

University of Mary Washington

Eagle Scholar

Research and Creativity Symposium

Research Symposia

4-23-2020

A Guide for Creating Great VR Storyboards: Planning to Make Your Virtual Vision a Reality

Cristina Montemorano

Follow this and additional works at: <https://scholar.umw.edu/rcd>



Part of the [Communication Commons](#)

Recommended Citation

Montemorano, Cristina, "A Guide for Creating Great VR Storyboards: Planning to Make Your Virtual Vision a Reality" (2020). *Research and Creativity Symposium*. 54.

<https://scholar.umw.edu/rcd/54>

This Poster is brought to you for free and open access by the Research Symposia at Eagle Scholar. It has been accepted for inclusion in Research and Creativity Symposium by an authorized administrator of Eagle Scholar. For more information, please contact archives@umw.edu.

A Guide for Creating Great VR Storyboards

PLANNING TO MAKE YOUR VIRTUAL VISION A REALITY
PART 1

SO YOU WANT TO CREATE A VIRTUAL REALITY PROJECT...

Storyboards are a great way to help you brainstorm ideas and visualize your final VR project.

But how do you begin this storyboarding process?

Initial Questions to Answer

IS VR THE BEST MEDIUM FOR YOUR PROJECT?

Are the unique affordances of VR (like immersion and viewing information in three dimensions) necessary for getting your points across?

If not, consider using a more "traditional" medium like two-dimensional video or photography for your project.

**WHAT TECHNOLOGY IS REQUIRED
TO VIEW YOUR PROJECT?**

- How will your audience view your final VR product?
- What equipment is required? Can viewers use cell phones and Google Cardboard, or do they need higher-end VR systems like an Oculus system or the HTC Vive?

Make sure that you plan for your final product to be as accessible to your target audience as much as possible!

WHAT IS THE PURPOSE OF YOUR PROJECT?

WHO IS YOUR AUDIENCE?

**WHAT DO YOU WANT YOUR AUDIENCE TO
TAKE AWAY FROM YOUR PROJECT?**

Having an explicitly-defined purpose, audience, and takeaways early on in your creative process will help you storyboard better and give your audience a clearer understanding of your intent.

ONCE YOU'VE ANSWERED THESE QUESTIONS,
IT'S TIME TO GET STORYBOARDING.

Continue reading for Part 2!

A Guide for Creating Great VR Storyboards

PLANNING TO MAKE YOUR VIRTUAL VISION A REALITY PART 2

IMAGINE THE POSSIBILITIES!

Let's take a look at other mediums and draw inspiration from them.

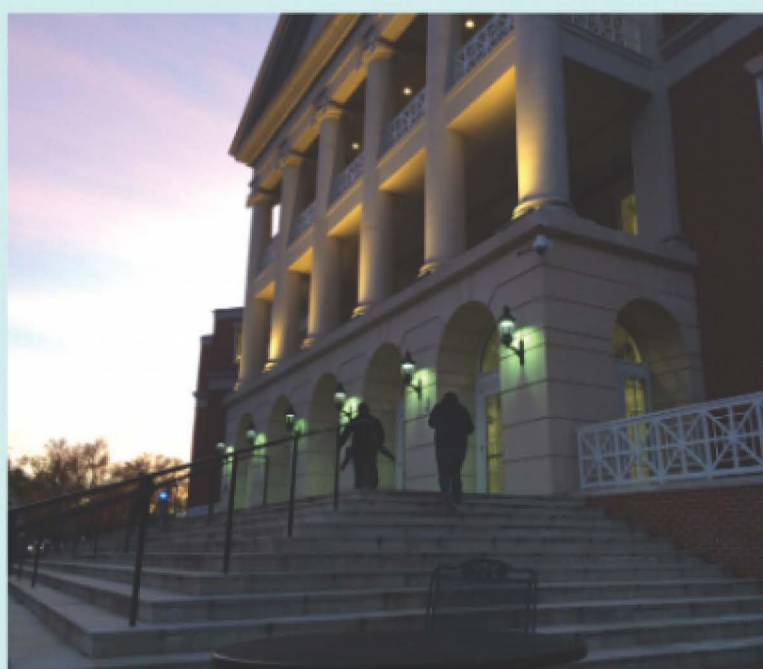
Still-Image Mediums



COMIC STRIPS

[FROM BRAVE CHEF BRIANNA VOL. 3]

- How do borders, panels, and gutters convey a message?
- How does narration and dialogue contribute to the comic?
- How is the foreground/background maintained?
- How does the eye travel through the set of panels?



PHOTOGRAPHY

[UMW UNIVERSITY CENTER]

- How does the photo's layout and angle of shot invite the viewer's gaze?
- Where is light located in the photograph? Where are there shadows?
- How are items placed within the photograph?
- What is not included in the photo?

Moving-Image Mediums



MOVIES

[FROM KILL BILL VOL. 1]

- How do characters move through the environment?
- How does the camera pan?
- When does the film cut?
- How are scenes framed?



