

 Tecnimont S.p.A.	 REPSOL POLIMEROS SA	4274_CONST 4274-ALBA PROJECT-PP AND PEL PLANTS	
MOD-ITP-XL_220 RELEASE OF SPOOLS FROM WORKSHOP Rev.1		Report n° IP-WSR-P-310-000012_MOD-ITP-XL_220 RFI Nr.: 325 Date :	
Unit -			
Plant Area -			
Isometric Number			
Inspection Package Number IP-WSR-P-310-000012 - IP Spool Release From Workshop			

Sheet 01/01

The Present Inspection Package contains the following Elements:

2211-VRG50A08-3-SP04;2211-VRG50A08-3-SP02;2211-VRG50A08-3-SP03;2211-VRG50A08-3-SP01;1121-HCM31015-7-SP01;1121-HCM24069-3-SP15;1121-HCM23060-1-SP02;1121-HCM23060-1-SP01;2211-VRG50A01-2-SP02;2211-VRG50A01-2-SP01;2121-VRG41B09-3-SP13;2121-VRG41B09-3-SP12;2121-VRG41B09-2-SP11;2121-VRG41B09-2-SP10;2121-ET40J06-1-SP02;2121-ET40J06-1-SP01;2121-ET40F05-4-SP07;2121-ET40F05-3-SP06;2121-ET40F05-3-SP05;2121-ET40F05-2-SP04;2121-ET40F05-1-SP03;2121-ET40F05-1-SP02;2121-ET40F05-1-SP01;2121-CWR40B02-8-SP10;2121-COM40A01-4-SP07;2121-COM40A01-2-SP02;1121-PR50010-2-SP06;1121-PR50010-2-SP05;1121-PR50010-2-SP04;2121-HXE10C36-1-SP04;2121-HXE10C36-1-SP03;2121-HXE10C36-1-SP02;2121-HXE10C36-1-SP01;2121-ET40S05-1-SP02;2121-ET40S05-1-SP01;1121-PR35013-2-SP06;1121-PR35013-2-SP05;1121-PR34024-1-SP01;1121-PR43040-1-SP01;1121-PR35019-1-SP03;1121-PR35019-1-SP02;1121-PR35019-1-SP01;1121-LS24013-1-SP01;1121-HCM24068-1-SP02;1121-HCM24068-1-SP01;1121-HCM24067-2-SP02;1121-HCM24067-2-SP01;1121-HCM24067-1-SP05;1121-HCM24067-1-SP04;1121-HCM24067-1-SP03;1121-ET40007-1-SP01;1121-CHWR21008-1-SP03;1121-BDL34018-2-SP04;1121-BDL34018-2-SP03;7111-ET20C01-6-SP12;7111-ET20C01-6-SP11;1111-PR24033-2-SP02;1111-PR24033-2-SP01

João Victor Pinto
 PIPING SUP. TEM
 Joaquim Pinto 30/10/2023

NOTES (*): 4274-XH-PQ-00000001

1) Painting cycle to be indicated.

2) Refer to: 4274-LZ-PC-00000214 (COMPANY 4001008GEN-PC-214) "Management of Site Metallic Welding Activities" and 4274-LZ-PC-00000215 (COMPANY 4001008GEN-PC-215) "Procedure for Traceability of Piping Material"

3) Refer to: 4274-XH-SG-00000003 (COMPANY 45-L-45-000-2-00-80005) "Specification for Piping Fabrication & Erection Amendment to EC-L-51.01 and EC-L-51.02" and 4274-XH-PQ-00000001 (COMPANY 45-L-45-000-2-00-80081) "Inspection and Test Plan for Steel Piping Works"

SGS
 reviewed by
 30/10/2023

TECNIMONT
 L.Gomes
 NWI
 30/10/2023

Signature

LEGEND OF CHECK RESULT	<input checked="" type="checkbox"/> Checked & NOT Accepted	<input checked="" type="checkbox"/> Checked & Accepted	N.A. Not Applicable	Y / N Punch List Produced
SUBCONTRACTOR	Date (DD-MMM-YYYY)	Name	Signature	
CONTRACTOR	30/10/2023	Joaquim Pinto	[Signature]	
COMPANY				
(Free)				

