Seven
Lessons
for
Developers
from
Filmmakers
@tlberglund

Surprise

We are uncovering better ways of developing
software by doing it and helping others do it.
Through this work we have come to value:

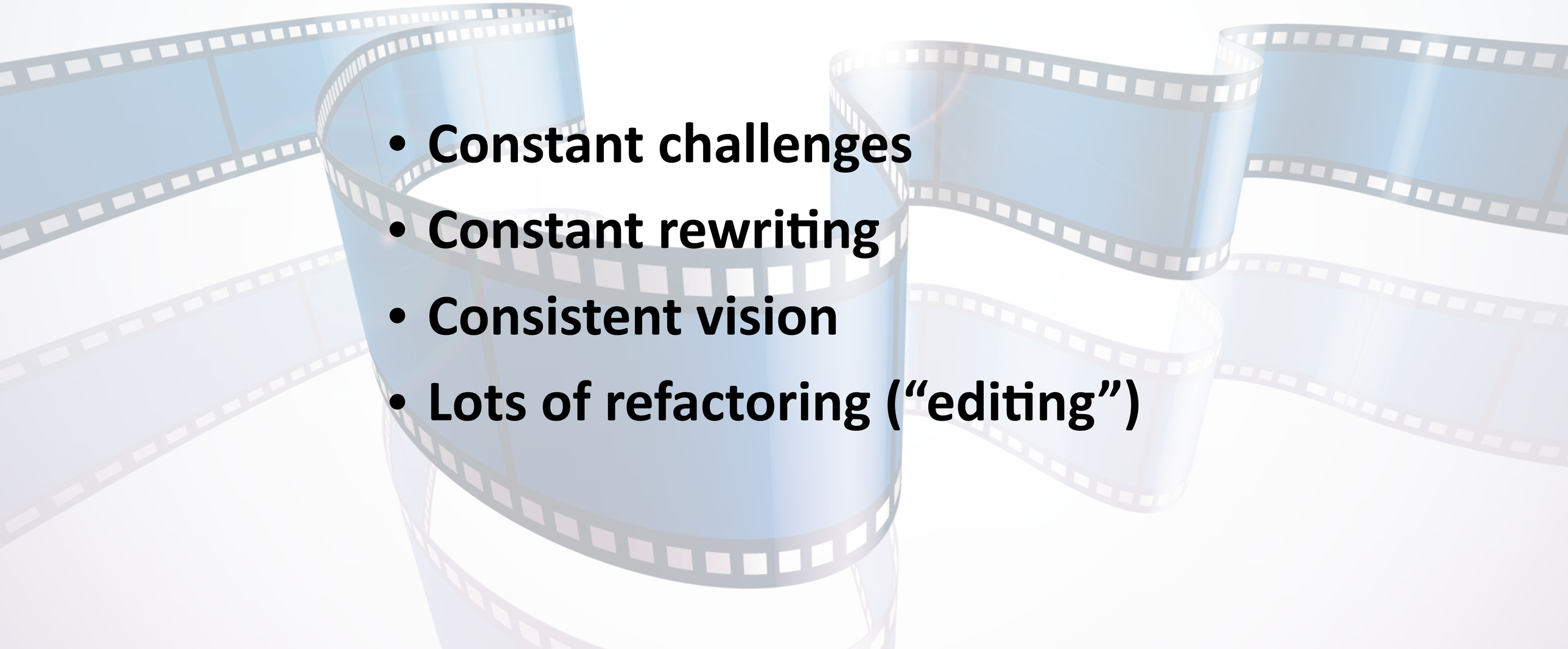
Individuals and interactions over processes and tools
Working software over comprehensive documentation
Customer collaboration over contract negotiation
Responding to change over following a plan

That is, while there is value in the items on
the right, we value the items on the left more.

