

→ KTI Project Report No. 10

**Vibration isolation of
a Schuler Press Line at
AUDI AG**

Customer	→ AUDI AG
Location	→ Neckarsulm, Germany
Year	→ 2017
KTI product	→ 32 Spring Isolators, type PW
Nat. frequency	→ 3.5 Hz
Tot. weight	→ 4,150 to

In Neckarsulm, Germany, AUDI AG runs a press line of Schuler GmbH, consisting of several presses which are connected and linked together. On this press line, e.g. big side parts of the Audi A8 are produced. In order to reduce the vibrations, this press line was installed 1995 on vibration isolation elements of a competitor. The natural frequency of this vibration isolation was designed with 3.5 Hz.

In 2017, the press line was reworked in the context of changes in production. In doing so, also the previous isolation elements were replaced by new KTI Spring Isolators. For this, KTI did not only supply the Spring Isolators, but also executed the complete exchange of the 32 Spring Isolators and the following leveling of the press line with over 4,000 to, together with the press manufacturer.

The photos on the right show the newly installed Spring Isolators. The load is borne by cylindrical shaped helical steel springs, which are positioned between the upper and the lower construction of the Spring Isolators. The viscous damping is located in the middle part, between the springs. For the release of the prestressed springs and the leveling of the press line, the Spring Isolators can be stressed from below by inserting hydraulic jacks into the Spring Isolators.



Spring Isolators for the vibration isolation of an AUDI AG press line
© KTI Schwingungstechnik GmbH