

IPv6 Readiness Report

help.edu.my — help.edu.my



Scan to verify

Category: Education • Generated: 04 Jul 2026, 22:12 MYT • Last Checked: 04 Jul 2026, 03:51 MYT • Verification ID: 7f46b9a0-3e63-4542-9907-ff9a291a656f

Report generated from National IPv6 Readiness Monitor — <https://ipv6.my6.my>

Audit trail: <https://ipv6.my6.my/audit/7f46b9a0-3e63-4542-9907-ff9a291a656f>

<p>X</p> <p>Non-Compliant</p> <p>MGv6C-1.0</p>	<p>47%</p> <p>No IPv6 Support</p>	<p>IPv6-ONLY READINESS</p> <p>Website: X Not Ready</p> <p>DNS: ✓ Ready</p> <p>Email: X Not Ready</p>
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<p>IPv4 ADDRESSES</p> <p>165.22.59.233</p>

Network Information (WHOIS / RDAP)

IPv4 Network	
Organization	DigitalOcean, LLC
Country	US
ASN	AS14061
ASN Name	DIGITALOCEAN-ASN - DigitalOcean, LLC, US
Network (CIDR)	165.22.0.0/16

Web Services (35%)				0 / 8
#	CHECK	RESULT	DETAIL	
1	AAAA Record	FAIL	No AAAA record found in DNS.	
2	Globally Routable IPv6	FAIL	IPv6 address is not globally routable.	
3	HTTP over IPv6	FAIL	HTTP is not accessible over IPv6.	
4	HTTPS over IPv6	FAIL	HTTPS is not accessible over IPv6.	
5	IPv6-Only Reachability	FAIL	Site is not reachable when limited to IPv6-only.	
6	TLS Certificate Valid (IPv6)	FAIL	TLS certificate is invalid, expired, or hostname mismatch over IPv6.	
7	Dual-Stack (IPv4 + IPv6)	FAIL	Domain is IPv6-only or IPv4-only.	
8	HTTP/3 (QUIC)	FAIL	No HTTP/3 support detected.	

DNS & DNSSEC (25%)				3 / 5
#	CHECK	RESULT	DETAIL	
1	NS Has AAAA Record	PASS	Nameserver has IPv6 address.	
2	NS Reachable via IPv6	PASS	Nameserver is reachable via IPv6 on port 53.	
3	NS Answers Queries via IPv6	PASS	DNS queries answered over IPv6.	
4	DNSSEC Validated	FAIL	DNSSEC validation failed or zone is unsigned.	
5	Reverse DNS (PTR)	FAIL	No PTR record found.	
6	DS Record at Parent	FAIL	No DS record at parent.	
7	RRSIG Valid	FAIL	No valid RRSIG found.	

#	CHECK	RESULT	DETAIL
8	Signing Algorithm	INFO	No DNSKEY record found.

Email Services (25%) 4 / 6

#	CHECK	RESULT	DETAIL
1	MX Record Exists	PASS	MX record found.
2	MX Server Has IPv6	PASS	MX server has AAAA record.
3	SMTP Reachable via IPv6	FAIL	SMTP is not reachable over IPv6.
4	STARTTLS over IPv6	FAIL	STARTTLS not available over IPv6.
5	SPF Record	PASS	SPF record found.
6	DKIM Selector	INFO	DKIM selector found: selector2_domainkey
7	DMARC Record	PASS	DMARC record found.

IPv4 Baseline (15%) 3 / 3

#	CHECK	RESULT	DETAIL
1	A Record	PASS	165.22.59.233
2	HTTP over IPv4	PASS	HTTP (port 80) responds over IPv4 — 81ms TTFB.
3	HTTPS over IPv4	PASS	HTTPS (port 443) responds over IPv4 — 53ms TTFB.

