

## THE RETURN OF THE PAINTER: MECHANICITY AND ITS OPERATOR

Eszter Polonyi

Combining computer engineering with painting, Dominik Mahnič's work recalls the history of mechanization as spectacle. At the time they were introduced, steam locomotives, cars, escalators, trolleybuses, neon lighting and analog computers were presented as examples of scientific advance, but also as a public source of astonishment.<sup>1</sup> Powered by sprawling electrical grids and steel engineering, twentieth-century mechanization routinely galvanized its spectators with fantasies of sky-high cities, aerial transport, roboticized kitchens, and prosthetic bodies. The sheer metal bulk of Mahnič's painting-machine, which he has dubbed the Brushograph (*Čopičograf* in Slovenian), recalls this range of mechanical hybrids that churned out the modern wonders of the world while clanking away in the laboratories modernity has erected to progress over the course of the twentieth and twenty-first centuries.

The phenomenon of the mechanical, or mechanicity, is integral to Mahnič's art work. Regularly integrating visual media devices into his work, ranging from laser projectors to video routers, optical and 3D printers, and other machines built for purposes of image reproduction, Mahnič stages mechanicity as a kind of art installation, sculptural object or even happening. The Brushograph follows on several of these earlier attempts by Machnic, starting in the mid 2010s, to automate the act of drawing or painting. Some changes were introduced since the Brushograph first emerged in 2019, such as the mixture of ingredients in its pigments, its adornment by a miniature Nike of Samothrace statue, adjustments to the number of layers of paint applied.<sup>2</sup> But the main silhouette of Mahnič's painting-machine has remained roughly unchanged.

The Brushograph consists of a rectangular metal frame fitted to the edges of a given canvas that has been stretched, coated and prepared in the customary manner. In addition to defining the limits of the painted field, this metal frame also constitutes the double axis of coordinates at which paint can be applied to the canvas's surface—by the machine. Fitted into the tracks that run alongside the metal bars of the frame, a remote-controlled component fixed with a paintbrush spans the lateral length of the canvas, forming a kind of x-axis and able to glide to and fro along what might be understood as the painting's y-axis. The movements of this remote-controlled component are designed to move the pigment from petrie dishes laid out to one side of the canvas to precise locations within the open field of the canvas. While sometimes these involve marking only one spot, so that the lever traverses the span of the frame to leave behind one daub of paint, most often the pigment is applied in the manner of a brush—"stroke," that is by dragging the brush across a given distance and leaving behind a line of pigment. Once the brush has produced its predetermined mark, it moves back to the petrie dishes to charge itself with the paint it needs for its next "stroke." Able to access the full length and width of the image, the mobile component is thus fully in control of the image that slowly emerges beneath it.

With each painting involving hundreds of thousands of brushstrokes, the Brushograph's progress toward a final image, however, takes a while. Weeks, typically. Which is longer than the time most visitors typically spend contemplating the Brushograph at work.

---

<sup>1</sup> Jackson, A. (Anna M. F.) (2008) *Expo: international expositions 1851-2010*, London: V&A Publishing; Schwartz, Vanessa (1993) 'The Public Taste for Reality: Early Mass Culture in *Fin-de-Siecle* Paris' (PhD thesis, University of California, Berkeley);

<sup>2</sup> For an illustrated overview of Mahnič's work online see Assembla (n.d.). *Dominik Mahnič*. Wiki. Retrieved August 23, 2023, from <https://app.assembla.com/spaces/dominik-Mahnic/wiki>.

What Mahnič seems to be presenting visitors with is not just a painting-machine, but painting *as* machine. Painting as a process. So what is the painting's image, if the painting is perpetually in a state of becoming? Unfinished as long as it continues to remain on display, where does this image, in fact, exist? With each instance of travel across the canvas, this performance of a painting-process leaves in the visitor with a mounting sense of absence, an awareness of an emptiness that fills the place where there should be someone, or someone's *intention* guiding the trajectory of the paintbrush. The frustration ensuing from the thought that the one will be unable or was never meant to accompany the performance of painting to its logical conclusion is compounded by the realization that the machine is mechanical, disinterested in interaction, and that its original image, like its final appearance, remain inaccessible to the visitor. The spectacle of mechanicity ensues partially from the eerie feeling that, as far as the visitor is concerned, the machine is deaf, blind and dumb to the world as they inhabit it. And yet, it produces form that is intelligible.

