





# MULTIMORPHISM

## THE BOOK IN SHORT

„YOU CAN LIVE IN THE JUNGLE OR LIKE THE OTHERS IN THE ZOO.“

Christopher Noelle aka Tofa is a passionate multimedia artist with over 30 years of experience in creating crossmedial art.

In this retrospective 300 pages book, the interrelationship of all the different medial disciplines that he dived into, creates an interesting and inspiring focus on crossmedial research with an outstanding artistic approach.

In our data-flufmed times such a cross-general artistic approach is difficult to follow and fulfill, but nevertheless highly interesting to trigger and (re-)discover your own creativity.

Multimorphism is not only a lookbook, but also claims to be a source of inspiration which underlines the complexity and relationship between the analog and the digital world.

10 Chapters about 11 mediums and 10 tutorial projects guide you threw the jungle of ourdays multimedial options, ranging from projection art over light painting, calligraphy, graphics, animation, penplotter art, spirography, street art, club culture up to xr ai architecture, AI driven campaigns and typographic transfers.

In collaboration with graphic designer Laurenz Hintermayer - who was in charge of the conceptual layout design - this artbook is closing the gap of the dynamic connections of XR art. Tofa is fusing the disciplines to interaction and shows us reciprocal influences that encourage to imitate.

Whether you're an enthusiast, a creative, a practitioner, or simply a curious observer, this book promises to ignite your imagination and expand your appreciation for the ever-evolving landscape of contemporary art.

## FORMAT

223 x 300mm (WxH), 300 pages CMYK + Spot color Silver (print), English

## MULTIMORPHISM - THE TITLE

The term „Multimorphism“ is the ability of a single thing to take multiple forms, adapting to different needs at the same time.

## AUDIENCE

10-99 years, unisex

Art interested people in the beginning of an artistic career or/and a general interest on temporary XR art from the genres graphic design, projection art, photography, calligraphy and typography, animation, graphic and interior design, street art, penplotter art and stuff far beyond.

Educational institutions such as Universities, Schools, Media Campuses and Festivals, Thinktank Companies, Agencies, Artbuyers and Artlovers.

## ABOUT THE AUTHOR

Berlin born Christopher Noelle (\*1974) aka Tofa is looking back on a story that went threw the roof like a rollercoaster long before the digital overkill started.

From the former extreme sports world champion in bike trials to filmmaker, animator, editor, typolover, sound designer, graphic and street artist, this lookback on 30 years of being creative shows so many facets of multimedia art and thus delivers something special that today is only hard to find.

The sorting of archives and preselection took more than 6 months before he handed this package over to his friend - graphic designer Laurenz Hintermayer - who was then in charge of connecting the content to an overall matching bundle in form of the book MULTIMORPHISM which will have a full impact on your imagination.

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**300 PAGES**









**30 YEARS OF WORK**





++ The Studio ++ ..... had ..... to be ++

..... painted .....





\*\*\*\*\* Stretching a vertical pixel rectangle \*\*\*\*\* from the center of the light painted sculpture \*\*\*\*\*

During my research experiments with a Polaroid Lab printer, I developed a digital-analog transfer technique, so any digital image could become a real and unique artwork print.

After a light painting photo session in my studio where a huge scale typographic styrofoam sculpture was the core of the setup, I had many cool shots from different perspectives.

I first started to extract a single vertical long pixel rectangle to grab the colors of the photo and use it as a stretched backdrop as graphic remix in Photoshop. During this process I also turned the original photo into black and white and stored it for another conversion - the Polaroid transfer technique.

I found a way of extracting the gel film of a polaroid photo-print to transfer the digital image to a non-digital medium, in this case watercolor paper. The process is quite complex and you need to follow nine steps to accomplish the mission.

- 1 Take a photo and transfer it to your cellphones camera roll.
- 2 Load this picture into the Polaroid app and print it out via the Polaroid Lab printer.
- 3 Let it expose and cut out the printed picture with a scissor.
- 4 Take two dishes for extracting the gel film.
- 5 Put the print into the first dish and pour hot water over it.
- 6 The print will divide into 3 parts: the plastic foil on top can be erased after 2 minutes.
- 7 Then again, pour more water over the leftover gel-print. It then will slowly crumble and divide itself from the white paper. You can carefully remove the parts that are still stuck on with a brush. Once its completely divided, you transfer it with the brush to the second dish.
- 8 The second dish has to be filled with cold water. First drag the watercolor paper into it and let it get wet.
- 9 Use the brush to arrange the gel-film on top of the water-flooded paper and carefully stroke the film in the directions that the image gets back to its original size.

