

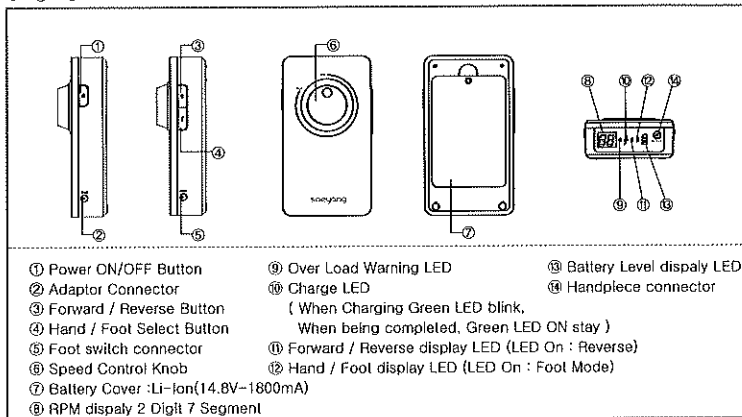
- ★ Read all safety instructions throughly before operating the unit.
Keep this user's manual in a safe place for future reference.

Features

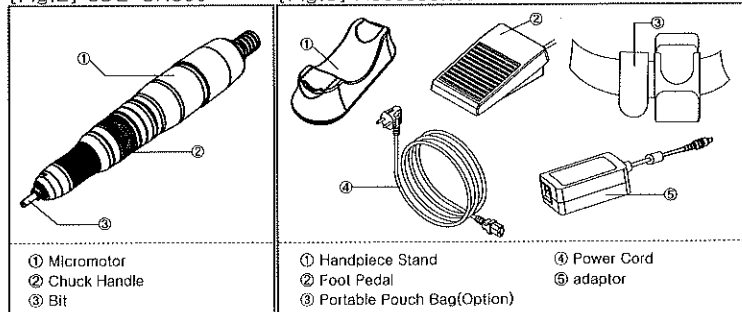
- ① Compact & Simple design.
- ② Control unit is easy to use it by the digital Speed Control tact button
- ③ Rechargeable Battery level dispaly (Orange/Green/Green)
- ④ Over charging protection
- ⑤ Automatic Safty – Overload protection system
- ⑥ Automatic power Saving functtion
- ⑦ Foot Pedal for On–Off Operation available as an option
- ⑧ Farward/Reverse rotation

Compositions

[Fig.1] Control Unit



[Fig.2] SDE-SH300



[Fig.3] Accessories

Operation Procedure

How to charge battery

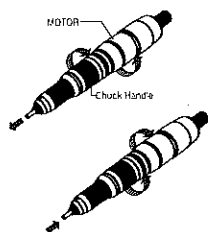
- ① Connect a power cable
- ② LED blinks while battery is charging.
- ③ When battery is fully charged, LED will keep staying on.



- Notice
- Charging should be done in a dry place within a temperature range of 0°C to 40°C (32°C F to 104°C F).
 - Dispose the battery in accordance with the national and local laws.
 - Do not throw the battery into a fire nor heat it, as it could explode or cause leakage of electrolytic chemicals.
 - Wash eyes immediately in clear running water if battery chemicals get into your eyes, and go to the ophthalmologist.
 - Immediately change clothing or wash that part of the body in clear water, when battery liquid has come in contact with the clothing you wear or your body.
 - Always use the K38 AC power adaptor to charge K38 battery.
 - If something goes wrong while you are using the adaptor, immediately shut off the power by pulling the plug out of the wall outlet.

Mounting and Removing of Bit

- ① To remove a bit [Fig.3]③, turn the Chuck Handle clockwise in the direction of the arrow until it clicks to stop, and pull out the bit.
- ② To mount a bit, make sure that the chuck is in open position, insert a bit all the way into the chuck, and turn the Chuck Handle clockwise in the opposite direction until it clicks to stop.



Notice



- Always thoroughly clean the Collet Chuck and bit before reassembled.
- Always completely turn off before attempting to change the micro motor or the bit.
- Make sure to insert the bit shank all the way, until it touches the back of the Collet Chuck, then tighten the Collet Chuck. If the bit is used while not inserted completely, it is very dangerous because it may come out by the vibration of itself, held before running the Handpiece.
- After replace a bit, it is necessary to make sure that the Collet Chuck is securely.
- Do not turn the Chuck release ring of the micro motor while the motor is in operation.
- Never use bent, asymmetrical or damaged bits. Always use standard bits.
- When the Handpiece is not in use, it is recommended a test bits be inserted into the Collet Chuck of the Handpiece.

How to operate a handpiece

- ① Connect a handpiece with a control box
- ② Turn a button of on/off power switch for two seconds
- ③ Turn a Control speed Knob
- ④ Change its operating directing by pushing a button of forward/reverse switch



Notice

- While the Handpiece is running, DO NOT try to adjust the Chuck Handle to prevent the Control Unit from being damaged.
- Before operating the Forward/Reverse Selector to turn a rotating direction, it is surely required to make sure that the Micromotor has been stopped.
- Do not leave the Handpiece long in break state. Otherwise, it may be troubled or malfunctioned

How to operate a foot switch

- ① Connect a foot switch with a control box
- ② Select a button of a foot mode switch
- ③ LED will be on when being selected a foot mode switch
- ④ A handpiece gets starting to run when an user steps on a foot switch

Automatic Power Saving Function

- ① It will be power off automatically after 3 minutes later if there is no operation

Overload Protection Function

- ① If a control box gets overloaded, an overload LED turns on. And a control box will be stopped after 5 seconds.
- ② Push a button of 'U' switch in order to re-operate a handpiece after an overload stop

Safety Protection System

To protect the motor and the control unit from excessive temperature rise caused by overloading such as by failure of ball bearing, greater loading to the bit, etc., a temperature sensor activates, when the temperature rises above the preset value, to be shut off the power supply.

