



PIXEL SECRETS





# Pixel Art

Tiny squares that can create some amazing things.  
I've loved pixel art since I was very young, my older sister introduced me to it.

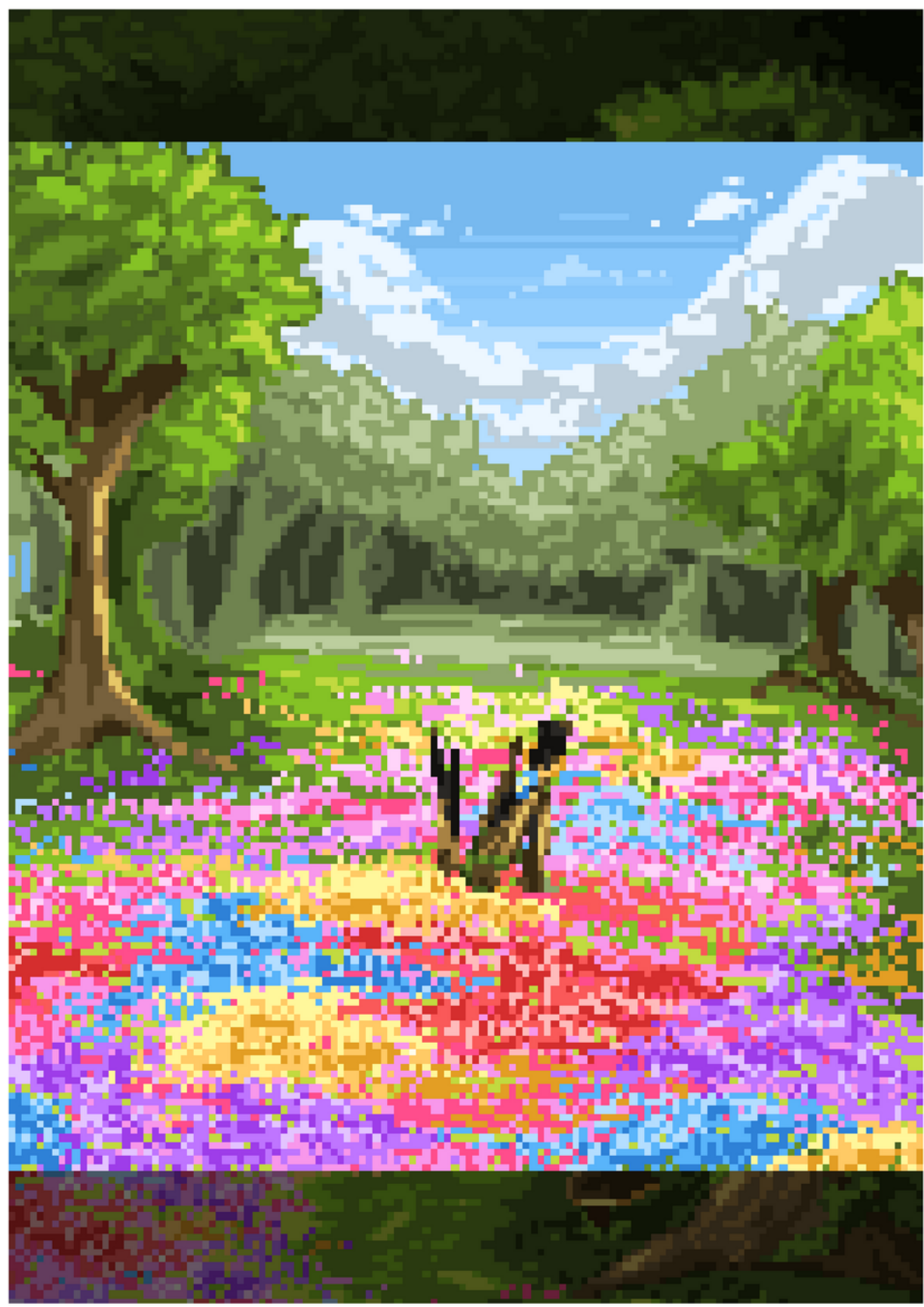
Originally all I did was dolls, then went onto small pixel pets and then finally sprites and scenery. I've been pixelling for the past 10 years, working on improving slowly. Pixel art is one of the few things that I've never gotten tired of doing, no matter how long it takes me, it's always fun and it is something that's easy to learn since it's made so small.

