

MK06 / WEY RAY 06



Manual Revision History

Version	Date	Remarks	Initials
E01	12.10.2006	Initial Version for MK06 / WEY RAY 06	KSU
E02	13.06.2007	Inserted pictures for WEY RAY 06	KSU
E03	01.11.2007	Updated whole Manual for TÜV	GMK/AKU
E04	08.04.2008	Edit Manual	SGR
E05	25.09.2008	Chapter 7.4.5 change "shift right" to "shift left"	AKU
E06	08.05.2009	Added Keypad 02 (RD3 Matching)	AKU
E07	09.09.2009	Edit	JRU
E08	02.10.2009	Edit Contacts	JRU
E09	24.11.2009	Edit design	JRU
E10	27.10.2010	New Setup	JRU/GMK
E11	04.11.2010	Edit	SGR
E12	08.04.2011	Modified chapter 5.4.1	AKU
E13	23.02.2012	Correct chapter 5.1	JRU
E14	29.03.2012	New Setup	JRU
E15	15.05.2012	Edit User Menu	JRU
E16	05.06.2012	Edit Keypads	JRU
E17	11.04.2013	Edit Contacts	JRU
E18	15.10.2013	Edit Setup	JRU
E19	07.04.2014	Edit Safety Instructions	JRU
E20	09.05.2014	Add Technical Info	JRU

Copyright

Wey Elektronik AG is the exclusive owner of the copyrights for the delivered programs, the documentation and manuals and the operating instructions, including the charts and layouts contained therein. They may not be duplicated, saved, transferred, disseminated or made available to third parties, neither in whole nor in part, without the prior written consent of Wey Elektronik AG. They may only be used for the intended operation of a legally acquired product or program within the business of the purchaser.

© Wey Elektronik AG



Table of Contents

1	Read this first	5
1.1	Safety Instructions	5
1.1.1	Power supply, Ports and Cables	5
1.1.2	Housing and opening the housing	6
1.1.3	Parts and Service	6
1.1.4	Environmental conditions and protection against electric shock	6
1.1.5	Disposal of Old Electrical and Electronic Equipment	6
1.2	Symbols / Notes	7
1.3	Warranty Limitations	7
2	Product Overview	8
2.1	Benefits	8
2.2	Roles	8
2.3	Keyboard Design	9
2.4	Scope of delivery (standard MK06/WEY RAY 06)	9
2.5	Specifications	9
2.5.1	Power consumption Connector Box and MK06/WEY RAY 06	9
2.5.2	Key switches and keycaps	9
2.5.3	Operating conditions	9
2.5.4	Approvals	10
2.5.5	General Features	10
3	Keyboard in Detail	10
3.1	Keyboard Roles	10
3.2	Keyboard System Keys	10
3.3	Keyboard Controls	11
3.3.1	Reset Button	11
3.3.2	Brightness Control	11
3.3.3	Volume Control	11
3.4	Keyboard Ports	11
3.4.1	Host Port	11
3.4.2	Headset Socket	11
3.4.3	Microphone	11
4	Plug-in Modules	12
4.1	Installation, Removal and Testing	12
4.1.1	Plug-in Installation /MK06	12
4.1.2	Removal of a Plug-in	12
4.1.3	Plug-in Installation WEY RAY 06	12
4.1.4	Removal of a Plug-in	12
4.1.5	Plug-in Testing	12
4.2	Standard Keypads	13
4.3	Customized Keypads	13
4.4	Plug-in Architecture	14
4.5	Keypad Coding	14
4.6	Fingerprint Reader	15
5	Operational Guide	15
5.1	Switching between Workstations	15
5.2	Share a single workstation with two keyboards	16
5.2.1	Share port configuration	16
5.3	Switching between Video Screens	16
5.4	Workstation Emulations	17
5.4.1	LCD	17
5.4.2	LCD Soft Keys	17
5.4.3	Plug-in Modules	17



5.5	Additional Key Functions.....	17
6	Installation.....	18
7	Setup and Testing	19
7.1	System Setup and Test Menu.....	19
7.2	Main System Setup Menu	19
7.2.1	System Setup.....	20
7.2.2	Configuration of Workstation Ports	21
7.2.3	DLINK Port	24
7.2.4	Share Port	24
7.2.5	Focus Port	25
7.2.6	Ethernet Own Port	25
7.2.7	Eth Share Options	25
7.2.8	Timeout.....	26
7.2.9	Audio	26
7.2.10	Display	26
7.2.11	Country Version	27
7.2.12	Repeat / Delay.....	27
7.2.13	Screen Switch - Assign to DLINK	27
7.2.14	Screen Switch - Assign to RES LINE.....	28
7.2.15	Force Attach	28
7.2.16	Global SW Options	29
7.2.17	Add Functions.....	29
7.3	Test Menu	30
7.3.1	HW - Test / Standalone Tests	30
7.3.2	HW - Tests / Loopback Test.....	31
7.3.3	Default/Clear / Keyboard internal	32
7.3.4	Default/Clear / AddOn-Touch	32
7.3.5	View Layers	33
7.3.6	Play.....	33
7.3.7	DlinkMod Update.....	34
7.3.8	Display Calib	34
7.4	User Menu	35
7.4.1	Software Info.....	35
7.4.2	Keycodetable Info	35
7.4.3	FileDir Info.....	36
7.4.4	Buzzer Control - Volume	36
7.4.5	Buzzer Control - Frequence.....	36
7.4.6	Audio	37
7.4.7	Act. WS Mouse Rst	37
7.4.8	Active WS Alerts.....	37
7.4.9	Macro Keys	38
7.4.10	Calculator	38
7.4.11	Video.....	38
7.4.12	KIx Adjust.....	39
7.4.13	VSS2X Updates	39
7.4.14	Security	40
7.4.15	PIN Handling	42
7.5	Memory Stick	44
7.5.1	Download	44
7.5.2	Upload.....	45
7.6	Troubleshooting.....	46
8	Appendix	46
8.1	Keyboard Country and Key sets.....	46
8.3	Keycodes used for all types of VSS2X Systems	48
9	Contacts	49

1 Read this first

This manual provides a comprehensive guide to the WEY Multifunctional Keyboards MK06 and WEY RAY 06. The contents of each chapter are summarized below:

- | | |
|-----------------------------|--|
| 2 Product Overview | Keyboard's architecture, uses, benefits and specifications in brief. |
| 3 Keyboard in Detail | In-depth guide to the keyboards, including the connectors and controls. |
| 4 Plug-in Modules | Detailed description of plug-in architecture, installation and testing procedures. Description of all currently available modules. |
| 5 Operational Guide | Describes the handling of the keyboard in a dealing environment, including the role of the function keys and controls. |
| 6 Installation | Information about keyboard integration within a dealing environment. |
| 7 Setup and Testing | Detailed guide to the keyboard set-up and configuration, including instructions on how to update the internal flash memory with the latest software. The chapter closes with testing and troubleshooting processes for the technical support staff. It describes the procedures and hardware needed to test the physical as well as the communications integrity of the keyboards. |
| 8 Appendix | Detailed reference section for the technical support staff, including specifications, keyboard layouts, cabling diagrams and additional hardware. |

1.1 Safety Instructions

NOTICE

Risk of property damage

- ▶ Carefully read this reference manual.
- ▶ Only original parts and accessories recommended by WEY Elektronik AG and peripheral devices in accordance with the DIN EN 60950 regulations may be used.
- ▶ Place the equipment on a stable surface or install it in appropriate racks and provide good ventilation!
- ▶ Use the equipment exclusively for its hereby specified purposes and keep it unplugged during installation and handling!

1.1.1 Power supply, Ports and Cables

WARNING



Risk of fire or electric shock

- ▶ Ensure correct voltage. (110/230V)
- ▶ Use only affiliated AC power adapter.
- ▶ Connect equipment to easily accessible, grounded main power outlet.
- ▶ Replace worn-out or damaged cables / AC power adapters immediately.
- ▶ Do not overload power circuits.
- ▶ Disconnect adapter from mains if equipment remains unused for a longer period of time.

1.1.2 Housing and opening the housing



WARNING

Risk of electric shock

- ▶ Do not touch any electrical contacts or devices.
- ▶ Do not insert any objects into the openings of the housing.
- ▶ Do not open the housing or remove the cover plate.

1.1.3 Parts and Service

NOTICE

Risk of property damage

- ▶ All WEY products and their attached units may only be opened and repaired by qualified and authorized service personnel.
- ▶ For fiber optic equipment only personnel familiar with the handling and general safety guidelines for optical equipment are entitled to repair such devices.

1.1.4 Environmental conditions and protection against electric shock



WARNING

Risk of electric shock or explosion

- ▶ Do not place WEY Products and their peripheral equipment near heat generating devices or humidifiers.
- ▶ Do not expose WEY Products to constant sunlight or wetness.
- ▶ Do not use Wey Products in rooms containing easily inflammable, ethereal or volatile gas.
- ▶ Avoid environmental hazards such as dust, dirt, food, liquids, chemicals, temperature extremes, vibrations and abrupt changes in humidity or temperature.
- ▶ In case of condensation on or within the units, allow sufficient time for the moisture to evaporate.
- ▶ Do not use artificial means to speed up the drying process.
- ▶ Before using the equipment again, verify that all connected units are thoroughly dry.

1.1.5 Disposal of Old Electrical and Electronic Equipment



NOTICE

Risk of negative consequences for the environment

The recycling of materials helps to conserve natural resources.

- ▶ This symbol on WEY products indicates that this product shall not be treated as household waste. Instead it should be handed over to the applicable collection point for the recycling of electrical and electronic equipment.
- ▶ By ensuring this product is disposed of correctly, you help prevent potential negative consequences for the environment and human health, which could otherwise be caused by inappropriate waste handling.

1.2 Symbols / Notes

WARNING



Indicates a hazardous situation that, if not avoided, could result in death or serious injury.

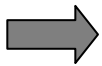
NOTICE



Indicates information considered important, but not hazard-related (e.g. messages relating to property damage).



The following tips and hints should be followed to enhance the usability of the product.



Arrow

► This arrow points to an action or a sequence of actions to be taken.

1.3 Warranty Limitations

The warranty term for the WEY Products is 12 months as per delivery date. The manufacturer does not assume any general liability or liability to pay any compensation or damages if any part of the manufacturer's instructions are violated. Warranty and liability shall not exceed the minimal extent as defined by applicable law and Wey Elektronik's General Sales Terms and Delivery Conditions. All other warranty regulations require the written consent of Wey Elektronik AG. Excluded from warranty are:

- Physical damage due to transport or mishandling
- Chemical damage due to mishandling
- Electrical damage not due to failure of components

2 Product Overview

This section provides a non-technical description of the keyboard's functionalities, major features and benefits.

2.1 Benefits

MK06 and WEY RAY 06 are multi-protocol keyboards. They feature the functionalities of all mainstream dealer and operator keyboards and they reduce desk clutter as well as data entry errors. They facilitate smooth transitions between a wide range of information services, allowing dealers and operators to forget about the technology and concentrate on the markets and tasks at hand.

MK06/WEY RAY 06 use a fully modular architecture with programmable soft keys and interchangeable add-ons. This allows the customization of keyboards in accordance with the ever-changing demands of dealing rooms and control centres. The main benefits are;

Benefits for the IT Department

- Very high meantime between failures (MTBF)
- Specialty keypads for multiple proprietary svcs
- Ease of installation and handling
- Menu driven setup
- Integrated test system
- Firmware Flash programmable
- Software downloads
- Wide range of plug-in modules

Benefits for the Trader/Operator

- Very high meantime between failures (MTBF)
- Specialty keypads for multiple proprietary svcs
- Fully customizable display warnings
- Sound and brightness controls
- Clear key labelling

2.2 Roles

MK06/WEY RAY 06 can control up to six workstations using the keyboard's dedicated LCD soft keys. The keyboard, mouse (PS2, USB) and audio from the workstations are connected to a WEY Connector Box that is controlled by the keyboard. The screens can be connected directly to the PC or switched through a WEY Deskswitch or Allocation System. This saves on costs for screens as well as on desk space. The keyboards can drive Deskswitches and other accessories, thus offering a wide range of control options. With a simple connection between two keyboards, up to six workstations can be shared between two users.

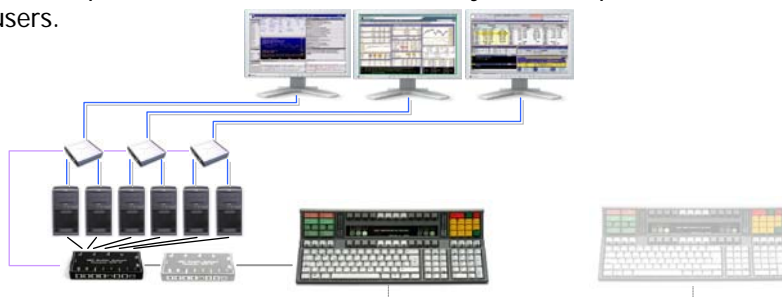


Figure 1 – MK06/WEY RAY 06 Keyboard controls 6 Workstations (dual and single screen) with 2x1 Deskswitches

The MK06/WEY RAY 06 can also be used in combination with a videoswitch or Allocation System (see Chapter 5.3). Multiple workstations can be accessed from any desk connected to the switch.

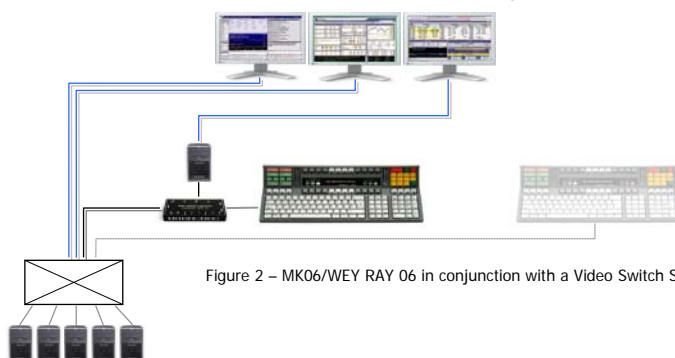


Figure 2 – MK06/WEY RAY 06 in conjunction with a Video Switch System

2.3 Keyboard Design

This section provides a brief overview of the keyboard layout and functions. The main body of the keyboard follows a standard PC keyboard layout with additional function keys and optional audible clicks.

The **<Escape>** key and 3 multiple purpose keys are located to the left of the 12 standard function keys. A single keystroke on the workstation 1-3 (WS1-WS3) buttons switches the control of the keyboard and mouse over to the selected workstation, illuminating the respective key's LED (green). In a Videoswitch environment, these keys also switch between workstations 4-6 when used in conjunction with **<Shift>**.

The **<System logoff>** key is on the right of the 12 function keys, along with 3 multiple purpose keys that switch between WS4-WS6. In a Videoswitch environment, however, these keys do not switch between workstations, but between Videoswitch screens 1-3, or in conjunction with **<Alt Gr>** between screens 4-6.

2.4 Scope of delivery (standard MK06/WEY RAY 06)

Part Nr.	Product name		
22104xx or 22108xx	Keyboard MK06 Keyboard WEY RAY06	xx Keyboard country set: US, UK, SG, FR, etc (See Appendix 8 "Keyboard country and key sets")	
22800SSLx	Keyboard cable	x Lengths of 2m or 3m available	
2211xx	Connector Box V (a) / VII	Other connector boxes available upon request.	
23568V9xx	PSU ENG AM178B60 (including power cable)	Power cable type: xx	SC → Europe (Shuko) SW → Swiss UK → United Kingdom US → United States

2.5 Specifications

Type	Model	Size WxDxH (mm)	Weight (g)	Power Consumption
Keyboard	MK06	459x245x66(75)	1950	12 VDC 1,4A max
	WEY RAY 06	540x285x66(75)	2350	12 VDC 1,4A max
Connector Box	Type IV (c)	151x91x28	220	12 VDC 0,15A max
	Type V (a)	151x91x28	220	12 VDC 0,15A max
	Type V (a) Rack	418x75x44	1550	12 VDC 0,15A max
	Type VII	151x91x28	220	12 VDC 0,15A max
	Type VII Rack	418x75x44	1550	12 VDC 0,15A max

2.5.1 Power consumption Connector Box and MK06/WEY RAY 06

- Power Supply: AC IN: 100 - 240V ~ 0.8A, DC OUT: + 12V = 5.0A
- Voltage: 12VDC
- Current: 1,55 A max.

2.5.2 Key switches and keycaps

- Type: MX soft with gold cross point contacts
- Operating force: $65 \pm 20 \mu\text{N}$
- Economic lifetime: 20×10^6 strokes
- Two colour moulded Keycaps
- Full N-Key Rollover

2.5.3 Operating conditions

- Operating temperature: 8 - 40 °C
- Storage temperature: 0 - 60 °C
- Operating location: indoor
- Relative humidity: 45-85% non-condensing
- Operating altitude: max. 2000 m
- MTBF: 89'540 hours

2.5.4 Approvals

All keyboards are FCC Class B and CE approved

2.5.5 General Features

Current emulations include:

- | | |
|--|--|
| <ul style="list-style-type: none"> • PC (PS2 and USB) • RS6000 • Open Bloomberg • EBS • Eurex • INSTINET | <ul style="list-style-type: none"> • SUN (ULTRA SPARC/BLADE 100 or 1000) • DEC Alpha workstations • DEC VAX and DEC VT Terminal up to type VT420 • Reuters Terminal or RTW32 Workstation • Reuters Dealing 3000 • Reuters XTRA |
|--|--|

In addition to extensive setup options for support staff, dealers and operators can also customise their keyboard according to their specific needs. To prevent unintentional modification of setup parameters, user menus, the setup and the test mode each require different and specific key combinations.

3 Keyboard in Detail

This section includes in-depth descriptions of the keyboard's applications, architecture, controls and connectors. A short user guide is also available, but not included in this document.

