



FEA of Residual Stresses in Butt Welding of Two Stainless Steel Plates

By Gurinder Singh Brar

LAP Lambert Academic Publishing Dez 2014, 2014. Taschenbuch. Book Condition: Neu. 223x159x7 mm. This item is printed on demand - Print on Demand Neuware - One of the most widely used permanent joining processes is welding. Welding results in a very complex thermal cycle which results in irreversible elastic-plastic deformation and residual stresses in and around fusion zone and heat affected zone (HAZ). Residual stresses may be an advantage or disadvantage in structural components depending on their nature and magnitude. Due to these residual stresses produced in and around the weld zone the strength and life of the component is reduced. In present study a commercially available finite element code was used to model and analyze a three dimensional model of the butt welded joint of two AISI 304 stainless steel plate used for manufacturing sugar hoppers. Butt welding simulations were performed by four different welding techniques - submerged arc welding (SAW), manual metal arc welding (MMAW), gas metal arc welding (MIG) and gas tungsten arc welding (TIG). Analysis of butt welded joint showed that butt welds produced by MIG resulted in lowest value of residual stress in plates. Critical analysis of butt welded joint by MIG and TIG showed...



READ ONLINE
[2.91 MB]

Reviews

This publication is definitely worth buying. It can be loaded with wisdom and knowledge I am easily could possibly get a satisfaction of looking at a composed publication.

-- **Rhiannon Steuber**

Very helpful to all type of individuals. It really is rally interesting through looking at time. Its been designed in an extremely basic way which is just soon after i finished reading this pdf through which basically modified me, change the way i believe.

-- **Tyshawn Brekke**

See Also



Psychologisches Testverfahren

Reference Series Books LLC Nov 2011, 2011. Taschenbuch. Book Condition: Neu. 249x191x7 mm. This item is printed on demand - Print on Demand Neuware - Quelle: Wikipedia. Seiten: 100. Kapitel: Myers-Briggs-Typindikator, Keirsey Temperament Sorter, DISG, Eignungstest für das Medizinstudium, Adult Attachment Interview,...



Programming in D

Ali Cehreli Dez 2015, 2015. Buch. Book Condition: Neu. 264x182x53 mm. This item is printed on demand - Print on Demand Neuware - The main aim of this book is to teach D to readers who are new to computer programming. Although...



Tinga Tinga Tales: Why Lion Roars - Read it Yourself with Ladybird

Paperback. Book Condition: New. Not Signed; This is a Tinga Tinga tale inspired by traditional stories from Africa. Lion is king of Tinga Tinga but he can't roar! Can his friend Flea help Lion to find his roar and behave more like...



Sport is Fun (Red B) NF

Pearson Education Limited. Paperback. Book Condition: new. BRAND NEW, Sport is Fun (Red B) NF, Dianne Irving, This title is part of Pearson's Bug Club - the first whole-school reading programme that joins books and an online reading world to teach today's...



Have You Locked the Castle Gate?

Addison-Wesley Professional. Softcover. Book Condition: Neu. Gebraucht - Sehr gut Unbenutzt. Schnelle Lieferung, Kartonverpackung. Abzugsfähige Rechnung. Bei Mehrfachbestellung werden die Versandkosten anteilig erstattet. - Is your computer safe Could an intruder sneak in and steal your information, or plant a virus Have...



Adobe Indesign CS/Cs2 Breakthroughs

Peachpit Press, 2005. Softcover. Book Condition: Neu. Gebraucht - Sehr gut Unbenutzt. Schnelle Lieferung, Kartonverpackung. Abzugsfähige Rechnung. Bei Mehrfachbestellung werden die Versandkosten anteilig erstattet. - Adobe InDesign is taking the publishing world by storm and users are hungry for breakthrough solutions to...