

Supplementary materials for “Influence of solidification rates at sand casting on the mechanical joinability of a cast aluminium alloy”

The supplementary Figures S1 to S5 show the light microscopy (LOM)-images of AlSi9 refined with a thickness of 2.0 mm – 4.0 mm. The LOM images also include the exemplary measurement of the DAS for each stage. In accordance with BDG guideline P220, at least 10 dendrite arms were measured. It is obvious that the thickness of the component has a significant influence on the morphology, or more precisely on the DAS. These figures serve to illustrate this influence. The exact results can be seen in Figure 5.

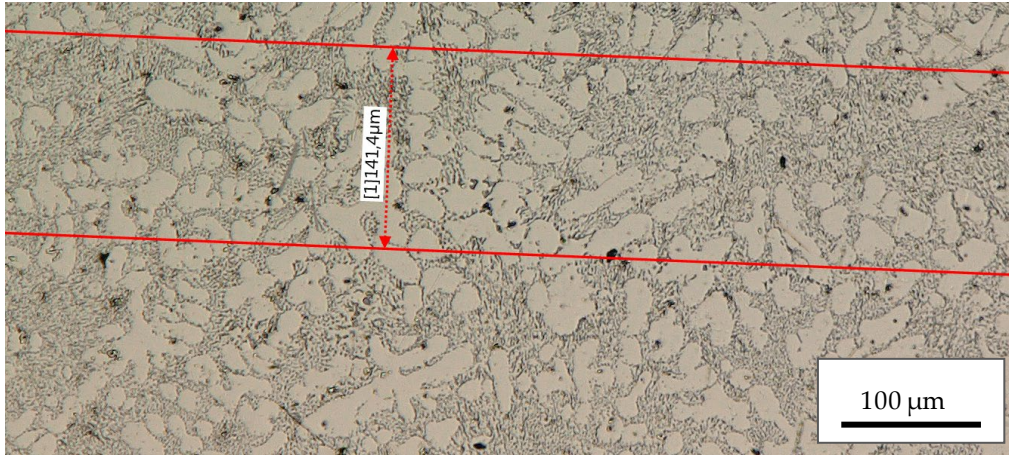


Figure S1: LOM-image of AlSi9 with a thickness of 2.0 mm

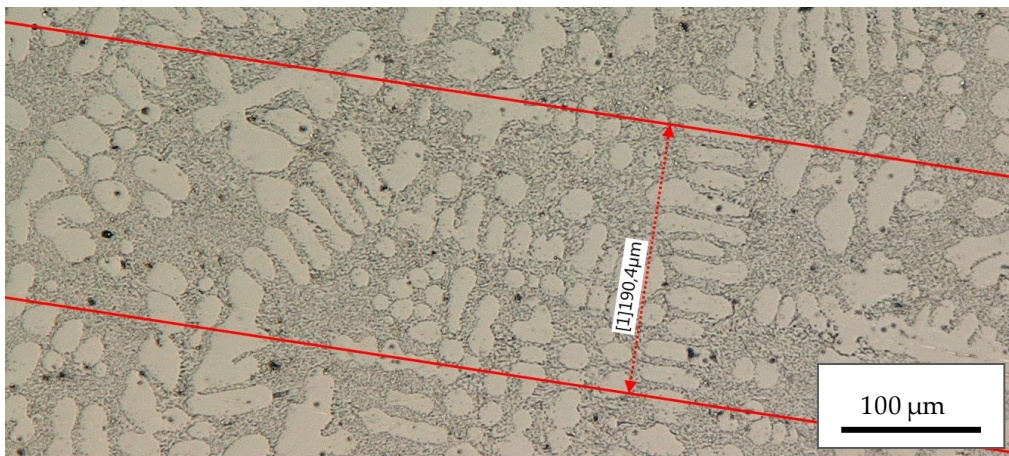


Figure S2: LOM-image of AlSi9 with a thickness of 2.5 mm

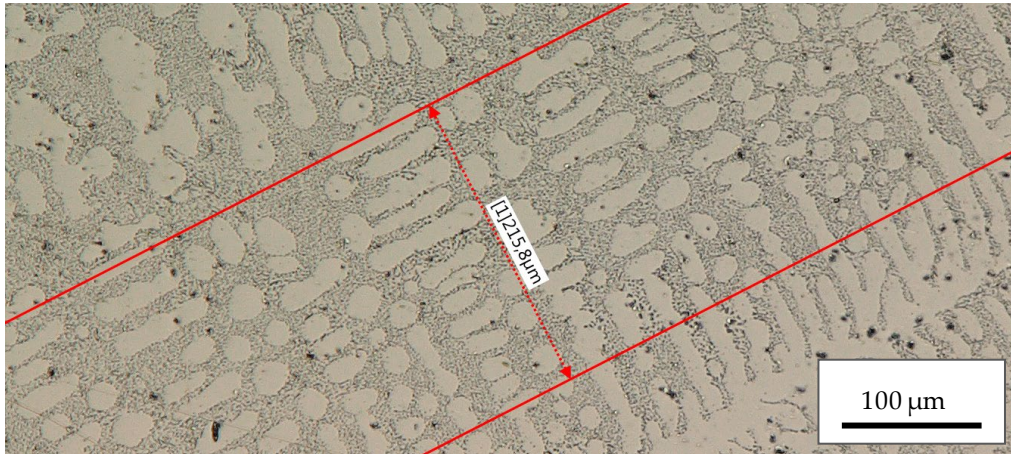


Figure S3: LOM-image of AlSi9 with a thickness of 3.0 mm

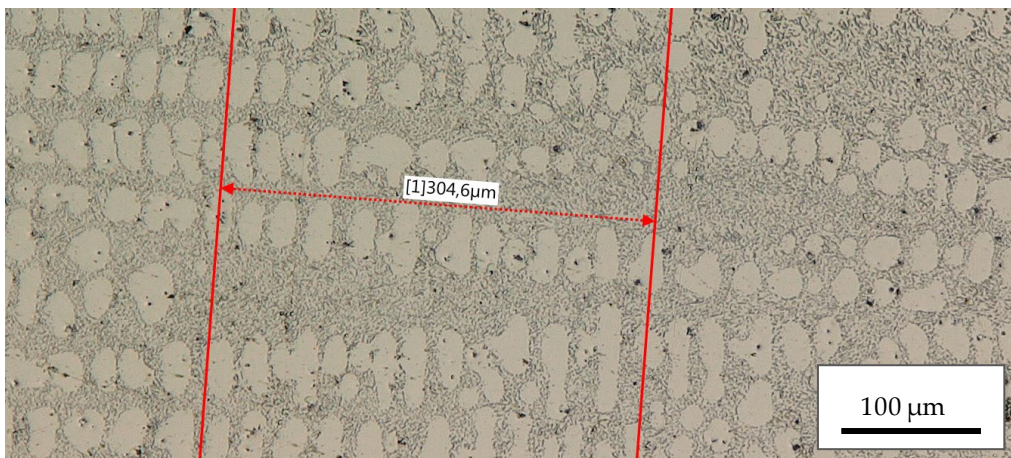


Figure S4: LOM-image of AlSi9 with a thickness of 3.5 mm

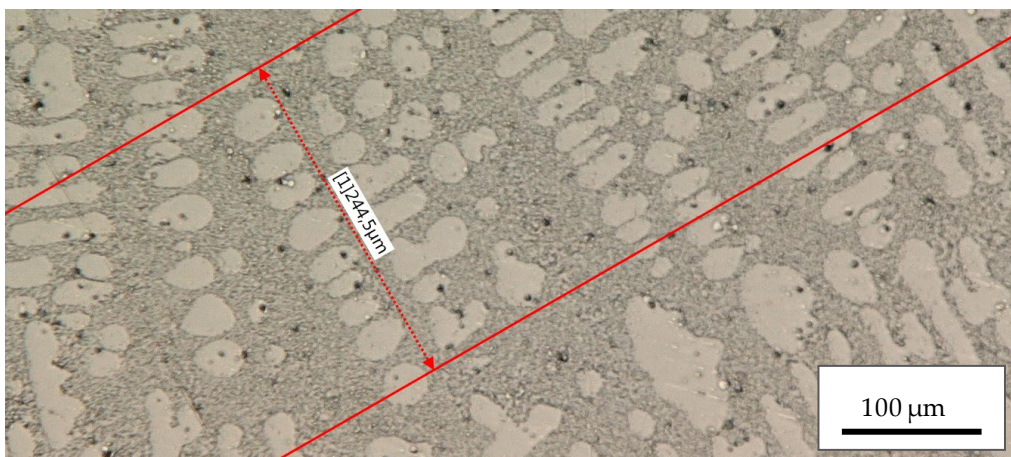


Figure S5: LOM-image of AlSi9 with a thickness of 4.0 mm