Audit Trail & Evidence Record

Verification ID	7f46b9a0-3e63-4542-9907-ff9a291a656f
Domain	help.edu.my
Check Mode	Manual
Status	Completed
Started	04 Jul 2026, 03:51:09 MYT
Finished	04 Jul 2026, 03:51:33 MYT
Test Node Profile	dual stack
Engine Version	2.0.0
MGv6C Version	1.0.0
Audit URL	https://ipv6.my6.my/audit/7f46b9a0-3e63-4542-9907-ff9a291a656f

Integrity Verification

<p>✓ INTEGRITY VERIFIED</p>	
Algorithm	hmac-sha256-v1
Root Hash	f78ce3d1e7c35963170ab72654e83891615837cc86f3fa78cb526f470c31e558
http_headers	90482d59db6c863ad3904a448dfbbe72ec3f78b7d362ac39ef5893df101d31c8
dns_responses	040b14910080bad2d233cf305c053f514656bbd641dab75e0266b9e94a7d28da
tls_handshake	ac5517395dfb3c5f08b26a1b22c3bdf8b53ff1d9ff00ae5c2695e9e5412f3cd2
connectivity_log	ea7b0475b741e2f488040f7bfaa8f1a5c6be725ab4f92912dac3e97abeebd661
dns_resolution_times	14472fb72455e98ff4d5ae17893a783f37386fa1498a2d8ae3b76d571b38d88a

Test Node Identity

Os	Linux srv1440888 6.8.0-124-generic #124-Ubuntu SMP PREEMPT_DYNAMIC Tue May 26 13:00:45 UTC 2026 x86_64
Hostname	srv1440888
Php Version	8.3.32
Server Ipv4	76.13.221.142
Server Ipv6	2a02:4780:5e:2789::1

DNS Resolution Performance

Comparison of A (IPv4) vs AAAA (IPv6) query times across resolvers and transports. Shows median (p50) and 95th percentile (p95) of 3 samples per tuple.

Resolver	Transport	A p50 (ms)	A p95 (ms)	AAAA p50 (ms)	AAAA p95 (ms)	Delta (ms)
System	Default	8.83	8.96	20.96	21.05	+12.1
Google	IPv4	18.46	25.89	20.84	34.92	+2.4
Google	IPv6	19.15	32.43	24.89	32.37	+5.7
Cloudflare	IPv4	8.94	20.62	21.32	22.34	+12.4
Cloudflare	IPv6	19.99	20.27	19.88	31.04	-0.1

DNS Evidence

A

```
;; Got answer:
;; -->HEADER<<- opcode: QUERY, status: NOERROR, id: 8288
;; flags: qr rd ra; QUERY: 1, ANSWER: 1, AUTHORITY: 0, ADDITIONAL: 1

;; OPT PSEUDOSECTION:
; EDNS: version: 0, flags:; udp: 1232
;; ANSWER SECTION:
help.edu.my. 3600 IN A 165.22.59.233
```

DS

```
;; Got answer:
;; -->HEADER<<- opcode: QUERY, status: NOERROR, id: 14695
;; flags: qr rd ra; QUERY: 1, ANSWER: 0, AUTHORITY: 1, ADDITIONAL: 1

;; OPT PSEUDOSECTION:
; EDNS: version: 0, flags:; udp: 1232
;; AUTHORITY SECTION:
edu.my. 2907 IN SOA e.nic.my. hostmaster.nic.my. 2026052757 1800 900 604800 3600
```

MX

```
;; Got answer:
;; -->HEADER<<- opcode: QUERY, status: NOERROR, id: 43648
;; flags: qr rd ra; QUERY: 1, ANSWER: 1, AUTHORITY: 0, ADDITIONAL: 1

;; OPT PSEUDOSECTION:
; EDNS: version: 0, flags:; udp: 1232
;; ANSWER SECTION:
help.edu.my. 3600 IN MX 1 help-edu-my.mail.protection.outlook.com.
```

NS

```
;; Got answer:
;; -->HEADER<<- opcode: QUERY, status: NOERROR, id: 10045
;; flags: qr rd ra; QUERY: 1, ANSWER: 4, AUTHORITY: 0, ADDITIONAL: 1

;; OPT PSEUDOSECTION:
; EDNS: version: 0, flags:; udp: 1232
;; ANSWER SECTION:
help.edu.my. 86400 IN NS ns2-07.azure-dns.net.
help.edu.my. 86400 IN NS ns3-07.azure-dns.org.
help.edu.my. 86400 IN NS ns4-07.azure-dns.info.
help.edu.my. 86400 IN NS ns1-07.azure-dns.com.
```

