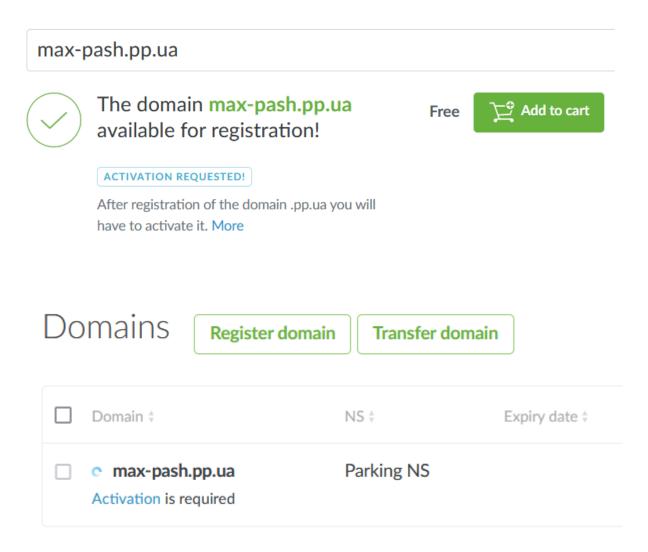# DNS

Pashynskyi Maxim

1) Register free domain (...pp.ua) https://nic.ua/en/domains

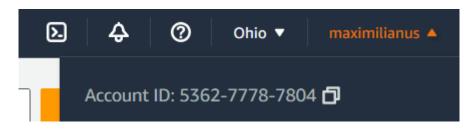

2) Activate created domain
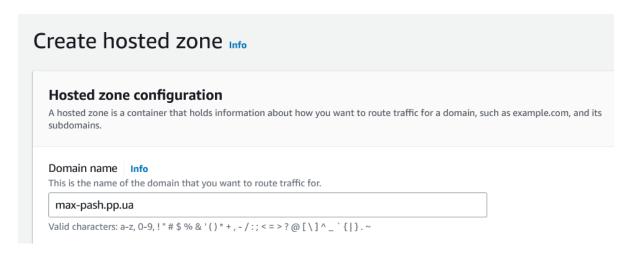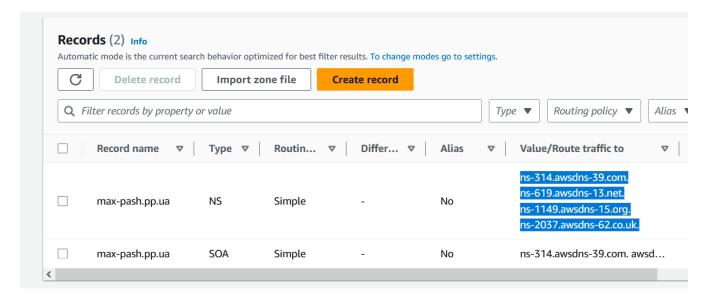

3) Register AWS Account

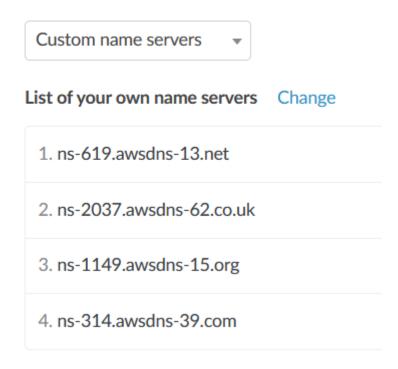**4) Create Hosted Zone in Route 53 (name of hosted zone should the name of registered domain**

5) Copy NS records in hosted zone and Change NS-servers setting to 'Custom name server' on nic.ua and paste copied NS records

NS-servers

Custom name servers ▼

List of your own name servers   Change

1. ns-619.awsdns-13.net

2. ns-2037.awsdns-62.co.uk
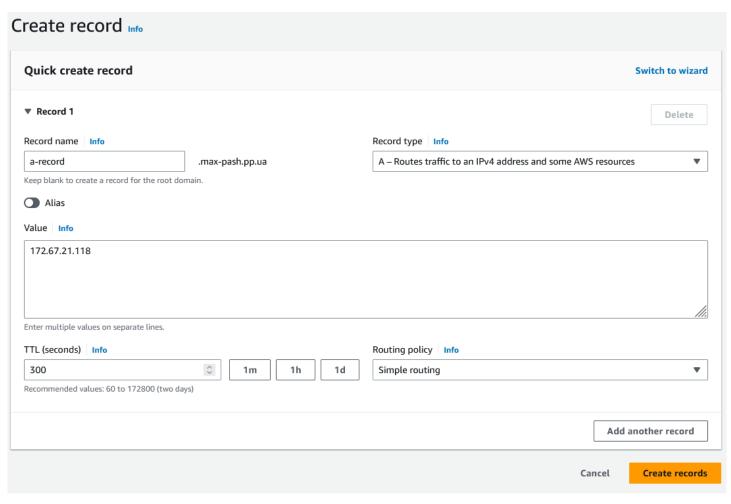
3. ns-1149.awsdns-15.org

4. ns-314.awsdns-39.com

6) **Check NS records of your domain using dig or nslookup commands (you should see NS records from hosted zone)**