VIDEO GAMES

[FROM FOLKLORE (2007)]

- How are players instructed on how to move and interact?
- How can players see the status of their playable character?
- How much agency do players have in the environment/story?

BUT VIRTUAL REALITY IS THREE-DIMENSIONAL...

Continue reading for Part 3!

A Guide for Creating Great VR Storyboards

PLANNING TO MAKE YOUR VIRTUAL VISION A REALITY PART 3

THINKING IN THREE DIMENSIONS

Most "traditional" storyboarding looks a little like this:



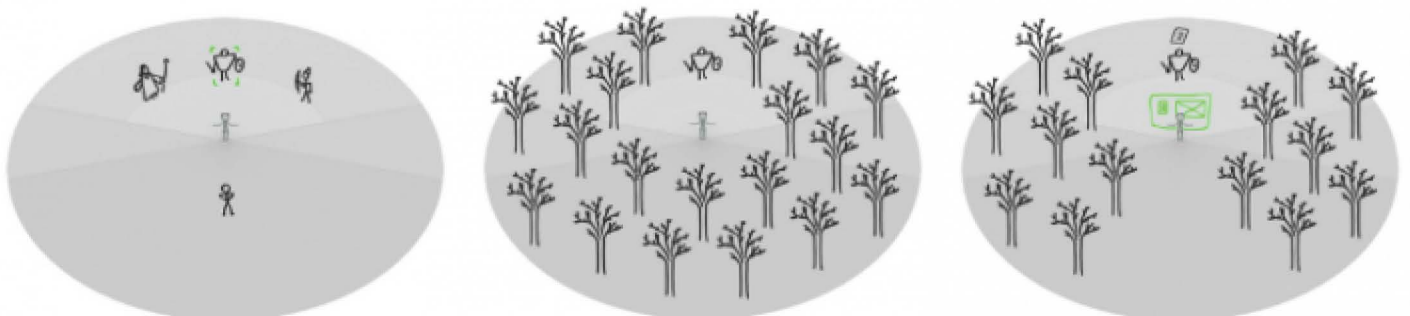
How can we add another dimension to storyboarding?

Spatial Thinking

As a VR content creator, you need to be conscious of how your audience will view your content within a 3D space.

Think about where objects are located within virtual space, how far apart objects appear, and the closeness of objects in relation to the user.

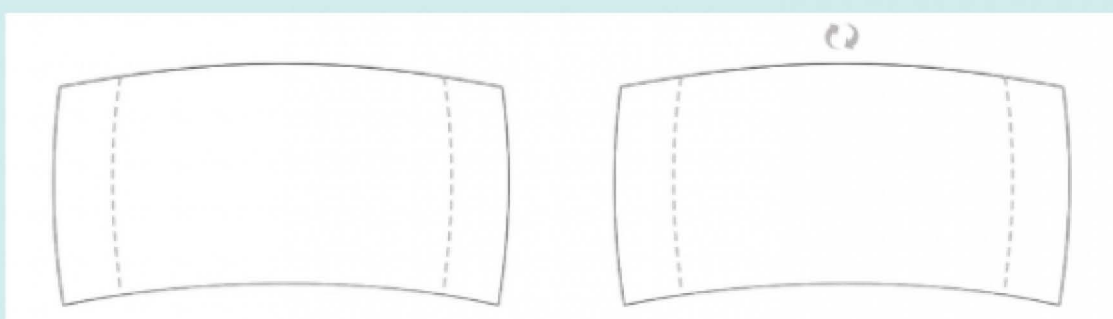
Remember that your content will immerse and surround the viewer in all directions.



VRPOP EXAMPLE TEMPLATE

You need to design content differently if you are creating a 360-degree image or video versus a computer-generated world with 3D models, as 3D modeling allows more interactivity.

However, with both kinds of VR projects, keep in mind that your viewer will see your content from a head-on view (below) rather than a "God's Eye View" (above).



FRONT AND REAR POINT OF VIEWS INSIDE VR GOGGLES

Make sure to engage your viewer and help direct their focus - plan your design around the fact that users will look at images and objects from different viewpoints!

WHAT TOOLS ARE AVAILABLE TO HELP ME STORYBOARD MY VIRTUAL REALITY PROJECT?

Continue reading for Part 4!

