



# VIP1903

## Motorola Advanced IP High-Definition Set-top

Strengthen your IP Video leadership – Count on Motorola's VIP1903 to help you deliver innovative, advanced IP experiences to your premium customers.

### Highlights

- Easy to use and install
  - Connects to High Definition or Standard Definition TVs
  - Offers superior high definition video and all digital sound quality
  - Supports Standard Definition and High Definition (SD/HD) high-quality digital video
  - Supports 5.1 digital audio

The Motorola VIP1903 is a compact, superior, HDTV IP set-top. The VIP1903 allows operators to expand their subscriber base, increase customer satisfaction, and grow their average revenue per user by offering their consumers rich home entertainment experiences with crystal clear HD picture and surround sound – as well as the flexibility of watching on-demand services whenever they want.

The VIP1903 is part of Motorola's comprehensive, secure, flexible, reliable, scalable, and open end-to-end IPTV Solution Suite, enabling operators to effectively compete with the incumbent TV broadcasters, while bringing down the cost of delivering compelling next-gen HD IP video experiences. With deployment of the VIP1903 operators will retain high-value customers and grow their subscriber base, increase average revenue per user (ARPU), and lower capital spending, all while improving customer loyalty and retention.

With the VIP1903, Motorola redefines the IP Video experience, enabling operators to accelerate their time to revenue, while providing their subscribers with a quality, next-generation IPTV.

The VIP1903 allows operators to deliver a myriad of differentiated offerings—meeting the growing consumer demand for personalized video content and delivery options—while balancing the operator's need to closely manage their capital investment and operating expenses.

The VIP1903 offers subscribers the latest advanced IPTV experiences and features, including,

### Capabilities:

- Digital TV functionality, high-quality broadcast TV, and interactive electronic program guide (EPG)
- Two-way IP capabilities to support multiple interactive TV applications, such as Video/TV on demand, nPVR with time shift and catch-up TV
- Feature-rich interactive applications and graphics such as Flicker, RSS news feed, and home networking (DLNA)
- Digital video scaling and hardware support for picture-in-picture

### Features:

- A high-end system-on-a-chip (SoC) single 450 MHz 800+ DMIPS microprocessor and enhanced graphics to decode HD and SD digital TV and output high-quality surround sound audio
- High Performing capabilities:
  - Two-way IP data communication
  - 256 MB DRAM
  - 64 MB Flash memory
- Full range of industry-standard audio, video and data inputs / outputs
  - Rear panel interfaces include - Ethernet, USB, dual SCART, HDMI™, Component video, analog and digital audio
  - Front panel interfaces include Status LED and IR receiver
  - Optional – SmartCard interface
  - Optional – front panel display and control keys

## DATA SHEET

VIP1903

Motorola Advanced IP High-Definition Set-top

### More Highlights

- Interactive IP set-top - supports multiple feature-rich advanced applications and graphics like Electronic Program Guides (EPG), Multicast TV and Video-On-Demand (VOD)
- Support for secure Digital Rights Management (DRM) and conditional access systems with integrated Secure Processor
- Supports High-Definition Multimedia Interface™ (HDMI) connectivity with High-Bandwidth Digital Content Protection (HDCP)
- Supports multiple IR protocols – Universal Remote Control friendly
- Secure - Rovi® and CGMS-A analog copy protection schemes
- Supports multiple video codecs for optimum deployment flexibility - MPEG-4 (H.264) and MPEG-2
- Environmentally friendly - CoC v8 compliant, and RoHS compliant

The VIP1903 is powered by the Motorola KreaTV™ application platform. KreaTV uses the Linux kernel and provides open, well-defined APIs for application development and customizations. The KreaTV Software Developer's Kit (SDK) offers operators, as well as third party integrators, a fast track to high-quality, revenue-generating digital TV offerings as well as value-added services combining TV and Internet media. KreaTV is integrated with leading VOD, middleware and conditional access systems.

As a global leader in IPTV solutions, Motorola offers service providers quick time-to-revenue IPTV deployments with flexible service/content packages for consumers, new billing options, and end-user personalization. At the same time, Motorola's IPTV software and services portfolio increases an operator's ability to differentiate and personalize offerings across multiple media, generating new revenue opportunities and improving the customer care system.

### KreaTV™ highlights:

- High performance graphics
- Powerful UI engines (HTML or SVG)
- DLNA support for media sharing and connected home features
- Efficient web browser (WebKit)
- Support for a variety of codecs and media formats
- Integrated tools for QoS and monitoring



### The VIP1003/VIP19x3 Series Set-top Family

This product comparison matrix summarizes the VIP1003/VIP19x3 platform hardware architecture. The models in these series run the same software and can co-exist on the same network, enabling service providers to maximize their capital investment, while deploying flexible market segmentation.

