

Vibration diagnostic system for the undercarriage of three-axle wheeled vehicles consists of a first multiplexer connected to two accelerometers, which are used to record the vibration acceleration parameters of the wheeled vehicle's steered axle housing in the vertical plane, a second multiplexer connected to two accelerometers, which are used to record the vibration acceleration parameters of the wheeled vehicle's intermediate axle housing in the vertical plane; a third multiplexer connected to two accelerometers, which are used to record the vibration acceleration parameters of the rear axle housing of a wheeled vehicle in the vertical plane, an analog-to-digital converter connected to the three multiplexers and a computing device, the output of which is connected to a monitor and a printer. One accelerometer is installed on each side of the steered, intermediate, and rear axles of a wheeled vehicle to record the vibration acceleration parameters of the vehicle's axle housings in the horizontal plane. The accelerometers are mounted on the vehicle's axle housings and connected to multiplexers.