



### Internal Dome Design

Normally recessed into a false ceiling to provide minimal intrusion in any indoor location. Or, when surface-mounted the sleek design will let it blend into a variety of environments for inconspicuously effective surveillance.

### Direct Drive Motor for more accurate and reliable camera movement

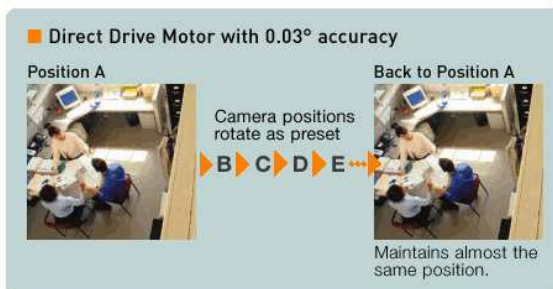
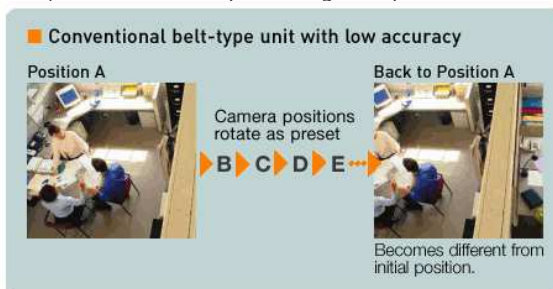
The VN-V686BU incorporates a newly-developed Direct Drive Motor for Pan/Tilt operation. Instead of a conventional belt-type mechanism, it can provide monitoring with more precision, less operation noise, and superior durability.

### Super Fast (400°/sec) & Super Slow (0.04°/sec) Pan/Tilt Performance

With a maximum 400°/sec. movement, you won't miss a crucial scene. Even when pan/tilting manually, the mechanism is very responsive allowing precise, natural joystick operation. Furthermore, extremely slow movement of 0.04°/sec. is possible, so you can carefully examine a scene even at the highest zoom magnification, thanks to the slow and smooth movement.

### Super Accuracy of $\pm 0.03^\circ$ for Preset Positions

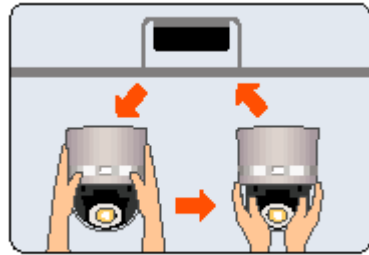
With an accuracy of  $0.03^\circ$ , the VN-V686BU can precisely maintain preset camera positions even after frequent panning and tilting—especially important at high zoom magnifications. With an ordinary camera (with low accuracy such as  $0.1^\circ$ ), the camera position gradually shifts each time the camera is panned or tilted, so that after frequent usage the position becomes totally different from the initial correct position.



Images are explanatory purposes and are not actual images attained using this product.

### Super Silent Operation of 37dB or lower

The mechanical noises of a belt-driven PTZ camera are absent. In fact, the operating noise as measured from a mere 1m away from our camera amounted to a quiet approx. 37dB. This makes it ideal for usage in locations where noise should be avoided, such as hospitals, museums, libraries and offices.



Plug-and-Play !



### Super Durability and Reliability

Direct Drive is a very simple mechanism. The number of parts in the mechanism is far less than that of belt-driven PTZ cameras, so one can expect the durability to be approximately 160%. And since the Direct Drive is completely belt-less, there is no possibility of malfunction due to belts that will break on a regular basis. The simplified mechanism greatly reduces the chances of malfunction and increases reliability.

### 36x Optical Zoom for Incredible Magnification

The VN-V686BU comes with a powerful 36x optical zoom to provide incredible magnification with full optical quality. It is powerful enough to allow identification of a face or a license plate located far away.



36x

### Quick and Easy Installation and Maintenance

Thanks to its "One-touch lock" mechanism, installation is extremely easy. Simply insert the camera unit to the bracket, and that's all. Maintenance is easy too. You can replace only the camera unit with the base unit remaining attached. All preset settings will resume so that you can minimize operation downtime.