TXT

```
;; Got answer:
;; -->HEADER<<- opcode: QUERY, status: NOERROR, id: 41044
;; flags: qr rd ra; QUERY: 1, ANSWER: 10, AUTHORITY: 0, ADDITIONAL: 1

;; OPT PSEUDOSECTION:
; EDNS: version: 0, flags:; udp: 1232
;; ANSWER SECTION:
help.edu.my. 3600 IN TXT "google-site-verification=tHIZUda2gpo-4NJaQ_33ovFDTnTMOUYtGm_o2K3gCs"
help.edu.my. 3600 IN TXT "google-site-verification=Ci0FD6PEzUG1ly-5-Pn6jSDnsjp_x7oiZdTyeffV0E"
help.edu.my. 3600 IN TXT "have-i-been-pwned-verification=dweb_4oa4mcp8yzwzgm85pwupme"
help.edu.my. 3600 IN TXT "google-site-verification=HvA8M7Bw8XnwvcmkEjzyyfmCyJAayTsRGg7_AkUqZKI"
help.edu.my. 3600 IN TXT "v=spf1 ip4:8.219.24.0/22 ip4:8.219.28.0/24 ip4:8.219.34.0/23 ip4:175.143.61.159 a:help-edu.managed-otrs.com include:spf.protection.outlook.com include:fdspfaus.freshemail.io include:sendgrid.net -all"
help.edu.my. 3600 IN TXT "YESJRNZKXNYDYJ9RCU59I6PWTkHYX7625GT54Z0H"
help.edu.my. 3600 IN TXT "v7nb578udfopeinvujmt36alba"
help.edu.my. 3600 IN TXT "google-site-verification=NhzYmsooZUwlJ5RcBE36bB6Fu39LCqd4kvmolhqJj_s"
help.edu.my. 3600 IN TXT "proxy-ssl.webflow.com"
help.edu.my. 3600 IN TXT "google-site-verification=Q1ow9YHXNgGDvK7mV9MYocjnpgWYphFLJNQhnav8M4"
```

AAAA

```
;; Got answer:
;; -->HEADER<<- opcode: QUERY, status: NOERROR, id: 51107
;; flags: qr rd ra; QUERY: 1, ANSWER: 0, AUTHORITY: 1, ADDITIONAL: 1

;; OPT PSEUDOSECTION:
; EDNS: version: 0, flags:; udp: 1232
```

```
;; AUTHORITY SECTION:
help.edu.my. 277 IN SOA ns1-07.azure-dns.com. azuredns-hostmaster.microsoft.com. 1 3600 300 2419200 300
```

RRSIG

```
ns1-07.azure-dns.com. azuredns-hostmaster.microsoft.com. 1 3600 300 2419200 300
```

DNSKEY

```
;; Got answer:
;; ->HEADER<<- opcode: QUERY, status: NOERROR, id: 51454
;; flags: qr rd ra; QUERY: 1, ANSWER: 0, AUTHORITY: 1, ADDITIONAL: 1

;; OPT PSEUDOSECTION:
; EDNS: version: 0, flags:; udp: 1232
;; AUTHORITY SECTION:
help.edu.my. 277 IN SOA ns1-07.azure-dns.com. azuredns-hostmaster.microsoft.com. 1 3600 300 2419200 300
```

DNSSEC_VALIDATION

```
; unsigned answer
help.edu.my. 3577 IN SOA ns1-07.azure-dns.com. azuredns-hostmaster.microsoft.com. 1 3600 300 2419200 300
```



```
Server Temp Key: ECDH, prime256v1, 256 bits
---
SSL handshake has read 2536 bytes and written 739 bytes
Verification: OK
---
New, TLSv1.3, Cipher is TLS_AES_256_GCM_SHA384
Server public key is 256 bit
Secure Renegotiation IS NOT supported
Compression: NONE
Expansion: NONE
No ALPN negotiated
Early data was not sent
Verify return code: 0 (ok)
---
DONE
```


HTTP Response Evidence

IPv4 HTTP (port 80)

HTTP Status	200
Connected IP	165.22.59.233
Connect Time	17.26 ms
TTFB	69.55 ms
Total Time	69.66 ms

