

## Features

- Quad stream support- H.264/ Dual-MPEG-4/ MJPEG
- 26x Optical Zoom/12x digital zoom
- Day/Night with IR-cut filter
- 400°/second Preset targeting
- 256 presets/1 programmable cruise
- 8 alarm in/1 output
- Two-way audio
- Bidirectional PTZ Coordinate Data
- Analog Output
- 24 VAC



## Description

The Siquira® HD60 ensures excellent pictures even under the most difficult circumstances by offering features like day/night and digital slow shutter.

### Quad Streaming

The versatile HD60 is capable of streaming H.264, dual MPEG-4 and MJPEG simultaneously. Each stream is optimized for its purpose, e.g., high-quality MJPEG live viewing, low-bandwidth H.264 or MPEG-4 storage, and low-resolution MJPEG for web applications or remote devices (e.g., PDAs). The H.264 implementation is based on dedicated hardware resulting in unparalleled video quality.

### Open Streaming Architecture (OSA)

The HD60 is designed to comply with the worldwide adopted standards for streaming video. Its OSA offers standardized streaming video and remote control. All streaming protocols are based on approved standards and tested with different vendors. A comprehensive HTTP API gives access to all controls and makes integration with third party VMS easy. In addition, the HD60 supports Siquira's unique MX™ protocol.

### Day/Night and Backlight Compensation

The HD60 is provided with an automatic Day/Night functionality, which is used in low light situations and a Backlight Compensation functionality for use in different scenes. This means, the HD60 provides a clear picture for the operator, no matter what the lightning situation is.

### High-Speed Dome

This network high-speed PTZ dome has 26x auto focus zoom lens with the 12x digital zoom. Because the lens can move in almost any direction (pan and tilt), this camera offers a wide range of observation without missing the smallest details. In addition, the precision 400° per second pan and tilt drive technology offers almost instant preset positioning.

### Audio, I/O Contacts and Analog Output

By combining streaming video with duplex audio and I/O contacts over IP, the HD60 provides all the interfaces necessary for any IP CCTV application. The balanced audio inputs/outputs are suitable for all industrial audio systems. With its analog output, the HD20 is a hybrid solution and can provide local video for a public view monitor or local DVR.

### Privacy Masks

Privacy masks cover sections of the image and shrink or grow according to the camera's zoom. This feature is often requested for such situations as city center surveillance and point of sale keypads.

## Ordering Information

Model	Description
MD22 /N	Mini network PTZ dome, day/night, vandal-resistant, IP66
MD22 /P	Mini network PTZ dome, day/night, vandal-resistant, IP66

\*WM02 is included with each outdoor MD and HD camera

# HD60

## Technical specifications

# IP PTZ dome with day/night (indoor)

### Camera

Image sensor	1/4" Progressive Scan CCD	
Optical zoom	26x	
Digital zoom	12x	
Resolution	NTSC	PAL
Effective pixels	380k	440k
Horizontal resolution	480 TVL	480 TVL
D1	720x480	720x576
1/2D1	352x480	352x576
2CIF	720x240	720x288
CIF	352x240	352x288
QCIF	176x120	176x144
Electronic shutter	1/2~1/30 k s	
Synchronization	Internal/line lock	
Video output	1.0 Vpp/75Ω, BNC	
S/N ratio	>50 dB (AGC off )	
Minimum illumination	0.07 lux (color), 0.01 lux (B/W)	
Focal length	3.5~91mm	
Focus mode	Auto/ manual	
White balance	Auto/ manual	
Iris control	Auto/ manual	
AGC control	Auto/ manual	
Backlight compensation	On/ Off	

### Audio

Two-way audio	Line out, Line in/mic in (jack Ø3.5 mm)
---------------	---

### Functions

Motion detection	On/ Off
Day/ Night (IR-cut filter)	On/ Off
Digital slow shutter	On/ Off

### Contacts

Alarm input	8
Alarm output	1
Alarm reaction	Preset, Sequence, Auto pan, Cruise

### Video

Number of video streams	H.264, 2x MPEG-4 and/or MJPEG
Frame rate	1 to 30 fps
Compression algorithm	H.264 BP (ISO/IEC 14496-10) MPEG-4 SP Layer 5 (ISO/IEC 14496-2), MJPEG
Type of streaming	UDP/IP (multi- and/or unicast)
Number of output streams	Up to 20
Video Motion Detection	Yes (user-defined masking)
Encoding latency	<130 ms typ
GOP structure	I, IP (selectable/user profiles)
Frame rate	1 to 30 fps
Quad streaming	D1@30fps H264 + D1@30fps MPEG-4 + CIF@1fps MJPEG
Output data rate	up to 20 Mb/s (CBR or VBR selectable/user profiles)
Video settings	User profiles, contrast, brightness, color saturation, hue, sharpness
Video overlay	3x Text lines (configurable: position, color, border/outline color, font size), 1x image in BMP, GIF, or JPEG format (configurable: position, scaling)

### Network

Interface	RJ45
Protocol	H.264 BP, MPEG-4 ES, RTP, UDP, IP, DHCP, IGMPv2, RTSP, (S)NTP, MX/IP, HTTP, SNMP v2, DiffServ, SAP, UPnP

