

1

The slide has a light gray background with white water droplets. The title 'CG INTRODUCTION' is at the top. Below it is a bulleted list: '• COMPUTER GRAPHICS' and '• GRAPHICS CREATED USING COMPUTERS -[\(FROM WIKI\)](#)'. To the left is a photograph of a vintage computer system with a CRT monitor and keyboard. To the right are screenshots of various computer interfaces, including a DOS-like screen, a Windows 3.0 desktop, and a modern Windows 8 Start menu.

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WHAT ELSE?

CG IS EVERYWHERE IN THIS CENTURY!

- MOVIE, TV, ANIMATION
- VIRTUAL REALITY
- AUGMENTED REALITY
- GAME



3

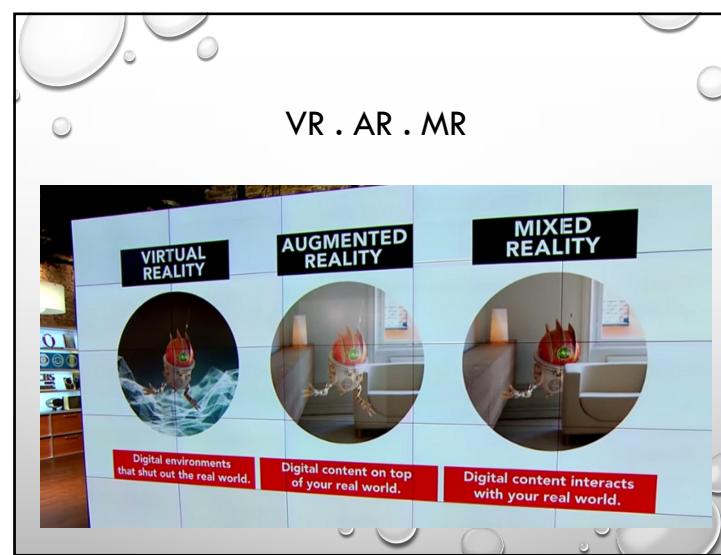
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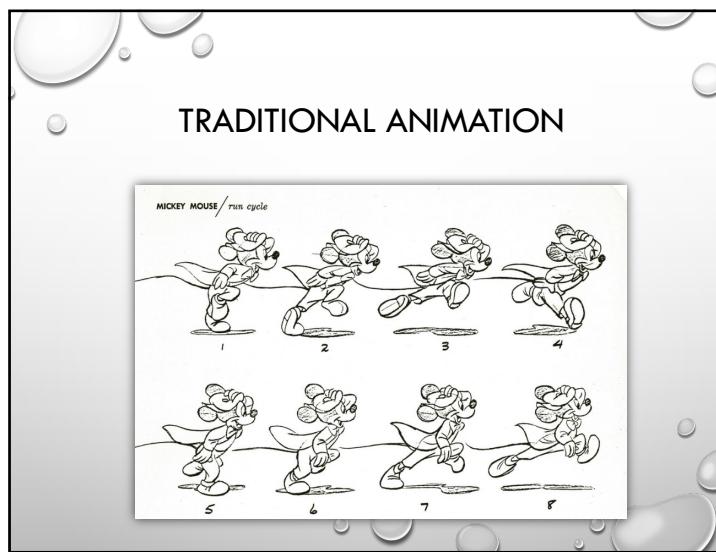


4



ANIMATION

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COMPUTER GRAPHICS INTRODUCTION

- RENDERING 3D GRAPHICS CAN BE TIME CONSUMING!
 - 為了求得更高品質的3D場景或圖像，製作一部3D電影或動畫可耗時數年

Toy story 3 (1,084 days)
The average frame takes about 7 hours to render
- some can take nearly 39 hours
(a movie has 24 frames per second)

<http://www.wired.co.uk/magazine/archive/2010/07/features/how-toy-story-3-was-made?page=full>



