

[MS-ADLS]: Active Directory Lightweight Directory Services Schema

This document contains a list of the objects that exist in the Active Directory Lightweight Directory Services schema. Active Directory and all associated terms and concepts are described in the Microsoft proprietary document titled "Active Directory Technical Specification", which has the following normative reference:

[MS-ADTS] Microsoft Corporation, "[Active Directory Technical Specification](#)", June 2007.

Note This document is not intended to stand on its own; it is intended to act as an appendix to the Active Directory Technical Specification, as specified in the preceding normative reference. For more information about the Active Directory schema, see [\[MS-ADTS\]](#) section 3.1.1.2 (Active Directory Schema).

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1 References

This section contains the references that are used in this document.

We conduct frequent surveys of the normative references to assure their continued availability. If you have any issue with finding a normative reference, please contact dochelp@microsoft.com. We will assist you in finding the relevant information. Please check the archive site, <http://msdn2.microsoft.com/en-us/library/E4BD6494-06AD-4aed-9823-445E921C9624>, as an additional source.

[JFIF] Hamilton, E., "JPEG File Interchange Format, Version 1.02", September 1992, <http://www.w3.org/Graphics/JPEG/jfif.txt>

[MS-ADTS] Microsoft Corporation, "[Active Directory Technical Specification](#)", July 2006.

[MSDN-GroupType] Microsoft Corporation, "Group-Type", <http://msdn2.microsoft.com/en-us/library/ms675935.aspx>

If you have any trouble finding [MSDN-GroupType], please check [here](#).

[MSDN-ExtUserIntDirObj] Microsoft Corporation, "Extending the User Interface for Directory Objects", <http://msdn2.microsoft.com/en-us/library/ms676902.aspx>

[RFC822] Crocker, D.H., "Standard for ARPA Internet Text Messages", RFC 822, August 1982, <http://www.ietf.org/rfc/rfc0822.txt>

[RFC2251] Wahl, M., Howes, T., and Kille, S., "Lightweight Directory Access Protocol (v3)", RFC 2251, December 1997, <http://www.ietf.org/rfc/rfc2251.txt>

[RFC2849] Good, G., "The LDAP Data Interchange Format (LDIF) - Technical Specification", RFC 2849, June 2000, <http://www.ietf.org/rfc/rfc2849.txt>

[RFC3280] Housley, R., Polk, W., Ford, W., and Solo, D., "Internet X.509 Public Key Infrastructure Certificate and Certificate Revocation List (CRL) Profile", RFC 3280, April 2002, <http://www.ietf.org/rfc/rfc3280.txt>

[X121] ITU-T, "Public data networks - Network aspects - International numbering plan for public data networks", Recommendation X.121, October 2000, <http://www.itu.int/rec/T-REC-X.121/en>

[X500] ITU-T, "Information Technology - Open Systems Interconnection - The Directory: Overview of Concepts, Models and Services", Recommendation X.500, August 2005, <http://www.itu.int/rec/T-REC-X.500-200508-I/en>

Note There is a charge to download the specification.

2 Attributes

The following sections specify the attributes in the Active Directory Lightweight Directory Services schema.

Note Lines of text in the attribute definitions that are excessively long have been "folded" in accordance with [RFC2849](#) Note 2.

2.1 Attribute accountExpires

This attribute specifies the date when the account expires. This value represents the number of 100 nanosecond intervals since January 1, 1601 Coordinated Universal Time (Greenwich Mean Time). A value of 0 or 0x7FFFFFFFFFFFFFFF (9223372036854775807) indicates that the account never expires.

```
cn: Account-Expires
ldapDisplayName: accountExpires
attributeId: 1.2.840.113556.1.4.159
attributeSyntax: 2.5.5.16
omSyntax: 65
isSingleValued: TRUE
schemaIdGuid: bf967915-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fCOPY
attributeSecurityGuid: 4c164200-20c0-11d0-a768-00aa006e0529
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.2 Attribute adminContextMenu

This attribute specifies the order number and globally unique identifier (GUID) of the context menu to be used on administration screens.

```
cn: Admin-Context-Menu
ldapDisplayName: adminContextMenu
attributeId: 1.2.840.113556.1.4.614
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 553fd038-f32e-11d0-b0bc-00c04fd8dca6
systemOnly: FALSE
```

2.3 Attribute adminDescription

This attribute specifies the description displayed on administration screens.

```
cn: Admin-Description
ldapDisplayName: adminDescription
attributeId: 1.2.840.113556.1.2.226
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf967919-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
```

```
searchFlags: 0
rangeLower: 0
rangeUpper: 1024
attributeSecurityGuid: 59ba2f42-79a2-11d0-9020-00c04fc2d3cf
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.4 Attribute adminDisplayName

This attribute specifies the name displayed on administration screens.

```
cn: Admin-Display-Name
ldapDisplayName: adminDisplayName
attributeId: 1.2.840.113556.1.2.194
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf96791a-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 256
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.5 Attribute adminMultiselectPropertyPages

A multivalued attribute whose values are a number representing the order in which the pages are added and a GUID of a COM object that implements multiselect property pages for the Active Directory Users and Computers snap-in.

```
cn: Admin-Multiselect-Property-Pages
ldapDisplayName: adminMultiselectPropertyPages
attributeId: 1.2.840.113556.1.4.1690
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 18f9b67d-5ac6-4b3b-97db-d0a406afb7ba
systemOnly: FALSE
```

2.6 Attribute adminPropertyPages

This attribute specifies the order number and GUID of the property pages for an object to be displayed on Active Directory administration screens. For more information, see the document, "Extending the User Interface for Directory Objects" [\[MSDN-ExtUserIntDirObj\]](#).

```
cn: Admin-Property-Pages
ldapDisplayName: adminPropertyPages
attributeId: 1.2.840.113556.1.4.562
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 52458038-ca6a-11d0-ffff-0000f80367c1
systemOnly: FALSE
```

2.7 Attribute allowedAttributes

This attribute specifies attributes that are permitted to be assigned to a class.

```
cn: Allowed-Attributes
ldapDisplayName: allowedAttributes
attributeId: 1.2.840.113556.1.4.913
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: FALSE
schemaIdGuid: 9a7ad940-ca53-11d1-bbd0-0080c76670c0
systemOnly: TRUE
searchFlags: 0
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_IS_CONSTRUCTED
```

2.8 Attribute allowedAttributesEffective

This attribute specifies a list of attributes that can be modified on the object.

```
cn: Allowed-Attributes-Effective
ldapDisplayName: allowedAttributesEffective
attributeId: 1.2.840.113556.1.4.914
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: FALSE
schemaIdGuid: 9a7ad941-ca53-11d1-bbd0-0080c76670c0
systemOnly: TRUE
searchFlags: 0
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_IS_CONSTRUCTED
```

2.9 Attribute allowedChildClasses

This attribute specifies classes that may be contained by a class.

```
cn: Allowed-Child-Classes
ldapDisplayName: allowedChildClasses
attributeId: 1.2.840.113556.1.4.911
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: FALSE
schemaIdGuid: 9a7ad942-ca53-11d1-bbd0-0080c76670c0
systemOnly: TRUE
searchFlags: 0
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_IS_CONSTRUCTED
```

2.10 Attribute allowedChildClassesEffective

This attribute specifies a list of classes that can be modified.

```
cn: Allowed-Child-Classes-Effective
```

```
ldapDisplayName: allowedChildClassesEffective
attributeId: 1.2.840.113556.1.4.912
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: FALSE
schemaIdGuid: 9a7ad943-ca53-11d1-bbd0-0080c76670c0
systemOnly: TRUE
searchFlags: 0
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_IS_CONSTRUCTED
```

2.11 Attribute aNR

This attribute specifies whether ambiguous name resolution is to be used when choosing between objects.

```
cn: ANR
ldapDisplayName: aNR
attributeId: 1.2.840.113556.1.4.1208
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 45b01500-c419-11d1-bbc9-0080c76670c0
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_IS_CONSTRUCTED
```

2.12 Attribute appliesTo

This attribute contains the list of object classes that the extended right applies to. In the list, an object class is represented by the schemaIDGUID property for its schemaClass object.

```
cn: Applies-To
ldapDisplayName: appliesTo
attributeId: 1.2.840.113556.1.4.341
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 8297931d-86d3-11d0-afda-00c04fd930c9
systemOnly: FALSE
searchFlags: 0
rangeLower: 36
rangeUpper: 36
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.13 Attribute assistant

This attribute specifies the distinguished name (DN) of a user's administrative assistant.

```
cn: Assistant
ldapDisplayName: assistant
attributeId: 1.2.840.113556.1.4.652
attributeSyntax: 2.5.5.1
```



```
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: 0296c11c-40da-11d1-a9c0-0000f80367c1
systemOnly: FALSE
searchFlags: fCOPY
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
```

2.14 Attribute attributeCertificateAttribute

This attribute specifies a digitally signed or certified identity and set of attributes. It is used to bind authorization information to an identity.

```
cn: attributeCertificateAttribute
ldapDisplayName: attributeCertificateAttribute
attributeId: 2.5.4.58
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: fa4693bb-7bc2-4cb9-81a8-c99c43b7905e
systemOnly: FALSE
searchFlags: 0
```

2.15 Attribute attributeDisplayNames

This attribute specifies the name to be displayed for this object.

```
cn: Attribute-Display-Names
ldapDisplayName: attributeDisplayNames
attributeId: 1.2.840.113556.1.4.748
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: cb843f80-48d9-11d1-a9c3-0000f80367c1
systemOnly: FALSE
```

2.16 Attribute attributeID

This attribute specifies the unique X.500 object identifier (OID) for identifying an attribute. For more information, see [\[X500\]](#).

```
cn: Attribute-ID
ldapDisplayName: attributeID
attributeId: 1.2.840.113556.1.2.30
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: TRUE
schemaIdGuid: bf967922-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: fPRESERVEONDELETE
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.17 Attribute attributeSecurityGUID

This attribute specifies the GUID to be used to apply security credentials to a set of objects.

```
cn: Attribute-Security-GUID
ldapDisplayName: attributeSecurityGUID
attributeId: 1.2.840.113556.1.4.149
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: bf967924-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 16
rangeUpper: 16
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.18 Attribute attributeSyntax

This attribute specifies the object identifier (OID) for the syntax for this attribute.

```
cn: Attribute-Syntax
ldapDisplayName: attributeSyntax
attributeId: 1.2.840.113556.1.2.32
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: TRUE
schemaIdGuid: bf967925-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: fPRESERVEONDELETE
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.19 Attribute attributeTypes

This attribute specifies a multivalued property containing strings that represent each attribute in the schema.

```
cn: Attribute-Types
ldapDisplayName: attributeTypes
attributeId: 2.5.21.5
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 9a7ad944-ca53-11d1-bbd0-0080c76670c0
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_IS_CONSTRUCTED
```

2.20 Attribute audio

This attribute allows the storing of sounds in Active Directory.

```
cn: audio
```

```
ldapDisplayName: audio
attributeId: 0.9.2342.19200300.100.1.55
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: d0e1d224-e1a0-42ce-a2da-793ba5244f35
systemOnly: FALSE
searchFlags: 0
rangeUpper: 250000
showInAdvancedViewOnly: FALSE
```

2.21 Attribute auxiliaryClass

This attribute specifies the list of auxiliary classes to be associated with this class.

```
cn: Auxiliary-Class
ldapDisplayName: auxiliaryClass
attributeId: 1.2.840.113556.1.2.351
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: FALSE
schemaIdGuid: bf96792c-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.22 Attribute badPasswordTime

This attribute specifies the last time and date that an attempt to log on to this account was made with an invalid password. This value is stored as a large integer that represents the number of 100 nanosecond intervals since January 1, 1601 (UTC). A value of zero means that the last "bad password time" is unknown.

```
cn: Bad-Password-Time
ldapDisplayName: badPasswordTime
attributeId: 1.2.840.113556.1.4.49
attributeSyntax: 2.5.5.16
omSyntax: 65
isSingleValued: TRUE
schemaIdGuid: bf96792d-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```

2.23 Attribute badPwdCount

This attribute specifies the number of times the user tried to log on to the account by using an incorrect password. A value of 0 indicates that the value is unknown.

```
cn: Bad-Pwd-Count
ldapDisplayName: badPwdCount
attributeId: 1.2.840.113556.1.4.12
attributeSyntax: 2.5.5.9
```

```
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: bf96792e-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
attributeSecurityGuid: 5f202010-79a5-11d0-9020-00c04fc2d4cf
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```

2.24 Attribute bridgeheadServerListBL

This attribute specifies the list of servers that are bridgeheads for replication.

```
cn: Bridgehead-Server-List-BL
ldapDisplayName: bridgeheadServerListBL
attributeId: 1.2.840.113556.1.4.820
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: d50c2cdb-8951-11d1-aebc-0000f80367c1
systemOnly: TRUE
searchFlags: 0
linkID: 99
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```

2.25 Attribute bridgeheadTransportList

This attribute specifies transports for which this server is a bridgehead.

```
cn: Bridgehead-Transport-List
ldapDisplayName: bridgeheadTransportList
attributeId: 1.2.840.113556.1.4.819
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: d50c2cda-8951-11d1-aebc-0000f80367c1
systemOnly: FALSE
searchFlags: 0
linkID: 98
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.26 Attribute businessCategory

This attribute specifies descriptive text on an organizational unit.

```
cn: Business-Category
ldapDisplayName: businessCategory
attributeId: 2.5.4.15
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: bf967931-0de6-11d0-a285-00aa003049e2
```

```
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 128
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.27 Attribute c

This attribute specifies the country/region in the address of the user. The country/region is represented as the two-character country code based on ISO-3166.

```
cn: Country-Name
ldapDisplayName: c
attributeId: 2.5.4.6
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf967945-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fCOPY
rangeLower: 1
rangeUpper: 3
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
  FLAG_ATTR_REQ_PARTIAL_SET_MEMBER
```

2.28 Attribute canonicalName

This attribute specifies the name of the object in canonical format.

"myserver2.fabrikam.com/users/jeffsmith" is an example of a distinguished name (DN) in canonical format.

This is a constructed attribute. The results returned are identical to those returned by the following Active Directory function: DsCrackNames(NULL, DS_NAME_FLAG_SYNTACTICAL_ONLY, DS_FQDN_1779_NAME, DS_CANONICAL_NAME, ...).

```
cn: Canonical-Name
ldapDisplayName: canonicalName
attributeId: 1.2.840.113556.1.4.916
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 9a7ad945-ca53-11d1-bbd0-0080c76670c0
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_IS_CONSTRUCTED
```

2.29 Attribute carLicense

This attribute specifies the vehicle license or registration plate.

```
cn: carLicense
```

```
ldapDisplayName: carLicense
attributeId: 2.16.840.1.113730.3.1.1
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: d4159c92-957d-4a87-8a67-8d2934e01649
systemOnly: FALSE
searchFlags: 0
showInAdvancedViewOnly: FALSE
```

2.30 Attribute classDisplayName

This attribute specifies the object name to be displayed on dialogs.

