

# Быстрый веб-сервис

На примере Пиксель-трекера

# Немного обо мне



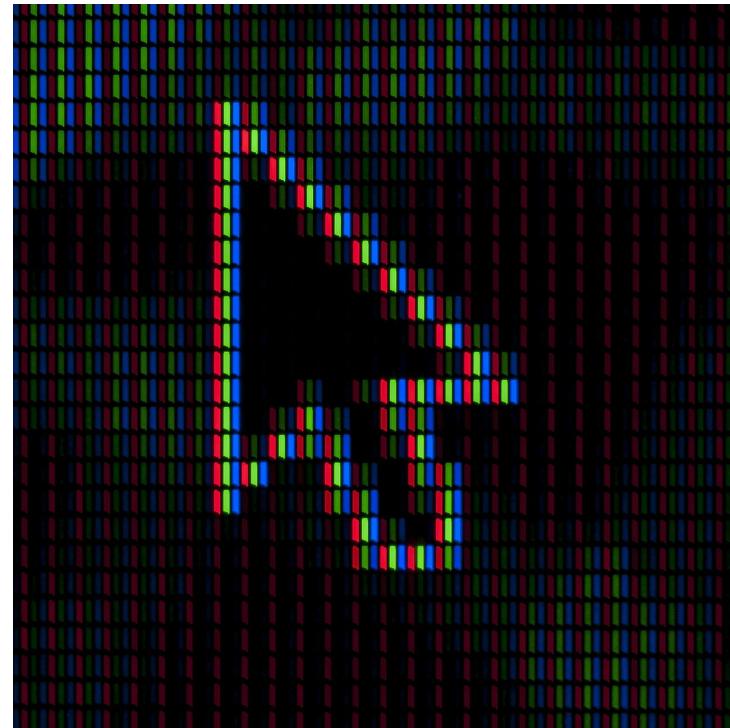
[linkedin.com/in/roman-romadin/](https://linkedin.com/in/roman-romadin/)

[medium.com/@romanitalian](https://medium.com/@romanitalian)

[github.com/romanitalian](https://github.com/romanitalian)

[t.me/RomanRomadin](https://t.me/RomanRomadin)

