

The Smart Phone Zoom X5

How can smartphone zoom photography disrupt approaches to visual literacy in photography based education to enhance critical thinking during a time of social media driven image production?

Kalpesh Lathigra / ARP / PGCERT / LCC University of Arts


Context and Rationale

Smartphones have become the default mode of image creation for students. The zoom function is often dismissed as low quality to amateurish and is deeply entangled with social media aesthetics, digital interpolation and algorithmic image shaping. Traditional photography rarely engages with zoom as a valid tool.

This project investigates how smartphone zoom photography can disrupt conventional norms and enhance critical thinking and the politics of looking.

- My role in this project is to create a dialogue with the students around rethinking their approach to visual literacy, accessibility, critical visual consciousness and what an image can mean if its made without the constraints of the pressures of expectation of education and industry.
- Spending time outside to the classroom in spaces such as the darkroom to communal areas I undertake what we term as “soft teaching”. It is here that much of the exciting work is made where there is a no hierarchy between educator and student.
- Providing students with the technical aspects and differences of Smartphone photography , the visual language they interpret and learn.
- Setting up an intervention to test the project’s possibilities and a workshop to allow students to break the constraints of system of expectation and success.
- Collection of Data in simple and direct ways accessible to students without disruption of their education and day to day lives and its interpretation.
- Trying to find participants who could represent the different pathway (non siloing) and are actually interested in participating in a project that could be challenging for themselves and them giving their consent for the project

Consent Forms BERA Ethical Guidelines for Educational Research (2024),



University of the Arts London

London College of Communication

PoCert Action Research

Participant Consent Form

Participant Consent Form – Photography-Based Educational Research

1. Project title

Disrupting visual literacy through smartphone zoom photography.

2. Researcher

Kalpesh Lathigra, PoCert student / Lecturer
London College of Communication, University of the Arts London
Email: k.lathigra@lcc.arts.ac.uk

3. Purpose of the research

This action research project investigates how the intentional use of smartphone zoom photography can support critical thinking and visual literacy within photography education. The research is undertaken as part of a PoCert qualification.

4. Voluntary participation

In line with the BERA Ethical Guidelines for Educational Research (2024), participation in this research is entirely voluntary. Choosing not to participate, or withdrawing, will have no effect on your grades, assessment, or relationship with staff.

5. What participation involves

If you consent, your participation may involve the creation of photographic images using a smartphone zoom function, contribution to group discussions or critiques, and completion of short written reflections or questionnaires.

6. Right to withdraw

You have the right to withdraw from the research at any time, without providing a reason. On withdrawal, your data will be removed where reasonably possible, unless it has already been anonymised and incorporated into assessed PoCert work.

7. Use of images and contributions

Photographic images and written reflections will be used solely for PoCert assessment and internal academic purposes. They will not be used for public exhibition, publication, or online dissemination without further explicit consent.

8. Anonymity and limits to confidentiality

Your identity will be protected through anonymisation or the use of pseudonyms where possible. However, due to the visual nature of photographic research, complete anonymity cannot be guaranteed. This limitation has been considered in the ethical design of the study.

9. Data protection and storage

Data will be collected and stored in accordance with UK GDPR and UAL data protection policies. Questionnaire data will be collected via Microsoft Forms and stored on UAL OneDrive. Data will be retained for up to five years and then securely deleted.

10. Risks and wellbeing

No risks beyond those normally encountered in teaching and learning activities are anticipated. You may decline to answer any question or stop participation at any time.

11. Concerns or complaints

If you have concerns about the conduct of the research or your rights as a participant, you may contact UAL Research Ethics at research.ethics@arts.ac.uk.

Consent

Please tick each box to indicate your consent:

☐

I have read and understood the accompanying Participant Information Sheet.

☐

I understand that my participation is voluntary and separate from assessment.

☐

I understand that I may withdraw at any time without penalty.

☐

I consent to my photographic work and reflections being used for this research.

☐

I understand how my data will be stored and used.

Optional:

☐

I consent to being credited by name if my photographic work is used.

