

# Kinco JD&低压伺服驱动器选配电机使用指南 V2.1

## 一、上位机软件-电机代码（上位机电机型号字母区分大小写）

电脑	数码管	电机型号
操作地址d4.19		电机型号
K@	404.b	未设置电机型号
G0	3047	SMC60S-0020-30A■K-3LK□
G1	3147	SMC60S-0040-30A■K-3LK□
G2	3247	SMC80S-0075-30A■K-3LK□
GB	4247	SMC130D-0100-20A■K-4LKP
G0	4F47	SMC130D-0150-20A■K-4LKP
GP	5047	SMC130D-0200-20A■K-4LKP
GC	4347	SMC130D-0150-20A■K-4HKP
GD	4447	SMC130D-0200-20A■K-4HKP
GR	5247	SMC130D-0300-20A■K-4HKP
GQ	5147	SMC130D-0300-30A■K-4HKP
KZ	5A4B	SMH40S-0005-30A■K-4LKH
KY	594B	SMH40S-0010-30A■K-4LKH
K0	304B	SMH60S-0020-30A■K-3LK□
K1	314B	SMH60S-0040-30A■K-3LK□
K2	324B	SMH80S-0075-30A■K-3LK□
K3	334B	SMH80S-0100-30A■K-3LK□
K4	344B	SMH110D-0105-20A■K-4LKC
K5	354B	SMH110D-0125-30A■K-4LKC
K6	364B	SMH110D-0126-20A■K-4LKC
K7	374B	SMH110D-0126-30A■K-4HKC
K8	384B	SMH110D-0157-30A■K-4HKC
K9	394B	SMH110D-0188-30A■K-4HKC
KB	424B	SMH130D-0105-20A■K-4HKC
KC	434B	SMH130D-0157-20A■K-4HKC
KD	444B	SMH130D-0210-20A■K-4HKC
KR	524B	SMH130D-0300-20A■K-4HKC
KE	454B	SMH150D-0230-20A■K-4HKC
KF	464B	SMH150D-0300-20A■K-4HKC
KG	474B	SMH150D-0380-20A■K-4HKC
KH	484B	SMH180D-0350-15A■K-4HKC
KI	494B	SMH180D-0440-15A■K-4HKC
RJ	4A52	SMH180D-0550-15R■K-4HKC
RK	4B52	SMH180D-0750-15R■K-4HKC
P4	3450	SMG130D-0100-20A■K-4LKG
P3	3350	SMG130D-0100-10A■K-4LKG
P5	3550	SMG130D-0150-20A■K-4LKG
P7	3750	SMG130D-0200-20A■K-4LKG
P6	3650	SMG130D-0150-20A■K-4HKG
P8	3850	SMG130D-0200-20A■K-4HKG
PC	4350	SMG130D-0300-20A■K-4HKG
PA	4150	SMG180D-0440-15A■K-4HKG
PB	4250	SMG180D-0550-15A■K-4HKG
PD	4450	SMG180D-0750-15A■K-4HKG

电脑	电机型号
60	SMC40S-0005-30M■K-5DS□
61	SMC40S-0010-30M■K-5DS□
62	SMC60S-0020-30M■K-3DS□
64	SMC60S-0040-30M■K-3DS□
67	SMC80S-0075-30M■K-3DS□
22	SMC60S-0020-30A■K-3DS□
24	SMC60S-0040-30A■K-3DS□
27	SMC80S-0075-30A■K-3DS□
2A	SMC130D-0120-30A■K-4DKR
2B	SMC130D-0150-30A■K-4DKR
29	SMH110D-0120-30A■K-4DKR
50	SMS40S-0005-30K■K-5DSU
51	SMS40S-0010-30K■K-5DSU
52	SMS60S-0020-30K■K-3DSU
54	SMS60S-0040-30K■K-3DSU
57	SMS80S-0075-30K■K-3DSU

