# 2.6 Outlet Facilities

1. Summary	· .			
DES	CRIPTION	UNIT	QUANTITY	LEGEND
	EXCAVATION	m <sup>3</sup>	2, 148. 2	
EXCAVATION	OVERBREAK	m <sup>3</sup>	121.9	5cm
	TOTAL	m <sup>3</sup>	2, 270. 0	
STEEL RIB	H-100x100x6x8	kg	26, 533. 0	
SUPPORT	PLATE(t=9)	kg	1,017.0	
	PLATE(t=16)	kg	3, 428. 3	
	BOLT NUT	11-15	516	
	COLLAR BRACE	kg	3, 793. 0	Φ16
	Total	kg	35, 287, 4	
	Total x 1.05	kg	37, 100. 0	
		· .,		
	STEEL PIPE	111.00	3, 096	Φ21. 7x1, 9×80
WI	re net	m <sup>2</sup>	2, 397. 7	Φ5x150x150 (2.13 kg/m2)
		(kg)	5, 107. 2	
		x1.05	5, 400. 0	
	IN GROUT		18	L=10.00m
and the second sec	ATION GROUT		48	L=5. 00m
ROCK BOLT	D22 L=1.50m		777	
	TOTAL	m	1, 166	
	TOTAL x 1.05	Ø	1, 200	
	OVERBREAKAGE	<sup>3</sup>	121.9	5cm
	SHOTCRETE	m <sup>3</sup>	234.4	10cm
SHOTCRETE	TOTAL	<sup>3</sup>	356.3	
	OVERBREAKAGE	m <sup>2</sup>	2, 464. 1	
	SHOTCRETE	m²	2, 403. 9	
	TOTAL	m <sup>2</sup>	4, 868. 0	
CONCRETE	OUTLET PROJECTION	m <sup>3</sup>	49.2	
	x 1.05		50.0	
FORM	OUTLET PROJECTION	m² i	83.5	
	FILLING CONCRETE	_m <sup>3</sup>	1, 313. 1	
PLUG	x 1.05	<sup>3</sup>	1, 400. 0	
	WATER STOP SEAL	al	7.4	

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SUBMARY	(Inclined	Intake	Structure)	).

	DESCRIPTION		UNIT	TOTAL	LEGEND
	Excavation	Total	[ D <sup>3</sup>	9, 295. 9	
	Excavation	x 1.1	3	10, 200. 0	· ·
	Concrete Type B	Total	n <sup>3</sup>	803.5	
	concrete Hibe D	x 1.05	<b>m</b> <sup>3</sup>	840.0	
Inclined Intake	I Concrete Ivne I.	Total .	m <sup>3</sup>	84.9	
Structure		x 1.05	m <sup>3</sup>	89.0	
	Reinforcing Bar	Total	kg	40.6	
	Kernitoreing Dar	x 1.06	kg	43.0	
	Excavated Slope	Total	5 <sup>2</sup>	2, 387. 0	
	Excavated STope	x 1.1	۵2	2, 620. 0	

#### 2. EXCAVATION

2-2.

2-1. EXCAVATION (TYPICAL SECTION)

vl	= 5.373×368.476		1, 979. 822 m <sup>3</sup>
v2 (OVERBREAK)	$= 0.310 \times 368.476$		114. 228 n <sup>3</sup>
EXCAVATION (PLUG SECT	10N)		

v1	$= 8.476 \times 19.044 + 1/2 (5.373 + 8.476) \times 1.000 =$	
v2 (OVERBREAK)	$= 0.381 \times 20.047$ $=$	
1		

2-3. EXCAVATION (TOTAL)

EXCAVATION $\Sigma Y = v1+v1 = 1,979.82 + 168.34$	= 2, 148. 163 m <sup>3</sup>
	a participation de la composicione d
OVERBREAK $\Sigma V = v2+v2 = 114.23 + 7.64$	= 121.866 m <sup>3</sup>

168.341 m<sup>3</sup> 7.638 m<sup>3</sup>

3. STEEL RIB SUPPORT

3-1. STEEL RIB SUPPORT (TYPICAL SECTION)

		<u> </u>	·····	isenti a distribu-		e de la sector de la	N=367. 470/1.	50=245
		ITEM	LENGTH	QUANTITIY	WHEIGHT/UNIT	WHEIGHT/m	EXTENSION	TOTAL REIGHT
		11-100x100x6x8 (kg)	2.955	2	17.2	101.652	245	24, 904. 740
		PL-155×180×9 (kg)		2	1.971	3.942	245	965, 790
	P	L-230×230×16 (kg)	-	2	6,644	13, 288	245	3, 255, 560
	1.1	BOLT NUT \$\$25	1	2			245	190
	- C0	LLAR BRACE $\Phi$ 16(kg)	1.576	6	1,58	14.940	245	3, 660, 418
	STE	EL PIPE <b>\$21.7×1.9</b>	0.080	12	-	-	245	2,940
L		WIRE NET (m <sup>2</sup> )	6.114	1		6. 114m <sup>2</sup>	367.470	2, 246. 712

3-2. STEEL RIB SUPPORT (PLUG SECTION)

-	and a second	1				N=20,047/1:50	)=13
	ITEM 1	LENGTH	QUANTITIY	WHEIGHT/UNIT	VHE1GHT/m	EXTENSION	TOTAL WEIGHT
	H-100x100x6x8 (kg)		2	17.2	125, 250	13	1, 628, 255
	PL-155×180×9(kg)		2	1.971	3, 942	13	51.246
	PL-230×230×16 (kg)	-	2	6.644	13.288	13	172.744
	BOLT NUT	0.07	2	· · · .		13	26
	COLLAR BRACE $\Phi 16 (kg)$	1.076	6	1.58	10.200	13	132,606
	STEEL PIPE Φ21.7×1.9	0.080	12			13	156
L	WIRE NET (n <sup>2</sup> )	7,534	1 1	s" . <b>–</b>	7, 534m <sup>2</sup>	20.047	151.034

3-3. STEEL RIB SUPPORT (TOTAL)

11EM	TYPICAL SECTION	PLUG SECTION	TOTAL WEIGHT
H-100x100x6x8 (kg)	24, 904, 740	1628.255	26, 532, 995
PL-155×180×9(kg)	965, 790	51, 246	1, 017, 036
PL-230×230×16 (kg)	3, 255, 560	172.744	3, 428, 304
BOLT NUT	490	26	516
COLLAR BRACE \$ 16 (kg)	3, 660, 418	132.606	3, 793, 024
STEEL PIPE \$21.7×1.9	2, 940. 000	156 Item 156	3.096
WIRE NET (m <sup>2</sup> )	2, 246. 712	151.034	

4. GROUTING

4-1. CURTAIN GROUT

L=10,00m

4-2. CONSOLIDATION GROUT

L=5.00m n=6×8

n

5. ROCK BOLT

12.22

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D22.	L=1.50m	n=8	n=3×388.523/1.500		=3×259	= 777
	с. 2	· · .	n an an Artan An Anna An Airteachtacht	<sup>2</sup>		
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### 5. SHOTCRETE

#### 5.1 TYPICAL SECTION

• •	$= 0.310 \times 368.476 \\= 0.596 \times 368.477$	· · · · · · · · · · · · · · · · · · ·		114. 228 m <sup>3</sup> 219. 612 m <sup>3</sup>
A1 (OVERBREAKAGE)	= 6. 269×368. 476		=	2, 309. 976 m <sup>2</sup>
A2 (SHOTCRETE)	= 6.114×368.477	· .	=	2, 252. 862 m <sup>2</sup>

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# 5.1 PLUG SECTION

		and the generation of the second s		
V1 (OVERBREAKAGE)	= 0.381×20.047		=	7.638 m <sup>3</sup>
V2 (SHOTCRETE)	= 0.738×20.047		_	14. 795 m <sup>3</sup>
A1 (OVERBREAKAGE)	$= 7.688 \times 20.047$	and the second sec		154. 121 m <sup>2</sup>
A2 (SHOTCRETE)	$= 7.534 \times 20.047$		· · · == .	151.034 m <sup>2</sup>
(a) An intervention of the second se second second sec	and the second	<ul> <li>A second sec second second sec</li></ul>	and the second	and the second se

### 5.1 TOTAL

	and the second		and the second	the second se		1 C C C C C C C C C C C C C C C C C C C
÷.,	OVERBREAKAGE	$\Sigma V = v1+v1$	= 114.23 +	7.64	· =	= 121.866 m <sup>3</sup>
	SHOTCRETE	$\Sigma V = v2 + v2$	= 219.61 +	14.80	-	= 234. 407 m <sup>3</sup>
					an an an an Arris. An an Arris	
	OVERBREAKAGE	$\Sigma A = v_1 + v_1$	= 2, 309, 98	+ 154.12	=	= 2,464.097 m <sup>2</sup>
	SHOTCRETE	$\Sigma A = v2+v2$	= 2, 252. 86	+ 151.03		= 2, 403. 896 m <sup>2</sup>
÷.,				· ·		

## 7. CONCRETE (OUTLET PROJECTION)

$V_1 = 4.471 \times 5.012 = 22.4$				
	V1	$= 4.471 \times 5.012$	· · · · · ·	= 22.409 m <sup>3</sup>

### 8. FORM (OUTLET PROJECTION)

. '	- 11	18 A	1.1.1		1.5	· · · ·	
	A1		1. + L.	$= 6.780 \times 5.012 + 4.471 \times 2$		. = .	42.923 m <sup>2</sup>
		1.1	· · · · ·				13

9. PLUG 9-1. CONCRETE = 117.776 m<sup>3</sup>  $= 5.875 \times 20.047$ 9-2 FORM Al 17.625 m²  $= 5.875 \times 3$ = 9-3. WATER STOP SEAL L1 7.380 m  $= 7.38 \times 1$ 2 - 126

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YPE OF WORK : Production and Construction of concrete (Type OCATION : Inclined Intake Structure	<b>B</b> )
CALCULATION	RESULT
(Between EL+110.00m and EL+130.00m)	
$A_1 = 0.70 \times 3.90 - (0.55 \times 0.25) \times 2 = 2.455 m^2$	
$A_2 = 1.60 \times 0.95 - (0.90 \times 0.40) = 1.160 \text{ m}^2$	
$A_3 = \sqrt{2} \times (4.95 + 3.90) \times 1.050 - (0.60 \times 0.30) \times 2$	
$-\frac{16}{4} \times 0.20^2$ = 4.255 m <sup>2</sup>	
$A_4 = A_1 + A_2 \times 2 + A_3 = 9.030 \text{ m}^2$	· · · · · · · · · · · · · · · · · · ·
$V_1 = A_{4,x} (24, 377 - 1.00) = 211,094 \text{ m}^3$	
$A_5 = 0.70 \times 3.90 - (3.40 \times 0.25) = 1.880 \text{ m}^2$	
$A_6 = 0.55 \times 1.050$ = 0.578 m <sup>2</sup>	
$Aq = A_5 + A_6 \times 2 + A_2 \times 2 = 5.356 \text{ m}^2$	
$V_2 = A_7 \times 1.90 + A_4 \times 0.50 = 14.691 m^3$	
$V_{3} = \frac{1}{2} \times (EL + 114.666 - EL + 110.000) \times 3.100 \times 3.900$ $- \frac{\pi}{4} \times 1.40^{2} \times 1.470$	
$= 25.943 \text{ m}^3$	
V4 = 1/6 x 3.00 x 1.800 x (2 x /2 x (6.70 + 3.10) + 6.70 x 2	
$= 29.700 \text{ m}^3$	
$V_{S} = \frac{1}{2} \times 1.240 \times 3.00 \times (17.50 + 3.90) \times \frac{1}{2} = 10.602 \text{ m}^{3}$	
Vo = 1/2 × (3.941 + 1.200) × 3.350 × 3.900 - (1.40 × 0.60	
$\times 2.800) + \frac{1}{2} \times (-0.858 \times 1.200) \times 3.900 - \frac{1}{2} \times (0.957)$	
$\pm 0.600) \times 0.50 \times 3.40$ = 3).916 m <sup>3</sup>	
$\Sigma V = V_1 + \sim + V_6 =$	323.946 m
	323,140 m
(Between FL+130.00 and EL+152.00)	
$A_{1} = \{2.30 \times 0.95 - (0.55 \times 0.40 + 0.90 \times 0.90)\} \times 2 = 3.210 \text{ m}^{2}$	
$A_2 = \frac{1}{2} \times (3.90 + 4.95) \times 1.050 - \frac{1}{2} 4 \times 0.20^2 = 4.615 \text{ m}^2$	
$V_1 = (A_1 + A_2) \times .37.85 = 296.176 \text{ m}^3$	
$V_2 = (A_1 + A_2) \times \frac{1}{2} \times (1.376 + 4.450) = 22.794 \text{ m}^3$	and an
$\forall V \in V_1 + V_2$	318,970 m
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CALCULATION For the first of the second seco	RESULT
(Operation Deck)	
$V_1 = 0.60 \times 11.700 \times 6.20$ = 43.524 m <sup>3</sup>	
$V_2 = -0.60 \times 3.780 \times 0.60$ = -1.361 m <sup>3</sup>	
V3 = 1/2 × (0.656 + 0.369) ×0.10 ×2 + 0.30×0.56 × 0.60 × 2	
$= -0.325 \text{ m}^3$	
$V_{4} = - \{\frac{1}{2} \times (0.656 \pm 0.369) \times 0.10 \times 2 \pm 0.30 \times 0.56\} \times 1.82$	
$= -0.492 \text{ m}^3$	8
$V_5 = \frac{1}{2} \times (6.194 + 7.571) \times 0.80 \times 6.20 = 34.137 \text{ m}$	3
V6 = 1/2 × (10.168 + 9.774) × 3.60 × 0.60 × 2 = 43.075 m <sup>3</sup>	<u></u>
$V_{1} = 0.80 \times 10.03) \times 6.20 = 49.754 m^{-3}$	3
$V_8 = -(0.9/4 + 0.430) \times 0.80 \times 0.55 \times 2 = -1.18.3 \text{ m}^3$	a the second
$V_{9} = -0.914 \times 0.80 \times 2.00 = -1.462 \mathrm{m}^{3}$	
$\frac{1}{10} = -(0.63) + 0.745 + 0.6881 \times 0.80 \times 0.40 \times 2 = -1.321 \text{ m}^3$	
$f_{11} = -1.344 \times 0.80 \times 2.00 = -2.150 \text{ m}^3$	
$1/2 = -0.40 \times 0.40 \times 6.194 \times 2 = -1.982 \text{ m}^3$	and an the same with the
/13 - 1/2 × 0.210 × 0.294 × 0.60 × 14 = 0.259 m <sup>3</sup>	2 <u></u>
$1_{14} = \frac{1}{2} \times 0.60 \times 0.210 \times 2.80 = 0.176 \text{ m}^3$	
$V_{15} = \frac{1}{2} \times (0.210 \pm 0.219) \times 0.294 \times 0.60 \times 5 = 0.189 \text{ m}^3$	
$h_{16} = -\frac{\pi}{4} \times 0.20^2 \times 7.566 = -0.238 \text{ m}^3$	
	an Anna an Anna Anna Anna Anna Anna
$\Xi V = V_1 + 2 + V_{16}$	
707AL =	803.516
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CALCULATION	RESULT
(Upstream portal of Diversion Hacility)	
$V_1 = 0.40 \times 6.10 \times 0.60 \times 2 = 2.928 \text{ m}^3$	
$V_2 = 0.50 \times 6.10 \times 0.60 \times 2 = .3.660 \text{ m}^3$	-
$\frac{1}{1} = 1.522 \times 0.60 \times 0.40 \times 2 = 0.73 \text{ m}^3$	
$V_4 = 0.50 \times 5.60 \times 0.40$ = 1.120 m <sup>3</sup>	
$V_{s} = 0.60 \times 5.60 \times 0.40 = 1.344 \text{ m}^{3}$	
$\Sigma V = V_1 + \gamma + V_S = $	9.78.3 m <sup>3</sup>
(Inclined Intake Structure)	
$V_1 = 0.55 \times 0.25 \times 23.877 \times 2 = 6.566 \text{ m}^3$	-
$V_2 = 0.25 \times 3.40 \times 0.50$ = 0.425 m <sup>3</sup>	
$V_3 = \frac{1}{2} \times (0.60 + 0.957) \times 0.50 \times 3.40 = 1.323 \text{ m}^3$	
$V_4 = 0.40 \times 0.40 \times (24.377 + 1.40) \times 2 = 8.249 \text{ m}^3$	
V5 = (0.60 × 0.30 + 0.10×0.40) × (24.3 m) + 1.400) × 2 = 11.342 m	3
$/6 = 1.050 \times 1.00 \times 2.000 = 2.100 \text{ m}^3$	
$I_q = 0.60 \times 1.50 \times 2.000 = 1.800 \text{ m}^3$	
18= 0.55 x 0.40 x (37.85) x 2 = 16.654 m3	
$1_9 = 0.40 \times 0.40 \times (37.85 + 4.690) \times 2 = 13.613 \text{ m}^3$	
$I_{10} = (0.60 \times 0.30 + 0.10 \times 0.40) \times (37.85 + 4.690) \times 2 = 18.718 \text{ m}^3$	
$I_{\rm II} = 0.25 \times 0.25 \times 3.10$ = 0.194 m <sup>3</sup>	
/12 = 0.40 × 0.40 × 6.194 × 2 = 1.982 m <sup>3</sup>	
13 = 0.983 × 0.25 × 0.55 × 2 = 0.270 m <sup>3</sup>	
$/_{14} = (0.63) \pm 0.745 \pm 0.688) \times 0.40 \times 2 = 1.651 \text{ m}^3$	
	84.887 m
$\frac{XV + V}{2} + \frac{V}{4}$	
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TYPE OF WORK : Production and Construction of concrete (Type C)