I hope you enjoy what I've made.









# Getting into Pixel art

Pixels are small squares on your computer, everything graphically is made up of pixels. If you zoom in on a photo you'll notice tiny squares of different colours. Those are pixels.

Pixel art can be done in various ways, and in a lot of different styles.

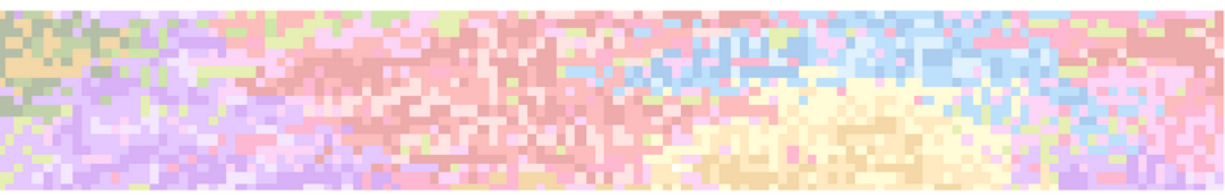
A lot of the older games we grew up with were done in pixel art because it was reduced in size and easier to put more onto the small cartridges

We'll start with the bare basics, getting set up to do pixel art. Most art programs allow you to do pixel art, but the easiest I found were

Photoshop  
Gimp  
MS Paint

While Photoshop isn't a free to use program, Paint and Gimp are.

The only tool we'll really be using in these programs is this one. The pencil tool.



Pixel art is most often made small, on average my canvas sizes go to a max of 250 pixels. That's for my larger works, otherwise they are around 50x50 pixels which is what I use for icons.



This is a 50 by 50 pixel square, so now that we have our canvas we can set our pencil tool to 1 pixel and start sketching.



The reason we use the pencil tool is you get a completely perfect and crisp pixel, where as with the brush you have a lot of extra blurred pixels which is going to add a lot of extra colour and make it difficult to draw in a small space.



We can now sketch a basic shape using our pencil tool, it's easier if you zoom in so that the pixels are a decent size.



Most programs use roughly the same tools, a magnifying glass to zoom in, the pencil for pixelling, and the eraser.



Sketch down what you'd like for your pixel piece. For mine I've drawn one of my mascots Zero.



As you can see he's pretty messy, but since the sketch is there we can clean up the lines. Make them look a bit more smooth much like linearting a normal sketch.

As you can see from the image on the right, it's a lot cleaner and easier to see.

I changed the pose just a little bit during the clean up process as it didn't look right to me. Changes are easy to make and it's a good idea to change something if it looks off to you.



Alright, with the cleanup done we can add the base colours. Now everything is very clear to see, so if you think anything looks incorrect it's easier to change it. That's a simple way of getting started with pixel art. There are other ways you can pixel such as painting with pixels and very large pixel work.



# Shading

Understanding shadows makes life a lot easier to shade a variety of objects and pictures. Colour is also important but we will get to that later on.

When you're shading an object you want to know where the lighting is coming from, and what kind of light source you have. Is it really bright like the sun? Or dim like a flame. Is it behind or in front of the character/object?



Light bounces off objects, and where it cannot hit it is darker, as shown above, we have both a sphere and a cube that have light coming from the top left, they are both brightest up the top where the light is coming from, but on the right side, it's darker because it isn't getting direct sunlight, the images on the right have the light coming from behind, to show this the front of the objects is darker, where as the back are highlighted. When you stand in the sunlight with your back to the sun, your entire front is completely dark, because the sunlight can't hit it. The same applies to shadows in drawing.

Lighting will also effect how bright that light is, the dimmer the light source, the bigger the shadows will be, the brighter the light source the more highlights but darker shadows you will have.









# Importance of Colours



Colours make a big difference to your work, it helps create the mood and feeling you want to give off. This goes for both pixel and other drawn works.

For instance cold colours like blue and purple can work very well for a sad picture, while light blue and white can be something gentle. Warm colours bring a nice warm feel to the picture, but both colour combinations work well when put together, such as putting blue and purple with a nice bright orange and yellow fire.



The first image has very dark blues and purples, but bright orange eyes, this gives off a rather dark and cold demeanor. While the second is a bit lighter, it gives off a warm glow of a fire with the cold shadows. The third is in daylight, the colours are more cool but bright where it's no longer intimidating, and the final image is a sunset lighting, which is shown with light orange and yellow based colours while still having a cool but slightly warm shadow.