Sheet 01/01

2211-VRG50A08-3-SP04;2211-VRG50A08-3-SP02;2211-VRG50A08-3-SP03;2211-VRG50A08-3-SP01;1121-HCM31
015-7-SP01;1121-HCM24069-3-SP15;1121-HCM23060-1-SP02;1121-HCM23060-1-SP01;2211-VRG50A01-2-SP02;
2211-VRG50A01-2-SP01;1121-VRG41B09-3-SP13;1121-VRG41B09-3-SP12;1121-VRG41B09-2-SP11;1121-VRG4
1B09-2-SP10;1121-ET40J06-1-SP02;1121-ET40J06-1-SP01;1121-ET40F05-4-SP07;1121-ET40F05-3-SP06;1121-E
T40F05-3-SP05;1121-ET40F05-2-SP04;1121-ET40F05-1-SP03;1121-ET40F05-1-SP02;1121-ET40F05-1-SP01;1121
-CWR40B02-8-SP10;1121-COM40A01-4-SP07;1121-COM40A01-2-SP02;1121-PR50010-2-SP06;1121-PR50010-2
-SP05;1121-PR50010-2-SP04;1121-HXE10C36-1-SP04;1121-HXE10C36-1-SP03;1121-HXE10C36-1-SP02;1121-H
XE10C36-1-SP01;1121-ET40S05-1-SP02;1121-ET40S05-1-SP01;1121-PR35013-2-SP06;1121-PR35013-2-SP05;11
21-PR34024-1-SP01;1121-PR43040-1-SP01;1121-PR35019-1-SP03;1121-PR35019-1-SP02;1121-PR35019-1-SP01
;1121-LS24013-1-SP01;1121-HCM24068-1-SP02;1121-HCM24068-1-SP01;1121-HCM24067-2-SP02;1121-HCM240
67-2-SP01;1121-HCM24067-1-SP05;1121-HCM24067-1-SP04;1121-HCM24067-1-SP03;1121-ET40007-1-SP01;112
1-CHWR21008-1-SP03;1121-BDL34018-2-SP04;1121-BDL34018-2-SP03;1111-ET20C01-6-SP12;1111-ET20C01-6-
SP11;1111-PR24033-2-SP02;1111-PR24033-2-SP01.

[illegible]



JOAQUIM PINTO
30/10/2023

SGS
Reviewed by
Assessed by

TECNIMONT
L. Gomes
NWJ

R
W

JOAQUIM PINTO
PING-SOP
Joquin Pinto

LEGEND OF CHECK RESULT		<input checked="" type="checkbox"/> Checked & NOT Accepted	<input checked="" type="checkbox"/> Checked & Accepted	N.A. Not Applicable	Y / N	Punch List Produced
	Date [DD-MMM-YYYY]		Name			Signature
SUBCONTRACTOR	30/10/2023		Engr. S. A. Muneer			
CONTRACTOR	30/10/2023		Engr. S. A. Muneer			
COMPANY						
(Free)						

