



Major Tool and Machine, Inc.
1458 E. 19th Street, Indianapolis, Indiana, 46218
Welder Performance Qualification (WPQ)
WeldOffice WPQ

Welder's name	Spencer, John		Test date	8/23/2005
ID Number	352		WPQ record number	Spencer 437
Date of birth			Standard test number	Rev.
Stamp number			WPS record number	WPS433 Rev. 0
Company name	Major Tool and Machine, Inc.		Qualification code	ASME Section IX
Division				

BASE METALS (QW-403)

	Product form	Specification (type or grade)	P no.	Grp-no.	Size	Sch.	Thick.	(in.)	Dia.	(in.)
Welded to:	Casting	CF8MNMnMOD	U		-	-	1.5	-		
	Casting	CF8MNMnMOD	U		-	-	1.5	-		
Joint type	Groove									

VARIABLES

Actual values

RANGE QUALIFIED

Type of weld joint	Plate - Groove		Groove and Fillet welds							
Base metal	U to U		CF8MNMnMOD to CF8MNMnMOD							

BASE METAL THICKNESS

Groove

Fillet

Overlay

Groove

Fillet

Overlay

Plate thickness (in.)	1.5	-	-	no limit	no limit	-
Pipe/tube thickness (in.)	-	-	-	no limit	no limit	-
Pipe diameter (in.)	-	-	-	no limit	no limit	-

PROCESS VARIABLES

Actual values

RANGE QUALIFIED

Welding process	GTAW	GTAW
Type	Manual	Manual
Backing	With	With
Filler metal specification	ER316MNNF	ER316MNNF
Filler metal classification	U	U
Filler metal F-number	U	U
Filler metal variety (QW-404.23)	Bare (solid)	Solid, metal cored
Consumable insert	None	Without
Number of layers deposited	12	
Weld deposit thickness (in.)	1.5	no limit
Weld position (Actual position tested)	1G	
Groove - Plate & Pipe >24"		-
Groove - Pipe 2.875" to 24"		-
Groove - Pipe < 2.875"		-
Fillet - Plate & Pipe >24"		-
Fillet - Pipe 2.875" to 24"		-
Fillet - Pipe < 2.875"		-
Progression	-	-
Backing gas	Without	With, without
GTAW welding current/polarity	DCEN	DCEN

TESTS

Type of test	Acceptance criteria	Result	Comments
Radiographic examination per QW-191 and QW-302.2	QW-191.2	Acceptable	see - ASME IX - QW-142/3, QW-304/5
Visual examination per QW-302.4	QW-194	Acceptable	see - ASME IX - QW-452.1 (a)
Notes	Welder performed 0.75" deposit thickness of PQR437.		

CERTIFICATION

Tests conducted by	MQS Inspections (radiography)	Laboratory test number	n/a
Mechanical tests by	Westmoreland (Mechanical)	Test file number	See Notes

We certify that the statements in this record are correct and that the test welds were prepared, welded and tested in accordance with the requirements of the Code.

Signature

Name	Signature
Date	



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WPQ - Additional Information
WeldOffice WPQ

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For Visual Inspection see MTM NDT Report No. 13218, For Radiographic See MQS Job No. 13850291