3.1 Keyboard Roles

Modern dealing and operator stations consist of multiple PCs, servers and information feeds. When several keyboards are required, this results in desk clutter and an increased risk of errors due to variations in key layout and physical key response. Replacing multiple keyboards and mouse devices with one multifunctional keyboard saves space and reduces error rates. The keyboard's main roles are;

- Workstation switching – The keyboard can be linked to a maximum of 16 workstations. Users can instantly switch keyboard control to any selected device by using the WS keys.
- Screen switching – The keyboard can drive videoswitches up to 8x8 Ports. Users are able to select up to 8 video signals, passing switch and display content through to the chosen monitor.
- Video feed switching – The keyboard can be used to control a Videoswitch distribution system such as the WEY Videoswitch VSS2X and VSS2X Mini or Micro.
- Single workstation sharing with two keyboards – The master keyboard is connected to the workstation and to the slave keyboard. Both master and slave can control the workstation independently, but not simultaneously.

3.2 Keyboard System Keys

Additional keys are used for the following functions (see Figure 3):

- Switching directly between connected workstations and Videoswitch sources
- Workstation emulations

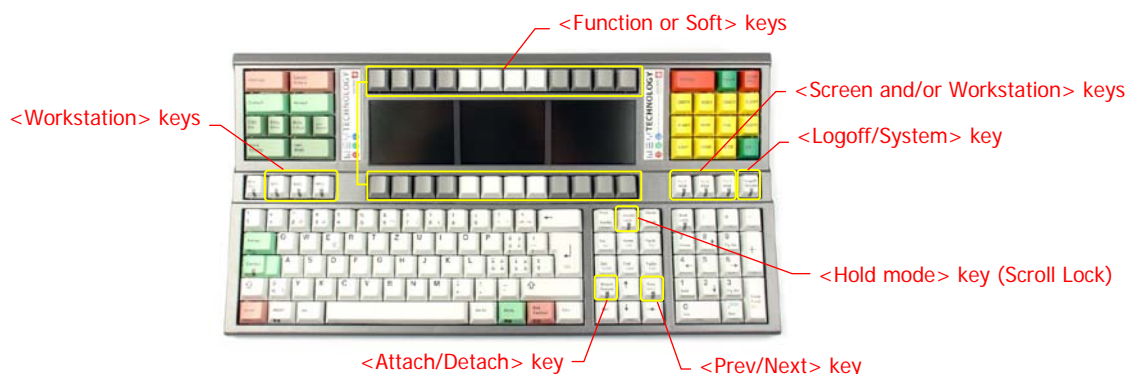


Figure 3 – Additional Keys

3.3 Keyboard Controls

There are three controls – one reset button and two rotary controls for brightness and volume.



Figure 4 – MK06 – View of the left side

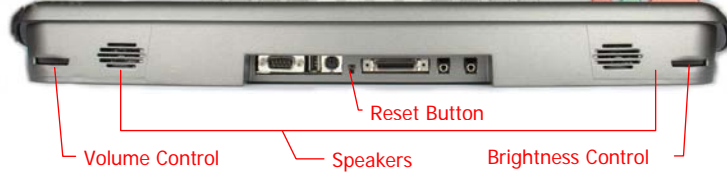


Figure 5 – WEY RAY 06 View of the back

3.3.1 Reset Button

The reset button generates a hardware reset, otherwise referred to as a soft boot.

3.3.2 Brightness Control

The rotary brightness control adjusts the LCD contrast level within a range of 256 increments. The value of the analogue control port is converted into a digital value which can be defined in the keyboard set up. During power up, the panel operates at the default brightness level.

3.3.3 Volume Control

The rotary control adjusts the volume of the audio signal within a range of 100 increments. The first five increments are not audible. The value of the analogue port is converted into a digital value, allowing firmware control of volume settings for special applications. For example, if the volume is turned off and the keyboard receives a message flagged as “important”, it can automatically increase the volume and alert the dealer or operator.

3.4 Keyboard Ports

Keyboards support the following connections:

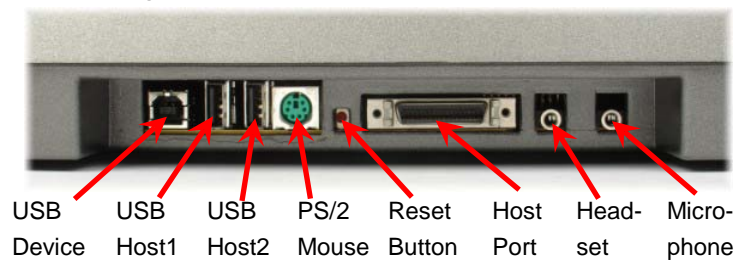


Figure 6 - MK06/WEY RAY 06 – Connectors (View from the rear)

The mouse is powered by the keyboard and detected automatically during power up. Details are displayed on the LCD panel (see Chapter 7.3.12). The keyboard supports;

PS/2	USB
Logitech Mouse Man (3 or 4 buttons and/or wheel)	All USB 1.1 mice (2 to 4 buttons and wheel)
Microsoft IntelliMouse, Explorer or Tilt Mouse (min. 2 buttons)	Microsoft Explorer- or Tilt Mouse (min. 2 buttons)
All 2 or 3 button mice with PS/2 compatible interface	MS-Mouse (2 or 3 buttons and/or wheel)

3.4.1 Host Port

The host port links to the Connector Box and communicates with the keyboard, mouse and audio data. It provides a serial port interface for file uploads to update the keyboard’s flash memory. The keyboard can also be powered via the host port.

3.4.2 Headset Socket

A 3.5mm headset socket carries lineout audio signals without amplification. It complies with industry standard headset jack plugs and features adjustable volume control. When a headset is connected, the internal speakers are switched off.



Important: To avoid permanent hearing damage from high audio levels, use only a specified headset (i.e. Sony MDR110LP or MDR210TV) and activate the headset mode in the user settings (see Chapter 7.3.3)

3.4.3 Microphone

The keyboard features a 3.5mm microphone socket with a microphone input line.

4 Plug-in Modules

One strength of the WEY keyboard design is its plug-in architecture. Slots on the top left and right of the keyboard accept a wide range of plug-in modules, typically customised keypads. They interface with dealing services and proprietary keyboard functions. Additional plug-ins such as a card reader and a TV module are also available to meet evolving market demands and specific customer needs.



Figure 7 – Keyboard showing a selection of Plug-in Modules

4.1 Installation, Removal and Testing

The plug-in installation is straightforward and does not require special tools or test equipment. A simple small screwdriver (e.g. TORX T6) is all you need. Installation can be performed by IT support.

4.1.1 Plug-in Installation /MK06

1. Select required plug-in.
2. Disconnect power supply.
3. Gently remove plug-in cover with a screwdriver. It is held by 4 rubber O-rings (Figure 8).
4. Locate the 10way male plug-in connector on ribbon cable which is revealed after removing cover.

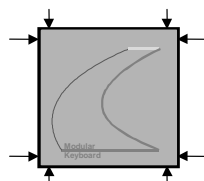


Figure 8 - Plug-in Cover Figure



Figure 9 – Screw hole positions

5. Connect cable with plug-in module
6. Locate screws and gently insert plug-in module. Insert the 2 fitting screws (Figure 9)
7. Tighten the two screws, connect power and run test routine (see Chapter 7.4.1)

4.1.2 Removal of a Plug-in

1. Select plug-in module and disconnect power.
2. Unscrew the 2 fitting screws (Figure 9)
3. Lift module a few centimetres. **DO NOT LIFT IT OUT COMPLETELY!**
4. Locate connector and disconnect it.
5. Lift module, refit module cover if necessary and connect power.

4.1.3 Plug-in Installation WEY RAY 06

1. Select plug-in, ensure availability of compatible flash memory software (e.g. for emulations).
2. If memory needs an update, run update routine prior to installation.
3. Disconnect power. Remove plug-in cover with a thin card (at each arrow point) and gently pry upwards.
4. Remove the cover when it pops up. There are no screws, only 2 hooks.
5. Connect cable with plug-in 10way male connector on ribbon cable (visible after removing cover). Insert and press down until cover snaps in.
6. Connect power and run test routine (See Chapter 7.5)



Figure 10 – Snap in ports positions

4.1.4 Removal of a Plug-in

1. Select plug-in module and disconnect Power
2. Use a thin card to lift plug-in module a few centimetres. **DO NOT LIFT IT OUT COMPLETELY!**
3. Locate connector and disconnect it.
4. Lift out plug-in module entirely, refit plug-in cover and connect Power.

4.1.5 Plug-in Testing

Set to test mode (See Chapter 7.5.) so that the keyboard displays the identifier value of pressed keys. Plug-in keypads can be tested by pressing each key and monitoring the keyboard LCD display.

4.2 Standard Keypads

Following standard Keypads are available:

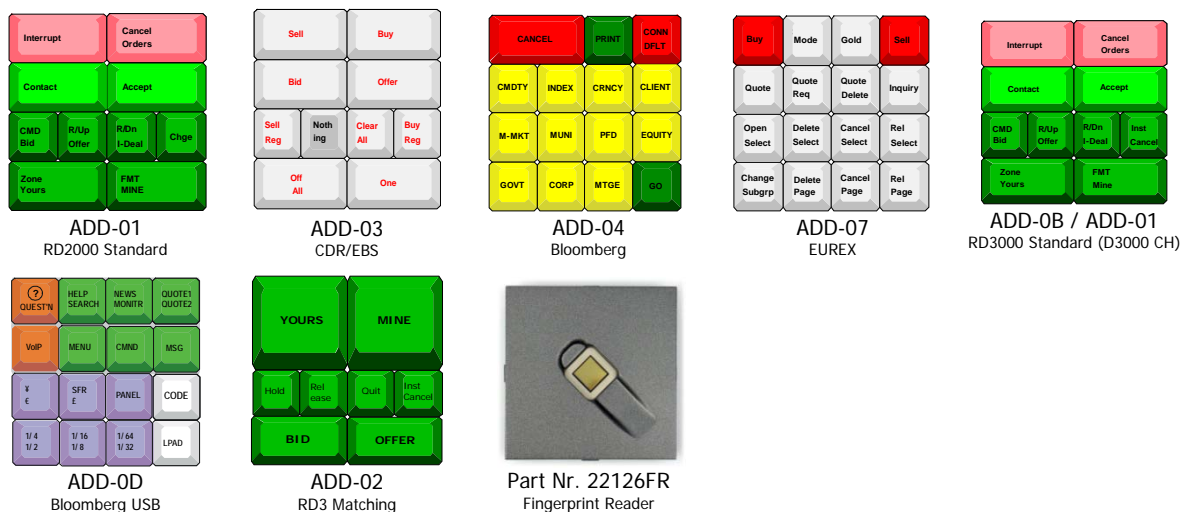


Figure 11 – Standard Keypads

4.3 Customized Keypads

Customized Keyboards can be ordered by special request (additional Cost and minimum order quantity applied). A few examples of custom keypads are shown below:

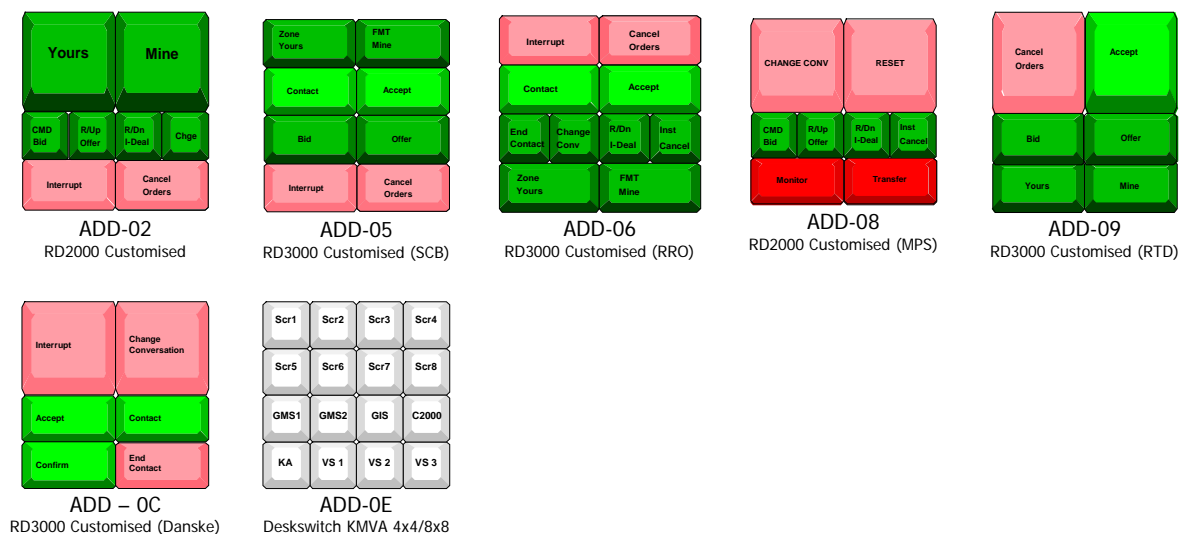


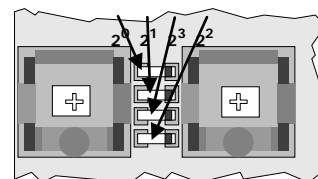
Figure 12 – Customized Keypads

4.4 Plug-in Architecture

The typical plug-in is a dumb device. Its intelligence is maintained in flash memory which can be easily modified via WEY software upgrades to include new emulations.

4.5 Keypad Coding

Each keypad has 4 soldering bridges that enable the keyboard to recognize individual keypads. An open bridge equals a logical "0". A bridge with SMD diode (cathode on right) equals logical "1".



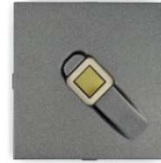
Note: Jumpers must be installed according to the table below:

ADD on ID	2 ⁰	2 ¹	2 ²	2 ³	Description
00	0	0	0	0	Cover
01	1	0	0	0	Reuters Dealing 2000 Standard (10 Keys)
02	0	1	0	0	RD2 Customised (8 Keys, BJB) / RD3 Matching
03	1	1	0	0	CDR / EBS Quotron
04	0	0	1	0	Bloomberg
05	1	0	1	0	Reuters Dealing 3000 Customised (SCB)
06	0	1	1	0	Reuters Dealing 3000 Customised (RRO)
07	1	1	1	0	EUREX
08	0	0	0	1	Reuters Dealing 2000 Customised (MPS)
09	1	0	0	1	Reuters Dealing 3000 Customised (RTD 3000)
0A	0	1	0	1	SUN (EK2000 only)
0B / 01	1	1	0	1	Reuters Dealing 3000 Standard (D3000 CH)
0C	0	0	1	1	Reuters Dealing 3000 Danske
0D	1	0	1	1	Bloomberg USB
0E	0	1	1	1	Deskswitch 4x4 / 8x8
0F	1	1	1	1	Custom

4.6 Fingerprint Reader

The following parts are required:

- Fingerprint reader Part. Nr: 22126FR
- Special USB cable Part. Nr: 22806FR
- Driver for thumb reader SW Nr: PSW22126
- Connector Box IV / V



Installation:



- Install the fingerprint reader in the keyboard.
(**Note:** The fingerprint reader is not shown in the Hardware Info.)
- Go into the Setup of the MK 06 Keyboard <CTRL> <SHIFT> <LOGOFF>.
- Go to menu <MK06 SW OPTION>.
- Press button <Video / USB ON P3a/b>. (This is port 3 SUN). Press <Enter> to confirm and reboot the keyboard by pressing <ESC><ESC>.
- Connect cable 22806FR to port 3 SUN (Mini DIN) and the PC (USB). Windows will recognize the USB HUB and the fingerprint reader in the keyboard.
- Install fingerprint reader driver (FR40).

5 Operational Guide

The main body of the keyboard follows that of a standard PC keyboard layout. Additional keys are needed for switching between workstations and video screens. The main groups of additional keys are as follows:

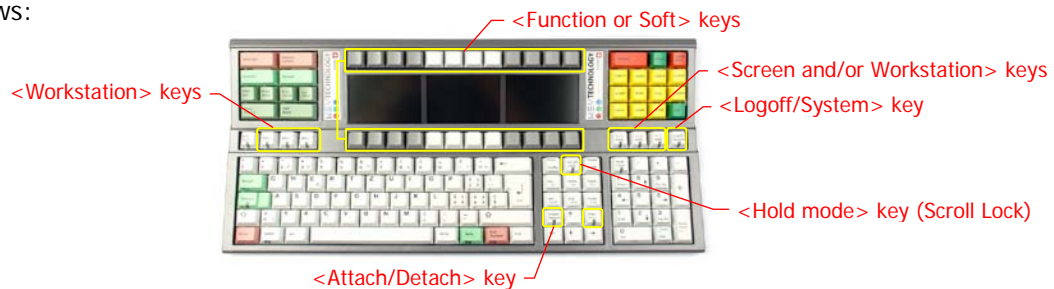


Figure 13 – System Keys

5.1 Switching between Workstations

This is the default without system configuration setup.

The keyboard can be programmed to control up to 16 workstations. WS emulations are selected by using dedicated WS keys (labelled WS1-WS6). Keys WS1-WS3 are on the left of the main keyboard, and keys for WS4-WS6 are on the right above the numeric pad. When selecting a WS, the LCD status line displays the WS-ID (WS1-WS6) plus the chosen emulation layer. To select WS7-WS16, the following hot key combinations are available:

- WS7-WS12: <SHIFT> + WS1-WS6
- WS13-WS16: <CONTROL> + WS1-WS4

5.2 Share a single workstation with two keyboards

When sharing a single WS with 2 keyboards, the master keyboard is connected to the WS and the slave keyboard is connected to the master using one of the keyboard's serial ports. The master keyboard emulates the mouse and the keyboard data to the connected WS by using the selected protocol. The slave keyboard sends the mouse and internal keyboard protocol to the master, which converts it to the WS emulation protocol. Following are various share cables, but you only need one.

