

Islamic University – Gaza
Faculty of Information Technology
Department Multimedia and
web development



الجامعة الإسلامية – غزة
كلية تكنولوجيا المعلومات
قسم الوسائط المتعددة وتطوير الويب

Advertising a product through 3D video

A Graduation Project Proposal
Presented to the
Faculty of Information Technology
The Islamic University of Gaza

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Abstract

It was agreed with the team members to create a much-needed project in the local and global markets which is a product promotion, to further personalize Nike's product offerings and stand out from the crowd.

From competing companies and supported by evidence, statistics, and achievements, in a three-dimensional presentation and montage of clips that show the parts of the product beautifully and in a smooth and clear style that conveys the idea and image in minds and eyes and shows its distinction by achieving the highest sales, superiority, and creativity over other companies

The video displays all aspects and beautifies them beautifully, quickly, and in high quality, and displays the details of the product in an accurate manner that attracts the customer to buy the shoe after reviewing the specifications by watching its advertisement

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Introduction

Recently, there has been an increase in the rate of watching movies and their spread significantly on the Internet.

TV channels and social media, and among these films, promotional films that have emerged a great need

Companies and institutions of all kinds have to make these films to publish their work and produce propaganda clips and

Professionally advertising brochures on the basis and methods of montage using the best international programs sophisticated.

The year 1949 was considered the year in which the documentary vibe spread widely and the documentary film began to take over

Its dimensions as an independent science, and its creators became an art. Since then, it has become a certainty that promotional videos are it has a great factor in explaining and presenting services, whether for companies and their products or educational institutions of all kinds

And so on, but with the development of technology, video content has become not only what attracts the viewer, but how It produces the video and the techniques made from it to make the viewer complete watching without getting bored.

Promotional videos are no longer limited to traditionally depicting a company or organization, but it became possible to It also present facts and statistics with infographic technology and new presentation methods attractive to the eye.

A promotional video is a short video clip to promote a movie, program, product, or organization, by Indirect contact with customers to promote a specific idea or product, and the duration of the promotional video ranges between 3 minutes to 11 minutes, to ensure that more people can watch it without getting bored at length.

The duration of the video ensures enjoyment and interest in what you want to promote and achieve your desire. In this project, we propose creating a promotional video for Nike

Statement of the problem

Many people are aware of the disparity in the extent of development and success between Nike and its competitors in terms of shoe production and the extent of their excellence and efficiency in line with the requirements of customers and the ability to sweep competing companies and commercial markets to achieve profits and gain customer satisfaction.

For a Nike product, which is a medical sports shoe characterized by the highest specifications that meet the user's need and distinguish it from the rest of the shoes as it has advantages that are not found in other companies, it is one of the company's secrets.

The proposed video will contribute to increasing the company's sales.

Objectives

Main objectives

Production of a short promotional video detailing Nike shoes

Specific objectives

- 1- Increase product sales.
- 2- Attract viewers on the latest product releases.
- 3- Educate customers about product details.
- 4- Introduce the customer to the product components and details in a realistic manner.

Importance of the project

- 1- Attracting a lot of customers who want to buy shoes from Nike.
- 2- Increasing the number of people, especially athletes, to buy Nike's medical shoes.
- 3- High striving to sweep the special shoe market around the world.
- 4- Draw the attention of other companies on how to manufacture shoes and raise the spirit of competition strongly.

Scope and limitations of the project

Scope

1. The range is Nike shoes
2. The target group is people who love shoes and Nike's customers in particular.
3. The duration of this video is between 1 to 3 minutes at most.
4. This video is a promotional film for the shoe only and is not for other purposes.

Limitations

- 1- A large-scale 3D experience, which requires a lot of learning, research, and practice.
- 2- Computers with high specifications for export and export.
- 3- The need for a special place, fast internet, and continuous electricity.
- 4- Need to get custom shoes.

Methodology

1- Pre-Production

One of the most important stages that the production stage goes through, and here is the search and scrutiny of the basic idea that The project revolves around it and extracts it carefully after a great effort because all the following stages are based on this stage, It is necessary here to write an introduction about the work to get an initial picture in the mind that is translated into a script and a graphic story about this film.

Determine the product to be modeled.

Providing the hardware and installing the necessary software for work.

Gathering the necessary information for this work as some of the previous activities of the company (CG Boost, 2011).

2- Production

Here begins the executive work of the idea to be embodied and the beginning of choosing the company, choosing the product and the necessary effects, and starting to create 3D (The CG Essentials, 2020) .

3- Post-Production

At this stage, the project has entered the final stage and, before it is properly exported, it is necessary to

Some of the procedures include:

- Compose the clips and combine them with the sound correctly.

Introducing some necessary modifications.

- Add background music to the project.

- Add video effects and transition effects.

- Adding an introductory banner for colleges and facilities.

- Add titles and texts for some scenes (Blender, 2008).

