Nicolet Monitor ICU Monitor System

Specifications



v32 Amplifier (continued)

Input Impedance > 100 M Ω (common mode)

CMRR at Patient Inputs > 115 dB @ 50 – 60 Hz, with active patient ground connected

Channel Crosstalk < -40 dB

Amplifier Sample Rate (under software control)

125, 250, 500, 1000, 2000

Calibration Square wave, 1, 5, 10, 20 sec period,

10, 50, 100, 1000 μV amplitude

Input Bias Current < 5 nA

Anti-Aliasing Filter Cut Off Frequency 500 Hz

Differential Input Impedance 40 M Ω

Interface to Amplifier Ethernet

Built-in Impedance and Display

Headbox Optional; no impedance display

Additional Ports

- Isolated SpO2 with X-Pod
- Photic output
- Isolated patient event button

Channel Hardware Gain 410

Deblock Yes
Auxiliary Inputs

1 Hi-level, non-isolated input for connection of external devices

(e.g. CO2 monitors, etc.)

Analog/Digital Converter 16 bits

Maximum Input Range ± 2.5V

ADC Resolution 76.3 μV Bandwidth DC – 500 Hz

v44 Amplifier

System Configurations

Sleep, EEG, ICU monitoring and LTM

OR and non-OR applications

Cart mount and wall mount options

Analog/Digital Converter 16 bits

ADC Resolution Voltage = $0.153 \mu V$ DC Offset Tolerance $\pm 900 mV$

Channels (Inputs) 32 EEG (9 configurable as bipolar AC)

12 non-isolated DC inputs (± 5V, BW = 100Hz)

Maximum Input Range ± 5 mV

Bandwidth 0.053 - 500 Hz

Noise $< 1.5\mu V$ pk-pk @ 0.1 - 100 Hz except channels 31, 32 and

OR channels 95% samples < 2uV p-p (0.1 - 100 Hz)

Input Impedance > 100 M Ω (common mode)

CMRR at Patient Inputs > 115 dB @ 50 – 60 Hz, with active patient ground connected except channels 31, 32 and OR channels > 100 dB @ 50-60 Hz

with RLD

Channel Crosstalk < -40 dB

Amplifier Sample Rate (under software control)

125, 250, 500, 1000, 2000

Calibration Square wave, 1, 5, 10, 20 sec period,

10, 50, 100, 1000 μV amplitude

Input Bias Current < 5 nA

Anti-Aliasing Filter Cut-off frequency 500 Hz

Differential input impedance $40 \text{ M}\Omega$

Interface to Amplifier Ethernet

Specifications, design options and terms quoted are subject to change without notice Advanced Technology Patent Pending

CareFusion
Middleton WI

carefusion.com

Channel Hardware Gain 410 Deblock Yes Integrated SpO2

Channels (DC Inputs) 12 non-isolated

- Analog/Digital Converter 16 bits
- Maximum Input Range ± 5V
- ADC Resolution 153 µV
- Bandwidth DC 120 Hz

Additional Ports

- (2) RS232 Serial Ports
- Auxiliary I/O
- Panasonic Camera Control port on amplifier
- Isolated SpO2
- Isolated patient event button

Headboxes

v44 requires one of the following:

- Clinical headbox with built in impedance and display
- Clinical headbox with head cap adapter and built in impedance and display
- OR headbox

Polygraphic Inputs

Number of Inputs 4 (sub-set of available 36)

Maximum Input Range User-selectable: ± 128 mV or ± 1V

Bandwidth DC - 1500 Hz

ADC Resolution At \pm 128mV = 4 μ V, At \pm 1V = 32 μ V

Auxiliary Input Module (Optional)

8 Hi-level non-isolated inputs for connection of external devices (e.g. SpO2, CO2 monitors, etc.)

Analog/Digital Converter 12 bit

Maximum Input Range ± 5V

ADC Resolution Voltage = 2.44 mV

Bandwidth DC - 32 Hz

Network

10/100/1000 Mb Ethernet (standard)

Quality System

Manufactured, designed, developed and marketed by CareFusion under ISO 13485

Compliance/Regulatory Standards

Designed, tested, manufactured and certified to meet the following domestic (USA), Canadian, European and International Standards:

UL 60601-1 Medical Electrical Safety Standard (USA)

CAN/CSA-C22.2 no. 601.1-M90 Medical Electrical Safety Standard (Canada) EN/IEC 60601-1 Medical Electrical Safety of Medical Equipment

(International and Europe)

IEC 60601-2-26 Particular safety of electroencephalographs equipment

EN 60601-1-2 Collateral safety standard for EMC

European Community (CE Mark)

Medical Device Directive (MDD) product certified by N.V. Kema,

Arnhem, The Netherlands, Notified Body (ID No. 0344)

Patient Isolation BF

