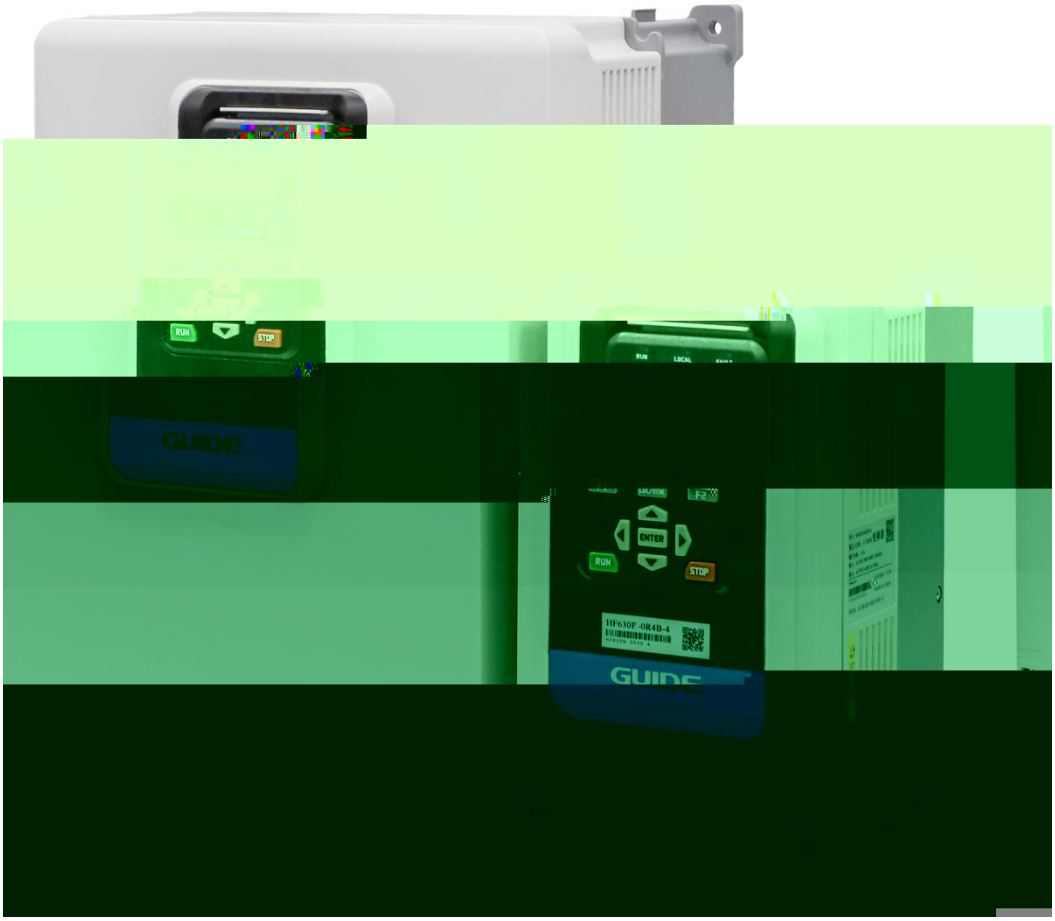

RUN
STOP
ENTER
RUN
STOP

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ſ ק ׳ □ ˇ ׳ ׀ ⌠ ו ח ׳ ŋ à ⊢ ׳

ſ ק HF630N ↓ □ ſ ק˜ ׀ ⌠ Б

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Н ضي Й

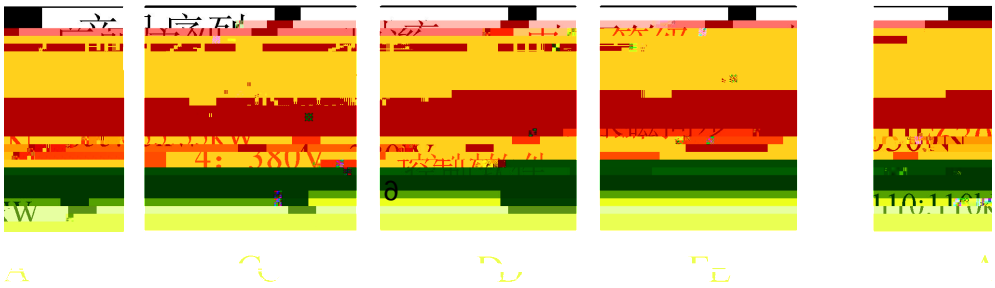
Hu

1 ˚˚ ج Ḥ
1.1 ǐ ﻤ ǐ ﻙ ﻤ Ƈ ʁ'
1.2 ɒ
1.3 N1~N10
1.4 ǐ
1.5˚˚ ج ˙˙
1.6 ɦ
1.7 ǐ ﻙ Ů
1.8 ǐ ﻙ ɒ
1.9 ǐ ﻙ Ư à غ
2
2.1 ﺑ
2.2
2.3
2.4 ~ ₹ ﻙ
2.5 └
3 ƀ
3.1 ǐ ﻙ à Ư
3.2 ƀ h
3.3
4 ƀ
4.1 ƀ
4.2 LED ƀ
5
5.1 ٧
5.2 ╠ Hu
5.3 U ǐ ă Δ .
5.4 ă
5.5 ă ɜ ǐ
6 ǐ ﻙ ă
6.1 ă └ P0
6.2 P2
6.3 ~ P3
6.4 ₹ P4
6.5 ǐ ǁ ~ P5
6.6 ǐ ǁ ₹ P6
6.7 Ḡ ă P7
6.8 Ω Ả └ P8
6.9 ǐ P9
6.10 V/F ǐ 1 ă P10
6.11 2 ă P11
6.12 1 └ P12
6.13 2 └ P13
6.14 ă P14
6.15 PID ﺷﺠ P15
6.16 ﺷﺠ P16
6.17 P19
6.18 └ P20
6.19 └ ă P21

6.20 P23
7 ǎ w
7.1 ǎ └ P0
7.2 P2
7.3 ~ P3
7.4 ₹ P4
7.5 ǐ ‖ ~ P5
7.6 ǐ ‖ ₹ P6
7.7 Ḡ ǎ P7
7.8 Ω Å └ P8
7.9 ǐ P9
7.10 V/F └ ǐ 1 ǎ P10
7.11 └ ǎ P21
7.12 P19
8 ǐ
8.1 ٦
8.2
9 Ь Ḡ Ī
9.1 Ḡ Ī ẹ
9.2
9.3
9.4 Ð
9.5 Ь Ḡ ḱ
Ɓ ˜ Ð
B1 PG ∖
B2 IO ∖
B3 ǐ PG ∖

1 ج ..

1.1 ..



ج .. .

A	.. ج ↓' HF630N
B	w' 5R5:5.5kW 055:55kW 110:110kW
C	ا ' 4:380V
D	' SW01 □ L Ð

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٦		Ð ..	
DL	ṗ ج	PG03	G □ ĵ ج .. ج ١
PN01	Profinet ١	PG04	G □ ĵ ج ĵ ج ١
BU	ṗ L- ا"H	I003 ^ IO ١~	5DI+2DO+1AI+Modbus RTU ^ G □ ĵ ج~

.. D .1

HF630Nmr t

HF630N-022-4+SW01	46	22	37	18.5	N4
HF630N-030-4+SW01	64	30	46	22	
HF630N-037-4+SW01	74	37	64	30	
HF630N-045-4+SW01	93	45	74	37	N5
HF630N-055-4+SW01	114	55	93	45	
HF630N-075-4+SW01	154	75	114	55	
HF630N-090-4+SW01	187	90	154	75	N6
HF630N-110-4+SW01	214	110	187	90	
HF630N-132-4+SW01	264	132	214	110	N7
HF630N-160-4+SW01	302	160	264	132	
HF630N-185-4+SW01	364	185	302	160	N8
HF630N-200-4+SW01	395	200	364	185	
HF630N-220-4+SW01	437	220	395	200	
HF630N-250-4+SW01	484	250	437	220	N9
HF630N-280-4+SW01	544	280	484	250	
HF630N-315-4+SW01	609	315	544	280	N10
HF630N-355-4+SW01	667	355	609	315	
HF630N-400-4+SW01	719	400	667	355	
HF630N-450-4+SW01	819	450	719	400	

'

1 à 0.4kW-37kW ṗ ჯ˜ 45kW-450kW ˆ ṗ ჯ’

2 à 0.4kW-37kW ṗ └ ˥ ˝Ḥ à 45kW-110kW ˆ ṗ └ ˥ ˝Ḥ à 132kW ĭ ɣ;:

ṗ └ ˥ ˝Ḥ ˆ ˥ └ ˥ ˝Ḥ

3 à ч LED ’

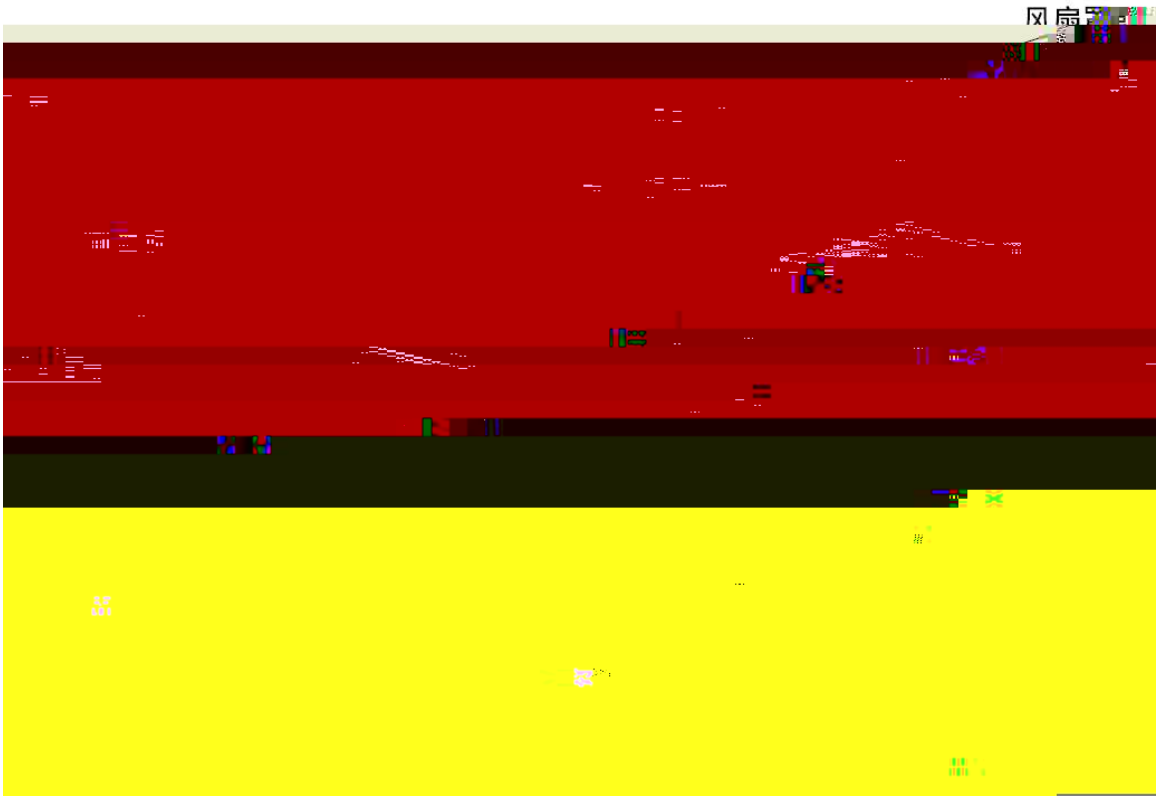
4 ’ ‘ ₣ 150% 5 № ¨Ḥ 1 № ’ ’ ‘

₣ 180% 5 № ¨Ḥ 1 № Â

1.2 Ð

HF630N ↓ ĩ ☹ W Ь □˘ ˜ Ң ﷺ˘ №≠ ė

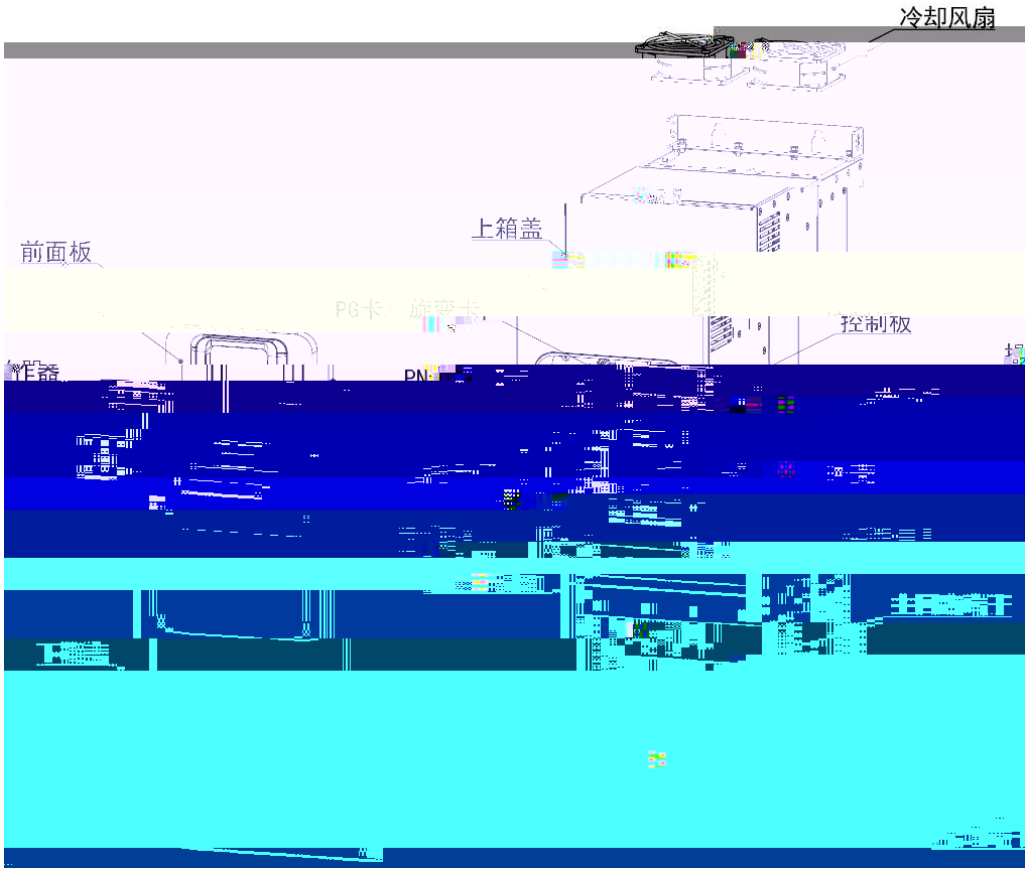
Â ЙҸ ˙ '



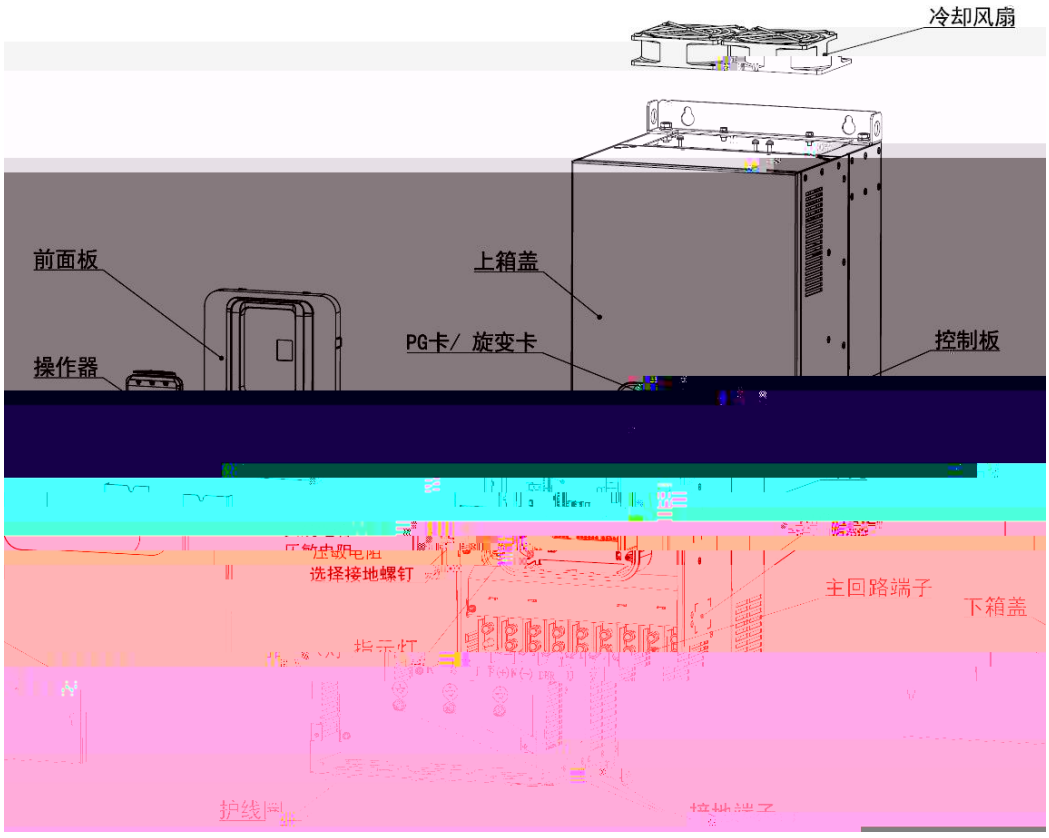
N1&N2ڰ ج Ð ˙ ˆ ⁂ 380V˙ 480V˘ 0.4kW˙ 11kW˜

N3 380V 480V 15kW 18.5kW

N4 380V 480V 22kW 37kW



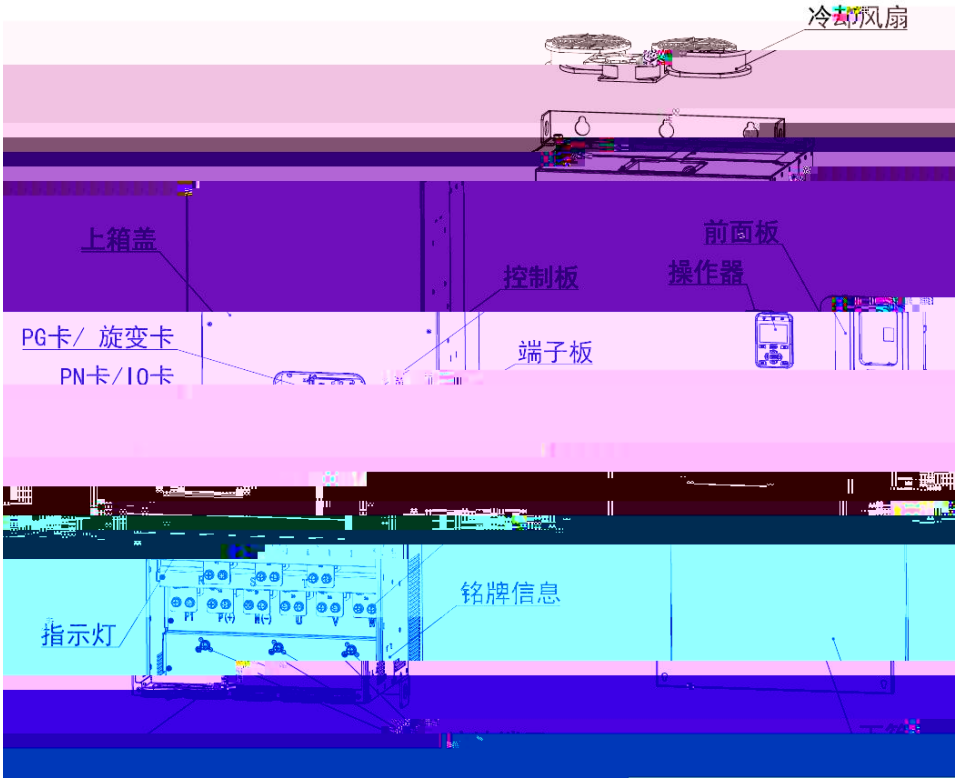
N5 380V 480V 45kW 75kW



N6 380V 480V 90kW 110kW

N7 380V 480V 132kW 160kW

N8 380V 480V 185kW 220kW

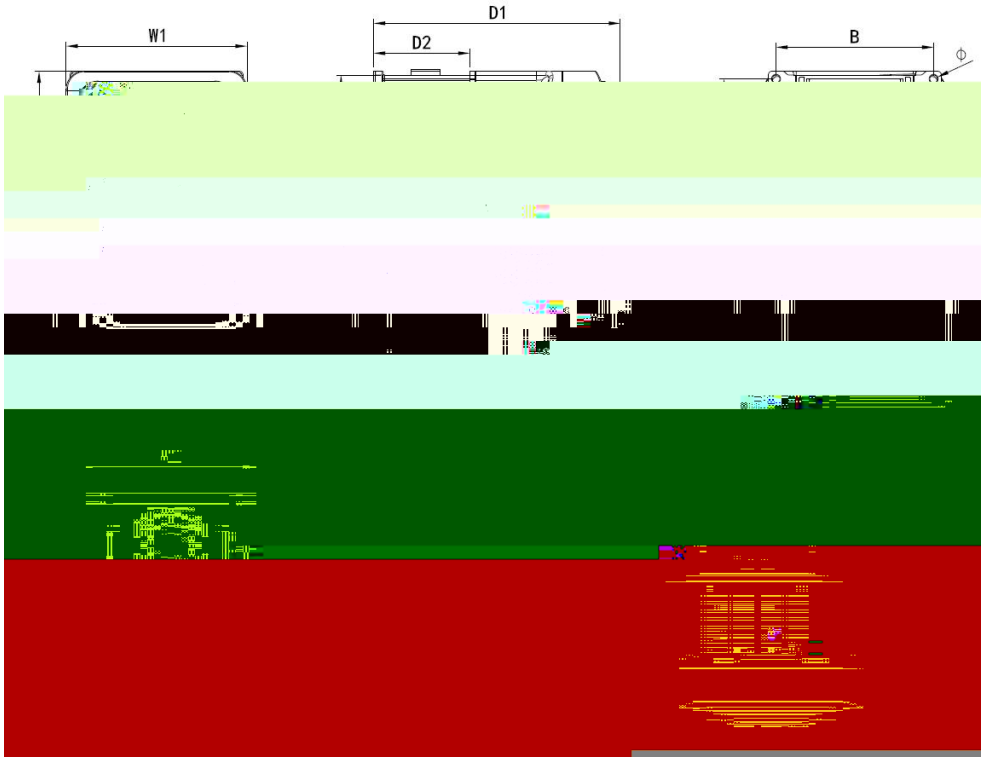


N9 380V 480V 250kW 280kW

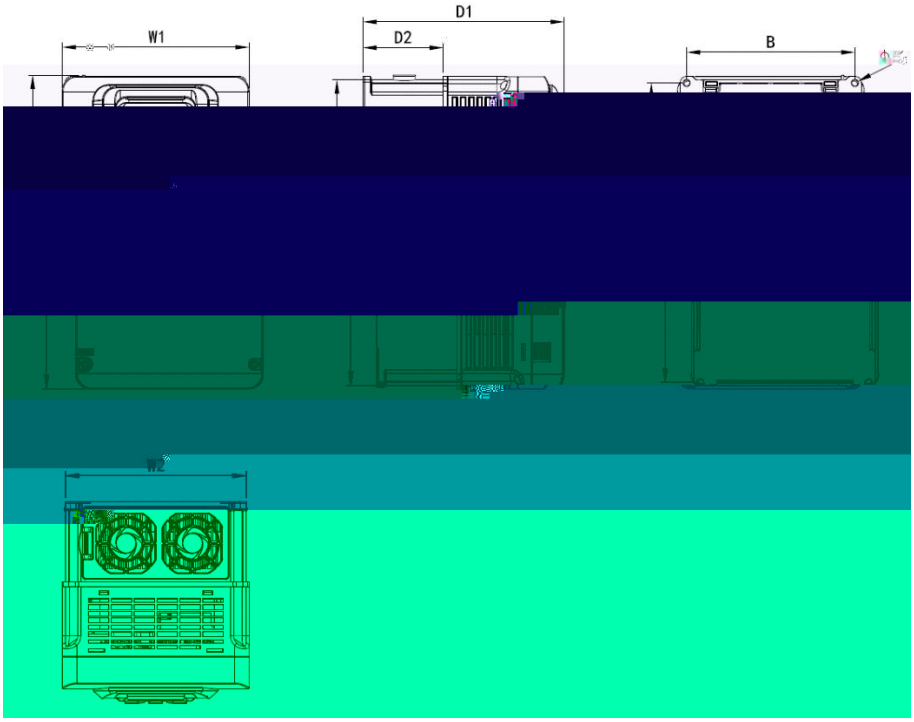


N10 380V 480V 315kW 450kW

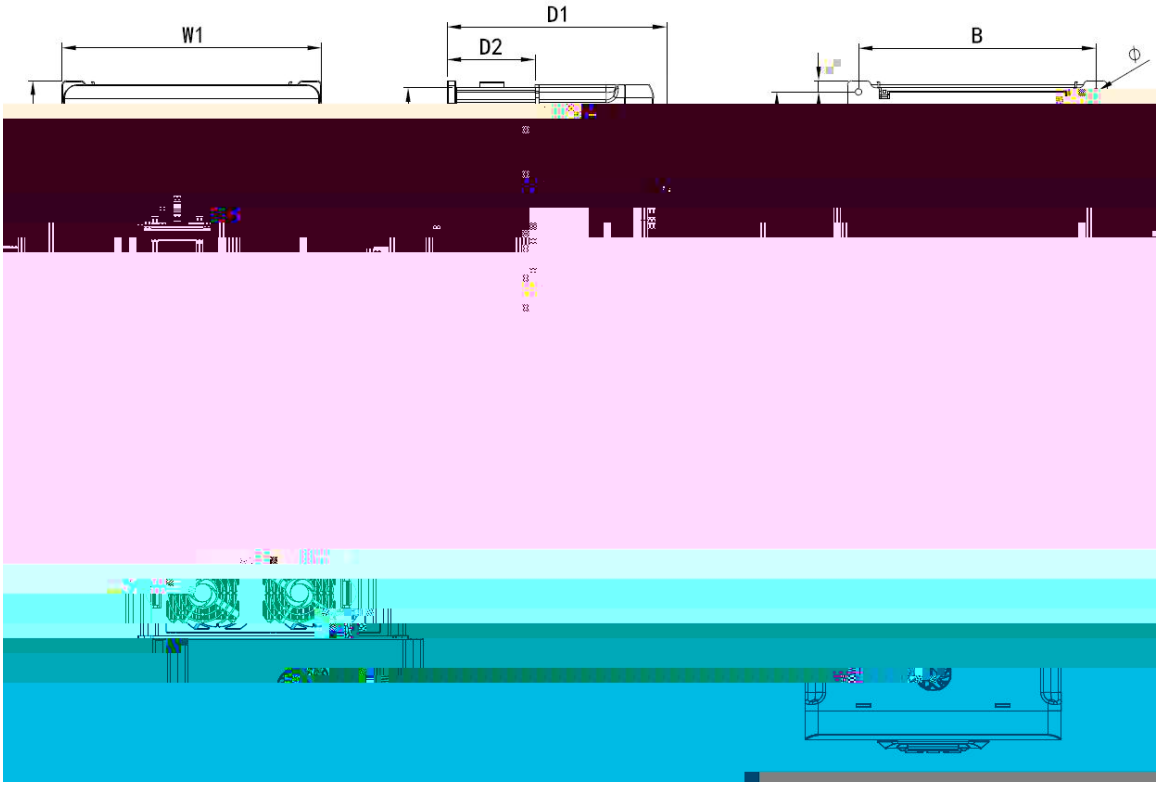
1.3 N1~N10



N1~N2 ﻡﻤﺼ ﺔﻴﻟآ ﺪﻳ



N3 ﻡﻤﺼ ﺔﻴﻟآ ﺪﻳ



N4

N5~N6 فهم آ يد

N7~N9 غم آ ید

N10 فم آ ید

1.5 ج

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	wr	DIDơ DIDO˜ L, wr ' ǐ ح ∫ U ¯ Å ' ' ا Ա ṗ ˘ ǐ ح ∓
~ ∓	~	~ 5 à ~ 2 ^ ا -10˙ +10V 0mA/4mA˙ 20mA -20mA˙ 20mA˜ ضي
	∓	∓ 3 ^ 1 ∓ ڊ 2 ح ∓˜ à ∓ 2 ^ ا 0˙ +10V 0mA/4mA˙ 20mA˜ ضي
¬	ƀ LED	˜ ˜ ă ˘ Ӟ˜ ∓ à ∓ ا à ∓ Θ ǐ ă ڜ Âṗ ' Θ ا β
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ą ضي		Ь ǐ ۅ à ڊ
		٧ G 1000 ˘ Â 1000 ضي ˘ ₰ 100 ٧ 1% ˘ ٧ ا ǐ ∓ Â 3000 h ٨ ٣
		-10Ṇ˙ +40Ṇ˘ 40Ṇ˘ ą ˘ ٱ 1Ṇ˘ 1%Â 50Ṇ h ٨ ٣ Â ٧ G -10Ṇ˘ ₰ ↑ ₰
		G 95%RH˘ o
	Ũ	Ũ -20Ṇ˙ +60Ṇ Â G ˘ Ũ ٨ ˘ ٨ ǐ ڪ؛؛ 10-30 № ˘ ą ˜Ḥ
ǐ	ƀ ٨	L 3 ѡ ˘ J3˜ ٨ ڊ IO ٨˘ J40 PN ٨ à J23 PG ٨
	ǐ ٢ o	o
		IP20
	' ٧	L '
		2
	ل	Ů80db