All this is taking about 30 minutes until you can drag the print on paper out of the second dish and let it dry. Be aware that this only works with Polaroid 600 films. When using Polaroid 600 color films, mirror your picture before the entire process, as the divided gel-film has a milk-coated surface on top. So in the transfer process you will use the backside of the film to be on top. With black and white films you go straight ahead forward without mirroring, as there is no coated layer on top of the extracted gel-film.





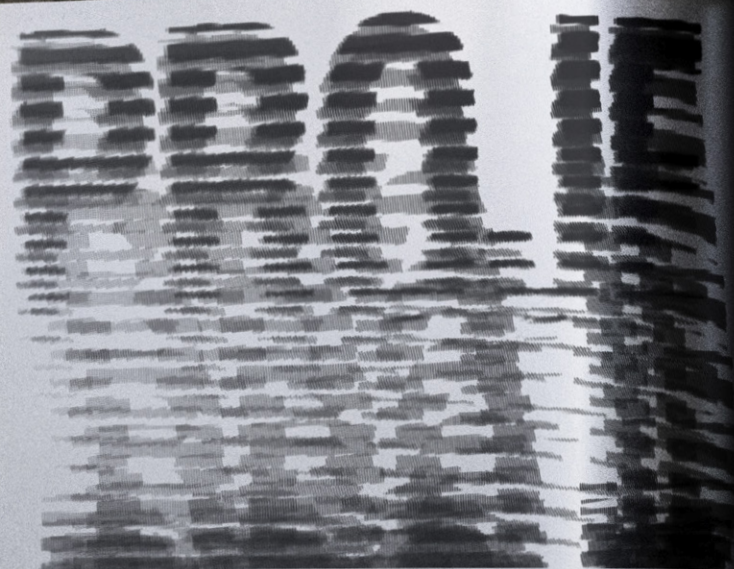
\*\* The A sculpture is a typographic styrofoam prototype \*\*\*\*\* 1.4m height \*\*\*\*\*

You could say that my career always felt like a roller-coaster that's on the edge of explosion. In the predigital aera, Graffiti was happening in the streets and only the local scene or travelling, magazines and documentaries on VHS were giving you access to this niche. Back in Hamburg towards the 1990s, post stickers were a cheap and easy way to communicate with the city. Tons of characters spit out of my hands and it was fun to go out and just stick them everywhere.

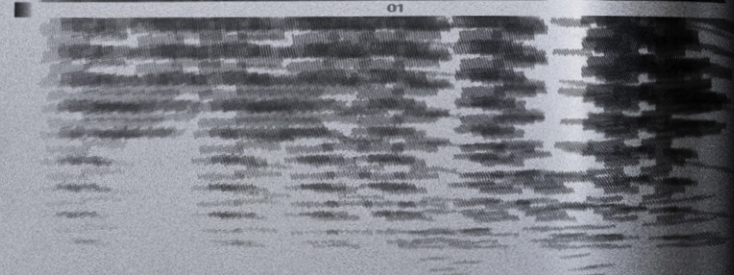
In 1996 I began training as an advertising salesman at the renowned Hamburg agency Jung von Matt but I found out that the so called "creative industries" didn't work out for me as I wanted to be more creative for myself than just for others. That's why fashion-design caught my attention and I jumped on the train of studying fashion-design for the next four years. As a result, I immersed myself in the computer world again, learned self-taught tools such as Corel, Photoshop, Flash and Premiere to develop my own illustrations and graphics. And it didn't take long when I was commissioned by a design scout to create shirt designs with graffiti for an inhouse fashion line of the Otto catalog. Looking back, that was a kind of strange job, where you got photos with new designs from fashion fairs and you had to deliver graphics in the same style. The task was clearly defined: exactly the same - just different. I was a Copycat, but as it was well paid and trained my computer skills, it was okay for me.