Model	VIP1003	VIP1903	VIP1903T	VIP1963	VIP1963T
Type	Low cost IP	IP	IP/DVB-T	IP with HDD	IP/DVB-T with HDD
Region	EU	EU	EU	EU	EU
RAM	256 MB	256 MB	256 MB	256 MB	256 MB
Applications FLASH	64 MB	64 MB	64 MB	64 MB	64 MB
Tuner			1 DVB-T		2 DVB-T
HDD				160/320 GB	160/320 GB
HDMI	1	1	1	1	1
SCART	1	2	2	2	2
Component (Y/Pb/Pr)		1	1	1	1
RGB	**	*	*	*	*
S-Video		*	*	*	*
CVBS	**	**	**	**	**
Audio R+L	**	1	1	1	1
TOSLINK		1	1	1	1
S/PDIF	1	1	1	1	1
USB 2.0	1	2	2	2	2
Smart Card interface		Optional	Optional	Optional	Optional
Display and Keys		Optional	Optional	Optional	Optional

\* Available in TV SCART

\*\* Available in SCART

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VIP1903

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In addition to delivering high-quality digital video products to its customers, Motorola is also committed to helping its customers reduce their environmental footprint. We approach this in several ways: improving the environmental profile of our products, running our operations in a safe and energy-efficient manner and helping our customers to be greener when they use our products.

Motorola's VIP Series set-tops help service providers lower their energy consumption, thereby helping them reduce their carbon footprint. Motorola has a global commitment to be part of the solution to climate change, and has worked for years to continually improve our environmental profile. We are in step with our customers and their increasing interest in partnering with a company that helps them reduce their environmental impact, while offering compelling products to help them grow their eco-conscious customer base.

Motorola is working to make products with a reduced environmental impact. In the development of our next-generation VIP series set-tops, we have focused on energy efficiency, lead-free manufacturing, and packaging / recycling enhancements. Depending on models and market, our units are compliant with European Code of Conduct regulations. In addition, the devices and power supplies are lead-free and RoHS compliant. Finally, all new VIP set-tops use environmentally friendly package designs. They are available in single bulk pack boxes that eliminate the use of suspension plastic and reduce box size, thereby reducing waste and transport costs. Motorola's VIP set-top packaging is 100% recyclable and is marked with standard recycling codes to make it easier for our customers to identify recycling opportunities.

## Specifications

### VIDEO INTERFACES

High definition TV:	HDMI with HDCP v1.2, YPbPr for component video
Standard definition TV:	Dual SCART with RGB, CVBS and S-Video output
Video Codecs:	MPEG-2, MPEG-4 AVC (H.264), VC-1, WMV9

### AUDIO

Digital audio:	Optical (Toslink) and electrical S/PDIF
Analog audio:	L/R RCA stereo connectors
Audio Codecs:	Dolby® Digital, MPEG-1 (MUSICAM), MP3, AAC LC, HE-AAC

### OTHER INTERFACES

IR receiver for remote:	36 kHz
USB:	Two USB 2.0 connectors (rear panel)
Ethernet:	10/100Base-T Ethernet (RJ-45)
Power input:	5.7 VDC, 3A
Optional:	SmartCard interface (ISO 7816 [1/2/3]) 4 digit 14 segment alpha-numeric LED display and touch keys (front panel)

### SOFTWARE

KreaTV application platform	
Operating system:	Linux® 2.6
Software upgrade:	Remote software download/upgrade
Copy protection:	Rovi 7.01, CGMS-A, HDCP v1.2
User interface:	HTML/SVG UI engine

### VIDEO RESOLUTION

NTSC:	480i, 480p
PAL:	576i, 576p
High Definition:	720p, 1080i, 1080p

### PROCESSING

CPU:	450 MHz 800+ DMIPS
DRAM:	256 MB
Flash:	64 MB

### MIDDLEWARE

KreaTV:	Open platform supports multiple middleware solutions
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### SECURITY

KreaTV:	Open platform supports multiple DRM/CA solutions Advanced secure chipset with PKI/secure boot
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### ACCESSORIES

NYX™:	Standard remote control
MRCU180 (optional):	Multi-unit remote control
MKB22 (optional):	Keyboard
USB120IR (optional):	IR Extender

### PHYSICAL

Dimensions:	252 mm x 178 mm x 57 mm (WxDxH)
Weight:	1.2 kg
Power:	External power supply 100-240 VAC, 50/60Hz in, 5.7 VDC 3A out
Power consumption:	6.2W Max
Operating Temperature:	0 °C to 45 °C (32 °F to 113 °F)
Operating Humidity:	8% to 95% (non-condensing)

### OTHER

Limited warranty	Two years
Compliance	RoHS, CE, WEEE and CoC v8

Some features and codecs are dependent on software version and/or involve additional license fees.

Specifications subject to change without notice.



**MOTOROLA**

Motorola, Inc. [www.motorola.com](http://www.motorola.com)

Compliant with the European Commission  
Code of Conduct (CoC) v8



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