

楽しい ShaderToy

@gyabo

メガデモ勉強会 2013 Summer

目的

- ShaderToyというサイトをご紹介します
- OpenGL (GLSL)をある程度知っているとう具合がいいです
- こんな方におすすめ
 - FragmentShaderのフレームワークで手軽なのがなくて困ってる方
 - 動画処理時、思いついたShaderを試してみたいけど環境構築だるいなど
 - etc

[私]

@gyabo <Masaki Sasaki>

本業は組み込み屋さんです

もくじ

- ShaderToyとは
- 作品をみてる
- 作ってみる
- アカウント登録
- 作品を投稿してみる
- ShaderToyのここがすごい
- ShaderToyのここがこわい
- ShaderToyの今

ShaderToy とは

Shadertoy

<https://www.shadertoy.com/img/logomail.png>

ShaderToyとは

ブラウザ(WebGL)でFragmentShaderを書いたり
他の人が作成した美しいShaderをコード付きで
見る事ができるソーシャルなサイト！

www.shadertoy.com

※

BeautyPi(beautypi.com)が運営している



動作環境

ブラウザ + ゲームがある程度できるグラボが載ってるPCならOK

[ブラウザ]

- Chrome 23 (オススメです)
- Firefox 17
- InternetExplorer(IEWebGLのインストール必要)
- Safari 6

<https://www.shadertoy.com/about>より抜粋

サイト開くとこんな感じ


Shadertoy BETA

https://www.shadertoy.com

Shadertoy Search...

Browse New Shader Sign In

Shader of the Week




"The Inversion Mac..." by Kali 1376 13


Build and Share your best shaders with the world and get **Inspired**.

- Create your own shaders
- Make your creations react to music and videos
- Teach and learn from the best shader developers
- Share and connect by commenting and discussing


Featured shaders



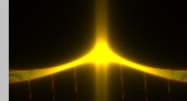
"Vector ..." by srtb 273 8



"Spiral ..." by syntax 99 5

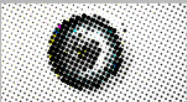


"Candles..." by P_Kaia 27 8




"Flappin..." by EitA 120 7

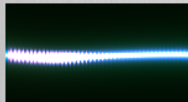
Recommended shaders



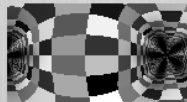
"CMYK Ha..." by ts 230 3




"Thumper" by jco 259 2



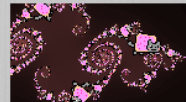
"Effect..." by Ark 336 1




"Tunnel ..." by reid 149 0



"Emboss" by P_M 282 2



"Fractal..." by iq 685 10



"Sparks" by vanb 303 8

Latest contributions

- attempt to port cdak 4 hours ago
- Flying Spheres 7 hours ago
- Scharr Filter 20 hours ago
- Annotated Reference Spectrum Vis 41 hours ago
- Grass 41 hours ago

Headlines

- 13/07/2013 - Release 0.3 brings Web-Cam support, a new front page and minor bug fixes!
- 11/07/2013 - Shadertoy will be presented at Siggraph 2013! Check out the "Real-Time Live!" website for more info. <http://s2013.siggraph.org/attendees/real-time-live>
- 10/07/2013 - The Solskogen demoparty happening this weekend in Norway has a Shadertoy competition. Join us and participate! <http://www.solskogen.no/>
- 09/07/2013 - Release 0.2.2: "Public - Not Listed" shaders that can be shared (using URL) without being listed by our search engine or the browse page

About Guidelines Send Feedback Terms & Privacy f t by BeautyPi

作品をみてる

Shadertoy

<https://www.shadertoy.com/img/logomail.png>

その1 : 面白そうなのを適当にクリック

The screenshot shows the Shadertoy website interface. At the top, there's a browser window with the URL <https://www.shadertoy.com>. The site header includes the Shadertoy logo, a search bar, and navigation links for "Browse", "New Shader", and "Sign In".

The main content area features a "Shader of the Week" section with a large thumbnail of a complex, dark, geometric structure. Below it, there's a section titled "Build and Share your best shaders with the world and get Inspired." with a list of bullet points:

- Create your own shaders
- Make your creations react to music and videos
- Teach and learn from the best shader developers
- Share and connect by commenting and discussing

Below this is a "Featured shaders" section displaying a grid of smaller thumbnail images, each with a title and user information. Examples include "The Inversion Mac...", "Vector ...", "Spiral ...", "Candles...", "Flappin...", "CMYK Ha...", "Thumper", "Effect...", "Tunnel ...", "Emboss", "Fractal...", and "Sparks".

At the bottom, there's a "Latest contributions" section with a list of recent uploads and their timestamps. A "Headlines" section follows, containing several news items related to the site's development and community events.

At the very bottom, there are links for "About", "Guidelines", "Send Feedback", "Terms & Privacy", and social media icons for Facebook and Twitter. The footer also includes the text "by BeautyPi".

見た目面白そう、ヤバそうなのを適当に選んでみる

画面の説明

The screenshot displays the Shadertoy website interface. At the top, the browser address bar shows the URL `https://www.shadertoy.com/view/Xss3DH`. The website header includes the Shadertoy logo, a search bar, and navigation links for 'Welcome gyabo', 'Browse', 'New Shader', 'Profile', and 'Logout'. The main content area is split into two columns. The left column features a video player showing a 3D rendered scene of a lit candle on a wooden table, with a glass and a card nearby. Below the video, the title 'Candlestick' is displayed, along with tags 'raymarch, flame, iterative, candle', the uploader's name 'P_Malin', and the upload date '17/7/2013'. A red arrow points to the view count '234', like count '8', and comment count '8'. Below this, a list of user comments is visible, with a red arrow pointing to the text 'ビュー数、イイネ数、コメント数 投稿した人の名前など'. The right column shows the GLSL shader code for the scene, titled 'Shader Inputs'. A red arrow points to the code, with the text 'ShaderCode (GLSL)'. At the bottom of the code editor, there are four small preview windows labeled 'iChannel0' through 'iChannel3', with a red arrow pointing to them and the text 'スゴイ級の方々のコメント!'. The footer of the website includes 'About', 'Guidelines', 'Send Feedback', 'Terms & Privacy', social media icons for Facebook and Twitter, and the text 'by Beautypi'.

ShaderCode (GLSL)

ビュー数、イイネ数、コメント数
投稿した人の名前など

スゴイ級の方々のコメント!

その2: これまでに投稿されたShaderを見てみる

Shadertoy BETA

https://www.shadertoy.com

Shadertoy Search...

Browse New Shader Sign In

Shader of the Week

Browseをクリック!

Build and Share your best shaders with the world and get **Inspired**.

- Create your own shaders
- Make your creations react to music and videos
- Teach and learn from the best shader developers
- Share and connect by commenting and discussing

Featured shaders

"The Inversion Mac..." by Kali 1376 13

"Vector ..." by srls 273 8

"Spiral ..." by syntax 99 5

"Candles..." by P_Kaia 27 8

"Flappin..." by EitA 120 7

Recommended shaders

"CMYK Ha..." by ts 230 3

"Thumper" by jco 259 2

"Effect..." by Ark 336 1

"Tunnel ..." by reid 149 0

"Emboss" by P_M 282 2

"Fractal..." by iq 685 10

"Sparks" by vanb 303 8

Latest contributions

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- 09/07/2013 - Release 0.2.2: "Public - Not Listed" shaders that can be shared (using URL) without being listed by our search engine or the browse page

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すごいShaderがいっぱい表示される！

The screenshot shows the Shadertoy website interface. At the top, there's a browser window with the URL <https://www.shadertoy.com/browse>. The website header includes the Shadertoy logo, a search bar, and navigation links: "Welcome gyabo | Browse | New Shader | Profile | Logout". Below the header, there are tabs for "Popular", "Newest", and "Love". The main content area displays a grid of 12 shader thumbnails, each with a title and view/love counts. The thumbnails include: "Clouds" by iq (10572 views, 55 loves), "Flame" by XT95 (8959 views, 40 loves), "Elevated" by iq (6779 views, 49 loves), "The road to Hell" by rez (6128 views, 22 loves), "Cubescape" by iq (5272 views, 16 loves), "Main Sequence Star" by flight404 (4436 views, 27 loves), "Piano" by iq (4200 views, 26 loves), "Catacombs" by iq (3655 views, 34 loves), "Mike" by iq (3212 views, 17 loves), "Volcanic" by iq (2910 views, 10 loves), "Insect" by iq (2867 views, 14 loves), and "The Cave" by BoyC (2821 views, 34 loves). At the bottom of the grid, there are page numbers: 1, 2, 3, ..., 71. Below the screenshot, there is a line of Japanese text: "これは人気順(Popular), ほかに最近の投稿(Newest), お気に入り数(Love)でソートすることができます". At the very bottom of the screenshot, there are footer links: "About | Guidelines | Send Feedback | Terms & Privacy" and social media icons for Facebook and Twitter, along with the text "by Beautypi".

