Some historians of photography claim that a radical divide exists between analogue and digital photography. At first glance, the analogue photographs of Bernd and Hilla Becher, on the one hand, and digital works of Andreas Gursky, on the other, would seem to confirm this distinction. Closer analysis, however, reveals that the divide between analogue and digital practices is not as strong as it initially appears, and that truth in photography depends on multiple contingent as well as non-contingent factors.

Keywords: Bernd Becher (1931–2007), Hilla Becher (b. 1934), Andreas Gursky (b. 1955), August Sander (1876–1964), Otto Steinert (1915–78), analogue photography, archive, art photography, digital photography, documentary photography, icon, index, modernism, new objectivity, postmodernism, subjective photography, symbol, truth, typology

Today, one of the central oppositions structuring our understanding of contemporary photography is the distinction between analogue – or film-based – practices and digital ones. In particular, the rise of digital recording and manipulation techniques have called into question the photograph’s traditional claims to truthful documentary representation to such an extent that, according to certain scholars and contemporary critics, digital photography is in essence an entirely new medium, an unprecedented form of representation that will create profound changes in human thought and understanding. While it is good to be suspicious of radical claims to this effect, it is true that the rapid adoption of digital technologies in photography since the 1990s has led to a greater erosion of the public trust in the truth of the photographic image than ever before, as well as a more broadly based awareness of the photograph’s ability to lie – its capacity, in other words, to help propagate mythologies when functioning as a component within the system of the global mass media. For this reason, asking why we often still see ‘truth’ and ‘objectivity’ in analogue photographic practices – and why we ascribe ‘untruth’ and ‘subjectivism’ to digital photography – continues to be of pressing concern, for what at first appears to be a clear-cut distinction between analogue and digital photography soon turns out to be far less cleanly divided.

At first glance, the radical differences between digital and analogue practices seem openly on display when comparing the work of Bernd and Hilla Becher, on the one hand, with Andreas Gursky, on the other. As was already suggested by their first book of photographs, Framework Houses of the Siegen Industrial Region in 1977, the Bechers were engaged in a rigorous and uncompromising documentary project – one
that stressed the objective analogue truth of the photographic medium. Eight Views, Hauptstrasse 3, Birken (1971) for example, is a set of eight equally sized photographs, sometimes displayed as a grid, presenting the front, back, sides, and individual corners of a single framework house in the industrial Siegen district of Germany (figure 1). Characteristic of the Bechers' "truthful" or "objective" approach is their consistent choice of angles and viewing distances, which de-emphasise subjective shot decisions and permit easy comparisons between different photographs and photographic groupings. Everything is done to reject the personality or particular sensibility of the photographer: the camera is consistently level with the middle of the subject; lighting is even and diffused; contrast is reduced to give all parts of the structure a similar weight and impact; and the background is de-emphasised in order to direct the spectator's attention to the architecture itself - its iconic form and its indexical connection to a specific construction existing at a particular moment of historical time (figure 2). The Bechers accentuate the truthful qualities of their analogue practice through the use of a large-format Plaubel Peco camera; it allows them to delineate their subjects with sharp focus, fine detail, and a wide depth of field - qualities that increase the iconic sensuousness of the image and that also help to maximise its informational qualities. Their choice of black and white film is likewise informative; it directs the viewer to concentrate on the architectural subject's specific physical and structural characteristics.

The 'truthfulness' - that is, the objectivity and the informational qualities - apparent in the Bechers' documentary practice rests not only in the analogue character of its photographic technologies but also in their photographs' natures as indexes their status as traced or caused by unique events in space, time, and consciousness. The indexical character of the analogue photograph emerges from its material basis as a chemically sensitised surface upon which light reflected off real people and objects has been captured in a direct and unmediated way. As indexes, the Bechers' editioned prints accrue an aura, a sense of value that often grows stronger, particularly if the original architectural subject is destroyed. Indexicality conditions the viewer to anthropomorphise photographs: to attribute human qualities such as intentionality and uniqueness to them as we also do to painting and sculpture. And, as the historical time grows between the moment when the Bechers made their photographs and the moment when the contemporary viewer apprehends them, their indexical qualities seem undiminished. Indeed, the passage of time seems to produce an unexpected effect: the older the print, the stronger the indexical connection appears between the Bechers' representation and the original object.

