

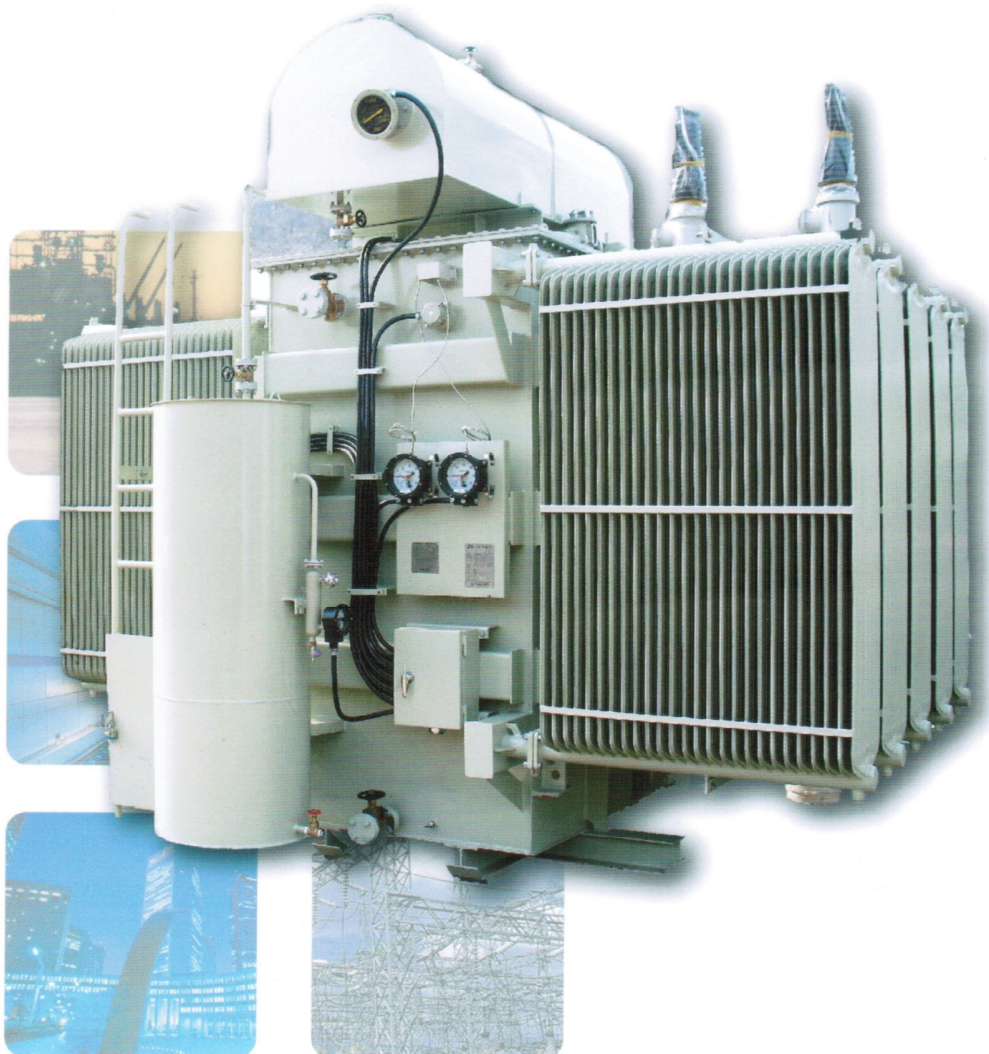
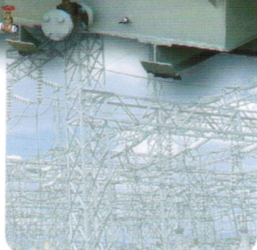
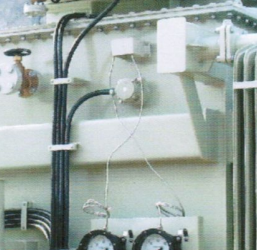
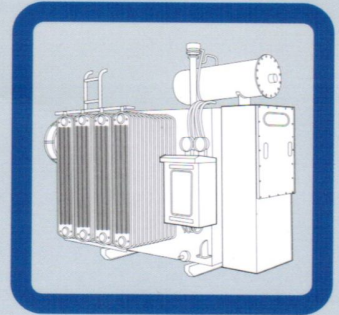