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CALCULATION	a na na n	RESULT
(Between EL+130,00 and EL+ 152,00m)		······································
(Formwork)		
A1 = 2.30 × 37.85 × 4	.348.22 m <sup>2</sup>	· · · · · · · · · · · · · · · · · · ·
A2 = 1/2 × 2.30 × 1.690 × 4 =	21,57 m <sup>2</sup>	· · · · · · · · · · · · · · · · · · ·
A3 = 0.95 × 37.85 × 2 =	71,92 m²	
A4 = 0.40 × (37.85 + 1.960) × 2 =	31.85 m²	
A5 = 2.80 × (37.85 + 3.640) =	116.17 m²	
$XA = A_{1+} \sim +A_{5}$	2 <b>2</b> 4	589.73 m
(Scaffolding)		
$A_1 = 348.22 \text{ m}^2$		348.22m
(supporting)		
VI = 0.40 × 0.40 × (37.85 + 3.640) × 2	an de la companya de La companya de la comp	
		-
(Operation Deck)		
A1 = 10.168 × 5.00 - (0.656 × 0.60 × 2 + 0.63	6x 1.820)	
	= : 48.86 m²	
$A_2 = 0.60 \times 6.20 \times 2$	$= 7.44 \mathrm{m}^2$	
A3= 11.70 × 0.60 × 2	$= 14.04 \text{ m}^2$	
A4 = 1/2 × (10,168 + 9,774) × 3.60 × 4	= 143,58 m <sup>2</sup>	
$A5 = \frac{1}{2} \times (b.194 + 7.571) \times 0.60 \times 2$	<u>= 8.26 m²</u>	
$As = \frac{1}{2} \times (b.194 + 7.571) \times 0.60 \times 2$ As = 0.80 × 10.030 × 2	$= 8.26 m^2$ $= 16.05 m^2$	
그는 그는 물건을 다 가슴을 걸려 가슴에 집에 가슴을 가슴을 가지 않는 것이 가지 않는 것이 같아.	<ul> <li>The effective result of the optimal</li> </ul>	
A6 = 0.80 × 10.030 × 2	= 16.05 m <sup>2</sup>	
A6 = 0.80 × 10.030 × 2 A7 = 0.80 × 6.20	$= 16.05 \text{ m}^2$ $= 4.96 \text{ m}^2$	
$A6 = 0.80 \times 10.030 \times 2$ $A7 = 0.80 \times 6.20$ $A8 = 6.194 \times 0.40 \times 2 \times 2$	$= \frac{16.05 \text{ m}^2}{4.96 \text{ m}^2}$ $= \frac{4.96 \text{ m}^2}{9.91 \text{ m}^2}$	
$A6 = 0.80 \times 10.030 \times 2$ $A7 = 0.80 \times 6.20$ $A8 = 6.194 \times 0.40 \times 2 \times 2$ $A9 = 6.194 \times 5.00$	$= \frac{16.05 \text{ m}^2}{4.96 \text{ m}^2}$ $= \frac{4.96 \text{ m}^2}{9.97 \text{ m}^2}$ $= \frac{30.97 \text{ m}^2}{1000000000000000000000000000000000000$	
$A_{6} = 0.80 \times 10.030 \times 2$ $A_{7} = 0.80 \times 6.20$ $A_{8} = 6.194 \times 0.40 \times 2 \times 2$ $A_{9} = 6.194 \times 5.00$ $A_{10} = 0.30 \times 1.032 \times 6$	$= 16.05 \text{ m}^{2}$ $= 4.96 \text{ m}^{2}$ $= 9.97 \text{ m}^{2}$ $= 30.97 \text{ m}^{2}$ $= 1.86 \text{ m}^{2}$	
$A_{6} = 0.80 \times 10.030 \times 2$ $A_{7} = 0.80 \times 6.20$ $A_{8} = 6.194 \times 0.40 \times 2 \times 2$ $A_{9} = 6.194 \times 5.00$ $A_{10} = 0.30 \times 1.032 \times 6$ $A_{11} = 1.032 \times 0.60 \times 2 \times 2$	$= .16.05 \text{ m}^{2}$ $= .4.96 \text{ m}^{2}$ $= .9.91 \text{ m}^{2}$ $= .30.91 \text{ m}^{2}$ $= .1.86 \text{ m}^{2}$ $= .2.48 \text{ m}^{2}$	
$A_{6} = 0.80 \times 10.030 \times 2$ $A_{7} = 0.80 \times 6.20$ $A_{8} = 6.194 \times 0.40 \times 2 \times 2$ $A_{9} = 6.194 \times 5.00$ $A_{10} = 0.30 \times 1.032 \times 6$ $A_{11} = 1.032 \times 0.60 \times 2 \times 2$ $A_{12} = 1.032 \times 1.820$	$= .16.05 \text{ m}^{2}$ $= .4.96 \text{ m}^{2}$ $= .9.97 \text{ m}^{2}$ $= .30.97 \text{ m}^{2}$ $= .7.86 \text{ m}^{2}$ $= .7.48 \text{ m}^{2}$ $= .7.88 \text{ m}^{2}$	
$A_{6} = 0.80 \times 10.030 \times 2$ $A_{7} = 0.80 \times 6.20$ $A_{8} = 6.194 \times 0.40 \times 2 \times 2$ $A_{9} = 6.194 \times 5.00$ $A_{10} = 0.30 \times 1.032 \times 6$ $A_{10} = 1.032 \times 0.60 \times 2 \times 2$ $A_{12} = 1.032 \times 1.820$ $A_{13} = (0.914 \pm 0.430) \times 0.80 \times 2$	$= .16.05 \text{ m}^{2}$ $= .4.96 \text{ m}^{2}$ $= .9.91 \text{ m}^{2}$ $= .30.97 \text{ m}^{2}$ $= .1.86 \text{ m}^{2}$ $= .2.48 \text{ m}^{2}$ $= .1.88 \text{ m}^{2}$	

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$\frac{2}{2} \sum_{n=1}^{\infty} \sum_{i=1}^{n} \sum_{i=1}^$	TYPE OF WORK :		
$ \begin{array}{c} \square \left[ 1 \\ \square \left[$			RESULT
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	A18 = 1.150 × 7.544 × 2	= 17.35 m <sup>2</sup>	
$\frac{2}{2} \sum_{n=1}^{\infty} \sum_{i=1}^{n} \sum_{i=1}^$		= 10, 42 m <sup>2</sup>	
$ \frac{1}{A_{1}} = \frac{1}{2 \times (11.151 + 10.031) \times 4.40 \times 2} = 93.20 \text{ m}^{2}} $ $ \frac{A_{2}}{A_{2}} = \frac{1}{2 \times (10.168 + 9.17(4.) \times 3.60 \times 2} = 71.79 \text{ m}^{2}} $ $ \frac{1}{2 \times (10.168 + 9.17(4.) \times 3.60 \times 5.02) = 179.48 \text{ m}^{3}} $ $ \frac{1}{2 \times (10.168 + 9.17(4.) \times 3.60 \times 5.02) = 179.48 \text{ m}^{3}} $ $ \frac{1}{2 \times (10.168 + 9.17(4.) \times 3.60 \times 5.02) = 179.48 \text{ m}^{3}} $ $ \frac{1}{2 \times (10.168 \times 10.03 \times 1.150 \times 2) = 82.63 \text{ m}^{3}} $ $ \frac{1}{2 \times 2.467 \times 1.762 \times 3.902} \times 8.48 \text{ m}^{3}} $ $ \frac{1}{2 \times 1.48 \times 10.163 \times 1.162 \times 3.902} = 270.59 $	$\overline{A} = A_1 + \sqrt{A_1 + A_1}$		336.58
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	(Scattolding)		
$SA = A_1 + A_2$ (Supporting) $V_1 = \frac{1}{2} \times (10.168 \pm 9.7714) \times 3.60 \times 5.00$ $= \frac{179.48 \text{ m}^3}{179.48 \text{ m}^3}$ $V_2 = \frac{1}{2} \times 7.164 \times 10.03 \times 1.150 \times 2$ $= 8.48 \text{ m}^3$ $= 270.59$			
$\frac{2}{\sqrt{2}} = \frac{1}{\sqrt{2}} \times \frac{1}{\sqrt{2}} = \frac{1}{\sqrt{2}} \times 1$	$A_2 = \frac{1}{2} \times \frac{10.165 + 1.11(4.) \times 3.60}{2} = \frac{1}{2}$		
$V_{1} = \frac{1}{2 \times (10.168 \pm 9.774) \times 3.60 \times 5.00} = 179.48 \text{ m}^{3}}{179.48 \text{ m}^{3}}$ $V_{2} = \frac{1}{2 \times 2.467 \times 1.762 \times 3.900} = 8.48 \text{ m}^{3}}{2.70.59}$ $= \frac{1}{2} \sqrt{1 \pm \sqrt{2} \pm \sqrt{159 \times 2.467 \times 1.762 \times 3.900}} = 270.59$	$\Sigma A = A_1 + A_2$	3	<u>    164.99 m</u> 
$\frac{V_{2}}{V_{3}} = \frac{V_{2}}{V_{2}} \frac{V_{164} \times 10.03 \times 1150 \times 2}{1.762 \times 3.902} = 82.63 \text{ m}^{3}}{8.48 \text{ m}^{3}}$ $= \frac{1}{3} V = V_{1} + V_{2} + V_{3}$ $= \frac{1}{270.59}$	(Supporting)		
$\frac{V_3 - V_6 \times 2.4611 \times 1.762 \times 3.900}{3.00} = 8.48 \text{ m}^3$	V1= 1/2 × (10.168 + 9.774) × 3.60 × 5.00	= 179.48 m <sup>3</sup>	
$\frac{270.59}{270.59}$		<u>82.63 m3</u>	in an ann an Airtean Tha ann an Airtean
		8.48 m <sup>3</sup>	
	$\frac{1}{2}V = V_1 + V_2 + V_3$		270.59
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TYPE OF WORK : LOCATION : Inclined Intake Structure		
CALCULATION	,	RESUL
(Between EL + 110,00 to EL + 130,00)		<u> </u>
(Formwork)		· · · · · · · · · · · · · · · · · · ·
$A_1 = 2.30 \times (24.3777 + 1.40) \times 2$	$= 118.57 \text{ m}^2$	
$A_2 = 1.90 \times (24.377) \times 2$	$= \frac{92.63 \text{ m}^2}{122.63 \text{ m}^2}$	
$A_3 = (3.90 + 2.00) \times 24.377$	= <u>143.82 m<sup>2</sup></u>	
A4 = 0.40 × 24.377 × 2	$\Rightarrow 19.50 \text{ m}^2$	<u> </u>
As = 0.25 × 24.3717 × 4	$= 24.377 \text{ m}^2$	
A6 = 7.80 × 23,377 + 1.050 × 2.80	$= 68.40 \text{ m}^2$	
A7 = 3.25 × 1.40 × 3	$= 13.65 m^2$	
$A_8 = (1.40 \pm 0.60 \times 2) \times 2.80$	$= 7.28 \text{ m}^2$	
$A_{1} = \frac{1}{2} \times (1.20 + 2.629) \times 2.00 \times 2$	$= 7.66 \text{ m}^2$	<u></u>
$A_{10} = 2.00 \times 3.90$	$= 7.80 \text{ m}^2$	7 747 - 44 
$A_{\rm H} = 0.25 \times 3.40$	$= 0.85 \mathrm{m}^2$	
A12 = (1.40 + 1.05 + 1.40) x 2.80	= 10.78 m <sup>2</sup>	
$\overline{A} - A_1 + 2 + A_{12}$	 	_515.32
(Scaffolding)		
$A_1 = 1/8.57 m^2$		
$A_{2} = 7.66 \text{ m}^2$		
$A_3 = 3.25 \times 2.80 \times 2 = 18.20 \text{ m}^2$		· · · · · · · · · · · · · · · · · · ·
$A_3 = 2.00 \times 3.90 = 7.80 \text{ m}^2$		
$A_4 = 3.35 \times 3.90 = 13.07 \text{ m}^2$		· · · · · ·
$\Delta A = A + 2 + A + 2 + A + 2 + 2 + 2 + 2 + 2 +$		165.3
(Supporting)	an a	
<u>Supporting</u>		
V = (2.00 × 0.70 + 2.80 × 0.90) × 24.377		95,56
n de 1996 de la composition de la compo La composition de la c		
e se de la serve de la constante de la serve de la constante de la serve de la serve de la serve de la serve d La serve desta de la serve d		
a leng ber gerigte stelle gerigte gelegen in der eine sind der der der eine stelle sind der eine sind der der The stelle st	and and a second se	
		et in territoria.