851 shaders: Popular Newest Love

Search...

Welcome gyabo | Browse | New Shader | Profile | Logout

10572 55
"Clouds" by iq

8959 40
"Flame" by XT95

6779 49
"Elevated" by iq

6128 22
"The road to Hell" by rez

5272 16
"Cubescape" by iq

4436 27
"Main Sequence Star" by flight404

4200 26
"Piano" by iq

3655 34
"Catacombs" by iq

3212 17
"Mike" by iq

2910 10
"Volcanic" by iq

2867 14
"Insect" by iq

2821 34
"The Cave" by BoyC

1 2 3 ... 71

これは人気順(Popular), ほかに最近の投稿(Newest), お気に入り数(Love)でソートすることができます

About | Guidelines | Send Feedback | Terms & Privacy | f | t | by Beautypi

作ってみる

Shadertoy

<https://www.shadertoy.com/img/logomail.png>

お手軽に試したい場合


Shadertoy BETA

https://www.shadertoy.com

Shadertoy Search...

Browse **New Shader** Sign In

Shader of the Week




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New Shaderをクリック!


Featured shaders



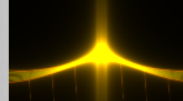
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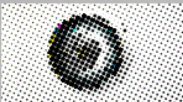


"Candles..." by P_K 27 8




"Flappin..." by Eit 120 7

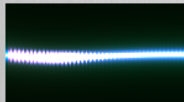
Recommended shaders




"CMYK Ha..." by ts 230 3




"Thumper" by jco 259 2



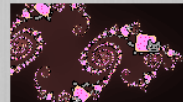
"Effect..." by 4rk 336 1



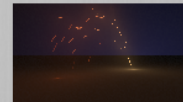
"Tunnel ..." by reit 149 0



"Emboss" by P_M 282 2



"Fractal..." by iq 685 10



"Sparks" by vanb 303 8

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New Shaderひらいた画面

https://www.shadertoy.com/new

Shadertoy Search...

Browse New Shader Sign In

```
Shader Inputs
uniform vec3 iResolution; // viewport resolution (in pixels)
uniform float iGlobalTime; // shader playback time (in seconds)
uniform float iChannelTime[4]; // channel playback time (in seconds)
uniform vec4 iMouse; // mouse pixel coords. xy: current (if MLB down), zw: click
uniform samplerXX iChannel0..3; // input channel. XX = 2D/Cube
uniform vec4 iDate; // (year, month, day, time in seconds)
```

```
1 void main(void)
2 {
3     vec2 uv = gl_FragCoord.xy / iResolution.xy;
4     gl_FragColor = vec4(uv, 0.5+0.5*sin(iGlobalTime), 1.0);
5 }
```

Warning

You are not logged in to Shadertoy - you won't be able to submit your shader

31.05 59.9 fps

105 chars ?

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画面の使い方



The screenshot shows the ShaderToy website interface. On the left, a video player displays a colorful gradient from blue to red. Below the video, red text reads "レンダリング結果と経過時間とFPS". To the right, a code editor shows GLSL code for "Shader Inputs" and a "void main(void)" function. Red text below the code says "Shaderが書ける場所すぐ書ける!". At the bottom right, four black squares represent "リソースチャンネル". The footer contains navigation links and the text "by Beautypi".

https://www.shadertoy.com/new

Shader Inputs

```
uniform vec3   iResolution; // viewport resolution (in pixels)
uniform float  iGlobalTime; // shader playback time (in seconds)
uniform float  iChannelTime[4]; // channel playback time (in seconds)
uniform vec4   iMouse; // mouse pixel coords. xy: current (if MLB down), zw: click
uniform samplerXX iChannel0..3; // input channel. XX = 2D/Cube
uniform vec4   iDate; // (year, month, day, time in seconds)
```

```
1 void main(void)
2 {
3     vec2 uv = gl_FragCoord.xy / iResolution.xy;
4     gl_FragColor = vec4(uv, 0.5+0.5*sin(iGlobalTime), 1.0);
5 }
```

Shaderが書ける場所
すぐ書ける！

レンダリング結果と
経過時間とFPS

リソースチャンネル

Created by None in 14/1/2013

105 chars ?

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リソースチャンネルをクリックすると
プリセットが選べる(Texture, 音楽、動画、Webcam...)

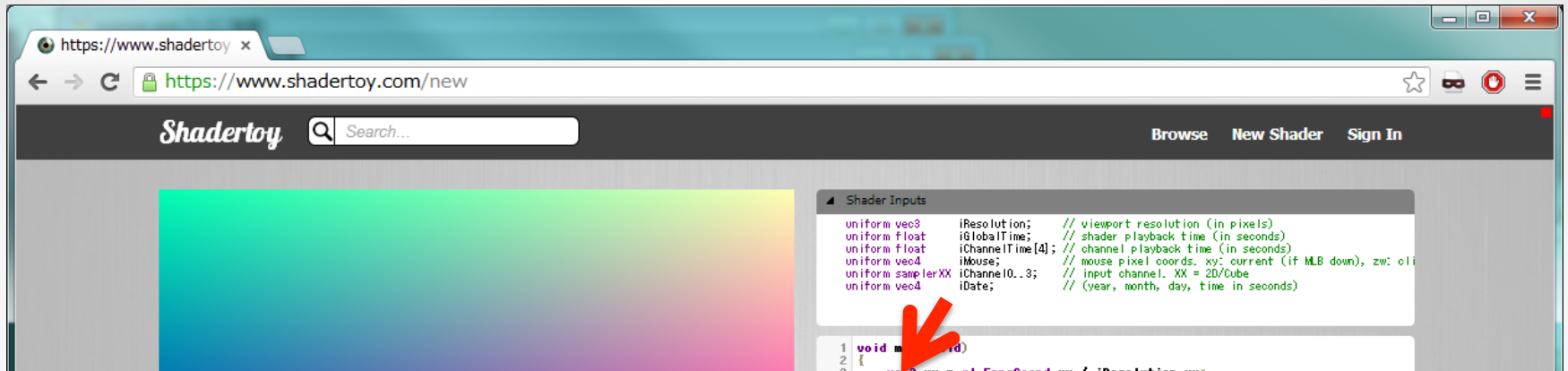
The screenshot shows the ShaderToy website interface. A 'Select Input' dialog box is open, displaying various resource categories:

- No Input**
- Textures**: A grid of 10 texture thumbnails with their respective dimensions and color channels (e.g., 512 x 512 rgb, 1024 x 1024 rgb).
- Videos / Webcam**: A row of 4 video thumbnails with durations (e.g., 34s, 3m 40s, 29s) and a 'Webcam' option.
- Cubemaps**: A row of 5 cubemap thumbnails with dimensions (e.g., 512x512, 64x64, 256x256, 64x64, 128x128, 64x64).
- Music**: A row of 5 music thumbnails with titles and durations (e.g., Electronebulae 4m 18s, Experiment 3m 48s, 8 bit mentality 3m 25s, XTrackTure 3m 50s, ourpithyator 7m 32s).

Red text overlay on the right side of the dialog box reads: **選ぶとそのチャンネルにリソースが入る**

At the bottom of the page, there are links for 'About', 'Guidelines', 'Send Feedback', and 'Terms & Privacy', along with social media icons for Facebook and Twitter. The footer also includes 'by Beautypi'.

