# TECHNICAL GUIDE \& 

PARTS CATALOGUE
Cal.VH8 Series
(VH83A/88A)
ANALOGUE QUARTZ

SPECIFICATION

| Cal. No. <br> Item |  | VH83A |  |
| :---: | :---: | :---: | :---: |
| Movement |  | *Refer to the pages 2 | o. specifications. |
| Movement size | Outside diameter | $\varphi 23.70 \mathrm{~mm}$ 22.60 mm : between 12 22.60 mm : between | clock sides lock sides |
|  | Casing diameter | $\begin{array}{\|l\|} \hline \varphi 23.30 \mathrm{~mm} \\ 22.10 \mathrm{~mm} \text { : between } 13 \\ 21.40 \mathrm{~mm} \text { : between } \\ \hline \end{array}$ | clock sides clock sides |
|  | Total height | 3.45 mm |  |
| Time indication | Cal. No. | VH83A | VH88A |
|  | 3 Hands <br> (Hour, Minute, Second) | $\bigcirc$ | $\bigcirc$ |
|  | 24 Hour hand (6H) | 0 | $\bigcirc$ |
|  | Date Calendar hand (3H) | 0 | - |
|  | Date Calendar hand (2H) | - | $\bigcirc$ |
|  | Date Calendar hand (12H) | - | - |
|  | Day Calendar hand (9H) | $\bigcirc$ | - |
|  | Day Calendar hand (10H) | - | $\bigcirc$ |
| Driving system |  | Step motor |  |
| Additional mechanism |  | Electronic circuit reset switch <br> Second setting device <br> Date setting <br> Day: Retrogade |  |
| Antimagnetic |  | $\geqq 1600 \mathrm{~A} / \mathrm{m}$ |  |
| Accuracy |  | Less than $\pm 15$ seconds : Monthly rate at normal temperature range |  |
| Battery |  | SR920SW (Silver oxide battery) Battery life is approximately 2 years |  |
| Measuring gate by quartz tester |  | Use 10 second gate *Set the winding stem with crown at the normal position |  |
| Jewels |  | 2 Jewels |  |

MOVEMENT VARIATION
 PARTS CATALOGUE

Disassembling procedures Figs. (1) $\rightarrow$ (51)
Reassembling procedures Figs. (51) $\rightarrow$ (1)

Lubricating : Types of oil

- Moebius 9010
- Moebius 9030

Oil quantity
$\infty$ Normal quantity
$\infty$ Liberal quantity

## <<VH83A $\gg$

(4) 0012354

Support for dial side parts screw
(19) 0273043 Hour wheel
(8) 0802469 Day driving wheel
(6) 0491014 Dial washer
(7) 0157018

Small hour hand wheel
(15) 0873169 Day jumper
(16) 0585169

Hammer (A)
(17) 0585170

Hammer (B)
(18) 0817049 Intermediate hour wheel
(12) 0505169

Day transmission wheel
(13) 0125324

Day wheel bridge
 PARTS CATALOGUE

Disassembling procedures Figs. (1) $\rightarrow$ (51)
Reassembling procedures Figs. (51) $\rightarrow$ (1)

Lubricating : Types of oil

- Moebius 9010
- Moebius 9030

Oil quantity
$\infty$ Normal quantity
$\infty$ Liberal quantity

## <<VH88A>>

(4) 0012354

Support for dial side
parts screw
(3) Dial
(18) 0273043 Hour wheel
(8) 0802469 Day driving wheel
(6) 0491014 Dial washer
(7) 0157018

Small hour hand
(15) 0873169 Day jumper (16) 0585169 Hammer (A)
(17) 0585170 Hammer (B)
(13) 0125324 Day wheel bridge
(14) 1019012 Day wheel
(12) 0505169

Day transmission wheel

| Disassembling procedures Figs. (1) $\rightarrow$ (51) <br> Reassembling procedures Figs. (51) $\rightarrow$ (1) | Lubricating : Types of oil Moebius 9010 Moebius 9030 | Oil quantity <br> $\infty$ Normal quantity <br> $\infty$ Liberal quantity |
| :---: | :---: | :---: |


*Refer to pages 6 for each parts code

Remarks:
O Different parts for each CAL.