Tools and equipment's and methods

Used Tools:

Tools	The Use
Personal computers (laptops)	Are the basis on which all programs and tools will be running
Processor cor i7	3D requires a fast processor for capability
Hard Disk && USB Flash memory	Transfer files between team members easily and ensures their preservation

Used Programs:

Programs	The Use
Blender	Creating the modeling, make materials for it, move it, make lighting, etc.
Adobe Premiere Pro cc 2020	Are the basis on which all programs and tools will be running
Adobe After Effect cc 2020	Motion graphic Intro
Adobe Audition pro cc 2020	Transfer files between team members easily and ensures their preservation
Microsoft Project 2018	Create project schedule
Windows 10	Previous programs have been installed on it to ensure efficient operation and speed.
Microsoft Word 2018	Writing a graduation research report
Google Chrome	For research, analysis, and knowledge

Obstacles and solutions

Following are the main obstacles that we encountered during the implementation of the project:

Obstacles	solutions
Blackouts	Postponing business sessions for another day
The need for experience in the field of montage	Education and knowledge increase through research Locations
Frequent internet failure	Postponing and waiting for the fix
Software Download	Frequent attempts and updated versions

Team roles

1- Khaled Madani

Bachelor's degree student at the Islamic University, fourth level, majoring in multimedia technology and web development.

Tasks:

- Writing a project proposal
- Script writing
- Audio Editing
- Storyboard
- Animation
- Lighting
- Rendering
- Compositing

2- Shaaban Abo Laban

Bachelor's degree student at the Islamic University, fourth level, majoring in multimedia technology and web development.

Tasks:

- Writing a project proposal
- Script writing
- Audio Editing
- Design
- 2D VFX / Motion Graphic
- Color Correction
- Rendering

3- Mohammed Shraim

Bachelor's degree student at the Islamic University, fourth level, majoring in multimedia technology and web development.

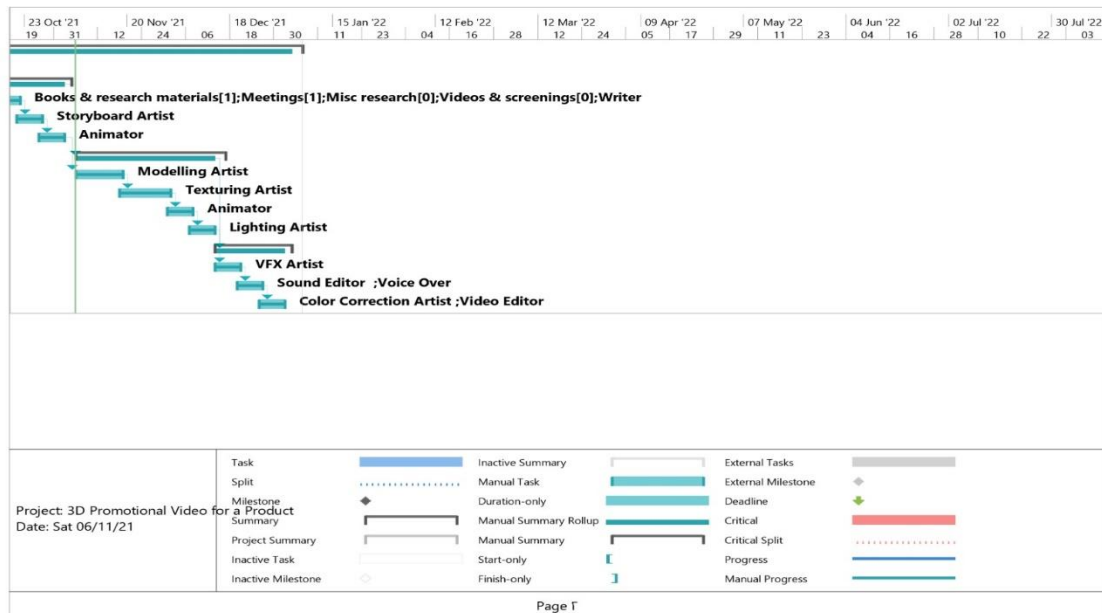
Tasks:

- Writing a project proposal
- Script writing
- Audio Editing
- Video Editing
- Modeling
- Texturing
- Rendering

Time table

To create the movie, we will follow the timeline as shown in the figure below through which

We will show the film production line in all its stages, which will start from October 2021 until January 2022.