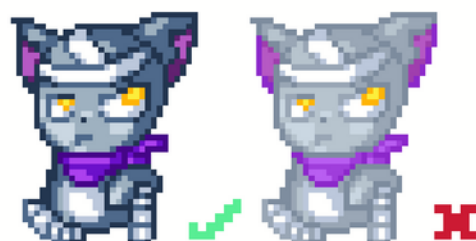
# Contrast

For pixel art contrast is important. The smaller the pixel art, I find the more contrast you need, otherwise colours tend to mash together and you can't see what's going on.

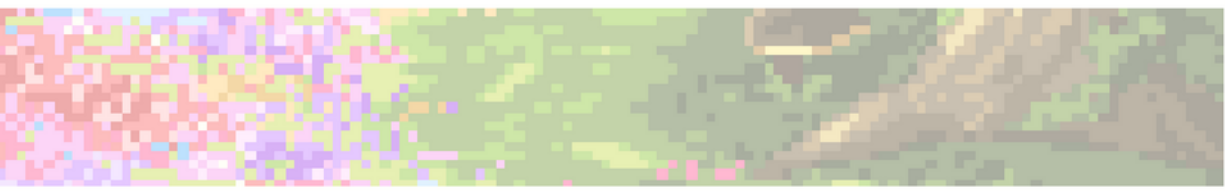
While bigger pixel art needs more colours and less contrast to blend the colours together. Contrast is also going to help define details more, such as harsh shadows or objects you want people to notice first on your artwork.



This image for example, in the bottom right you can see the harsh shadow that the tree gives off. Where as other colours tend to blend in more, the more you want it to stand apart from the other parts of the picture the more you want to define it and have it more of a contrasting colour.

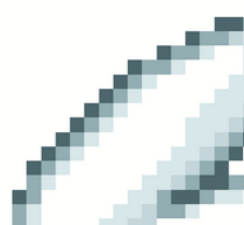


As you can see it's a lot easier to tell what's going on when the colours have more contrast. The one on the right is a bit more muddy and it's got no real definition to it.



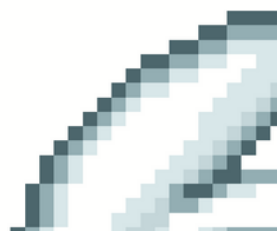
# Blending Colours

When you have a set palette but some of the colours aren't quite blending in properly you can always add in another colour between the two to help it blend in more. This is often called Anti Aliasing this helps blend the skin into the outline without making the outline too light.



With this image you can see I've got the darker shade in the small cracks of the edge, it follows all the way around but doesn't hug the edge too much, it's only one or two pixels at a time in the corner of the outline.

This is what you'd like to avoid. This is called pillow shading, where you hug the outside line all the way around, and it tends to take away all the shape to your shadows.



Dithering is also a commonly used way of blending two colours without having to add any extra colours to your palette.



The point of dithering is trying to weave the two colours together, which helps blend them when you have little to no colours to use.



# Picking Your Palette

A lot of people struggle with picking a colour palette, even I have troubles with it on occasion. Colours are important to your image, as stated on a previous page. So the palette you choose is going to say a lot about your work.

Generally when I'm picking my colours I start with the base colour I want.



So I've picked the base colours I want next up we'll be picking a shading colour. With what we've learned from the previous pages, we want to pick colours that will match the mood we're trying to convey. For mine I'll be doing a basic daylight shaded palette. So we'll pick a darker shade of each colour.

Now we have a darker shade for our base colour. We also need a highlight, don't forget you can play with colours don't always need to go straight down towards black, if you have a yellow shade it with an orange, and if shading white, you can use a light blue-ish grey. Don't just stick with black and white shades and highlights. Find colours that work well together.



I've added my highlight colours to my palette, you can probably notice with my purple highlight that it's closer to a pink than a purple.





Now that we have our colours, using the contrast as well so that they're not too close together, you can easily edit the palette as you go, if it's not quite dark enough or too dark, you can change it as you please.

If you like your palette but a colour isn't blending properly, the easiest option is to add another colour into your palette.

We've edited the palette and added an extra colour between each shade, this just helps us blend some shadows or highlights that don't seem to work right on their own.