A third aspect of the truthfulness of the Bechers' photography lies in its rigorous archival method. For the past forty years, the Bechers have documented the vanishing industrial architecture of Germany, Western Europe, and the USA, producing a large typological databank of what they at one time called 'anonymous sculptures': structures such as winding towers, processing plants, framework houses, factory halls, silos, blast furnaces, lime kilns, cooling towers, water towers, and gas tanks. By preserving numerous well-documented instances of these buildings constructed between the 1870s and the 1950s, they created a significant archive that today exists as an important source of historical information. And because of their clarity, extent, and comparability, among other qualities, we still assume that we can investigate and discover 'truths' about the modern industrial past through the Bechers' photographs.

Another aspect of the truthfulness of the Bechers' work comes from its conscious relationship to the photographic past; specifically, its links to 'new objectivity' (Neue Sachlichkeit) photography: figures such as Karl Blossfeldt, August Sander, and Albert Renger-Patzsch, whose documentary practices connected careful analogue and often large-format camera techniques to archival and typological methodologies. Like the Bechers' work, Sander's portraits are straight on, neutral, 'cool', and objective. Part of Sander's archive of portraits documenting the diverse social strata of German society in the pre-Nazi period, Blind Miner and Blind Soldier (ca. 1930), seems to present a
Figure 1. Bernd and Hilla Becher, *Eight Views, Hauptstrasse 3, Birken, Germany*, 1971, eight gelatin silver prints, 23.81 cm x 17.94 cm each. The J. Paul Getty Museum, Los Angeles, CA. Image © 2012 Hilla Becher.

Figure 2. Bernd and Hilla Becher, *Framework House, Corner View, Hauptstrasse 3, Birken, Germany*, 1971, gelatin silver print, 23.81 cm x 17.94 cm. The J. Paul Getty Museum, Los Angeles, CA. Image © 2012 Hilla Becher.
clear picture of German men traumatised by either World War I or heavy industry (figure 3). Presenting two examples of the same 'type', the disabled male proletariat, the photograph suggests both similarities and differences. Despite their worn clothing and oppressive external location, details that attest to economic hardship and privation, both figures remain buttoned up and orderly, perhaps a sign of their continuing allegiance to traditional German and military values, despite the poverty suffered by many former workers and combatants during the Weimar Republic, particularly in its waning years. On the other hand, possibly because of his more collapsed body language, the disabled man on the left seems closer to death, reminding the viewer that our fates are individual, even if our circumstances are similar. Even the slight angle and off-centredness of the viewpoint strengthens the photograph's rich documentary character by making it seem slightly less staged or set up.

Because of their directness and rich detail, we get a sense from Sander's photographs that we see the subjects as they are and not as the photographer interprets them to be. The Bechers evoked the 'objective' photography of the 1910s, 1920s, and 1930s in part as a way of distancing themselves from the 'subjective' photography of Otto Steinert and others in the 1950s. In opposition to Sander, Steinert's photographs emphasised the photographer's subjective and transformative vision. This can be seen, for example, in the unsettled and momentary character of Steinert's Call (1950), the formal qualities of which evoke a type of looking receptive to chance and experiment (figure 4). Steinert's subjective attitude in photography is suggested by the figure's mobile stance,
For Peirce, symbols are always arbitrary and conventional as well as dependent on the beholder. There is no more fundamental connection—as is the case with icons or indexes—between the signifier and the signified. The primary examples of symbolic relationships are the arbitrary connections between linguistic signs—either words or phrases—and their denotative and connotative meanings: connections that are far more conventional and abstract than those of realistic painterly or sculptural representations, let alone photographs. Peirce called the symbol a ‘conventional sign, or one depending on habit’. ‘The symbol’, he noted, ‘is connected with its object by virtue of the idea of the symbol-using mind, without which no such connection would exist’. See Peirce, ‘Logic as Semiotic’, 113–14.