```
cn: Class-Display-Name
ldapDisplayName: classDisplayName
attributeId: 1.2.840.113556.1.4.610
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 548e1c22-dea6-11d0-b010-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.31 Attribute cn

This attribute specifies the name that represents an object. This attribute is used to perform searches.

```
cn: Common-Name
ldapDisplayName: cn
attributeId: 2.5.4.3
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf96793f-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fATTINDEX
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
             FLAG_ATTR_REQ_PARTIAL_SET_MEMBER
```

2.32 Attribute co

This attribute specifies the country/region in which the user is located.

```
cn: Text-Country
ldapDisplayName: co
attributeId: 1.2.840.113556.1.2.131
```

```
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: f0f8ffa7-1191-11d0-a060-00aa006c33ed
systemOnly: FALSE
searchFlags: fCOPY
rangeLower: 1
rangeUpper: 128
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.33 Attribute comment

This attribute specifies the user's comments.

```
cn: User-Comment
ldapDisplayName: comment
attributeId: 1.2.840.113556.1.4.156
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf967a6a-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
attributeSecurityGuid: 59ba2f42-79a2-11d0-9020-00c04fc2d3cf
```

2.34 Attribute company

This attribute specifies the user's company name.

```
cn: Company
ldapDisplayName: company
attributeId: 1.2.840.113556.1.2.146
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: f0f8ff88-1191-11d0-a060-00aa006c33ed
systemOnly: FALSE
searchFlags: fCOPY
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
```

2.35 Attribute configurationFile

ms-DS-Configuration-File

```
cn: ms-DS-Configuration-File
ldapDisplayName: configurationFile
attributeId: 1.2.840.113556.1.4.1889
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
```

```
schemaIdGuid: e2a40bd5-33d3-4e61-b32b-736ecc1ca9dd
searchFlags: fATTINDEX
```

2.36 Attribute configurationFileGuid

ms-DS-Configuration-File-Guid

```
cn: ms-DS-Configuration-File-Guid
ldapDisplayName: configurationFileGuid
attributeId: 1.2.840.113556.1.4.1886
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: 8658cbf9-a1dc-4c83-8e7f-5eba94de8aa7
searchFlags: fATTINDEX
```

2.37 Attribute contextMenu

This attribute specifies the order number and GUID of the context menu to be used for an object.

```
cn: Context-Menu
ldapDisplayName: contextMenu
attributeId: 1.2.840.113556.1.4.499
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 4d8601ee-ac85-11d0-afe3-00c04fd930c9
systemOnly: FALSE
```

2.38 Attribute cost

This attribute contains the relative cost for routing messages through a particular site connector.

```
cn: Cost
ldapDisplayName: cost
attributeId: 1.2.840.113556.1.2.135
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: bf967944-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
```

2.39 Attribute countryCode

This attribute specifies the country code for the user's language of choice. This value is not used by Microsoft Windows 2000.

```
cn: Country-Code
ldapDisplayName: countryCode
attributeId: 1.2.840.113556.1.4.25
```



```
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 5fd42471-1262-11d0-a060-00aa006c33ed
systemOnly: FALSE
searchFlags: fCOPY
rangeLower: 0
rangeUpper: 65535
attributeSecurityGuid: 59ba2f42-79a2-11d0-9020-00c04fc2d3cf
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.40 Attribute createDialog

This attribute specifies the GUID of a dialog for creating an associated object.

```
cn: Create-Dialog
ldapDisplayName: createDialog
attributeId: 1.2.840.113556.1.4.810
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 2b09958a-8931-11d1-aebc-0000f80367c1
systemOnly: FALSE
```

2.41 Attribute createTimeStamp

This attribute specifies the date when this object was created. This value is replicated.

```
cn: Create-Time-Stamp
ldapDisplayName: createTimeStamp
attributeId: 2.5.18.1
attributeSyntax: 2.5.5.11
omSyntax: 24
isSingleValued: TRUE
schemaIdGuid: 2df90d73-009f-11d2-aa4c-00c04fd7d83a
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_IS_CONSTRUCTED
```

2.42 Attribute createWizardExt

This attribute specifies the GUID of the wizard extensions for creating an associated object.

```
cn: Create-Wizard-Ext
ldapDisplayName: createWizardExt
attributeId: 1.2.840.113556.1.4.812
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 2b09958b-8931-11d1-aebc-0000f80367c1
systemOnly: FALSE
```

2.43 Attribute creationWizard

This attribute specifies the wizard to activate when creating objects of this class.

```
cn: Creation-Wizard
ldapDisplayName: creationWizard
attributeId: 1.2.840.113556.1.4.498
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 4d8601ed-ac85-11d0-afe3-00c04fd930c9
systemOnly: FALSE
```

2.44 Attribute dc

This attribute specifies the naming attribute for domain and DNS objects. This attribute is usually displayed as dc=DomainName.

```
cn: Domain-Component
ldapDisplayName: dc
attributeId: 0.9.2342.19200300.100.1.25
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 19195a55-6da0-11d0-afd3-00c04fd930c9
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 255
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
             FLAG_ATTR_REQ_PARTIAL_SET_MEMBER
```

2.45 Attribute defaultClassStore

This attribute specifies the default class store for a given user.

```
cn: Default-Class-Store
ldapDisplayName: defaultClassStore
attributeId: 1.2.840.113556.1.4.213
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: bf967948-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
```

2.46 Attribute defaultGroup

This attribute specifies the group to which this object is assigned when it is created.

```
cn: Default-Group
```

```
ldapDisplayName: defaultGroup
attributeId: 1.2.840.113556.1.4.480
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: 720bc4e2-a54a-11d0-afdf-00c04fd930c9
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.47 Attribute defaultHidingValue

This attribute specifies a Boolean value that specifies the default setting of the showInAdvancedViewOnly property of new instances of this class.

```
cn: Default-Hiding-Value
ldapDisplayName: defaultHidingValue
attributeId: 1.2.840.113556.1.4.518
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: b7b13116-b82e-11d0-afee-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.48 Attribute defaultObjectCategory

This attribute specifies the object category to use for an object if one is not specified.

```
cn: Default-Object-Category
ldapDisplayName: defaultObjectCategory
attributeId: 1.2.840.113556.1.4.783
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: 26d97367-6070-11d1-a9c6-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.49 Attribute defaultSecurityDescriptor

This attribute specifies the security descriptor to be assigned to the object when it is first created.

```
cn: Default-Security-Descriptor
ldapDisplayName: defaultSecurityDescriptor
attributeId: 1.2.840.113556.1.4.224
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
```

```
schemaIdGuid: 807a6d30-1669-11d0-a064-00aa006c33ed
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 32767
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.50 Attribute department

This attribute contains the name for the department in which the user works.

```
cn: Department
ldapDisplayName: department
attributeId: 1.2.840.113556.1.2.141
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf96794f-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fCOPY
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
```

2.51 Attribute departmentNumber

This attribute identifies a department within an organization.

```
cn: departmentNumber
ldapDisplayName: departmentNumber
attributeId: 2.16.840.1.113730.3.1.2
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: be9ef6ee-cbc7-4f22-b27b-96967e7ee585
systemOnly: FALSE
searchFlags: 0
showInAdvancedViewOnly: FALSE
```

2.52 Attribute description

This attribute contains the description to display for an object. This value is treated as single-valued by the system.

```
cn: Description
ldapDisplayName: description
attributeId: 2.5.4.13
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: bf967950-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
```

```
rangeLower: 0
rangeUpper: 1024
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.53 Attribute desktopProfile

This attribute specifies the location of the desktop profile for a user or group of users. Currently not used.

```
cn: Desktop-Profile
ldapDisplayName: desktopProfile
attributeId: 1.2.840.113556.1.4.346
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: eea65906-8ac6-11d0-afda-00c04fd930c9
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.54 Attribute destinationIndicator

This attribute is part of the X.500 specification [\[X500\]](#) and is not used by NTDS.

```
cn: Destination-Indicator
ldapDisplayName: destinationIndicator
attributeId: 2.5.4.27
attributeSyntax: 2.5.5.5
omSyntax: 19
isSingleValued: FALSE
schemaIdGuid: bf967951-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 128
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.55 Attribute directReports

This attribute contains the list of users that directly report to the user. The users that are listed as reports are those that have the property manager property set to this user. Each item in the list is a linked reference to the object that represents the user.

```
cn: Reports
ldapDisplayName: directReports
attributeId: 1.2.840.113556.1.2.436
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: bf967a1c-0de6-11d0-a285-00aa003049e2
```

```
systemOnly: TRUE
searchFlags: 0
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
linkID: 43
systemFlags: FLAG_ATTR_NOT_REPLICATED
```

2.56 Attribute displayName

This attribute specifies the display name for an object. This attribute is usually the combination of the user's first name, middle initial, and last name.

```
cn: Display-Name
ldapDisplayName: displayName
attributeId: 1.2.840.113556.1.2.13
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf967953-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fANR | fATTINDEX
rangeLower: 0
rangeUpper: 256
attributeSecurityGuid: 59ba2f42-79a2-11d0-9020-00c04fc2d3cf
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.57 Attribute displayNamePrintable

This attribute specifies the printable display name for an object. The printable display name is usually the combination of the user's first name, middle initial, and last name.

```
cn: Display-Name-Printable
ldapDisplayName: displayNamePrintable
attributeId: 1.2.840.113556.1.2.353
attributeSyntax: 2.5.5.5
omSyntax: 19
isSingleValued: TRUE
schemaIdGuid: bf967954-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
rangeLower: 1
rangeUpper: 256
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
isMemberOfPartialAttributeSet: TRUE
```

2.58 Attribute distinguishedName

This attribute is the same as the distinguished name (DN) for an object.

```
cn: Obj-Dist-Name
ldapDisplayName: distinguishedName
attributeId: 2.5.4.49
attributeSyntax: 2.5.5.1
omSyntax: 127
```

```

omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: bf9679e4-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: fPRESERVEONDELETE
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
  FLAG_ATTR_REQ_PARTIAL_SET_MEMBER | FLAG_ATTR_NOT_REPLICATED

```

2.59 Attribute dITContentRules

This attribute specifies the permissible content of entries of a particular structural object class via the identification of an optional set of auxiliary object classes, mandatory, optional, and precluded attributes. Collective attributes are included in DIT-Content-Rules, as specified in [RFC2251](#) section 3.2.1.

```

cn: DIT-Content-Rules
ldapDisplayName: dITContentRules
attributeId: 2.5.21.2
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 9a7ad946-ca53-11d1-bbd0-0080c76670c0
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_IS_CONSTRUCTED

```

2.60 Attribute division

This attribute specifies the user's division.

```

cn: Division
ldapDisplayName: division
attributeId: 1.2.840.113556.1.4.261
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: fe6136a0-2073-11d0-a9c2-00aa006c33ed
systemOnly: FALSE
searchFlags: fCOPY
rangeLower: 0
rangeUpper: 256
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050

```

2.61 Attribute dMDLocation

This attribute specifies the distinguished name (DN) to identify the schema partition.

```

cn: DMD-Location
ldapDisplayName: dMDLocation
attributeId: 1.2.840.113556.1.2.36
attributeSyntax: 2.5.5.1

```

```
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: f0f8ff8b-1191-11d0-a060-00aa006c33ed
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.62 Attribute dmdName

This attribute specifies a name used to identify the schema partition. Not used by Active Directory.

```
cn: DMD-Name
ldapDisplayName: dmdName
attributeId: 1.2.840.113556.1.2.598
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 167757b9-47f3-11d1-a9c3-0000f80367c1
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 1024
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.63 Attribute dNSHostName

This attribute specifies the name of the computer as registered in DNS.

```
cn: DNS-Host-Name
ldapDisplayName: dNSHostName
attributeId: 1.2.840.113556.1.4.619
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 72e39547-7b18-11d1-adeb-00c04fd8d5cd
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 2048
attributeSecurityGuid: 72e39547-7b18-11d1-adeb-00c04fd8d5cd
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.64 Attribute dnsRoot

This attribute specifies the uppermost DNS domain name assigned to a domain/directory partition. This attribute is set on a crossRef object and is used for referral generation.

When searching through an entire domain tree, the search must be initiated at the Dns-Root object. This attribute can be multivalued, in which case multiple referrals are generated.

```
cn: Dns-Root
```



```
ldapDisplayName: dnsRoot
attributeId: 1.2.840.113556.1.4.28
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: bf967959-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fATTINDEX
rangeLower: 1
rangeUpper: 255
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.65 Attribute dSASignature

This attribute specifies the DSA-Signature of an object is the Invocation-ID of the last directory to modify the object.

```
cn: DSA-Signature
ldapDisplayName: dSASignature
attributeId: 1.2.840.113556.1.2.74
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: 167757bc-47f3-11d1-a9c3-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.66 Attribute dSCorePropagationData

This attribute is for internal use only.

```
cn: DS-Core-Propagation-Data
ldapDisplayName: dSCorePropagationData
attributeId: 1.2.840.113556.1.4.1357
attributeSyntax: 2.5.5.11
omSyntax: 24
isSingleValued: FALSE
schemaIdGuid: d167aa4b-8b08-11d2-9939-0000f87a57d4
systemOnly: TRUE
searchFlags: 0
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
  FLAG_ATTR_REQ_PARTIAL_SET_MEMBER | FLAG_ATTR_NOT_REPLICATED
```

2.67 Attribute dSHeuristics

This attribute contains global settings for the entire forest.

```
cn: DS-Heuristics
ldapDisplayName: dSHeuristics
attributeId: 1.2.840.113556.1.2.212
attributeSyntax: 2.5.5.12
```

```
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: f0f8ff86-1191-11d0-a060-00aa006c33ed
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.68 Attribute dSUIAdminMaximum

This attribute specifies the default maximum number of objects that are shown in a container by the admin UI.

```
cn: DS-UI-Admin-Maximum
ldapDisplayName: dSUIAdminMaximum
attributeId: 1.2.840.113556.1.4.1344
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: ee8d0ae0-6f91-11d2-9905-0000f87a57d4
systemOnly: FALSE
```

2.69 Attribute dSUIAdminNotification

This attribute specifies a list of the GUIDs of COM objects that support a callback interface that DSAdmin calls when an action has occurred on an object through the UI.

```
cn: DS-UI-Admin-Notification
ldapDisplayName: dSUIAdminNotification
attributeId: 1.2.840.113556.1.4.1343
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: f6ea0a94-6f91-11d2-9905-0000f87a57d4
systemOnly: FALSE
```

2.70 Attribute dSUIShellMaximum

This attribute specifies the default maximum number of objects that are shown in a container by the shell UI.

```
cn: DS-UI-Shell-Maximum
ldapDisplayName: dSUIShellMaximum
attributeId: 1.2.840.113556.1.4.1345
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: fcca766a-6f91-11d2-9905-0000f87a57d4
systemOnly: FALSE
```

2.71 Attribute dynamicLDAPServer

This attribute specifies the DNS name of server handling dynamic properties for this account.

```
cn: Dynamic-LDAP-Server
ldapDisplayName: dynamicLDAPServer
attributeId: 1.2.840.113556.1.4.537
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: 52458021-ca6a-11d0-afff-0000f80367c1
systemOnly: FALSE
searchFlags: 0
```

2.72 Attribute employeeID

This attribute specifies the ID of an employee.

```
cn: Employee-ID
ldapDisplayName: employeeID
attributeId: 1.2.840.113556.1.4.35
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf967962-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 16
```

2.73 Attribute employeeNumber

This attribute specifies the number assigned to an employee other than the ID.

```
cn: Employee-Number
ldapDisplayName: employeeNumber
attributeId: 1.2.840.113556.1.2.610
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: a8df73ef-c5ea-11d1-bbcb-0080c76670c0
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 512
```

2.74 Attribute employeeType

This attribute specifies the job category for an employee.

```
cn: Employee-Type
ldapDisplayName: employeeType
attributeId: 1.2.840.113556.1.2.613
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
```

```
schemaIdGuid: a8df73f0-c5ea-11d1-bbcb-0080c76670c0
systemOnly: FALSE
searchFlags: fCOPY
rangeLower: 1
rangeUpper: 256
```

2.75 Attribute Enabled

This attribute is used to signify whether or not a given crossRef is enabled.

```
cn: Enabled
ldapDisplayName: Enabled
attributeId: 1.2.840.113556.1.2.557
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: a8df73f2-c5ea-11d1-bbcb-0080c76670c0
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.76 Attribute enabledConnection

This attribute indicates whether or not a connection is available for use.

