

大众 TSI 发动机电控系统的故障诊断与检修

摘要

在当今社会，随着科技的发达，时代的变迁，智能化汽车已经成为一种普遍。已经逐渐融入到人们的生活中。电控发动机是汽车上最核心的器件，它的结构也是最复杂的，维修人员对这种情况也是比较头疼，不仅要检查他的哪个部位出现问题，而且要进行大工程、讲耐心、过细致的修复。如何高效率地排除故障已经成为最关键、最重要的问题。

要对汽车进行维修，必须要熟悉汽车的各个器件、部位，当检测到什么部位出现故障时，再“对症下药”。当然，不同类型的汽车，可能里面的器件会有一些小差别，这就涉及到专业人士的专业知识。按照目前来说，电控系统是最容易出现问题的，也是问题出现最多的，很多维修人员对这方面的问题都束手无策，毕竟涉及太多复杂的工程。现在，我就以上海大众新途 TST 安发动机涡轮增压器为例，详细的介绍故障排查和修复，这目前仅仅只是理论上的，实际操作可能会更难。高精度的检测装备必定与高速发展时代相吻合，汽车行业会越来越好，汽车维修行业也会越来越精良，越来越完美。

关键词：TSI；电控系统；故障排除

Abstract

In today's society, with the development of science and technology, the changes of the times, intelligent car has become a common. It has been gradually integrated into people's lives, and the application of AI technology in cars has become a popular embodiment. The electronic control engine is the most core device in the automobile, and its structure is also the most complex. The maintenance personnel also have a headache about this situation. They should not only check which part of the engine has problems, but also carry out large-scale engineering, patience and meticulous repair. How to eliminate faults efficiently has become the most critical and important problem.

In order to repair the car, we must be familiar with all parts and components of the car. When we detect any part of the car that has a fault, we can "suit the case". Of course, different types of cars may have some small differences in the components, which involves the expertise of professionals. At present, the electronic control system is the most prone to problems, but also the most problems, many maintenance personnel are helpless in this regard, after all, it involves too many complex projects. Now, I will take the turbocharger of Shanghai Volkswagen New TST engine as an example to introduce troubleshooting and repair in detail. At present, this is only theoretical, and practical operation may be more difficult. The high-precision testing equipment is bound to coincide with the high-speed development era, the automobile industry will be better and better, and the automobile maintenance industry will be more and more sophisticated and perfect.

Keywords: TSI; electronic control system; troubleshooting

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