Participant name: _____

Signature: _____ Date: _____

Researcher signature: *Kalpesh Lathigra* Date: _____

Undertaking an Intervention Cycle

- As a way of creating both an accessible and interesting way for the participants to engage with the project. I developed an intervention brief . I already use the possibilities of interventionist practice in my teaching. It relates mostly to a physical intervention on the photograph for example stitching thread through a print or polaroid lifts.
- Setting a clear caveat that the participants must use images already made on their phones and must not have used the zoom function and reflected what they believed was their style or what they felt was industry standard.
- They were provided with an information sheet detailing the differences between optical and digital zoom to understand what happens in the smartphone
- This was a remote workshop in terms of logistics and allowing the students to be able to make choices on pre shot images they would choose to intervene using the crop function and postproduction on both their smartphone or laptops using software such as Photoshop. They would deliver these to me via email/ direct messaging.

Digital Zoom, Interpolation, Surveillance Optics & Social-Media Aesthetics

1. Digital Zoom: What It Really Does

Digital zoom is **not** the same as optical zoom.

- **Optical zoom** uses the lens to bring the subject physically closer.
- **Digital zoom** simply **crops the image and enlarges it**, meaning the camera must *invent* new pixels to fill the gaps.
As you zoom in, you're not "seeing more", you're seeing an amplified crop.

Digital zoom reveals how smartphones simulate photographic clarity rather than truly capture it. Every zoomed image becomes a negotiation between what was there and what the software imagines.

2. Interpolation: Inventing Missing Information

Interpolation is the computational process that guesses what the missing pixels should look like.

Common systems include:

- **Nearest Neighbour:** simple, blocky, pixelated
- **Bilinear / Bicubic:** smooth but smeared
- **AI Super-Resolution:** algorithms infer texture using training data

This matters because the more interpolation is used, the less the image reflects the original scene. Instead, it becomes a **data-driven reconstruction**, raising questions about truth, fiction, and photographic representation.

3. Surveillance Optics: Zoom as Power

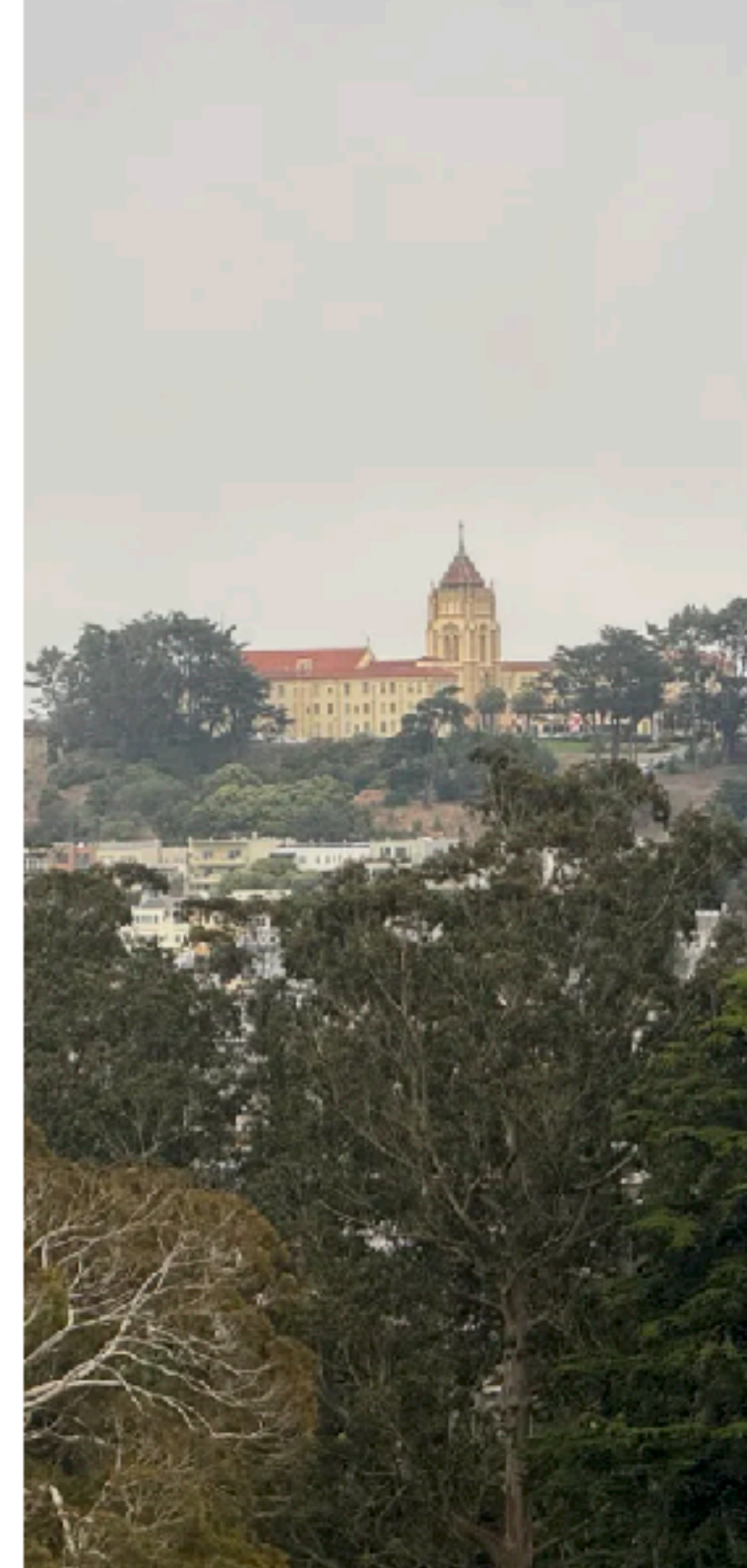
Zoom has strong ties to surveillance technologies, CCTV, drone cameras, police body cams, satellite imaging.