```
cn: Enabled-Connection
ldapDisplayName: enabledConnection
attributeId: 1.2.840.113556.1.4.36
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: bf967963-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.77 Attribute entryTTL

This operational attribute is maintained by the server and appears to be present in every dynamic entry. The attribute is not present when the entry does not contain the [dynamicObject](#) object class.

The value of this attribute is the time in seconds that the entry continues to exist before disappearing from the directory. In the absence of intervening "refresh" operations, the values returned by reading the attribute in two successive searches are guaranteed to be nonincreasing. The smallest permissible value is 0, indicating that the entry may disappear without warning. The attribute is marked NO-USER-MODIFICATION because it may only be changed by using the refresh operation.

```
cn: Entry-TTL
ldapDisplayName: entryTTL
attributeId: 1.3.6.1.4.1.1466.101.119.3
attributeSyntax: 2.5.5.9
omSyntax: 2
```

```
isSingleValued: TRUE
schemaIdGuid: d213decc-d81a-4384-aac2-dcfcfd631cf8
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 31557600
systemFlags: 20
```

2.78 Attribute extendedAttributeInfo

This attribute specifies a multivalued property containing strings that represent additional information for each attribute.

```
cn: Extended-Attribute-Info
ldapDisplayName: extendedAttributeInfo
attributeId: 1.2.840.113556.1.4.909
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 9a7ad947-ca53-11d1-bbd0-0080c76670c0
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_IS_CONSTRUCTED
```

2.79 Attribute extendedCharsAllowed

This attribute indicates whether extended characters are allowed in the value of this attribute. Applies only to IA5, Numeric, Printable, and Teletex string attributes.

```
cn: Extended-Chars-Allowed
ldapDisplayName: extendedCharsAllowed
attributeId: 1.2.840.113556.1.2.380
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: bf967966-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.80 Attribute extendedClassInfo

A multivalued property containing strings that represent additional information for each class. Each value contains the [governsID](#), [LDAPDisplayName](#), and [schemaIDGUID](#) of the class.

```
cn: Extended-Class-Info
ldapDisplayName: extendedClassInfo
attributeId: 1.2.840.113556.1.4.908
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 9a7ad948-ca53-11d1-bbd0-0080c76670c0
systemOnly: TRUE
```

```
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_IS_CONSTRUCTED
```

2.81 Attribute extensionName

This attribute specifies the name of a property page used to extend the UI of a directory object.

```
cn: Extension-Name
ldapDisplayName: extensionName
attributeId: 1.2.840.113556.1.2.227
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: bf967972-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
rangeLower: 1
rangeUpper: 255
```

2.82 Attribute extraColumns

This is a multivalued attribute whose values consist of a 5 tuple: (attribute name), (column title), (default visibility (0,1)), (column width (-1 for auto width)), 0 (reserved for future use; must be zero). This value is used by the Active Directory Users and Computers console.

```
cn: Extra-Columns
ldapDisplayName: extraColumns
attributeId: 1.2.840.113556.1.4.1687
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: d24e2846-1dd9-4bcf-99d7-a6227cc86da7
systemOnly: FALSE
```

2.83 Attribute facsimileTelephoneNumber

This attribute contains the telephone number of the user's business fax machine.

```
cn: Facsimile-Telephone-Number
ldapDisplayName: facsimileTelephoneNumber
attributeId: 2.5.4.23
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf967974-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.84 Attribute fromEntry

A constructed attribute that is TRUE if the object is writable and FALSE if it is read-only; for example, a global catalog (GC) replica instance.

```
cn: From-Entry
ldapDisplayName: fromEntry
attributeId: 1.2.840.113556.1.4.910
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: FALSE
schemaIdGuid: 9a7ad949-ca53-11d1-bbd0-0080c76670c0
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_IS_CONSTRUCTED
```

2.85 Attribute fromServer

The distinguished name of the replication source server.

```
cn: From-Server
ldapDisplayName: fromServer
attributeId: 1.2.840.113556.1.4.40
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: bf967979-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.86 Attribute fsmoRoleOwner

Flexible Single-Master Operation: The distinguished name of the domain controller (DC) where the schema can be modified.

```
cn: FSMO-Role-Owner
ldapDisplayName: fsmoRoleOwner
attributeId: 1.2.840.113556.1.4.369
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: 66171887-8f3c-11d0-afda-00c04fd930c9
systemOnly: FALSE
searchFlags: fATTINDEX
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.87 Attribute garbageCollPeriod

Located on the CN=Directory Service,CN=Windows NT,CN=Services,CN=Configuration,... object. It represents the period of time in hours between DS garbage collection runs.

```
cn: Garbage-Coll-Period
ldapDisplayName: garbageCollPeriod
attributeId: 1.2.840.113556.1.2.301
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 5fd424a1-1262-11d0-a060-00aa006c33ed
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.88 Attribute generatedConnection

TRUE if this connection was created by auto-topology generation.

```
cn: Generated-Connection
ldapDisplayName: generatedConnection
attributeId: 1.2.840.113556.1.4.41
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: bf96797a-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.89 Attribute generationQualifier

Indicates a person's generation, for example, "Jr." or "II".

```
cn: Generation-Qualifier
ldapDisplayName: generationQualifier
attributeId: 2.5.4.44
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 16775804-47f3-11d1-a9c3-0000f80367c1
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 64
```

2.90 Attribute givenName

This attribute contains the given name (first name) of the user.

```
cn: Given-Name
ldapDisplayName: givenName
attributeId: 2.5.4.42
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: f0f8ff8e-1191-11d0-a060-00aa006c33ed
```



```
systemOnly: FALSE
searchFlags: fANR | fATTINDEX
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
isMemberOfPartialAttributeSet: TRUE
```

2.91 Attribute governsID

This attribute specifies the unique object ID of the class defined by this Class-Schema object.

```
cn: Governs-ID
ldapDisplayName: governsID
attributeId: 1.2.840.113556.1.2.22
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: TRUE
schemaIdGuid: bf96797d-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: fPRESERVEONDELETE
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.92 Attribute groupType

This attribute contains a set of flags that define the type and scope of a group object. For more information about the possible values for this attribute, see the Remarks section of [\[MSDN-GroupType\]](#).

```
cn: Group-Type
ldapDisplayName: groupType
attributeId: 1.2.840.113556.1.4.750
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 9a9a021e-4a5b-11d1-a9c3-0000f80367c1
systemOnly: FALSE
searchFlags: fPRESERVEONDELETE | fATTINDEX
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
  FLAG_ATTR_REQ_PARTIAL_SET_MEMBER
```

2.93 Attribute hasMasterNCs

This attribute specifies the distinguished name (DN) for the naming contexts for the DC. Forward link for the [Mastered-By](#) attribute.

```
cn: Has-Master-NCs
ldapDisplayName: hasMasterNCs
attributeId: 1.2.840.113556.1.2.14
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
```

```
schemaIdGuid: bf967982-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
linkID: 76
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.94 Attribute hasPartialReplicaNCs

This attribute specifies the sibling to [Has-Master-NCs](#). Reflects the distinguished name (DN) for all other-domain NCs that have been replicated into a global catalog.

```
cn: Has-Partial-Replica-NCs
ldapDisplayName: hasPartialReplicaNCs
attributeId: 1.2.840.113556.1.2.15
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: bf967981-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
linkID: 74
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.95 Attribute homePhone

This attribute specifies the user's main home phone number.

```
cn: Phone-Home-Primary
ldapDisplayName: homePhone
attributeId: 0.9.2342.19200300.100.1.20
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: f0f8ffa1-1191-11d0-a060-00aa006c33ed
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
isMemberOfPartialAttributeSet: TRUE
```

2.96 Attribute homePostalAddress

This attribute specifies the user's home address.

```
cn: Address-Home
ldapDisplayName: homePostalAddress
attributeId: 1.2.840.113556.1.2.617
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 16775781-47f3-11d1-a9c3-0000f80367c1
```

```
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 4096
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
```

2.97 Attribute houseIdentifier

This attribute specifies a linguistic construct used to identify a particular building; for example, a house number or house name relative to a street, avenue, town, or city.

```
cn: houseIdentifier
ldapDisplayName: houseIdentifier
attributeId: 2.5.4.51
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: a45398b7-c44a-4eb6-82d3-13c10946dbfe
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 32768
```

2.98 Attribute iconPath

This attribute specifies the source for loading an icon.

```
cn: Icon-Path
ldapDisplayName: iconPath
attributeId: 1.2.840.113556.1.4.219
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: f0f8ff83-1191-11d0-a060-00aa006c33ed
systemOnly: FALSE
rangeLower: 0
rangeUpper: 2048
```

2.99 Attribute initials

This attribute contains the initials for parts of the user's full name. May be used as the middle initial in the Windows Address Book.

```
cn: Initials
ldapDisplayName: initials
attributeId: 2.5.4.43
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: f0f8ff90-1191-11d0-a060-00aa006c33ed
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
```

```
rangeUpper: 6
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
```

2.100 Attribute instanceType

This attribute specifies a bit field that dictates how the object is instantiated on a particular server. The value of this attribute can differ on different replicas, even if the replicas are in sync.

```
cn: Instance-Type
ldapDisplayName: instanceType
attributeId: 1.2.840.113556.1.2.1
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: bf96798c-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: fPRESERVEONDELETE
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
  FLAG_ATTR_REQ_PARTIAL_SET_MEMBER
```

2.101 Attribute internationalISDNNumber

This attribute specifies an international ISDN number associated with an object.

```
cn: International-ISDN-Number
ldapDisplayName: internationalISDNNumber
attributeId: 2.5.4.25
attributeSyntax: 2.5.5.6
omSyntax: 18
isSingleValued: FALSE
schemaIdGuid: bf96798d-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 16
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.102 Attribute interSiteTopologyFailover

This attribute indicates how much time must transpire since the last keep-alive for the intersite topology generator to be considered dead.

```
cn: Inter-Site-Topology-Failover
ldapDisplayName: interSiteTopologyFailover
attributeId: 1.2.840.113556.1.4.1248
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: b7c69e60-2cc7-11d2-854e-00a0c983f608
systemOnly: FALSE
searchFlags: 0
```

```
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.103 Attribute interSiteTopologyGenerator

This attribute is used to support fail-over for the machine designated as the one that runs Knowledge Consistency Checker intersite topology generation in a given site.

```
cn: Inter-Site-Topology-Generator
ldapDisplayName: interSiteTopologyGenerator
attributeId: 1.2.840.113556.1.4.1246
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: b7c69e5e-2cc7-11d2-854e-00a0c983f608
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.104 Attribute interSiteTopologyRenew

This attribute indicates how often the intersite topology generator updates the keep-alive message that is sent to domain controllers (DCs) contained in the same site.

```
cn: Inter-Site-Topology-Renew
ldapDisplayName: interSiteTopologyRenew
attributeId: 1.2.840.113556.1.4.1247
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: b7c69e5f-2cc7-11d2-854e-00a0c983f608
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.105 Attribute invocationId

This attribute is used to uniquely identify each Exchange Server directory in the organization.

```
cn: Invocation-Id
ldapDisplayName: invocationId
attributeId: 1.2.840.113556.1.2.115
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: bf96798e-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: fATTINDEX
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.106 Attribute ipPhone

This attribute specifies the TCP/IP address for the phone. Used by telephony.

```
cn: Phone-Ip-Primary
ldapDisplayName: ipPhone
attributeId: 1.2.840.113556.1.4.721
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 4d146e4a-48d4-11d1-a9c3-0000f80367c1
systemOnly: FALSE
searchFlags: 0
rangeUpper: 64
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
isMemberOfPartialAttributeSet: TRUE
```

2.107 Attribute isCriticalSystemObject

If TRUE, the object hosting this attribute must be replicated during installation of a new replica.

```
cn: Is-Critical-System-Object
ldapDisplayName: isCriticalSystemObject
attributeId: 1.2.840.113556.1.4.868
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: 00fbf30d-91fe-11d1-aebc-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.108 Attribute isDefunct

If TRUE, the class or attribute is no longer usable. Old versions of this object may exist, but new ones cannot be created.

```
cn: Is-Defunct
ldapDisplayName: isDefunct
attributeId: 1.2.840.113556.1.4.661
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: 28630ebe-41d5-11d1-a9c1-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.109 Attribute isDeleted

If TRUE, this object has been marked for deletion and cannot be instantiated. After the tombstone period has expired, it is removed from the system.

```
cn: Is-Deleted
ldapDisplayName: isDeleted
attributeId: 1.2.840.113556.1.2.48
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: bf96798f-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
             FLAG_ATTR_REQ_PARTIAL_SET_MEMBER
```

2.110 Attribute isEphemeral

This attribute is not currently used.

```
cn: Is-Ephemeral
ldapDisplayName: isEphemeral
attributeId: 1.2.840.113556.1.4.1212
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: f4c453f0-c5f1-11d1-bbcb-0080c76670c0
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.111 Attribute isMemberOfPartialAttributeSet

If TRUE, this attribute is replicated to the global catalog.

```
cn: Is-Member-Of-Partial-Attribute-Set
ldapDisplayName: isMemberOfPartialAttributeSet
attributeId: 1.2.840.113556.1.4.639
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: 19405b9d-3cfa-11d1-a9c0-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.112 Attribute isSingleValued

If TRUE, this attribute can only store one value.

```
cn: Is-Single-Valued
ldapDisplayName: isSingleValued
attributeId: 1.2.840.113556.1.2.33
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
```

```
schemaIdGuid: bf967992-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.113 Attribute jpegPhoto

This attribute is used to store one or more images of a person using the JPEG File Interchange Format [\[JFIF\]](#).

```
cn: jpegPhoto
ldapDisplayName: jpegPhoto
attributeId: 0.9.2342.19200300.100.1.60
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: bac80572-09c4-4fa9-9ae6-7628d7adbe0e
systemOnly: FALSE
searchFlags: 0
showInAdvancedViewOnly: FALSE
```

2.114 Attribute keywords

This attribute specifies a list of keywords that can be used to locate a given connection point.