### Inclined Intake Structure

Excavation	·		- , 3	
Elevation		Area (m <sup>2</sup> )	an an the second second	Volume
(m)	Area 1	Area 2	Total	(m <sup>3</sup> )
157.0	162.642		162.642	
155.0			154.021	316.7
150.0			136,288	725.8
145.0	214.630	<u> </u>	214.630	877.3
140.0			283.078	1,244.3
135.5		43.543	271.656	1,248.2
135.5			228.113	0.0
135.0			229.650	114.4
130.0	273.616	<u> </u>	273.616	1,258.2
128.0		46.137	273.737	547.4
128.0			227.600	0.0
125.0			227.117	682.1
120.5	176.470	39.282	215.752	996.5
120.5	176.470		176.470	0.0
120.0		Sec. 1. Company	178.929	88.8
115.0		a presidente d'Artica.	155.616	836.4
113.0		79.920	124.140	279.8
113.0	44.220	and a second product of the second	44.220	0.0
110.0			9.300	80.3
110.0	0.000		0.000	0.0
Total		de la sectore	and the second second	9,295.9
Total x 1.1		<u> </u>	and the Albert States	10,200.0

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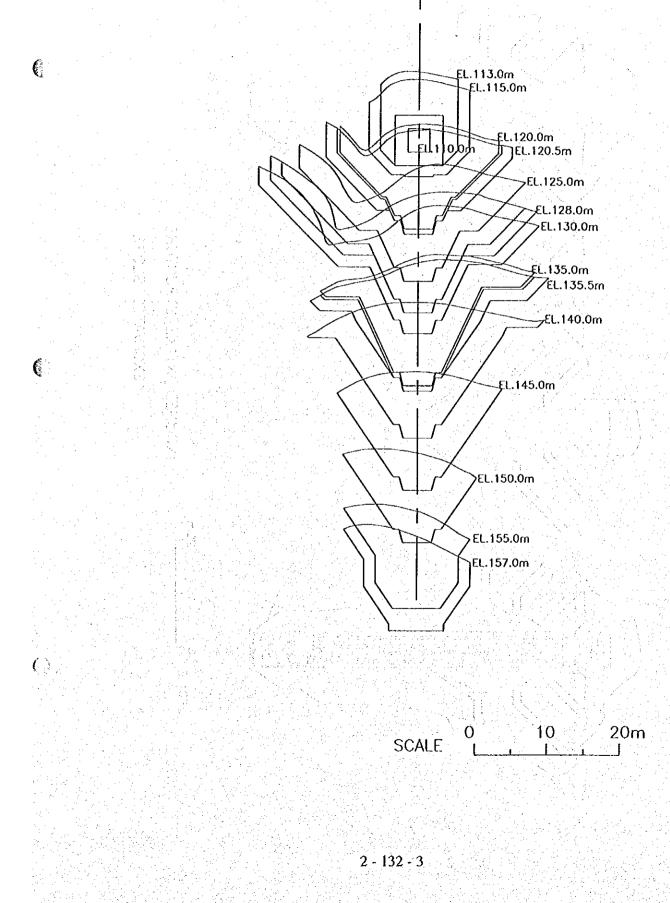
8

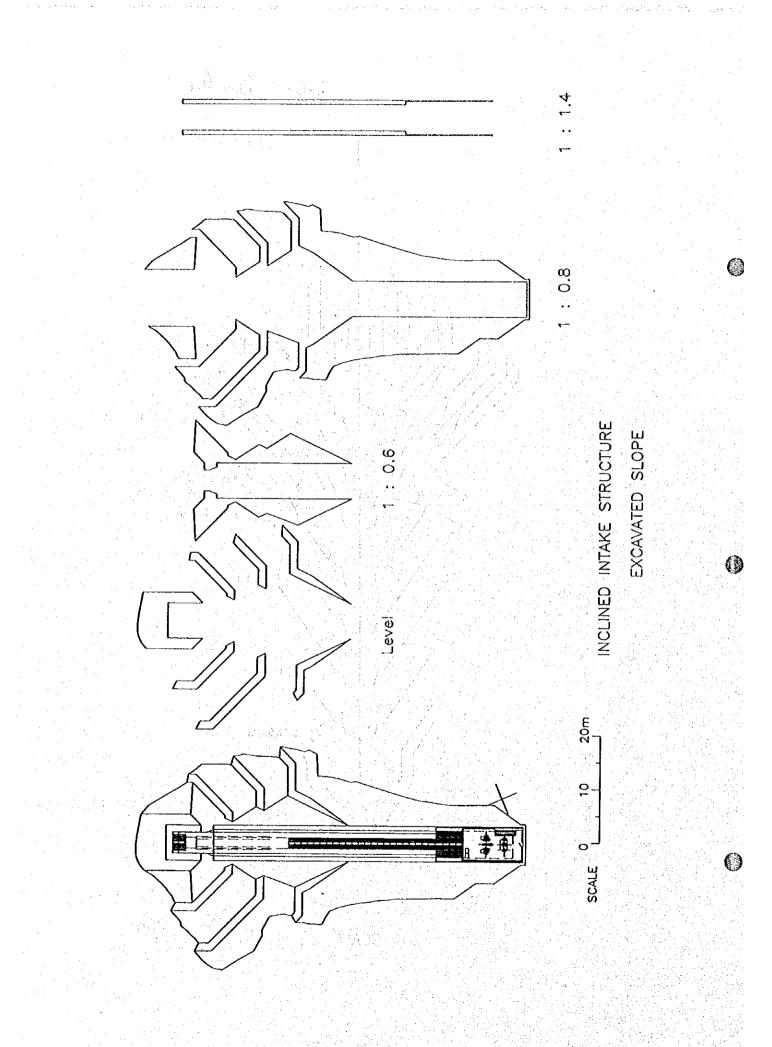
Excavated Slope

	1:0.6	1:0.8	1:1.4	Level	total
	(m2)	(m2)	(m2)	(m2)	total
	96.96	32.39	38,56	79.92	
<u>, di settori i</u>	100.69	98.82	38.56	21.63	
		107.38		29.33	a se stare
		503.99	Alexandra et al al anti-	18.47	
		55.27		17.65	
		68.08		16.82	
		34.31	an an the state of	25.08	
a service de Espe		<ul> <li>A provide the second sec</li></ul>	and the group		
Total	197.65	900.24	77.12	208.90	an an the formation
			and an application		
x slope	384	1,441	95	467	
2 - X					
Total(x 1.1)	420	1,590	100	510	2,620

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Intake Structure Excavation





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# 2.7 Steel Structure

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1 1 1 1		Steel	Material	Machine	Sub-total		nting	Acid
ITEX	NEWE	Material	• • • • • • • • • •	single unit			Paint	
		(kg)	(kg)	(kg)	<u>(kg)</u>	(m')	<u>(nł)</u>	<u>(m)</u>
BULK HEAD GATE		3334	139		3473	0.0	45.6	3.
	Gate guide	19314	208	0	19522	468.5	44.3	39.
	lloist	7178	992	689	8858	2.4	92.2	0.
a da	<u>1 Gate Total</u>	29826	1339	688	31853	470.9	182.1	42.
EVERGENCY GATE	Gate Leaf	1639	51	0	1690	0.0	27.8	1
	Lifting Beam	428	4	0	432	0.0	9.5	0
	Gate guide	10902	6	<u> </u>	10908	258.4	26.7	18.
	lloist	7512	987	504	9003	2, 4	105.4	0
	l Gate Total	20481	1048	501	22033	260.8	169.4	21
Trash Rack		14993	61	0	15057	0.0	477.2	0
STEEL PENSTOCK	Outlet pipe	140483	0	0	140483	2115.7	1833.7	0
	Installation stand	102417	5756	0		3574.8		0
물 활동 동	Total	242900	5756	0	248656	5690.5	1833. 7	0
DUT LET	Control Gate	5697	247	650	6594	8.4	39.7	0
STRUCTURES	Guard Gate	5121	266	650	6037	8.2	34.8	0
( ð 650)	Auxiliary Facilities	1444	70	845	2359	32.8	0.0	0
	Installation stand	335	19	0	354	13.8	0.0	0
	ĩotal	12597	602	2145	15344	63.2		1
DUT LET	Control Gate	829	30	217	1076			0
STRUCTURES	Guard Gate	802	642	217	1661	0.5	7, 8	• 0
( ð 250)	Auxiliary Facilities	756	13	285	1054	27.8	0.0	0
	Installation stand	235	13	0	248	9.5	0.0	0
	Total	2622	698	719	4039	38.4	19.7	0.
Operating Stand		4192	30	0	4222	0.0		0.
	Gate Leaf	17207	126	0	17333			6
	Gate guide	3121	12	0	3133	58.4		7.
	i Gate Total	20328	138	- 0	20466	58.4	262.8	13.
Electrical Equ				2020	531			
stootiicai Equ	tody installation	Tel Maria		2760				
Total		347939	9675	6076	000001	6582.2	01/0 /	80.

Total Quantity of Gate

(1/3)	Arca(m <sup>-</sup> )	Acid		Γ	Γ					Γ			Ī	ſ			Γ	0.3	0			Γ	0.2	0.2	0	0.2	0.4	0.4	ſ		T	0.5				
	Painting Are	nting	S. 10.S.	6 2	V	3.5		5.2		8	0	0.4		60 1		2.7	9	 } ; ; ; ;			0.1	0.1							6.0		0.2			0.3		
	Pair	Pair	S 1 1	L																																
	Weight(kg)	A		435	62	122	158	183	62	311	4	14	53	113	36	555	392	71	2.2		3	2	12	19	10	10	17	19	20	31	, LU	87	62	28		
	Weig	Unit																											•							
		המוורד רא		1-1	*	3	ġ	3	4	2	с С	<i>ф</i>	1	5	57	× 00	8	16	ô	4	4	4	1	2	1	1	5	1	28	4	4	12	12	4		
		3											-	-												_		-								
	Dimensions(mm)	X Length		2200	00	055)	000	055)	1800	800			00	200	00					0	c	50)	00	50	00	00	750	00		80			— ¢ 150)	- ¢ 166)		
	Dimen	Shape		$14 \times 1800 \times 2200$	$14 \times 90 \times 2000$	$9 \times (122 \times 2055)$	$14 \times 120 \times 2000$	$9 \times (422 \times 2055)$	$1 \times 100 \times 1$	$45 \times 272 \times 1800$	$9 \times 70 \times 265$	$9 \times 70 \times 305$	$9 \times 442 \times 1700$	$16 \times 282 \times 1700$	$9 \times 160 \times 1700$	$\phi 100 \times 70$	$0.00 \times 500$	$12 \times 50 \times 180$	$16 \times 6.170$	$12 \times 50 \times 100$	$9 \times 100 \times 120$	$9 \times (100 \times 150$	70 X	$10 \times 70 \times 1750$	$20 \times 30 \times 2000$	<b>UN</b>	$12 \times 50 \times 17$	$12 \times 95 \times 2100$	50×6×310	$12 \times 120 \times 680$	$150\Lambda \times 60$	$\phi$ 350 × 120	Ф) Х	$22 \times (\phi 280$		
				Ы	- Id	- Jl	i.	- 1d	- J.	- PI,	id.	Ъ1.	Pl.	Ъ.	PL	RB	RB	PI,	, Id	نډ	ic.	5	tر ال	رہ	Ъľ.	٦ ۲	2	Ъľ,	FB	Pl,	Pipe	RB	· t	دډ		
	Material	4 Par 4 7 7 7 10		SS400	SS400	SS400	SS400	SS400	SS400	SM400C	SS400	SS400	SS400	SS400	SS400	SSW-QLS	SCM435	SUS304	SUS304	CAC603	SS400	SS400	SUS304	SUS304	SUS304	SUS304	SUS304	SUS304	SS400	SS400	SGP	SUS304	SUS304	SS400		
l.caf)	Itom				·lange	Wcb	Flange	Yeb ·	lange	ſch -	beam Flange	sub beam Flange	sub beam Web		beam Web				ite	-	- 2					2				sher	Pipe.	valve				
BULK HEAD GATE (Gate Leaf)			Gate Leaf	Skin Plate	Main Girder Flange	Main Girder W	Main Girder F	Main Girder Web	Side Girder Flange	Side Girder Web	1	_1		Vertical sub	Vertical sub beam	Main Wheel	Wheel pin	Kcy Platc	Shaft End-Plate	Side Shoe	Bracket			E	Scal guide	Scal clamp bar		Scal clamp har	Trash rack bar	Trash rack Washer	Water filling pipe	Water filling valve	Bcllmouth	Flange		
BULK HI	No.																																		Ī	

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BULK HEAD GATE (Gate

N N		Naroria)	1 San 1 San 1	Dimensions (mm)		v Weig	Weight(kg)	Painting Arca(m <sup>2</sup> )	'ca (m <sup>2</sup> )
	A second management of the			Shape X Length	אחמוורד רא	Unit	n Min	Painting	Acid
								1. S. 1 0. S.	
	Rod cover	SGP	Pipe	65A × 700	2		10	0.3	ľ
	[Flange	SS400	PL	$12 \times (\phi 250 - \phi 76.3)$	2		30	0.2	
	Blind plate	SS400	PL	12×φ250	2	:	6		
	Rod	SS400	RB	$  \phi 40 \times 1750$	2		34	0.4	
	Head plate	SS400	t -	$60 \times 100 \times 200$	2		161	0.21	ſ
	Rod pin	S45C	RB	¢ 50 × 150	2		ιÓ		
	Bearing	SS400	RB	( \$ 80 - \$ 56) × 70	V		9	0.1	
	Bearing	SS400	٦d	12×( d 200- d 60)	7		11	0.2	
	Rib	SS400	٦ď	× 70.	8			. P	
	Lifting beam	SS400		$200 \times 80 \times 7$ , $5 \times 2000$	2		186	3.0	
	Pîn	S45C	RB	·	2		4		
	Bracket	SS400	7d	$12 \times 200 \times 600$	1		451		
	Bracket	SS400	Ы	12×300×600	V I		189	V 1	Ī
	Bracket base	SS400	Ы	$12 \times 300 \times 400$	3		26	0.61	T
	Reinforcement	SS400	1d	9×250×500	4		35	10	
	Rib	SS400	ЪГ	9×75×178	œ		8	0.21	ſ
	Lubricating Unit	SUS304	RB	$\phi 10 \times (t=1, 0) \times 5000$	5		4		ľ
-	Lubricating Unit	SS400	PL	12	I set		20	0.4	
	Lubricating Unit	SS400	12	61	I set		151		
	Lubricating Unit	SS400	PL.	3.2	-1 set		2 C	0.4	
				Sub Total			3334	45.61	3.0
-									
	· · · ·								
-									T

