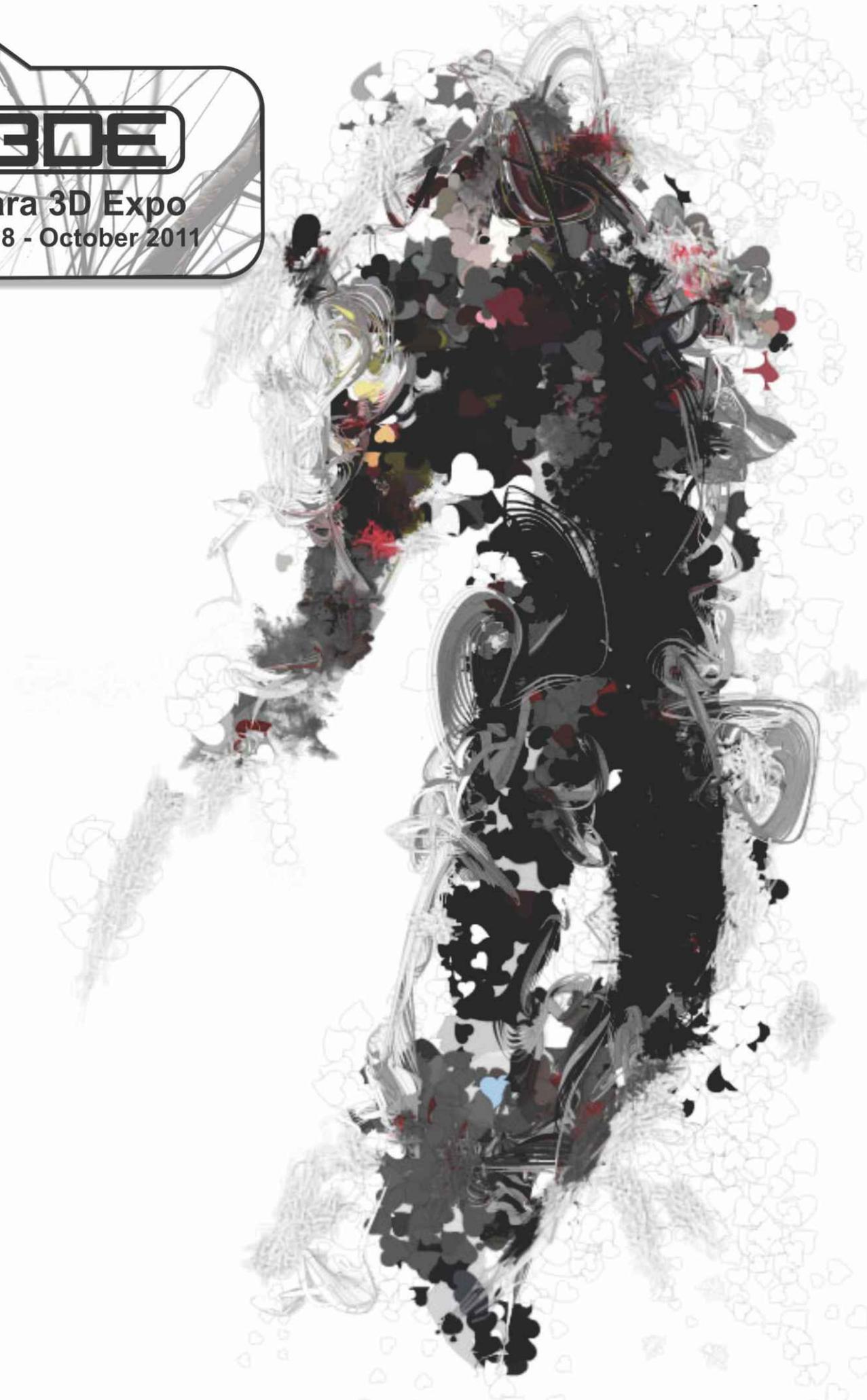


**C3DE**  
Carrara 3D Expo  
Issue 08 - October 2011

The logo is contained within a rounded rectangular frame with a decorative, web-like pattern in the background.

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# Welcome to the best of Carrara

Carrara 3D Expo is the creativity of Carrara users gone wild! It is an inspiration that never ends. Carrara is a wonderful tool that enables the creative ideas fly. And we at C3DE are here to show you that Carrara is no joke - it is a tool designed to be loved by 3D artists!



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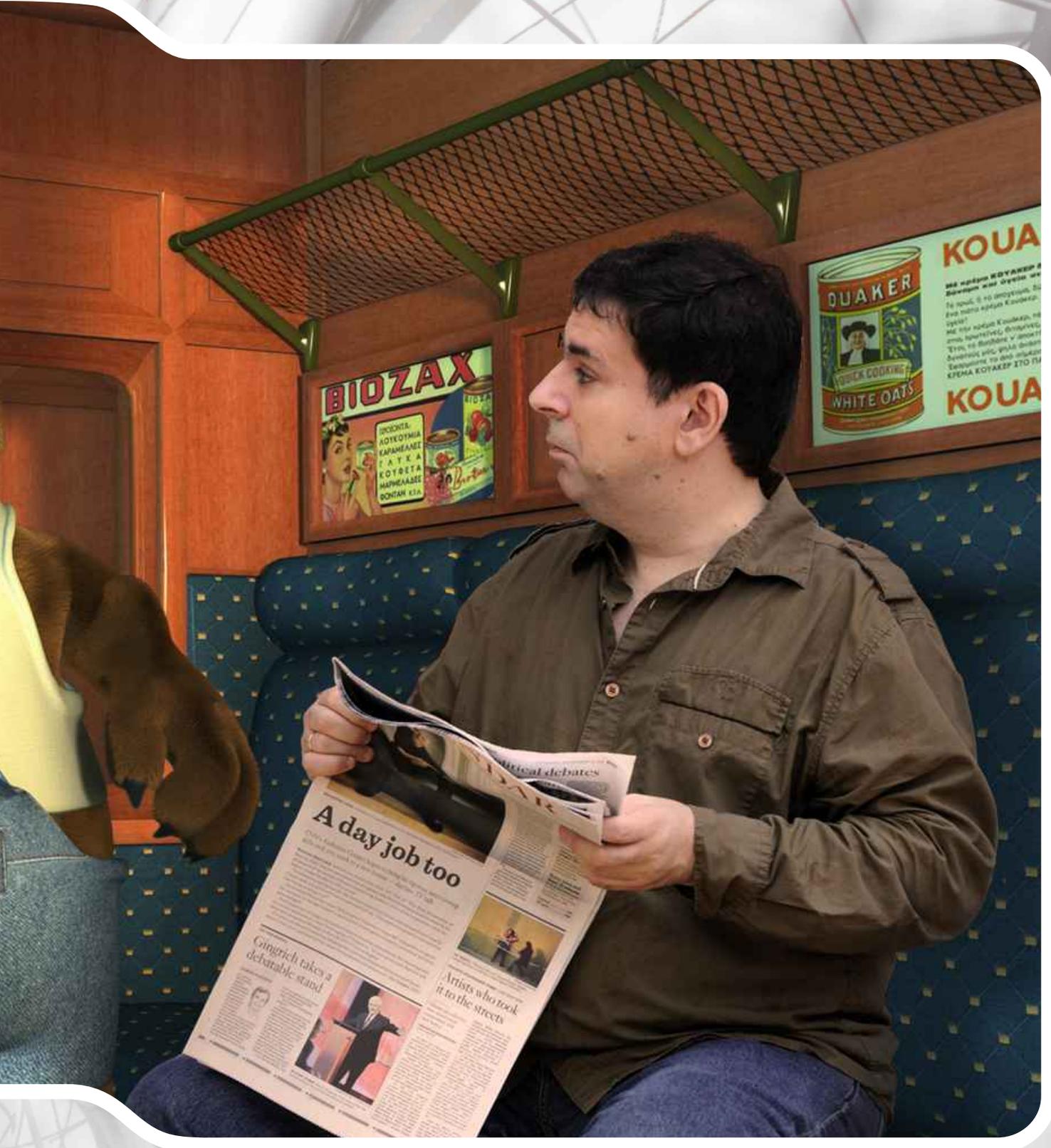
Micheal Mathews, Jeffrey Linn, David Collins, Behzad Jamshidi. KarmaComposer, Carrara Lounge ([www.carraralounge.com](http://www.carraralounge.com)), The fine folks at DAZ, Charles Brissart, Pierre-Sylvain Desse, Eric Kwong, Ronen Lev, Pallavi Mangalvedkar, Steve Kondris, Chad Smith, Rob Whisenant, Craig Randal, Denise Tyler, Sparrowhawke3D, Inagoni, DCG, Shoestring Shaders, Fenric, Frederic Ribble, [www.thebest3d.com](http://www.thebest3d.com), everyone who supported the e-zine and everyone else who helps to keep Carrara alive!

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**Nassos Vakalis interviewed:**  
**Human Nature**





Nassos Vakalis, it's a pleasure to welcome you once again to the pages of Carrara 3D Expo. You've been quite busy since the last time you visited with us. Your animated short 'Human Nature' is creating quite a stir in the DAZ Carrara forum as well as getting invitations from film festivals around the world.

A professional quality animation done in Carrara. Outstanding!

I've watched your video several times now and each time, I am amazed. The unexpected ending just makes me want to watch it again. What sort of feedback have you been getting from the film festival crowd?

I have sent the film to a number of USA and International festivals and I did get into a few of them. Still I have not received any awards but generally there was a positive feedback from many industry people who seen it in it's premier at the Dreamworks studios last year. Everyone liked the story and found it unpredictable as you said and also many thought it was created in Maya or something of that caliber. Many people commented positive on the music too, which was done by Kostas Christides an acclaimed Hollywood composer with credits in films like "Spiderman 3", "The Priest" and "Ghost Rider". But I also send it to a festival called aniMazspot, which was taking place here in Los Angeles, where you get a personalized feed back from the judges. Some thought the ending was very predictable. So I guess you can't please everyone. Nevertheless I still have to hear from a lot more festivals so if there are any developments or awards I would let you and the Carrara forums know about it. It is going to be good publicity for Carrara.

I have had some experience with film making and animated visual projects, and I know preproduction is very important when creating any film project. In an interview in issue 04 of C3DE, you revealed that Carrara is very helpful for storyboarding. Could you share with us your preproduction process for 'Human Nature' and how Carrara was a part of that process?

Carrara is my choice of software for pre-visualizing sequences for the movies I work on professionally. It's easy to use interface and flexibility makes it a wonderful tool choice for such work. One of the great features is the animation paths were I use to attach my camera and create more interesting camera moves and compositions. Human Nature had a smaller preproduction time so I didn't board the story using Carrara. It was a very simple and straightforward story so I did small little thumbnail drawings in my tablet and edited them together in Adobe Premier. When I was pleased with that outcome I started building the scenes in Carrara. Here is the trick though, I wanted to be able to do everything or at least 90% of the work within Carrara so my choice was to find or build content that was Carrara compatible. I was not interested to spend time building complex models and characters because I didn't had the time to do so and what challenges me more is to tell the story than building the assets. I looked over all-available content in DAZ and other vendors and found different stuff that could work with my storyline and characters. I was pretty lucky to find the animal characters and the compartment in DAZ marketplace. I bought them and run some tests. They worked great. The rest of the content was found in DAZ, renderosity and other vendors. What I could not find I end up building myself from scratch.



There is an ongoing debate as to whether Carrara is a suitable tool for animation. Since you have created your animated short in Carrara, you are more than qualified to give your opinion on this. How did Carrara perform for you as an animation tool?

Carrara has many great tools and definitely animation is not an exception. I don't claim that the process was not frustration though. So I will start by listing some of the problems I encounter and then mentioned what worked great for me. First I bought a MAC computer just for this movie and I found that in general Carrara was not running at my new MAC as well as it was in a PC. So this might have been one of the frustrating issues in general, but the most frustrating issue with the animation was the IK target system. It is not working as well as I was expecting. It seemed very hard to keep feet or hands locked in a place. I guess someone could have been able to fix most off these problems with a new rig but that was beyond my goals or even technical knowledge so I tried to work around most off these kind of problems many times trough trial and error. On the positive side I found the manipulation of the keys and the twining curves superb, flexible and very intuitive. Some of the tricks I knew while working in other programs like Maya worked well within the Carrara graph environment and I think helped into the posing and timing of my animation which was very critical.



The scenes and models in 'Human Nature' are very detailed. Did you create your models in Carrara, or did you use premade content?

I do not consider myself a modeler and definitely not a rigger so the only models I created were the ones I could not find and buy. I wanted to have the animals from the start and immediately I found that DAZ was selling a number of cartoony characters called HEAVIES that could fit my needs. They even had a set of clothes that I could easily altered to fit my needs. I wanted though some more flexibility with the morphs so I contacted the author himself and got a quote for additional work though at the end I choose to do the extra morphs on my own. The train compartment was also a DAZ product as well as some of the props. Some other props were found in Carrara content, like the mill, and I manipulated and retextured them a bit. Some of the environments were build by me and some trees came from a Howie scene though I end up making billboards out of them since the scenes were getting too heavy. Another big problem was the opening scene with the locomotive, which was a poser model with complex working parts that failed to work right in Carrara. It did work fine in poser and DS so I studied the rig and end up re-rigging the pistons and wheels so they work right within Carrara. The most complex model I created totally on my own was the little transistor radio and it's retractable flexible antenna rig.

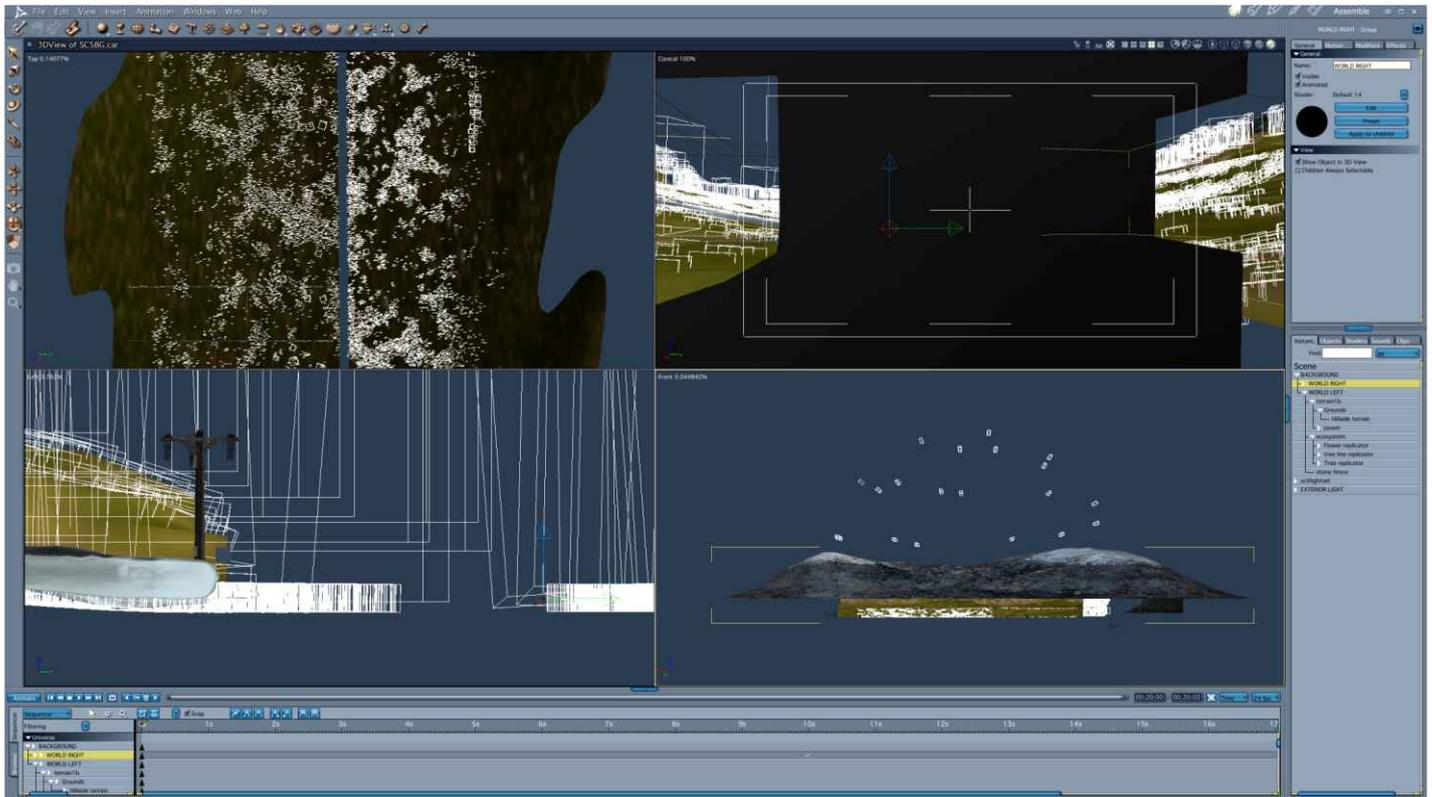
The rising smoke from the locomotive chugging through the first scene of your animation is outstanding. Was this effect created in Carrara or did you add it in post? If it was created in Carrara, please tell us the secret of how to create such convincing smoke/steam effects in Carrara.



