

Up Close & Virtual

The Power of Live VR Actors

03.21.2022

Alex Coulombe

CEO Heavenue / Agile Lens

 ibrews

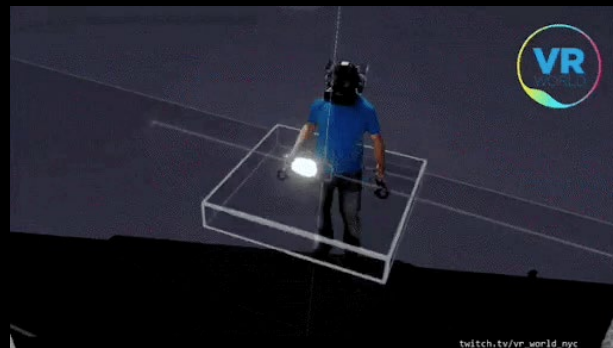


GDC

March 21-25, 2022
San Francisco, CA

who am I?

- Syracuse University B. Arch + Drama
- Warehouse Architecture Theatre (WhAT)
- Fisher Dachs Associates
- Agile Lens: Immersive Design
- Heavenue
- Alive in Plasticland
- OnBoardXR
- 5th Wall Forum
- Syracuse University / NYU
- UE4 / Unity3D
- Realtime Conference
- Theatre Communications Group
- XR Dad



HEAVENUE

Alex Coulombe

Designer

Tool-Maker

Educator

Needs new headshot



Alex Coulombe

Designer

Tool-Maker

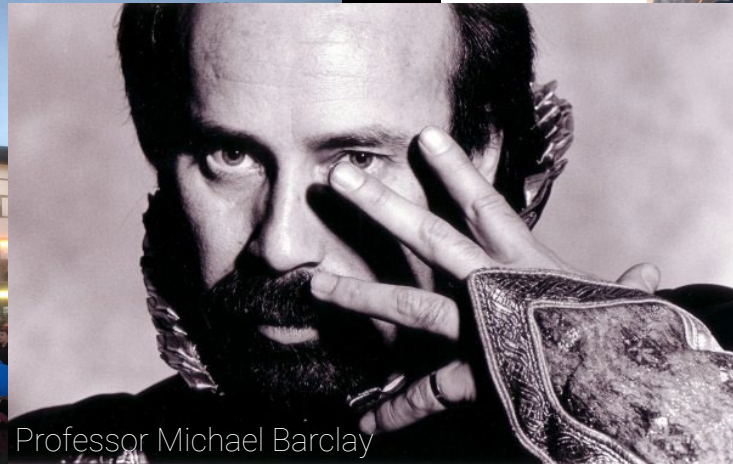
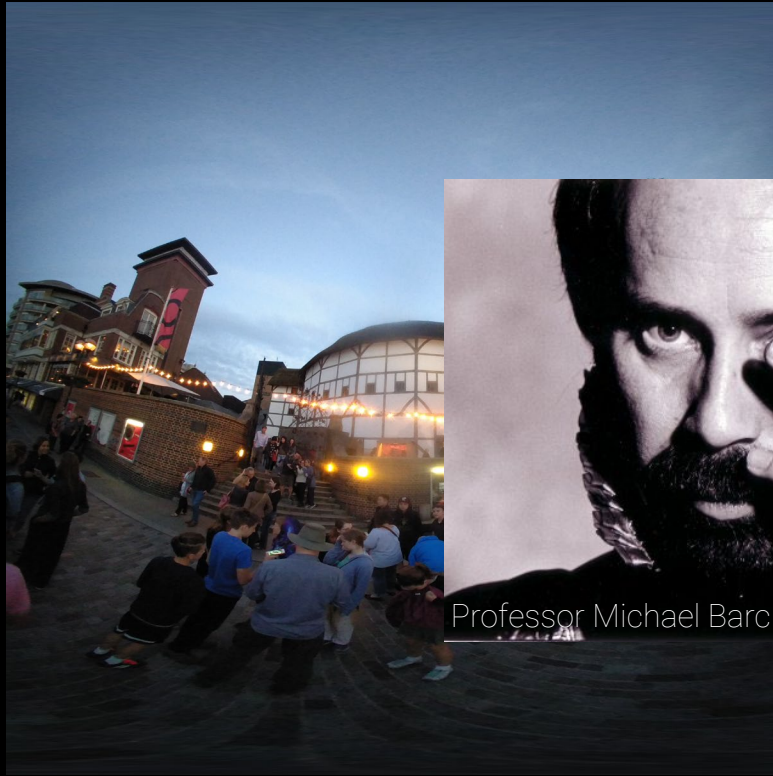
Educator

~~Needs new headshot~~



2008

London



Professor Michael Barclay



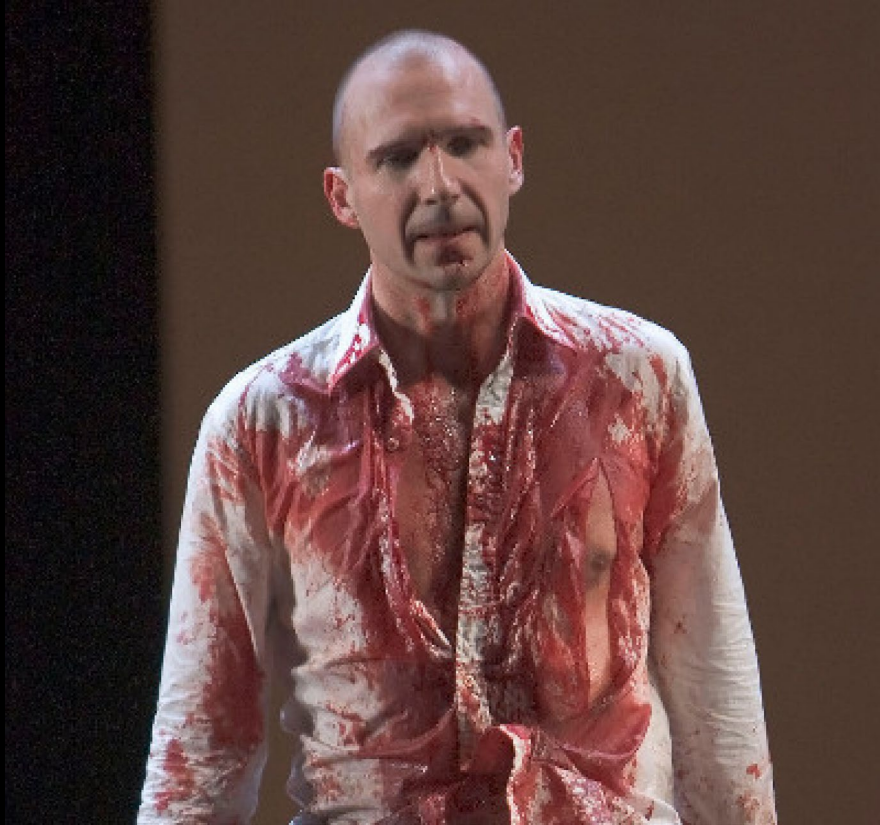
2008

Oedipus, National Theatre



2008

Oedipus, National Theatre





Theatre of the Oppressed teacher Julian Boal





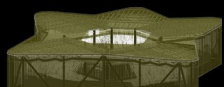
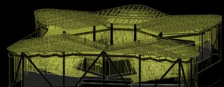
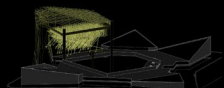
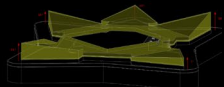


Can technology democratize the
sensation of front-row theatre?

