

A-SDR402E Series Low Cost 4-Channel Digital Video Recorder



General Operation

The A-SDR402E is a highly stable four-channel digital video recorder based on an embedded RTOS (Real-Time OS) operating system with an internal watchdog timer and auto restart upon power loss. The unit is designed for real-time display and recording capabilities for four video inputs, four audio inputs, and powerful alarm handling with one-to-one action for each event. The A-SDR402E records up to 120 images per second at standard resolution (30-ips per channel), 60 ips when set to high resolution, and 30 ips when set to very high resolution; the unit also offers multiple archiving options using an external USB flash-drive, hard disk drive or CD-RW drive.

IR Remote Control

The A-SDR402E includes an IR remote control permitting operation and programming of all menus.

Panic Mode

The A-SDR402E features an emergency "panic" record mode activating all camera inputs to record regardless of programmed time-lapse or event recording schedules. The panic mode can be activated by pressing a button on the front panel or the remote control. For normal recordings, the unit provides multiple recording options for time-lapse, event recording (motion, alarm-in, text-in, video-loss) and even pre-event recording.

S.M.A.R.T Monitoring

The A-SDR402E utilizes advanced Self-Monitoring, Analysis and Reporting Technology (SMART) to monitor the internal IDE HDDs. The technology senses potential fault conditions within the DVR and will report the information on-screen.

Graphical User Interface (GUI)

The A-SDR402E features a graphical user interface, which is easily navigated using the front panel controls, optional mouse or remote control. All system programming and control is accomplished using on-screen pull-down menus and easy to follow dialog boxes.

Remote System Operation

The A-SDR402E supports remote access via TCP/IP supported networks. Remote access and control is available using IE browser v6.0 and above through the built-in

web server WebGuard. The client-based remote software (Remote Administration Software-RASplus) included with the unit allows programming, control, live viewing and image search from the remote location. Multiple A-SDR402E units may be addressed and remotely accessed simultaneously using only one copy of the RASplus program.

The Remote Administration Software (RASplus) provides reporting functions including a live system status; event and system log searches, and allows programming of the remote unit. Using RASplus provides remote monitoring of video images from single or multiple sites. The images may be viewed full-screen, 2x2, 3x3 or a variety of multi-segment displays up to 64 segments on screen simultaneously. The Search function provides a duplex remote search and playback of the recorded images and also provides image zoom, interpolation, file save and file print.

The local A-SDR402E can send exception event and alarm notifications to a remote monitoring location running the RASplus software to alert the remote station when an alarm or triggered event has occurred (TCP/IP networks only), or alert individuals using the pager "call-back" function.

System Archive

The A-SDR402E recorder features an advanced archiving system using a compressed file format with executable "player" software saved with each image file. This allows for the transfer of Chain Fingerprint Encryption (CFE) with each image file. The A-SDR402E recorder offers a front panel USB port for image archive. Using the built-in USB port with an external USB HDD or USB CD-RW the unit can archive video fast and efficiently.

Connector Interface

The A-SDR402E DVR offers a standard BNC and VGA output connectors permitting a wide range of CRT or LCD video monitor options. The unit features loop through BNC video connections and four audio inputs and one output. The internal network card (RJ-45) permits connection to IP supported networks. The RS-485 connection terminal allows the DVR to control Pan-Tilt-Zoom cameras and supports more than forty-five different protocols.

Features

- 4-Channel Digital Video Recorder with 4-Channels of Audio
- Built-in web server allows remote connection through a web browser e.g. Internet Explorer v6.0 or higher
- 120-ips – CIF resolution
60-ips – 2CIF resolution
30-ips – 4CIF resolution
- 336x224 - CIF Resolution
672x224 - 2CIF Resolution
672x448 - 4CIF Resolution
- IR Remote Control (included)
- USB v.2.0 port with full mouse support
- Quad, Full-Screen and Sequential Camera Views with built-in 2x zoom
- One-Button PANIC Record
- Composite/VGA Monitor Outputs / VGA Monitor Outputs
- Remote Monitoring using TCP/IP
- User Friendly Graphical User Interface (GUI) with PTZ control
- Time-Lapse, Event and Pre-Event Recording Selectable by Camera
- Variable Recording Speed / Image Quality by Camera
- Programmable "Event-Action"
- Built-in Motion Detection, Text-in, Alarm-in and Video-loss Alarm Inputs
- Point-of-Sale (POS) interface
- Powerful Search Function for Calendar, Date/Time, Event, and POS Query
- Key-Lock Security / 256 individual users
- Chained Fingerprint Encryption
- Callback (TCP/IP), or SMTP email
- Overwrite or Stop HDD Recording Options
- Multi-Language Menus

Ordering Guide

SCN#	Item
A-SDR402E-250	4-channel Digital Recorder, USB, 250GB, Remote Operation, Image Archive



Specifications

VIDEO

Signal Format	NTSC or PAL (auto detect)
Video Input	Composite: 4 looping inputs
Monitor Outputs	Composite: One (BNC), 1 Vp-p, 75 Ohms Analog RGB: One VGA
Display Resolution	720x480 (NTSC)
Record Resolution	Standard: 336x224 (NTSC) High: 672x224 (NTSC) Very High: 672x448 (NTSC)
Playback/Record Speed	120ips (standard resolution) 60ips (high resolution)
(images per second)	30ips (very high resolution)
Codec	MPEG4 (Part-2, ASP Profile)