Yes this is a totally Carrara particle effect. It is not facing camera particles but rather square object particles that oriented parallel to the camera. There are a number of different shaders involved with some running my own textures captured from stills made from the Carrara 3d clouds and sequences of similar textures in the alpha channel. One of the less noticed effects that I'm very proud off though is not the main smoke but small little puffs of smoke coming out of the piston. While studying how white train smoke looks and behaves in real nature in a youtube video I noticed that the live action train I was looking at was releasing a second smaller puff of smoke from the piston area. This looked more like a moist smoke that dissolves fast in the air with a slight upward movement. I thought it will be nice if I could add that to my scene to up the believability and it worked pretty well. So if anything else I would say the secret for creating this kind of effects is to study the real thing and try to imitate it as well as possible with the available tools.

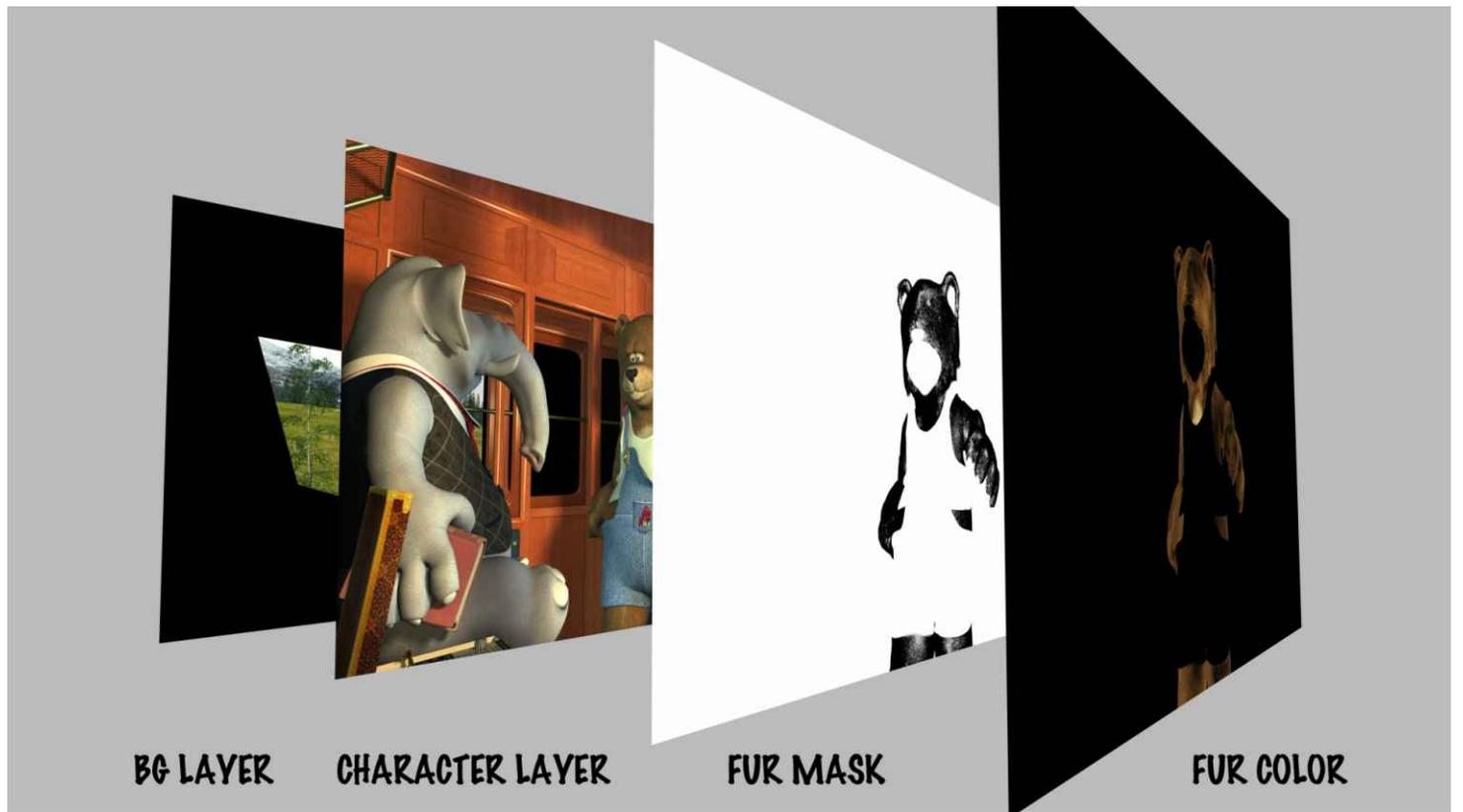






The landscape in Human Nature is outstanding. I know there are many tricks to creating background in animation: matte paintings, looping short clips, stock video footage. None of these seem to apply to 'Human Nature'. If there is looping footage, I can't detect it. How did you create the landscape for 'Human Nature'? Did you make use of any special features within Carrara in the creation of your landscape?

Well the way the landscapes was created is very simple. I created the one side in scale to the compartment model. The ground was my own creation but I used elements from an Howie scene. Some of the trees are billboards textures created from 3d tree renders and actual 3d models are used for the closer ones. The flowers were also replicated billboards after I experienced astronomical high render times with actual geometry. The far away mountain was one of the standard Carrara content mountains and shader but after doing a test render I noticed the procedural texture was boiling so I end up baking it. A light dome of spotlights lights the whole scene trying to imitate a more global lighting effect enhanced by a few more directional lights. After I finished the one side I duplicated it, made a few minor changes and flopped it around for the other side. So I had two landscapes almost touching each other with a small gap in the middle for the camera. Initially I will import the corresponding character set up with the compartment and place it at the center of the two landscapes. The compartment was attached to the camera. Then I would translate the camera and render through the camera the view outside the windows. I used a mathematical formula to figure out how many Carrara units I had to translate the camera per frame in order to achieve the speed of the train established in the opening scene.



I also had a black mask in front and very close to the camera and parented to the camera leaving unblocked an area just a bit larger than the compartment windows. Then I deleted the compartment leaving the mask to block the area of the landscape covered earlier by the compartment. This saves tons of render time. I would later, during compositing, apply motion blur to the background shake it a bit up and down to simulate the train movement and composite it with the interior compartment elements rendered as a different pass in order to create the final composite. Speaking about render time I would like to add at this point that I had a render farm assist me with the rendering of the project. I only rendered a few little things on my own system, while the big bulk of the work was done in "Small-render-farm" run by Damir Marikovic in Croatia. He received the files over the Internet and rendered the different passes sending me back the output via again Free Internet file transfer websites.

You really succeeded in giving life to your actors. Again, having some experience in the animation field, I know this can be difficult to do. Can you give us some insight into how you were able to make your characters so believable and how Carrara's features helped in the process? Also, is there some significance to the choice of bear and elephant?

Well as said earlier I found the HEAVIES perfect for what I needed. You might have not noticed but there is a third character a hippo driving the locomotive at the opening shoot. The selection of the characters fits perfect their personalities, the uptight elephant worked great against the more happy go lucky and simple minded bear. I was lucky enough that I only had a few walking scenes because it is really hard to work with the IK targets in Carrara. It was also hard to have the characters; specially the elephant lift up stuff like the book or the cigar and make it look smooth. I would not say it can't be achieved but it took me a lots of time to make it work seamlessly and many times it required the use of a duplicate object that appeared in the position where the elephant was to place the book the moment he release it while the one he was holding became invisible. This is an old trick the works pretty well in most cases. But besides all these technical problems I feel the real success with the use of these characters are their expressions. I had to create some new minor morphs but overall combining the ones available with the characters worked very well. Magnets were used to adjust the clothes when the skin was poking through or when the characters press against the compartment seats. Overall as you can see there is minimum movement to the characters, just enough to show what they are thinking or doing and a well tuned expression to show exactly what they are feeling. Some times keeping it simple is the best way to communicate something.

There are many moments in your film both subtle and not so subtle that really give life to your animation, such as the smashing of the cigarettes. What was the most challenging moment in the animation, and what tricks did you use to meet the challenge?

The most challenging moments of the animation were the moments that things were changing hands or had to be released on or picked up. This is a weakness of the Carrara IK targeting system that is not working as I was expecting. So it took me a lot of time and trial and error to get these moments work smoothly. Another challenge was the fact that the compartment I found in DAZ was not designed for the size of the HEAVIES so as you might have notice you never see the ground floor of the compartment. The compartment door was also too small for the bear to come in and out so it was cheated. As mentioned earlier magnets were used to control part of the clothes and cover pock throughs, so lots of time was spend to move these magnets around and adjust the effect. I was lucky because these methods were well documented and I found many useful info at the forums and videos at youtube solving similar problems. The biggest challenge of all was the cigarette smoke. It took the longer time trying to get the cigarette smoke working as desired, something that was finally done in post and not within Carrara.



It's impossible to miss the smoke effect in the train compartment. Did you create this effect in Carrara or in post?

I just mentioned this effect end up a post effect. There are two major post effects I used, one was the motion blur and the other was the cigar and cigarette smoke. The plug in for the smoke is called turbulance 2d and it is an after effects plug in. Thy also have a 3d plug in but it is not made to work with Carrara. Initially I tried to find a way to make this a Carrara effect but it turned out it was not possible since there are no Carrara fluid effects. Another approach was to use meatballs and some kind a Fresnel shader but I felt the outcome would not be as convincing as I wanted so I settled for the post solution. Thought Carrara has a motion blur effect it is very slow because it renders multiple frames to come out with one blurred frame so the post filter ReelSmart motion blur was used in post to simulate the same effect.



Now that you've completed 'Human Nature' using Carrara as your main tool, what are your feelings about the software in terms of animation performance as well as content creation? Would you go through the process of creating another animation with Carrara?

Carrara is a great tool and it has great potential as long as someone understands the limitations. This is not a handicap of Carrara but something artist could have in mind when they plan their films or animations. I could not expect everything I wanted to do to work within the Carrara environment and to be honest the fact that so many things worked so well including complex stuff like the bear hair or the clothing issues it is very promising. So having all these things in mind and knowing what I can do and what I could not do, I would try again to do and even challenge others to do a short film in Carrara. It is very possible and my film proves that. In order to make something longer and more complex I would say that definitely Carrara could be one of the tools but for handling anything and everything needed it needs further development. Though I have done Human Nature using C7.2 I found C8 very unstable at my MAC environment. It crashes very often and seems to have more bugs than any previous version so I would wait till DAZ fixes at least some of the stability issues before undertaking a bigger project.

Lastly, do you have any advice for budding script writers and animators?

One of the most important things I have learned over the years in this business is that the core of the business is story and character. If you don't have these elements then you have nothing. Yes, you might be able to do individual effects or beauty scenes but if you want to make films you must be able to tell a story. This is where the focus of the younger artists should be.

Thank you very much for your time and good luck on the festival circuit!





### FESTIVAL SCREENINGS

- 6th Animfest in Athens Greece
- 15th Cartoons on the Bay in Italy
- California International Animation Festival in USA
- 17th Film Festival della Lessinia in Italy
- 8th Neum Animated Film Festival in Bosnia & Herzegovina
- 5th Digi2011 in Drama Greece

### Receives Honorable Distinction

- 4th Animasyros in Syros in Greece
- 6th Pentedattilo Film Festival in Italy
- Monza Motor Film Festival 2011 in Italy
- 1st Greek Film Fest Chicago! in USA
- 6th Cyprus International Film Festival 2011 in Cyprus
- 11th Golden Kuker in Bulgaria



#### **FUTURE FESTIVAL SCREENINGS:**

- 24 hours of Nuremberg Film Festival in Germany
- 41st Roshd Film Festival in Iran
- 13th Panorama of Independent Filmmakers in Thessaloniki Greece
- 3rd Tofuzi Festival in Georgia
- 4th Annual London Greek Film Festival in UK

#### **OTHER EVENTS:**

- Premiers at the Dreamworks Animation Studios in USA
- Learning in the Dark in India
- Nord ost Art Art Event in Germany

The background of the page is a complex, abstract composition of thin, overlapping lines in white and light red, creating a sense of depth and movement. On the right side, there is a semi-transparent white rectangular area that serves as a backdrop for the text. To the far right, a portion of a colorful, multi-layered sphere is visible, with hues of purple, green, and yellow, suggesting a 3D rendered object.

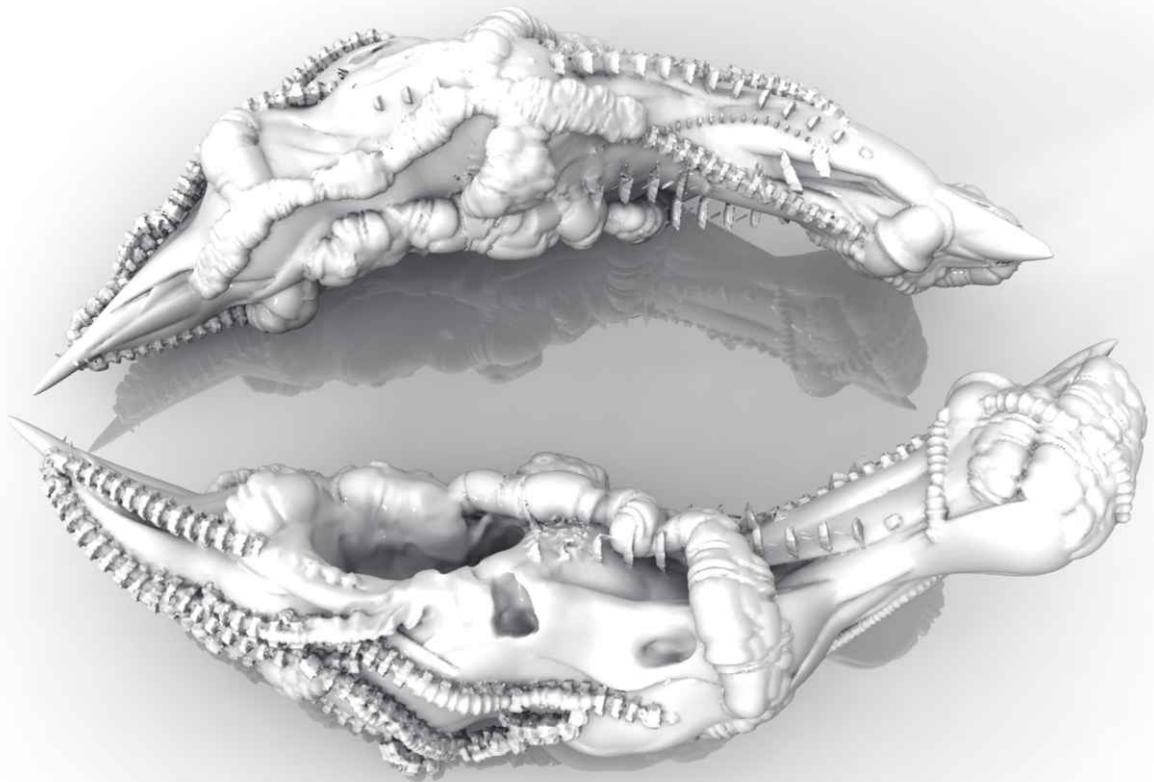
**R**obbie  
**M**ac **G**ill



**ivray**

*RS/Marking*

[www.onearmedgraphics.com](http://www.onearmedgraphics.com)

*RS MacGillivray*

Robbie MacGillivray is a Carrara artist with a unique and individual creative vision. We are fortunate to have Robbie with us for this issue of Carrara 3D Expo.

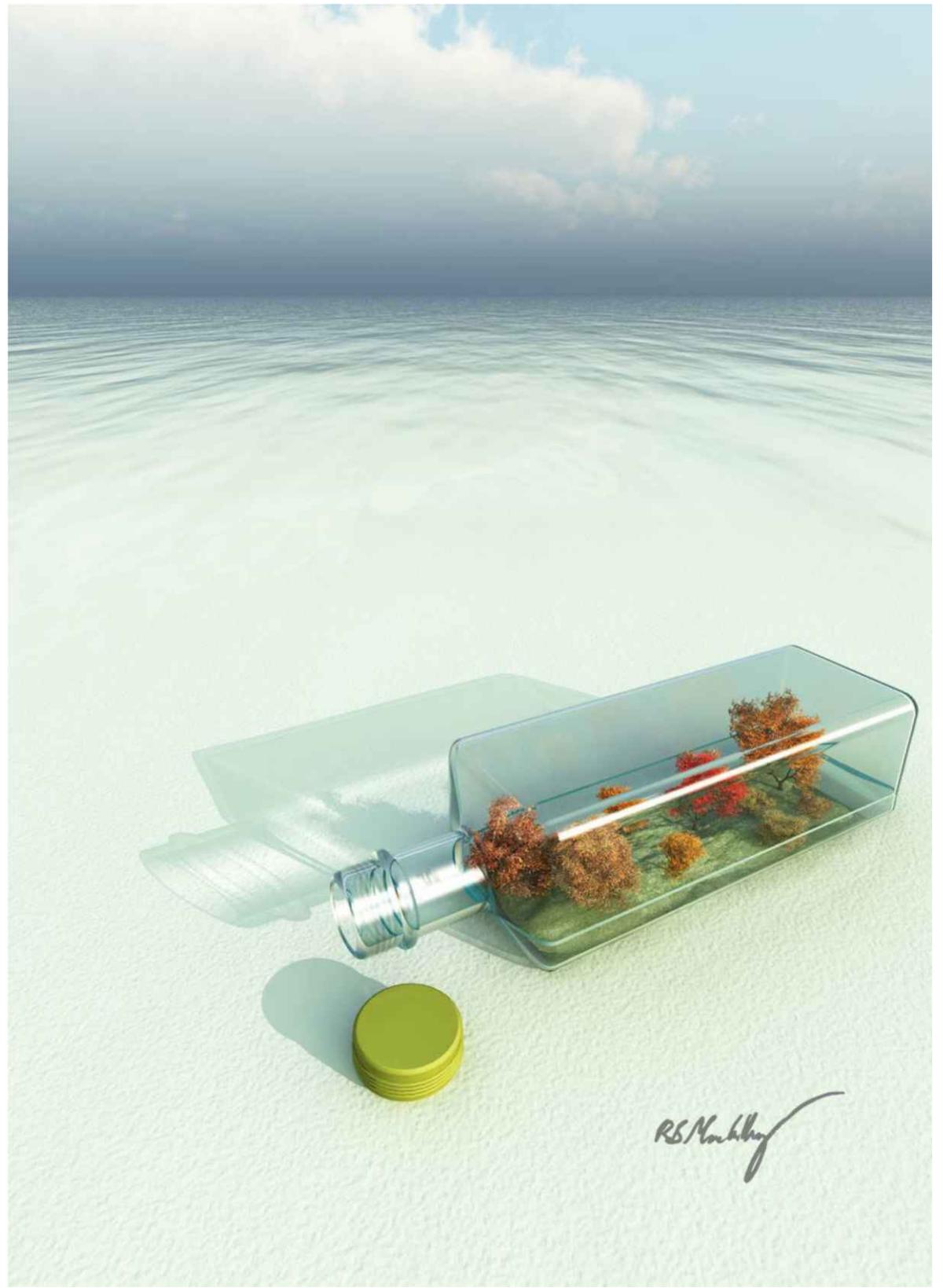
**C3DE** - Hello, Robbie! We're glad to have you here with us in the pages of C3DE. Please introduce yourself to our readers.

