

接管载荷表						
NOZZLE LOAD TABLE						
接管 NOZZLE	P (N)	VC/V1 (N)	VL/V2 (N)	MC/M1 (N·m)	MT/M2 (N·m)	ML/M2 (N·m)
N01	12800	9600	12800	5120	7680	6656
N02,N05	12800	9600	12800	5120	7680	6656
N03	9600	7200	9600	2880	4320	3744
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主要材料表						
筒体 封头 SHELL HEAD	S31603(GB/T 4300-2017) 16MnNB(GB/T 713.2-2013)				接管 COIL	0.345P(GB/T 713.2-2013)
筒体主 (壳板) NOZZLE FLANGE (SHELL)	S31603NB(GB/T 4300-2017) 16MnNB(GB/T 713.2-2013)				接管 (壳板) NOZZLE P.FE (SHELL)	S31603NB(GB/T 4300-2017) 16MnNB(GB/T 713.2-2013)
筒体主 (接管) NOZZLE FLANGE (COIL)	16MnNB(GB/T 713.2-2013)				接管 (接管) NOZZLE P.FE (COIL)	0.345D(GB/T 713.2-2013)
筒体盲板 BLIND FLANGE	S31603(GB/T 4300-2017) 16MnNB(GB/T 713.2-2013)				螺栓 (≥M36)	35CrMoA(GB/T 3077-2013)

