



Tim Stock

BMW X5 - when the Fix is not the Fix

This is an interesting case of a non-starting BMW X5. The workshop was called to start a BMW X5 E70 that had sat unused for several months. Suspecting a flat battery, the garage sent a technician to jump start the BMW.

The battery was low and a jump start was attempted with a jump pack, but the engine refused to start and sounded low on compression. The decision to recover the BMW back to the workshop was made.

Back at the workshop, the battery was fully charged, and then diagnosis revealed the timing chain had broken. A complete timing chain kit was fitted, including all associated

components. As this required the engine to be removed, the vehicle was left parked outside for several weeks before the engine was refitted.

Once again, the BMW would not start and a diagnosis began. It was noticed there was no high-pressure fuel increase. The low-pressure circuit was checked and it showed that fuel was not being delivered. The low-pressure pump circuit was checked. This is where the first mistake was made.

The technician used his LED test light to check for power at the low-pressure pump. A live was indicated; the earth also proved OK. Based on this erroneous test, the in-tank fuel delivery pump was replaced.

The new pump did not solve the problem, there was still no low-pressure supply. It was at this point that the Helpline was involved in the issue.

This BMW uses a pump control module to operate the pump as the engine load requires. We asked for a more detailed voltage check on the fuel pump under cranking, and it was found the voltage was only 3 volts supplied to the pump.

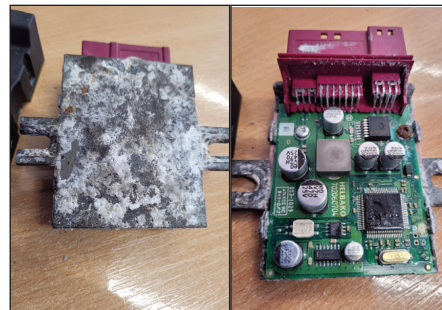
An investigation into the EKPS module wiring was required. The module is located in the Offside rear load area. As soon as the

technician found the module, it was obvious that the module was the issue. Water had been leaking into the rear load area for several months, damaging the circuitry of the module. A replacement EKPS module solved the non-start issue.

An LED test light does not give any indication of voltage, which led the technician to mis-diagnose the fuel pump as being the problem, and needlessly replacing it. If he had load tested the circuit to the fuel pump, the real source of the problem, the EKPS module, would have been spotted earlier.



The EKPS Module was located in the boot



Signs of water damage on the exterior of the module indicated the likely source of the problem, and the interior was also water damaged