**R** - Hi! I'm Robbie. I'm a 38 year old Kiwi living in Brisbane, Australia. You can visit me at [www.onearmedgraphics.com](http://www.onearmedgraphics.com).

**C3DE** - Tell us how you discovered Carrara.

**R** - I started creating digital art on an Amiga 1200 way back in the day. I lost an arm in a motorbike accident in 1990 and have suffered from Chronic and Phantom Pain ever since. Art for me is definitely a 'therapy', but it does fit well with my fairly creative and abstract mind.

I discovered Carrara 5 from a cover disc. At the time, I was learning 3DS Max, and when I installed Carrara, I was gobsmacked to discover how much more user friendly it was than 3DS Max. I instantly dropped Max and have never used it again.



I work in Health Insurance, but at home, I use Carrara professionally for graphic design and some freelance work. I have a few plans in the pipelines for further work including lip-sync and court animation services.



*RS Marching*



**C3DE** - Your art is very creative to say the least. What inspires you to create such marvelous works of art?

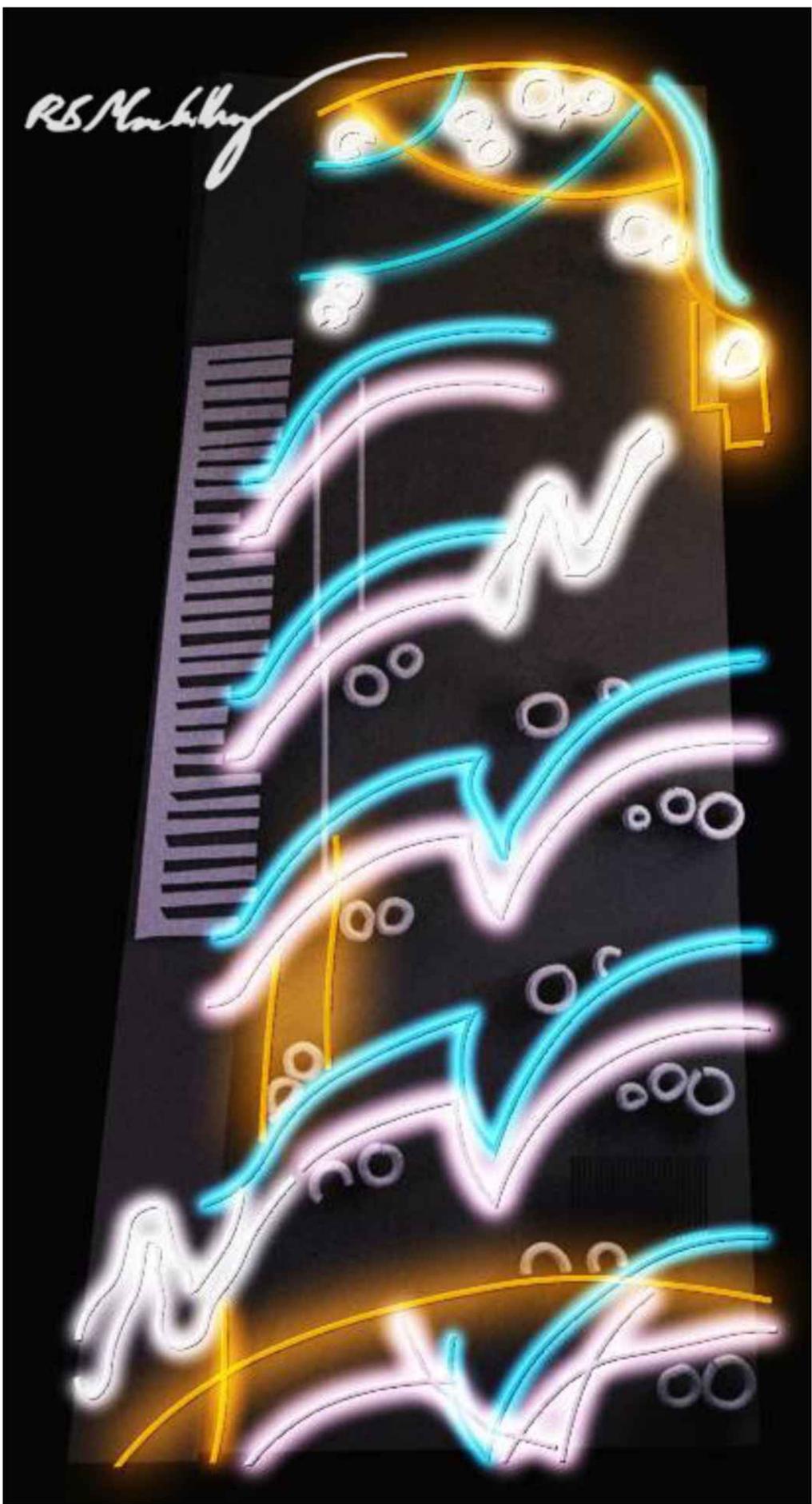
**R** - Thank you. I am more of an explorer than a craftsman. Many of my 'final' renders are a result of experimentation. I feel very lucky to have some ideas just pop into my head. Experimentation and a curious nature are healthy attributes.

I want to understand as much about the toolset as I can, and then I can be rewarded with random cool ideas for trying something new.

**C3DE** - How well does Carrara meet your artistic needs?

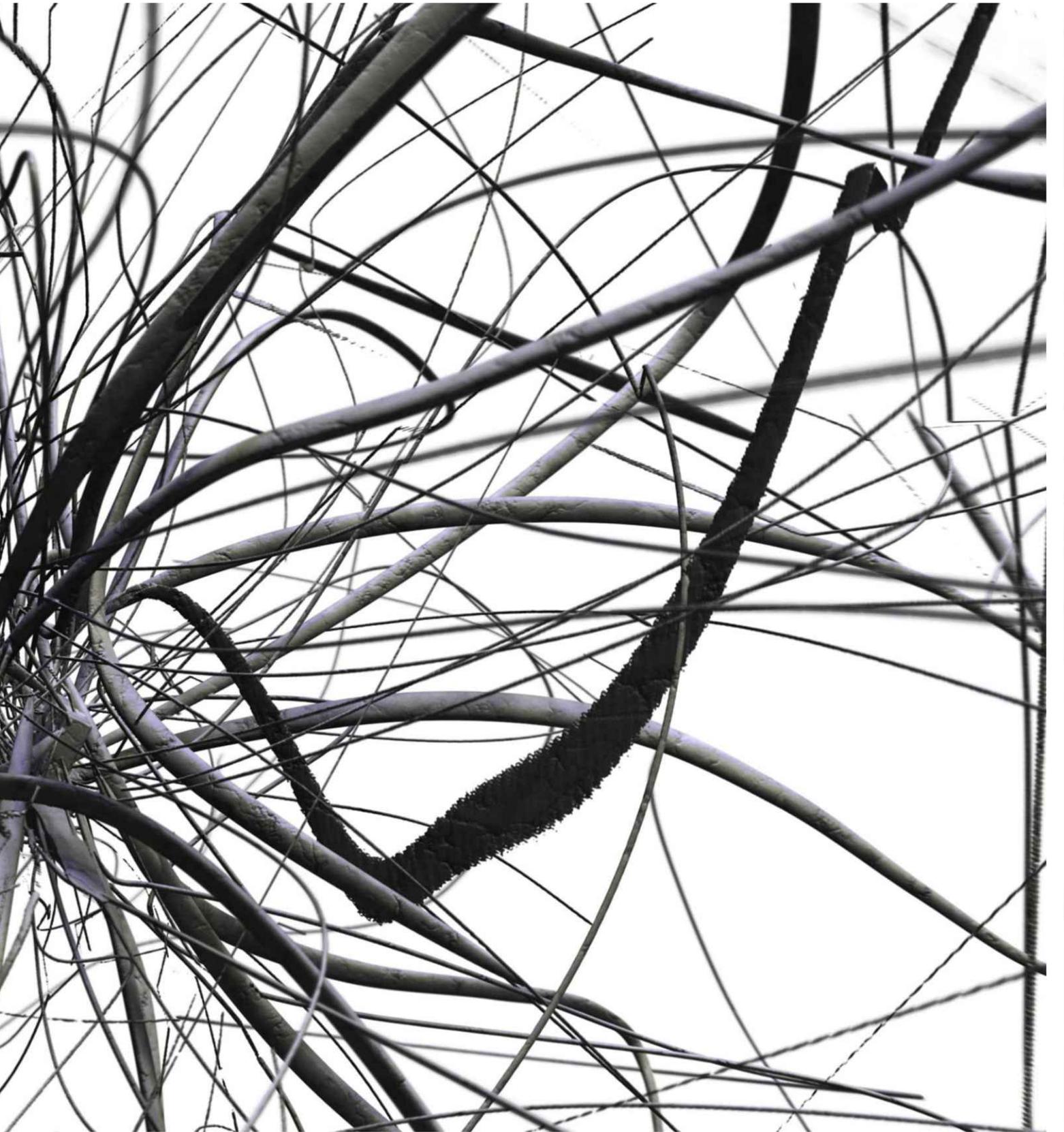
**R** - Carrara and the community have been great. I remember starting out and getting great help from the Carrara forum and this seriously helped keep my interest up. Big hugs to all you lovely peeps. I've felt a little less excited by some of the decisions the developers have made, but I'm not going to lose sleep over it.







*RS/Marking*







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**C3DE** - What other software packages do you use, and how well do they compare to Carrara?

**R** - I have Vue Infinite 6.5-8, Poser 7 and 8, Hexagon and 3D Coat.

I learned to model with Hexagon, following the excellent tutorials of EZ. I do feel much more comfortable modeling in Hexagon than in Carrara.

Vue Infinite is great for landscapes, but it is a shame that it has that dreadful flicker when animating. I am not particularly attracted to landscapes as a subject choice so, in hindsight, investing in Vue wasn't a great idea.

Poser gives me good results and is a fast renderer. It has some useful scripts like figure randomizer that makes it a valuable tool.

I like sculpting in 3D Coat. It allows for some great creative doodles. Sculptris is another great 3D sculpting tool, and it's free. 3DC has much better paint tools than Carrara.











**C3DE** - What kind of improvements would you like to see in Carrara?

**R** - I'd like to see an updated UI and file/system dialogue boxes. I hate navigating my folders because Carrara doesn't 'know' where to look. The Physics engine is awful, at least for my experiments. Any enhancements to particles would make me a happy chappy. Atmospherics are pretty awful, too.

**C3DE** - What are Carrara's strong points as a professional tool for artists?

**R** - Carrara has a very fast rendering engine, quite capable lighting models and an easy and powerful texture system. Carrara is also very efficient with system resources and is very user friendly. I can crank out a 3000px image destined for print-on-demand in 5 minutes from start to finish.

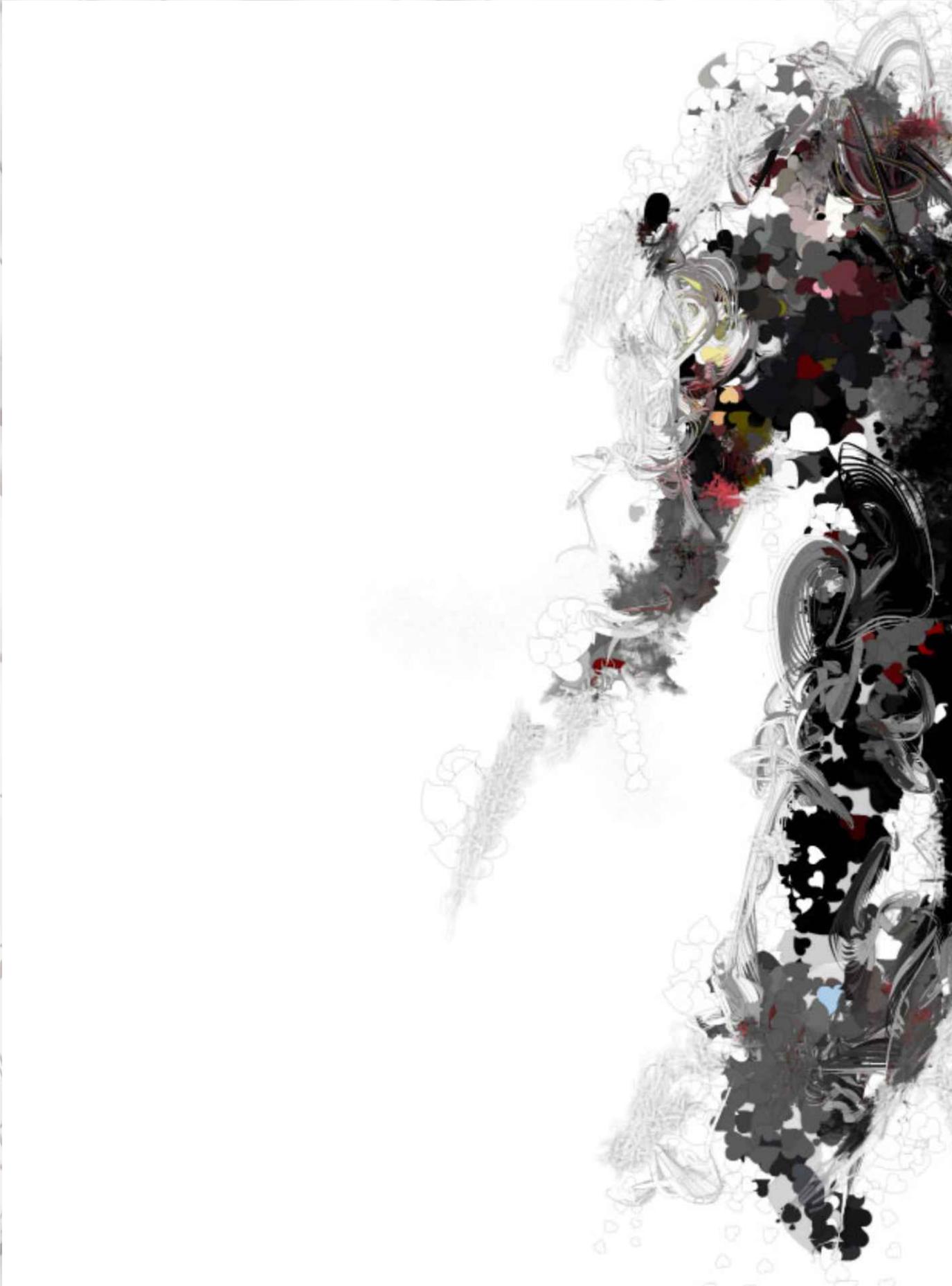


## Three Sisters

**C3DE** - Is there anything else you'd like to tell our readers?

**R** - The Carrara community is fantastic, and the efforts that people like JB put into making C3DE such an awesome resource are really amazing. I've participated less in the forums over the past year or two, but I really encourage everyone to stick together and help each other develop their creative skills.

**C3DE** - Thank you very much!





RS Moulton



# **C**arrara **T**ips & **T**ricks **T**racker **B**y **D**avid Brandy

# Adding a moon c/w reflection on the water -- Tim Payne

**Step 1** - Set up your scene and place your moon/planet where you want it to appear in the final render. Save your scene.

**Step 2** - Hide everything in your scene except the planet, turn off the sky, convert the sunlight to a distant light, reduce ambient light, and render an image. You may want to adjust the color and intensity of the distant light. This will be the Backdrop, so its dimensions should be identical to your final image.



