

HAKKO

FUME EXTRACTION

FA-431

FUME EXTRACTION

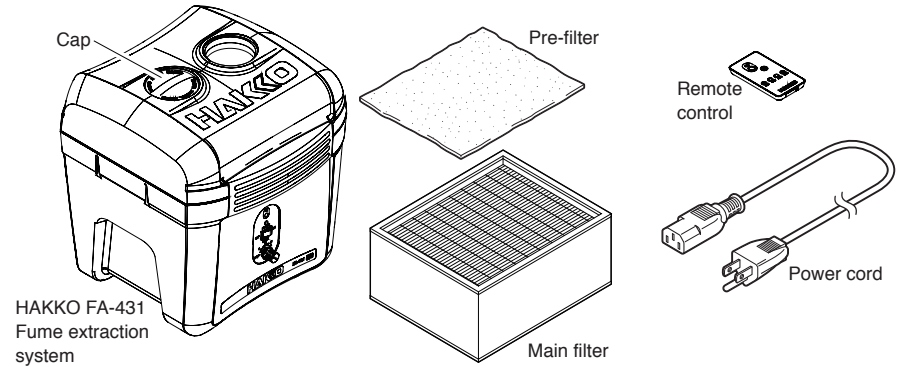
Instruction Manual

Thank you for purchasing the HAKKO FA-431 Fume Extraction system.
Please read this manual before operating the HAKKO FA-431.
Keep this manual readily accessible for reference.

1. PACKING LIST AND PART NAMES

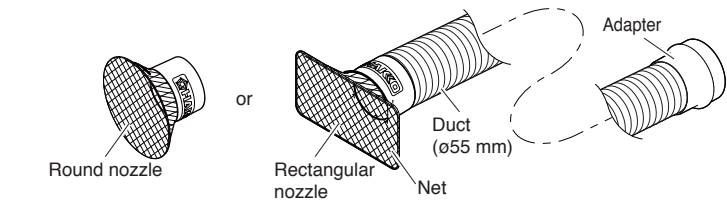
Please check to make sure that all items listed below are included in the package.

HAKKO FA-431 Fume extraction system	1	Main filter (inside main unit)	1
Power cord	1	Pre-filter	10pcs.
Cap (inside main unit)	1	Instruction manual	1
Remote control	1		



● Duct set (not included)

Duct set (Duct / Adapter / Rectangular nozzle or Round nozzle / Net)



2. SPECIFICATIONS

● HAKKO FA-431

Power Consumption	100 - 110V 120W 220 - 240V 110W		
Suction Capacity *1	High	Medium	Low
	4.7m³/min	3.7m³/min	2.8m³/min
Filtering Efficiency	97% (≥ 0.3μm)		
Duct diameter	ø55 mm		
Dimensions	330(W) x 366(H) x 343(D) mm		
Weight (w/o cord)	7.2 kg		

*1 When using 2 ducts

* Specifications and design are subject to change without notice.

■ Electrostatic Protection

This product includes such features as electrically conductive plastic parts and grounding of the unit as measures to protect the device to be soldered from the effects of static electricity. Be sure to observe the following instructions:

1. The plastic parts are not insulators, they are conductors. When making repairs or replacing parts, take sufficient care not to expose live electrical parts or damage insulation materials.
2. Be sure to ground the unit during use.

HAKKO CORPORATION
HEAD OFFICE
4-5, Shiokusa 2-chome, Naniwa-ku, Osaka 556-0024 JAPAN
TEL:+81-6-6561-3225 FAX:+81-6-6561-8466
http://www.hakko.com E-mail:sales@hakko.com

OVERSEAS AFFILIATES
U.S.A.: AMERICAN HAKKO PRODUCTS, INC.
TEL: (661) 294-0090 FAX: (661) 294-0096
Toll Free (800)88-HAKKO
http://www.hakkousa.com

HONG KONG: HAKKO DEVELOPMENT CO., LTD.
TEL: 2811-5588 FAX: 2590-0217
http://www.hakko.com.hk
E-mail:info@hakko.com.hk

SINGAPORE: HAKKO PRODUCTS PTE., LTD.
TEL: 6748-2277 FAX: 6744-0033
http://www.hakko.com.sg
E-mail:sales@hakko.com.sg

Please access to the following address for the other Sales affiliates.