You want to avoid using blacks or greys for highlight and shadows. Picking colours that match help quite a lot, like purple highlighting to pink, or green highlighting to yellow, even blue can highlight to a softer brighter blue.

Here's just a few examples of picking colours, using different colours instead of just using black shades of your original colour. This just adds a lot more vibrance to your image.





# Dolls and Sprites

Though people don't realize it there is a difference between dolls and sprites. Sprites are generally drawn from scratch, while dolls use a base.



Sprites



Dolls

As you can see sprites are drawn from scratch they all look different, and can often get different styles depending on the size, while the dolls all come from the same base.

Just like dolls in real life, you start with a base and then add on your clothing and hair, while with sprites you have to sketch out the picture like you would if you were drawing normally. Without using a base to start off.

Both are valid pixel art forms and both require skill but most people do find it easier to start with dolls than sprites. Since the anatomy is already done.



# Pixel Painting

I tend to like doing pixel art in a lot of different styles, painting with pixels is another that I enjoy doing since you can constantly edit small things as you go. You can still start with a concept but generally you don't keep the dark outlines.



With my concept I've just used straight out colours I'd like as my base colours, as you can see I have my sky, clouds, sand and water. It has all the basics in it for a nice beach scene.

This time I've refined my basic idea, so you can see everything a bit more clearly. Now we can start adding shadows. So we have to figure out where the light source is coming from. From the colours it looks like day time.



We have some basic shadows in, and I've also added in some rocks since I thought it looked to bare through that part. Now we can add some highlights and refine our shadows a bit more.



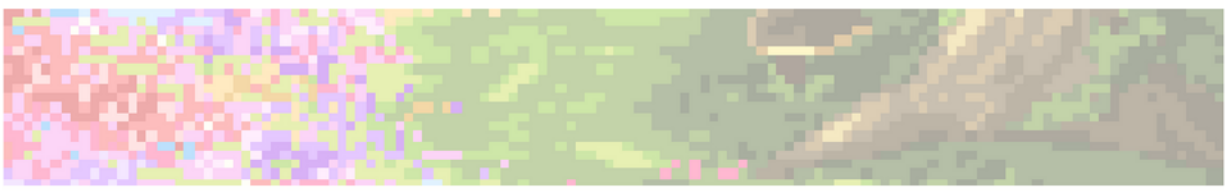
# Pixel Painting



Now we've got some shadows and highlights, but it still looks a little bit flat. Next up we'll just be refining everything, so blending colours together that need it and adding in any extra shades if it doesn't seem to be working correctly.



Now we've got a bit more refinement in our picture. Everything is fully shaded, and technically you can consider this finished, but it depends on if you want to add in more details or not. Me personally I normally add in small details things like shells, maybe a starfish or some extra lighting on the rocks and water.

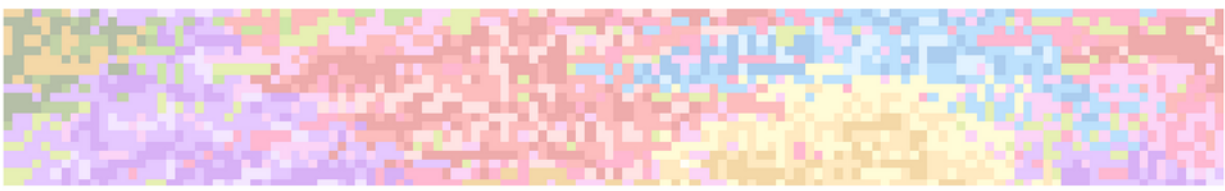


# Pixel Painting

Finished adding in my details and fixed up a couple of shadows I thought looked misplaced. The fun thing about painting is you can always go over the top of what you're doing, with pixel art as a whole it's not as difficult to do that since it's small and has few colours. I find the fewer colours you have the easier it is to edit.

Adding in a few bits and pieces, where you think it's too bare is perfectly fine. I quite often change entire parts of a picture even after it's been shaded because I think it could look better done in a different way, so playing with your palette etc can change the entire concept and feeling of your picture. So it doesn't have to be completely set in stone once you've done the sketch of it.

Have fun with it, that's the most important thing.



# Isometric Pixels

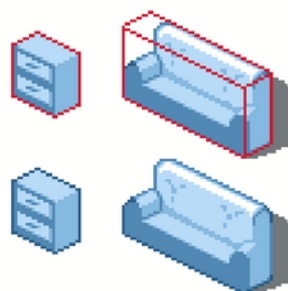
Isometric pixel art has been a commonly used style for people wanting a 3D look to their pixel art.