Been waiting all night for them to appear)


```
max@DESKTOP-JT48RV1:~$ dig max-pash.pp.ua NS

; <<>> DiG 9.16.1-Ubuntu <<>> max-pash.pp.ua NS
;; global options: +cmd
;; Got answer:
;; ->>HEADER<<- opcode: QUERY, status: NOERROR, id: 54171
;; flags: qr rd ra; QUERY: 1, ANSWER: 4, AUTHORITY: 0, ADDITIONAL: 1

;; OPT PSEUDOSECTION:
; EDNS: version: 0, flags:; udp: 1232
;; QUESTION SECTION:
;max-pash.pp.ua.                         IN      NS

;; ANSWER SECTION:
max-pash.pp.ua.         86400   IN      NS      ns-1149.awsdns-15.org.
max-pash.pp.ua.         86400   IN      NS      ns-2037.awsdns-62.co.uk.
max-pash.pp.ua.         86400   IN      NS      ns-314.awsdns-39.com.
max-pash.pp.ua.         86400   IN      NS      ns-619.awsdns-13.net.

;; Query time: 78 msec
;; SERVER: 192.168.0.1#53(192.168.0.1)
;; WHEN: Fri Aug 18 10:07:35 EEST 2023
;; MSG SIZE  rcvd: 183
```

7) Create A and CNAME records in hosted zone

Create record Info

Quick create record   Switch to wizard

▼ Record 1   Delete

Record name   Info   Record type   Info

| a-record | .max-pash.pp.ua | A – Routes traffic to an IPv4 address and some AWS resources ▼ |

Keep blank to create a record for the root domain.

◯ Alias

Value   Info

```
172.67.21.118
```

Enter multiple values on separate lines.

TTL (seconds)   Info   Routing policy   Info

| 300 | ⇕ | 1m | 1h | 1d | | Simple routing ▼ |

Recommended values: 60 to 172800 (two days)

Add another record

Cancel   **Create records**

Create record Info

Quick create record   Switch to wizard

▼ Record 1   Delete

Record name   Info   Record type   Info

| cname-record | .max-pash.pp.ua | CNAME – Routes traffic to another domain name and to some AWS reso... ▼ |

Keep blank to create a record for the root domain.

◯ Alias

Value   Info

```
youtube.com
```

Enter multiple values on separate lines.

TTL (seconds)   Info   Routing policy   Info

| 300 | ⇕ | 1m | 1h | 1d | | Simple routing ▼ |

Recommended values: 60 to 172800 (two days)

Add another record

Cancel   **Create records**

☐	a-record.max-pash.pp.ua	A	Simple	-	No	172.67.21.118	300
☐	cname-record.max-pash.pp.ua	CNAME	Simple	-	No	youtube.com	300

8)*Set latency routing policy for two DNS records

	Record name	Type	Routin...	Differentiator	Alias	Value/Route traffic to	TTL (s...
☐	max-pash.pp.ua	NS	Simple	-	No	ns-314.awsdns-39.com. ns-619.awsdns-13.net. ns-1149.awsdns-15.org. ns-2037.awsdns-62.co.uk.	172800
☐	max-pash.pp.ua	SOA	Simple	-	No	ns-314.awsdns-39.com. awsd...	900
☐	a-record.max-pash.pp.ua	A	Simple	-	No	172.67.21.118	300
☐	cname-record.max-pash.pp.ua	CNAME	Simple	-	No	youtube.com	300
☑	latency-dou.max-pash.pp.ua	A	Simple	-	No	172.67.21.118	300
☑	latency-google.max-pash.pp.ua	A	Simple	-	No	142.250.203.206	300
☑	main.max-pash.pp.ua	CNAME	Latency	Europe (Stockholm)	No	latency-google.max-pash.pp.ua	60
☑	main.max-pash.pp.ua	CNAME	Latency	US East (Ohio)	No	latency-dou.max-pash.pp.ua	60

9)*Check created dns records using dig or nslookup commands

```
max@DESKTOP-JT48RV1:~$ dig main.max-pash.pp.ua

; <<>> DiG 9.16.1-Ubuntu <<>> main.max-pash.pp.ua
;; global options: +cmd
;; Got answer:
;; ->>HEADER<<- opcode: QUERY, status: NOERROR, id: 24810
;; flags: qr rd ra; QUERY: 1, ANSWER: 2, AUTHORITY: 0, ADDITIONAL: 1

;; OPT PSEUDOSECTION:
; EDNS: version: 0, flags:; udp: 1232
;; QUESTION SECTION:
;main.max-pash.pp.ua.            IN      A

;; ANSWER SECTION:
main.max-pash.pp.ua.    300     IN      CNAME   latency-google.max-pash.pp.ua.
latency-google.max-pash.pp.ua. 300 IN   A       142.250.203.206

;; Query time: 87 msec
;; SERVER: 192.168.0.1#53(192.168.0.1)
;; WHEN: Fri Aug 18 10:28:44 EEST 2023
;; MSG SIZE  rcvd: 93
```

```
max@DESKTOP-JT48RV1:~$ nslookup main.max-pash.pp.ua
Server:         192.168.0.1
Address:        192.168.0.1#53

Non-authoritative answer:
main.max-pash.pp.ua     canonical name = latency-google.max-pash.pp.ua.
Name:   latency-google.max-pash.pp.ua
Address: 142.250.203.206

max@DESKTOP-JT48RV1:~$
```

Europe (Stockholm) has lower latency than US East (Ohio).