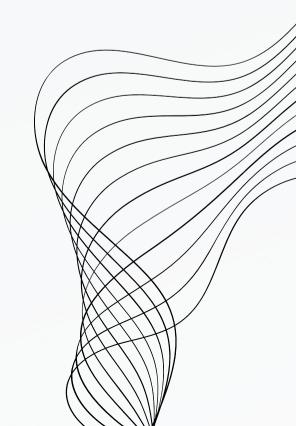


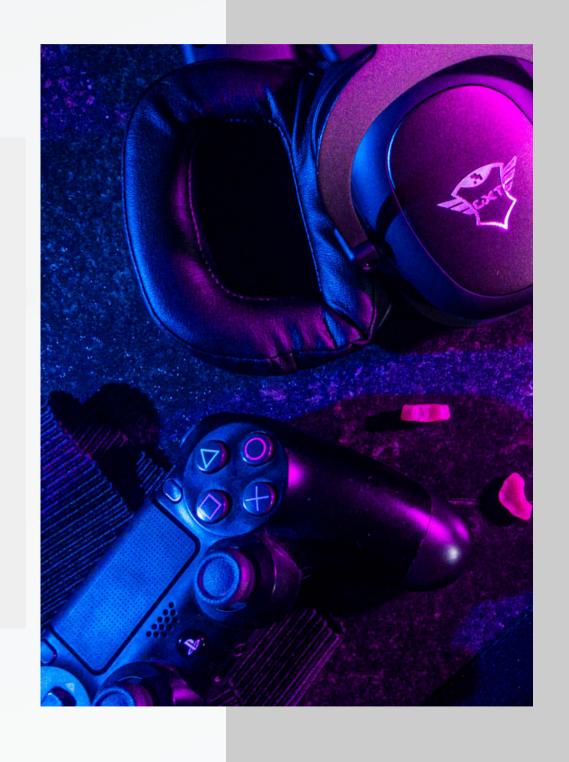
# HOW DOES CLOUD TECHNOLOGY WORK IN GAMING

www.osiztechnologies.com



### INTRODUCTION

Tired of expensive gaming consoles or waiting for downloads? Cloud gaming is here! Imagine playing the latest games on any device, anywhere. This blog post will explore the magic of cloud technology and how it's changing the way we play games.



### GAME SERVERS:

### Powerhouse Performance

These servers are equipped with cutting-edge processors, graphics cards, and ample memory, exceeding the capabilities of most personal devices. This ensures smooth gameplay for demanding titles.

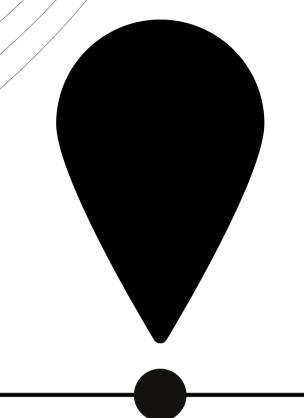
### Data Center Distribution

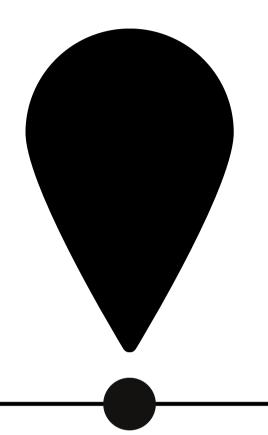
Servers are strategically located in data centers across the globe, minimizing the physical distance between players and the servers hosting their games. This reduces latency, the time it takes for data to travel, leading to a more responsive experience.

#### Virtualization

Cloud platforms can leverage virtualization technology, allowing them to run multiple game instances on a single physical server, optimizing resource allocation and costeffectiveness.

### USER INPUT





# LOW LATENCY MATTERS

Your controller or keyboard inputs are captured by your device and sent through the internet to the game servers.

Minimizing latency is crucial for a seamless experience, especially in fast-paced games where quick reactions are essential.

### ENCODING AND TRANSMISSION

User input data is compressed and transmitted to the servers efficiently using specialized protocols designed for low latency and minimal packet loss.

# VIDEO AND AUDIO STREAMING

### REAL-TIME RENDERING

On the game server, your input is used to determine the game's state, and powerful graphics processing units (GPUs) render the game's visuals in real-time.

# ADVANCED ENCODING

The rendered video and audio are compressed using sophisticated encoding techniques to optimize data size and minimize bandwidth requirements while maintaining high quality.

### STREAMING DELIVERY NETWORKS (SDNS)

These specialized networks prioritize game data delivery, ensuring it reaches your device quickly and reliably with minimal lag.

### PLAYING THE GAME





## DECODING AND DISPLAY

Your device receives the streamed video and audio data, decodes it using specialized software, and displays it on your screen or speakers, creating the illusion of playing the game locally.

### RESPONSIVE GAMEPLAY

The entire process, from sending your input to receiving the game's response, should ideally happen within milliseconds for a smooth and responsive experience.

### CONCLUSION

Cloud gaming represents a groundbreaking shift in how we experience and enjoy video games. By leveraging the power of remote servers, players can access high-quality gaming experiences on any device, from anywhere with an internet connection. The seamless integration of powerful hardware, low-latency data transmission, and advanced streaming technologies ensures an immersive and responsive gameplay experience.

If you're considering diving into the world of <u>cloud gaming</u> or looking for the best provider to meet your gaming needs, look no further than Osiz. a leading <u>game</u> <u>development Company</u> With its cutting-edge infrastructure, global server distribution, and commitment to delivering top-notch performance, Osiz stands out as the premier choice for cloud gaming enthusiasts.