# Что такое трекер



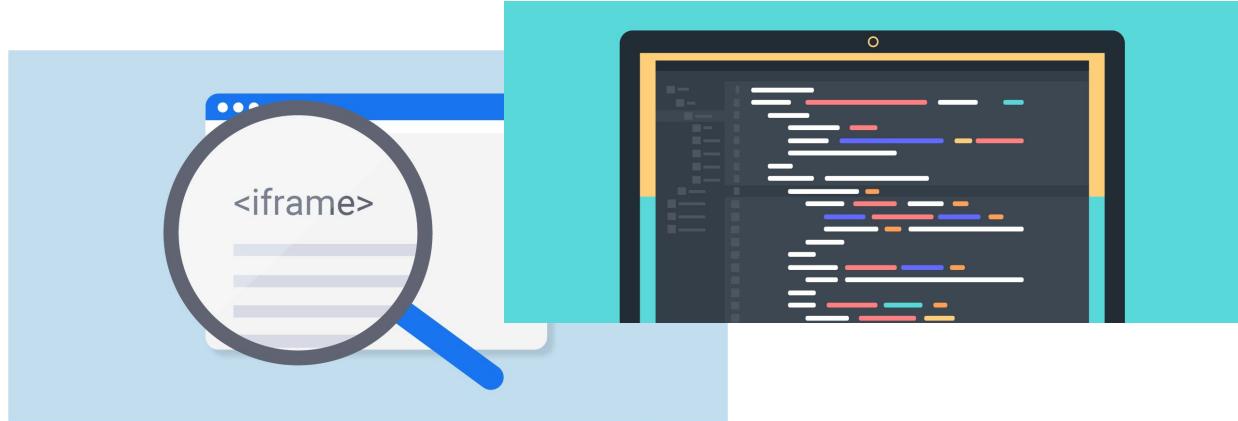
# Типы трекеров

- iframe - NO



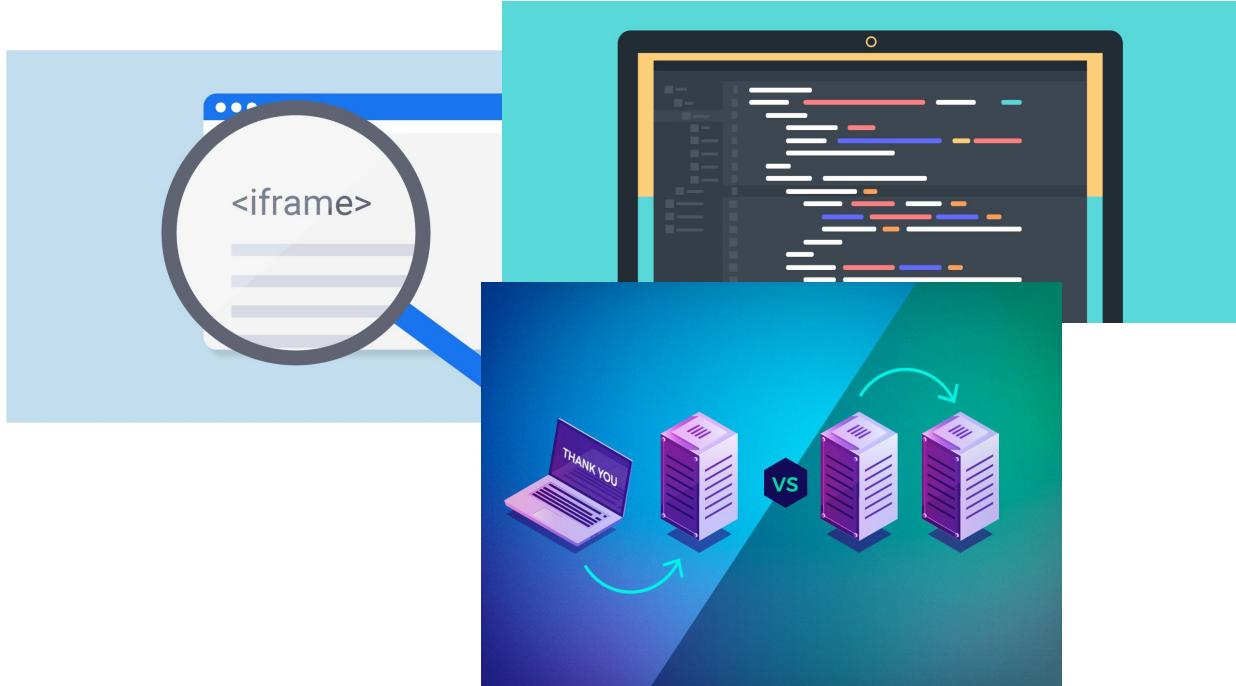
# Типы трекеров

- iframe - NO
- JS - NO



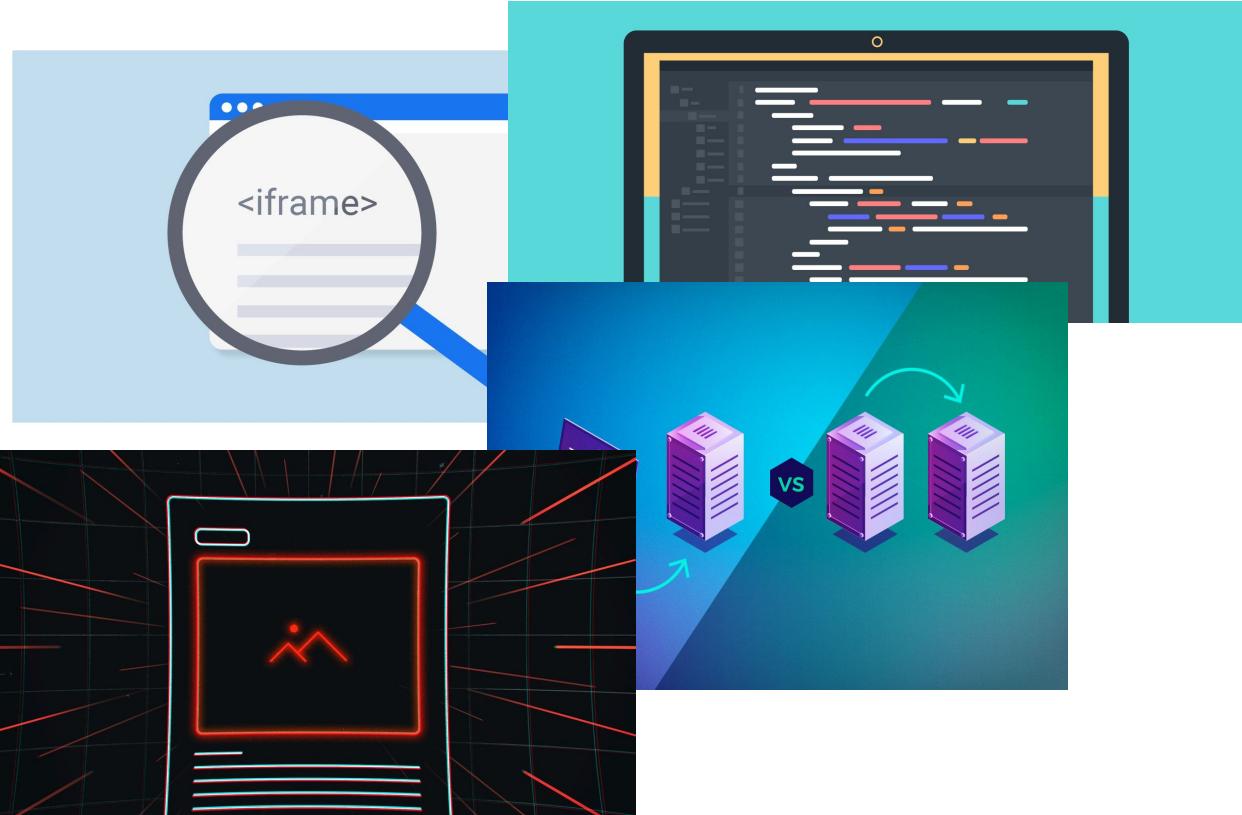
# Типы трекеров

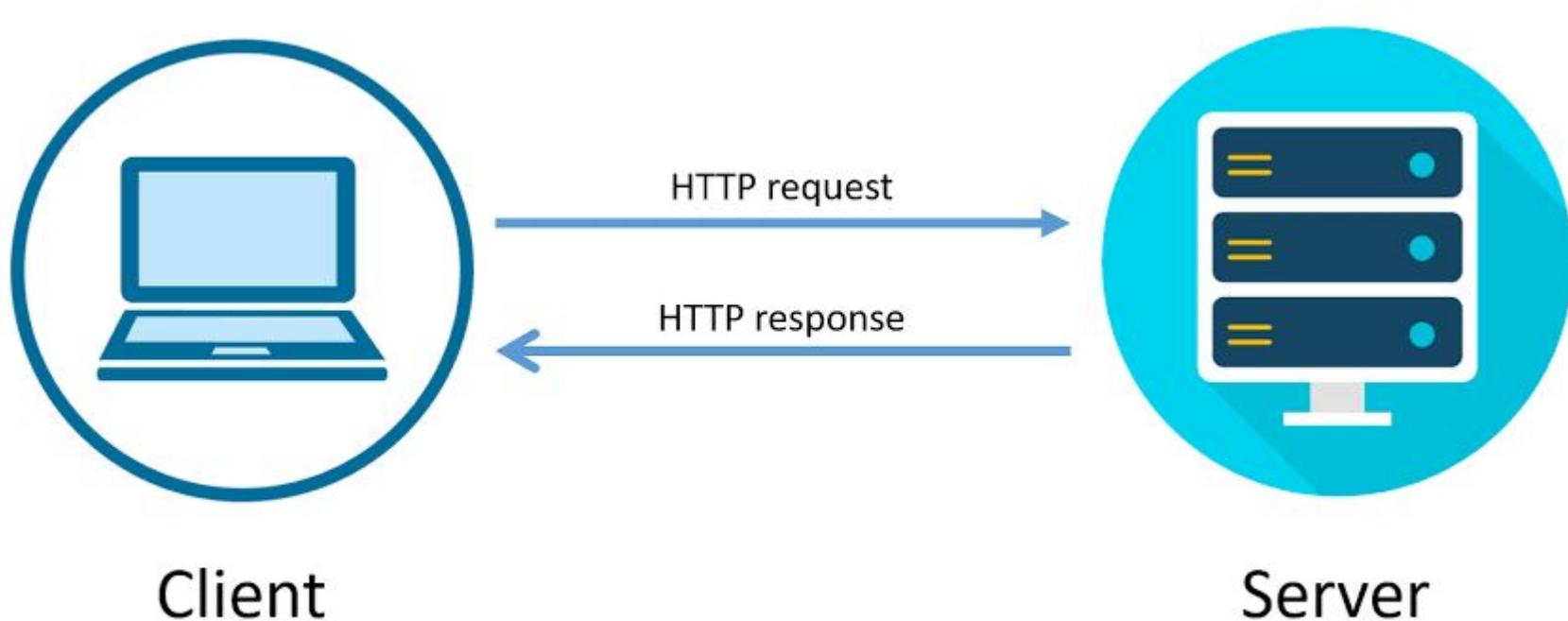
- iframe - NO
- JS - NO
- S2S postback - NO



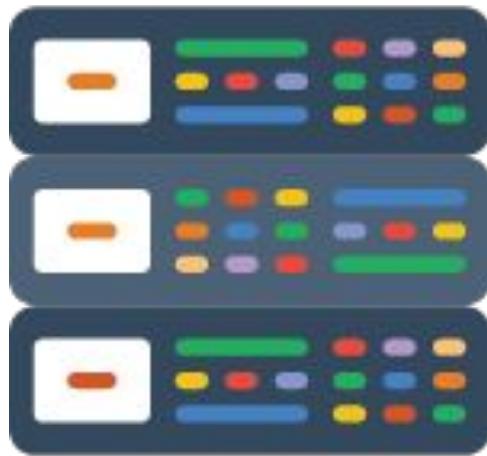
