HRDE 4x4

DIGITAL VIDEO RECORDER
WITH 4 VIDEO AND 4 AUDIO CHANNELS

The HRDE 4x4 is a high-quality stand alone and/or networked digital video recorder (DVR) with built in audio recording capabilities. The HRDE 4x4 features advanced and industry-standard MPEG-4 inter-frame compression, which translates into superior video quality. The compression algorithm minimizes data storage requirements, which enables high-quality and streaming video over low bandwidth connections. Additionally, the HRDE 4x4 offers adjustable video resolutions and compression levels – making it easy to achieve the desired image.

The HRDE 4x4 features a switcher, multiplexer, selectable multi-mode display, digital motion detection, and camera tilting options. Operating in a triplex mode, the HRDE 4x4 allows simultaneous recording, playback, and network access to the recorder. Also available in the HRDE 4x4 is alarm, sensor and motion, and event recording capabilities. The HRDE 4x4 hardware runs on a Real Time Operating System (RTOS), eliminating the threat of virus contamination found in Windows-based operating systems. The RTOS platform also enables users to record events and tasks.

Market Opportunities

The HRDE 4x4 is designed for small to mid-sized businesses that demand an affordable, high-quality DVR with advanced features and functionality. The HRDE 4x4 is ideal, but not limited to installations for small dealerships, production shops, service stations, gas stations, etc. The HRDE 4x4 is compact in size enabling these businesses to place the DVR on a counter offering easy access and operations. The HRDE 4x4 transitions the market from a VCR to a technologically advanced, easy to install, and cost-effective digital video solution that offers features and functionality more commonly inherent in higher-end digital video recorders.

Features:

- Robust, MPEG-4 video compression for superior video quality and optimal storage capabilities

- Four versatile composite video inputs with connectors that allow the option to switch between NTSC/PAL/4 channels of digital audio

- Event recording triggered by external alarm devices configurable by user

- Multi-networking capability: remote view, search and operating of multiple DVRs at various locations for up to 16 sites

- On-board motion detection, 14 x 10 grid matrix per camera

- PTZ control port with built in pan, tilt, and zoom controller

- USB Port for back up/archive of data and storage

- Recording rates adjustable from 1 to 30 images/second NTSC (1-25 images/sec PAL) and configurable by the user on per camera basis

- The Quad recording resolution is 360 x 240 at 120IPS and 360 x 288 PAL at 100 IPS. The full resolution recording is 720 x 480 NTSC and 720 x 576 PAL

SPECIFICATIONS

Video		
Input	4ch NTSC / PAL, 1.0V peak-to-peak, 75ohm, BNC	
Output	1ch NTSC / PAL, 1.0V peak-to-peak, 75ohm, BNC	
	1 VGA	
Audio		
Input	4 Line In (RCA) / 1 Line Out (RCA)	
Output	Compression G.711	
Alarm		
Input	4 Sensor In (N/O, N/C selectable)	
Output	1	
OS		
	Real Time Operating System (RTOS)	
Display		
Video Format	NTSC	PAL
Resolution	360 x 240, 720 x 480	352 x 288, 704 x 576
Recording		
Compression Algorithm	MPEG-4	
Video Format	NTSC	PAL
Resolution	360 x 240, 720 x 480	360 x 288, 720 x 576
Recording Frame Rate	120 Fps@360 x 240	100Fps@360 x 288
	30Fps/4ch (720 x 480/ch)	25Fps/4ch (720 x 576/ch)
Still Image Capture	720 x 480 / 360 x 240	720 x 576 / 360 x 288
Recording triggered by		
Mode / Method	Manual, Motion, Sensor, and Schedule / Resolution, Fps, & Quality	
Motion Detection	Full or Partial area set-up per each channel	
Multi-task		
Triplex	Record, Playback, & Network	
Control Unit		
	Front Panel Control/Remote via Ethernet and RAS	
Communication Protocol		
Console	1 RS-232C	
Camera Control	1 RS-485	
Network		
Protocol	ADSL, LAN / Dynamic IP Support	
LAN Port	1 10/100-base T Ethernet	
Functions	Live, Search, Set-up, P/T/Z, Focus, CMS	
HDD		
Capacity	80GB – Estimated 24 days for all 4 cameras based on 1 IPS per camera at quad resolution time lapse recording	
Backup		
Network	Still Image & Video	
USB Memory Stick	Still Image & Video	

SPECIFICATIONS CONTINUED:

| Electrical	
Power supply	100-240VAC, 50/60Hz, 1.5A, External adapter
Unit Input voltage	12VDC
Power consumption	normal18W (12V, 1.5A)
Connectors	
Backup (Archive)	USB
RS-232 serial port	9-pin DB9 type
Composite video in	BNC (4)
Composite video out	BNC, VGA – HDB15
Audio in	RCA (4)
Audio out	RCA (1)
Ethernet	RJ-45
Physical and Environmental	
Dimensions (WxHxD)	13.78x2.83x10.24in. (350x72x260mm)
Weight	7.05lb (3.kg)
Operating temperature	32 to 104°F (0 to 40°C)
Storage temperature	14 to 122°F (-10 to 50°C)
Relative humidity range	0 to 90% (non-condensing)

