

Geopriv
Internet-Draft
Expires: April 23, 2006

C. Guenther
H. Tschofenig
Siemens
October 20, 2005

An Extensible Markup Language (XML) Representation for Expressing
Geographic Location Information Policy Capabilities
draft-guenther-geopriv-policy-caps-03.txt

Status of this Memo

By submitting this Internet-Draft, each author represents that any applicable patent or other IPR claims of which he or she is aware have been or will be disclosed, and any of which he or she becomes aware will be disclosed, in accordance with [Section 6 of BCP 79](#).

Internet-Drafts are working documents of the Internet Engineering Task Force (IETF), its areas, and its working groups. Note that other groups may also distribute working documents as Internet-Drafts.

Internet-Drafts are draft documents valid for a maximum of six months and may be updated, replaced, or obsoleted by other documents at any time. It is inappropriate to use Internet-Drafts as reference material or to cite them other than as "work in progress."

The list of current Internet-Drafts can be accessed at
<http://www.ietf.org/ietf/lid-abstracts.txt>.

The list of Internet-Draft Shadow Directories can be accessed at
<http://www.ietf.org/shadow.html>.

This Internet-Draft will expire on April 23, 2006.

Copyright Notice

Copyright (C) The Internet Society (2005).

Abstract

This specification defines a set of Extensible Markup Language (XML) elements for expressing geographic location information policy capabilities.

Internet-Draft

Geopriv Policy Capabilities

October 2005

Table of Contents

1.	Introduction	3
2.	Terminology	4
3.	Structure of Geopriv Policy Capabilities	5
4.	XML Schema	6
5.	Example Document	7
6.	Security Considerations	8
7.	IANA Considerations	9
7.1.	Namespace Registration	9
7.2.	Geopriv Policy Capabilities Schema Registration	9
8.	Acknowledgments	10
9.	References	11
9.1.	Normative References	11
9.2.	Informative References	11
	Authors' Addresses	12
	Intellectual Property and Copyright Statements	13

Internet-Draft

Geopriv Policy Capabilities

October 2005

1. Introduction

Authorization policies are an important component of presence [[RFC2778](#)]. They allow the presentity to grant access to specific pieces of information to watchers. Authorization policies have been designed to be extensible. For this reason [I-D.ietf-simple-common-policy-caps] defines a generic Extensible Markup Language (XML) based format for representing policy capabilities. That format applies to many policy types, including location and presence. This specification extends that one by defining policy capabilities specific to geographic location information. Those policy capabilities correspond to the conditions, actions and transformations defined in [[I-D.ietf-geopriv-policy](#)].

Internet-Draft

Geopriv Policy Capabilities

October 2005

[2.](#) Terminology

The key words "MUST", "MUST NOT", "REQUIRED", "SHALL", "SHALL NOT", "SHOULD", "SHOULD NOT", "RECOMMENDED", "MAY", and "OPTIONAL" in this document are to be interpreted as described in [[RFC2119](#)].

3. Structure of Geopriv Policy Capabilities

The structure of common policy capability documents is defined in [[I-D.ietf-simple-common-policy-caps](#)]. In that specification, each policy capability document has three components - a list of supported conditions, a list of supported actions, and a list of supported transformations. This specification merely extends that document with the conditions, actions and transformations defined in [[I-D.ietf-geopriv-policy](#)]. It does so by defining the following empty elements:

- civic-loc-condition
- geospatial-loc-condition
- distribution-transformation
- retention-transformation
- keep-rules-transformation
- civic-loc-transformation
- geospatial-loc-transformation

