

ICS[®] TECHNICAL BULLETIN

*****IMPORTANT – PLEASE READ*****

7/2/2019

Subject: Merit Saws – Kubota and Kohler Engine Exhaust Temperatures

Classification:

<input type="checkbox"/>	New Product
<input type="checkbox"/>	Product Change
<input checked="" type="checkbox"/>	General Use & Operation
<input type="checkbox"/>	Product Service
<input checked="" type="checkbox"/>	Product Safety

Explanation:

Exhaust temperatures can vary, and the largest factor is engine load. The higher the load the higher the exhaust temperature. In order to remain compliant with emission standards, operating temperatures of exhaust have increased to diminish carbon monoxide and hydrocarbon emissions.

Kubota Catalyst and Kohler Muffler used in Merit Saws

At 1000°F (538°C), steel will have a slight red, but mostly grey color. Due to the higher operating temperatures of these engines, a bright red glow may appear on the head pipe, the catalyst or near the muffler. If the temperature of your exhaust system is in question, you can measure it with a high temperature, non-contact infrared test thermometer rated to at least 1600°F (871°C) (available at Grainger, Amazon and other retailers)

Kubota engines have an operating load temperature that may reach over 1300°F (704°C). The exhaust gas temperature should not exceed 1562°F (850°C) under maximum load conditions. Measurements are taken by aiming the thermometer at the head pipe 4 inches (100mm) from the catalyst.

Kohler engines have an operating load temperature that may reach up to 1500°F (815°C) out of the head. The center of the muffler will typically hover near 750°F (399°C) and should not exceed 1000°F (538°C). Kohler measurements are taken 1 inch (25mm) from the exhaust head or in the center of the muffler. Either measurement will determine if temperature is within spec.

As with any internal combustion engine, use caution when working around exhaust systems, as they can reach extreme temperatures.