## 二、使用详解

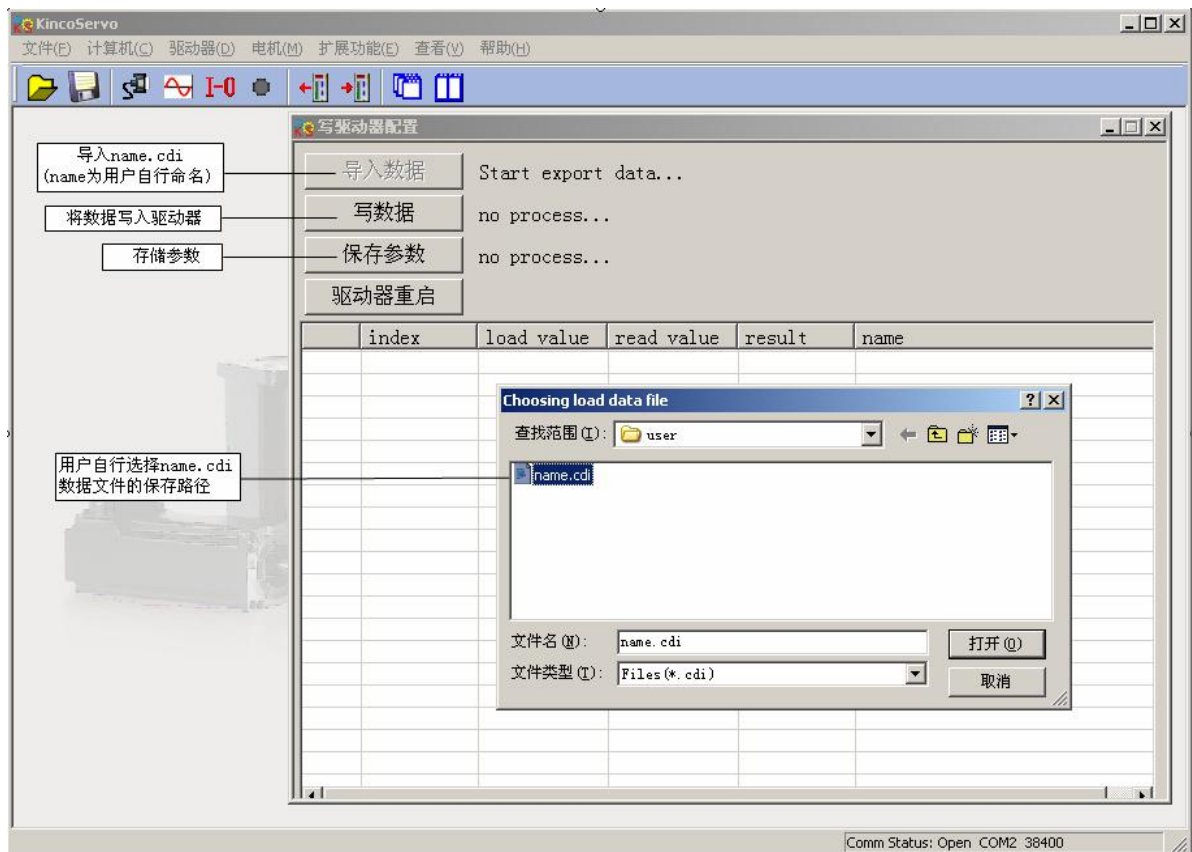
Kinco 出厂的伺服驱动器，没有配置电机。

### 1、用户有数据文件（不需要配置电机）

通过软件直接下载数据文件到驱动器，驱动器和电机就能正常运行；下载后若有问题，请联系步科。

进入软件界面，由菜单栏—扩展功能—写驱动器配置，直接把用户调试好的驱动器数据 name .cdi 文件，下载到驱动器。

注：必须从网站 [www.kinco.cn](http://www.kinco.cn) 下载最新软件。



## 2、用户没有数据文件（需要配置电机）

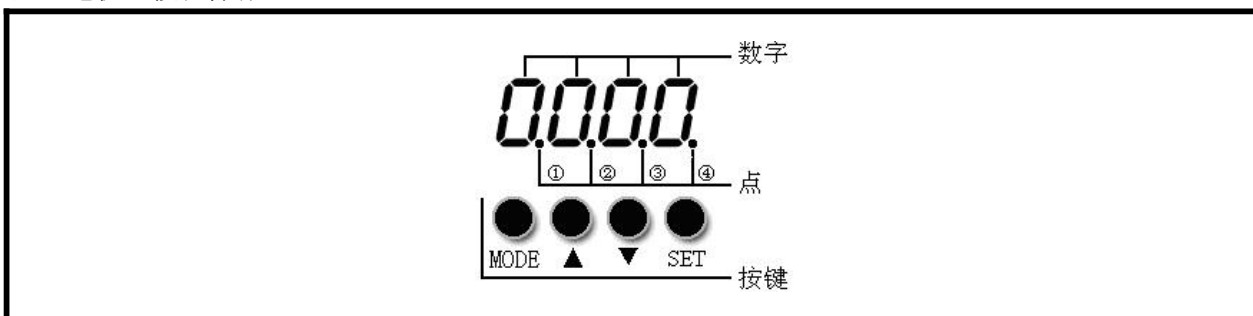
首次使用时，驱动器需配置电机，配置步骤如下：

- (1) 根据驱动器与电机配置表确认电机型号是否正确；
- (2) 通过按键和上位机软件两种操作方式，配置电机；
- (3) 根据应用要求调整伺服参数；

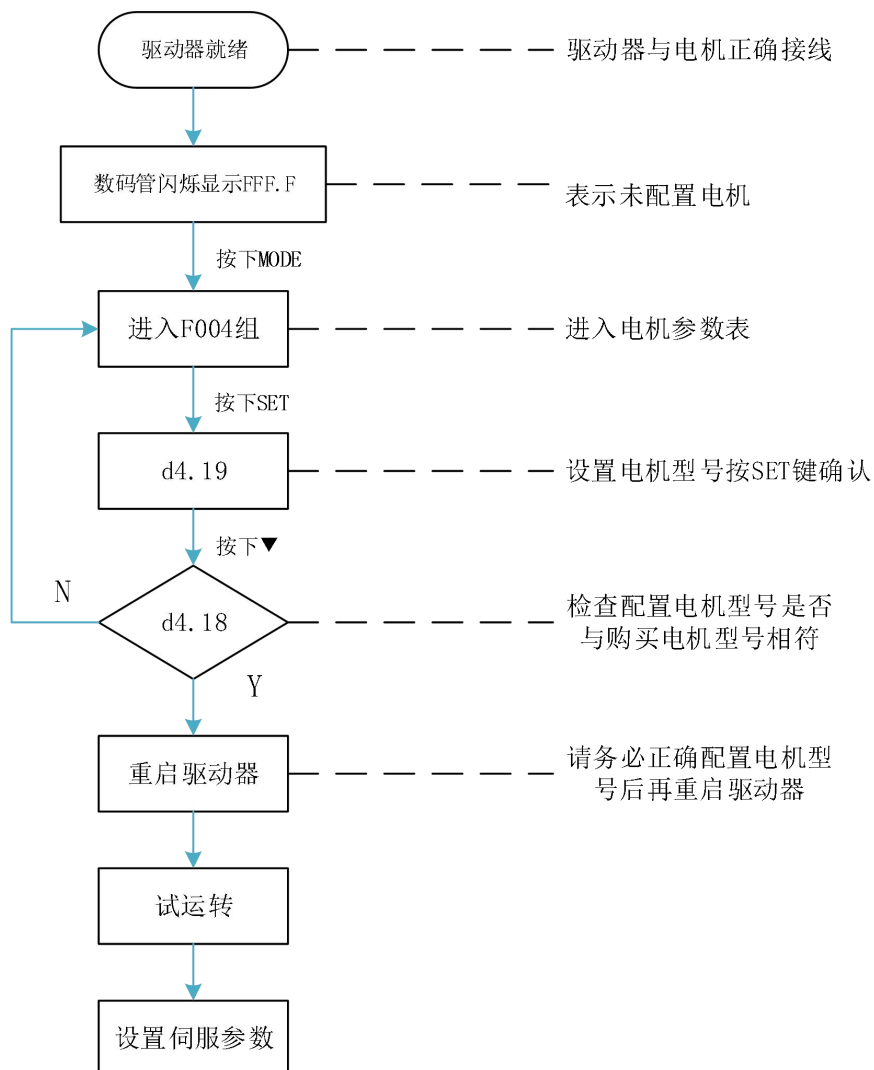
注：若电机型号配置不正确，驱动器与电机可能无法正常工作。

伺服驱动器	按键操作	上位机软件操作	与 PC 连接通讯线																
CD420、CD430、CD620	✓	✓	<table border="1"> <thead> <tr> <th colspan="2">上位机 (公头)</th> <th colspan="2">驱动器 (母头)</th> </tr> </thead> <tbody> <tr> <td>RXD</td> <td>2</td> <td>5</td> <td>TXD</td> </tr> <tr> <td>TXD</td> <td>3</td> <td>1</td> <td>RXD</td> </tr> <tr> <td>GND</td> <td>5</td> <td>6</td> <td>GND</td> </tr> </tbody> </table>	上位机 (公头)		驱动器 (母头)		RXD	2	5	TXD	TXD	3	1	RXD	GND	5	6	GND