ID	Task Mode	Task Name	Duration	Start	Finish	Predecessors	Resource Names	Actual Cost	25 Sep '21
1		3D Promotional Video for a Product	72 days	Sat 16/10/21	Thu 06/01/22			\$49,258.00	
2	✓	Pre-Production	18 days	Sat 16/10/21	Thu 04/11/21		TRAVEL EXPENSES[1]	\$4,935.00	
3	✓	Concept/Idea	6 days	Sat 16/10/21	Thu 21/10/21		Books & research mater	\$1,060.00	
4	✓	Storyboards	6 days	Thu 21/10/21	Wed 27/10/21		Storyboard Artist	\$375.00	
5	✓	Animatic	6 days	Wed 27/10/21	Tue 02/11/21		Animator	\$750.00	
6	✓	Production	36 days	Sat 06/11/21	Thu 16/12/21		Producer ;CAMERAS[9]	\$37,618.00	
7	✓	3D Modeling	12 days	Sat 06/11/21	Thu 18/11/21		Modelling Artist	\$1,750.00	
8	✓	Texturing	12 days	Thu 18/11/21	Wed 01/12/21		Texturing Artist	\$1,120.00	
9	✓	Animation	6 days	Wed 01/12/21	Tue 07/12/21		Animator	\$750.00	
10	✓	Lighting & Camera Setting	6 days	Tue 07/12/21	Mon 13/12/21		Lighting Artist	\$200.00	
11	✓	Post-Production	18 days	Tue 14/12/21	Mon 03/01/22		Other costs	\$6,705.00	
12	✓	Compositing & Special VFX	6 days	Tue 14/12/21	Mon 20/12/21		VFX Artist	\$1,500.00	
13	✓	Music & Foley	6 days	Mon 20/12/21	Sun 26/12/21		Sound Editor ;Voice Over	\$550.00	
14	✓	Editing & Final Output	6 days	Sun 26/12/21	Sat 01/01/22		Color Correction Artist ;	\$655.00	

Figure 2 MS Project 2

Related works

Video continues to be one of the most effective elements in a digital marketing strategy as we roll into 2020. As a visual species, humans find videos more engaging, more memorable, and more popular than any other type of content out there. Video as a means of storytelling and advertising is no longer a nice option – it's a necessity.

1- Coffee Product



Figure 3 Coffee Product

2- Smart Watch



Figure 4 Smart Watch

3-iPhone 12 Pro Max



Figure 5 iPhone 12 Pro Max

4-Children's room rendering



Figure 6 Children's room rendering

Literature review

1.Nike: Air VaporMax Flyknit

NIKE's athletic footwear products are designed primarily for specific athletic use, although a large percentage of the products are worn for casual or leisure purposes. The new Nike Air VaporMax offers you an incredibly light and flexible feeling (nikecorresp, 2017).



Figure 7 Literature review 1

Existing problems:

- Didn't attract customers well
- lighting problem
- Camera movement problem
- Doesn't display product details well
- The colors are uncomfortable to the eyes and inappropriate

2.Nike: Photosynthesis Pack

This shoe has been designed to suit all age groups and different genders with the application of the highest quality standards and obtaining people's testimonials with a good rating (nikecorresp, 2015a).



Figure 8 Literature review 2

Existing problems:

- black background
- Reflects an unwanted image of customers
- Unrealistic appearance of the product to customers
- Product details not completely clear

3. Nike Running Jungle Pack:

It is a shoe designed by Nike for the spring season. It has flexibility and was decorated with flowers and coordinated in a way that suits the weather in terms of the existing materials. It is completely different from winter and summer shoes (nikecorresp, 2015b).



Figure 9 Literature review 3

Existing problems:

- The designer focused on design in advertising more than highlighting the product.
- Product details not featured
- The environment is not suitable for advertising a shoe product.
- The colors of the environment are not suitable for the colors of the shoes.

Optimizations Projects:

- Color enhancements are made to contrast with the environment.
- Camera motion and scene tracking are professionally optimized.
- Scene lighting has been improved to make details well-clear.
- Strive to reach the largest audience.
- An improvement has been made to the output and display of the scene in proportion to the product.

Post Production

1. Idea

To innovate, we must choose an idea that is popular with us and close to our inclinations as well, so the trend was to produce a three-dimensional promotional advertisement for a product to introduce customers to the product in all its details as if it seemed realistic and to achieve the large number of accesses to users in conjunction with profit-making and competing with major companies.

2.Scenario

Number	Scene	Text	Sound	Notes
1	The appearance of the Nike box and showing the shoes from more than one angle	No text	Music	--
2	The shoes come out of the box and then appear to the camera	No text	Music	--
3	The camera reviews the product from all sides, from the front, back, side, top, and base as well as of the banner	No text	Music	--
4	Review the product (shoe) details so that the product is disassembled into parts	No text	Music	--
5	The camera shows details of the shoe from all sides, from the front, back, side, top	No text	Music	--
6	The screen is divided into four scenes displayed from several directions, showing the assembly and contrast of the shoe from several angles.	No text	Music	--
7	Return the shoe to the box as it was at the beginning	No text	Music	--
8	Displaying the Nike logo in a dynamic manner consistent with the scene	No text	Music	--
9	A message appears, thanks for watching	No text		--
10	Displaying the names and photos of the students participating in the completion of the work and the supervisor of the project	Name supervisor and students	Music	--

3. Storyboard

Shot Number **1**



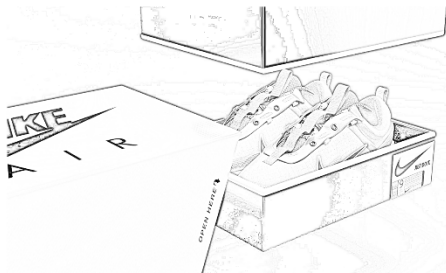
The appearance of the Nike chest and its appearance from more than one angle.

