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**Monitoring field and laboratory performance for airborne and impact sound insulation for 110,000 homes per annum**

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This paper provides an overview of a unique monitoring system used in England and Wales for tracking the sound insulation performance for 110,000 new build homes per annum. The regulatory approach, known as Robust Details was established within the building regulations and passed by parliament in 2004 after an 18 month initial research project. Annually over 5,000 construction sites now use this system approach for separating walls and floors for attached houses and apartments. Acoustic site inspections and sound insulation field testing reports provide systematic feedback to the design and performance review. Since the RD systems inception on-site sound insulation compliance rates have risen from 40% to 97%. This paper will discuss the role of laboratory benchmark testing for products and also the role of acoustic "field" inspectors in tracking the airborne and impact performance. In addition the role of intervention and statistical analysis in upgrading or withdrawing specific wall and floor constructions will be presented.