10. THE WELD JOINTS OF THE CLADDED LAYER OF THE STAINLESS STEEL COMPOSITE PLATE SHALL UNDERGO 100% PT AND MEET THE GRADE I QUALIFICATION REQUIREMENTS SPECIFIED IN NB/T 47013.5-2015.
11. ALL BUTT JOINTS OF THE EXTERNAL HALF-PIPES SHALL UNDERGO 100% RT, WITH A QUALIFICATION LEVEL NO LOWER THAN GRADE II.
12. THE WELDING OF THE HALF-PIPES SHOULD BE CARRIED OUT AFTER THE EQUIPMENT HYDROSTATIC TEST IS COMPLETED. THE WELDING OF THE HALF-PIPES SHOULD FIRST FOCUS ON THE BUTT WELDS, FOLLOWED BY THE CORNER WELDS, AND A REASONABLE CONSTRUCTION SEQUENCE SHOULD BE ADOPTED TO MINIMIZE WELDING RESIDUAL STRESS.
13. THE A-CLASS WELD JOINTS OF THIS EQUIPMENT SHALL BE PREPARED AS PRODUCT WELDING SPECIMENS. ACCORDING TO THE PROVISIONS OF ARTICLE 9 OF GB/T 150.4-2024, THE INSPECTION AND EVALUATION OF THE WELDING SPECIMENS SHALL BE CONDUCTED IN ACCORDANCE WITH THE REQUIREMENTS OF NB/T 47016-2023, WHERE THE WELDING JOINTS SHALL UNDERGO A -20°C IMPACT TEST WITH A KV₂ ≥ 41J. ALL WELD JOINTS SHALL BE FREE OF UNDERFILLS, SURFACE CRACKS, LACK OF PENETRATION, LACK OF FUSION, SLAG INCLUSIONS, AND OTHER DEFECTS. THE WELD HEAD AND BASE MATERIAL SHOULD TRANSITION SMOOTHLY.
14. AFTER THE HEAD IS FORMED, IT SHOULD UNDERGO 100% ULTRASONIC TESTING IN ACCORDANCE WITH NB/T 47013.3-2015, WITH A QUALIFICATION LEVEL OF GRADE I. IF FURTHER FORMING IS APPLIED, THE MATERIAL PROPERTIES SHOULD BE RESTORED AND HEAT TREATMENT TEST PLATES OF THE BASE MATERIAL SHOULD BE INCLUDED.
15. THE EQUIPMENT SHOULD UNDERGO OVERALL FURNACE HEAT TREATMENT, AND THE HEAT TREATMENT HOLDING TEMPERATURE SHOULD PREFERABLY BE AT THE UPPER LIMIT. AFTER HEAT TREATMENT, THE HARDNESS OF THE BASE MATERIAL, WELDS, AND HEAT-AFFECTED ZONES ON BOTH INTERNAL AND EXTERNAL SURFACES SHOULD BE < 200 HB. ALL PRE-WELDED COMPONENTS SHOULD BE WELDED TO THE EQUIPMENT BEFORE HEAT TREATMENT, AND NO WELDING SHOULD BE PERFORMED ON THE EQUIPMENT AFTER HEAT TREATMENT. THE HEAT TREATMENT SHOULD ALSO COMPLY WITH THE REQUIREMENTS OF GB/T 30583-2014.
16. THE WELDS BETWEEN THE SKIRT AND THE BOTTOM HEAD MUST BE FULLY WELDED AND UNDERGO MAGNETIC PARTICLE TESTING MEETING THE GRADE I QUALIFICATION REQUIREMENTS IN ACCORDANCE WITH NB/T 47013.4-2015.
17. THE DIFFERENCE BETWEEN THE MAXIMUM AND MINIMUM INNER DIAMETERS ON THE SAME SECTION OF THE TOWER BODY SHOULD NOT EXCEED 18 mm.
18. THE STRAIGHTNESS DEVIATION FOR ANY 3000 MM LENGTH OF THE CYLINDER BODY SHALL NOT EXCEED 3 mm, AND THE TOTAL STRAIGHTNESS DEVIATION OF THE TOWER BODY SHALL NOT EXCEED 17 mm.
19. THE VERTICALITY DEVIATION OF THE TOWER BODY DURING INSTALLATION SHALL NOT EXCEED 20mm.
20. THE TOLERANCE FOR THE CENTER CIRCLE DIAMETER OF THE ANCHOR BOLT HOLES IN THE SKIRT SEAT, AS WELL AS THE TOLERANCE FOR THE CHORD LENGTH BETWEEN ADJACENT HOLES AND ANY TWO HOLES, SHALL NOT EXCEED ±3 mm.
21. THE INSTALLATION DIMENSIONAL TOLERANCE FOR THE LOCAL LIQUID LEVEL GAUGE PIPE OPENING SHALL BE IN ACCORDANCE WITH THE PROVISIONS OF ARTICLE 6, SECTION 14.2.13 OF GB 70584-2020.
22. THE BUTT JOINT BETWEEN THE CONNECTING PIPE AND FLANGE WITH DN < 250 SHALL UNDERGO 100% MAGNETIC PARTICLE AND PENETRANT TESTING IN ACCORDANCE WITH NB/T 47013-2015, AND THE QUALIFICATION LEVEL SHOULD BE LOWER THAN GRADE I.
23. THE CHLORIDE ION CONTENT OF THE WATER USED FOR HYDROSTATIC TESTING OF STAINLESS STEEL EQUIPMENT SHALL BE LESS THAN 25 mg/L. AFTER PASSING THE TEST, THE WATER SHOULD BE DRAINED AND THE EQUIPMENT IMMEDIATELY DRIED.
24. AFTER PASSING THE LEAKAGE TEST, THE STAINLESS STEEL SURFACE IN CONTACT WITH THE MEDIUM SHOULD BE TREATED WITH ACID PICKLING AND PASSIVATION. THE PASSIVATION FILM FORMED SHOULD BE TESTED ACCORDING TO THE METHOD SPECIFIED IN GB/T 25150-2010. AFTER PASSING THE TEST, THE ACID PICKLING MEDIUM MUST BE CLEARED THOROUGHLY, THERE MUST BE NO RESIDUE.
25. DURING THE AIR TIGHTNESS TEST, ALL SAFETY ACCESSORIES (SAFETY VALVES) MUST BE FULLY ASSEMBLED. INSTALL A CONDUIT AT THE OUTLET OF THE SAFETY VALVE TO GUIDE THE DISCHARGE MEDIUM TO A SAFE LOCATION AND HANDLE PROPERLY. IT SHOULD NOT BE DIRECTLY DISCHARGED INTO THE ATMOSPHERE.
26. THE ANCHOR BOLTS FOR THE SKIRT BASE SHOULD BE POSITIONED USING AN ANCHOR BOLT FOUNDATION TEMPLATE. THE FOUNDATION TEMPLATE AND THE SKIRT BASE PLATE SHOULD BE DRILLED FOR THE BOLT HOLES TOGETHER. THE FOUNDATION TEMPLATE MUST BE SENT TO THE INSTALLATION SITE IN ADVANCE.
27. THE EQUIPMENT SKIRT SHOULD BE COVERED WITH A FIRE-RESISTANT LAYER, AND ITS FIRE RESISTANCE LIMIT SHOULD NOT BE LESS THAN 2 HOURS. THE SPECIFIC REQUIREMENTS SHOULD FOLLOW ARTICLE 5.6 OF GB 50169-2008 "FIRE PROTECTION DESIGN STANDARD FOR PETROCHEMICAL ENTERPRISES" (2018 VERSION).
28. THE LOCATIONS OF THE NOZZLES, ANCHOR BOLTS, LIFTING LUGS, NAMEPLATES, GROUNDING PLATES, ETC., CAN BE FOUND IN THE PIPING LAYOUT DIAGRAM (SEPARATE DRAWINGS TO BE PROVIDED), WITH C12-C17 ARRANGED UNIFORMLY IN A 120° STAGGERED MANNER.