# Типы трекеров

- iframe - NO
- JS - NO
- S2S postback - NO
- image - YES

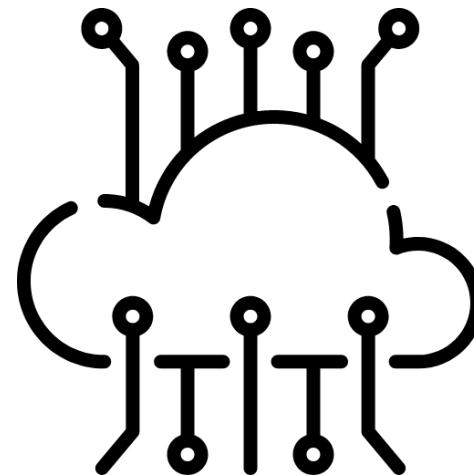




Свой сервер или облако



VS

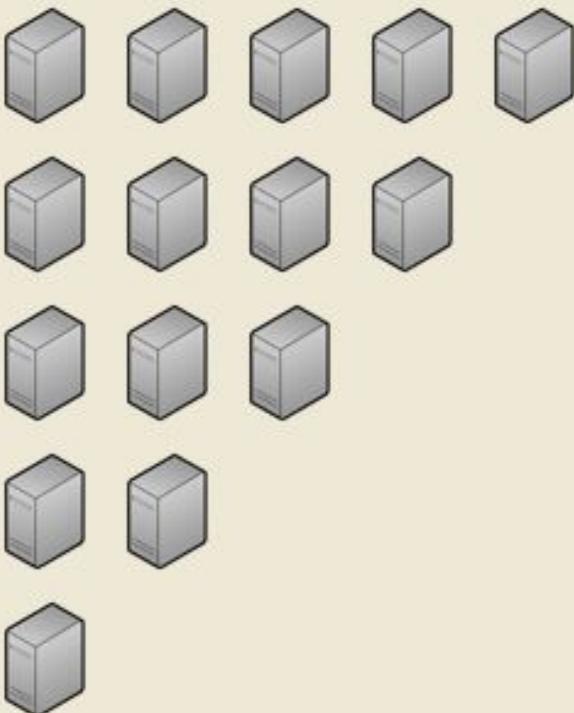


# Vertical



vs.

# Horizontal





Плюсы и минусы “стороннего” решения



Почему свой трекер?

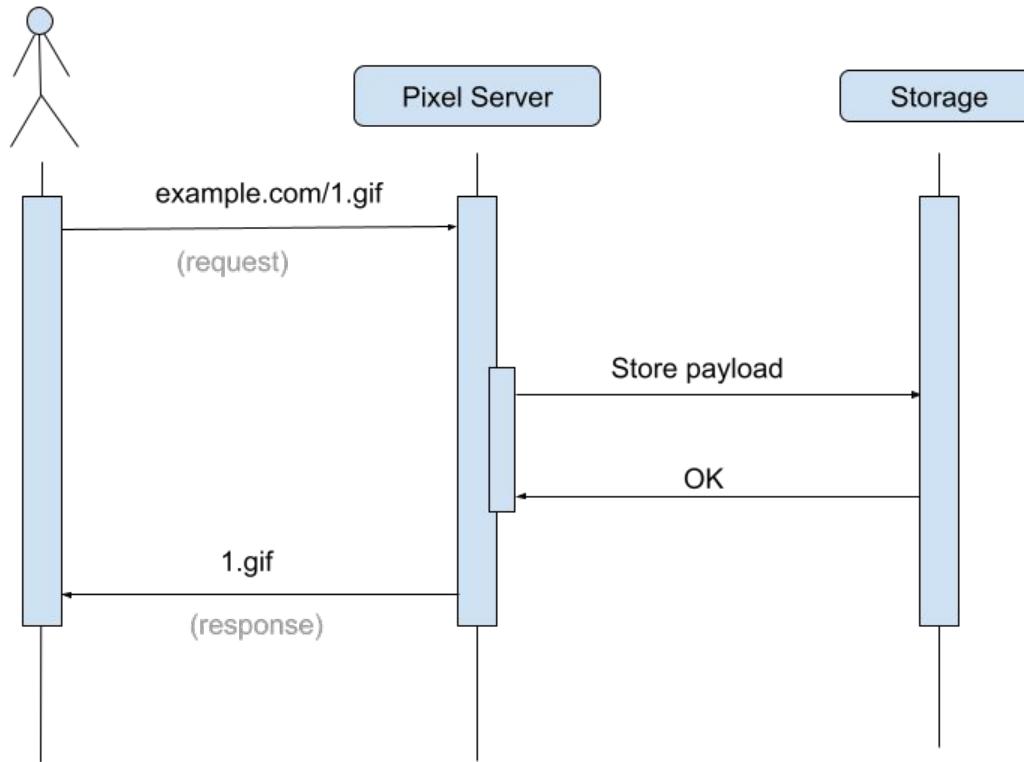
Делаем сами! Уложимся за час ... или меньше.