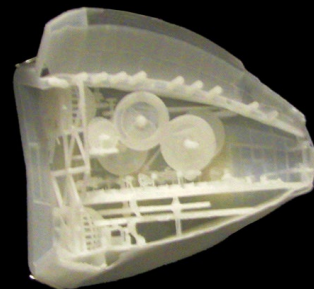
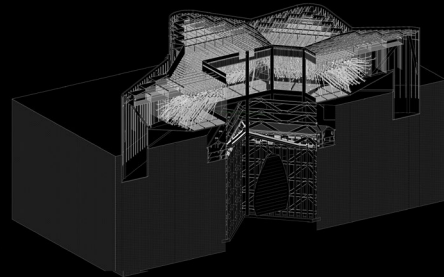
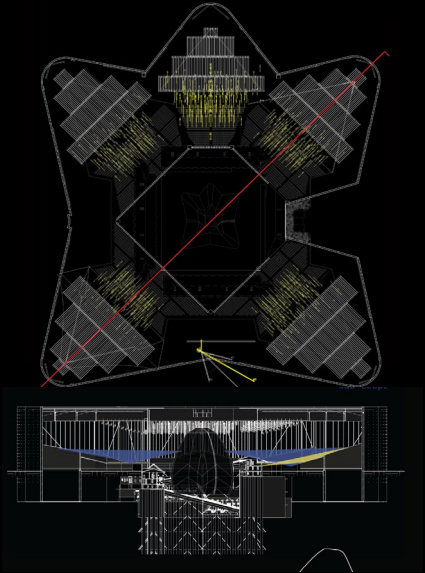
2010

Thesis

Scopic Operations
in Military Theatre



© 2010 Alex Coulombe



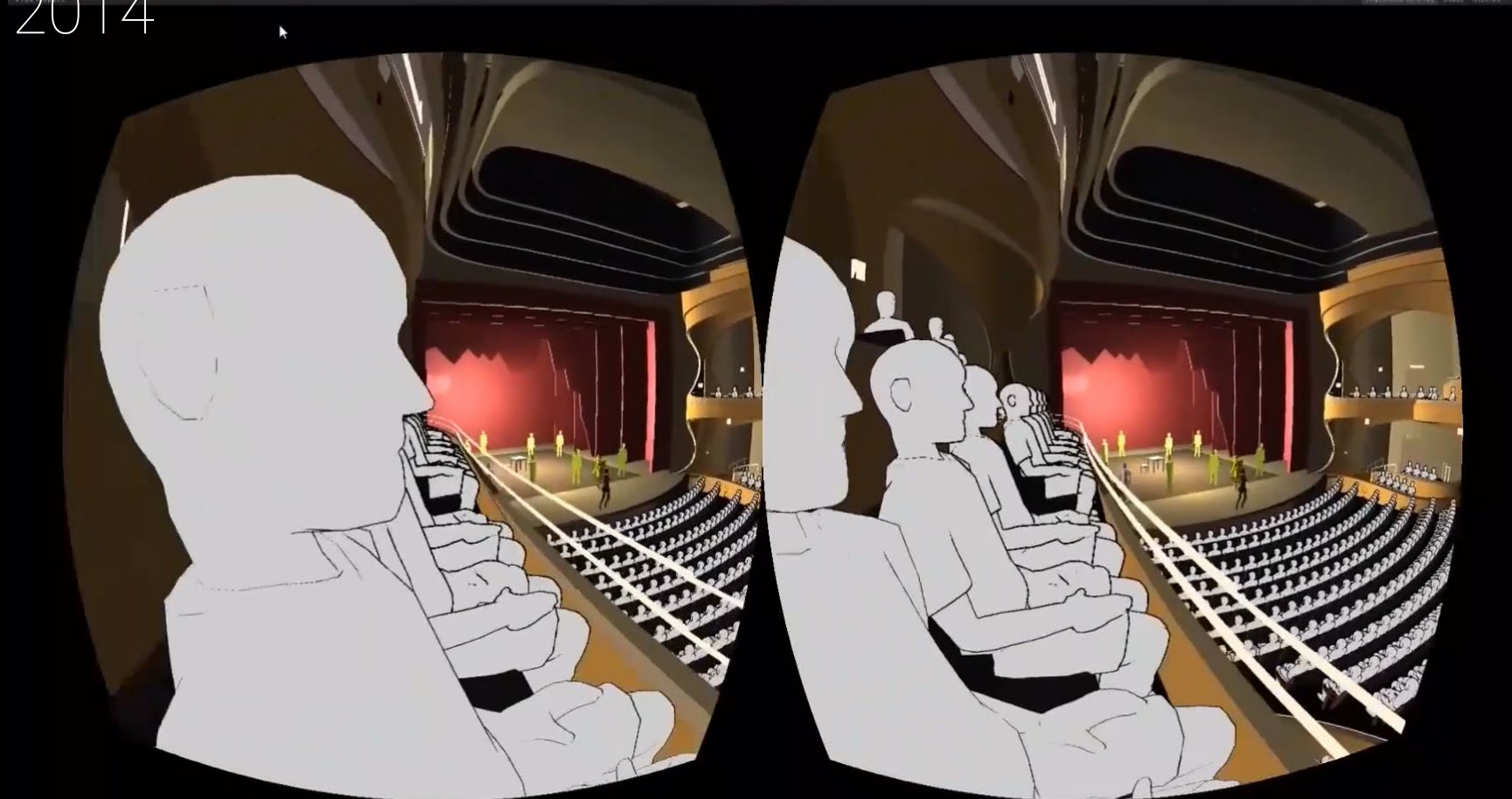
2010 Thesis
Scopic Operations
in Military Theatre