NOTE: (1) THE COMPOSITION OF THE MEDIUM (Wt%): UNDER NORMAL OPERATING CONDITIONS: LIQUID PHASE: FORMALDEHYDE: 0.08, METHANOL: 3.01, FORMIC ACID: 0.07, ISOBUTYRALDEHYDE: 0.08, ISOBUTANOL: 2.19, ISOBUTYRIC ACID: 0.02, TRIMETHYLAMINE: 1.05, HYDROXYISOBUTYRALDEHYDE: 2.68, NEOPENITOL: GLYCOL: 55.89, HYDROXYISOBUTYRALDEHYDE: NEOPENITOL: GLYCOL: ESTER: 0.74, HYDROXYISOBUTYRIC ACID: 0.07, ISOBUTYRIC ACID: ESTER: 0.74, WATER: 33.24, OTHER: 0.05, ESTER: 0.08, GAS PHASE: METHANOL: 4.84, ISOBUTANOL: 1.42, TRIMETHYLAMINE: 38.03, WATER: 11.31, OTHER: 0.13, HYDROGEN: 44.27.

UNDER REDUCTION CONDITIONS: HYDROGEN < 20 % V, STEAM, NITROGEN, PURE HYDROGEN CONDITIONS MAY OCCUR DURING OPERATION.

(2) THE NORMAL OPERATING CONDITIONS ARE AS FOLLOWS: WORKING PRESSURE: 40.8 kPa/cm² G, WORKING TEMPERATURE: 150°C, DESIGN PRESSURE: 46 kPa/cm² G, DESIGN TEMPERATURE: 180°C. FOR REGENERATION CONDITIONS: WORKING PRESSURE: 5.1 kPa/cm² G, WORKING TEMPERATURE: 280°C, DESIGN PRESSURE: 9.2 kPa/cm² G, DESIGN TEMPERATURE: 280°C. REGENERATION OCCURS EVERY 20 YEARS FOR 10 DAYS. THE MAXIMUM ALLOWABLE WORKING PRESSURE IS BASED ON THE DESIGN TEMPERATURE OF 180°C UNDER NORMAL OPERATING CONDITIONS.

(3) THE PLATFORMS, LADDERS, PIPE RACK BRACKETS (INCLUDING BASE PLATES AND THEIR ACCESSORIES) WELDED TO THE EQUIPMENT BODY, AS WELL AS OTHER PRE-WELDED COMPONENTS, SHALL BE DESIGNED AND SUPPLIED BY THE MANUFACTURER. THE SELF WEIGHT OF THE EQUIPMENT INCLUDES PRE WELDED PARTS OUTSIDE THE TOWER, WHICH WEIGH APPROXIMATELY 300kg. PRE WELDED PARTS INSIDE THE TOWER, NO.3 DISTRIBUTOR, AND PAD ARE ALL SUPPLIED BY THE LICENSOR.