1.6 h

ז ₩ ٧˜ ă ӟ˘ ƀ Ḃ˘ Ь ' ,

Ƶ ˘ ˜ ضي180% ' Ѝ Ω¬ '

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1.7 ï ÿ Ö

˚˚˚	[kW]	Ö [kW]	˚˚˚	[kW]	Ö [kW]
HF630N-0R4-4+SW01	0.4	0.048	HF630N-055-4+SW01	55	1.313
HF630N-0R7-4+SW01	0.75	0.059	HF630N-055-4+SW01	55	1.313
HF630N-1R1-4+SW01	1.1	0.068	HF630N-075-4+SW01	75	1.486
HF630N-1R5-4+SW01	1.5	0.079	HF630N-075-4+SW01	75	1.486
HF630N-2R2-4+SW01	2.2	0.092	HF630N-090-4+SW01	90	1.956
HF630N-3R7-4+SW01	3.7	0.151	HF630N-090-4+SW01	90	1.956
HF630N-5R5-4+SW01	5.5	0.151	HF630N-110-4+SW01	110	2.422
HF630N-7R5-4+SW01	7.5	0.218	HF630N-110-4+SW01	110	2.422
HF630N-011-4+SW01	11	0.277	HF630N-132-4+SW01	132	3.100
HF630N-015-4+SW01	15	0.328	HF630N-160-4+SW01	160	3.663
HF630N-018-4+SW01	18.5	0.5	HF630N-185-4+SW01	185	4.495
HF630N-022-4+SW01	22	0.645	HF630N-200-4+SW01	200	4.800
HF630N-022-4+SW01	22	0.645	HF630N-220-4+SW01	220	4.91
HF630N-030-4+SW01	30	0.722	HF630N-250-4+SW01	250	5.88
HF630N-030-4+SW01	30	0.722	HF630N-280-4+SW01	280	7.044
HF630N-037-4+SW01	37	0.906	HF630N-315-4+SW01	315	7.708
HF630N-037-4+SW01	37	0.906	HF630N-355-4+SW01	355	8.003

HF630N-0-10

1.9 ہ ہ ہ ہ ہ ہ

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1. ہ ہ ہ ہ ہ ہ

2

2.1 ﻫ



HF630N+SW01 □ f ﻫ ″Ḥ Ð ą

2.2

ÞЬ ضي Ï ק ₣ ט ק └ק˜ Ղ ↕ Ψ Ï ק

ع └ק شخ Â

Þ Ï ק ˜ / ₣ (ח غ) ´ Ƈ №ˇ ˆ Ï ק

Â

ˆ ק˜ ą Â

2.3

W	ק^ A˜ ă	˜ / ₣ ^ mm²˜ ^ CEFR ۱ 40%Ա Ъ˜	ק^ A˜ Ъ (AC-3)
0.4 kW	1.8	2.5	9
0.7 kW	2.6	2.5	9
1.1kW	3.3	2.5	9
1.5 kW	4	2.5	9
2.2 kW	5.7	2.5	9
3.7 kW	10.2	2.5	12
5.5kW	15	2.5	18
7.5kW	18	2.5	18
11kW	24	2.5	25
15kW	32	4	32
18.5kW	41	4	50
22kW	47	6	50
30kW	65	10	65
37kW	75	10	80
45kW	94	16	95
55kW	115	16	115
75kW	155	25	150
90kW	188	35	205
110kW	215	50	245
132kW	265	70	300
160kW	330	95	410
185kW	365	95	410
200kW	396	120	475

220kW	438	120	475
250kW	485	70*2	620
280KW	545	70*2	620
315kW	610	95*2	620
355kW	668	120*2	2*410
400kW	720	120*2	2*410
450kW	820	150*2	2*475

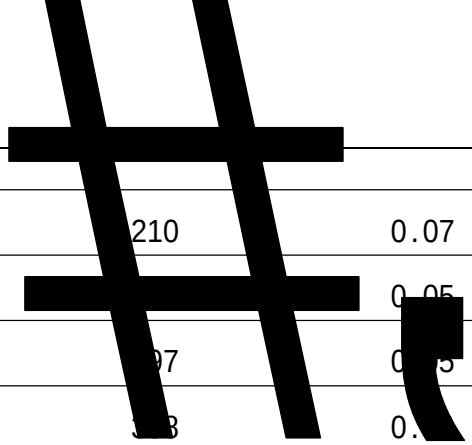
2.4 ~ ₹´ ಶ

~ ಶ ₹ ಶ

w 2% ~ ۱ 1% ₹ ۱

^ A~ ^ mH~ ^ A~ ^ mH~

0.4 kW 28 m"



110kW	210	0.07	215	0.03
132kW	[illegible]	0.05	265	0.03
160kW	[illegible]97	0.05	303	0.02
185kW	[illegible]3	0.[illegible]	365	0.02
200kW	388	0.04	396	0.02
220kW	430	0.03	438	0.02
250kW	475	0.03	485	0.01
280KW	534	0.03	545	0.01
315kW	598	0.02	610	0.01
355kW	655	0.02	668	0.01
400kW	705	0.02	720	0.01
450kW	803	0.02	820	0.01



22kW	22	18	ů 8	ů 11
30kW	20	18	ů 10	ů 13
37kW	16	14.8	ů 12	ů 16
45kW	13	8	ů 15	ů 20
55kW	10	8	ů 20	ů 26
75kW	7.5	6.8	ů 26	ů 35
90kW	6.8	5.1	ů 29	ů 38
110kW	5.1	4.8	ů 38	ů 50

' 1 à 110kW ĭ ɣ Й, ĭ ҁ ṗ └ ӏ ″Ң 100% └ ʐ '

2 à Kc' └ ˘ 'P \l ɷ ƀ ɒ '

3 à └ w ,ˆ Â

3 Ь

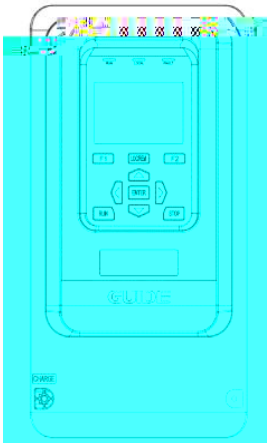
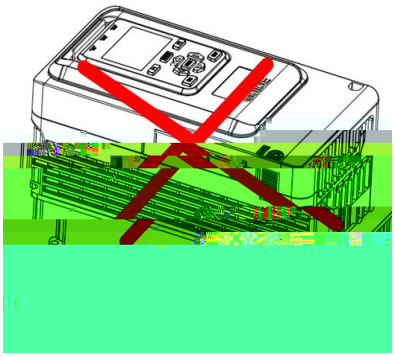
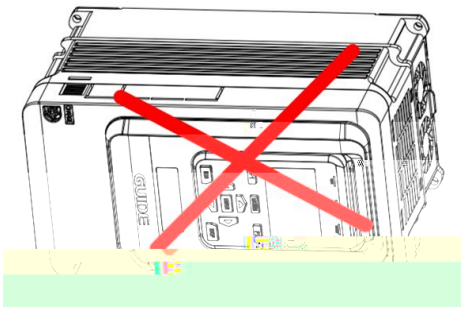
3.1 Ї ҷ à Ũ

		Ũ	
´	ھ	ضG ´ Ţ	٨ ج ‰´
شي	' شي ھھ G ṗ ھط ھ Ў Ŧo 10cm à ŏ ŭ 5cm Â ' ٧ : ч Â ѿ ѽ ę ~ ˘ ˘ Ь ˘ з ѵ Â	Ũ' شي ' ض ⌈ à ṗ شي Â ǖ ę Ь 6 ѫ Â	Ї ' ض ‰´ Ţ˘ ˜ à à à Ї Â
	-10Ņ˙ +40Ņ˘ 40Ņ˘ ą ˘ ٦ 1Ņ˘ 1% Â 50Ņ h ٨ ٣ Â ٧ G -10Ņ˘ ѵ ↑ ѵ Â	-20Ņ˙ +60Ņ˘ Ї G 1Ņ/№ Â	-20Ņ˙ +60Ņ
٨	70˙ 106 kPa 0.7˙ 1.05 ٨	70˙ 106 kPa 0.7˙ 1.05 ٨	60˙ 106 kPa 0.6˙ 1.05 ٨
⌟	10Hz Ů f Ů 57Hz' ' 0.075mm 57Hz Ů f Ů 150Hz' ѵ ' 9.8 m/s2	10Hz Ů f Ů 57Hz' ' 0.075mm 57Hz Ů f Ů 150Hz' ѵ ' 9.8 m/s2	⌟ ' `E ⌟ Н˙ I I
ll D_P	Ь ¨Ņ	ѵ 100m/s^2 11ms	ѵ 100m/s^2 11ms
Й	Ь ¨Ņ	250mm˘ <100kg ' 100mm˘ ů 100kg Â	250mm˘ <100kg ' 100mm˘ ů 100kg Â
	G 95%RH˘ o		
	٧ G 1000 ˘ Â 1000 شي ˘ ѵ 100 ٧ 1% ˘ ٧ ٨ Ї Ŧ Â 3000 h ٨ ٣ Â		
	2		
r	ą ض à à ھض à r à r Â Ь ˘ з ѵ Â		

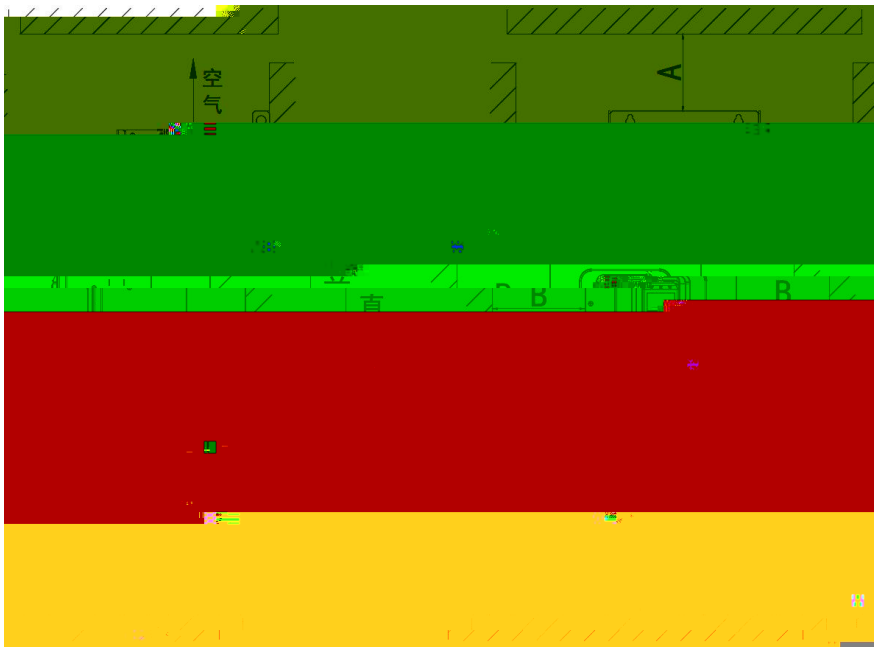
3.2 Ь h

3.2.1 h

ч ъ ≠ G Ї ك ˘ Ї ك ضي hh Â Й β Â

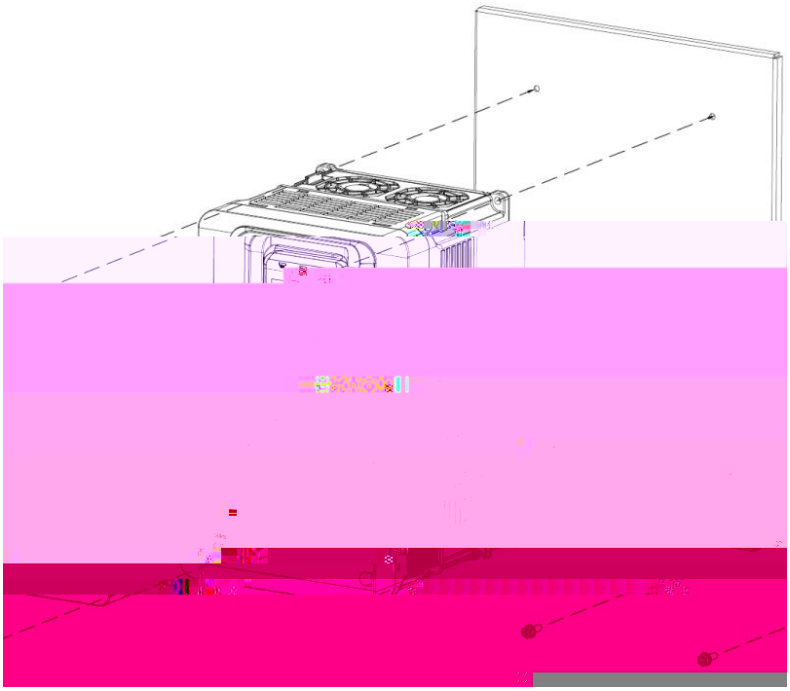
3.2.2

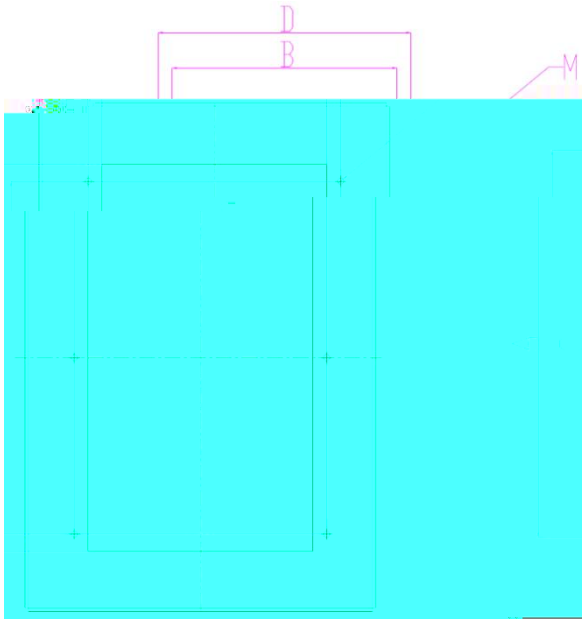


ضم	W		(ч β' mm)
N1˙ N3	0.4˙ 18.5kW	A ů 100	B ů 20
N4	22˙ 37kW	A ů 200	B ů 20
N5˙ N6	45˙ 110kW	A ů 250	B ů 50
N7˙ N10	132˙ 450kW	A ů 300	B ů 50

Þ □ W ﻲﺸﻴ ﻍ ﻎﺠ ˘ ٢ ЙĮ ٌٌ ج Â

ˆ 1˜ ˆ G ΐ ﺞﻛ˜





~	ааа	W	~ ^ Ч β' mm~		^ Ч β' mm~		Ґ E
			A	B	C	D	M
1	N1/N2	0.4kW· 11kW	267	139	240	175	6-M5
2	N3	15kW· 18.5kW	307	178	280	200	6-M5
3	N4	22kW· 37kW	378	283	360	300	6-M6

' M4: 12 ¤ 1KGF.CM' M5: 20 ¤ 2KGF.CM' M6: 30 ¤ 3KGF.CM

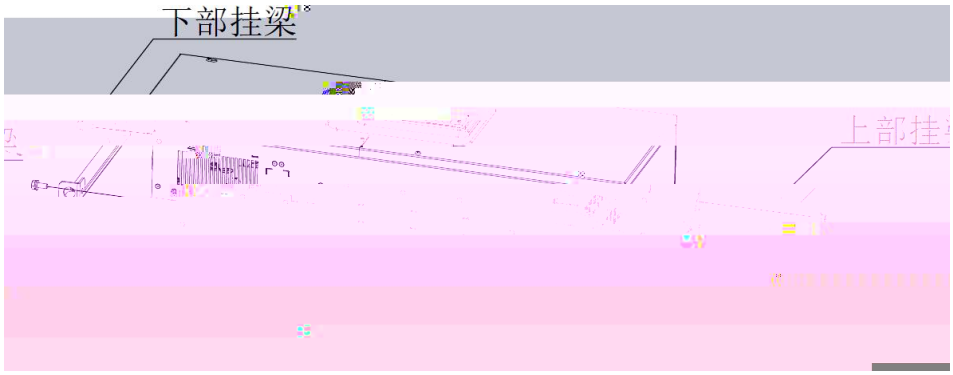
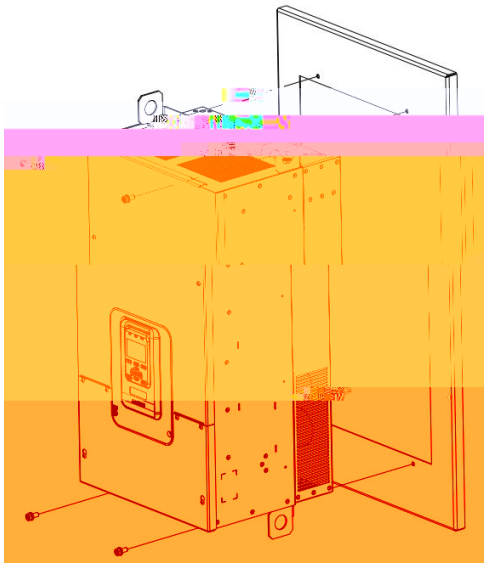
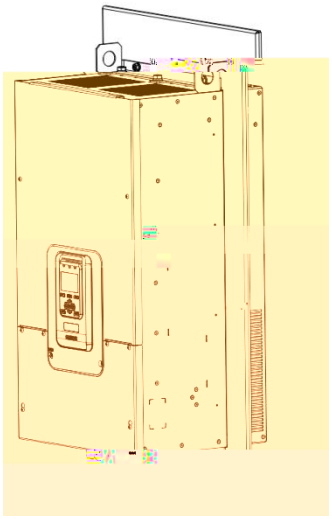
ń ≠ ' ^ 0.4 kW· 37kW~ ааа ЗЎ ~ Ч Ð˘ ‰ ааа Ь Ч

Ü ' ~ ˘ з Â ˘ ⊢

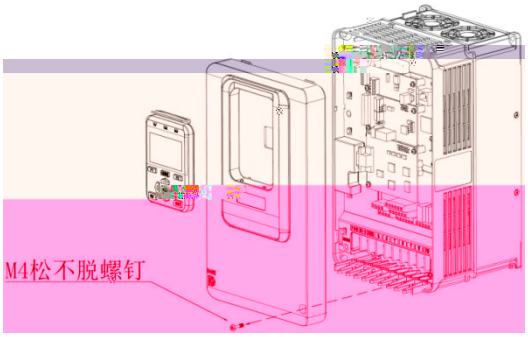
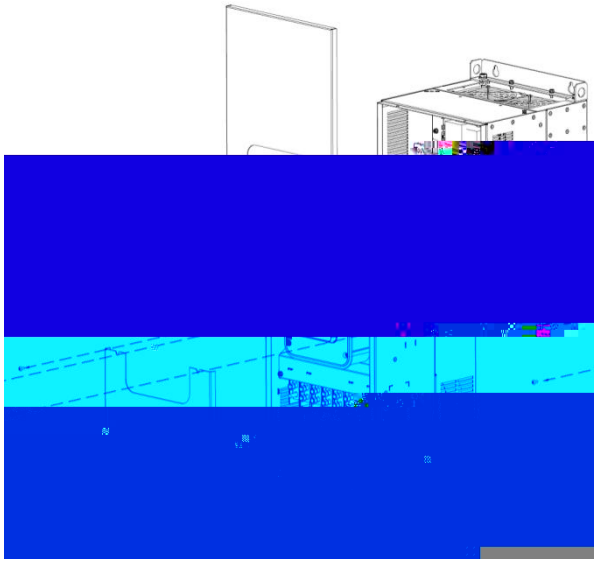
ааа Â

~ ааа~	ааа	Ч ^ Ч β' ~
HF630N-N2	N1/N2	1
HF630N-N3	N3	1
HF630N-N4	N4	1

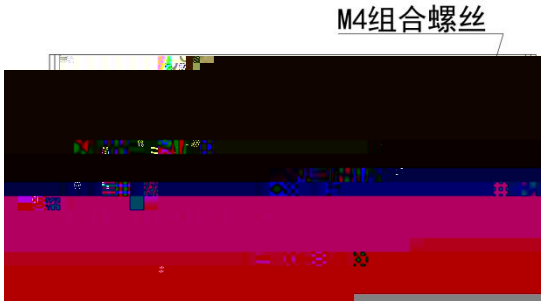
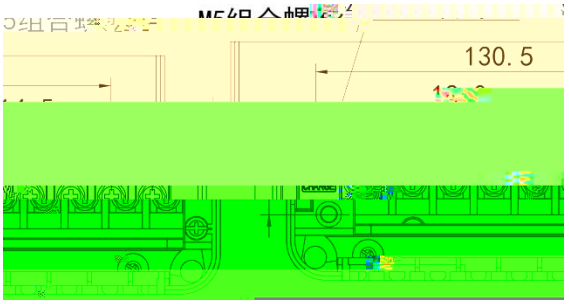
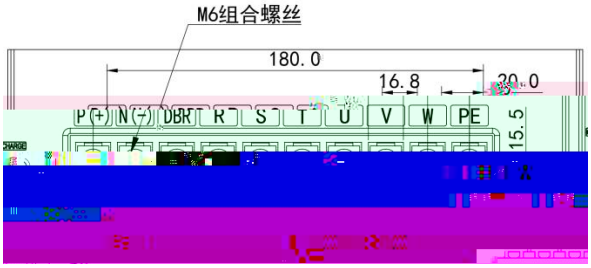
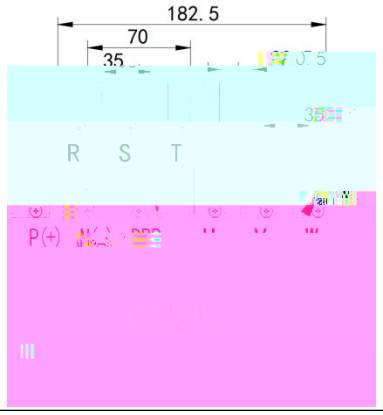
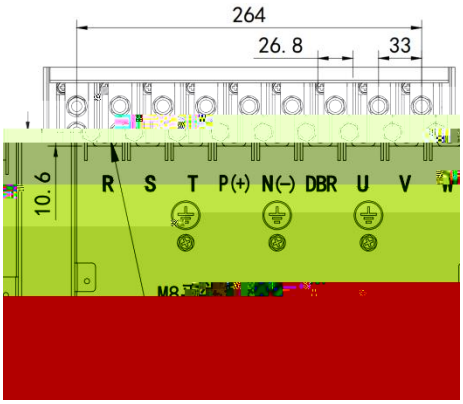
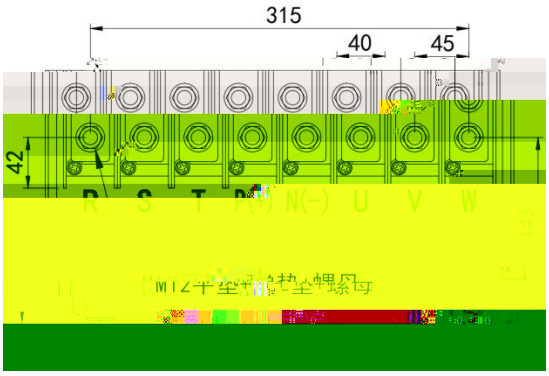
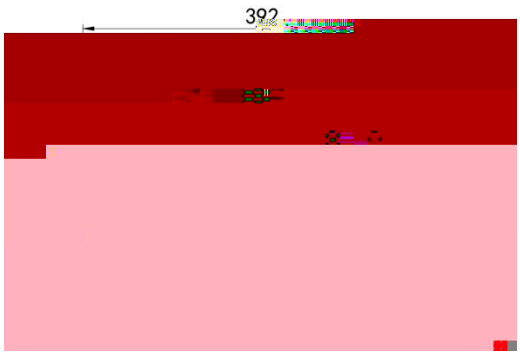
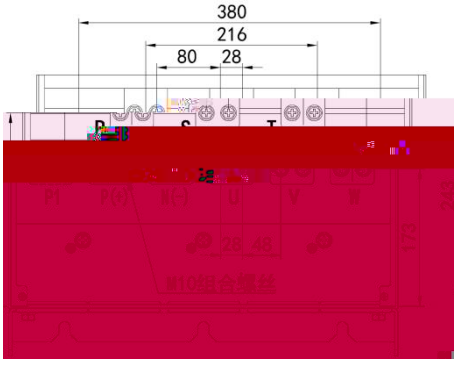
2~ ааа^ N5· N10~

