



SHIFTING THE LIMITS

REFERENCE CMT-ADVANCED

Automotive supplier Magna Steyr AG & Co KG, Austria

ALUMINIUM WELDING OF MOTOR VEHICLE BODIES THAT PUSH THE LIMITS.

With 36 sites across North America, Europe and Asia, Magna Steyr is one of the world's leading brand-independent automotive suppliers. The subsidiary company of the global Magna International Group employs almost 9,500 people. Incorporating highly flexible development and production strategies, the company provides solutions for vehicle parts, components, modules and entire vehicles.



REQUIREMENT

“By using CMT Advanced we can avoid the problems we had previously been having with porosity on joints involving castings.”

Werner Karner,
welding expert at Magna Steyr

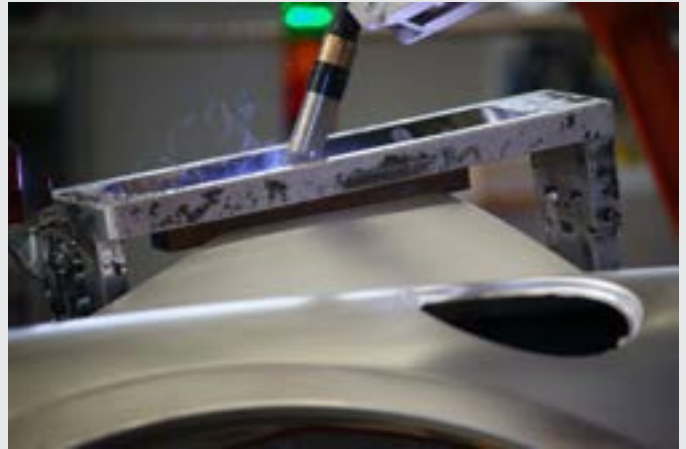
The structure of the body places high demands on welding: the weld seam must completely meet the strength requirements of the body structure. The surface must also be free of cracks and pores, as mechanical reworking is completely out of the question on a passenger car of this category. Last but not least it must be possible to implement the final process economically in the given time. Conventional welding processes did not make the cut for this application due to the high levels of heat generation.

SOLUTION

“The successful solution we arrived at with CMT Advanced meant that we could simply forget about all the complicated alternatives, such as subsequently trimming the roof panel.”

Karl Hartl,
project manager at Magna Steyr

CMT Advanced cold welding technology from Fronius proved to be the ideal solution for this challenging aluminium welding application. The maximum amperage of 90 A means the new arc welding process produces very little heat input. This enables even ultra-thin sheets like the aluminium body of the SLS AMG to be joined with extremely little spatter. At the same time, significantly larger gaps and gaps of varying widths can be bridged to a high standard. This enables Magna Steyr to ensure the stability of the body structure and rule out the need for any mechanical reworking.



/ Perfect Welding / Solar Energy / Perfect Charging

WE HAVE THREE DIVISIONS AND ONE PASSION: SHIFTING THE LIMITS OF POSSIBILITY.

/ Whether welding technology, photovoltaics or battery charging technology – our goal is clearly defined: to be the innovation leader. With around 3,300 employees worldwide, we shift the limits of what’s possible - our record of over 900 granted patents is testimony to this. While others progress step by step, we innovate in leaps and bounds. Just as we’ve always done. The responsible use of our resources forms the basis of our corporate policy.

Further information about all Fronius products and our global sales partners and representatives can be found at www.fronius.com

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