

Exploration of FFmpeg Techniques

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Film Preservation and Restoration

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Summary

- a survey
- on audio-visual file formats
- the command-line interface
- the FFmpeg family
- installation

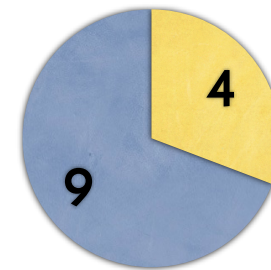
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Survey

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FPRWI 2017 in Chennai:

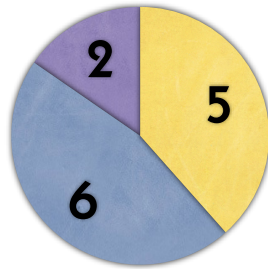
● I attended ● I did not attend



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My knowledge of FFmpeg is:

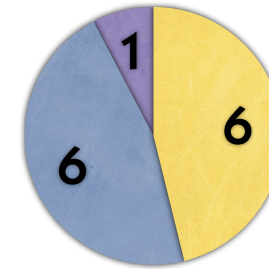
● none ● beginner
● intermediate ● advanced



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My command line skills are:

● none ● beginner
● intermediate ● advanced



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CLI

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Interacting with the computer

- command-line interface (CLI)
- graphical user interface (GUI)

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FFmpeg

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Components

- ffmpeg
- ffplay
- ffprobe
- libavutil
- libavcodec
- libavformat
- libavdevice
- libavfilter
- libswscale
- libswresample

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Data Transformations

demultiplex: libavformat

decode: libavcodec

filter: libavfilter

encode: libavcodec

multiplex: libavformat

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File Transformations

ffmpeg (CLI)

→ ffmpeg.org

FFmpeg Cookbook for Archivists

→ avpres.net/FFmpeg/

ffmprovisr

→ amiaopensource.github.io/ffmprovisr/

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Metadata Extraction

MediaInfo (GUI, CLI)

→ mediaarea.net/MediaInfo

ffprobe (CLI)

→ ffmpeg.org

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Media Players

VLC (GUI)

→ www.videolan.org/vlc/

mpv (CLI)

→ mpv.io

ffplay (CLI)

→ ffmpeg.org

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A Graphical User Interface

FFCommand Engine (GUI)

→ github.com/ColorlabMD/FFCommand_Engine

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Installation

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Windows Users

- install from a build
- install using Chocolatey
- install using Homebrew
- compile the source code with an alternate Homebrew formula

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Apple Users

- install from a build
- install using Homebrew
- compile the source code with an alternate Homebrew formula

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Linux Users

- install from a build
- install using Homebrew
- compile the source code with an alternate Homebrew formula

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