- Cable between port 5 of CB1 (Connector Box 1) and port 5 of CB2 (Connector Box 2)

<u>9 D-Sub Female</u>	<u>9 D-SUB Female</u>
Pin: 2	Pin: 3
Pin: 3	Pin: 2
Pin: 5	Pin: 5
- Cable between keyboard interface of CB 1 and port 5 of CB 2

<u>15 D-Sub Female</u>	<u>9 D-Sub Female</u>
Pin: 3	Pin: 14
Pin: 5	Pin: 3
- Cable between keyboard interface of CB 1 and keyboard interface of CB2

<u>15 D-Sub Female</u>	<u>15 D-Sub Female</u>
Pin:13	Pin: 14
Pin:14	Pin: 13

5.2.1 Share port configuration

Configuration

- Share Master: PORT, SHARED WS and COM parameter
- Share Slave: SHARED WS, no PORT and no COM parameter

Limitations

Shared WSs (WS1-16) must be configured with the same WS number on both keyboards. Available are on direct ports (P1/2, P3a/b, P4/5) as well as DLINK port emulations.

Shared WS via Micro Switch System (*only WS1-WS6 are possible*)

- WS can be configured on different WS number
- All share functions available

5.3 Switching between Video Screens

This is the default without system configuration setup.

If the keyboard is configured for a Videoswitch, the WS4-WS6 keys change functionality. They become keys for video screens 1-3 respectively, and video screens 4-6 when pressed together with <Shift>. To select WS7-WS16, the following hot key combinations are available:

- WS7-WS9: <CONTROL> + WS1-WS3
- WS10-WS12: <ALT> + WS1-WS3
- WS13-WS15: <SHIFT> + <CONTROL> + WS1-WS4
- WS16: SHIFT <ALT> WS1
- SCREEN4 – 6: <ALT GR> + <SCR1 - SCR4>

5.4 Workstation Emulations

Selecting a WS emulation changes the LCD soft keys' role according to the chosen emulation. The LCD display is used to label the soft keys.



Figure 14 – Soft key labels on LCD

5.4.1 LCD

LCD colours identify each key's current function in each emulation. The upper row of LCD soft keys is labelled in the top 3 text lines of the LCD, and the lower row is labelled in the bottom 3 text lines. The rows in the middle of the LCD display "Attached to" followed by the WS-ID and the emulation name as well as messages from the connected workstation (e.g. dealing alerts). Functions and commands on the LCD are activated by pressing the LCD Soft key. The inverse displayed labels have to be pressed together with <Shift> or <Ctrl> depending on the selected source.

5.4.2 LCD Soft Keys

The LCD soft keys are multiple role keys. The LCD displays the current role of each soft key according to the selected WS emulation or the chosen setup mode. Soft keys represent the following services:

- Off, • Red, • Yellow, • Green

LCD soft keys are displayed in the original colour of each emulation, e.g. green for Reuters Dealing Conversation keys, red for Reuters Dealing trade keys, and yellow for Bloomberg keys.

5.4.3 Plug-in Modules

Plug-in modules (see Chapter 4) can be used in conjunction with LCD soft keys. After selecting the appropriate workstation emulation, the keypads offer faster access with large labelled and colour coded keys. This is comparable to the functionality of dedicated keyboards. With the Force Attach option you can switch to the desired emulation by pressing the respective key.

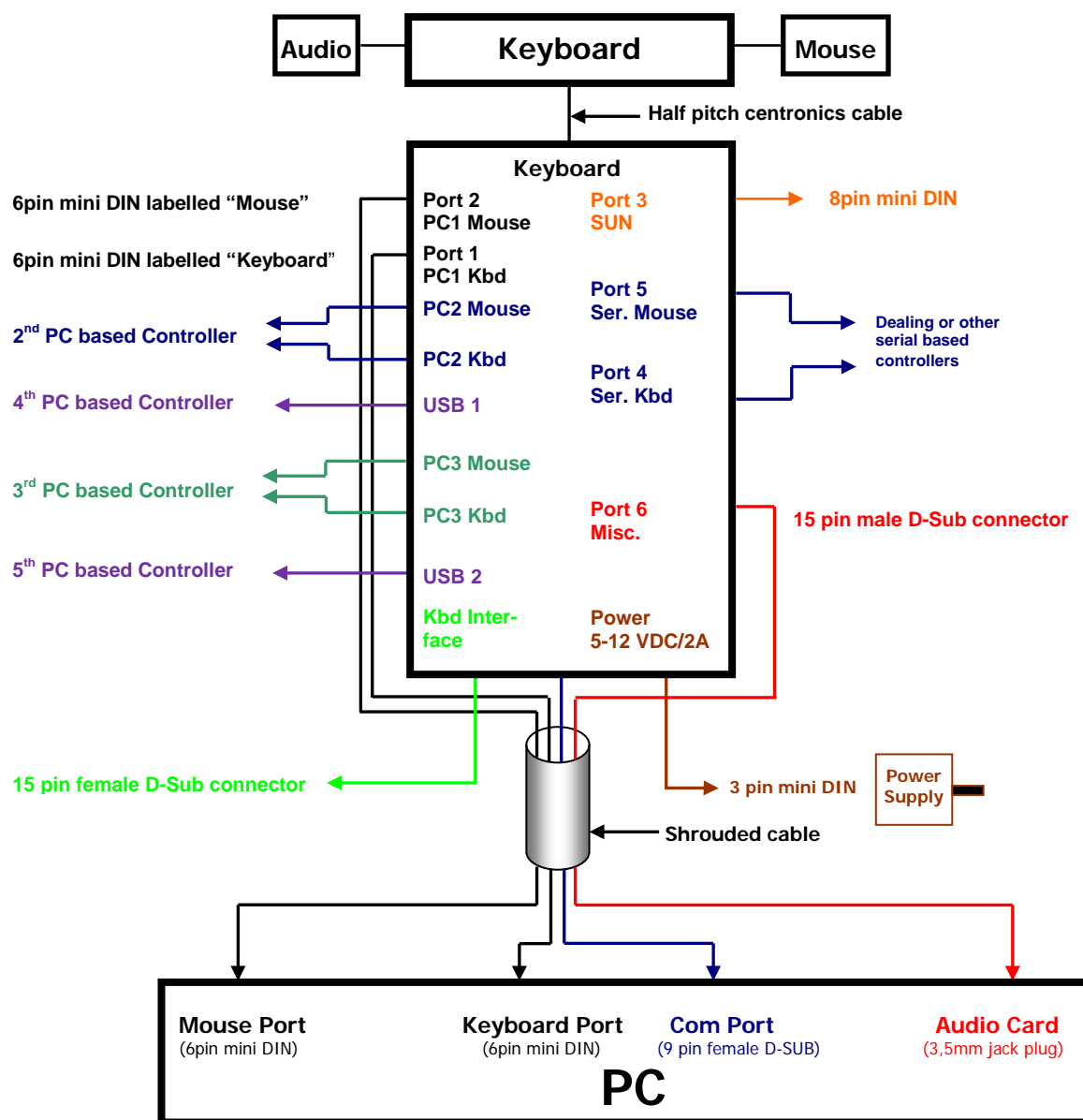
5.5 Additional Key Functions

Some standard keys can have multiple roles during WS emulations:

Standard key	D2000/D3000 Function	PC Function	SUN Function
Windows left	Abbr	WIN left	Diamond
Windows right	Deal	WIN Right	Diamond

The functions engraved on the front of each key, especially those on the numeric keypad, correspond to functions in the Bloomberg emulation. Additional keycaps for D2000/3000 are available in other colours.

6 Installation



Note: Connections may vary depending on the type of connector box.

7 Setup and Testing

This section describes the keyboard setup and configuration as well as an update of internal flash memory with the latest software. It closes with a troubleshooting section.

7.1 System Setup and Test Menu

To enter the keyboard setup mode, press <CONTROL> + <ALT> + <Logoff System> simultaneously. During the setup mode the LCD changes to red. <ESC> in the main menu provokes a SOFTWARE reset and activates new settings. <ESC> is also used to switch from the current to the previous menu level. Use the arrow keys to navigate through the menu. Press enter to save a selection. Press <Shift> + to clear a selection.

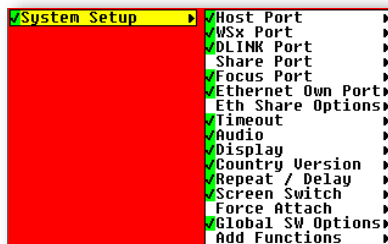
Available Functions are shown below:

Example	Function selected
✓Example	Function stored
*	Function already used

7.2 Main System Setup Menu



Submenus are selected with the <arrow keys> or with the mouse. To confirm a selection, press the left mouse key or <Enter>. To delete a selection, press the middle mouse key or <Shift> + <Enter>. To go back one step, press the right mouse key or <Esc>. To leave the main menu and download settings, press the right mouse key or <Esc> until the keyboard reboots.



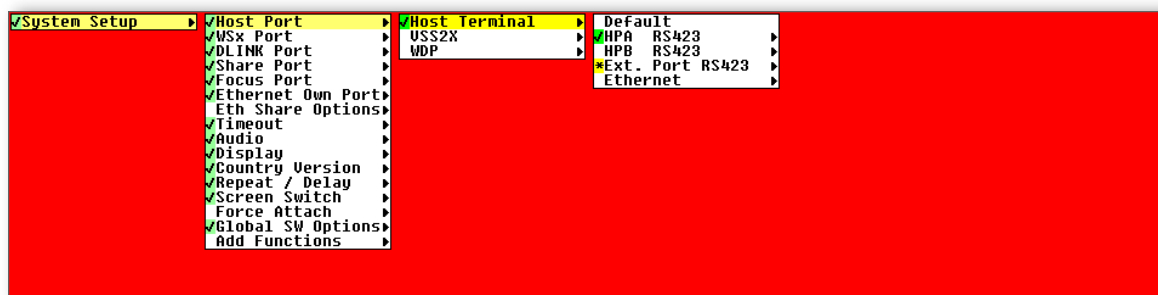
7.2.1 System Setup

This menu is used to set up the following emulations:

Emulations	Description
Host Terminal	Supports the terminal protocol using Host Port A for configuration with the keyboard GUI
VSS2X	Supports MK06/WEY RAY 06 with an VSS2X Videoswitch using Host Port A
WDP	Supports MK06/WEY RAY 06 with an WEY Distribution Platform using Ethernet Port

7.2.1.1 Host Port - Host Terminal

Communications settings for the host port (to communicate with the MK configuration tool).

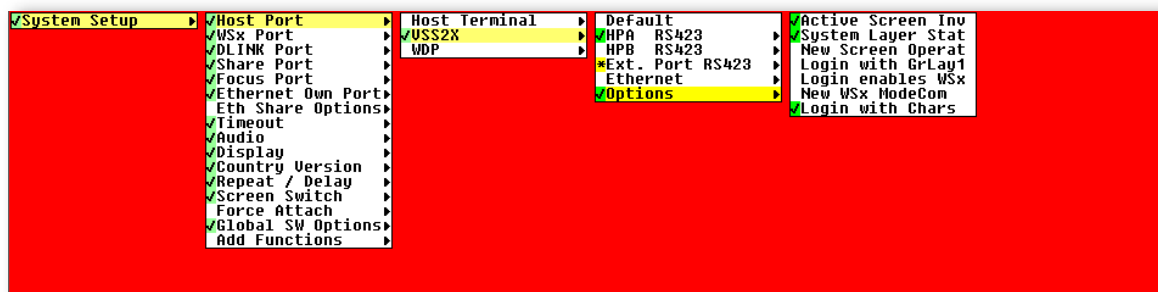


The following settings are controlled per port:

- Default Resets settings to default values (1, 8, N, 1 Baud: 115200, Host Port A)
- Baud rate 1200 to 115200
- Data bits 7 or 8
- Stop bits 1, 1.5 and 2
- Parity Even, odd or no
- Ethernet future function

7.2.1.2 Host Port - VSS2X

Communications settings for the VSS2X (Videoswitch) port.



The following VSS2X options are available:

- Activ Screen Inv Sets display of active screen to inverse (Videoswitch)
- System Layer Stat Status view of sources in system layer using different colours (Videoswitch)
- New Screen Operate Changes the functionality of Scr1 key (old = switching to user mode / new = remains in workstation).
- Login With GrLay Additional login mask.
- Login enables Wsx At system login the workstation are released.
- New Wsx ModeCom sends different WS Command 0xD0 0x1X (0x10 = WS1 to 0x1f = WS16) and disables old command 0xD0 0xF6 (Enabling 16 WS's).
- Login with Chars At Login characters are displayed with stars.

7.2.1.3 Host Port - WDP

Communications settings for WEY Distribution Platform (WDP).

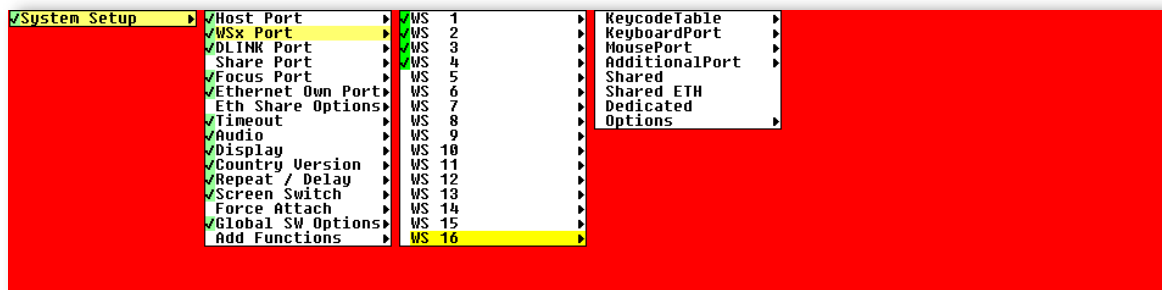


The following options for WDP are available

- Login enables WSx At system login the workstation are released.
- Login with GrLay1 Additional login mask.
- Show LoginName Displays the login name in the system layer, on the third display.
- Enable Statistic View Ethernet statistic by pressing SHIFT_L + "SHIFT_R" + "ENTER (Num-Block).
- Force ETH Port Using the Ethernet port (Ethernet PHY) regardless of keyboard hardware revision.

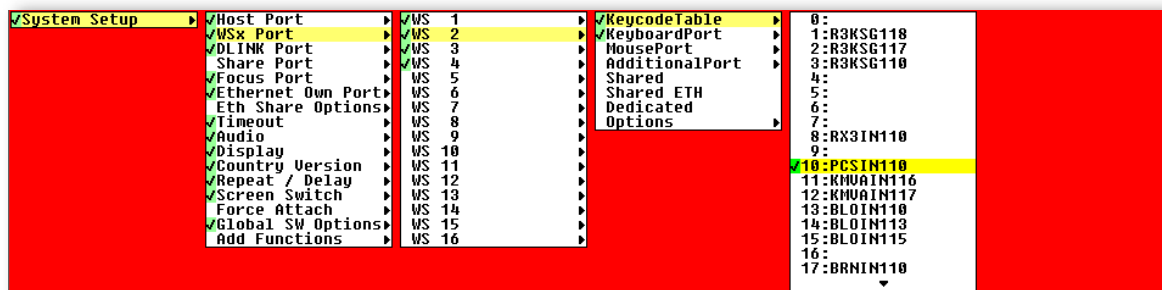
7.2.2 Configuration of Workstation Ports

This menu configures emulations for WS1-WS16. In most emulations WS1-WS6 are selected by a single click. In VSS2X/VSS2Xm mode, only WS1-WS3 can be chosen with a single click. If no additional keypads are installed with WS Screen buttons, select WS4-WS6 by using <Shift> / WS7-WS9 by using <Ctrl> / WS10-WS12 by using <Alt> / WS13 -WS15 by using <Shift>+<Ctrl> / WS16 by using <Shift>+<Alt> in conjunction with the WS1 key. Videoswitch Screen Keys 4-6 can be chosen by using <Alt Gr> in conjunction with the Screen 1-3 keys. If no Videoswitch configuration is made, select WS7-WS12 by using <Shift> / WS13-WS16 by using <Ctrl> in conjunction with the WS1-WS6 keys.



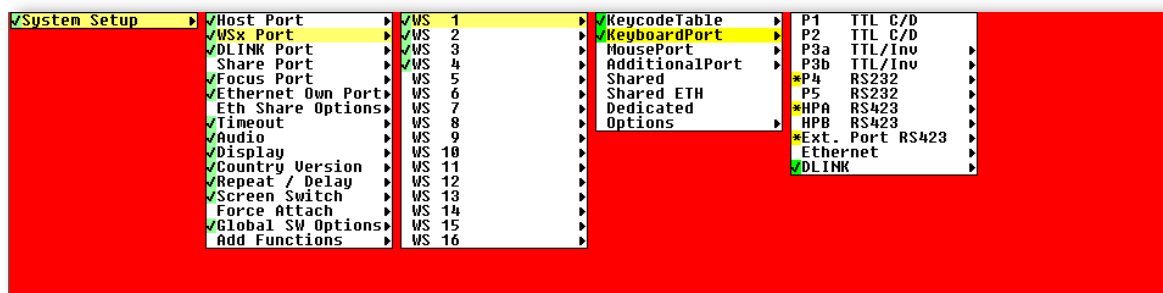
7.2.2.1 WS Port – Keycode Table

Select Keycode Table for desired WS. "0" is reserved for Country Version ASCII Table.



7.2.2.2 WS Port - Keyboard Port

Select Keyboard Port communication parameters.