Film Process

- Development
- Pre-production
- Production
- Post-Production
- Distribution

Apocalypse Now



- Constant challenges
- Constant rewriting
- Consistent vision
- Lots of refactoring (“editing”)

Technology Change

Talkies

The Great Dictator, Charlie Chaplin (1940)

Color

- 1922: two-color Technicolor process
- 1930: 36 films under Technicolor contract
- 1932: retooled “three-strip” process
- 1936: *Garden of Allah*
- 1938: *Adventures of Robin Hood*

Digital

- 1993: Avid, the first digital NLE
- 2000: *O Brother Where Art Thou*
- 2002: *Star Wars Attack of the Clones* or something
- Today: Nolan, Tarantino, Spielberg, Scorsese

Technology Change

- Periods of innovation
- Periods of stasis
- Resistance at inflection points
- Success is not technical
- Form over content

Leadership

First
Kill
all the
Product
Owners
@tlberglund

The Director

The Director

Actors

The Director

Shots

The Director

Screenplay

The Director

Leader

Leadership

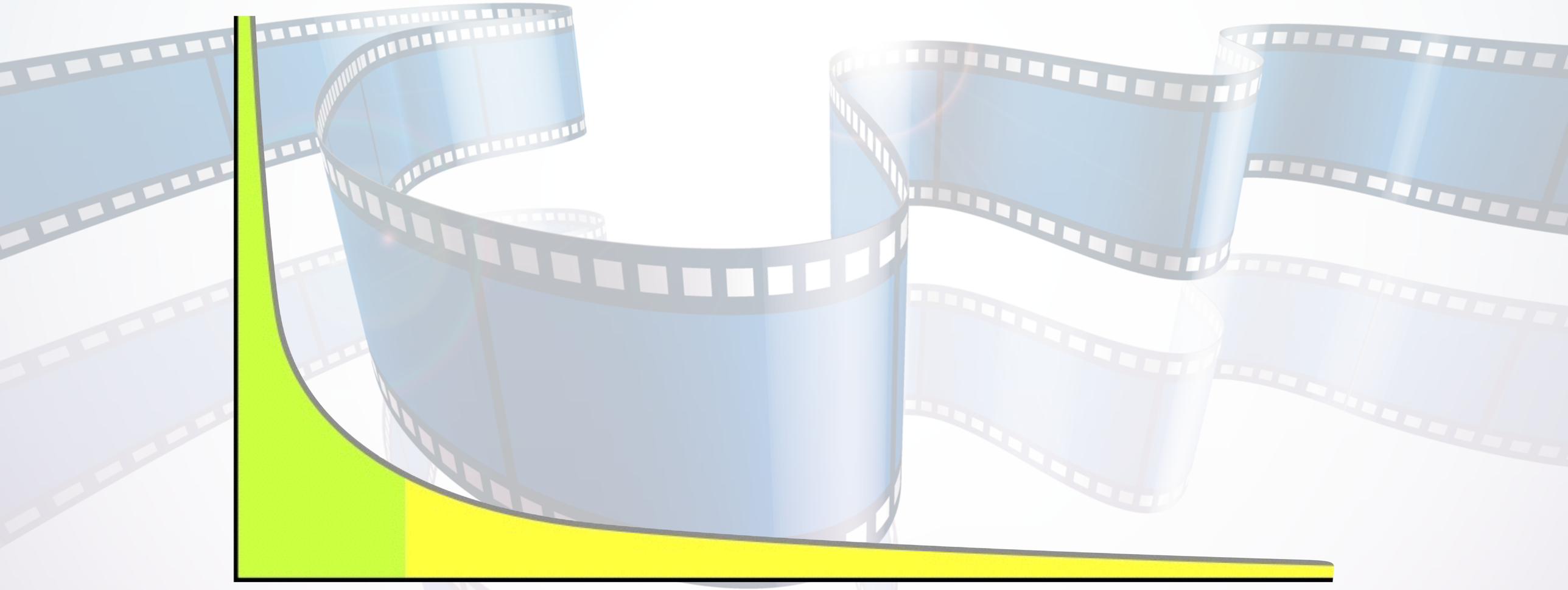
- Diverse backgrounds
- The Romantic hero: the Auteur
- Vision

Talent

10x

The 10x Actor

The Power Law Actor



Talent

- Talent is not evenly distributed
- Recognition is not evenly distributed
- Make friends with Dr. Pareto
- *Never let this stop you*