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No. Item	Material			Quantity -	Weight (kg)	t (kg)	Paint	Painting Arca(m <sup>2</sup> )	a (m²)
			Shape X Length		Unit	Ŵ	Painting	ing	Acid
Elbow	SGP	15(	50A 90° F(S)	ſ			1. S.	0. S.	
Bush	Oilless	#20	SP ( \$ 15	100		32		-	
Bush	0illess	#2(	$56 - \phi 11) \times$	4				+-	
	[0i]]css	#2(	φ 68 <del>–</del>	2		9			
Scal Nuber	Synthetic	è	type X	1		22			
	57	[1]	Flat	1		ŝ			
Sont Windows Parts	SUS304		3/8° nipple, connector, elbow	l set	-	101		}	
DCAL TASNET	SUS304+Synthetic	rubbe		80	0.012				
1001	SII5304	91W		80	0.203	16.			
1 IOU	502304	M20		32	0. 296	ດີ			
BOLT .	SUS304	M20	M20×80 N. SW	32	0. 3451	11	┢		
Bolt	SUS304	1M16		40	0.1711	12			
Bolt	SUS304	M12	M12×60 N	1001	0.0851	6			
FIZEN BOLT	SUS304	MIZ		161	0.082		<u> </u>		
		:  -	Sub Total			139			
			Coto 1 200						
			VALCE LEAL JOLAL			3473	0	45.6	3.0
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			Dimensions (mm)		Wei	Weight(kg)	Painting A	Area (m <sup>*</sup> )
MOMMENT INTO A CONTRACT OF A C	Material		Shape X Length	Quantity	Unit	M	Painting	Acid
Sill beam				2			1. S. 1 0. S.	
Rail	SS400	)	$300 \times 90 \times 9 \times 2300$	0		175	4	
Rail	SS400	Н	$200 \times 200 \times 8/12 \times 1000$	21		100	2.4	
Seal Plate	SUS304	٦d	$12 \times 150 \times 2600$			37		0.4
Cover Plate	SS400	٦J	$12 \times 450 \times 2600$			110	1.2 1.2	
Cover Plate	SS400	ld	$12 \times 300 \times 350$	2		20	o	
Rib	SS400	ld	$9 \times 300 \times 300$	2		32	6	
Installation beam	SS400	- 7	75×75×9×600	2		30		
Installation beam	SS400	- T -	75×75×9×300	7		12		
Installation beam	SS400	RB	16×250 M16	23		6		
Anchor bar	SD295A	C	16×400	23		71		
Lintel beam								
Rail	SS400	·	200×90×8×2300			102	1.7	
Scal Plate	SUS304	<b>,</b>	$13 \times 150 \times 2000$	1		31		0.3
Cover Plate	SS400	7,1	$12 \times (1021 \times 2024)$	<b>-</b>		178	1.91 1.9	
Sub beam	SS400	1	$100 \times 100 \times 12 \times 2300$	-		34	ò	
Rib :	SS/100	Ъ	$9 \times 90 \times 120$	20		15		
Installation beam	SD295A	D	$16 \times 300$	10		Ω۱		
Installation beam	SD295A	Ω	$16 \times 400$	10		9	0. 2.	
1	-							
	SS400	Ы.	$22 \times 150 \times 1950$	ν		202	2.3	
	SS/100	ЪГ	$19 \times 256 \times 1950$	2		149	2.0	
Wheel track	1 SUS304N2	4	$13 \times 200 \times 1950$	2		80		0.8
Cover Plate	SS400	PL	$12 \times (1078 \times 1950)$	2		292	3.1 3.1	
lRib	SS400	ЪГ	9 × 300 × 400	10		85	7	
Installation beam	SS/100	SIN	16×250 M16	-010		7	0. 1	
Anchor bar	SD295A	D	$16 \times 400$	01		9	0.2	
Joint plate	SS400	Πď	$ 12 \times 100 \times 256$	30		19		
Side guide (Front rail)								
Front rail	SS400	£	: 150 X 6	2		72	2.3	
Front rail	SUS304	1	75×75×9×1950	2		39	1.2	
Wheel track	SUS304	٦L	$120 \times 19$	2		37		0.5
Bearing Plate	SS400	Ъľ	10×50×1950	2		15		
lkib	CODESS	ic.	002 X 001 X 6	101			× <	

BULK II	Bill.K IIFAD GATE (Gate guide)						•		(2/3)	
No.		Watorial		Dimensions (mm)	+	Weight (kg)	ht (kg)	Painting	Area (m <sup>*</sup> )	
				Shape X Length	אחפוורז רא	llnit		Painting	Acid	
								1. S. 10. S.		
	Installation beam	SS400		75×75×9×150	01		121	7		
	Installation beam	SS400	RB	16×250 M16	20		œ	0.31		
	Anchor bar	SD295A	Ð	$16 \times 400$	20		12	0.41		
	Joint plate	SS400	, PI,	$ 12 \times 100 \times 141$	80 		11	0.2		
	Side guide (Sub rail)									
	Main Rail	SS400	Н	$194 \times 150 \times 6/9 \times 65714$	2		4022	129.1		
	Wheel track	SUS304	PI,	$10 \times 100 \times 65714$	7		1.042		13.1	
	Joint plate	SS400	ЪГ	12×100×176	08		133	2.8		1
	[Installation beam	SS400	1	75×75×9×300	264		1682			
	Installation beam	SS400	RB.	16×250 M16	792	 	313			
	Anchor bar	SD295A	Q	16×400	792		1941	15.9		
	Side guide(Sub front rail)									
	Rail	SS400	CL.	$150 \times 150 \times 6$ , $5/9 \times 65108$	2		2396	78.1		
	Rail	SS400	1 .	75×75×9×65108	2		1297	39.1		
• :	Wheel track	SS400	PI,	$10 \times 120 \times 65108$	2		1239		15.6	
	Bcaring Plate	SS400	Ы	$10 \times 50 \times 165108$	2		516			j e e
	Rib	SUS304	٦I	9×100×200	264		373	10.6		
		SS400	Jd	12×100×141	80		106	2.3		
		SS400	L -	75×75×9×200	264		526	15.8		
	Installation beam	SS400	RB	16×250 M16	792		313	10.0		
	Anchor bar	SD295A	<u>م</u>	16×400	792		191	15.9		
	Inspection stand									
	Ratil	SS400	H.	$150 \times 150 \times 7/10 \times 3000$	5		187	ιċ	4	
	Rail	SS400	H	$150 \times 150 \times 7/10 \times 3500$	2		2181		0	
	Post	SS400	H	$150 \times 150 \times 7/10 \times 900$	11		392	11	3	
	Beam	SS400	æ	$150 \times 150 \times 7/10 \times 850$	4		106	с: 		
	Beam	SS400	H	$150 \times 150 \times 7/10 \times 400$	2		25	0	4	
	Всал	SS400	=	$150 \times 150 \times 7/10 \times 433$	9		81	2.3		
	lRib	SS400	PL	12×71, 5×130	56		461			
	Side roller rail	SS400	L.	$75 \times 75 \times 9 \times 3500$	2	 	102	2		
	Sub bcam	SS400	ľ	75×75×9×1200	2		24		-	
	Sub heam	SS400	-1	75×75×9×800	2		16/		5	
	Gusset	SS400	Id	$9 \times 200 \times 200$	80		23		<u>e</u>	
			-					1	,	

BULK III	BUIX, NEAD GATE (Gate guide)				· · · · · · · · · · · · · · · · · · ·	-	-	·		(3/3)
CN-	i para por la companya di Argonica di MANA 🔒 🔒 como na como di Manama marco di Manama di Manam	Watonia]		Dimensions (mm)	·····	Weig	Weight(kg)	Paint	Painting Arca(m <sup>2</sup> )	24 (m <sup>-</sup> )
		-	a tra a star a s	Shape X Length	אַמטורדרא	Unit	M.	Painting	ing '	Acid
								L. S.	0. S.	
	Wheel track	SUS304	PL	$10 \times 100 \times 3000$	2		48			0.6
and the second second	Boaring Plate	SUS304	PL	$10 \times 100 \times 3500$	2		56			0.7
and the second	Bcaring Plate	SUS304	Ъl	$10 \times 50 \times 3500$	5		28			0. 1
	Anchor Pad	004SS	14	$16 \times 250 \times 250$	20		157	1.3	1.3	
	Stiffener	SS400	FB.	65×9×230	20		21	0.6		
	Stiffener	SS400	9.: 1	65×9×230	10		32	6.0	F	ſ
	Anchor	SD295A	ດ	$16 \times 300$	80		37	1.2		ľ
	Liner plate	SS400	Jd	12×100×130	40		49		0.1	
	fliner plate	- SS400	Jd	$12 \times 100 \times 100$	20		191		0.4	1
	Gate resting device	SS400	Sec. Sec.		1 set		1001		<b> </b>	ſ
	-Air pipe									
	Air pipe	SGP	Pipe	150A × 450			8	0.5		
		SGP	Pipe	150A X 4700000			1386			
		SGP	Pipe	150A 90° E(L)	4		28	0.5		T
	the state of the state of the	SS400	. FB	90 X 6 X 269	18		55	2.3		ľ
	Installation beam	SS400	-1	75×75×9×300	36		108			
s i i ser en en en										
				Sub Total			19314	468.5	44.3	39.1
									<b>}</b> _	
a strength of the		ALL								
	Side guide (Sub front rail)									
2	Bolt	SUS304		M16×60 N	176	0.158	58			
	Nut	- SUS304		M16	3274		111			
	Gate resting device									
	Bolt, Nut			N16×70 N	32	0.174	9			
1 · · · · · · · ·	Air Pipe		4							
	Ubolt	SS400		for 150A. A type, MIG	36		34			
	Anchor-bolt	SS400		M16×170	72		26			
	Anchor setter	glass		AP16	72		3			
									~	
				Sub Total		<b>-</b>	208			
				Gate guide Total			19522	168.5	11.3	39.1

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Drum Shell Side plate			Anna Canal Canada Canad		Weight (kg)	Painting Ar	Area (m <sup>-</sup> )
Drum Shell Side blate	Tet 105 pm		Shape X 1 cout h	Quantity 11-14		- I - '	
Shell  Side plate			X	2100		intin	Acid
[Side plate	SMADOC	t.	40×1800×3016	F		1. S. 0. S.	
	VO04MS	٦L	32×(41300-4880)			. 1	
Side plate	SM400A	id -	(01200-0	, ,			
Shaft End-Plate	SM400A	Ŀ	( \$ 1200 - <del>5</del>	2	11/21	2 2 2	
Rib	VOOLMS	Ē	1	- 4	177	2.0	
Fastening plate	SS400	4		0 4			
Boss	S25C	E	( \$ 100- \$ 220) X 750	6	01	0.2	
Rope stopper	S25C	+-	55 × 120 × 125		1/2/1		
Bush	CAC603	E E Z	( \$ 220- \$ 100) Y 950	·		i c	
Drum gcar			(M=12 7=118 P=120)		17.7	T	
Rim	SCM35	Ц Ц	( ~ 1440 - × 1344) ~ 100				
Web	SCWA 10		95 × ( ± 1944 - ± 400)		148	0.8	
Rib	SCW10	, e	2012 \ \ \ 1.341 - \ \ 4.00 \		293	2.7	
Fastening plate	SCW10		20 00 04 12	6	37	0.9	
Ross Blate			J X 180	6	12		
Bush recent and a second	014410	20	400-0	1	172		
Pinion coar	COLUMN S	-	06	1	22		
Drum shaft	NECEN I	80	(MELL, CELL, BEL30)		44	0.1	
Key Plate	SCADO F	20	0130×2400		534	1.4	
Pinion nin	CAEPAN -		10 × 60 × 250	4	8	0.1	
Bcaring (2 nieces)	N-DC-N	2	Ø 1.10 × 685	1	51	0.3	
	Nelve			2	1201		
	rycons	ž	( \$ 130 - \$ 100) X 160	-2	11		
				-			
		T					
			-				
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		GATE (Gate zuide)
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BULK H	BULK HEAD GATE (Gate guide)					- - -		· .	(5/2)
N		Matarial		Dimensions (mm)		Wci	Weight(kg)	Painting	Painting Arca (m <sup>*</sup> )
	a and another states of the second states of the second states of the second states of the second states of the			Shape X Length		Unit	8 - 1 - 1 - 1 - 1 - 1 - 1 - 1 - 1 - 1 -	Painting	Acid
1	(a) approximate the second se Second second sec			÷				1. S. 1 0.	-
	Drum-Bracket	SS400	ЪГ	$22 \times (750 \times 1000)$	63		207		2.4
	Drum Bracket	SM100A	t	$20(PL25) \times 200 \times 1050$	2		99		. F
	Drum Bracket	SM400A	t	$20 (PL25) \times 200 \times 1100$	5		69		
المراجعة ويتعاده والمراجع المراجع	Drum-Bracket	- SS400	Jd	$12 \times 180 \times 750$	4		212		
2. At size there is	DrumBracket	SS400	Jd	$12 \times 100 \times 600$	22		11		0.2
Annual Contraction	DrumBracket	SS400	Ιd	$12 \times 180 \times 800$	V		54		2
	Drum Bracket	SS400	ЪГ	11××400×400	~		35		0.6
	- Drum-Bracket	SS400	t	14 (Pl.19) × (400 × 400)	~1		35		0.6
	- Drum-Bracket	SS400	٦L	12×96×374	16		541		
	Bcaring Stand	SM400A	t.	$20(Pl.25) \times 160 \times 410$	24		21		0.3
	Bearing Stand	SS400	- Id	$12 \times 170 \times 410$	~		13		0.3
	Bearing Stand	SS400	Jd	$12 \times 65 \times 170$	8		8		0.2
	Brake Stand	SS400	دډ	10 (PL12) ×85 × 430	2		9		0.1
	Brake Stand	SS400	٦d	$12 \times 350 \times 450$			15		0.3
the Angle of the State	Brake Stand	SS400	- Jd -	12×98×450	01		8	-	0.2
The theory works with the	Brake Stand	SS400	٦d	12 × 98 × 400	2		12	~	0.2
	Brake Stand	- SS400	2	$12 \times 90 \times 173$	5		9	-	0. 1
	Motor Stand	SS400	د.	$10 \times 80 \times 280$	1 2		15		
	Motor Stand		7	$12 \times 310 \times 360$	1		111	5	0.2
	Motor Stand	SS400	ľď	$12 \times 138 \times 450$	2		12	-	0.2
	Motor Stand	SS400	J	$12 \times 138 \times 410$	57		11		0.2
	Position indicator stand	SS400	Ы	$12 \times 400 \times 400$			15		
	Position indicator stand	SS400		65×65×6×150	2		21	-	0.1
	Xoq	SS400		65×65×6×400	2		5	-	0.21
-	llimit switch box stand	SS400	-	65×65×6×200	2		2		
	Emergency opening device								
	Rod	SUS304	RB	♦ 25 × 1300	• •		ſĊ		0
	Thrust	SUS304	RB	¢ 50 × 200			3		0
	Guide	SUS304	l	$30 \times (\phi 80 - \phi 27)$	2		2		0.1
	Guido	SUS304TPA	Pipe	80A (Sch40) × 400	1		9		0.2
	Bracket	SS400	ld	$12 \times 180 \times 250$	1		v	0	1.
	Bracket	SS400	તે	$6 \times 80 \times 250$	1				
	lßracket	SS400	ž	6×50×220	1		1		

BULK HEAD GATE (Gate guide)