In the same time I also dived deep into the streetart and graffiti scene and my characters and typobased sketches and ideas improved over the time. When I finished my studies in 2002 I made myself a gift with a trip to New York. I had this idea in mind to bring out a book about all the different styles of graffiti and streetart. That's why I met Seen for an interview and Faile in his tiny apartment in NY. You can imagine that I came back with tons of photos, but when one of my hard-drives died, that idea got stucked in the unaccessible nowhere. And my move to Berlin was also changing the direction.

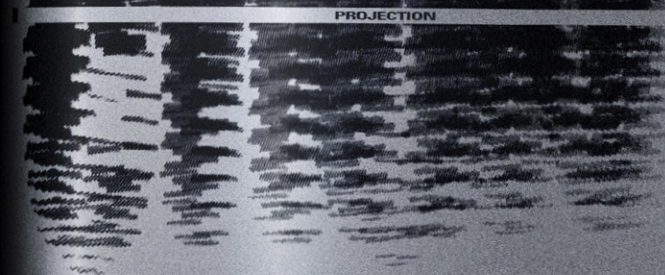




01



PROJECTION



OMF





\*\* The A sculpture is a typographic styrofoam prototype \*\*\*\*\* 1,4m height \*\*\*\*\*

Armed with camera, tripod, remote control, torches, blades, Led-Strips or customized lighting tools, you can use any urban space as canvas, as long as it's kind of dark. Light painting goes back to the early days of photography with the first official light painted photo taken back in 1889 by Etienne-Jules Marey (Fr) and Georges Demeny. Over the past century this longtime exposure technique was used by wellknown artists such as Man Ray, Gjon Mili, Picasso or Eric Staller. And with the rise of digital photography an entire new scene popped up and I'm part of this since 2003. Now working with a certain technique for more than two decades is cool but in the same time also challenging to keep motivation up - and finding new challenges takes time. I guess I've tried out pretty much of the existing techniques and today the topic comes back on my table in waves. As long as you don't have to make a living out of it, it's becoming like a tool that I can use, it only has to fit to the concept.

On this journey my first highlight was a print publication with a light painted fashion series published in the Streetwear Today magazine back in 2005, followed up by a solo exhibition at the Carhartt Flagshipstore in Berlin Mitte.

At that time Berlin had so many great abandoned spots and I loved to play with the urban space to create virtual graffiti with light strokes and letters, but also inventing things like Honk - a character which I developed from an old tape machine - was becoming a returning element in my work.

Over the years I published my photos in international magazines, was part of group and solo-exhibitions and taught light painting beginner courses, held workshops and lectures at Universities, Festivals and Museums such as the Ars Electronica Center or my 20 years-best-of-presentation at the Design Friends symposium in Luxembourg.

And it also was at the Ars Electronica Festival where I connected with Prof. Braumann who runs the robotic laboratory at the University of Arts in Linz. As industrial robots were always on my wishlist, we joined forces and developed the light painting robot as installation and for the opening show of the first "Creative Robotics" exhibition at the AEC. The Kuka robot was armed with a programmable pixelstick and performed a recorded choreography which was moving the blinking Led-strip while a camera filmed the setup and transferred the movement in realtime into light painting animations on the 8k screen of the Deepspace theatre to show the audience what normally remained hidden for the viewer.

But also simple techniques have power: like working with a roll of waxed paper inside an empty aquarium or filling a dish with liquid glyzerine, blowing air into it with a straw and use a stencil flash can create otherworldly images. Like this I created a negative stencil reflection of an ABC slide which I stuck to a flash that was then exposing the image on the surface of a single soapbubble and produced the smallest nonpermanent light painted ABC on liquid soap.

And when I go outside, I capture the spots that trigger my inner child. Keeping a collection of those spots on my phone helps me getting back there once I have a new idea ready for a shooting.

And some of the actions are still funny today: I remember being out at Nordbahnhof on the eastside wall doing some light painting experiments when two cops came by and wanted to bust me for illegal graffiti. As I only



had torches in my backpack and the camera, I could convince them that all things were legal and when I showed them the results, they were astonished of my nighttime action.

During my Tokyo residency I crawled on the streets to repaint streetsigns - if someone saw me like that, they might have thought a key or I lost my contact lens. The cool thing about this technique is that you can practise it almost everywhere, either on your own or together with friends and a session easily ends up with hundreds of new photos, so the harddrives still keep growing.

