**Postgraduate Certificate** UVs and 3D Texturing with Allegorithmic

> tech, global university

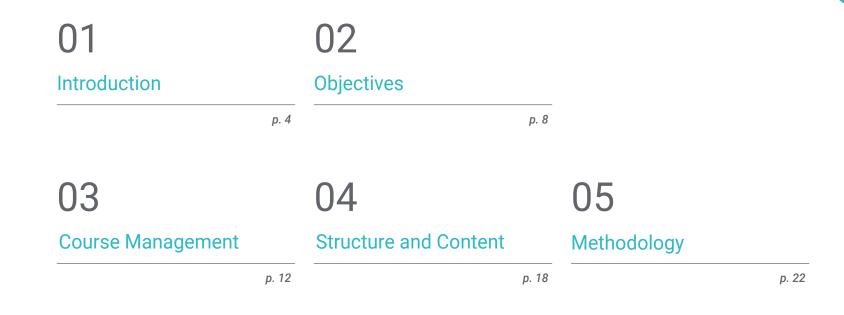


## **Postgraduate Certificate** UVs and 3D Texturing with Allegorithmic

- » Modality: online
- » Duration: 6 weeks
- » Certificate: TECH Global University
- » Credits: 6 ECTS
- » Schedule: at your own pace
- » Exams: online

Website: www.techtitute.com/us/design/postgraduate-certificate/uvs-3d-texturing-allegorithmic

# Index



06 Certificate

p. 30

# 01 Introduction

In the highest-quality cinema, the most widespread tool is Mari, a piece of software with which the most prestigious 3D designers make the figures and models that we all know. The problem for most professionals in the design world is that this program is hardly taught in traditional faculties, so their knowledge is very basic or scarce. TECH has elaborated this qualification to solve this problem, going deeper into the aspects of UV mapping and 3D texturing with Allegorithmic Substance Painter, another of the most used tools in the field of video games.



You will learn all the secrets hidden in the Mari tool, as well as the correct way to texture in Substance Painter, which will greatly increase your professional potential"

## tech 06 | Introduction

Due to their great versatility of use, as well as the final quality of the work done, the most widespread texturing tools in the world of cinema and video games are Mari and Allegorithmic Substance Painter, respectively.

Since the software is relatively complex, traditional design schools do not have enough influence on its use, so that professionals in this field often require much more in-depth and specialized instruction to really improve their job performance and position.

For this reason TECH has assembled a team of experts with experience in the use of these two softwares, with the task of elaborating a Postgraduate Certificate as detailed and exhaustive as possible so that the student ends up mastering them in all their aspects, adding a plus of professionalism to all their work and projects.

Additionally, the Postgraduate Certificate in UVs and 3D Texturing with Allegorithmic is taught completely online, and the student can access all the teaching material from the first day of the qualification. Since there are no classes or schedules, the students are the ones who decide how and when to study, which gives them great freedom and comfort to be able to face the program.

This **Postgraduate Certificate in UVs and 3D Texturing with Allegorithmic** contains the most complete and up-to-date educational program on the market. Its most notable features are:

- The development of case studies presented by experts in 3D modeling
- The graphic, schematic, and practical contents with which they are created, provide practical information on the disciplines that are essential for professional practice
- Practical exercises where self-assessment can be used to improve learning
- Its special emphasis on innovative methodologies
- Theoretical lessons, questions to the expert, debate forums on controversial topics, and individual reflection assignments
- Access to content from any fixed or portable device with an Internet connection

You will be a design professional with more advanced knowledge thanks to this Postgraduate Certificate in UVs and 3D Texturing with Allegorithmic"

### Introduction | 07 tech

You will learn the tricks and techniques of the best 3D designers in the industry, applicable to a multitude of fields and projects"

The program's teaching staff includes professionals from the sector who contribute their work experience to this training program, as well as renowned specialists from leading societies and prestigious universities.

The multimedia content, developed with the latest educational technology, will provide the professional with situated and contextual learning, i.e., a simulated environment that will provide immersive training programmed to train in real situations.

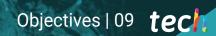
This program is designed around Problem-Based Learning, whereby the professional must try to solve the different professional practice situations that arise throughout the program. This will be done with the help of an innovative system of interactive videos made by renowned experts.

You will create the highest quality models of your team thanks to your deeper knowledge of Mari and Substance Painter.

You will have the opportunity to launch yourself into the most prestigious design teams in video games or even Hollywood.