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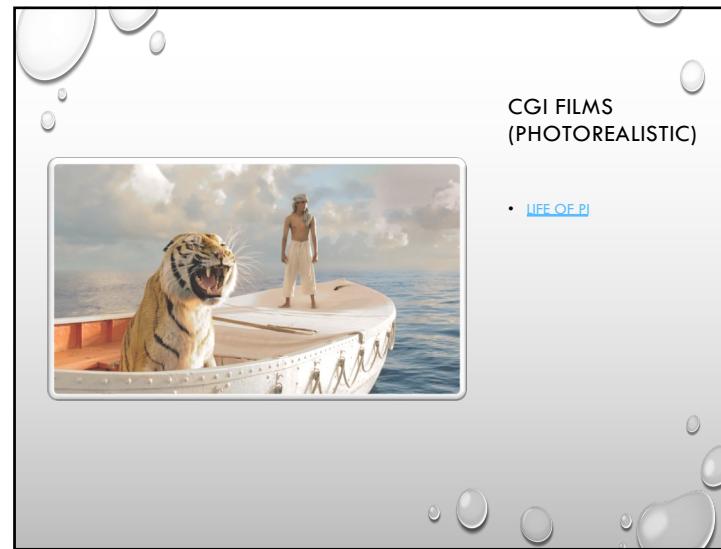
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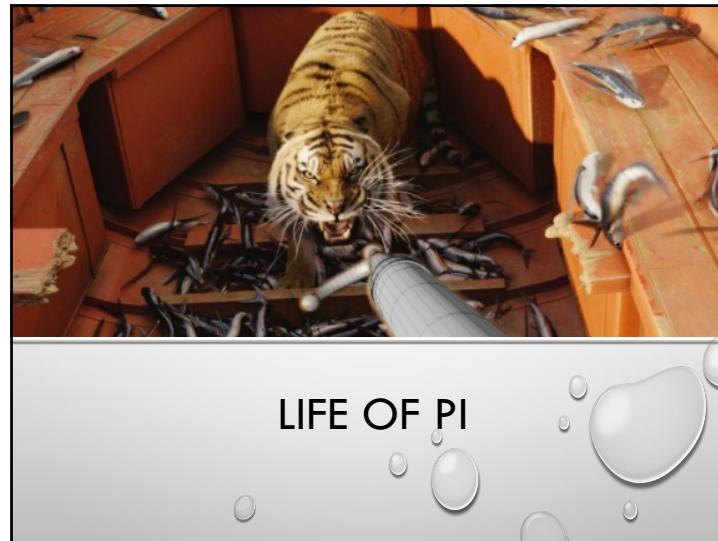
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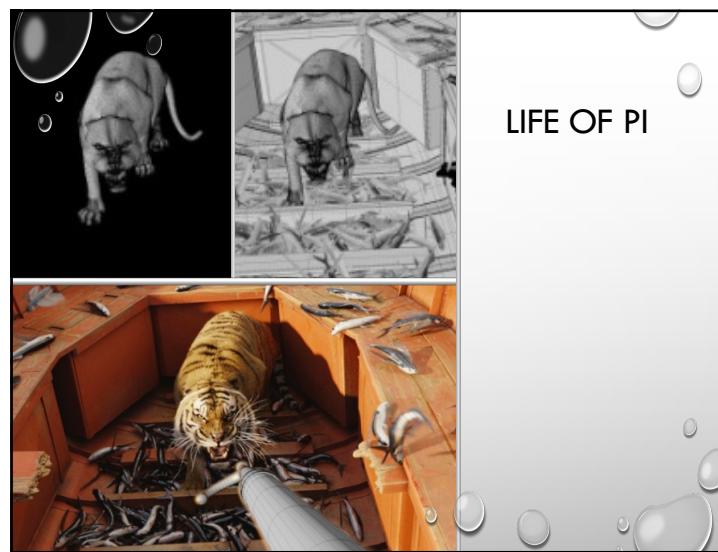