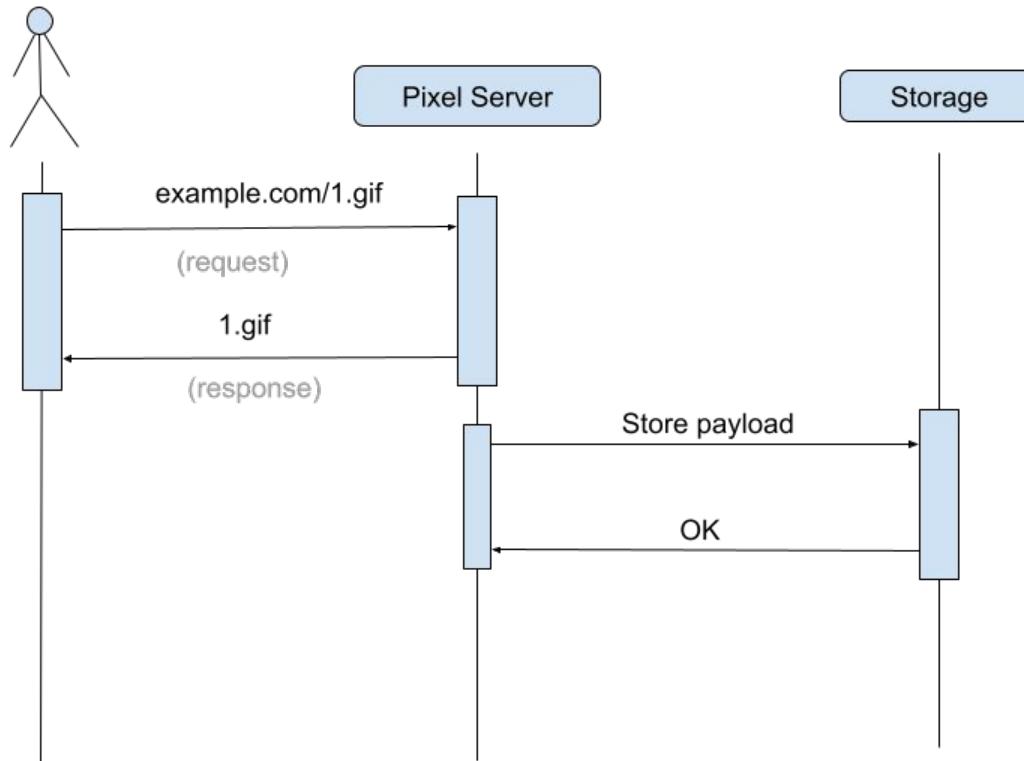


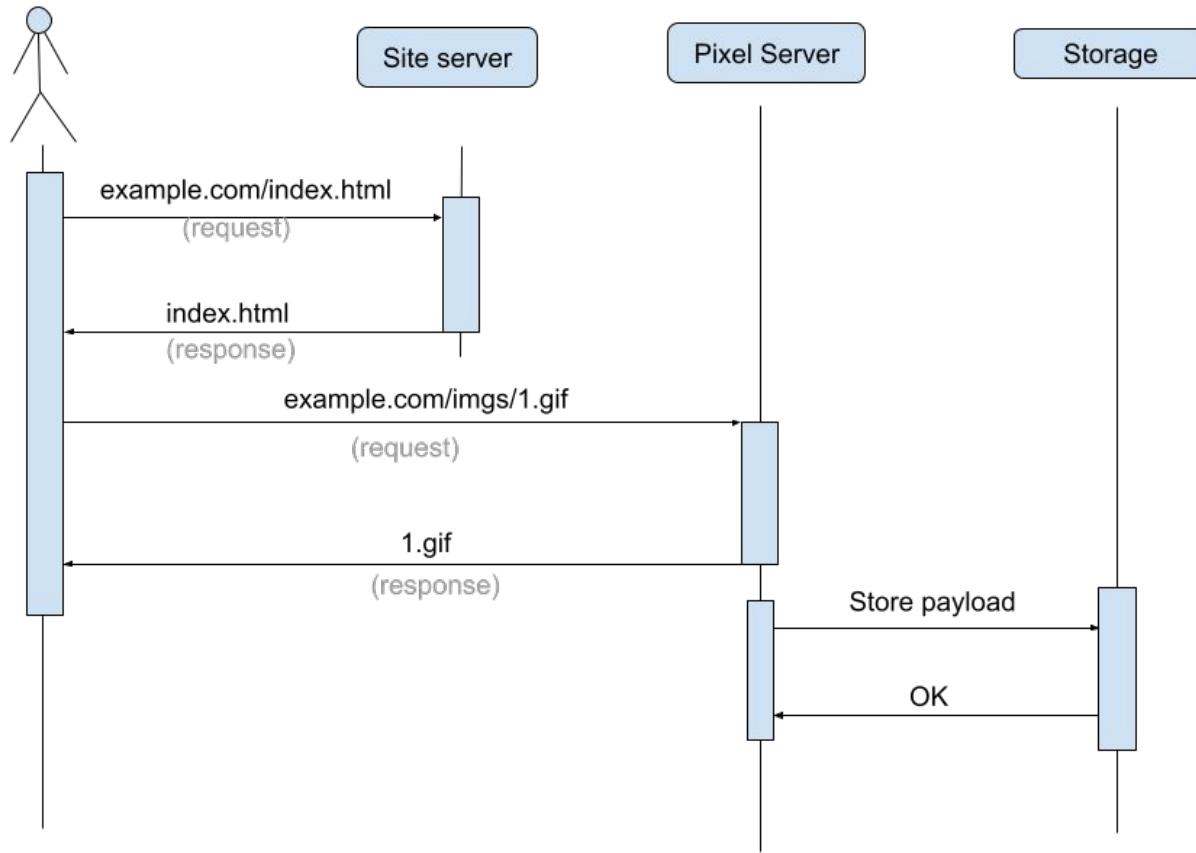
# Пример использования

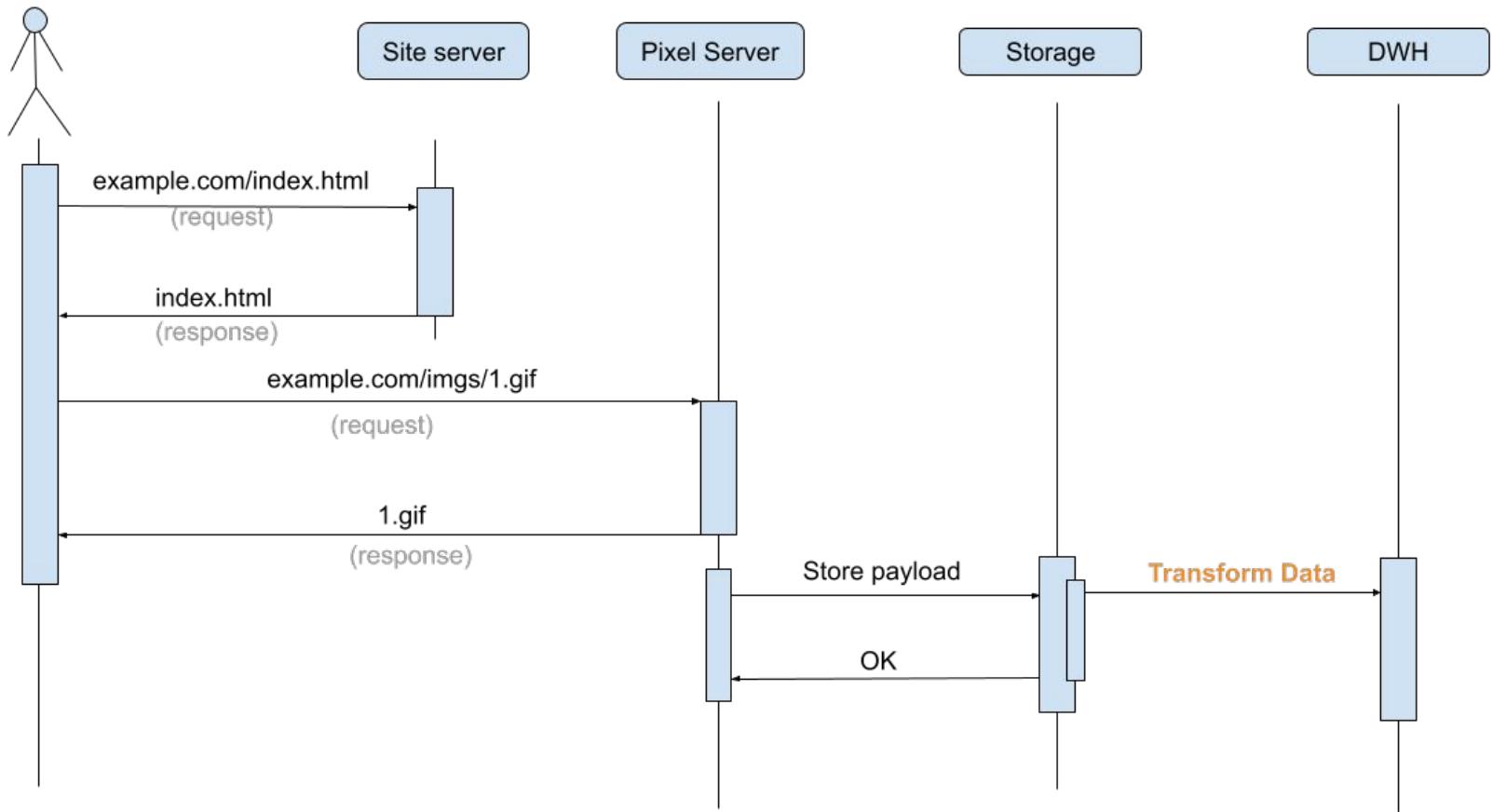
```

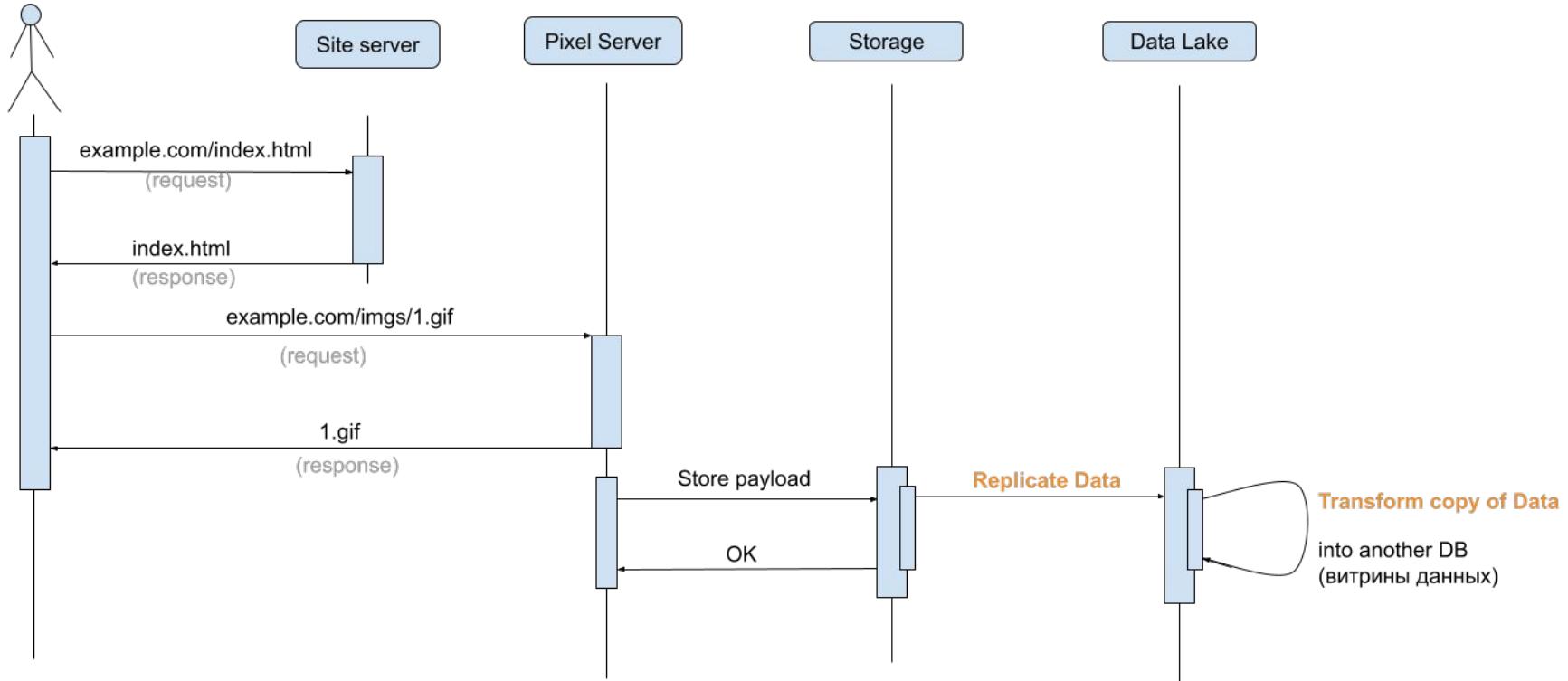
```