Steinert accepted all genres of photography into subjective photography, so long as they were individualistic. Furthermore, he did not reject new objectivity photography altogether; indeed, he saw subjective photography as continuing and developing the avant-garde photographers’ emphasis on experimentation. He did, however, see subjective photography as ‘humanized, individualized photography’, a mode of photographic practice that employed the camera ‘in order to win from the single object images [Bildsichten] corresponding to its essence [Wesen]’. Otto Steinert, Subjektive Fotografie, Bonn/Rein: Brüder Auer Verlag 1952, 6.

As a result of this change, the photograph functions less as document and more as art. And by rejecting Steinert’s subjectivism as well as by emphasizing their associations with the tradition of German objectivity exemplified by Sander, the Bechers stress the connections between their practices and an older mode of photographic comportment with strong documentary and matter-of-fact associations.

In comparison with the Bechers, Gursky’s work seems altogether different. His photographs are intended and presented as artworks, not as documents; and although they are formally rigorous, there is little or nothing of the Bechers’ focus on objective method, a largely unvarying format and set of practices that allow for individual structures to be documented as well as interrelated typologically. Instead, Gursky’s photographs seem much more symbolic and subjective, qualities that appear to reflect an awareness of the manipulability of the photographic medium, which in turn can be linked to the untruthfulness and lack of objectivity associated with digital processes.
Gursky's Rhine II (1999), for example, presents an image of something that does not exist in real life (figure 5). Here we are presented with a slightly elevated view of a section of the river running parallel to the picture plane, flanked by swaths of green grass and, in the foreground, a paved roadway, a man-made structure that echoes in form and function the natural avenue of transportation that flows behind it. Nature is doubly flattened in these images: depth of field is compressed through Gursky's lens and he has employed Paintbox software to remove a few buildings from the far side of the river, thereby accentuating the motif's horizontality. A photographic representation of the world has thus been transformed into an abstract artwork, 'a natural Newman', as one critic called it. Its indexical qualities have been weakened; and we perceive it as a metaphor for the dialectic between nature and technology, rather than a depiction of a particular geographic location. Through its digital manipulation, moreover, which renders the picture more abstract and mechanised, the iconic quality of the river motif is emphasised, thus strengthening the beholder's sense that landscape's form has been idealised.

*Atlanta* (1986) also seems manipulated in this sense (figure 6). Here Gursky has used the computer to merge two disparate viewpoints of the John-Portman-designed hotel: shots of the Atlanta Hyatt Regency's atrium taken from the same vantage point but at a distance of 180 degrees from one another. Somewhere near the vertical centre of our vision, in other words, Gursky has merged opposite ends of the same hallways, creating a back wall that was never really there. Like the Rhine, Atlanta looks in certain ways like an abstract painting; and, on a thematic level, like many of Gursky's photographs, it envisions a world of global migration and flow: a space in which travel, leisure, and labour are systematically interrelated and organic forms seem to be channelled as if they were materials being processed within a giant machine. Although cool and 'deadpan', the image seems ominous; what is most disturbing about it are its formal qualities. Although the sensuousness of the work engages us, if we stare at the picture long enough, we come to mistrust it. Intuitively, the spectator knows that landscape is false in some way and that, whatever reality the photograph still points to, what we see in front of us is not the world as it existed before Gursky's lens. When the spectator learns how Gursky digitally manipulated the photograph, the view seems even more uncanny. We suddenly recognise that what we see is physically impossible, because it encompasses more than twice the normal range of human vision – and yet, strangely, it looks like our everyday field of view. Reality, here, is rendered both familiar and strange. Thus, despite its clarity and detail, Atlanta does not emphasise its documentary character; instead, it foregrounds its digital manipulation and thus sows seeds of doubt about its own truthful nature as well as the viewer's ability to comprehend the objective world.