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CD412、CD422、CD432、CD622、 FD412、FD422、FD432、FD622、 JD430、JD620、JD630、JD640、 JD650	✓	✓	<table border="1"> <thead> <tr> <th colspan="2">上位机 (公头)</th> <th colspan="2">驱动器 (母头)</th> </tr> </thead> <tbody> <tr> <td>RXD</td> <td>2</td> <td>2</td> <td>TXD</td> </tr> <tr> <td>TXD</td> <td>3</td> <td>3</td> <td>RXD</td> </tr> <tr> <td>GND</td> <td>5</td> <td>5</td> <td>GND</td> </tr> </tbody> </table>	上位机 (公头)		驱动器 (母头)		RXD	2	2	TXD	TXD	3	3	RXD	GND	5	5	GND
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OD124S、OD134S		✓	<table border="1"> <thead> <tr> <th colspan="2">上位机 (公头)</th> <th colspan="2">驱动器</th> </tr> </thead> <tbody> <tr> <td>RXD</td> <td>2</td> <td>2</td> <td>TXD</td> </tr> <tr> <td>TXD</td> <td>3</td> <td>1</td> <td>RXD</td> </tr> <tr> <td>GND</td> <td>5</td> <td>3</td> <td>GND</td> </tr> </tbody> </table>	