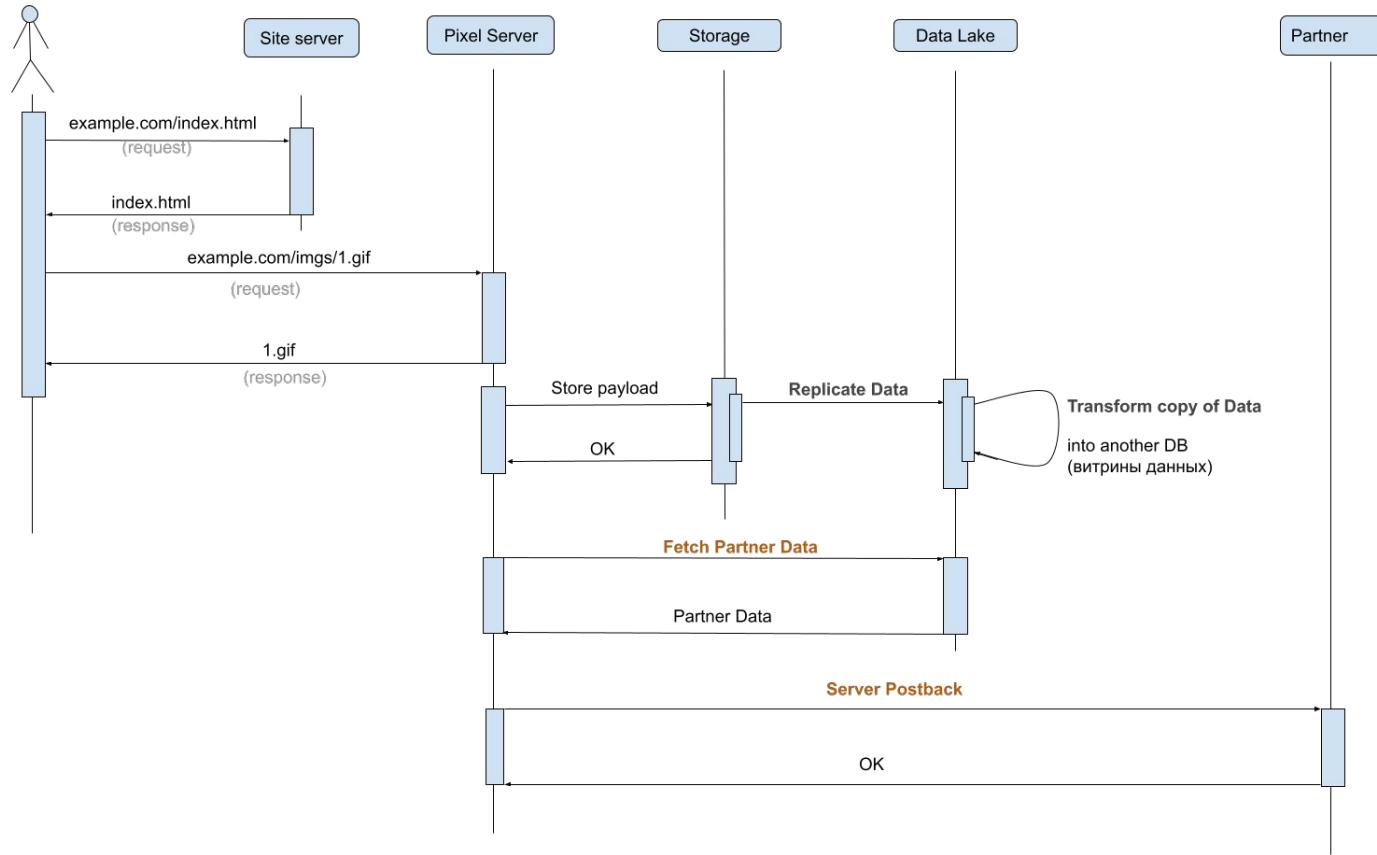




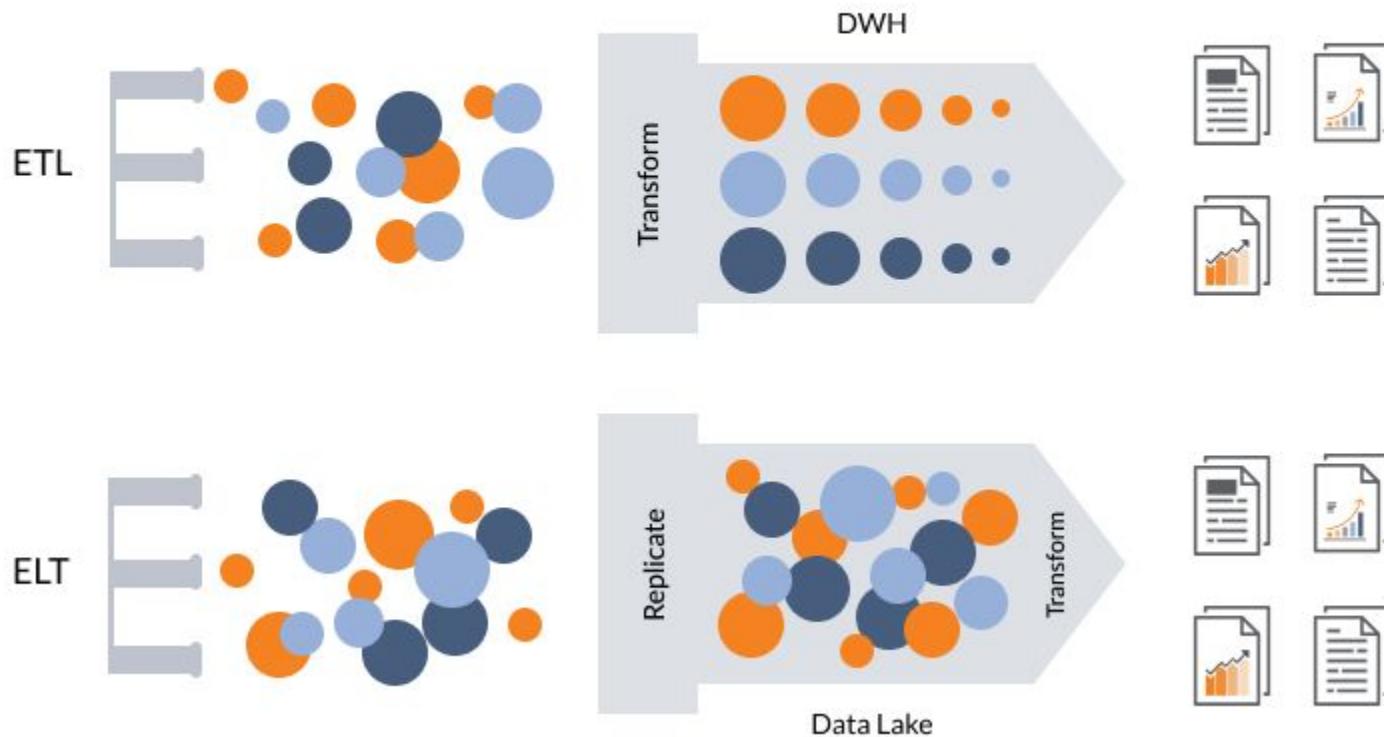


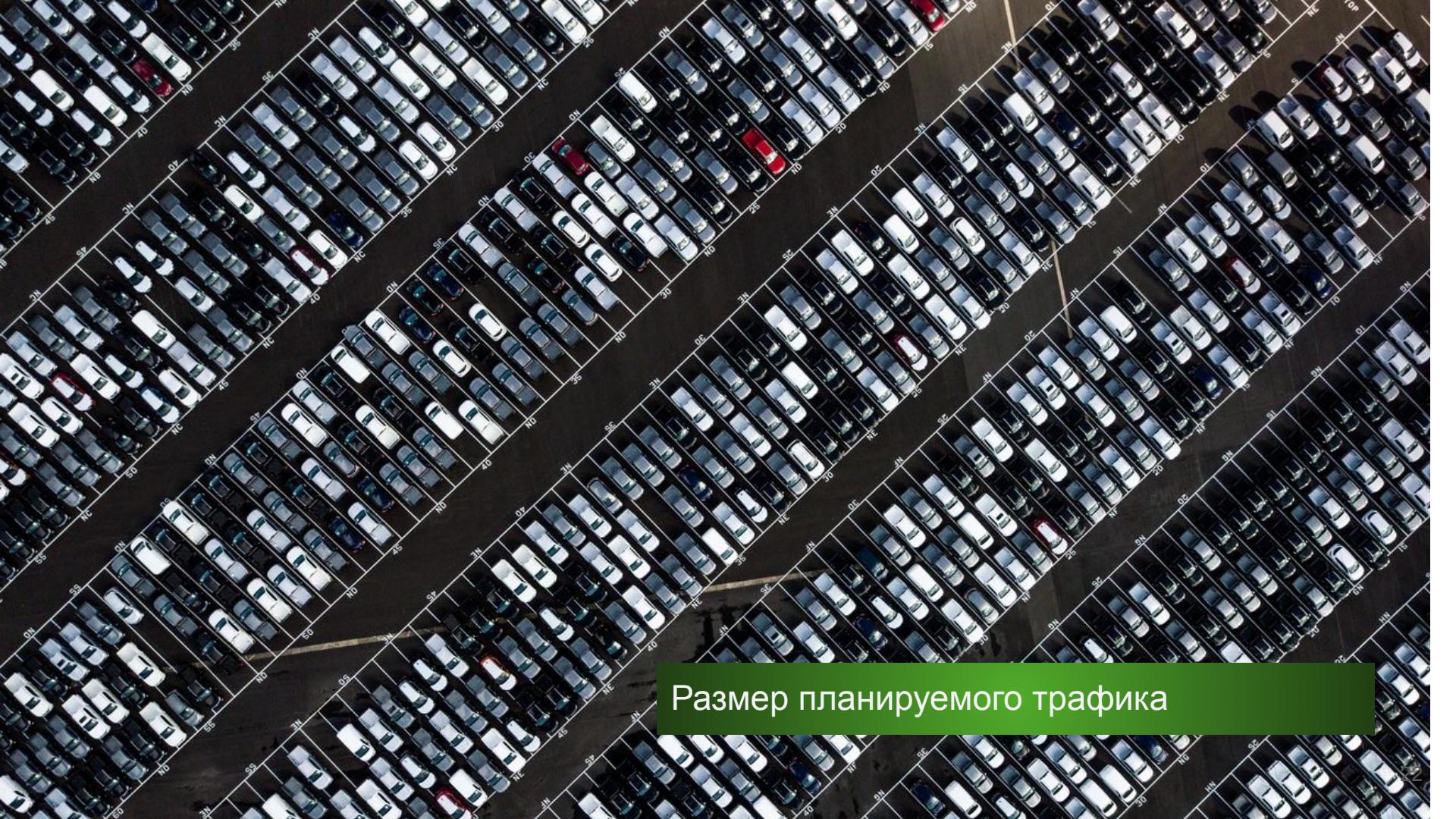






# DWH vs Data Lake





Размер планируемого трафика



VS

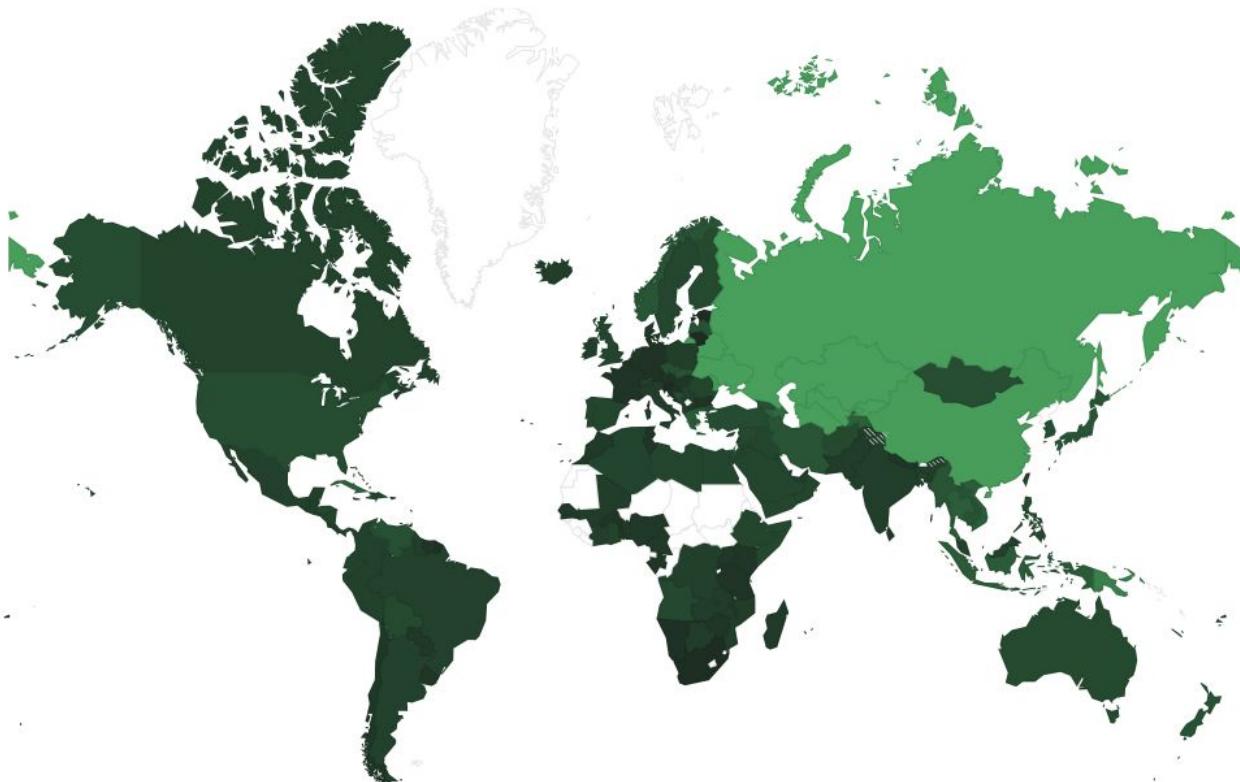




Apache

VS

nginx



<https://www.similartech.com/compare/apache-vs-nginx>

# Стандартные логи

```
http {  
    ...  
    access_log /var/log/nginx/example_ru_access.log;  
    ...  
}
```

# Будем сохранять логи в собственном формате?

```
http{
    log_format custom '$remote_addr - $remote_user [$time_local] '
                    ' "$request" $status $body_bytes_sent '
                    ' "$http_referer" "$http_user_agent" '
                    ' "$http_x_forwarded_for" $request_id '
                    '$geoip_country_name $geoip_country_code '
                    '$geoip_region_name $geoip_city ';

    access_log /var/log/nginx/example_ru_access.log custom;
}
```

# Не забываем про ротацию

```
# cat /etc/logrotate.d/nginx

/var/log/nginx/*log {
    create 0644 nginx nginx
    daily
    rotate 50
    missingok
    notifempty
    compress
    sharedscripts
    postrotate
        /bin/kill -USR1 `cat /run/nginx.pid 2>/dev/null` 2>/dev/null || true
    endscript
}
```

# А HTTP заголовки?

```
header_filter_by_lua_block {  
    local h = ngx.req.get_headers()  
    for k, v in pairs(h) do  