(4) THE CERAMIC BALL SUPPORT STRUCTURE (INCLUDING 3 LAYERS OF WIRE MESH) SHALL BE FINALLY CONFIRMED BY THE PATENT HOLDER, DESIGNED AND SUPPLIED BY THE EQUIPMENT MANUFACTURER.

(5) THE LIFTING METHOD FOR THIS EQUIPMENT SHALL BE DETERMINED THROUGH CONSULTATION BETWEEN THE MANUFACTURER, THE OWNER, AND THE INSTALLATION UNIT TO FINALIZE THE TYPE AND SIZE OF THE LIFTING LUGS.

(6) THE REACTOR SHALL USE EXTERNAL HALF-TUBE HEATING, WITH A HALF-TUBE SPECIFICATION OF DN100 AND A CENTER-TO-CENTER SPACING OF 160 mm. THE HALF-TUBE SHOULD NOT EXCEED 50 METERS IN LENGTH. THE HALF-TUBE IS WOUND CLOCKWISE WHEN VIEWED FROM ABOVE. IF IT CANNOT BYPASS OBSTACLES SUCH AS PIPE CONNECTIONS, DN32 PIPES CAN BE USED FOR CONNECTION.

(7) BED RESISTANCE REDUCTION: PRODUCING MAX 80KPa, RESTORING MAX 20Kpa.

(8) UNDER NORMAL OPERATING CONDITIONS, THE REDUCED CATALYST BED NEEDS TO BE WETTED BEFORE DRIVING, SO THERE MAY BE A SITUATION WHERE THE LIQUID LEVEL PENETRATES THE ENTIRE BED, WHICH CAN BE CONSIDERED AS FULL LIQUID.

(9) THE EXTERNAL HEATING HALF-TUBE OF THE REACTOR DOES NOT OPERATE UNDER NORMAL CONDITIONS, IT IS ONLY USED FOR THE HEATING CONDITIONS.

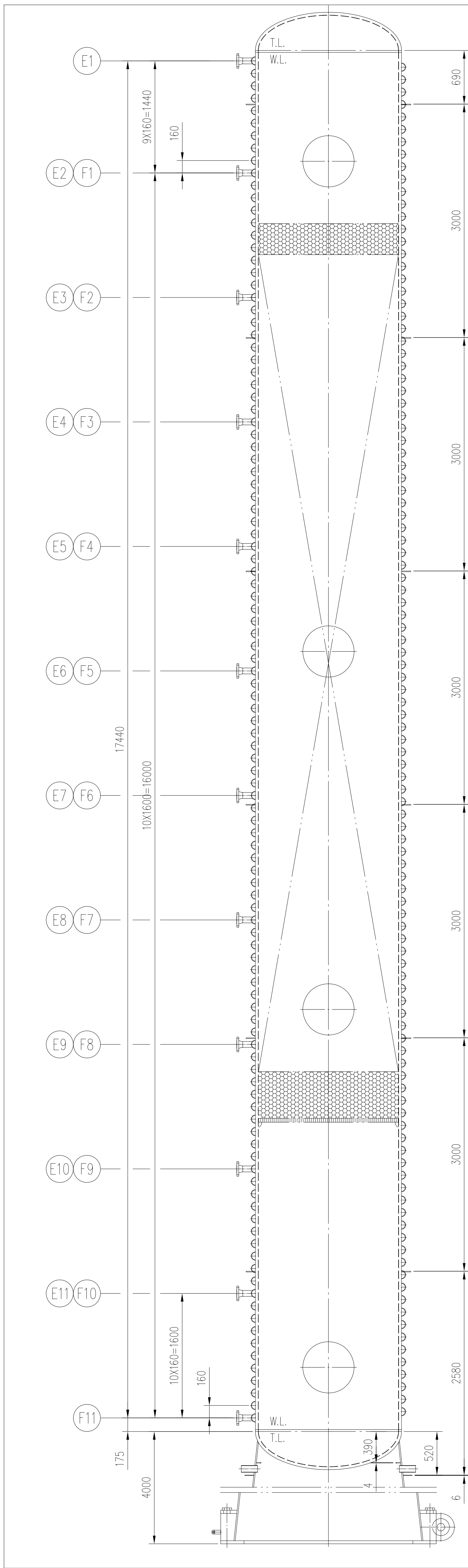
(10) EXCEPT FOR THE CERAMIC BALLS, CATALYST, CERAMIC RINGS, AND THE NO.3 LIQUID DISTRIBUTOR, ALL OTHER INTERNALS (INCLUDING THE NOT GUIDE TUBE, CERAMIC BALL SUPPORT STRUCTURE, DEMISTER, AND OTHER INTERNALS) ARE DESIGNED AND SUPPLIED BY THE TOWER MANUFACTURER.