上位机 (公头)		驱动器		RXD	2	2	TXD	TXD	3	1	RXD	GND	5	3	GND
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RXD	2	2	TXD																
TXD	3	1	RXD																
GND	5	3	GND																

(1) 配置电机（按键操作）



数字/点/键	功能
MODE	用于切换基本菜单； 在参数调节中，短按用于移动要调节的位，长按退出到上一级状态。
▲	按下▲键可增加设定值，长按可快速增加数值。
▼	按下▼键可减小设定值，长按可快速减小数值。
SET	用于进入选择的菜单； 进入此参数设定状态； 当参数设定完后确认输入参数；

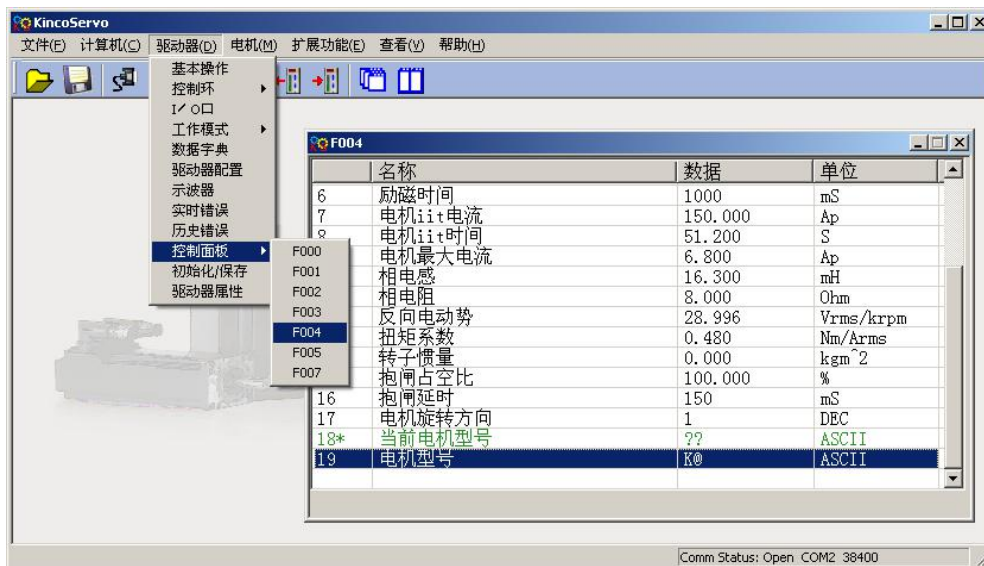


请用户务必正确配置电机型号后再重启驱动器。驱动器重启后，若用户要重新配置电机型号，需要依次设置 d4.19 为 303.0（按 SET 键确认）和 d4.00 为 1（保存电机参数），驱动器重启之后再按照上面操作流程重新配置电机型号和设置伺服参数。

## (2) 配置电机（上位机软件操作）

通讯连接良好，进入软件界面，由菜单栏—驱动器—控制面板—F004，用户通过 F004 组对话框 d4.19 配置电机型号（设置 d4.19 请参考驱动器与电机配置表），设置完毕按回车键确认，驱动器重启。

请用户务必正确配置电机型号后再重启驱动器。驱动器重启后，若要重新配置电机型号，需要依次设置 d4.19 为 00（按回车键确认），再进入参数初始化/保存页面，点击存储电机参数。驱动器重启之后再通过 d4.19 重新配置电机型号和设置伺服参数。



