

# PeerTV: The Future of Media Distribution

**P**eerTV is a comprehensive application for end users, content owners, and broadband operators that distributes video over Internet with live streaming and progressive download. It was recently launched in the Swedish market by startup company Peerialism. It offers its customers lower cost of distribution, reduced peak capacity investments, as well as higher viewing capacity (more simultaneous viewers), through advanced technology such as traffic optimization and P2P overlay networks.

To reach the objectives for PeerTV and to meet other customer requirements, Peerialism has developed advanced technology in several areas: innovative P2P components including P2P protocols and optimization algorithms (such as Chandelier) targeted towards live streaming, an integrated simulation and emulation tool (MyP2PWorld) to radically speed up development and shorten time to market, and new techniques for firewall hole punching and NAT traversal of video streams. The result is a new, highly capable video distribution solution built on structured P2P overlays developed from scratch in little over 12 months. PeerTV has comparable QoS to leading distribution providers

but at much lower costs. PeerTV is ISP friendly as well: traffic is to a large degree kept local in the network, and is transparent and encoding agnostic. The distribution layer is transparent to media servers and media players.



A key success factor in the current and future development work is direct access to advanced research in distributed systems. Peerialism has close ties to the Swedish Institute of Computer Science (SICS) and the Royal Institute of Technology (KTH) and is a partner in several Swedish and European projects including the

SELFMAN project. The connections with institutes like SICS and projects like SELFMAN allow the company to quickly test and evaluate new P2P components. The company receives valuable feedback on its own work and is provided access to work by others; for instance, the company is currently testing the SELFMAN component model Kompics (KTH) and is investigating potential benefits of closer integration with the load injection framework CLIF (France Telecom), and the scalable transactional store Scalaris (ZIB).

Peerialism currently employs 14 people with offices in Stockholm and Cairo. It finances its commercialization and growth out of its own revenues. An internal program to allow employees to do a PhD whilst being employed by the company has recently been launched.

For additional information please see [www.peerialism.com](http://www.peerialism.com).



PEERIALISM

## SELFMAN

Building large-scale self-managing distributed systems based on structured P2P overlay networks and software components.

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