### Ecology-Conscious PoE for Saving Power and Costs

Built-in PoE (Power over Ethernet) allows the camera to be activated through a LAN cable connection. Both power supply and video transmission are covered by a single cable, reducing costs for cables, installation, and power. With a power consumption lower than conventional models, the VN-V686BU can minimize impact on the environment.

### Progressive Output for Clearer Images

The VN-V686BU progressive output images are optimal for monitoring on LCD or TFT monitors. You can obtain jaggy-free noiseless images even for moving objects.



Progressive Output



Interlaced Output

### EasyWide-D Function for backlight compensation

This function is equivalent to the conventional Wide Dynamic Range function, allowing pictures to be adjusted to identify details of the subject by adjusting gamma curve even in difficult backlit conditions.



Normal picture



Adjusted with Easy Wide-D

### IR Cut Filter for Round-the-Clock Surveillance

The IR cut filter automatically switches between ON and OFF according to the level of ambient light. In daytime it outputs a high-quality colour image, and at night the filter mechanism removes the IR filter to output black-and-white images with greater sensitivity.

(When utilizing IR lamps, an external trigger for night mode is recommended.)

### Privacy Mask for Protecting Intrusive Monitoring

Up to 8 masked areas can be set as hidden areas to protect subjects from invasion of their privacy.



Without Privacy mask



With Privacy mask

### Proven Reliability

Assurance of reliability comes not only from JVC's years of experience and solid track record, but also by inspecting every single product at our QC facility based on our strict quality standards. For all models, this includes grueling tests for Pan/Tilt and Zoom in/out movement accuracy, and for outdoor models, severe tests against water, dust, and shocks are applied to ensure stable performance that conforms to the IP66

- Tests like these are applied to each and every model.  
Count on durability.

**2**  
million times  
of zooming

**4**  
million times  
of focusing

**5**  
million times  
of panning

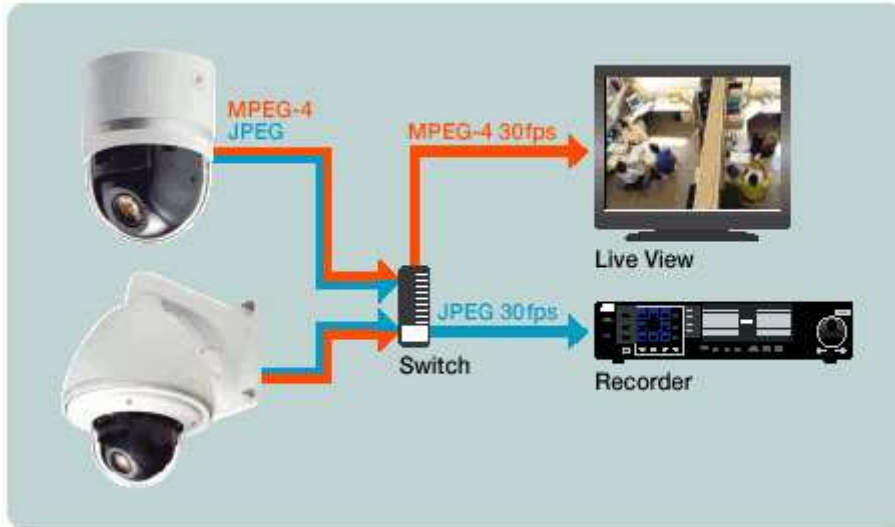
Numbers are guides and vary depending on the usage conditions.

Standard.

### MPEG-4/Motion JPEG Full-Frame Dual Stream

The VN-V686BU can stream both MPEG-4 and Motion JPEG VGA images simultaneously at the full frame rate (30fps for each stream). MPEG-4 distribution is ideal where monitoring with smooth, high frame rate images is required within a limited bandwidth. Motion JPEG images are useful when you need to record images as

evidence data, because of the high quality still pictures it can provide.



#### **Electronic Sense-Up for Low-Light Situations**

Electronic sense up function provides higher sensitivity level for monitoring in dark locations by lengthening the exposure time automatically.

#### **CRT/LCD Selectable Display Mode**

By choosing the display mode that matches the monitor being used, you'll get images with optimal brightness regardless of whether you are using a CRT or LCD monitor.