These systems use zoom not for aesthetics but for **control, distance, and scrutiny**.

Three key ideas:

- **Distance:** The viewer remains safely detached from the subject.
- **Power:** The person operating the camera has more agency than the person being watched.
- **The Forensic Gaze:** Subjects are analysed for clues, guilt, or deviance.

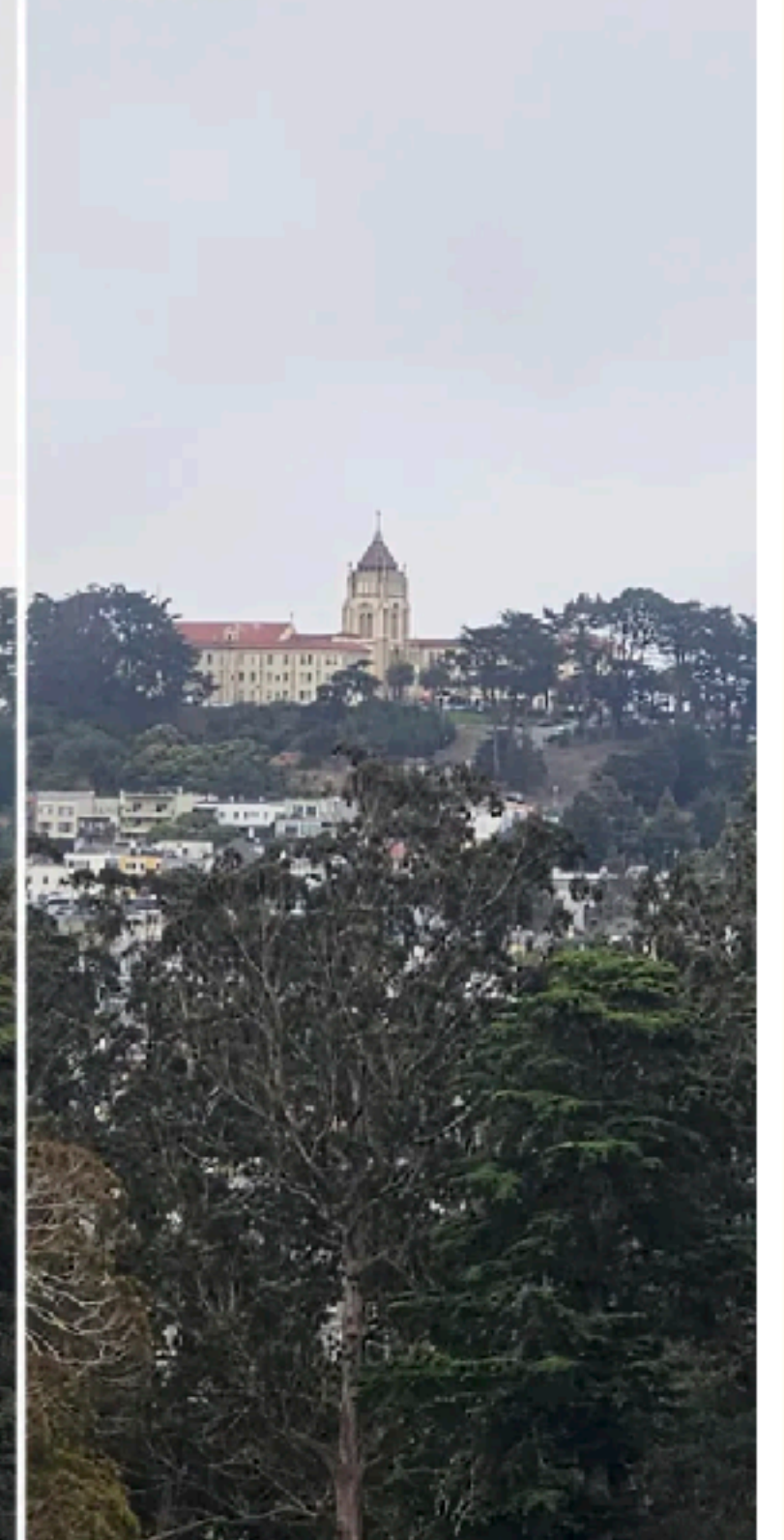
iPhone 15 Pro Max
5x optical zoom



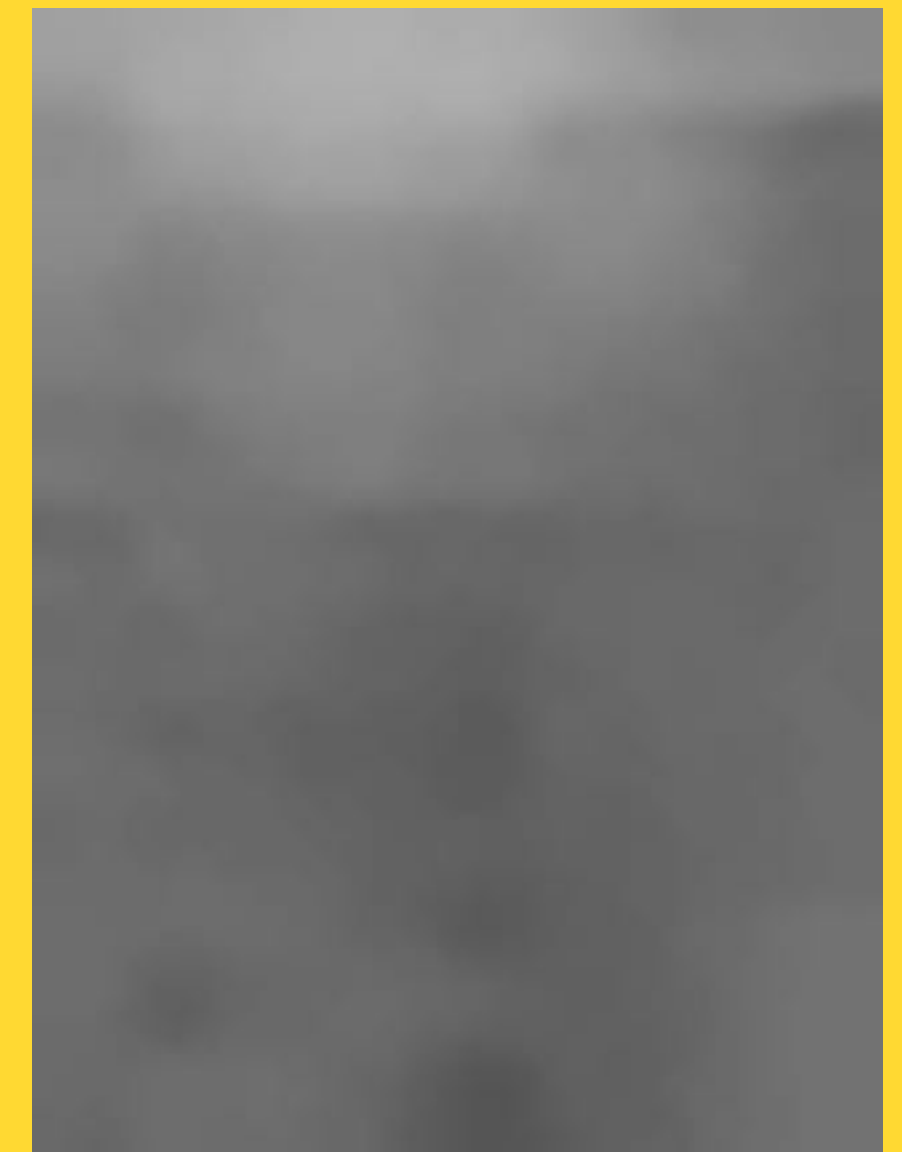
Pixel 7 Pro
5x optical zoom



Galaxy S23 Ultra
5x digital zoom



Results of Intervention Cycle - Participants using archive images from their camera roll and using crop and zoom in PhotoShop