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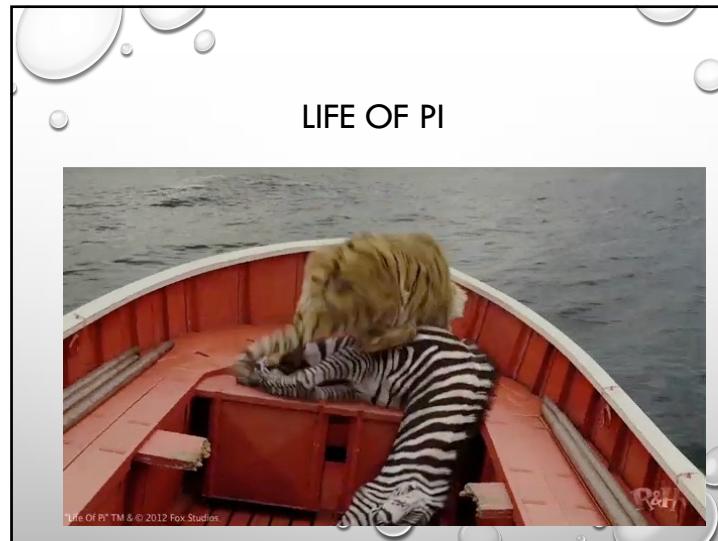
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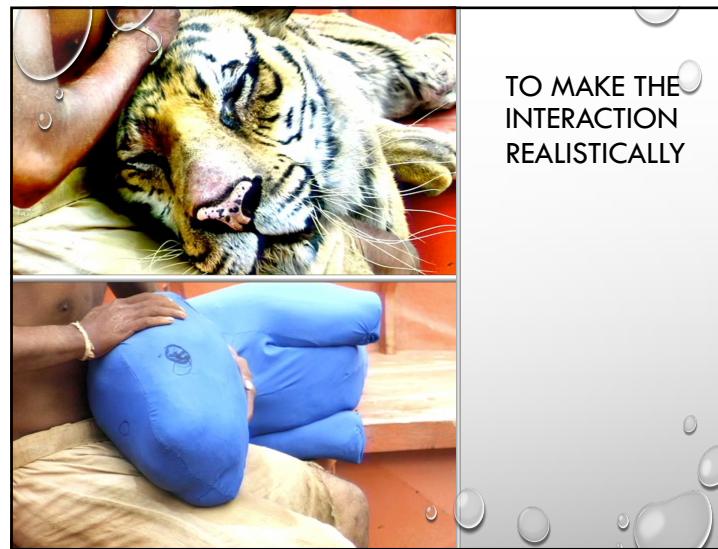
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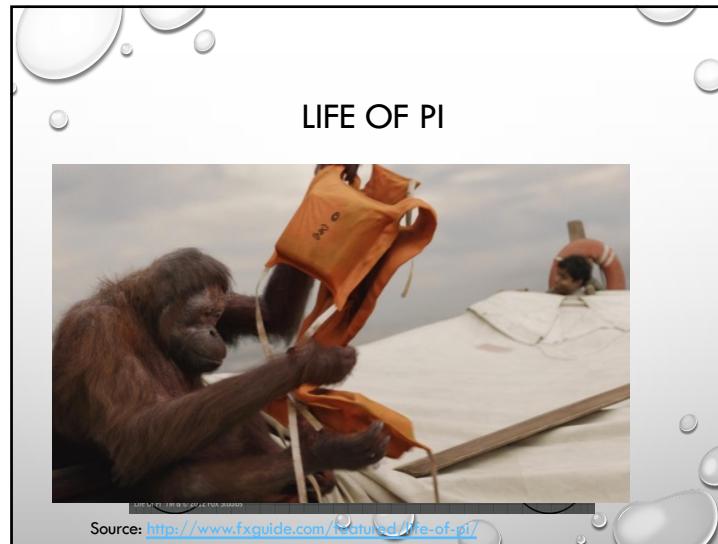


