stress controlled

- Cyclic triaxial (10^-3 % up to 10%) ASTM D3999/D5311
  - Large-strain shear modulus, damping ratio
  - Cyclic strength (liquefaction potential)
  - Strain or stress controlled

- Cyclic simple shear (10^-2 % up to 10%) GTX S1062
  - Cyclic strength (liquefaction potential)
  - Strain or stress controlled

For More Information Contact:
jtomei@geotesting.com
800-434-1062
GTX provides full service lab and field testing of soil, rock, and geosynthetics. The modular design of our automated equipment allows us to reconfigure our test stations to meet the day-to-day scheduling demands of the most complicated projects. Our staff has world-wide project experience with advanced cyclic and dynamic testing.

Sample Shipping

We can provide shipping containers and procedures to safely transport sensitive, undisturbed samples from anywhere in the world. We have developed a special container that remains upright for shipping undisturbed thin-walled tube samples that minimizes disturbance in sensitive soils. This container conforms to ASTM D4220 and is reusable, lightweight, and easy to use.

For materials sensitive to vibrations, GTX has developed special techniques to freeze specimens for air transport and then thaw them under controlled stress conditions. We have used these techniques to obtain comparable results to tests performed in Japan on undisturbed samples of loose silty sands. We can also x-ray samples to verify sample integrity and identify best portions for testing.