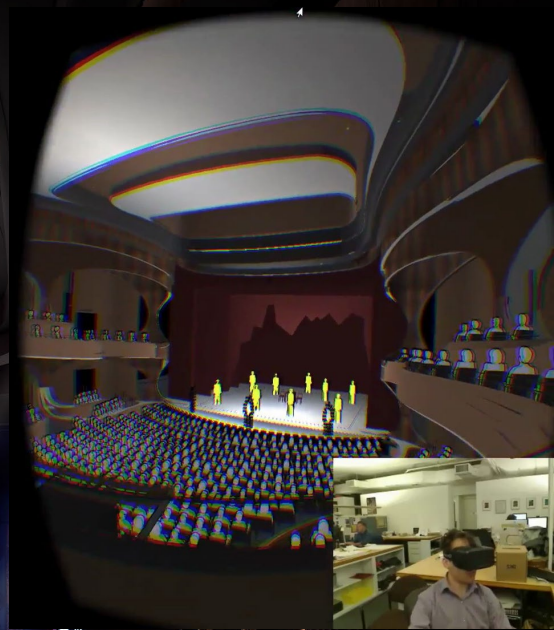
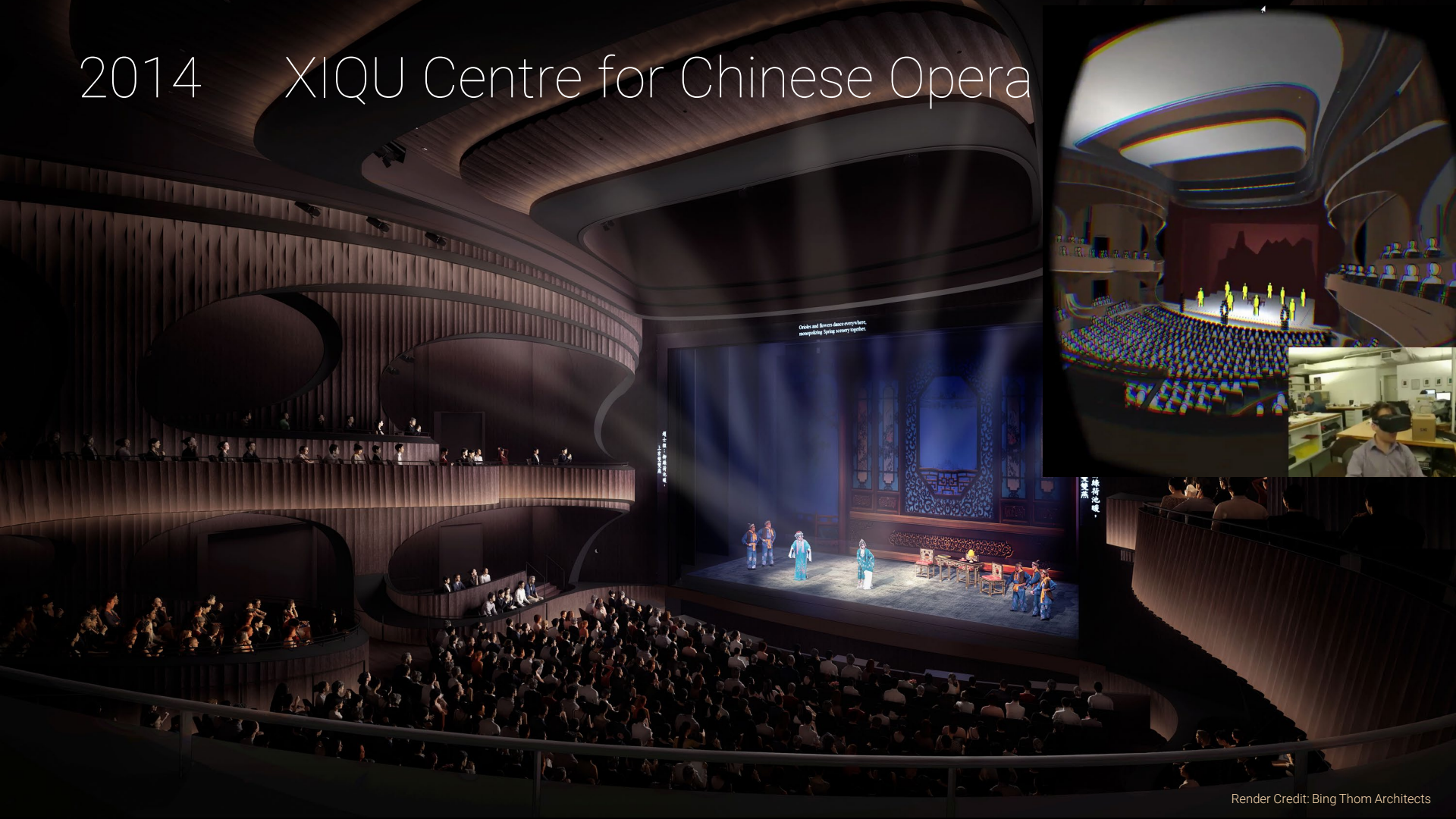
Look,
AR !

2013





2014 XIQU Centre for Chinese Opera



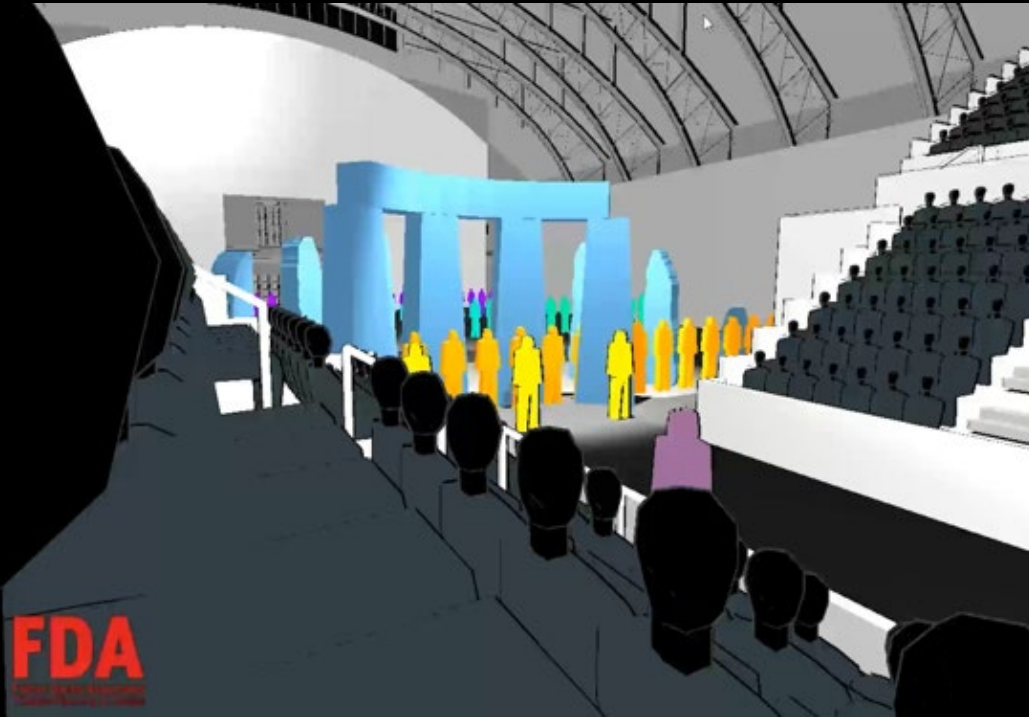
2014 late show with stephen colbert
with bravo media