It is even characteristic of Gursky's work that his 'straight' or non-doctored images look digitally manipulated. *Untitled* I (1993) presents an elevated and oblique view of the grey institutionally carpeted floor of the Düsseldorf Kunsthalle (figure 7). The realism of the image changes from the bottom edge or front plane, where the texture of the carpet is clearly apparent, to the top edge or rear plane, where the carpet is out of focus. On the bottom and across most of the photograph Gursky's image is true and informative; in the top one-tenth of the representation, where shallow depth of field plus distance creates abstraction, the photograph could be anything: a response, perhaps, to recent German painting's dialogue with photography in the 1960s and 1970s or to global conceptualism's tradition of institutional critique during the same time.

While the photographic surface depicting the museum carpet cannot offer the richness and sensuous presence of the textured and complexly worked face of Gerhard Richter's canvas Grey (1974), for example, the photograph's size and sumptuous painting indicate that it does aspire to the condition of abstract painting (figure 8). Furthermore, by potentially referring to Richter's famous series of grey monochromes created between 1970 and 1975, Gursky's depiction of the Kunsthalle's floor suggests an interest in engaging with the early abstract work of a

Matthew Biro
Figure 5. Andreas Gursky, *Rhine II*, 1999, chromogenic colour print, 155.6 cm × 308.6 cm. Museum of Modern Art, New York. Image © 2012 Andreas Gursky/Artists Rights Society (ARS), New York/VG Bild-Kunst, Bonn.
Figure 7. Andreas Gursky, *Untitled 1 (Carpet)*, 1993, chromogenic colour print, 174.5 cm x 210 cm. Image © 2012 Andreas Gursky/Artists Rights Society (ARS), New York/VG Bild-Kunst, Bonn.

Figure 8. Gerhard Richter, *Grey*, 1974, oil on canvas, 250 cm x 195 cm. Image © 2012 Gerhard Richter.
German artist, who, in the 1960s, was well known for his pioneering melding of painting with photography. And in retrospect, as suggested by Gursky, Richter’s complex mechanisation of his daily practices of painting seems to have prepared the ground for an increased reflexivity in contemporary photography about nearly abstract forms of photomechanical reproduction.

The photograph also appears to respond to the long history of conceptual art. When compared with the floor and wall removals of Lawrence Weiner, for example, Gursky’s image does not seem to be as rigorously conceptualist in its institutional critique as the US artist’s work. However, as is the case with Weiner’s interventions in the museum’s architecture, the Düsseldorf floor speaks to an interest in directing the viewer’s attention to the museum as a space of social, structural, and spectatorial experience – an interest that is also characteristic of some of fellow Becher-student Thomas Struth’s large-scale photographs. Thus, on multiple levels, Untitled I dissociates itself from its specific documentary functions and instead emphasises its formal dialogue with the tradition of twentieth-century art through its nature as an instance of one or more inter-subjectively agreed upon aesthetic types; in this case, either the form of the monochrome or the strategy of institutional critique.

By raising the question of general types, Gursky’s museum floor impels a return to the concept of typology that emerges in the Bechers’ work. This is particularly important since it is through the typologies that the Bechers’ photographs begin to separate themselves from their purely indexical documentary functions. Unlike Hauptstrasse 3, Birken discussed previously, Water Towers (1967–80) is a typology and not a set (figure 9). A set, according to the Bechers, documents a particular structure from different angles, while a typology, on the other hand, presents a group of photographs that are different instances of the same type or ideal form. Sets, in other words, refer indexically to one actual structure, while typologies refer indexically to a number of different individual structures. The Bechers’ typologies thus use a group of specific instances to suggest a generic type, and, as is the case with all forms of representation that help us to group and separate specific things or beings in the world, they are conceptual and thus open to metaphorical and symbolic appropriation.

It was the Bechers’ typologies, moreover, that allowed their photographs to be understood as works of art. Although they have often denied an interest in making art photography, their work was assimilated into the gallery and museum system during the late 1960s and early 1970s. Responding to the literalness and seriality of their photographs, curators and critics in the USA (as well as a number of prominent artists such as Carl Andre) found a common ground between the Bechers’ work and the minimalist and conceptualist art that had recently come to prominence. Brought into the museum, the Bechers’ typologies became works about ideas of industrial structures; and as Alexander Alberro put it, their serial arrays provoked a “rigorous dismantling of the autonomous, auratic art object.” As evocations of formal concepts (which in turn were based on the assumption that built forms arise naturally out of industrial functions), the Bechers’ photographs became less about the actual structures that they documented and more about abstract ideas or types. Andre perhaps best described the specific concept that informed all the Bechers’ work when he noted that: ‘The photographs of the Bechers record the transient existence of purely functional structures and reveal the degree to which form is determined by the invariant requirements of function.’ Consequently, despite their avowed documentary intentions, the Bechers’ photographs also became understood as conceptual art.