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Ŷ ⁞ L ⁞ ’ ŷ ~ Â
 

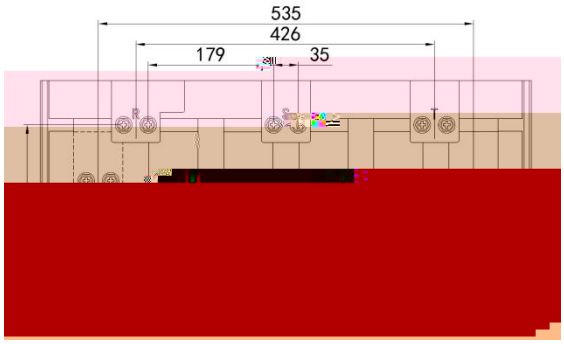
3.2.4 ⁄ Ь

⁄ N1˙ N4˜ ⁄ Ь	
1˜ ŭ Ӈ U˘ U ’	
2˜ Ƙ ₴ ⁘ M4 Ь ⁄˘ U ˆ ⁄˘ ɣ ѽ ⁄ ˜ Â	
⁄ N5˙ N10˜ ⁄ Ь	
1˜ Ƙ ₴ ⁘ ɜ ɷ ŋ ⁄’	
2˜⁘ Ң⁘ ₮˘ ‘P ŭ Ӈ’	
3˜ Ӈ h Ӈ ŭ ₮ˆ ң ˆ ɣ Ь ŭ ₮˘ ‘P ⁄ ₮ ⁄ ˜ Â	

3.3.2 h

N1~N2 h	№	N3 h	№
			
N4 h	**№**	**N5 h**	**№**
			
N6 h	**№**	**N7 h**	**№**
			
N8 h	**№**	**N9 h**	**№**
			

N10 h عِ № ىح

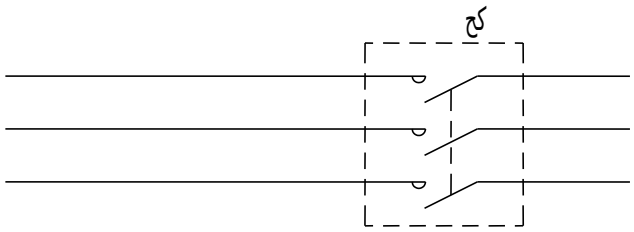


(1) N1~N2 قمم h Й, ىح'

(2) N3~N4 ھ h Й,ي'

(4) N6 ﻗﻤﻢ h Й,ﻳﺤ'

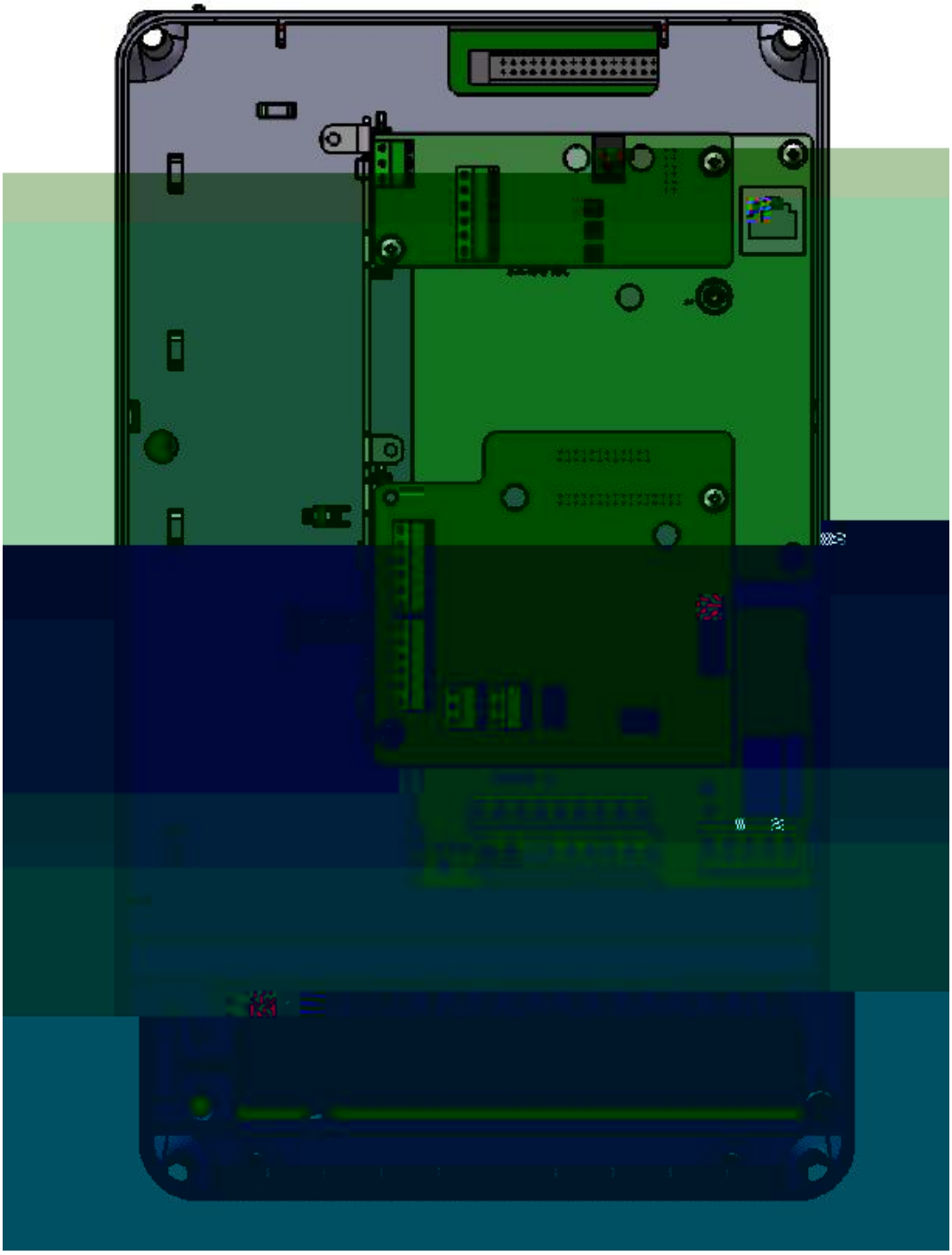
7	Ґ ◌ U à V à W ₣ Ь ˚ ץ ѵ Ք ì Ք	◌ Й ◌ Â
8	ч ⋮ ˘ Ґ ◌ Ш ◌ Ţ ◌ à ◌ ◌ Ք ◌ Â	
9	ą ї̆ L Â L h ɛ ^ ´ à à ◌ à ◌ ~ 10cm ץ Â	
10	◌ ~ ї̆ ₣ ◌ ˘ 0.75mma ץ ˘ Ь Ґ ◌ ض ˘ G 50m Â	
11	L Ь h ◌ ¬ ą № ˘ 10cm ץ ˘ ´ ї̈ ą ì Â	
12	Ґ ◌ Ь G 100m˘ G 100m ˘ ѵ ₣ ◌ ३ ∧ Â	
13	Ь ˚Ң№ ◌˘ ץ Ḡ Â h ◌ Â ą ˘ ą ' ∧ U ' P Â	
14	∧ Ь Ґ ◌ ∧ Â	
15	₣ ^ Ґ ◌ Ь ~ G 30 m Â	

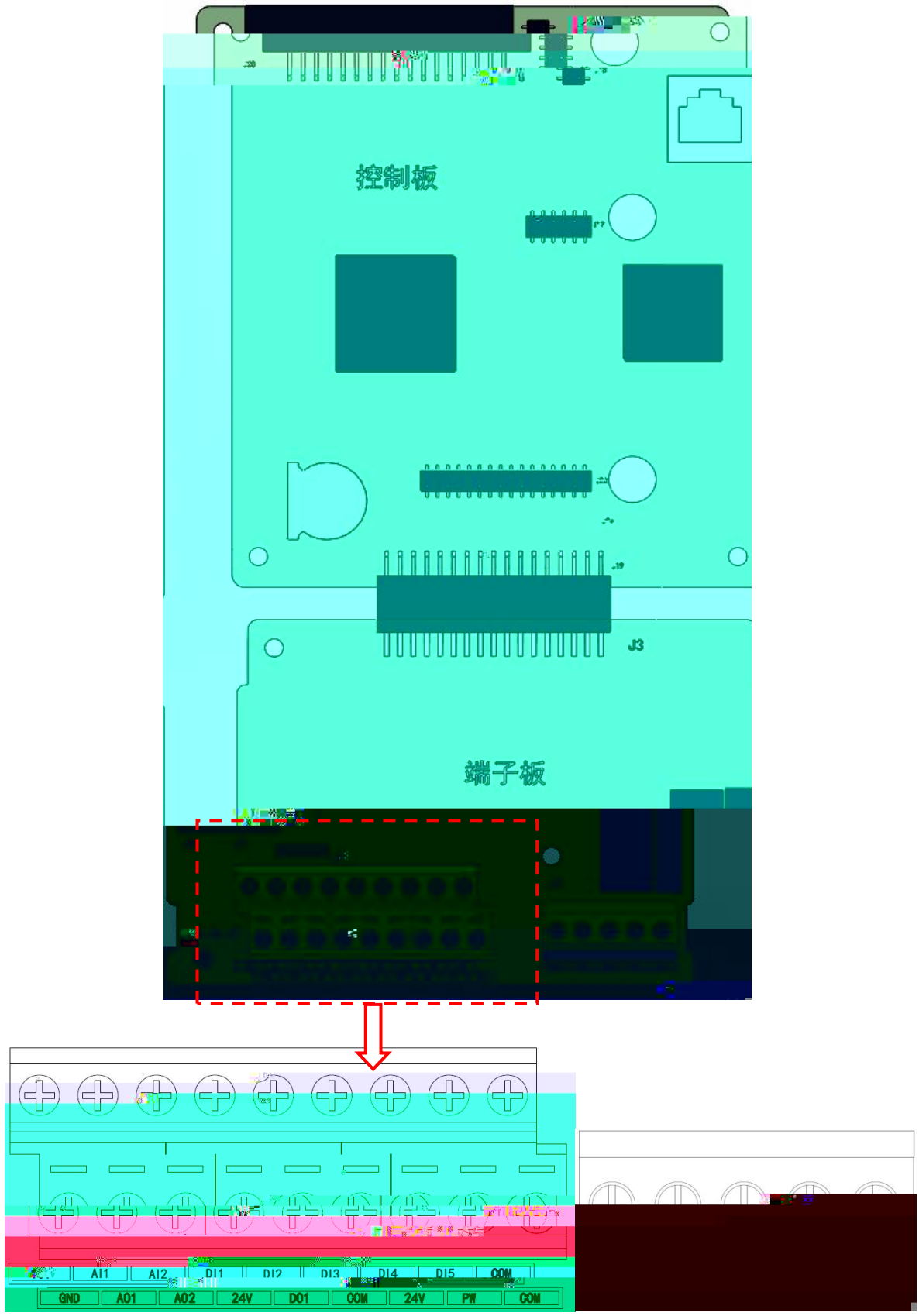


3.3.4 L

ضِ L عج ˘ ĭ ƀ à PG ∖ ~ w ∖ ~ ˘ ۞
Й ĭ ک Â Й U˘ L à ĭ ۷ ∖ β Й ید Â

HF630N L β ید




控制板
J3
端子板
AI1
AI2
DI1
DI2
DI3
DI4
DI5
COM
GND
AO1
AO2
24V
DO1
COM
24V
PW
COM

4 ƀ

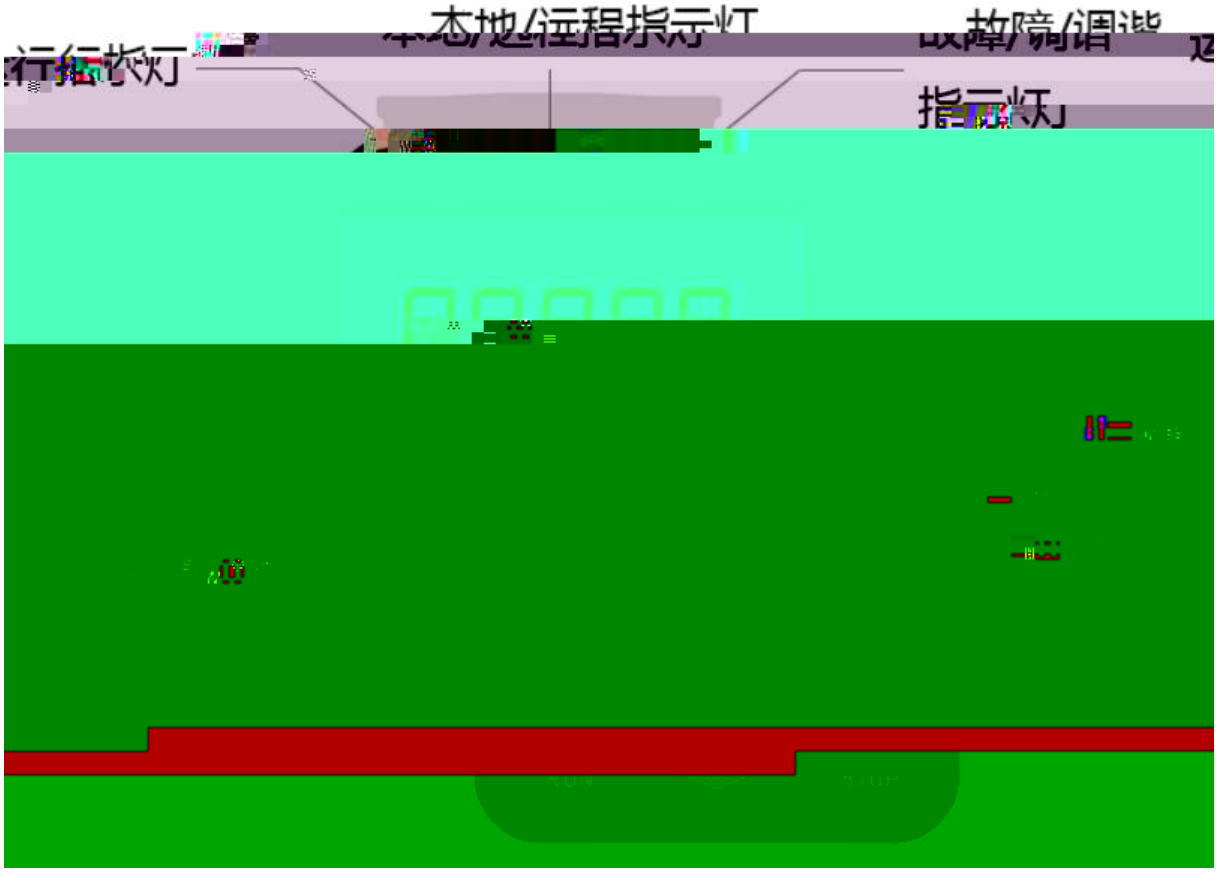
4.1 ƀ

HF630N ↓ ǐ ૯ LED ƀ ǎ à ǵ w Â

4.2 LED ƀ

4.2.1 LED ƀ :

Й ҙ ч ƀ ė w :



^ 1˜ LED ъ

l' RUN L:

l' LOCAL L: ضر /

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O W

F1/ESC

LOC/REM

4.2.2 LED ƀ ϒ

ˆ 1˜ ƒ

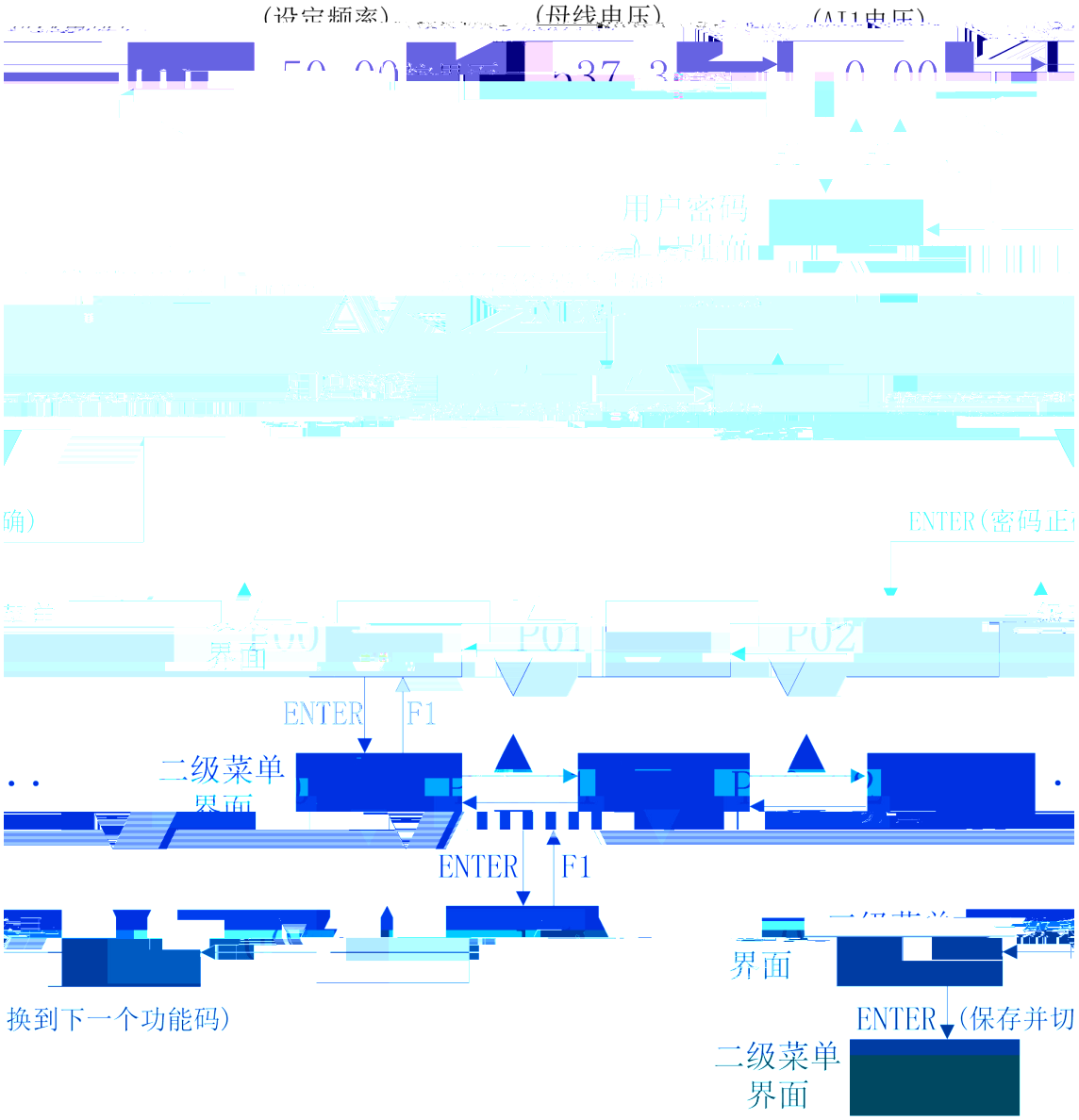
ˆ 2˜ ƒ ƨ

ƨ ˘ ضِ Ӈ ɾ ® ⌈ w ₩ ɬ

˜ Â F1 ˜ ˜ₒ ˘ ˜ₒ ⁝⁝ (ǵ)/

Ӈ(ɳ)/ ( )/ ( )/ENTER Ţ ĸ ₩ ɷ ˆ ˜ ˘ ˜

ENTER U ˗ ˜ ₩ ɬ ˘ ï ɾ ƀ ǐ ⁝⁝ Â



^ 3˜

Ӣ˜ LED G W / ˘ Ь

℗ Ь Ӣ ɜ˘ p Ӣ ˜ ă ≠ Ь Ь

□ Â Ӣ˜ ˜ ă W P02.03 ¿ P02.04 Â



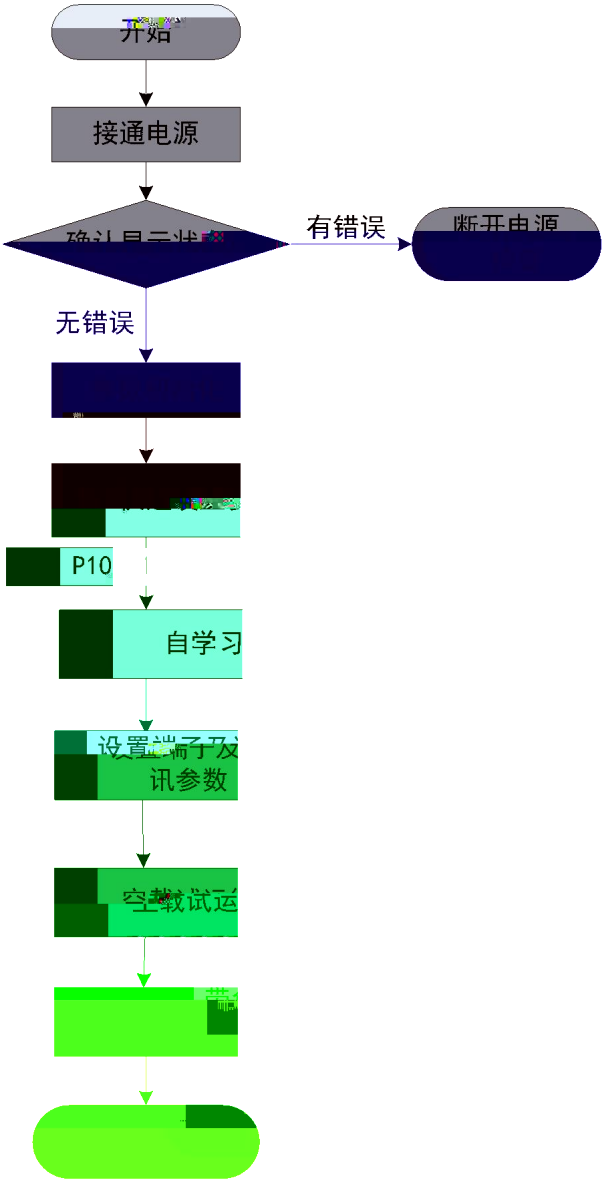
5

: □ F Ï ლ HF630N ˘ h ´ Ï ლ

ɒ à Ω¨ ¿ Å L˘ ṕ ˆ ɣ Ï ლ L Â

5.1 ч

ɣ Й, ˝˘ Â



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5.5 ă ä ĭ

ä	Þ	
ä	1. └ à ă ˘ Й ֆ ă ' 2. P10.71 ч 11˜ ENTER ˘ TUNE˜ ~ ă ä , 3. RUN ă ä˘ ä Ţ FAULT ˘ ä U ¬ ⁄	ä G Þ ғ ˘ ä˜ Й ă ' 1. (P10.50); 2. D (P10.51); 3. Q (P10.52); ä3 ˜ ֆ ė Â
ä	1. └ à ă ˘ Й ֆ ă ' 2. P10.71 ч 12˜ ENTER ˘ TUNE˜ ~ ă ä , 3. RUN ă ä˘ ä Ţ FAULT ˘ ä U ¬ ⁄	ä G Þ ˜ Y ˘ ä˜ Й ă ' 1. (P10.50); 2. D (P10.51); 3. Q (P10.52); 4. ĭ ¬ Ь (P10.54); ä3 ˜ ֆ ė Â

ˆ 1˜ ä ╠ Hυ
HF630N ↓ ĭ ֆ ˪ ă ä3 w Â‰ ă ä G ă
Â ч ъ Ḡ └ ˘ ĭ ֆ ‰ ˘ w Þ ‰
˘ ĭ ֆ └ Й Â
ä ╠ Y Й ض ¢ Hυ '

	Hυ
Ղ Þ ì	Þ ˜ Y ˘ ä' Þ ˘ ä Â
ė ĭ ֆ Ղ ≠	w Þ ĭ ֆ w ˘ ˜ ä^ w Þ G ĭ ֆ w 1/5˜ Â
ă ~ Ղ	P10 ă Ղ Þ ă ₩ ˘ w à ㅅ à à Â ~ ˜ ä Â
⁘ Ղ ֆ	└˘ ⁘ ֆ Â V/ F └ └˘ ֆ Þ ڑ ä Â

ˆ 2˜ '

ЙД ضِ ЙД Â

╠ ė Ա۔ ŋ˘ Å ۓ ė ŋ Ղ ˗

ƀ Â Ղ ˆ Ղ ĭ ˗ ~ ˘ ₰ ė ⁞

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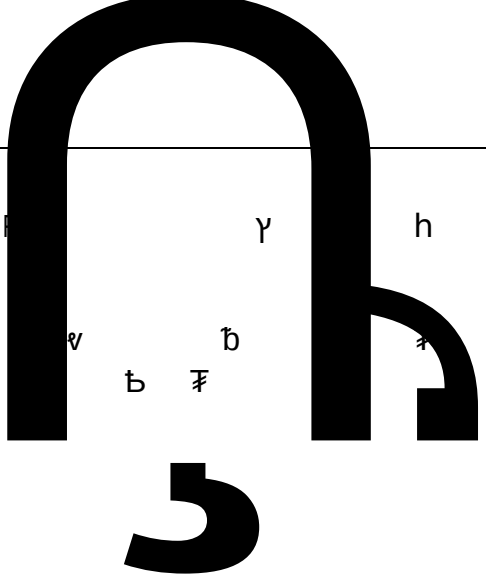
ą ƀ ƀ ЙД '

	ƀ	Ԋ
1	˘ Δ	
2	ч ض L˘ LOCAL ˝ '	
3	ƀ UP/DOWN ˘ ă̆ ч 5Hz	
4	RUN ˘ ĭ ڪ˘ RUN ˝ ˘	ƴ h ˘ ғ ĭ ڪ '
5	4 Ţ ˘ ↕ ₰ ỵ 50Hz	ƀ ₹ ˘ Ḡ Ь ₹ '
6	U˘ STOP ˘ Å Â	

ˆ 3˜ '

ЙД ЙД Â

ṗ		ƀ	
		ė Ա۔ ŋ	
		ŋ Å	
		Ж ˗ ˘ ė ₰	
		Å ۓ ė ŋ Ղ ˗ ƀ	ʊ
		ч ₹ ,˘ Ạ ЙД ƀ STOP ‰	
	1	˘ Δ	
	2	ч ض L˘ LOCAL ˝	
	3	ƀ UP/DOWN ˘ ă̆ ч 5Hz	