用意してくれているUniform変数がいくつかあります

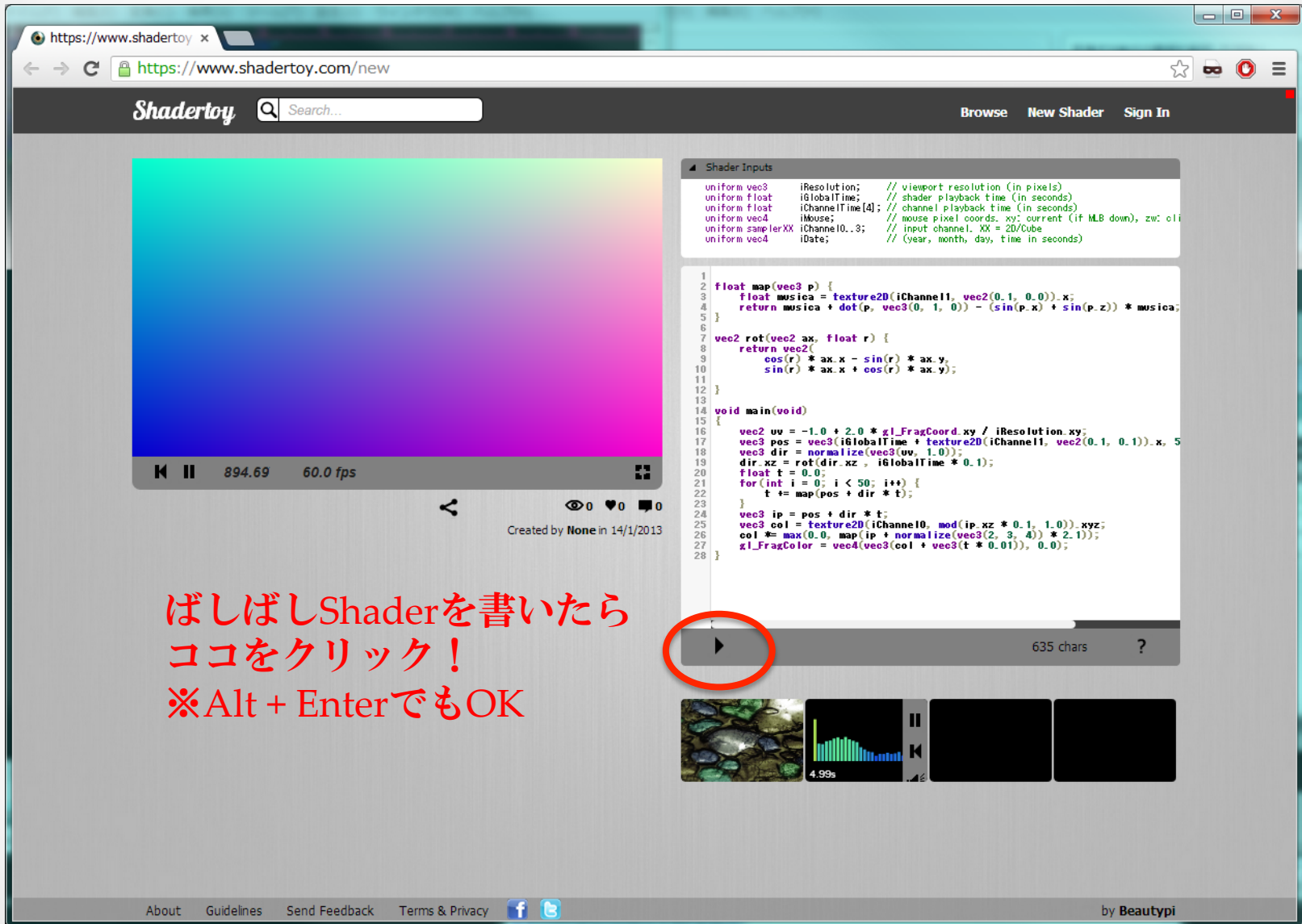


Shader Inputs

```
uniform vec3    iResolution; // viewport resolution (in pixels)
uniform float   iGlobalTime; // shader playback time (in seconds)
uniform float   iChannelTime[4]; // channel playback time (in seconds)
uniform vec4    iMouse; // mouse pixel coords. xy: current (if MLB down), zw: click
uniform samplerXX iChannel0..3; // input channel. XX = 2D/Cube
uniform vec4    iDate; // (year, month, day, time in seconds)
```

```
1 void main(void)
2 {
3     vec2 uv = gl_FragCoord.xy / iResolution.xy;
4     gl_FragColor = vec4(uv, 0.5+0.5*sin(iGlobalTime), 0.5+0.5*cos(iGlobalTime), 1.0);
}
```


使い方はShaderを書いたらコンパイルの繰り返し



The screenshot shows the Shadertoy website interface. On the left is a preview window displaying a colorful gradient. On the right is a code editor with a 'Shader Inputs' section and a main code area. A red circle highlights the play button in the code editor's toolbar. Below the code editor, there are thumbnails for other shaders and a waveform visualization.

https://www.shadertoy.com/new

Shadertoy Search...

Browse New Shader Sign In

Shader Inputs

```
uniform vec3 iResolution; // viewport resolution (in pixels)
uniform float iGlobalTime; // shader playback time (in seconds)
uniform float iChannelTime[4]; // channel playback time (in seconds)
uniform vec4 iMouse; // mouse pixel coords. xy: current (if MLB down), zw: click
uniform samplerXX iChannel0..3; // input channel. XX = 2D/Cube
uniform vec4 iDate; // (year, month, day, time in seconds)
```

```
1
2 float map(vec3 p) {
3     float musica = texture2D(iChannel1, vec2(0.1, 0.0)).x;
4     return musica + dot(p, vec3(0, 1, 0)) - (sin(p.x) + sin(p.z)) * musica;
5 }
6
7 vec2 rot(vec2 ax, float r) {
8     return vec2(
9         cos(r) * ax.x - sin(r) * ax.y,
10        sin(r) * ax.x + cos(r) * ax.y);
11 }
12
13
14 void main(void)
15 {
16     vec2 uv = -1.0 + 2.0 * gl_FragCoord.xy / iResolution.xy;
17     vec3 pos = vec3(iGlobalTime + texture2D(iChannel1, vec2(0.1, 0.1)).x, 5
18     vec3 dir = normalize(vec3(uv, 1.0));
19     dir.xz = rot(dir.xz, iGlobalTime * 0.1);
20     float t = 0.0;
21     for(int i = 0; i < 50; i++) {
22         t += map(pos + dir * t);
23     }
24     vec3 ip = pos + dir * t;
25     vec3 col = texture2D(iChannel0, mod(ip.xz * 0.1, 1.0)).xyz;
26     col *= max(0.0, map(ip + normalize(vec3(2, 3, 4)) * 2.1));
27     gl_FragColor = vec4(vec3(col + vec3(t * 0.01)), 0.0);
28 }
```

Created by None in 14/1/2013

635 chars ?

ばしばしShaderを書いたら
ココをクリック！
※Alt + EnterでもOK

About Guidelines Send Feedback Terms & Privacy f t by BeautyPi

表示される！たのしい！



The screenshot shows the ShaderToy website interface. The browser address bar displays `https://www.shadertoy.com/new`. The website header includes the "ShaderToy" logo, a search bar, and navigation links for "Browse", "New Shader", and "Sign In".

The main content area features a 3D rendered scene of a landscape with glowing, colorful terrain. Below the scene is a video player with playback controls and a timestamp of `1290.83` at `60.0 fps`. To the right of the scene, the "Shader Inputs" section lists uniform variables: `uniform vec3 iResolution;`, `uniform float iGlobalTime;`, `uniform float iChannelTime[4];`, `uniform vec4 iMouse;`, `uniform samplerXX iChannel0..3;`, and `uniform vec4 iDate;`. Below this is the GLSL shader code, which includes functions for mapping, rotation, and a main loop that updates position and color based on time and channel data.

At the bottom of the page, there is a footer with links for "About", "Guidelines", "Send Feedback", and "Terms & Privacy", along with social media icons for Facebook and Twitter. The text "by Beautypi" is also present.

リソース変えて調子をみたり
音楽にあわせて動かしたりなどで
色々具合を見る事ができます

画面はただの板ポリゴンです



The screenshot shows the Shadertoy website interface. At the top, there's a search bar and navigation links for 'Browse', 'New Shader', and 'Sign In'. The main content area features a video player on the left displaying a stone texture with a play button, a pause button, and a frame rate of 59.9 fps. To the right of the video is a code editor titled 'Shader Inputs' and 'main(void)'. The code is as follows:

```
Shader Inputs
uniform vec3   iResolution; // viewport resolution (in pixels)
uniform float  iGlobalTime; // shader playback time (in seconds)
uniform float  iChannelTime[4]; // channel playback time (in seconds)
uniform vec4   iMouse; // mouse pixel coords. xy: current (if MLB down), zw: click
uniform samplerXX iChannel0..3; // input channel. XX = 2D/Cube
uniform vec4   iDate; // (year, month, day, time in seconds)

1 void main(void)
2 {
3   vec2 uv = -1.0 + 2.0 * gl_FragCoord.xy / iResolution.xy;
4   gl_FragColor = vec4(texture2D(iChannel0, uv).xyz);
5 }
```

Below the code editor, there's a red text overlay: **上はただテクスチャを表示するだけのGLSLCode**. At the bottom of the code editor, it shows '111 chars' and a question mark icon.

Below the video player, there's a share icon, view count (0), heart count (0), and comment count (0). Below that, it says 'Created by None in 14/1/2013'.

At the bottom of the page, there's a footer with 'About', 'Guidelines', 'Send Feedback', 'Terms & Privacy', social media icons for Facebook and Twitter, and 'by Beautypi'.