INPUTS/OUTPUTS

Alarm Input	4 TTL, NC/NO programmable, 4.3V threshold
Alarm Output	1 relay out, terminal block, NC&NO, 0.5A @ 125VAC, 1A @ 30VDC
Alarm Reset Input	1 TTL, terminal block
Internal Buzzer	80db at 10cm
Network Connectivity	10/100 Base Ethernet
Audio Input	4 line level
Audio Output	1 line level

CONNECTORS

Video Input	Composite: 4 BNC
Video Loop	Composite: 4 BNC
Monitor Output	Composite: 1 BNC Selectable CVBS – VGA (15 pin D)
Audio In	4 RCA connector
Audio Out	1 RCA connector
Alarms	Terminal block
Alarm Reset In	Terminal block
Ethernet Port	RJ-45
RS-232 Serial Port	DB9
RS-485 Serial Port	Terminal block
USB Port	1 front panel 2.0
IR Port	1 remote control

STORAGE

Primary Storage	1 HDD
Backup Storage	USB (HDD, CD-RW, Flash Drive)

GENERAL

Dimensions (W x H x D)	13.38" x 1.81" x 12.20" (340mm x 46mm x 310mm)
Unit Weight	7.05 lbs. (3.2kg)
Shipping Weight	9.7 lbs. (4.4kg)
Shipping Dimensions (W x H x D)	18.1" x 6.2" x 16.1" (460mm x 158mm x 410mm)
Operating Temperature	41°F to 104°F (5°C to 40°C)
Operating Humidity	0% to 90%
Power	100–240 VAC, 0.6A, 50/60Hz

APPROVAL

UL, CB, CE, FCC, MIC

Specifications subject to change without notice.

Recommended System Components

Part Number	Description
ML757	17" LCD VGA-only, 1280x1024, black plastic case
ML970W	19" Wide LCD VGA-only, 1440x900, black plastic case
M170CP2	17" LCD Monitor 1280x1024, narrow bezel, plastic, cctv/pc
M190CP2	19" LCD Monitor 1280x1024, narrow bezel, plastic, cctv/pc
A-MC1574FN	15" Color Monitor, CRT, 500 TVL, 2-ch A/V, SVHS
A-MC2174FN	21" Color Monitor, CRT, 500 TVL, 2-ch A/V, SVHS
CONKIT4C	Interface Box, 4-channel Video/Audio/Alarm, RJ11, BNC, RCA, 15VDC (includes video connection cables)
A-XDLBW2	Lockbox, DVR
BB-3	Cable, 3' BNC to BNC, RG59
BB-6	Cable, 6' BNC to BNC, RG59
ACB-6	Cable, 6' RCA to RCA, audio

Storage Duration

The A-SDR402E records up to 120 images per second at standard resolution (30-ips per channel) and the tables illustrate a typical recording duration for CIF, 2CIF and 4CIF record resolutions with a single video input, with continuous video recording and no audio for the recorder with a 250-GB hard disk drive. The actual storage duration will vary depending on the number of cameras recorded, the image quality selected, the recording speed, recording schedule, motion content of the images and the number of stored events.

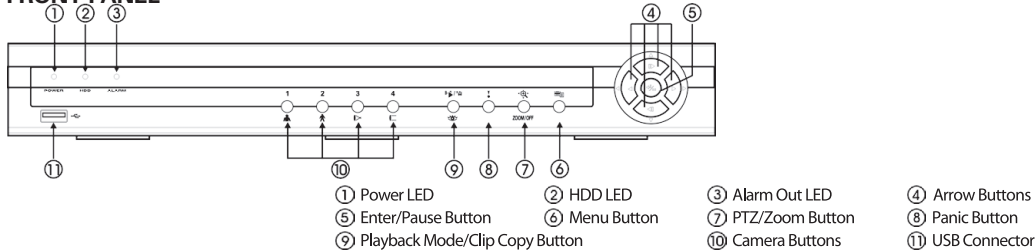
250-GB HDD Record Rate (ips)	Record Image Quality (CIF, 336 x 224)			
	Low days	Standard days	High days	Very High days
30	48.2	24.1	12.1	8
15	96.5	48.2	24.1	16.1
5	289.4	144.7	72.3	48.2
1	1446.8	723.4	361.7	241.1

250-GB HDD Record Rate (ips)	Record Image Quality (2-CIF, 672 x 224)			
	Low days	Standard days	High days	Very High days
15	48.2	24.1	12.1	8
10	72.3	36.2	18.8	12.1
5	144.7	72.3	36.2	24.1
1	723.4	361.7	180.8	120.6

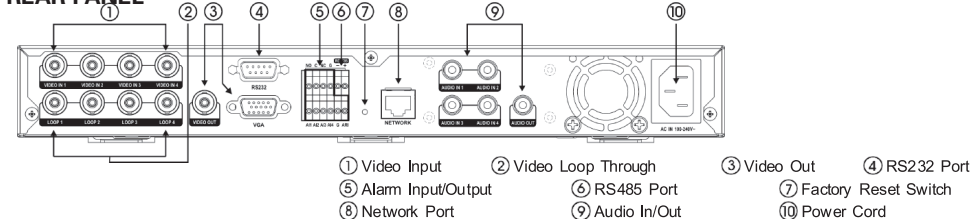
250-GB HDD Record Rate (ips)	Record Image Quality (4-CIF, 672 x 448)			
	Low days	Standard days	High days	Very High days
7.5	45.2	22.6	11.3	7.5
5	72.3	36.2	18.1	12.1
1	361.7	180.8	90.4	60.3

Storage is for one input; divide by number of cameras used.

FRONT PANEL



REAR PANEL



T1567-05

© 2009 ADT Security Services, Inc.



ADT Always There™