<http://www.hakko.com>

3.WARNINGS, CAUTIONS, NOTES AND EXAMPLES

Warnings, cautions and notes are placed at critical points in this manual to direct the operator's attention to significant items. They are defined as follows:

⚠ WARNING: Failure to comply with a WARNING may result in serious injury or death.

⚠ CAUTION : Failure to comply with a CAUTION may result in injury to the operator, or damage to the items involved.

NOTE : A NOTE indicates a procedure or point that is important to the process being described.

⚠ WARNING

- Do not absorb combustibile, explosive or corrosive gas.
- Store the fume extraction unit in a dry place.
- Do not block the exhaust vent of the fume extraction unit.
- Turn the power off when not in use, or left unattended.
- Turn the power off when changing parts or storing the HAKKO FA-431.
- This appliance can be used by children aged from 8 years and above and persons with reduced physical, sensory or mental capabilities or lack of experience and knowledge if they have been given supervision or instruction concerning use of the appliance in safe way and understand the hazards involved.
- Children shall not play with the appliance.
- Cleaning and user maintenance shall not be made by children without supervision.

To prevent accidents or damage to the HAKKO FA-431, be sure to observe the followings:

⚠ CAUTION

- Use only genuine HAKKO replacement parts.
- Do not operate the fume extraction without the filter; otherwise it may cause the unit to malfunction.
- Hold the plug when inserting or removing the cord in/from the outlet.
- Do not allow the HAKKO FA-431 to become wet, or use it with wet hands.
- While using the HAKKO FA-431, don't do anything which may cause bodily harm or physical damage.

4. OPERATION

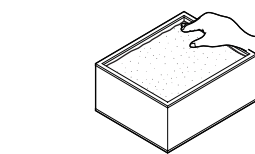
● Set the filter

1. Open the upper cover and then remove the plastic bag from the main filter.

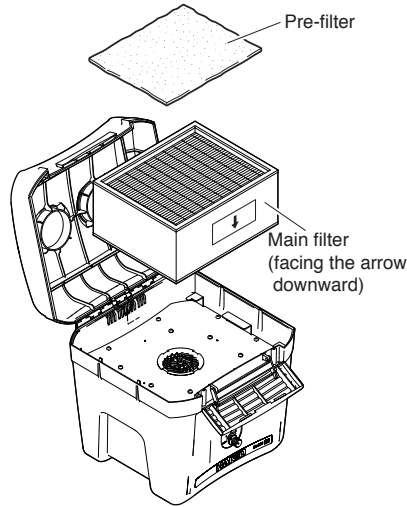
2. Put the main filter on the main unit. Set the filter with the arrow pointing down (as shown in the illustration).

3. Fit the pre-filter on top of the main filter.

⚠ CAUTION
Be sure the pre-filter lies flat and completely covers the top of the main filter with no gaps.



4. Close the upper cover



● Attach the duct

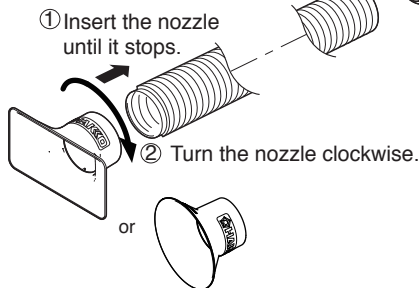
A. How to attach duct set

1. Refer to Figure 1(right), and attach the nozzle and adapter to the duct. Insert the nozzle and adapter until it stops, turn the nozzle clockwise. Make sure the nozzle and adapter are firmly attached.

⚠ CAUTION
Twist the nozzle tight enough to avoid coming off.

(Fig.1)

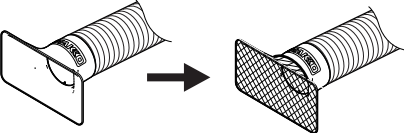
Be sure the duct is facing in the proper direction during assembly.