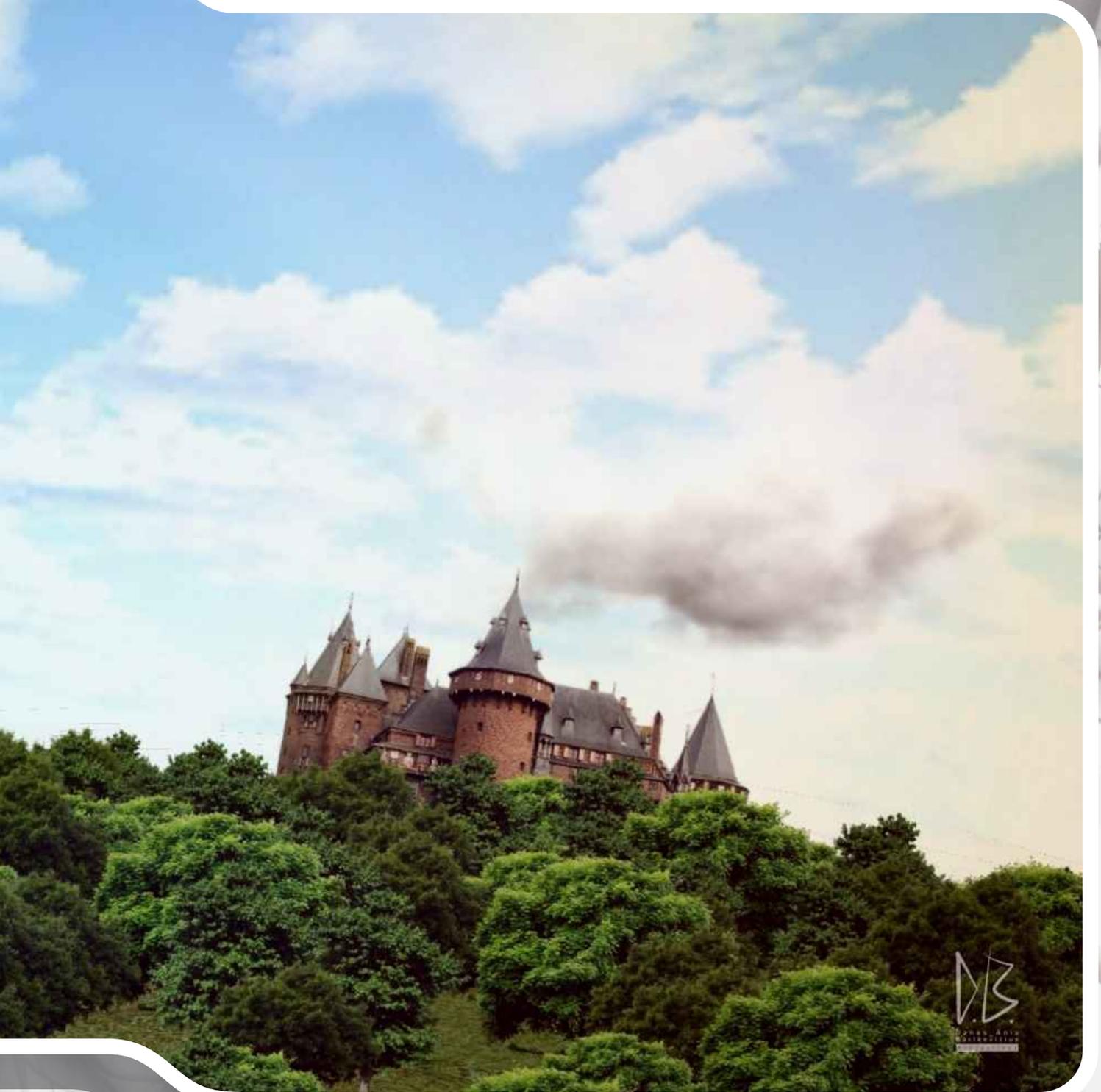
**Step 3** - Convert your camera to a Spherical camera. Leave it in exactly the same position, but set its rotation to  $x = 90$ ,  $y = 0$ ,  $z = 90$  and render a really big Background image. The smoothness and reflectivity of your water, as well as the dimensions of your final image will determine how large the background needs to be, but to prevent pixelation it probably shouldn't be any smaller than 4000x2000.

**Step 4** - Reopen your original scene. Make the planet model invisible (or delete it). Add the Background and Backdrop. The background "interpolate" setting will help to reduce pixelation in the reflection. Render your final image.





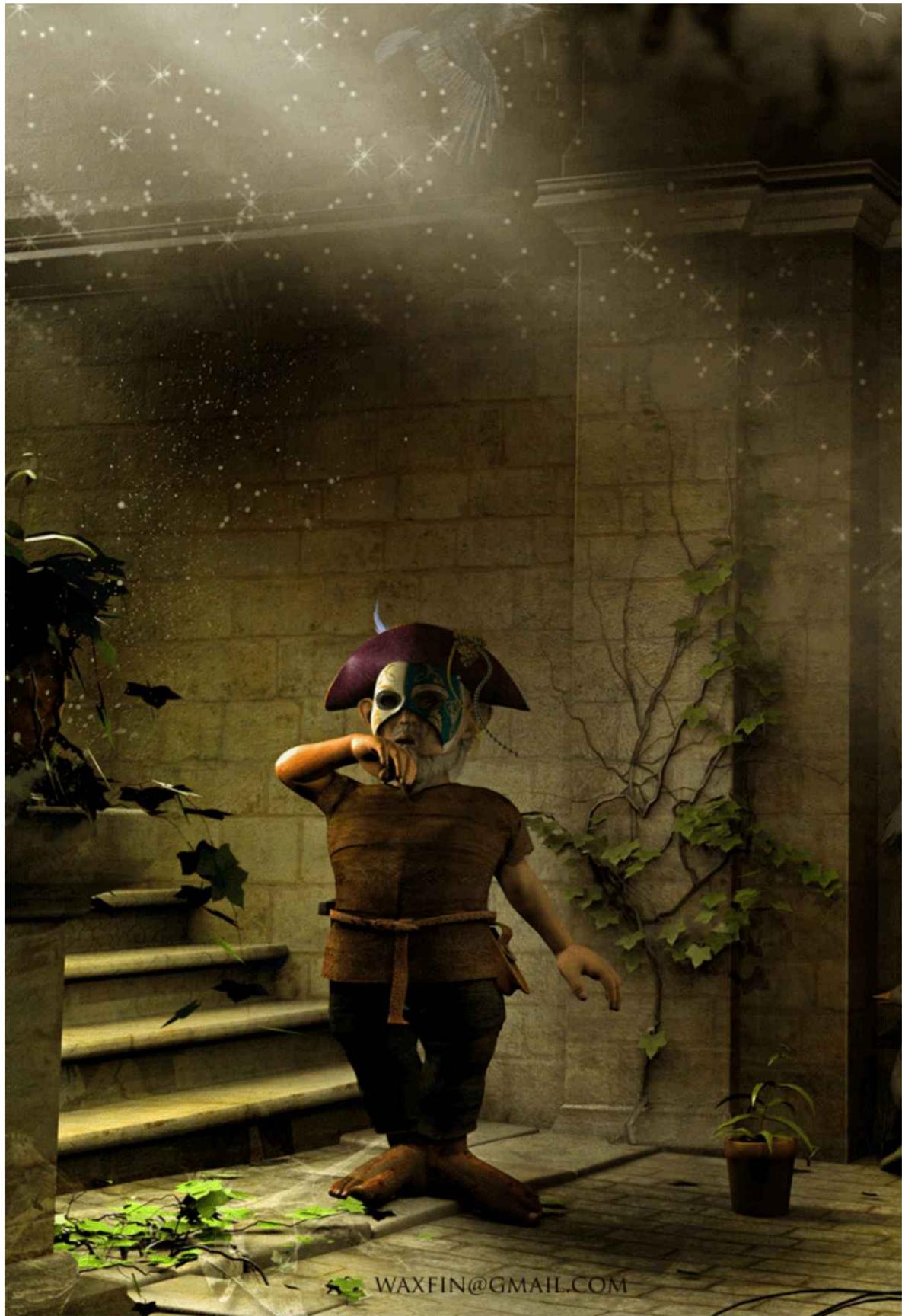
# Carrara 3D



# Art Gallery

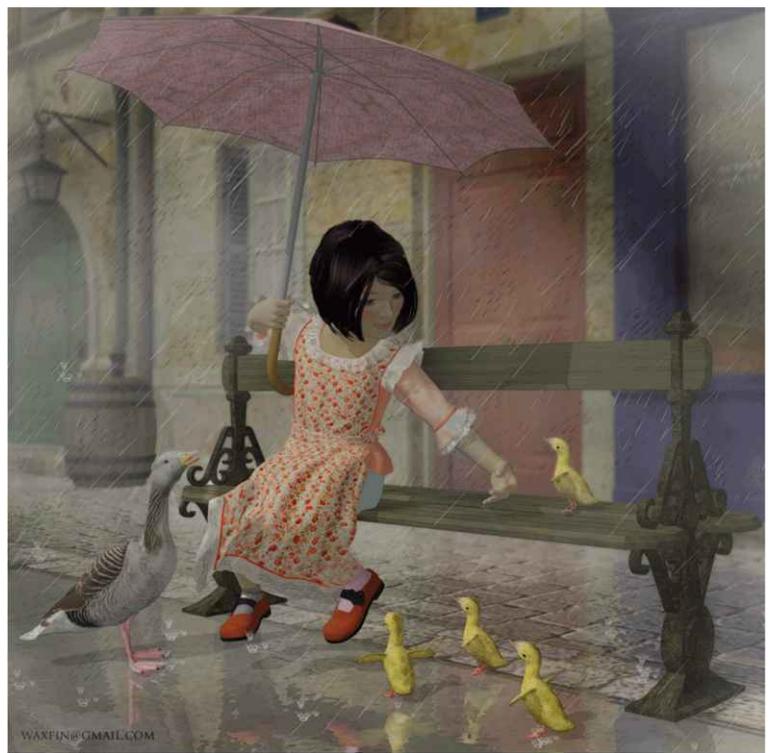
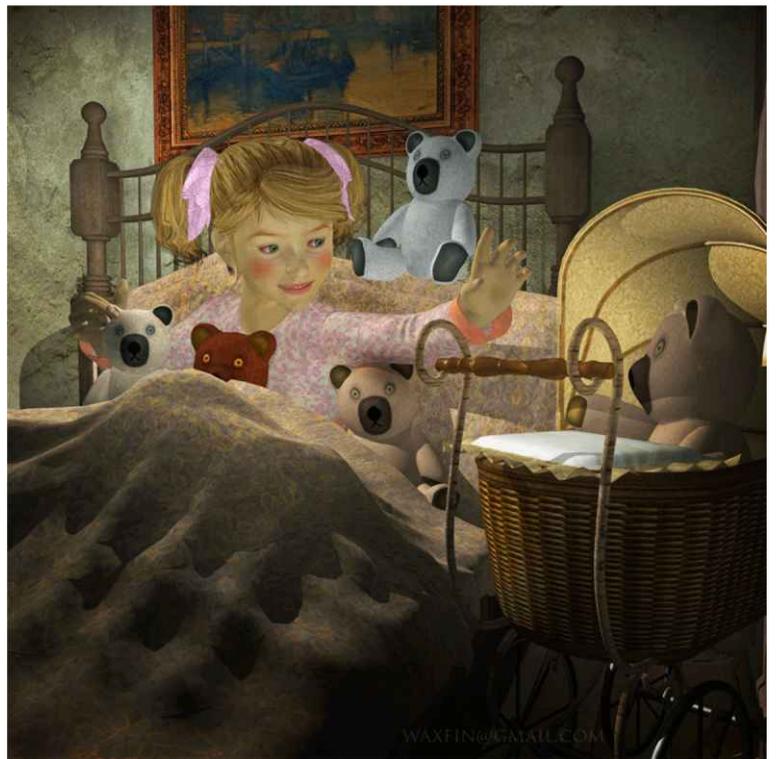
# A Andrew Finnie

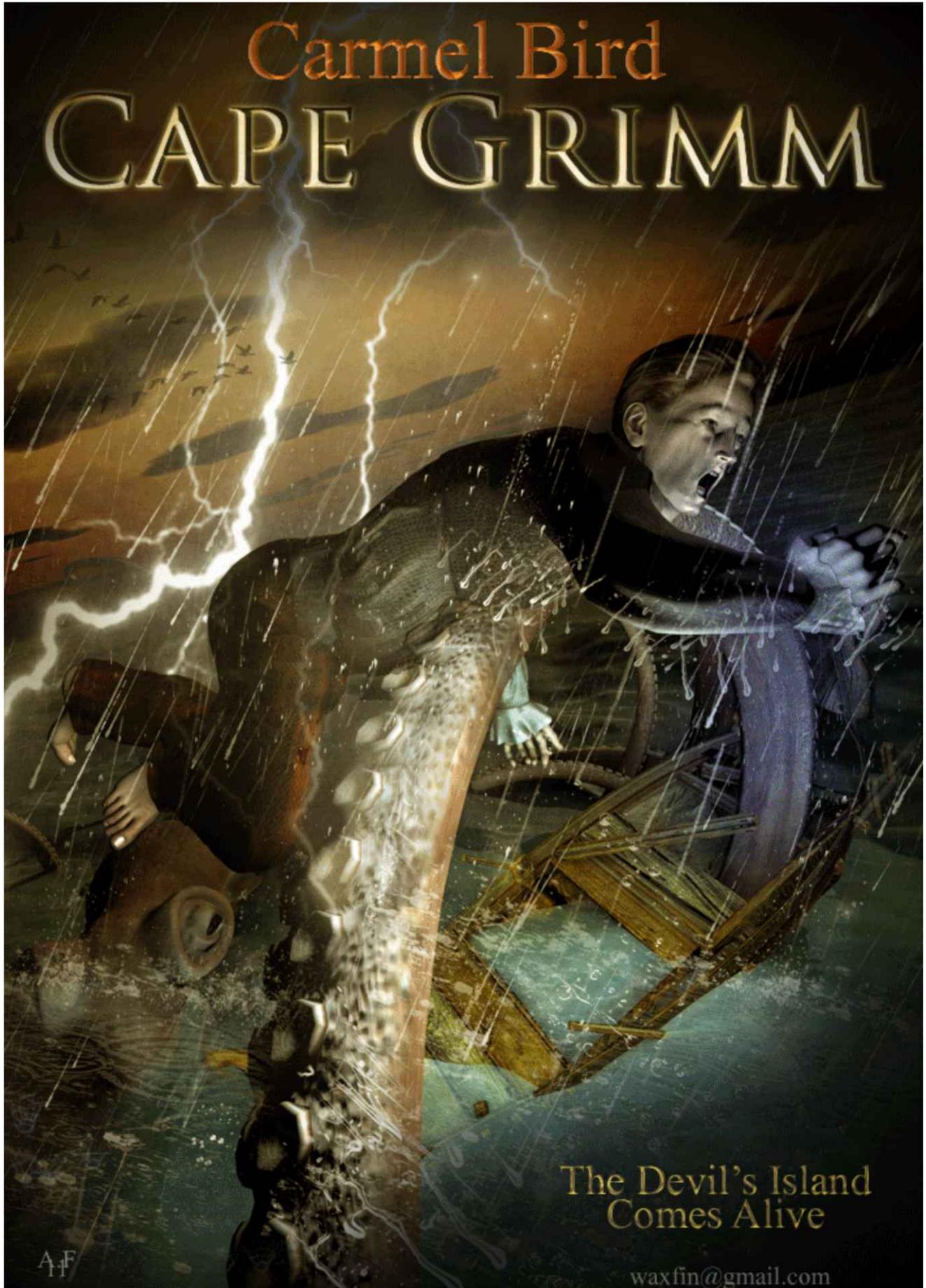




WAXFIN@GMAIL.COM







# Carmel Bird CAPE GRIMM

The Devil's Island  
Comes Alive

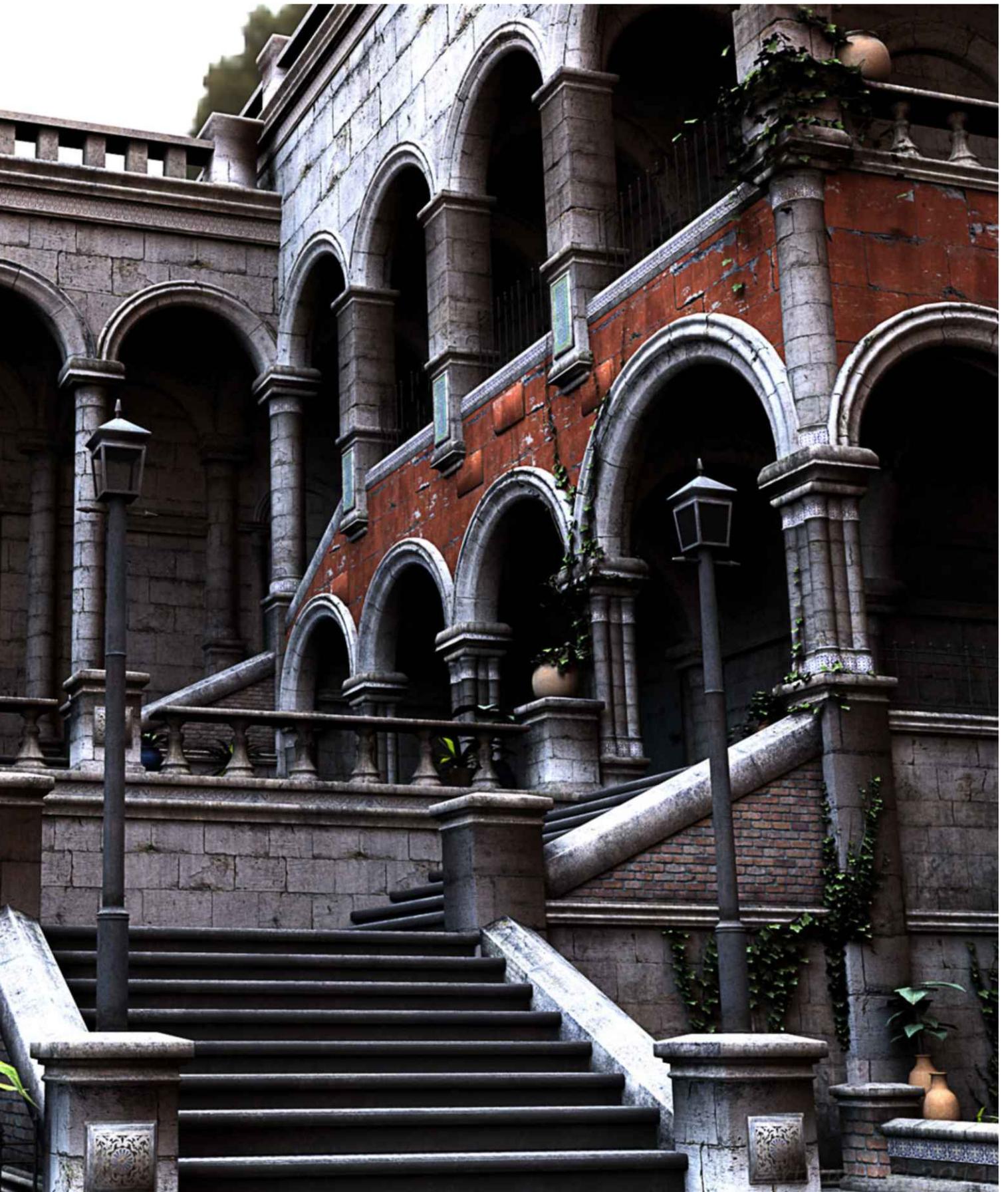
A.F.