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TO MAKE THE
INTERACTION
REALISTICALLY

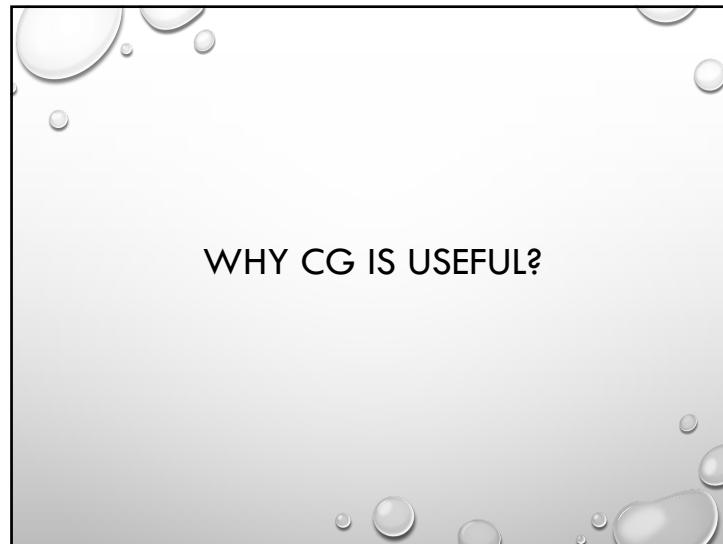
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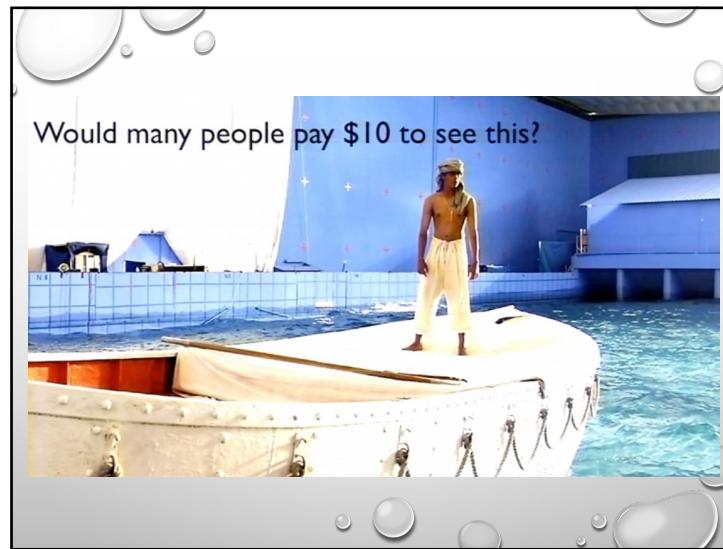
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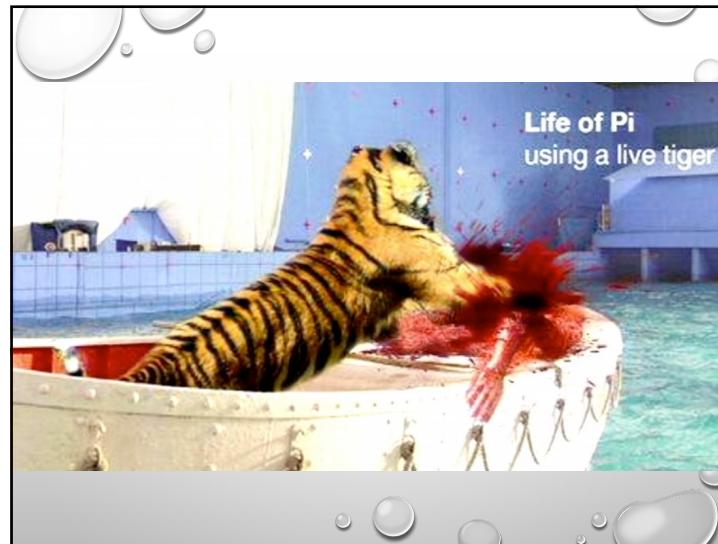