        ngx.log(ngx.ERR, "Got header "..k..": "..v..";")  
    end  
}
```

The background is a dense, green-tinted landscape with organic, flowing shapes resembling stylized trees or clouds. A central, winding path leads through the scene. Several small, colorful figures are scattered throughout: a red figure near the top center, a blue figure on a rock, a white figure in the middle right, and several smaller, more distant figures. The overall aesthetic is dreamlike and abstract.

Apache HTTP Server

# PHP

```
<?php  
$img = "1px.gif";  
  
header("Content-Type: image/jpeg");  
header("Content-Length: " . filesize($img));  
echo file_get_contents($img);
```

# Go

```
func Px1() (*bytes.Buffer, error) {
    buffer := new(bytes.Buffer)

    m := image.NewRGBA(image.Rect(0, 0, 1, 1))
    clr := color.RGBA{B: 0, A: 0}
    draw.Draw(m, m.Bounds(), &image.Uniform{C: clr}, image.Point{}, draw.Src)

    var img image.Image = m
    if err := jpeg.Encode(buffer, img, nil); err != nil {
        return nil, err
    }

    return buffer, nil
}
```

# Или чуть попроще

```
func Px1() (*bytes.Buffer, error) {
    var buf bytes.Buffer
    err := gif.Encode(&buf, image.Rect(0, 0, 1, 1), &gif.Options{NumColors: 1})

    return &buf, err
}
```

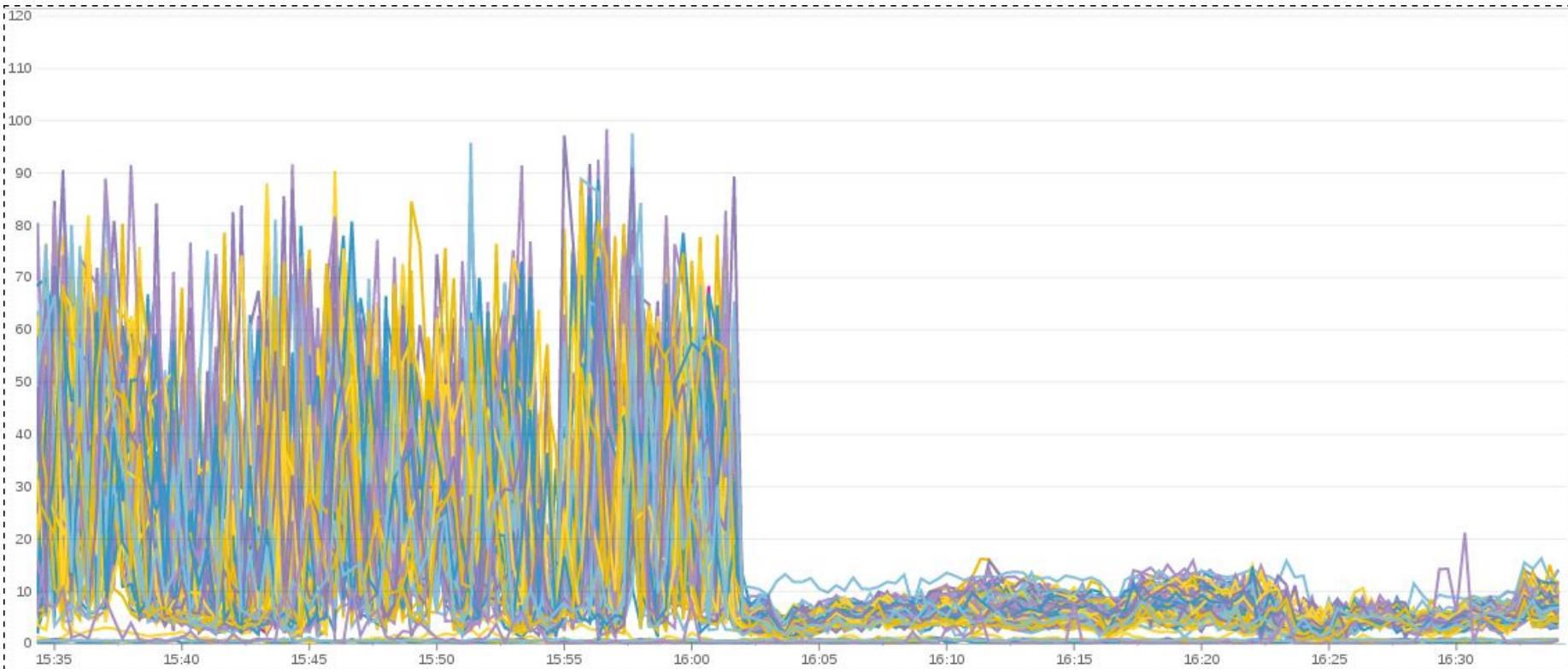
# HugePages

```
echo madvise > /sys/kernel/mm/transparent_hugepage/enabled
```

```
$ always [madvise] never
```