In light of the Bechers’ partial assimilation into the sphere of contemporary art, the artistic focus of many of their students – Gursky included – is easy to understand. Gursky saw first-hand that documentary and art did not have to be separated, and as a result his photographic practice became a kind of social documentation designed to circulate within the institutions of fine art. Perhaps because of his primary location within the gallery and museum sphere, however, the visual dialogue in which he

supposedly neutral photographers are, of course, making an interpretation of the world does not invalidate the adjective, which points to a kind of surface objectivity.


20 – When looked at from the point of view of the history of photography, works like Gursky’s Untitled I (Carpet) also seem to engage with the tradition of seascapes begun by Gustave Le Gray in the 1850s and practiced powerfully since the 1980s and 1990s by photographers such as Hiroshi Sugimoto and Thomas Joshua Cooper.

21 – On sets and typologies in the Bechers’ work, see Lange, Bernd and Hilla Becher, 35, 44–5 and 51–4.


engages seems most focused on the history of painting; there is less dialogue with the history of photography. On the other hand, the concept of objectivity or Sachlichkeit—like that of documentary—has always contained multiple meanings. Although Gursky’s photographs clearly land on the side of metaphor, even the rigorous documentary practice of the Bechers always possessed symbolic aspects. As is the case with the Bechers’ project, it is probably best to see Gursky’s work as playing between the two poles of documentary and art. The question is not whether Gursky’s works diverge from objective representation, but rather whether the metaphors he constructs still document something about the contemporary world.

To answer this question, it behooves us to explore the metaphorics of the Bechers’ typologies in greater depth. As a number of critics and historians have argued, a sense of melancholy pervades the Bechers’ oeuvre. The photographers preserved and archived the built remnants of industries that are now in decline in the West; and the strategies that they used—analogue technologies, objective representation, typological structure, and archival method—are all products of a past that grows more remote every day. Their photographs, moreover, possess pronounced modernist characteristics: a sense that form follows function, that architects and engineers can learn from nature, and that artists must take technology as their subject so as to show their audiences how best to live in the modern world.

Finally, their work also channels the positivist philosophies of the nineteenth century upon which a number of modernist positions were built. This positivism can be discovered in the Bechers’ emphasis on empirical observation, their use of comparison to reveal both identity and difference, and, above all, their ‘physiognomic’ approach to phenomena, which assumes that, when properly organised, individual instances will reveal the ideal forms that stand behind them as their ultimate causes. And by evoking these positivist and modernist ideas so consistently, the Bechers underscore the divide that separates the Germany in which these ideas still made sense from the Germany in which they produced their memorialising archive. For this reason, their work is in some ways—like Gursky’s—‘postmodernist’ in that it is about the waning of certain forms of modern technology and about the loss of objectivity. It can remind us, in other words, that seeing things clearly does not necessarily translate into a deeper understanding of the world.

In light of the metaphorical reading of the Bechers’ analogue mode of photographic comportment, which sees it as a subtle critique of positivism, modernism, and technological utopianism in the post-1950s world, Gursky’s by no means exclusive turn to digital photography does not indicate a rejection of photography’s documentary function. Instead, Gursky’s embrace of non-analogue methods suggests a desire to develop a practice of photography that is adequate to his contemporary moment. This world, as works like Klitschko (1999) suggest, is a context in which form has become separated from function, where the body has no centred or unified point of view, and where people, commodities, and the environment have become enmeshed in a global network of exchange in which everything can be translated into everything else (figure 10).