Shot Number **2**



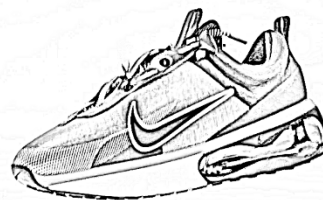
The appearance of the Nike chest and its appearance from more than one angle.

Shot Number **3**



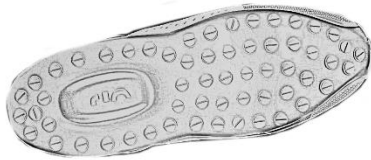
The Nike box is opened and the shoes are revealed from inside the box.

Shot Number **4**



Take the shoes out of the box and start showing the details.

Shot Number 5



Get the shoes out of the box and start showing the details and wrap the camera from the bottom View.

Shot Number 6



Continue to display shoe details and display the right View.

Shot Number 7



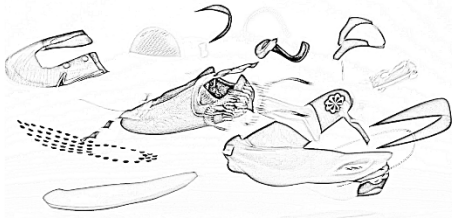
Shoe view from the back view.

Shot Number 8



Quick rotation of the shoe and showing it from all sides.

Shot Number 9



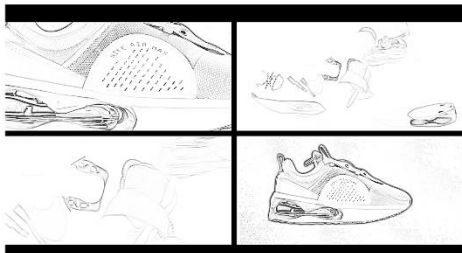
Dismantling the shoe smoothly and showing the pieces of the shoe in an attractive way from a side angle.

Shot Number 10



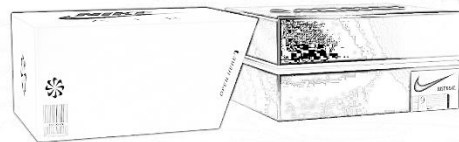
Smoothly disassembling the shoe and showing the component parts of the shoe in an attractive way from an upper angle.

Shot Number 11



The screen is divided into four sections and each section displays an interface to the shoe in a reverse and fast manner.

Shot Number 12



Return the shoes to the Nike box and close the box.

Shot Number 13



Creative appearance of the Nike logo.....
.....
.....

Shot Number 14

Image

Supervisor name :-

Team members :-

The names of the supervisor and team members are displayed in addition to their photos.....
.....

Production

1. Modeling

(The CG Essentials, 2020)

Step 1:

The shoe floor is designed according to the pre-reference image of the product.



Figure 11 Modeling Step 1-1

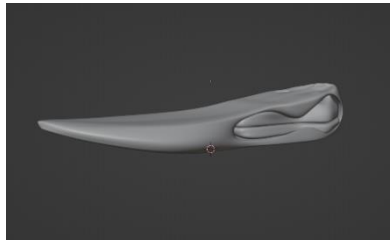


Figure 10 Modeling Step 1-2

Step 2:

The shoe base is designed according to the product

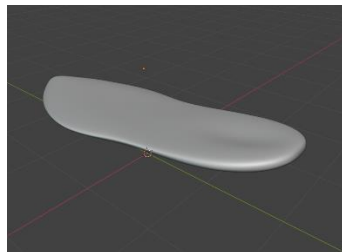


Figure 12 Modeling Step 2-1

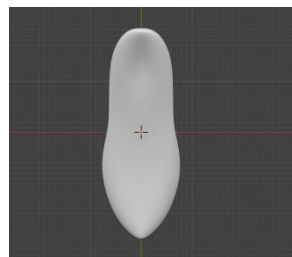


Figure 13 Modeling Step 2-2

Step 3:

The shoe frame is designed according to the product

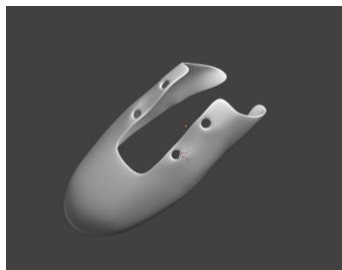


Figure 14 Modeling Step 3-1

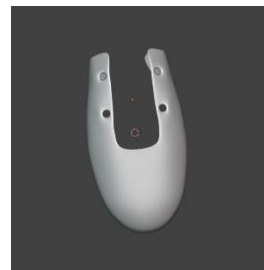


Figure 15 Modeling Step 3-2

Step 4:

The entrances to the ties are designed according to the product



Figure 16 Modeling Step 4

Step 5:

The ties are designed according to the product

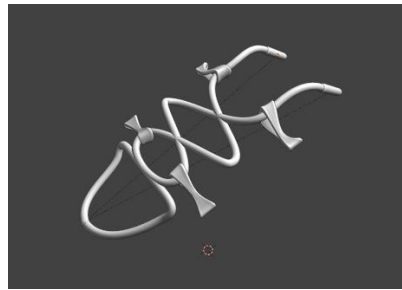


Figure 17 Modeling Step 5

Step 6:

The adhesive that connects the upper surface of the shoe to the base is designed according to the product

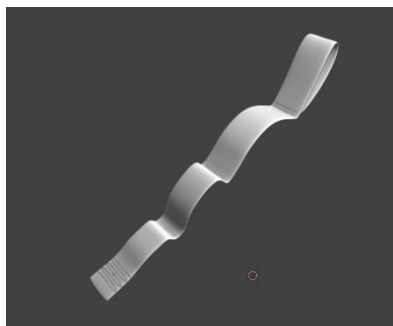


Figure 18 Modeling Step 6

Step 7:

The shoe frame is designed according to the product

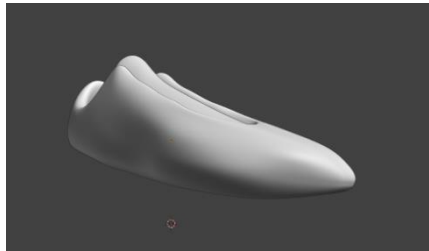


Figure 19 Modeling Step 7

Step 8:

The back of the shoe is designed



Figure 20 Modeling Step 8

Step 9:

The bottom of the shoe is designed

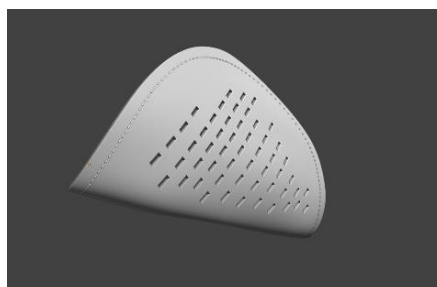


Figure 21 Modeling Step 9

Step 10:

The final image of the product from **the (top – bottom – right – left)**



Figure 22 Modeling Step 10-1

top view

bottom view

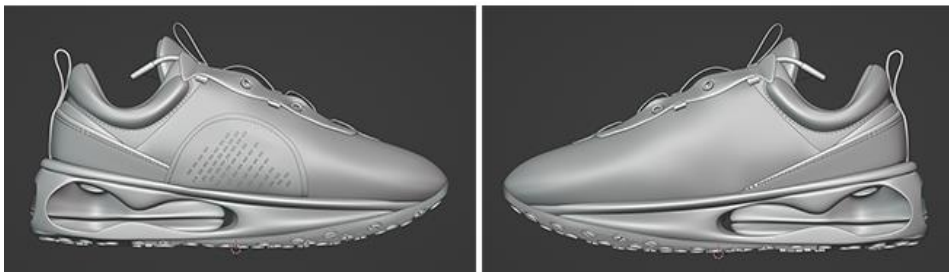


Figure 23 Modeling Step 10-2

right view

left view

2.Texturing

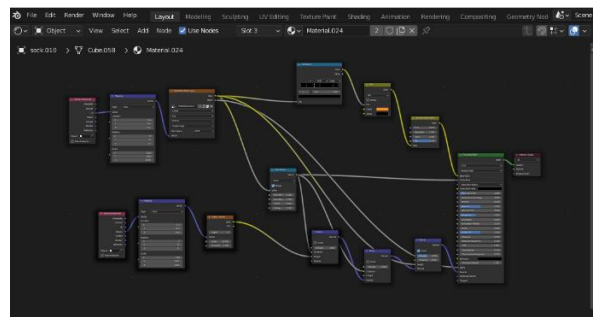
The materials were applied to all the pieces that were designed in the modeling stage as appropriate and according to the product reference image (Blender, 2008).



Figure 24 Texturing1



Figure 25 Texturing2



3. Animation

The product (shoe) has been moved according to the scenario followed from the beginning, and the product will be moved using the Blender program with dynamic movements that correspond to the smooth appearance of the product and highlight the details so that the idea is clearly communicated to the audience.