<https://www.kernel.org/doc/Documentation/vm/transhuge.txt>

## Dramatic System CPU drop disabling Transparent Huge Pages on Hadoop with CentOS6/RHEL6 Hadoop nodes



<http://www.ghostar.org/2015/02/transparent-huge-pages-on-hadoop-makes-me-sad/>

type: Web 

Date: Last 6 months 

+ NEW

Total clicks

223



Total impressions

17.6K



Average CTR

1.3%

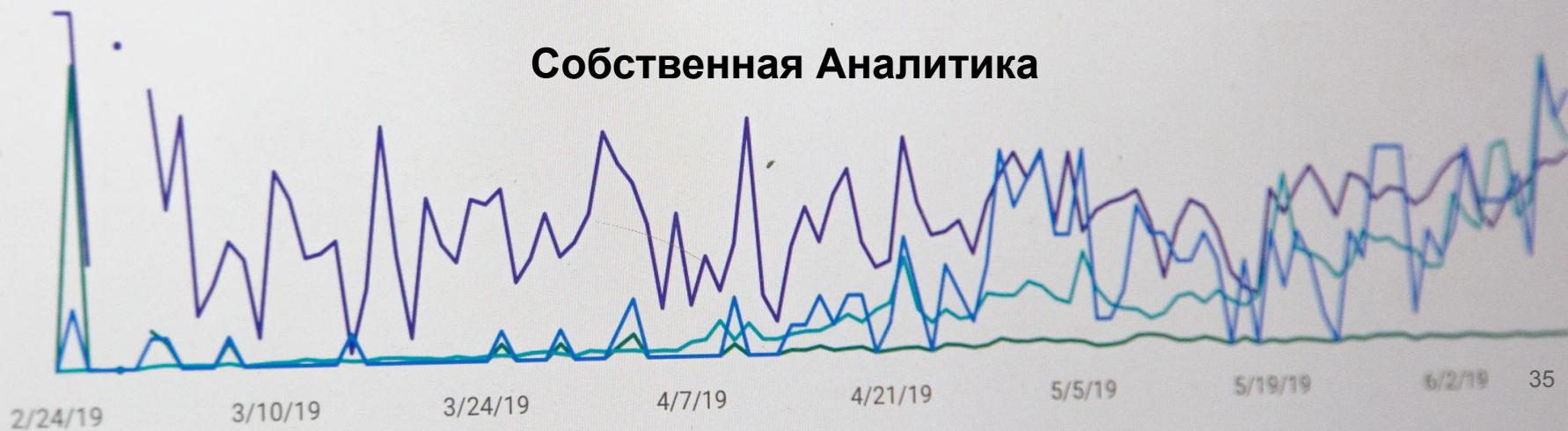


Average position

25.2



## Собственная Аналитика



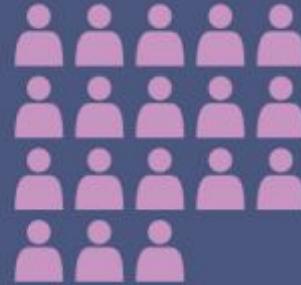
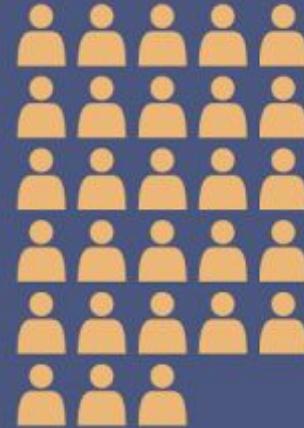
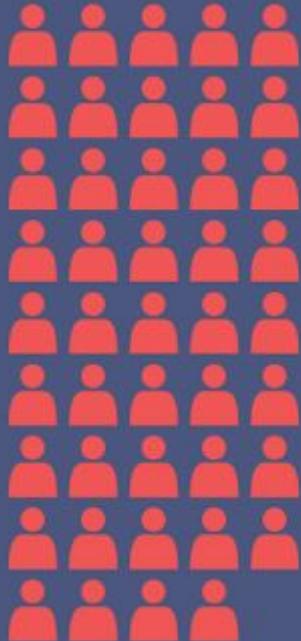
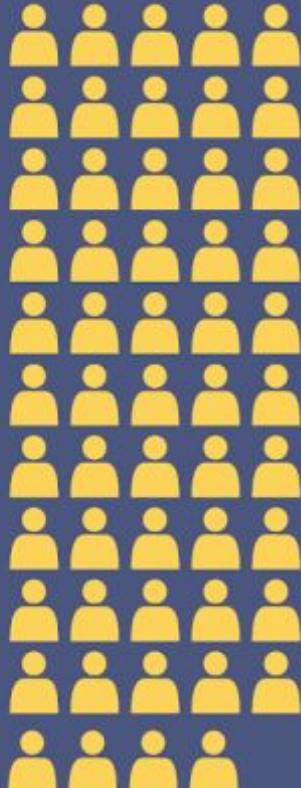
1

2

3

4

5



Когортный анализ

Первая версия



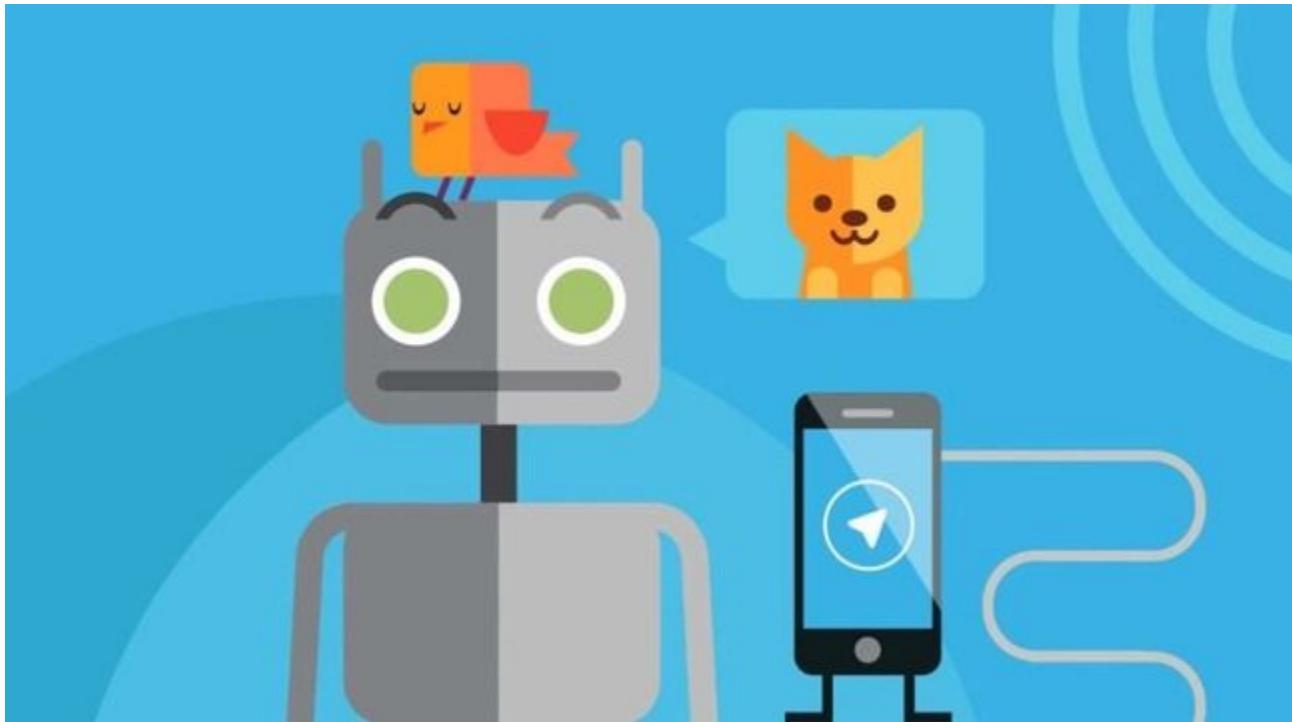
Вторая версия



Третья версия



# Боты как отдельный сегмент



# Первая версия была реализована



# Вторая версия



# Третья версия



# 2020 + Safari and Firefox

«Яндекс Метрике», «Google Аналитике» и пикселям пришел конец?

Обновления Apple убивают все трекеры

# Safari + tracker

A screenshot of a Mac OS X desktop showing a Safari browser window. The title bar says 'koti-koti.ru'. A tooltip box from the 'koti-koti.ru' extension is overlaid on the page, stating '2 trackers prevented from profiling you' and listing 'Trackers on This Web Page' as 'google-analytics.com' and 'yandex.ru'. An orange arrow points from the left towards this tooltip. The main content of the page is titled 'KOTI-KOTI.RU' and features the text 'ВЕШНЯЕ КАРТИНКИ КОТОВ И МИЛОТА'. Below this are three images of cats: one cat sleeping in a red bed, a white cat eating a pink frosted cake, and several cats on a blue surface. Below each image is a caption: 'Cats are dreaming' (date 2018.06.18), 'He loves Cakes!' (date 2018.06.07), and 'Very aggressive c' (date 2018.06.04).

2  
koti-koti.ru  
2 trackers prevented from  
profiling you

Trackers on This Web Page

google-analytics.com  
yandex.ru

Recent Post

Cats are dreaming  
2018.06.18

He loves Cakes!  
2018.06.07

Very aggressive c  
2018.06.04

# Firefox vs tracker

KOTI-KOTI.RU

Enhanced Tracking Protection is ON for this site  
Site not working?

Blocked

① Cross-Site Tracking Cookies >

② Tracking Content >

None Detected

Social Media Trackers  
Fingerprinters  
Cryptominers

Protection Settings Standard  
P Protections Dashboard 278 Blocked

Cats are dreaming 2018.06.18

He loves Cakes! 2018.06.07

Very aggressive cat-band! 2018.06.04

...  
...  
...

KT KOTI-KOTI.RU

https://www.koti-koti.ru

Cross-Site Tracking Cookies Blocked

These cookies follow you from site to site to gather data about what you do online. They are set by third parties such as advertisers and analytics companies.