立体的な画像を出すには
Raytrace, Raymarching, FakeEffect...
など、ある程度定番の工夫が必要です。

※
ほかの人のShaderをまねして改造するのが上達する近道！

アカウント登録

Shadertoy

<https://www.shadertoy.com/img/logomail.png>

Sign In をクリックする！

The screenshot shows the Shadertoy website interface. At the top, there is a navigation bar with the Shadertoy logo, a search bar, and links for "Browse", "New Shader", and "Sign In". The "Sign In" link is circled in red, and a red arrow points to it from the text "Sign In をクリックする！" (Click Sign In!). Below the navigation bar, the main content area features a "Shader of the Week" section with a large image of a complex, dark, geometric structure. To the right of this section is a call to action: "Build and Share your best shaders with the world and get Inspired." followed by a list of features: "Create your own shaders", "Teach and learn from the best shader developers", "Make your creations react to music and videos", and "Share and connect by commenting and discussing". Below this is another red text prompt: "Sign In をクリック！" (Click Sign In!). The main content area also includes sections for "Featured shaders" and "Recommended shaders", each displaying a grid of small thumbnail images of various shaders. At the bottom, there are sections for "Latest contributions" and "Headlines" with text updates. The footer contains links for "About", "Guidelines", "Send Feedback", "Terms & Privacy", and social media icons for Facebook and Twitter, along with the text "by BeautyPi".

アカウントを作成する

Shadertoy BETA

Question - Google 検索

https://www.shadertoy.com/signin

Shadertoy Search...

Browse New Shader Sign In

Sign In

Username

Password

[Can't access your account? Click.](#)

Create Account

Username

Email

Password

Repeat Password

Tip: Your username and password should have at least two characters, even though we recommend stronger password to protect yourself.

必要な情報を詰めて
Sign Upをクリック

すると
確認用メールが飛ぶ。

チェックすれば
登録完了。

一度登録したら↑で
再びログインできる

About Guidelines Send Feedback Terms & Privacy

by Beautypi

サインインしたら、プロフィール画面を開いてみる

The screenshot shows the ShaderToy website homepage. The browser's address bar displays "https://www.shadertoy.com". The navigation menu at the top includes "Welcome gyabo", "Browse", "New Shader", "Profile", and "Logout". The "Profile" link is circled in red, and a red arrow points to it from the right. The main content area features a "Shader of the Week" section with a large image of a complex 3D structure. Below this is a "Build and Share your best shaders with the world and get Inspired." section with a list of bullet points: "Create your own shaders", "Teach and learn from the best shader developers", "Make your creations react to music and videos", and "Share and connect by commenting and discussing". The "Featured shaders" section displays a grid of eight shader thumbnails with their titles and creator names. The "Recommended shaders" section also displays a grid of eight thumbnails. The "Latest contributions" section lists recent uploads with their titles and upload times. The "Headlines" section contains three news items with dates and links. The footer includes links for "About", "Guidelines", "Send Feedback", "Terms & Privacy", and social media icons for Facebook and Twitter, along with the text "by Beautypi".

ShaderToy BETA | Question - Google 検索

https://www.shadertoy.com

Welcome gyabo | Browse | **New Shader** | Profile | Logout

Shader of the Week

Build and Share your best shaders with the world and get **Inspired**.

- Create your own shaders
- Teach and learn from the best shader developers
- Make your creations react to music and videos
- Share and connect by commenting and discussing

Featured shaders

"The Inversion Mac..." by Kali 1408 ❤️ 3

"yet ano..." by Antonalog 82 ❤️ 2

"Industry" by Solskogen 8 ❤️ 8

"LivingK..." by Kali 12 ❤️ 12

"Out You..." by Solskogen 6 ❤️ 6

Recommended shaders

"Waves" by Solskogen 1 ❤️ 1

"Thumper" by Solskogen 2 ❤️ 2

"Just Tr..." by Solskogen 5 ❤️ 5

"Logotyp..." by Solskogen 4 ❤️ 4

"Implici..." by Solskogen 3 ❤️ 3

"Moonlight" by Solskogen 11 ❤️ 11

"Fire" by Solskogen 1010 ❤️ 12

Latest contributions

- Flying Spheres 13 hours ago
- Scharr Filter 25 hours ago
- Annotated Reference Spectrum Vis 46 hours ago
- Grass 47 hours ago
- Distort Close 49 hours ago

Headlines

13/07/2013 - Release 0.3 brings WebCam support, a new front page and minor bug fixes!

11/07/2013 - ShaderToy will be presented at **Siggraph 2013**! Check out the "Real-Time Live!" website for more info.
<http://s2013.siggraph.org/attendees/real-time-live>

10/07/2013 - The Solskogen demoparty happening this weekend in Norway has a ShaderToy competition. Join us and participate!
<http://www.solskogen.no/>

09/07/2013 - Release 0.2.2: "Public - Not Listed" shaders that can be shared (using URL) without being listed by our search engine or the browse page

About | Guidelines | Send Feedback | Terms & Privacy | f | t | by Beautypi

作ったShaderを見たり、管理する事ができます

The screenshot shows the Shadertoy website profile page for user 'gyabo'. The browser address bar shows 'https://www.shadertoy.com/profile'. The page has a dark header with the Shadertoy logo, a search bar, and navigation links: 'Welcome gyabo | Browse New Shader Profile Logout'. The main content area is divided into several sections:

- Profile Information:** Username: gyabo, Email: gyaboyan@gmail.com, Member since: February 25, 2013, 7:02 am, Reputation: 671 toys. A privacy notice states: 'Privacy: Your email isn't visible to other users. View your Public Profile.'
- Change password:** A form with fields for 'Current Password', 'New Password', and 'Repeat New Password', and an 'Update' button. A tip reads: 'Tip: Your password should have at least two characters even though we recommend stronger password to protect yourself'.
- Delete Your Account:** A form with a 'Password' field and a 'Delete All' button. A note states: 'Note: You will not be able to recover your information later on.'
- Config:** A section for profile settings, including a 'Profile Pictures' upload button, a checked checkbox for 'Receive social notifications', and a 'Save' button.
- Listed (public):** A table showing public shaders with columns for Name, Date, Views, and Options (Delete).
- Not Listed (public):** A section indicating 'No submitted shaders'.
- Drafts (private):** A table showing private drafts with columns for Name, Date, Views, and Options (Delete).

Large text overlays are present on the page:

- 'プロフ絵' (Profile Picture) is overlaid on the profile information section.
- '公開中のShader' (Public Shaders) is overlaid at the bottom left.
- '下書中のShader' (Draft Shaders) is overlaid at the bottom right.

The footer contains links for 'About', 'Guidelines', 'Send Feedback', 'Terms & Privacy', social media icons for Facebook and Twitter, and the text 'by Beautypi'.

作品を投稿してみる

Shadertoy

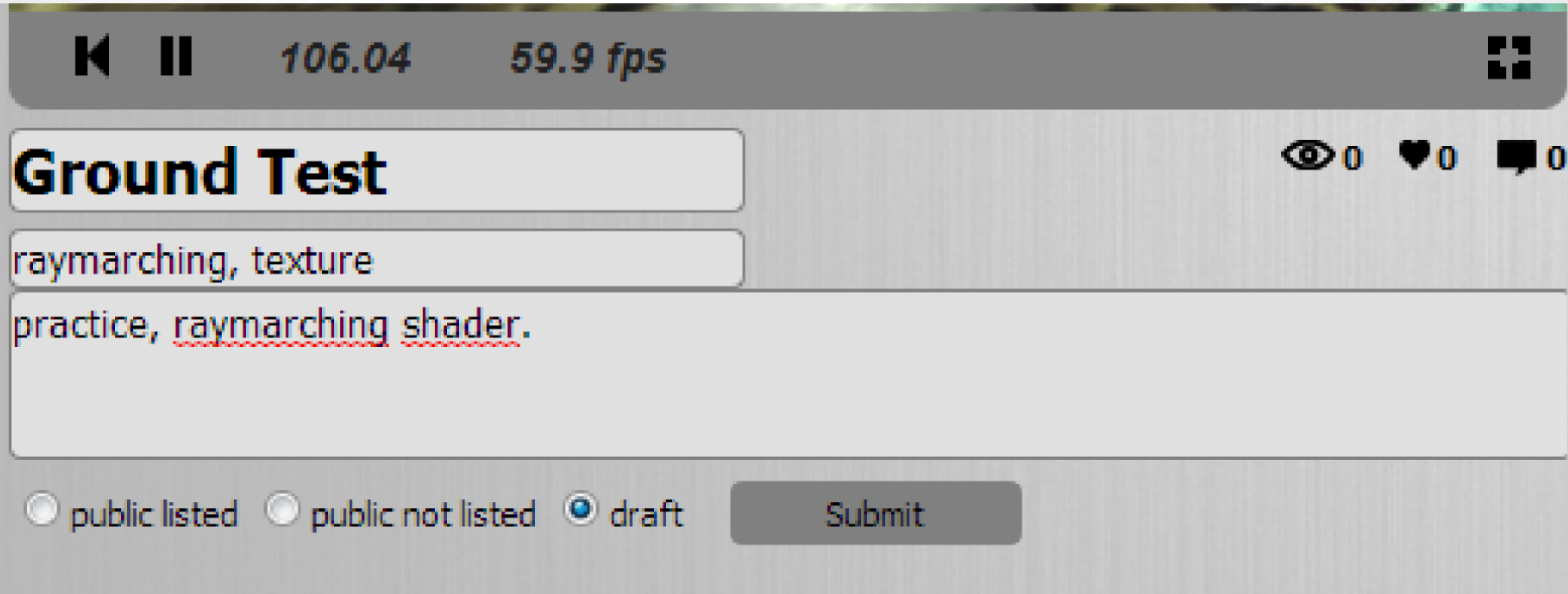
<https://www.shadertoy.com/img/logomail.png>