waxfin@gmail.com



# Cool art dude





Courtyard

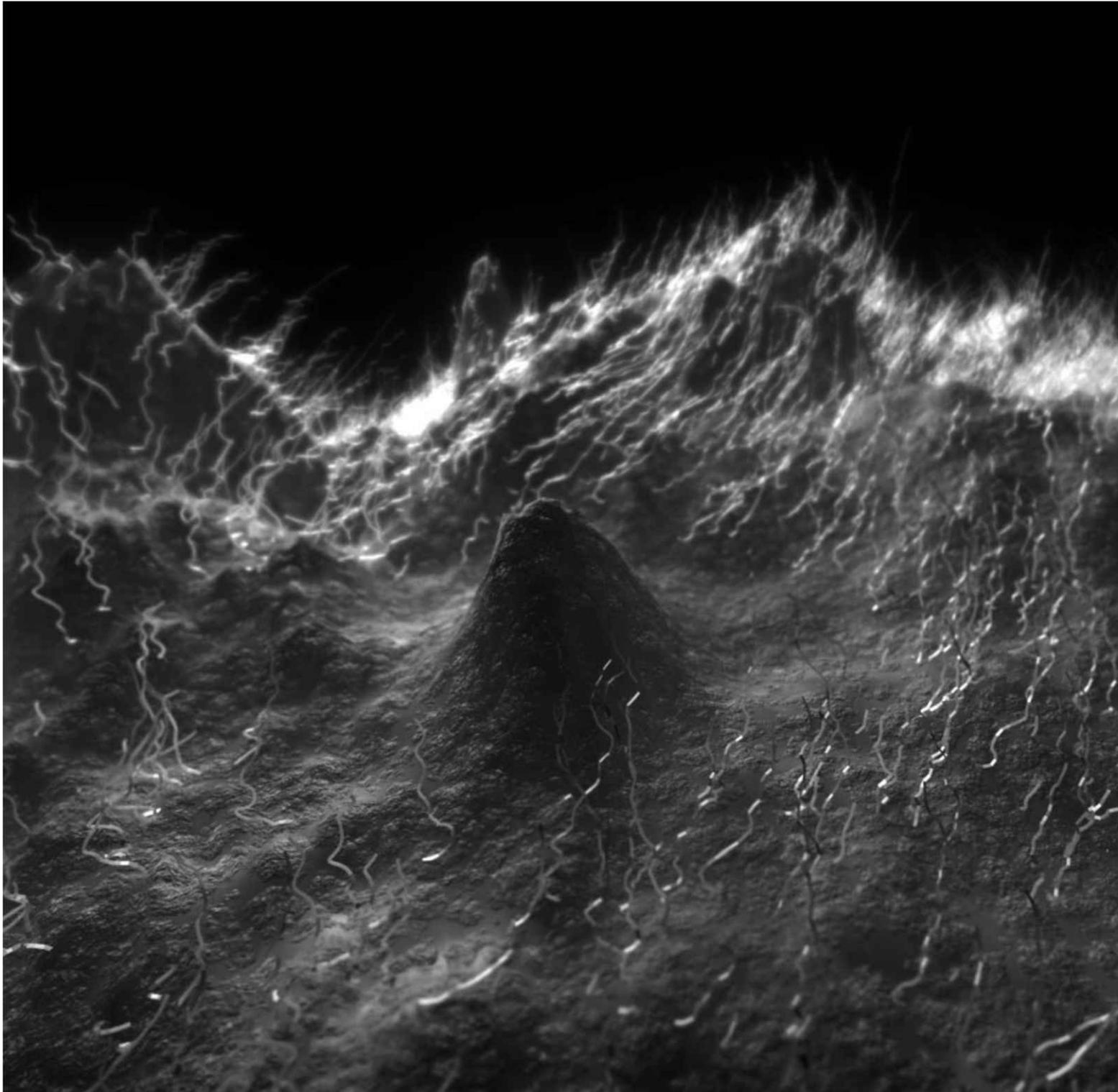
# Crippeman

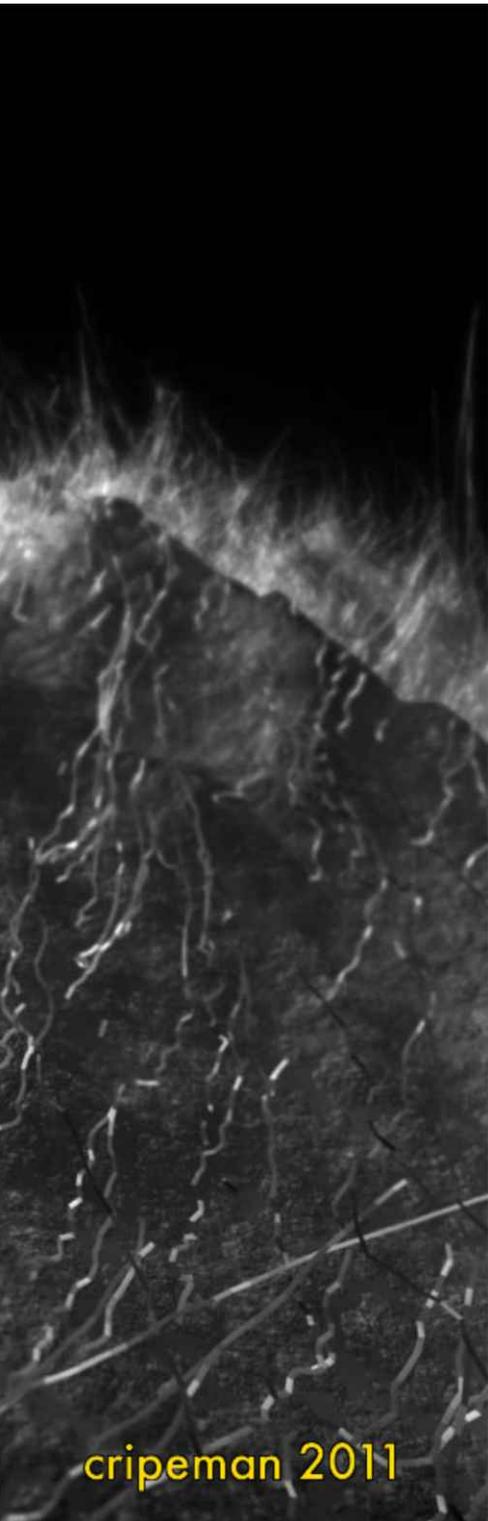




cripeman 2011

Infestation





Among the bumps and curls | What would Dewey decimal do? | Mouse

# Darien Liddell



Hall of The Frost Jarls Daughter



Ariel



Devotion

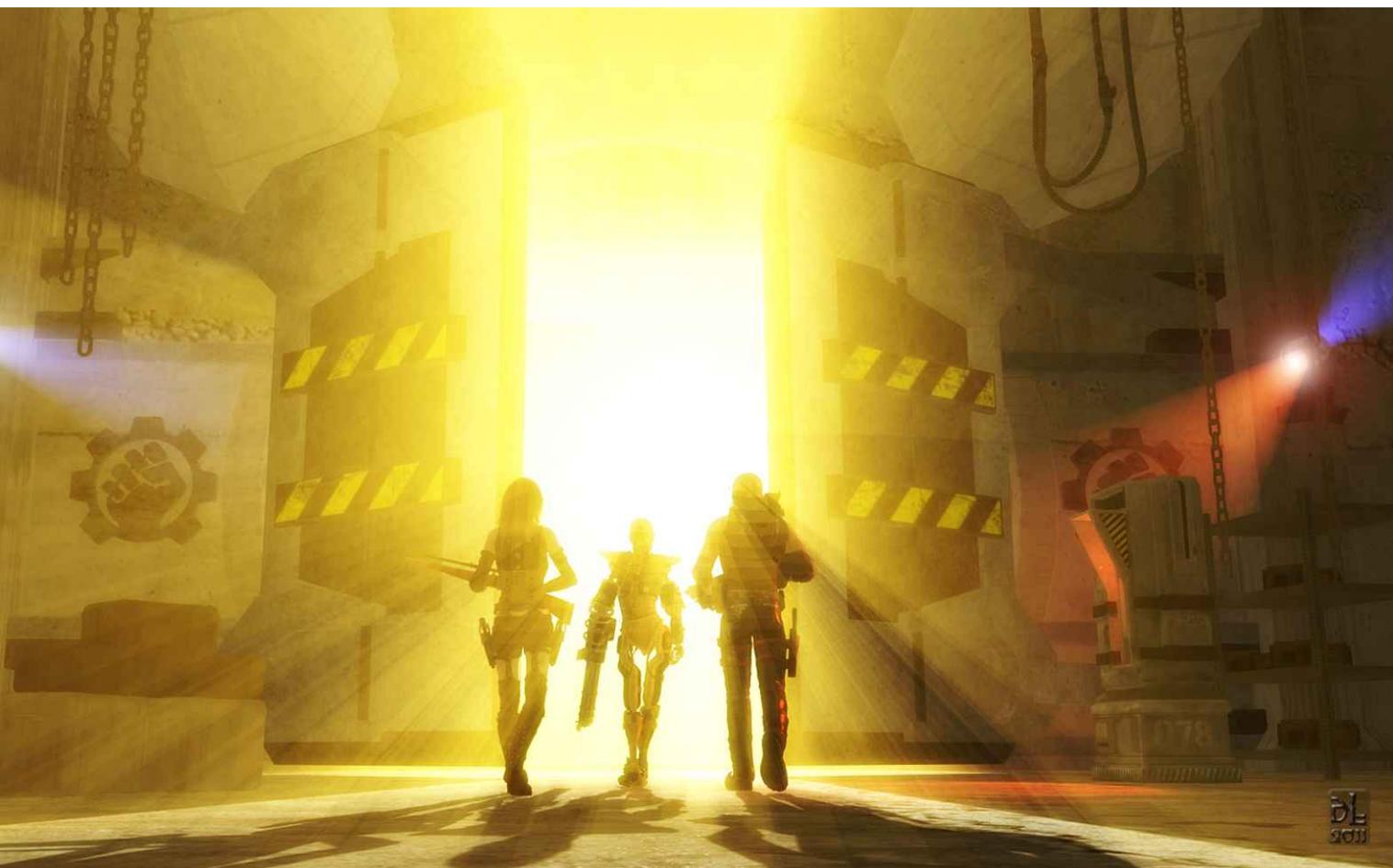
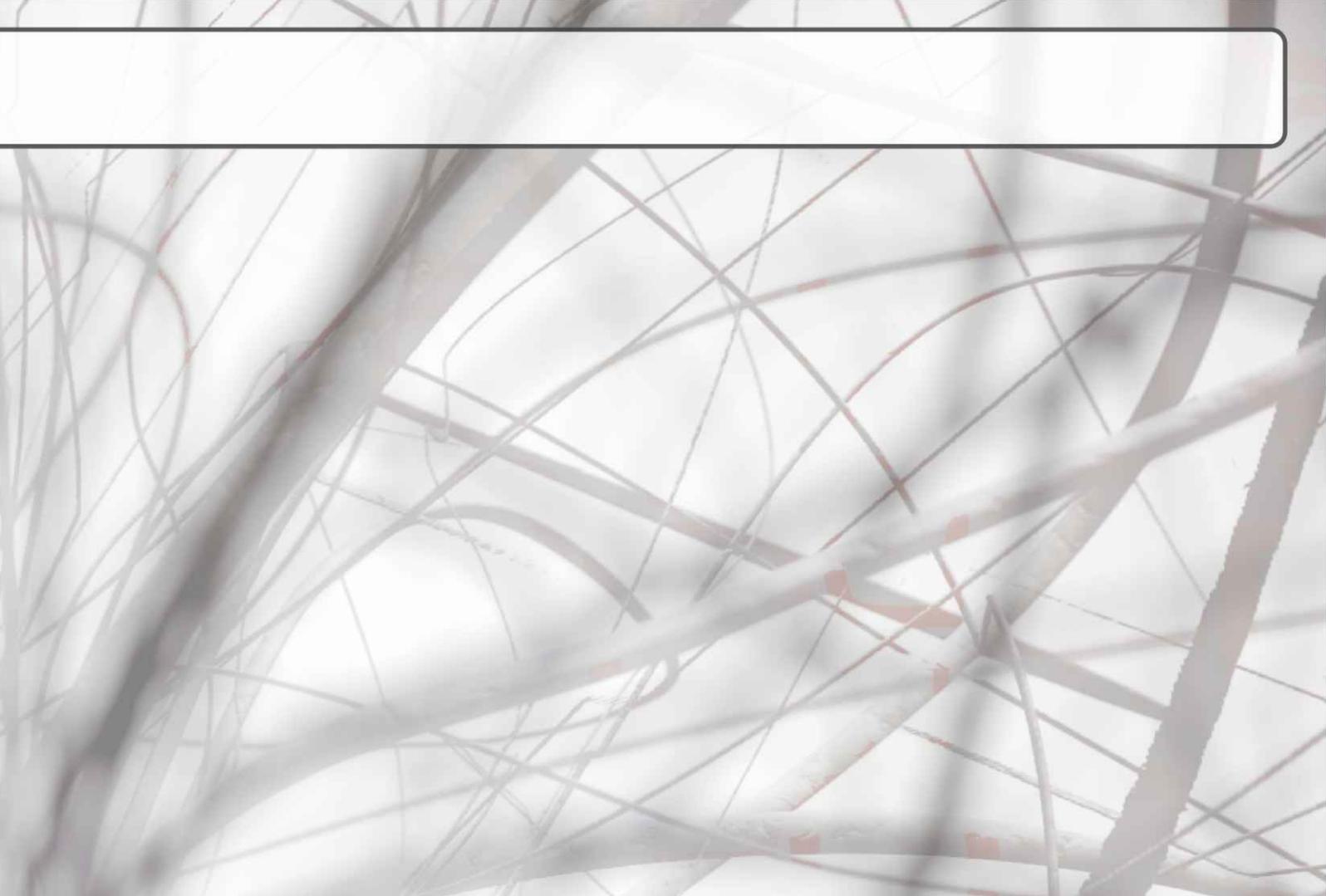