1

https://mc.yandex.ru

Manage Protection Settings



Cats are dreaming

2018.06.18



He loves Cakes!

2018.06.07



Very aggressive cat-band!

2018.06.04







# KOTI-KOTI.RU

Н Ы Е К А Р Т И Н К И К О Т О В И М И Л О Т А

KOTI-KOTI.RU

https://www.koti-koti.ru

Not Blocking Tracking Content

② Websites may load external ads, videos, and other content with tracking code. Blocking tracking content can help sites load faster, but some buttons, forms, and login fields might not work.

https://www.google-analytics.com  
https://mc.yandex.ru

Manage Protection Settings

Cats are dreaming

He loves Cakes!

Very aggressive cat-band!

2018.06.18      2018.06.07      2018.06.04

н ы е к а р т и н к и к о т о в и м и л о т а

KOTI-KOTI.RU

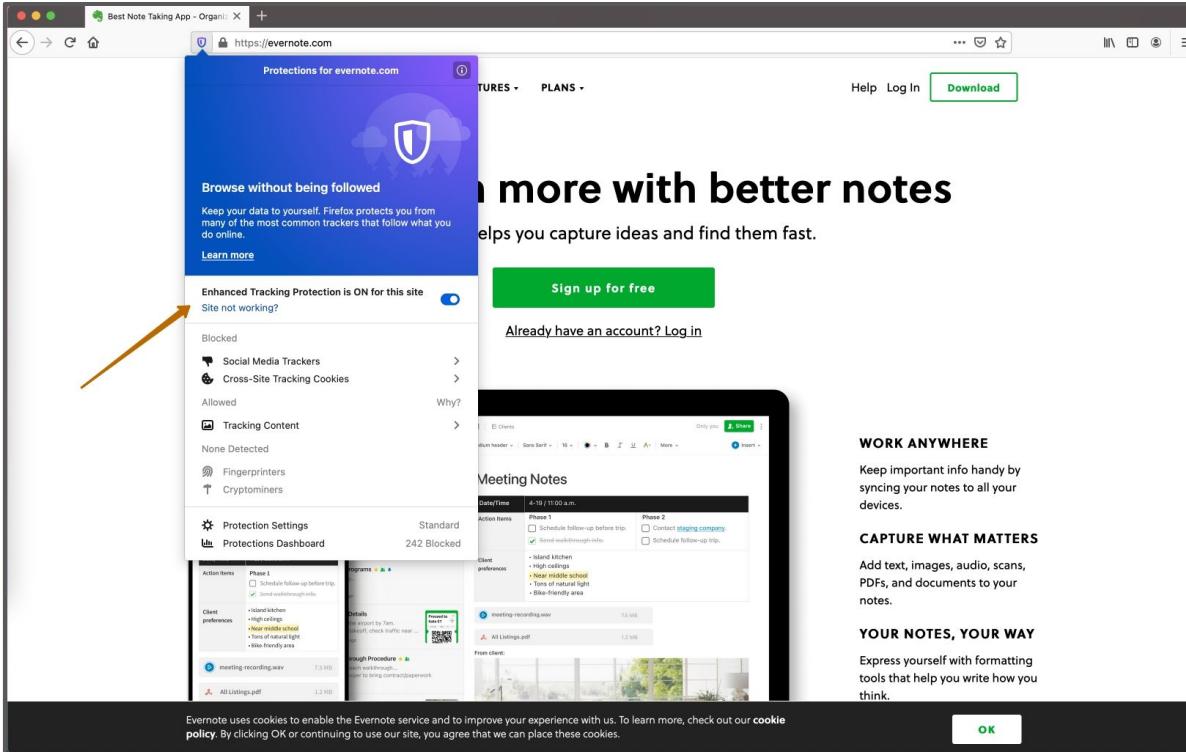
  




\*\*\*


# Firefox + Evernote



A screenshot of a web browser window displaying the Evernote website (<https://evernote.com>). A prominent orange arrow points to the 'Not Blocking Tracking Content' link in the cookie consent dialog on the left side of the page.

**Not Blocking Tracking Content**

Websites may load external ads, videos, and other content with tracking code. Blocking tracking content can help sites load faster, but some buttons, forms, and login fields might not work.

- <https://mc.yandex.ru>
- <https://cdn.optimizely.com>
- <https://www.google-analytics.com>
- <https://www.facebook.com>
- <https://analytics.twitter.com>
- <https://googleads.g.doubleclick.net>
- <https://a10732733166.cdn.optimizely.com>
- <https://connect.facebook.net>
- <https://static.hotjar.com>
- <https://secure.quantserve.com>
- <https://stats.g.doubleclick.net>
- <https://rules.quantcount.com>
- <https://pixel.quantserve.com>
- <https://script.hotjar.com>
- <https://vars.hotjar.com>
- <https://log.optimizely.com>

**Manage Protection Settings**

Evernote uses cookies to enable the Evernote service and to improve your experience with us. To learn more, check out our [cookie policy](#). By clicking OK or continuing to use our site, you agree that we can place these cookies.

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[Already have an account? Log in](#)

**WORK ANYWHERE**

Keep important info handy by syncing your notes to all your devices.

**CAPTURE WHAT MATTERS**

Add text, images, audio, scans,

**OK**

The screenshot shows the Evernote homepage ([evernote.com](https://evernote.com)) with a privacy overlay. The overlay highlights that 8 trackers were prevented from profiling the user. It lists the trackers found on the page: bing.com, doubleclick.net, facebook.net, google-analytics.com, googleadservices.com, googletagmanager.com, and hotjar.com.

FEATURES ▾ PLANS ▾

h more with better  
helps you capture ideas and find them fa

Sign up for free

Already have an account? [Log in](#)

A separate mobile device interface is shown at the bottom, displaying the 'All Notes' screen with a note titled 'Jamie Gold' and various editing tools.

# Отчёт Apple о трекерах на девайсе (не блокировка)

The screenshot shows the 'Privacy Report' window from Safari. At the top, it says 'Safari prevents trackers from following you across websites.' Below this is a green shield icon with a white 'D'. A 'Show More' link is present. The main area displays statistics for the last 30 days: 25 trackers prevented from profiling the user, and 81% of websites contacted trackers. A section titled 'Most contacted tracker' highlights 'googletagmanager.com was prevented from profiling you across 8 websites'. Below this is a table comparing 'Websites' and 'Trackers'.

Tracker	Owner	Seen on websites
▶ googletagmanager.com	Google	8
▶ doubleclick.net	Google	7
▶ google-analytics.com	Google	7
▶ facebook.com	Facebook	4
▶ facebook.net	Facebook	3
▶ yandex.ru	Yandex	3
▶ vk.com	V Kontakte	2
▶ mail.ru	Mail.Ru	2
▶ googleadservices.com	Google	2
▶ yadro.ru	ECO PC - Complex S...	1
▶ micpn.com	Movable Ink	1

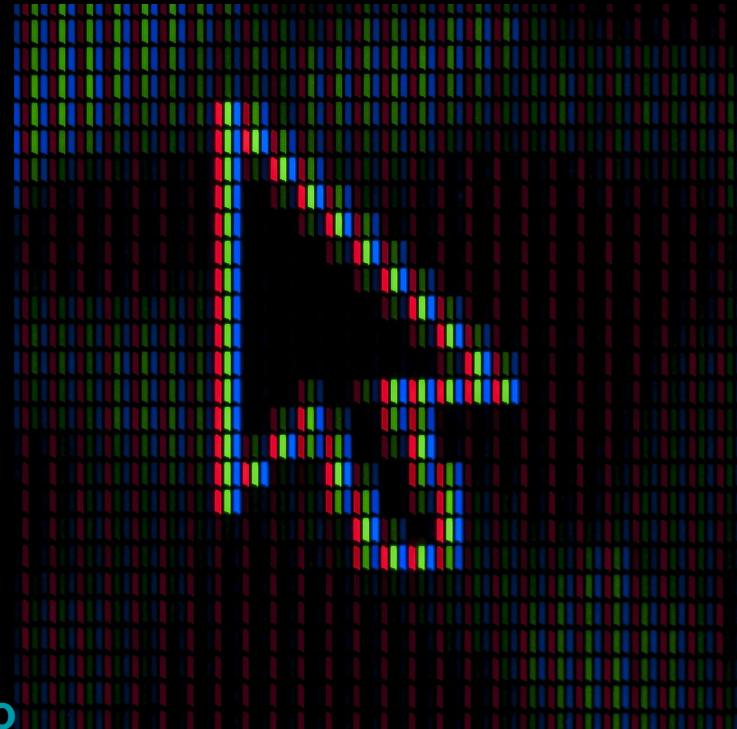
**Разделение – это возможности для эксперимента.**

[linkedin.com/in/roman-romadin/](https://linkedin.com/in/roman-romadin/)

[medium.com/@romanitalian](https://medium.com/@romanitalian)

[github.com/romanitalian](https://github.com/romanitalian)

[t.me/RomanRomadin](https://t.me/RomanRomadin)



**Спасибо**