The Dream of Scipio

Daniela de Paulis
Daniela de Paulis Studio
Charloisse Kerksingel 12b 3082 DA
Rotterdam, The Netherlands
selavyrose@gmail.com

***The Dream of Scipio* is a multimedia project started in 2018 and reflecting upon different interpretations of the concept of *View from Above* from classical literature to contemporary philosophy. The project is a collaboration between media artist Daniela de Paulis, the Italian Military Aviation and the Regional Park of the Appian Way, culminating in the virtual and physical re-enactment of the 1909 flight by the Wright Brothers over the ancient ruins of Rome. The flight is also known for its first aerial footage in the history of filmmaking taken from a plane.**

Augmented reality. Flight technology. Aerial Photography. Film history. Overview Effect. Neuroscience. Philosophy.

1. HISTORICAL BACKGROUND

The Dream of Scipio started in March 2018 as part of my solo exhibition at 16 Civico, an artist-led gallery space in the Italian town of Pescara. As part of the exhibition I included an experimental piece for which every day I displayed a new satellite image captured by radio operator Ennio D'Onofrio with his amateur antenna tracking the METEOR M 2 Russian meteorological satellite. Every day the image showing a large portion of the Western globe with its meteorological changes and the saturated colours palette, invited the visitors to think of their physical location from an altitude of 832 Km (the altitude of the METEOR M 2 satellite). The images custom made for the exhibition by D'Onofrio with his hand built antenna, converted the sight of the globe captured by the technological eye of the Russian satellite orbiting in space into photographs filtered by the sensitivity of the human gaze.

The Dream of Scipio borrows its title from the homonymous section of *On the Republic (De Re Publica)*, a literary dialogue on Roman politics, written in six volumes by Cicero between 54-51 BCE. Cicero's *Dream of Scipio* (Latin: *Somnium Scipionis*):

"Is rightly seen as a condensation of important ideas from ancient philosophy and cosmology by scholars in the middle ages. Scholars now recognise it as a superb example of a popular meditation technique widely practiced in different schools of classical philosophy, and known today as the 'View from Above'."

In Cicero's account, Scipio Aemilianus describes how, exhausted by a banquet from drinking and talking until late at night, he fell into a deeper sleep than usual. While he sleeps, he dreams, and in his dreams he experiences a mystical revelation, a vision of his mighty ancestor and adoptive grandfather Cornelius Scipio Africanus. In the dream, Aemilianus meets the spirit of Africanus "on the outer boundary of the heavens, where the ancients supposed that the souls also lived, close to the gods". From top to bottom, together they look at the stars, along with the many different lands and nations scattered on the surface of the globe.

During the dream Aemilianus self-reflects upon his view:

"These stellar spheres were much larger than the earth. Indeed, the earth now seemed so small to me that I began to think less of this empire of ours, which is equivalent only to a precise point on its surface".

The spirit of Africanus, taking on the role of mentor, emphasises to his nephew the overwhelming beauty and harmony of the cosmos and exclaims:

"The scene filled me with awe and joy. And yet, all the time, I could not avoid staring at our world below".

"Gazing on the stars, the Milky Way, home of the departed souls, Scipio Aemilianus realizes the relative insignificance of the Earth compared to the stars."

"Africanus then presents the conditions of his legacy: "love justice and wisdom", and be devoted to your country, the highest form of virtue [...]"

Cicero's purpose in *The Dream of Scipio* is thus

"To show how public service, the importance of civic life, is a divinely sanctioned activity. The two major themes are the immortality of the soul and the relationship between human society and the divine order of the universe."

Interestingly, the connection between civic, political responsibilities along with the striving ambition to transcend human limitations by reaching for the stars is often evoked in space exploration propaganda describing missions portraying the sight of the Earth from a distance. *The Dream of Scipio* seems to pave the way for such paradigm in the history of aviation, aeronautics and cosmonautics alike.

The Dream of Scipio is the second known written document depicting the concept of 'View from Above'. The earliest written document narrating the view of the whole Earth is Plato's description in the fourth century BC:

"The true Earth, if one views it from above, it is said to look like those twelve piece leather balls, variegated, a patchwork of colours of which our colours here are, as it were, samples that painters use. The whole Earth is of such colours, indeed of colours far brighter still and purer than those: one portion is purple, marvellous for its beauty; another is golden, and all that is white is whiter than chalk or snow; and all the Earth is composed of other colours likewise, indeed of colours more numerous and beautiful than any we have seen. Even its very hollows, full as they are of water and air, give an appearance of colour, gleaming among the variety of other colours, so that its general appearance is one of continuous multicoloured surface."