# 02 **Objectives**

The objective of this TECH qualification is to increase the professional skills of its students with quality education, which will be a differential factor in determining success in their professional careers. That's why the syllabus delves into advanced texturing techniques, with which the student's 3D models will look much better while improving their own workflow.



With the expert advice you will receive throughout this program, you will be more than prepared to take a major leap forward in your professional career"

# tech 10 | Objectives



## General Objectives

- Expand knowledge of human and animal anatomy in order to develop hyper-realistic creatures
- Master retopology, UVs and texturing to perfect the models created
- Create an optimal and dynamic workflow to work more efficiently with 3D modeling
- Have the skills and knowledge most in demand in the 3D industry to be able to apply for the best jobs



## Objectives | 11 tech



### Specific Objectives

- Study the most optimal way to UVS's in Maya and UDIM systems
- Develop the knowledge to texture in Substance Painter for video games
- Knowledge of texturing in Mari for hyper-realistic models
- Learn how to create XYZ textures and displacement maps on our models
- Delve into the import of our textures in Maya

This qualification will be a before and after in your career in the world of design, as you will know how to apply much more striking and formidable textures to your models"

# 03 Course Management

This program has first level teachers in the field of 3D modeling, so the student has a guarantee of quality and professionalism on the part of the staff when receiving the best possible training in 3D texturing. Additionally, TECH's use of an innovative educational methodology ensures that its students get even more out of all its qualifications.

You are in the best place to be able to add value to your professional quality by learning the latest developments and methods in 3D texturing"

## tech 14 | Course Management

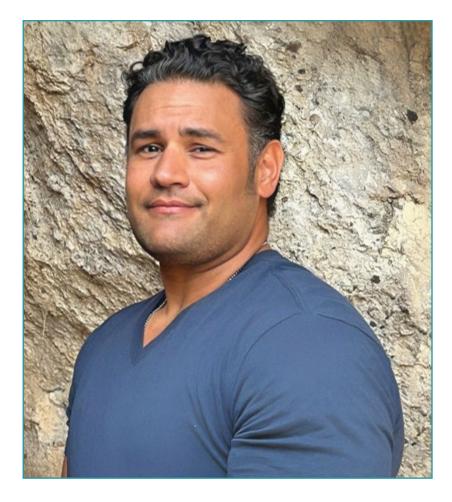
### **International Guest Director**

Joshua Singh is a leading professional with over 20 years of experience in the **video game** industry, internationally recognized for his skills in **art direction** and **visual development**. With solid training in **software** such as **Unreal**, **Unity**, **Maya**, **ZBrush**, **Substance Painter** and **Adobe Photoshop**, he has made a significant mark in the field of **game design**. In addition, his experience spans **visual development** in both 2D and 3D, and is distinguished by his ability to collaboratively and thoughtfully solve problems in **production environments**.

In addition, as **Art Director at Marvel Entertainment**, he has collaborated with and guided elite teams of artists, ensuring that the artwork meets the required quality standards. He has also served as **Lead Character Artist** at **Proletariat Inc**. where he has created a safe environment for his team and has been responsible for all character assets in **video games**.

With an outstanding track record, including **leadership roles** at companies such as **Wildlife Studios** and **Wavedash Games**, Joshua Singh has been an advocate for artistic development and a mentor to many in the industry. Not to mention his time at large and well-known companies, such as **Blizzard Entertainment** and **Riot Games**, where he has worked as a **Senior Character Artist**. And, among his most relevant projects, stands out for his participation in hugely successful **video games**, including **Marvel's Spider-Man 2**, **League of Legends** and **Overwatch**.

Thus, his ability to unify the vision of **Product, Engineering and Art** has been fundamental to the success of numerous projects. Beyond his work in the industry, he has shared his experience as an instructor at the prestigious **Gnomon School of VFX** and has been a presenter at renowned events such as the **Tribeca Games Festival** and the **ZBrush Summit**.



