

## CLAVI马

Der Schlüssel für Ihren Wertschutz


## GB Operational Instructions 82021 Code-Combi K Extended version

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## 1 Working instructions

## Important points

- Before putting the lock into operation, please read the instructions carefully.
- All instructions exclusively refer to the lock and not to possible control elements of the safe.
- Carry out the programming sequences with the lock and the safe opened.
- Every correct entry keyed in and recognised by the lock is confirmed by an acoustic signal. These confirmation signals are not taken into consideration in the following notes.
- You have 20 seconds for each entry keyed in. If you have not pressed a key within this 20 second period, the electronic system will close down automatically. Operations not fully completed have to be re-started.
- Code entries can be interrupted by pressing the $\mathbf{P}$ button.
- The lock is set at the works code 123456 when supplied. Alter this immediately to your own personal code for security reasons. Do not use any personal or other similarly well known data when selecting this code.


## General instructions

- The lock is designed for use from $+10^{\circ} \mathrm{C}$ to $+50^{\circ} \mathrm{C}$.
- The lock should be cleaned using a damp cloth only (do not use any aggressive cleaning agents).
- The lock must not be lubricated.
- Never open the lock casing. Should dismantling be required on the fittings, please carry this out in strict accordance with the operational instructions provided. Failure to comply with this will endanger the correct functioning of the lock and result in your losing warranty entitlements.


## 2 Signals and what they mean

Plastic control unit:


Diagram 1: Control unit

| Symbol | Signal | Meaning |
| :---: | :---: | :---: |
| 1 x (G) | Green LED flashes once | Valid 6-digit code entered |
| (G) | Green LED remains lit up | Lock is ready for programming |
| $3 \times$ (R) | Red LED flashes 3 times | Invalid code entered or entry suspended by pressing $\mathbf{P}$ button |
| $10 \times$ (R) | Red LED flashes 10 times after ON button pressed | Insufficient voltage |
| 1, 2, 4, 8 or 16 minutes (R) | Red LED flashes every second for $1,2,4,8$ or 16 minutes after ON button pressed | Lock is in blocked status |
| (R) | Red LED flashes every 5 seconds | Lock is in time delay status |
| $3 x$ (R) | Red and green LED flash alternately 3 times | Lock was last opened with another code |
| (G̦) 1 ¢ | Green LED flashes every 5 seconds accompanied by an acoustic signal | Lock is in opening window status |
| $1 \times$ - | Acoustic signal sounds once | End of opening window period |
| $2 \times$ 位 | Acoustic signal sounds twice | New 6-digit code entered |
| $3 \times$ - | Acoustic signal sounds 3 times | Invalid 6-digit code entered |

## 3 Operational modes

The lock can be opened with a single code (primary code), with two codes (primary or secondary code), or with a dual code ( $1^{\text {st }}$ and $2^{\text {nd }}$ partial codes). Only the holder of the overriding primary code is able to release the secondary code and the dual code.

Primary Code: 6-digit secret combination
Secondary Code: Additional 6-digit combination for a further user of the safe
Dual Code: A 12-digit combination made up of two 6-digit codes for two users of the safe. Both users must enter their 6-digit code to complete the combination (mutual check principle).

Three different operational modes are available. The following diagrams depict the different modes to be used for opening.

Parallel mode is set by the works and the works primary code is 123456 . No secondary code is set by the works.
I.
parallel mode

II.
delegated dual code mode

III.
ordinary dual code mode

dual code

## 4 Lock functions

The lock should only be programmed with the lock and safe opened.

### 4.1 Parallel mode function


4.1.1 Opening with primary or secondary code

| 1) | Press ON |  |
| :--- | :--- | :--- |
| 2) | Enter valid 6-digit primary or secondary code | $1 \times$ Gी |
| 3$)$ | Within 4 seconds turn bar handle clockwise until stop position reached |  |

If the lock was last opened with a different code, the signal $\mathbf{3} \mathbf{x}$ (G): appears.

