1.15 What is... What is 'RDAP'?

RDAP (Registration Data Access Protocol)

There are many reasons for wanting to see the contact details of a domain holder:

- to secure domain transfers when changing registrars, data of the registrant is required
- to contact you in the event of technical difficulties in connection with a domain
- to get in contact with official and legal inquiries
- to the KJontaktaufnahme with purchase intentions of a Domain

Until now, the WHOIS protocol had been used for this purpose. Via a WHOIS query in various places, such as the registrar or the registry¹⁾ the deposited data of the domain holder could be viewed. Since 2015, IETF and ICANN have made proposals for a possible successor model, the Registration Data Access Protocol (RDAP).

What is the Registration Data Access Protocol (RDAP)?

The Registration Data Access Protocol (RDAP) is a network protocol standardized by the Internet Engineering Task Force (IETF) in 2015. It is intended to be the successor to the WHOIS protocol, which is used to research the domain name, IP address, and Autonomous System Number (ASN) of Internet resources.

RDAP offers the possibility to obtain further information on elementary Internet resources such as

- Domain names,
- · IP addresses or
- Autonomous System Numbers (ASNs)

and related entries. With the help of RDAP, requests can be made to domain registrars to request the contact details of the domain holder, the name servers or other contacts such as the admin-C of the domain.

1.15 What is...

Why was RDAP developed?

When the WHOIS protocol was published by the IETF in 1982, the Internet did not yet exist. All domains of the then ARPANET were managed centrally and could be easily queried. It has been discussed for a long time that this protocol no longer meets the demands of today's Internet. For example, there were no standards for character encoding and many domain registries handle WHOIS data according to their own specifications. Also, the query does not take place via a secure connection, which is why anonymous users also have full access to all data.

After various other attempts to find a solution, the new RDAP standard was finally launched, which is intended to solve the problems of the WHOIS protocol to date. From **26 August 2019**, registrars and operators of all address zones that are contractually bound to the ICANN domain administration will have to provide the Registration Data Access Protocol (RDAP).

What is the difference between RDAP and WHOIS?

RDAP is a kind of improved WHOIS; during its development, particular emphasis was placed on security, internationalization and structuring of the data. RDAP offers

- a structured query and response semantics,
- secure access to requested contact data,
- extensibility.
- the bootstrapping mechanism,
- standardized forwarding of queries,
- web-based and REST-compliant,
- uncomplicated translations of output data,
- · differentiated access to contact data

RDAP transfers the data via the HTTPS protocol in JSON format instead of in free text form, which makes it less easy to read, but makes it machine-readable and enables uniform interfaces.

RDAP

HTTP-based standardized JSON-format machine-readable automatic redirection to data origin define access rights and -levels

Whois

text-based free text difficult to process no redirection no defined access rights

1.15 What is...

Discussion about access rights

A new feature in RDAP is the possibility to define different access rights. The registry can define who can view which data for different groups. Anonymous users could see less data than authenticated users. However, there is still a need for clarification here, for example with regard to criminal prosecution.

¹⁾ since the entry into force of the GDPR in 2018 the Whois of gTLDs does not show personal data anymore. RDAP as the successor will handle this the same for now.

Unique solution ID: #2605

Author: Admin

Last update: 2022-09-20 13:47