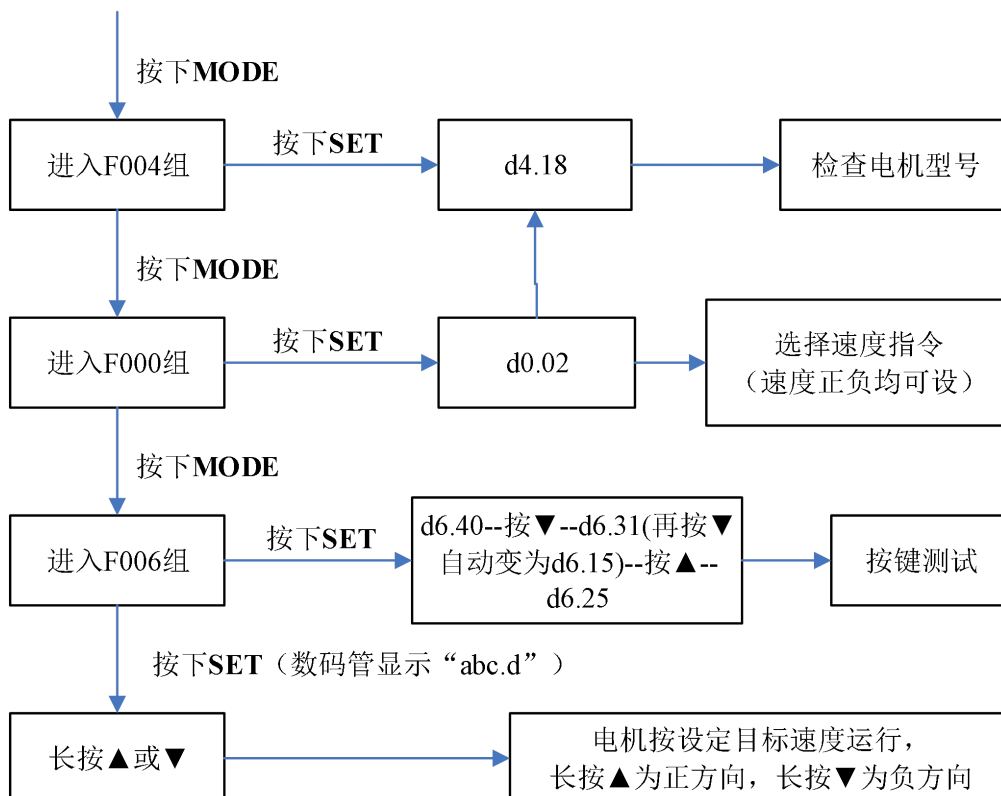
## 三、试运行（按键操作）

1、试运转操作目的：检测驱动器和电机配置是否正确，工作是否正常。

2、试运转操作注意事项

- (1) 请确保电机在无负载下运行。如果电机法兰固定在机械上，请确保电机轴与机械连接断开；
- (2) 请确保电机电缆线、电机编码器线、电源线路（动力线路、控制电源线路）接线正确；
- (3) 试运转操作，长按“▲”或“▼”电机在运行时，外部控制器脉冲信号、数字输入信号以及模拟量信号将暂时失效，因此试运转操作的时候一定要确保安全。