Specialization

Supervising Art Director	DAVID KLASSEN
Art Directors	RICHARD F. MAYS
	SUZAN WEXLER
Assistant Art Director	MICHAEL E. GOLOMAN
Set Decorator	LAURI GAFFIN
Assistant Set Decorator	FLORENCE FELLMAN
Additional Photography by	GABRIEL BERISTAIN
Steadicam Operator/Camera Operator	COLIN ANDERSON
First Assistant Camera	PETER BERGLUND
Second Assistant Camera	MATT STENERSON
B-Camera First Assistant	TAYLOR MATHESON
B-Camera Second Assistant	JOEY O'DONNELL
Camera Loader	GARY BEVANS
Additional Camera Operators	GARY HATFIELD • KEITH SOLOMON
Additional Camera Assistants	MARK SANTONI • ROCKY BABCOCK
	LIAM SINNOTT • MARK STRASBURG
	RICH MORIARTY • ROBERT BAIRD
Script Supervisors	CRISTINA WEIGMANN

Key Grip

Key Grip

http://nofilmschool.com/2014/01/short-film-about-grips-the-unsung-heroes-of-the-film-industry

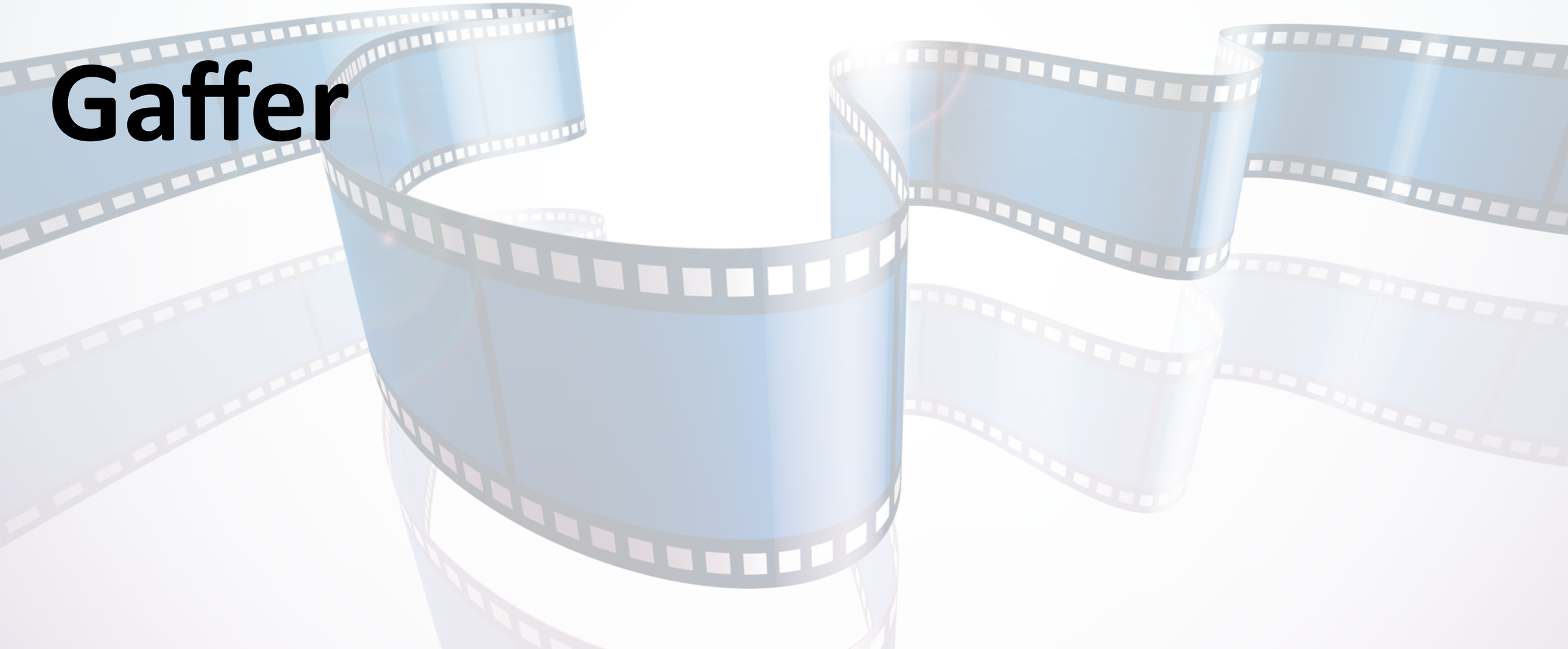
Key Grip

Dolly Grip

Dolly Grip

http://johnnyvong.com/works/little-mao/img_5895/

Gaffer



Gaffer

http://pixgood.com/film-gaffer.html

Specialization

- Required by complexity
- Encouraged by unionization (in film)
- *Not just for insects anymore*
- Useless without vision