Line Drawing
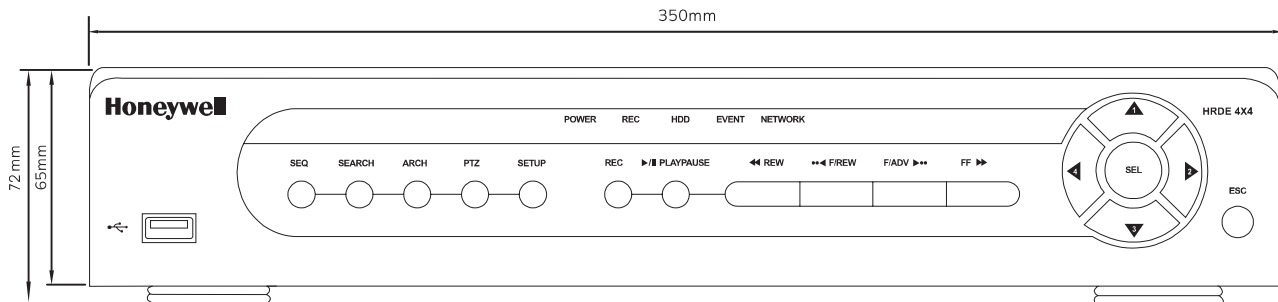
Front Panel
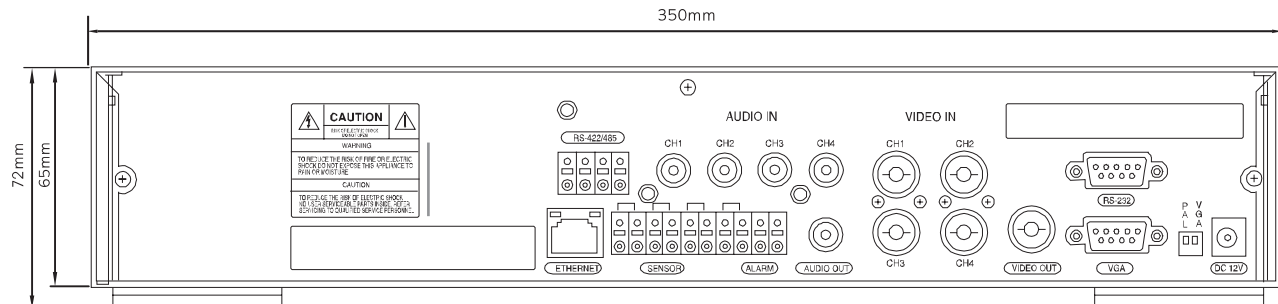
Back Panel

System Diagram

Cameras 1–4

PC or Composite
Monitor

HRDE
4x4

Remote access
via PC/Laptop
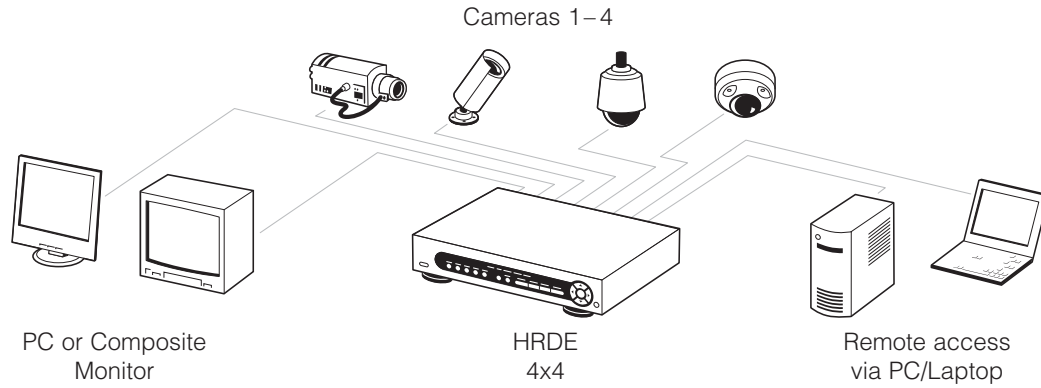
Ordering

Ordering	
NTSC configurations	HRDE4F80 – 4 channel video/audio DVR with 80GB of digital storage
PAL* configurations	HRDE4F80X – 4 channel video/audio DVR with 80GB of digital storage

*Difference in the power cable only – video inputs are PAL/NTSC switchable

NOTE: Honeywell reserves the right, without notification, to make changes in product design or specifications.

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