Plato's intellectual vision of the Earth seen from a distance reveals remarkable similarities with the photographs of the planet taken during space missions.

Contemporary views of the Earth seen from space, recorded by astronauts, cosmonauts and probes, have inspired a renovated interest in the concept of 'View from Above'. For example space philosopher Frank White developed the concept of 'Overview Effect' in 1987 to describe the cognitive shift-taking place in the mind of the astronauts after witnessing the sight of the Earth from outer space. After witnessing the sight of the planet from a distance, most astronauts report in fact an emphasised perception of the interconnection of all terrestrial events: climatic, geographic, socio-political. Urging for a heightened sense of civic responsibilities

towards the planet and life, the 'Overview Effect' follows the trail of previous efforts in the history of the 'View from Above' concept. Although deeply rooted in Western thought, 'The Overview Effect' philosophy strives for transcending nationalistic epics and the tale of heroism permeating the history of aviation and space exploration, envisioning instead a slow yet necessary evolution of human thought in the direction of global responsibilities and sense of belonging. 'The Overview Effect' has been often a cultural reference in the development of my artistic work over the last decade, including my project *OPTICKS* and *COGITO in Space*. *The Dream of Scipio* thus follows along this line of work, adding to it layers of research, perception and critique.

Figure 1: An Image by Ennio D'Onofrio for "*The Dream of Scipio*" (2018).

2. THE DREAM OF SCIPIO

During autumn 2018 I worked at the Regional Park of the Appian Way in Rome as part of *Exploded View*, a project by Dutch curator Krien Clevis and featuring new works by twelve international artists conducting field research at the archaeological sites of the city. Working alongside the

archaeologists of the Park I discovered the history of the first flights in the city of Rome, demonstrated by Wilbur Wright in front of members of the House of Savoy and the aristocracy in April 1909. The flights took place in the Centocelle Park, a wide-open field dotted by Roman ruins, also an archaeological site and part of the Regional Park of the Appian Way.

Wilbur Wright demonstrated 67 flights at the Centocelle Park "beginning on 15 April, half of which were training efforts with Italian army and navy officers and other passengers". During one flight on 24 April:

"He permitted Federico Valle, a 'bioscope' cameraman from the Universal News Agency to fly with him and photograph the surrounding countryside, thus producing the first motion pictures taken from an aircraft in flight".

The footage, now of property of Filmarchiv Austria, conveys the excitement of the preparations for the flight and most poignantly the moments when the Flyer – a rudimental yet visionary flying machine – lift itself off the ground, hovering several metres above the ground and placing its wings on top of the ancient ruins, echoing and even surpassing their grandiosity. The footage staggeringly blends the past, present and future, elevating the revolutionary contour of the Flyer in the foreground against the timeless and blurry rural landscape in the background. The footage lyrically parades the weightless, effortless motion of the wings above the ground—a symbol of the achievement of a long standing human dream, the visualisation of a utopia becoming real thanks to human intellect and audacity—while casting the shadow of gloomy prospects ahead, with the exploitation of the newly achieved freedom and technological advancement in war supremacy.

Figure 2: "A frame from the film shot aboard the Wright Flyer in Centocelle, Italy. The camera is pointed under the forward elevator at the ruins of Roman aqueducts" (Filmarchiv Austria).

The first photographic documentation of aerial views dates back to 1858, when

"Gaspard-Félix Tournachon, who used the pseudonym Nadar, captured the first aerial photographs of Paris from a tethered balloon at an altitude of sixteen hundred feet [...] As photographic technology advanced—with roll film, lighter cameras, and long shutter releases—it became possible to affix cameras to unmanned flying objects. Between 1887 and 1889, Arthur Batut took aerial shots of the South of France using just a kite, a camera, and a fuse [...] In 1908, Julius Neubronner, who had used carrier pigeons in his work as an apothecary, filed a patent for a miniature camera that could be worn by a pigeon and would be activated by a timing mechanism."