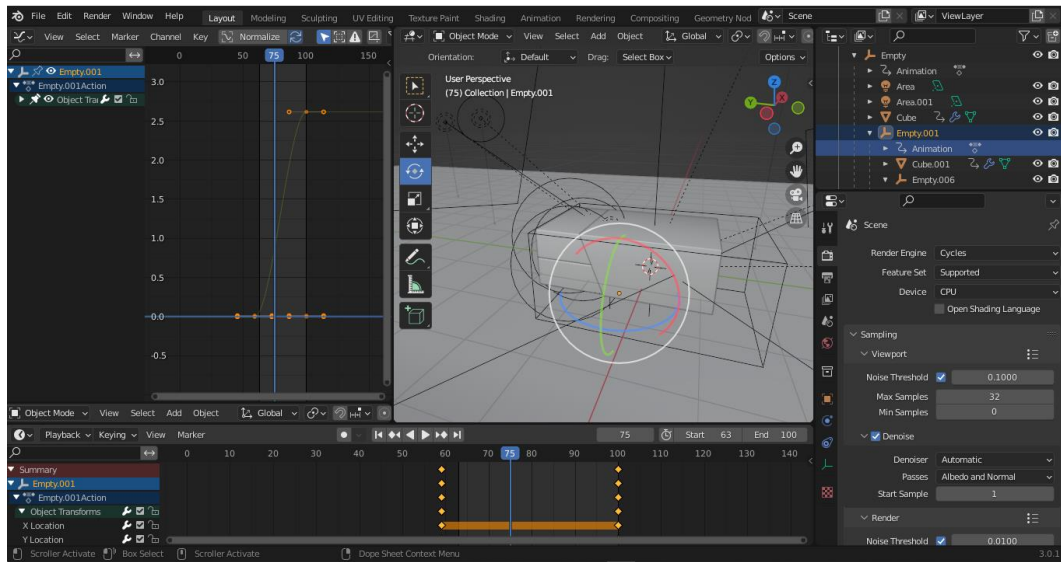


Figure 26 animation

4. Lighting

Special lighting was created for each scene to clearly show the product and its contrast and highlight the details as if it were realistic.

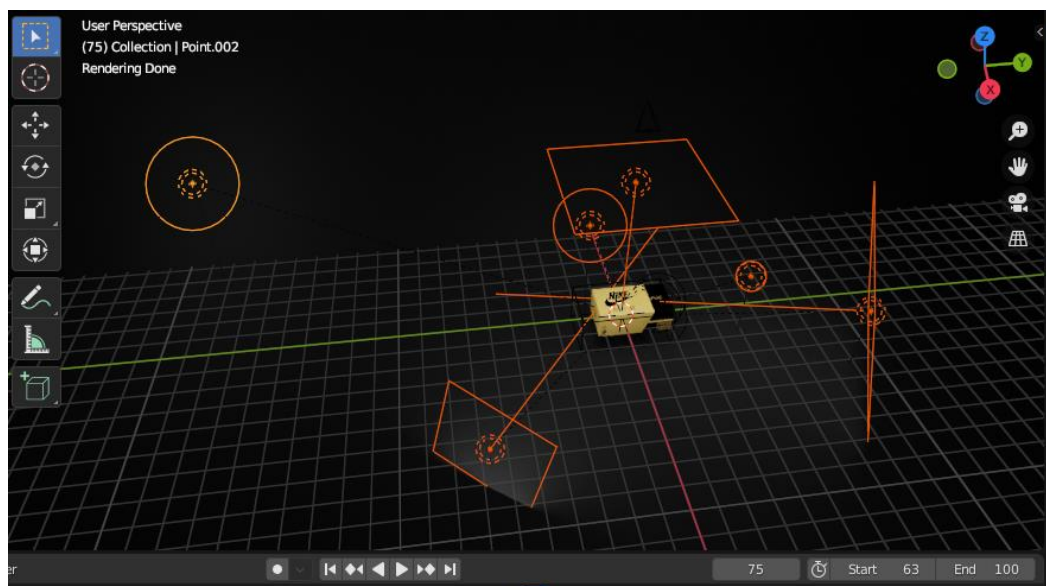


Figure 27 lighting

5. Rendering

A rendering of the viewer will be made in proportion to the scenario set before, where the output will be of a very high quality (cycle) to attract more users and obtain the largest percentage of profits.