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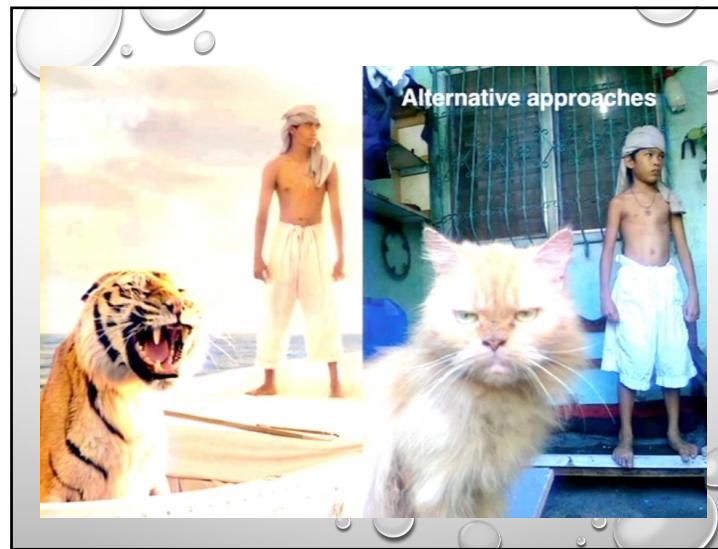
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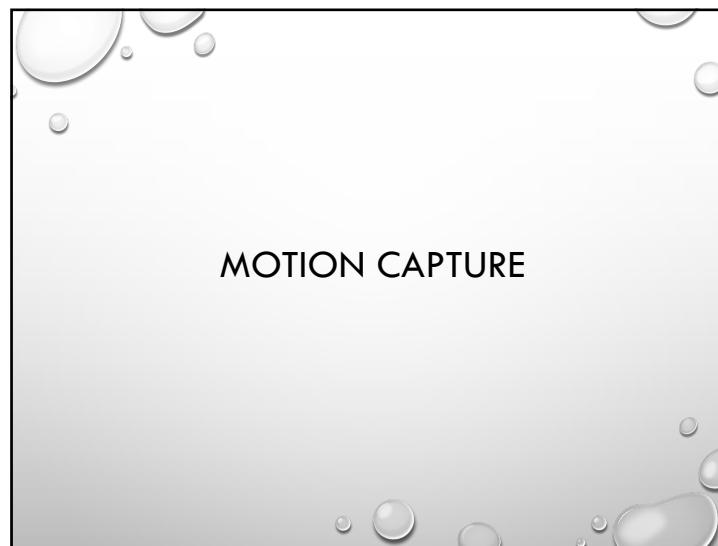
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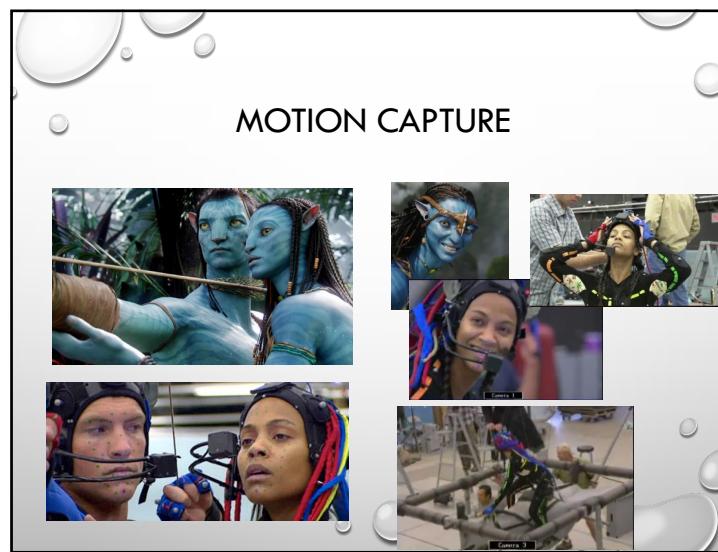