4. OPERATION

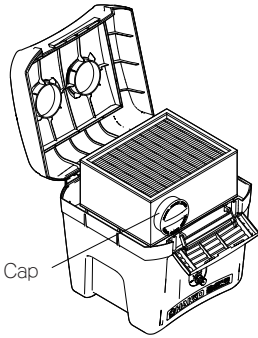
2. Fit the net on the nozzle. (Figure.2)

(Fig.2)

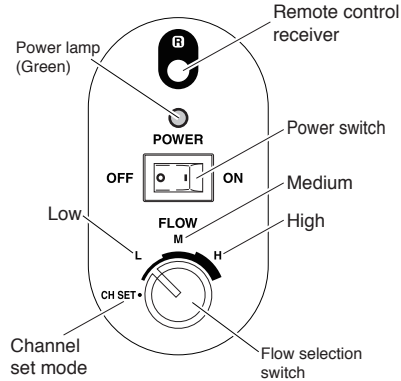
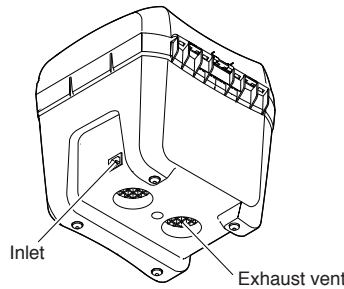


3. Insert the duct into the open port. If using one duct, ensure the cap is in place on the unused port. When using two ducts, please store the cap inside the main unit next to the main filter as shown in Figure 3 (right).

(Fig.3)



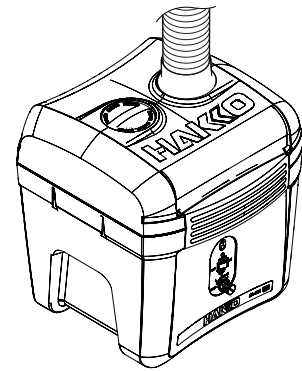
● Fume extraction unit



1. Connect the power cord to the power receptacle on the right of the unit.
2. Plug the power cord into a ground wall socket.
3. Turn the power switch on. Power lamp will light up.

⚠ CAUTION
• Close the cover before turning the power switch on.
• Do not block the open port on purpose.
• When the fan is running, do not open the upper cover.
• Turn the power off when not in use. Failure to do so may result in shorter filter life.
• The main filter on the HAKKO FA-431 should be changed once per year as a general rule.
Continued use after the replacement period may result in malfunction.

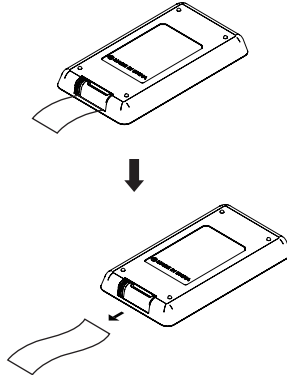
※Adjust the flow suitable for working environment by using flow selection switch.



※Fan of HAKKO FA-431 will operate in remote control. (refer to the “● Operation of the remote control”)

⚠ CAUTION
Remote control operation does not switch off the power of the HAKKO FA-431. (Only the fan is stopped.) After work has been completed, set the power of the HAKKO FA-431 main unit to OFF.

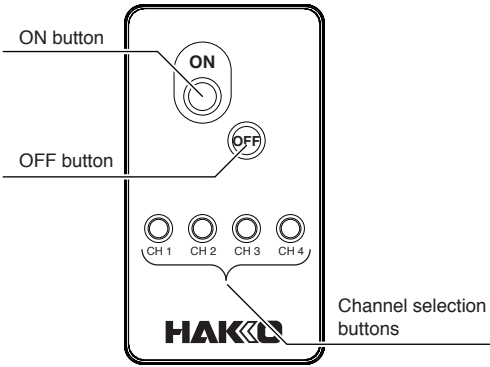
⚠ CAUTION
Remove protective film before use.



4. OPERATION

● Operation of the remote control

HAKKO FA-431 can be operated using the remote control.



The remote control has the following buttons:

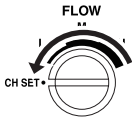
- **ON button**
Starts the fan of the HAKKO FA-431.
- **OFF button**
Stops the fan of the HAKKO FA-431.
- **Channel selection buttons (CH1 to CH4)**
 - Sets the channel of the remote control to the same channel as the HAKKO FA-431 main unit.
 - When one of the channel selection buttons (channels CH1 to CH4 are selectable) is held pressed together with the OFF button for 2 seconds or longer, sets the channel of the remote control itself to the pressed channel.