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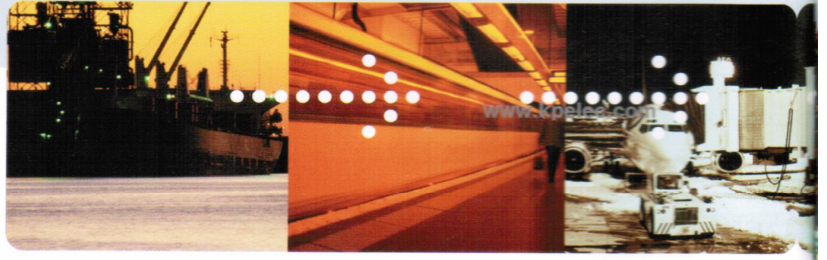
Oil Transformer

Capacity : 50~50,000KVA / Voltage : up to 72KV



KP ELECTRIC CO.,LTD.

KP ELECTRIC
Oil Transformer



Best Leader of Transformers





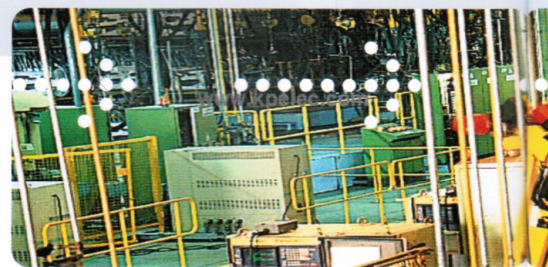
Oil Transformers



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Oil Transformer



CHARACTERISTICS OF TRANSFORMER

3 PHASE TRANSFORMER

OL IMMERSED TYPE

3 phase	H.V (kV)	L.V (V)	Connection
IEC 60076	F23.9 R22.9 21.9 20.9 19.9	380/220	$\Delta - Y$
	F6.9 R6.6 6.3 6.0 5.7	220	$\Delta - \Delta$
	F3.45 R3.3 3.15 3.0 2.85	440	
	F3.45 R3.3 3.15 3.0 2.86	480	

■ RATED KVA, ONAN AT 75°C

Capacity (kVA)	Efficiency (%)	Voltage regulation (%)	No Load current (%)	% IZ (%)	Frequency (Hz)
100	97.6	1.9	6.0	2.5	50 or 60
150	97.7	1.8	6.0	3.7	
200	97.8	1.7	5.5	3.7	
250	97.9	1.7	5.5	3.7	
300	98.0	1.6	5.0	3.7	
350	98.0	1.6	5.0	4.1	
400	98.1	1.6	4.5	4.5	
450	98.1	1.6	4.5	4.3	
500	98.2	1.5	4.5	4.7	
600	98.3	1.5	4.5	4.7	
750	98.3	1.4	4.0	4.7	
900	98.4	1.4	4.0	5.5	
1000	98.4	1.4	4.0	5.5	

3 phase	Primary(kV)	Secondary(V)	Connection
IEC 60076	F23.9 R22.9 21.9 20.9 19.9	3300	$\Delta - Y$
	F6.9 R6.6 6.3 6.0 5.7	6600	$\Delta - \Delta$
		3300/6600	

■ RATED KVA, ONAN AT 75°C

Capacity (kVA)	Efficiency (%)	Voltage regulation (%)	No load current (%)	% IZ (%)	Frequency (Hz)
100	97.6	1.8	6.5	3.5	50 or 60
150	97.7	1.7	6.0	4.0	
200	97.8	1.6	5.5	4.0	
250	97.9	1.6	5.5	4.0	
300	98.0	1.5	5.0	4.0	
350	98.0	1.5	5.0	4.5	
400	98.1	1.5	4.5	4.5	
450	98.2	1.5	4.5	4.5	
500	98.2	1.4	4.5	5.0	
600	98.3	1.4	4.5	5.0	
750	98.3	1.3	4.0	5.0	
900	98.4	1.3	4.0	6.0	
1000	98.4	1.3	4.0	6.0	



CHARACTERISTICS OF TRANSFORMER

1 PHASE TRANSFORMER

O L MMERSED TYPE

3 phase IEC 60076	H.V (kV)	L.V (V)	Connection
	F23.9 R22.9 21.9 20.9 19.9	220/110	Sub
	F6.9 R6.6 6.3 6.0 5.7	440/220	
	F3.45 R3.3 3.15 3.0 2.85	220 440	