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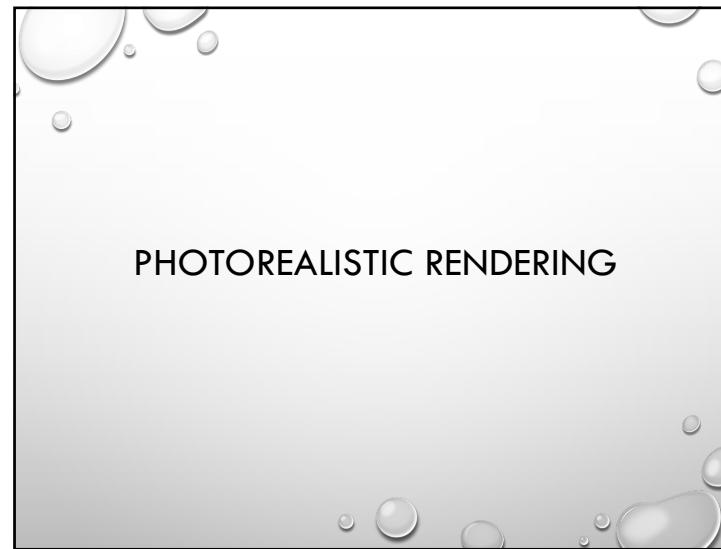
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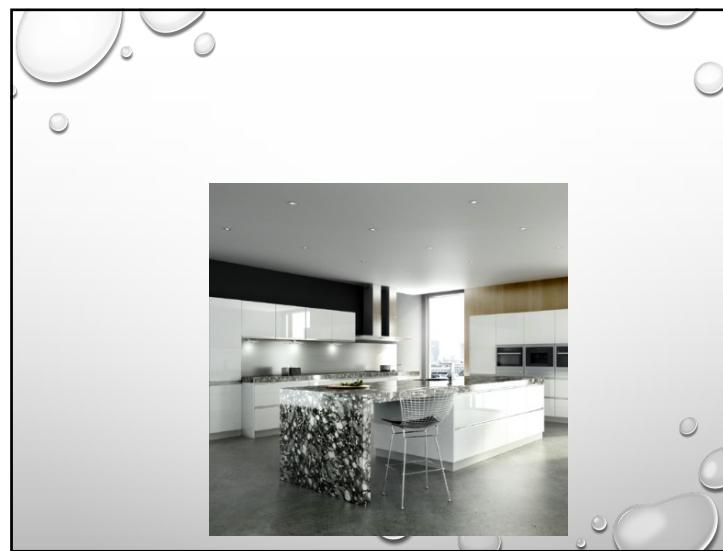
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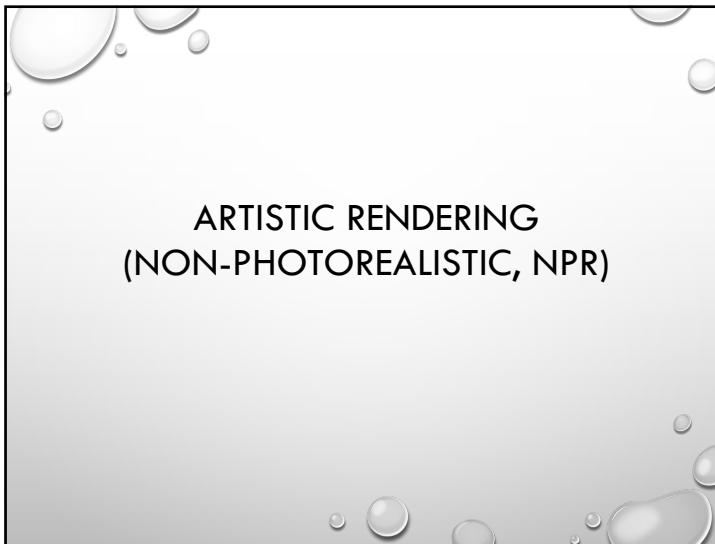
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NON-PHOTOREALISTIC RENDERING