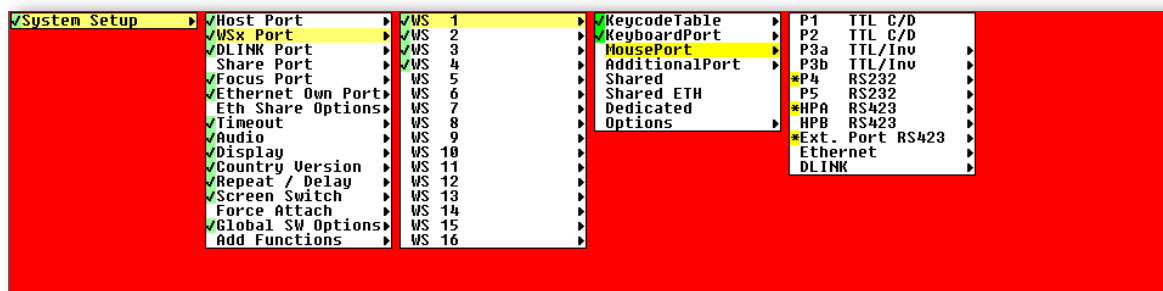


Currently supported settings are as follows:

- P1/P2 TTL C/D IBM synchronous protocol for PC compatible emulations and DEC Alpha
- P3a/P3b TTL/INV For SUN direct
- P4/P5 RS232 DEC and all Reuters Dealing s or SUN USB with external adapter
- HPA/HPB RS423 For Videoswitch and all Reuters Dealing emulations
- Ext. Port RS423 Currently no function
- Ethernet Currently no function
- DLINK For all PC compatible emulations with Connector Box II, III, IV and for all compatible emulations with Connector Box IV, V and VI

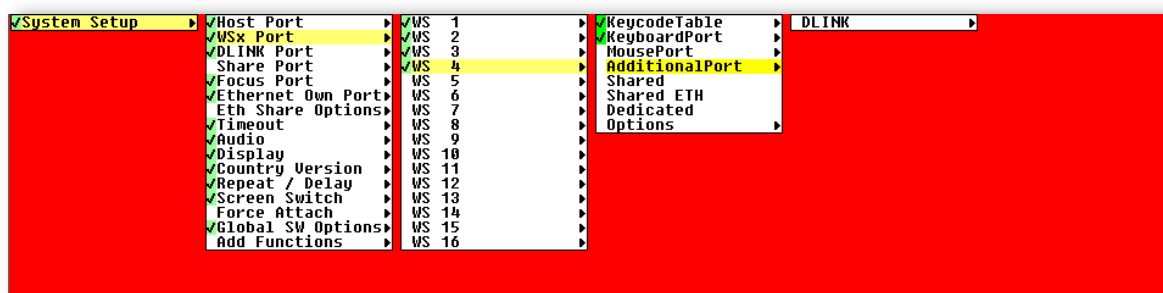
7.2.2.3 WS Port - Mouse Port

Sets mouse communication parameters.



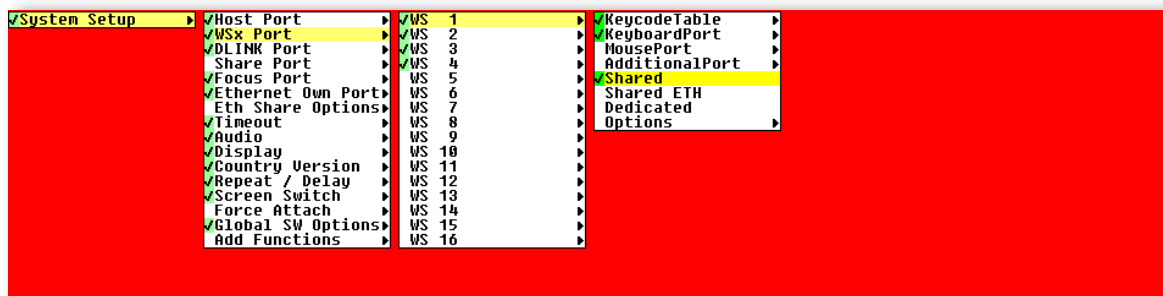
7.2.2.4 WS Port - Additional Port

Currently no function.



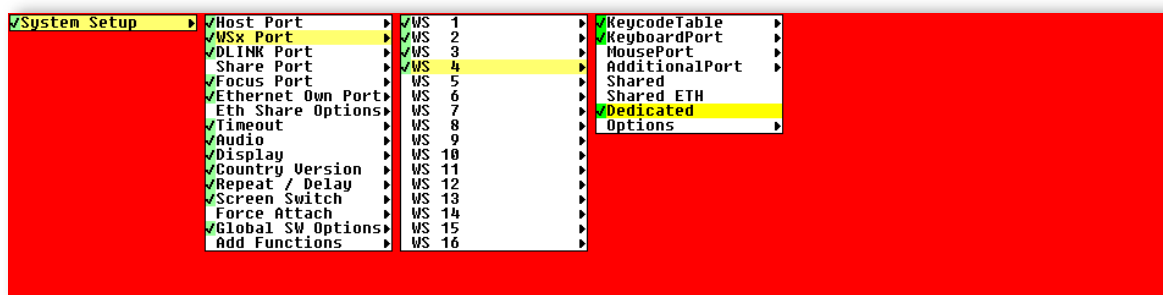
7.2.2.5 WS Port - Shared

For ports with 2 keyboards (master, slave).



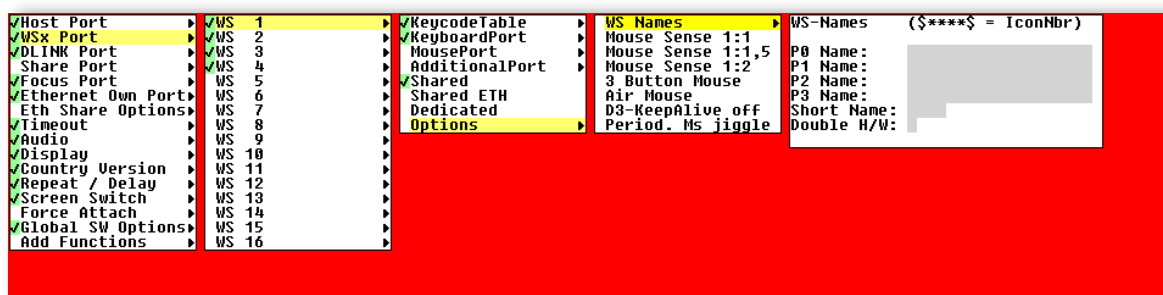
7.2.2.6 WS Port - Dedicated

Special application to use workstation - via SI in VSS2X protocol.



7.2.2.7 WS Port - Options

Set workstation name and mouse sensitivity.

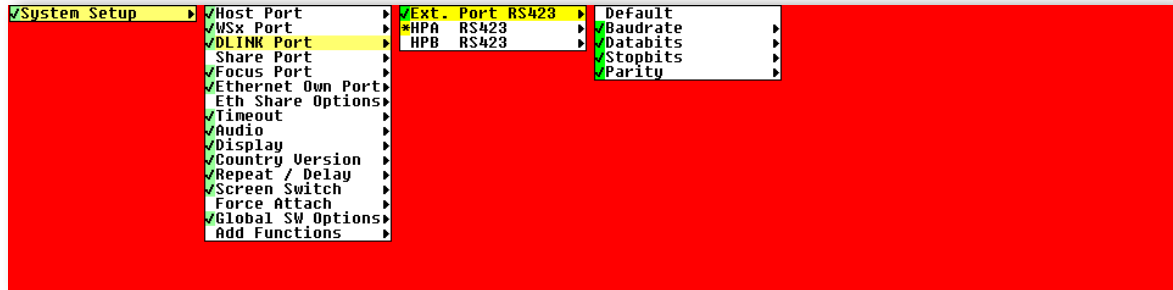


- P0-P3 Name: Name for Page 0 - to Page 4 WS names can be defined per layer. Max. 32 characters respectively 16 characters when double size is active.
- Short Name Short Name of WS (4 characters) for incoming alerts
- Double H/W Characters in display change to double size when <1> is selected
- Mouse Sense 1:1 Mouse movements direct .
- Mouse Sense 1:1,5 The speed of mouse movements multiplied by 1.5
- Mouse Sense 1:2 The speed of mouse movements multiplied by 2 (double)
- 3 Button Mouse Inits Keyboard Mouse Input to 3 button mouse default
- Air Mouse Inits Keyboard Mouse Input to LOGITECH MX Cordless Air Mouse
- D3-KeepAlive off Inits keyboard to suppress D3-KeepAlive
- Period. Ms jiggle Sends periodic mouse data to port (USB Focus)

7.2.3 DLINK Port

The DLINK Port can be configured to 3 different serial ports. The detected DLINK MODULES are displayed during power up in layer "Serial Model Hardware/Config Info" with the following message: 'DI-M: xxx xxx xxx'.

DLINK Ports are used for USB Ports and other DLINK devices.



Communications settings for DLINK ports. The following settings are controlled per port:

- Default Resets settings to default values
- Baud rate 1200 to 115200 and Auto
- Data bits 7 or 8
- Stop bits 1, 1.5 and 2
- Parity Even, odd or no

7.2.4 Share Port

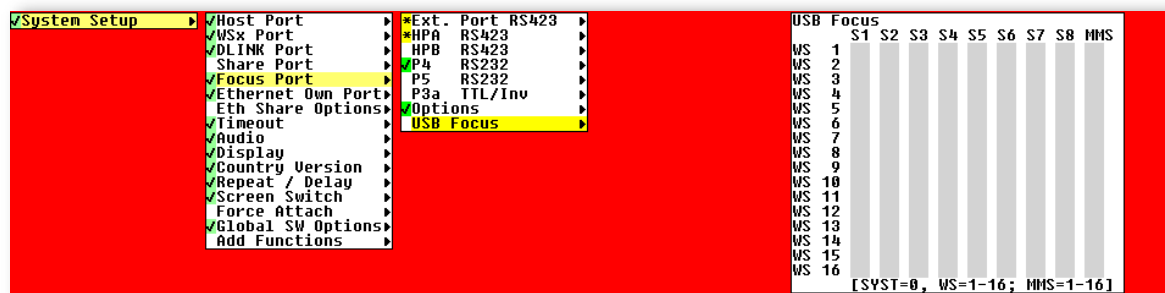
One serial port can be used for sharing 2 keyboards with one or more WSs. The default share port is P5. Use host port B, if D2000/3000 is configured (e.g. ports 4 and 5 are already in use). The master keyboard is connected to the shared WS, but it can also be the slave for another WS. If the WS is used by one of the 2 keyboards, it is locked for the other one (flashing workstation LED).



- Overtake Workstation LED is blinking:
 - 1st key press ⇒ Message on Display: "Press again for overtake"
 - 2nd key press ⇒ Overtakes selected WS within 10, 5 or 2 seconds.
 - TimeOut ⇒ Disconnects when neither keyboard nor mouse are in use.
- Fast blinking WS LED on keyboard: Workstation access impossible
 Slow blinking WS LED on keyboard: Workstation access possible

7.2.5 Focus Port

To change keyboard legends in the LCD for a WS, you can configure a serial port with “NT Focus Monitor” or USB Focus Software.



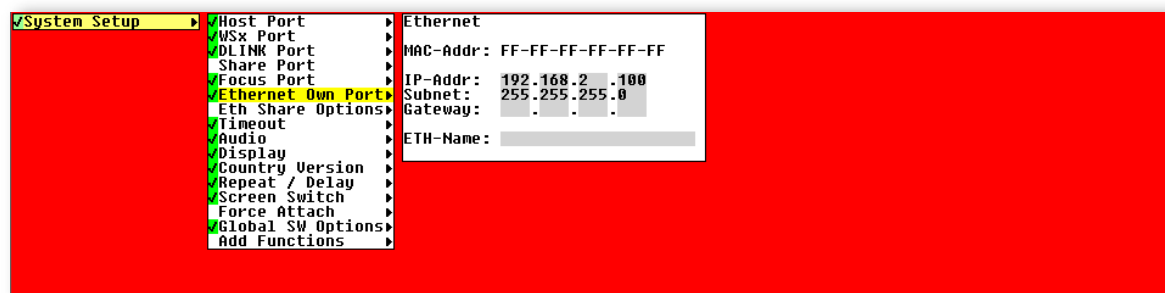
- Options ⇒
 - Transparent Mode Sends serial data simultaneously over Focus Port by pressing defined character.
 - No VS8x8 Support Enable / disable Deskswitch 8x8 ADD ON for correct message
- USB Focus ⇒
 - WS1-WS16 definable group of slaves (S1-8). Entries in this line enables USB Focus protocol via related WSx USB Port. Possible inputs: System = 0, WS = 1-16
 - S1-S8 Group entries of related WSx
 - MMS Destination WSx of mouse data. this function is activated by press and hold middle mouse key

Use the following keyboard commands to configure the listed functions:

- TAB Next row
- Backspace Clear parameter
- 0 to 16 Enter a number in cross point table
- Enter Save parameters
- Arrow left/up/right/down one step left/up/right/down

7.2.6 Ethernet Own Port

The Ethernet settings must be made so that a WEY MK06 Keyboard can be polled and integrated into the WDP System.



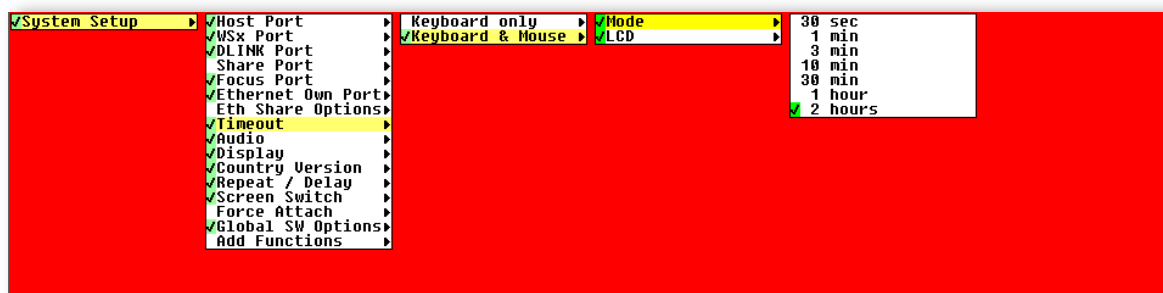
- MAC-Addr: MAC address (cannot be changed)
- IP-Addr: IP address (IPv4)
- Subnet: Subnet address (IPv4)
- Gateway: Gateway address (IPv4)
- ETH-Name: Ethernet name

7.2.7 Eth Share Options

Not available (future function)

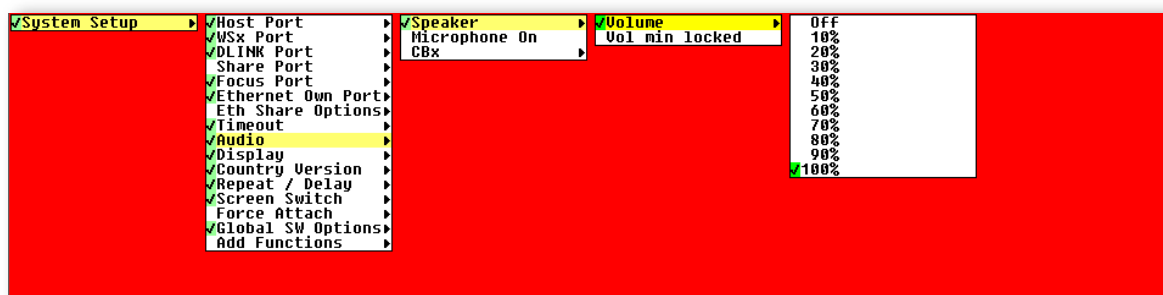
7.2.8 Timeout

Timeout can be applied to <Keyboard only> or <Keyboard + Mouse>. It can be set to one of 7 time intervals from 30 seconds to 2 hours. Timeout options are only available in <Single WS-MODE> or <HOST TERM MODE>. Timeout on <Keyboard only> or <Keyboard + Mouse> switches off the selected emulation and returns to default mode. In conjunction with LCD, timeout switches off display in order to reduce power consumption.



7.2.9 Audio

This menu is for the audio setup.



- Speaker ⇒ Volume Loudness set between 10%-100% or off to reduce power consumption.
- Speaker ⇒ Vol min locked Minimum volume is limited to 50% and cannot be turned off.
- Microphone On Microphone line on or off.
- CBx ⇒ Stereo Selects MONO or STEREO (Connector Box V/VI only).
- CBx ⇒ Lines Keyboard IF Audio lines to Keyboard Interface Connector (Connector Box V/VI only)
- CBx ⇒ 2.CBx Selects MONO or STEREO (Connector Box V/VI only), Audio Lines to Keyboard Interface Connector (Connector Box V/VI only) for second CBx

7.2.10 Display

This menu is for the display viewing angle setup



- Viewing Angle Viewing angles from 1 to 14 are available to setup the display.

7.2.11 Country Version

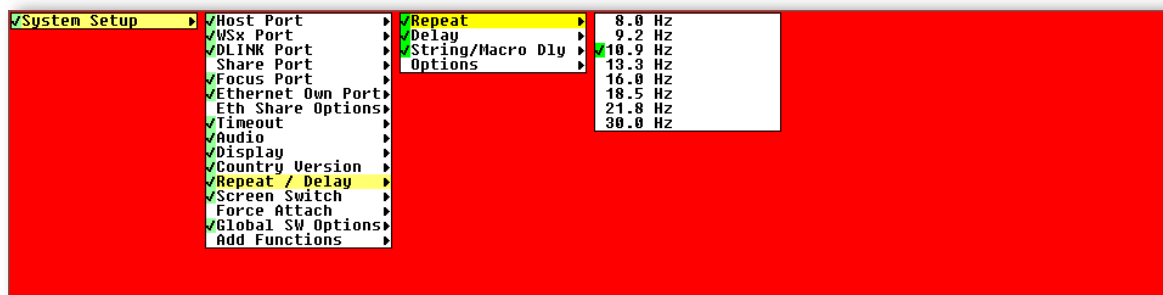
The following keyboard country version and appropriate character code emulations may be selected.



- Swiss German / US / German / UK / Belgian / Italian / Spanish / Danish / French/ Dutch/ Norwegian/ Portuguese/ Swedish

7.2.12 Repeat / Delay

Used to set delay / repeat times for key codes when pressing a key.