3、试运转操作步骤



# Motor Model Configuration Guide for Kinco Servo V2.1

## I. PC-Motor code (The motor model should be Capital letters in software)

PC	LED	Motor Model
LED CODE d4. 19		
K@	404.b	未设置电机型号
G0	3047	SMC60S-0020-30A ■K-3LK □
G1	3147	SMC60S-0040-30A ■K-3LK □
G2	3247	SMC80S-0075-30A ■K-3LK □
GB	4247	SMC130D-0100-20A ■K-4LKP
G0	4F47	SMC130D-0150-20A ■K-4LKP
GP	5047	SMC130D-0200-20A ■K-4LKP
GC	4347	SMC130D-0150-20A ■K-4HKP
GD	4447	SMC130D-0200-20A ■K-4HKP
GR	5247	SMC130D-0300-20A ■K-4HKP
GQ	5147	SMC130D-0300-30A ■K-4HKP
KZ	5A4B	SMH40S-0005-30A ■K-4LKH
KY	594B	SMH40S-0010-30A ■K-4LKH
K0	304B	SMH60S-0020-30A ■K-3LK □
K1	314B	SMH60S-0040-30A ■K-3LK □
K2	324B	SMH80S-0075-30A ■K-3LK □
K3	334B	SMH80S-0100-30A ■K-3LK □
K4	344B	SMH110D-0105-20A ■K-4LKC
K5	354B	SMH110D-0125-30A ■K-4LKC
K6	364B	SMH110D-0126-20A ■K-4LKC
K7	374B	SMH110D-0126-30A ■K-4HKC
K8	384B	SMH110D-0157-30A ■K-4HKC
K9	394B	SMH110D-0188-30A ■K-4HKC
KB	424B	SMH130D-0105-20A ■K-4HKC
KC	434B	SMH130D-0157-20A ■K-4HKC
KD	444B	SMH130D-0210-20A ■K-4HKC
KR	524B	SMH130D-0300-20A ■K-4HKC
KE	454B	SMH150D-0230-20A ■K-4HKC
KF	464B	SMH150D-0300-20A ■K-4HKC
KG	474B	SMH150D-0380-20A ■K-4HKC
KH	484B	SMH180D-0350-15A ■K-4HKC
KI	494B	SMH180D-0440-15A ■K-4HKC
RJ	4A52	SMH180D-0550-15R ■K-4HKC
RK	4B52	SMH180D-0750-15R ■K-4HKC
P4	3450	SMG130D-0100-20A ■K-4LKG
P3	3350	SMG130D-0100-10A ■K-4LKG
P5	3550	SMG130D-0150-20A ■K-4LKG
P7	3750	SMG130D-0200-20A ■K-4LKG
P6	3650	SMG130D-0150-20A ■K-4HKG
P8	3850	SMG130D-0200-20A ■K-4HKG
PC	4350	SMG130D-0300-20A ■K-4HKG
PA	4150	SMG180D-0440-15A ■K-4HKG
PB	4250	SMG180D-0550-15A ■K-4HKG
PD	4450	SMG180D-0750-15A ■K-4HKG

PC	Motor Model
60	SMC40S-0005-30M ■K-5DS □
61	SMC40S-0010-30M ■K-5DS □
62	SMC60S-0020-30M ■K-3DS □
64	SMC60S-0040-30M ■K-3DS □
67	SMC80S-0075-30M ■K-3DS □
22	SMC60S-0020-30A ■K-3DS □
24	SMC60S-0040-30A ■K-3DS □
27	SMC80S-0075-30A ■K-3DS □
2A	SMC130D-0120-30A ■K-4DKR
2B	SMC130D-0150-30A ■K-4DKR
29	SMH110D-0120-30A ■K-4DKR
50	SMS40S-0005-30K ■K-5DSU
51	SMS40S-0010-30K ■K-5DSU
52	SMS60S-0020-30K ■K-3DSU
54	SMS60S-0040-30K ■K-3DSU
57	SMS80S-0075-30K ■K-3DSU