With isometric pixels you can change the angle of the camera quite easily with the amount of pixels in each 'block' the one on the left has 2 pixels for each angle, while the one on the right has only one.

The amount you use for your angle is up to you, I personally prefer to stick to two pixels as I find it's easier to work with.

You need to make sure all your lines match if you're going at an angle, otherwise it looks wonky/unbalanced. So you need to make sure you keep everything going at the same angle.



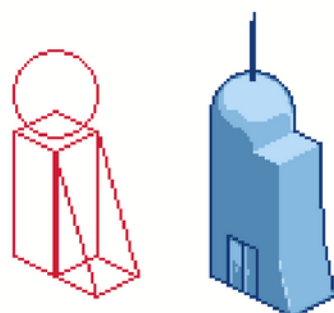
Using the basic cube you've got as a base, you can mold it into other things, like furniture.

You can curve the edges, make things smoother and turn it into other shapes.



# Isometric Pixels

There's not much of a limit when it comes to isometric, you can make small buildings from simple shapes using the same idea.



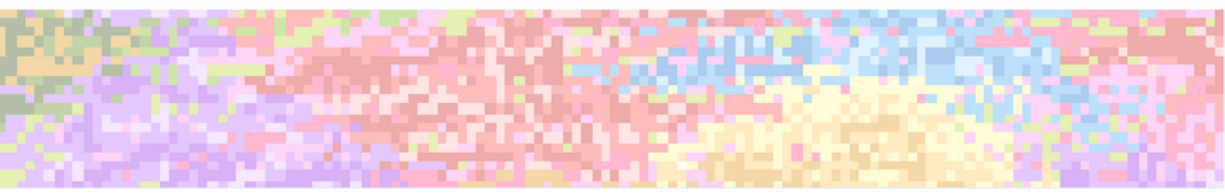
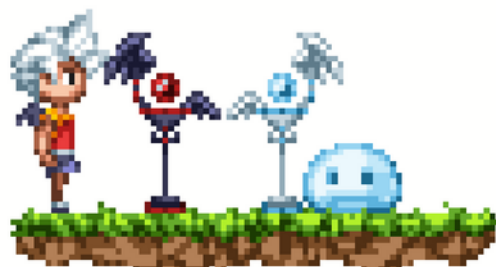
You can keep building onto the shape, and create something new from it. Even building things like a room doesn't become too much of a challenge once you get started.

This is how I started, I enjoy building rooms for sprites I used to make. Any sprite should fit in this kind of setting so long as you have it at the correct angle.

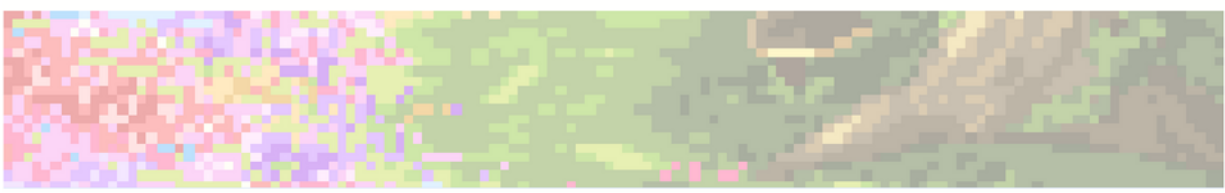


This is just a simple 3/4 view sprite I made, it fits well with the surrounding since it's going along with the same angle as the setting. So long as you follow the flow/angle of your setting you can put in almost anything without it sticking out.











# Stylising Your Work

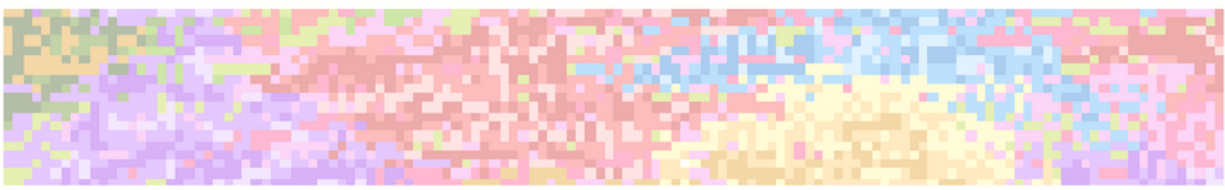
With every art form you can build a style behind it, things like your colours, how detailed, small or large your work is will create a different style.