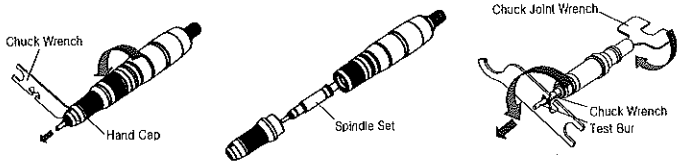
When this safety protection system functions, turn off the unit.

Precaution

- ★ Below Safety instructions must be read to avoid potential hazards that could result in personal injuries or damage to the unit.

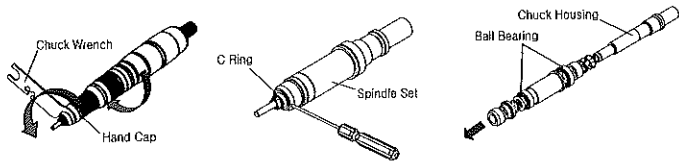
- ① Install the Control Unit in the room at suitable temperature(0~40°C).
Using it in an excessively dusty warm of humid location damages to the Control Unit.
- ② When taking your Control Unit from the Box. Never let it fall on the floor.
Please handle with care.
- ③ Take care not to drop the handpiece. It will damage Ball Bearing or weaken durability of the handpiece.
- ④ Never plug or unplug the Power Cord with wet hands to avoid electric shock.
- ⑤ Never use the damaged electric cable to avoid electric shock.
- ⑥ Do not insert too many power cords into one socket. It gives rise to fire.
- ⑦ Be sure not to disassemble or alter the units.
- ⑧ Never allow water or other liquids to spill onto and into the control unit and the handpiece.
- ⑨ Turn off the unit and report to the dealers you purchased it from when such are found as liquid leak from deformation or some discoloration of the control unit.
- ⑩ Consider the safety of the customer first, and operate the unit carefully.
- ⑪ Use only in the beauty care (nail art/pedicure) by an authorized personnel.
- ⑫ Do not use or leave the unit in a high heat environment such as in direct hot sun, in a parked car under hot sun or near tire or stove.
- ⑬ Always check the unit for looseness, vibration, sound, operating the temperature.
Check the unit at a distance before using on the customer.
- ⑭ Put the handpiece on its stand when it is not in use.

Replacing the Collet Chuck



- ① The Hand Cap and the Spindle Set are disjointed by continuously turning the Hand Cap counterclockwise using the Chuck Wrench.
- ② The Collet Chuck is disjointed by continuously turning it counterclockwise using tools.
- ③ After replace by new Collet Chuck, assemble the Handpiece.
- ⊕ Replacing cycle of Carbon Brushes being about one year, can be depending on working hours and loading conditions.

Replacing Ball Bearings



- ① Disjoint the Hand Cap and the Spindle Set.
- ② If remove the C Ring from the front of the Chuck Housing, Ball Bearings and other parts are disassembled.
- ③ After assemble other parts and replace with new Ball Bearings sequentially, install the C Ring again.
- ④ Joins the Hand Cap and the Spindle Set.
- ⑤ After run the Handpiece under no load state and confirm something wrong nonexistence, then use.
- ⊕ Replacing cycle of Carbon Brushes being about one year, can be depending on working hours and loading conditions.

Trouble shooting

★ Motor fails to run.

Trouble Detail	Cause	Remedy
Control unit fully charged, but motor fails to run.	ⓐ Loose connection motor plug with jack in control unit.	Correctly plug the Motor cord.
	ⓑ Defect in motor cord.	Replace motor cord.
	ⓒ Worn Carbon brushes.	Replace Carbon brushes.
	ⓓ Trouble in motor.	Check motor and repair if the motor is troubled.
Motor stops suddenly in use. (Safety protection system functioned.)	Overloaded, or Chuck is Opened during operation.	See 6. Safety Protection System. Check the chuck and close the chuck if opened.
Motor fails to run when Foot Pedal is used.	ⓐ H/F Selector is at "H".	Set it at "F".
	ⓑ Foot Pedal fails to function.	Check and replace Foot Pedal.
	ⓒ Defect in Foot Pedal cord.	Check and replace Foot Pedal.
	ⓓ Loose connection Foot Pedal plug with jack in control unit.	Check Foot Pedal plug and connection.
Motor stops in 2~3 seconds.	Battery has not been charged.	Charge battery.
Motor runs with insufficient power and stop in a few minutes.	Worn battery.	Replace battery.

★ In case any malfunction is found, consult with the dealer the unit was purchased from.

Specifications

CONTROL UNIT	Input	Output	Electric power	Weight(g)	Dimension(mm)		
	18Vdc	12Vdc	24W	277	W	D	H
HAND PIECE	Input	Torque <td>RPM <th>Weight(g)</th> <th colspan="3">Dimension(mm)</th> </td>	RPM <th>Weight(g)</th> <th colspan="3">Dimension(mm)</th>	Weight(g)	Dimension(mm)		
	DC12V	2.3Ncm	0~30,000	183	∅	L	
CHARGER	Input			Output			
	100~240v, 50/60Hz			18Vdc/1.8A			

★MEMO

saeyang

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