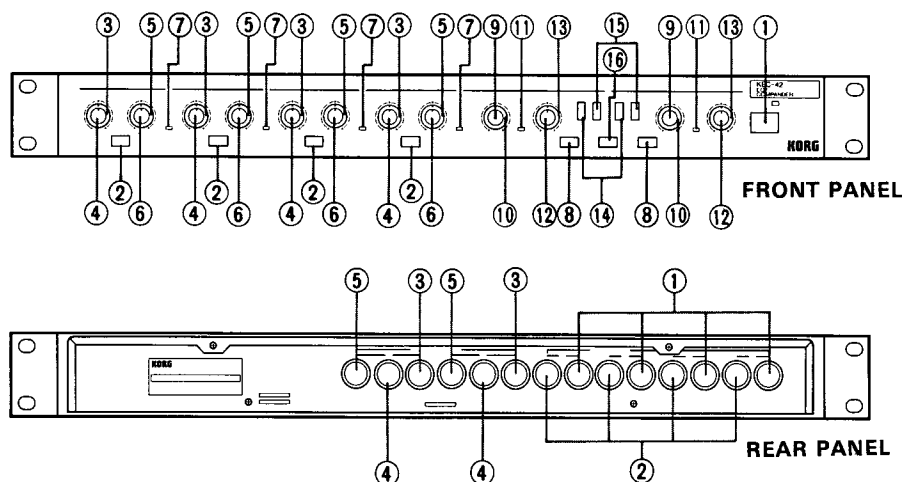


Equalizer — Componder

KEC-42

User's manual

Thank you and congratulations on your choice of the KORG Equalizer-Componder KEC-42. To obtain optimum performance from this advanced digital synthesizer, please read this manual carefully.



NAMES AND FUNCTIONS OF PARTS

FRONT PANEL

① POWER Switch

This is the power switch. When the switch is ON, the LED lights up.

► **EQUALIZER BLOCK**

② EQ BYPASS Switch

When you push this switch, the Effect circuit will be defeated and only the Direct sound will be generated.

③ LOW LEVEL Control

This controls the amount of boost or cut in the low frequency range. (±15 dB MAX)

④ HIGH LEVEL control

This controls the amount of boost or cut in the high frequency range. (±15 dB MAX)

⑤ FREQ Control

This establishes the center frequency where you wish to boost or cut. (100 Hz ~ 10 KHz)

⑥ GAIN Control

This controls the amount of boost or cut based on the frequency you established using the ⑤ FREQ Control. (±15 dB MAX)

⑦ PEAK Indicator

When the Equalizer Block is over inputted (over +16 dBm), this will flash.

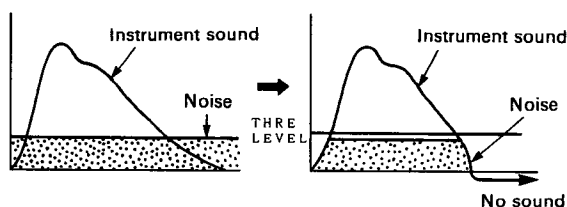
► **COMPANDER BLOCK**

⑧ COMPANDER BYPASS Switch

When you push this switch, the Effect circuit will be defeated and only the Direct sound will be generated.

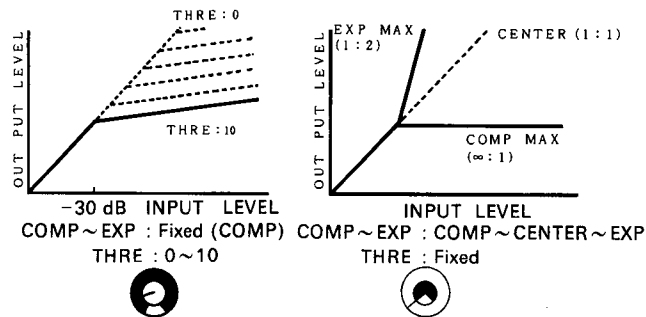
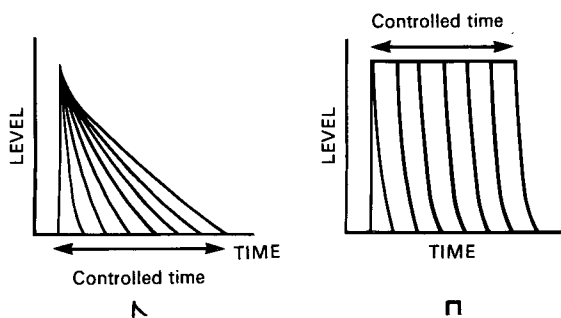
I GATE Control Section

This GATE is a circuit which will not pass through the sound under the level established. (THRESHOLD LEVEL)



⑨ GATE DECAY Control

This controls the attenuation at the closing of the Gate. At the center point the attenuation time is shortest and by turning to right and left, you can select the different Decay shapes.