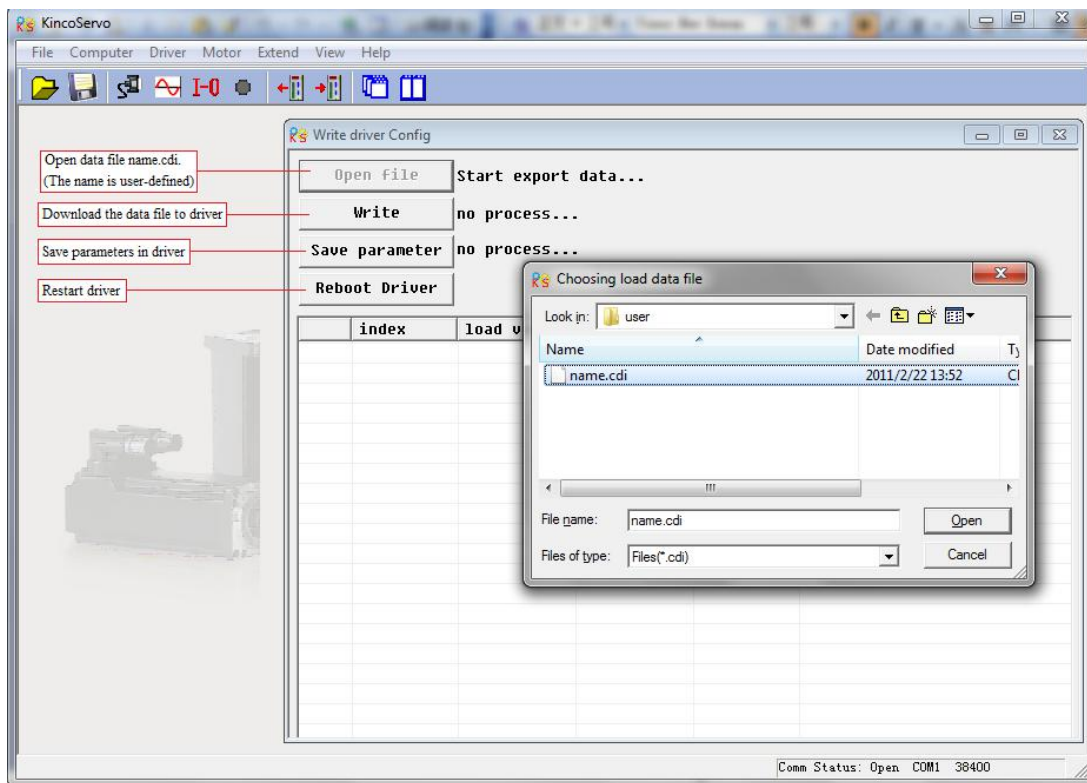
## II. Explain in detail

Kinco servo does not configure motor in default setting. Customers should configure it when they get a new servo.

## 1. Customers have the data file (Configure motor by downloading data file)

Use the CD-PC software to download data file to servo driver, then driver and motor can work normally. Please contact us if there is any problem after downloading. In CD-PC, click the **Extend-->Write Driver Config**. Then open the data file (For example, name.cdi), write it to driver.

Note: You should download the new version software from our website: <http://www.kinco.cn/en/>



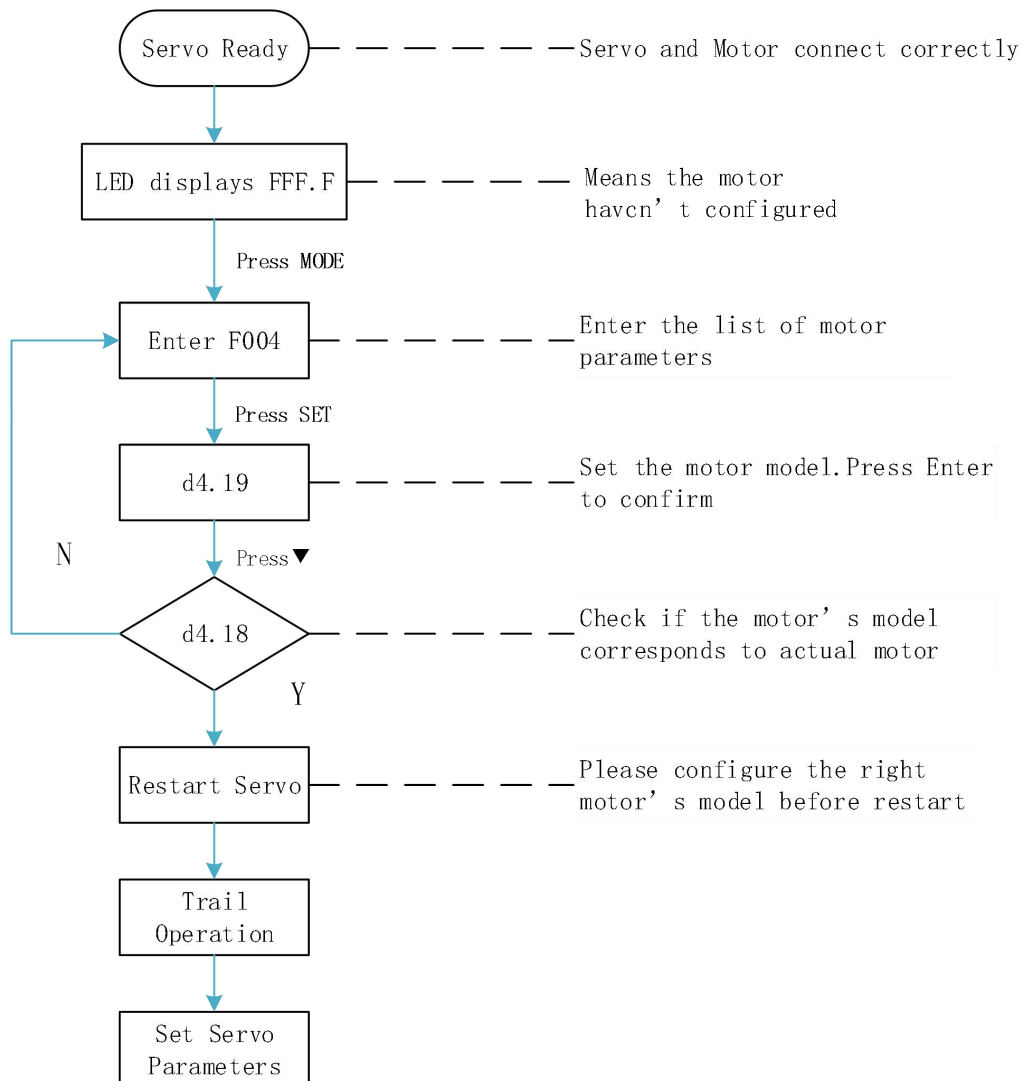
## 2. Customers do not have data file (They need configure motor model in servo)

Customers can configure the motor's model according to servo/motor configuration table mentioned above, then set the parameters according to the application. If the motor's model do not configure properly, the driver and motor may not work normally. You can configure motor model via keys on servo or CD-PC software.