6 ǐ ر ă

w		w	
P0	ă L	P11	2 ă
P2		P12	1 L
P3	~	P13	2 L
P4	₣	P14	ă
P5	ĭ ǁ ~	P15	PID ﺷﺠ
P6	ĭ ǁ ₣	P16	ﺷﺠ
P7	Ḡ ă	P19	
P8	Ω Å L	P20	L
P9	ĭ	P21	L ă
P10	V/F ĭ 1 ă	P23	

w ă

w Ţ Й'

ľ æ Ŀ' ă ṿ ضِ ǐ ر G Å à Ţ ﺧﺸ '

ľ Æ Ŀ' ă ṿ ضِ ǐ ر G ˘ Ь '

ľ á Ŀ' ă ṿ ṿ˘ Ь '

ľ * Ŀ' ă ľ ʌ ă Ŀ˘ G L ʌ ˘ ƀ'

6.1 ă L P0

w	O	₀	₣ ∧ ɣ	
P00.00		0 65535	0	æ
P00.01	ă Δ .	0 Ъ 01 ₣ ∧ ă ˘ Ь´ ă 02 Ḥ	0	Æ
P00.02	w ă	ɷ β P23,P27 0 Ь 1 ∨ β P11,P13,P16,P19,P20,P21 0 Ь 1	11	Æ
P00.03	Ḡ			
P00.04	w ĺ	0 ˆ ĺ 1 Ь ˆ ĺ	0	æ

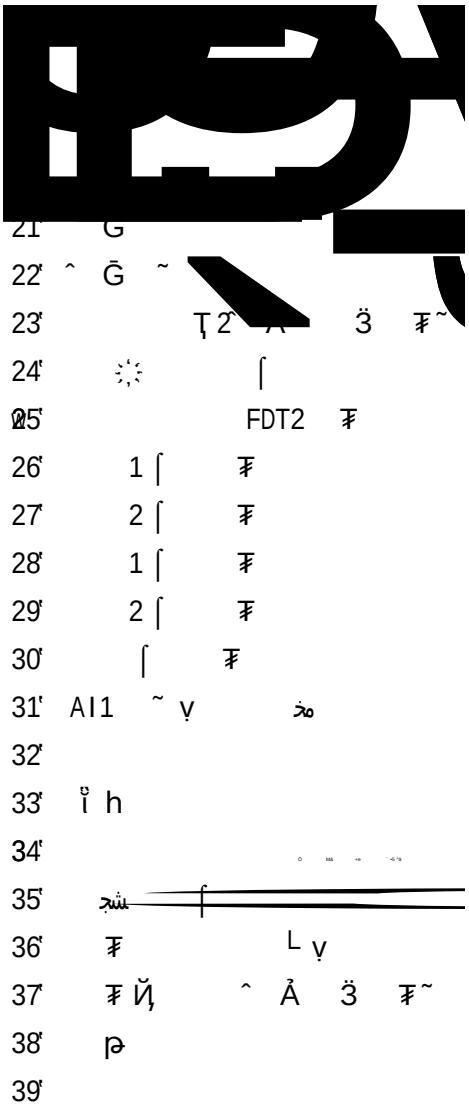
6.2 P2

w	O	₀	₣ ∧ ɣ	
P02.01	F2 w	0 1 Ḡ 2 ǐ ℗ 3 ⌐ 4 ǐ ⌐	0	Æ
P02.02	STOP w	0 ₇ ض Ъ Ӣ, STOP Ả w 1 ض к ᵥ Ъ Ӣ, STOP Ả w ڜ	1	æ

ĺ ᦟ ǎ

P02.05	LED Å ǎ	0000 FFFF Bit00: ^ Hz~ Bit01: ^ V~ Bit02: DI ~ Bit03: DO ₣ Bit04: AI1 ^ V~ Bit05: AI2 ^ V~ Bit06: AI3 ^ V~ Bit07: ụ Bit08: ụ Bit09: PLC Bit10: Bit11: PID Bit12 PULSE ~ ǁ ^ kHz~	33	æ
P02.06		0.0001 6.5000	1	æ
P02.07	ǐ ლ ლ	0.0Ņ 100.0Ņ	-	á
P02.08	ჯ	-	-	á
P02.09		0h 65535h	-	á
P02.11	Ð	-	-	á
P02.12	β	ɷ β P23.14 ɷ 0 0 β β 1 1 β β 2 2 β β 3 3 β β Ɱ β P23.19/P23.29 ɷ 1 1 β β 2 2 β β	21	æ
P02.13		0h 65535h	-	á
P02.14		0 65535	-	á

ĩ ᦟ ă



P04.11	₣	0' 1' ǐ ɷ β' FMR Ⅵ β' DO5 β' DO4 Ⅵ β' DO1 ' β' DO2	0	æ

6.5 ǐ ‖ ~ P5

w		O		₯	₣ Ⅵ ɣ	
P05.00	AI	1	ㄱ	-10.00V˙ P05.02	-10.00V	æ
P05.01	AI	1	ɣ	-100.0%˙ +100.0%	-100.00%	æ
P05.02	AI	1	ㄱ	P05.00˙ +10.00V	10.00V	æ
P05.03	AI	1	ɣ	-100.0%˙ +100.0%	100.00%	æ
P05.04						

P05.20	AI	ɷ β' AI1 1' 1 2 ˘ P05.00˙ P05.03˜ 2' 2 2 ˘ P05.05˙ P05.08˜ 3' 3 2 ˘ P05.10˙ P05.13˜ 4' 4 4 ˘ P19.00˙ P19.07˜ 5' 5 4 ˘ P19.08˙ P19.15˜ Ⅵ β' AI2 ˘ □;: β' AI3 ˘ □;:	321	æ
P5.21	AI ʏ G ˜ ỵ	ɷ β :AI1 ʏ G ˜ 0: ˜ 1:0.0% Ⅵ β' AI2 ʏ G ˜ ˘ □;: β' AI3 ʏ G ˜ ˘ □;:	0	æ

6.6 ǐ Ⅱ ǂ P6

w	O	₂	ǂ ʌ ỵ	
P06.00	Ⅱ ǂ w	0' 1' 2' ǂ 3' ǂ 4' ǂ w 5' ǂ ʌ	0	æ
P06.01	AO1 ǂ	6' Ⅱ ˜ ˆ 100.% 50.0kHz˜ 7' AI1 8' AI2 9' AI3ˆ ʌ˜ 10'	0	æ

P06.02	AO2 ₣	11' ỵ 12' 13' 14' ₣ ^ 100.0% 1000.0A˜ 15' ₣ ۱ 100.0% 1000.0V˜ 16' Ḡ		
P06.03	ǁ ₣	0.01kHz˙ 50.00kHz	50.00kHz	æ
P06.04	AO1 Ẓ	-100.0%˙ +100.0%	0.00%	æ
P06.05	AO1	-10.00˙ +10.00	1	æ
P06.06	AO2 Ẓ	-100.0%˙ +100.0%	0.00%	æ
P06.07	AO2	-10.00˙ +10.00	1	æ
P06.08	Ḡ			
P06.09	Ḡ			
P06.10	Ḡ			

6.7 Ḡ ă P7

w	O	ه	₣ ۱ ỵ	
P07.00	Ḡ	0' 1' ˜Ḥ	1	æ
P07.01	Ḡ	0.20˙ 10.00	1	æ
P07.02		50%˙ 100%	80%	æ
P07.03	۱	0˙ 100	0	æ
P07.04	۱ Ḡ ۱	200.0˙ 2200.0	760.0	æ
P07.05		0˙ 100	20	æ
P07.06	Ḡ	50%˙ 200%	150%	æ
P07.07	ض Ḡ	ɷ β' ضر Ḡ ۷ β' Ω˫ ╠ ض Ḡ 0' 1'	11	æ
P07.08	˫ ۱ ˜Ḥ' ƀ ۱	200.0V˙ 2000.0V	٩٩٩	æ
P07.09	˫ β	0˙ 20	0	æ

P07.10	˩ β DO˙ ƀ	0˙ Ь˩ ƀ 1˙ ˩ ƀ	0	æ
P07.11	˩ β	0.1s˙ 100.0s	1.0s	æ
P07.12	~ / ㄌ Ɋ₀₀ Ḡ	ɷ β˙ ~ Ḡ Ⴓ β˙ ㄌ Ɋ₀₀ Ḡ 0˙ 1˙ ˜Ḥ	00	æ
P07.13	ǂ Ḡ	ɷ β˙ ǂ Ḡ Ⴓ β˙ Ɋ˩ ╠ ǂ Ḡ 0˙ 1˙ ˜Ḥ	11	æ
P07.14	₩ ﻡ	0˙ 1˙ Ḡ 2˙ ∀ 3˙ ⋮ 4˙ Ɋ 8˙ ‖ 11˙ 15˙ ž		

P07.22	¸¸¸ ^ ₩ ~ ï ⁄	.	.	á	
P07.23	¸¸¸ ^ ₩ ~ ⁘	.	.	á	
P07.24	¸¸¸ ^ ₩ ~	.	.	á	
P07.25	¸¸¸ ^ ₩ ~ ĭ ˉ ㄣ	.	.	á	
P07.26	Ḡ				
P07.27	Ꮒ	.	.	á	
P07.28	Ꮒ	.	.	á	
P07.29	Ꮒ	.	.	á	
P07.30	Ꮒ ~	.	.	á	
P07.31	Ꮒ ₹	.	.	á	
P07.32	Ꮒ ï ⁄	.	.	á	
P07.33	Ꮒ ⁘	.	.	á	
P07.34	Ꮒ	.	.	á	
P07.35	Ꮒ ĭ ˉ	.	.	á	
P07.36	Ḡ				
P07.37	₩	.	.	á	
P07.38	₩	.	.	á	
P07.39	₩	.	.	á	
P07.40	₩ ~	.	.	á	
P07.41	₩ ₹				

P07.50	Ḡ ⁻ ƀ 4	ɷ β' Ẓ ^ 119˜ 0' Å 1' Å Å 2' Ⱶ β' ^ 115˜ β' Δ β ^ 51˜	0	ǽ
P07.51	Ḡ ⁻ ƀ 5			
P07.52	1			
P07.53	2			
P07.54		0' ɣ ╠ 1' ɣ 2' ɣ:; 3' ɣ Й, 4' ɣ	0	ǽ
P07.55		0%˙ 100.0%ˆ 100.0% P08.10˜	100.00%	ǽ
P07.56	D ᶎ ﻣ	0' D ᶎ 1' PT100 2' PT1000	0	ǽ
P07.57	Ḡ ṿ	0Ṇ˙ 200Ṇ	110Ṇ	ǽ
P07.58	ṿ	0Ṇ˙ 200Ṇ	90Ṇ	ǽ
P07.59	Ḡ			
P07.60	Ḡ			
P07.61	Ḡ			
P07.62	Ḡ			
P07.63	Ḡ	0' 1'	0	ǽ
P07.64		0.0˙ 100.0 ₊	10.00%	ǽ
P07.65		0.0˙ 60.0s	1.0s	ǽ
P07.66	Ḡ			
P07.67	ṿ	0.0 ₊ ˙ 50.0 ₊ˆ ˜	20.00%	ǽ
P07.68		0.0s˙ 60.0s	1.0s	ǽ
P07.69	Ẓ ṿ	0.0 ₊ ˙ 50.0 ₊ˆ ˜	20.00%	ǽ

P07.70	Ẓ	0.0s˙ 60.0s	0.0s	æ
P07.71	Å Ь Å	0˙ 100	40	
P07.72	Å Ь Å №	0˙ 100	30	
P07.73	Å Ь Å¬ ƀ ⁞	0˙ 300.0	20.0	
P07.74	Ḡ			
P07.75	Ḡ ¬ ƀ 6	ɷ β' Δ β ^ 51˜ 0' 1' Å Ⅵ β' ^ 170˜ 0' 1' Å	11	æ

6.8 Ω Å L P8

w	O	₀	₹ ∧ ɣ	
P08.00	Ḡ			
P08.01	1 L	0' D ㄌ L^ SVC˜ 1' D ㄌ L^ FVC˜ 2' V/F L	0	Æ
P08.02	Ω¬	0' ƀ ث ɒ ^ LED ˜ 1' ث ɒ ^ LED ˜ 2' ث ɒ ^ LED ˜	0	æ
P08.03	h X	0' ^ P08.08˝ UP/DOWN˜ ḱ ˘ Ь ˜ 1' ^ P08.08˝ UP/DOWN˜ ḱ ˘ ˜ 2' AI1 3' AI2 4' AI3 5' PULSE Ⅱ ^ DI5˜ 6' ɒ 7' PLC 8' PID 9'	0	Æ
P08.04	Y	□P08.03˜ h X ˜	0	Æ
P08.05	Ŋ ∨ ↑ Y	0' G	0	æ

		1' 0.1 2' 0.01			
P08.20	Ḡ				
P08.21	Ŋ ѵ Ẓ	0.00Hz˙	P08.10	0.00Hz	æ
P08.22	№	2' 0.01Hz		2	Æ
P08.23	Å	0' Ь 1'		0	æ
P08.24		0' 1 1' 2		0	Æ
P08.25	ѵ ⋮ ‰	0' ^ P08.10˜ 1' 2' 100Hz		0	Æ
P08.26	UP/DOWN' Ъ ‰	0' 1'		0	Æ
		ѽ β' Ъ Ω¬ ▫▫			
P08.27	Ω¬ Ь ▫▫	0' 1' 2' AI1 3' AI2 4' AI3 5' PULSE Ⅱ ^ DI5˜ 6' ֍ Ⅰ'			

ŕ

6.9 ǐ P9

w	O			₯	Ɣ
P09.00		0' G Ţ 1' G		0	æ
P09.01		0.0%	100.0%	0.00%	æ
P09.02		0.0%	50.0%	0.00%	æ
P09.03	Ա	0.1s	3000.0s	10.0s	æ
P09.04	:::				

P09.27	PLC	ɷ β' 0' Ь 1' Ⅵ β' Å 0' Å Ь 1' Å	0	æ
P09.28	PLC 0	0.0s^ h~ · 6553.5s^ h~	0.0s^ h~	æ
P09.29	PLC 0 ѵ ⁞	0· 3	0	æ
P09.30	PLC 1	0.0s^ h~ · 6553.5s^ h~	0.0s^ h~	æ
P09.31	PLC 1 ѵ ⁞	0· 3	0	æ
P09.32	PLC 2	0.0s^ h~ · 6553.5s^ h~	0.0s^ h~	æ
P09.33	PLC 2 ѵ ⁞	0· 3	0	æ
P09.34	PLC 3	0.0s^ h~ · 6553.5s^ h~	0.0s^ h~	æ
P09.35	PLC 3 ѵ ⁞	0· 3	0	æ
P09.36	PLC 4	0.0s^ h~ · 6553.5s^ h~	0.0s^ h~	æ
P09.37	PLC 4 ѵ ⁞	0· 3	0	æ
P09.38	PLC 5	0.0s^ h~ · 6553.5s^ h~	0.0s^ h~	æ
P09.39	PLC 5 ѵ ⁞	0· 3	0	æ
P09.40	PLC 6	0.0s^ h~ · 6553.5s^ h~	0.0s^ h~	æ
P09.41	PLC 6 ѵ ⁞	0· 3	0	æ

P09.42	PLC 7	0.0s h ~ 6553.5s h ~	0.0s h ~	æ
P09.43	PLC 7 v ¦	0 3	0	æ
P09.44	PLC 8	0.0s h ~ 6553.5s h ~	0.0s h ~	æ
P09.45	PLC 8 v ¦	0 3	0	æ
P09.46	PLC 9	0.0s h ~ 6553.5s h ~	0.0s h ~	æ
P09.47	PLC 9 v ¦	0 3	0	æ
P09.48	PLC 10	0.0s h ~ 6553.5s h ~	0.0s h ~	æ
P09.49	PLC 10 v ¦	0 3	0	æ
P09.50	PLC 11	0.0s h ~ 6553.5s h ~	0.0s h ~	æ
P09.51	PLC 11 v ¦	0 3	0	æ
P09.52	PLC 12	0.0s h ~ 6553.5s h ~	0.0s h ~	æ
P09.53	PLC 12 v ¦	0 3	0	æ
P09.54	PLC 13	0.0s h ~ 6553.5s h ~	0.0s h ~	æ
P09.55	PLC 13 v ¦	0 3	0	æ
P09.56	PLC 14	0.0s h ~ 6553.5s h ~	0.0s h ~	æ
P09.57	PLC 14 v ¦	0 3	0	æ
P09.58	PLC 15	0.0s h ~ 6553.5s h ~	0.0s h ~	æ

8	F 3	% %	%	Æ
9	F	% %	%	æ
	F		4	æ
	F			æ
		4	3	æ
3	F	3 E Ⅱ 5 5 6 %		æ
4	F	V	V	æ
5	F ;,;	V ĺ ⌡		æ
6	F	V ĺ ⌡		æ
7	F	U ′P		æ
8	F	%	%	Æ
9	F			Æ
	F			æ
	F Ồ	%	%	Æ
		V V	V	Æ
3				Æ
4				æ

P10.25	↿	L	↿	0˙ 100	30	æ
P10.26	↿					

>55kW˜

P10.52	□	1Q	0.01mH˙ 655.35mHˆ ǐ ㄏ w <=55kW˜ 0.001mH˙ 65.535mHˆ ǐ ㄏ w >55kW˜	ă	Æ
P10.53	□ ㄐ β	1	0˙ 12	0	
P10.54	□	1 ǐ ˙ ㄣ	0.1V˙ 6553.5V	ă	Æ
P10.55	□	1 ₹	0˙ 60000	0	
P10.56~ P10.60	Ḡ				
P10.61	ㄏ Ⅱ		1˙ 65535	1024	Æ
P10.62	ㄏ ㎜		0ʺ ABZ ㄏ 1ʹ Ḡ 2ʺ ǐ ㄑ ㄏ 3ʺ Ḡ 4ʺ ₲ ₰ ㄨ o ₰ ₰ Ẏ ₩ „ ₩ „	0	Æ
P10.63	Ḡ				
P10.64	ABZ ㄏ AB		D ₰ ₰ 0ʺ h 1ʹ ǐ h	0	Æ
P10.65	ㄏ		0.0˙ 359.9£	0.0£	Æ
P10.66	Ḡ				
P10.67	Ḡ				
P10.68	ǐ ㄑ ㄏ		1˙ 65535	1	Æ
P10.69	Ḡ				

3 Ā Ā
GUIDE Ẽ om

6.11 2 ǎ P11

w	O	ز	₣ ∧ ų	
P11.00	2 ق	2	2	Æ
P11.01	w	0.1kW 1000.0kW	ق	Æ
P11.02	∧	1V 2000V	ق	Æ
P11.03		0.01A 655.35 ǐ ر w <=55kW 0.1A 6553.5 ǐ ر w >55kW	ق	Æ
P11.04		0.01Hz	ق	Æ
P11.05		1rpm 65535rpm	ق	Æ
P11.06	Ḡ			
P11.07	Ḡ			
P11.08	Ḡ			
P11.09	Ḡ			
P11.10	Ḡ			
P11.11~ P11.15	Ḡ			
P11.16		0.001 65.535 ǐ ر w <=55kW 0.0001 6.5535 ǐ ر w >55kW	ǎ	Æ
P11.17	D	0.01mH 655.35mH ǐ ر w <=55kW 0.001mH 65.535mH ǐ ر w >55kW	ǎ	Æ
P11.18	Q	0.01mH 655.35mH ǐ ر w <=55kW 0.001mH 65.535mH ǐ ر w >55kW	ǎ	Æ
P11.19	∧ β	0 12	0	
P11.20	ǐ ¬ ϧ	0.1V 6553.5V	ǎ	Æ
P11.21	₣	0 60000	0	
P11.22~ P11.26	Ḡ			

P11.27	ر ll	1˙ 65535	1024	Æ
P11.28	ر ﻣ	0ʺ ABZ ر 1ʹ Ḡ 2ʺ ǐ ر 3ʺ Ḡ 4ʹ Ḡ	0	Æ
P11.29	Ḡ		0	Æ
P11.30	ABZ ر AB	0ʺ h 1ʹ ǐ h	0	Æ
P11.31	ر	0.0˙ 359.9£	0.0£	Æ
P11.32	Ḡ		0	Æ
P11.33	Ḡ		0.0£	Æ
P11.34	ǐ ر	1˙ 65535	1	Æ
P11.35	Ḡ		4	
P11.36	ǐ PG	0.0ʺ ƀ 0.1s˙ 10.0s	0	Æ
P11.37		0ʺ ƀ 1ʹ Ḡ 2ʺ Ḡ 11ʹ □ 12ʺ □	0	Æ

6.12 1 L P12

w	O			ﻣ	₣ ∧ ỵ	
P12.00		ɒ	1	1˙ 100	30	æ
P12.01		№	1	0.01s˙ 10.00s	0.50s	æ
P12.02	Ⓟ	1		0.00˙ P02.05	5.00Hz	æ
P12.03		ɒ	2	1˙ 100	20	æ
P12.04		№	2	0.01s˙ 10.00s	1.00s	

P12.22	ŭ			a	0 1	0 æ
P12.23	□		₮	∧	ė	1% 50% 5% æ
P12.24	□	Δ	β			50% 180% 80% æ
P12.25	□	Δ	β			0,1,2 0 æ
P12.26	Ḡ					
P12.27	□	€				50 500 100 æ
P12.28					L	0,1 0 æ
P12.29	╠	ẽ				0 0
P12.30				Kp		1 100 6 æ
P12.31				Ki		1 100 6 ȣ

J. JOO ę ȣ3Țȣ3J ʏ ɯo

3

200

0

80℘

P12.49	ۋ	0,1,2	0	æ
P12.50	ض ǐ ¨ ϧ a	0,1	0	æ
P12.51	SVC Δ β ẽ	0˙ 360.0	0	

6.13 2 L P13

w	O			ذ	₣ ∧ ɣ	
P13.00		ɒ	1	1˙ 100	30	æ
P13.01		№	1	0.01s˙ 10.00s	0.50s	æ
P13.02	Ⓟ	1		0.00˙ P13.05	5.00Hz	æ
P13.03		ɒ	2	1˙ 100	20	æ
P13.04		№	2	0.01s˙ 10.00s	1.00s	æ
P13.05	Ⓟ	2		P13.02˙	10.00Hz	æ
P13.06		L		50%˙ 200%	100%	æ
P13.07						

00

		0' P13.12 1' AI1 2' AI2 3' AI3		
P13.11	L Й ˸˸ ^ Ü ~	4' PULSE Ⅱ 5' 6' MIN(AI1,AI2) 7' MAX(AI1,AI2) 1.7 ˘ P13.12	0.00%	æ
P13.12	L Й ˸˸ ^ Ü ~	0.0% · 200.0%	150.00%	æ
P13.13 :	¤	0· 60000	2000	æ
P13.14 :	№	0· 60000	1300	æ
P13.15	¤	0· 60000	2000	æ
P13.16	№	0· 60000	1300	æ
		ɷ β' №№		
P13.17	№	0' 1'	0	æ
P13.18 □		0: 1: 2: ⌐	1	æ
P13.19 □		0· 50	5	æ

P13.27	L	0˙ 100	ق	æ
P13.28	₣ ∧ ɇ	1%˙ 50%	5%	æ
P13.29	Δ β	50%˙ 180%		

6.14 ă P14

w O ₥ ₹ ∧ ɣ

6.15 PID ﹣ P15

w	O	﹣	₣ ∧ ẏ	
		0' P15.01 1' AI1 2' AI2		
P15.00	PID	3' AI3 4' PULSE ‖ ^ DI5~ 5' 6' Ɒ	0	æ
P15.01	PID ẏ	0.0%˙ 100.0%	50.00%	æ
P15.02	PID ǐ ƥI	0' AI1 1' AI2 2' AI3 3' AI1.AI2 4' PULSE ‖ ^ DI5~ 5' 6' AI1+AI2 7' MAX^ |AI1|, |AI2|~ 8' MIN^ |AI1|, |AI2|~	0	æ
P15.03	PIDƀ h	0' ƀ 1' ǐ ƀ	0	æ
P15.04	PID ǐ	0˙ 65535	1000	æ
P15.05	ᵽ Kp1	0.0˙ 100.0	20	æ
P15.06	№ Ti1	0.01s˙ 10.00s	2.00s	æ
P15.07	№ Td1	0.000s˙ 10.000s	0.000s	æ
P15.08	PID ǐ	0.00˙	2.00Hz	æ
P15.09	PIDẔ	0.0%˙ 100.0%	0.00%	æ
P15.10	PID №	0.00%˙ 100.00%	0.10%	æ
P15.11	PID ǐ̇	0.00˙ 650.00s	0.00s	æ
P15.12	PID ǐ	0.00˙ 60.00s	0.00s	æ
P5.13	PID ₣	0.00˙ 60.00s		

P16.16	VDO1 ₣	0.0s˙ 3600.0s	0.0s	æ
P16.17	VDO2 ₣	0.0s˙ 3600.0s	0.0s	æ
P16.18	VDO3 ₣	0.0s˙ 3600.0s	0.0s	æ
P16.19	VDO4 ₣	0.0s˙ 3600.0s	0.0s	æ
P16.20	VDO5 ₣	0.0s˙ 3600.0s	0.0s	æ
P16.21	VDO ₣	0' 1' ï ɷ β' VDO1 Ⅵ β' VDO2 β' VDO3 Ⅳ β' VDO4 ' β' VDO5	0	æ

6.17 P19

w	O	₰	₣ Ⅵ ỵ	
P19.00	AI 4 ~	-10.00V˙ P19.02	-10.00V	æ
P19.01	AI 4 ~	-100.0%˙ +100.0%	-100.0%	æ
P19.02	AI 4 1 ~	P19.00˙ P19.04	3.00V	æ
P19.03	AI 4 1 ~	-100.0%˙ +100.0%	30.00%	æ
P19.04	AI 4 2 ~	P19.02˙ P19.06	6.00V	æ
P19.05	AI 4 2 ~	-100.0%˙ +100.0%	60.00%	æ
P19.06	AI 4 ~	P19.04˙ +10.00V	10.00V	æ
P19.07	AI 4 ~	-100.0%˙ +100.0%	100.00%	æ
P19.08	AI 5 ~	-10.00V˙ P19.10	-10.00V	æ
P19.09	AI 5 ~	-100.0%˙ +100.0%	-100.00%	æ
P19.10	AI 5 1 ~	P19.08˙ P19.12	-3.00V	æ
P19.11	AI 5 1 ~	-100.0%˙ +100.0%	-30.00%	æ
P19.12	AI 5 2 ~	P19.10˙ P19.14	3.00V	æ
P19.13	AI 5 2 ~	-100.0%˙ +100.0%	30.00%	æ
P19.14	AI 5 ~	P19.12˙ +10.00V	10.00V	æ
P19.15	AI 5 ~	-100.0%˙ +100.0%	100.00%	æ