Years later I remember a rainy night when I couldn't sleep. So I went to an empty parking slot with my car and attached an LED HulaHoop to the top of the roof. I placed the tripod next to the car and triggered the camera on bulb mode threw the window, now starting to drive a long U-turn and come back to the origin without crashing into the tripod. A tricky one when you are on your own.

Conceptually I'm not setting limits to the styles and once I've found something now, I first start with deeper research to find solutions that could work out. The connection between access to new tools and the knowledge base I collected from all my past experiments is the essential part for new inventions. E.g. the AxiDraw penplotter is such a thing. After using it for vector illustrations in the first year, I asked a friend of mine to build a customized touchsensitive fiberglass pen. The plotter was mounted on a glass table so I could capture the printing process in the darkness by taking the photo from underneath. These crossmedial ideas is exactly what I like to explore.

Having said that, let's take a closer look on the HOL-OPAINTER project, which is an extended reality (XR) concept that I developed to combine different techniques to create XR light painting:

I always wanted to merge fiction and reality in realtime and the Holopainter allows me to work bi-directional between CG graphics and real photos taken in urban surrounding.

Let me give you an example: I worked on a calligraphy, a half circled typographical shape, which I then rebuilt in 3D. Now that this 3D model is on my desktop, how could I transfer this into a real urban environment photo? A pixelstick (programmable LED strip) would allow me a 2D transfer of a digital picture in a light painting photo, but it's not really 3D. So I had to dig a bit deeper to create a solution that works different. It took me lots of testing and experiments and based on my experiments in 3D animation, mapping projection and light painting, I built a customized rollable backprojection screen that allows me to transfer animations into real space. The resulting hologram-like image is created by using cross-section animations combined with movement, all captured in a longtime-exposure which enables an interdisciplinary approach to create a new XR light painting experience.

But first things first: In 2009 it was Keez Duyves from Pipalab (NL) who showed me an experiment on a portable playstation screen, playing back a crosssection animation of a Concorde plane that simply by the movement resulted in a little floating 3D object in the long exposed photo. So originally, this was the initial trigger. A couple of years later, I made my own studio-tests with a rolling TFT screen that played back 2D and 3D graphics which I moved towards the camera, but I knew I had to develop something bigger that also works outdoors - so, only 13 years later I picked up this input again with the Hol-

opainter project - which finally was realizable with a funding by the Cultural Ministry of Upper Austria. The entire project itself wasn't difficult for me, as I had a precise idea in mind, but all the technical ingredients needed their time to become affordable.

I constructed a rebuildable base for the shortthrow projector and the backprojection-screen, both built on rolls of inline-skates with a distance of 2.5m from projector to screen to cover the entire screensize of 2.4m x 1.8m. Another difficulty was finding the right matching power-supply - an E-powerstation that delivers enough power for several hours for projector and laptop. I first worked with a car-battery but it didn't last long enough. With the Jackery Explorer 2000 I found a powerstation that was a perfect match between size, weight and power. This E-battery is placed next to the shortthrow-projector and my laptop easily fits on top.