Theory

Film Theory

- What film is
- What film means
- Film’s relationship to other arts
- Film’s relationship to reality
- Film’s relationship to the viewer

Film Theory

Auteur

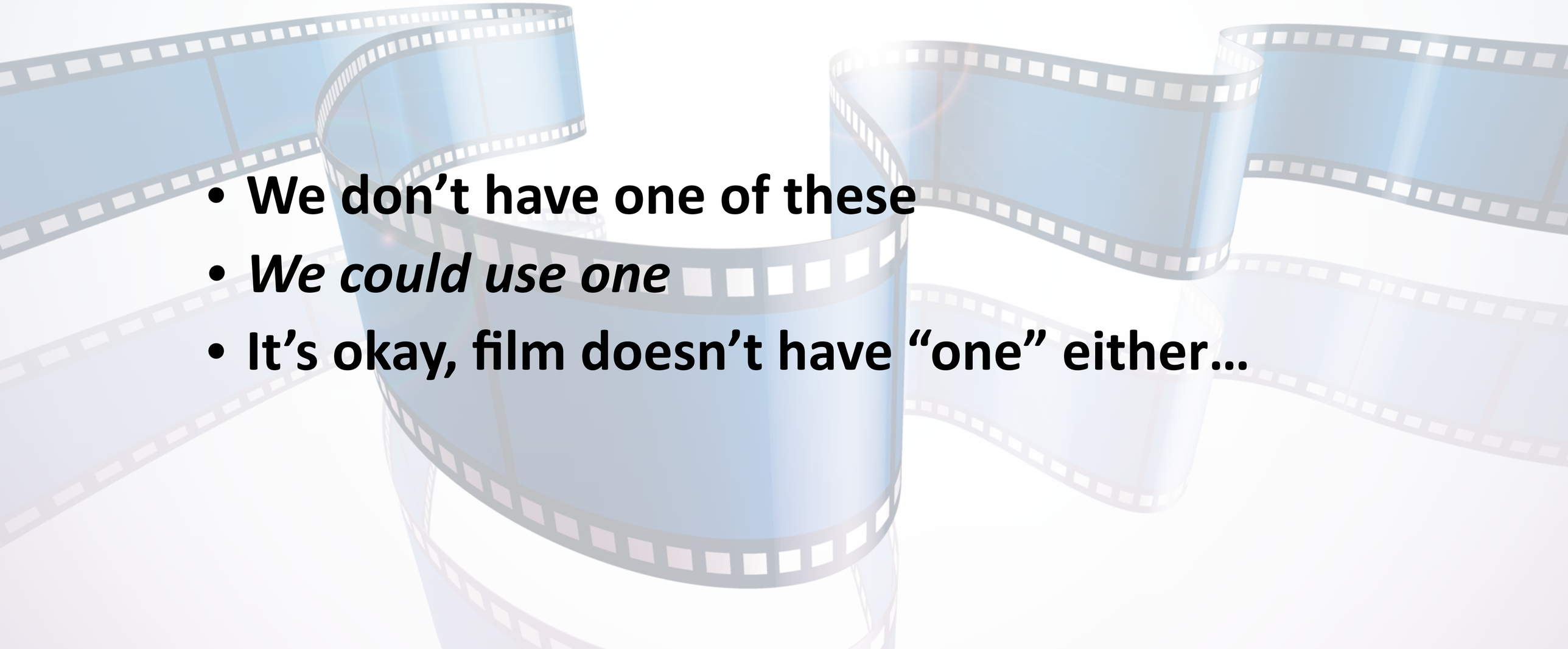
Film Theory

Marxist

http://filmmakeriq.com/2014/02/the-history-of-cutting-the-soviet-theory-of-montage/

http://filmmakeriq.com/2014/02/the-history-of-cutting-the-soviet-theory-of-montage/

Software Theory



- We don’t have one of these
- *We could use one*
- It’s okay, film doesn’t have “one” either…