■ RATED KVA, ONAN AT 75°C

Capacity (kVA)	Efficiency (%)	Voltage rugulation (%)	No load current (%)	% IZ (%)	Freguency (Hz)
100	98.1	1.7	5.5		50 or 60
150	97.7	1.8	6.0		
200	97.8	1.7	5.5		
250	97.9	1.7	5.5		
300	98.0	1.6	5.0		
350	98.0	1.6	5.0		
400	98.1	1.6	4.5		
450	98.1	1.6	4.5		
500	98.2	1.5	4.5		
600	98.3	1.5	4.5		
750	98.3	1.4	4.0		
900	98.4	1.4	4.0		
1000	98.4	1.4	4.0		

1 phase IEC 60076	Primary(kV)	Secondary(V)	Connection
	F23.9 R22.9 21.9 20.9 19.9	3300	Sub
	F6.75 R6.6 6.45 6.3 6.15	6600	
		3300/6600	

■ RATED KVA, ONAN AT 75°C

Capacity (kVA)	Efficiency (%)	Voltage rugulation (%)	No load current (%)	% IZ (%)	Freguency (Hz)
100	97.6	1.8	6.5		50 or 60
150	97.7	1.7	6.0		
200	97.8	1.6	5.5		
250	97.9	1.6	5.5		
300	98.0	1.5	5.0		
350	98.0	1.5	5.0		
400	98.1	1.5	4.5		
450	98.2	1.5	4.5		
500	98.2	1.4	4.5		
600	98.3	1.4	4.5		
750	98.3	1.3	4.0		
900	98.4	1.3	4.0		
1000	098.4	1.3	4.0		

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Oil Transformer



CHARACTERISTICS OF TRANSFORMER

3 PHASE TRANSFORMER

OIL IMMERSED TYPE

Amorphous Metal IEC 60076	H.V(kV)	L.V(V)	Connection
	F23.9 R22.9 21.9 20.9 19.9	380-220	$\Delta - Y$

■ RATED KVA, ONAN AT 75°C

Capacity (kVA)	Efficiency (%)	Voltage rugulation (%)	No Load current (%)	No load Loss (W)	% IZ (%)	Frequency (Hz)
100	97.7	1.9	1.9	120	4.0	50 or 60
150	97.9	1.9	1.9	135	4.5	
200	98.1	1.8	1.9	150	3.7	
300	98.2	1.65	1.8	200	3.7	
400	98.3	1.6	1.8	230	4.3	
500	98.5	1.5	1.8	270	4.3	
600	98.5	1.5	1.8	300	4.3	
750	98.5	1.5	1.5	350	4.5	
1000	98.7	1.45	1.5	450	5.1	

Domain Rrfinement steel(Laser core) Low noise & High Efficiency IEC 60076	H.V(kV)	L.V(V)	Connection
	F23.9 R22.9 21.9 20.9 19.9	380-220	$\Delta - Y$
	F6.9 R6.6 6.3 6.0 5.7	220	$\Delta - \Delta$
	F3.45 R3.3 3.15 3.0 2.85	440	

■ RATED KVA, ONAN AT 75°C

Capacity (kVA)	Efficiency (%)	Voltage rugulation (%)	No Load current (%)	No load Loss (W)	Noise Level (dW)	% IZ (%)	Frequency (Hz)
100	98.2	1.7	1.9	290	53	4.060	50 or 60
150	98.5	1.4	1.9	340	53	4.0	
200	98.6	1.3	1.9	380	53	4.5	
300	98.6	1.3	1.8	500	53	5.0	
400	98.7	1.3	1.8	580	54	5.4	
500	98.7	1.2	1.8	680	55	5.0	
600	98.8	1.2	1.8	800	55	6.0	
750	98.8	1.2	1.5	950	57	6.0	
1000	98.9	1.1	1.5	1000	57	6.8	



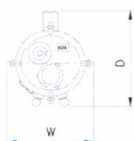
DIMENSIONS OF TRANSFORMER

SINGLE PHASE TRANSFORMER

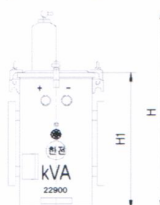
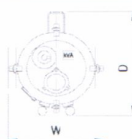
22900V

IEC 60076
1P 22900V - 220/110V

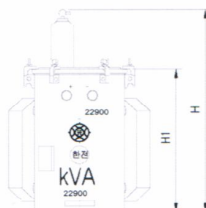
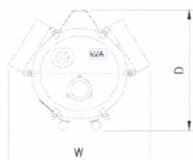
H.V(kV)	L.V(V)	Connection
F13.8 R13.2 12.6	220/110	Sub.