# D. Singh, Joshua

- Art Director at Marvel Entertainment, California, USA
- Lead Character Artist at Proletariat Inc
- Art Director at Wildlife Studios
- Art Director at Wavedash Games
- Senior Character Artist at Riot Games
- Senior Character Artist at Blizzard Entertainment
- Artist at Iron Lore Entertainment
- 3D Artist at Sensory Sweep Studios
- Senior Artist at Wahoo Studios/Ninja Bee
- General Studies from Dixie State University
- Degree in Graphic Design from Eagle Gate Technical College

Thanks to TECH, you will be able to learn with the best professionals in the world"

6

## tech 16 | Course Management

### Management



### Ms. Gómez Sanz, Carla

- 3D Generalist at Blue Pixel 3D
- Concept Artist, 3D Modeler, Shading in Timeless Games Inc.
- · Collaboration with multinational consulting firm for the design of vignettes and animation for commercial proposals
- Advanced Technician in 3D Animation, video games and interactive environments at CEV School of Communication, Image and Sound.
- Master's Degree and Bachelor's Degree in 3D Art, Animation and Visual Effects for video games and cinema at CEV School of Communication, Image and Sound.

Course Management | 17 teci

# 04 Structure and Content

The syllabus of this Postgraduate Certificate in UVs and 3D Texturing with Allegorithmic has been structured with two objectives in mind: to contain all the essential theory and practice in the use of Substance Painter and Mari while at the same time facilitating the acquisition of all this teaching material thanks to a powerful audio-visual support. The student will find a clear, clean and impeccable writing, with a precision and conciseness to focus on the really important details.

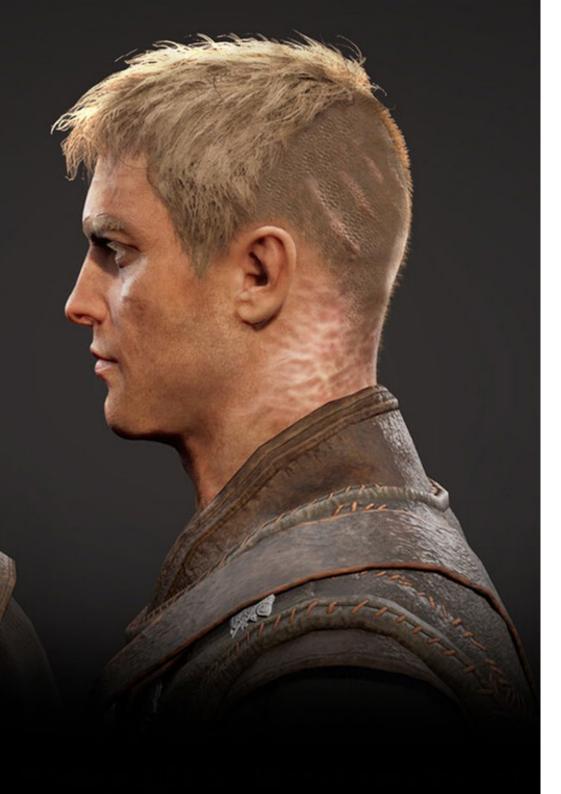
Following the most innovative and cuttingedge educational approach on the market, you will be learning the most advanced 3D texturing in the best possible way"

## tech 20 | Structure and Content

# **Module1. UVs** and Texturing with Allegorithmic Substance Painter and Mari

- 1.1. Creation of High-Level UVs in Maya
  - 1.1.1. Facial UVs
  - 1.1.2. Creation and Layout
  - 1.1.3. Advanced UVs
- 1.2. Preparation of UVs for UDIMs Systems Focused on Large Production Models
  - 1.2.1. UDIMs
  - 1.2.2. UDIMs in Maya
  - 1.2.3. Textures in 4K
- 1.3. XYZ Textures: What Are They and How to Use Them?
  - 1.3.1. XYZ. Hyperrealism
  - 1.3.2. MultiChannel Maps
  - 1.3.3. Texture Maps
- 1.4. Texturing: Videogames and Cinema
  - 1.4.1. Substance Painter
  - 1.4.2. Mari
  - 1.4.3. Types of Texturing
- 1.5. Texturing in Substance Painter for Videogames
  - 1.5.1. Baking from High to Low Poly
  - 1.5.2. PBR Textures and Their Importance
  - 1.5.3. ZBrush with Substance Painter
- 1.6. Finalizing our Substance Painter Textures
  - 1.6.1. Scattering, Translucency
  - 1.6.2. Model Texturing
  - 1.6.3. Scars, Freckles, Tattoos, Paints or Makeup





### Structure and Content | 21 tech

- 1.7. Hyper-Realistic Facial Texturing with XYZ Textures and Color Mapping
  - 1.7.1. XYZ Textures in ZBrush
  - 1.7.2. Wrap
  - 1.7.3. Correction of Errors
- 1.8. Hyper-Realistic Facial Texturing with XYZ Textures and Color Mapping
  - 1.8.1. Mari's Interface
  - 1.8.2. Texturing in Mari
  - 1.8.3. Projection of Skin Textures
- 1.9. Advanced Detailing of Displacements Maps in ZBrush and Mari
  - 1.9.1. Texture Painting
  - 1.9.2. Displacement for Hyperrealism
  - 1.9.3. Layer Creation
- 1.10. Shading and Texture Implementation in Maya
  - 1.10.1. Skin Shaders in Arnold
  - 1.10.2. Hyperrealistic Eye

6.