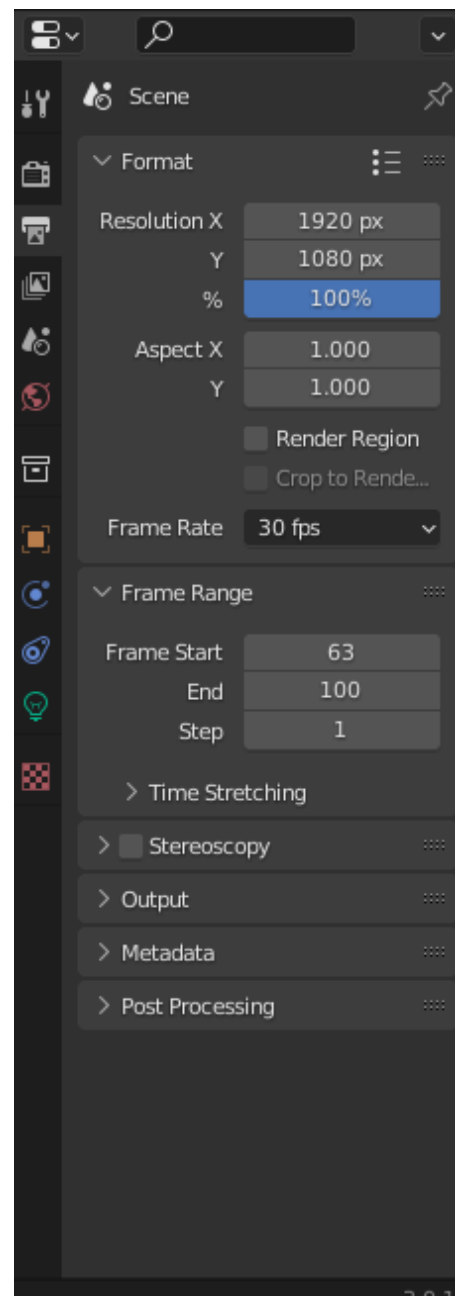
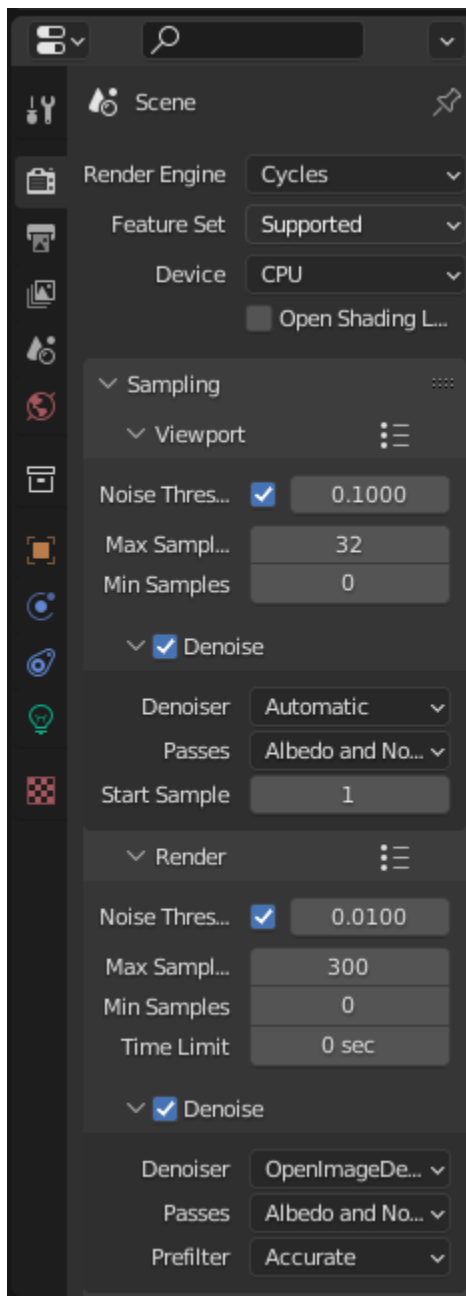


Figure 28 rendering

Post-Production

1.Composition

The scenes that were output in mp4 format will be compiled using the Adobe Premiere program and the music will be inserted according to the scenario and aesthetic effects will be created in conjunction with the music.

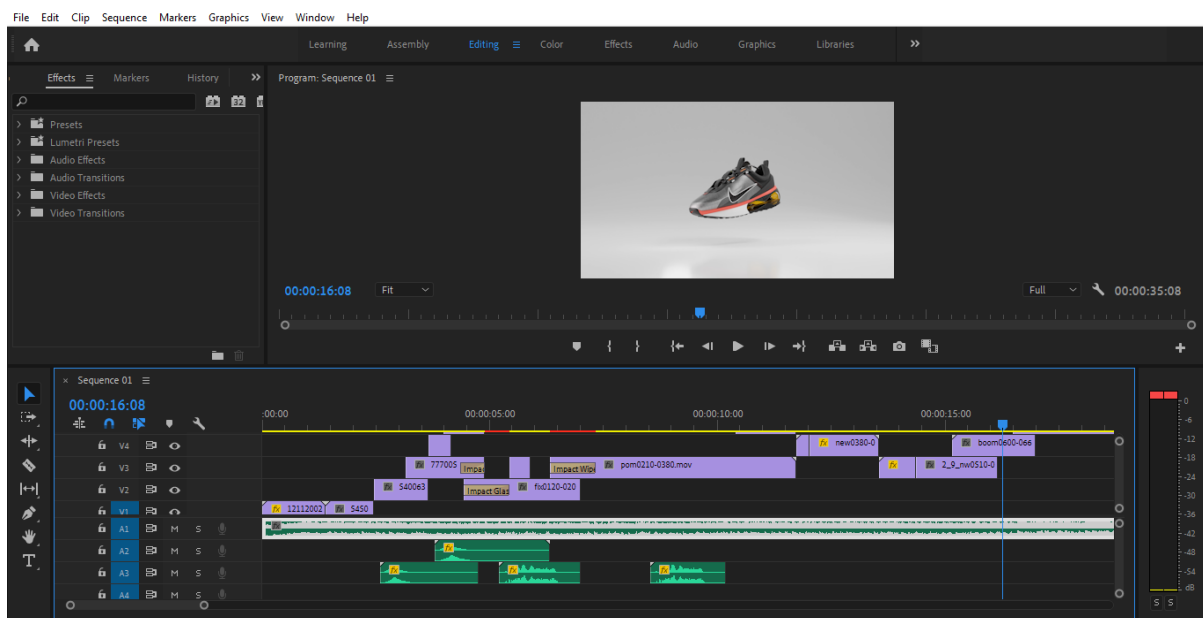


Figure 29 Composition

2. Motion graphic

Create custom animations to display the product, use some scripts, create an introductory banner for Nike, and create end titers that include the names of the team and admin using Adobe After Effects.