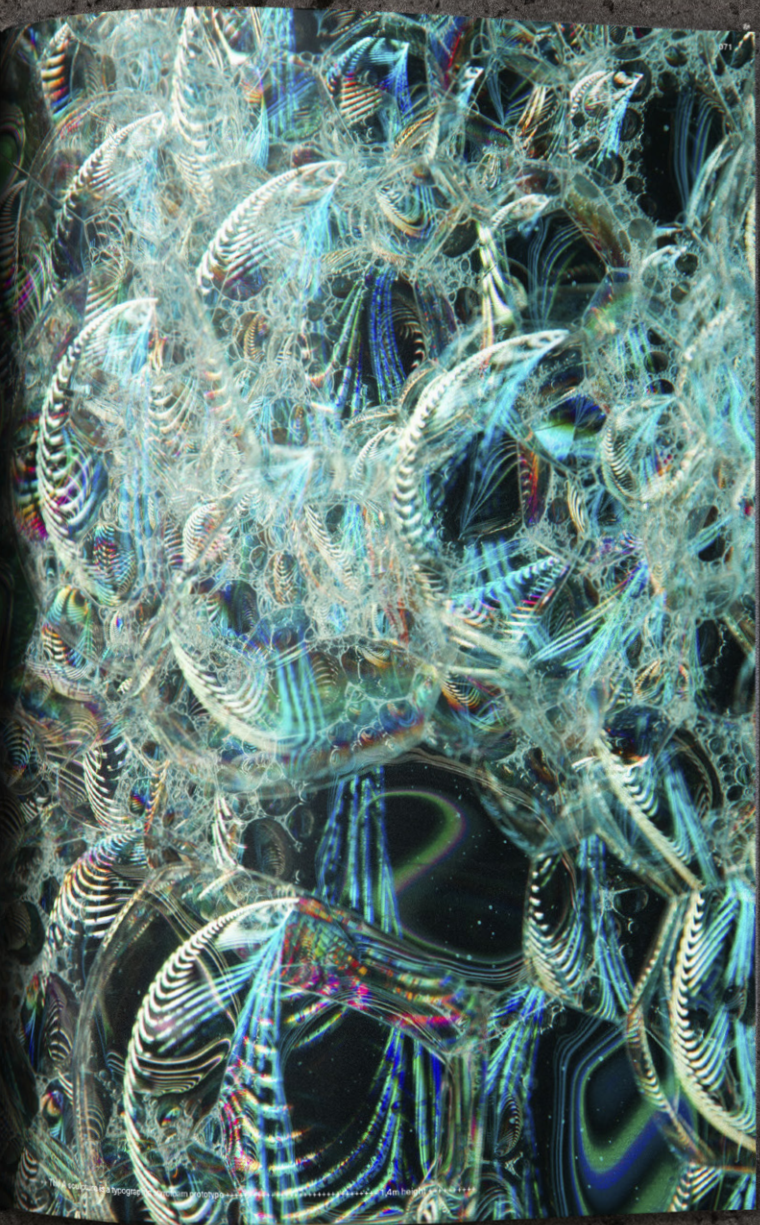
On the software side I work with Madmapper which allows me to experiment in various directions while making changes on the fly. In the software I can either use a 3D Obj file which I can position and map with generative animations like lines or colored textures or I simply use pre-rendered animation loops, gifs or simply stills. The advantage of the software is its realtime user-friendliness: I can loop, crop, strobe multiply or mask any content, so it's a me defining exactly what is screened for how long, where and in which color. The animation is a tricky beast, as it easily can burn out the entire picture if it's showing too much. So basically it works best with simply showing a line crossing over an object all screened borderless on black background.

If you work with a crosssection animation (like scanning throw a 3D object), the biggest problem is the permanent visibility of the front and the backside of a 3D object in the final photo, always depending on what you want to be seen... but if I take an obj file, I can position the perspective and simply let a single thin line run over it without showing its backside. Like this the 3d model gets visible as perspective floating object inside the projection.

And also the ping-pong idea behind this workflow is not only resulting in new light painting artworks, the re-digitalisation and re-defragmentation of the light painted results is also bringing another exciting inspirational level into the game of 3D animations and VFX. And once the first session was over, I immediately knew that the results are different to other light painted art, opening a different chapter between digital and analog experimental, which I really like.

And there's another aspect which I really like about this concept: today people encapsulate themselves in digital worlds and completely lose the sense of time, communication and the present.

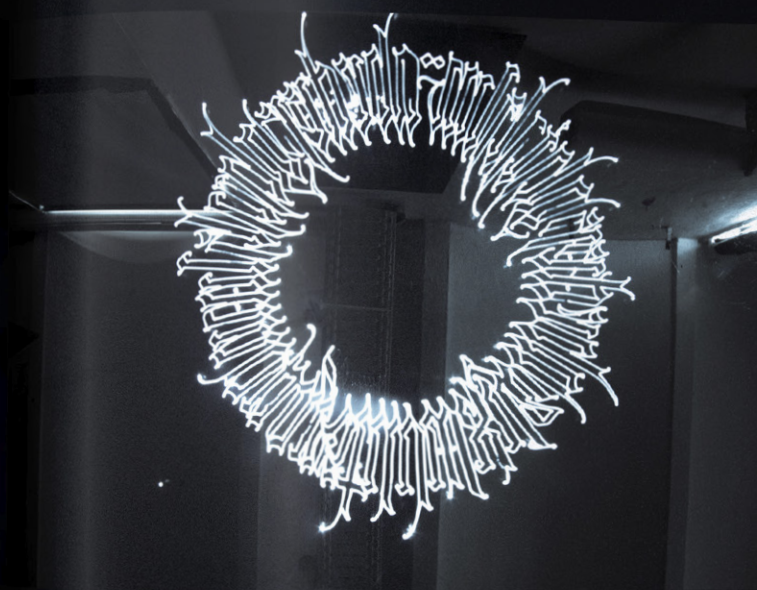
This tool opens new possibilities for interaction and immersive art, where users can interact, while allowing to break out of the purely digital world to create multimedia art based on artistic freedom.