Each of these elements indicates whether the respective attribute in [[I-D.ietf-geopriv-policy](#)] is supported. All of these elements are defined within the namespace:

urn:ietf:params:xml:ns:geopriv-policy-capabilities

[4.](#) XML Schema

```
<xs:schema
  targetNamespace=
    "urn:ietf:params:xml:ns:geopriv-policy-capabilities"
  xmlns="urn:ietf:params:xml:ns:geopriv-policy-capabilities"
  xmlns:pc="urn:ietf:params:xml:ns:policy-capabilities"
  xmlns:xs="http://www.w3.org/2001/XMLSchema"
  elementFormDefault="qualified"
  attributeFormDefault="unqualified">

  <xs:import namespace=
    "urn:ietf:params:xml:ns:policy-capabilities" />
```

```

<xs:element name="civic-loc-condition"
  type="pc:emptyType" />

<xs:element name="geospatial-loc-condition"
  type="pc:emptyType"/>

<xs:element name="distribution-transformation"
  type="pc:emptyType" />

<xs:element name="retention-tranformation"
  type="pc:emptyType" />

<xs:element name="keep-rules-transformation"
  type="pc:emptyType" />

<xs:element name="civic-loc-transformation"
  type="pc:emptyType"/>

<xs:element name="geospatial-loc-transformation">
  <xs:complexType>
    <xs:sequence>
      <xs:element name="lat-resolution"
        type="pc:emptyType" minOccurs="0" />
      <xs:element name="lon-resolution"
        type="pc:emptyType" minOccurs="0" />
      <xs:element name="alt-resolution"
        type="pc:emptyType" minOccurs="0" />
    </xs:sequence>
  </xs:complexType>
</xs:element>

</xs:schema>

```

[5.](#) Example Document

The following document indicates that the identity and validity conditions are supported, each of which is defined in [I-D.ietf-geopriv-common-policy], while no support of sphere conditions is indicated. Furthermore, the example indicates that the geolocation-specific condition named civic-loc-condition is supported. With respect to transformations, the example gives the indication that the

geolocation-specific transformations named keep-rules-transformation is supported. This is also the case for geospatial-loc-transformations, namely, for latitude and longitude values, but not for altitude values:

```
<?xml version="1.0" encoding="UTF-8"?>
<policy-capabilities
  xmlns="urn:ietf:params:xml:ns:policy-capabilities"
  xmlns:GPC="urn:ietf:params:xml:ns:geopriv-policy-capabilities"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance">

  <conditions>
    <identity/>
    <validity/>
    <GPC:civic-loc-condition/>
  </conditions>

  <actions>
  </actions>

  <transformations>
    <GPC:keep-rules-transformation/>
    <GPC:geospatial-loc-transformation>
      <GPC:lat-resolution/>
      <GPC:lon-resolution/>
    </GPC:geospatial-loc-transformation>
  </transformations>

</policy-capabilities>
```


This specification does not introduce any new security considerations beyond those discussed in [[I-D.ietf-simple-common-policy-caps](#)].

[7.](#) IANA Considerations

This section registers a new XML namespace and a new XML schema with IANA.

[7.1.](#) Namespace Registration

URI: urn:ietf:params:xml:ns:geopriv-policy-capabilities
Registrant Contact: IETF Geopriv Working Group, Christian Guenther
(christian.guenther@siemens.com), Hannes Tschofenig
(hannes.tschofenig@siemens.com).

XML:

```
BEGIN
<?xml version="1.0"?>
<!DOCTYPE html PUBLIC "-//W3C//DTD XHTML Basic 1.0//EN"
  "http://www.w3.org/TR/xhtml-basic/xhtml-basic10.dtd">
<html xmlns="http://www.w3.org/1999/xhtml">
<head>
  <meta http-equiv="content-type"
    content="text/html; charset=iso-8859-1"/>
  <title>Geopriv Policy Capabilities</title>
</head>
<body>
  <h1>Namespace for Geopriv Policy Capabilities</h1>
  <h2>urn:ietf:params:xml:ns:geopriv-policy-capabilities</h2>
  <p>See <a href="[[[URL of published RFC]]]">RFCXXXX</a>.</p>
</body>
</html>
END
```

[7.2.](#) Geopriv Policy Capabilities Schema Registration

URI: Please assign.

Registrant Contact: IETF Geopriv Working Group, Christian Guenther
(christian.guenther@siemens.com), Hannes Tschofenig
(hannes.tschofenig@siemens.com).