投稿するには同じようにNew Shader選んで編集

The screenshot shows the Shadertoy website interface. At the top, there's a navigation bar with "Welcome gyabo | Browse New Shader Profile Logout". The main content area is split into two columns. The left column features a 3D rendered scene of a textured sphere with a complex, colorful pattern. Below the scene is a control bar with play/pause, stop, and FPS/Resolution indicators (106.04, 59.9 fps). A red box highlights a form for editing the shader, containing a title field "Ground Test", a description field with "raymarching, texture" and "practice, raymarching shader.", and radio buttons for "public listed", "public not listed", and "draft". The right column displays the GLSL code for the shader, starting with "float map(vec3 p) {" and ending with "x1_FragColor = vec4(vec3(col + vec3(t * 0.01)), 0.0);". Below the code is a character count "691 chars" and a question mark. At the bottom, there are social media icons for Facebook and Twitter, and a footer with "About Guidelines Send Feedback Terms & Privacy" and "by Beautyti".

↑に作品名、関連タグ、コメントを書くのだが...

作品名などを埋めてSubmitすれば投稿できる



The screenshot shows a video player interface with a submission form. At the top, there are playback controls: a back arrow, a play/pause button, the time '106.04', the frame rate '59.9 fps', and a full-screen button. Below the video area, the title 'Ground Test' is displayed in a large font. To the right of the title are icons for views (0), likes (0), and comments (0). Below the title is a text input field containing 'raymarching, texture'. Below that is a larger text area containing 'practice, raymarching shader.'. At the bottom, there are three radio buttons for visibility: 'public listed', 'public not listed', and 'draft' (which is selected). To the right of these buttons is a 'Submit' button.

Publicが公開用の
設定(どっちでも良い)

Draftは下書きなどに使用する。
※一時保存でよく使う
最初はDraftで様子を見てから
Publicにして投稿するのがベスト

Publicで投稿すると、browser -> Newestに載る！

The screenshot shows the Shadertoy website interface. At the top, there's a navigation bar with the Shadertoy logo, a search bar, and user options like 'Welcome gyabo', 'Browse', 'New Shader', 'Profile', and 'Logout'. Below the navigation bar, there's a header with '851 shaders:' and tabs for 'Popular', 'Newest', and 'Love'. A large text overlay reads '見てくれた方が感想をくれるかもしれません！'. The main content area displays a grid of 12 shader demos, each with a thumbnail image, a title, the author's name, and view/love counts. A red arrow points to the first demo, 'Ground Test' by gyabo. The footer contains links for 'About', 'Guidelines', 'Send Feedback', 'Terms & Privacy', social media icons for Facebook and Twitter, and the text 'by Beautypi'.

Shadertoy BETA x

https://www.shadertoy.com/results?query=&sort=newest

Shadertoy Search...

Welcome gyabo | Browse New Shader Profile Logout

851 shaders: Popular Newest Love

見てくれた方が感想をくれるかもしれません！

"Ground Test" by gyabo 0 0

"Flying Spheres" by martin_shirokov 24 0

"Scharr Filter" by thenumbernine 23 0

"Annotated Refer..." by guycook 38 1

"Grass" by simulation 51 0

"Distort Close" by wakka 34 0

"Distort" by wakka 41 0

"Mandelbrot Evol..." by asti 31 1

"Candlestick" by P_Malin 239 8

"Vector Graphic" by srtuss 289 8

"emphasing textures" by FabriceNeyre 71 1

"Kaleidoscopic w..." by gleurop 49 0

1 2 3 ... 71

About Guidelines Send Feedback Terms & Privacy f t by Beautypi

ShaderToyのここがすごい

Shadertoy

<https://www.shadertoy.com/img/logomail.png>

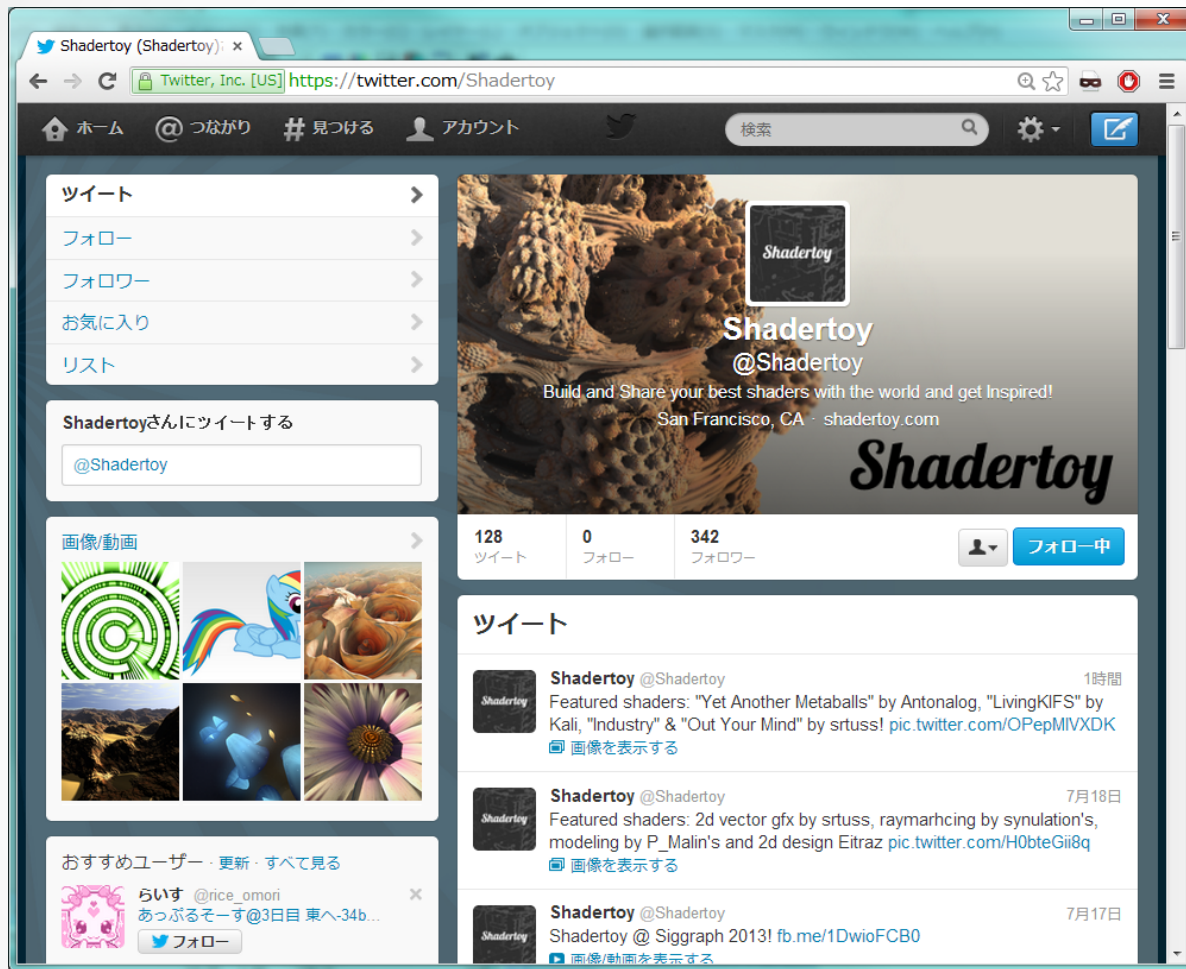
作成したShaderに対してコメントがもらえる!