Response Headers:

```
{
  "0": "HTTP/1.1 301 Moved Permanently",
  "1": "Date: Fri, 03 Jul 2026 19:51:33 GMT",
  "2": "Content-Type: text/html",
  "3": "Content-Length: 162",
  "4": "Connection: keep-alive",
  "5": "Location: https://help.edu.my/",
  "6": "X-Frame-Options: SAMEORIGIN",
  "7": "X-Content-Type-Options: nosniff",
  "8": "X-XSS-Protection: 1; mode=block",
  "9": "Server: Prometheus",
  "10": "Pre-Cognitive-Push: Enabled",
  "11": "Quantum-Flux-Capacity: Omega",
  "13": "HTTP/2 200",
  "14": "date: Fri, 03 Jul 2026 19:51:33 GMT",
  "15": "content-type: text/html; charset=UTF-8",
  "16": "x-flying-press-source: PHP",
  "17": "content-encoding: gzip",
  "18": "cache-tag: help.edu.my",
  "19": "cdn-cache-control: max-age=2592000",
  "20": "cache-control: public, no-cache",
  "21": "x-flying-press-cache: HIT",
  "22": "last-modified: Fri, 03 Jul 2026 14:12:56 GMT",
  "23": "x-frame-options: SAMEORIGIN",
  "24": "x-content-type-options: nosniff",
  "25": "x-xss-protection: 1; mode=block",
  "26": "server: Prometheus",
  "27": "pre-cognitive-push: Enabled",
  "28": "quantum-flux-capacity: Omega",
  "29": "strict-transport-security: max-age=31536000",
  "30": "referrer-policy: strict-origin-when-cross-origin",
  "31": "x-grid-srcache-ttl: 2592000",
  "32": "x-grid-srcache-fetch: MISS",
  "33": "x-grid-srcache-store: BYPASS",
  "34": "alt-svc: h3=\":443\"; ma=86400"
}
```

IPv4 HTTPS (port 443)

HTTP Status	200
Connected IP	165.22.59.233
Connect Time	7.54 ms
TTFB	49.07 ms
Total Time	49.12 ms

Response Headers:

```
[
  "HTTP/2 200",
  "date: Fri, 03 Jul 2026 19:51:33 GMT",
  "content-type: text/html; charset=UTF-8",
  "x-flying-press-source: PHP",
  "content-encoding: gzip",
  "cache-tag: help.edu.my",
  "cdn-cache-control: max-age=2592000",
  "cache-control: public, no-cache",
  "x-flying-press-cache: HIT",
  "last-modified: Fri, 03 Jul 2026 14:12:56 GMT",
  "x-frame-options: SAMEORIGIN",
  "x-content-type-options: nosniff",
  "x-xss-protection: 1; mode=block",
  "server: Prometheus",
]
```

```
"pre-cognitive-push: Enabled",
"quantum-flux-capacity: Omega",
"strict-transport-security: max-age=31536000",
"referrer-policy: strict-origin-when-cross-origin",
"x-grid-srcache-ttl: 2592000",
"x-grid-srcache-fetch: MISS",
"x-grid-srcache-store: BYPASS",
"alt-svc: h3=\":443\"; ma=86400"
]
```

Connectivity Test Evidence

Test	Result
TCP Connect IPv4 → port 80	301 0.008528 0.016857
TCP Connect IPv4 → port 443	200 0.008862 0.049338

Test Node Network Evidence

Node Profile	dual stack
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Egress Connectivity

IPv4 Egress	76.13.221.142
IPv6 Egress	2a02:4780:5e:2789::1

Sysctl IPv6 Flags

net.ipv6.conf.all.disable_ipv6	0
--------------------------------	---

IPv6 Routes

```
2a02:4780:5e::/48 dev eth0 proto kernel metric 256 pref medium
fe80::/64 dev eth0 proto kernel metric 256 pref medium
default via 2a02:4780:5e::1 dev eth0 proto static metric 1024 pref medium
```

IPv4 Routes

```
default via 76.13.221.254 dev eth0 proto static
10.6.101.0/24 dev wg0 scope link
10.6.102.0/24 dev wg0 scope link
76.13.221.0/24 dev eth0 proto kernel scope link src 76.13.221.142
172.29.0.0/24 dev wg0 scope link
```