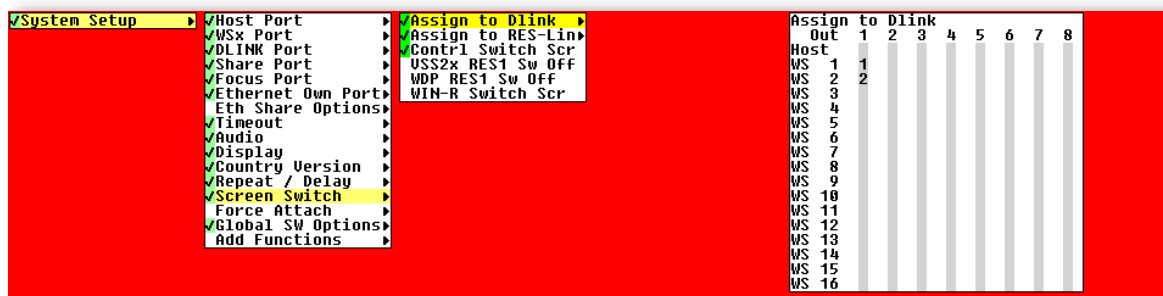


- Repeat 8Hz – 30Hz
 - Delay 250ms – 1000ms
 - String / Macro Dly String/Macro delay between each code output 10ms - 100ms!
- Note:** Only used for dealing and serial keyboard interfaces. Not for PC!
- Options =>Macro Brk=1s Dly Macro delay between each code output is 1 second!



7.2.13 Screen Switch - Assign to DLINK

Configuration of Videoswitch on DLINK Port.

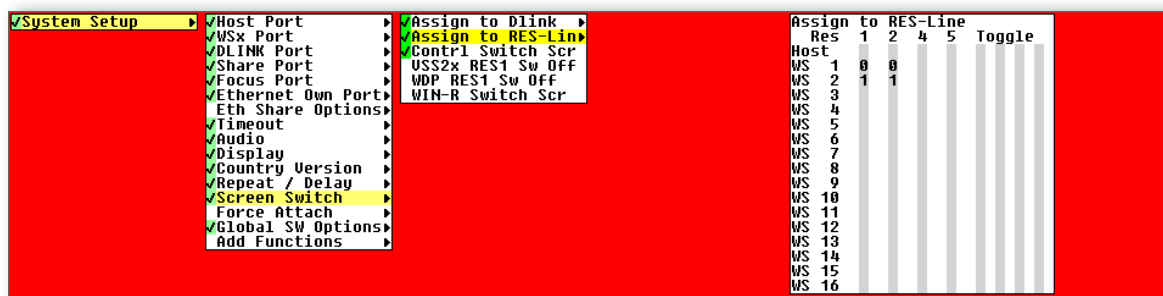


Use the following keyboard commands to configure the listed functions:

- TAB Next row
- Backspace Clear parameter
- 1-8 Enter a number in cross point table
- Enter Save parameters
- Arrow left one step left
- Arrow right one step right
- Arrow up one step up
- Arrow down one step down

7.2.14 Screen Switch - Assign to RES LINE

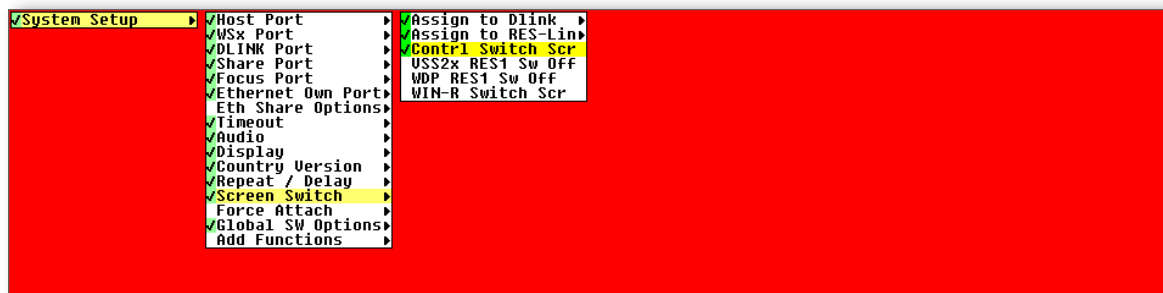
Menu for RES Lines actions. There are 4 RES lines on Connector Box Port 6 (MISC port). These lines can drive Videoswitches or other devices up to a combined total of 100mA.



Use the following keyboard commands to configure the listed functions:

- TAB Next row
- Backspace Clear parameter
- 0 or 1 Enter a number in cross point table
- Enter Save parameters
- Arrow left one step left
- Arrow right one step right
- Arrow up one step up
- Arrow down one step down
- 0 or 1 Toggle function for RES Lines with system key (RES 1-2-4-5)

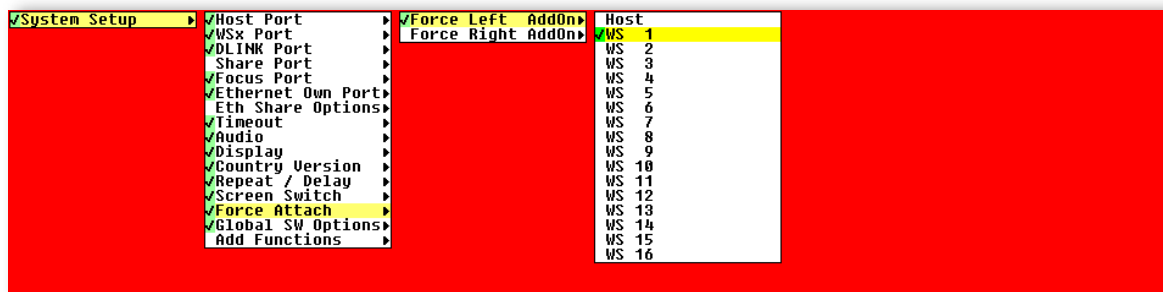
7.2.14.1 Screen Switch - Control



- Control Switch Scr Enables toggle function for <Ctrl> key
- VSS2X RES1 Sw Off When the Keyboard is in VSS2x mode, ResLine 1 will be disabled (off)
- WDP RES1 Sw Off When the Keyboard is in WDP mode, ResLine 1 will be disabled (off)
- WIN-R Switch Scr Enables toggle function for <Windows Right> key

7.2.15 Force Attach

Force Attach is used to automatically send commands by pressing the left or right AddOn. Selection can be made for WS1-WS16 and Host Port (Videoswitch).



- Force Left AddOn Select Force attach with left AddOn WS1-WS16 or host
- Force Right AddOn Select Force attach with right AddOn WS1-WS16 or host

7.2.16 Global SW Options

Menu for special configuration options.



WS Options ⇒

- | | |
|----------------------------|--|
| • USB WSx Switching WS1-16 | Enables workstation switching by moving mouse over screen border |
| • MS Switch Conf En | Enables workstation mouse switching by special configuration |
| • MsSwitchConf Sel | Enables 8 different configuration for mouse switch software |
| • MsSwitchAlert Sel | Enables 8 different alert (selected alert are send out at switching) |
| • WSx sel by MMouse | Enables workstation switching by pressing middle mouse button |
| • WS Switch disable | Disable workstation switching between main and workstation layer |
| • KeyMacros disable | Disable key macros |

Demo Options ⇒

- | | |
|-----------------------|--|
| • Video / USB on P3ab | Enables video / USB over Port 3 (SUN) |
| • Demo Info Scroll | Enables demo to scroll layer of LCD screen |
| • Demo RFID | Enables RFID demo |

System Options ⇒

- | | |
|---------------------|---|
| • Disable Setup Sel | Will disable Setup-Access by pressing <Ctrl> & <Alt> & <Logoff> |
|---------------------|---|



CAUTION: Can only be enabled again by means of the MK-Tool!

7.2.17 Add Functions

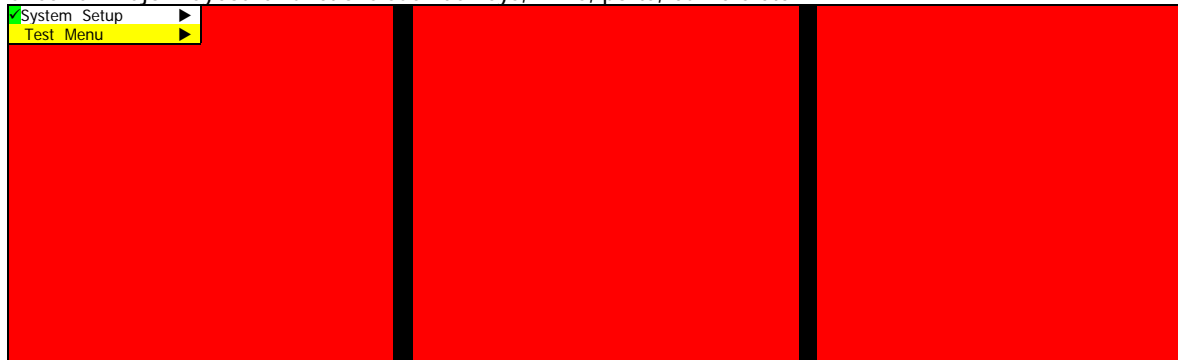
Menu to save and load a keyboard set up to/from the Connector Box.



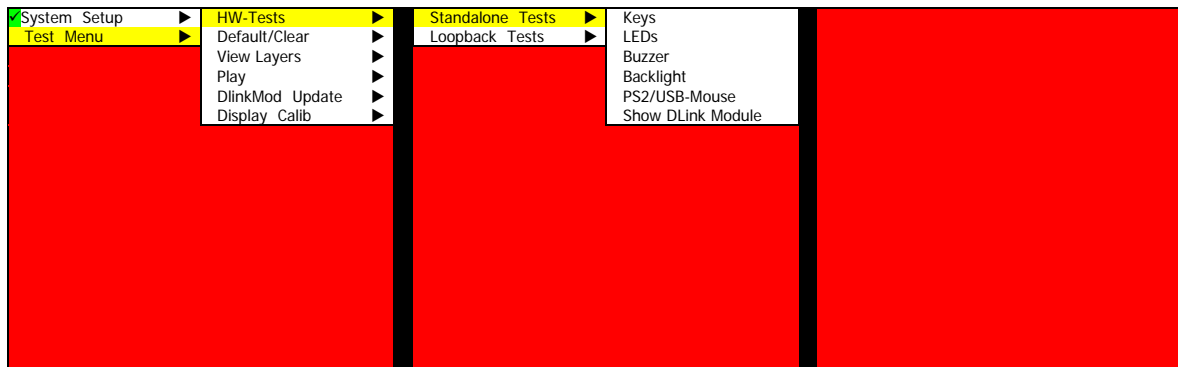
- | | |
|-------------------|--|
| • Save / Load CBx | Save and load keyboard setup to / from Connector Box |
|-------------------|--|

7.3 Test Menu

Check all major keyboard functions such as keys, LEDs, ports, buzzers etc.

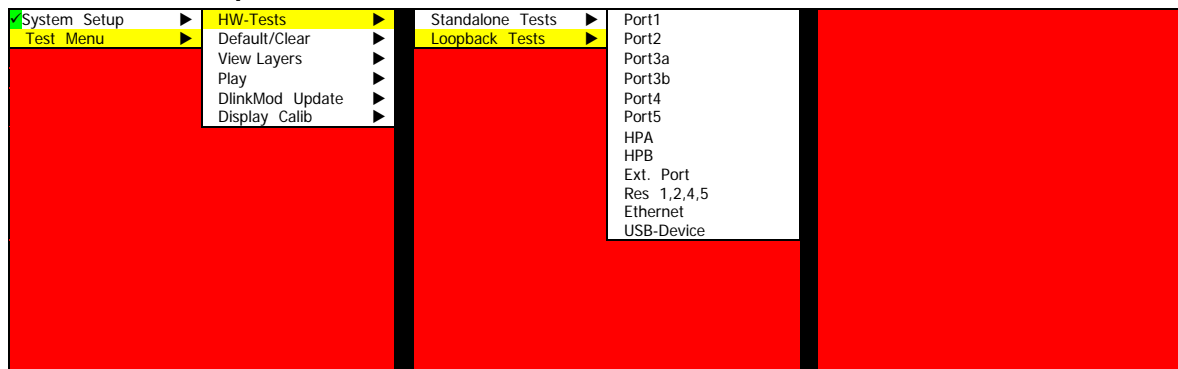



7.3.1 HW - Test / Standalone Tests



- Keys
Enables testing individual keys. Pressing a key displays internal key codes.
- LEDs
Tests all LEDs (green, red and orange) on the main keyboard
- Buzzer
Tests the buzzer with a cycle of sounds at different frequencies
- Backlight
Tests the backlight function and brightness. The test starts with backlight off, progresses through all 11 brightness increments and finishes with the LCD set to the default backlight level.
- PS2/USB-Mouse
Tests mouse and shows data generated by moving and clicking mouse
- Show DLink Module
Shows all related firmware versions from DLink modules.

7.3.2 HW - Tests / Loopback Test



- 

• Port 1 and Port 2

Test sends 250 data bytes via Port1 respectively Port2. PS2 Host Simulator returns received data back to the keyboard via the same port.
Test requires IBM Host Simulator
- Port 3A

Test sends 250 data bytes via TXD Port3a and receives data back via RXD Port 3A.
Test requires shorted lines in 8pin connector.
- Port 3B

Test sends 250 data bytes via TXD Port3B and receives data back via RXD Port 3B.
Test requires shorted lines in 8pin connector.
- Port 4 and 5

Test sends 250 data bytes via TXD Port4/5 and receives data back via RXD Port4/5.
Test requires link between Pin 2 and 3 in 9pin connector.
- HPA (Hostport A)

Test sends 250 data bytes via TXD HPA and receives data back via RXD HPA.
Test requires link between Pin 10 and 11 in 15pin connector.
- HPB (Hostport B)

Test sends 250 data bytes via TXD HPB and receives data back via RXD HPB.
Test requires link between Pin 13 and 14 in 15pin connector.
- Ext. Port (Extended Port)

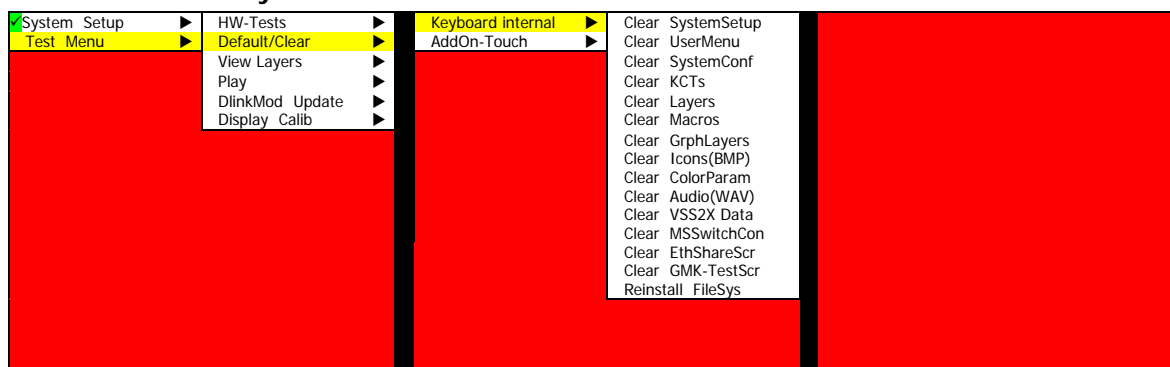
Test sends 250 data bytes via TXD and receives data back via RXD.
Test requires link between Pin 5 and 14 in 15pin Misc. Port connector.
- RES1/2/4/5

Tests all four RES Lines. The test starts with RES 1 and ends with RES 5.
- Ethernet

Currently not supported.
- USB

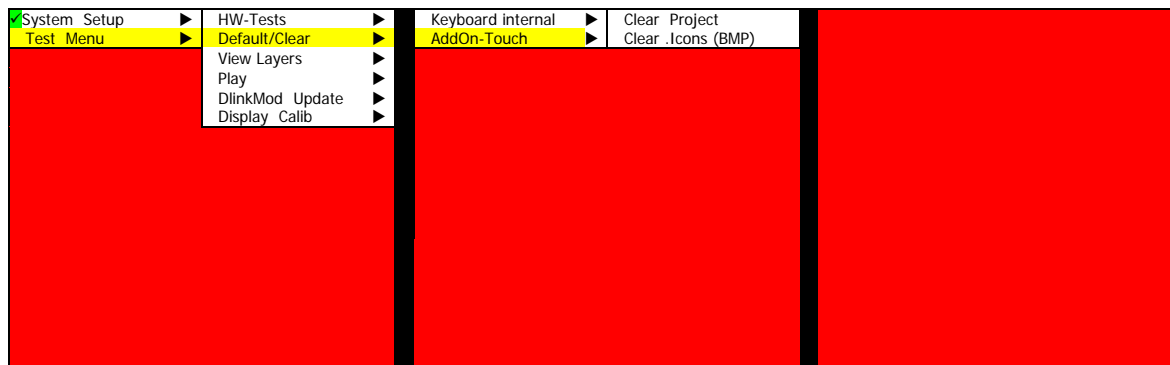
Currently not supported.