ISO Summary List

22635 / 1506

Page 1

Client **TECNIMONT/REPSOL**

Job # **22635**

% RT/UT

Local **Portugal**

Project **4274 ALBA-I007 Piping Fabrication**

% PT/MT

ISO # **2121-VRG41B09-3**

Revision **00**

Priority **6**

Piping Size/Class **4-1E21**

PED Category **II**
Assessment Inspection/Results

Spool	Weld#	Joint	Product Description	Seq. N.	Heat #	M.Certificate	FM-Dos	WPS	WeldDate/Stamp	VT	NDT-PT/MT	NDT-RT/UT	NDT-PMI/HT	NDT-PN	NDT-FT	Repair 1	Repair 2
01	12	S55	BW 4" 90 LR ELBOW ASME B16.9 A234-WPB BE S 4" PIPE - A106-B BE SMLS	341 19	17357 23211707	CE23001997_3.1.01 23310548	5-Varela PVX1312824	MW.20_BW	12/09/2023 S71	VT-I-024							
02	12	S56	BW 4" PIPE - A106-B BE SMLS 4" 90 LR ELBOW ASME B16.9 A234-WPB BE S	341 19	17357 23211707	CE23001997_3.1.01 23310548	5-Varela PVX1312824	MW.20_BW	12/09/2023 S71	VT-I-024							
03	12	S57	BW 4" 90 LR ELBOW ASME B16.9 A234-WPB BE S 4" PIPE - A106-B BE SMLS	341 19	17357 23211707	CE23001997_3.1.01 23310548	5-Varela PVX1312824	MW.20_BW	12/09/2023 S71	VT-I-024							
05	13	S59	BW 4" 90 LR ELBOW ASME B16.9 A234-WPB BE S 4" PIPE - A106-B BE SMLS	341 19	17357 23211707	CE23001997_3.1.01 23310548	5-Varela PVX1312824	MW.20_BW	12/09/2023 S71	VT-I-024							
06	13	S60	BW 4" PIPE - A106-B BE SMLS 4" 90 LR ELBOW ASME B16.9 A234-WPB BE S	341 19	17357 23211707	CE23001997_3.1.01 23310548	5-Varela PVX1312824	MW.20_BW	12/09/2023 S71	VT-I-024							
07	13	S61	BW 4" 90 LR ELBOW ASME B16.9 A234-WPB BE S 4" PIPE - A106-B BE SMLS	341 19	17357 23211707	CE23001997_3.1.01 23310548	5-Varela PVX1312824	MW.20_BW	12/09/2023 S71	VT-I-024		RT-RT-I-0118					
08	13	S62	BW 4" PIPE - A106-B BE SMLS 4x4" WN FLANGE ASME B16.5 300# A105N RF	37 19	07EE23 23211707	224997 23310548	5-Varela PVX1312824	MW.20_BW	12/09/2023 S71	VT-I-024							



Notes

BW-Butt Weld; FW-Fillet Weld; LW-Lap Weld; SW-Socket Weld; TBW-Tee Butt Weld
PT-Penetrant Test; MT-Magnetic Test; RT-Radiographic Test
UT-Ultrasonic Test; PMI-Positive Material Identification
HT-Hardness Test; PN-Pneumatic Test; FT-Ferrites Test

Remarks

APPROVED QC

Name: *Patricia Texeira*
Date: *25/10/2023*
Sign: *Patricia Texeira*

QC

APPROVED by Client

Name: *L. Gomes*
Date: *25/10/2023*
Sign: *L. Gomes*

APPROVED by 3rd party or AI

Name: *João Amaro*
Date: *30/10/2023*
Sign: *João Amaro*



LINE DATA				FLUID CODE: VRG				LINE NO. 4"-VRG-41B09-1E21 (CG)			
REV	DATE	REVISION DESCRIPTION	DRAWN UP	CHKD UP	APP'D	PIPING MATERIAL CLASS	INSULATION	WELD CLASS	HEAT TREATMENT	PAINTING CODE	P&ID No.
00	25-08-2023	ISSUED FOR CONSTRUCTION	TG	MW	TM	1E21	CG / 50	E	N	20	19-A-19-000-1-01-00001 sheet 53

Tecnimont		PIPING ISOMETRIC		IDENTIFICATION CODE			
PLANT: SINES INDUSTRIAL COMPLEX	CLIENT REF: REPSOL POLYMEROS	Job	4274	E C T N	XHDL	Area	2121
		UNIT	19	SHEET	3	REV	00
PIPING ASSEMBLY DRAWING	19-L-19-000-2-00-86197 sheet 1	PIPING SUPPORT SPECIFICATION	XH-SG-000000002	PIPING STANDARD SUPPORT SUMMARY	XH-LP-000000001		
PIPING ISOMETRIC LIST	XH-LD-212100001	PIPING TYPICAL INSTALLATIONS	XH-SL-000000002	WELDING SPECIFICATION	XH-SW-000000001		

BILL OF MATERIALS

PS NO	DESCRIPTION	NS (MM)	ITEM CODE	QTY.	HOLD
1	PIPE PIPE - A106-B BE SMLS T01AC03V02 S-STD <PIPA010B14STD> (L-7806)	4	I117953	9.4 M	
2	FITTINGS 90 LR ELBOW ASME B16.9 A234-WPB BE SMLS C01DC04V01 S-STD <90LA200F34STD> (L-7955)	4	I128635	4	
3	FLANGES WN FLANGE ASME B16.5 300# A105N RFFE BE 125 - 250 AARH F01CFC44BV05 S-STD <WNFA300R354STD> (L-236)	4	I4272446	1	