P19.16~ P19.23	Ḡ				
P19.24	AI1		-100.0%˙ 100.0%	0.00%	æ
P19.25	AI1		0.0%˙ 100.0%	0.50%	æ
P19.26	AI2		-100.0%˙ 100.0%	0.00%	æ
P19.27	AI2		0.0%˙ 100.0%	0.50%	æ
P19.28	AI3		-100.0%˙ 100.0%	0.00%	æ
P19.29	AI3		0.0%˙ 100.0%	0.50%	æ
P19.30	AI1	⍲ 1	-10.000V ˙ 10.000V	₹ ∧	æ
P19.31	AI1	⍲ 1	-10.000V ˙ 10.000V	₹ ∧	æ
P19.32	AI1	⍲ 2	-10.000V ˙ 100000V A ₹	₹ ∧ (,	∧ q é
P19.33	AI1	⍲ 2	-10.000V ˙ 10.000V	₹ ∧	

6.18 L P20

w	O		₹ ∧ ẏ	
P20.00	/ L	0 L 1 L	0	Æ
P20.01	L Й	0 1 P20.03 1 AI1 2 AI2 3 AI3 4 ‖ 5 6 MIN AI1,AI2 7 MAX AI1,AI2 1-7	0	Æ
P20.02	Ḡ	0 0 P20.03	0 0	
P20.03	L Й	-200.0% 200.0%	150.00%	æ
P20.04		0 10.00	0.00%	
P20.05	L h	0.00Hz	50.00Hz	æ
P20.06	L ǐ h	0.00Hz	50.00Hz	æ
P20.07	L ѵ	0.00s 650.00s	0.00s	æ

P21.07	ѵ	4	0.0s˙ 6500.0s	ƒƒƒ	æ
P21.08	⁞	4	0.0s˙ 6500.0s	ƒƒƒ	æ
P21.09		1	0.00Hz˙	0.00Hz	æ
P21.10		2	0.00Hz˙	0.00Hz	æ
P21.11			0.00Hz˙	0.00Hz	æ
P21.12	ĭ	ѵ	0.0s˙ 3000.0s	0.0s	æ
P21.13	ĭ	└ą	0˝ ¨Ң 1˝	0	æ
P21.14		ʏ ɢ Й	0˝ ү Й 1˝ ˛Åąæжь-˛ 2˝	0.00Hz	æ
P21.15	Й ƒƒƒ	└	0.0%˙ 100.0%	0.0%	æ
P21.16		⁞ ⌠	0h˙ 65000h	0h	æ
P21.17		⌠	0h˙ 65000h	0h	æ
P21.18	Ѫ¯ Ḡ		0˝ ь Ḡ 1˝ Ḡ	1	æ
P21.19		ẏ^ FDT1˜	0.00Hz˙	50.00Hz	æ
P21.20		U^ FDT1˜	0.0%˙ 100.0%^ FDT1 ˜	5.00%	æ
P21.21		⌠ ₹	0.0%˙ 100.0%^ ˜	0.00%	æ
P21.22	ѵ ⁞	Ţ ϖ	0˝ 1˝	0	æ
P21.23	Ḡ				
P21.24	Ḡ				
P21.25	ѵ 2Ⓟ	1ь ѵ	0.00Hz˙	0.00Hz	æ
P21.26	⁞ 2Ⓟ	1ь ⁞	0.00Hz˙	0.00Hz	æ
P21.27		¯			

P21.33	κ ⌡ ₹ 2	0.0%˙ 100.0%ˆ ~	0.00%	æ
P21.34		0.0%˙ 300.0% 100.0%	5.00%	æ
P21.35		0.01s˙ 600.00s	0.10s	æ
P21.36	₹ ỵ	0.0%ˆ Ь ~ 0.1%˙ 300.0%ˆ ~	200.00%	æ
P21.37	₹	0.00s˙ 600.00s	0.00s	æ
P21.38	κ ⌡ 1	0.0%˙ 300.0%ˆ ~	100.00%	æ
P21.39	κ ⌡ 1	0.0%˙ 300.0%ˆ ~	0.00%	æ
P21.40	κ ⌡ 2	0.0%˙ 300.0%ˆ ~	100.00%	æ
P21.41	κ ⌡ 2	0.0%˙ 300.0%ˆ ~	0.00%	æ
P21.42	w	0: 1:	0	æ
P21.43		0ˇ P21.44 1ˈ AI1 2ˇ AI2 3ˇ AI3 ~ P21.44	0	æ
P21.44		0.0Min˙ 6500.0Min	0.0Min	æ
P21.45	AI1 ~ ㄱ Ḡ ỵ Ӣ	0.00V˙ P21.46	3.10V	æ
P21.46	AI1 ~ ㄱ Ḡ ỵ	P21.45˙ 10.00V	6.80V	æ
P21.47	ɔɕɕ ⌡	0Ņ˙ 100Ņ	75Ņ	æ
P21.48	L	0ˇ 1ˈ ₩	0	æ
P21.49	ɨ	w ˆ P08.51~ ˙ ˆ P08.10~	0.00Hz	æ
P21.50	ɨ	P 0.0s˙ 6500.0s	0.0s	æ
P21.51	w	0.00Hz˙ ɨ ˆ P21.49~	0.00Hz	æ
P21.52	w	0.0s˙ 6500.0s	0.0s	æ

P21.53	⌠	0.0Min· 6500.0Min	0.0Min	æ
P21.54	₣w	0.00% · 200.0%	100.00%	æ
P21.55		0~200%	100.00%	æ
P21.56	₣ ∤	0,1	0	
P21.57	DPWM® :;:	5.00Hz· P08.10	12.00Hz	æ
P21.58	PWM L	0' L 1' □ L	0	æ
P21.59	∀ ẽ	0' Ь ẽ 1' ẽ 1	1	æ
P21.60	PWM	0' PWM 1· 10' PWM	0	æ
P21.61	ą	0' Ь ą 1' ą	1	æ
P21.62	L	100 · 120	110	æ
P21.63	∤	60.0V · 1100.0V	ڤمم	æ
P21.64	Ḡ			
P21.65	∀	100% · 200%	150%	æ
P21.66	∤	200.0V · 2200.0V	ڤمم	Æ

6.20 P23

w	O	∤ β	ڜضر	
P23.00	(Hz)	0.01Hz	7000H	
P23.01	(Hz)	0.01Hz	7001H	
P23.02	∤ (V)	0.1V	7002H	
P23.03	₣ ∤ (V)	1V	7003H	
P23.04	₣ (A)	0.01A	7004H	
P23.05	₣w (kW)	0.1kW	7005H	
P23.06	₣ (%)	0.10%	7006H	
P23.07	DI ~	1	7007H	
P23.08	DO ₣	1	7008H	
P23.09	AI1 ∤ (V)	0.01V	7009H	

	AI2 ^ mA~	0.01V/0.01mA	700AH
P23.11	AI3	0.01V	700BH
P23.12	ụ		700CH
P23.13	ụ	1	700DH
P23.14		1	700EH
P23.15	PID	1	700FH
P23.16	PID ĩ	1	7010H
P23.17	PLC	1	7011H
P23.18	PULSE ~ Ⅱ	0.01kHz	7012H
P23.19	ĩ (Hz)	0.01Hz	7013H
P23.20	▼ φ	0.1Min	7014H
P23.21	AI1 ╠ ^	0.001V	7015H
P23.22	AI2 ╠ ^ V~	0.001V/0.01mA	7016H
P23.23	AI3 ╠ ^	0.001V	7017H
P23.24		1m/Min	7018H
P23.25	╠	1Min	7019H
P23.26	╠	0.1Min	701AH
P23.27	PULSE ~ Ⅱ	1Hz	701BH
P23.28	ụ	0.01%	701CH
P23.29	ر ĩ	0.01Hz	701DH
P23.30	h X	0.01Hz	701EH
P23.31	Y	0.01Hz	701FH
P23.32	Æ c		

P23.40	F № ₣	1V	7028H
P23.41		1	7029H
P23.42	DO ~		702AH
P23.43	DI w	1	702BH
P23.44	DO w	1	702CH
P23.45	Ḥ	1	702DH
P23.46	h ɾ Ḥ └ h ɳ ₰		702EH
P23.47~ P23.57	Ḡ		
P23.58	Z Ḥ ر	100.00%	703AH
P23.59	(%)	0.01%	703BH
P23.60	└ (%) نم	0.01%	703CH
P23.61	ï ر	1	703DH
P23.62	₭	1	703EH
P23.63			

7 ǎ w

7.1 ǎ L P0

P00.00		₹ ∧ ẏ	0
	₷	0˙ 65535	

P00.00 κ ₩ ₡ ˘ ↕ Ḡ w Â Ѝ ~ ∧ ˘

~ ˘ Ղ ↕ Ь ė ќ w ǎ ˘ Â

P00.00 ч 00000 ↕ ˘ ą Ḡ w Â

P00.01	ǎ Δ .		₹ ∧ ẏ	0
	₷	0	ƀ	
		1	₹ ∧ ǎ ˘ Ь´ ǎ	
		2	Ḥ	

1 à ₹ ∧ ẏ˘ Ь´ ǎ

P00.01 ч 1 U˘ ĩ ☋ w ǎ № ч ∧ ₹ ∧ ǎ ˘ p ϒ Ѝ ǎ Ь

'

1~ ∧ ǎ (P1);

2~ ǎ L ' P00.00, P00.01;

3~ Ḥ ' P07.14˙ P07.45;

4~ ǎ ' P10.34˙ P10.55, P11.00˙ P11.21;

5~ ^ P02.09~ ˘ ⁘ ^ P02.13~ ˘ ^ P02.14~ ;

6~ ^ P08.10~ ˘ ⁘ ^ P08.12~ ;

7~ L ǎ ' P12.13˙ P12.16, P13.13˙ P13.16;

2 à Ḥ

ĩ ☋ Ḥ à ^ P02.09~ à ⁘ ^ P02.13~ à

^ P02.14~ Â

P00.02	w ă		₣ ∧ ẏ	11
	₥	ɷ β	P23,P27	
		0	Ь	
		1		
		∨ β	P11,P13,P16,P19,P20,P21	
		0	Ь	
		1		

P00.04	w ḱ		₣ ∧ ẏ	0
	₥	0	ˆ ḱ	
		1	Ь ˆ ḱ	

w ă Ɂ ˆ ɣ ḱ ˇ ɢ w ă ˪ ∨ Â
w ч0 ↕ w ₶ ˆ ḱ ’ ч1 ˇ w ₶ ˇ Ь
ḱ Â

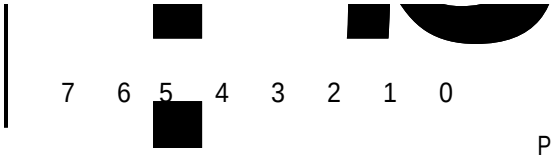
7.2 P2

P02.01	F2 w		₣ ∧ ẏ	0
	₥	0	F2	
		1	Ḡ	
		2	ỉ ℗	
		3	˪	
		4	ỉ ˪	

F2 ч w ˇ ˆ w F2 w Âض Å غ Ţ ₶ ˆ ɣ
℗ Â

0′ w Â
1′ Ḡ
2′ ỉ ℗
F2 ℗ ɒ h Â w ₇ ضث ɒ ч ƀ ث ɒ Â
3′ ˪

LED ă 2 ₹ ∧ ṿ 0



7 6 5 4 3 2 1 0

PID ĭ

PLC

PULSE ~ Ⅱ (kHz)

2(Hz)

▼ φ

AI1 ╟ ㄴ (V)

AI2 ╟ ㄴ (V)

AI3 ╟ ㄴ (V)

15 1 4 13 12 11 10 9 8

P02.04 0000 ·

FFFF

╟ (Hour)

ﻣﺬ

╟ (Min)

PULSE ~ Ⅱ (Hz)

ṿ

ﻛﺞ

LEDẢ ă ₮ ᴧ ỵ



P02.05

P02.07	ĩ ɔɕɯ ɕɤ	₹ ∧ ẏ	0
	ɯɤ	0.0Ņ˙ 100.0Ņ	

ĩ ɔɕɯIGBT Â

Ь ▯ ɱɱ ĩ ɔɕɯIGBT Ḡ ẏ Ь ▯ Â

P02.09		₹ ∧ ẏ	0h
	ɯɤ	0h˙ 65535h	

ĩ ɕɤ Â ∫ P21.17Ủ ĩ ɕɤ w

₹w ^ 12˜ ₹ONḢ˚ Â

P02.11	Ð ˚	₹ ∧ ẏ	
	ɯɤ	L Ð ˚	
P02.12	β	₹ ∧ ẏ	1
	ɯɤ	0	0 β β
		1	1 β β
		2	2 β β
		3	3 β β

ɷ β'

G β Â Ѝ, ɐe ɒ '

P02.06 ч 2.000Ơ β P02.12 ч 2Ĉ 2 β ~ ˘

ĩ ɕɤ ч 40.00Hz ˘ ч' 40.00*2.000 = 80.00Ơ 2 β ~

ĩ ɕɤ G Å ˘ ↕ ч ˘ ∨l' L·Â

Ƴ 50.00Hz ч ɒ˘ ↕ Å ч' 50.00*2.000 = 100.00Ơ 2 β

~

P02.13	⁘	₹ ∧ ẏ	0h
	ɯɤ	0h˙ 65535h	

Ŧ ʌ ĩ ᓚ ⁘ Â

⌠ ⁘ ^ P21.17˜ ˇ ĩ ᓚ w Ŧ w ^ 24˜ Ŧ ON Ḥ˚ Â

P02.14		Ŧ ʌ ẏ	-
	ॐ	0˙ 65535	

⌠ ╟ ч ĩ ᓚ Â

7.3 ~ P3

HF630N ↓ ĩ ᓚ 5 ɷ w ~ ^ ỉ Ţ DI5 ˆ ɣ ƀ ‖ ~
~ ˇ 2 ɷ ~ Â ~ Ŧ ˇ ↕ˆ w ~
Ŧ ʌ Â
w ~ Ŧ ʌ 5 ɷ w ~ ^ DI6 · DI10˜ ˇ 1 ɷ ~
^ AI3˜ Â

w	O	Ŧ ʌ ẏ
P03.00	DIS J DIS ᵐ DI1 w	1ˆ ~
P03.01	DI0 >| DI2	

ỵ **w**

0 w ˇ Ь ą ч ľ w Ŀ˘ ɣ ˛ ђ Â

1 ˆ FWD˜

2 ǐ ˆ REV˜

3 ˛˛˛ Ŀ

Ŀ ǐ ȿ Ь ǐ Â

ǐ ȿ

	à ~	UP/DOWN ǐ ỵ˘ ą P08.08 ỵ Â
20	ث ɒ Ⓟ	ث ɒ ч └ ^ P08.02=1~ ˘ ˜ ˚ Ɣ └ Ь └ Ⓟ Â ث ɒ ч └ ^ P08.02=2~ ˘ ˜ ˚ Ɣ └ Ь └ Ⓟ Â
21	४ ⋮	Ḡ ǐ ᶎ Ь ỉ Ḥ˚ ڒ^ Ả ث ɒ ~ ˘ ╠ ₹ Â
22	PID Ả	PID ˘ ǐ ᶎ ╠ ₹ ˘ Ь 'P PID Â
23	PLC β	PLCض Ţ Ả˘ 'P ˘ ˚ ą ǐ ᶎ ⌡ PLC Δ Â
24	Ả	ǐ ᶎ Ɣ Ţ ₹ Â w Ả Â
25	ᶎ ~	ǁ ~ Â
26	ᶎ β	ᶎ Â
27	~	~ Â
28	β	
29	└	ǐ ᶎ └˘ ǐ ᶎ ~ └
30	PULSE˜ ǁ ~ ~^ . DI5 ~	DI5ƀ ч ǁ ~ w Â
31	Ḡ	Ḡ
32	ч └˗	˘ ǐ ᶎ Ⓟ ⌡ └˗
33	~	Ḥ˚ ~ ǐ ᶎ U˘ ǐ ᶎ ₹ E015 Ả Â
34	ḱ ą	w ч ˘ ↕ ǐ ˘ ǐ ᶎ Ь ڒ ˘ ⌡ Â
35	PIDƀ h ŭ ǐ	˘ PIDƀ h ЬP15.03 h ǐ
36	Ả 1	└ ˘ ˚ ą ǐ ᶎ Ả ˘ G ⁜ STOP w Â
37	└ ث ɒ Ⓟ 2 G ض └ غ └ Ң Ⓟ Â ث ɒ ч	

			L˘ ↕ Ⓟ ч L, ĭ ң˝ ĭ Á
38	PID № Å		˘ ↕ PID № w Å˘ p PID p ė № w . Â
39		X Ь Ⓟ	˘ ↕ X ^ P08.08˜ ٹ
40		Y Ь Ⓟ	˘ ↕ Y ^ P08.08˜ ٹ
41		1	ң ѫ 4 ˘ ˆ ү 4 ă Ⓟ ˘
42		2	ṗ Â
43	PID ă Ⓟ		PID ă Ⓟ Ð ч DI ^ P15.18=1˜ ˘ ˘ PID ă ą P15.05˙ P15.07’ ↕ ą P15.15˙ P15.17’
44		Ң 1	Ң 1 ė 2 ˘ ŭ ȣ Ɛ p

1 2 3 4

1

P03.10	DI	₣ ∧ ų	0.010s
	ﻣ	0.000s˙ 1.000s	

DI Ð Â ą ﻲﺸﻲ ~ Ì ˙ Ъ˘ ˆ

ă˘ ˘ ɣ ↕ ʐ Â ᵖ Ψ DI ڒ Ї Â

P03.11	ث ɒ		₣ ∧ ų	0
	ﻣ	0	ɳ 1	
		1	ɳ 2	
		2	⁝⁝ 1	
		3	⁝⁝ 2	

ă˘ ɥ ↻ ˘ L Ї ﻕ ﺿ Ь Â

' ч Ḃ ˘ Ѝ к ŭDI1 · DI10 w ~ Ţ DI1àDI2àDI3⁝⁝

ɷ Ъ ч Â ∢ P03.00 · P03.02 ų DI1àDI2àDI3⁝⁝ ɷ

w ˘ w ɥ P03.00 · P0309 ﻣ Â

0' ɳ 1' ч ą ɳ Â DIxàDIy ═ à

Ї Â

w Ѝ'

	ų	
DIx	1	ˆ FWD˜
DIy	2	Ї ˆ REV˜

ì Ţ˘ DIxàDIy ч DI1˙ DI10 w ~ ˘ Â

1' ɳ 2' DIx w ч ą ˘ DIy w

h Â

w Ѝ'

	ų	
DIx	1	ˆ FWD˜
DIy	2	Ї ˆ REV˜

ì Ţ˘ DIxàDIy ч DI1˙ DI10 w ~ ˘ Â

P03.15	DI1	₣ ∧ ẏ	0.0s
	ż₀	0.0s˙ 3600.0s	
P03.16	DI2	₣ ∧ ẏ	0.0s
	ż₀	0.0s˙ 3600.0s	
P03.17	DI3	₣ ∧ ẏ	0.0s
	ż₀	0.0s˙ 3600.0s	

G DI Ů Ĩ˛ ˘ Ĩ ڇ Ĩ˛ Â

╟Γ. . DI1 à DI2 à DI3 í w Â

P03.13	DI 1	₣ ∧ ẏ	00000
	ż₀	ɷ β	DI1
		0	
		1	∀
		∀ β	DI2 ˆ 0˙ 1˜ □;; ~
		β	DI3 ˆ 0˙ 1˜ □;; ~
		∀ β	DI4 ˆ 0˙ 1˜ □;; ~
		' β	DI5 ˆ 0˙ 1˜ □;; ~
P03.14	DI 2	₣ ∧ ẏ	00000
	ż₀	ɷ β	DI6
		0	
		1	∀
		∀ β	DI7 ˆ 0˙ 1˜ □;; ~
		β	DI8 ˆ 0˙ 1˜ □;; ~
		∀ β	DI9 ˆ 0˙ 1˜ □;; ~
		' β	DI10 ˆ 0˙ 1˜ □;; ~

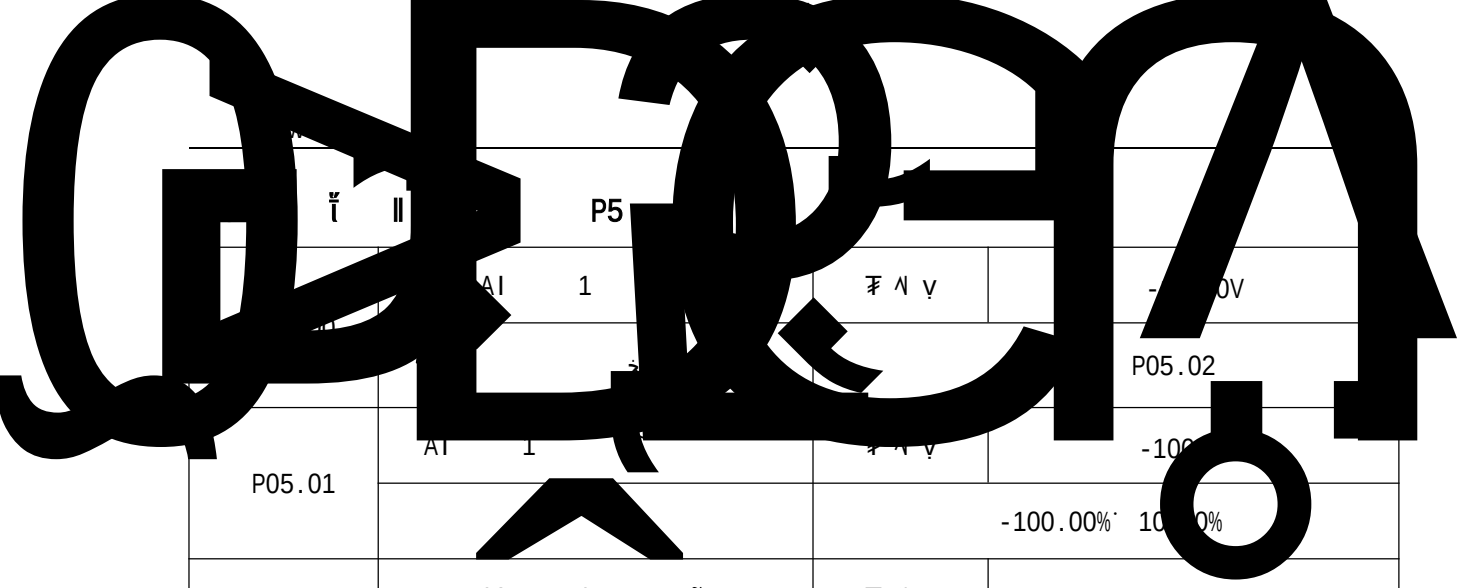
G ~ Â ч ˘ DI Ь COM

˘ Â ч ∀ ˘ DI Ь COM ˘

Â

4	⌡	ă w P21.21 Â
5	Ţ^ Å Þ ₣˜	ĩ ς ғ ₣ ч0 ˘ ₣ONḤ˜ Âضِ ĩ ς g Å ˘ Ḥ˜ ч OFF Â
6		⌟ Ḡ ⌟ ƀ ң ╠˘ ṿ ∞ ˘ ضِ ṿ U ₣ONḤ˜ Â ă ă w P07.00ˈ P07.02 Â
7	ĩ ς	ضِ ĩ ς Ḡ ŭ ╠10s˘ ₣ONḤ˜ Â
8	ṿ ⌡	ṿ ⌡ P09.08 ṿ ˘ ₣ONḤ˜ Â
9	ṿ ⌡	ṿ ⌡ P09.08 ṿ ˘ ₣ONḤ˜ Â w ă P9 w
10	⌡	P09.05 ˘ ₣ON Ḥ˜ Â
11	PLC	PLC ₩ ₢ U˘ ₣ ₩ ₢ ч 250ms ⫴ Ḥ˜ Â
12	⌡	ĩ ς P21.17 ˘ ₣ON Ḥ˜ Â
13	Ţ	₣ Й ˘ ғ ĩ ς ₣ ˝ Й ˘ ₣ONḤ˜ Â
14	Ţ	ĩ ς ضِ ς Й˘ ₣ ⌡ ṿ ˘ ĩ ς g Ḡ ˘ ₣ONḤ˜ Â
15	‰	ĩ ς h ج غ ج ˘ ғ ĩ ς ⌡ к v Ḥ ˘ ĩ ς g˜ ˘ ₣ ONḤ˜ Â
16	AI1>AI2	˜AI1 ṿ g AI2 ˜ ṿ ˘ ₣ONḤ˜ Á
17	⁝ ⌡	⌡ ⁝ ˘ ₣ONḤ˜ Â
18	Й ⌡ ^ Å Þ ₣˜	⌡ Й ˘ ₣ONḤ˜ Â Å Й Ḥ˜ ч OFF Â
19	⅄ ₣	ĩ ς g ⅄ ˘ ₣ONḤ˜ Â

20		ă ٧ Â
21	Ḡ	Ḡ
22	Ḡ	Ḡ
23	Ţ2̂ Å Ä ₹˜	ĩ ر ₹ ч0 ˘ ₹ONḤ̂ Â Å Й, Ḥ ̊ Ä ч ONÂ
24	⁘ ⌠	ĩ ر ⁘ ^ P02.13˜ P21.16 ˘ ₹ONḤ̂ Â '℮ ‡— D₴
25	FDT2 ₹	ă w P21.28 à P21.29 Ÿ Â — Ш ЌD И t ɹ ⁑
26	1 ⌠ ₹	ă w P21.30 à P21.31 Â
27	2 ⌠ ₹	ă w P21.32 à P21.33 Â
28	1 ⌠ ₹	ă w P21.38 à P21.39 Â
29	2 ⌠ ₹	ă w P21.40 à P21.41 Â
30	⌠ ₹	w ^ P21.42˜ ˘ ĩ ر ⌠ U˘ ₹ONḤ̂ Â
31	AI1 ˜	˜AI1 ụ ɢP21.46̂ AI1 ˜Ḡ ⁘ ˜ ɢP21.45̂ AI1 ˜Ḡ Й, ˜ ˘ ₹ONḤ̂ Â
32	Ţ	ĩ ر ɢ ˘ ₹ONḤ̂ Â
33	ĩ h Ţ	ĩ ر ɢ ĩ h ˘ ₹ONḤ̂
34		ă w P21.28 à P21.29
35	⁖ ⌠	ĩ ر ⁖ ر ^ P02.07) ⌠ ⁖ ⌠ ụ^ P21.47˜ ₹ONḤ̂ ^ P21.47 ₹ONḦ̂ ˜,
36	Ð	ă w P21.36 à P21.37,´R@byÂÐ, ѲJ·3c g
37	Й, ⌠ ^ Å Ä ₹˜ Ø Ϙ ^	Ø