(11) THE REINFORCING RING ALSO SERVES AS INSULATION SUPPORT, WITH A SPACING OF APPROXIMATELY 3000 mm PER RING, AND MUST NOT BE INTERRUPTED. IT MAY BE ADJUSTED UP OR DOWN WHEN ENCOUNTERING NOZZLES OR PLATFORM SUPPORT LUGS, BUT THE MAXIMUM SPACING MUST NOT EXCEED 3500 mm.

(12) ALL SIDE-MOUNTED PRESSURE GAUGES ARE REQUIRED TO MEASURE THE LIQUID PHASE, AND THE PRESSURE MEASUREMENT POINTS SHOULD BE INSTALLED AT AN UPWARD ANGLE TO PREVENT LIQUID ACCUMULATION.

(13) IF THIS EQUIPMENT UNDERGOES A HORIZONTAL HYDROSTATIC TEST, EFFECTIVE MEASURES MUST BE TAKEN TO PREVENT DEFORMATION OF THE EQUIPMENT.

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伴热盘管俯视图
TOP VIEW DETAILS OF HEATING COIL
不按比例 NO SCALE

伴热蒸汽入口/出口端部示意图
SCHEMATIC DIAGRAM OF INLET/OUTLET END OF HEATING STEAM
不按比例 NO SCALE

D01 口防涡流挡板详图
DETAIL OF D01 ANTI-VORTEX PLATE
不按比例 NO SCALE

裙座壳缺口详图
DETAIL OF GAP IN SKIRT SHELL
不按比例 NO SCALE

接地板详图
DETAIL OF EARTH PLATE
1:4

N07 口把手详图
DETAIL OF N07 HANDLE
不按比例 NO SCALE

C11~18 转接法兰与温度计套管连接详图
DETAIL OF C11~18 CONNECTION BETWEEN ADAPTER FLANGE AND THERMOMETER SLEEVE
不按比例 NO SCALE

盘管大接管或吊耳示意图
SCHEMATIC DIAGRAM OF COIL PIPE MEETING LARGE NOZZLE OR LITTING LUG
不按比例 NO SCALE

伴热盘管示意图
SCHEMATIC DIAGRAM OF HEATING COIL
不按比例 NO SCALE

地脚螺栓座详图
DETAIL OF THE ANCHOR BOLT BASE
不按比例 NO SCALE

D01 口引出孔结构详图
DETAIL OF D01 OUTLET HOLE STRUCTURE
不按比例 NO SCALE

I1 口引出孔结构详图
DETAIL OF I1 OUTLET HOLE STRUCTURE
不按比例 NO SCALE

A、B 类焊接接头
“A” & “B” JOINT OF SHELL
1:1

接管与壳体焊接接头
NOZZLE JOINT TO SHELL
1:1

N03 口内接管与锻管焊接接头
N03 INTERNAL PIPE JOINT TO FORGED PIPE
不按比例 NO SCALE

C33、C42 口侧装压力计接管示意图
SCHEMATIC DIAGRAM OF SIDE-MOUNTED PRESSURE GAUGE NOZZLE
不按比例 NO SCALE