Dwg.1



Dwg.2



Dwg.3



Capacity (kVA)	Out Line Drawing	Dimension(mm)				Bushing Terminal		Oil Quantity (LT)	Weight (kg)	Remark
		W	D	H	H1	PRI.	SEC.			
10	Dwg.1	520	600	1080	710	HT-63	LTP-200	50	145	
20	Dwg.2	530	600	1140	770	HT-63	LTP-200	55	180	
30	Dwg.2	610	600	1180	810	HT-63	LTP-200	60	200	
50	Dwg.2	700	650	1200	830	HT-63	LTP-300	75	290	
75	Dwg.3	770	690	1220	850	HT-63	LTP-500	85	350	
100	Dwg.3	810	750	1280	910	HT-63	LTP-500	120	450	

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Oil Transformer



DIMENSIONS OF TRANSFORMER

3 PHASE TRANSFORMER

22900V

IEC 60076

3P 22900V-380/220V

H.V(kV)

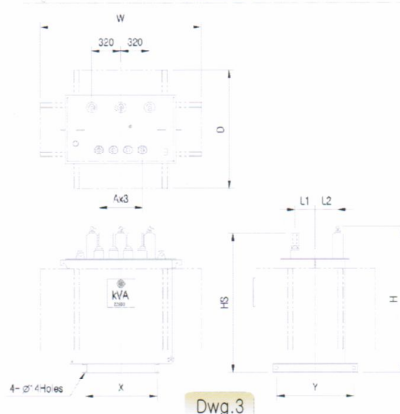
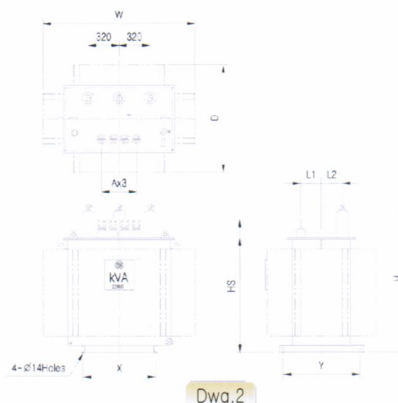
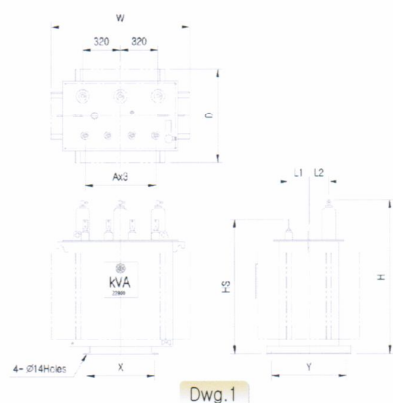
F23.9 R22.9 21.9 20.9 19.9

L.V(V)

380/220

Connection

$\Delta-\Delta$, $\Delta-Y$



Capacity (kVA)	Out Line Drawing	Dimension(mm)										Bushing Terminal		Oil LT	Weight kg
		W	D	H	AS	A	L1	L2	X	Y		PRI.	SEC.		
100	Dwg.1	1070	720	1280	1110	150	170	170	480	640		HT-63	LT-630	250	830
150	Dwg.1	1070	720	1280	1110	150	170	170	480	640		HT-63	LT-630	250	830
200	Dwg.1	1090	760	1330	1160	180	180	180	480	640		HT-63	LT-630	280	950
250	Dwg.1	1160	790	1370	1200	200	185	185	610	680		HT-63	LT-630	315	1100
300	Dwg.1	1270	870	1400	1230	200	185	185	610	680		HT-63	LT-630	340	1200
350	Dwg.2	1340	930	1410	1250	120	190	195	610	680		HT-63	LT-1000	365	1300
400	Dwg.2	1400	980	1410	1250	120	195	200	610	680		HT-63	LT-1000	380	1380
500	Dwg.2	1410	950	1480	1320	120	200	205	610	680		HT-63	LT-1000	440	1600
600	Dwg.2	1530	1080	1480	1320	120	215	220	700	800		HT-63	LT-1000	460	1810
700	Dwg.2	1660	1150	1530	1370	120	230	235	750	800		HT-63	LT-1000	570	2150
750	Dwg.2	1660	1150	1530	1370	120	230	235	750	800		HT-63	LT-1000	570	2150
900	Dwg.3	1780	1260	1620	1540	160	225	250	800	860		HT-63	LT-2000	650	2450
1000	Dwg.3	1820	1300	1620	1540	160	245	270	800	860		HT-63	LT-2000	705	2700