### 4.1.2 Opening after 3 or more incorrect code entries $\Rightarrow$ penalty time

After 3 incorrect entries the lock goes into a one minute blocked status. The period in which the lock is blocked is extended to $2,4,8$ and a maximum of 16 minutes every time an incorrect code is entered. During this period the red LED flashes every second and it is not possible to enter any further codes. When the blocked period is over, ON may be pressed again at any time.

| 1) | Press ON |  |
| :--- | :--- | :--- |
| 2) | Enter valid 6-digit code | $1 \times$ GT: |
|  | Signal: Invalid 6-digit code was entered during former opening attempt | $3 \times$ - |
| 3) | Within 4 seconds turn bar handle clockwise until stop position reached |  |

### 4.1.3 Alteration of primary code by primary code holder

| 1) | Open lock with valid 6-digit primary code (see 4.1.1) |  |
| :--- | :--- | :--- |
| 2) | Press ON |  |
| 3) | Press P | (G) |
| 4) | Enter valid 6-digit primary code | (G) $/ 2 \times$ - |
| 5) | Enter new 6-digit primary code | $1 \times$ G(G) |
| 6) | Enter new 6-digit primary code again |  |
| 7) | Test newly programmed primary code by locking and opening once <br> more |  |

If the new primary code as per 6) was incorrectly confirmed, the signal $\mathbf{3} \mathbf{x}$ (R) appears. Repeat the sequence.

### 4.1.4 Switching on secondary code by primary code holder

| 1) | Open lock with valid 6-digit primary code (see 4.1.1) |  |
| :--- | :--- | :--- |
| 2) | Press ON |  |
| 3) | Press P | (G) |
| 4) | Enter valid 6-digit primary code | (G) |
| 5) | Press P | (G) |
| 6) | Press 3 | (G) $/ 2 \times$ - |
| 7) | Enter new 6-digit secondary code | $1 \times$ (G): |
| 8) | Enter new 6-digit secondary code again |  |
| 9) | Test newly programmed secondary code by locking and opening once <br> more |  |

If the new secondary code as per 8) was incorrectly confirmed, the signal $\mathbf{3} \mathbf{x}$ (R) appears. Repeat the sequence.

GB
4.1.5 Alteration of secondary code by secondary code holder

| 1) | Open lock with valid 6-digit secondary code (see 4.1.1) |  |
| :--- | :--- | :--- |
| 2) | Press ON |  |
| 3) | Press P | (G) |
| 4$)$ | Enter valid 6-digit secondary code | (G) $/ 2 \times$ - |
| 5) | Enter new 6-digit secondary code | $1 \times$ G. |
| 6) | Enter new 6-digit secondary code again |  |
| 7) | Test newly programmed secondary code by locking and opening once <br> more |  |

If the new secondary code as per 6) was incorrectly confirmed, the signal $\mathbf{3} \mathbf{x}$ ( Repeat the sequence.

### 4.1.6 Cancellation of secondary code by primary code holder

| 1) | Open lock with valid 6-digit primary code (see 4.1.1) |  |
| :---: | :---: | :---: |
| 2) | Press ON |  |
| 3) | Press $\mathbf{P}$ |  |
| 4) | Enter valid 6-digit primary code | (G) |
| 5) | Press $\mathbf{P}$ |  |
| 6) | Press 0 | $1 \times$ (G) |

By pressing the key combination $\mathbf{P}$ and $\mathbf{0}$ all the functions programmed (secondary code, dual code, time delay, opening window) are deleted.

### 4.1.7 Locking

In conjunction with a boltwork: After the door has been closed the boltwork must be locked and the lock closed.

1) Turn bar handle counter clockwise until stop position reached

4.2.1 Switching on dual code by primary code holder

| 1) | Open lock with valid 6-digit primary code (see 4.1.1) |  |
| :---: | :---: | :---: |
| 2) | Press ON |  |
| 3) | Press $\mathbf{P}$ |  |
| 4) | Enter valid 6-digit primary code | (G) |
| 5) | Press $\mathbf{P}$ |  |
| 6) | Press 5 |  |
| 7) | Enter new 6-digit $1^{\text {st }}$ part of combination | (G) $/ 2 \times$ - |
| 8) | Enter new 6-digit $1^{\text {st }}$ part of combination again | 1 x (G) ${ }^{\text {(G) }}$ |
| 9) | Enter new 6-digit $2^{\text {nd }}$ part of combination | (G) $/ 2 \times$ - |
| 10) | Enter new 6-digit $2^{\text {nd }}$ part of combination again | 1 x (G) |
| 11) | Test newly programmed dual code by locking and opening once more |  |

If the new partial combinations are not correctly confirmed, the signal $3 \mathbf{x} \cdot(\mathbb{R})$ appears. Repeat the sequence.
The correct sequence of the partial combinations and its repeated confirmation must be adhered to.