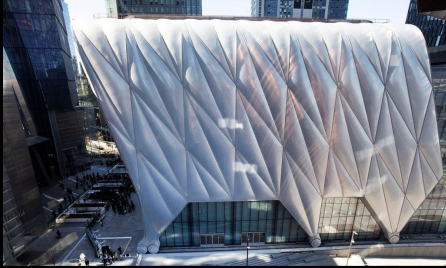
2014

kenneth branagh's macbeth

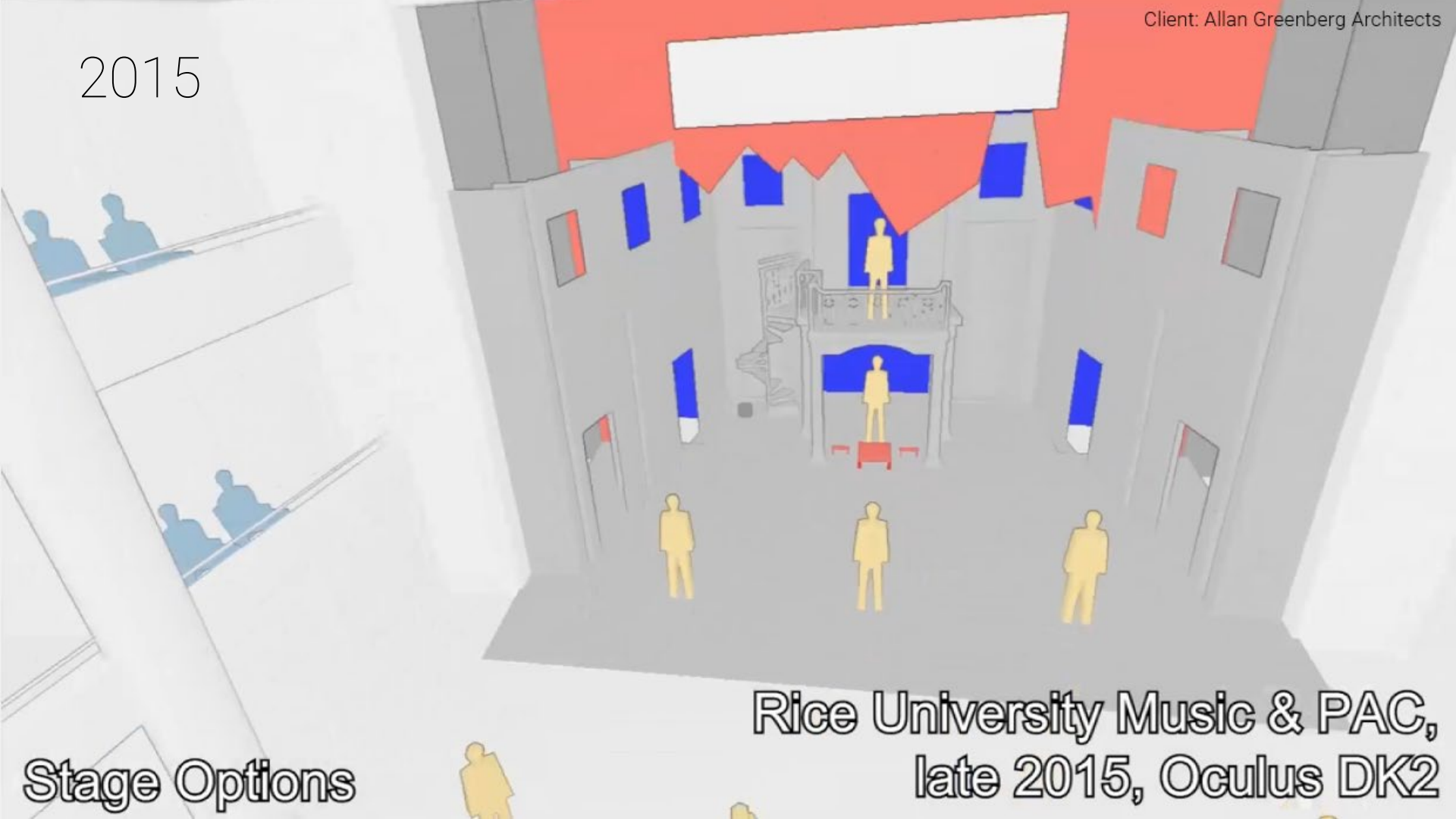
with fisher dachs



2015 the shed at hudson yards



2015



Rice University Music & PAC,
late 2015, Oculus DK2

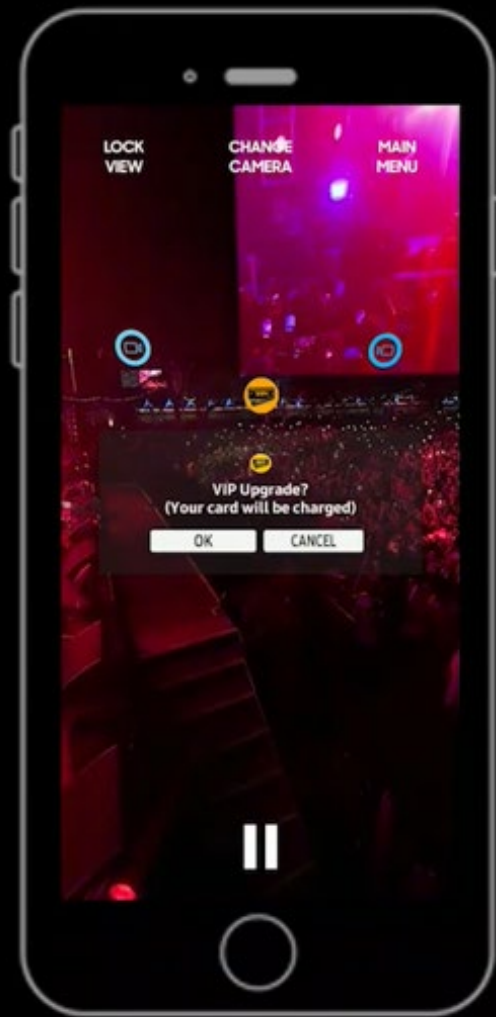
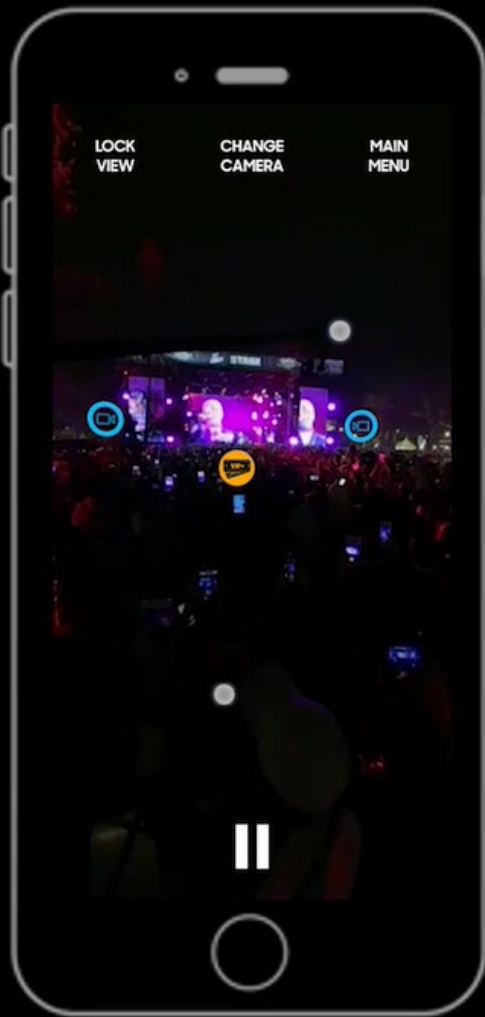
Stage Options

