

Method of Forming Magnesium Alloy Sheets

Disclosure Number

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Technology Summary

Successful, economically feasible thermomechanical processing of rare earth free magnesium alloys has been accomplished by a novel rolling method. The present invention involves improvements in processing temperatures and deformation strains in combination with other parameters. It is contemplated from proof-of-principle experiments that the present invention has a significant effect in disrupting the strong basal texture in magnesium based alloys. The basal texture disruption is thought to lower the deformation temperature allowing conventional magnesium sheet alloys to be formed into automotive components using conventional tooling and lubricants.

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