The Workshop as a Research Tool

This project employs action research as its main methodology

Its a Reflective teaching practice

Allows me Investigate, Intervene and Evaluate Pedagogy Strategies within my Teaching Practice

the method respects the messiness of learning and enables meaningful insights into how students negotiate visual literacy in contemporary image culture. active participants in questioning dominant photographic norms, rather than passive recipients of technical instruction.

Using John Berger's Way of Seeing, Freire's Pedagogy of the oppressed and Fontcuberta's Pandora's camera as research material that triangulate , the classic, the future and social justice to lay the foundation of possibilities for the workshop in my own mind. In the simplest terms, it allowed me to translate and talk to the students without them deep diving into the texts.

Smartphone Workshop – 3/12/2025

With the democratisation of photography through the smartphone, visual literacy is now the new normal.

But is it enough, or do we need to disrupt our visual recall by making photographs with an unorthodox but disciplined practice using the Smartphones Zoom function.

Can this allow us to see with clarity?

If so, how does this affect our sense vision and ultimately how we approach commissions and personal practice.

In this workshop, I want you to only make photographs using the zoom function, no postproduction cropping or zoom is allowed.

You can make the photographs around the confines of the building of the university.
Portraits can be made but only with the consent of the individuals you wish to photograph.

Be bold in the ideas of failure. What does this statement mean?

In essence it is about a discipline of recognising what you expect takes a good photograph and then not making it and walking away from that moment.

It is about embracing the unknown quality of the experimental and challenging your taught, learnt and influenced process.

How can you look beyond the ordinary, boring sometimes mundane situations around us.
It is these moments that we can see something special.

We are going to elevate the photographs we make in this session in the various areas of the university whether that's in the studio or in the buildings/ classrooms / canteen.

You will be working individually

You will have 2.5 hours for the first part of the brief to make the photographs and deliver via we transfer, WhatsApp, text message or email.

After lunch we will meet again and discuss the process and disseminate your images.

You will be given a series of questions to answer about your experience and thoughts of this exercise.

Data !! The Results of the ARP Remote Workshop from the four participants





View results

Respondent

2

Anonymous

02:30

Time to complete

1. Has your perception of smartphone zoom photography changed as a result of this workshop? *

My perception of it has not changed, but it is a great way to experiment with composing an image especially in comparison to using a more 'professional' camera such as DSLRs. It is immediate, low risk and inexpensive if you already own a smart phone.

2. What did you notice about image construction that you hadn't before? *

I can appreciate when objects are not so much in focus, interesting and unique abstract images can be created. However, as we look at our phones everyday and use the phone camera function so often, it can feel quite difficult to use it to create images that feel fresh to the eye.

3. Did this exercise help you think more critically about images on social media? *

No, because images on social media in terms of personal usage is usually composed of photographs taken in non-artistic contexts, the purpose is to document and share to friends and family or the internet. Although, this exercise has shown how versatile phone photography is, as it can be used for different numerous purposes.

4. How might you use zoom intentionally in future work? *

I can incorporate this within darkroom printing, I can crop in on film negatives and work with archival material to find interesting compositions as a way of exploring within existing images.

5. Rate your confidence in critical visual analysis after the workshop from a scale of 1-10 (10 being very confident) *

9.5

Reflection

This project emerged from a desire to intervene in how smartphone photography specifically zoom is positioned within BA Photography education. Through this workshop, I wanted to test whether repositioning zoom as a deliberate, critical tool could open up more inclusive ways for students to think about distance, abstraction, and visual ethics.

Close-cropped images of hoses, cables, textured floors, plastic containers, chemical markings, and institutional signage resist narrative clarity and instead foreground materiality, repetition, and ambiguity. The images that sit between abstraction and documentation, prompting questions about labour, maintenance, and whose spaces are considered worthy of representation. This shift aligns with my broader commitment to socially engaged photographic practice that foregrounds what is often unseen or undervalued.