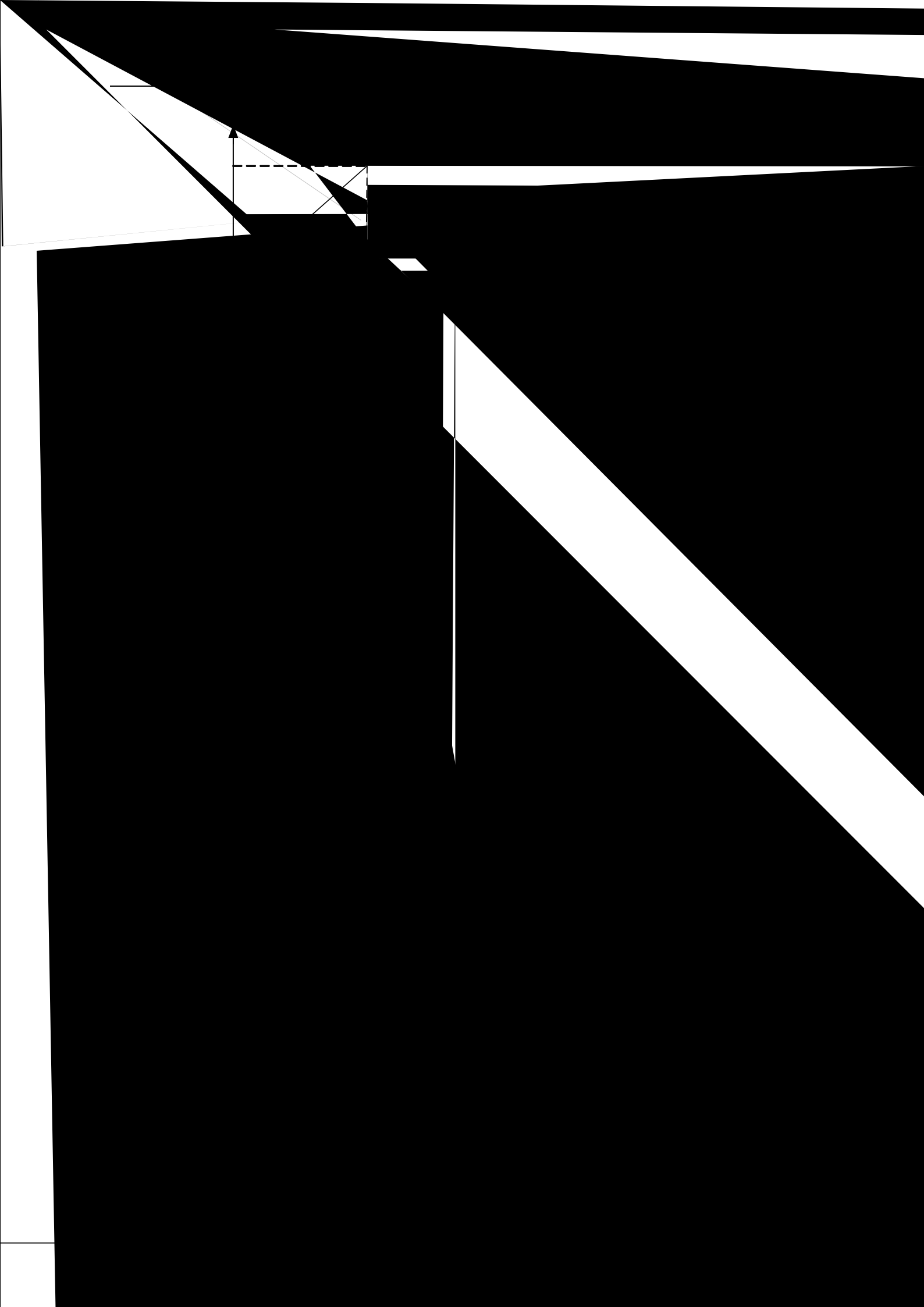


	P5		
	AI 1		-10.00V
			P05.02
P05.01	AI 1		-100
		-100.00% 10 0%	
P05.02	AI 1 ~		10.00V
		P05.00 10.00V	
P05.03	AI 1 ~		100.0%
		-100.00% 100.0%	
P05.04	AI1		0.10s
		0.00s 10.00s	

W G ~ ~ Ь ï ŋ ỵ ң ˜ Â

~ L ' □ ˘ ~ G ˜ L ˆ P05.02 ˜ ˘ ↕ ˜ L ' □ ˘ ~ G ˜ L ˆ P05.00 ˜ ˘ ↕

˜ AI ỵ G ~ L ˆ ŋ P05.02 Â m " ˘ c ỵ ả L ŋ - ˜ 0.0%



P05.10	AI 3 ~	₣ ∧ ų	-10.00V
	₺	0.00s˙ P05.12	
P05.11	AI 3 ~	₣ ∧ ų	-100.00%
	₺	-100.00%˙ 100.0%	
P05.12	AI 3 ~	₣ ∧ ų	10.00V
	₺	P05.10˙ 10.00V	
P05.13	AI 3 ~	₣ ∧ ų	100.0%
	₺	-100.00%˙ 100.0%	
P05.14	AI3	₣ ∧ ų	0.10s
	₺	0.00s˙ 10.00s	

3 w ĭ ą ˘ ă 1 Â

P05.15	PULSE ~	₣ ∧ ų	0.00kHz
	₺	0.00kHz˙ P05.17	
P05.16	PULSE ~	₣ ∧ ų	0.0%
	₺	-100.00%˙ 100.0%	
P05.17	PULSE ~	₣ ∧ ų	50.00kHz
	₺	P05.15˙ 50.00kHz	
P05.18	PULSE ~	₣ ∧ ų	100.0%
	₺	-100.00%˙ 100.0%	
P05.19	PULSE	₣ ∧ ų	0.10s
	₺	0.00s˙ 10.00s	

w g ˘ DI5 ǁ Ь ң ˜ Â

ǁ ₇ DI5 ~ ĩ ☋ Â w Ь 1 ³˘ ă 1 Â

P05.20

˘ ˋẼ

P306.03N+	FMP ₹	₹ ^ ỵ	50.00kHz
	₀	0.01kHz˙ 100.00kHz	

3 И+

N +

P07.04	۱ Ḡ ۱	₹ ۸ ṿ	760.0
	مخ	200.0~2200.0	

ضي ΐ ح ⋮ Ţ˘ ۱ ۱ Ḡ ۱ U˘ ΐ ح Å ⋮ Ḡ
ضي ╠ ˘ ۱ Й, U ⋮ Â

۱ ˘ G ضي ⋮ Ţ˘ ΐ ح └ ۱ ʒ Â ṿ └ ۱
ʒ Â ضي Ь Ŭ ۱ ╠ Й˘ Â

G ˘ ۱ ˘ Ղ ↕ ˩ ڒ ΐ Â G
˘ ṿ ˘ Ղ ↕ └ Ь ˘ ˆ ₹ ۱ Â

۱ ч 0 ˘ Ŭ ۱ w Â

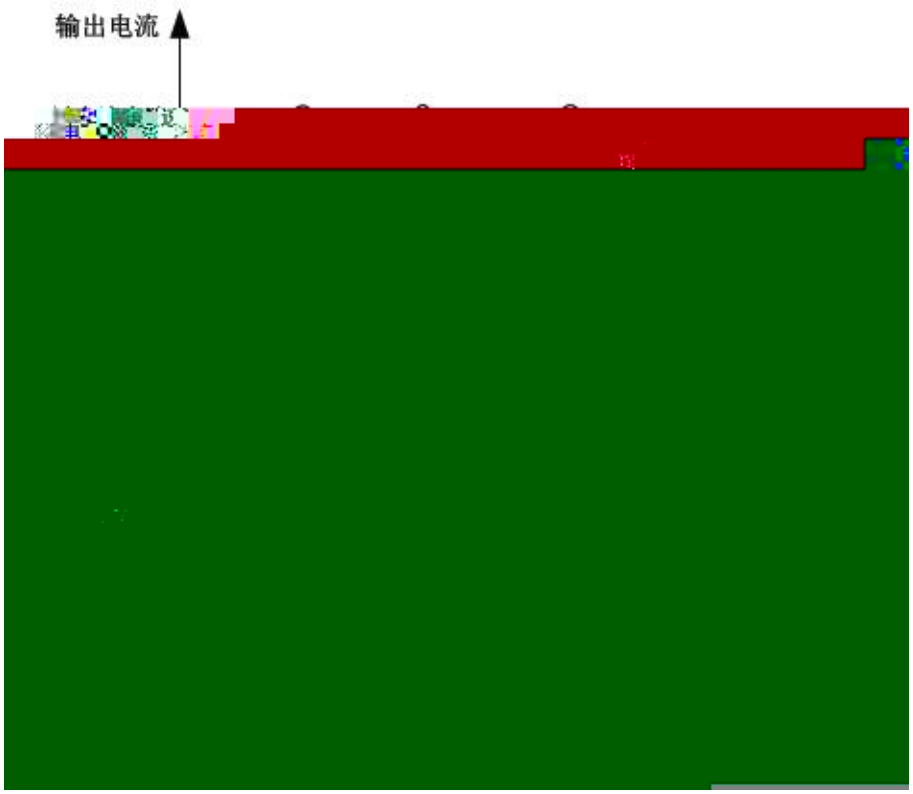
P07.05		₹ ۸ ṿ	20
	مخ	0˙ 100	
P07.06	Ḡ	₹ ۸ ṿ	150%
	مخ	50%˙ 200%	

' ΐ ح ₹ ∫ Ḡ ^ P07.06˜ ˘ ΐ ضي ح
۶ ˘ ۲ ₹ ' ضي ˘ ۲ ₹ ' ضي ⋮ ˘ Й,
˘ ∫ G Ḡ ^ P07.06˜ ң U˘ Â
ے Â

Ḡ ' w Ḡ Â ă ṿ ΐ ح
Ḡ w ṿ № Â

' G ضي ۶ ⋮ Ţ˘ ΐ ح └ ʒ Â ṿ └
ʒ Â ضي Ь Ŭ ╠ Й˘ Â

G ˘ ˘ Ղ ↕ ˩ ڒ ΐ Â G
˘ ṿ ˘ Ղ ↕ └ Ь ˘ ˆ ₹ Â ضي ˘ پ ي ش
└ G 20 Â ч 0 ˘ Ŭ w Â



P07.07	ض Ḡ	₣ ∧ ṿ	11
	ﻫ	ϖ β ' ض Ḡ ' ∨ β ' Ω ╟ ض Ḡ	
P07.08	┗ ∨ "Ḥ" ƀ ∧	₣ ∧ ṿ	ﻫ
	ﻫ	200.0V~2000.0V	

˜ ǐ ڪ ˘ ϑ ض Â

w ˘ ↕ ǐ ڪ UVW U ₩ ṗ Ψ ∧ ₣ Â

P07.09	˗ β	₣ ∧ ṿ	0
	ﻫ	0˙ 20	

ǐ ڪ ˗ β ˘ ˜ ˗ β Â U˘ ǐ ڪ Ḡ Â

P07.10	˗ β DO˗ ƀ	₣ ∧ ṿ	1
	ﻫ	0' Ь˗ ƀ 1' ˗ ƀ	

ǐ ڪ ϑ ˗ β w ˘ ↕ ض ˗ β ˘ DO ϑ˗ ƀ˘ ˜

ץ P07.10 Â

P07.11	¬ β	₣ ∧ ỵ	1.0s
	ॐ	0.1s˙ 100.0s	

ĭ ☋ ˘ ⌡ ¬ β Ң Â

P07.12	~ Ḡ	₣ ∧ ỵ	1
	ॐ	0̛ 1˙ ¨Ḥ	

ϖ ~ Ḡ Â

P07.13	₣ Ḡ	₣ ∧ ỵ	11
	ॐ	0̛ 1˙ ¨Ḥ	

ϖ ₣ Ḡ Â

P07.14	₩ ⁂	0˙ 999
P07.15	Ⱨ ⁂	
P07.16	⁘ ^ ₩ ~ ⁂	

ĭ ☋ ⁘ ⁂ 0 ч Â ˜ G ₢ ϖ ˆ ⱬ ĭ ═
˘ ă ĵ ˜ Â

P07.17	⁘	₩
P07.18	⁘	₩
P07.19	⁘ ∧	₩ ∧
P07.20	⁘ ~	₩ ~ ˘ ч˙

BI T9	BI T8	BI T7	BI T6	BI T5	BI T4	BI T3	BI T2	BI T1	BI T0
DI 0	DI 9	DI 8	DI 7	DI 6	DI 5	DI 4	DI 3	DI 2	DI 1

~ ч ON ỉ Ⱨ └ β ч 1˜ OFF ↕ ч
0̛ DI ч ∨ı └ Â

P07.21		₩ ₹ ˘ ч' BIT4 BIT3 BIT2 BIT1 BIT0 DO2 DO1 DO4 DO5 FMP ~ ч ON ì ʜ L β ч 1˜ OFF ↕ ч Ơ DI . ч M L Â
P07.22		Ḡ
P07.23		₩
P07.24		₩
P07.27	ʜ	□ P07.17˙ P07.24
P07.28	ʜ	
P07.29	ʜ ۸	
P07.30	ʜ ~	
P07.31	ʜ ₹	
P07.32	ʜ ĩ ᘐ	
P07.33	ʜ	
P07.34	ʜ	
P07.37	₩	□ P07.17˙ P07.24
P07.38	₩	
P07.39	₩ ۸	
P07.40	₩ ~	
P07.41	₩ ₹	
P07.42	₩ ĩ ᘐ	
P07.43	₩	
P07.44	₩	

P07.47	Ḡ ⁻ ƀ 1		₹ ∧ ỵ	00000
	ɔ	ɷ β	ˆ E011˜	
		0	Å	
		1	Å Å	
		2		
		∨ β	˜ ˆ E113˜ ˆ □ ɷ β ˜	
		β	₹ ˆ E114˜ ˆ □ ɷ β ˜	
		∨ β	ˆ E015˜ ˆ □ ɷ β ˜	
		' β	ˆ E0202˜ ˆ □ ɷ β ˜	
P07.48	Ḡ ⁻ ƀ 2		₹ ∧ ỵ	00000
	ɔ	ɷ β	↺ ˆ E118˜	
		0	Å	
		1	℗ ч VF˜ Å Å	
		2	℗ ч VF˜	
		∨ β	w Ω ˆ E021˜	
		0	Å	
		1	Å Å	
		β	ĩ ↺ ˆ E111˜ ˆ □ P07.47 ɷ β ˜	
		∨ β	ˆ E045˜ ˆ □ P07.47 ɷ β ˜	
		' β	⌠ ˆ E026˜ ˆ □ P07.7 ɷ β ˜	
P07.49	Ḡ ⁻ ƀ 3		₹ ∧ ỵ	00000
		ɷ β	Ч 1ˆ E027˜ ˆ □ P07.47 ɷ β ˜	
		∨ β	Ч 2ˆ E028˜ ˆ □ P07.47 ɷ β ˜	
		β	⁘ ⌠ ˆ E029˜ ˆ □ P07.47 ɷ β ˜	

Ⅵ β	^ E030˜
0	Å
1	Å Å
2	⁞ ⌠ 7% ˘ Ь ↕ ⁻ ⌠
' β	PID ǐ ĸ ^ E031˜ ^ □ P07.47 ɷ β˜
Ḡ ⁻ ƀ 4	₣ ∧ ỵ 00000
ɷ β	Ẓ ^ E119˜ ^ □ P07.47 ɷ β˜
Ⅵ β	

P07.50

ɔ₀

˘ ˋE˜

P07.67	ẏ	₣ ∧ ẏ	15.0%
	₥	0.0% 50.0%	~
P07.68		₣ ∧ ẏ	1.0s
	₥	0.0s 60.0s	

W 7 ضي ΐ ك ضي D ك L Â

ΐ ك ∫ ˘ ₣ ẏ G ẏ P07.67 ₣
G P07.68 ˘ ΐ ك E115 Ḡ ⌟ ƀ
Â

P07.69	Ẓ ẏ	₣ ∧ ẏ	20.0%
	₥	0.0% 50.0%	~
P07.70	Ẓ	₣ ∧ ẏ	2.0s
	₥	0.0s 60.0s	

W 7 ضي ΐ ك ضي D ك L Â

ΐ ك ∫ ƀ ₣ Ẓ ˘ Ẓ G Ẓ ẏ
P07.69 ₣ G Ẓ P07.70 ˘ ΐ ك E119
Ḡ ⌟ ƀ Â

Ẓ ч 0.0s ˘ ŭ Ẓ Â

7.8 Ω Å L P8

P08.01	1 L		₣ ∧ ẏ	0
	₥	0	D ك L^ SVC~	
		1	D ك L^ FVC~	
		2	V/F L	

0' D ك L

L˘ G L يشي ˘ ₩̃ ΐ ك7 ⌟ ₩̃ Â

à à K à Â

1' D ك L L˘ ₰ ك˘ ΐ ك

ƀ ك ▯ مم PG ∧ Â G L L يشي Â ₩̃ ΐ ك7

P08.02	ث פ		₮ ٨ ų	0
	ת	0	ƀ ث פ ^ LOCAL ~	
		1	ث פ ^ LOCAL ~	
		2	ث פ ^ LOCAL ~	

ĩ ך ث פ ~ Â

ĩ ך ث פ ´ ' Ω¨ à Å à à ỉ à ¯ Â

0' ƀ ث פ ^ l' LOCAL Ł ~ ' ƀ RUN à STOP ث פ Â

1' ث פ ^ l' LOCAL Ł ~ ' w ~ FWD( ) àREV(ỉ) àFJOG(h ¯) à RJOG(ỉ h ¯) ث פ Â

2' ث פ ^ l' LOCAL Ł ~ ث פ β ₮ Â

˘ ٨ Â

h X ₮ ٨ ų 0

0 ^ P08.08 UP/DOWN ˆ ˊ ˘ ƀ ~

1 ^ P08.08 UP/DOWN ˆ ˊ ˘ ~

2 AI1

P08.03

ת



Δ ч P08.08 Ŀ ģ

Ť U P ˇ ν ч P08.08 ľ Ŀ ν Â

1' ^ ~

Δ ν ч P08.08 ľ Ŀ ν Â ģ à η ^ w ~

m" ЧP à DOWN ~ Ť Ť ς ν Â

Ť ς U P ˇ ч ⊥ ˇ Ť ς ģ àη

UP à DOWN ќ Â

ˇ P08.23 ч ľ Å Ŀ ˇ P08.23 G ض Ť ج

Å ˇ ќ Â P08.23 Ь Å ˜ˇ Ь

˜ˇ Ţ Â

2' AI1

3' AI2

4' AI3

~ ÂHF630N L ㄴ 2 ⓠ ~ ^ AI1˘ AI2˜˜

Ð I/O Ѵ˜ ㄴз 1 ⓠ ~ ^ AI3˜ Â

ì Ţ˘ AI1 ч -10V˙ 10V ٨ فمم ˜˘ AI2˜ ч -10V˙ 10V ٨ ˜˘ Ӟ˜ ч 0/ 4mA˙

20mA ˜˘ J1 ˇ AI3 ч -10V˙ 10V ٨ فمم ~ Â

AI1 à AI2 à AI3 ~ ٨ ν˘ Ь ˜ ˇ ˜ Ү Â HF630N

ㄴ 5 ˜ ˇ ì Ţ 3 ч ˜ ^ 2 ˜ ~ ˘ 2 ч 4

˜ к ˇ ˜ Ү P05 ĭ P19 w Â

w P05.20 G AI1~AI3 ~˘ №≠ 5 Ţ ك ₩ ˇ

5 Ť ㄱ ˜ , ă ЧP05 à P19 w Â

5' ‖ ^ DI5˜ ‖ m" 5

PLC

-16 ɷ ĸ Ɒ Ң Ⓟ

Ī ɾ ṗ ă P9

PID

PID L ₣ ƀ ч Âẅ ش L ɒ

L à L ش Â

P15 l' PID w L ˜ ă Â

ɡ h β Â

P08.04		0	^	P08.08 UP/DOWN ḱ ˘ Ь ~
		1	^	P08.08 UP/DOWN ḱ ˘ ~
		2	AI1	
		3	AI2	
		4	AI3	
		5	Ⅱ ^ DI5	
		6	Ɒ	
		7	PLC	
		8	PID	
		9		

ض ƀ ч ^ ч X ∫ Y Ⓟ ~ ˘ ì Ь h

X ˘ ą ˜ ɣ ă P08.03 ˜

ƀ ŋ ѵ Ƶ - Ƶ

3˜ ч ‖ ~ ˘ Ь ³ Â ' ↑ Y Ь h
X ˘ Ь ч □ ₩ ₢ ˘ ↙ P08.03 Ь P08.04 Ь ч □ ẏ˘ Ɋ ↕
Ÿ Â

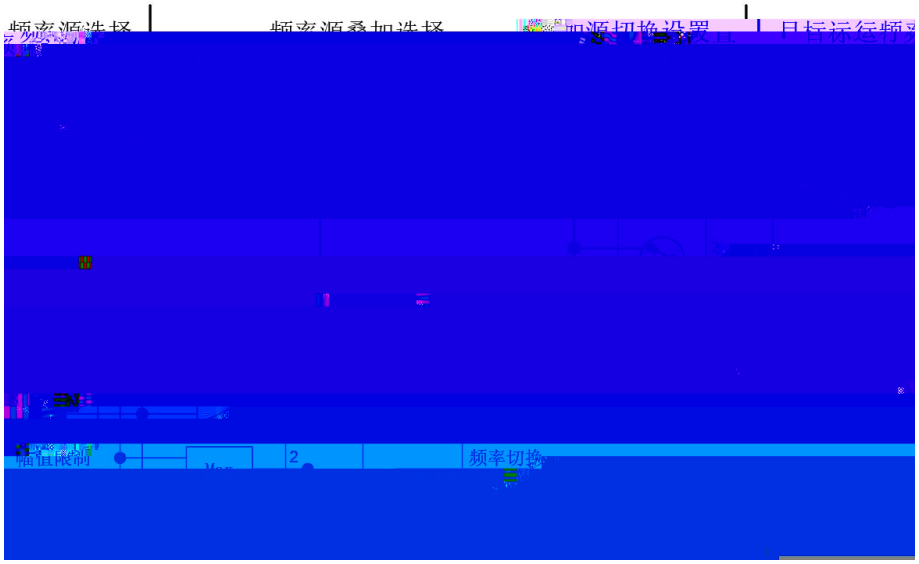
P08.05	Ŋ ₰ ↑ Y ₰		₹ ↙ ẏ	0
	₰	0	G	
		1	G h X	
P08.06	Ŋ ₰ ↑ Y ₰		₹ ↙ ẏ	0
	₰		0% 150%	

ч ľ Ŋ ₰ Ŀ^ ↙ P08.07 ч 1à3 4˜ ˘ Ң ₢ ă
↑ ₰ Â

P08.05 G ↑ ₰ ˘ ˆ G ˘ Ӟ Y
G h X˝ ч G h ˘ ↕ ↑ ₰ h X ĩ.
ĩ. Â

P08.07	Ŋ ₰	₹ ↙ ẏ	0
	₢ β		
	0	h X	
	1	h ^ ˜ Ⅵ β ~	
	2	h X Ь ↑ Y Ⓟ	
	3	h X Ь h Ⓟ	
	4	↑ Y Ь h Ⓟ	
	Ⅵ β	h ˜	
	0	h+	
	1	h-	
	2	ʜ ẏ	
	3	ʜ ẏ	

ă Â h X ɇ ↑ Y ¨ Â
₢ β' '



