



Durability Testing

ARC, the Best Kept Secret in Efficiency!

Durability testing helps to ensure the success of your product. Using the **shaker rig** at ARC, a wide variety of parts can be tested, from seats, commercial trailer skirts to frame assemblies. ARC has the **in-house capability** to take digital models or reverse engineer them, create the mounting structure, complete the install, run the test and produce a full report.

Using **accelerated test methods** one hour of shake inputs results in a simulation of 1440 miles. Thus, **one week of testing** is equivalent to **100,000 miles**. At any point during the testing, the rig can be paused and a design check completed, from bolt torque to crack checking. This allows for a rapid improvement cycle.

ARC can apply various vibration profiles:

- **Sinusoidal inputs**; used for checking of resonance problems
- **Actual road data**; actual accelerations collected by data logger on actual truck
- **ASTM D4728 Assure Level I**; white noise random inputs that are shaped to be representative of a real road. This input is the most often used.