#### **Image Stabilizer**

Even in cases where the camera is shook by the wind or vibrations coming from its surroundings, the Image Stabilizer function helps reduce image blur. This function is invaluable in outdoor setups, such as Pendant mount style installations which are especially susceptible to the effects of vibrations.

#### **Motion Detection and Tracking**

This function outputs an alarm whenever movement is detected within a pre-specified area of the image. It can also be used to automatically track a moving object or person.

(The blue frame of the detected subject is shown only in Demonstration Mode.)



Image device	1/4" IT CCD
Lens Zoom ratio	36x optical and 32x digital
Lens Focal length	f=3.43mm to f=122mm
Max. aperture ratio	F1.6 (WIDE) to F4.5 (TELE)
Max. close-range	Approx. 1.8m (TELE), Approx. 0.6m (WIDE)
Focus	Manual/Easy AF/One push AF
Day/Night	Automatic Day/Night IR cut filter
Minimum illumination	<b>Color:</b> 1.0 lx (50%, AGC SUPER) 0.5 lx (25%, AGC SUPER) <b>B&amp;W:</b> 0.08 lx (50%, AGC SUPER) 0.04 lx (25%, AGC SUPER)
Pan/Tilt range	Pan: 360°endless / Tilt: -5°to 185°
Pan/Tilt speed	0.04°to 400°/sec
Picture compression	Motion JPEG MPEG-4: Part2 (ISO/IEC 14496-2), Profile: SP
Picture resolutions	640x480, 320x240
Frame rate and streaming	Up to 30 fps per each stream of Motion JPEG and MPEG-4 in 640x480 resolution simultaneously (Full frame dual stream)
Compression levels	JPEG: Variable (VFS) 7 levels/Average (AFS) VGA (10KB–100KB), QVGA(3KB – 33KB) MPEG-4: Constant (CBR) / Variable (VBR), Bit rate adjustable 64kbps – 8000kbps
Image settings	Configurable AGC, Sens-up, Day/Night, Shutter speed, BLC, ALC, White balance (ATW/AWC), Gamma curve, Black level, Enhance range, Color level, Exposure value, Noise reduction, Monitor type, Privacy mask (8 areas), Image stabilizer
PTZ function	100 preset positions, Auto flip, Auto pan, Auto trace, Auto patrol, Auto return, Motion detect, Auto tracking
Shutter speed	2.1sec (Sens-up) to 1/10000 sec
Security	3 levels password, IP address filtering, HTTPS encryption (for setting)
Max. clients	20 simultaneous users, Unlimited users by multicast
Alarm/Event management	Trigger: Built-in motion detection, External alarm input x 2 or Schedule Event: Pre/post recording , FTP sending, Notification over TCP/UDP, E-mail, External output x 2, Periodic FTP and Preset position, Pre/Post alarm buffer of 8MB
Connectors	RJ-45 for Ethernet 10Base-T/100Base-TX Terminal block for 2 alarm input, 2 output Alternative power connection
Dust and water protection	—
Power	24 VAC (50Hz/60Hz), 1.2A 48 VDC (PoE, IEEE802.3af class0), 12.95W
Operating temperature	-10°C to 50°C/14°F to 122°F (0°C to 40°C /32°F to 104°F recommended)
Installation and maintenance	Web based setting tool, Camera search tool, Firmware update over HTTP
Recommended operating environment	OS: Windows Vista Business (SP1), Windows XP Pro (SP2)/Home (SP2) CPU: Pentium4 2GHz, Memory: 1GB, HDD space: 512MB Display and video card: 1024x768 True color (24bit or 32 bit), VRAM 8MB Browser: IE7.0 for Windows Vista, IE6.0 for Windows XP
System integration support	Open API for application integration, ActiveX Viewer, QoS, Embedded Linux operating system
Supported protocols	TCP/IP, UDP/IP, HTTP, FTP, ICMP, ARP, RTP, DHCP, SNMP, SMTP, DSCP, IGMP, IPv6, VSIP
Video management software/hardware (Not included)	VR-N900U/1600U/1600E: JVC Network video recorder for viewing, recording and archiving up to 9/16 cameras VN-RS800U: JVC free video management software for viewing, recording and archiving up to 32 cameras (JPEG stream only)
Dimensions (WxHxD)	ø160mm x 201mm (H)
Weight	1.9kg (4.2lbs)