⑩ THRESHOLD LEVEL Control

This establishes the level of the opening and the closing of the Gate. The Gate will open when the signal exceed the established level, and closed when it is below this level. At 10, the Gate remaining open all the time and by going closer to 0, the Gate becomes harder to open.

⑪ GATE OPEN Indicator

This will go on when the Gate is open. Use this as the indicator when setting up the Threshold level.

II COMP/EXP Control Section

By changing the ratio of the input level and the output level, the Compressor/Limiter Expander provides automatic gain control for a variety of musically useful effects including compression, limiting, expansion, de-essing, etc.

⑫ COMP EXP Control

This establishes the ratio of the input and the output level. From the center to the left is the Comp/Limiter area and here you can establish the ratio of input and output within the range of $1 : 1 \sim \infty : 1$. From the center to the right is the Expander area and you can establish the ratio within the range of $1 : 1 \sim 1 : 2$.

⑬ THRESHOLD LEVEL Control

This sets the level of the COMP/EXP. When the input signal exceeds this established level, it is effected by COMP EXP Control.

III INPUT Select Section

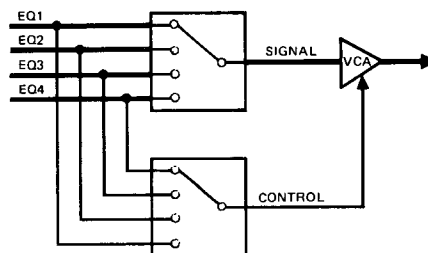
This section controls signal routing to the VCA Circuit. The signal to either the VCA input or VCA control can be the output of an EQ Section (or an external source). This section allows you to create complex patches within the unit.

⑭ SIGNAL INPUT Select Switch

This selects which of the EQ outputs will be routed as the VCA input.

⑮ CONTROL INPUT Select Switch

This selects which of the EQ outputs will be selected as the VCA control.



⑯ LINK Switch

IN KEC-42, when this is ON, it will combine Componder Blocks A and B. This is a unique feature for creating complex VCA functions.

REAR PANEL

① EQ INPUT Terminal

This is the input terminal for the Equalizer. This will input line-level signals. If you do not connect a plug into the terminal, it will automatically receive the input signal from the former channel in parallel.

② EQ OUTPUT Terminal

This is the output terminal for the Equalizer.

③ GATE COMP/EXP OUTPUT Terminal

This is the output terminal for the Componder Block.

④ EXT AUX INPUT Terminal

This is the external input terminal for VCA input for the Componder Block. If you connect a plug into this terminal, the signal selected by the SIGNAL INPUT Select Switch will be cut, and this terminal has priority.

⑤ EXT KEY INPUT Terminal

This is the external input terminal for the VCA Control of the Componder Block. If you connect a plug into this terminal, the signal selected by the CONTROL INPUT Select Switch will be cut, and this terminal has priority.

■ ON

⊙ Fixed level

⊖ Variable range of level

⊕ Set value at your own discretion

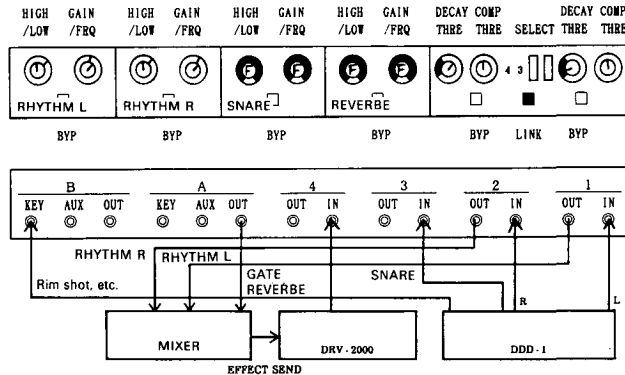
Space Even if this is specified, the specification is not effective.

USING THE KEC-42 EFFECTIVELY ...

