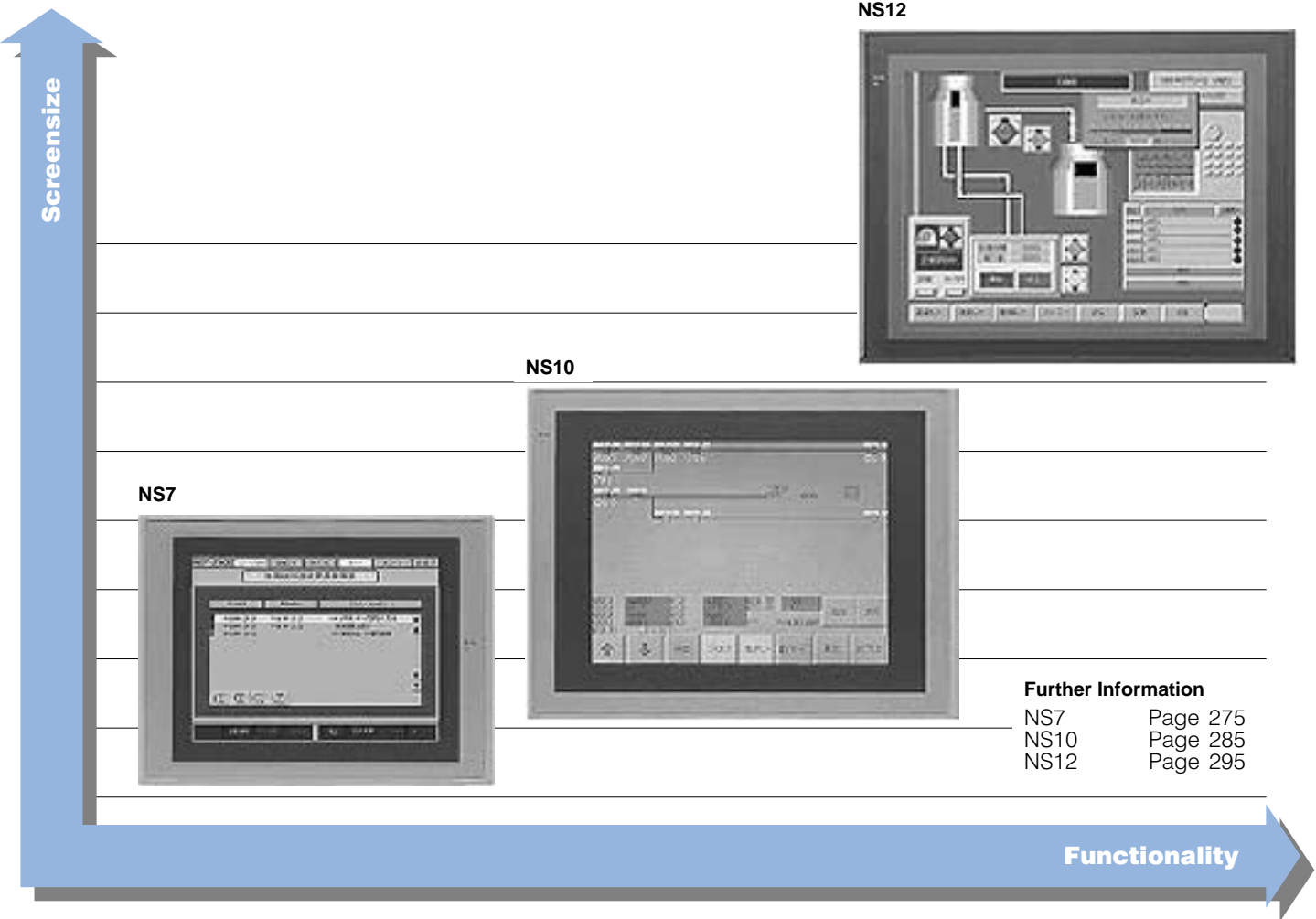# Advanced Touch-screen Terminals
(NS Series)

HMI Terminals for industrial applications

The new generation of touch-screen Terminals are available with 7", 10" and 12" screens. NS Terminals are ideal both as universal control units for individual machines and for the operation of networked systems. The NS series brings advanced information processing to the factory floor in a manageable and reliable manner.

1:1 NT Link, 1:n NT Link, controller link and FINS protocols ensure outstanding communication performance in OMRON networks. The design of the enclosure is extremely flat so space requirements are minimal compared to the effective area. The terminal's low weight and compact dimensions allow lightweight, inexpensive bracket and housing solutions.

- TFT (NS12/10) and STN technology (NS7)
- 256 colours, high luminosity, wide viewing angle
- Flexible software programming allows the NS application to support most language requirements.
- Local communication with 2x RS-232C ports
- Network communication via Ethernet or CLK
- Memory card for program and data transfer
- Data transfer from and to data formats such as RTF, CSV, TXT, BMP, JPEG
- Macro programming for expanded functionality
- Flat and lightweight construction, protection class IP65(F)
- Video camera input (optional)
- Password protection
- Programming with NS Designer
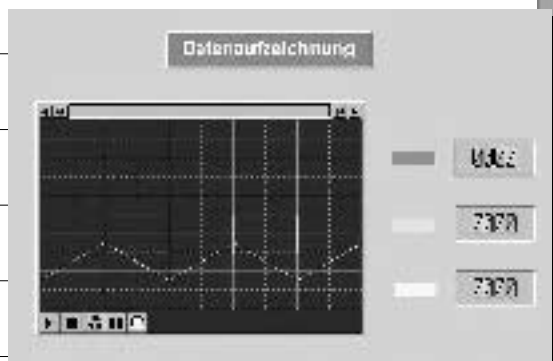- NT user programs can be converted easily

Screensize

NS12

NS10

NS7

Functionality

OMRON

Overview of Advanced Touch–screen Terminals

	NS7	NS10	NS12
STN display	Yes	–	–
TFT display	–	Yes	Yes
Display size mm	160.4x121.1	215.2x162.4	246.0x184.5
Number of screen dots pixels	640x480	640x480	800x600
Number of lines/characters	60/80	60/80	75/100
Number of keys/touch fields	768 (32x24)	1200 (40x30)	1900 (50x38)
Memory	6 MB	4 MB (+ 16 MB with expansion)	4 MB (+ 16 MB with expansion)
Max. screen pages	4000	4000	4000
Numeric input/text input	Yes/Yes	Yes/Yes	Yes/Yes
Bar graph	Yes	Yes	Yes
Trend/line diagram	Yes	Yes	Yes
Alarm handling	Yes	Yes	Yes
Pop–up windows	Yes	Yes	Yes
Real–time clock/date	Yes	Yes	Yes
Video input	–	With NS-CA001 Module	With NS-CA001 Module
RS–232C	2x RS-232C	2x RS-232C	2x RS-232C
NT Link	1:1, 1:n	1:1, 1:n	1:1, 1:n
FINS	Yes (Ethernet type)	Yes (Ethernet type or CLK Module)	Yes (Ethernet type or CLK Module)
Macro programming	Yes	Yes	Yes
Ethernet	10BaseT	10BaseT	10BaseT
Controller Link	–	With NS-CLK21 Module	With NS-CLK21 Module
PLC driver	OMRON	OMRON	OMRON

Programmable Terminals

NS Designer Programming Software

System requirements:
– Pentium 400 MHz
– 32 MB of RAM
– 200 MB of hard disk space