### 4.2.2 Opening

### 4.2.2.1 Opening with primary code by primary code holder

| 1) | Press ON |  |
| :--- | :--- | :--- |
| 2) | Enter valid 6-digit primary code | 1x (G) |
| 3) | Within 4 seconds turn bar handle clockwise until stop position reached |  |

If the lock was last opened with the dual code, the signal $3 \mathbf{x}$ (G): appears.

GB
4.2.2.2 Opening with dual code by dual code holder

| 1) | Press ON |  |
| :--- | :--- | :--- |
| 2) | Enter valid 6-digit $1^{\text {st }}$ part of combination | $1 \times$ (G): |
| 3) | Enter valid 6-digit $2^{\text {nd }}$ part of combination | $1 \times$ (G): |
| 4$)$ | Within 4 seconds turn bar handle clockwise until stop position reached |  |

If the lock was last opened with the primary code, the signal $\mathbf{3} \mathbf{x}$ (G) appears.
The correct sequence of the partial codes must be adhered to. In order to open the lock the $1^{\text {st }}$ part of the combination has to be entered followed by the $2^{\text {nd }}$ part of the combination.

### 4.2.3 Opening after 3 or more incorrect code entries $\Rightarrow$ penalty time

After 3 incorrect entries the lock goes into a one minute blocked status. The period in which the lock is blocked is extended to $2,4,8$ and a maximum of 16 minutes every time an incorrect code is entered. During this period the red LED flashes every second and it is not possible to enter any further codes. When the blocked period is over, ON may be pressed again at any time.

| 1) | Press ON |  |
| :--- | :--- | :--- |
| 2) | Enter valid code | $1 \times$ GG: |
|  | Signal: Invalid code was entered during former opening attempt | $3 \times$ - |
| 3) | Within 4 seconds turn bar handle clockwise until stop position reached |  |

### 4.2.4 Alteration of primary code by primary code holder

| 1) | Open lock with valid 6-digit primary code (see 4.2.2.1) |  |
| :--- | :--- | :--- |
| 2) | Press ON |  |
| 3) | Press $\mathbf{P}$ | (G) |
| 4$)$ | Enter valid 6-digit primary code | (G) $/ 2 \times$ - |
| 5) | Enter new 6-digit primary code | $1 \times$ (G) |
| 6) | Enter new 6-digit primary code again |  |
| 7) | Test newly programmed primary code by closing and opening once <br> more |  |

If the new primary code as per 6) was incorrectly confirmed, the signal $\mathbf{3 x}$ (R) appears. Repeat the sequence.
4.2.5 Cancellation of dual code by primary code holder

| 1) | Open lock with valid 6-digit primary code (see 4.2.2.1) |  |
| :--- | :--- | :--- |
| 2) | Press ON |  |
| 3) | Press P | (G) |
| 4$)$ | Enter valid 6-digit primary code again |  |
| 5) | Press P | $1 \times(\mathbf{G})$ <br> दdual code <br> deleted |
| 6) | Press 0 |  |

By pressing the key combination $\mathbf{P}$ and $\mathbf{0}$ all the functions programmed (secondary code, dual code, time delay, opening window) are deleted.

### 4.2.6 Locking

See chapter 4.1.7

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### 4.3 Ordinary dual code mode function

### 4.3.1 Activation of ordinary dual code mode by primary code holder

This action deletes the primary code and replaces it with a dual code. The lock can only be opened by a combination of the $1^{\text {st }}$ and $2^{\text {nd }}$ parts of the code (mutual check principle).

| 1) | Open lock with valid 6-digit primary code (see 4.1.1) |  |
| :---: | :---: | :---: |
| 2) | Press ON |  |
| 3) | Press $\mathbf{P}$ |  |
| 4) | Enter valid 6-digit primary code again | (G) |
| 5) | Press $\mathbf{P}$ |  |
| 6) | Press 7 |  |
| 7) | Enter new 6-digit $1^{\text {st }}$ part of combination | (G) $/ 2 \times$ - |
| 8) | Enter new 6-digit $1^{\text {st }}$ part of combination again | 1 x (G) |
| 9) | Enter new 6-digit $2^{\text {nd }}$ part of combination | (G) $/ 2 \mathrm{x}$ 标 |
| 10) | Enter new 6-digit ${ }^{\text {nd }}$ part of combination again | 1 x (G) |
| 11) | Test newly programmed dual code by locking and opening once more |  |

