

## **Chronology of Defect (too many characters for the recall portal comment box)**

### **Chronology:**

MBAG became aware of a potential issue related to the installation of the exhaust gas recirculation pipe in the engine compartment through a notification from its production plant at the end of June 2019. MBAG conducted a review of all vehicles that remained at the plant and corrected the installation of the screw connections for the EGR pipe as necessary.

MBAG launched an investigation and conducted various analyses of the effect of an EGR pipe with screws not tightened to specification.

This investigation also included a detailed thermal analysis regarding the effect of potentially leaking exhaust gas on the various surrounding components. MBAG also analyzed the various functions of nearby components and their specific material properties, especially their resistance against high temperatures.

During the analysis MBAG also closely considered the potential for the spread of contaminated air in the event the EGR pipe began to leak. As part of this analysis, MBAG reviewed the vehicle features that could prevent exhaust gas intrusion into the passenger compartment's fresh air supply as well as whether passengers may be able to detect the presence of exhaust gas during different operating scenarios. MBAG ultimately was able to rule out the possibility of exhaust gas entering the passenger compartment through the fresh air supply because the components responsible for the fresh air supply in the passenger compartment are tightly sealed towards the rest of the engine compartment.

On February 5, 2020, DAG determined that a safety risk could not be ruled out and decided to initiate a recall campaign.

Around the same time the initial investigation of this matter began, MBAG also became aware of a potential issue related to the operation of the flange seal between the exhaust gas turbocharger and the diesel particulate filter. Since the underlying circumstances between this subject and the flange seal are very similar regarding the location of components and possible affects, both subjects were analyzed simultaneously. To date DAG is not aware of any complaints concerning this matter from the field.