ERECTION MATERIALS

PS NO	DESCRIPTION	NS (MM)	ITEM CODE	QTY.	HOLD
4	GASKETS SPIRAL WOUND GASKET ASME B16.20 300# RFTBE 304/GRAFOIL CARBON STEEL SS 304 ASME B16.5 G03GFP11S12 <N/A> (N/A)	4	I63508975	2	
5	BOLTS STUD BOLTS&NUTS ASME B18.31.2/ B18.2.2 A193-B7/A194-2H INCH SIZE I010B0301 <SB2R51G3/441/2> - 2 NUTS PER BOLT - 115 mm Length	3/4	I53437466	8	
6	STUD BOLTS&NUTS ASME B18.31.2/ B18.2.2 A193-B7/A194-2H INCH SIZE I010B0301 <SB2R51G3/45> - 2 NUTS PER BOLT - 125 mm Length	3/4	I53437468	8	
7	VALVES / IN-LINE ITEMS GATE VALVE API 600 300# A216-WCB RFFE 8-F6&HF API 600 B7/2H 125 - 250 AARH BB-OS&Y FLXW API 600 HW ASME B16.5 V01FFC29B167 NREQD <G44L-130> (L-130)	4	I5606092	1	
8	SUPPORTS RESTING SHOE CLAMPED, COLD INS. -F2A1 H=150 L=300	4	107	1	
9	VERT. TRESTLES WELDED TO STR TR34 HEA100	4	87	1	
10	CLAMPED GUIDE, COLD INS. -F2G1 H=150 L=300	4	87	1	
11	CLAMPED GUIDE, COLD INS. -F2G1 H=150 L=300	4	86	1	
12	VERTICAL STAKES WELDED TO STR. ST48 HEA100	4	86	1	
13	VERTICAL STAKES WELDED TO STR. ST46 HEA100	4	293	1	
14	RESTING SHOE CLAMPED, COLD INS. -F2A1 H=150 L=300	4	293	1	

CUT LIST

PIECE NO	LENGTH (MM)	SIZE (IN)	WELD NO	WELD CAT.	SIZE (IN)	WELD TYPE	BOLT NO	FLANGE SIZE (IN)	SIZE (IN)	LENGTH (MM)
<1>	2061	4"	F54	F	4"	BW	BJ09	4"	3/4"	115
<2>	4811	4"	S55	S	4"	BW	BJ10	4"	3/4"	125
<3>	584	4"	S56	S	4"	BW				
<4>	1909	4"	S57	S	4"	BW				
			F58	F	4"	BW				
			S59	S	4"	BW				
			S60	S	4"	BW				
			S61	S	4"	BW				
			S62	S	4"	BW				