2017



2018 Event360

Live VR Streamed
Performances



2018

intel arena
with glimpse group

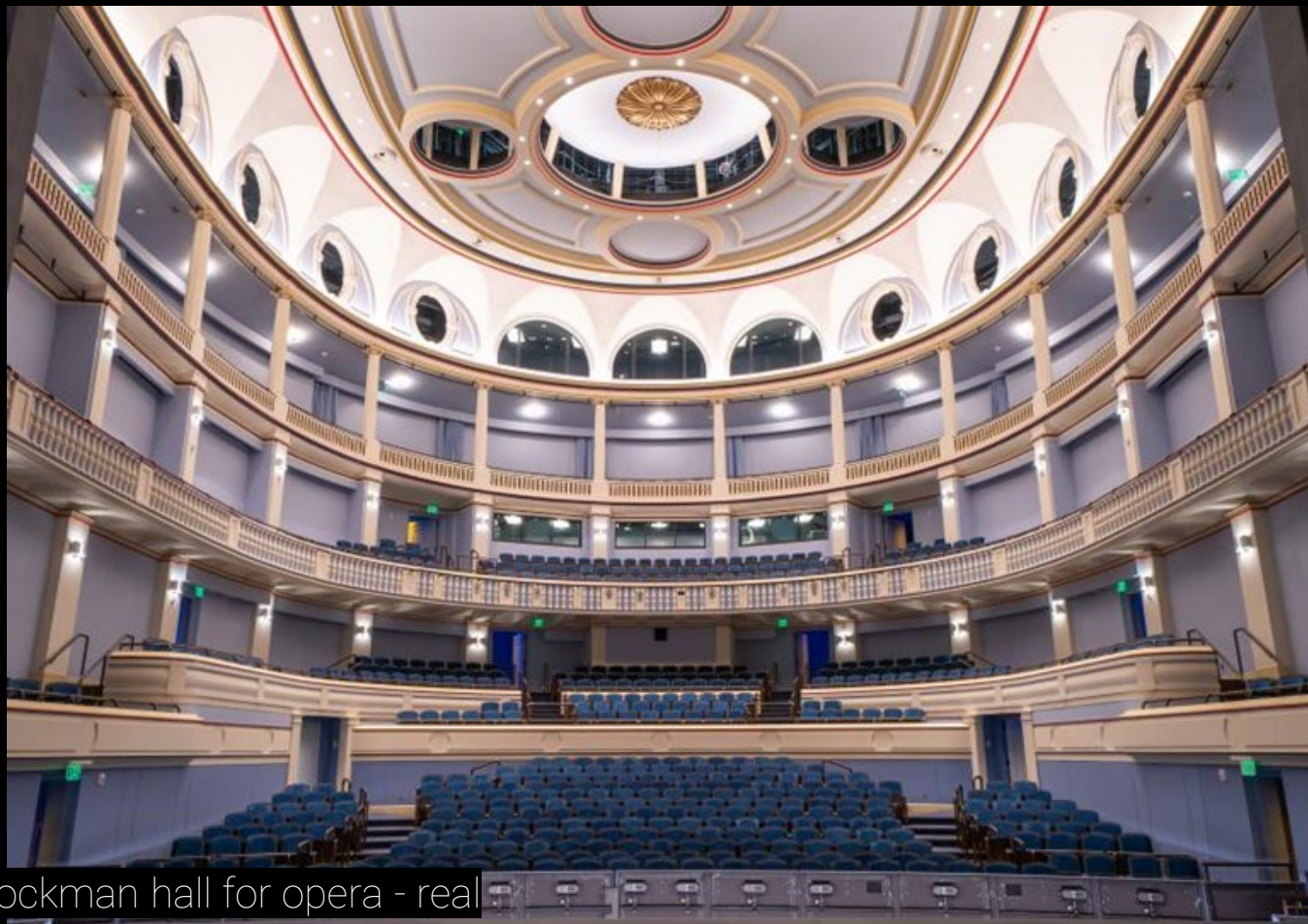


2019



brockman hall for opera - virtual vs construction

2020



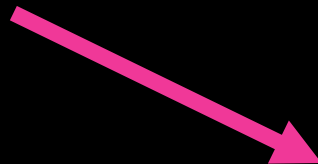
brockman hall for opera - real

2020 david geffen hall – lincoln center - nyc



Josh Dachs of Fisher Dachs Associates and Alex Coulombe







December 2021



AN ACTORS THEATRE OF LOUISVILLE LAB PRODUCTION

A CHRISTMAS CAROL: SCROOGE'S GHOST ENCOUNTER

LIVE IN VR

BY CHARLES DICKENS

ADAPTED AND DIRECTED BY ROBERT BARRY FLEMING

IN COLLABORATION WITH AGILE LENS AND HEAVENUE



oculus AVAILABLE ON OCULUS QUEST



AGILE LENS
IMMERSIVE DESIGN



HEAVENUE

ACTORS
THEATRE OF LOUISVILLE

Photo Credit: Jonathan Roberts
IRL Scrooge: Gregory Maupin
IVR Scrooge: Ari Tarr
Sets/Props: Katelin Ashcraft
IRL Costumes: Anna Jenny
IVR Costumes/Sets: Jun
Animation: Rob Lester
Lights: Dani Clifford
Sound: Paul Doyle