The council



Earthdawn





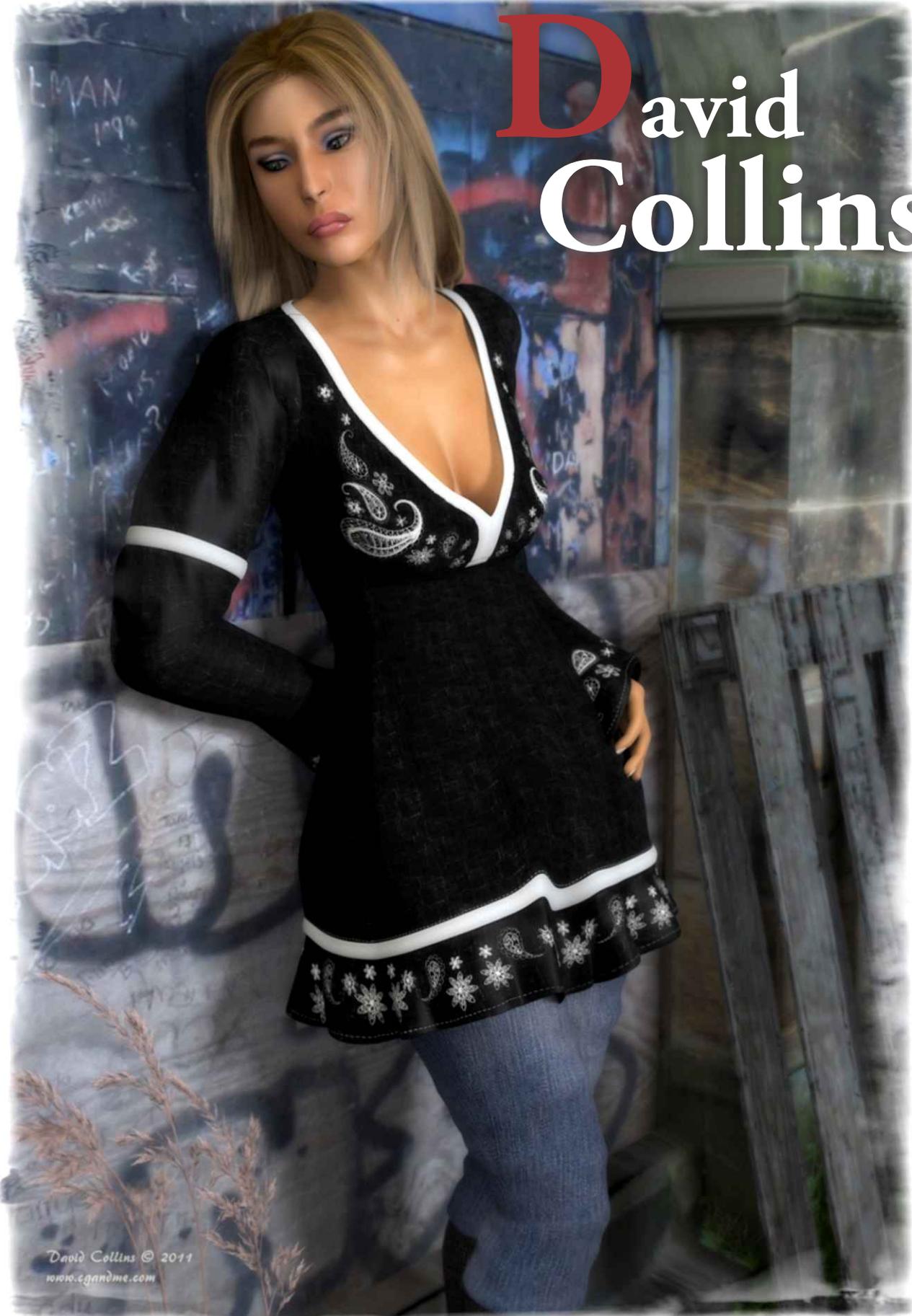
The opening





Shaylee

# David Collins



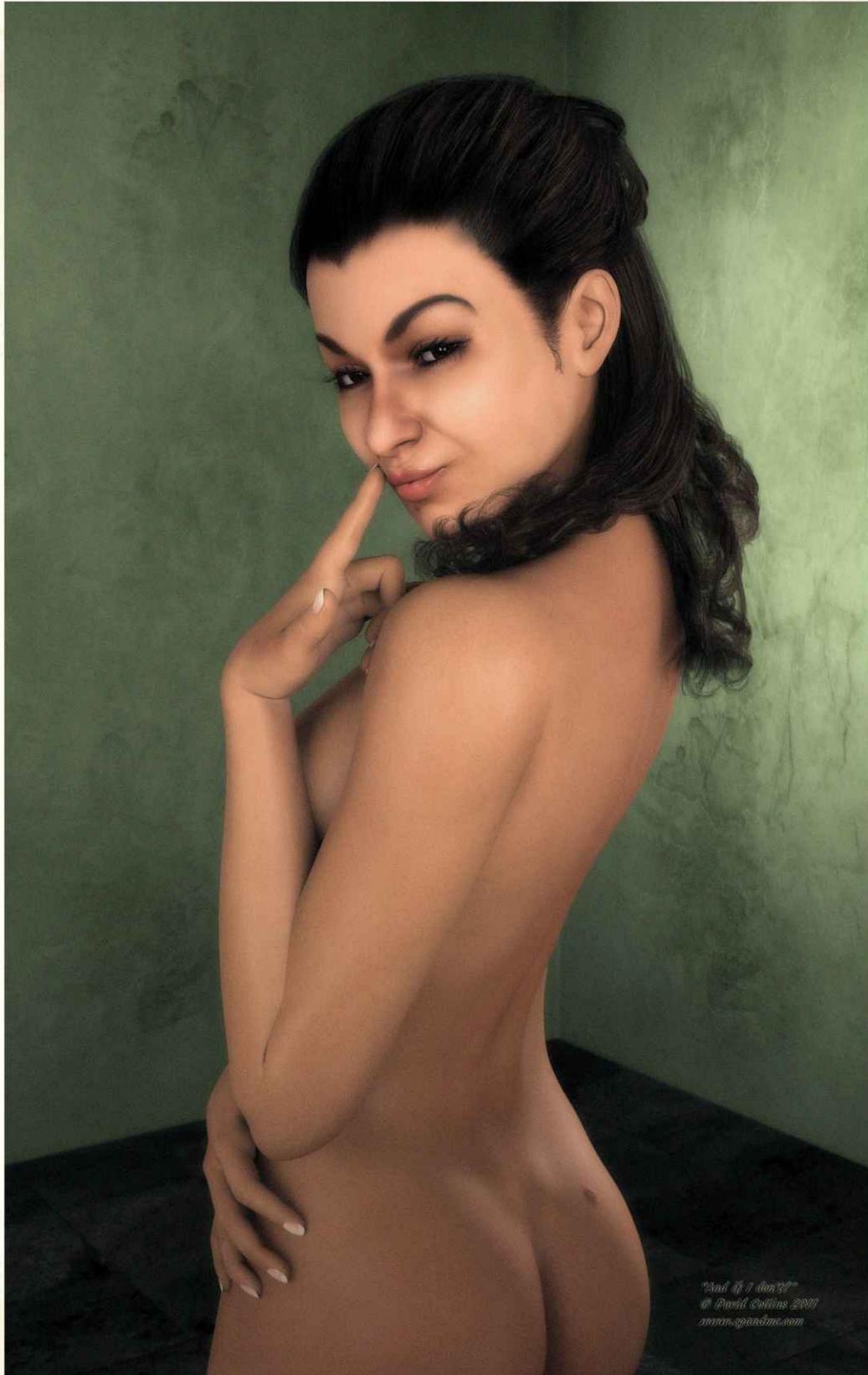
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Remembering



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I See You 2

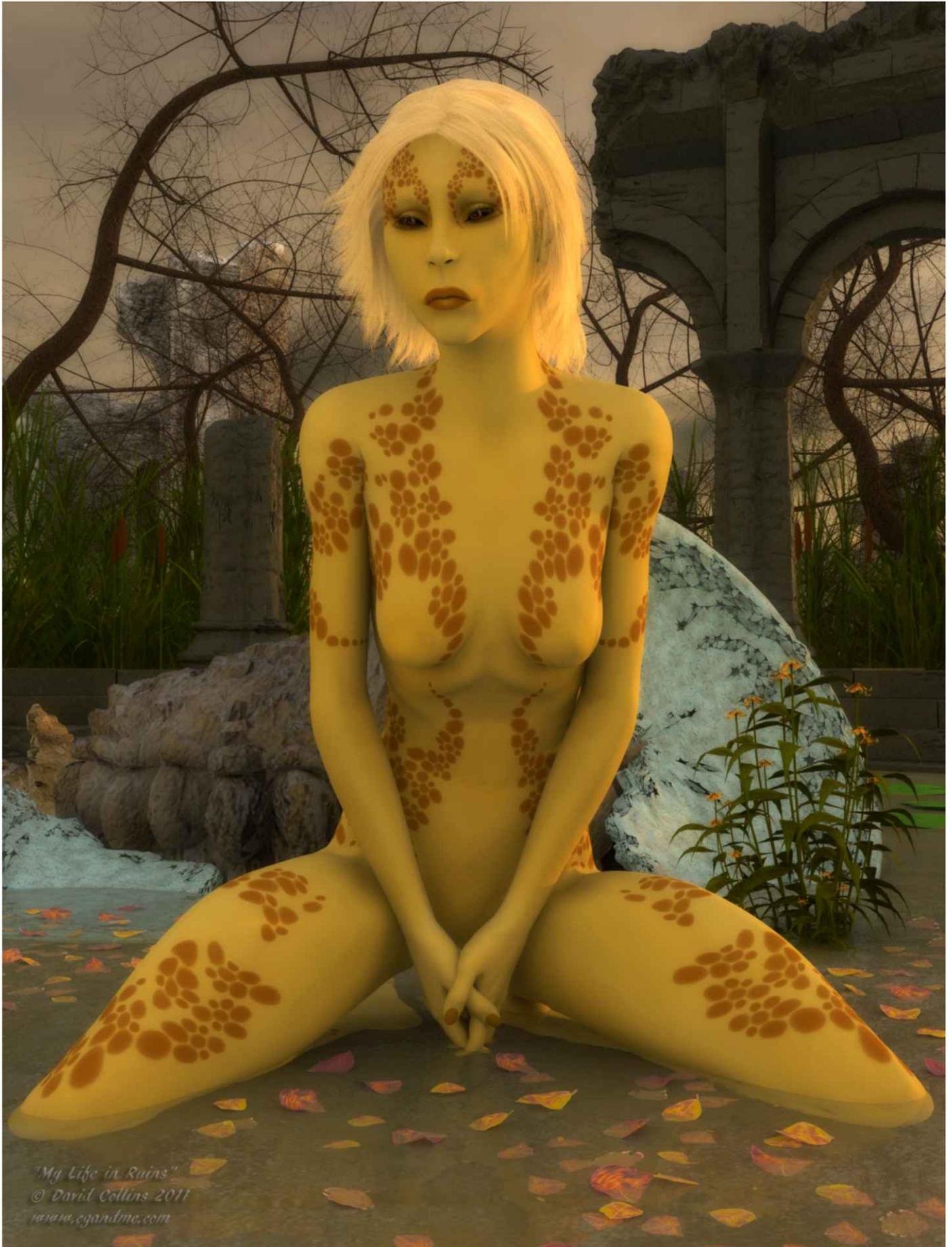


*"And if I don't"*  
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And if I don't

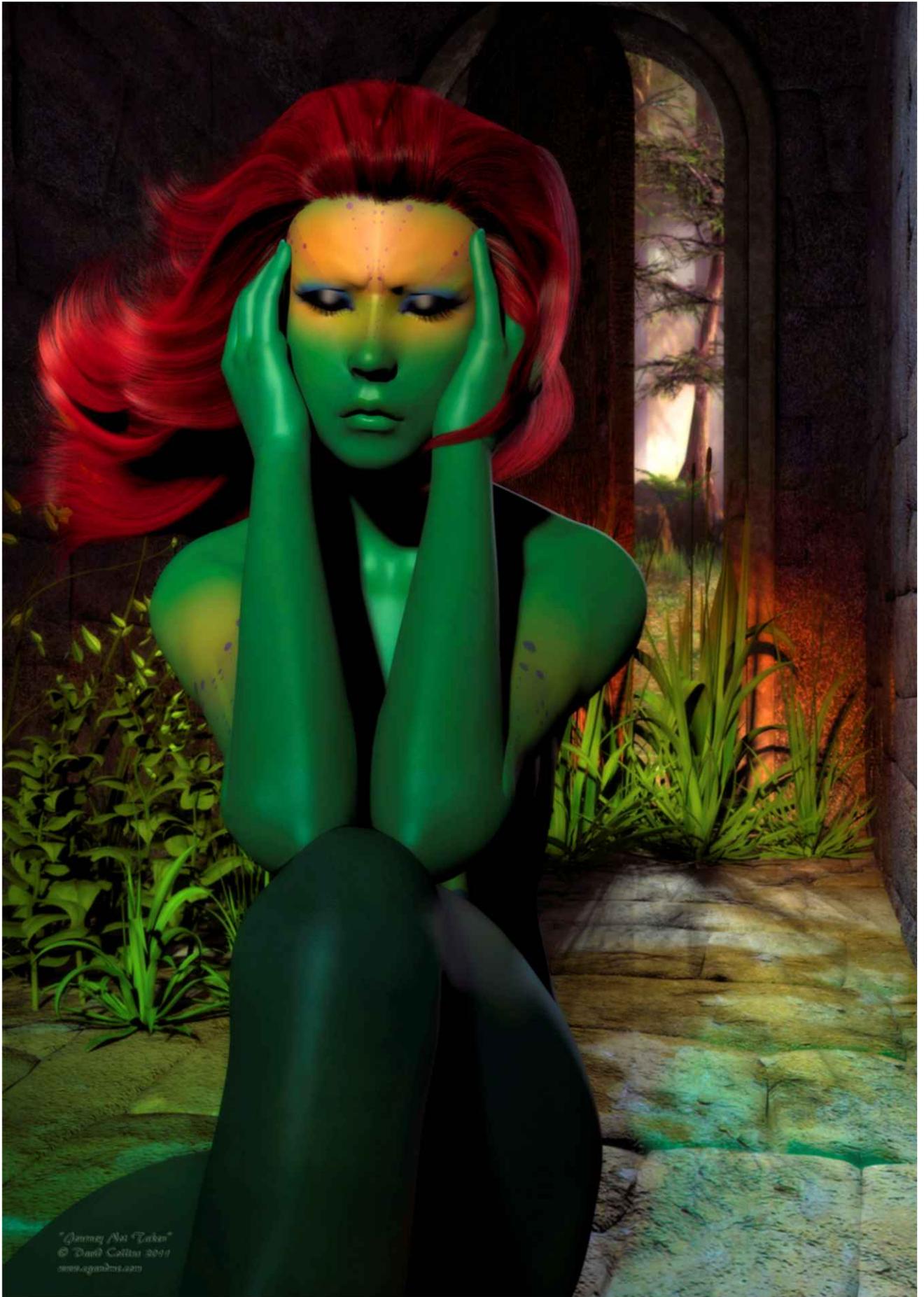


Do not a prison make



*"My Life in Ruins"*  
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My Life in Ruins

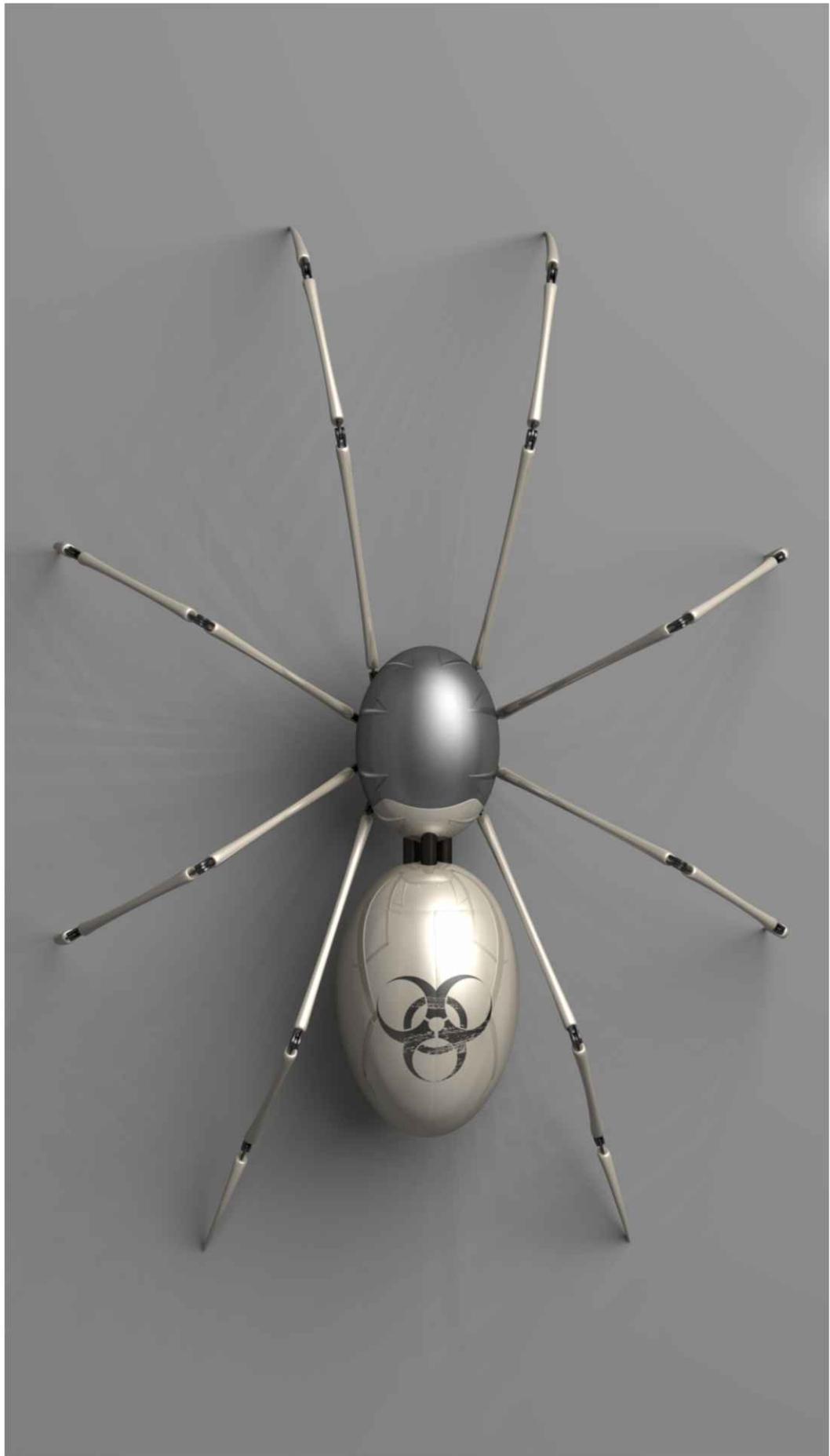


"Journey Not Taken"  
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Journey not taken