If the new partial combinations are not correctly confirmed, the signal $\mathbf{3 x}$ ( $\mathbb{R}$ - appears. Repeat the sequence.
The correct sequence of the partial combinations and its repeated confirmation must be adhered to.

### 4.3.2 Opening with dual code by dual code holder

| 1) | Press ON |  |
| :--- | :--- | :--- |
| 2) | Enter 6-digit 1 ${ }^{\text {st }}$ part of combination | $1 \times$ (G): |
| 3) | Enter 6-digit 2 ${ }^{\text {nd }}$ part of combination | $1 \times$ (G): |
| 4$)$ | Within 4 seconds turn bar handle clockwise until stop position reached |  |

The correct sequence of the partial codes must be adhered to. In order to open the lock the $1^{\text {st }}$ part of the combination has to be entered followed by the $2^{\text {nd }}$ part of the combination.

### 4.3.3 Opening after 3 or more incorrect code entries $\Rightarrow$ penalty time

After 3 incorrect entries the lock goes into a one minute blocked status. The period in which the lock is blocked is extended to $2,4,8$ and a maximum of 16 minutes every time an incorrect code is entered. During this period the red LED flashes every second and it is not possible to enter any further codes. When the blocked period is over, ON may be pressed again at any time.

| 1) | Press ON |  |
| :--- | :--- | :--- |
| 2) | Enter valid dual code | $1 \times$ GT: |
|  | Signal: Invalid dual code was entered during former opening attempt | $3 \times$ - $=$ |
| 3) | Within 4 seconds turn bar handle clockwise until stop position reached |  |

### 4.3.4 Alteration of dual code by dual code holder

| 1) | Open lock with valid dual code (see 4.3.2) |  |
| :---: | :---: | :---: |
| 2) | Press ON |  |
| 3) | Press $\mathbf{P}$ |  |
| 4) | Enter valid dual code once more | (G) |
| 5) | Enter new 6-digit $1^{\text {st }}$ part of combination | (G) $12 \times$ - |
| 6) | Enter new 6-digit $1^{\text {st }}$ part of combination again | 1 x (G) |
| 7) | Enter new 6-digit $2^{\text {nd }}$ part of combination | (G) $12 \times$ - |
| 8) | Enter new 6-digit $2^{\text {nd }}$ part of combination again | 1 x (G). |
| 9) | Test newly programmed dual code by closing and opening once more |  |

If the new partial combinations are not correctly confirmed, the signal $\mathbf{3 x}$ (R) appears. Repeat the sequence.
The correct sequence of the partial combinations and its repeated confirmation must be adhered to.

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### 4.3.5 Cancellation of ordinary dual code mode

The $1^{\text {st }}$ part of the dual code becomes the new primary code on deletion.
By pressing the key combination $\mathbf{P}$ and $\mathbf{0}$ all the functions previously programmed (secondary code, dual code, time delay, opening window) are deleted.

| 1) | Open lock with valid dual code (see 4.3.2) |  |
| :--- | :--- | :--- |
| 2) | Press ON |  |
| 3) | Press P | (G) |
| 4$)$ | Enter valid dual code once more | $1 \times(\mathbf{G})$ |
| 5) | Press P | $1 \times(\mathbf{G})$ <br> $\Rightarrow 2^{\text {nd }}$ part of <br> code deleted |
| 6) | Press 0 |  |

### 4.3.6 Locking

See chapter 4.1.7

### 4.4 Time delay (TD) and opening window (OW) functions

The time delay (TD) function refers to the period of time which must elapse before the lock can be opened. The opening window (OW) is the period in which the lock may be opened after the TD has elapsed. Any valid code can be provided with a TD or OW function.