1.10.3. Touch-ups and Tips

Enroll today with this TECH Postgraduate Certificate and don't wait any longer to give a real boost to your career in 3D design"

# 05 **Methodology**

This academic program offers students a different way of learning. Our methodology uses a cyclical learning approach: **Relearning.** 

This teaching system is used, for example, in the most prestigious medical schools in the world, and major publications such as the **New England Journal of Medicine** have considered it to be one of the most effective.

Discover Relearning, a system that abandons conventional linear learning, to take you through cyclical teaching systems: a way of learning that has proven to be extremely effective, especially in subjects that require memorization"

## tech 24 | Methodology

### Case Study to contextualize all content

Our program offers a revolutionary approach to developing skills and knowledge. Our goal is to strengthen skills in a changing, competitive, and highly demanding environment.



At TECH, you will experience a learning methodology that is shaking the foundations of traditional universities around the world"



You will have access to a learning system based on repetition, with natural and progressive teaching throughout the entire syllabus.

## Methodology | 25 tech



A learning method that is different and innovative

This TECH program is an intensive educational program, created from scratch, which presents the most demanding challenges and decisions in this field, both nationally and internationally. This methodology promotes personal and professional growth, representing a significant step towards success. The case method, a technique that lays the foundation for this content, ensures that the most current economic, social and professional reality is taken into account.

666 Our program prepares you to face new challenges in uncertain environments and achieve success in your career"

The case method is the most widely used learning system in the best faculties in the world. The case method was developed in 1912 so that law students would not only learn the law based on theoretical content. It consisted of presenting students with real-life, complex situations for them to make informed decisions and value judgments on how to resolve them. In 1924, Harvard adopted it as a standard teaching method.

What should a professional do in a given situation? This is the question we face in the case method, an action-oriented learning method. Throughout the program, the studies will be presented with multiple real cases. They will have to combine all their knowledge and research, and argue and defend their ideas and decisions.

The student will learn to solve complex situations in real business environments through collaborative activities and real cases.

## tech 26 | Methodology

### **Relearning Methodology**

TECH effectively combines the Case Study methodology with a 100% online learning system based on repetition, which combines 8 different teaching elements in each lesson.

We enhance the Case Study with the best 100% online teaching method: Relearning.

In 2019, we obtained the best learning results of all online universities in the world.

At TECH you will learn using a cutting-edge methodology designed to train the executives of the future. This method, at the forefront of international teaching, is called Relearning.

Our university is the only one in the world authorized to employ this successful method. In 2019, we managed to improve our students' overall satisfaction levels (teaching quality, quality of materials, course structure, objectives...) based on the best online university indicators.



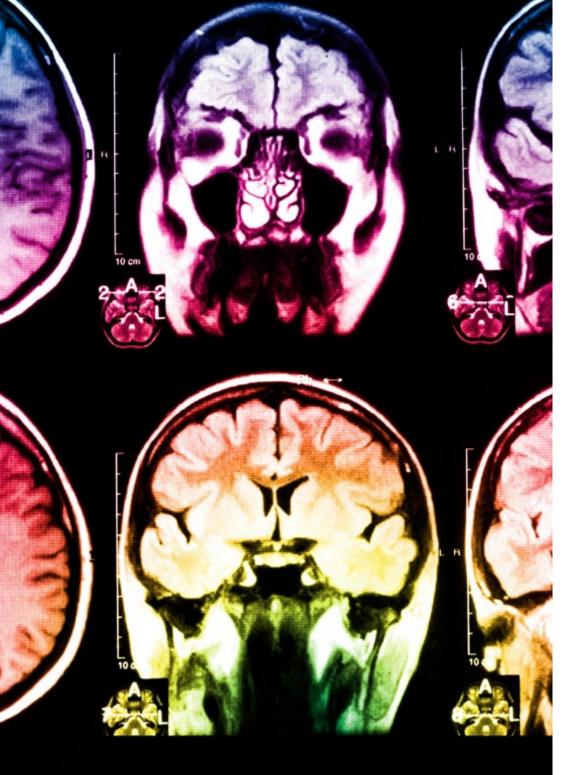
### Methodology | 27 tech

In our program, learning is not a linear process, but rather a spiral (learn, unlearn, forget, and re-learn). Therefore, we combine each of these elements concentrically. With this methodology we have trained more than 650,000 university graduates with unprecedented success in fields as diverse as biochemistry, genetics, surgery, international law, management skills, sports science, philosophy, law, engineering, journalism, history, markets, and financial instruments. All this in a highly demanding environment, where the students have a strong socio-economic profile and an average age of 43.5 years.