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111 Y. 171	BULA HEAD GATE (Gate guide)			-					(3/5)	<u>.</u>
-		- 1		Dimensions (mm)		Weight (kg)	t (kg)	Painting	g Arca (m <sup>2</sup> )	<u>.</u>
<b>5</b> 24	1. CCII	TRIIDIRM		Shape × Length	vuanci cy -	Unit	M	Painting	t Acid	- <del>-</del>
								I.S. 0.		Ē
		SS400	Pi.	$12 \times 220 \times 240$	1		5		0.1	
	Control Stand	SS400	- PI.	$12 \times 220 \times 240$	1	_	5		0. 1(	
	Control Stand	SS400	H	200×200×8/12×680	1		34		0.8	
	ē	SS400	Ы	9×85×300	2		4		0.1	
		· SS400	Ы	2.3×2.5m	2		06	1		<b>[</b>
	Gear cover	SS400	1	$50 \times 50 \times 6 \times 100$	91		28		0.8	
	Chain cover	SS400	Ъľ	2.3×0.4 <i>m</i>	2	-	20			
the second of the second of the	Chain cover	SS400	1	50×50×6×200	4		4		0. 1	<b>[</b>
	Oil catch	SS400	Id	2.3×2.5 m	2		06	1	0.0	, ,
	0il catch	SS400	1	50×50×6×1600	4		28	-	1.3	
	Oil catch	SS400	1	50×50×6×850	4		15		0.7	
the second second second	llanger	SS400	-PL	$22 \times 300 \times 380$	16		315		3.6	<b>[</b>
	lloist flame									Γ
	Main girder	SS400 <sup>-</sup>	H H	$400 \times 200 \times 8/13 \times 3380$	2		442	•	0.8	<b>r</b>
	Main girder	SS400	H-	100×200×8/13×2000	4		523	-	2.8	
	Sub flame	SS400	]	$250 \times 90 \times 9/13 \times 2360$	1		82	-	2.0	<b></b>
	Sub flamc	SS400		250×90×9/13×350	8		26		2.4	
	Sub-flame	SS400		250×90×9/13×500	1		17		0.4	
	Rib	SS400	٦	PL12×96×374	12		41		0.9	
	Anchor Pad	SS400	Ŀ	$16 \times 200 \times 200$	12		60	1.0		ľ
	Anchor	SD295A	D	16×150	18		11	0.4		<b>_</b>
	Liner	SS400	د	$100 \times 100 \times 200$	12		188	10 -1		
										<b>[</b>
				Sub Total			7178	2.4 9	92.2	0.5
										,
										<b>–</b>
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BULK HEAD GATE (Gate guide)

(4/5)

DULN DEAD V	DULA DEAL VALLE VORLE KULUES								
		Worksula	Dig	Dimensions (mm)	Duantity	4C18	Weight (kg)	Fainting Area(m)	rca (m /
			Sha	Shape X Length		- Unit -	M.	Painting	Acid
								l. S.   0. S.	
Motor	1 Martin M Martin Martin Ma Martin Martin Ma Martin Martin Martin Martin Martin Martin Martin Martin Mar		1.5kw,	6P, 50Hz	1		53		
			080-496	6 i=1/500			550		
	www.wollimit.switch-Box warm		MD233		1		30		
Gate	Gate Position Indicator		D-12-011X18	-1S-	1		50		
				Sub Total			683	-	
	1:							-	
Brake			I-1/SMB	316UPS	-1		601		
	Chain coupling		CR-5016-	6-J	2		2	-	
Gear	Gear-coupling		KSS-280	0	1 · · · · ·		116		
Limi	Limit switch	-	Direct	Direct moving type	<b>I</b>		10		
Limi	Limit switch		Roller	hand type	3	-	ĉ		
Cha	Chain-sprocket		RS40	T D	2		6		
Chai	Chain sprocket	A CONTRACTOR OF A	RS40	$1^{\circ} = 18$					
Roll	Roller chain		RS40	160 rink	1			<del>.</del>	
Rol 1	Rollerchain	· · · · · ·	RS40	100 rink	1		<b>*-4</b>		
Wire	Wire-Rope	$31S(6 \times 37)$	→ 20 ×	140m G type	1		202		
Rope	s socket	-	101 ¢	¢ 20	1		Ŷ	Ţ	
Pin			for $\phi$	20	1		÷		
Tool	l box				- I set		25		
Name	Name plate(operation)	White acryle	t=5.0	mm	1 1		Ī		
Name	Name plate	C2801P			1		1		
Inbr	Inbricating Oil		1		-  -1 set		330		
Hand	Hand pomp		MP-113	3 3 ]	2	-	02		
Dist	Distributing Valve		VS32		5	-	5		
Dist	Distributing Valve		VS33		ν.		x	-	
Dist	Distributing Valve		VS34		2		מו		
1 · χ.	Y. type strainer		3/8		*		~		
011	Oil pack		SGP-104	04			12		
I'ubi	Lubricating parts		High pi	High pressure screwed union 3/8	8 34		<b>:0</b> : :	-	-
			High p	pressure screwed tee 3/8	-				-
			High p	High pressure screwed elbow 3/S					
			High p	High pressure screwed clbow 3/8	8			_	-
			A NACE AND A DESCRIPTION OF AN						

-																																	•			
(5/5)	CA (m <sup>2</sup> )	Acid			ſ									Γ				T				ľ	Ţ	ſ						ľ						0.5
	Painting Arca(m <sup>2</sup> )	Painting -	1 0. S.															-																		4 92.2
	ВЧ	P <sub>3</sub>	I.S.			5	-1	1		1	-	ī	1-1	 	 		<b> </b>	7		271	21	0		7	5			ĩ			 	20		2		3 2.4
	Weight(kg)	a an William									-						1			2				1		ſ						0	-	992		8853
	Weig	·Unit							-															:							}					
		Auguricy		10	24	101	24	16	19	66	35	12	121	125	12		-	9	9	00	œ	000 1	4	10	4	4	7	4	4	4	24	24				
	Dimensions (mm)	Shape X Length		High pressure plug 3/8	nipple	High pressure long nipple 3/8	Pipe joint $ ilde{0}$ 20X1/4						Tube clump 3/8×2P	screw bolt M	+ screw bolt M8×30	-		φ 29 × 160 with N. SW	t h N	with N.	with N.	with N,	with N.	with N,	\$20×90 with N. SW	0×60 with	MIO×60 with N, SW	2×45 with N,	M12×60 with N, SW	0×60 with N,	2×60	M24 × 150 N2		Sub Total		Hoist Total
	Vatorio!	- 191 101					SUS304	SUS304	SUS304	-			-	4T				·· S15C						SS400	S45C	SS400	SS400	SS400	SS400	SS400	SS400	SS400				
BULK NEAD GATE(Gate guide)				llubrication parts													Bolt, Nut	Reamer bolt	Bolt	Bolt	Bolt	Bolt	Knock pin	Bolt	Knock pin	Boll the second s	[3o] t	Bolt	Bolton managements and a	Bolt	Bo] t	Bolts and the second seco				
BULK II	с <mark>У</mark>																												2							

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(1/1)	Area (m <sup>-</sup> )	Acid		6	0	1	7	7			0.2	0.2	0.2	0.2		0.2	•	8		31		0.1	9		8.1.8							 5 1.8
	Painting	Painting	S. 1 0. S	∞ 					1					-				0	0	0	-			~~	27.		-				 	 27.8
		M		560	505	158	251	196	51	181	18	181	13	101	191	11	21	36	ົນ	25	4	5	44	_	1639		77	15.		9	51	 1, 690
	Weight (kg)	Unit				-																						0.187	0.012	0. 142		 
		Augura Ly			4		9	9	2	9	2	2			23	1	1	4	7	8	8	21	4					80	80	44		
	Dimensions (mm)	Shape X Length		PL 16×1650×2700	[ 300×90×12/16×2600	[ 300 × 90 × 12/16 × 1630	PL 9×100×595	PL  9×291×775	t 35×50×1630	t 45×50×150	t [10×70×1630	t 10×70×1630		PL 20×30×2300	0L 12×50×1630			Pl. 12×200×480	PL 12×60×200	Pl. 12× (90×480)	PL $ 12 \times (\phi 100 - \phi 50)$	RB   \$50×175	2L 12×90×1300		Sub Total		- 11-4 0 F1-4			M16×50 N	Sub Total	l Gate Leaf Total
	un vatarial	שם רבי זמד			SS400	SS400			CAC603	CAC603	SUS304	SUS304		- • •	_				_							Correction + Co.	Svnthetic	SUS304	SUS304+Synthotic rubbed for M16	SUS304		 
EMERGENCY GATE (Gate Leaf)		and the second	Gate Leaf	Skin Plate	Main girder	Side girder	Side girder	Side girder	Bearing Plate	Guide shoe	Slide plate scat	Seal base	Scal base	Rubber stopper	Seal clamp bar	Seal clamp bar	Seal clamp bar	llanger	Bracket	Bracket	Bracket	Pin	Rein forcoment plate			Sco. 1 Rubbor	Rubber		l Washer			

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No	Waterial		Dimensions (mm)		Weig	Weight(kg)	Painting /	Ares (m <sup>2</sup> ).
	101 1000	:	Shape X Longth	Ansnutzy	Unit	Å	Paintine	Acid
							1. S.   O. S.	
- 1	SS400	Ы.	9×160×2650	2		601	$\vdash$	
Beam Web	SS400	Ρľ	9×182×2650	~		68	6.1	
Guide Flange	SS400	PI,	9×160×500	S		451		
Guide girder web	SS/00	ЪI,	9×152×500	8		43	1 2	
Rib	SS400	.ld	9 × 182 × 160	20		161		
Rib	SS400	ΡΙ.	9 × 152 × 160	7		2		
Corner Rib	SS400	ΡĽ	9 X (260 X 280)	4		101		
Corner Rib	SS/00	PI,	9×160×400	4		181		
Guide Roller	SUS304	RB	φ100×30	4		2		c
Pin	SUS304	RB	φ 28×87	7		. 6		\$
Key Plate	SUS304	ب	6×26×76	4		1	-	
Bracket	SS400	٦L	14×110×115	0			C	
Bracket	SS400	Ы,	14×100×210	4		o		
Liner	SS400	t.	6×100×210	4		4		
Seat plate	SS400	PL,	16×110×220	4	-	121		
Hook	SS400	<b>ب</b> د ا	50 × (140 × 900)	2		58	.ł.,	
$P_{1}$	SUS304	RB	0 45 × 160	2		4		
Key Plate	SS400	÷	9×30×100	2				
Hand bar	SUS304	ЪĽ	19	0	:			
Rein forcement	SS400	t	25 × ( \$ 100 - \$ 15)	4		- IC		
Weight	SS400			2		20		
Pin	SUS304	RB	¢ 22×150	23		1-1		
Hanger	SS400	Ъ	12×150×150			4	0.1	
Hangor	SS400	ЪΓ	9×100×160	V		ī	C	
Hanger	SS400	PI,	9×180×210	2		5	0	
Stopper	SUS304	ţ	$50 \times 100 \times 100$	5		00		o
Stopper	SS400	Ы	9×180×210	2		ю I	0	
			Sub Total			428	6.5	0.2
Bolt	SUS304		M16×50 with N, SW	1.6		2		
Nut	SUS304		MI2, MI0			2		
			Sub Total			4		
						•		

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[EMERGENCY GATE (Gate guide)						•		(1/2)
N.	Matorial		Dimensions (mm)	· · · · · · · · · · · · · · · · · · ·	Weis	Weight (kg)	Painting Arca(m <sup>*</sup>	.csi (m²)
	שומרבד דמד		Shape X Length	AUBULICY		ан түр <b>М</b> аниян тү	Painting	Acid
Sill beam							I. S.   O. S.	
Rail	SS400	).	$150 \times 75 \times 6.5 \times 2700$			50	:0	
Seal Plate	SUS304	PL	$10 \times 250 \times 2700$	1		54		0.7
Rib Contraction and the second s	SS400	PL	$9 \times (120 \times 120)$	9	1	7	0.1	
Lustallation beam	SS400	L : -	75×75×9×200	9	:	12	0. 1	
Installation beam	SS400	RB	16×300 M16	81		Ġ.	0.3	
Anchor bar	SD295A	- <b>Q</b>	16×400	18		11	0.4	
Lintel guide								
	SS400		$150 \times 75 \times 6.5 \times 2300$	<b>1</b>		431	1.4	
Seal Plate	SUS304	÷.	$10 \times 250 \times 2300$	<b>-</b> -1		27		0.3
Cover Plate	SS400	PL	9×450×2300	<b>-</b>		73	2.1	
Rib	SS400	μL	9×100×150	មា		م	0.2	
Rib	SS400	Ίd	9×50×100	ي ب ب		2	0. 1	
Installation beam	SS400	1	75×75×9×200	£۲		101	0.3	
Installation beam	SS400	RB	16×200 M16	10		3	0.1	
Anchor bar	SD295A	Ω	16×400	101		9	0.2	
Side guide (Main rail)	a transfer and					:		
Rail	SS/100		$200 \times 90 \times 8 \times 1750$	2		106	2.7	
Bearing Plate	SUS304	<b>1</b>	$10(30) \times 200 \times 1750$	2		13		0.2
Cover Plate	SS400	ΡL	9×450×1750	2		111	3.2	- C
Rib	SS400	- bL	9×75×170	7	ź	4	0.1	
Rib	SS400	۶Ľ		ν.		3	0. 11	
	SS400	-1	75×75×9×250	<b>30</b>		20	6.0	
Installation beam	SS400	ßB	16×300 M16	16		8	0.2	
Anchor bar	SD295A	· · Q	16×400	16	-	10	r _	
Side guide (Sub rail)								
Rail	SS400	- H	$125 \times 125 \times 6.5/9 \times 63284$	- 2		2, 987	94.9	
Bearing Plate	SUS304	t	$10(30) \times 100 \times 63284$	2		1304		16.4
Cover Plate	SS400	PL	$9 \times 450 \times 63284$	2		4, 024	113.9	
Rib	SS400	٦ſ	9×50×84	128		38	1.0	
Rib.	SS400	ΡL	$9 \times 84 \times 250$	128		061	5.4	
Joint Plate	SS400	٦d	9×100×300	40		85	2.4	
Bearing Plate	SS400	1	75×75×9×250	128		319	9.6	0.2
Rib	SS400	ß	16×300 M16	256		121	3.9	