Mahnič's Brushograph belongs to the era of smart machines. Its application of paint is far from random, instead clearly reflecting the logic of digital media. The movements taken by its mechanism are carried out according to a carefully designed plan of action, namely a program that was scripted by a team of experts that involved Mahnič and two computer programmers, Peter Veselinović, and Vid Vidmar. In principle, the ability to trace the movements of the Brushograph back to human origins might counter the sense given by the machine of its own autonomy. One can conjure an image of three humans focused on writing a piece of software, (almost) as easily as one might picture Mahnič assembling together the various components of the Brushograph's hardware. But does this bring us any closer to the body of a human, or even a collective of humans, to which the origins of the painting might be attributed? Or does such a thought experiment not brush against the grain of a device calling itself a "painting-machine"? Is the seat of authorship not meant to remain empty?

The presence of Mahnič himself is an interesting point of consideration in determining what precisely the Brushograph intends to foreground about mechanization. Mahnič is frequently to be found sitting or standing in the same gallery space as his machine. Under the pretext of meeting his visitors, answering questions but also monitoring the work at hand, his baseball-capped figure remained a near constant fixture of the presentation of the Brushograph at MSUM in 2023.<sup>3</sup> And yet, despite this inclusion of himself as part of the process of the Brushograph's painting, Mahnič seems uncomfortable with the idea of being labeled as anything other than its assistant, or operator, at best.

This deferral to mechanicity is implied by his name, "Mahnič," which when read out loud in Slovenian phonetically resembles the German phrase for "doing-nothing" [*macht-nichts*]. Presumably an adopted (or adapted) name, the name is only assumed as a designator to then—by virtue of its denotative meanings—disqualify him from the condition of agency it initially advertises. By using the same cultural practice of naming to both announce and negate himself from participation in the work, Mahnič subverts the idea of decision-making as a part of the work of art, embracing instead what may be interpreted as the classic avant-garde trope of chance or contingency.<sup>4</sup> Even if authorship is not

---

<sup>3</sup> For instance Mahnič spent four hours a day in the MSUM galleries Tuesdays through Fridays during the month-and-a-half it was on view (<https://www.mg-lj.si/en/exhibitions/3690/exhibition-dominik-Mahnic-brushograph-2-0/>)

<sup>4</sup> Speaking of John Cage on (non-)choices, the American experimental filmmaker Hollis Frampton writes: "To choose is to exclude; to negate choice is, by implication, to include everything. But to subvert the notion of choice is to invert the intellectual perspective within which choice operates. To make non-choices is to situate oneself, as an artists, at the intersection of inclusion and exclusion where, in the absolute co-presence of every possible compositional option and every conceivable perceptual pathway, the notion of choice becomes irrelevant." Frampton, H. (1976) 'Notes on Composing in Film', *October*, 1, pp. 104–110. See also Breton, A. (1924) 'Manifesto of Surrealism.'

“dead,” in the manner literary and cultural theorists starting in the sixties conceptualized it,<sup>5</sup> the Brushograph’s paintings hollow out positionality in its very resuscitation. This mechanized author/painter is a revenant, a ghost, a specter.