The screenshot shows the ShaderToy website interface. At the top, there's a navigation bar with 'Welcome gyabo | Browse | New Shader | Profile | Logout'. The main content area features a video player for the 'neg-color' shader, which displays a colorful, abstract raymarched scene. Below the video, the title 'neg-color' is shown along with tags like 'raymarching' and 'Fake neg color.'. There are also options to set the shader's visibility (public listed, public not listed, draft) and a 'Save' button. A comments section is visible, showing several user comments with their avatars and timestamps. A large, semi-transparent text overlay in the center of the page reads 'スゴイ方からコメントもらえちゃったりします' (You can receive comments from amazing people!). On the right side, a 'Shader Inputs' section displays the GLSL code for the shader, including uniforms for resolution, time, mouse, and date, and a main function that implements a raymarching algorithm.

```
Shader Inputs
uniform vec3  iResolution; // viewport resolution (in pixels)
uniform float iGlobalTime; // shader playback time (in seconds)
uniform float iChannelTime[4]; // channel playback time (in seconds)
uniform vec2  iMouse; // mouse pixel coords. xy: current (if MLB down), zw: click
uniform samplerXX iChannel[0..3]; // input channel. XX = 2D/Cube
uniform vec4  iDate; // (year, month, day, time in seconds)

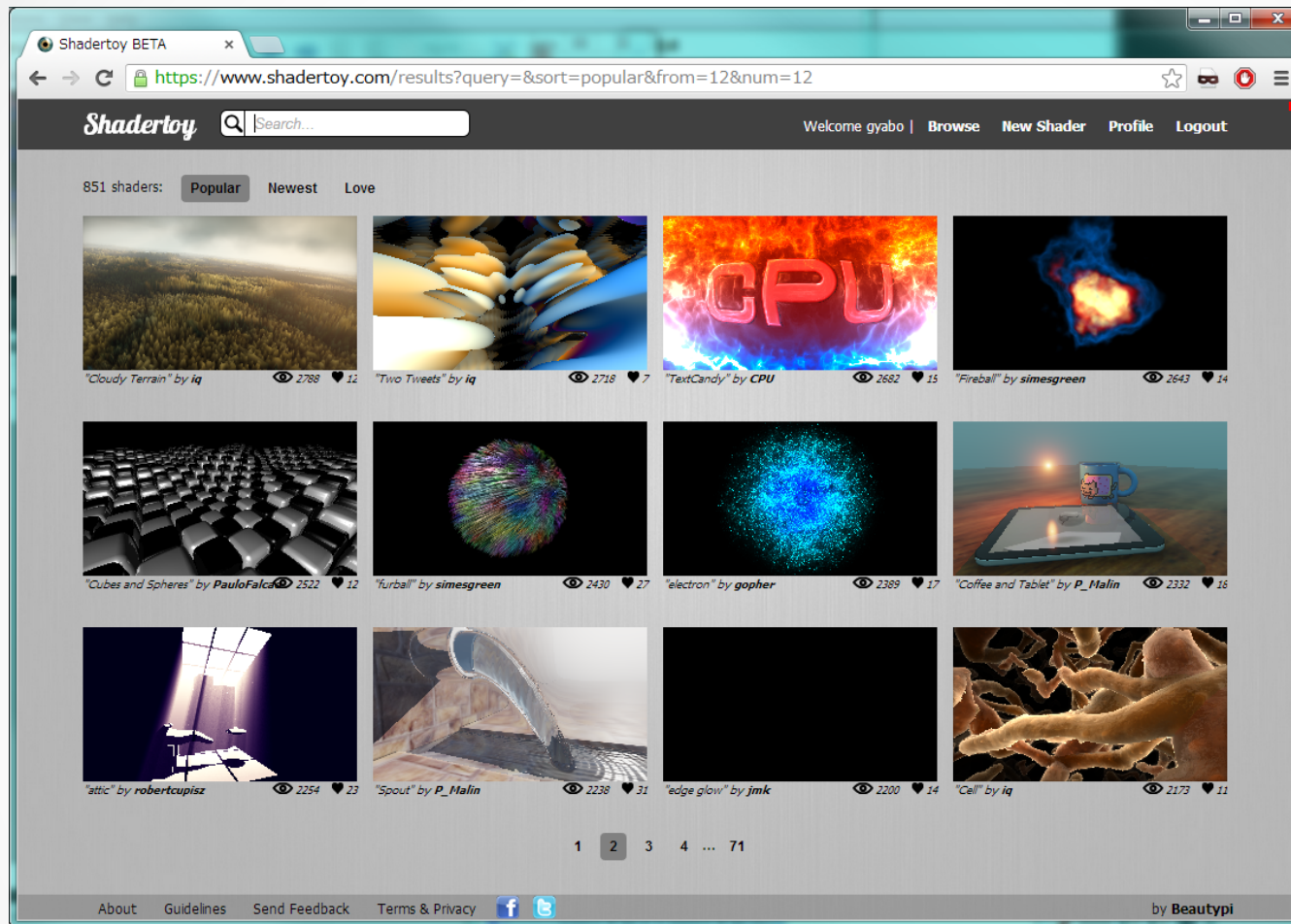
1 float bf(vec2 p, float r) { return length(abs(mod(p, 10.0)) - 5.0) - r; }
2 vec2 rot(vec2 p, float a) { return vec2(p.x * cos(a) - p.y * sin(a), p.x *
3
4 float map(vec3 p) {
5   float k = 5.0 - dot(abs(p), vec3(0, 1, 0)) + (cos(p.z) + cos(p.x)) * 0.
6   return max(max(k, -bf(p.xz, 4.0)), -bf(p.zy, 3.5));
7 }
8
9 void main( void ) {
10  vec3 dir = normalize(vec3( vec2(iResolution.x / iResolution.y, 1.0) * (
11    float a = -iGlobalTime * 0.1;
12    dir.xz = rot(dir.xz, sin(a * 4.0));
13    dir.xy = rot(dir.xy, -a);
14    vec3 pos = vec3(iGlobalTime * 4.0, 0, iGlobalTime * 7.0);
15    vec3 npos = pos;
16    float t = 0.0;
17    for(int i = 0; i < 75; i++) {
18      npos = pos + dir * t;
19      t += map(npos);
20    }
21    vec3 c1 = vec3(1, 2, 3);
22    vec3 col = 0.1 * mix(c1, c1.yzx, t * 0.7) * map(npos * abs(vec3(8, 11,
23    x1_FragColor = vec4(1.5-abs(sqrt(3.0 - col) + t * 0.01), 1.0 );
24  }
25 }
```

公式Twitterで具合の良いShaderが紹介される



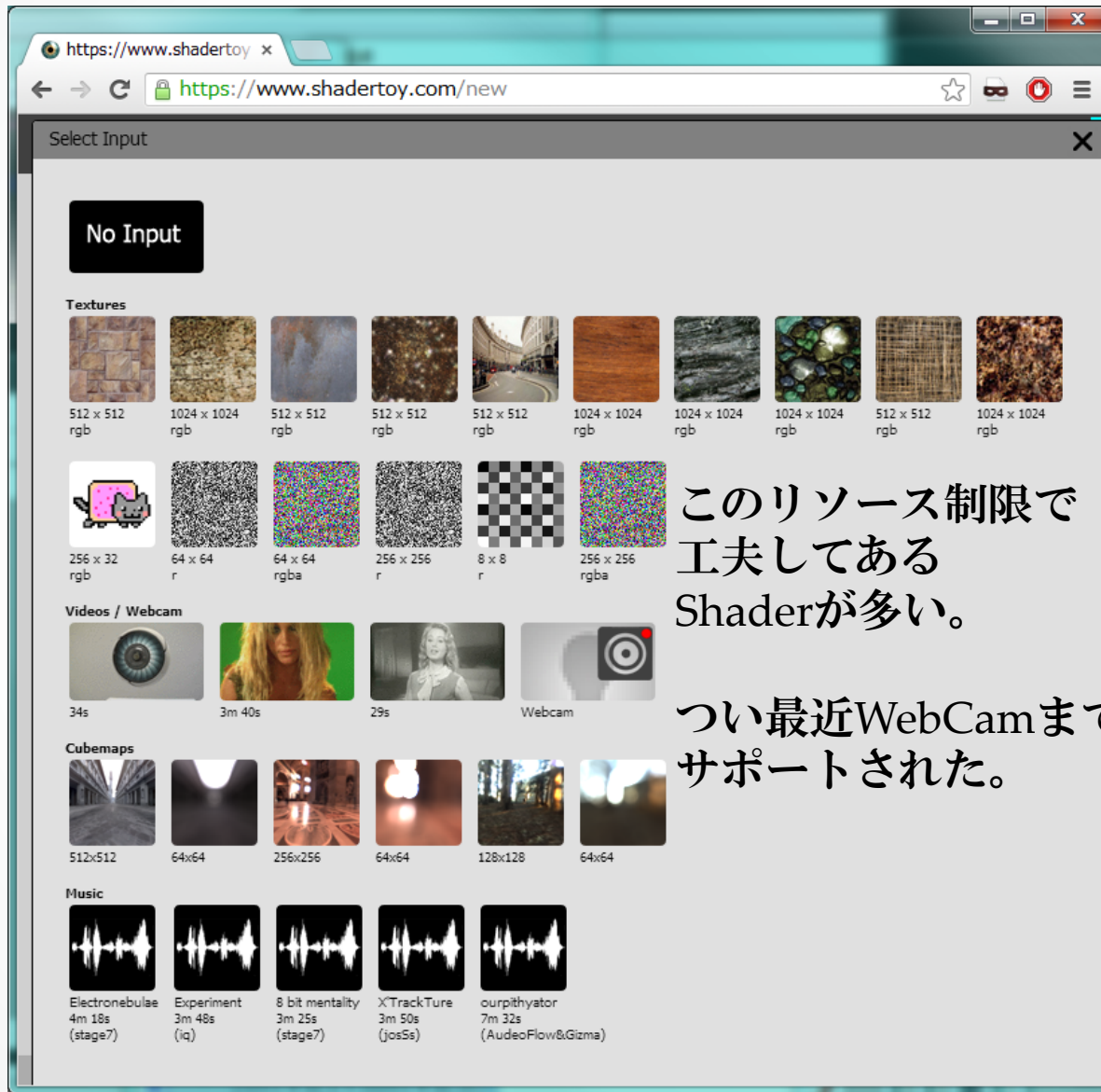
掲載基準はよくわからない。
単純にView数やライイネ数かな...

