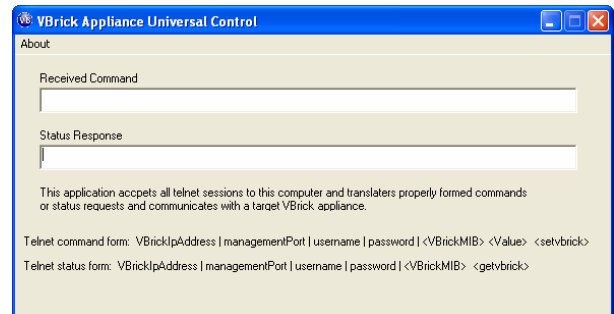


Controlling VBrick Appliances

Simple Control for Developers

All VBrick appliances can be configured, managed, and controlled via the VBrick's internal web server management interface, via a local control terminal, via telnet, via SNMP, and via a special COM object ("SDK"). For automation and programmatic control of a VBrick, it is very inconvenient (and often virtually impossible) to "parse" the human interface provided by the web server, control terminal, and telnet methods. The VBrick "SDK" cannot be used by popular 3rd party control systems (e.g. AMX, Crestron) and it requires a custom development application to make it useful. The "VBrick Appliance Universal Control" application makes it very easy to manage and control any number of VBricks from AMX, Crestron, and similar custom control applications with great simplicity.

The VBrick Universal Control application runs on any Windows computer. It accepts telnet calls to the IP address or host name of computer where it is running. It accepts a particular syntax that includes the identification of a target VBrick along with "get" or "set" parameters.



The application translates the received commands into VBrick machine language, communicates with the target VBrick, and reports status back to the telnet client. You can think of the application as a VBrick proxy server. All commands are sent to computer, and the computer instantly communicates with the target VBrick.

The application supports all VBrick features, such as setting an encoder bit rate, setting a decoder receive address, starting a recording, stopping a recording, configuring a file transfer, setting up a telepresence session, etc. The syntax of set and get command is very simple.

Set:

Ip|port|username|password|<parameter1>[<parameter2>]|<value1>[<value2>]<setvbrick>

Get:

Ip|port|username|password|<parameter><getvbrick>

Where

- **Ip** – the IP Address of the target VBrick
- **Port** – the management port of the target VBrick (default is 80)
- **Username** – the target VBrick username (default is operator)
- **Password** – the target VBrick password (default is operator)
- **<parameter>** -- the VBrick parameter as specified in the MIB
- **<value>** -- the set value for the parameter.

For set, there may be multiple parameters and values (minimum of one required). The parameters must be in the correct order. Generally, the parameters consist of a set of values followed by an “apply” for the group of values. All “Apply” parameters have a value of “2”

Examples:

Set the VBrick at 192.168.1.11 to 1500 Kbps encoding rate and 30 fps:

```
192.168.1.11|80|admin|admin|<vbrickSlot1EncoderVideoTargetBitRate><vbrickSlot1EncoderVideoTargetFrameRate><vbrickSlot1EncoderVideoApplySet>|<150000><30><2><setvbrick>
```

Set the VBrick at 192.168.1.11 to record file name “myvideotestfile.wmv” , the recording duration to 60 seconds, and start recording now:

```
192.168.1.11|80|admin|admin|<vbrickSlot1ArchiveFileName><vbrickSlot1ArchiveDuration><vbrickSlot1ArchiveApplySet><vbrickSlot1ArchiveStart>|<myvideotestfile.wmv><60><2><2><setvbrick>
```

Get the VBrick at 192.168.1.11 slot 1 encoding bit rate:

```
192.168.1.11|80|admin|admin|<vbrickSlot1EncoderVideoTargetBitRate>|<getvbrick>
```

Testing

The application comes with several test files that you may edit for your purposes. For testing, it is handy to open Windows Hyperterm, connect to the PC that is running the VBrick Universal Control application (if you use Hyperterm on the same computer, connect to "localhost"). Simply select Transfer / Send Text File and browse to the desired file.

Applications

- Controlling VBrick from AMX
- Controlling VBricks from Crestron
- Controlling VBricks from Linux computers
- Controlling VBricks from Apple computers
- Controlling VBricks from web servers

Limitations

The only possible concern is that telnet is not secure, hence you will be sending the VBrick username/password "in the clear". This is normally not a significant concern for most control applications, and the lowest password level (the VBrick appliance supports four different password levels) should be used depending on what feature you wish to set or get.