Given his investment into the mechanization of art practice, or, what some might simply call media art, what is surprising is not Mahnič’s self-effacement but the fact that he does not seem to have quite given up on painting. Parallel to multiple projects that automatize the act of drawing, casting and painting, Mahnič continues to make art by hand, that is without any machinic mediation. For what the Brushograph ultimately produces are paintings. Oil on canvas, tempera on canvas. Produced on the flatbed format of the Brushograph, the image itself never becomes fully visible during the painting process. But finished examples of the Brushograph’s work can be found in its surroundings, often hanging on the walls. In these works, it becomes clear that Machnic is committed to genres of painting and types of figural representation that are actually abundantly legible within the history of art. His activity as portraitist would qualify as such (although he might consider the outcome of this more “sketches” than finished work). But such is also his work as an easel painter. In a photograph of himself recently reproduced as a painting, Mahnič has swapped his baseball cap for a straw hat and appears against a darkened mountainscape silhouetted against the sun (Fig.1). Mahnič depicts himself turned away from the viewer and gazing at both the view and his easel, seemingly drawing on the classic trope of *Rückenfigur* in nineteenth-century painting, according to which a lone protagonist will mirror and draw out the thoughts of the painting’s intended viewer. Mahnič aligns the Brushograph’s paintings with well-known tropes, motifs, and genres. Adopting the range in palette and leggy brushwork characteristic of Post-/Impressionism, Mahnič’s art historical references are both appropriate to the capacities of his machine but also surprisingly familiar.

Banality is a quality of the digital image that recent critics have begun to remark upon.<sup>6</sup> Not because the images with which we surround ourselves in the twenty-first century are without meaning. Visual media have long been known to heighten affect and sensation in the encounter with images and the images that today circulate over digital media have often inordinate significance to those sharing them.<sup>7</sup> But taken out of the context of our own images archives, that is, viewed from the perspective of the database—the daily quantity of images posted to just Facebook, Snapchat and Instagram—the overall impression is one of (more or less precisely) engineered blandness.<sup>8</sup>

An era beset by similar conceptual anxieties, the nineteen-twenties voiced concerns about the potentially formative sensory pathologies stemming from a state of overwhelming visual saturation.<sup>9</sup>

---

<sup>5</sup> Foucault, M. (1979) ‘What is an Author?’, in *Textual Strategies: Perspectives in Post-Structuralist Criticism*, pp. 141–160; Barthes, R. (1977) *Image, music, text*, *The Journal of Aesthetics and Art Criticism*. Edited by S. Heath. Hill and Wang (Fontana communications series).

<sup>6</sup> See for instance Batchen, Geoffrey (2000), ‘Vernacular Photographies’, *History of Photography*, 24(3): 262–71 and Pollen, Annebella (2016), *Mass Photography: Collective Histories of Everyday Life*. London: I. B. Tauris. Kalaš’s milieu is one of new figurality and pop art Foster, H. (1996) ‘Death in America’, *October*, 75(Winter), pp. 36–59.

<sup>7</sup> Bruno, G. (2002) *Atlas of emotion : journeys in art, architecture, and film*. London ; New York: Verso; Hillis, K., Paasonen, S. and Petit, M. (2015) *Networked Affect*. Cambridge, Mass: MIT Press.

<sup>8</sup> ‘800 million images are uploaded to Snapchat every day, together with 350 million to Facebook and 80 million to Instagram.’ The quote is from Xavier Antich’s article “Buried by Images” and is quoted by Joan Fontcuberta in her correspondence with Geoffrey Batchen (“Coda: Photography in the Age of Massification. A Correspondence between Joan Fontcuberta and Geoffrey Batchen,” in Dvorak, T. and Parikka, J. (2021) *Photography Off the Scale. Technologies and Theories of the Mass Image*. Edinburgh: Edinburgh University Press, pp.253-288.

<sup>9</sup> Kracauer, S. and Levin, T. Y. (2009) ‘Photography’, *Critical Inquiry*, 19(3), pp. 421–436; Bajac, Q. (2014) ‘The Age of Distraction: Photography and Film’, in *Modern Photographs from the Thomas Walther Collection, 1909–1949*, pp. 1–12.