| Parts name | Parts code | VH83A | VH88A |
| :--- | :---: | :---: | :---: |
| (27) Battery connection (+) | 4268076 | 0 | - |
|  | 4268078 | - | 0 |

* All parts code are subject to change without notice.
-The explanation here is only for the particular point of Cal.VH83A/VH88A


## REMARKS ON DISASSEMBLING AND REASSEMBLING

(1) Day wheel
-How to install:
${ }^{(1) S e t ~ L e v e r ~ o f ~ H a m m e r ~(A) ~ a l o n g ~ t h e ~ p i n ~ o f ~ t h e ~ m a i n ~ p l a t e . ~}$
(2)After confirm that gears of Hammer (A) and (B) are engaged each other, set Day wheel vertically.

(2)HAND

- How to install hands:

Place the movement directly on a flat metal plate or such a hard plate when you install the hands.

7.1.1. Metal plate

Necessary procedure to setting hands:
(1)The state of movement is confirmed by the position of a right picture.
Pull out the crown to the second click position and rotate to set the position of Day transmission wheel and Support for dial side parts.
(2)Set the dial.
(3) Install the date calendar hand at the 12 o'clock position.
(4)Install the Day calendar hand at the first position.
(5)Pull out the crown to the second click position, and change the date by rotating the crown clockwise.
(6)Install the 24hour, hour, minute and second hands at the 12 o'clock position.


Necessary procedure to setting hands:
(3)Day calendar (Retrograde) hand

- Quick moving of Day calendar hand

The hand instantaneously returns from B position to $A$ position when one week passes.


B position TECHNICAL GUIDE
(4)Winding stem

- How to remove:

Pull out the winding stem while pushing the indented portion of the arrow.

(5)Battery
-How to install:
Insert the battery in the aslant direction as shown by the arrow. Check that the battery connection (+) touches securely the side face of the battery.

-How to remove:
Firstly slide the battery in the direction of the arrow with tweezers, and then lift the battery.

(6)Insulator
-How to set:
To insulate between the battery connection (+) and the battery connection $(-)$, the insulator should be put at the two pins securely as bellow.

(7)Day jumper and Support for dial side parts

- Reassembling procedures

The support for dial side parts spring sets to the day jumper. (A position)

Support for dial side parts spring

(8)Setting position (at the time of disassembling and reassembling)
-How to set the Date \& Day driving wheels in the correct position: Note:
Set the indicator finger of a Date \& Day driving wheels to the setting position mark on the Main plate.
<Cal.VH83A setting position》

-How to assemble and set the Date \& Day jumpers of the support of dial side parts:
There are two hooks on the support for dial side parts. (Fig.1)
First, assemble the two hooks on the support for dial side parts to the position of the built-in height A of the base plate. (Fig.2)
Set the Date \& Day jumper to the teeth of the Date star \& Day wheel.
Second,assemble the two hooks on the position of the built-in height $B$ of the base plate. (Fig.3)
example VH83A


Fig. 1 (example VH83A)


Fig. 2 (built-in height A)


Fig. 3 (built-in height B)

## DISPLAY AND CROWN OPERATION


[Note:
*1: Hour hand
*4: Date calendar hand
*7: Crown at normal position
*9: Second click
*2: Minute hand
*5: Day calendar hand
*8: First click

- Time setting
*3: Second hand
*6: 24 Hour hand
- Date setting (Quick change function)


## TIME SETTING


1.Pull out the crown to the second click when the second hand is at the 12 O'clock position.

Turn the crown rotation to set the day of the week.

Turn the crown to set the hour and minute hands to the time.
(Check that AM / PM is set correctly)

2.Push the crown back into the normal position in signal.

3.Pull out the crown to the first clik.
Turn the crown counterclockwise to set the date.

4.Push the crown back into the normal position.
*Do not set the date between 10:00 PM and 2:00 AM
Otherwise the day could not change properly. If it is necessary to set the date during that time period, once change the time to any time except the period, and then set the date.
After that set the time correctly.
Notes in time setting of Cal.VH8 series
When time setting is done with counterclokwise, date hand might reverse but there is no problem for the function.
Please set the date by using quick change function when date showing is incorrect.