```
cn: Keywords
ldapDisplayName: keywords
attributeId: 1.2.840.113556.1.4.48
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: bf967993-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fATTINDEX
rangeLower: 1
rangeUpper: 256
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.115 Attribute l

This attribute represents the name of a locality, such as a town or city.

```
cn: Locality-Name
ldapDisplayName: l
attributeId: 2.5.4.7
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf9679a2-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fCOPY | fATTINDEX
rangeLower: 1
```



```
rangeUpper: 128
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
             FLAG_ATTR_REQ_PARTIAL_SET_MEMBER
```

2.116 Attribute labeledURI

This attribute specifies a Uniform Resource Identifier (URI) followed by a label. The label is used to describe the resource to which the URI points and is intended as a friendly name fit for human readers.

```
cn: labeledURI
ldapDisplayName: labeledURI
attributeId: 1.3.6.1.4.1.250.1.57
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: c569bb46-c680-44bc-a273-e6c227d71b45
systemOnly: FALSE
searchFlags: 0
showInAdvancedViewOnly: FALSE
```

2.117 Attribute lastAgedChange

ms-DS-Last-Aged-Change

```
cn: ms-DS-Last-Aged-Change
ldapDisplayName: lastAgedChange
attributeId: 1.2.840.113556.1.4.1888
attributeSyntax: 2.5.5.11
omSyntax: 24
isSingleValued: FALSE
schemaIdGuid: f37b11f3-6fe2-488d-a76a-0b530002f4f7
searchFlags: fATTINDEX
```

2.118 Attribute lastBackupRestorationTime

This attribute specifies the time when the last system restore operation occurred.

```
cn: Last-Backup-Restoration-Time
ldapDisplayName: lastBackupRestorationTime
attributeId: 1.2.840.113556.1.4.519
attributeSyntax: 2.5.5.16
omSyntax: 65
isSingleValued: TRUE
schemaIdGuid: 1fbb0be8-ba63-11d0-afef-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.119 Attribute lastKnownParent

This attribute specifies the distinguished name (DN) of the last known parent of an orphaned object.

```
cn: Last-Known-Parent
ldapDisplayName: lastKnownParent
attributeId: 1.2.840.113556.1.4.781
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: 52ab8670-5709-11d1-a9c6-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.120 Attribute lastLogonTimestamp

This attribute specifies the time the user last logged on to the domain. This value is only updated if the user logs on after a week has passed since the last update. This value is replicated.

```
cn: Last-Logon-Timestamp
ldapDisplayName: lastLogonTimestamp
attributeId: 1.2.840.113556.1.4.1696
attributeSyntax: 2.5.5.16
omSyntax: 65
isSingleValued: TRUE
schemaIdGuid: c0e20a04-0e5a-4ff3-9482-5efeaecd7060
systemOnly: TRUE
searchFlags: 0
attributeSecurityGuid: 5f202010-79a5-11d0-9020-00c04fc2d4cf
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.121 Attribute LDAPAdminLimits

This attribute contains a set of attribute-value pairs defining LDAP server administrative limits.

```
cn: LDAP-Admin-Limits
ldapDisplayName: LDAPAdminLimits
attributeId: 1.2.840.113556.1.4.843
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 7359a352-90f7-11d1-aebc-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.122 Attribute LDAPDisplayName

This attribute specifies the name used by LDAP clients, such as the ADSI LDAP provider, to read and write the attribute by using the LDAP protocol.

```
cn: LDAP-Display-Name
ldapDisplayName: LDAPDisplayName
attributeId: 1.2.840.113556.1.2.460
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf96799a-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fPRESERVEONDELETE | fATTINDEX
rangeLower: 1
rangeUpper: 256
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.123 Attribute IDAPIPDenyList

This attribute holds a list of binary IP addresses that are denied access to an LDAP server.

```
cn: LDAP-IPDeny-List
ldapDisplayName: IDAPIPDenyList
attributeId: 1.2.840.113556.1.4.844
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: 7359a353-90f7-11d1-aebc-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.124 Attribute linkID

This attribute specifies an integer that indicates that the attribute is a linked attribute. An even integer is a forward link, and an odd integer is a back link.

```
cn: Link-ID
ldapDisplayName: linkID
attributeId: 1.2.840.113556.1.2.50
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: bf96799b-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.125 Attribute localizationDisplayId

This attribute is used to index into the Extrts.mc file to get the localized displayName for the objects for UI purposes.

```
cn: Localization-Display-Id
ldapDisplayName: localizationDisplayId
attributeId: 1.2.840.113556.1.4.1353
```

```
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: a746f0d1-78d0-11d2-9916-0000f87a57d4
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.126 Attribute location

This attribute specifies the user's location, such as an office number.

```
cn: Location
ldapDisplayName: location
attributeId: 1.2.840.113556.1.4.222
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 09dcb79f-165f-11d0-a064-00aa006c33ed
systemOnly: FALSE
searchFlags: fATTINDEX
rangeLower: 0
rangeUpper: 1024
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.127 Attribute lockoutTime

This attribute specifies the date and time (UTC) that this account was locked out. This value is stored as a large integer that represents the number of 100 nanosecond intervals since January 1, 1601 (UTC). A value of zero means that the account is not currently locked out.

```
cn: Lockout-Time
ldapDisplayName: lockoutTime
attributeId: 1.2.840.113556.1.4.662
attributeSyntax: 2.5.5.16
omSyntax: 65
isSingleValued: TRUE
schemaIdGuid: 28630ebf-41d5-11d1-a9c1-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.128 Attribute mail

This attribute specifies the list of e-mail addresses for a contact.

```
cn: E-mail-Addresses
ldapDisplayName: mail
attributeId: 0.9.2342.19200300.100.1.3
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
```

```
schemaIdGuid: bf967961-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fATTINDEX
rangeLower: 0
rangeUpper: 256
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
isMemberOfPartialAttributeSet: TRUE
```

2.129 Attribute mailAddress

This attribute specifies the generic mail address attribute. It is used "in the box" as an optional attribute of server objects, where it is consumed by mail-based DS replication (if the machines are so configured).

```
cn: SMTP-Mail-Address
ldapDisplayName: mailAddress
attributeId: 1.2.840.113556.1.4.786
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 26d9736f-6070-11d1-a9c6-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.130 Attribute managedBy

This attribute specifies the distinguished name (DN) of the user that is assigned to manage this object.

```
cn: Managed-By
ldapDisplayName: managedBy
attributeId: 1.2.840.113556.1.4.653
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: 0296c120-40da-11d1-a9c0-0000f80367c1
systemOnly: FALSE
searchFlags: 0
linkID: 72
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.131 Attribute managedObjects

This attribute contains the list of objects that are managed by the user. The objects listed are those that have the managedBy property set to this user. Each item in the list is a linked reference to the managed object.

```
cn: Managed-Objects
ldapDisplayName: managedObjects
attributeId: 1.2.840.113556.1.4.654
attributeSyntax: 2.5.5.1
```

```
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: 0296c124-40da-11d1-a9c0-0000f80367c1
systemOnly: TRUE
searchFlags: 0
linkID: 73
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```

2.132 Attribute manager

This attribute contains the distinguished name (DN) of the user who is the user's manager. The manager's user object contains a `directReports` property that contains references to all user objects that have their manager properties set to this DN.

```
cn: Manager
ldapDisplayName: manager
attributeId: 0.9.2342.19200300.100.1.10
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: bf9679b5-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fCOPY
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
linkID: 42
isMemberOfPartialAttributeSet: TRUE
```

2.133 Attribute masteredBy

This attribute specifies the back link for the [Has-Master-NCs](#) attribute. The distinguished name (DN) for its NTDS Settings objects.

```
cn: Mastered-By
ldapDisplayName: masteredBy
attributeId: 1.2.840.113556.1.4.1409
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: e48e64e0-12c9-11d3-9102-00c04fd91ab1
systemOnly: TRUE
searchFlags: 0
linkID: 77
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```

2.134 Attribute mayContain

The list of optional attributes for a class.

```
cn: May-Contain
ldapDisplayName: mayContain
```

```
attributeId: 1.2.840.113556.1.2.25
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: FALSE
schemaIdGuid: bf9679bf-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.135 Attribute member

This attribute specifies the list of users that belong to the group.

```
cn: Member
ldapDisplayName: member
attributeId: 2.5.4.31
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: bf9679c0-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
attributeSecurityGuid: bc0ac240-79a9-11d0-9020-00c04fc2d4cf
linkID: 2
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
             FLAG_ATTR_REQ_PARTIAL_SET_MEMBER
```

2.136 Attribute memberOf

This attribute specifies the distinguished name (DN) of the groups to which this object belongs.

```
cn: Is-Member-Of-DL
ldapDisplayName: memberOf
attributeId: 1.2.840.113556.1.2.102
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: bf967991-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: fCOPY
attributeSecurityGuid: bc0ac240-79a9-11d0-9020-00c04fc2d4cf
linkID: 3
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```

2.137 Attribute middleName

This attribute specifies additional names for a user; for example, middle name, patronymic, matronymic, or others.

```
cn: Other-Name
```

```
ldapDisplayName: middleName
attributeId: 2.16.840.1.113730.3.1.34
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf9679f2-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 64
```

2.138 Attribute mobile

This attribute specifies the primary cellular phone number.

```
cn: Phone-Mobile-Primary
ldapDisplayName: mobile
attributeId: 0.9.2342.19200300.100.1.41
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: f0f8ffa3-1191-11d0-a060-00aa006c33ed
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
```

2.139 Attribute modifyTimeStamp

This attribute specifies the date when this object was last changed. This value is replicated.

```
cn: Modify-Time-Stamp
ldapDisplayName: modifyTimeStamp
attributeId: 2.5.18.2
attributeSyntax: 2.5.5.11
omSyntax: 24
isSingleValued: TRUE
schemaIdGuid: 9a7ad94a-ca53-11d1-bbd0-0080c76670c0
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_IS_CONSTRUCTED
```

2.140 Attribute moveTreeState

This attribute contains state information for a directory tree that is being moved.

```
cn: Move-Tree-State
ldapDisplayName: moveTreeState
attributeId: 1.2.840.113556.1.4.1305
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
```



```
schemaIdGuid: 1f2ac2c8-3b71-11d2-90cc-00c04fd91ab1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.141 Attribute mS-DS-ConsistencyChildCount

This attribute is used to check consistency between the directory and another object, database, or application by comparing a count of child objects.

```
cn: MS-DS-Consistency-Child-Count
ldapDisplayName: mS-DS-ConsistencyChildCount
attributeId: 1.2.840.113556.1.4.1361
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 178b7bc2-b63a-11d2-90e1-00c04fd91ab1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.142 Attribute mS-DS-ConsistencyGuid

This attribute is used to check consistency between the directory and another object, database, or application by comparing GUIDs.

```
cn: MS-DS-Consistency-Guid
ldapDisplayName: mS-DS-ConsistencyGuid
attributeId: 1.2.840.113556.1.4.1360
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: 23773dc2-b63a-11d2-90e1-00c04fd91ab1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.143 Attribute mS-DS-ReplicatesNCReason

This is an attribute of an [nTDSConnection](#) object that indicates why (or whether) the Knowledge Consistency Checker (KCC) concludes that the connection is useful in the replication topology. This attribute is multivalued and has DistName+Binary syntax, where the binary part is an int-size bitfield.

```
cn: MS-DS-Replicates-NC-Reason
ldapDisplayName: mS-DS-ReplicatesNCReason
attributeId: 1.2.840.113556.1.4.1408
attributeSyntax: 2.5.5.7
omSyntax: 127
omObjectClass: 1.2.840.113556.1.1.1.11
isSingleValued: FALSE
schemaIdGuid: 0ea12b84-08b3-11d3-91bc-0000f87a57d4
systemOnly: FALSE
```

```
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.144 Attribute ms-DS-UserAccountAutoLocked

This attribute specifies a Boolean flag that indicates whether or not the account this attribute references has been locked out. (TRUE means locked out.)

```
cn: ms-DS-User-Account-Auto-Locked
ldapDisplayName: ms-DS-UserAccountAutoLocked
attributeId: 1.2.840.113556.1.4.1857
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: f2dd7bab-1f3b-47cf-89fa-143b56ad0a3d
systemOnly: FALSE
searchFlags: 0
systemFlags: 20
```

2.145 Attribute ms-DS-UserEncryptedTextPasswordAllowed

This attribute specifies a Boolean flag that controls whether Active Directory stores the password in reversible encryption format.

```
cn: ms-DS-User-Encrypted-Text-Password-Allowed
ldapDisplayName: ms-DS-UserEncryptedTextPasswordAllowed
attributeId: 1.2.840.113556.1.4.1856
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: 5a87c7f2-93c5-454c-a8c5-8cb09613292e
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.146 Attribute ms-DS-UserPasswordNotRequired

This attribute specifies a Boolean flag that controls whether a password is required for the account this attribute references.

```
cn: ms-DS-User-Password-Not-Required
ldapDisplayName: ms-DS-UserPasswordNotRequired
attributeId: 1.2.840.113556.1.4.1854
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: 8f066172-a25e-4f53-8dcd-0a67d5fb883d
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.147 Attribute msDS-AllowedDNSSuffixes

The list of allowed suffixes for the [dNSHostName](#) attribute in computer objects.

```
cn: ms-DS-Allowed-DNS-Suffixes
ldapDisplayName: msDS-AllowedDNSSuffixes
attributeId: 1.2.840.113556.1.4.1710
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 8469441b-9ac4-4e45-8205-bd219dbf672d
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 2048
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.148 Attribute msDS-Approx-Immed-Subordinates

The value returned by this attribute is based on index sizes. This value may be off by +/-10 percent on large containers, and the error is theoretically unbounded, but the use of this attribute is to assist the UI with determining how to display the contents of a container.

```
cn: ms-DS-Approx-Immed-Subordinates
ldapDisplayName: msDS-Approx-Immed-Subordinates
attributeId: 1.2.840.113556.1.4.1669
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: e185d243-f6ce-4adb-b496-b0c005d7823c
systemOnly: TRUE
searchFlags: 0
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
systemFlags: 20
```

2.149 Attribute msDS-Auxiliary-Classes

This attribute lists the auxiliary classes that have been dynamically attached to an object. This attribute is not associated with a class. It is automatically populated by the system.

```
cn: ms-DS-Auxiliary-Classes
ldapDisplayName: msDS-Auxiliary-Classes
attributeId: 1.2.840.113556.1.4.1458
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: FALSE
schemaIdGuid: c4af1073-ee50-4be0-b8c0-89a41fe99abe
systemOnly: TRUE
searchFlags: fPRESERVEONDELETE
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
systemFlags: 20
```

2.150 Attribute msDS-AzApplicationData

This attribute specifies a string used by individual applications to store needed information.

```
cn: ms-DS-Az-Application-Data
ldapDisplayName: msDS-AzApplicationData
attributeId: 1.2.840.113556.1.4.1819
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 503fc3e8-1cc6-461a-99a3-9eee04f402a7
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
```

2.151 Attribute msDS-AzApplicationName

This attribute specifies a string that uniquely identifies an application object.

```
cn: ms-DS-Az-Application-Name
ldapDisplayName: msDS-AzApplicationName
attributeId: 1.2.840.113556.1.4.1798
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: db5b0728-6208-4876-83b7-95d3e5695275
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 512
```

2.152 Attribute msDS-AzApplicationVersion

This attribute specifies a version number to indicate that the AzApplication is updated.

```
cn: ms-DS-Az-Application-Version
ldapDisplayName: msDS-AzApplicationVersion
attributeId: 1.2.840.113556.1.4.1817
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 7184a120-3ac4-47ae-848f-fe0ab20784d4
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
```

2.153 Attribute msDS-AzBizRule

This attribute specifies the text of the script implementing the business rule.