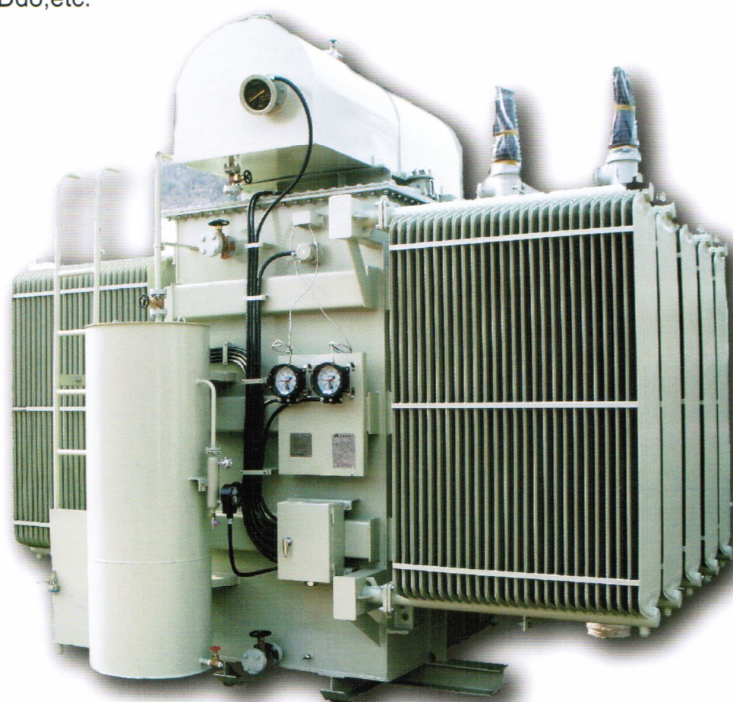


POWER TRANSFORMER

3 PHASE 22.9KV Class

• Ratings

- Phase : 3ϕ
- Frequency : 60Hz, 50Hz
- Primary voltage : 22.9KV
- Secondary voltage : 6.6 / 3.3KV
- TAP Voltage : F23.9-R22.9-21.9-19.9KV
- Vector : Ddo, etc.

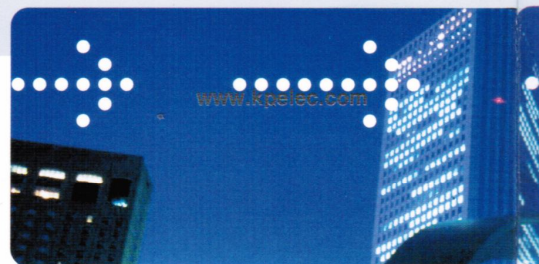


Characteristics & Dimensions

Capacity (kVA)	Exciting Current I_0 (%)	Voltage Req. ε (%)	Eff η (%)	Dimension(mm)			Oil (ℓ)	Total Weight (kg)
				W	D	H		
1500	4.5	1.25	98.5	2600	2100	2600	1480	4800
2000	4.5	1.20	98.5	2900	2200	2800	1700	6200
2500	4.0	1.20	98.7	2500	2500	2900	2000	7300
3000	4.0	1.20	98.7	2600	2600	3050	2200	8000
5000	4.0	1.10	98.9	3000	3000	3100	3200	12000
7500	3.5	1.00	99.1	3400	3400	3300	4000	14500
10000	3.5	1.00	99.2	3600	3800	4000	5500	16500

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Oil Transformer

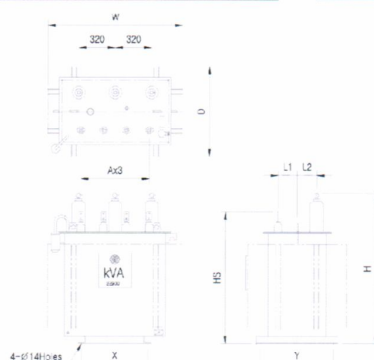


DIMENSIONS OF TRANSFORMER

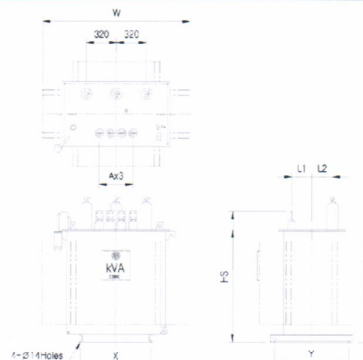
3 PHASE TRANSFORMER

22900V

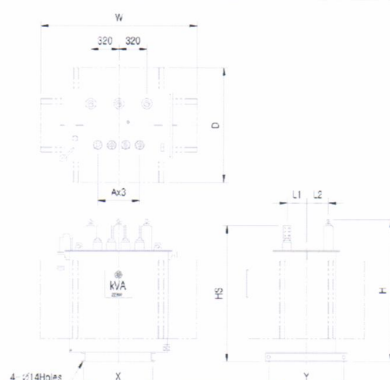
Amorphous Metal (IEC 60076)	H.V(kV)	L.V(V)	Connection
3P 22900V-380/220V	F23.9 R22.9 21.9 20.9 19.9	380/220	$\Delta-\Delta, \Delta-Y$