Similarly to talk of image blizzards and deluges during this period, metaphors of image cascades and avalanches have returned in the early twenty-first century, this time relative to the discourse of digital remediation rather than photography and film.<sup>10</sup> In both early-century moments, pioneers of new forms of visuality and visual perception have remained a minority. Most producers of images in these two historic periods are interested in appropriation. With a growing industry of image distribution and circulation serving the image-manufacturing needs of the public in both eras, the end result is not aesthetic refinement so much as a tyranny of the same: endless sunsets, birthday parties, images of violence, pornography.

Mahnič's is an attempt to redeem the digital image from its own banality. To extract one from among the looming millions and, by singling it out, studying it color by color, rebuilding it, layer by layer, brushstroke by choreographed brushstroke, to temporarily suspend the relentless tidal wave that threatens to crush meaningfulness.

Historically speaking, engagement with banality is not an easy feat. The art world's difficulty in wrapping its head around the vernacular and the popular is legendary. Curators in Paris balked at the introduction of commodity objects in galleries in 1917, when Duchamps tried exhibiting his industrially manufactured "fountain," and they managed to continue to be shocked in 1962 when Warhol put Campbell's soup cans on display. Critics have often responded defensively, with Clement Greenberg composing his famous ode to modernist abstraction in 1960, its purity, reason, and self-sufficiency elevating painting high above the mass-produced object, which he dismissed as its binary opposite—"kitsch."<sup>11</sup>

By constructing a machine with which to engage banality, Mahnič takes on the brunt of this legacy. He uncovers the paradigm of industrial manufacture under whose aegis all painting has been made since the nineteenth century. But he does so by rendering the means of reproduction visible on two counts: by foregrounding its apparatus, and by revealing its broader effects on form itself. The broad, even strokes of the Brushograph's brushwork recall the marks made by a machine, perhaps most similar to the streaks left by early printers. And for those in the region, this kind of linear division of the painterly field constitutes a direct reference to the work of Mahnič's predecessor Bogoslav Kalaš, a painter and representative of the Pop art movement that emerged in the Yugoslav region.<sup>12</sup> Whether we call it "kitsch," Pop art, or "Variants of New Figural Art," as it has been recently called by Slovenian art historians, this kind of imagery was particularly controversial.<sup>13</sup> In the U.S., it would take Pop art several years of wrangling with institutional gatekeepers before art institutions gave admittance to its practitioners. In Slovenia it was only in the twenty-first century that this heritage would be rediscovered.<sup>14</sup> Mahnič's and Kalaš's combination of Impressionist brushwork with the marks of a mechanical printer are the Yugoslav equivalent to Roy Lichtenstein's Ben-Day dots: they evoke industrially-manufactured popular culture.

---

<sup>10</sup> See Erik Kessel's installation of *24 Hrs in Photos* and its discussion for instance in Parikka, J. and Dvorak, T. (2021) 'Introduction: On the Scale, Quantity and Measure of Images', in *Photography Off the Scale. Technologies and Theories of the Mass Image*, pp. 1-24.

<sup>11</sup> Greenberg, C. (1989) 'Avant-Garde and Kitsch', in *Art and Culture. Critical Essays*. Boston: Beacon Press, pp. 3–21.

<sup>12</sup> Kalaš, B. (2016) *Bogoslav Kalaš : [stroj za slikanje : pregledna razstava = the painting machine : a survey exhibition : Moderna galerija, Ljubljana, 17. 12. 2015-20. 3. 2016]*. Edited by M. Jenko. Ljubljana: Moderna Galerija/Museum of Modern Art; Gurshtein, K. (2009) 'Bogoslav Kalaš: the Ghost in the (Painting-) Machine', *ArtMargins*, pp. 1–14. Available at: <https://artmargins.com/bogoslav-kalas-ghost-painting-machine-article/>.

<sup>13</sup> See also Grafenauer, P. (2018) 'Non-Aligned Pop: Case of Slovenia', *Open Journal for Studies in Arts*, 1(1), pp. 7–28.

<sup>14</sup> *Slovenija in neuvrščeni pop : [UGM - Umetnostna galerija Maribor, 2. december 2016 - 26. marec 2017] = Slovenia and non-aligned pop : [UGM - Maribor Art Gallery, 2 December 2016-26 March 2017]* (2017). Maribor: UGM.

