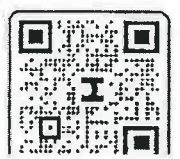


CERTIFICATE NO(증서번호) : D001582
 DATE OF ISSUE(발행일자) : 2019-12-05
 CONTRACT(P/O) NO.(계약번호) : 28991
 PR NO.(주문서번호) : F191003108
COMACONT(제품명) : ERW CARBON STEEL PIPE
 SPECIFICATION(표준규격) : ASTM A53 B

검사증명서
MILL TEST CERTIFICATE
 EN 10204 TYPE 3.1 - 2004
 CUSTOMER(고객사): 현대중공업(주)
 현대중공업(주)



No.	TYPE OF PIPE END	SIZE OUT-DIA*THICK*LENGTH (외경*두께*길이)	PCS	WEIGHT (KG)	TOTAL LENGTH (M)	HEAT No.	Hydrostatic Test			Tensile Properties(Gage Length: 2 inch)				Hardness Test			C/N Impact Test		D.W.T Test (°C)
							Spec	Pressure	Time	Base MPa	Weld MPa	Yield Strength MPa	Tensile Strength MPa	Y/R Ratio	EL	Max Value	Specimen	Absorbed Energy(Joule)	
5	EB BE	16" X 0.312" X 6.150 M	4	1915	246	R28145	820	5	T	S28	493	419	37						
6	EB BE	16" X 0.312" X 6.150 M	13	6223	79.95	R28149	820	5	T	492	495	357	41						
7	EB BE	15" X 0.312" X 6.150 M	8	3829	49.2	R28388	820	5	T	486	498	357	41						
TOTAL				60	28171	399													

No.	Heat No.	Chemical Composition(%)											Zn Coating	Zn-Coating Test		H-C-Test		H-I-C Test			S.C.C Test	
		C	S	Mn	P	S	Cu	N	Cr	Mo	V	CA3		Time	Result	Collapse Pressure	psi	QLR	CTR	CSR		
5	R28145	Min	30		120	50	45	2	40	40	40	150	80	1000								
		Max	2	2	2	2	3	3	2	2	2	3	3	3								
6	R28149	Min	30		120	50	45	2	40	40	40	150	80	1000								
		Max	2	2	2	2	3	3	2	2	2	3	3	3								
7	R28388	Min	30		120	50	45	2	40	40	40	150	80	1000								
		Max	2	2	2	2	3	3	2	2	2	3	3	3								

Heat Treatment: Non-Destructive Test (LIT) GOOD, Bending Test GOOD, Visual & Dimension GOOD

본 제품은 관련 규격에 합격되었음을 보증합니다.
 This material has been manufactured, sampled, tested and inspected in accordance with the specification and it has been found to meet the requirements.
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CA Warning

H.K. CHOI