The 'acct' URI Scheme
draft-ietf-appsawg-acct-uri-00

Abstract

   This document defines the 'acct' URI scheme as a way to identify a
   user's account at a service provider, irrespective of the particular
   protocols that can be used to interact with the account.

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Table of Contents

1. Introduction

   Existing URI schemes that enable interaction with, or that identify
   resources associated with, a user's account at a service provider are
   tied to particular services or application protocols. Two examples
   are the 'mailto' scheme (which enables interaction with a user's
   email account) and the 'http' scheme (which enables retrieval of web
   files controlled by a user or interaction with interfaces providing
   information about a user). However, there exists no URI scheme that
   generically identifies a user's account at a service provider, in the
   absence of interaction with the account using a particular
   application protocol. This specification fills that gap.

2. Rationale

   During formalization of the WebFinger protocol
   [I-D.jones-appsawg-webfinger], much discussion occurred regarding the
   appropriate URI scheme to include when specifying a user's account as
   a web link [RFC5988]. Although both the 'mailto' [RFC6068] and
   'http' [RFC2616] schemes were proposed, not all service providers
   support email services or web interfaces on behalf of user accounts
   (e.g., a microblogging or instant messaging provider might not
   provide email services, or an enterprise might not provide HTTP
   interfaces to information about its employees). Therefore, the
   discussants recognized that it would be helpful to define a URI
   scheme that could be used to generically identify a user's account at
   a service provider, irrespective of the particular services or
   application protocols that could be used to interact with the
   account. The result was the 'acct' URI scheme defined in this
   document.

3. Definition

   The syntax of the 'acct' URI scheme is defined under Section 4 of
   this document. Although 'acct' URIs take the form
   userpart@domainpart, the scheme is designed for the purpose of
   identification instead of interaction (regarding this distinction,
   see Section 1.2.2 of [RFC3986]). The "Internet resource" identified
   by an 'acct' URI is a user's account hosted at a service provider,
   where the service provider is associated with a DNS domain name.
   Thus a particular 'acct' URI is formed by setting the userpart
   portion of the URI to the user's account name at the service provider
   and by setting the domainpart portion of the URI to the DNS domain
   name of the service provider.

   For example, if a user has an account name of "foobar" on a

   microblogging service "status.example.net", it is taken as convention
   that the string "foobar@status.example.net" designates that account.
   This is expressed as a URI using the 'acct' scheme as
   "acct:foobar@status.example.net".

   It is not assumed that an entity will necessarily be able to interact
   with a user's account using any particular application protocol, such
   as email; to enable such interaction, an entity would need to use the
   appropriate URI scheme for such a protocol, such as the 'mailto'
   scheme. While it might be true that the 'acct' URI minus the scheme
   name (e.g., user@example.com derived from acct:user@example.com) can
   be reached via email or some other application protocol, that fact
   would be purely contingent and dependent upon the deployment
   practices of the provider.

   Because an 'acct' URI enables identification only and not
   interaction, it cannot be deferenced directly (as can URIs for most
   application protocols). Any protocol that uses the 'acct' URI
   scheme, such as the WebFinger protocol, is responsible for specifying
   how an 'acct' URI is to be dereferenced in the context of that
   protocol.

4. IANA Considerations

   In accordance with the guidelines and registration procedures for new
   URI schemes [RFC4395], this section provides the information needed
   to register the 'acct' URI scheme.

4.1. URI Scheme Name

   acct

4.2. Status

   permanent

4.3. URI Scheme Syntax

   The 'acct' URI syntax is defined here in Augmented Backus-Naur Form
   (ABNF) [RFC5234], borrowing the 'pct-encoded', 'sub-delims', and
   'unreserved' rules from that specification and the 'host' rule from
   [RFC3986]:

   acctURI   = "acct:" userpart "@" host
   userpart   = 1*(unreserved / pct-encoded / sub-delims)

4.4. URI Scheme Semantics

The 'acct' URI scheme is used to identify user accounts hosted at
service providers. It is used only for identification, not
interaction. A protocol that uses the 'acct' URI scheme is
responsible for specifying how an 'acct' URI is to be dereferenced in
the context of that protocol. There is no media type associated with
the 'acct' URI scheme.

4.5. Encoding Considerations

The 'acct' URI scheme allows any character from the Unicode
repertoire [UNICODE] encoded as a UTF-8 [RFC3629] string that is then
percent-encoded as necessary into valid ASCII [RFC20]. Note that
domain labels need to be encoded as A-labels as defined by [RFC5890]
in order to support internationalized domain names (IDNs).

4.6. Applications/Protocols That Use This URI Scheme Name

At the time of this writing, only the WebFinger protocol makes use of
the 'acct' URI scheme. However, use is not restricted to the
WebFinger protocol.

4.7. Interoperability Considerations

There are no known interoperability concerns related to use of the
'acct' URI scheme.

4.8. Security Considerations

See Section 5 of RFCXXXX.

[Note to RFC Editor: please replace XXXX with the number issued to
this document.]

4.9. Contact

Peter Saint-Andre, psaintan@cisco.com

4.10. Author/Change Controller

This scheme is registered under the IETF tree. As such, the IETF
maintains change control.

4.11. References

For use of the 'acct' URI scheme with the WebFinger protocol, see
[I-D.jones-appsawg-webfinger].

5. Security Considerations

   Because the 'acct' URI scheme does not directly enable interaction
   with a user's account at a service provider, possible security
   concerns are minimized.

   Protocols that make use of 'acct' URIs are responsible for defining
   security considerations related to such usage, e.g., the risks
   involved in dereferencing an 'acct' URI and the authentication and
   authorization methods that could be used to control access to
   personally identifying information.

6. Acknowledgements

   Some text was borrowed from [I-D.jones-appsawg-webfinger].

   Thanks to Graham Klyne and Barry Leiba for their substantive
   feedback.

7. References

7.1. Normative References

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7.2. Informative References

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