0' h X

h X ƀ ч Â

1' h h ƀ ч ˘ h w l' Ⅵ β Ŀ Â

2' h X Ь ↑ Y Ⓟ w ~ w 18 Ⓟ ~

˘ h X ƀ ч Â w ~ w 18 Ⓟ ~

˘ ↑ Y ƀ ч Â

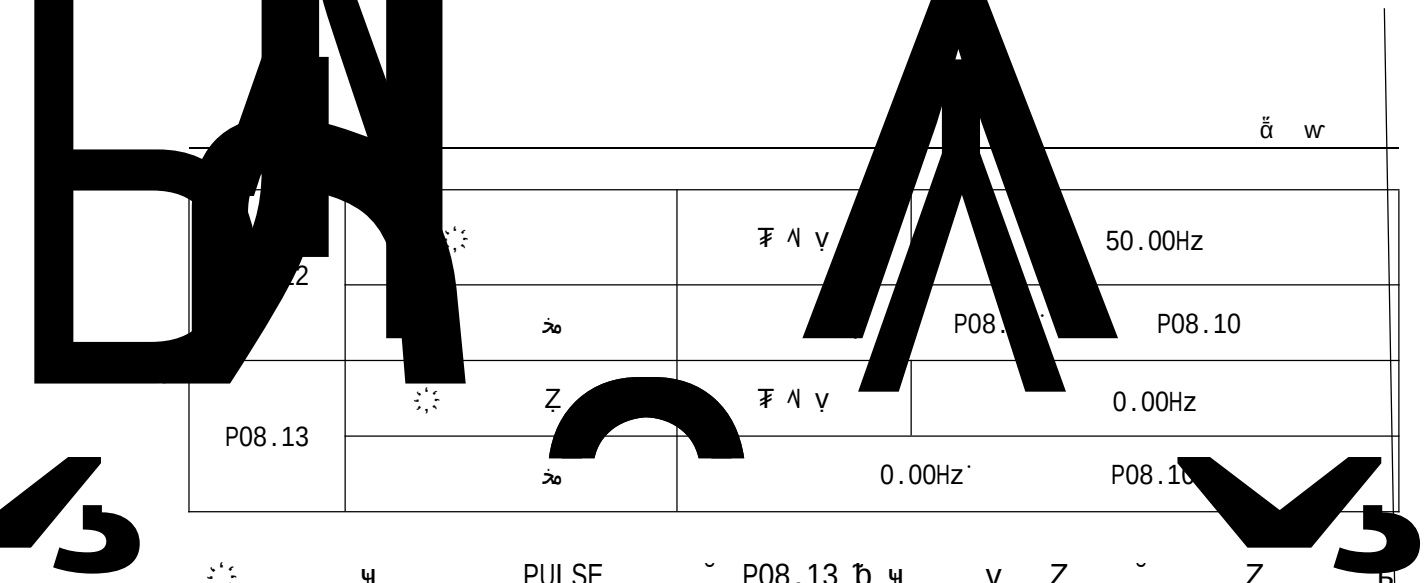
3' h X Ь h Ⓟ w ~ w 18 Ⓟ ~

˘ h X ƀ ч Â w ~ w 18 Ⓟ ~

˘ h ƀ ч Â

4' ↑ Y Ь h Ⓟ w ~ w 18 Ⓟ ~

˘ ↑ Y ƀ ч Â



P08.12			50.00Hz
			P08.10
P08.13			0.00Hz
		0.00Hz	P08.10

PULSE P08.13 P08.11

P08.14			0.00Hz
		0.00Hz	P08.12

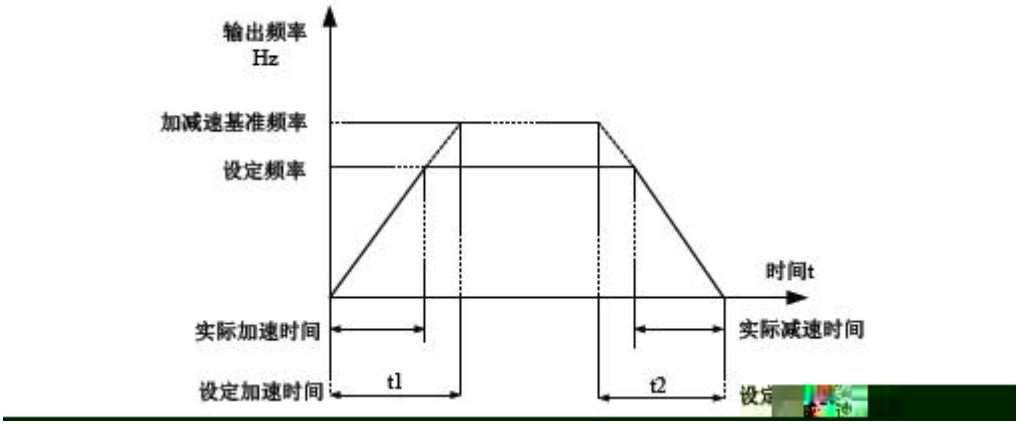
P08.14 P21.14

P08.15

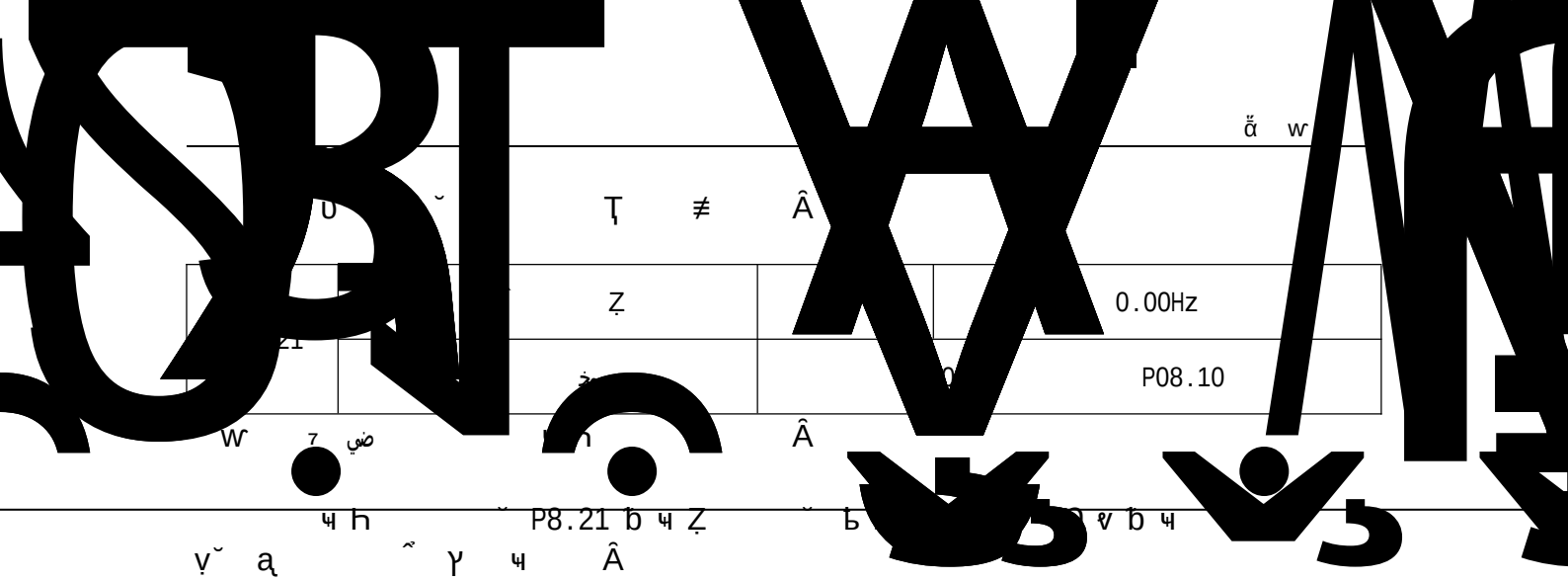
P0	⁞ 1		
		0.00s˙ 6500.0s	

t1Â

t2Â



HF630 ª ,⁞



	Ż		0.00Hz
			P08.10

P08.23	Å		0
		0	Ь
		1	

P08.24		0	1
		1	2

P08.25 ч 1 ˘ ѵ ⋮ Ь ˘ ĭ˙ ˘ ↕
ѵ ĭ˙ ˘ Â

P08.26	ɒ UP/DOWN ‰		₮ ∧ ẏ	0
	ɲ	0		
		1		

ă˝ ч Â
ǵ à η UP/DOWN˥ ƀ ˘ v ќ ˘ ↓
ضي ⋮˘ ضي ⋮ Â
ң ↓≠˘ ضي ĭ ҫ ɢ ѵ ⋮ ˘ ↓ ĭ ҫ Ь
Ь □ ˘ ă Ь □ Â

ث ɒ ₮ ∧ ẏ

P308.27

P08.28				0
		0		
		1		
		2		

0 Ø¬
Ø¬ L¬ ч 0 ↕ ĩ ر ر Ø¬ Â Ø¬ L¬ Ь
ч 0 ↕ ώ L¬ ˘ U ˈP ر Ø¬ Â ˘ ضØ¬ ˆ
¬ يشي Â
1 Ḡ
2 Ḡ

P08.31	Ø¬	∓ ∧ ẏ	0.00Hz
	ж	0.00Hz˙ 10.00Hz	
P08.32	Ø¬ Ḡ	∓ ∧ ẏ	0.0s
	ж	0.0s˙ 100.0s	

ч Ḡ Ø¬ ˘ ... Ø¬ Â ч ą Ø¬ ˜Ḥ№ ˘
Ø¬ Ḡ ẅ Â

Ø¬ P08.31 Ь ỉ Й L Â p 08.3 8

P08.33	Ω L	₮ ∧ ỵ	0%
	₯	0% 100%	
P08.34	Ω L	₮ ∧ ỵ	0.0s
	₯	0.0s 100.0s	

w P08.36

0 Å Å ث פ U ĩ ح Å ы 0 U Å Â

1 Å Å ث פ U ĩ ح ы Å Â

Å L ы ы 0.00Hz

P08.39

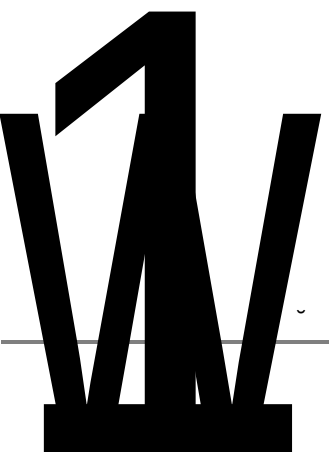
ض 0.00Hz

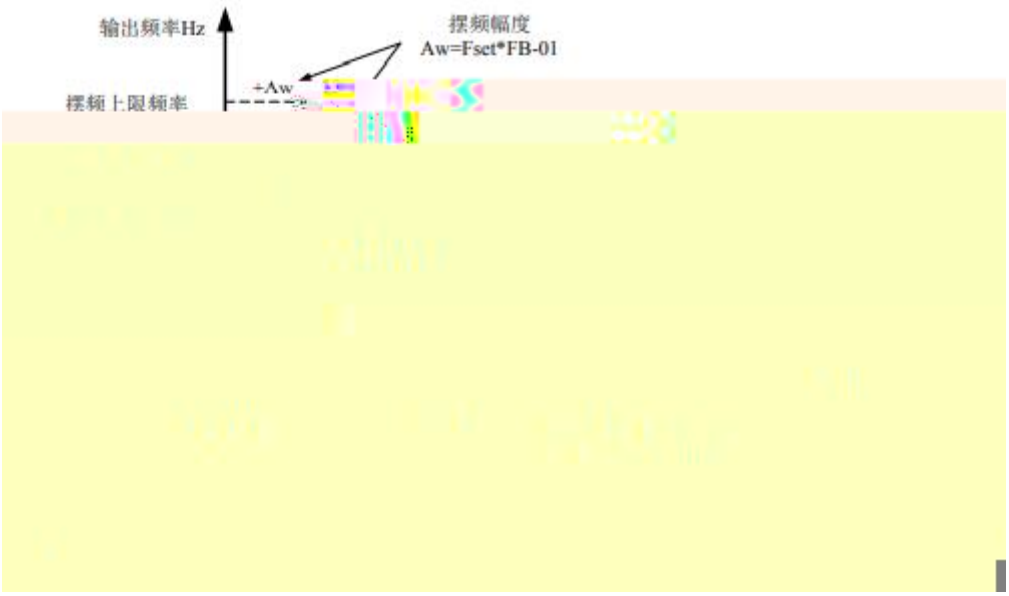
Å L ы ы 0.0s

P08.40

ض 0.0s 36.0s

P08.





ƀ

Ŧ ʎ ʏ 0

P09.00 0

P09.03	Ա	₹ ∧ ẏ	10.0s
	₺	0.0s˙ 3000.0s	
P09.04	⁝⁝ ⁝ ˥	₹ ∧ ẏ	50.0%
	₺	0.0%˙ 100.0%	

Ա ' ₩ ₡ Ա ẏ Â

⁝⁝ ⁝ ˥ P09.04˜ ⁝⁝ ⁝ ˥ Ա P09.03 № Â

⁝⁝ ⁝ ˥ ˛ Ա P09.03 ⁝⁝ ⁝ ˥ P09.04 ˘ ∨ β ч Â

⁝⁝ Й ˛ Ա P09.03 ¦ˆ 1˙ ⁝⁝ ⁝ ˥ P09.04˜ ˘ ∨ β ч Â

P09.05		₹ ∧ ẏ	1000m
	₺	0m˙ 65535m	
P09.06		₹ ∧ ẏ	0m
	₺	0m˙ 65535m	
P09.07	‖	₹ ∧ ẏ	100.0
	₺	0.1˙ 6553.5	

⁝⁝ w ɢ └ Â

Ḥ w ~ ˘ ‖ ₡ ƀ ‖ P09.07 ˘ ˜ ⌠ P09.06 Â ɢ P09.05 ˘ w DO ₹ ľ ⌠ Ł ON Ḥ˜ Â

└ Ţ˘ ˜ ϒ w DI ˘ β ƀˆ DI w ч 28˜ ˘ ĺ ᵣ ă P3 ă Â

Ţ ~ w ч ľ ~ Ł ˆ w 27˜ ˘ ض ‖ ˘ ą DI5 ₀ Â

P09.08	ẏ	₹ ∧ ẏ	1000
	₺	1˙ 65535	
P09.09	ẏ	₹ ∧ ẏ	1000
	₺	1˙ 65535	

ẏ w ~ Â Ţ ~ w ч ľ

ק ~ Lˆ w 25~ ˇ ضِ ll ˇ ą DI5 ₀ Â

ẏ ⌠ ẏ P09.08 ˇ w DO ₣ l' ẏ ⌠ Ł ON Ḥ˝ ˇ
U ק Å Â

ẏ ⌠ ẏ P09.09 ˇ w DO ₣ l' ẏ ⌠ Ł ON Ḥ˝ ˇ
ק ˇ ⌠ l' ẏ Ł ק Å Â
ẏ P09.09 Ь G ẏ P09.08 Â Й, ₹ ч ẏ ⌠ ĭ ẏ
⌠ w ₹ Â



HF630N Ɒ˘ ĭ γ w ˇ w ˇ ˆ
γ Ь ч VF № ∧ ˇ γ ĭ PID Â ч ˇ Ɒ ч ẏ Â
PLC ˆ Ɒ ∨ Â

P09.10	Ɒ 0	₣ ∧ ẏ	0.0%
	₹	-100.0% 100.0%	
P09.11	Ɒ 1	₣ ∧ ẏ	0.0%
	₹	-100.0% 100.0%	
P09.12	Ɒ 2	₣ ∧ ẏ	0.0%
	₹	-100.0% 100.0%	
P09.13	Ɒ 3	₣ ∧ ẏ	0.0%
	₹	-100.0% 100.0%	
P09.14	Ɒ 4	₣ ∧ ẏ	0.0%
	₹	-100.0% 100.0%	
P09.15	Ɒ 5	₣ ∧ ẏ	0.0%
	₹	-100.0% 100.0%	
P09.16	Ɒ 6	₣ ∧ ẏ	0.0%

	ж	-100.0%: 100.0%	
P09.17	Ɒ 7	₣ ∧ ų	0.0%
	ж	-100.0%: 100.0%	
P09.18	Ɒ 8	₣ ∧ ų	0.0%
	ж	-100.0%: 100.0%	
P09.19	Ɒ 9	₣ ∧ ų	0.0%
	ж	-100.0%: 100.0%	
P09.20	Ɒ 10	₣ ∧ ų	0.0Hz
	ж	-100.0%: 100.0%	
P09.21	Ɒ 11	₣ ∧ ų	0.0%
	ж	-100.0%: 100.0%	
P09.22	Ɒ 12	₣ ∧ ų	0.0%
	ж	-100.0%: 100.0%	
P09.23	Ɒ 13	₣ ∧ ų	0.0%
	ж	-100.0%: 100.0%	
P09.24	Ɒ 14	₣ ∧ ų	0.0%
	ж	-100.0%: 100.0%	
P09.25	Ɒ 15	₣ ∧ ų	0.0%
	ж	-100.0%: 100.0%	

Ɒ ˆ ɣ ۻ ۺ ' ƀ ч à ƀ ч VF № ∧ à ƀ ч PID Â

ۺ ۻ Ӈ˘ Ɒ ч ų˘ ж -100.0%~100.0%˜ ƀ ч ì ч № ' ƀ ч VF № ∧ ˘ ч ɢ ∧ № ' ɢ PID ч ų˘ Ɒ ƀ ч PID Ь Â Ɒ w DI Ь □ ˘ ® ˘ ĺ r ă P3 ˜ Â

7.10

P10.50~10.54 □ ă ˘ ˚ □ ⁚ Ψ ι № ă ˘ p №
Ь ⁚ ă ˘ ĺ ֆ ˗ ˘ ғ l' □
Ŀ Â ֆ ч l' □ Ŀ P10.50~10.54 4 ѡ ă ˘ l' □
Ŀ ˗ P10.54˝ í ғ Ӣ'

1˜ ĭ ˗ ϟ Ke˘ Ӣ' E=(Ke* *2*pi)/60

2) ĭ ˗ ϟ E'(V/1000r/min)˘ Ӣ' E=E'* /1000

3) ⁚ ң ѡ ă ˘ Ӣ' E=P/(1.65*I)

ì Ţ˘ ч (rpm)˘ P ч w (w)˘ I ч (A)
l' □ Ŀ ₹‰ ĭ ˗ ϟ A064 ҏ˘ 3˝ ˗
Â

ќ w ۸ ˘ ĺ ֆ Ψ ˗ ќ P10.50~10.54 ă ѵ˘ ą
Ţ Â

⁚ □ ă ˘ ˝ ˝ ץ ۸ ι w Â

P10.61	ֆ ǁ	₹ ۸ ѵ	1024
	ѫ	1˙ 65535	

ABZ ֆ ǁ Â
ض D ֆ L Ӣ˘ ֆ ǁ ˘ Ղ ↕ Ь Â

P10.62	ֆ ғғғ	₹ ۸ ѵ	0
	ѫ	0	ABZ ֆ
		1	Ḡ
		2	ĺ ۸ ֆ
		3	Ḡ
		4	Ḡ

HF630N ֆ ғғғ˘ Ь □ ֆ Ь □ PG ۸˘ ą PG
۸ Â ì Ţ˘ □ ˝ 2 ֆ Ţ к ₩ Â
PG ۸ U˘ ' P10.62˝ Ղ ↕ ĺ ֆ˝ Ь Â

P10.71			₮ ∧ ỵ	0
	ﻍ	0	ƀ	
		11	□	
		12	□	

L ч Ḡ ǐ̈ فی

P21.03	∀ 2	∓ ∧ ∨	20.0s
	∂∘	0. 0s˙ 6500.0s	
P21.04	⁞ 2	∓ ∧ ∨	20.0s
	∂∘	0. 0s˙ 6500.0s	
P21.05	∀ 3	∓ ∧ ∨	20.0s
	∂∘	0. 0s˙ 6500.0s	
P21.06	⁞ 3	∓ ∧ ∨	20.0s
	∂∘	0. 0s˙ 6500.0s	
P21.07	∀ 4	∓ ∧ ∨	20.0s
	∂∘	0. 0s˙ 6500.0s	
P21.08	⁞ 4	∓ ∧ ∨	20.0s
	∂∘	0. 0s˙ 6500.0s	

HF630N ˪ 4 ∀ ⁞ ˘ №≠ ч P08.17\P08.18 ẗ;: 3 ∀ ⁞ Â
4 ∀ ⁞ ꓤ ŋ □˘ ă P08.17 ¿ P08.18 ˜ Â w
~ DI Ь □ ˙˙ ˘ ˆ Y ℗ 4 ∀ ⁞ ˘ ĺ ˛ ą ă w
P03.01˙ P03.05 Ţ ˜ Â

1 ∓ ∧ ∨ .0089 ѕ
P21.09

P21.12					0.0s
					0.00s 3000.0s
P21.13					0
		0			
		1			
P21.14					0
		0			
		1			

ʏ ɢ Ӣ ˇ ĭ ҁ ˆ ɣ ă̋ ÂHF630N

ˇ Ɣ Â

P21.15	Ӣ ѧѧ L	∓ ∧ ѵ	0.0%
	ѯ	0.0%˙ 100.0%	

Ӣ ѧѧ ˝Ң h ė ɾ ң ض ˇ ˆ ɣ ѽ ıı ң ‖ Â

ă̋ ѵ 0 Â

ɀ h ė ɾ L ˇ Ӣ ѧѧ ˇ ɷ D˩ ˇ

ˏ˙ Ӣ ѧѧ ض Ţ ˇ Ь P21.15 ˇ Ղ ↕ ˇ

Ψ Ӣ Â h ė ɾ Ӣ ѧѧ Â

Ӣ ѧѧ = □ ¦ ∓ (%) ¦ Ӣ ѧѧ (%)

' P21.15 = 10.0%˜ □ 50Hz˜ ∓ 50%˜ ↕'

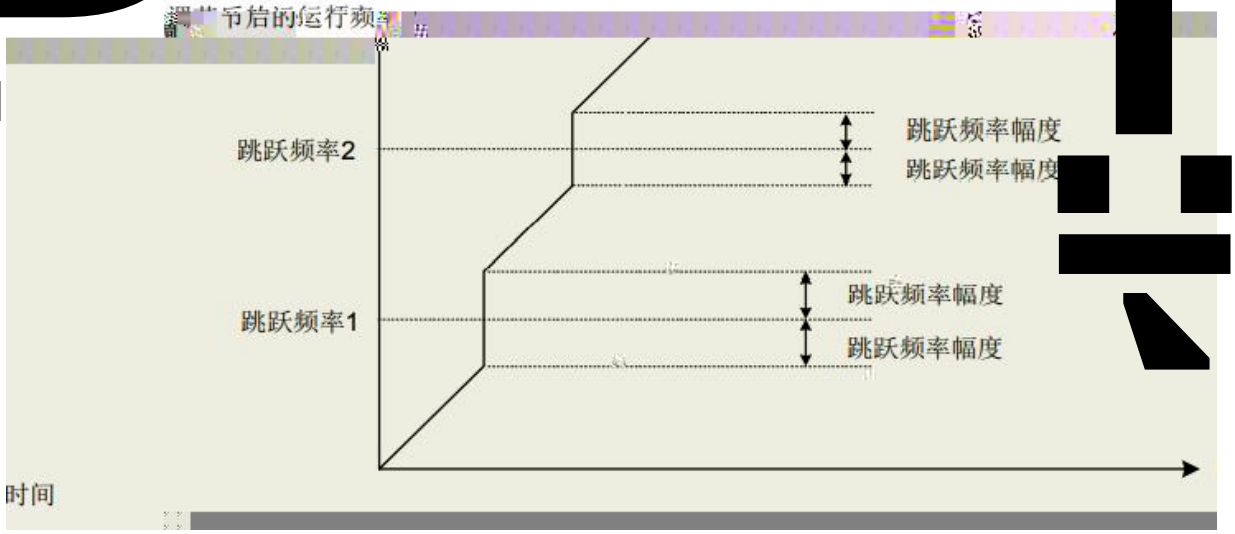
Ӣ ѧѧ = 50Hz ¦ 50% ¦ 10%=2.5Hz

ĭ ҁ = 50Hz ~ 2.5Hz = 47.5Hz

P21.18	Ѫ˩ Ḡ	∓ ∧ ѵ	1
	ѯ	0' Ь Ḡ 1' Ḡ	

ă̋ ĭ̆ ĭ ҁ ŋ Ḡ w Â

m ضد



P21.25	∀ 1 Ь ∀ 2 Ⓟ	₣ ∧ ∨	0.00Hz
	ﻫ	0.00Hz˙	
P21.26	⋮ 1 Ь ⋮ 2 Ⓟ	₣ ∧ ∨	0.00Hz
	ﻫ	0.00Hz˙	

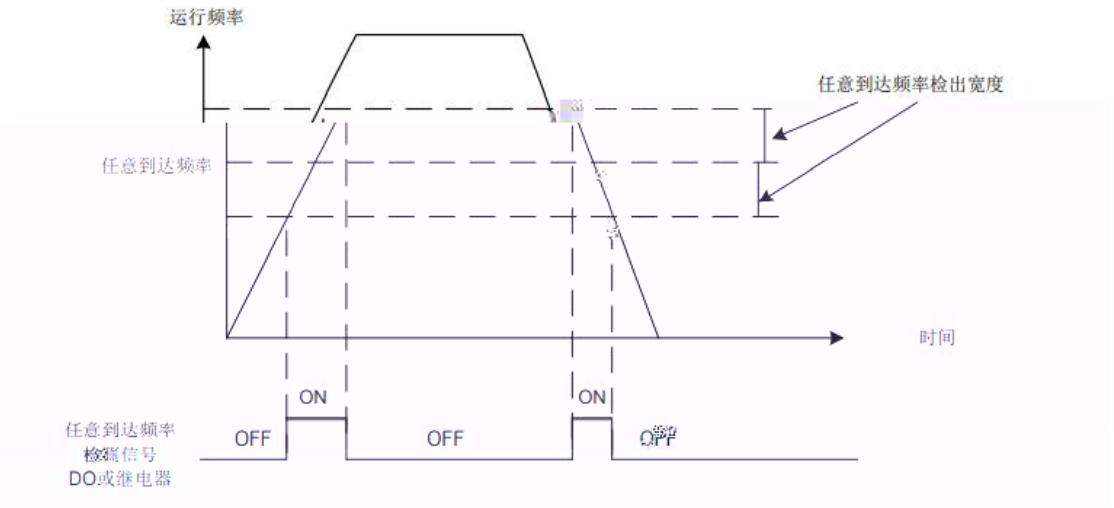
W ﺽ ч 1˜ ғ DI Ⓟ ∀ ⋮ Â G ﺽ Ĩ

ﻙ Ţ˜ Ь DI ﻫ˜ я ﻫ˜ ﻫ˝Ĩ Âسˇ Ь

P21.31	к ⌠ Ŧ 1	Ŧ ٨ ų	0.0%
	ﺧ	0.0%˙ 100.0%ˆ ~	
P21.32	к ⌠ ų 2	Ŧ ٨ ų	50.00Hz
	ﺧ	0.00Hz˙	
P21.33	к ⌠ Ŧ 2	Ŧ ٨ ų	0.0%
	ﺧ	0.0%˙ 100.0%ˆ ~	

Ї ﻙ Ŧ ˘ ﺽ к ⌠ ų Ŧ ﺧ ṗ ˘ w DO Ŧ ON Ḥ˜ Â

HF630N ᴸ Ң к ⌠ Ŧ ă ˘ №≠ ų ĭ ﺧ Â Й ﺑ ч w ﺑ Â



w Ŧ ٨ ų 0

P21.42 0

ﺧ

1

Ŧ ٨ ų 0

0 P21.44

P21.43

ﺧ 1 AI1

2 AI2

		3	AI3
		~ 100% P21.44	
P21.44		∓ ∧ ụ	0.0Min
	₰	0.0Min˙ 6500.0Min	

ă ĩ ↄ w Â

P21.42 w ˘ ĩ ↄ Ω˝ ˘ ⌠ U˘ ĩ ↄ ˝ Å ˘ □ w DO ∓ ON Ḥ˚ Â ĩ ↄ Ω˝ ˘ ɾ 0 ˘ ▼ φ ˚ P23.20 Â P21.43 à P21.44 ˘ ∨ β ч № Â