\*\* The A sculpture is a typographic styrofoam prototype \*\*\*\*\* 1,4m height \*\*\*\*\*

Coming from graffiti sketches to calligraphy is putting the core of handlettering on the table. The aspect of irreversible lines by drawing with a ink or a ballpen helps improving your own routine.

My sketchbooks vary from the early days focus on characters and toons to later ABCs and abstract calligraphy and a vacation trip where the computer stays home is also another great experience to focus on typography or abstract shapes.

Having the sketchbook besides the computerwork is calming and a great way to become better in visualization. The mix of working with analog tools and digital ones like Procreate allows me the combination of different medias and reeditis in remix sessions to improve what I have in mind.

Conceptually the calligraphy series are mostly done with a 6mm calligraphy pen and the thing I like most is the changeover from one ink cartridge color to another. Those fading colors create an unrepeatable fusion. You can also simulate this process by adding different color with a pipette onto the blade while writing or create stunning highlights. Sometimes I start with two or three long thin lines by using the small and sharp side of the blade. These lines can be used to interact between positive and negative shapes and to find a balance between left and right side of the line.

When a sketchbook is complete, I go throw the pages armed with my punch to mark everyone I like and if I would use the output in single frames the exhibition space would have to be huge. That's why I invented an analog spinner based on the odes of a sucking pig skewer where two sketchbooks are mounted onto the skewer so the viewer can spin and stipulate the opening pages and each time a different drawing will pop up.

From time to time I also scan some of the results and throw them into the vectorization process to rework on the calligraphy in 3D and combine it with animation effects or in mapping projections.

The diversity of handlettering or abstract calligraphy is a nice counterpart to the digital work-life-balance and the results speak for themselves.



When I started working at the legendary nightclub Tresor in Berlin it was just before its reopening in a new location. The former power plant station called Kraftwerk was waiting there just like an unpolished diamond.

Within the seven years I had the chance to collaborate with a great team and also found my partners in projection mapping and lighting - and that's where our mapping and lighting company The Core, came to live.

I started with a sponsorship by Carlsberg, reliable for the streetart wall designs. With the integration of our own 360° visual playground at Globus floor and the puristic techno related Tresor floor in the vault, there were already more than 20.000sqm to cope with.

Over the next years I became responsible for the entire media archive, including graphic design, webdevelopment, corporate identity and visual installations and also had the chance to work on documentaries, international artist collaborations and exchanges, audiovisual workshops and also cover artworks for the inhouse techno label Tresor Records.

We created our own audiovisual laboratory at Schaltraum, the control center of Kraftwerk and made also a screen-printing laboratory to produce the merchandise for the clubs merch-shop.

The multi-skill request that came with this job had the positive effect of working not only on the computer, but also designing, painting and constructing new style-elements inside the club.

The work was an inspirational source with the permanent challenge of time and budgets, but it was great to see the evolution from point zero to where it is today, just like the brands claim says: IT'S NOT OVER.



\*\* The process of detachment of a Polaroid 800 film creates an artwork in itself \*\*\*\*\*





\*\* The A sculpture is a typographic styrofoam prototype \*\*\*\*\* 1m height \*\*\*\*\*



















**MULTIMORPHISM.COM**

**300 PAGES**

**10 CHAPTERS**

**10 TUTORIAL PROJECTS**

**SPOT COLOR CHROME/SILVER PAGES**

**MAPPING PROJECTION**

**CALLIGRAPHY**

**PENPLOTTER ART**

**POLAROID TRANSFERS**

**LIGHT PAINTING**

**SPIROGRAPHY**

**STREET ART**

**TRESOR ART**

**GRFX**

**3D ART**

**XR AI ART**

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