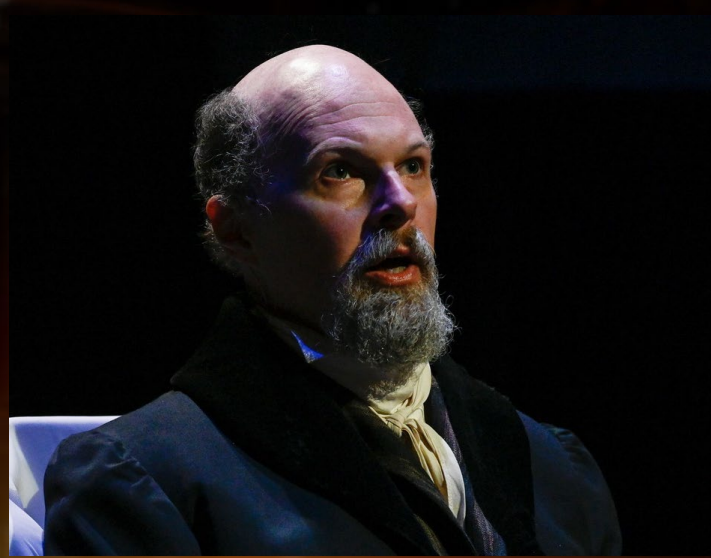
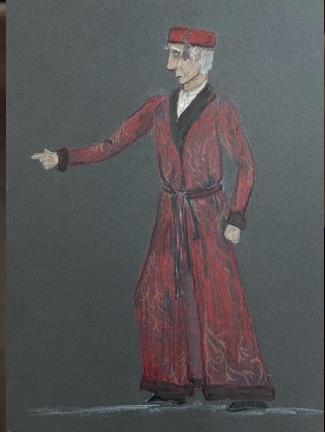
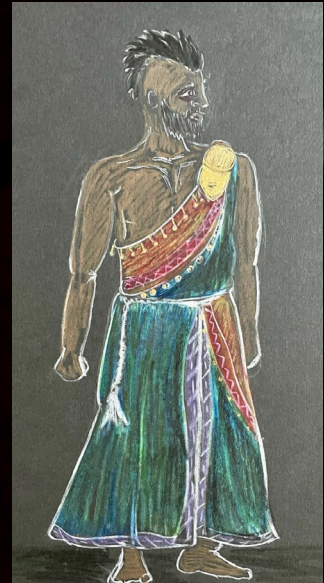
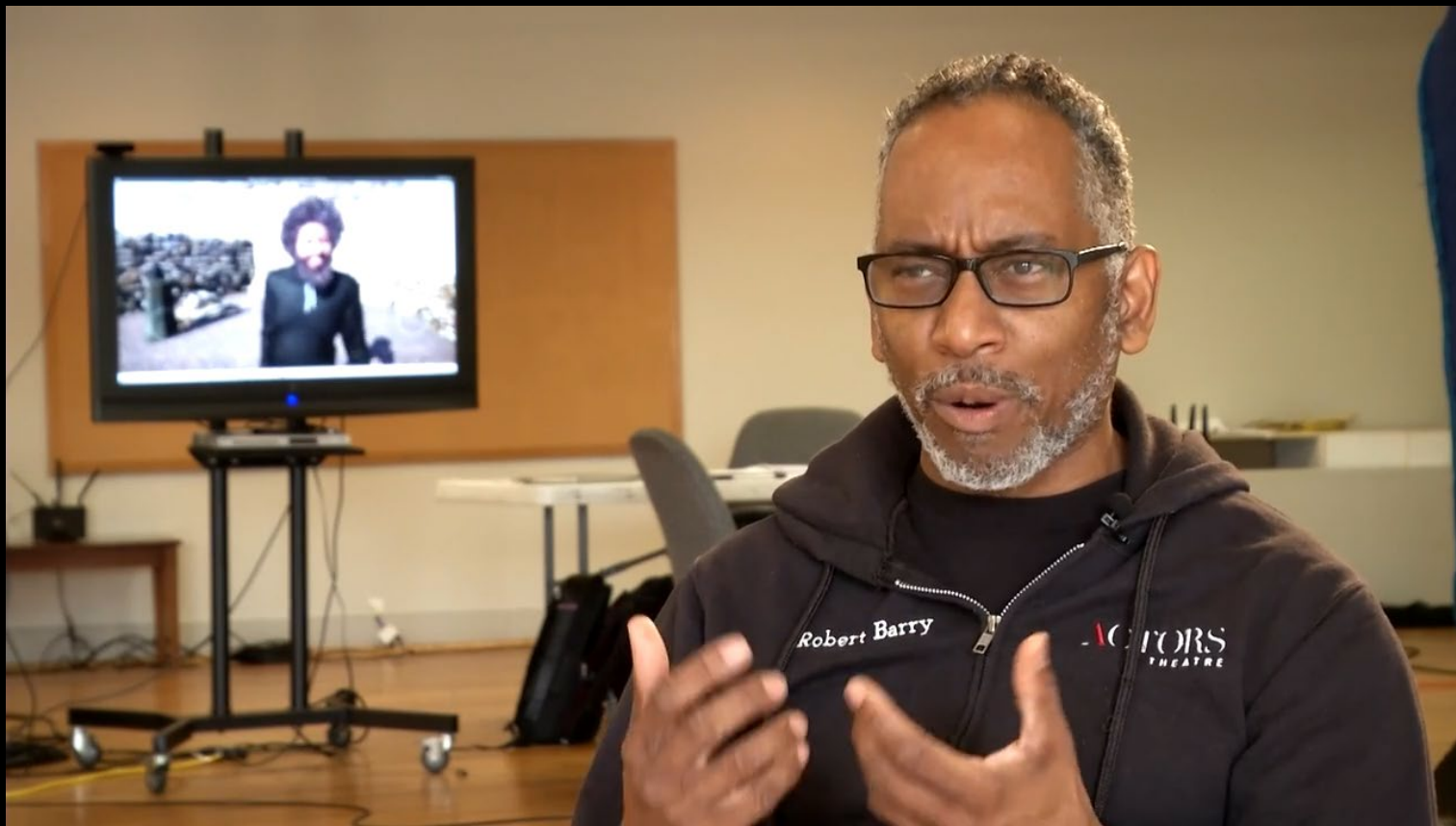


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actors theatre of louisville



a few months before...



Brandon Powers and Kevin Laibson,
"Agony" Into the Woods

Greg Maupin

IRL Scrooge + Ghost Voices



Ari Tarr @xractor

VR Scrooge/Dickens/others



Ari Tarr @xractor

VR Scrooge/Dickens/others



Terms

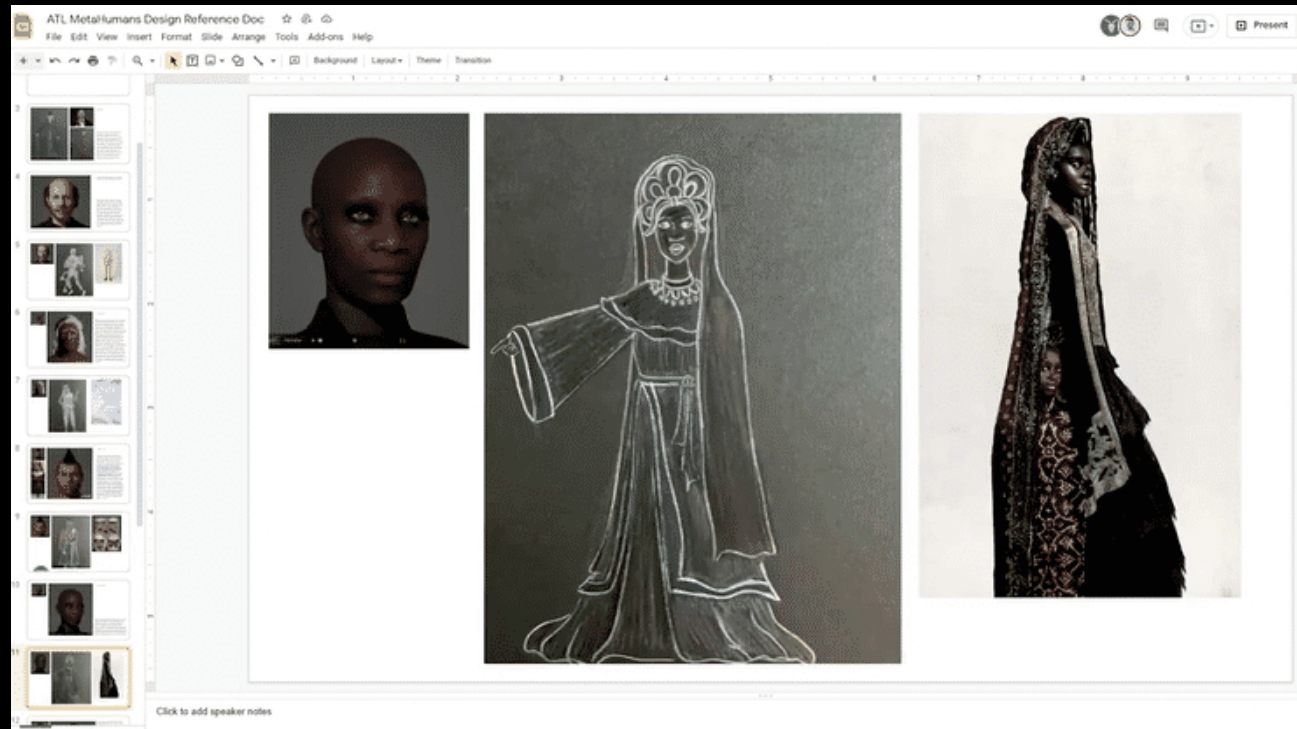
“RACTOR”
“RACTIVE”