The Wright Brothers were fully aware of the potential of their invention for explorative and military objectives and actively pursued financial support and opportunities for cooperation with the American Army to continue developing their prototype. Whilst their proposal was unsuccessful with the American Army, very soon their invention attracted the attention of the European military.

In 1911, shortly after the Wright Brothers European tour, the first plane was used in the Italo-Turkish war and the first aerial bombing was deployed with "Italian Lieutenant Giulio Gavotti dropping four grenades from his Taube monoplane."

During WWI the pace of aerial photography accelerated greatly, with military aerial reconnaissance becoming an advantageous tool in warfare. Cameras were stripped to aircrafts to map the territory of the enemy and reveal its movements and strategic plans.

Military advancement in aerial photography paved the way to the first images of the Earth seen from space.

The Cold War acted in fact as a steep race between the Soviet Union and the United States for satellites placement into orbit, with satellite technologies and photography being used as espionage tools and for gathering other relevant data about the terrestrial environment, its climate and geography. As a result, satellite images of the Earth seen from space became increasingly detailed and realistic.

The cultural impact of pivotal images of the Earth seen from space such as *Earthrise* (1968) and *Blue Marble* (1972), both captured during manned space missions, Apollo 8 and Apollo 17 respectively, as well as the cultural impact of space missions throughout the Cold War, were the result of carefully orchestrated public announcements by the

space missions and government officials that combined political and ethical propaganda. Like in Cicero's *Dream of Scipio*, the politically infused, increasingly dramatic 'View from Above' during the Cold War era appeals to earthlings' civic virtuosity and honourable principles while aiming for the heavens.

The most ambitious and far reaching photograph of the Earth seen from space ultimately defies the concept of 'View from Above' by baffling all familiar spatial coordinates: taken from the edges of the solar system by the *Voyager 1* spacecraft in 1990, while turning back for a farewell at its home planet before continuing sailing towards the cosmic abyss, the *Pale Blue Dot* image portrays the Earth as a pixel bathed in a beam of sunlight in the vastness of space. The image confronts the viewer with profound questions about one's existence and one's place in the cosmos, the infinitely small size of the home planet in relation to the cosmos dissolving all human certainties. The *Pale Blue Dot* image presents the concept of 'View from Above' through an unconventional lens: taken from an incomprehensible distance from where humans loose attachment and control over their home planet, as opposed to photographs taken by spacecraft and satellites hovering above it, the image seems to shift the socio-political paradigm permeating whole Earth images towards a broader and deeper existential questioning.

Figure 3: *Pale Blue Dot* (credits: NASA)

The collaboration with the Italian Military Aviation for *The Dream of Scipio* began in January 2019. The first steps of the project were presented at an historical paper mill in November 2019 as part of the exhibition *Exploded View*, in collaboration with the Regional Park of the Appian Way in Rome. The presentation for the exhibition consisted in a video installation showing an excerpt from the original silent black and white footage filmed during the 1909 flight at the Centocelle Park and provided by Filmarchiv Austria. The footage was projected next to some of the historical machineries of the paper mill built at the end of the XIX century, with the structure of the wings of the *Flyer* matching that of the industrial features. The video installation aimed at contextualising the work in the early 1900, when the paper mill was in full production and the pioneering flight took place. The presentation was designed as a museum exhibit, highlighting the history of the place.

The project is now being developed in collaboration with the Italian Military Aviation in two stages: a public presentation in augmented reality at the Centocelle Park, where the flight took place in 1909, and the actual re-enactment of the flight to be hosted in 2023.

The work for the representation of the flight in augmented reality is currently being conducted at the media lab of the Italian Military Aviation, in collaboration with Paolo Nurcis, curator of the IMA's historical collection. The work started by comparing the original footage taken from the plane with digital maps of the area, correlating features present in the 1909 film with current ones. As the flight circled around the archaeological areas of Rome, most of the features are very recognisable and still present today. Instead the rural landscape of the area has undergone some great changes in vegetation, partition of the agricultural lands and with the addition of office buildings for the operation of the Centocelle military airport. This forgotten airport, built in 1908, has been the stage of several pioneering ventures in the history of aviation. Bombed during WWII, it started decreasing in size due to the urbanisation of the surrounding areas and ceased its flying activities in 1965. The former military airport is now a public park, managed both by the Military Aviation and the Regional Park of the Appian Way that is in charge of the maintenance of the archaeological sites. Exactly where Wilbur Wright took off with the *Flyer* in 1909 lays a concrete runway, still used occasionally for helicopters.