```
cn: ms-DS-Az-Biz-Rule
ldapDisplayName: msDS-AzBizRule
attributeId: 1.2.840.113556.1.4.1801
```

```
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 33d41ea8-c0c9-4c92-9494-f104878413fd
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 65536
```

2.154 Attribute msDS-AzBizRuleLanguage

The language that the business rule script is in (for example, JScript or Visual Basic Scripting Edition).

```
cn: ms-DS-Az-Biz-Rule-Language
ldapDisplayName: msDS-AzBizRuleLanguage
attributeId: 1.2.840.113556.1.4.1802
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 52994b56-0e6c-4e07-aa5c-ef9d7f5a0e25
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 64
```

2.155 Attribute msDS-AzClassId

This attribute specifies a class ID required by the AzRoles UI on the AzApplication object.

```
cn: ms-DS-Az-Class-ID
ldapDisplayName: msDS-AzClassId
attributeId: 1.2.840.113556.1.4.1816
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 013a7277-5c2d-49ef-a7de-b765b36a3f6f
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 40
```

2.156 Attribute msDS-AzDomainTimeout

This attribute specifies the time (in milliseconds) after a domain is detected to be unreachable and before the DC is tried again.

```
cn: ms-DS-Az-Domain-Timeout
ldapDisplayName: msDS-AzDomainTimeout
attributeId: 1.2.840.113556.1.4.1795
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
```

```
schemaIdGuid: 6448f56a-ca70-4e2e-b0af-d20e4ce653d0
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
```

2.157 Attribute msDS-AzGenerateAudits

This attribute specifies a Boolean field indicating if runtime audits need to be turned on (for example, audits for access checks).

```
cn: ms-DS-Az-Generate-Audits
ldapDisplayName: msDS-AzGenerateAudits
attributeId: 1.2.840.113556.1.4.1805
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: f90abab0-186c-4418-bb85-88447c87222a
systemOnly: FALSE
searchFlags: 0
```

2.158 Attribute msDS-AzGenericData

AzMan-specific generic data.

```
cn: ms-DS-Az-Generic-Data
ldapDisplayName: msDS-AzGenericData
attributeId: 1.2.840.113556.1.4.1950
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: a283ad81-eaac-448b-af22-6c7099a946e0
systemOnly: FALSE
searchFlags: 0
rangeUpper: 65536
```

2.159 Attribute msDS-AzLastImportedBizRulePath

This attribute specifies the last imported business rule path.

```
cn: ms-DS-Az-Last-Imported-Biz-Rule-Path
ldapDisplayName: msDS-AzLastImportedBizRulePath
attributeId: 1.2.840.113556.1.4.1803
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 665acb5c-bb92-4dbc-8c59-b3638eab09b3
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 65536
```

2.160 Attribute msDS-AzLDAPQuery

A string that defines the LDAP query (max length 4096) which determines the membership of a user object to the group.

```
cn: ms-DS-Az-LDAP-Query
ldapDisplayName: msDS-AzLDAPQuery
attributeId: 1.2.840.113556.1.4.1792
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 5e53368b-fc94-45c8-9d7d-daf31ee7112d
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 4096
```

2.161 Attribute msDS-AzMajorVersion

This attribute specifies the major version number for AzRoles.

```
cn: ms-DS-Az-Major-Version
ldapDisplayName: msDS-AzMajorVersion
attributeId: 1.2.840.113556.1.4.1824
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: cfb9adb7-c4b7-4059-9568-1ed9db6b7248
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
```

2.162 Attribute msDS-AzMinorVersion

This attribute specifies the minor version number for AzRoles.

```
cn: ms-DS-Az-Minor-Version
ldapDisplayName: msDS-AzMinorVersion
attributeId: 1.2.840.113556.1.4.1825
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: ee85ed93-b209-4788-8165-e702f51bfbf3
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
```

2.163 Attribute msDS-AzObjectGuid

This attribute specifies the unique and portable identifier of AzMan objects.

```
cn: ms-DS-Az-Object-Guid
ldapDisplayName: msDS-AzObjectGuid
```

```
attributeId: 1.2.840.113556.1.4.1949
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: 8867b29c-9ccf-4ce2-be30-b67c0d2432c6
systemOnly: TRUE
searchFlags: fATTINDEX
rangeLower: 16
rangeUpper: 16
```

2.164 Attribute msDS-AzOperationID

This attribute specifies the application-specific ID that makes the operation unique to the application.

```
cn: ms-DS-Az-Operation-ID
ldapDisplayName: msDS-AzOperationID
attributeId: 1.2.840.113556.1.4.1800
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: a5f3b553-5d76-4cbe-ba3f-4312152cab18
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
```

2.165 Attribute msDS-AzScopeName

This attribute specifies a string that uniquely identifies a scope object.

```
cn: ms-DS-Az-Scope-Name
ldapDisplayName: msDS-AzScopeName
attributeId: 1.2.840.113556.1.4.1799
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 515a6b06-2617-4173-8099-d5605df043c6
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 65536
```

2.166 Attribute msDS-AzScriptEngineCacheMax

This attribute specifies the maximum number of scripts that are cached by the application.

```
cn: ms-DS-Az-Script-Engine-Cache-Max
ldapDisplayName: msDS-AzScriptEngineCacheMax
attributeId: 1.2.840.113556.1.4.1796
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 2629f66a-1f95-4bf3-a296-8e9d7b9e30c8
```



```
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
```

2.167 Attribute msDS-AzScriptTimeout

This attribute specifies the maximum time (in milliseconds) to wait for a script to finish auditing a specific policy.

```
cn: ms-DS-Az-Script-Timeout
ldapDisplayName: msDS-AzScriptTimeout
attributeId: 1.2.840.113556.1.4.1797
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 87d0fb41-2c8b-41f6-b972-11fd50d6b0
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
```

2.168 Attribute msDS-AzTaskIsRoleDefinition

This attribute specifies a Boolean field that indicates whether AzTask is a classic task or a role definition.

```
cn: ms-DS-Az-Task-Is-Role-Definition
ldapDisplayName: msDS-AzTaskIsRoleDefinition
attributeId: 1.2.840.113556.1.4.1818
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: 7b078544-6c82-4fe9-872f-ff48ad2b2e26
systemOnly: FALSE
searchFlags: 0
```

2.169 Attribute msDS-Behavior-Version

This attribute is used to track the domain or forest behavior version. It is a monotonically increasing number that is used to enable certain Active Directory features.

```
cn: ms-DS-Behavior-Version
ldapDisplayName: msDS-Behavior-Version
attributeId: 1.2.840.113556.1.4.1459
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: d31a8757-2447-4545-8081-3bb610cacbf2
systemOnly: TRUE
searchFlags: 0
rangeLower: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.170 Attribute msDS-DefaultNamingContext

This attribute specifies the default naming context (partition) for this AD/LDS instance.

```
cn: ms-DS-Default-Naming-Context
ldapDisplayName: msDS-DefaultNamingContext
attributeId: 1.2.840.113556.1.4.1873
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: 09278375-bc53-e342-8a03-943043a1b573
systemOnly: FALSE
searchFlags: 0
linkID: 2044
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.171 Attribute msDS-DefaultNamingContextBL

This attribute specifies a backlink reference for the [msDS-DefaultNamingContext](#) attribute.

```
cn: ms-DS-Default-Naming-Context-BL
ldapDisplayName: msDS-DefaultNamingContextBL
attributeId: 1.2.840.113556.1.4.1874
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: 2a4e57c2-60bc-5040-b463-51e1d82df9a5
systemOnly: TRUE
searchFlags: 0
linkID: 2045
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```

2.172 Attribute msDS-DefaultQuota

This attribute specifies the default quota that will apply to a security principal creating an object in the NC if no quota specification exists that covers the security principal.

```
cn: ms-DS-Default-Quota
ldapDisplayName: msDS-DefaultQuota
attributeId: 1.2.840.113556.1.4.1846
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 6818f726-674b-441b-8a3a-f40596374cea
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.173 Attribute msDS-DisableForInstances

This attribute specifies the set of DSA objects, representing AD/LDS instances, for which Service Connection Point publication should be disabled.

```
cn: ms-DS-Disable-For-Instances
ldapDisplayName: msDS-DisableForInstances
attributeId: 1.2.840.113556.1.4.1870
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: 5f8f45cb-0fb7-fc4f-b44f-66f781aa66dd
systemOnly: FALSE
searchFlags: 0
linkID: 2042
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.174 Attribute msDS-DisableForInstancesBL

This attribute specifies the backlink reference to the ms-DS-Service-Connection-Point-Publication-Service object.

```
cn: ms-DS-Disable-For-Instances-BL
ldapDisplayName: msDS-DisableForInstancesBL
attributeId: 1.2.840.113556.1.4.1871
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: 8f9d31dd-67ea-cd42-9b88-7cddb36c21f4
systemOnly: TRUE
searchFlags: 0
linkID: 2043
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```

2.175 Attribute msDS-DnsRootAlias

This attribute is used to store the domain alias.

```
cn: ms-DS-DnsRootAlias
ldapDisplayName: msDS-DnsRootAlias
attributeId: 1.2.840.113556.1.4.1719
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 2143acca-eead-4d29-b591-85fa49ce9173
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 255
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.176 Attribute msDS-Entry-Time-To-Die

This attribute holds the absolute expiration time of a dynamic object in the directory.

```
cn: ms-DS-Entry-Time-To-Die
ldapDisplayName: msDS-Entry-Time-To-Die
attributeId: 1.2.840.113556.1.4.1622
attributeSyntax: 2.5.5.11
omSyntax: 24
isSingleValued: TRUE
schemaIdGuid: e1e9bad7-c6dd-4101-a843-794cec85b038
systemOnly: TRUE
searchFlags: fPRESERVEONDELETE | fATTINDEX
isMemberOfPartialAttributeSet: TRUE
systemFlags: 24
```

2.177 Attribute msDS-ExecuteScriptPassword

This attribute is used during domain rename operation. This value cannot be written to or read from with LDAP.

```
cn: ms-DS-ExecuteScriptPassword
ldapDisplayName: msDS-ExecuteScriptPassword
attributeId: 1.2.840.113556.1.4.1783
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: 9d054a5a-d187-46c1-9d85-42dfc44a56dd
systemOnly: TRUE
searchFlags: 0
rangeLower: 0
rangeUpper: 64
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```

2.178 Attribute msDS-FilterContainers

A multi-valued string attribute containing the names of classes used to determine which container types should be shown by the Active Directory Users and Computers snap-in when filtering.

```
cn: ms-DS-Filter-Containers
ldapDisplayName: msDS-FilterContainers
attributeId: 1.2.840.113556.1.4.1703
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: fb00dcdcf-ac37-483a-9c12-ac53a6603033
systemOnly: FALSE
rangeLower: 1
rangeUpper: 64
```

2.179 Attribute msDS-HasDomainNCs

This attribute specifies DS replication information detailing the domain NCs present on a particular server.

```
cn: ms-DS-Has-Domain-NCs
ldapDisplayName: msDS-HasDomainNCs
attributeId: 1.2.840.113556.1.4.1820
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: 6f17e347-a842-4498-b8b3-15e007da4fed
systemOnly: TRUE
searchFlags: 0
rangeLower: 4
rangeUpper: 4
linkID: 2026
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.180 Attribute msDS-HasInstantiatedNCs

This attribute specifies DS replication information detailing the state of the NCs present on a particular server.

```
cn: ms-DS-Has-Instantiated-NCs
ldapDisplayName: msDS-HasInstantiatedNCs
attributeId: 1.2.840.113556.1.4.1709
attributeSyntax: 2.5.5.7
omSyntax: 127
omObjectClass: 1.2.840.113556.1.1.1.11
isSingleValued: FALSE
schemaIdGuid: 11e9a5bc-4517-4049-af9c-51554fb0fc09
systemOnly: TRUE
searchFlags: 0
rangeLower: 4
rangeUpper: 4
linkID: 2002
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.181 Attribute msDS-hasMasterNCs

This attribute specifies a list of the naming contexts contained by a DC. Deprecates [hasMasterNCs](#).

```
cn: ms-DS-Has-Master-NCs
ldapDisplayName: msDS-hasMasterNCs
attributeId: 1.2.840.113556.1.4.1836
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: ae2de0e2-59d7-4d47-8d47-ed4dfe4357ad
systemOnly: TRUE
searchFlags: 0
```

```
linkID: 2036
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.182 Attribute msDS-IntId

The ms-DS-IntId attribute is for internal use only.

```
cn: ms-DS-IntId
ldapDisplayName: msDS-IntId
attributeId: 1.2.840.113556.1.4.1716
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: bc60096a-1b47-4b30-8877-602c93f56532
systemOnly: TRUE
searchFlags: fPRESERVEONDELETE
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.183 Attribute msDs-masteredBy

This attribute specifies the backlink for [msDS-hasMasterNCs](#).

```
cn: ms-DS-Mastered-By
ldapDisplayName: msDs-masteredBy
attributeId: 1.2.840.113556.1.4.1837
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: 60234769-4819-4615-a1b2-49d2f119acb5
systemOnly: TRUE
searchFlags: 0
linkID: 2037
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```

2.184 Attribute msDS-MembersForAzRole

This attribute specifies the list of member application groups or users linked to Az-Role.

```
cn: ms-DS-Members-For-Az-Role
ldapDisplayName: msDS-MembersForAzRole
attributeId: 1.2.840.113556.1.4.1806
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: cbf7e6cd-85a4-4314-8939-8bfe80597835
systemOnly: FALSE
searchFlags: 0
linkID: 2016
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.185 Attribute msDS-MembersForAzRoleBL

This attribute specifies the backlink from member application group or user to Az-Role objects linking to it.

```
cn: ms-DS-Members-For-Az-Role-BL
ldapDisplayName: msDS-MembersForAzRoleBL
attributeId: 1.2.840.113556.1.4.1807
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: ececcd20-a7e0-4688-9ccf-02ece5e287f5
systemOnly: TRUE
searchFlags: 0
linkID: 2017
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```

2.186 Attribute msDS-NC-Replica-Locations

This attribute specifies a list of servers that are the replica set for the corresponding non-domain naming context.

```
cn: ms-DS-NC-Replica-Locations
ldapDisplayName: msDS-NC-Replica-Locations
attributeId: 1.2.840.113556.1.4.1661
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: 97de9615-b537-46bc-ac0f-10720f3909f3
systemOnly: FALSE
searchFlags: 0
linkID: 1044
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.187 Attribute msDS-NCReplCursors

This attribute specifies a list of past and present replication partners, and how up to date we are with each of them.

```
cn: ms-DS-NC-Repl-Cursors
ldapDisplayName: msDS-NCReplCursors
attributeId: 1.2.840.113556.1.4.1704
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 8a167ce4-f9e8-47eb-8d78-f7fe80abb2cc
systemOnly: FALSE
searchFlags: 0
systemFlags: 20
```

2.188 Attribute msDS-NCReplInboundNeighbors

This attribute specifies replication partners for this partition. This server obtains replication data from these other servers, which act as sources.