※When the channels of the remote control and the HAKKO FA-431 are the same, pressing the remote control's ON button will cause the fume extractor to operate. (Both units are initially set to channel CH1.)

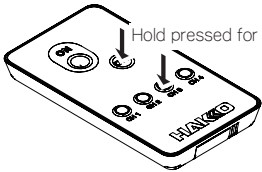
● How to set the channel

Example : Setting to channel 3

1. Set the flow selection switch of the HAKKO FA-431 to CH SET.



2. While holding the OFF button of the remote control pressed, press CH3 and hold both buttons pressed for approximately 2 seconds.

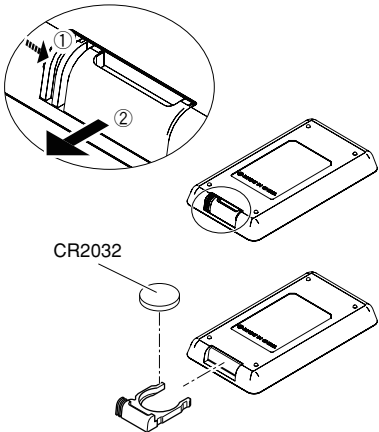


3. When channel setting has been completed, the LED on the main unit will blink twice and the buzzer will sound the same number of times as the set channel.

CAUTION
If the above procedure is performed without setting the main unit's flow selection switch to CH SET, only the channel of the remote control will be changed and operation by remote control cannot be performed. If this occurs, perform the channel setting procedure again.

※When using multiple HAKKO FA-431 units, all fume extractors set to the same channel as the remote control will operate when the remote control is used. Operation of fume extractors according to the application can be performed by changing the channel setting of the fume extractors as necessary.

CAUTION
If the remote control stops operating completely, it might be because the battery (CR2032) is completely exhausted. Replace the battery.



5. MAINTENANCE

Performing proper and periodic maintenance extends the product life. Wear of the product will differ depending on work environment, the quality and quantity of the solder and flux. Apply the following service procedure as dictated by the conditions of the usage.

● Filter replacement timing

NOTE:
When replacing the filter, please be performed in a state in which the fan has stopped.

6. TROUBLE SHOOTING GUIDE

● Nothing happens when the power switch is turned on.

- CHECK** : Is the power cord disconnected ?
ACTION : Connect it.
- CHECK** : Is the main filter set properly ?
ACTION : Fit the main filter properly before turning on the power switch again.
- CHECK** : Is the flow control set to CH SET ?
ACTION : Adjust the flow suitable for working environment by using the flow selection switch.

● Even if a remote control button is pressed, the fume extractor does not operate.

- CHECK** : Is the flow control set to CH SET ?
ACTION : Adjust the flow suitable for working environment by using the flow selection switch.
- CHECK** : Are the remote control and HAKKO FA-431 set to different channels?
ACTION : Set both units to the same channel.
- CHECK** : Is the battery of the remote control exhausted?
ACTION : Replace the battery.