7.3.3 Default/Clear / Keyboard internal



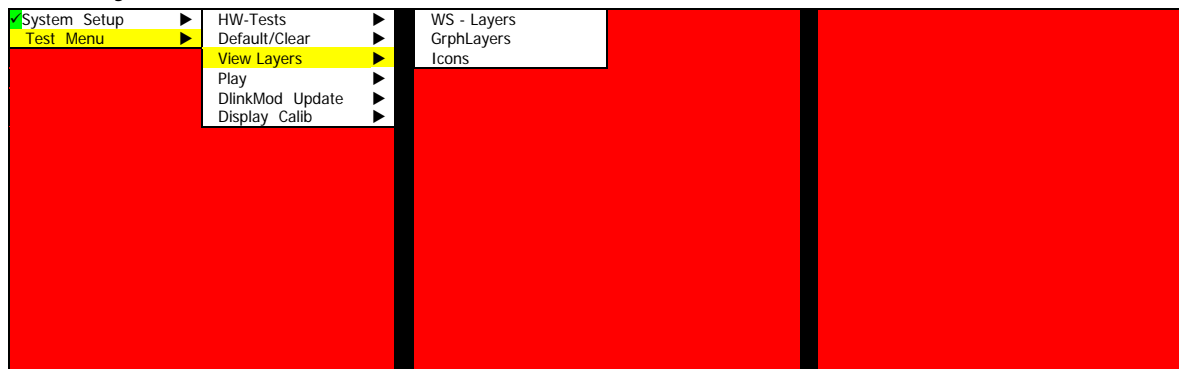
- Clear SystemSetup Deletes all internal configurations and sets to default values.
- Clear UserMenu Deletes all user configurations and sets to default values.
- Clear SystemConf Deletes System configurations and sets to default values.
- Clear KCTs Deletes all keycode tables.
- Clear Layers Deletes all layers.
- Clear Macros Deletes all macros.
- Clear GrphLayers Deletes graphical layer.
- Clear Icons (BMP) Deletes all icons and sets ICON 0-63 to default values.
- Clear ColorParam Deletes all color parameters and sets to default values.
- Clear Audio (WAV) Deletes all audio files.
- Clear VSS2X Data Deletes all videoswitch dates (EMU, Alert and Message)
- Clear MSSwitchCON Deletes all Mouse Switch configurations
- Clear EthShareScr Deletes all Ethernet share scripts
- Clear GMK-TestScr Deletes all GMK test scripts
- Reinstall FileSys Generates new file system. **Attention:** All data will be overwritten and lost!

7.3.4 Default/Clear / AddOn-Touch



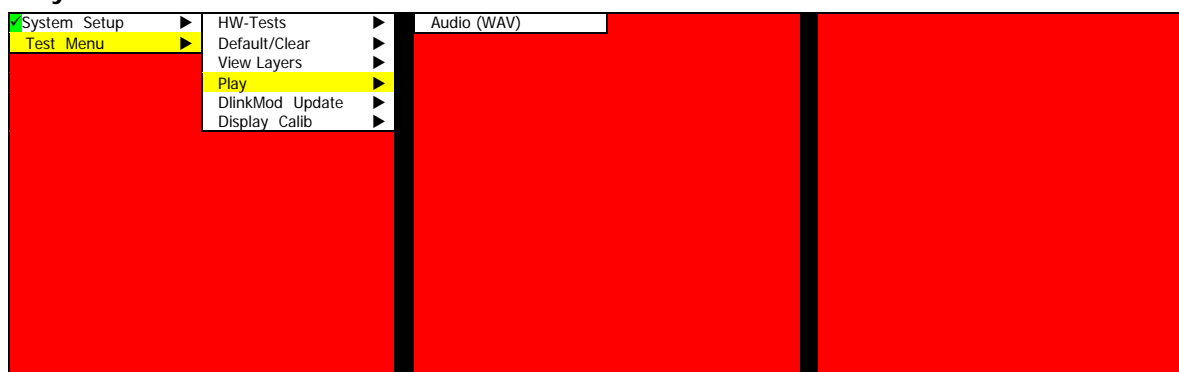
- Clear SystemSetup Deletes all internal configurations and sets to default values.
- Clear UserMenu Deletes all user configurations and sets to default values.

7.3.5 View Layers



- WS - Layers Displays workstation overview and all stored layers. Select layers and pages using cursor keys: up and down for page 0-3, left and right for layer0-65.
- GrphLayers Displays Graphic Page 1-4
- Icons (BMP) Displays soft key icon 0-255, (Bitmap)

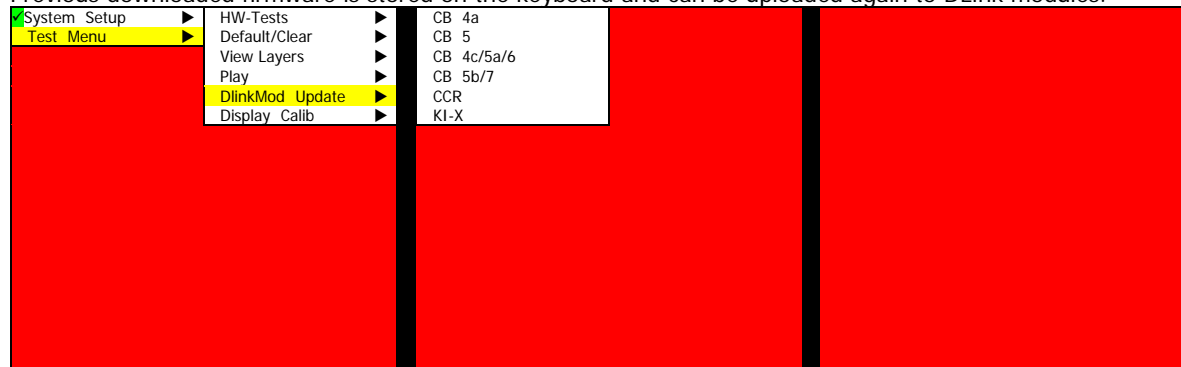
7.3.6 Play



- Play Plays Audio file in WAV Format

7.3.7 DlinkMod Update

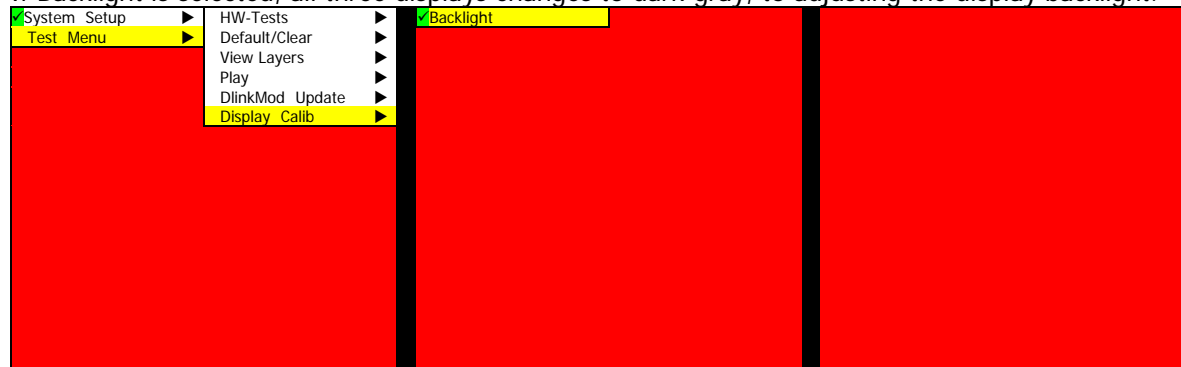
Previous downloaded firmware is stored on the keyboard and can be uploaded again to DLink modules.



- CB 4a Upload connector box firmware from keyboard to Connector Box 4a
- CB 5 Upload connector box firmware from keyboard to Connector Box 5
- CB 4c/5a/6a Upload connector box firmware from keyboard to Connector Box 4c/5a/6a
- CB 5b/7 Upload connector box firmware from keyboard to Connector Box 5b/7
- CCR Upload card reader firmware from keyboard to card reader (CB5R_PK1)
- KI-X Upload keyboard interface firmware from keyboard to keyboard interface

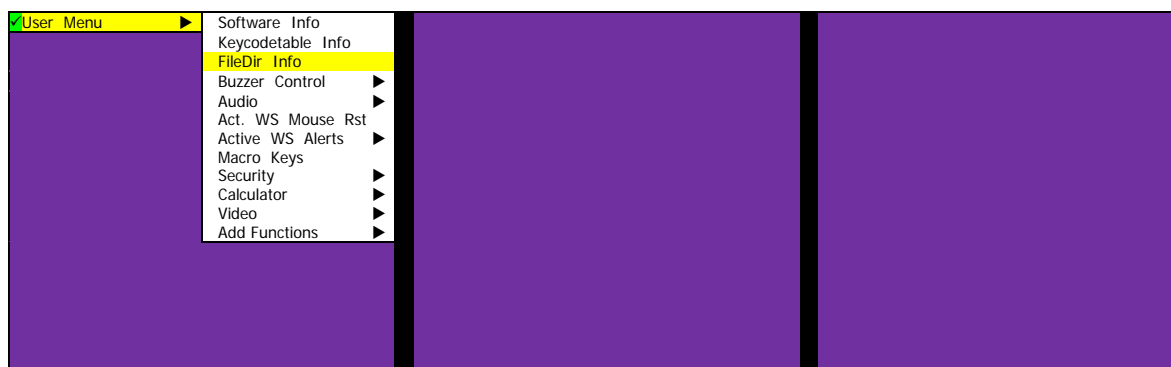
7.3.8 Display Calib

If Backlight is selected, all three displays changes to dark-gray, to adjusting the display backlight.

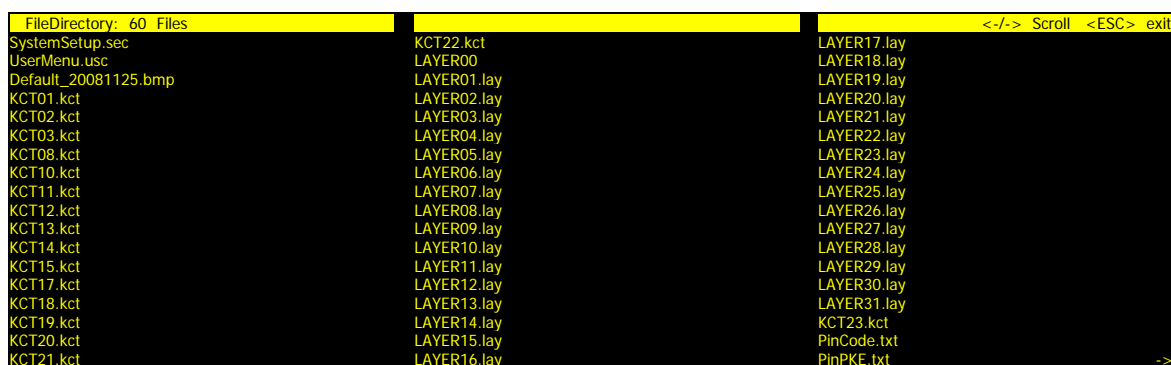


- Backlight The backlight of each of the three displays can be adjusted to the correct value. There are twenty-five values available per display. Select display and value using cursor keys: up and down for display, left and right for value 0-25.

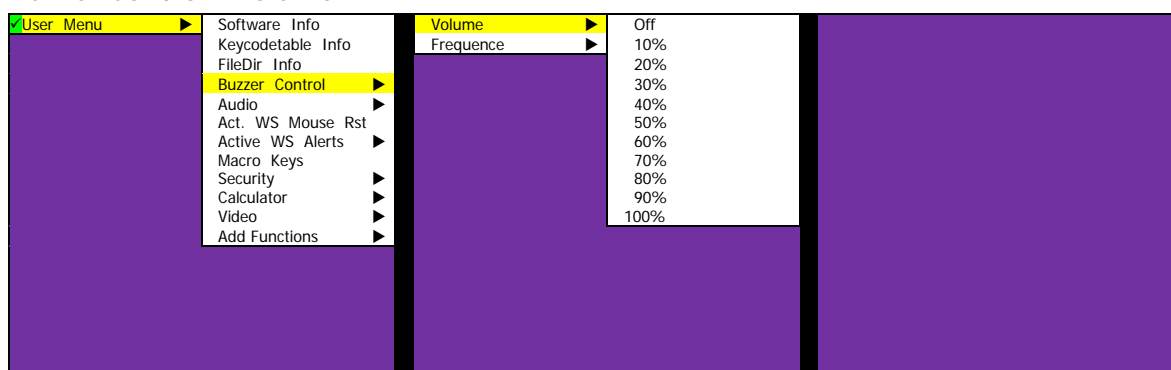
7.4.3 FileDir Info



- FileDir Info Press FileDir Info to show all stored files and their positions.

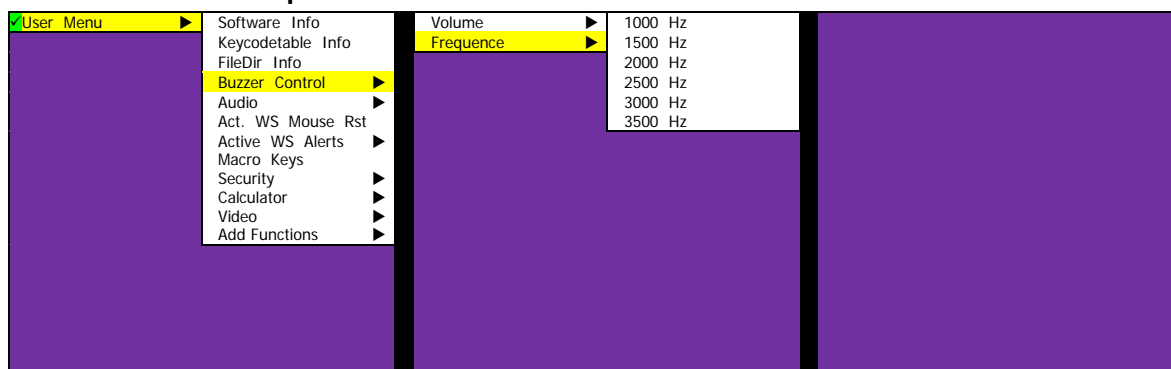


7.4.4 Buzzer Control - Volume



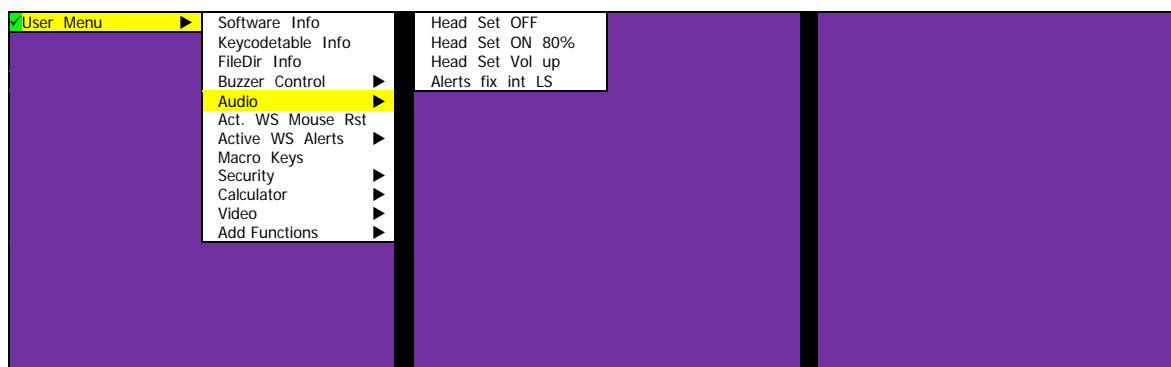
- Volume Changes the volume of the internal buzzer. Available options are Off / 10-100%. Each step generates a beep at the selected volume and pitch.

7.4.5 Buzzer Control - Frequency



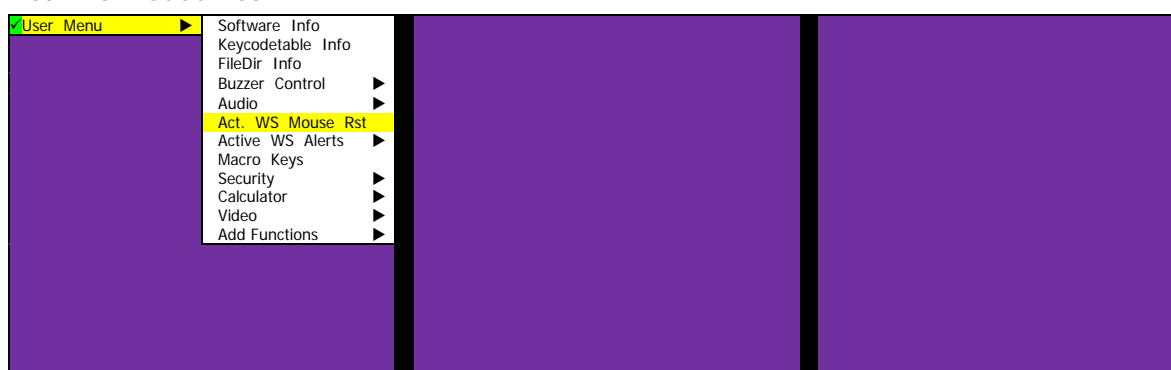
- Frequency Changes the frequency of the internal buzzer. Available options are 1000Hz - 3500Hz. Each step generates a short beep at the selected volume and pitch.

7.4.6 Audio



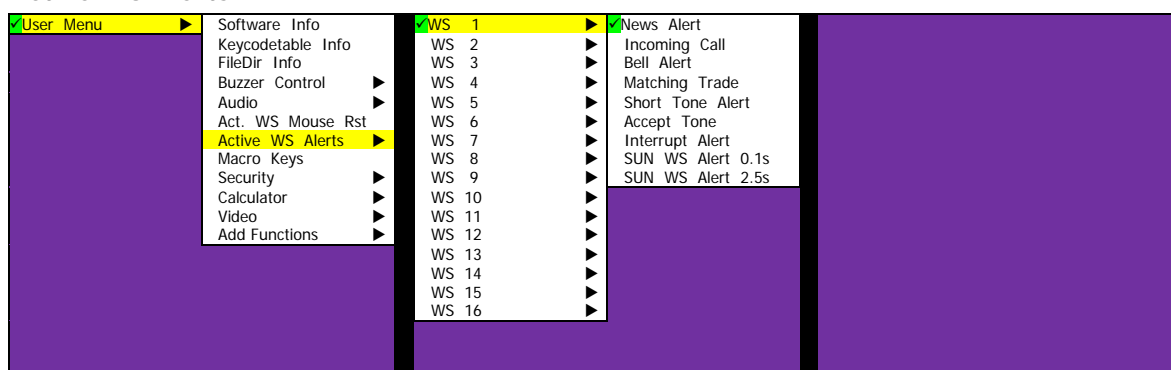
- Head Set OFF Headset port deactivated.
- Head Set On 80% Head Set ON limits the volume to 80% for the headset. Activating the headset mode limits the maximum volume according to standard EN 50332.
- Head Set Vol up Increase the maximum volume around 15% for the headset.
- Alerts fix int Ls Alerts on loudspeaker only (alerts deactivated on headset)

7.4.7 Act. WS Mouse Rst



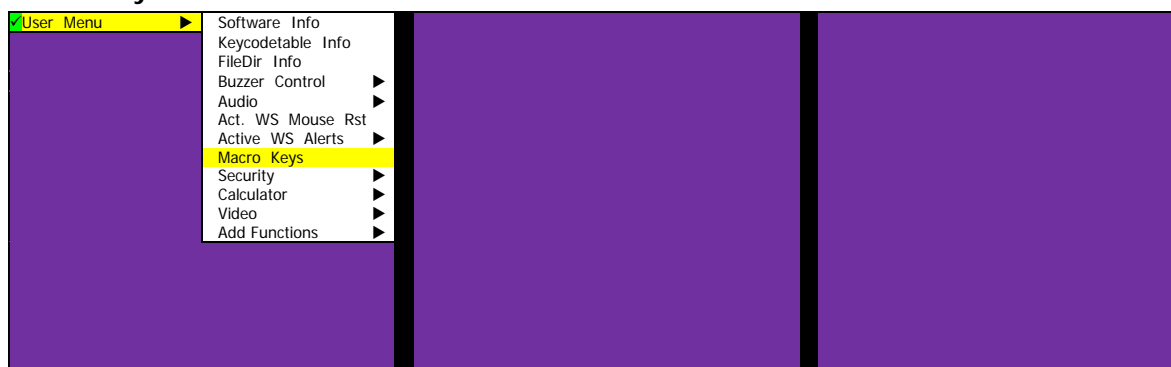
- Act. WS Mouse Rst Starts re-initialisation of the mouse on active workstation (only TTL C/D P1/2 and DLINK-Ports with TTL C/D interface).