### Pan/Tilt

Pan travel	360° endless
Tilt travel	-10° ~ 190°
Preset speed	400°/s
Manual speed	1° ~ 90°/s
Presets	256 presets
Preset accuracy	0.225°
Cruise	1
Sequence	8
Auto pan	4
Proportional pan & tilt	On/ Off
Resume after power loss	Yes
Zone title	16
Home function	Preset, Sequence, Auto pan, Cruise
Auto flip	Digital/Mechanical/Off

### Mechanical

Dimension (h x w x d)	Ø131 x 220.5 mm (Ø5.2 x 8.68 in.)
Weight	1.6 kg (3.5 lbs.)
Color	RAL-9003 (Signal White)

### Environmental

Operating Temperature	0°C to +40°C (+32°F to +104°F)
-----------------------	--------------------------------

### Powering

Power consumption	27W
Power	19.2 - 28.4 VAC (24VAC nominal +/- 20%)



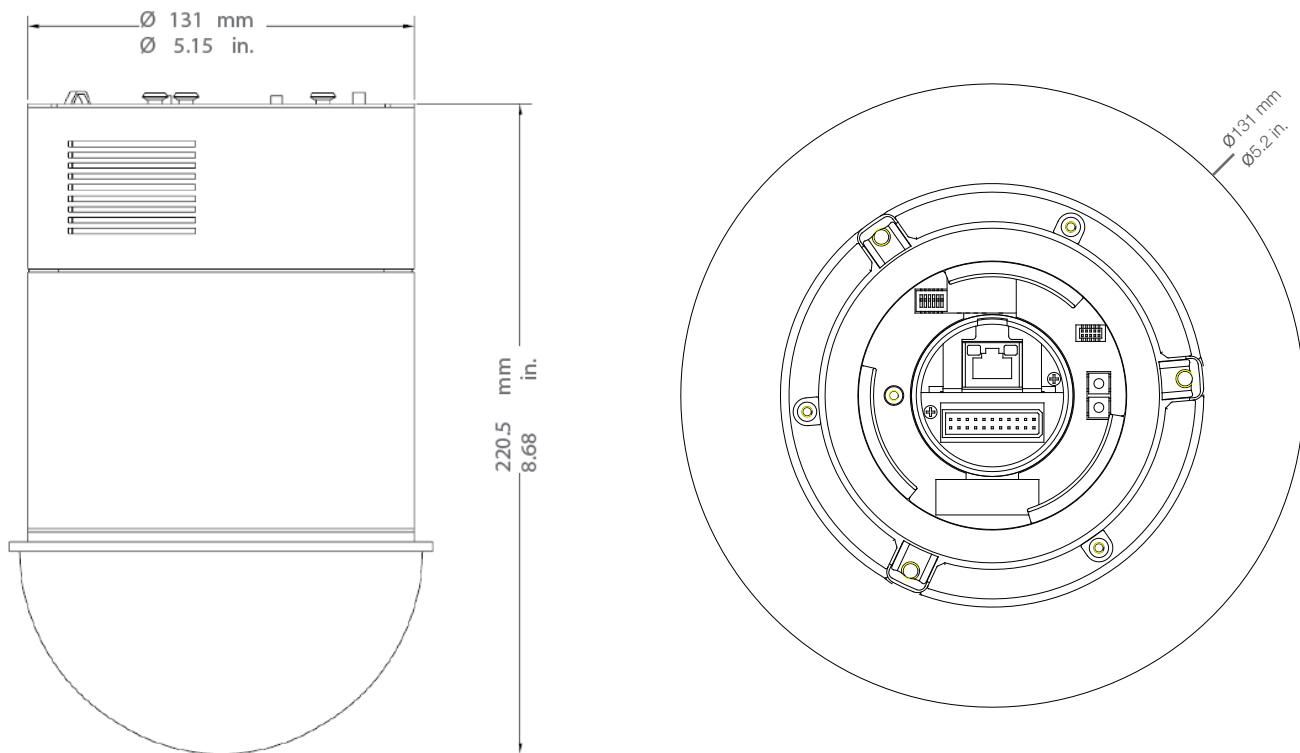
The quality management system utilized in the development, production, sales and support of this product is ISO 9001:2008 certified by LRQA.

© Optelecom-NKF Version: January 2010 V1 (First Edition) – Subject to modification

[www.siquira.com](http://www.siquira.com)  
[www.optelecom-nkf.com](http://www.optelecom-nkf.com)

HD60  
 Technical Drawing

IP PTZ dome with day/night (indoor)



Ordering Information Accessories

Model	Description
PA01 /EU	Power adapter 220~235 VAC to 24 VAC /1,5A for HD-series with no use of heater (indoor), with EU plug
PA01 /US	Power adapter 220~235 VAC to 24 VAC /1,5A for HD-series with no use of heater (indoor), with US plug
CM01	Straight tube 25 cm
CM02	Straight tube 50 cm
CM03 /HD	Hard ceiling mount indoor HD-series
CM04 /HD	Flush mount indoor HD-series
WM01	Mini wall mount for HD-series
WM02 /HD	Tube adaptor for indoor HD-series, compatible with CM01, CM02 and WM03



The quality management system utilized in the development, production, sales and support of this product is ISO 9001:2008 certified by LRQA.

© Optelecom-NKF Version: January 2010 V1 (First Edition) – Subject to modification