### 4.4.1 Switching on/alteration of the TD/OW

| 1) | Open lock with valid code |  |
| :---: | :---: | :---: |
| 2) | Press ON |  |
| 3) | Press $\mathbf{P}$ |  |
| 4) | Enter valid code once more | (G) |
| 5) | Press P | (G) |
| 6) | Press 1 when TD/OW is entered for <br> - primary code in parallel mode <br> - primary code in delegated dual code mode <br> - dual code in ordinary dual code mode <br> Press 2 when TD/OW is entered for <br> - secondary code in parallel mode <br> - dual code in delegated dual code mode | (G) |
| 7) | Enter a 2-digit TD (01-99 minutes) and enter a single digit OW (1-9 minutes) <br> Example: 092 for 9 minutes TD and 2 minutes OW | $1 \times$ (G) |
| 8) | Test newly programmed TD and OW by closing and opening once more |  |

### 4.4.2 Opening with programmed TD/OW

| 1) | Press ON |  |
| :--- | :--- | :--- |
| 2) | Enter valid code | $1 \times$ (G): |
|  | Automatic start of TD: visual signal every 5 seconds | (R): |
|  | After end of TD: acoustic signal | $1 \times$ |
|  | Automatic start of OW: visual and acoustic signal every 5 seconds | (GT) / G |
| 3) | Enter valid code once again during OW period | $1 \times$ (G): |
| 4) | Within 4 seconds turn bar handle clockwise until stop position reached |  |

By pressing the $\mathbf{P}$ key during the TD period this function is interrupted. The entire sequence must then be repeated in order to open again.
3 code entries are possible during the OW period. Following the third incorrect entry the entire process has to be repeated.

### 4.4.3 Cancellation of programmed TD/OW

| 1) | Open lock with valid code |  |
| :--- | :--- | :--- |
| 2) | Press $\mathbf{O N}$ | (G) |
| 3) | Press $\mathbf{P}$ | (G) |
| 4$)$ | Enter valid code once more | (G) |
| 5) | Press $\mathbf{P}$ | Press $\mathbf{1}$ when TD/OW is entered for <br> - primary code in parallel mode <br> - primary code in delegated dual code mode <br> - dual code in ordinary dual code mode <br> Press $\mathbf{2}$ when TD/OW is entered for <br> - secondary code in parallel mode <br> - dual code in delegated dual code mode |
| 7) | Press $\mathbf{0 0 0}$ (set TD/OW on 0 respectively) | $1 \times$ (G): <br> TD/OW <br> deleted |

## 5 Power supply

The lock is powered by means of a 9-volt block battery. We recommend using an alkaline/ manganese battery with reduced heavy metal content
When changing the battery, please dispose of old batteries in an environmentally friendly manner using recycling/collecting boxes. Batteries should never be thrown on the fire, into water or thrown away with normal household waste.

Insufficient power supply

| 1$)$ | After pressing ON | $10 \times(\mathbb{R} \cdot$ |
| :--- | :--- | :--- |
| 2$)$ | Replace battery without delay |  |

Low voltage is shown if the red LED flashes 10 times after the $\mathbf{O N}$ button is pressed. There is still sufficient energy for opening approximately 50 times, but no further programming sequences should be carried out.
When low voltage is indicated, please change the battery immediately. If the low battery signal is ignored for a long period the number of possible opening cycles may be reduced due to the battery's automatic discharge.

### 5.1 Changing the battery

Press the catch on the top edge of the battery cover with a screwdriver and lever of battery lid. Pull the battery out carefully until the battery clip is visible. Release the battery from the clip and replace. Re-engage the lid. Please ensure that the cable is not damaged.


Diagram 2: Battery case

### 5.2 Emergency power supply

If the battery is discharged with the door locked, the lock can be powered up using the emergency power supply connection. To do this, a 9 -volt block battery must be connected to the supply clip beneath the cover of the control unit.


Press tool into the right hand or upper (in case of vertical installation) hole on the bottom edge of the control unit until the catch is released. Keep the tool pressed down whilst the cover raising carefully.


Repeat this process on the left hand or down (in case of vertical installation) hole. Lift off the cover carefully.


Pull out the battery clip for the emergency supply by about 1 cm and clip in a 9-volt block battery. Open the lock with a valid code, remove the block battery from the clip and replace the discharged battery in the lock case.


Replace the cover and press down until all four catches are engaged. Check that the lock functions correctly whilst the safe is still open.