Example 1 ... The Gate Reverb

Input the Reverb sound in EQch4, and control it with the Gate opened by the snare in ch3. This setting usually uses the A compander but

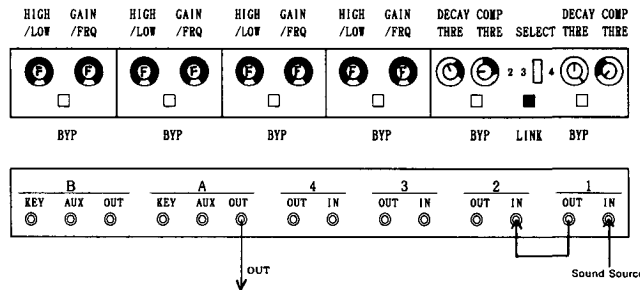
by using the LINK function and an external key you can have another release time whenever you wish.



Example 2 ... Signal Processor

By connecting EQ1/2 in series, you can achieve more sensitive equalization. Control the dynamic range with A Compander (it is used as a compressor in the example), and eliminate excessive levels by setting B to be a Hard limiter.

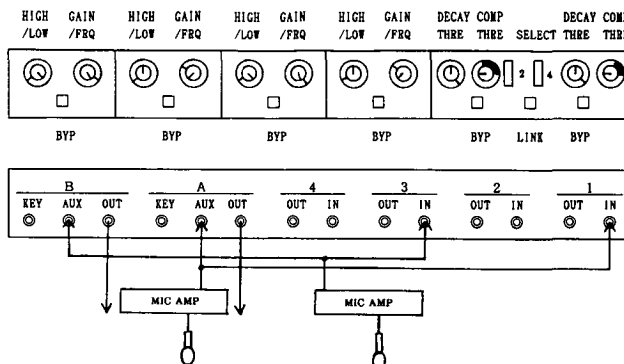
EQ3/4 are fed to the A/B Compander, and control the compander with the frequency dependant compression. You can use the Gate also, corresponding to your need.



Example 3 ... De-esser (Civlance Controller)

De-esser is an effect which eliminates excessive "SSS"ing in vocals. The KEC-42 can be used

simultaneously on two vocal tracks. Adjust the EQ points to the tonal quality of the vocal.



SPECIFICATIONS

Number of Channels:

EQ 4CH
COMPANDER 2CH

Frequency Response:

EQ EFFECT 20Hz ~ 30kHz (± 1 dB)
BYPASS 20Hz ~ 30kHz (± 1 dB)
COMP EFFECT 20Hz ~ 20kHz (+1dB, -3dB)
BYPASS 20Hz ~ 20kHz (± 1 dB)

Input: EQ

Typ -10dBm
MAX +21dBm
Impedance 100K Ω (25k Ω at link)

Output: EQ

Typ -10dBm
MAX +21dBm
Impedance 1K Ω

S/N Ratio (typ):

EQ EFFECT 89dB
(IHF-A)

BYPASS 90dB
COMP EFFECT 79dB
BYPASS 88dB

Dynamic Range:

EQ EFFECT 102dB
BYPASS 110dB
COMP EFFECT 94dB
BYPASS 108dB

Equalizer:

Shelving LOW ± 10 dB at 100Hz
Shelving HIGH ± 10 dB at 10kHz
Peaking ± 15 dB, 100Hz ~ 10kHz

Companer:

Ratio $\infty : 1 \sim 1 : 1 \sim 1 : 2$
Threshold Level -30dBm ~ +10dBm
Attack Time 15mS
Release Time 300mS
Max. EXP Range 20dB
Max. COMP Range 45dB

Gate

: Threshold Level $-\infty \sim +10$ dBm
Attack Time 2mS
Decay Time (\curvearrowright) 30mS ~ 1.8S
Decay Time (\square) 30mS ~ 1.8S