# Eieele



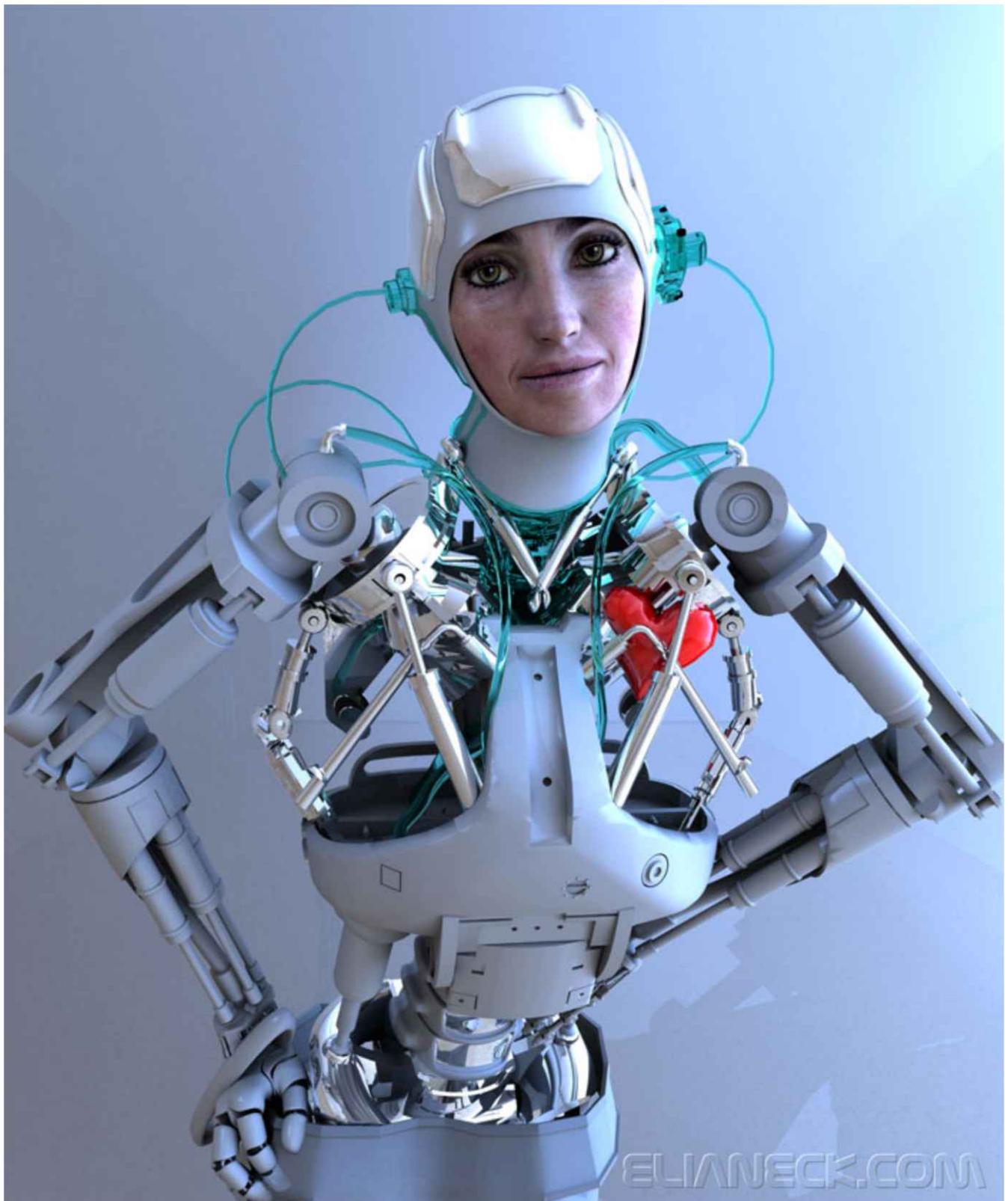


Arachnoid





# Elianeneck



Cyber



ELIATUECK

Dark



Fays

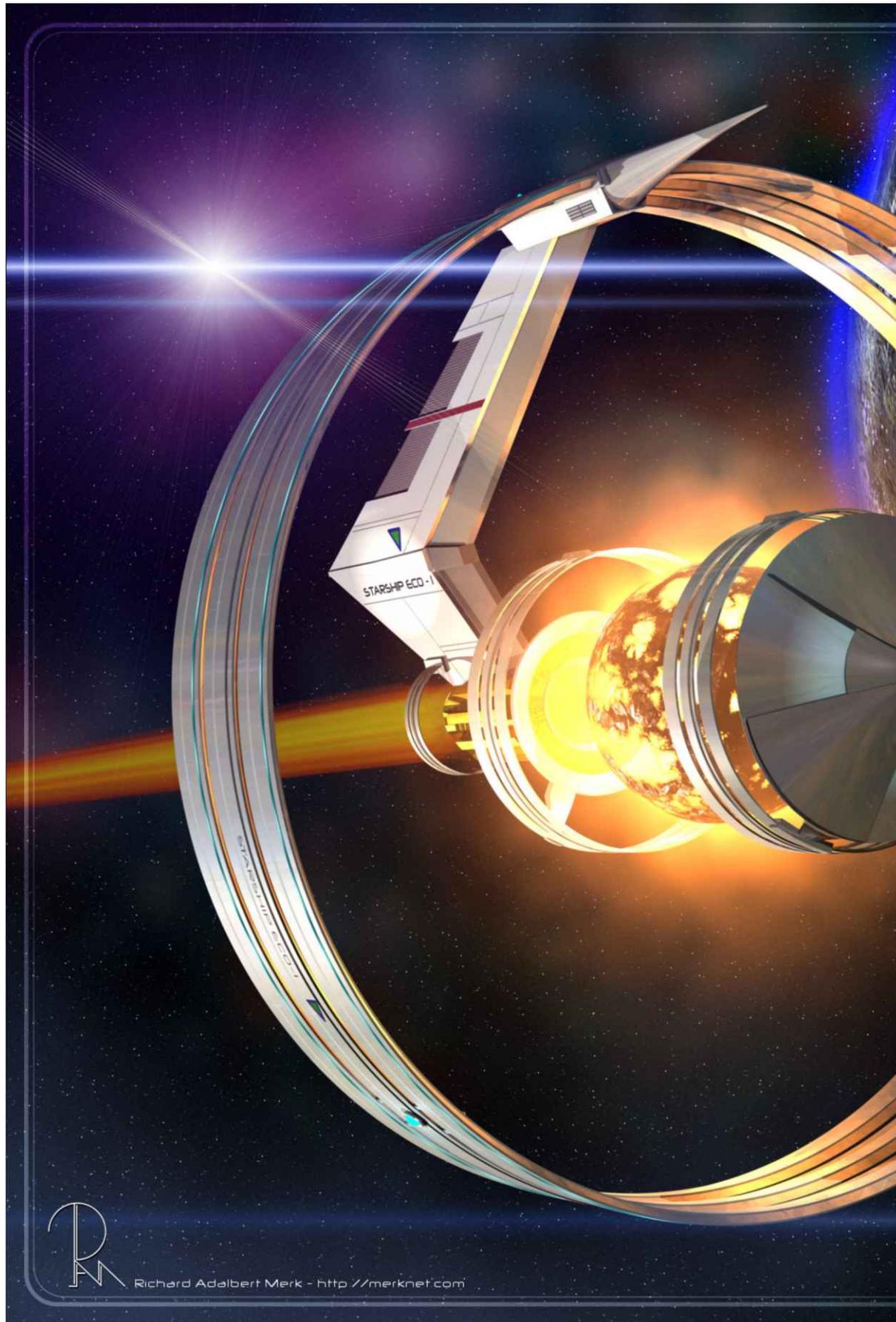
# Mark Clark

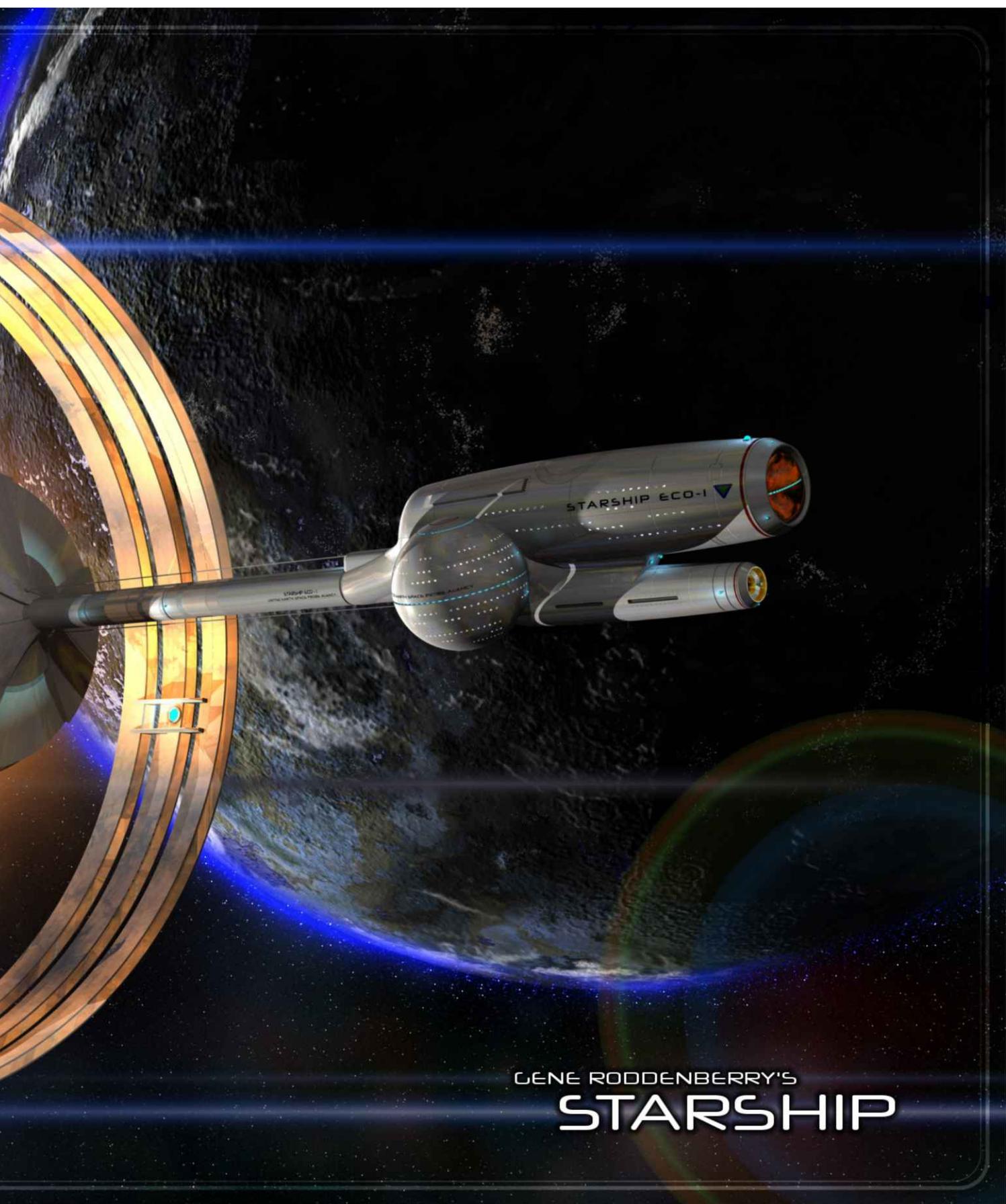


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Mad-Science

# Richard Merk





GENE RODDENBERRY'S  
**STARSHIP**

Starship 36x24



Escort1



Starshiptrio 36x24

# Jefferson



Rally 2



Strange object

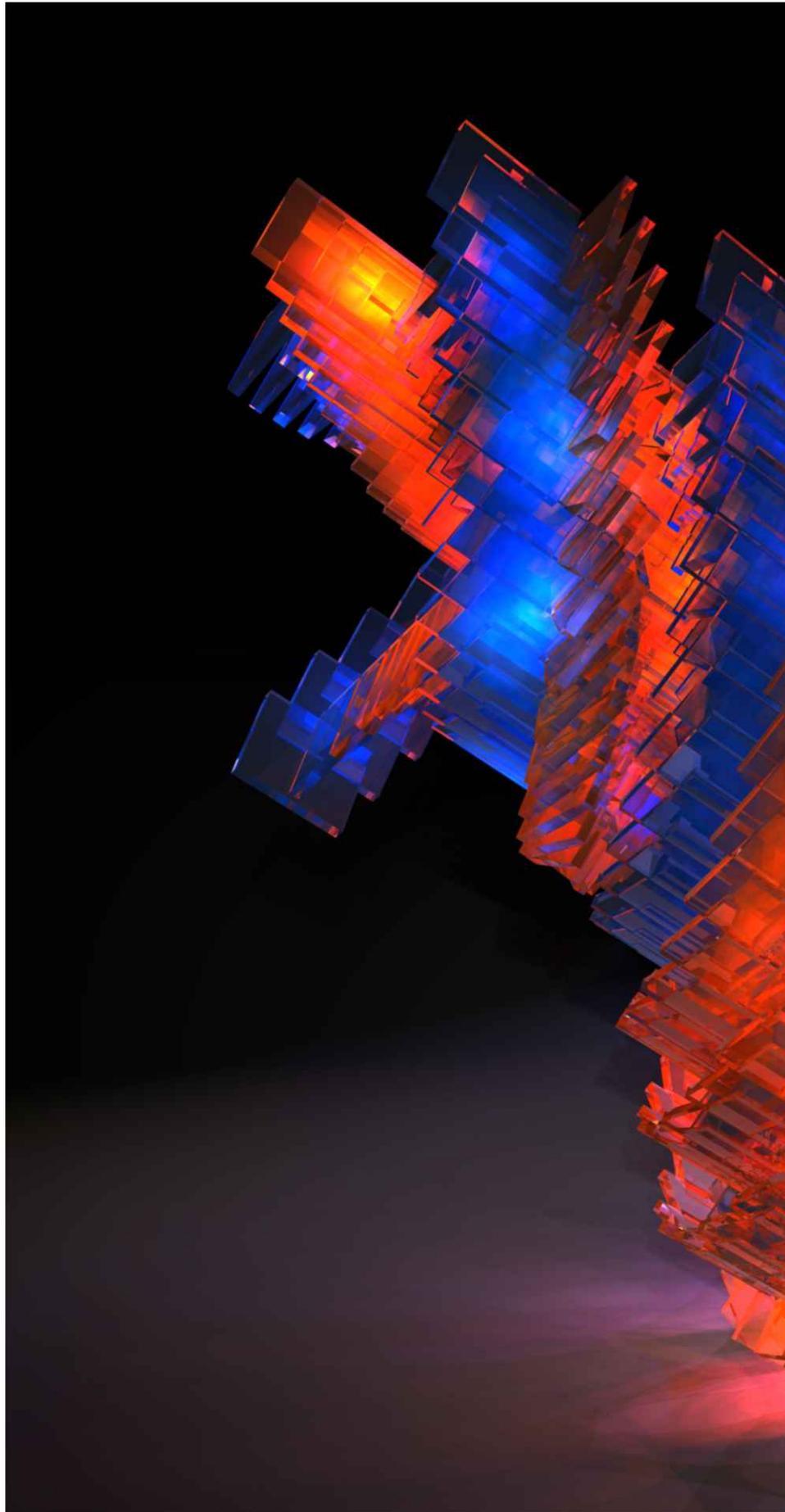
# Danas\_Anis

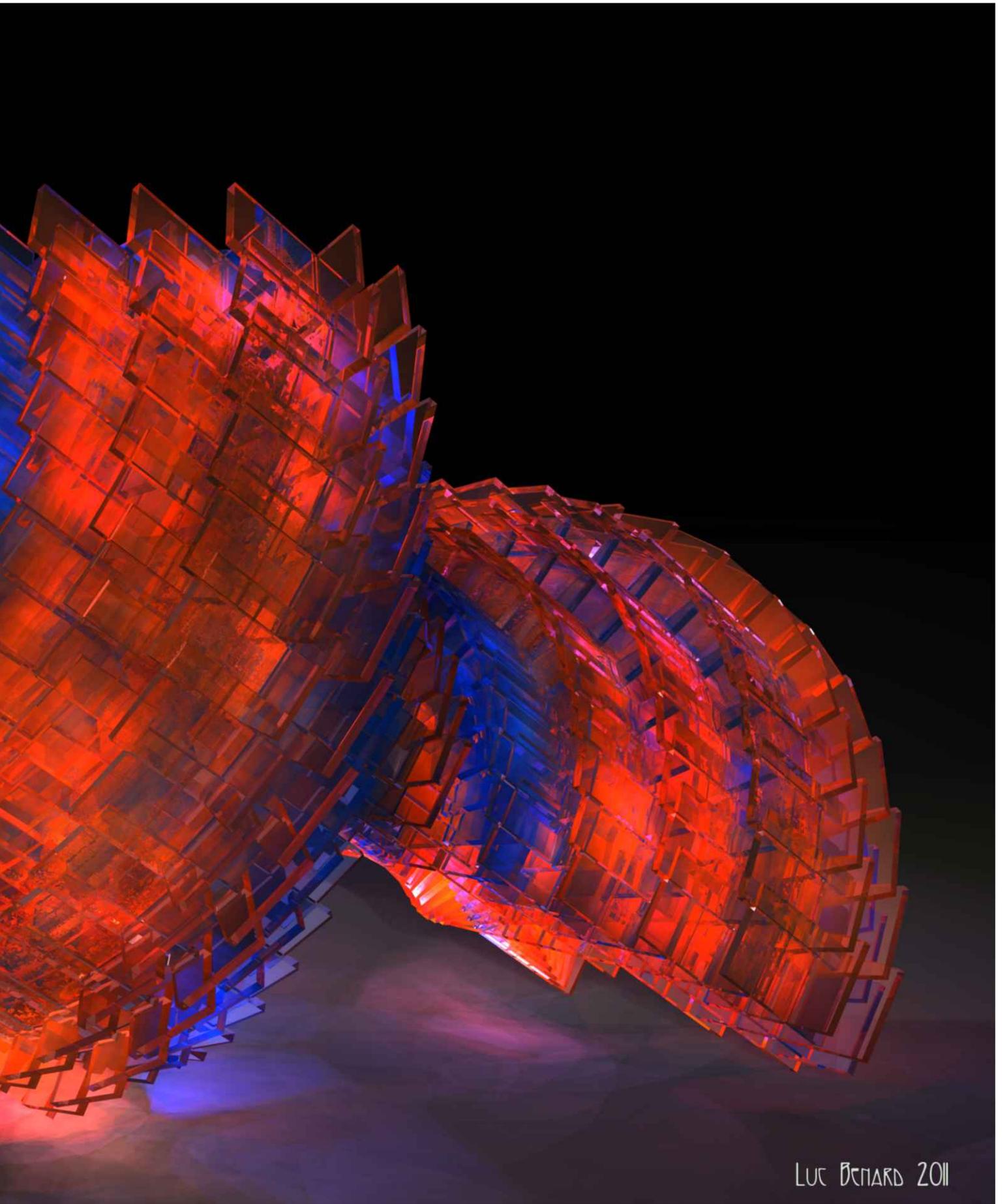




The Two Castles

# Luck Benard

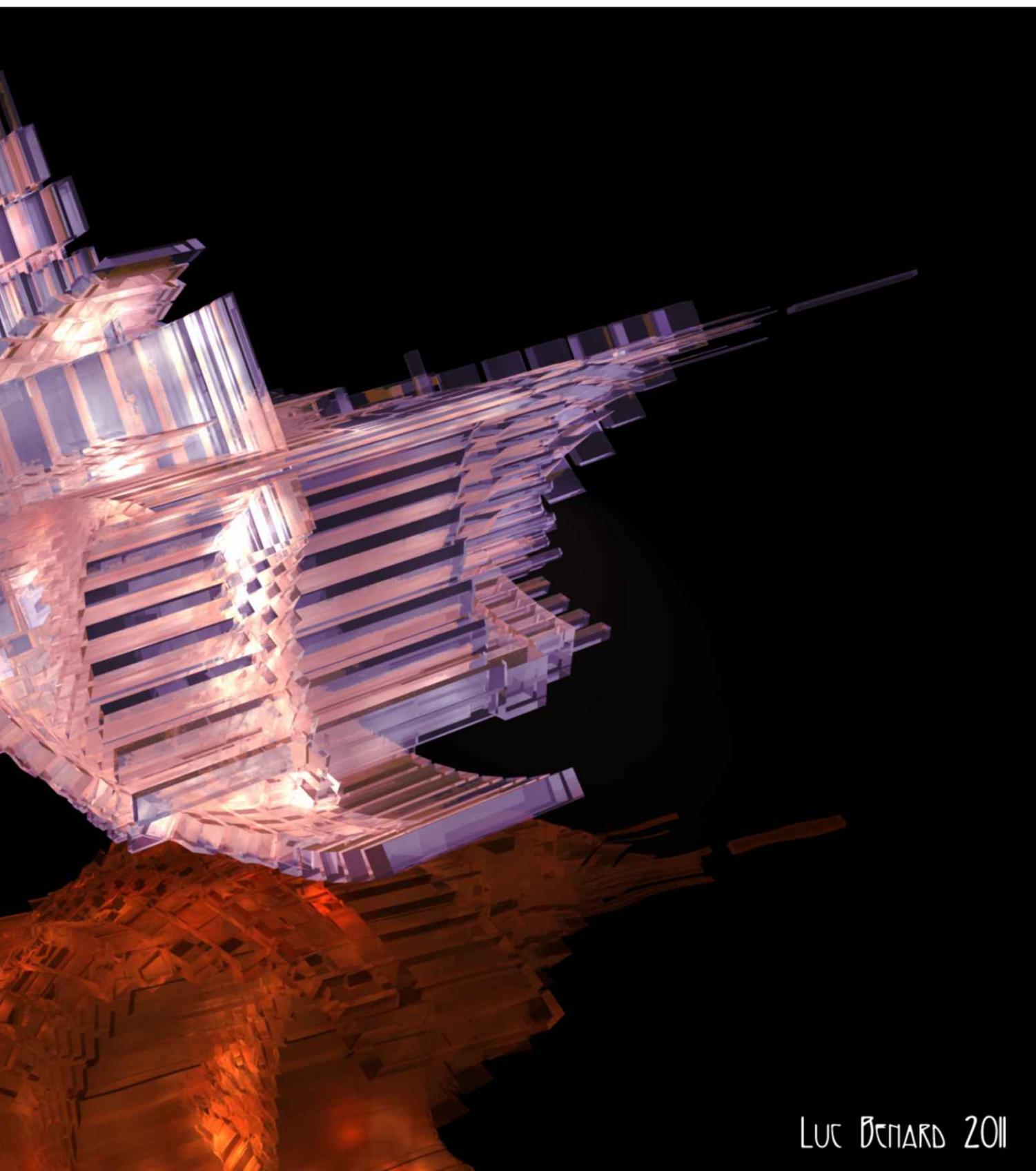