WELD LIST

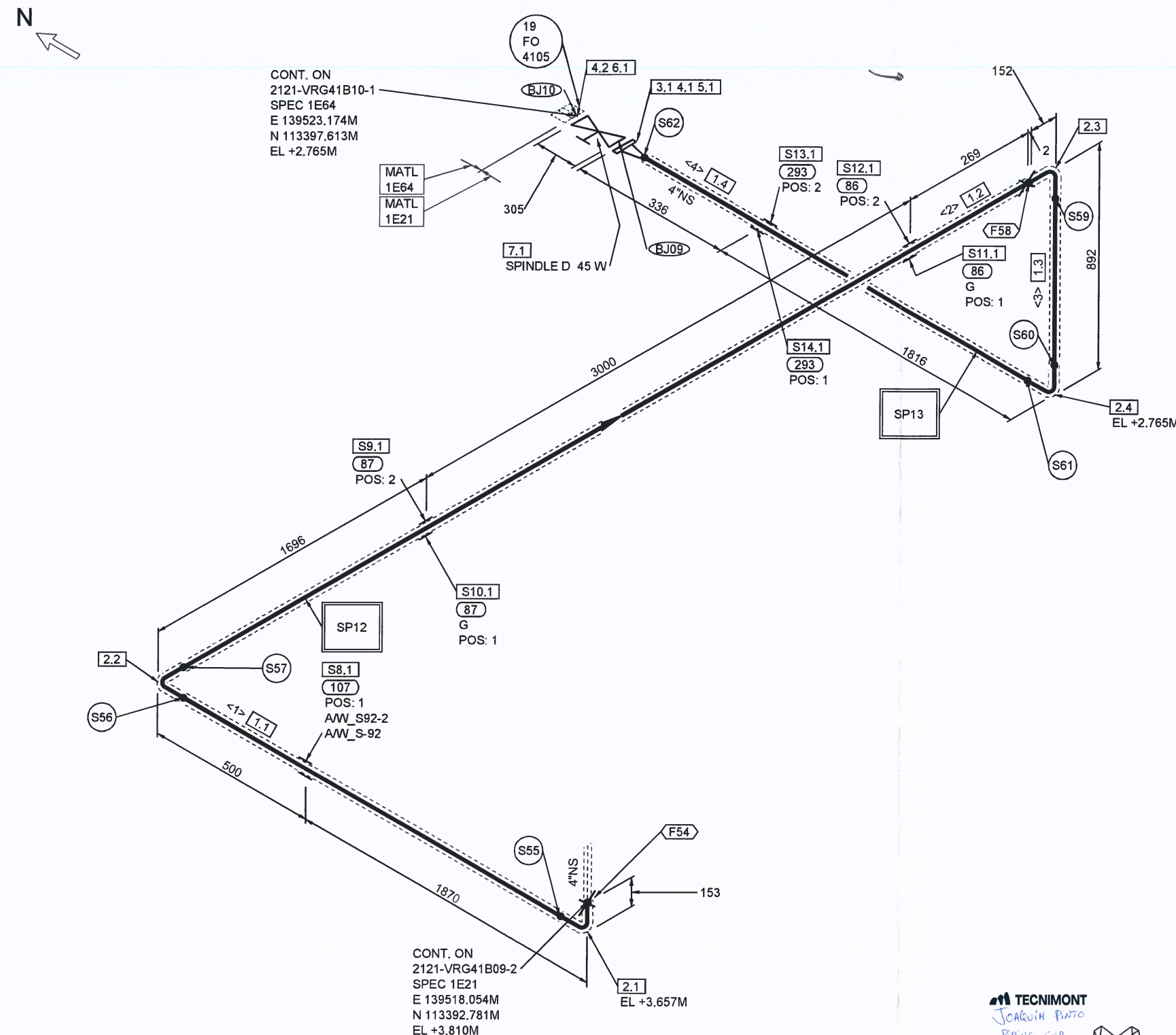
BOLT LIST

INCH METER

PIPE NS (IN)	CL LENGTH (M)
4	11.0

ISOMETRIC NO. 4274-SP-XH-DL-2121-VRG41B09-3-IS00

SPOOLING REV NO. 00



CONT. ON
2121-VRG41B10-1
SPEC 1E64
E 139523.174M
N 113397.613M
EL +2.765M

MATL
1E64
MATL
1E21

7.1
SPINDLE D 45 W


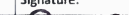
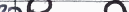
S9.1
(87)
POS: 2

S10.1
(87)
G
POS: 1

S8.1
(107)
POS: 1
A/W_S92-2
A/W_S92

CONT. ON
2121-VRG41B09-2
SPEC 1E21
E 139518.054M
N 113392.781M
EL +3.810M

TECNIMONT
JACQUIN RINTO
PIPING SUP
Joaquim Rinto
AS BUILT

 MECOWIDE <small>Quality - Performance - Reliability</small>	Prep.:	TG	PROC. NR:	PCL 22635	
	Status:	IFC	Date:	25-08-2023	Rev:
Dimensional:	Signature:				
Before Welding	11/9/2023 				
After Welding	12/9/2023 				
* Assinalate deviation in the drawings ("+" n" or "- n").					
Autocontrol (visual) registered in the Welder Production Sheet in the field of observations (Autocontrol OK)					

AUTHORISED FOR CONSTRUCTION

SIGNED FOR CONSTRUCTION IS SHOWN ON ISO LIST FOR RELEVANT PIPING AREA

LEGENDS

JOINT TYPE	HMET TYPE OF JOINT	JOINT TYPE	HMET TYPE OF JOINT	JOINT TYPE	HMET TYPE OF JOINT	JOINT TYPE	HMET TYPE OF JOINT
BW	G	SW	S	LET	LET	SOB	B
FW	S	SIB	B	LF	RF	SOF	S
LA	RF	SLW	S	MTW	M	THD	TH

1 DENOTES PARTS LIST NO
PIPE SUPPORT
A = RESTING SUPPORT G = GUIDE F = AXIAL RESTRAINT B = GUIDE + STOP M = SPRING
WHERE A WITHOUT NUMBERING IS INDICATED THIS MEANS THAT THERE IS A REST DIRECTLY ON STEEL STRUCTURE

PROJECT: LOW LINEAL DENSITY POLYETHYLENE (PEL) AND POLYPROPYLENE (PP)
FOR PROJECT - ALBA PROJECT