非常にレベルが高いShaderが多い



アカウント登録している為か
ほどよい緊張感の為か...

プリセットが豊富(GLSL SandBoxと大きく異なる)



このリソース制限で工夫してある Shaderが多い。

つい最近WebCamまでサポートされた。

ShaderToyのここがこわい

Shadertoy

<https://www.shadertoy.com/img/logomail.png>

投稿した作品に 不具合があるとメールが飛んでくる！

Shadertoy Community - Problem Notice

受信トレイ x



Shadertoy <info@shadertoy.com>

3月4日 ☆



To 自分 ▾

英語 ▾ > 日本語 ▾ [メッセージを翻訳](#)

次の言語で無効にする: 英語 x

Shadertoy

Dear gyabo,

Thanks a lot for your `shader` "string", <https://www.shadertoy.com/view/4sXGR8>

Unfortunately WebGL seems to be a pretty fragile technology still today, and we have observed that this `shader` is not showed as designed on Chrome for Mac and Linux. Still today WebGL is not standard, especially regarding loop instructions, INF numbers or NaNs.

Our team does not change your code without your permission. Instead, we want to ask if you could take some time to modify the `shader` so all users of Shadertoy get to see your shaders as you intended them to be seen! However, since your `shader` works just fine on your current development platform and you cannot easily reproduce the issue, we make ourselves available for testing the `shader` or fixing any code if you don't have the time. Just let us know.

ざっくりとした意味

Sincerely,

「あなたが投稿したShaderはこちらでは変更しないけど
きちんと動作するように変更して再投稿してほしい」

The Shadertoy Team

不具合とは？

ShaderToyのガイドラインで以下は避けてと記載

- NaNな計算
- ループ回数多すぎてコンパイル中にブラウザ上でタイムアウト発生したり
- 30fps確保できていない?ものなど
(※環境に拠ると思う)

最悪rejectされる(publicからdraftに強制的に戻る)

※最近変なの投稿していないので、
もしかしたら挙動変わってるかも

ガイドラインは？

Shadertoy BETA

https://www.shadertoy.com

Shadertoy Search...

Welcome gyabo | Browse | New Shader | Profile | Logout

Shader of the Week

Build and Share your best shaders with the world and get **Inspired**.

- Create your own shaders
- Teach and learn from the best shader developers
- Make your creations react to music and videos
- Share and connect by commenting and discussing

"The Inversion Mac..." by Kali 1415 13

"yet another..." by Antonalog 89 2

"Industrial..." by srtuss 264 8

"Living..." by N112 225 112

"Out Y6..." by srtuss 88y 6

Recommended shaders

"Fire..." by simesgreen 2643 14

"Voxel..." by Dave_Hoskins 88y 4

"Night..." by nikat 269 3

"old school..." by triggerHLM 187 1

"Beer..." by H86u 0

"Ang..." by 1451q 20

"Wave..." by bonniem 1857 1

Latest contributions

- **Ground Test** 41 minutes ago
- **Flying Spheres** 14 hours ago
- **Scharr Filter** 27 hours ago
- **Annotated Reference Spectrum Vis** 48 hours ago
- **Grass** 48 hours ago

Headlines

13/07/2013 - **Release 0.3** brings WebCam support, a new front page and minor bug fixes!

11/07/2013 - Shadertoy will be presented at **Siggraph 2013**! Check out the "Real-Time Live!" website for more info. <http://s2013.siggraph.org/attendees/real-time-live>

10/07/2013 - The **Solskogen** demoparty happening this weekend in Norway has a Shadertoy competition. Join us and participate! <http://www.solskogen.no/>

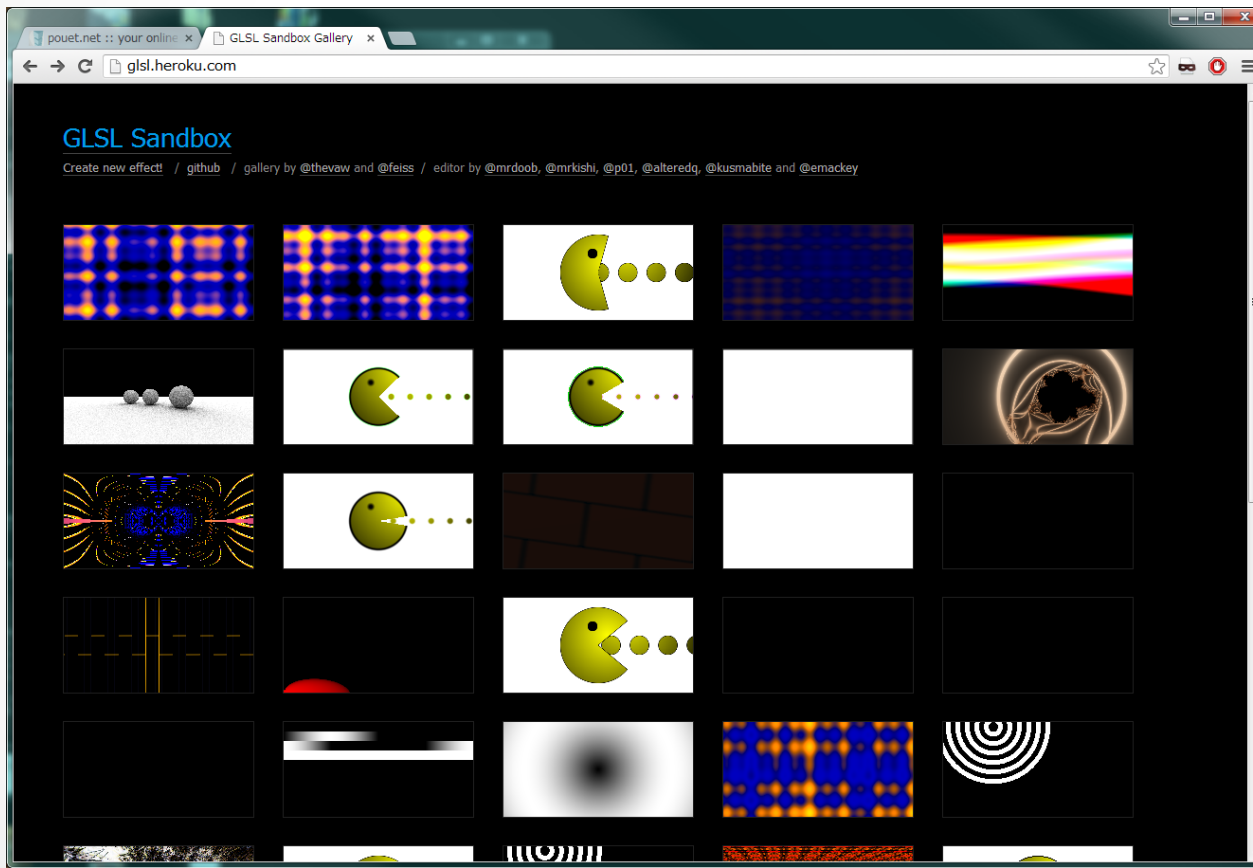
09/07/2013 - **Release 0.2.2**: "Public - Not Listed" shaders that can be shared (using URL) without being listed by our search engine or the browse page

About Guidelines Send Feedback Terms & Privacy

by BeautyPi

警告のおかげか

作った方が懸命に直しているのか、動作しないShaderが殆ど無い。



クリックしても
再生できない時
割とかなしい

<http://gsls.herokuapp.com/>

ShaderToyの今

Shadertoy

<https://www.shadertoy.com/img/logomail.png>

Siggraph2013でLiveCodingするっぽい

The image is a screenshot of a web browser displaying the SIGGRAPH 2013 website. The browser's address bar shows the URL: `s2013.siggraph.org/attendees/real-time-live/events/shadertoy-live-coding-reactive-shaders`. The page header features the SIGGRAPH 2013 logo and the text: "Conference 21-25 July 2013", "Exhibition 23-25 July 2013", and "Anaheim Convention Center". There are social media icons for Facebook, Google+, Twitter, YouTube, and RSS, along with a search bar.