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	Na+24121		Ulmensions (mm)		Weight (kg)	(kg)	Painting	ng Arca(m <sup>*</sup> )	(] [] []
			Shape X Length	Angurty	Unit	*	Painting		Acid
							I. S. 1 (	0. S.	
Anchor bar	SD295A	a	16×400	256		160	5.1		
Inspection stand					-	<b></b>	~.		
Rail	SS400	11	$125 \times 125 \times 6.5/9 \times 3500$	2		1651		5.3	
Post	SS400	Н	$150 \times 150 \times 7/10 \times 850$	9		159		4.6	
Post	SS400	n	$150 \times 150 \times 7/10 \times 600$	9		112		3.2	
Joint	SS400	H	125 × 125 × 6, 5/9 × 1300	41	-	1231		3.9	
Joint	SS400	Η		6		12	┢╸	4	
[]oint	SS400	н	125×125×6.5/9×975	× •		92		2 0	
Sub beam	SS/00	l.	75×75×9×1100	9		99		2.0	
Gusset Plate	001/SS	, Iq	9×200×200	12		34		10	
Bearing Plate	108304	t I	$10(30) \times 100 \times 3500$	2		72			õ
Stopper	SS400	, PI,	12×100×100	2		5		0.0	
Stopper	SS400	ЪГ	12×100×200	4		80 -			
Rib	SS400	ld	9×59.3×107	24				0.3	
Rib	SS400	Ы	$9 \times 72 \times 130$	24		161	-	0.4	
Anchor pad	SS/100	ЪГ	16×250×250	12		16	0.71	0.7	
Stiffener	SS/00	53	65×9×230	12		13	0.4		
Stiffener	SS/00	FB	$65 \times 9 \times 230$	24	:	19	0.6		
Anchor	SD295A	Ģ	$16 \times 300$	- 48		22	0.7		
l'incr	SS400	Ъľ	12×100×130	24		29		0.6	
lliner	SS400	7	12×100×100	12		11		0.2	
			Sub Total			10902	258.4	26, 7	18.
Bolt	SS400		MI6×70 N	32	0.174	9			
					-				
			Sub Total		 	9			
			Gate guide Total			10908	258.4	26.7	18.
	-			• •					

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EMERGENCY GATE (Hoist)									(1/5)
No. 1 Frank	Mararial		Dimensions (mm)		Wei	Weight(kg)	Painting	ing Area(m	( <b>1</b> II)
Contraction of the second s	TOTTOT		Shape X Length	אמשורו בא			Painting		Acid
Drum	and the second secon		Ň			-	1. S. 1	<b> </b>	
Shell	SM400C	t	$30 \times 600 \times 2608$	2		737		3.1	Ι
Side plate	SM400A	PL	28×( ¢1100- ¢950)	2		224		2.0	Γ
Shaft End-Plate	SM400A		28×( \$ 1000-\$ 330)	2		308		2.8	Γ
Rib	SM400A	ld	$28 \times (100 \times 300)$	12		55		0.5	Γ
Fastening plate	SS400	t	$10 \times 150 \times 150$	12	з 3	121		0.4	ſ
Bosser	S25C	RB	(	2	3	187			ſ
Rope stopper	\$25C	t.	35×80×85	2		3		       	
Bush	CAC603	RB	(	2		1 43		1	
Dram gear	and the second se		(M=16, Z=98, B=160)						T
Rint	SCM135	RB	$(\phi 1600 - \phi 1492) \times 160$	2		570		2.4	
[Web	SCW410	t.	28×( \$1472-\$330)	2		772		6.7	Γ
Rib	SCW410	- t		12		134		2.5	T
Fastening plate	SCW410	<b>t</b> -	$16 \times 180 \times 200$	12	-	54		0.7	Γ
Boss	SCW410	RB -	(	2		187			T
Bush	CAC603	RB	$(\phi 220 - \phi 190) \times 250$	5	1	43		1	T
Pinion gear	SCM440		(M=16, Z=21, B=130)	2	-	207		0.3	ľ
Drum shaft	S45C-N	RB	¢ 190 × 1100	12		490			ľ
Kcy Plate	SS/00	2	$16 \times 60 \times 250$	8		15		0.2	
Pinion pin	S45C-N	g	$\phi  80 \times 500$	2		39		0.3	
Bearing (2 picces)	SC450	ESS ESS	φ 70 × 100	t.		114		0.4	
Bush	CAC603	Ð	$(\phi 80 - \phi 70) \times 100$	4		2		1	
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$ \begin{array}{ c c c c c c c c c c c c c c c c c c c$	EMERGENCY GATE (Hoist)								(2/2)
$ \begin{array}{ c c c c c c c c c c c c c c c c c c c$		Material		Dimensions (mm)	Outant true	Wci	ght (kg)	Paintin	g Arca(m <sup>2</sup> )
acket         S8400         PI         16X (750 × 1000)         4         218         1.5         0.5           acket         S8400         r         16(11)         5.1         23         23         25         27         0.5         27         0.5         27         0.5         27         0.5         27         0.5         27         0.5         27         0.5         27         0.5         27         0.5         27         0.5         27         0.5         27         0.5         27         0.5         27         0.5         27         0.5         27         0.5         27         0.5         27				×	1.7 TA 110.02	-Unit	M	Paintin	
Refect         SS400         Pl         IGX (TSG X1000)         A         238         5,1           acket         SS400         t         IGX (TSG X1000)         A         111         1.8           acket         SS400         t         IGX (TSG X1000)         A         111         1.8           acket         SS400         t         IZX 1800 X750         A         1121         1.8           acket         SS400         P1         IZX 1800 X400         A         1021         1.2           acket         SS400         P1         IZX 1800 X400         A         1021         2.3           acket         SS400         P1         IZX 1800 X400         A         1021         2.3           acket         SS400         P1         IZX 1800 X400         A         1021         2.3           acket         SS400         P1         IZX 100 X400         A         1021         2.3           Stand         SS400         P1         IZX 100 X400         B         2.7         0.2           Stand         SS400         P1         IZX 100 X400         B         2.7         0.2           Stand         SS400         P1         IZX		-						1. S. 1 O.	╞
Refect         SS400         t         Is(F1!5) x200X.1100         d         111         112           acket         SS400         P1         12X.8103 x200X.1100         8         101         12           acket         SS400         P1         12X.8103 x200X.1100         8         103         23         0.5           acket         SS400         P1         12X.8103 x600         8         103         23         0.5           acket         SS400         P1         12X.8103 x600         8         109         23         0.5           acket         SS400         P1         12X.8103 x600         8         70         0.5           Sect         SS400         P1         12X.8103 x600         8         27         0.2           Stand         S400         P1         12X.8104 x400         2         27         0.2           Stand         S400         P1         12X.835.4450         2         2         0         2           Stand         S400         P1         12X.835.4450         2         2         0.2         2         0.2           Stand         S3400         P1         12X.835.4450         2         2 <t< td=""><td>Drum bracket</td><td>SS400</td><td>ЪI,</td><td><math>16 \times (750 \times 1000)</math></td><td>4</td><td></td><td>318</td><td>-</td><td></td></t<>	Drum bracket	SS400	ЪI,	$16 \times (750 \times 1000)$	4		318	-	
meket         SSM00         t         l6(PLI9) ×200 ×100         d         1111         1.8           acket         SSM00         P1         12 ×180 ×160         8         1021         2.3         0.5           acket         SSM00         P1         12 ×180 ×160         8         1021         2.3         0.5           acket         SSM00         P1         12 ×180 ×160         8         1021         2.3         0.5           acket         SSM00         P1         12 ×180 ×160         8         109         2.1           acket         SSM00         P1         12 ×180 ×160         8         0.5         2.7         0.6           acket         SSM00         P1         12 ×160 ×100         2         2         0.2           acket         SSM00         P1         12 ×160 ×100         2         2         0.6           Stand         SSM00         P1         12 ×160 ×100         2         2         0.2           Stand         SSM00         P1         12 ×860 ×130         2         2         0         0           Stand         SSM00         P1         12 ×860 ×130         2         2         0         0	Urum bracket	SS400	: tt	$16(PL19) \times 200 \times 1050$	4		106		1.7
meket         SS400         PL         12X 100X 600         B         10021         2.23         0.55           acket         SS400         PL         12X 100X 600         B         10021         2.33         0.55           acket         SS400         PL         12X 100X 400         A         233         0.5           acket         SS400         PL         12X 100X 400         A         273         0.6           acket         SS400         PL         12X 100X 400         A         273         0.6           acket         SS400         PL         12X 90X 400         A         273         0.6           stand         Ss400         PL         12X 100X 400         B         9         0.1           stand         Ss400         PL         12X 100X 400         2         0.7         0.6           stand         Ss400         PL         12X 100X 400         2         0.1         0.2           stand         Ss400         PL         12X 100X 400         2         0.2         0.2           stand         Ss400         PL         12X 100X 400         2         0.2         0.2           stand         Ss400	Urum bracket	SS400	ų	$16(PL19) \times 200 \times 1100$	1		1111 1		1.8
meket         SS400         P1.         I2X.100 × 600         A         C <thc< th="">         C         <thc< th=""> <thc< th=""></thc<></thc<></thc<>	Drum bracket	SS400	PL	$12 \times 180 \times 750$	8		102		
zelect         SSA00         PL         1(2×180×800         8         109         2.3           select         SS400         PL         1/4740×700         4         70         1.3           acket         SS400         PL         1/4740×700         6         27         0.6           acket         SS400         PL         1/4740×700         8         27         0.6           acket         SS400         PL         12×65×314         8         0         9         0.2           acket         SS400         PL         12×65×430         2         9         0.1           Stand         SS400         PL         12×150×760         2         16         0.1           Stand         SS400         PL         12×85×450         2         9         0.2           Stand         S4000         PL         12×85×450         2         6         0.1           Land         SS400         PL         12×85×450         2         6         0.2           Land         SS400         PL         12×85×450         2         6         0.1           Land         SS400         PL         12×85×450         2	Drum bracket	SS400	PI	12×100×600	4		23		
acket         Ss400         Pl.         IA X400 X400         A         70         1           acket         Ss400         r         IA (F).13) X (50 X400         A         53         0         2           acket         Ss400         r         IA (F).13) X (50 X410         2         30         0         5           Stand         Ss400         r         IX (F).13) X (50 X410         2         30         0         3           Stand         Ss400         r         IX (F).13) X (50 X410         2         30         0         3           Stand         Ss400         r         IX (F).13) X (50 X410         2         30         0         1           Stand         r         IX (F).13) X (50 X400         2         3         30         0         1           Stand         r         IX (F).13) X (50 X100         2         7         6         0         1           Stand         r         IX (200 X100         2         2         6         0         1           Stand         r         IX (200 X100         2         2         6         0         1           Stand         Stand         r         IX (200 X100	Drum bracket	SS400	Pl,	X	00		1001		
acket         S3400         t         [4](f1.13) X (f00 × 100)         f         53         0         2           acket         S3400         Pl.         125 (104 × 406)         2         2         0         5           Stand         S3400         Pl.         125 (104 × 406)         2         16         9         0.2           Stand         S3400         Pl.         125 (104 × 406)         2         9         0.2           Stand         S3400         Pl.         125 (104 × 406)         2         9         0.2           Stand         S3400         Pl.         125 (104 × 406)         2         9         0.2           Stand         S3400         Pl.         125 (105 × 85 430)         2         7         0         0           S400         Pl.         125 (105 × 85 430)         2         7         0         2         0.2           tand         S3400         Pl.         125 (105 × 86 × 160)         2         0         1         0.2           tand         S3400         Pl.         125 (105 × 86 × 160)         2         2         0         1         0         2         0         1         0         2         0 <td>Drum bracket</td> <td>SS400</td> <td>Pl.</td> <td>8 X X</td> <td>4</td> <td></td> <td>102</td> <td></td> <td></td>	Drum bracket	SS400	Pl.	8 X X	4		102		
acket stand by 12 Sequence (16) (12) (12) (15) (16) (15) (16) (16) (16) (16) (16) (16) (16) (16	Drum bracket	SS400	<b>د</b> ړ	$\times 00\nu \times (61.19)$	V		531		
Stand         S3400         t         15(P1.19) × 150×410         2         30         0         5           Stand         Stand         P1         12×104×400         2         16         0.3           Stand         S3400         P1         12×104×400         2         16         0.3           Stand         S3400         P1         12×36×430         2         6         0.1           tand         S3400         P1         12×36×430         2         2         0.2           tand         S3400         P1         12×30×440         2         2         0.2           tand         S3400         P1         12×30×440         2         2	Drum bracket	SS400	PI.	12×96×374	8		27	÷	
Stand         Ssado         Pl. $12 \times 104 \times 400$ $2$ 16 $0.3$ Stand         Ssado         PL $12 \times 103 \times 104$ $8$ $9$ $0.2$ tand         Ssado         PL $12 \times 103 \times 150 \times 104$ $8$ $9$ $0.2$ tand         Ssado         PL $12 \times 98 \times 450$ $2$ $8$ $0.2$ tand         Ssado         PL $12 \times 98 \times 450$ $2$ $8$ $0.2$ tand         Ssado         PL $12 \times 98 \times 450$ $2$ $2$ $7$ $0.2$ tand         Ssado         PL $12 \times 98 \times 450$ $2$ $7$ $0.2$ tand         Ssado         PL $12 \times 30 \times 170$ $2$ $7$ $0.2$ tand         Ssado         PL $12 \times 30 \times 170$ $2$ $2$ $0.1$ tand         Ssado         PL $12 \times 30 \times 170$ $2$ $2$ $0.2$ tand         Ssado         PL $12 \times 30 \times 200$ PL $12 \times 108 \times 450$ $2$ <	Bearing Stand	SS400	۰ <b>ـ ۲</b> .	X	2		30		
Stand         SS400         PL $12 \times 120 \times 104$ B         9         9         0.2           tand         SS400         t $10(P13) \times 85 \times 430$ 2         6         0.1           tand         SS400         PL $12 \times 85 \times 430$ 2         6         0.1           tand         SS400         PL $12 \times 85 \times 430$ 2         6         0.1           tand         SS400         PL $12 \times 85 \times 430$ 2         2         6         0.1           tand         SS400         PL $12 \times 85 \times 430$ 2         2         6         0.1           tand         SS400         PL $12 \times 85 \times 430$ 2         2         2         0.3           tand         SS400         PL $12 \times 85 \times 430$ 2         2         2         0.1           tand         SS400         PL $12 \times 85 \times 410$ 2         2         2         0.1           tand         SS400         PL $12 \times 85 \times 410$ 2         2         2         0.1           tand         SS400         PL $12 \times 108 \times 410$ 2         2 <td>Bearing Stand</td> <td>SS400</td> <td>74</td> <td>12×104×400</td> <td>2</td> <td></td> <td>15</td> <td></td> <td></td>	Bearing Stand	SS400	74	12×104×400	2		15		
tand         SS400         t $10(P1.12) \times 85 \times 430$ $2$ $6$ $0.2$ tand         SS400 $P1$ $12 \times 350 \times 450$ $2$ $6$ $0.2$ tand         SS400 $P1$ $12 \times 350 \times 450$ $2$ $6$ $0.2$ tand         SS400 $P1$ $12 \times 380 \times 450$ $2$ $7$ $0.2$ tand         SS400 $P1$ $12 \times 380 \times 470$ $2$ $2$ $7$ $0.2$ tand         SS400 $P1$ $12 \times 380 \times 170$ $2$ $2$ $2$ $0.1$ tand         SS400 $P1$ $12 \times 300 \times 170$ $2$ $2$ $0.1$ tand         SS400 $P1$ $12 \times 300 \times 170$ $2$ $2$ $0.1$ tand         SS400 $P1$ $12 \times 300 \times 170$ $2$ $2$ $0.1$ indicate stand         SS400 $P1$ $12 \times 300 \times 10$ $12 \times 300 \times 10$ $2$ $0.1$ indicate stand         SS400 $P1$ $12 \times 400 \times 400$	Bearing Stand	SS400	.]]	12×120×104			σ		
$ \begin{array}{ c c c c c c c c c c c c c c c c c c c$	Brake Stand	SS400		110 (PL12) ×85×430	5		2	-	
	Brake Stand	SS400	Ы	X 450			-		1 - 2
$ \begin{array}{ c c c c c c c c c c c c c c c c c c c$	Brake Stand	SS400	, Iq	X	6		2 0		0 0
$ \begin{array}{ c c c c c c c c c c c c c c c c c c c$	Brake Stand	SS400	Ъľ	X 86 X			2		3 6 0
$ \begin{array}{ c c c c c c c c c c c c c c c c c c c$	Brake Stand	SS400	-ld				. 9		* - 0
$ \begin{array}{ c c c c c c c c c c c c c c c c c c c$	Motor Stand	- SS400 -	<b>.</b>	10×80×170	6		2		
$ \begin{array}{ c c c c c c c c c c c c c c c c c c c$	Motor Stand	SS400	Γ	12 X 200 X 200			2 <		
$ \begin{array}{ c c c c c c c c c c c c c c c c c c c$	Motor Stand	SS400	- Jf	12×108×450	6		<b>Γ Ο</b>		
n indicate standSS400PL $12 \times 400 \times 400$ $10$ $1$ $10$ $15$ $0.3$ n indicate standSS400L $65 \times 65 \times 6 \times 150$ $2$ $2$ $0.1$ odicate standSS400L $65 \times 65 \times 6 \times 150$ $2$ $2$ $0.1$ odicate standSS400L $65 \times 65 \times 6 \times 200$ $2$ $2$ $0.1$ odicate standSS400L $65 \times 65 \times 6 \times 200$ $2$ $2$ $0.1$ odicate standSS300L $65 \times 65 \times 6 \times 200$ $1$ $3$ $2$ $0.1$ $2 \times$ opening deviceSUIS304PL $30 \times (480 - 627)$ $2$ $2$ $0.1$ $2 \times 1300$ PL $30 \times (56 \times 40) \times 400$ $1$ $1$ $6$ $0.1$ $2 \times 300$ PL $12 \times 180 \times 250$ $1$ $1$ $6$ $0.1$ $5 \times 300$ PL $12 \times 180 \times 250$ $1$ $1$ $0$ $1$ $5 \times 300$ PL $12 \times 180 \times 250$ $1$ $1$ $0$ $1$ $5 \times 300$ PL $12 \times 180 \times 250$ $1$ $1$ $1$ $1$ $5 \times 300$ PL $12 \times 180 \times 250$ $1$ $1$ $1$ $1$ $5 \times 300$ PL $12 \times 180 \times 250$ $1$ $1$ $1$ $1$ $6 \times 300$ PL $10 \times 250$ $1$ $1$ $1$ $1$ $6 \times 300$ PL $10 \times 20 \times 220$ $1$ $1$ $1$ $1$ $6 \times 300$ PL $10 \times 20 \times 11$ $1$ $1$ $1$ $1$ $6 \times 300$	Motor Stand	SS400	Jd.	12×108×410	0		× ¢		
n Indicate standSS400L $65 \times 65 \times 6 \times 150$ 220.1ndfcate standSS400L $65 \times 65 \times 6 \times 400$ 250.1ndicate standSS400L $65 \times 65 \times 6 \times 200$ 2220.1ey opcning deviceSIIS304RB $a \ge 5 \times 1300$ 150.1SIIS304RB $b \ge 5 \times 200$ 1333SIIS304RB $b \ge 5 \times 200$ 133SIIS304PL $30 \times (a \otimes 0 - a 27)$ 222SIIS304PL $30 \times (a \otimes 0 - a 27)$ 222SIIS304PL $12 \times 180 \times 250$ 161SS400PL $12 \times 180 \times 250$ 1161SS400PL $6 \times 80 \times 250$ 1111SS400PL $6 \times 80 \times 250$ 1111SS400PL $6 \times 50 \times 220$ 1111SS400PL $12 \times 180 \times 250$ 1111SS400PL $6 \times 50 \times 220$ 1111SS400PL $6 \times 50 \times 220$ 1111SS400PL $10 \times 10 \times 10^{10}$ 1111SS400PL $10 \times 10^{10}$ 1111SS400PL $10 \times 10^{10}$ 1111SS400PL $10 \times 10^{10}$ 1111SS400 <td></td> <td>SS400</td> <td>PI,</td> <td>12 X 400 X 400</td> <td></td> <td></td> <td>2</td> <td></td> <td>10</td>		SS400	PI,	12 X 400 X 400			2		10
ndfcate standSS400I. $[65 \times 65 \times 6 \times 400$ $2$ $5$ $0.2$ ndicate standSS400I. $65 \times 65 \times 6 \times 200$ $2$ $2$ $0.1$ cy opcning deviceSIIS304RB $d = 25 \times 1300$ $1$ $5$ $0.1$ SIIS304RB $d = 50 \times 200$ $1$ $3$ $3$ SIIS304RB $550 \times 200$ $1$ $3$ $3$ SIIS304PL $30 \times (d = 0.40) \times 400$ $1$ $3$ $3$ SIIS304PL $30 \times (d = 0.40) \times 400$ $1$ $1$ $4$ SIIS304PL $12 \times 180 \times 250$ $1$ $1$ $4$ SIIS304PL $12 \times 180 \times 250$ $1$ $1$ $4$ SIIS304PL $12 \times 180 \times 250$ $1$ $1$ $4$ SIIS304PL $12 \times 180 \times 250$ $1$ $1$ $1$ SS400PL $6 \times 50 \times 220$ $1$ $1$ $1$ SS400PL $6 \times 50 \times 220$ $1$ $1$ $1$ SS400PL $6 \times 50 \times 220$ $1$ $1$ $1$ SS400PL $6 \times 50 \times 220$ $1$ $1$ $1$		SS400	<b>L</b>	65 × 65 × 6 × 150	2		2 2		
ndicate standSS400L $65 \times 65 \times 6 \times 200$ 220.1 $cy$ opening deviceSIIS304RB $\phi$ 25 × 1300150.1 $SIIS304$ RB $\phi$ 50 × 2001533 $SIIS304$ PL $30 \times (\phi \ 80 - \phi \ 27)$ 2220.1 $SIIS304$ PL $30 \times (\phi \ 80 - \phi \ 27)$ 2222 $SIIS304$ PL $30 \times (\phi \ 80 - \phi \ 27)$ 2222 $SIIS304$ PL $12 \times (\phi \ 80 - \phi \ 27)$ 2222 $SIIS304$ PL $12 \times (\phi \ 80 - \phi \ 27)$ 2222 $SIIS304$ PL $12 \times (\phi \ 80 - \phi \ 27)$ 2222 $SIIS304$ PL $12 \times (\phi \ 80 - \phi \ 27)$ 2222 $SIIS304$ PL $12 \times (\phi \ 80 - \phi \ 250)$ 1401 $SS400$ PL $6 \times 50 \times 220$ 111- $SS400$ PL $6 \times 50 \times 220$ 1111 $SS400$ PL $6 \times 50 \times 220$ 111- $SS400$ PL $6 \times 50 \times 220$ 1111 $SS400$ PL $6 \times 50 \times 220$ 1111 $SS400$ <t< td=""><td>Limit indicate stand</td><td>SS400</td><td><b>1</b></td><td>ΙX</td><td>2</td><td></td><td></td><td></td><td>1. 21</td></t<>	Limit indicate stand	SS400	<b>1</b>	ΙX	2				1. 21
cy opening deviceSIIS304RB $\phi$ 25×130015SIIS304RB $\phi$ 50×20013SIIS304PL $30\times(\phi$ 80- $\phi$ 27)22SIIS304PL $30\times(\phi$ 80- $\phi$ 27)22SIIS304PL $10\times(\phi$ 80- $\phi$ 27)22SIIS304PL $120\times(\phi$ 80- $\phi$ 25011SIISII $100\times(\phi$ 80- $\phi$ 20011SIISII $100\times(\phi$ 80- $\phi$ 20011SIISII $100\times(\phi$ 80- $\phi$ 20011SIISII $100\times(\phi$ 80- $\phi$ 20011SIISII $100\times(\phi$ 80- $\phi$ 20011SII $100\times(\phi$ 80- $\phi$ 8	Limit indicate stand	SS400	<b>1</b>	X	2		2		1
SIIS304       RB       & 25×1300       1       5         SIIS304       RB       & 50×200       1       3         SIIS304       PL       30×(& 80-& 27)       2       2         SIIS304       PL       30×(& 80-& 27)       2       2         SIIS304       PL       30×(& 80-& 27)       2       2         SIIS3047PA       PL       30×(5640)×400       1       6         SIIS304       PL       1/2×180×250       1       4       0.1         SS400       PL       1/2×180×250       1       1       1       -         SS400       PL       6×50×220       1       1       1       -       -         SS400       PL       6×50×220       1       1       1       1       -       -	Emergency opening device								
SUS304       RB $\phi$ 50×200       1       3       3       1         SUS304       PL       30×( $\phi$ 80- $\phi$ 27)       2       2       2       2       2         SUS304TPA       Pi be       80A (Seh40)×400       1       6       2       2       2       1       1       2       1	Rod	SUS304	RB	∳ 25 × 1300			U,		C
SIIS304       PL       30× (\$ 80-\$27)       2       2       2         SU3304TPA       Pipe       80A (Sch40) × 400       1       6       6       1         SS400       PL       12×180×250       1       1       4       0.1         SS400       PL       6×80×250       1       1       1       1         SS400       PL       6×80×220       1       1       1       -         SS400       PL       6×80×220       1       1       1       -	Thrust	SUS304	RB	♦ 50 X 200			× e	-	i c
SUS304TPA     Pipe     80A (Seh40) × 400     1     6       SS400     PL     -12×180×250     1     4     0.1       SS400     PL     6×80×250     1     1     1       SS400     PL     6×80×250     1     1     1       SS400     PL     6×80×220     1     1     1	[Guide	SUS304	ЪĽ	(-\$\phi_80-\$\phi_4)	2		2		s c
SS400     PL     12×180×250     L       SS400     PL     6×80×250     1     1       SS400     PL     6×80×220     1     1       SS400     PL     6×50×220     1     1	Guide	SUS304TPA	Pipe	(Sch40) X	1		9		0.0
SS400         Pl.         6×80×250         1 <th1< th=""> <th1< th=""> <th1< th=""> <th< td=""><td>Bracket</td><td>SS400</td><td>PI,</td><td><math>\times 180 \times</math></td><td>1</td><td></td><td>7</td><td></td><td>-</td></th<></th1<></th1<></th1<>	Bracket	SS400	PI,	$\times 180 \times$	1		7		-
SSA00 P1. [6×50×220 1 1 1 1	Bracket	SS400	PI,	6×80×250					
	Bracket	SS400	Ъ!,	X 20 X	-				
	and the second								