7.4.8 Active WS Alerts



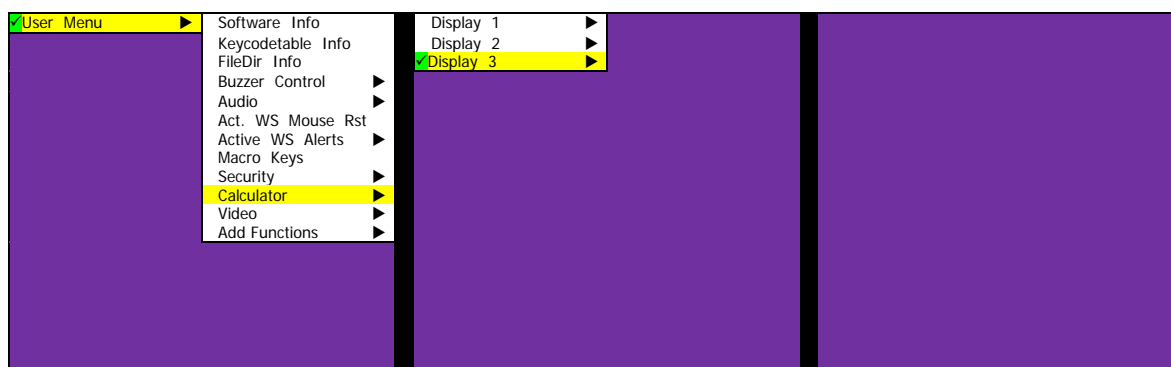
- Active WS Alerts Allows user to customise Reuters Dealing and SUN alerts per workstation.

7.4.9 Macro Keys



- Macro Keys Allow the user to customise unassigned function keys. To start macro menu choose workstation button and press <Macro Keys>.
- Press unassigned function key for macro programming (shines yellow):
- Enter legend for function key and press <Return> or press to delete key.
- Press <System> and then <Return> to store (shines green) or press <ESC> to cancel.
- Press next function key for more macros.
- Press <ESC> so that all keystrokes are stored and sent to port ⇒ Online Programming.
- Press any key to leave Macro Menu and go back to User Menu

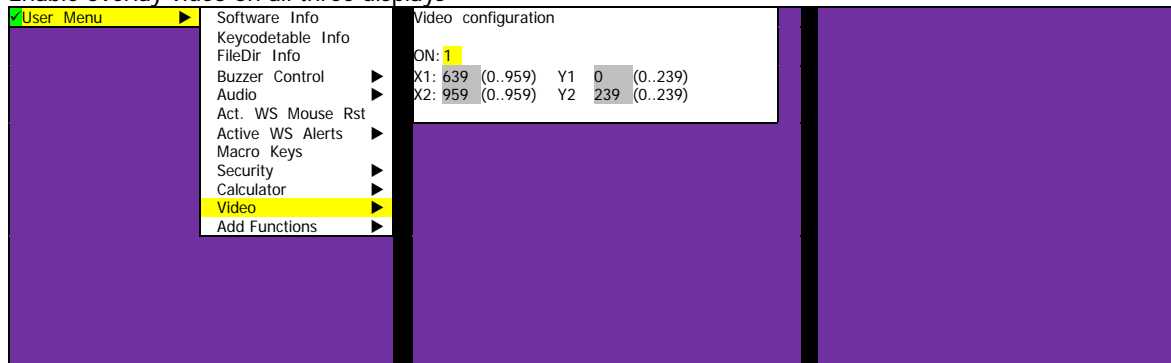
7.4.10 Calculator



- Calculator Enables calculator on display 1 left, display 2 middle or display 3 right. To enable or disable calculator press <shift> + <Num Lock> in normal mode.

7.4.11 Video

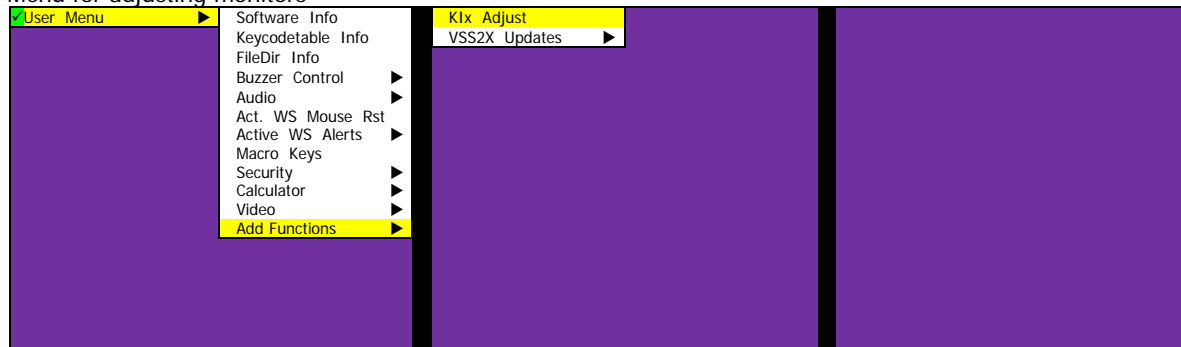
Enable overlay video on all three displays



- ON 0: off / 1: on
- X1 Horizontal start point from the overlay picture (max 959 pixel)
- X2 Horizontal end point from the overlay picture (max 959 pixel)
- Y1 Vertical start point from the overlay picture (max 239 pixel)
- Y2 Vertical end point from the overlay picture (max 239 pixel)

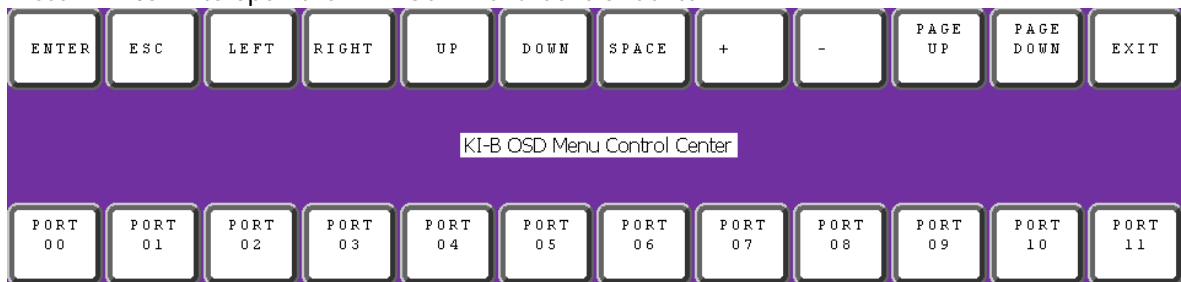
7.4.12 Klx Adjust

Menu for adjusting monitors



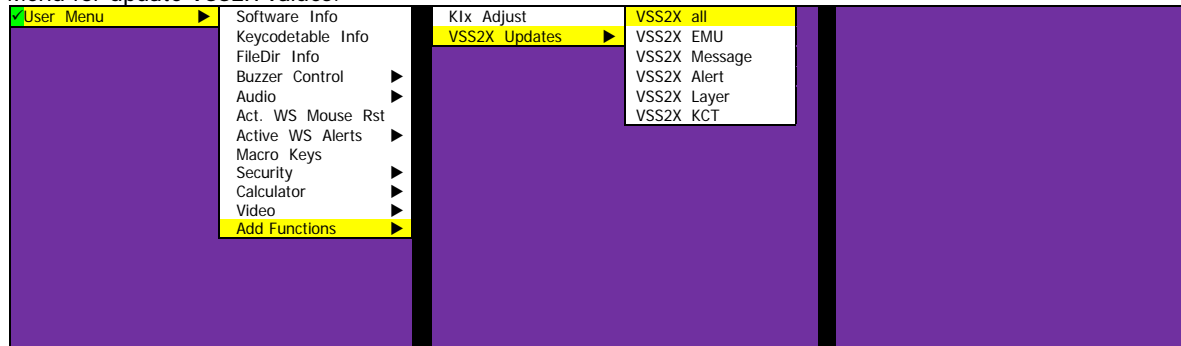
- Klx Adjust Adjust monitors over Keyboard Interface

Press **<Enter>** to open the KI-B OSD Menu Control Center.



7.4.13 VSS2X Updates

Menu for update VSS2X values.



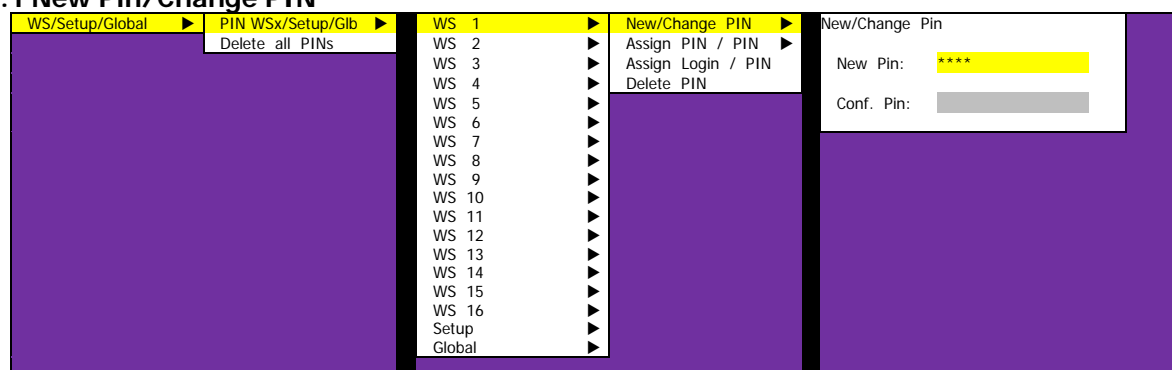
- VSS2X ALL Updates all VSS2X values
- VSS2X EMU Updates Emulation
- VSS2X Message Updates Messages
- VSS2X Alert Updates Alerts (Thomson Reuters)
- VSS2X Layer Update Layers
- VSS2X KCT Updates Keycode Tables

7.4.14 Security

The Security menu contains soft keys to define and administer PINS (Personal Identification Numbers) to protect up to 16 workstations with one keyboard.



7.4.14.1 New Pin/Change PIN



The Main PIN can be set up or changed on a per workstation basis (max. 32 numbers/letters). Changing the Main PIN of a WS does not alter a predefined SUB PIN or its assignments.

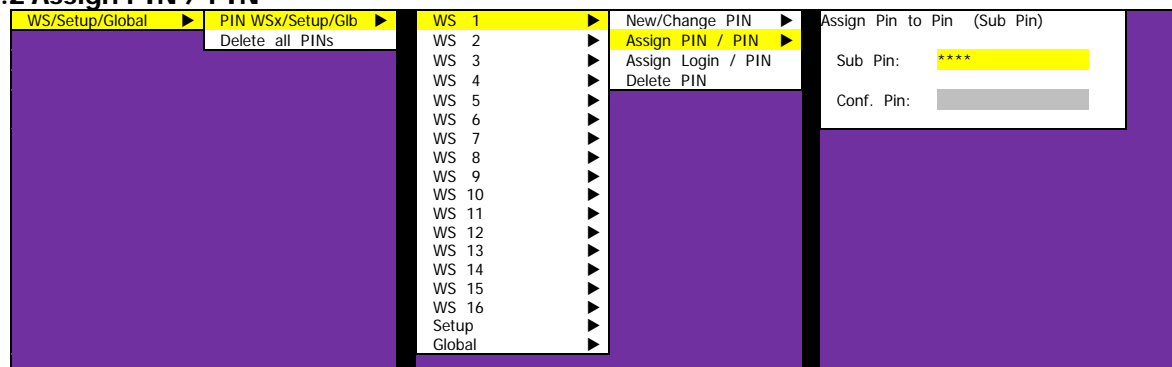


Important: Use only numbers and letters. Punctuation marks, modifier keys (Function/Ctrl) and the <Shift> key cannot be used. Incorrect PINS can disable a keyboard!

Two different PINS can be defined per workstation:

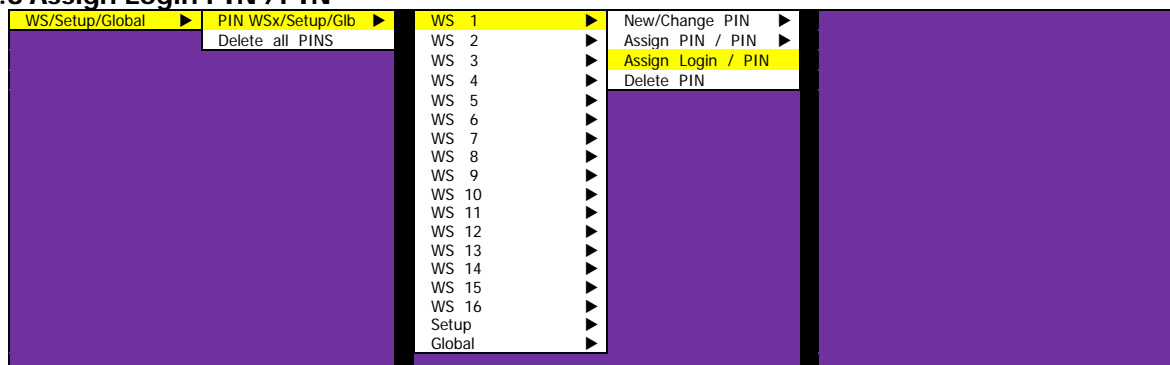
- PIN of WS PIN of Main User
- SUB PIN of WS PIN of Representative
- Supervisor PIN Defined with MK-Tool. Used to disable both the WS PIN and the SUB PIN.
- WEYGMK PIN For WEY internal use only. This PIN cannot be viewed or changed.

7.4.14.2 Assign PIN / PIN



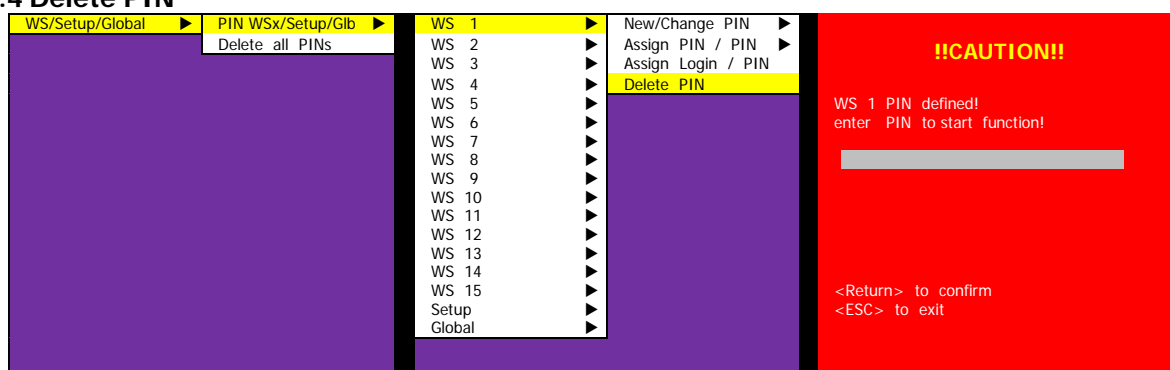
Used to assign a SUB PIN for a deputy. After assigning a SUB PIN, the deputy has the same access rights as the user of the Main PIN (e.g. can delete SUB and Main PIN).

7.4.14.3 Assign Login PIN /PIN



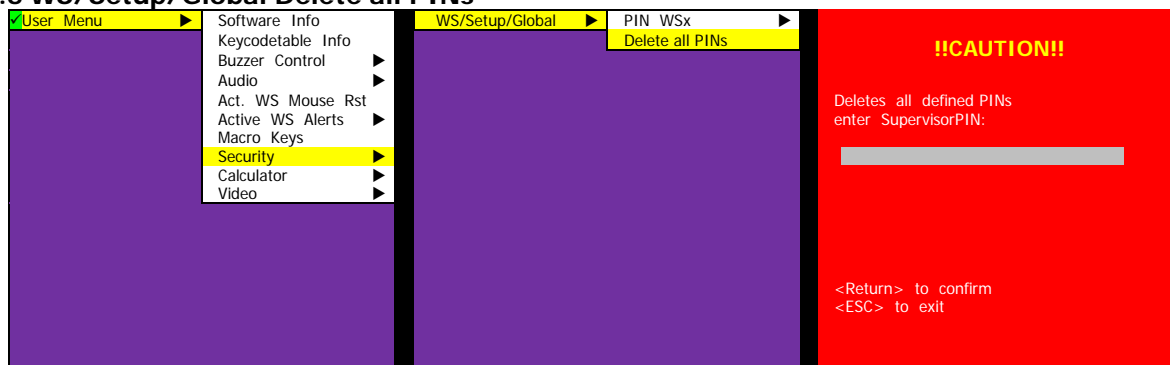
Used to assign a PIN in conjunction with Videoswitch Systems. The keyboard saves the Videoswitch Login when entered and switches to the system mode. All WSs with a PIN identical to the Videoswitch Login can access the VSS2X. If the Login is invalid, the keyboard stays in the user mode, the Videoswitch Login saved on the keyboard will be deleted, and access to the protected WS will be denied.