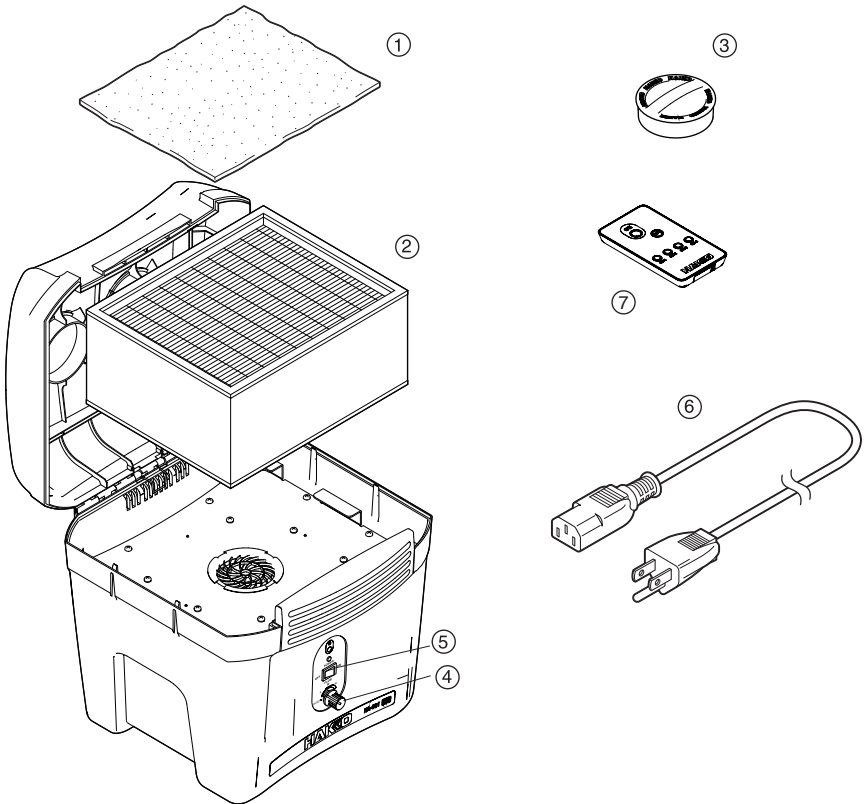
● Remote control channel cannot be set.

- CHECK** : Is the flow selection switch set to a setting other than CH SET?
ACTION : Set the flow selection switch to CH SET.
- CHECK** : Is the battery of the remote control exhausted?
ACTION : Replace the battery.

※ 各言語（日本語、英語、中国語、フランス語、ドイツ語、韓国語）の取扱説明書は以下のURL、HAKKO Document Portalからダウンロードしてご覧いただけます。
(商品によっては設定の無い言語がありますが、ご了承ください)
* 各國語言(日語,英語,中文,法語,德語,韓語)的使用說明書可以通過以下網站的HAKKO Document Portal 下載參閱。
(有一部分的產品沒有設定外語對應,請見諒)
* Instruction manual in the language of Japanese, English, Chinese, French, German and Korean can be downloaded from the HAKKO Document Portal.
(Please note that some languages may not be available depending on the product.)

<https://doc.hakko.com>

7. PARTS LIST



7. PARTS LIST

●HAKKO FA-431

Item No.	Part No.	Part Name	Specifications
①	A5034	Pre-filter	10 pcs.
②	A5033	Main filter	
③	B3619	Cap	
④	B1486	Knob	
⑤	B2852	Power switch	
⑥	B2421	Power cord, 3 wired cord but no plug	220 - 240V
	B2422	Power cord, 3 wired cord & BS plug	India
	B2424	Power cord, 3 wired cord& European plug	220V KTL , 230V CE
	B2425	Power cord, 3 wired cord & BS plug	230V CE , U.K.
	B2426	Power cord, 3 wired cord & Australian plug	
	B2436	Power cord, 3 wired cord & Chinese plug	China
	B3508	Power cord, 3 wired cord & American plug (B)	
	B3550	Power cord, 3 wired cord & SI plug	
	B3616	Power cord, 3 wired cord & BR plug	
⑦	B3641	Power cord, 3 wired cord & American plug (U)	U.S.A.
	C5035	Remote control	

●Option

Item No.	Part No.	Part Name	Specifications
①	C1571	Duct set / Rectangular nozzle	Duct (1) / Adapter (1) Rectangular nozzle(1) / Net (1)
②	C1572	Duct set / Round nozzle	Duct (1) / Adapter (1) Round nozzle (1) / Net (1)
③	B3642	Duct	φ 55 mm
④	B3620	Adapter	
⑤	B3621	Adapter	For 3 inch
⑥	B3622	Rectangular nozzle	
⑦	B3623	Round nozzle	
⑧	B2418	Bench top hood	
⑨	B3625	Net	5 pcs.
⑩	B2410	Duct	For 3 inch (φ 75 mm)
⑪	B2416	Duct band	Set of 2
⑫	A5035	Sub-filter	5 pcs.
⑬	A5036	Sub filter / for rectangular nozzle	20 pcs.
⑭	A5037	Sub filter / for round nozzle	20 pcs.
⑮	B5146	Filter case / for rectangular nozzle	
⑯	B5147	Filter case / for round nozzle	