Distortion

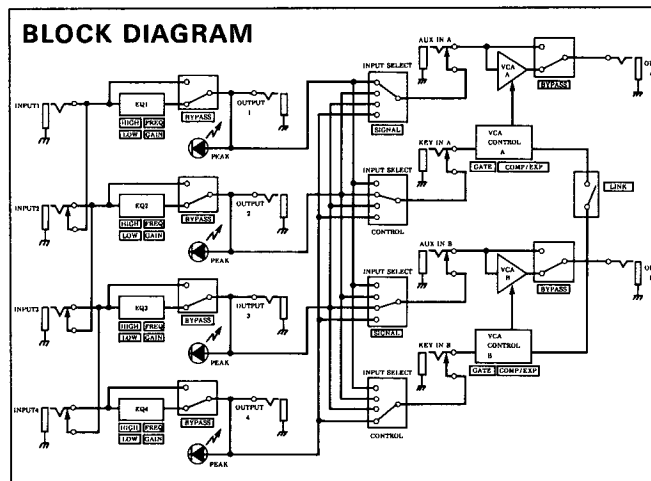
: EQ 0.05%
COMP 0.05%

Power Consumption

: 12W

Dimensions : 435(W) x 249(D) x 44(H)mm

Weight : 2.6Kg



SAFETY NOTE

■ Location

Do not use this unit for extended periods of time where it is exposed to:

- direct sunlight
- extremes of temperature or humidity
- sand or dust

■ Power Supply

- Use only with rated AC voltage. If you will be using this unit in a country having a different voltage, be sure to obtain the proper transformer to convert to rated voltage.
- To help prevent noise and poor sound quality, avoid using the same outlet as other equipment, or branching off extensions shared by other equipment.

■ Input/Output Jacks and Connection Cords

Be sure to use standard cables with phone plugs for input and output connections to the rear panel of the DRV-1000. Never insert any other kind of plug into these jacks.

■ Handle Gently

Knobs and switches are designed to provide positive operation with a gentle touch. Do not use force.

■ Maintenance

Wipe the exterior with a soft, dry cloth. Never use paint thinner, benzene or other solvents.

■ Keep This Manual

Store this manual in a safe place for future reference.

NOTICE

Korg products are manufactured under strict specifications and voltages required by each country. These products are warranted by the Korg distributor only, in each country. Any Korg product not sold with a warranty card or not carrying a serial number disqualifies it from the manufacturer's/distributor's warranty and liability. This requirement is for your own protection and safety.

KORG KORG INC.

15-12, Shimotakaido 1-chome, Suginami-ku, Tokyo, Japan.

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**KORG WARRANTY DEPT.
ROSE-MORRIS & CO., LTD.
32-34 GORDON HOUSE ROAD,
LONDON NW5 1NE**



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WARRANTY REGISTRATION CARD

Model _____ Serial No _____

Owners Name _____

Address _____

Name of Group (if applicable) _____

Dealers Name _____

Date of Purchase _____ Purchase Price _____

- Male Female Organisation
- Under 18 Years 18-24 25-34 35-49 Over 49 Years
- Beginner Average Advanced
- Advertising Reviews Friends Dealer Exhibition

Other _____

- Technical Quality Brand Reputation Styling
- Price Dealers Recommendation Friends Recommendation
- Features Other _____

Rock Jazz Pop Classical Other _____

Amateur Semi-Professional Professional At Home

On Stage In Studio Other _____

Model _____

WARRANTY STATEMENT

Rose-Morris & Co. Ltd., as sole UK distributors of Korg products, warrant to the original retail purchaser only, that this product is free from defects in material and workmanship under normal use and offers free service and/or parts exchange within one year from the date of purchase by the original purchaser only.

All parts, except the external cabinets, are warranted for one year from the date of purchase and will be replaced if in the sole judgement of Rose-Morris & Co. Ltd., they shall be deemed defective. This warranty does not apply to equipment showing abuse or damage to parts which in the judgement of Rose-Morris & Co. Ltd., are not defective, nor does it extend to any equipment which may have been tampered with, altered, or repaired outside any Rose-Morris & Co. Ltd., Authorised Service Centre.

When a warranty service is required the unit must be shipped to the original place of purchase; freight and insurance prepaid by the owner.


This warranty becomes effective when the purchaser returns the fully completed Registration Card to Rose-Morris & Co. Ltd., within thirty days of the date of purchase.

This warranty does not effect your statutory rights.

Rose-Morris

In order to register your warranty, fill out the form opposite and return it to Rose-Morris & Co. Ltd., within 30 days of purchase.

To assist us in developing future products, we would appreciate your helping us to obtain a clearer picture of who buys our products and why. Any information you care to give us will be kept in the strictest confidence.



Detach this half

1. Sex ▶
2. Age Group ▶
3. Musical Ability ▶
4. How did you first hear of Korg ▶
5. What mainly influenced your decision to purchase a Korg product ▶
6. What kind of music do you normally listen to ▶
7. Your Korg product will mainly be used for ▶
8. What magazines do you regularly read ▶
9. Do you own a Home Computer ▶
10. What other instruments do you own ▶