 Painterly Rendering (1998)

 [What Dreams May Come](#) (1998)

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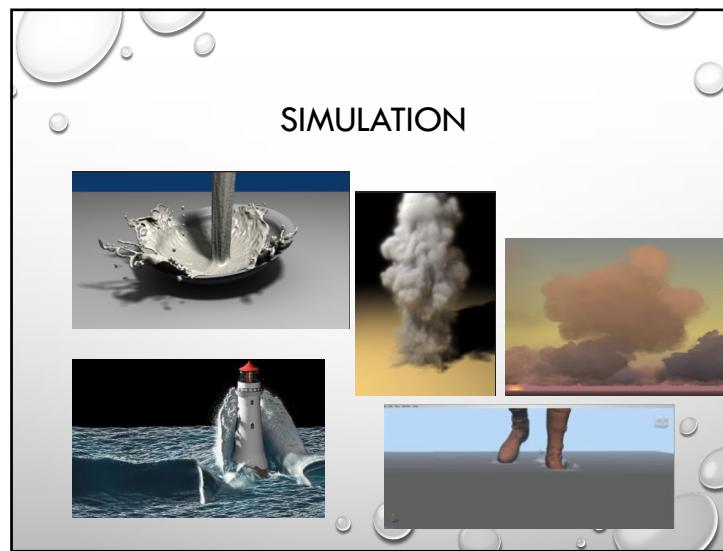
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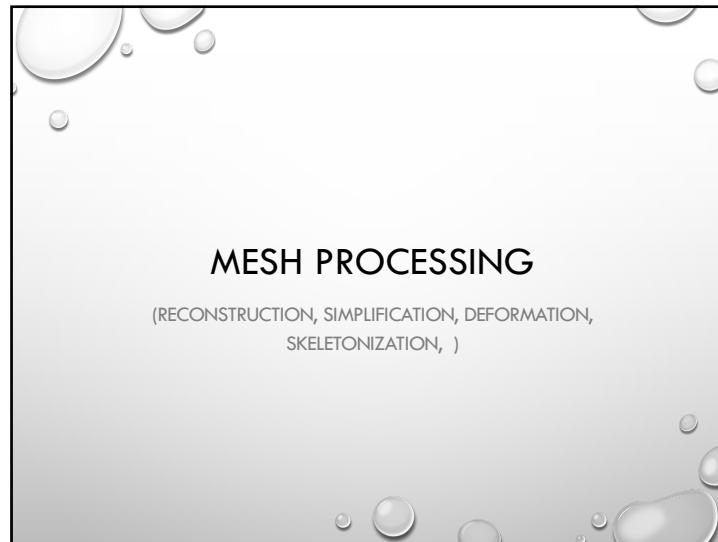
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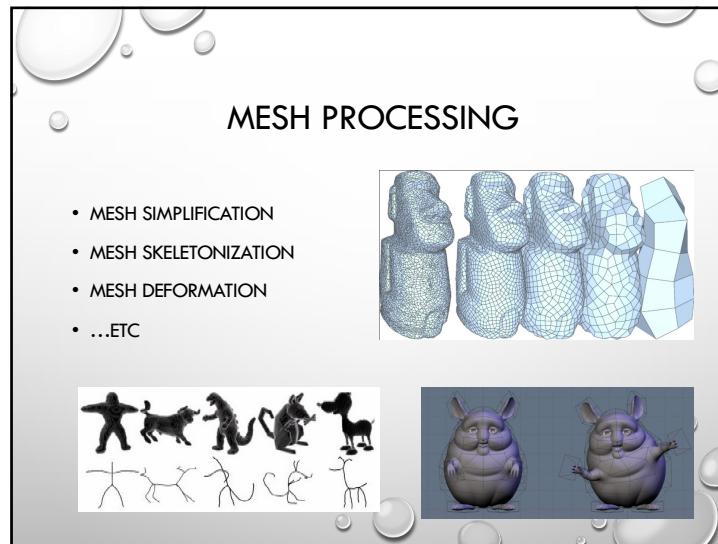
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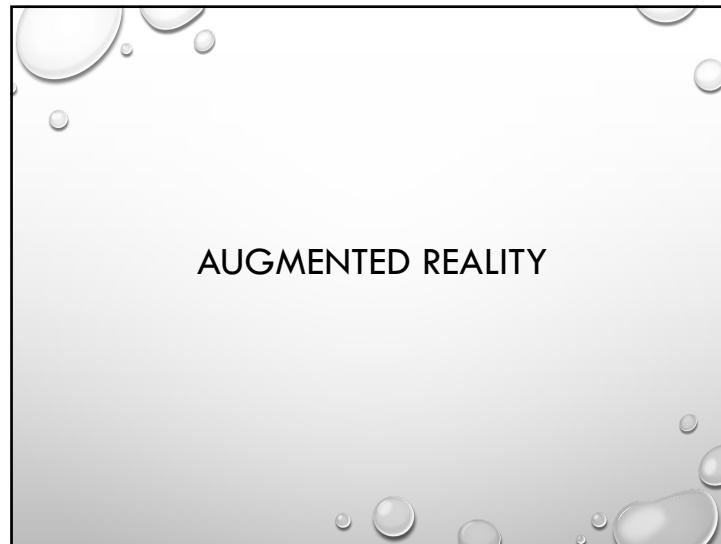