特性表 CHARACTERISTIC TABLE					
型式 TYPE	规格 SIZE	材料密度 DENSITY kg/m³	高度 HEIGHT	层数 LAYERS	体积 VOLUME m³
筒体	圆筒形	1000*	10500*	1	26.72
筒体	—	591*	350*	1	0.89
筒体	φ6*	1300~1400*	50*	1	0.13
筒体	φ9*	1300~1400*	50X2*	2	0.13X2
筒体	φ16*	1300~1400*	100*	1	0.26
筒体	φ25*	1300~1400*	400*	1	1.02

I1	ASME B16.5-2020	接管 100X41X6 FLANGE	3	S30403	0.2	0.6		
	GB/T12459-2017	接管 100X41X6 FLANGE	1	S30403	0.91			
	接管 100X41X6 FLANGE	1	S30403	2.3				
	接管 100X41X6 FLANGE	1	S30403	2.3				
E1~I1, F1~I1	接管 100X41X6 FLANGE	24	Q345D	6.3	151.2		一半为二 DIVIDE INTO TWO	
	接管 100X41X6 FLANGE	11	Q345R	5.6	61.6		一半为二 DIVIDE INTO TWO	
	接管 100X41X6 FLANGE	1/10	Q345R	6.345	L=53m/59m			
	接管 100X41X6 FLANGE	22	Q345D	0.6	13.2			
SA1~2 SV1~4	ASME B16.5-2020	法兰 1"-CLASS300 WN/RF Sch80 FLANGE	22	16Mn	1.82	40.04		
	接管 100X41X6 FLANGE	2	Q345R	51	102			
	接管 100X41X6 FLANGE	4	20	1.76	7.04			
	接管 100X41X6 FLANGE	112	30CrMoA	0.05	5.6			
HG/T20634-2009	接管 100X41X6 FLANGE	56	35CrMoA	0.2	11.2			
	接管 100X41X6 FLANGE	7	S31603	4.6	32.2			
	接管 100X41X6 FLANGE	7	S31603	4.6	32.2			
	接管 100X41X6 FLANGE	7	S31603	4.6	32.2			
HG/T20634-2009	接管 100X41X6 FLANGE	144	30CrMoA	0.101	14.6			
	接管 100X41X6 FLANGE	72	35CrMoA	0.38	27.36			
	接管 100X41X6 FLANGE	2	16Mn	0.38	27.36			
	接管 100X41X6 FLANGE	9	S31603	/	/			
JBK-R2501-04	接管 100X41X6 FLANGE	3	16Mn	0.38	27.36			
	接管 100X41X6 FLANGE	4	16Mn	0.38	27.36			
	接管 100X41X6 FLANGE	2	16Mn	0.38	27.36			
	接管 100X41X6 FLANGE	2	16Mn	0.38	27.36			
GB/T12459-2017	接管 100X41X6 FLANGE	8	S31603	0.2	1.6			
	接管 100X41X6 FLANGE	2	S31603	0.3	0.6			
	接管 100X41X6 FLANGE	1	S31603	6	C19			
	接管 100X41X6 FLANGE	8	S31603	4.9	39.2			
HG/T20634-2009	接管 100X41X6 FLANGE	1	S31603	6.3	C10			
	接管 100X41X6 FLANGE	80	30CrMoA	0.101	8.08			
	接管 100X41X6 FLANGE	40	35CrMoA	0.31	12.4			
	接管 100X41X6 FLANGE	10	S31603	3.7	37			
HG/T20634-2009	接管 100X41X6 FLANGE	10	S31603	/	/			
	接管 100X41X6 FLANGE	160	30CrMoA	0.177	28.3			
	接管 100X41X6 FLANGE	80	35CrMoA	0.612	49			
	接管 100X41X6 FLANGE	10	S31603	24.5	245			
JBK-R2501-05	接管 100X41X6 FLANGE	10	S31603	/	/			
	接管 100X41X6 FLANGE	10	S31603	/	/			
	接管 100X41X6 FLANGE	10	S31603	/	/			
	接管 100X41X6 FLANGE	10	S31603	/	/			
HG/T20634-2009	接管 100X41X6 FLANGE	9	16Mn	0.38	27.36			
	接管 100X41X6 FLANGE	1	16Mn	0.38	27.36			
	接管 100X41X6 FLANGE	1	16Mn	0.38	27.36			
	接管 100X41X6 FLANGE	1	16Mn	0.38	27.36			
JBK-R2501-04	接管 100X41X6 FLANGE	1	S30403	46				
	接管 100X41X6 FLANGE	1	S30403	10.3				
	接管 100X41X6 FLANGE	1	S30403	9.5				
	接管 100X41X6 FLANGE	2	S30403	2	4			
GB/T12459-2017	接管 100X41X6 FLANGE	1	S30403	9.5				
	接管 100X41X6 FLANGE	1	S30403	9.5				
	接管 100X41X6 FLANGE	1	S30403	9.5				
	接管 100X41X6 FLANGE	3	S31603	0.32	0.96			