Dwg.1



Dwg.2



Dwg.3



Capacity (kVA)	Out line Drawing	Dimension(mm)										Bushing Terminal		Oil Weight	
		W	D1	D	H	H1	L1	L2	X	Y		PRI.	SEC.	LT	kg
100	Dwg.1	960	720	1330	1160	150	185	185	480	640		HT-63	LT-630	280	740
150	Dwg.1	1000	680	1330	1160	150	185	185	480	640		HT-63	LT-630	270	890
200	Dwg.1	1070	740	1330	1160	180	185	185	580	640		HT-63	LT-630	290	970
300	Dwg.1	1130	760	1480	1310	200	190	190	580	640		HT-63	LT-630	375	1250
400	Dwg.2	1390	840	1380	1230	120	180	190	750	640		HT-63	LT-1000	380	1600
500	Dwg.2	1530	920	1480	1330	120	190	200	750	640		HT-63	LT-1000	490	1800
600	Dwg.2	1540	1040	1390	1240	120	230	240	750	800		HT-63	LT-1000	490	1900
750	Dwg.2	1480	1020	1490	1340	120	260	270	750	800		HT-63	LT-1000	570	2300
1000	Dwg.3	1780	1140	1540	1500	160	265	290	860	750		HT-63	LT-2000	880	3100



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DIMENSIONS OF TRANSFORMER

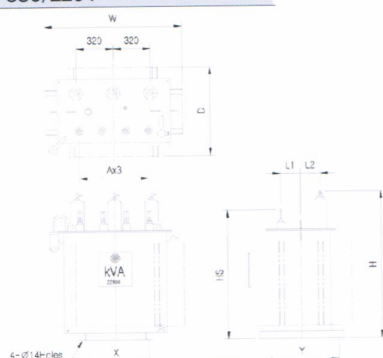
3 PHASE TRANSFORMER

22900V

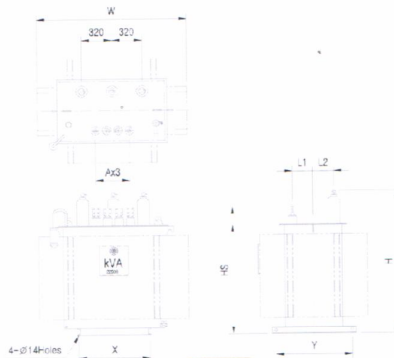
Domain Refinement(Laser core)
(Low Noise & Hight Efficiency)

3P 22900V-380/220V

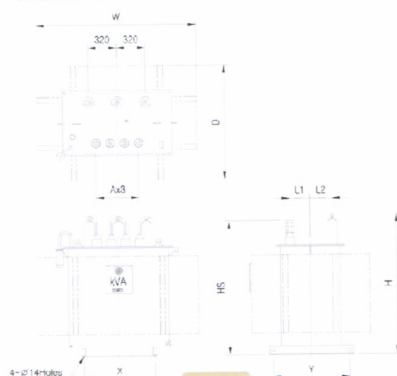
H.V(kV)	L.V(V)	Connection
F23.9 R22.9 21.9 20.9 19.9	380/220	$\Delta-\Delta, \Delta-Y$