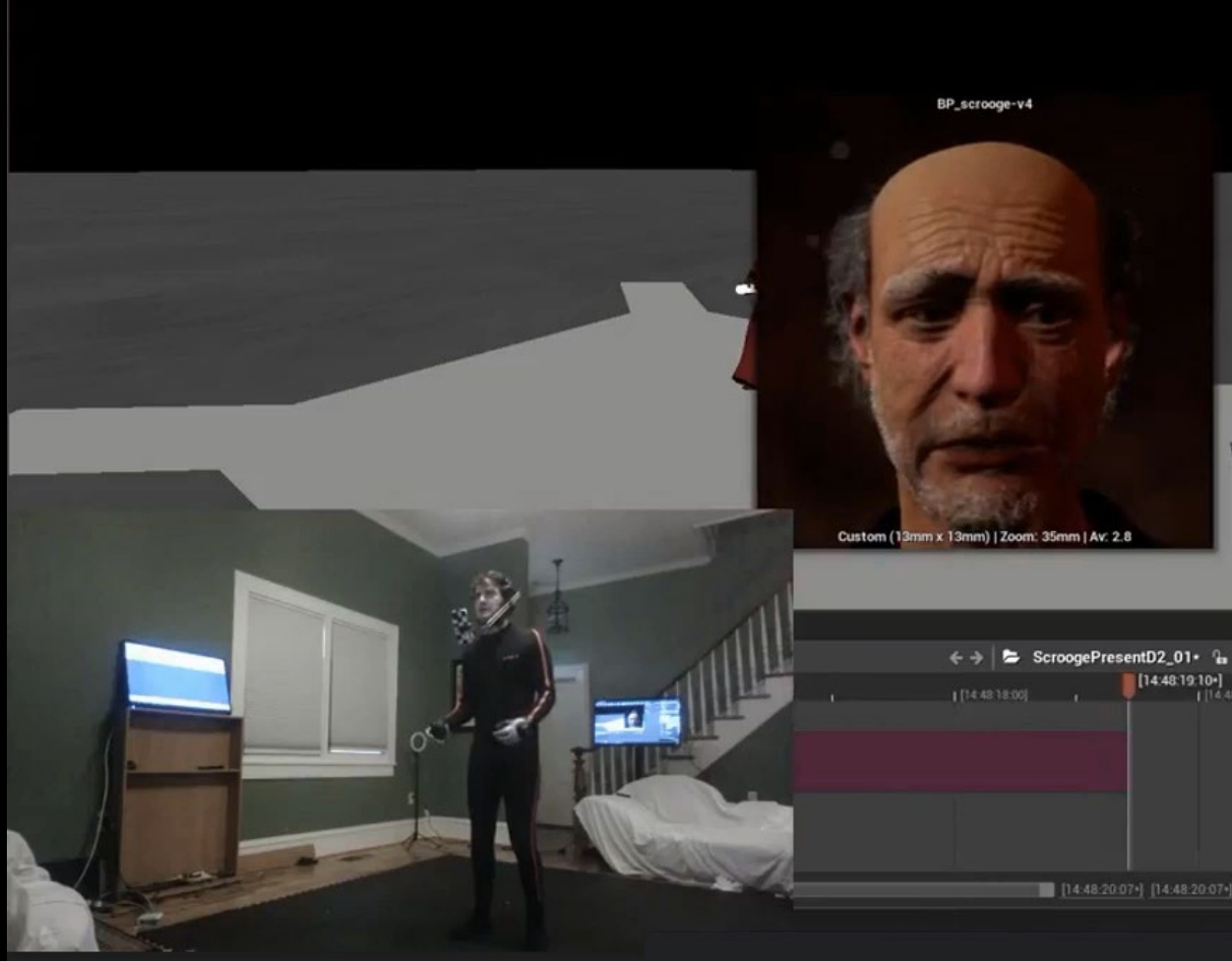
“**ractive**” - a form of elite interactive entertainment, in which a live human performer (a “**ractor**”) working from a computer-provided script, improvises in real-time with paying customers, over a virtual reality network.”

-- The Interactive Fiction Wiki.

Production



Rehearsal



key factors for our ractor:

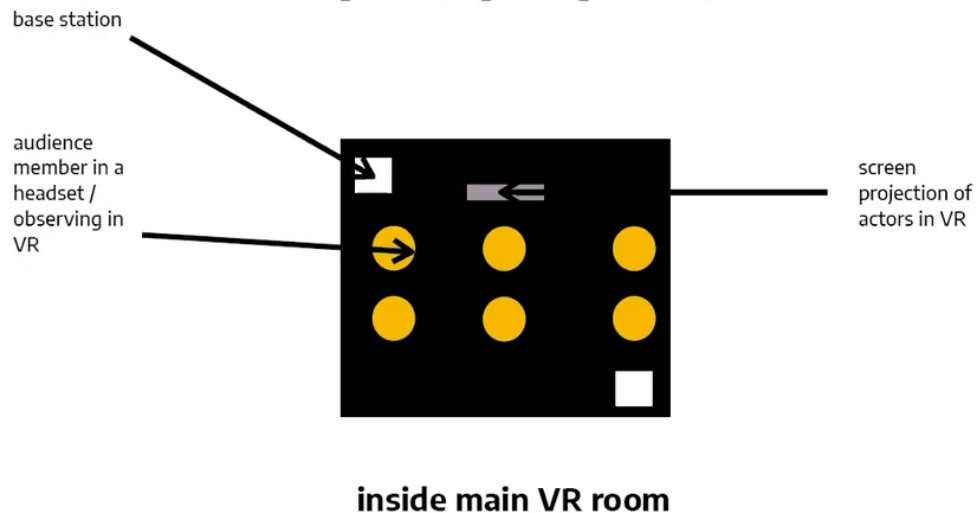
- Low-cost cloud computing
- Free expressive digital humans
- Free expressive performance capture

Alive in Plasticland 2018 – Live VR Improv



alive in plasticland

layout proposal



ALIVE IN PLASTICLAND

Including but not limited to:

David Gochfeld

Kiira Benzing

Kevin Laibson

Adrian Vásquez de Velasco

Lara Bucarey

Mark Sternberg

Sarah Nowak

Keisha Zollar

Jake Keefe

Tracy Mull

Tracy Mull

Ray Cordova

Mark Stetson

Rachel Scherer

Jeff Scherer

Luis Fernandez

David Armstrong

Tamsi New

Chris Booth

Julia Darden

Josh Hurley





Alive in Plasticland Improv Workshop, 12/08/2018

alive in plasticland



2018 Alive in Plasticland – Live VR Improv Shows



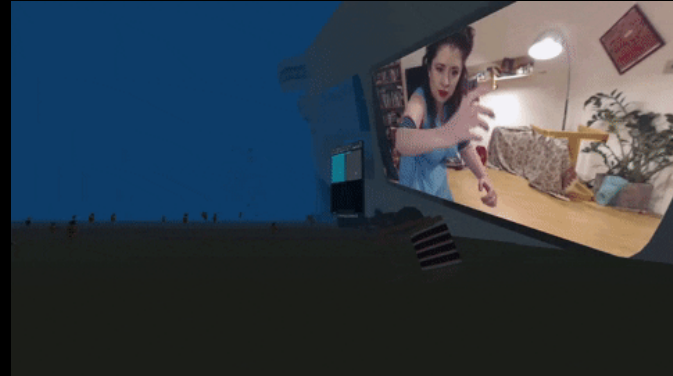
studies:

- 1) Avatar selection and the uncanny valley
- 2) Performer/audience interaction
- 3) Ideal performer backgrounds
- 4) Genres
- 5) Maskwork, puppetry, mime, clowning

studies:

- 1) Avatar selection and the uncanny valley
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OnBoardXR: Live VR Performing Arts Festival (2020 - ?)