For example, the older gameboy games were styled to have very few colours and very tiny sprites, while newer games can have larger more colourful sprites.



Other things like dark outlines, no outlines, bright or dark colours, very detailed or hardly coloured sprites are all going to contribute to what you're making. Playing around with styles until you find something you're happy with, or something that suits the theme you're going for is important.

It's not just in how you draw it, but also in its size, colour, how thick or thin the outlines are, how detailed it is, how bright or dull it looks. Everything contributes.



# Adding Volume and Depth

Something that often happens is making an object look flat with your shadows and lighting. This is something I used to have a lot of problem with.



We'll start with this tree, it's completely bare at the moment so we'll put some leaves on it.

I've added some leaves but it looks a little flat, even though we have our basic shadows and lighting, there's not a lot of real volume or depth to this tree.



This is more like it, the leaves at the front are more detailed, while the ones near the back are darker and have very little to nothing in the way of shadows or highlights. This gives it more volume and helps bring the illusion this tree is thick and full of leaves.

Adding more shadow to the branches of the tree help as well, it's more defined and you can tell there's more leaves to block out the light. So adding some shadows to the underbranches will help show that off a little bit more.

The same thing applies to backgrounds, things you want people to notice will be more detailed as they're closer to the camera, while the things off in the distance will be less detailed often a tiny bit harder to see. Looking at photographs for reference is always a good idea if you get confused.







# Old Pixel Works

The following pages are a compilation of all the pixel art I have done over the years. It's funny that only recently I realized just how much I seemed to enjoy making adoptable type stuff.

I hope you enjoy what I've made and I hope it inspires you to create something you enjoy. It doesn't matter how good or bad it looks, so long as you enjoy making it.

# Food



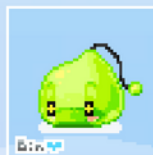
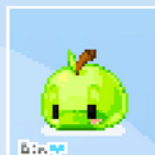
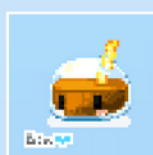
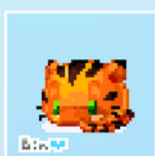