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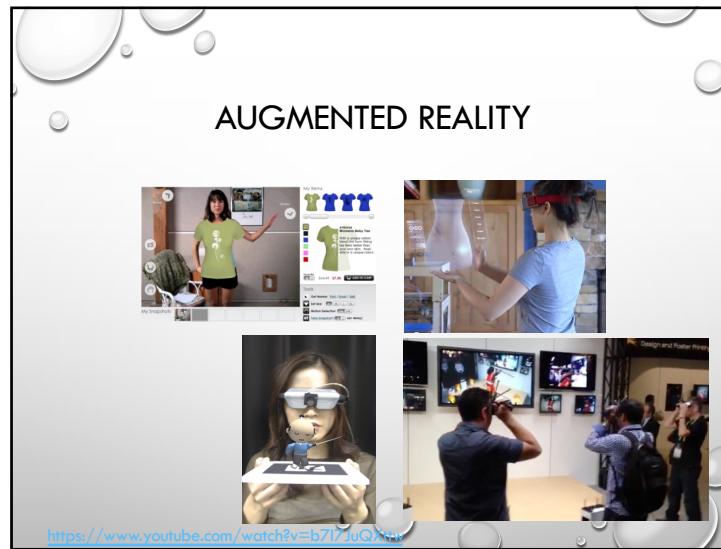
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RESEARCH OF AUGMENTED REALITY

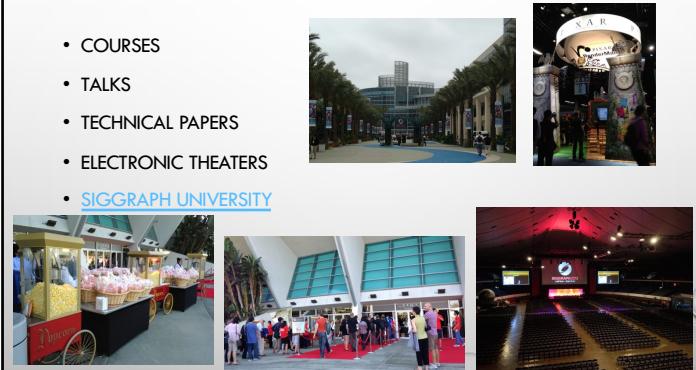
- REALISTIC RENDERING
- HARDWARE
- LIMITED COMPUTING POWER



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SIGGRAPH

- COURSES
- TALKS
- TECHNICAL PAPERS
- ELECTRONIC THEATERS
- [SIGGRAPH UNIVERSITY](#)



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