Servo	Key Operation	Software Operation	Connection Cable																
CD420、CD430、CD620	✓	✓	<table border="1"> <thead> <tr> <th colspan="2">PC(DB9 Male)</th> <th colspan="2">Servo(DB9 Female)</th> </tr> </thead> <tbody> <tr> <td>RXD</td> <td>2</td> <td>5</td> <td>TXD</td> </tr> <tr> <td>TXD</td> <td>3</td> <td>1</td> <td>RXD</td> </tr> <tr> <td>GND</td> <td>5</td> <td>6</td> <td>GND</td> </tr> </tbody> </table>	PC(DB9 Male)		Servo(DB9 Female)		RXD	2	5	TXD	TXD	3	1	RXD	GND	5	6	GND
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RXD	2	2	TXD																
TXD	3	1	RXD																
GND	5	3	GND																

(1) Configure Motor (Keys Operation)

数字/点/键	功能
MODE	Switch menu; When setting parameters, press can shift, long press can return to the previous menu.
▲	Press▲ can increase the number, long press can increase quickly.
▼	Press▼ can decrease the number, long press can decrease quickly
SET	Enter the selected menu; Enter the status of parameters setting; affirm the parameters;



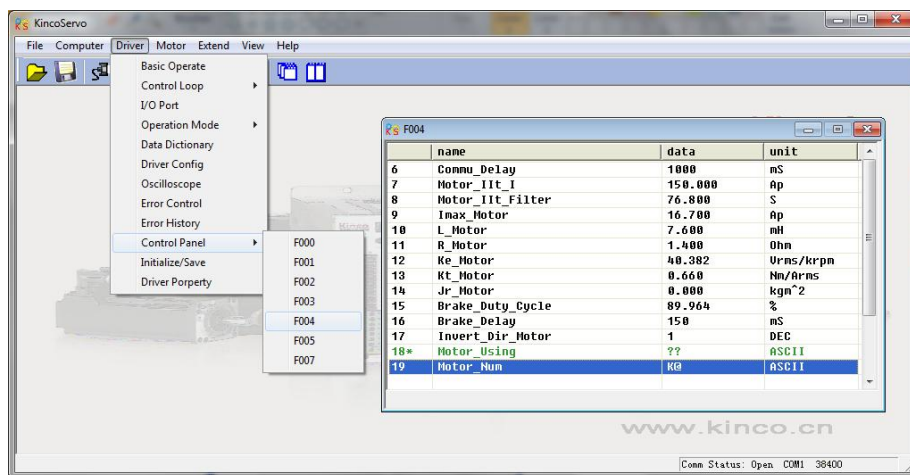


**Please configure the right motor's model before restart.** If customers want to reset the motor model, they should set D4.19 to 303.0 (Press SET to confirm) and then d4.00 to 1(Save motor parameters), after restart the servo they can reset motor model and servo parameters according to the above chart

## (2) Configure Motor (CD-PC Software Operation)

Connect the servo to PC, open the CD-PC, then Menu—Driver—Control Panel—F004, in the F004, in the F004, set the 19th operation: **Motor Num** (Please refer to the servo and motor configuration table), after that press SET to confirm, then restart servo.

**Please configure the right Motor's model before restart.** If the customers want to reset the motor model, they should set D4.19 (Motor Num in F004) to 00(Press SET to confirm), then SET the **Initialize/Save** page, click the **Save motor parameters**. After restart the servo, they can reset the motor model and set servo parameters.



## III. Trail Operation (Keys Operation)

### 1. The purpose of trail operation

Check if the servo and motor configures properly, if they can work normally.

### 2. Note for trail operation

- (1). Ensure that the motor is running without load. If the motor flange is fixed on the machine, make sure that the motor shaft is disconnected from the machine.
- (2). Ensure that motor cables, motor encoder cables, and power circuits (power lines and control power lines) are properly connected. For details, see Chapter 3.
- (3). During the trial operation, if you hold pressing ▲ or ▼ when the motor is running, pulse signals, digital input signals, and analog signals of the external controller are temporarily unavailable, so safety must be ensured.

### 3. Steps of trail operation