The augmented reality presentation will be experienced by the public at the Centocelle Park at dusk, exactly at the location where the flight took place. The presentation, conducted in collaboration

with the Italian Military Aviation, will allow participants to move through the landscape, superimposing the historical re-enactment with the physical features of the area. Besides using parts of the original footage, showing the crowded preparations, the curiosity of the bystanders in outdated outfits, the take off and the actual flight over the ancient ruins and the rural landscape, the augmented reality simulation will also expand the perception of the participants by gradually zooming out into satellite images of the location, into footage of the Earth seen from the International Space Station, into images of the planet taken from spacecraft, from the Moon, reaching out into the edges of the solar system and ending the journey with the *Pale Blue Dot* viewpoint. The augmented reality will thus simulate an experiential journey into space as a dream of flying from the private and subjective stand point of the participant. The journey will take the participants from the present reality of the Park to its collective historical memory, to the visionary perspectives of outer space, transitioning from phenomenology to ontology. The augmented reality will also act as an educational tool on the history of aviation. The artistic and philosophical objectives of the simulation is to prompt an introspective and subjective elaboration of the images of the home planet, stimulating individual questioning and the individual perception of these images as opposed to a passive fruition of their propagandistic connotation.

The event featuring the augmented reality simulation will be introduced by talks about the history of aerial views and their relation to aviation, astronautics and cosmonautics.

Figure 4: *The Flyer at the Museum Vigna di Valle, Bracciano.*

The physical re-enactment of the 1909 flight is still in the negotiation stage. The Italian Military Aviation has suggested hosting the event in 2023, as part of their hundred years anniversary. The area of the Centocelle Park where the flight would take place is mostly rural, and large enough to allow for the flight operations. The replica of the plane used for the 1909 flight would be built from existing drawings of

the actual plane that flew over the Centocelle Park, now permanently exhibited at the Museum Vigna di Valle, near the Bracciano Lake, the major museum of aviation in Italy.

As part of the re-enactment of the flight I am planning to film the flight once again, taking the passenger seat and using a digital camera.

3. REFERENCES

- Filmarchiv Austria (1909) Wilbur Wright, il volo a pianoro di Centocelle, Roma.
<https://www.youtube.com/watch?v=98Rk0Evd7B4&t=46s> (retrieved 21 March 2020).
- Glines, C.V. (2003) Wright Brothers: A Promise of Flight Fulfilled, *Aviation History*, November 2003 issue.
- History Pod (2017) 23 October 1911: Italian Carlo Piazza pilots the first aircraft in war.
<https://www.youtube.com/watch?v=Y695pINQxJg> (retrieved 21 March 2020)
- Kruele, J. (2014) The Origins of Aerial Photography
<https://www.newyorker.com/culture/photo-booth/origins-aerial-photography> (retrieved 21 March 2020)
- Lertora, A. (1989) Lettere dei Fratelli Wright, *Rivista Aeronautica*, 2, pp. 94-100.
- Miller, N. (2011) Cicero's Cosmos: Somnium Scipionis ("The Dream of Scipio") *The Inspiration of Astronomical Phenomena VI*, Padua, IT, 2011, 375. Astronomical Society of the Pacific Conference Series 441.
- Poole, R. (2008) *Earthrise*. Yale University Press, New Haven and London.
- Robertson, R. (2013) The Dream of Scipio from Cicero's Republic
<https://donaldrobertson.name/2013/01/04/the-dream-of-scipio-from-ciceros-republic/> (retrieved 21 March 2020).
- Ronald, V. (2012) Centocelle
<https://forgottenairfields.com/airfield-centocelle-554.html> (retrieved 22 March 2020)
- Waxman, O. B. (2018) Aerial Photography's Surprising Role in History
<https://time.com/longform/aerial-photography-drones-history/> (retrieved 21 March 2020)
- White, F. (2014) The Overview Effect, American Institute of Aeronautics and Astronautics, Reston, Virginia.
- Wright Brothers Aeroplane Company (1999-2011) Wake Up Call
http://wrightbros.org/History_Wing/History_of_the_Airplane/Decade_After/Wake_Up_Call/Wake_Up_Call_4.htm (retrieved 21 March 2020)