Klitschko includes many of Gursky’s favourite motifs: crowds, geometrised spaces of contemporary mass entertainment, and representations of representation (in this case, the television lighting and cameras as well as the repetition of human figures—clusters of men in the ring and in the broadcast centre on the right—in the two central screens overhead). Already in the 1990s Gursky had a prescient sense of the shape of the world to come, and he expressed this intuition by constructing compelling metaphors for his rapidly developing moment, images that ten and twenty years later continue to inspire conviction. Although Gursky’s work often relies on digital technologies, he has made some of the most iconic social documents of his time.

In terms of form, Gursky has been equally innovative. As Michael Fried argues, Gursky is one of the key photographers exemplifying the re-emergence of an ‘absorptive’ or anti-theatrical tradition in contemporary art. Fried isolates a number of formal and representational strategies that operate in Gursky’s photographs to

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Figure 10. Andreas Gursky, *Klitschko*, 1999, chromogenic colour print, 206.53 cm x 261.62 cm. Image © 2012 Andreas Gursky/Artists Rights Society (ARS), New York/VG Bild-Kunst, Bonn.
distance or ‘sever’ the viewer from the picture’s natural, architectural, or human subjects, including a regular combining of microscopic and macroscopic perspectives as a well as a non-fixed, ‘hovering’, quasi-aerial point of view. The digital manipulation that underlies these and other aspects of Gursky’s photographic practice thus has, according to Fried, an important (and positive) effect. Although it undermines the photograph’s indexicality, digital manipulation makes what appears within the frame seem more controlled or intentional, more determined by the photographer. And for this reason, Gursky’s digital manipulations help to redeem photography for Fried, to make it matter as art as never before.

The analogue age is over—in photography as well as everywhere else. Although analogue processes may survive as specialised technologies embraced by a select few, most new images made in the world will be captured, transmitted, and consumed digitally. Moreover, even if a greater percentage of ‘great’ photographers continue to work with analogue technologies in comparison with working photographers in general (something that may remain true in art, but probably not in documentary photography), more and more of the world’s most important photographers will nonetheless slowly become digital ones. Today, the sheer ratio of digital to analogue equipment points to the ultimate triumph of digital photography. For this reason, it is safe to say that we have witnessed a seismic shift over the past 20 years, a radical transformation of photography, a primary medium through which we continue to understand both our environments and ourselves.

At the same time, it is important not to overemphasise the division between analogue and digital photography. As suggested by the long history of photomontage in the nineteenth and twentieth centuries, analogue photographs have always had the power to manipulate and transform reality. Indeed, because the camera always selects—or edits—and otherwise changes the world that exists before its lens, no photograph—analogue or digital—can be said to represent the complete ‘truth’ of its subjects or objects. Digital images, moreover, still have importance as documents. For example, as suggested by the amateur snapshots of torture at Abu Ghraib in 2003, digital photographs continue to possess a great deal of evidentiary (as well as propagandistic) power.

As this comparison of Gursky with the Bechers demonstrates, the photograph is always profoundly heterogeneous. It is, simultaneously, both document and art, the product of multiple authors, and the locus of numerous, sometimes contradictory signifying relations. A sometimes seemingly transparent avenue of communication that is anything but clear and non-distorting, the photograph possesses a complex history that—in both its analogue and its digital phases—reveals contours of human knowledge that remain imperceptible in everyday life.

28—As we view Gursky’s photographs, Fried argues, we feel separated from his worlds—they seem like mental pictures or concepts. There appears to be no point of view; and the scope and detail of the images seem outside of normal human perceptual experience. When human subjects are visible, moreover, they appear absorbed; they do not acknowledge the viewer, and hence prevent us from identifying with them. Furthermore, because they are shot from afar, they most often seem emotionally flat, betraying little inwardness or psychic depth. A desire to distance the beholder is also behind Gursky’s photography of barriers that come between the viewer and the scene. Michael Fried, Why Photography Matters, 156–82.


31—The exhibition The Camera Always Lies, the 2008 Regional Triennial of the Photographic Arts, at the Center for Photography at Woodstock, made a similar point a few years ago, demonstrating a widespread awareness on the part of curators and photographers that the camera already changed reality and shaped experience long before the digital age.