XML: The XML schema to be registered is contained in section
[Section 4](#). Its first line is

```
<xs:schema
```

and its last line is

```
</xs:schema>
```

Internet-Draft

Geopriv Policy Capabilities

October 2005

8. Acknowledgments

The authors would like to thank Jonathan Rosenberg whose Presence Policy Capabilities document [[I-D.ietf-simple-pres-policy-caps](#)] served as template for this document.

Internet-Draft

Geopriv Policy Capabilities

October 2005

[9.](#) References

[9.1.](#) Normative References

- [RFC2119] Bradner, S., "Key words for use in RFCs to Indicate Requirement Levels", March 1997.
- [RFC2778] Day, M., Rosenberg, J., and H. Sugano, "A Model for Presence and Instant Messaging", February 2000.
- [RFC3688] Mealling, M., "The IETF XML Registry", January 2004.

[9.2.](#) Informative References

- [I-D.ietf-geopriv-common-policy]
Schulzrinne, H., Morris, J., Tschofenig, H., Polk, J., and J. Rosenberg, "A Document Format for Expressing Privacy Preferences", [draft-ietf-geopriv-common-policy-04](#) (work in progress), February 2005.
- [I-D.ietf-geopriv-policy]
Schulzrinne, H., Tschofenig, H., Morris, J., Cuellar, J., and J. Polk, "Geopriv Policy", [draft-ietf-geopriv-policy-06](#) (work in progress), July 2005.
- [I-D.ietf-simple-common-policy-caps]
Rosenberg, J., "An Extensible Markup Language (XML) Representation for Expressing Policy Capabilities", [draft-ietf-simple-common-policy-caps-00](#) (work in progress), July 2005.

[I-D.ietf-simple-pres-policy-caps]

Rosenberg, J., "An Extensible Markup Language (XML)
Representation for Expressing Presence Policy
Capabilities", [draft-ietf-simple-pres-policy-caps-00](#) (work
in progress), July 2005.

Guenther & Tschofenig Expires April 23, 2006

[Page 11]

Internet-Draft

Geopriv Policy Capabilities

October 2005

Authors' Addresses

Christian Guenther
Siemens
Otto-Hahn-Ring 6
Munich, Bavaria 81739
Germany

Email: christian.guenther@siemens.com

Hannes Tschofenig
Siemens
Otto-Hahn-Ring 6
Munich, Bavaria 81739
Germany

Email: hannes.tschofenig@siemens.com

Internet-Draft

Geopriv Policy Capabilities

October 2005

Intellectual Property Statement

The IETF takes no position regarding the validity or scope of any Intellectual Property Rights or other rights that might be claimed to pertain to the implementation or use of the technology described in this document or the extent to which any license under such rights might or might not be available; nor does it represent that it has made any independent effort to identify any such rights. Information on the procedures with respect to rights in RFC documents can be found in [BCP 78](#) and [BCP 79](#).

Copies of IPR disclosures made to the IETF Secretariat and any assurances of licenses to be made available, or the result of an attempt made to obtain a general license or permission for the use of such proprietary rights by implementers or users of this specification can be obtained from the IETF on-line IPR repository at <http://www.ietf.org/ipr>.

The IETF invites any interested party to bring to its attention any copyrights, patents or patent applications, or other proprietary rights that may cover technology that may be required to implement this standard. Please address the information to the IETF at ietf-ipr@ietf.org.

Disclaimer of Validity

This document and the information contained herein are provided on an "AS IS" basis and THE CONTRIBUTOR, THE ORGANIZATION HE/SHE REPRESENTS OR IS SPONSORED BY (IF ANY), THE INTERNET SOCIETY AND THE INTERNET ENGINEERING TASK FORCE DISCLAIM ALL WARRANTIES, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO ANY WARRANTY THAT THE USE OF THE INFORMATION HEREIN WILL NOT INFRINGE ANY RIGHTS OR ANY IMPLIED WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE.

Copyright Statement

Copyright (C) The Internet Society (2005). This document is subject to the rights, licenses and restrictions contained in [BCP 78](#), and except as set forth therein, the authors retain all their rights.

Acknowledgment

Funding for the RFC Editor function is currently provided by the Internet Society.