Software Theory

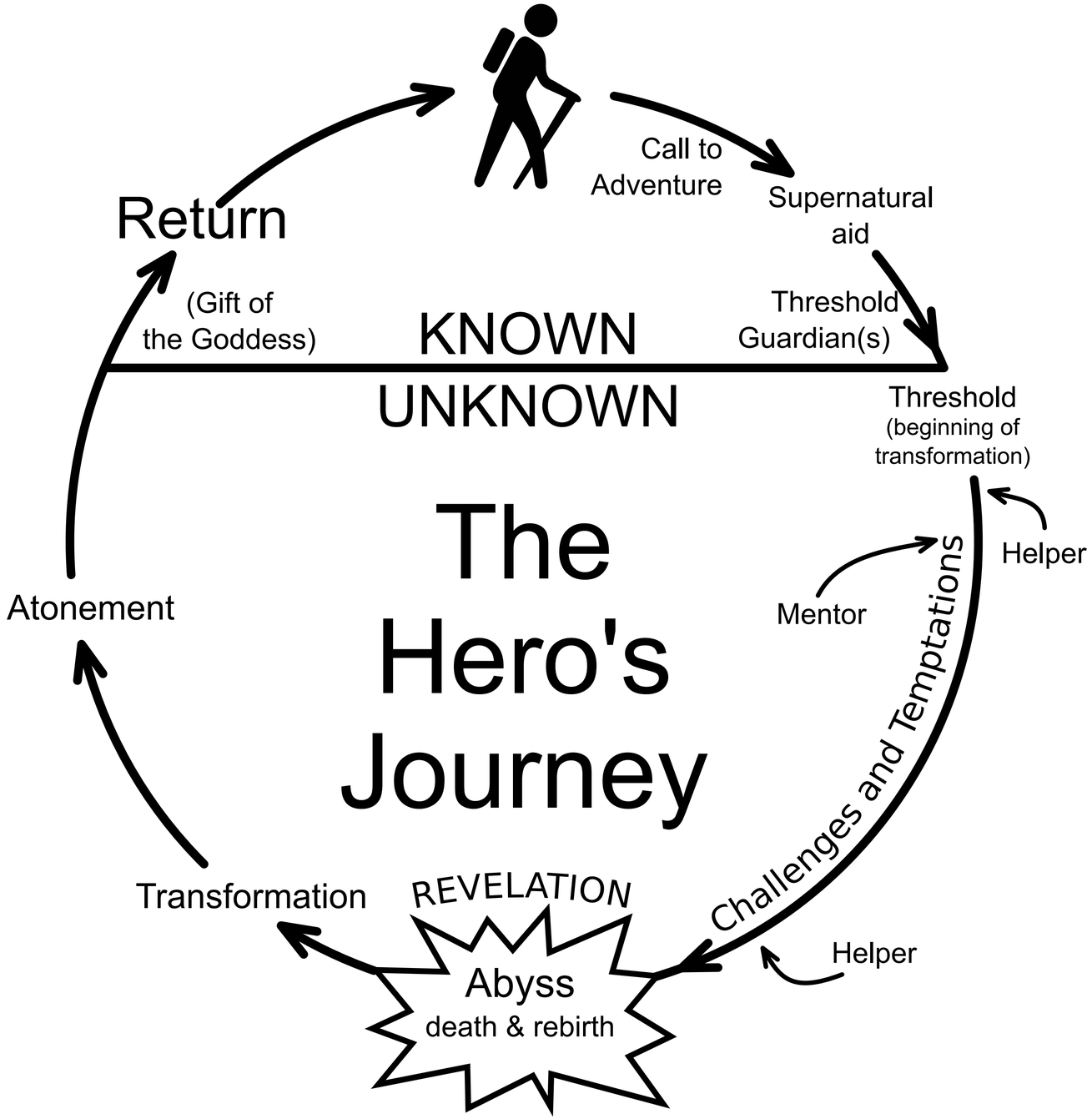
- What software is
- Software’s relationship to other arts
- Software’s relationship to other kinds of tools
- Software’s relationship to information
- Software’s relationship to material reality
- Software’s relationship to the user

Story

I was always a filmmaker before I was anything else. If I was always anything, I was a storyteller, and it never really made much of a difference to me what medium I worked in.

- Nicholas Meyer

User Stories


Call to Adventure
Supernatural aid
Threshold Guardian(s)
Threshold
(beginning of transformation)
Helper
Mentor
Challenges and Temptations
Helper
Abyss
death & rebirth
REVELATION
Transformation
Atonement
(Gift of the Goddess)
Return
KNOWN
UNKNOWN
The Hero's Journey

THANK
YOU!
@tlberglund