D01	ASME B16.5-2020	接管 100X41X6 FLANGE	1	S31603III	8.17				
		接管 100X41X6 L=1195 INNER PIPE	1	S31603	18.5				
	GB/T12459-2017	接管 100X41X6 L=7.62 90EL FLANGE	1	S31603	2.8				
		接管 100X41X6 L=353 INNER PIPE	1	S31603	5.4				
	HG/T20634-2009	接管 M20 NUT	16	30CrMoA	0.101	1.616			
	HG/T20634-2009	接管 100X41X6 L=1195 FULL THREADED STUD	8	35CrMoA	0.4	3.2			
	ASME B16.5-2020	接管 100X41X6 L=7.62 90EL FLANGE	1	S31603III	16.4				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	2	S31603	0.8	1.6			
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	16MnIII接管S31603	21.5				
		接管 100X41X6 L=7.62 90EL FLANGE	1	S31603	0.45				
		接管 100X41X6 L=7.62 90EL FLANGE	2	S31603	0.23	0.46			
		接管 100X41X6 L=7.62 90EL FLANGE	1	S31603	1				
V01	HG/T20634-2009	接管 M20 NUT	16	30CrMoA	0.101	1.616			
	HG/T20634-2009	接管 100X41X6 L=1195 FULL THREADED STUD	8	35CrMoA	0.38	3.04			
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	接管件 ASSEMBLY	12.8				
	HG/T20633-2009	接管 100X41X6 L=7.62 90EL METALLIC RING JOINT GASKETS	1	S31603	1				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	16MnIII接管S31603	26				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	接管件 ASSEMBLY	2.36				
		接管 100X41X6 L=7.62 90EL FLANGE	2	Q235B	0.38	0.76			接管200 INTERVAL
		接管 100X41X6 L=7.62 90EL FLANGE	24	30CrMoA	0.3227	7.28			
		接管 100X41X6 L=7.62 90EL FLANGE	12	35CrMoA	1.3	15.6			
		HG/T20633-2009	接管 100X41X6 L=7.62 90EL METALLIC RING JOINT GASKETS	1	S31603	1			
N07	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	16MnIII接管S31603	66.5				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	16MnIII接管S31603	90				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	16MnIII接管S31603	57				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	16MnIII接管S31603	24				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	16MnIII接管S31603	50				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	16MnIII接管S31603	57				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	16MnIII接管S31603	26				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	S31603III	11.8				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	S31603	7				
		HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	16MnIII接管S31603	35			
N06	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	16MnIII接管S31603	37				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	16MnIII接管S31603	50				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	16MnIII接管S31603	57				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	16MnIII接管S31603	57				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	16MnIII接管S31603	44				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
		HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59			
N05	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
		HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59			
N04	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
		HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59			
N03	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
		HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59			
N02	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
		HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59			
N01	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
		HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59			
22	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
		HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59			
21	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
		HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59			
20	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
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	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
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	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
		HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59			
19	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
		HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59			
18	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				
	HG/T20634-2009	接管 100X41X6 L=7.62 90EL FLANGE	1	20	59				</