Relearning will allow you to learn with less effort and better performance, involving you more in your training, developing a critical mindset, defending arguments, and contrasting opinions: a direct equation for success.

From the latest scientific evidence in the field of neuroscience, not only do we know how to organize information, ideas, images and memories, but we know that the place and context where we have learned something is fundamental for us to be able to remember it and store it in the hippocampus, to retain it in our long-term memory.

In this way, and in what is called neurocognitive context-dependent e-learning, the different elements in our program are connected to the context where the individual carries out their professional activity.



## tech 28 | Methodology

This program offers the best educational material, prepared with professionals in mind:



#### **Study Material**

All teaching material is produced by the specialists who teach the course, specifically for the course, so that the teaching content is highly specific and precise.

30%

10%

8%

These contents are then applied to the audiovisual format, to create the TECH online working method. All this, with the latest techniques that offer high quality pieces in each and every one of the materials that are made available to the student.



#### Classes

There is scientific evidence suggesting that observing third-party experts can be useful.

Learning from an Expert strengthens knowledge and memory, and generates confidence in future difficult decisions.



#### **Practising Skills and Abilities**

They will carry out activities to develop specific skills and abilities in each subject area. Exercises and activities to acquire and develop the skills and abilities that a specialist needs to develop in the context of the globalization that we are experiencing.



#### **Additional Reading**

Recent articles, consensus documents and international guidelines, among others. In TECH's virtual library, students will have access to everything they need to complete their course.

### Methodology | 29 tech



#### **Case Studies**

Students will complete a selection of the best case studies chosen specifically for this program. Cases that are presented, analyzed, and supervised by the best specialists in the world.



#### **Interactive Summaries**

The TECH team presents the contents attractively and dynamically in multimedia lessons that include audio, videos, images, diagrams, and concept maps in order to reinforce knowledge.

This exclusive educational system for presenting multimedia content was awarded by Microsoft as a "European Success Story".



#### **Testing & Retesting**

We periodically evaluate and re-evaluate students' knowledge throughout the program, through assessment and self-assessment activities and exercises, so that they can see how they are achieving their goals.



20%

25%

# 06 **Certificate**

The Postgraduate Certificate in UVs and 3D Texturing with Allegorithmic guarantees students, in addition to the most rigorous and up-to-date education, access to a Postgraduate Certificate issued by TECH Global University.



Successfully complete this program and receive your university qualification without having to travel or fill out laborious paperwork"

## tech 32 | Certificate

This program will allow you to obtain your **Postgraduate Certificate in UVs and 3D Texturing** with Allegorithmic endorsed by **TECH Global University**, the world's largest online university.

**TECH Global University** is an official European University publicly recognized by the Government of Andorra (*official bulletin*). Andorra is part of the European Higher Education Area (EHEA) since 2003. The EHEA is an initiative promoted by the European Union that aims to organize the international training framework and harmonize the higher education systems of the member countries of this space. The project promotes common values, the implementation of collaborative tools and strengthening its quality assurance mechanisms to enhance collaboration and mobility among students, researchers and academics.

This **TECH Global University** title is a European program of continuing education and professional updating that guarantees the acquisition of competencies in its area of knowledge, providing a high curricular value to the student who completes the program.

Title: Postgraduate Certificate in UVs and 3D Texturing with Allegorithmic Modality: online

Duration: 6 weeks

Accreditation: 6 ECTS



\*Apostille Convention. In the event that the student wishes to have their paper diploma issued with an apostille, TECH Global University will make the necessary arrangements to obtain it, at an additional cost.

tecn global university Postgraduate Certificate UVs and 3D Texturing with Allegorithmic » Modality: online » Duration: 6 weeks » Certificate: TECH Global University » Credits: 6 ECTS » Schedule: at your own pace » Exams: online

**Postgraduate Certificate** UVs and 3D Texturing with Allegorithmic

tech global university