P21.61	ą	∓ ∧ ụ	1
	₰ 0	Ь ą	
	1	ą	

Ω φ w ˘ ⋮ ĩ ↄ ∓ ˘ Ḡ ĩ ↄ Ь Â ĩ ↄ ɢ φ ˘ ĩ ↄ ˚ ∓ ₰˘ ' Ь ¨Ḥ ˘ ϒ ĩ ↄ φ E040˝ ĩ ↄ Å Â

7.12 P19

AI1 ∧

P19.30

P19.42	A01 ㄱ 1	₹ ㄴ ụ	₹ ㄴ
	ㅁ	0.500V˙ 4.000V	
P19.43	A01 ㄱ 1	₹ ㄴ ụ	₹ ㄴ
	ㅁ	0.500V˙ 4.000V	
P19.44	A01 ㄱ 2	₹ ㄴ ụ	₹ ㄴ
	ㅁ	6.000V˙ 9.999V	
P19.45	A01 ㄱ 2	₹ ㄴ ụ	₹ ㄴ
	ㅁ	6.000V˙ 9.999V	

w ˘ ₹ A0 Â w ă ₹ ㄴ ˘

₹ ㄴ ụ ˘ Ψ ч ₹ ㄴ U ụ Â ŵ ضي شي Ь Â

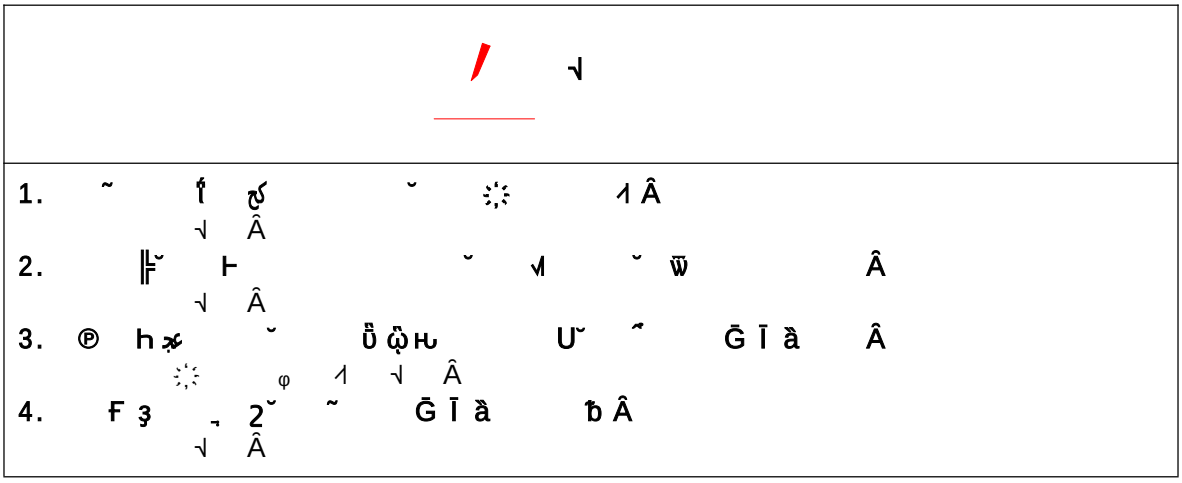
ㄱ Ĭ ک ₹ ㄱ ụ Â ㄱ ’ ת ک ₹

₹ ㄱ ụ Â

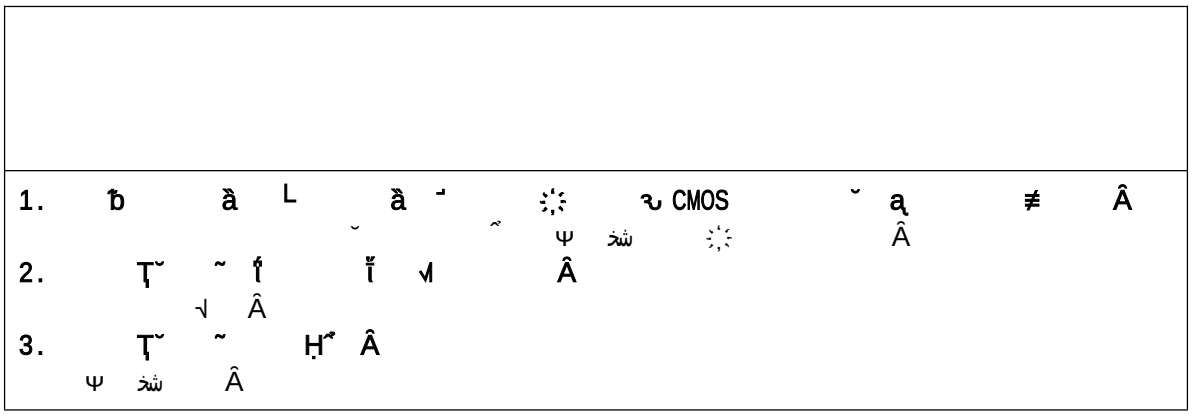
L¬ 1à L¬ G P08.44 1à L¬
E061
ỵ

DI	1 à ǎ 2 à Ḥ̂ 3 à PW Ь +24V ˩ 4 à L	1 à P3 ˜ ǎ 2 à Ḥ̂ 3 à PW Ь +24V 4 à ∧ Ⱶ
L ˘ ㄱ	1 à ㄓ 2 à ㄓ Ь 3 à PG ∨ 4 à ˩	1 à 2 à PG ∨ 3~4 à ∧ Ⱶ
ǐ ㄓ ė ㄱ	1 à ǎ Ь 2 à ∨ ⋮ Ь.. 3 à ˩	1 à ǎ 2 à .. ∨ ⋮ 3 à ∧ Ⱶ
⁘ ˆ ˜ Err17	1 à Ω˘ ㄓ Ꝑ..	1 à ㄓ ᑎ ˩ 2 à ㄓ ᑎ 3 à ㄓ 24V ㄴ ᑎ 4 à ∧ Ⱶ
⁘ 8.8.8.8.8	1 à L ⁘ ˜ ㄓ ɒ ɔɯ	1 à L

9 Ь Ḡ Ī



1. ~ Ť ᴄᴋ ˇ ⁘ ⅄ Â
   ↴ Â
2. ╟˘ Ⱶ ˇ ⅄ ˇ ₩ Â
   ↴ Â
3. Ⓟ Ⱨ ᵡ ˇ Ŭ ᾧ ʜ U˘ ˆ Ḡ Ī à Â
   ⁘ φ ⅄ ↴ Â
4. Ғ ʒ ¬ 2˘ ~ Ḡ Ī à Ь Â
   ↴ Â



1. Ь à Ꮮ à ⁃ ⁘ ↻ CMOS ˇ ą ≠ Â
   ˇ ˆ Ψ ᵡ ⁘ Â
2. Ţ˘ ~ Ť Ĭ ⅄ Â
   ↴ Â
3. Ţ˘ ~ Ḥ˚ Â
   Ψ ᵡ Â

9.1 Ḡ Ī ẹ

ɢ Ĭ ᴄᴋ ʐ Ь ... Ĩ ᵐᵐ ჯ˘ ϒ Ί ʒ Ь Ĭ Â Ť ᴄᴋ ą Ī˙ ˇ à à ᴣ˘ ϒ Ĭ Ť ᴄᴋ ṗ ˝Ḥᴄᴋ Ð . ᵡ ˇ ˆ Ψ Ť ᴄᴋ Ŭ Ỿ Â ᵡ ˇ ч ą ᵐ ჯ ˇ ض à ą Ţ Ť ᴄᴋ ẹ ^ Ɛ ɷ ₩ ~ Ḡ Ī ⅄ №̲ Â

9.2

ч ↻ Ť ᴄᴋ Ŭ ˇ Ḡ ˇ Ť ᴄᴋ ą ث˘ Ť ᴄᴋ ˇ ṗ Й '

	ṕ	∞≠ ‰
	1. à 2. à r	1. > 40Ņ Å ٧ < 95%˜ o 2. ء˘ à r
' ↓	1. 2. Ǐ ک r	1. ˘ 2. r ˘ كل
Ǐ ک r	1. ˉ à ↑ 2. كل 3. à	1. ˉ à ₹ ٥ 2. كل à ء 3. ﻫ ˉ
ء	1. ˉ à ↑ 2. كل	1. à 2. à Ь ش˜ كل
˜ à ₹ ă	1. ˜ ↑ 2. ₹	1. ˜ ↑ ض ﺥ ṕ 2. ₹ ض ٧ ٢ Й

B Đ

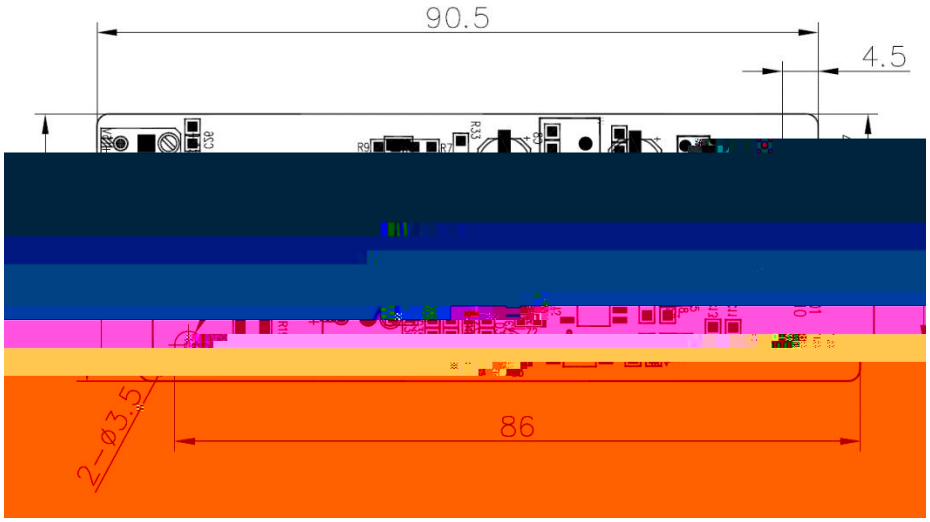
B1 PG V

B1.1

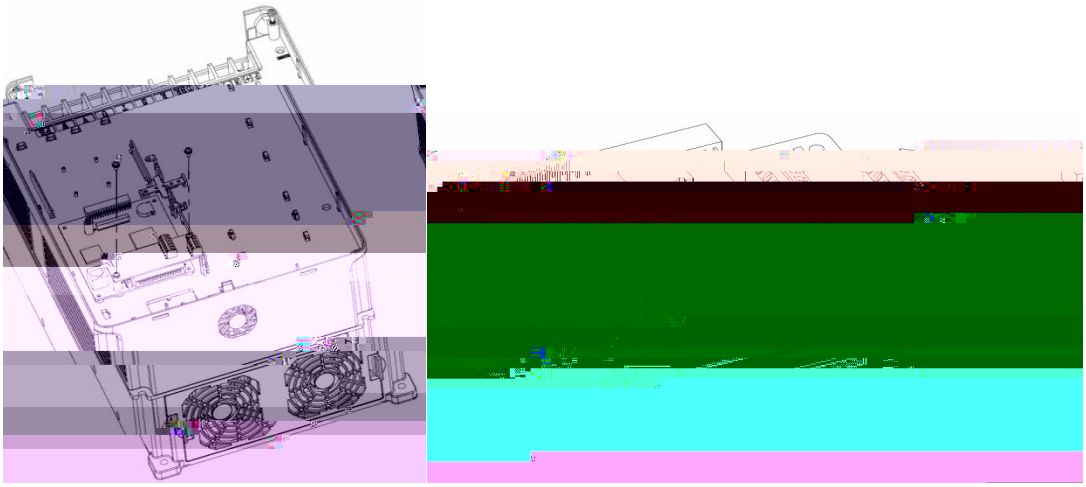
1.1.1

PG V GDHF-BPGX1

1.1.2



PG V



PG V

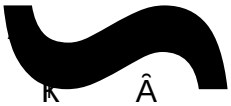
Hυ

1>.PG

2>.

3>.

4>.



B1.2

1.2.1

PG PG

PG

1.2.2

PG 9

A+	A-	B+	B-	Z+	Z-

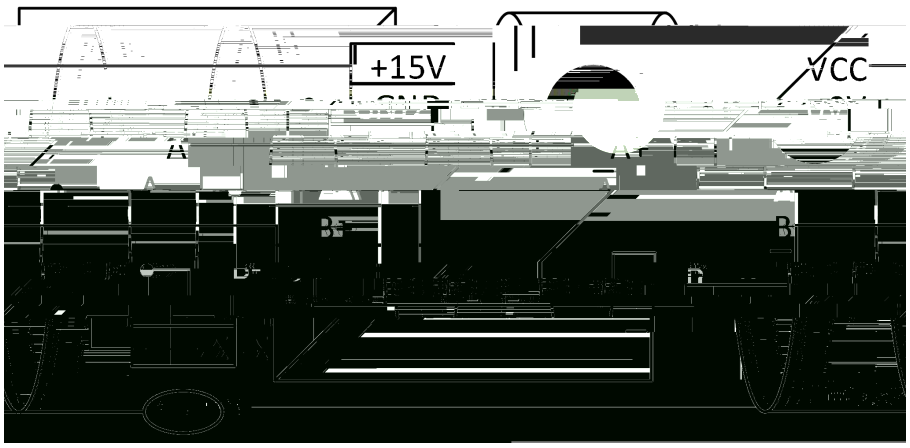
+15V	NC	GND

+15V GND A+ A- B+ B- Z+ Z-

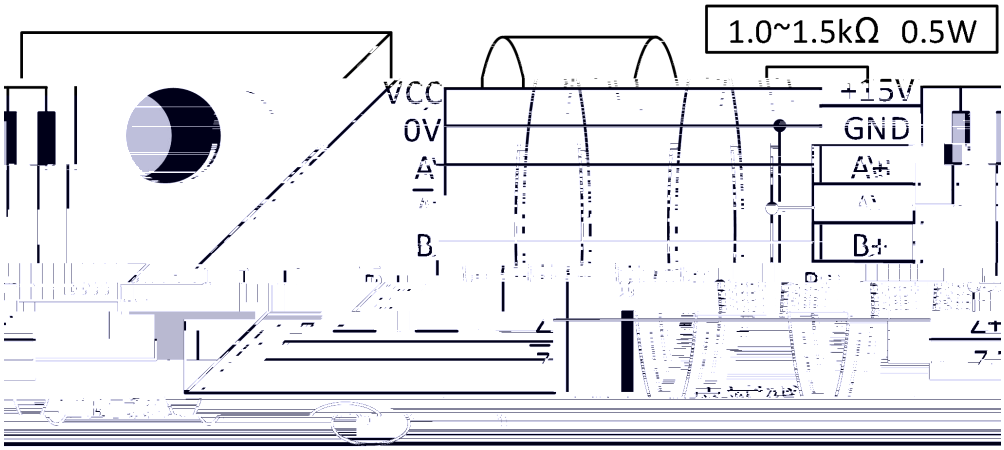
PE PE

1.2.3

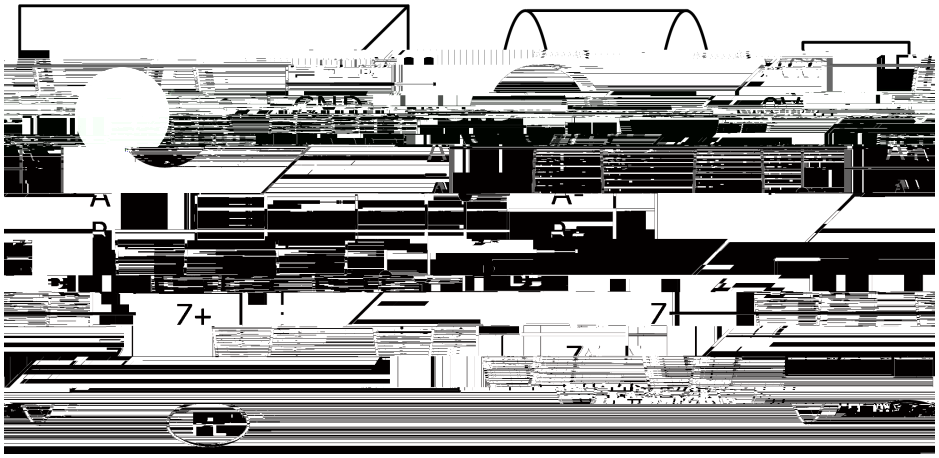
A B 1



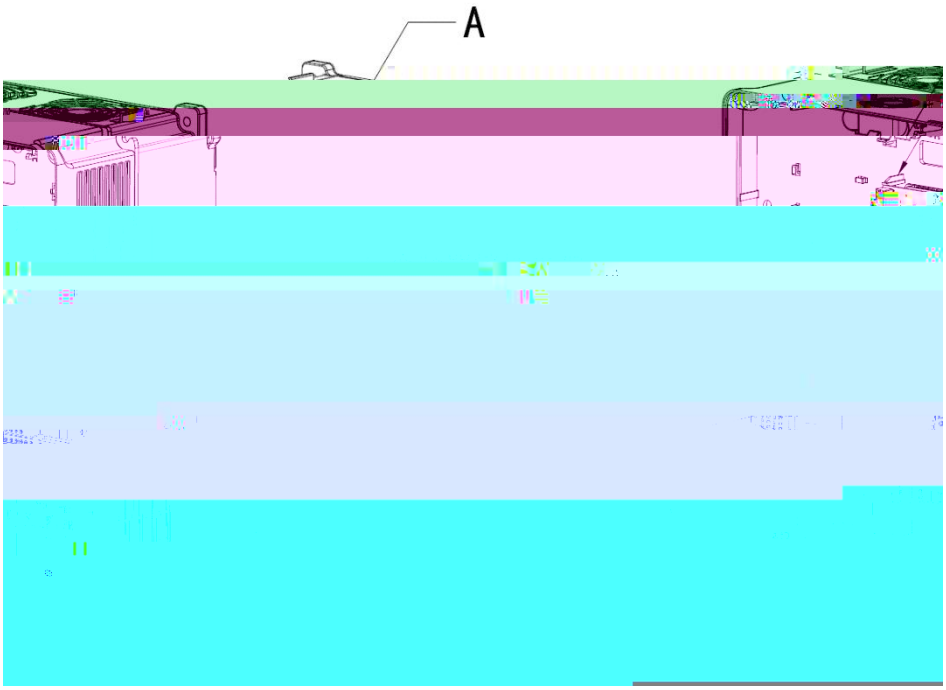
1.3.2



1.3.3



IO V Й, Â



IO V

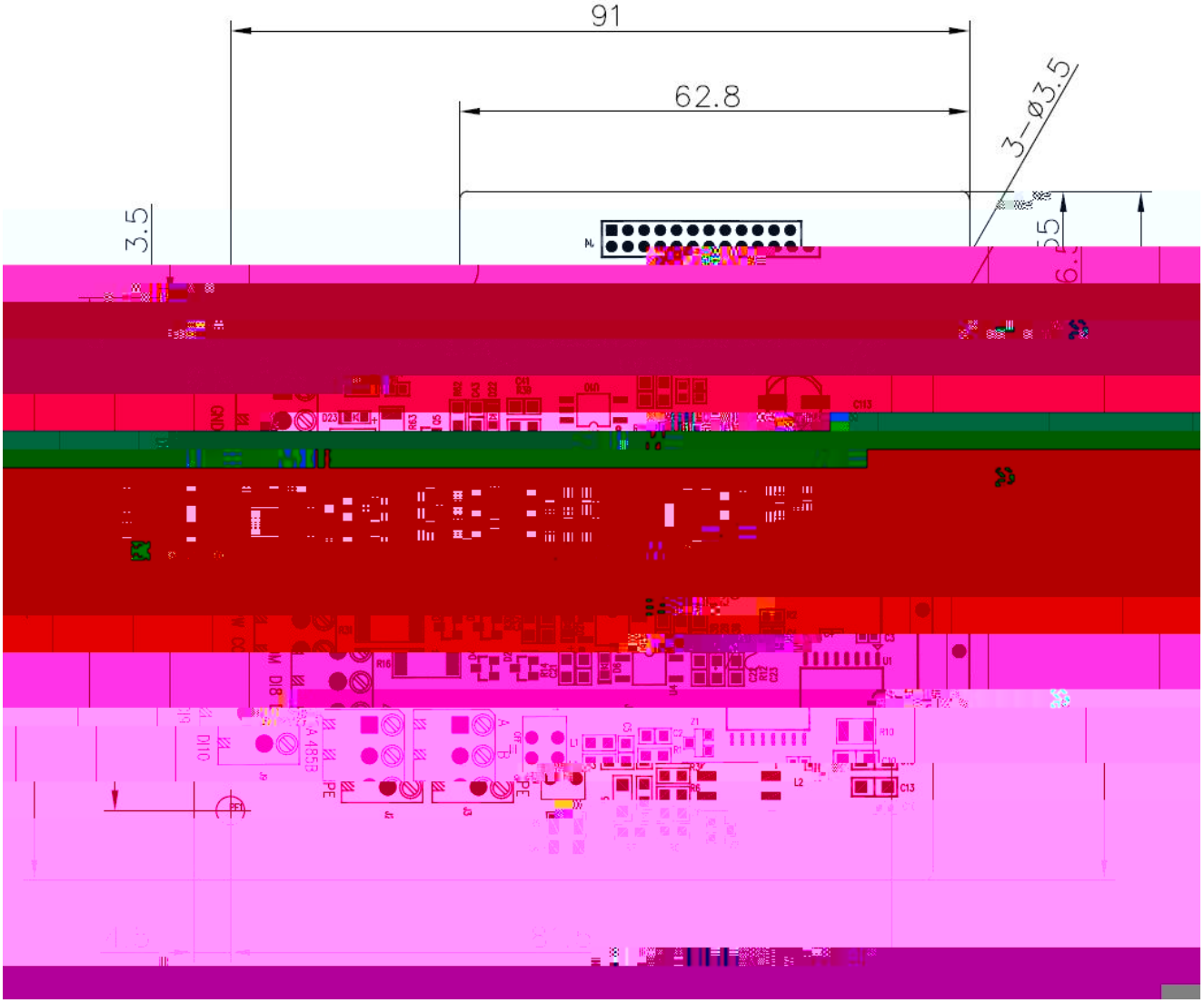
B2.1 IO V o

ضي IO Й, o '

≠		O	
	24V	24VDC	24VDC L 24V Ä 24V Â
	COM	24VDC ضر ă	24VDC ضر ă
	PW	~ `E ¨	Ь 24V
~	DI6-PW	~ 6	1 à ώ ` ` I ǐ ~ ' 2 à ~ ' 3.3K ß ; ~ ا ' 9~30V
	DI7-PW	~ 7	
	DI8-PW	~ 8	
	DI9-PW	~ 9	
	DI10-PW	~ 10	
∓	DO2-PW	∓ 2	ώ ` ǐ ∓ ∓ ا ' 0V~24V ∓ ' 0mA~50mA
	DO3- PW	∓ 3	
~	AI3-GND	~ 3	~ ا ' DC 0V~10V ~ ' 22k ß

` PW Ь 24V ;

B2.2



IO Ⅵ Đ GDHF-BIOX1 ˆ ㄱ ß mm˜

' ~ ǐ ᶎ L Ţ Â

Đ' ê ǐ ᶎ ą ий Ì Ţ ˜ G Đ ˜ ṗ Â

Đ ' Ỿ o Ḥ˜ Â

Đ ' W

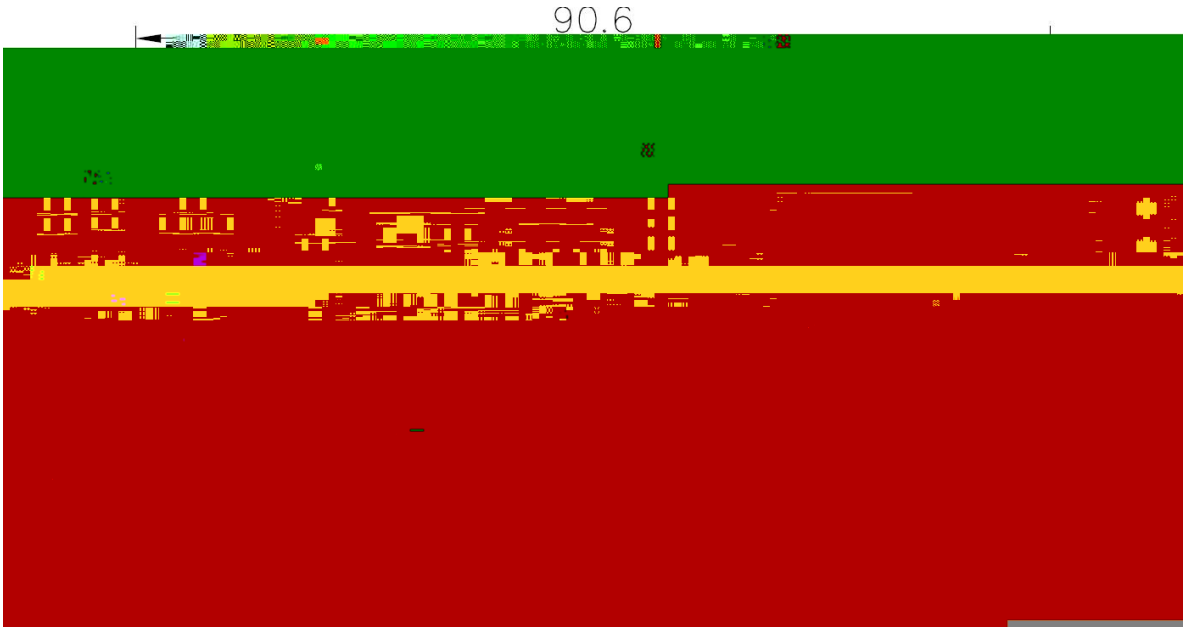
B3 Í PG Ⅵ

B1.1 ㎜ Ь

1.1.1 ㎜

Í ㄏ Í PG Ⅵ ㎜ ч GDHF-BPGY1Â

1.1.2 Ĭ



Í PG Ⅵ

Hυ '

1>. Í PG Ⅵ Ь L β Â

2>. Ţ δ Í PG Ⅵ ˘ Ь ㄏ Đ Â

3>. Ţ ㎜ Й 1˘ Ь Ẓ ẁ Â

4>. Ո ⌠ Ⅰ' ο Ŀ ڑ U ⌠ β˘ 'P Ⱪ Â

B1.2 ą

1.2.2

Í PG Ⅵ ˜ 9 ѡ ˘ Й ⱬ Â

EXC+	EXC-	SIN+	SIN-	COS+	COS-

Ì Ţ˘ EXC+ à EXC- ч ㄏ : ~' SIN+ à SIN-˘ COS+ à COS- ч ㄏ à φ Ĭ Ḥ Â

ضر ˆ ï ضر PE ~ ˘ ₩ ا ضر ˘ ا ﷺ

№	12 β
:	10KHZ
: ₹ ا	ˆ Vrms
SIN/COS ا	3.5Vpp
ï	0.5
	60000rpm

Hυ '

(1) ï PG ا Ḥ ƀ ˉ ƶ № ˘ ,

(2) ч ﷺ ضر Ḥ ˆ ˘ ч PG ا Ḥ ˆ ,

(3) ضر ضر ˆ ï ضر PE ~ ˘ ₩ ا ضر ˘ ا ﷺ

Ḥ ˆ ˆ Â

1.2.3

≠	β	O	w
ï ا ضر o ˆ J2˜	1	EXC+	: ₹ Ḥ
	2	EXC-	: ₹ Ḥ
	3	SIN+	ï Ḥ
	4	SIN-	ï Ḥ
	5	COS+	ï φ Ḥ
	6	COS-	ï φ Ḥ
ˆ J32˜			ï PG ا ƀ L Ḥ o

Hu

1à aą ĩ ڰ ج ╠ Ⱶ й Â

2à ч ↄ ŋ˘ Ғ ʒ¸ 2 ĩ Â

3à й ṗ ˆ ĩ¬ ˘ Ьз Â

м È˜

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ضي' ĸ ǔ ٧ لج لج 6ˆ

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