A navigation bar below the header contains links: "For Submitters", "For Volunteers", "For Attendees", "For the Media", and "For Exhibitors & Advertisers".

The main content area features a large banner image of a colorful, abstract landscape with a "Register Now!" button. Below the banner, the page is titled "Shadertoy: Live Coding for Reactive Shaders". The event details are as follows:

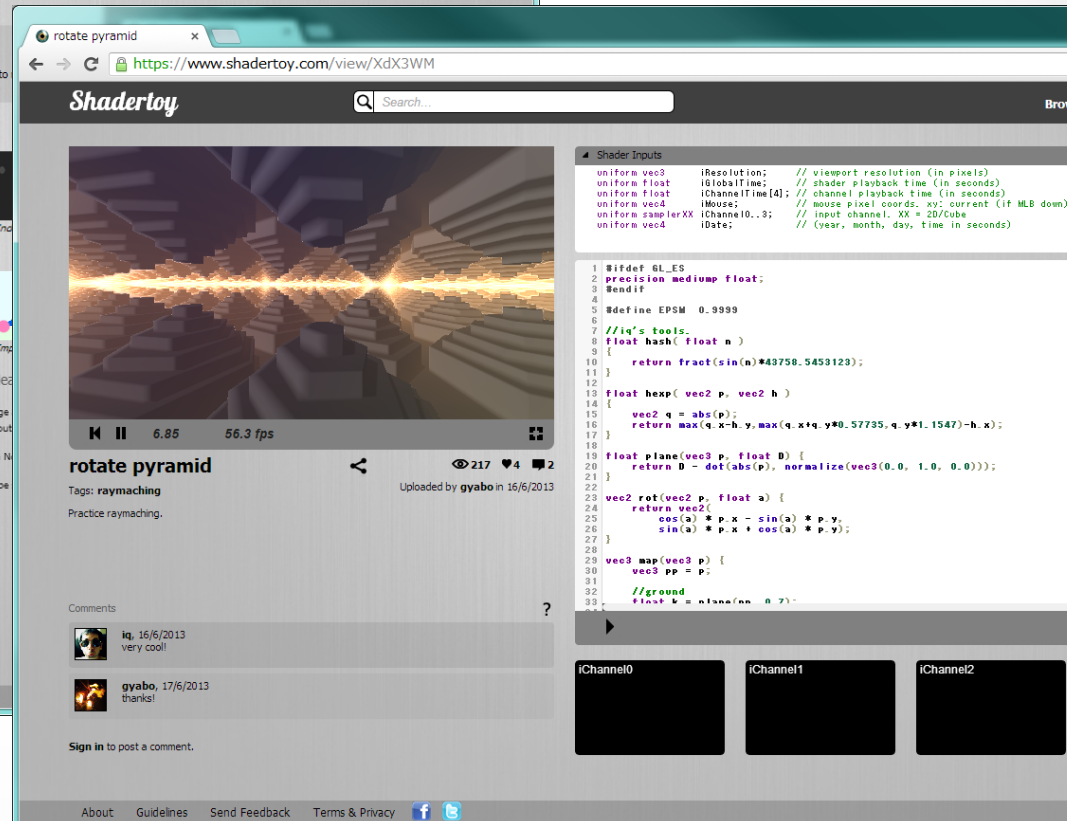
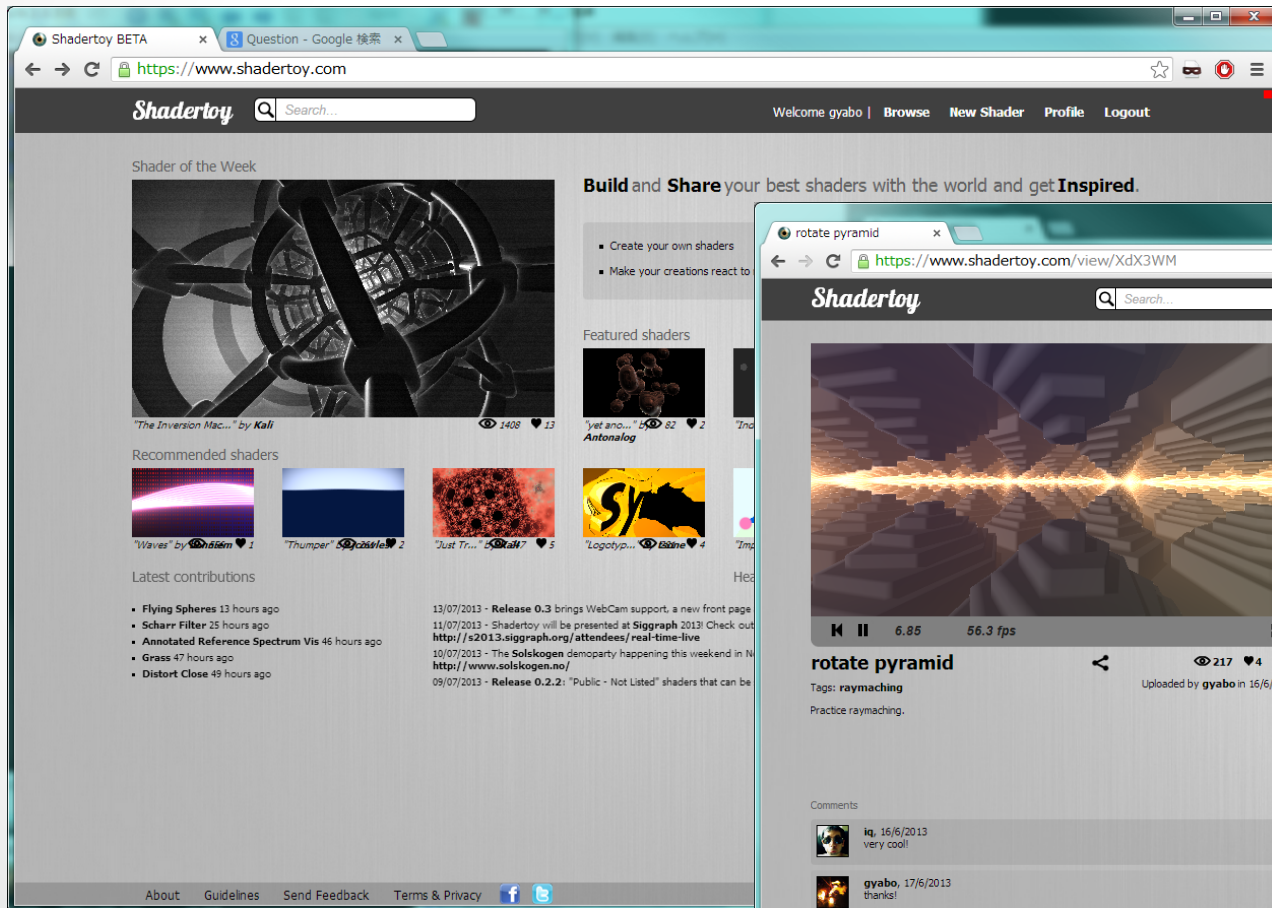
- Real-Time Live!
- TUESDAY, JULY 23, 2013 - 5:30PM TO 7:00PM
- Anaheim Convention Center | Hall A

A video player shows a 3D landscape with the title "Elevated". To the right of the video, the text reads: "At SIGGRAPH 2012, after Beautypi showed visuals on stage that reacted to music and controllers that could interact with the audience, many people expressed interest in building similar visuals. For SIGGRAPH 2013, Beautypi introduces Shadertoy, a web tool that allows developers all over the globe to push pixels from code to screen using WebGL. Developers..."

On the left side of the page, there are social media links for Facebook, Google Plus, and Twitter.

まとめ

豊富なリソースが提供されているブラウザ環境での お試しShaderを作る時などに重宝するし、なにより動いてるの投稿したりしてたのしい！



おわり

ご清聴ありがとうございました！

Question?



遊ぶ為に知っておくといいこと