Dwg.1



Dwg.2



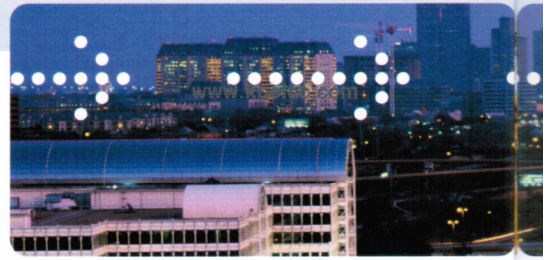
Dwg.3



Capacity (kVA)	Out line Drawing	Dimension(mm)										Bushing Terminal		Oil Weight	
		W	D1	D	H	H1	L1	L2	X	Y		PRI.	SEC.	LT	kg
100	Dwg.1	1010	650	1260	1090	150	155	165	480	640		HT-63	LT-630	245	780
150	Dwg.1	1030	650	1330	1160	150	155	165	480	640		HT-63	LT-630	245	930
200	Dwg.1	1100	750	1330	1160	180	200	195	610	680		HT-63	LT-630	300	1100
250	Dwg.1	1170	760	1380	1210	200	205	200	610	680		HT-63	LT-630	340	1400
300	Dwg.1	1190	760	1410	1240	200	205	200	610	680		HT-63	LT-630	360	1500
350	Dwg.2	1200	760	1450	1300	120	190	200	610	680		HT-63	LT-1000	370	1770
400	Dwg.2	1270	810	1450	1300	120	190	200	610	680		HT-63	LT-1000	420	2000
500	Dwg.2	1320	850	1490	1340	120	215	225	700	800		HT-63	LT-1000	510	2300
600	Dwg.2	1400	880	1520	1370	120	230	240	750	800		HT-63	LT-1000	560	2500
750	Dwg.2	1430	960	1560	1410	120	250	260	750	800		HT-63	LT-1000	580	3000
1000	Dwg.3	1640	1110	1640	1570	160	230	255	800	860		HT-63	LT-2000		

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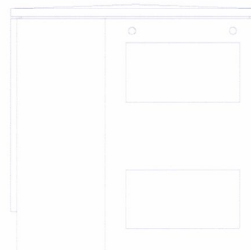
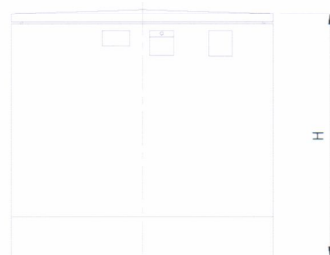
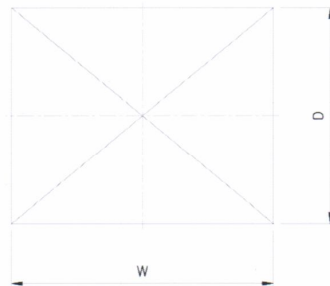
Oil Transformer



DIMENSIONS OF TRANSFORMER

1 PHASE PAD MOUNTED TRANSFORMER

ANSI C57	H.V(kV)	L.V(V)	Connection
1P 13200V-400/230V	F23.9 R22.9 21.9	L.V	Sub.
PAD Mount	F13.8 R13.2 12.6		
	F6.9 R6.3 6.0		
	F3.45 R3.3 3.0		



Dwg.1

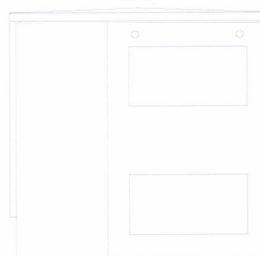
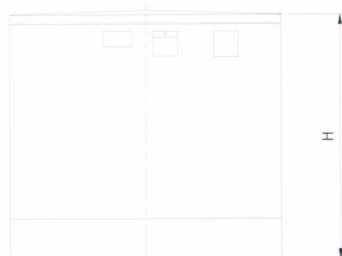
Capacity (kVA)	Out line Drawing	Dimension(mm)				Oil LT	Weight kg
		W	D	H	X		
50	Dwg.1	1000	1000	950	900	195	660
100	Dwg.1	1000	1000	950	900	295	760
200	Dwg.1	1000	1400	1150	900	320	1270



DIMENSIONS OF TRANSFORMER

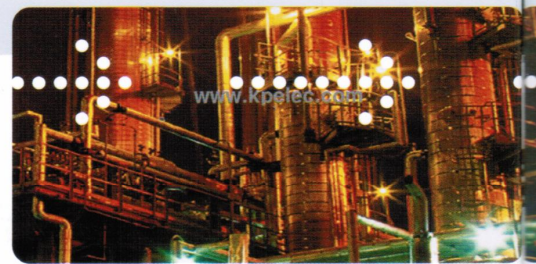
3 PHASE PAD MOUNTED TRANSFORMER

ANSI C57	H.V(kV)	L.V(V)	Connection
3P 22900V-400/230V	F23.9 R22.9 21.9	L.V	$\Delta - Y$
PAD Mount	F13.8 R13.2 12.6		$\Delta - \Delta$
	F6.9 R6.3 6.0		
	F3.45 R3.3 3.0		



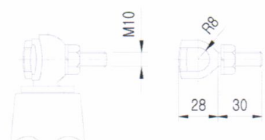
Dwg.1

Capacity (kVA)	Out line Drawing	Dimension(mm)				Oil LT	Weight kg
		W	D	H	X		
75	Dwg.1	1500	1000	1400	1400	250	1350
150	Dwg.1	1500	1000	1400	1400	365	1400
300	Dwg.1	1500	1250	1400	1400	665	1850
500	Dwg.1	1500	1500	1400	1400	840	2300