```
cn: ms-DS-NC-Repl-Inbound-Neighbors
ldapDisplayName: msDS-NCReplInboundNeighbors
attributeId: 1.2.840.113556.1.4.1705
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 9edba85a-3e9e-431b-9b1a-a5b6e9eda796
systemOnly: FALSE
searchFlags: 0
systemFlags: 20
```

2.189 Attribute msDS-NCReplOutboundNeighbors

This attribute specifies replication partners for this partition. This server sends replication data to these other servers, which act as destinations. This server will notify these other servers when new data is available.

```
cn: ms-DS-NC-Repl-Outbound-Neighbors
ldapDisplayName: msDS-NCReplOutboundNeighbors
attributeId: 1.2.840.113556.1.4.1706
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 855f2ef5-a1c5-4cc4-ba6d-32522848b61f
systemOnly: FALSE
searchFlags: 0
systemFlags: 20
```

2.190 Attribute msDS-Non-Security-Group-Extra-Classes

This attribute specifies the common names of the nonstandard classes that can be added to a non-security group through the Active Directory Users and Computers snap-in.

```
cn: ms-DS-Non-Security-Group-Extra-Classes
ldapDisplayName: msDS-Non-Security-Group-Extra-Classes
attributeId: 1.2.840.113556.1.4.1689
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 2de144fc-1f52-486f-bdf4-16fcc3084e54
systemOnly: FALSE
```

2.191 Attribute msDS-NonMembers

This attribute serves the same purpose as the **Non-Security-Member** attribute but with scoping rules applied.

```
cn: ms-DS-Non-Members
```



```
ldapDisplayName: msDS-NonMembers
attributeId: 1.2.840.113556.1.4.1793
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: cafcb1de-f23c-46b5-adf7-1e64957bd5db
systemOnly: FALSE
searchFlags: 0
linkID: 2014
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.192 Attribute msDS-NonMembersBL

This attribute specifies the backlink from a non-member group/user to Az groups linking to it (same functionality as Non-Security-Member-BL).

```
cn: ms-DS-Non-Members-BL
ldapDisplayName: msDS-NonMembersBL
attributeId: 1.2.840.113556.1.4.1794
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: 2a8c68fc-3a7a-4e87-8720-fe77c51cbe74
systemOnly: TRUE
searchFlags: 0
linkID: 2015
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```

2.193 Attribute msDS-OperationsForAzRole

This attribute specifies a list of operations linked to Az-Role.

```
cn: ms-DS-Operations-For-Az-Role
ldapDisplayName: msDS-OperationsForAzRole
attributeId: 1.2.840.113556.1.4.1812
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: 93f701be-fa4c-43b6-bc2f-4dbea718ffab
systemOnly: FALSE
searchFlags: 0
linkID: 2022
```

2.194 Attribute msDS-OperationsForAzRoleBL

This attribute specifies the backlink from Az-Operation to Az-Role objects linking to it.

```
cn: ms-DS-Operations-For-Az-Role-BL
ldapDisplayName: msDS-OperationsForAzRoleBL
attributeId: 1.2.840.113556.1.4.1813
```

```
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: f85b6228-3734-4525-b6b7-3f3bb220902c
systemOnly: TRUE
searchFlags: 0
linkID: 2023
systemFlags: FLAG_ATTR_NOT_REPLICATED
```

2.195 Attribute msDS-OperationsForAzTask

This attribute specifies a list of operations linked to Az-Task.

```
cn: ms-DS-Operations-For-Az-Task
ldapDisplayName: msDS-OperationsForAzTask
attributeId: 1.2.840.113556.1.4.1808
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: 1aacb436-2e9d-44a9-9298-ce4debeb6ebf
systemOnly: FALSE
searchFlags: 0
linkID: 2018
showInAdvancedViewOnly: TRUE
```

2.196 Attribute msDS-OperationsForAzTaskBL

This attribute specifies the backlink from Az-Operation to Az-Task objects linking to it.

```
cn: ms-DS-Operations-For-Az-Task-BL
ldapDisplayName: msDS-OperationsForAzTaskBL
attributeId: 1.2.840.113556.1.4.1809
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: a637d211-5739-4ed1-89b2-88974548bc59
systemOnly: TRUE
searchFlags: 0
linkID: 2019
systemFlags: FLAG_ATTR_NOT_REPLICATED
```

2.197 Attribute msDS-Other-Settings

This multivalued attribute is used to store any configurable setting for the DS stored in the NAME=VALUE format.

```
cn: ms-DS-Other-Settings
ldapDisplayName: msDS-Other-Settings
attributeId: 1.2.840.113556.1.4.1621
attributeSyntax: 2.5.5.12
```

```
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 79d2f34c-9d7d-42bb-838f-866b3e4400e2
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.198 Attribute msDS-PortLDAP

This attribute is used to specify which port is used by the Directory Service to listen for LDAP requests. Currently, this attribute is only used for AD/LDS.

```
cn: ms-DS-Port-LDAP
ldapDisplayName: msDS-PortLDAP
attributeId: 1.2.840.113556.1.4.1859
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 977225c1-5bdf-42b7-b6db-c3af077f558f
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 65535
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.199 Attribute msDS-PortSSL

ms-Ds-Port-LDAP is used to specify which port is used by the Directory Service to listen for LDAP requests. Currently, this attribute is used only for AD/LDS.

```
cn: ms-DS-Port-SSL
ldapDisplayName: msDS-PortSSL
attributeId: 1.2.840.113556.1.4.1860
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 2c85cfc2-2061-468c-a0ea-c8e0910f7374
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 65535
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.200 Attribute msDS-Preferred-GC-Site

The ms-DS-Preferred-GC-Site attribute is used by the security accounts manager for group expansion during token evaluation.

```
cn: ms-DS-Preferred-GC-Site
ldapDisplayName: msDS-Preferred-GC-Site
attributeId: 1.2.840.113556.1.4.1444
attributeSyntax: 2.5.5.1
omSyntax: 127
```

```
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: d921b50a-0ab2-42cd-87f6-09cf83a91854
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.201 Attribute msDS-PrincipalName

Account name for the security principal (constructed).

```
cn: ms-DS-Principal-Name
ldapDisplayName: msDS-PrincipalName
attributeId: 1.2.840.113556.1.4.1865
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 564e9325-d057-c143-9e3b-4f9e5ef46f93
systemOnly: FALSE
searchFlags: 0
systemFlags: 20
```

2.202 Attribute msDS-QuotaAmount

The assigned quota in terms of number of objects owned in the database.

```
cn: ms-DS-Quota-Amount
ldapDisplayName: msDS-QuotaAmount
attributeId: 1.2.840.113556.1.4.1845
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: fbb9a00d-3a8c-4233-9cf9-7189264903a1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.203 Attribute msDS-QuotaEffective

The effective quota for a security principal computed from the assigned quotas for a directory partition.

```
cn: ms-DS-Quota-Effective
ldapDisplayName: msDS-QuotaEffective
attributeId: 1.2.840.113556.1.4.1848
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 6655b152-101c-48b4-b347-e1fcebcb60157
systemOnly: FALSE
searchFlags: 0
systemFlags: 20
```

2.204 Attribute msDS-QuotaTrustee

The SID of the security principal for which a quota is being assigned.

```
cn: ms-DS-Quota-Trustee
ldapDisplayName: msDS-QuotaTrustee
attributeId: 1.2.840.113556.1.4.1844
attributeSyntax: 2.5.5.17
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: 16378906-4ea5-49be-a8d1-bfd41dffb4f65
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 28
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.205 Attribute msDS-QuotaUsed

The current quota consumed by a security principal in the directory database.

```
cn: ms-DS-Quota-Used
ldapDisplayName: msDS-QuotaUsed
attributeId: 1.2.840.113556.1.4.1849
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: b5a84308-615d-4bb7-b05f-2f1746aa439f
systemOnly: FALSE
searchFlags: 0
systemFlags: 20
```

2.206 Attribute msDS-ReplAttributeMetaData

A list of metadata for each replicated attribute. The metadata indicates who changed the attribute last.

```
cn: ms-DS-Repl-Attribute-Meta-Data
ldapDisplayName: msDS-ReplAttributeMetaData
attributeId: 1.2.840.113556.1.4.1707
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: d7c53242-724e-4c39-9d4c-2df8c9d66c7a
systemOnly: FALSE
searchFlags: 0
systemFlags: 20
```

2.207 Attribute msDS-ReplAuthenticationMode

The **ms-DS-Repl-Authentication-Mode** attribute is used to specify which authentication method is used to authenticate replication partners. This attribute applies to the configuration partition of an AD/LDS instance.

```
cn: ms-DS-Repl-Authentication-Mode
ldapDisplayName: msDS-ReplAuthenticationMode
attributeId: 1.2.840.113556.1.4.1861
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 6e124d4f-1a3f-4cc6-8e09-4a54c81b1d50
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.208 Attribute msDS-Replication-Notify-First-DSA-Delay

This attribute controls the delay between changes to the DS and notification of the first replica partner for an NC.

```
cn: ms-DS-Replication-Notify-First-DSA-Delay
ldapDisplayName: msDS-Replication-Notify-First-DSA-Delay
attributeId: 1.2.840.113556.1.4.1663
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 85abd4f4-0a89-4e49-bdec-6f35bb2562ba
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.209 Attribute msDS-Replication-Notify-Subsequent-DSA-Delay

This attribute controls the delay between notification of each subsequent replica partner for an NC.

```
cn: ms-DS-Replication-Notify-Subsequent-DSA-Delay
ldapDisplayName: msDS-Replication-Notify-Subsequent-DSA-Delay
attributeId: 1.2.840.113556.1.4.1664
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: d63db385-dd92-4b52-b1d8-0d3ecc0e86b6
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.210 Attribute msDS-ReplicationEpoch

This is used to hold the epoch under which all of the DCs are replicating. An epoch is the period in which a domain has a specific name. A new epoch starts when a domain name change occurs.

```
cn: ms-DS-ReplicationEpoch
ldapDisplayName: msDS-ReplicationEpoch
attributeId: 1.2.840.113556.1.4.1720
attributeSyntax: 2.5.5.9
omSyntax: 2
```

```
isSingleValued: TRUE
schemaIdGuid: 08e3aa79-eb1c-45b5-af7b-8f94246c8e41
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```

2.211 Attribute msDS-ReplValueMetaData

A list of metadata for each value of an attribute. The metadata indicates who changed the value last.

```
cn: ms-DS-Repl-Value-Meta-Data
ldapDisplayName: msDS-ReplValueMetaData
attributeId: 1.2.840.113556.1.4.1708
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 2f5c8145-e1bd-410b-8957-8bfa81d5acfd
systemOnly: FALSE
searchFlags: 0
systemFlags: 20
```

2.212 Attribute msDS-RetiredReplNCSignatures

Information about naming contexts that are no longer held on this computer.

```
cn: ms-DS-Retired-Repl-NC-Signatures
ldapDisplayName: msDS-RetiredReplNCSignatures
attributeId: 1.2.840.113556.1.4.1826
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: d5b35506-19d6-4d26-9afb-11357ac99b5e
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```

2.213 Attribute msDs-Schema-Extensions

A binary blob used to store information about extensions to schema objects.

```
cn: ms-ds-Schema-Extensions
ldapDisplayName: msDs-Schema-Extensions
attributeId: 1.2.840.113556.1.4.1440
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: b39a61be-ed07-4cab-9a4a-4963ed0141e1
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.214 Attribute msDS-SCPContainer

The custom location to place SCP objects. This attribute should contain a DN value (either FQDN or GUID-based) for the container in Active Directory.

```
cn: ms-DS-SCP-Container
ldapDisplayName: msDS-SCPContainer
attributeId: 1.2.840.113556.1.4.1872
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 454588e6-0b4e-b642-a6b8-ec03f6e1d9c5
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 4096
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.215 Attribute msDS-SDReferenceDomain

The domain to be used for default security descriptor translation for a non-domain naming context.

```
cn: ms-DS-SD-Reference-Domain
ldapDisplayName: msDS-SDReferenceDomain
attributeId: 1.2.840.113556.1.4.1711
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: 4c51e316-f628-43a5-b06b-ffb695fcb4f3
systemOnly: FALSE
searchFlags: 0
linkID: 2000
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.216 Attribute msDS-Security-Group-Extra-Classes

The common names of the non-standard classes that can be added to a security group through the Active Directory Users and Computers snap-in.

```
cn: ms-DS-Security-Group-Extra-Classes
ldapDisplayName: msDS-Security-Group-Extra-Classes
attributeId: 1.2.840.113556.1.4.1688
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 4f146ae8-a4fe-4801-a731-f51848a4f4e4
systemOnly: FALSE
```

2.217 Attribute msDS-ServiceAccount

The FPO representing the AD/LDS service account.


```
cn: ms-DS-Service-Account
ldapDisplayName: msDS-ServiceAccount
attributeId: 1.2.840.113556.1.4.1866
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: a7f73651-688b-401e-b0cf-9345857bab23
systemOnly: TRUE
searchFlags: 0
linkID: 2040
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.218 Attribute msDS-ServiceAccountBL

Backlink reference to the AD/LDS DSA object that uses this service account.

```
cn: ms-DS-Service-Account-BL
ldapDisplayName: msDS-ServiceAccountBL
attributeId: 1.2.840.113556.1.4.1867
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: 1322c9ff-1334-3d4a-9396-4d9284d42636
systemOnly: TRUE
searchFlags: 0
linkID: 2041
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```

2.219 Attribute msDS-ServiceAccountDNSDomain

The domain of which the AD/LDS service account is a member.

```
cn: ms-DS-Service-Account-DNS-Domain
ldapDisplayName: msDS-ServiceAccountDNSDomain
attributeId: 1.2.840.113556.1.4.1862
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: fba633d4-20d7-4773-8b2c-c7445f54360d
systemOnly: TRUE
searchFlags: 0
rangeLower: 0
rangeUpper: 2048
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.220 Attribute msDS-Settings

Used to store settings for an object. Its use is solely determined by the object's owner. It is recommended to use it to store name/value pairs. For example, color=blue.

```
cn: ms-DS-Settings
```

```
ldapDisplayName: msDS-Settings
attributeId: 1.2.840.113556.1.4.1697
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 0e1b47d7-40a3-4b48-8d1b-4cac0c1cdf21
systemOnly: FALSE
searchFlags: 0
rangeUpper: 1000000
```

2.221 Attribute msDS-TasksForAzRole

List of tasks for Az-Role.

```
cn: ms-DS-Tasks-For-Az-Role
ldapDisplayName: msDS-TasksForAzRole
attributeId: 1.2.840.113556.1.4.1814
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: 35319082-8c4a-4646-9386-c2949d49894d
systemOnly: FALSE
searchFlags: 0
linkID: 2024
```

2.222 Attribute msDS-TasksForAzRoleBL

Backlink from Az-Task to Az-Role objects linking to it.

```
cn: ms-DS-Tasks-For-Az-Role-BL
ldapDisplayName: msDS-TasksForAzRoleBL
attributeId: 1.2.840.113556.1.4.1815
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: a0dcd536-5158-42fe-8c40-c00a7ad37959
systemOnly: TRUE
searchFlags: 0
linkID: 2025
showInAdvancedViewOnly: TRUE
systemFlags: FLAG_ATTR_NOT_REPLICATED
```

2.223 Attribute msDS-TasksForAzTask

List of tasks linked to Az-Task.

```
cn: ms-DS-Tasks-For-Az-Task
ldapDisplayName: msDS-TasksForAzTask
attributeId: 1.2.840.113556.1.4.1810
attributeSyntax: 2.5.5.1
omSyntax: 127
```

```
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: b11c8ee2-5fcd-46a7-95f0-f38333f096cf
systemOnly: FALSE
searchFlags: 0
linkID: 2020
```

2.224 Attribute msDS-TasksForAzTaskBL

Back link from Az-Task to the Az-Task objects linking to it.

```
cn: ms-DS-Tasks-For-Az-Task-BL
ldapDisplayName: msDS-TasksForAzTaskBL
attributeId: 1.2.840.113556.1.4.1811
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: df446e52-b5fa-4ca2-a42f-13f98a526c8f
systemOnly: TRUE
searchFlags: 0
linkID: 2021
systemFlags: FLAG_ATTR_NOT_REPLICATED
```

2.225 Attribute msDS-TombstoneQuotaFactor

The percentage factor by which the tombstone object count should be reduced for the purpose of quota accounting.

```
cn: ms-DS-Tombstone-Quota-Factor
ldapDisplayName: msDS-TombstoneQuotaFactor
attributeId: 1.2.840.113556.1.4.1847
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 461744d7-f3b6-45ba-8753-fb9552a5df32
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 100
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.226 Attribute msDS-TopQuotaUsage

The list of top quota users ordered by decreasing quota usage currently in the directory database.