Crucially, zoom also functioned as an accessible entry point. Because all participants already owned smartphones, the exercise removed financial and technical barriers often embedded in photography education. This mattered not only practically, but politically: it challenged the idea that critical or conceptually rigorous work requires specialist equipment. By legitimising the smartphone as a site of serious inquiry, the workshop disrupted hierarchies that often marginalise students from lower-income backgrounds or those who do not identify with dominant, technology-driven notions of photographic “professionalism.

The written feedback reflects a range of engagement. One participant articulated a clear conceptual shift, recognising how zoom constructs intimacy and authority within social media imagery, and questioning the ethics of that manufactured proximity. Others were more hesitant, framing zoom as practical rather than political. However, even these responses contained moments of transfer, such as reimagining zoom logic through darkroom cropping or archival material. This suggests that while not all students adopted a critical language immediately, the workshop planted seeds for longer-term reflection.

I think extending the workshop over a longer period could deepen engagement with social justice and ethical looking. However, within a short intervention, the project successfully reframed zoom as a site of accessibility, critical awareness, and conceptual agency.

Reflection on the ARP

- **Had the capacity to bridge theory and practice**
- **concepts such as digital mediation, interpolation to be tested and experienced through hands-on photographic exercises.**
- **The experiential dimension proved valuable in encouraging students to articulate insights that might not have emerged through discussion alone**
- **As both the Researcher and Educator - there is risk of subjectivity and bias in interpreting the data**
- **Students may have shaped their responses to what they believed the Educator's expectations are - these are students who I don't teach but have regular interactions with soft teaching**
- **I have tried to mitigate this by having multiple forms of evidence from images , written reflections to a series of questions.**
- **A Group Discussion would have proved valuable as would a in person workshop - the dialogue may have helped form a different set of data**
- **I have concerns of whether this can be scaled up due to the size of the group and the very nature of photographic practice**
- **The strength lies in the transferability that educators could individual adapt to their personal setting and adapt accordingly. For Example I have been setting "homework" to my students to take photo a day for 30 days on the zoom function and we will evaluate the work after that period and disseminate the work.**

Summary of My Project Findings

- Reframing smartphone zoom as a conceptual tool supported critical engagement and challenged assumptions about its value beyond technical limitation
- Some students demonstrated a clear shift in perception, using zoom to think about distance, compression, and abstraction rather than proximity
- Participant images showed strong alignment with my intentions, foregrounding fragmentation, ambiguity, and attention to overlooked institutional spaces
- Other participants remained tentative or resistant, indicating that conceptual shifts require more time and scaffolding to be fully integrated
- The workshop effectively surfaced hierarchies of value around technology and professionalism within photography education
- Uneven engagement highlighted the need for extended duration and more dialogue to be able to reflect and to support inclusive and sustained critical learning

Bibliography

Berger, J. (1972) *Ways of seeing*. London: Penguin.

Freire, P. (1970) *Pedagogy of the oppressed*. London: Penguin.

Fontcuberta, J. (2014) *Pandora's camera: photogr@phy after photography*. London: MACK.

Smith, W.A. (1976) *The meaning of conscientização: the goal of Paulo Freire's pedagogy*. Amherst, MA: Center for International Education, University of Massachusetts.

BJP Staff (2025) 'How mobile photography is reshaping cultural storytelling worldwide', *British Journal of Photography*. Available at: <https://www.1854.photography/2025/12/how-mobile-photography-is-reshaping-cultural-storytelling-worldwide/> (Accessed: 18 January 2026).

Marchese, M. (2023) 'The new age of Homo Photographicus', *Made in Mind Magazine*. Available at: <https://www.madeinmindmagazine.com/the-new-age-of-homo-photographicus/> (Accessed: 18 January 2026).

Suominen, A (2003) Writing with Photographs, Re -Constructing Self : An Arts Based Autoethnographic Inquiry.MA thesis. The Ohio State University

Spence, J. (1988) *Putting Myself in the Picture: A Political, Personal and Photographic Autobiography*. Real Comet Press / Camden Press, London/Seattle.

Ai Log - Using ChatGPT

Harvard Referencing UAL

Summaries of writers

Berger, J. (1972) *Ways of seeing*. London: Penguin.

Freire, P. (1970) *Pedagogy of the oppressed*. London: Penguin.

Fontcuberta, J. (2014) *Pandora's camera: fotogr@phy after photography*. London: MACK.

ARP planning and research

Smartphone Zoom Functionality vs Optical Zoom worksheet