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levience	IENEDCENICY CATE (HA: a+)				•	•	.'		(3/5)
CINCINAL				Dimensions (mm)		Wei8	-Weight (kg)	Painting /	Area (m <sup>2</sup> )
No,	Item	Material		Shana X Lonoth	duanticy	- Unit	X	Painting	Acid
								i.S. 0.S.	
	Onevatine stand	SS400	7	$12 \times 220 \times 240$	1		5	•	
		SS400	٦.	$12 \times 220 \times 240$	1		S		
	Onerating Stand	SS400	Ŧ	$200 \times 200 \times 8/12 \times 680$	1		34		8
	Onerating stand	SS400	Γď	9×85×300	2		14	°	1
	Gear cover	SS400	Ы	2.3×2.5m	2		106		0
	Gear cover	SS400		$50 \times 50 \times 6 \times 400$	16		28		8
	IChain cover	SS400	Ы	2.3×0.4m	2		20		
	Chainscover	SS400	-1	$50 \times 50 \times 6 \times 200$	. 4		7		
	Oil catch	SS400	٦d	2.3×2.5m	2		106	10.	0
	0il catch	SS400		$50 \times 50 \times 6 \times 1600$	4		28		3
	011 catch	SS400	1	$50 \times 50 \times 6 \times 850$	4		15		7
	Hanger	SS400	٦٢	$ 22 \times 300 \times 380$	16		315	G	9
	Flame								
	Main girder.	SS400	Ŧ	$400 \times 200 \times 8/13 \times 3600$	2		124		5
	Main girder	SS400	Ŧ	$400 \times 200 \times 8/13 \times 2100$	4		549		÷
	Sub beam	SS400		$250 \times 90 \times 9/13 \times 2100$	2		145		9
	Sub beam	SS400		$250 \times 90 \times 9/13 \times 200$	<u>ເ</u>		35	o'	6
	Sub beam	SS400		$250 \times 90 \times 9/13 \times 1000$	7		69		
	Rib	SS400	ЪГ	PL12×96×374	12		41		6
	Rib	SS400	ΡL	$PL9 \times 80 \times 224$	8		10	o'	3
	Anchor	SS400	Jd	$16 \times 200 \times 200$	12		60		
	Anchor	SD295A	0	16×150	18		11 11	0.4	
	Liner	SS400	t	$100 \times 100 \times 200$	12		188	1.0	
The second se	<u> </u>								
			:	Sub Total			7512	2.4 105.	4 0.5
		-							
						2			-
							-		

No.	and and a second se	Vatoria1		Dimensions(mm)		Wcie	Wcight(kg)	Painting Arca (m <sup>2</sup> )	Area (m <sup>-</sup> )
		T 735 12W	والأعرب والمعينات	Shape X Longth	Wuantity	Unit	A	Painting	Acid
								1. S.   O. S.	
MOLOR				6P, 5C	1		62		
	Hellcal speed reducer			<u> 9BG-440 i=1/500</u>	1		380		
	Limit Switch Box			MD233	I		30		
Gate	Gate Position indicator			STX110-S1-D	1		50		
				Sub Total			661		
	- F								
Brake				BMS4-1316UPS	1.		1001	-	
Chair	Chain coupling			CR-5016-J	2		2		
Gcar	Gcar coupling	-		HS-SSA-90 - 1 = 400	2		73		
l.imit	Limit switch			Direct moving type	1				
ll.imit	Limit switch			Roller hand type	. 6.		e		
Chain	<u>Chain sprocket</u>			RS40 $T = 60$			2		
Chain	<u>Chain sprocket</u>			1	10		> -		
Rollc	Roller chain			RS40 160 rink	2				
Rollc	Roller chain			100			* -		
Wire Rope	Rope	$JIS(6 \times 37)$		X 140m	0		252	-	
Rope sket	sket			16	2		6		
Pin					2		. 6.		
Tool box	рох				111		25		
Namo	<u>Name plate(Operation)</u>	White acryle		t=5.0 mm					
Name	Name plate	C2801P							-
Inbri	Inbricating Oil				1		330		
Hcad pump	punp			MP-113 3 4	2		30		
Distr	Distributing Valve			VS32	2		e		
Distr	Distributing Valve			VS33	7		i oc		
Distr	Distributing Valve		1	S34	3				
Y Typ	Y Type strainer			3/8	4		4		
011 pack	ack			SGP-104			12		
1.101.1	Lubricating parts		-	High pressur screwed union 3/8	34		9		
			Ŧ	High pressur screwed tee 3/8	4		-		
	-		= : :	High pressur screwed clbow 3/8	81		3		
			E.	High pressur screwed elbow 3/8		-	•••		