```
cn: ms-DS-Top-Quota-Usage
ldapDisplayName: msDS-TopQuotaUsage
attributeId: 1.2.840.113556.1.4.1850
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 7b7cce4f-f1f5-4bb6-b7eb-23504af19e75
```

```
systemOnly: FALSE
searchFlags: 0
systemFlags: 20
```

2.227 Attribute msDS-UpdateScript

This is used to hold the script with the domain restructure instructions.

```
cn: ms-DS-UpdateScript
ldapDisplayName: msDS-UpdateScript
attributeId: 1.2.840.113556.1.4.1721
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 146eb639-bb9f-4fc1-a825-e29e00c77920
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.228 Attribute msDS-User-Account-Control-Computed

ms-DS-User-Account-Control-Computed

```
cn: ms-DS-User-Account-Control-Computed
ldapDisplayName: msDS-User-Account-Control-Computed
attributeId: 1.2.840.113556.1.4.1460
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 2cc4b836-b63f-4940-8d23-ea7acf06af56
systemOnly: FALSE
searchFlags: 0
attributeSecurityGuid: 4c164200-20c0-11d0-a768-00aa006e0529
systemFlags: 20
```

2.229 Attribute msDS-UserAccountDisabled

A Boolean flag that controls whether an account is disabled or enabled.

```
cn: ms-DS-User-Account-Disabled
ldapDisplayName: msDS-UserAccountDisabled
attributeId: 1.2.840.113556.1.4.1853
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: 7c708658-7372-4211-b22b-13a45ffd1d61
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.230 Attribute msDS-UserDontExpirePassword

A Boolean flag that controls whether the password for the account this attribute references will expire or not.

```
cn: ms-DS-User-Dont-Expire-Password
ldapDisplayName: msDS-UserDontExpirePassword
attributeId: 1.2.840.113556.1.4.1855
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: 8788193a-2925-43d9-a221-bb7fff397675
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.231 Attribute msDS-UserPasswordExpired

A Boolean flag that indicates whether the password for the account this attribute references has expired or not. TRUE means that the password expired.

```
cn: ms-DS-User-Password-Expired
ldapDisplayName: msDS-UserPasswordExpired
attributeId: 1.2.840.113556.1.4.1858
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: 565c7ab5-e13e-47f6-abb5-de741806f125
systemOnly: FALSE
searchFlags: 0
systemFlags: 20
```

2.232 Attribute mustContain

The list of mandatory attributes for a class. These attributes must be specified when an instance of the class is created.

```
cn: Must-Contain
ldapDisplayName: mustContain
attributeId: 1.2.840.113556.1.2.24
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: FALSE
schemaIdGuid: bf9679d3-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.233 Attribute name

The relative distinguished name of an object.

```
cn: RDN
```

```
ldapDisplayName: name
attributeId: 1.2.840.113556.1.4.1
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf967a0e-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: fPRESERVEONDELETE| fANR | fATTINDEX
rangeLower: 1
rangeUpper: 255
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
FLAG_ATTR_REQ_PARTIAL_SET_MEMBER
```

2.234 Attribute nCName

The distinguished name of the naming context for the object.

```
cn: NC-Name
ldapDisplayName: nCName
attributeId: 1.2.840.113556.1.2.16
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: bf9679d6-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: fPRESERVEONDELETE
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.235 Attribute nETBIOSName

The name of the object to be used over NetBIOS.

```
cn: NETBIOS-Name
ldapDisplayName: nETBIOSName
attributeId: 1.2.840.113556.1.4.87
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf9679d8-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fATTINDEX
rangeLower: 1
rangeUpper: 16
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.236 Attribute networkAddress

The TCP/IP address for a network segment. Also called the subnet address.

```
cn: Network-Address
```

```
ldapDisplayName: networkAddress
attributeId: 1.2.840.113556.1.2.459
attributeSyntax: 2.5.5.4
omSyntax: 20
isSingleValued: FALSE
schemaIdGuid: bf9679d9-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 256
```

2.237 Attribute nonIndexedMetadata

ms-DS-Non-Indexed-Metadata

```
cn: ms-DS-Non-Indexed-Metadata
ldapDisplayName: nonIndexedMetadata
attributeId: 1.2.840.113556.1.4.1887
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 6c417825-f0a6-4772-b5c7-b0aaaf3c8e54
```

2.238 Attribute notificationList

The **Notification-List** attribute is not currently used.

```
cn: Notification-List
ldapDisplayName: notificationList
attributeId: 1.2.840.113556.1.4.303
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: 19195a56-6da0-11d0-afd3-00c04fd930c9
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.239 Attribute ntPwdHistory

The password history of the user in Windows NT one-way format (OWF). Windows 2000 uses the Windows NT OWF.

```
cn: Nt-Pwd-History
ldapDisplayName: ntPwdHistory
attributeId: 1.2.840.113556.1.4.94
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: bf9679e2-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
```

```
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.240 Attribute nTSecurityDescriptor

The Windows NT security descriptor for an object.

```
cn: NT-Security-Descriptor
ldapDisplayName: nTSecurityDescriptor
attributeId: 1.2.840.113556.1.2.281
attributeSyntax: 2.5.5.15
omSyntax: 66
isSingleValued: TRUE
schemaIdGuid: bf9679e3-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fPRESERVEONDELETE
rangeLower: 0
rangeUpper: 132096
isMemberOfPartialAttributeSet: TRUE
systemFlags: 26
```

2.241 Attribute o

The name of the company or organization.

```
cn: Organization-Name
ldapDisplayName: o
attributeId: 2.5.4.10
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: bf9679ef-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
             FLAG_ATTR_REQ_PARTIAL_SET_MEMBER
```

2.242 Attribute objectCategory

An object class name used to group objects of this or derived classes.

```
cn: Object-Category
ldapDisplayName: objectCategory
attributeId: 1.2.840.113556.1.4.782
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: 26d97369-6070-11d1-a9c6-0000f80367c1
systemOnly: FALSE
```



```
searchFlags: fATTINDEX
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
             FLAG_ATTR_REQ_PARTIAL_SET_MEMBER
```

2.243 Attribute objectClass

The list of classes of which this object is an instance.

```
cn: Object-Class
ldapDisplayName: objectClass
attributeId: 2.5.4.0
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: FALSE
schemaIdGuid: bf9679e5-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: fPRESERVEONDELETE | fATTINDEX
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
             FLAG_ATTR_REQ_PARTIAL_SET_MEMBER
```

2.244 Attribute objectClassCategory

This attribute contains the class type, such as abstract, auxiliary, or structured.

```
cn: Object-Class-Category
ldapDisplayName: objectClassCategory
attributeId: 1.2.840.113556.1.2.370
attributeSyntax: 2.5.5.9
omSyntax: 10
isSingleValued: TRUE
schemaIdGuid: bf9679e6-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
rangeLower: 0
rangeUpper: 3
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.245 Attribute objectClasses

A multi-valued property containing strings that represent each class in the schema. Each value contains the [governsID](#), [LDAPDisplayName](#), [mustContain](#), [mayContain](#), and so on.

```
cn: Object-Classes
ldapDisplayName: objectClasses
attributeId: 2.5.21.6
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 9a7ad94b-ca53-11d1-bbd0-0080c76670c0
```

```
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_IS_CONSTRUCTED
```

2.246 Attribute objectGUID

The unique identifier for an object.

```
cn: Object-Guid
ldapDisplayName: objectGUID
attributeId: 1.2.840.113556.1.4.2
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: bf9679e7-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: fPRESERVEONDELETE | fATTINDEX
rangeLower: 16
rangeUpper: 16
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
  FLAG_ATTR_REQ_PARTIAL_SET_MEMBER | FLAG_ATTR_NOT_REPLICATED
```

2.247 Attribute objectSid

A binary value that specifies the security identifier (SID) of the user. The SID is a unique value used to identify the user as a security principal.

```
cn: Object-Sid
ldapDisplayName: objectSid
attributeId: 1.2.840.113556.1.4.146
attributeSyntax: 2.5.5.17
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: bf9679e8-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: fPRESERVEONDELETE | fATTINDEX
rangeLower: 0
rangeUpper: 28
attributeSecurityGuid: 59ba2f42-79a2-11d0-9020-00c04fc2d3cf
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
  FLAG_ATTR_REQ_PARTIAL_SET_MEMBER
```

2.248 Attribute objectVersion

This can be used to store a version number for the object.

```
cn: Object-Version
ldapDisplayName: objectVersion
attributeId: 1.2.840.113556.1.2.76
attributeSyntax: 2.5.5.9
```

```
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 16775848-47f3-11d1-a9c3-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.249 Attribute oObjectClass

The unique OID for the attribute or class.

```
cn: OM-Object-Class
ldapDisplayName: oObjectClass
attributeId: 1.2.840.113556.1.2.218
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: bf9679ec-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.250 Attribute oMSyntax

A number representing the OM type for the attribute.

```
cn: OM-Syntax
ldapDisplayName: oMSyntax
attributeId: 1.2.840.113556.1.2.231
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: bf9679ed-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: fPRESERVEONDELETE
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.251 Attribute options

This attribute is a bit field, where the meaning of the bits varies from objectClass to objectClass. Can occur on Inter-Site-Transport, NTDS-Connection, NTDS-DSA, NTDS-Site-Settings, and Site-Link objects.

```
cn: Options
ldapDisplayName: options
attributeId: 1.2.840.113556.1.4.307
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 19195a53-6da0-11d0-afd3-00c04fd930c9
systemOnly: FALSE
searchFlags: 0
```

systemFlags: FLAG_SCHEMA_BASE_OBJECT

2.252 Attribute otherFacsimileTelephoneNumber

A list of alternate facsimile numbers.

```
cn: Phone-Fax-Other
ldapDisplayName: otherFacsimileTelephoneNumber
attributeId: 1.2.840.113556.1.4.646
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 0296c11d-40da-11d1-a9c0-0000f80367c1
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
```

2.253 Attribute otherHomePhone

A list of alternate home phone numbers.

```
cn: Phone-Home-Other
ldapDisplayName: otherHomePhone
attributeId: 1.2.840.113556.1.2.277
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: f0f8ffa2-1191-11d0-a060-00aa006c33ed
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
```

2.254 Attribute otherIpPhone

The list of alternate TCP/IP addresses for the phone. Used by telephony.

```
cn: Phone-Ip-Other
ldapDisplayName: otherIpPhone
attributeId: 1.2.840.113556.1.4.722
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 4d146e4b-48d4-11d1-a9c3-0000f80367c1
systemOnly: FALSE
searchFlags: 0
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
isMemberOfPartialAttributeSet: TRUE
```

2.255 Attribute otherMobile

A list of alternate cell phone numbers.

```
cn: Phone-Mobile-Other
ldapDisplayName: otherMobile
attributeId: 1.2.840.113556.1.4.647
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 0296c11e-40da-11d1-a9c0-0000f80367c1
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
```

2.256 Attribute otherPager

A list of alternate pager numbers.

```
cn: Phone-Pager-Other
ldapDisplayName: otherPager
attributeId: 1.2.840.113556.1.2.118
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: f0f8ffa4-1191-11d0-a060-00aa006c33ed
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
```

2.257 Attribute otherTelephone

A list of alternate office phone numbers.

```
cn: Phone-Office-Other
ldapDisplayName: otherTelephone
attributeId: 1.2.840.113556.1.2.18
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: f0f8ffa5-1191-11d0-a060-00aa006c33ed
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
```

2.258 Attribute otherWellKnownObjects

Contains a list of containers by GUID and distinguished name. This permits retrieving an object after it has been moved by using just the GUID and the domain name. Whenever the object is moved, the system will automatically update the distinguished name.

```
cn: Other-Well-Known-Objects
ldapDisplayName: otherWellKnownObjects
attributeId: 1.2.840.113556.1.4.1359
attributeSyntax: 2.5.5.7
omSyntax: 127
omObjectClass: 1.2.840.113556.1.1.1.11
isSingleValued: FALSE
schemaIdGuid: 1ea64e5d-ac0f-11d2-90df-00c04fd91ab1
systemOnly: FALSE
searchFlags: 0
rangeLower: 16
rangeUpper: 16
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.259 Attribute ou

The name of the organizational unit.

```
cn: Organizational-Unit-Name
ldapDisplayName: ou
attributeId: 2.5.4.11
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: bf9679f0-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fATTINDEX
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
             FLAG_ATTR_REQ_PARTIAL_SET_MEMBER
```

2.260 Attribute owner

The distinguished name of an object that has ownership of an object.

```
cn: Owner
ldapDisplayName: owner
attributeId: 2.5.4.32
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: bf9679f3-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
```

linkID: 44

2.261 Attribute ownerBL

The back link to the [owner](#) attribute. Contains a list of owners for an object.

```
cn: ms-Exch-Owner-BL
ldapDisplayName: ownerBL
attributeId: 1.2.840.113556.1.2.104
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: bf9679f4-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
linkID: 45
systemFlags: FLAG_ATTR_NOT_REPLICATED
```

2.262 Attribute pager

The primary pager number.

```
cn: Phone-Pager-Primary
ldapDisplayName: pager
attributeId: 0.9.2342.19200300.100.1.42
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: f0f8ffa6-1191-11d0-a060-00aa006c33ed
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
```

2.263 Attribute parentGUID

This is a constructed attribute, invented to support the DirSync control. Holds the objectGuid of an object's parent when replicating an object's creation, rename, or move.

```
cn: Parent-GUID
ldapDisplayName: parentGUID
attributeId: 1.2.840.113556.1.4.1224
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: 2df90d74-009f-11d2-aa4c-00c04fd7d83a
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_IS_CONSTRUCTED
```

2.264 Attribute partialAttributeDeletionList

Tracks the internal replication state of partial replicas (that is on GCs). Attribute of the partial replica NC object. Used when the GC is in the process of removing attributes from the objects in its partial replica NCs.

```
cn: Partial-Attribute-Deletion-List
ldapDisplayName: partialAttributeDeletionList
attributeId: 1.2.840.113556.1.4.663
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: 28630ec0-41d5-11d1-a9c1-0000f80367c1
systemOnly: TRUE
searchFlags: 0
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
  FLAG_ATTR_REQ_PARTIAL_SET_MEMBER | FLAG_ATTR_NOT_REPLICATED
```

2.265 Attribute partialAttributeSet

Tracks the internal replication state of partial replicas (that is, on GCs). Attribute of the partial replica NC object. Defines the set of attributes present on a particular partial replica NC.

```
cn: Partial-Attribute-Set
ldapDisplayName: partialAttributeSet
attributeId: 1.2.840.113556.1.4.640
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: 19405b9e-3cfa-11d1-a9c0-0000f80367c1
systemOnly: TRUE
searchFlags: 0
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
  FLAG_ATTR_REQ_PARTIAL_SET_MEMBER | FLAG_ATTR_NOT_REPLICATED
```

2.266 Attribute pekList

List of password encryption keys.

```
cn: Pek-List
ldapDisplayName: pekList
attributeId: 1.2.840.113556.1.4.865
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: 07383083-91df-11d1-aebc-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```


2.267 Attribute personalTitle

The user's title.