True to the Warholian logic of wanting to be a machine, Mahnič's paintings are not meant to be read in terms of Mahnič himself. While presumably meaningful in some way to Mahnič himself, reconstructing his personality from his paintings would require Holmesian-level forensic analysis. Deferring his choices to the Brushograph, Mahnič loosens the bonds tying his paintings to the methods of classic art historical connoisseurship. Rather, his paintings become a document of their apparatus, the Brushograph, and as a record of the paradigm of automatized mechanicity from which this emerged.

One final note about Mahnič's case of the return of the painter as machine. Painting-machines have tended to be on the bulky side. It is admittedly part of their charm. For instance, the Japanese Gutai artist Akira Kanayama in 1957 created a home-made paint-spilling machine that was mounted on a toy car that could therefore cover canvases of any surface area he wished.<sup>15</sup> Similarly, the machine built by the automation consultant Raymond Auger in 1962 only allegedly received a paintbrush to "hold in its hand" to hone in on the precision of servomechanisms its creator had been designing, although its sprawling larger-than-life dimensions suggest it may have been somewhat lacking in grace.<sup>16</sup> A longstanding fascination with the French artist Jean Tinguely, the phenomenon of his "Machines à peindre" within his *Méta-matic* series became so large that they needed to be powered by engines, in other cases they became bicycles.<sup>17</sup>

It's not so much their size that makes these wheezing, spewing, shooting paint-machines slightly machoistic, but their movements' lack of elegance.<sup>18</sup> Tinguely's machines' infamous unweildiness was such that they became the brunt of parody in a Gene Kelley film in which the machine's maker falls victim to the half-a-dozen paint-missiles he builds in his apartment.<sup>19</sup> Dangers of self-implosion aside, the jerky clumsiness in a mechanical-painter's arm is ultimately to the detriment of their own work.

The Brushograph's control over its paintbrush therefore comes as welcome surprise. Not that the daubs of paint it delivers are particularly small. There is a streakiness of its final image that is directly (and perhaps deliberately) reminiscent of the Brushograph's genetic origins in laser printers. Control is more perceptible in the compositional integrity of the final image produced as well as the motions that are executed by the Brushograph. One motion in particular stood out to this viewer; namely, the arm's monitoring of paint at the tip of its brush. Rather than drag a dripping brush across the canvas, the Brushograph collides the end of the brush with the side of a petrie dish by moving forward while simultaneously performing the slightest bit of a dipping movement. The quietness of this gesture, by which a robot-arm wipes paint off its brush, signifies an interesting departure from the Brushograph's predecessors.

---

<sup>15</sup> <https://cyberneticzoo.com/robots-in-art/1957-remote-controlled-painting-machine-akira-kanayama-japanese/>

<sup>16</sup> <https://cyberneticzoo.com/robots-in-art/1962-painting-machine-raymond-auger-american/>

<sup>17</sup> Tinguely's machine that ran on fuel was "Méta-Matic No. 17" (1959). The vehicular painting-machine actually produced drawings and was called "Le Cyclogreveur," 1960. See also: [https://lgt-felix-eboue.eta.ac-guyane.fr/IMG/pdf/5dessins\\_filiations2tinguely.pdf](https://lgt-felix-eboue.eta.ac-guyane.fr/IMG/pdf/5dessins_filiations2tinguely.pdf)

<sup>18</sup> In their massivity, painting-machines are distinctly different from drawing-machines, which have tended to be significantly on the lighter side. See the online archive of five-hundred years of drawing-machines compiled by Pablo Garcia from the School of the Art Institute of Chicago (<https://drawingmachines.org/index.php>).

<sup>19</sup> Thompson, J. L. (1964) *What a Way to Go!* 20th Century Fox; <https://cyberneticzoo.com/robots-in-art/1964-painting-machines-larry-flint-american/>; at the time this was written the full film was accessible online (<https://www.youtube.com/watch?v=9BTbVhkm30U>).