7.4.14.4 Delete PIN



This function deletes PINS. Deleting a Main PIN also deletes its SUB PIN and vice versa (deleting SUB PIN also deletes the Main PIN).

7.4.14.5 WS/Setup/Global Delete all PINS



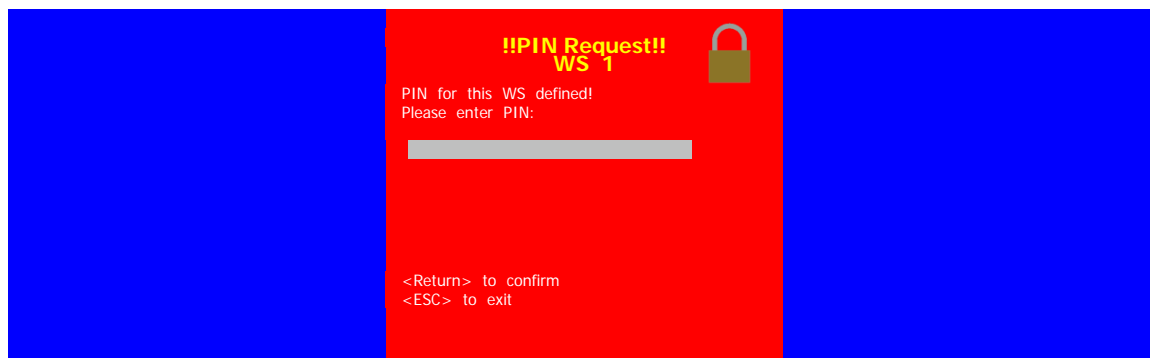
Function clears all PINS and SUB PINS saved on the keyboard for WS1-16, as well as PIN assignments for Logins in conjunction with the Videoswitch.

7.4.15 PIN Handling

If one or several WSs are protected with a PIN, access must be re-activated after Reset / Power up. Manually locking with <Shift left>+<System>. VSS2xx locking must be done with <Logoff/System>, meaning that sources in attach or hold mode must be released.



Quit System mode with <Logoff> avoids conflict with various system timers and security functions. After every interruption of Sleep mode. When choosing a PIN protected WS, the following message appears:

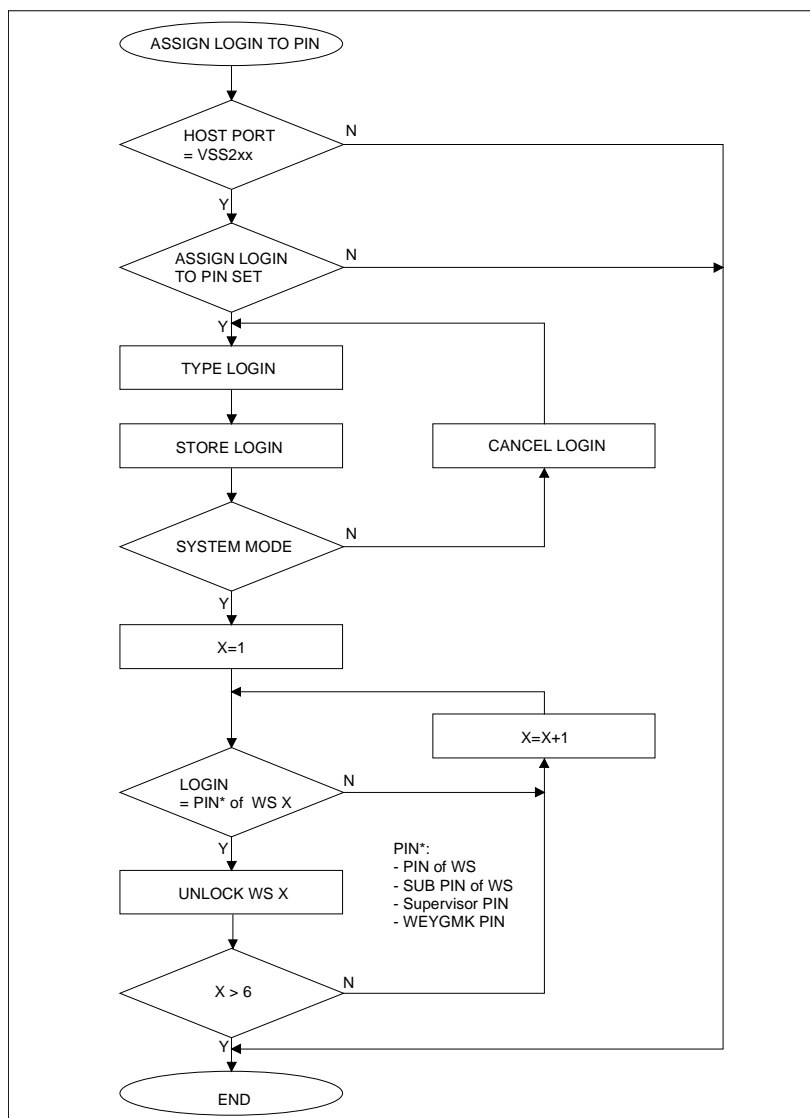


If the PIN entry is incorrect, the error message **!! Invalid PIN !!** appears and the PIN must be re-entered. If the entry is correct, the respective WS layer appears and access is granted to all WSs protected with the same PIN. Protecting a WS with a PIN has no impact whatsoever on non-protected workstations.



Important: If at least one WS is protected with a PIN, only the Supervisor PIN can enter the Setup mode.

7.4.15.1 Flowchart of Function <ASSIGN LOGIN TO PIN>



7.5 Memory Stick

Downloading and uploading files is possible using memory sticks.

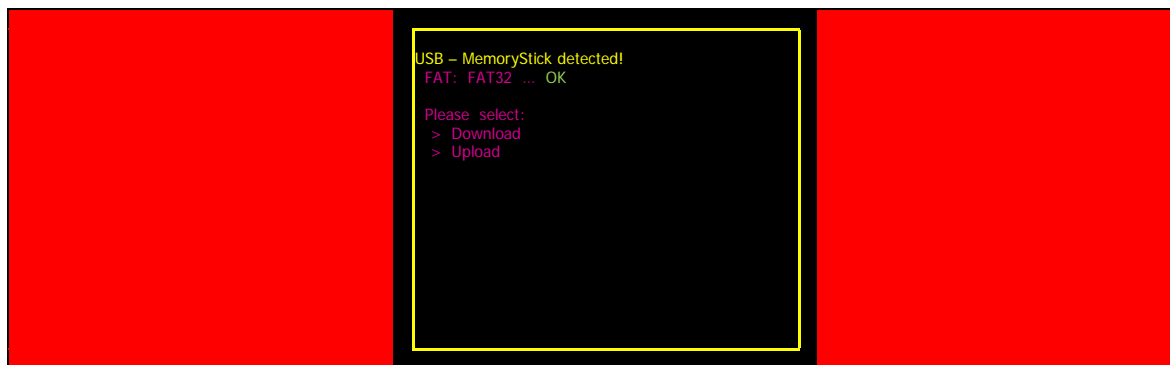
Tested memory sticks are: USB Memory Stick 2GB Imation Part Nr: 22742-2048

The memory stick must be formatted with FAT32.

Directory for download/upload: MK_WR06\Download

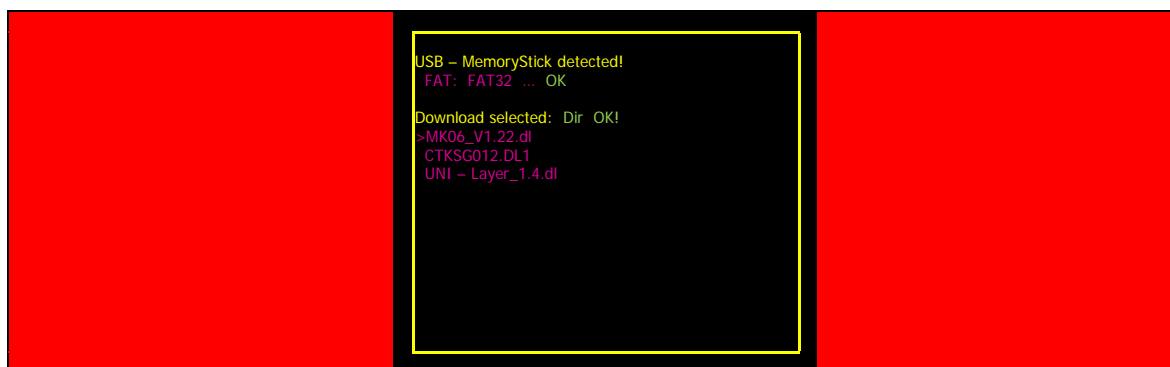
Format of files to download is maximum 32characters including the extension:

- MK06-Application: "MK06_XXXXXXXXXXXXXXXXXXXXX.dl"
- Setup: "XXXXXXXXXXXXXXXXXXXXXXXXXXXXX.sec"
- UserSetup: "XXXXXXXXXXXXXXXXXXXXXXXXXXXXX.usc"
- SystemConfig: "SystemConfig_XXXXXXXXXXXXX.txt"
- GraphicBMPs: "BMPY_XXXXXXXXXXXXXXXXXXXXX.bmp" (Y: GraphicBmpNbr)
- Icons: "ICONYYYY_XXXXXXXXXXXXXXXXXXXXX.bmp" (YYYY: IconNbr)
- ColorParams: "XXXXXXXXXXXXXXXXXXXXXXXXXXXXX.par"
- Audio-WAV: "WAVYYYY_XXXXXXXXXXXXXXXXXXXXX.wav" (YYYY: WavNbr)
- KeyCodeTables: "KCTYY_XXXXXXXXXXXXXXXXXXXXX.kct" (YY: KCT-Nbr)
- Layer: "LAYERYY_XXXXXXXXXXXXXXXXXXXXX.lay" (YY: LayerNbr)
- Macros: "XXXXXXXXXXXXXXXXXXXXXXXXXXXXX.mac"
- MouseSwitchConfig: "XXXXXXXXXXXXXXXXXXXXXXXXXXXXX.msc"
- DL1-Files: "XXXXXXXXXXXXXXXXXXXXXXXXXXXXX.dl1"
- ConBox: "CBXXXXXXXXXXXXXXXXXXXXXXXXXXXXX.dl"



Connect Memory Stick to the USB Host Port of the MK06 and reboot the keyboard by pressing <Ctrl> + <Alt> + <Logoff> + <ESC>.

7.5.1 Download

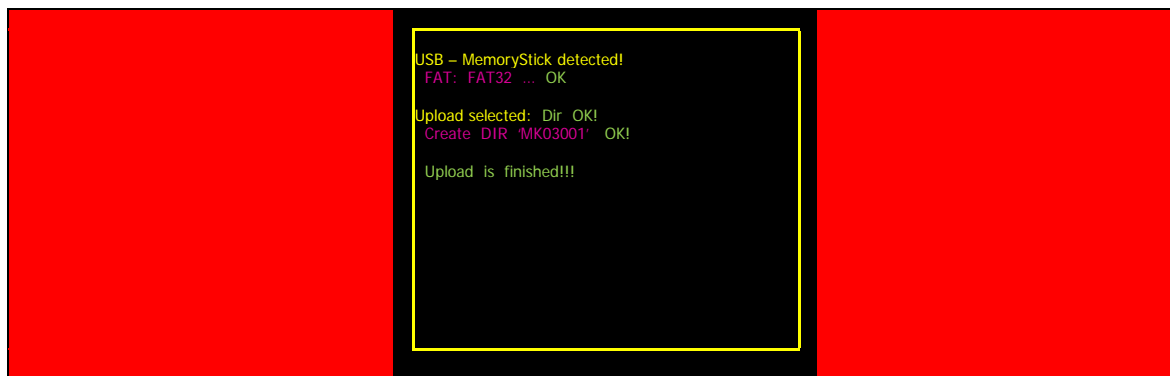


Select directory to download all files and press <Shift> + <Enter>.

7.5.2 Upload

The following files will automatically be uploaded into a created folder on the memory stick:

- InfoPage: "InfoPage.txt"
- System: "SystemSetup_XXXXXXXXXXXXXXX.sec"
- UserSetup: "UserMenu_XXXXXXXXXXXXXXX.usc"
- SystemConfig: "SystemConfig_XXXXXXXXXXXXXXX.txt"
- GraphicBMPs: "BMPY_XXXXXXXXXXXXXXX.bmp" (Y: GraphicBmpNbr)
- Icons: "ICONYYYY_XXXXXXXXXXXXXXX.bmp" (YYYY: IconNbr)
- ColorParams: "ColorParam_XXXXXXXXXXXXXXX.par"
- Audio-WAV: "WAVYYYY_XXXXXXXXXXXXXXX.wav" (YYYY: WavNbr)
- KeyCodeTables: "KCTYY_XXXXXXXXXXXXXXX.kct" (YY: KCT-Nbr)
- Layer: "LAYERYY_XXXXXXXXXXXXXXX.lay" (YY: LayerNbr)
- Macros: "Macros_XXXXXXXXXXXXXXX.mac"
- MouseSwitchConfig: "MouseSwitchConfig_XXXXXXXXXXX.msc"



Select upload and press <Enter>. The MK06 creates a directory on the memory stick to which all needed files will be uploaded.

7.6 Troubleshooting

Below you will find a list of common problems and corrective actions. Always check for evidence of liquid spillage or misuse. If you still cannot identify the problem, or the actions fail to resolve your problem, please contact your local WEY Customer Support!

Problem	Action
Reboot Keyboard	Press <Ctrl> + <Alt> + <Logoff System> and then <ESC>
No Display and LEDs not lit up	Check mains and socket power. Check if Power Supply Unit (PSU) has a country adapter fully plugged into the PSU. Check all connections. Replace first PSU, then connector box and finally the cables.
No Display but some LEDs are lit up	Adjust contrast with rotary knob on the left hand side, respectively at rear of the keyboard. Reboot MK06/WEY RAY 06.
Corrupt Display	Reboot MK06/WEY RAY 06.
User complains that a key is auto repeating for a service	Check for keys that are physically stuck in the down position.
User loses keyboard and/or mouse for one or more services	Check all connections. Reboot MK06/WEY RAY 06. Check service with original proprietary keyboard and mouse. Replace connector box first and then cables.
No audio or crackly sound	Adjust volume with rotary knob on the left hand side, respectively at rear of the keyboard. Check all connections.

8 Appendix

8.1 Keyboard Country and Key sets

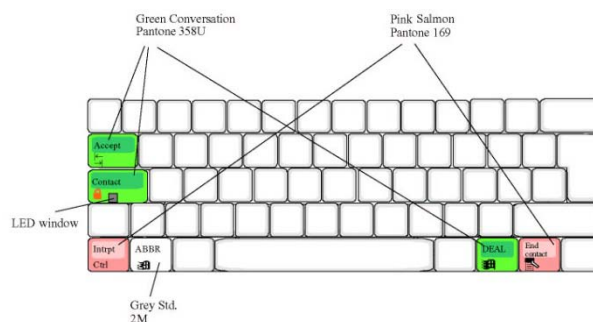


Figure 15 Reuters Keys for Main Keypad



Figure 16 MK06 Base Kit

- BE: Belgian
- ES: Spanish
- FR: French
- GE: German
- IT: Italian
- SG: Swiss
- UK: United Kingdom
- US: United States
- DA: Danish
- SW: Sweden
- *RU: Russian

*Optional: US Layout with add. symbols



8.3 Keycodes used for all types of VSS2X Systems



Keycodes 92, 93, 94 will be used in combination with <Alt> or <Alt Gr> key, to be able to select screen 4, 5 and 6

9 Contacts

Thank you for your interest in WEY.

You can establish direct contact with the department of your choice in the appropriate country.

Switzerland

WEY Elektronik AG

(Development, Production)
Dorfstrasse 57 / Postfach 132
CH-8103 Unterengstringen
Switzerland

Tel +41 44 751 89 89

Fax +41 44 750 30 61

E-Mail info.ch@weytec.com

Switzerland (Headquarters)

WEY Technology AG

(Headquarters, Sales)
Industriestrasse 11
CH-6343 Rotkreuz
Switzerland

Tel +41-41 798 20 48

Fax +41-41 798 20 49

E-Mail info.ch@weytec.com

Germany

WEY Technology GmbH

www.weytec.com/adressen

USA

WEY Technology Inc.

www.weytec.com/addresses

United Kingdom

WEY Technology Ltd

www.weytec.com/addresses

Singapore

WEY Technology Singapore Pte. Ltd.

www.weytec.com/addresses

France

WEY Technology Sarl

www.weytec.com/addresses

Australia

WEY Technology Asia Pacific Pty. Ltd.

www.weytec.com/addresses

Italy

WEY Technology S.r.l.

www.weytec.com/addresses

Taiwan

WEY Technology Singapore Pte. Ltd.

Taiwan Branch

www.weytec.com/addresses

Austria

WEY Technology Austria

www.weytec.com/adressen

Hong Kong

WEY Technology Hong Kong Ltd.

www.weytec.com/addresses

Russia

WEY Technology OOO

www.weytec.com/addresses

India

WEY Technology India Pvt. Ltd.

www.weytec.com/addresses

Full location addresses and contact details are available on our website:

www.weytec.com/addresses

www.weytec.com

info.ch@weytec.com

Please visit our website for further information about our company and products.