



## Mobile TV Made Easy Create. Encode. Broadcast.

**Live television over wireless networks is not science fiction. It's here and already mobile users all over the world are watching television in their handheld devices. Discover these endless possibilities with Live Engine LX from Popwire Technology.**

It's happening, and it's happening right now. All across the world, broadcasting corporations are either testing or have already gone live with the next step in mobile communications. With the opportunity to send video and audio to mobile units, broadcasters now have endless possibilities for content to reach viewers or listeners whenever and wherever they are.

### Rock Solid

Record uptimes are not the only attractive feature of Live Engine LX. Easy setup, an intuitive graphical user interface, optimized output for any mobile wireless network, standards-based RTP delivery and support for four simultaneous output streams are only a few key features.

It is not without considerable pride that Popwire Technology noted a uptime track record for the Big Brother project, where the Live Engine LX software was online and operational around the clock, seven days a week. In fact, to the knowledge of Popwire Technology, there has never been a failure of operation with Live Engine LX. Never.

### Brains by Popwire, Muscles by Linux

Linux has taken the world by storm in the last ten years and as a server platform for internet services. It offers great stability without an enormous price tag. Live Engine LX is certified to run on SUSE LINUX Professional 9.3 or later.

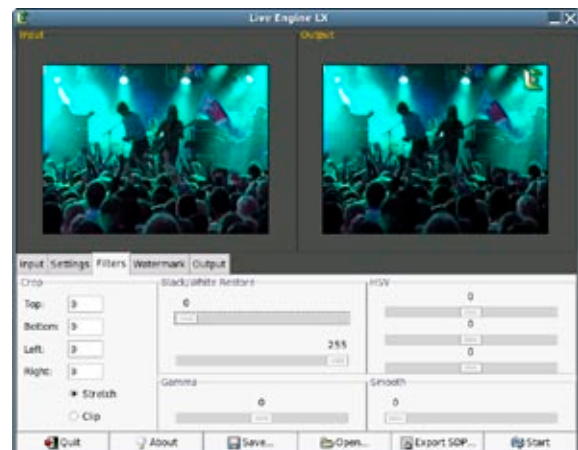
### Supporter of Open Standards

At Popwire Technology, we believe in open standards. That is why Live Engine LX runs on Linux and supports all compatible 3G/GPRS/Edge handsets and 3GPP compliant streaming servers. Live Engine LX also supports Video4Linux2 (V4L2) and Advanced Linux Sound Architecture (ALSA) as well as the Secure Shell, SSH, which is a defacto standard for secure and no-nonsense administration of the Live Engine LX.

Another open feature within Live Engine LX system itself is the possibility to easily 'clone' settings from one to several other servers, which makes for faster setup of several servers since an administrator never has to repeat the entire setup procedure for every single server.

### Dynamic Frame Rate Adaptation

When Streaming to bandwidth-sensitive devices such as mobile phones, bit rate is critical. Live Engine LX has numerous ways of staying within the bandwidth constraints; one of these is the continuous adjustment of frame rate as needed to ensure the best possible quality for the given bitrate.





## Features

Intuitive Graphical Interface, based on the Gnome window manager

Output optimized for distribution over any mobile wireless network

Remotely controllable using command line interface via Telnet or Secure Shell (SSH)

Standards-based RTP delivery over TCP/UDP

Dynamic Frame Rate Adaptation (see sidebar)

Support for four simultaneous output streams via multi-license.

Can run as a system service

## Filters

Crop

Smooth

Gamma correction

HSV: Hue, Saturation, Brightness (value)

Black and White Restoration

Watermark: PiP (Picture in Picture), apply a PNG file as watermark.

## Input Signal

Determined by the interfaces of the supported video and audio capture cards.

## Output Signal

MPEG4, SVPL 0/0b, H.263 baseline video, AMR NB, AAC LC audio (incl. stereo)

Packetizing according to 3GPP

## Operating system support

SUSE Linux Professional 9.3 or later

## Uptime Track Record

Popwire has not had a single failure of a Live Engine LX installation at a customer site. Not one. Not ever.

## System Hardware Requirements

Pentium 4 at 1.4GHz or more (Pentium 4 HT at 3GHz or more for multiple streams)

Video For Linux 2 (V4L2) compatible video capture cards\*

Advanced Linux Sound Architecture (ALSA) compatible audio capture cards\*\*

512 megabytes of RAM (1 gigabyte of RAM for multiple streams)

100 megabytes of free hard drive space

\*) While all video capture cards supported by Video For Linux 2 should work, only certain cards have been certified by Popwire Technology. Please check [www.popwire.com](http://www.popwire.com) for the latest list of certified video capture cards.

\*\*) While all audio capture cards supported by Advanced Linux Sound Architecture (ALSA) should work, only certain cards have been certified by Popwire Technology. Please check [www.popwire.com](http://www.popwire.com) for the latest list of certified video capture cards.