A Guide for Creating Great VR Storyboards

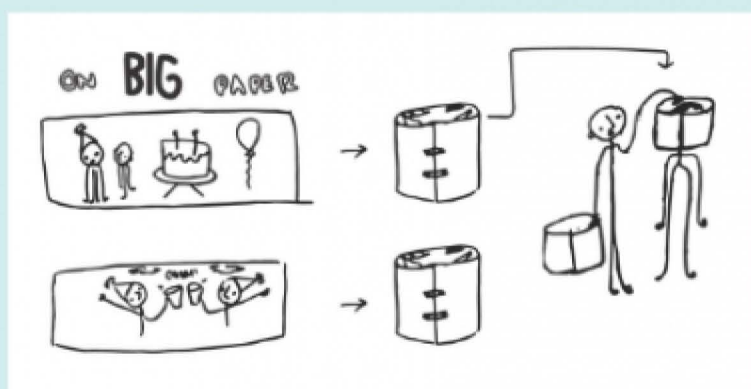
PLANNING TO MAKE YOUR VIRTUAL VISION A REALITY PART 4

TOOLS OF THE TRADE

Now that you're inspired and raring to go, let's get storyboarding!

There's not one right way to plan your project, so here's a few different ways to start sketching.

"Low-Tech" Tools



DIY 360-DEGREE PAPER
GREAT FOR 360 VIDEO PROJECTS



LEGO PROTOTYPE
CREATING A 3D GOD'S-EYE VIEW

PAPER AND PENCIL

Simple and effective!

I recommend using the templates that I showed in Part 3 (cited below), along with "traditional" storyboarding methods.

Writing out a step-by-step description of how you want your audience to view your project can also help in your design process.

BUILDING A SPACE WITH 3D PROPS

Get creative!

If you plan and process information better in 3D, this may be the perfect method for you.

Make sure to take pictures of your creations to reference later.

"High-Tech" Tools

There are many different applications available to help you build your VR project, but here are a couple that I recommend.



STORYBOARD VR
VISUALIZE VR EXPERIENCES IN VR



GEAR 360 CAMERA
STITCH TOGETHER IMAGES WITH APPS LIKE VEER EDITOR, V360, OR COLLECT

WHERE DID I GET THIS STORYBOARDING INFORMATION?

Continue reading for Works Cited!

A Guide for Creating Great VR Storyboards

PLANNING TO MAKE YOUR VIRTUAL VISION A REALITY WORKS CITED

ELECTRONIC SOURCES

Artefact. "Storyboard VR: Download a free tool to prototype VR ideas." Artefact, www.artefactgroup.com/case-studies/storyboard-vr/. Accessed 3 April 2020.

Leitch, Andrew. "A Storyboard for Virtual Reality." Medium, medium.com/cinematicvr/a-storyboard-for-virtual-reality-fa000a9b4497. Accessed 3 April 2020.

Recode Staff. "Full transcript: VR researcher Jeremy Bailenson on Recode Decode" Vox, www.vox.com/2018/2/20/17029344/transcript-vr-virtual-reality-augmented-researcher-jeremy-bailenson-headset-oculus-recode-decode. Accessed 6 April 2020.

Redohl, Sarah. "Storyboarding Strategies for VR." Immersive Shooter, www.immersiveshooter.com/2018/03/26/storyboarding-strategies-for-vr/. Accessed 5 April 2020.

Rothberg, Sarah. "Directing Virtual Reality: Notes on Storyboarding for VR." NYU, itp.nyu.edu/classes/dvr-spring2017/notes-on-storyboarding-for-vr/. Accessed 3 April 2020.

PICTURE SOURCES, IN ORDER OF APPEARANCE

- Brave Chef Brianna, Vol 3
- Photo Courtesy of Cristina Montemorano
- <http://kissthemgoodbye.net/movie/displayimage.php?album=385&pid=862397>
- Screen capture from Folklore (2007) for PS3
- Modern Joust Commercial Storyboard Courtesy of Cristina Montemorano
- <https://virtualrealitypop.com/storyboarding-in-virtual-reality-67d3438a2fb1?gi=c3811d5bod97#.et4kqex94>
- <https://medium.com/cinematicvr/a-storyboard-for-virtual-reality-fa000a9b4497>
- <https://itp.nyu.edu/classes/dvr-spring2017/notes-on-storyboarding-for-vr/>
- Ibid.
- <https://www.turbosquid.com/3d-models/3d-model-htc-vive/1037510>
- <http://www.artefactgroup.com/case-studies/storyboard-vr/>
- <https://news.samsung.com/us/samsung-new-gear-360-introduces-true-4k-video-360-degree-content-capture-unpacked-2017/>
- <https://www.immersiveshooter.com/2017/09/12/veer-editor-360-video-editing-app-android-ios-launch-sept-15/>
- <https://www.immersiveshooter.com/2017/03/31/v360-360-video-editing-android/>
- <https://www.immersiveshooter.com/2017/02/15/collect-app-brings-360-video-editing-to-android/>

REMEMBER...

- Be sure to get other opinions about your VR design. This way, you can make sure that your project is accessible and does what is intended.
- VR sickness is new level of responsibility for the designer. Make sure that you design your content in a way that lowers the risk of users getting sick.
- "The content's got to be good enough to justify messing up your hair, getting those lines around your face and having your buddies take pictures of you and making fun." - Jeremy Bailenson

GOOD LUCK ON YOUR VIRTUAL REALITY PROJECT!