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EMERGEN	EMERGENCY-GATE (Hoist)		and the second secon		a service of the serv	with the state of	(2/2)	
N			Dimensions (mm)		Weight(kg)	Painting Arca(m <sup>2</sup> )	Arca (m <sup>2</sup> )	
NO.		material	Shape × Length	Auanutry	Unit W	Painting	Acid	
						1.S. 10.S.		
	Hubricatring parts	and the second	High pressure plug 3/8	10				
and a second of the second			pressuro nipple	24		1		
water from an other	<ul> <li>A set in particular particular in an and instant in the particular particular in the first particular in the particular interval in the particular particular interval in the particular particular interval in the particular particul particular particular part particular particular par</li></ul>	a second and a second second second	High pressure nipple 3/8	10	~~~	2		
and a history of	والمراجع والمراجع فالمراجع والمراجع والمراجع والمراجع والمراجع والمراجع والمراجع والمراجع والمراجع	SUS304	Pipe joint \$ 10×1/4	24		1 [		
	والمراجع والمراجع والمراجع والمراجع والمراجع ومتمر والمراجع والمراجع والمراجع والمراجع والمراجع والمراجع والمراجع	SUS304		16				
	and the second	SUS304		19			- 19%-	
A LONG AND AND A LONG			clump	66		1		<b>.</b>
	والمحافظة والمحافظ المعامين المحافظ والمحافظ والمحافظ والمحافظ والمحافظ			35		1		· · ·
N. Commence			Tube clump #10×3	12		1		
	<ul> <li>A state of the sta</li></ul>		Tube clump 3/8×2P	12		1		
		1 4T [	+ screw bolt M6×10	125		1		
			Ф	12				
and the second	[Bolt, Nut							
and the second	Reamer bolt	S45C	0.25×120 with N, SW17	12		1		
a and a second second	Bolt	001/SS	with	12		5		-
	[Bo.] t	SS400	with	16		4		
	Bolt	SS400	with	16		3 (		_
ALC: NOT A	·[80]T.	SS400	M30×120 with N, SW行]	16		6	-	
	Knock pin	SA5C	with N,	8		2		
	Bolt	SS400		9		3		<b>r</b> ,
	Knock pin	S45C	with N,	4		2		
-	Bolt	SS400	with N,	4	r 			
A THE REPORT OF		SS400	[MIO×60 with N, SW14]	4				
-	[Bolt	SS400	with N.	4		5		
	Bolt	SS400	M12×60 with N, SW44	4		1		
	[Bolt	SS400	MIO×60 with N, SW(-)	14				
	[Bolt	SS400	M12×60 with N. SW45	24	-	2 4 5 4		
	Bolt	SS400	M24×150 N2	24	2	20] [	~~~	
			Sub Total		286	- 1 2		
				_				
			Hoist Total		8998	8 2.4 105.	.41 0.5	
	-							

11.5744										
ICUX	IKNOIL KAUA (Emergency Gate)			Dimensional (mm)		AN	1. 1. 1. 1. 1. 1. 1. 1. 1. 1. 1. 1. 1. 1			(2)
°0 No	The second s	Material		Ulmensions (mm)	Quantity	WC18	Weight (kg)	Painting		Arca (m')
	<b>1</b>			Shape X Length		Unit	æ	Painting		Acid
	EMERGENCY GATE Trash rack							I.S.I C		
	Trash rack bar	SS400	Æ	$90 \times 9 \times 1900$	40	12.1	483		13.7	
	Trash rack bar	SS400	E	$90 \times 9 \times 500$	28	3.2	68		2.5	
	Binding bolt	SS400	RB	$\phi 22 \times 1500$	18	4.5	18		1 9	
	Binding bolt	SS/00	RB	$\phi$ 22 × 650	12	1.9	23		0.5	Γ
	Distance piece	SGP	Pipe.	20A × 91	312	0.15	181		4.9	
	Trash rack guide	SS400	-	75×75×9×1500	8		120		3.6	
	Trash rack guide	SS400	-	$75 \times 75 \times 9 \times 550$	4		22		0. 71	
	Hook Bolt	SS400	RB	N	24	0.3	2		0.2	
	Support beam	SS400	Н	$200 \times 200 \times 8/12 \times 3300$	2		329		7.9	
	Support beam	SS400	H	$200 \times 200 \times 8/12 \times 600$	4		120		2.9	
	Post	SS400	н	$200 \times 200 \times 8/12 \times 2500$	3	124.8	374			Ī
	Rib - K	SS400	Ъľ	$12 \times 96 \times 176$	22	1.6	35		0.7	
	Bearing plate	SUS304	ЪГ	$10 \times 100 \times 1800$	10	14.31	29			40
	Seat plate	SS400	Ъľ	$12 \times 250 \times 450$	3	10.6	32		0.7	
	_	SS400	ц	$10 \times 250 \times 450$	3	8.8	26		0.7	
	Installation beam	SS400	<u>_</u> _	75×75×9×150	8	1.5	12			
	Installation bolt	SS400	RB	16×300 M16	32	0.5	151		0.5	
	Anchor bar	SD295A	۹	16×400	32		20		0.6	
	and the second				•					
				Sub Total			18651		51.4	0.4
	a week of some state of a state of the state									
	NU1210	SS400		MTG	112	0.034	4			
	Nut	SS400		M22	120	0.074	6			
	801000000	SS400	N	M22×60 N, SW	24	0. 296	2			
	and the second			Sub Total			20			
			÷							Γ
				EMERGENCY GATE Trash rack To	Total		1885		51.4	40
										;
	where is not subject to the state of the state									
										Γ
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	(a) A second s second second s Second second secon second second sec								╞	T
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(2/3)	Painting Area(m <sup>-</sup> )	ng Acid		103. 2	2.5	5.31	40.7	83.9	14.8	6.4		63. 2	2. 0	4.2	2.4	1.6	2.2		334. 3		•	-		 334.3		-		_		-
	Painti	Painting	1. 5 1 0	1						-							-		er 		•	•	 	 3		 		 -	-	 
	Weight(kg)	W		4104	1001	211	1758	825	338	151	59	2211	71}	. 149	55	51	67)		10150	-	34	12	112	 10191	1		***			
	Weigh	Unit		0.6	5. 28	11. 13	5.67	0.148	13. 0	5. S		81.9	0.66	1. 38	0 1	0.47	0.62			-	0. 158	0. 034								
	Ousnritv	*****		156	19	19	310	5580	26	26	208	27	108	108	54	108	108	2 2 2			216	216					:	-		 
	Dimensions (mm)	Shape X Longth		400 FB 65×12×1470	0 FB	400 FB 65×12×1817	0 RB	Pipe	1	E FB	RB	SS400 H 150×150×7/10×2600	PL	Τd		RB 16×300 V	295A D 16×400		Sub Total		400 MI6×60 N	000 M16	Sub Total	Trash rack Total						
TRASH RACK(Trash rack)	Water Water Water Water		Trash Rack	Trash rack bar SS40				Ce	de			eam		Rib SS4	Installation beam SS4	bolt	Anchor bar SD2				Bolt SS40	Nut SS								
TRASH R	, vv	\$											and the second second																	 

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		T	, 1		1	r	r	1	<b>r</b>	1	ŗ	1	T	T	T			<b>1</b>		1	7		<b>r</b>	1			T-	т	T-	-1		-1 <sup>-</sup> -	-1	- <b>-</b>	-1-
Arca (m <sup>-</sup> )	Acid																																		
Painting A	Painting	0. S.	38.0	0 2		4.9	2.7	10.6	20.7		0.8	0.6	0.6	0.8		91.5						91.5							177 9	2.11					
Pai	ied -	1. S	2	301	142	2	23	8	5	13	80	0	19	25		8		3		3		E			-				5	2	RA				
Weight(kg)	Å		1512	3(	ì	=			54							2978						2981							1/002		a				
Wcię	Unit		9.0	6.3	0 14	14.0	6.3	0.28	144.9	0.66	1.38	1.99	0.47	0.63				0.034		:													-		
Ouantitv -			168	48	. 960	8	101	64	5	20	20	10	40	40	-			80				al						-	╞		- (P				╞
ä				-	-	-		-		-  				-					-			rack Total	-			4			Material)	14 50 4 55 5	Purchased			╞	
(шш)	Length					- 0			- 0091/X							Total				Total		m Trash							Steel		(Material		1		
Dimensions(mm)	×		× 1470	2100	œ	$75 \times 75 \times 6 \times 2050$	(2050	0 MIG	$150 \times 150 \times 7/10 \times 4600$	$5 \times 130^{\circ}$	× 130	$75 \times 75 \times 9 \times 200$	0 M16			Sub 1				Sub T		nspection room				1 1 1			ck Total (		Total				
Uim	Shape		$ 65 \times 12 \times 1470$	¢ 22×2100		$75 \times 75$		$16 \times 180$	150×1	$9 \times 71.5 \times 130$	$9 \times 150 \times 130$	$75 \times 75$	$16 \times 300$	16×400				M16	· ·			Inspect							Trash rack		sh rack				
			£	RB	Pipe	: <b>.</b>	E E	RB	H.	- PL	- Id		RB	6			- - - - -			-				•			-				Trash		:		
Material			SS400	SS400	SGP	SS400	SS400	SS100	SS400	SS400	SS100	SS100	SSA00	SD295A	-		-	SS/100															1		
		Rack		·			_																-			•		·			-				
an arrest gar a		r Trash Rack				U U	c	-			10 - 11 - 12 - 12 - 12 - 12 - 12 - 12 -	реаш	vi t								A DESTRUCTION OF A												ALL ALL ALL		
No.		Inspection room	Trash rack bar	bolt			ack guide		beam				<u>ation bolt</u>	bar													11 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1		-						
		Inspect	Trash r	Sinding bolt	Distanc	Trash rack	Trash rack	[look bolt	Support beam	Rih	Rib	Instal lation	Installation	Anchor	•••			Nut				an and an					10 - 10 - 16 10 - 10 - 16	an trag					1		
No.						, ,																											tion and the second		

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STEEL 1	STEEL PENSTOCK (Trasition Pipe)			(1) L. (2) (1) (1) (1) (1) (1) (1) (1) (1) (1) (1	and the second second second	the second second second					(1/2)
No	A state of the	Matorial -		Dimensions (mm)			Weight(kg)		aintin	Painting Area(m <sup>-</sup> )	1
\$~	A compared of the second s			Shape X Length	- MUANCILY	Unit	M and a second s		Painting	-	Acid
A NUMBER OF STREET	والمراجع والمراجع والمستخدمة والمستخدمان والمراجع والمراجع والمستخدما والمراجع والمراجع والمراجع والمراجع								0		
	Transition Pipe	SM100A	. Id	25×(□1400~ ¢ 1400)×1150		1 1148.	4	148	5.9	5.9	
	No. 1-Ring-girder Flange	SS400	٦L	$22 \times 200 \times 6413$		1 221.5			2.6	-	
	No.1-Ring girder Web	SS400	PL	$ 16 \times 200 \times 7425$		1 186.		187	3. 6		
	3e	SS400	1	$22 \times 200 \times 5184$		1 199.	00		2.3		Γ
the second second second		SS400	1.1	$16 \times 200 \times 6796$		1 170.	7	171 2	2.7		
s. distances and	1	SM400A	3	$9 \times \phi 1400 \times 2471$		1 772.8			0.9	10.9	Γ
		SS400		<u>9×(¢1618-¢1418)</u>		2 33.69			1.9		Γ
	Pipe	SM400A	٦d	9× ¢ 1400×14000				378 62.		62.0	ľ
a see to select the set	and the second	SS400		9× ( ¢ 1618- ¢ 1418)	Ĩ	10 33.69		337 9	9.5		T <sup>-i</sup>
Sector and the sector of the	en de la company de la comp	SM400A	:	$ 9 \times \phi   1400 \times 70686$		1 22, 105, 8	. 22	L	312.9 3	312.9	Γ
The second second second	a she was a serie and a serie a serie a	SS400		$ 9 \times (\phi \ 1618 - \phi \ 1418)$	50	L					Γ
S S Income and the second second	<sup>2</sup> ipe	SM400A	PL	9× 01400×115000		1 35964.2	en L		609	509	Γ
	and the second sec	SS400-	3.1	Ļ	22	33.		E	72.5		T
	permanent	SM400A		9× 01400×71505	2 - AN	1 22393.		22393 3	317	317	ſ
the second of th	the second s	- SS400:		9× ( ¢ 1618- ¢ 1418)	48	. 33.	. 69		8.0		Γ
A FRANK ALL ANALY AND	and the second of the second of the second	SM400A	- 1	9× ± 1400×35343		1 11052.	I.  6		7	156.4	
	The second s	- SS400 -		<u> 9×(¢1618-¢1418)</u>	26	33.	69	876 24.	00		
		SM400A		9× 0 1400×86986		2				385.0	Γ
	a second and the second se	SS400		9× ( ¢ 1618- ¢ 1418)	58	1		E			ſ
	All the state of the set	SM400A		9× ¢1400×7891					34.9	34.9	
		SS400				6 33.69			5.7		
		SM400A	- 1	9 X 4 650 X 1207		1 176.5			2.5	2.5	
		SM100A	1			1 572.			3. 1	8.1	
	Pipe	SM400A		9 X & 650 X 6600		1 965.	4			13. 7	
		SM100A	i	9× d 650×1046		1 152.	6		2.2	2.2	
		SM400A		9 × 650 × 3063		1 448.	0		6. 3 2	6.3	
	nent	SM400A	- 1	$12 \times (\phi 1000 - \phi 650)$		1 12.	7	43 (	0.5		
		SS400		9×( ¢ 868- ¢ 668)	1.	2 17.0					
	t Pipe	SM400A	٦. ٦	¢ 300 × 200		9.	1		0.2	0, 2	
	pipe	SM400A		J		10.	2		0.2		
	Straight Pipe	SM400A	ЪГ	6 × ¢ 250 × 182	-	1 6.	9		0.1	0.1	
	Straight Pipe	SM400A	Ъľ	6 X & 250 X 972		1 35.	<u>. 1</u> ].		0.7	0.7	
	Straight Pipe	SM400A	<u>ار</u>	6× ¢ 250×6150		1 233.	0	223	1.9	<u> 1</u> 9	

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STEEL.	STEEL PENSTOCK (Trasition Pipe)		a a marine de					1	(c)	(0/0)
No.	the second s	Waterial		Dimensions(mm)		Weig	Weight(kg)	Paintin	Painting Area (m <sup>2</sup> )	1
		1 12 1 12 2 2		Shape × Longth	Wuantity	Unit	т. т. <b>М</b> с т.	Painting	Lin Acid	-
									┾	- -
	Bond Pipe	SM400A	Ŀ.	6× 4250×216	-	8.2	α	1	100	T
	Bend Pipe	SM400A	Ρl.	$6 \times \phi 250 \times 785$		2.62	30	i c		T
	Reinforcement	SM400A	- JI	9 × ( \$ 500 - \$ 250)		10 41	01	50	2	T
	Stiffener	SS100	- P1,	$6 \times (\phi 412 - \phi 262)$	9	3.7	22			T
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				Sub Total			140.483 2115 7	_	1833 7	T
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