# Potions





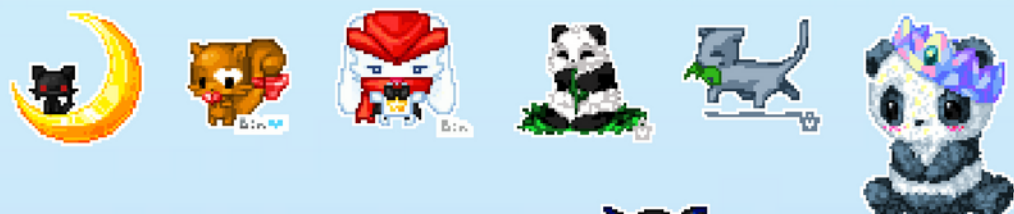
# Blobs





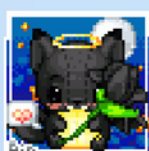


# Animals



B.O.T

Bin



Bin





# Fanart



# Sprites





# Sprites



# Sprites



# Sprites





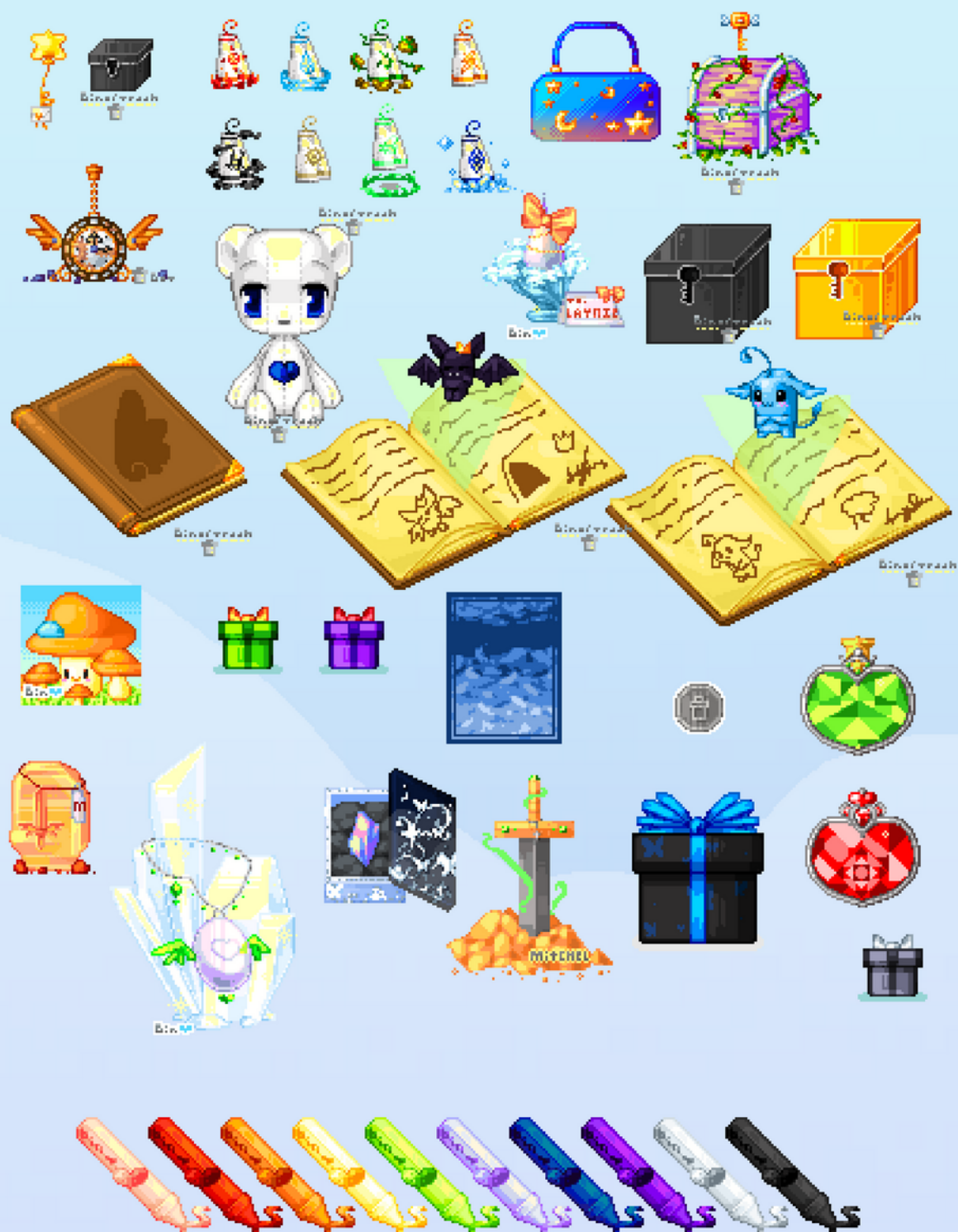
# Sprites



# Sprites



# Misc





Never give up on it. With time anyone can become good at something. It just takes a bit of effort.



2004



2015



2004



2015

I've been doing pixel art since 2004, I never thought I'd be at the level I am now. I still enjoy it as much as when I started.

# Thank you

Special thank you to my beloved Patrons, who  
allow me to keep doing this



Kikimonole

A dear friend who has always stuck up and  
been there for me.



omgitssoup

A very funny and witty guy, who is always  
there for others. A true gem.



MadJake45

Always a pleasure to talk to. Someone I'm  
quite happy to take the time out to have a  
chat with.



Duane Mason

A kind and happy person, it's always nice  
to get a message from you.



Jessica Conlins

You give without asking for anything in  
return, a truly noble and beautiful person  
both inside and out.



Kate Lambourne

Generous and very kind, it's a pleasure to  
have you pop up in my life.

# Thank you

Special thank you to my beloved Patrons, who  
allow me to keep doing this



Sawtooth44

Seriously I don't know what I'd have done without you, you helped me during hard times, always stick around to give me and others a laugh and are there no matter what happens. Thank you so much for everything you've done.

There's many other people I have to thank, all my friends and family. I don't know where I'd be without you. Thank you for letting me be myself, and for allowing me to bring the ideas I have in my mind to life.

Thank you, from the bottom of my heart.

My pixel works over the past ten years.

Along with various tutorials to help you  
guys get started in learning how to do it  
yourself.