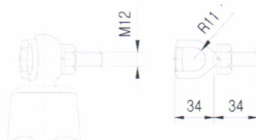


BUSHING TERMINAL & EARTHING TERMINAL

BUSHING TERMINAL



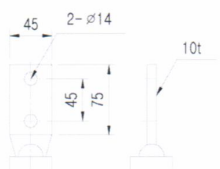
LTP-200



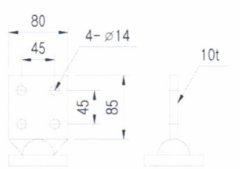
LTP-300



LTP-500



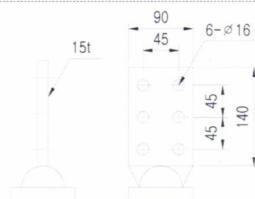
LT-630



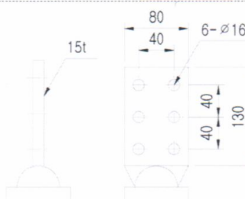
LT-1000



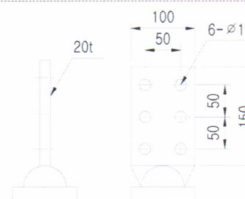
LT1-1000



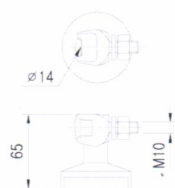
LT-2000



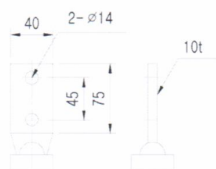
LT1-2000



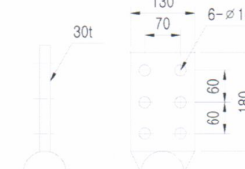
LT-3000



HT-63

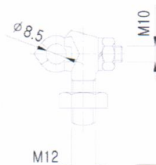


HT-200



LT-4000

EARTHING TERMINAL



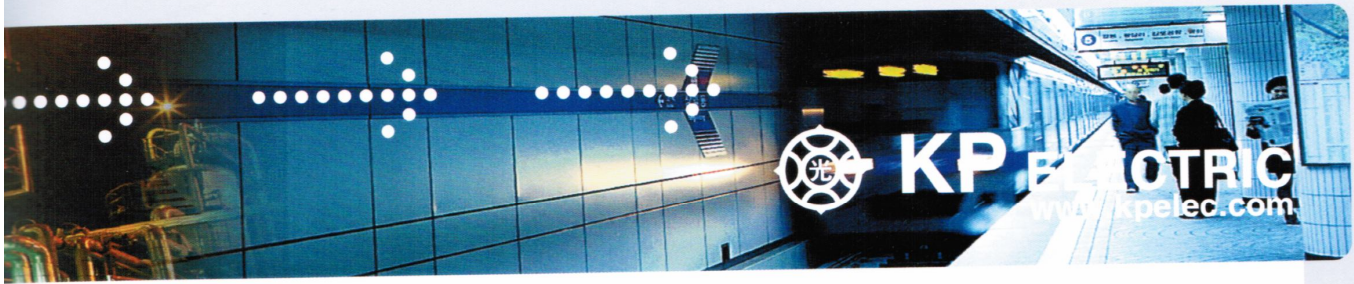
E-001



E-002

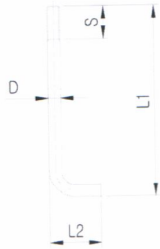


E-003



FOUNDATION BOLT & HOLES

Anchor Bolt & Hole (Below 1000kVA)



Anchor Bolt

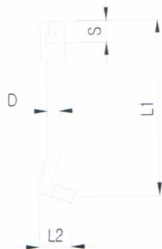
Capacity (kVA)	규격 (mm)			
	D	S	L1	L2
10 ~ 50	M10	25	160	40
75 ~ 1000	M12	32	200	50



Anchor Hole

Capacity (kVA)	Size (mm)	
	A	B
10 ~ 50	140	160
75 ~ 1000	160	200

Anchor Bolt & Hole (Above 1000kVA)



Anchor Bolt

Capacity (kVA)	Size (mm)			
	D	S	L1	L2
1000kVA~	M12	46	207	56



Anchor Hole

Capacity (kVA)	Size (mm)	
	A	B
1000kVA~	140	230