Social VR doesn't want the same
things as a live performance



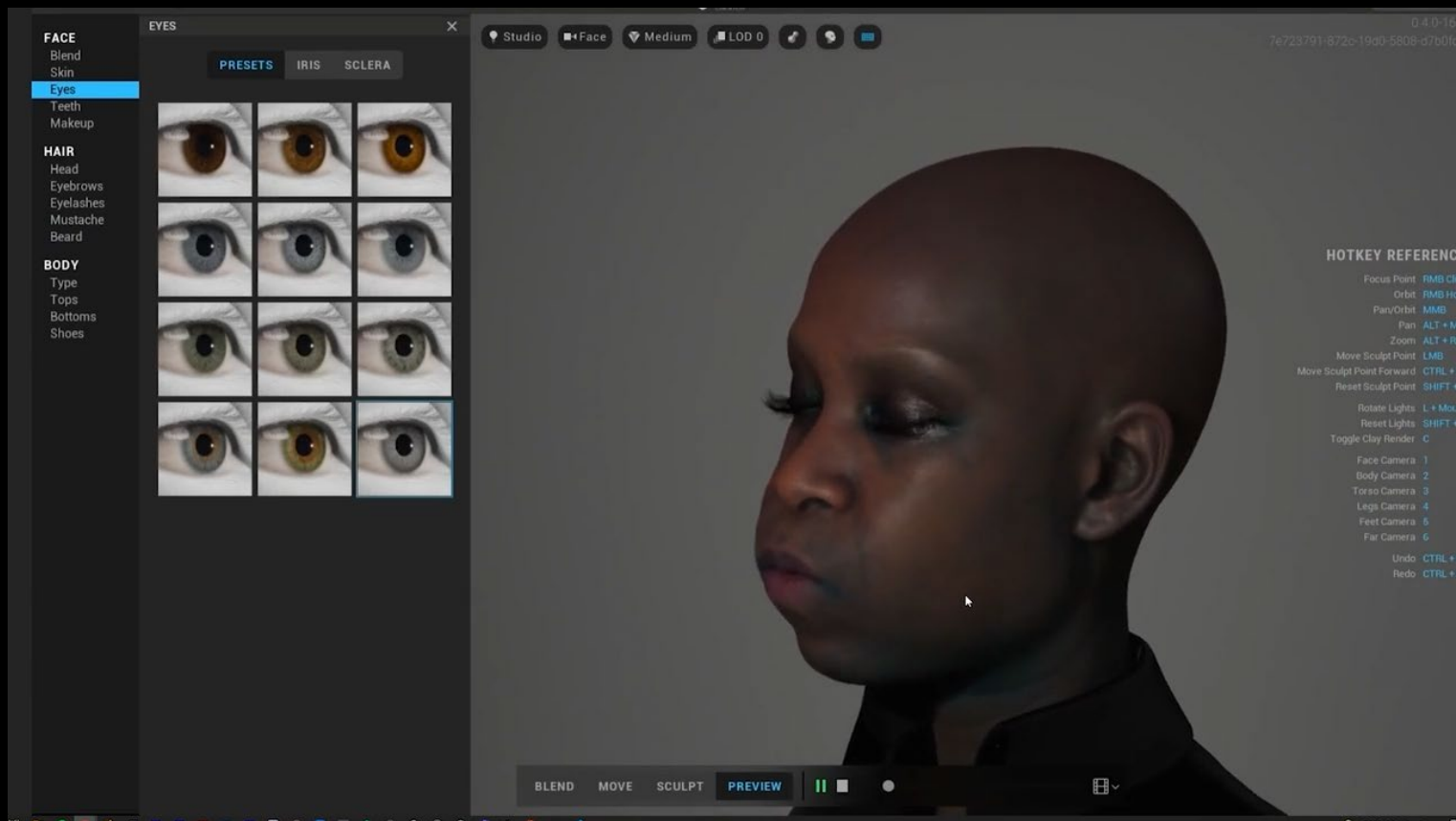
1998年9月1日

VIVECON 2021



cloud computing

metahuman creator





livelink face

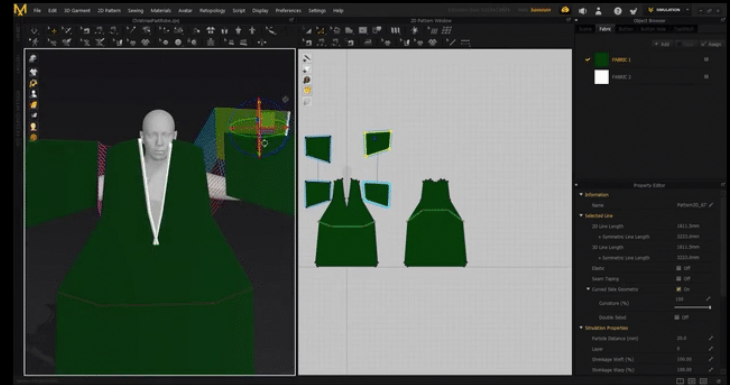
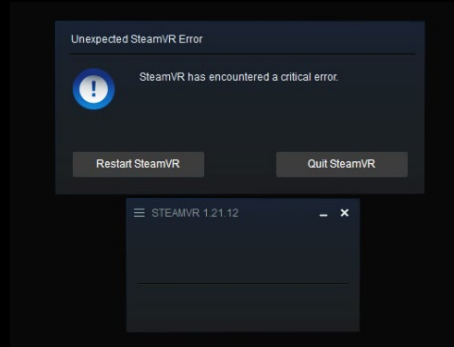




sad things:

- 1) Actor NOT in VR
- 2) Body capture
- 3) Face data limited
- 4) SteamVR crashes
- 5) Data sync
- 6) Costumes/Physics
- 7) Cues and multiplayer replication
- 8) Audience agency
- 9) Asset loading
- 10) Live vs Recordings, IRL vs VR

BONUS: I broke the show !



pros and cons of:

- 1) live vs recorded
- 2) single-player vs multiplayer
- 3) high fidelity vs low fidelity
- 4) social VR vs custom application
- 5) mocap vs greenscreen vs volumetric
- 6) interactive vs passive
- 7) IRL vs AR vs VR
- 8) muted audience vs mic access
- 9) vr vs video stream







Heavenue Editor 0.0.1

720p 1080p 4k



Thank you!

Alex Coulombe
 ibrews

alex@heavenue.io

For updates on Heavenue:
<https://www.heavenue.io/>

Also join the Heavenue Discord:
<https://discord.gg/ubmwcNam7d>

And the Virtual Theatremakers Discord:
<https://discord.gg/VAs8JHZ>