3. color correction

The final video colors will be modified to increase the contrast, clarity and aesthetics of the advertisement permanently.

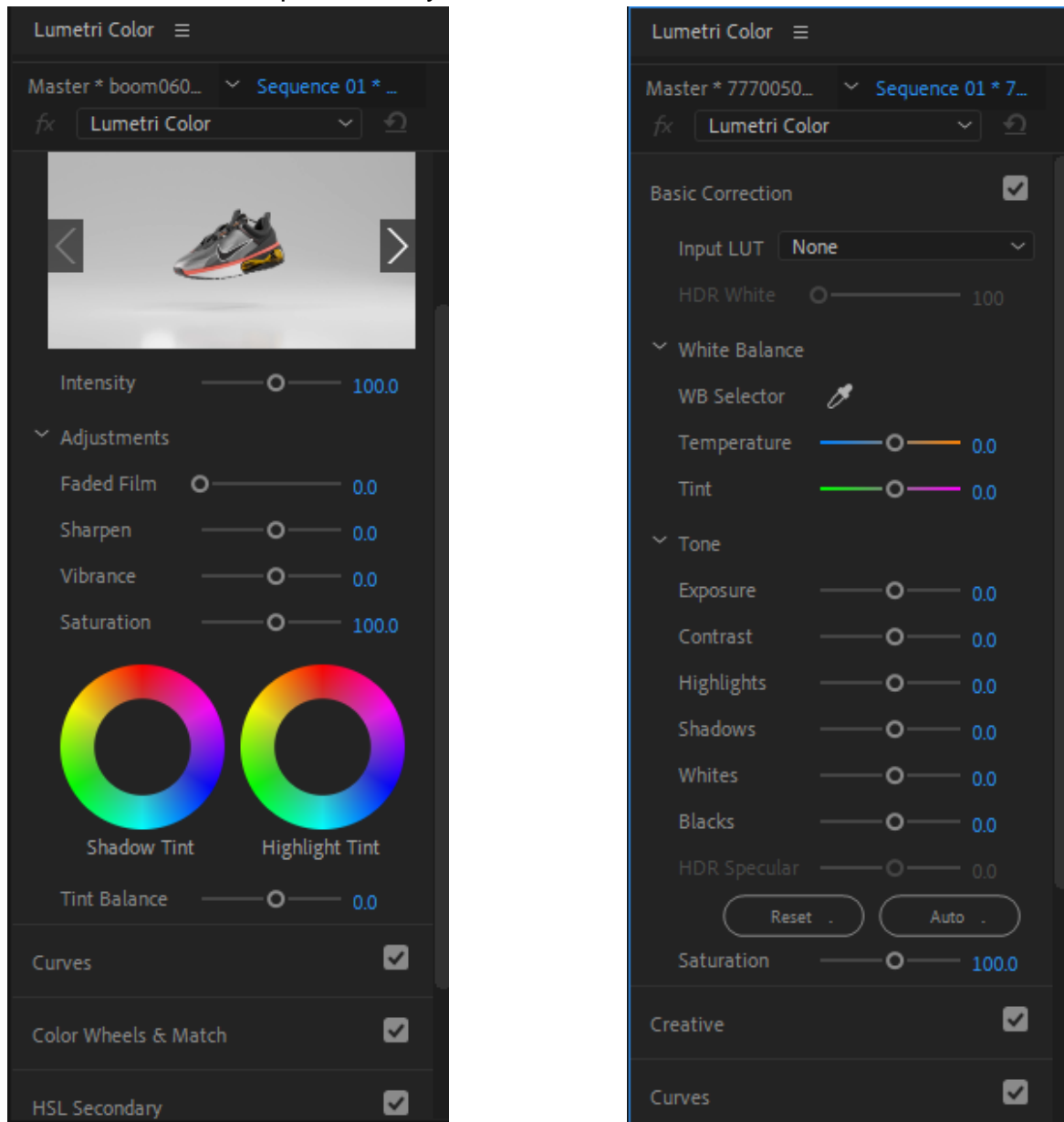


Figure 30 color correction

4. Final Output

Output the final video (advertisement) in mp4 format, which will be ready for publication across all platforms and reach the largest percentage of users to achieve the project goals.

Reference's

- Blender. (2008, May 29). *Blender channel*. Blender.
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<https://www.youtube.com/c/TheCGEssentials/featured>