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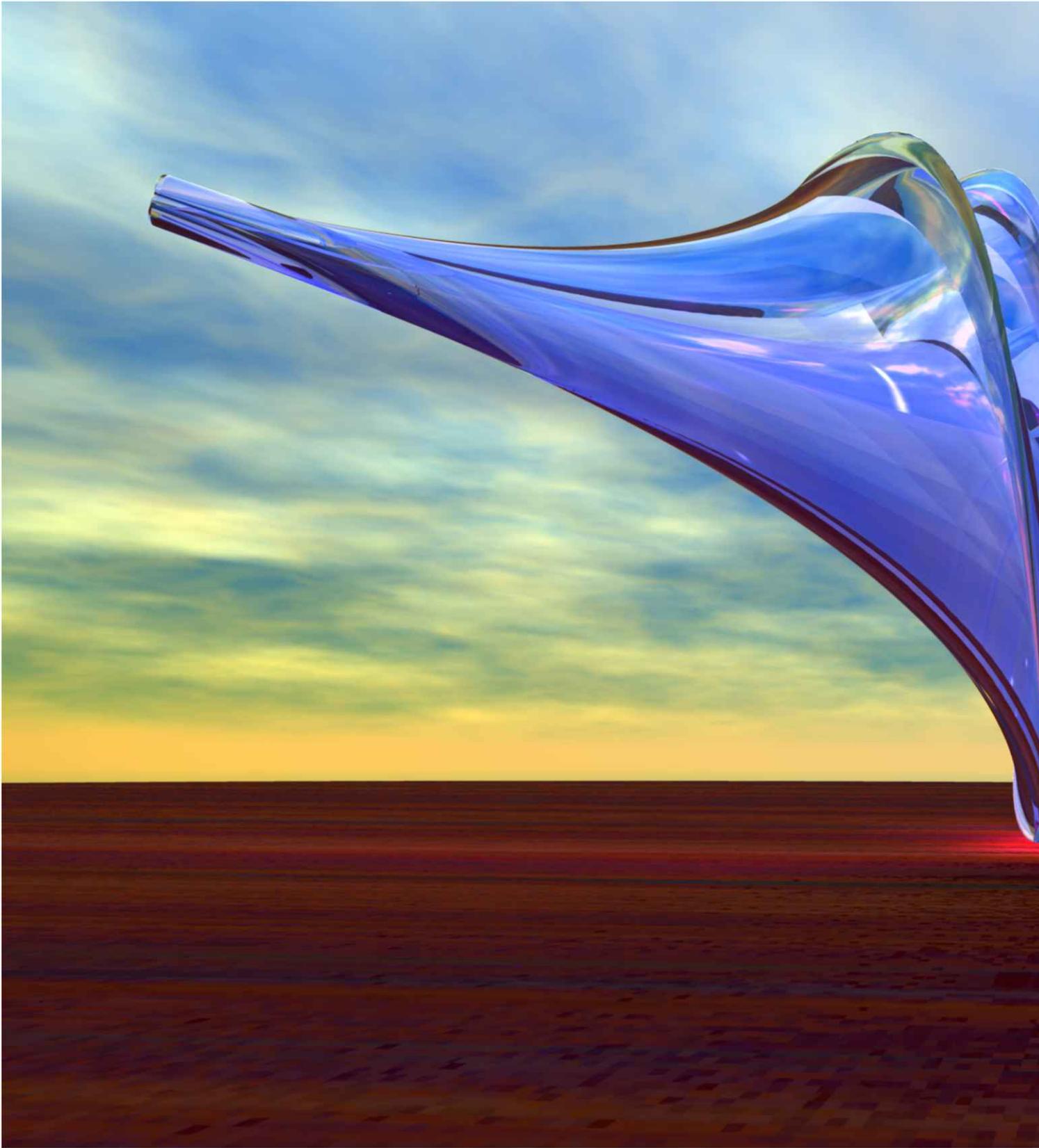
Algorithmic Structure 2.45

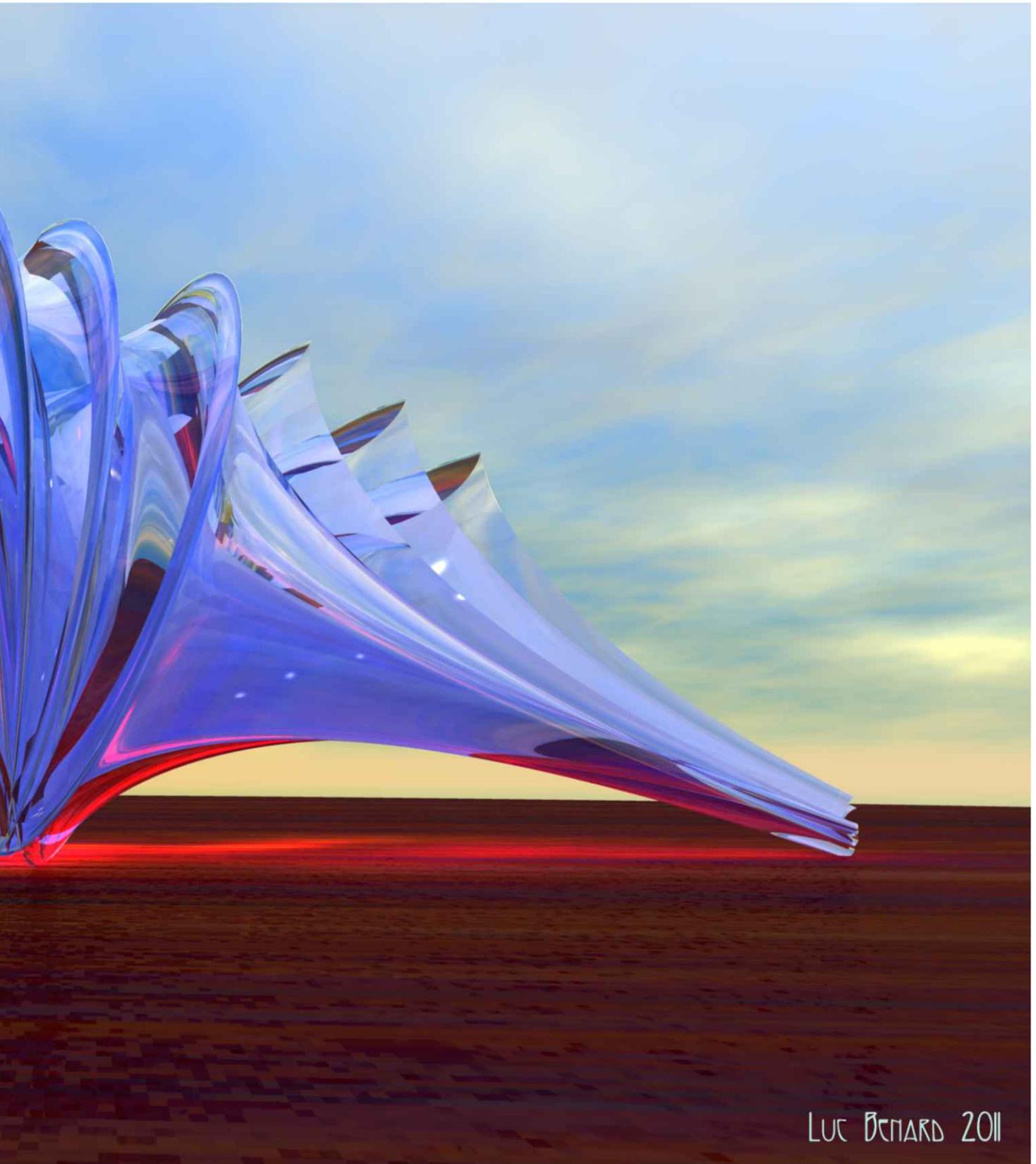




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NablaSystem 48F





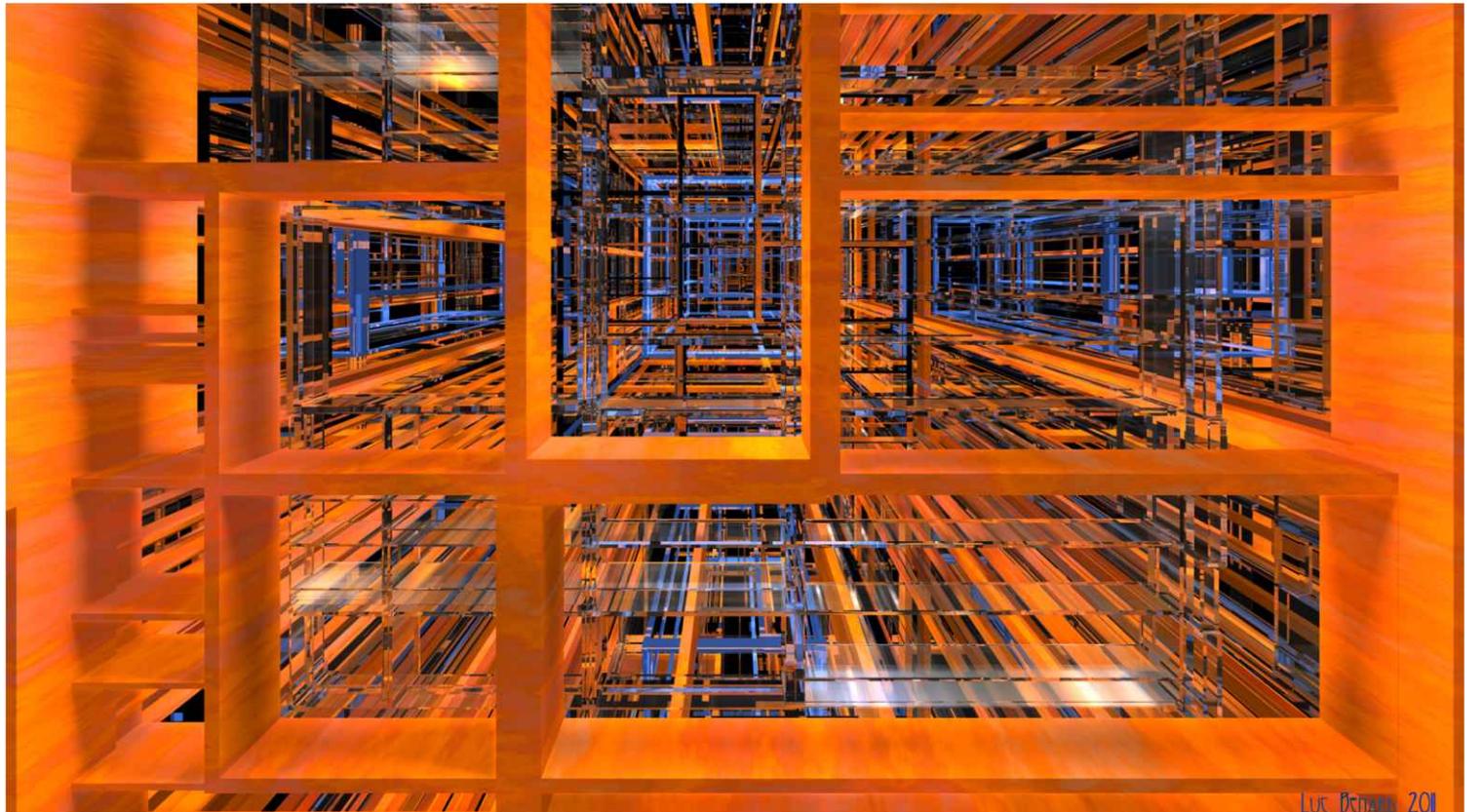
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Klein Bottle 8.1



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Mondrian Cubes Well



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Still Life Bis

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