```
cn: Personal-Title
ldapDisplayName: personalTitle
attributeId: 1.2.840.113556.1.2.615
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 16775858-47f3-11d1-a9c3-0000f80367c1
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
```

2.268 Attribute photo

An object encoded in G3 fax as explained in recommendation T.4, with an ASN.1 wrapper to make it compatible with an X.400 BodyPart as defined in X.420.

```
cn: photo
ldapDisplayName: photo
attributeId: 0.9.2342.19200300.100.1.7
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: 9c979768-bala-4c08-9632-c6a5c1ed649a
systemOnly: FALSE
searchFlags: 0
showInAdvancedViewOnly: FALSE
```

2.269 Attribute physicalDeliveryOfficeName

Contains the office location in the user's place of business.

```
cn: Physical-Delivery-Office-Name
ldapDisplayName: physicalDeliveryOfficeName
attributeId: 2.5.4.19
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf9679f7-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fANR | fATTINDEX
rangeLower: 1
rangeUpper: 128
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.270 Attribute possibleInferiors

The list of objects that this object can contain.

```
cn: Possible-Inferiors
ldapDisplayName: possibleInferiors
attributeId: 1.2.840.113556.1.4.915
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: FALSE
schemaIdGuid: 9a7ad94c-ca53-11d1-bbd0-0080c76670c0
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_IS_CONSTRUCTED
```

2.271 Attribute possSuperiors

The list of objects that can contain this class.

```
cn: Poss-Superiors
ldapDisplayName: possSuperiors
attributeId: 1.2.840.113556.1.2.8
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: FALSE
schemaIdGuid: bf9679fa-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.272 Attribute postalAddress

The mailing address for the object.

```
cn: Postal-Address
ldapDisplayName: postalAddress
attributeId: 2.5.4.16
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: bf9679fc-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fCOPY
rangeLower: 1
rangeUpper: 4096
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.273 Attribute postalCode

The postal or Zip code for mail delivery.

```
cn: Postal-Code
ldapDisplayName: postalCode
attributeId: 2.5.4.17
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf9679fd-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fCOPY
rangeLower: 1
rangeUpper: 40
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.274 Attribute postOfficeBox

The P.O. box number for this object.

```
cn: Post-Office-Box
ldapDisplayName: postOfficeBox
attributeId: 2.5.4.18
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: bf9679fb-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fCOPY
rangeLower: 1
rangeUpper: 40
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.275 Attribute preferredDeliveryMethod

The X.500 preferred way [\[X500\]](#) to deliver to addressee.

```
cn: Preferred-Delivery-Method
ldapDisplayName: preferredDeliveryMethod
attributeId: 2.5.4.28
attributeSyntax: 2.5.5.9
omSyntax: 10
isSingleValued: FALSE
schemaIdGuid: bf9679fe-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.276 Attribute preferredLanguage

The preferred written or spoken language for a person.

```
cn: preferredLanguage
```

```
ldapDisplayName: preferredLanguage
attributeId: 2.16.840.1.113730.3.1.39
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 856be0d0-18e7-46e1-8f5f-7ee4d9020e0d
systemOnly: FALSE
searchFlags: 0
showInAdvancedViewOnly: FALSE
```

2.277 Attribute preferredOU

The organizational unit to show by default on user's desktop.

```
cn: Preferred-OU
ldapDisplayName: preferredOU
attributeId: 1.2.840.113556.1.4.97
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: bf9679ff-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fCOPY
```

2.278 Attribute prefixMap

The **Prefix-Map** attribute is for internal use only.

```
cn: Prefix-Map
ldapDisplayName: prefixMap
attributeId: 1.2.840.113556.1.4.538
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: 52458022-ca6a-11d0-afff-0000f80367c1
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```

2.279 Attribute primaryGroupToken

A computed attribute that is used in retrieving the membership list of a group such as Domain Users. The complete membership of such groups is not stored explicitly for scaling reasons.

```
cn: Primary-Group-Token
ldapDisplayName: primaryGroupToken
attributeId: 1.2.840.113556.1.4.1412
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: c0ed8738-7efd-4481-84d9-66d2db8be369
systemOnly: TRUE
```

```
searchFlags: 0
systemFlags: 20
```

2.280 Attribute primaryInternationalISDNNumber

The primary ISDN number.

```
cn: Phone-ISDN-Primary
ldapDisplayName: primaryInternationalISDNNumber
attributeId: 1.2.840.113556.1.4.649
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 0296c11f-40da-11d1-a9c0-0000f80367c1
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
```

2.281 Attribute primaryTelexNumber

The primary telex number.

```
cn: Telex-Primary
ldapDisplayName: primaryTelexNumber
attributeId: 1.2.840.113556.1.4.648
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 0296c121-40da-11d1-a9c0-0000f80367c1
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
```

2.282 Attribute proxiedObjectName

This attribute is used internally by Active Directory to help track interdomain moves.

```
cn: Proxied-Object-Name
ldapDisplayName: proxiedObjectName
attributeId: 1.2.840.113556.1.4.1249
attributeSyntax: 2.5.5.7
omSyntax: 127
omObjectClass: 1.2.840.113556.1.1.1.11
isSingleValued: TRUE
schemaIdGuid: e1aea402-cd5b-11d0-afff-0000f80367c1
systemOnly: TRUE
searchFlags: 0
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
```

2.283 Attribute proxyAddresses

A proxy address is the address by which an Exchange Server recipient object is recognized in a foreign mail system. Proxy addresses are required for all recipient objects such as custom recipients and distribution lists.

```
cn: Proxy-Addresses
ldapDisplayName: proxyAddresses
attributeId: 1.2.840.113556.1.2.210
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: bf967a06-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fANR | fATTINDEX
rangeLower: 1
rangeUpper: 1123
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.284 Attribute pwdLastSet

The date and time that the password for this account was last changed. This value is stored as a large integer that represents the number of 100 nanosecond intervals since January 1, 1601 (UTC). If this value is set to 0 and the User-Account-Control attribute does not contain the UF_DONT_EXPIRE_PASSWD flag, the user must set the password at the next logon.

```
cn: Pwd-Last-Set
ldapDisplayName: pwdLastSet
attributeId: 1.2.840.113556.1.4.96
attributeSyntax: 2.5.5.16
omSyntax: 65
isSingleValued: TRUE
schemaIdGuid: bf967a0a-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
attributeSecurityGuid: 4c164200-20c0-11d0-a768-00aa006e0529
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.285 Attribute queryFilter

Query-Filter attribute.

```
cn: Query-Filter
ldapDisplayName: queryFilter
attributeId: 1.2.840.113556.1.4.1355
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: cbf70a26-7e78-11d2-9921-0000f87a57d4
```

systemOnly: FALSE

2.286 Attribute queryPolicyBL

List of all objects holding references to a given Query-Policy.

```
cn: Query-Policy-BL
ldapDisplayName: queryPolicyBL
attributeId: 1.2.840.113556.1.4.608
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: e1aea404-cd5b-11d0-afff-0000f80367c1
systemOnly: TRUE
searchFlags: 0
linkID: 69
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```

2.287 Attribute queryPolicyObject

Reference to the default Query-Policy in force for this server.

```
cn: Query-Policy-Object
ldapDisplayName: queryPolicyObject
attributeId: 1.2.840.113556.1.4.607
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: e1aea403-cd5b-11d0-afff-0000f80367c1
systemOnly: FALSE
searchFlags: 0
linkID: 68
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.288 Attribute rangeLower

The minimum value or length of an attribute.

```
cn: Range-Lower
ldapDisplayName: rangeLower
attributeId: 1.2.840.113556.1.2.34
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: bf967a0c-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.289 Attribute rangeUpper

The maximum value or length of an attribute.

```
cn: Range-Upper
ldapDisplayName: rangeUpper
attributeId: 1.2.840.113556.1.2.35
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: bf967a0d-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.290 Attribute rDNAttID

The RDN for the attribute that is used to name a class.

```
cn: RDN-Att-ID
ldapDisplayName: rDNAttID
attributeId: 1.2.840.113556.1.2.26
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: TRUE
schemaIdGuid: bf967a0f-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.291 Attribute registeredAddress

Specifies a mnemonic for an address associated with an object at a particular city location. The mnemonic is registered in the country/region in which the city is located and is used in the provision of the Public Telegram Service.

```
cn: Registered-Address
ldapDisplayName: registeredAddress
attributeId: 2.5.4.26
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: bf967a10-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 4096
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
```


2.292 Attribute replInterval

The attribute of Site-Link objects that defines the interval in minutes between replication cycles between the sites in the Site-List. Must be a multiple of 15 minutes (the granularity of cross-site DS replication), a minimum of 15 minutes, and a maximum of 10,080 minutes (one week).

```
cn: Repl-Interval
ldapDisplayName: replInterval
attributeId: 1.2.840.113556.1.4.1336
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 45ba9d1a-56fa-11d2-90d0-00c04fd91ab1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.293 Attribute replPropertyMetaData

Tracks internal replication state information for DS objects. Information here can be extracted in public form through the public DsReplicaGetInfo() API. Present on all DS objects.

```
cn: Repl-Property-Meta-Data
ldapDisplayName: replPropertyMetaData
attributeId: 1.2.840.113556.1.4.3
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: 281416c0-1968-11d0-a28f-00aa003049e2
systemOnly: TRUE
searchFlags: fPRESERVEONDELETE
isMemberOfPartialAttributeSet: TRUE
systemFlags: 27
```

2.294 Attribute replTopologyStayOfExecution

This attribute specifies the delay between deleting a server object and permanently removing it from the replication topology.

```
cn: Repl-Topology-Stay-Of-Execution
ldapDisplayName: replTopologyStayOfExecution
attributeId: 1.2.840.113556.1.4.677
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 7bfdcb83-4807-11d1-a9c3-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.295 Attribute replUpToDateVector

This attribute tracks internal replication state information for an entire NC. Information here can be extracted in public form through the DsReplicaGetInfo() API. Present on all NC root objects.

```
cn: Repl-UpToDate-Vector
ldapDisplayName: replUpToDateVector
attributeId: 1.2.840.113556.1.4.4
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: bf967a16-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
  FLAG_ATTR_REQ_PARTIAL_SET_MEMBER | FLAG_ATTR_NOT_REPLICATED
```

2.296 Attribute repsFrom

This attribute lists the servers from which the directory will accept changes for the defined naming context (NC).

```
cn: Reps-From
ldapDisplayName: repsFrom
attributeId: 1.2.840.113556.1.2.91
attributeSyntax: 2.5.5.10
omSyntax: 127
omObjectClass: 1.2.840.113556.1.1.1.6
isSingleValued: FALSE
schemaIdGuid: bf967a1d-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
  FLAG_ATTR_REQ_PARTIAL_SET_MEMBER | FLAG_ATTR_NOT_REPLICATED
```

2.297 Attribute repsTo

This attribute lists the servers that the directory will notify of changes and the servers the directory will send changes to, upon request for the defined naming context (NC).

```
cn: Reps-To
ldapDisplayName: repsTo
attributeId: 1.2.840.113556.1.2.83
attributeSyntax: 2.5.5.10
omSyntax: 127
omObjectClass: 1.2.840.113556.1.1.1.6
isSingleValued: FALSE
schemaIdGuid: bf967a1e-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
```

2.298 Attribute retiredReplDSASignatures

This attribute tracks the past DS replication identities of a given DC.

```
cn: Retired-Repl-DSA-Signatures
ldapDisplayName: retiredReplDSASignatures
attributeId: 1.2.840.113556.1.4.673
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: 7bfdcb7f-4807-11d1-a9c3-0000f80367c1
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.299 Attribute revision

This attribute specifies the revision level for a security descriptor or other change. Only used in the sam-server and ds-ui-settings objects.

```
cn: Revision
ldapDisplayName: revision
attributeId: 1.2.840.113556.1.4.145
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: bf967a21-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.300 Attribute rightsGuid

This attribute specifies the GUID used to represent an extended right within an access control entry.

```
cn: Rights-Guid
ldapDisplayName: rightsGuid
attributeId: 1.2.840.113556.1.4.340
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 8297931c-86d3-11d0-afda-00c04fd930c9
systemOnly: FALSE
searchFlags: 0
rangeLower: 36
rangeUpper: 36
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.301 Attribute roomNumber

This attribute specifies the room number of an object.

```
cn: roomNumber
ldapDisplayName: roomNumber
attributeId: 0.9.2342.19200300.100.1.6
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 81d7f8c2-e327-4a0d-91c6-b42d4009115f
systemOnly: FALSE
searchFlags: 0
showInAdvancedViewOnly: FALSE
```

2.302 Attribute rootTrust

This attribute specifies the distinguished name of another [Cross-Ref](#).

```
cn: Root-Trust
ldapDisplayName: rootTrust
attributeId: 1.2.840.113556.1.4.674
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: 7bfdcb80-4807-11d1-a9c3-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.303 Attribute schedule

This attribute specifies a schedule BLOB as defined by the NT Job Service. Used by replication.

```
cn: Schedule
ldapDisplayName: schedule
attributeId: 1.2.840.113556.1.4.211
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: dd712224-10e4-11d0-a05f-00aa006c33ed
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.304 Attribute schemaFlagsEx

This attribute is not currently used.

```
cn: Schema-Flags-Ex
ldapDisplayName: schemaFlagsEx
attributeId: 1.2.840.113556.1.4.120
```

```
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: bf967a2b-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.305 Attribute schemaIDGUID

This attribute specifies the unique identifier for a schema object.

```
cn: Schema-ID-GUID
ldapDisplayName: schemaIDGUID
attributeId: 1.2.840.113556.1.4.148
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: bf967923-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
rangeLower: 16
rangeUpper: 16
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.306 Attribute schemaInfo

This attribute specifies an internal binary value used to detect schema changes between DCs and force a schema NC replication cycle before replicating any other NC. Used to resolve ties when the schema FSMO is seized and a change is made on more than one DC.

```
cn: Schema-Info
ldapDisplayName: schemaInfo
attributeId: 1.2.840.113556.1.4.1358
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: f9fb64ae-93b4-11d2-9945-0000f87a57d4
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.307 Attribute schemaUpdate

This attribute is not currently used.

```
cn: Schema-Update
ldapDisplayName: schemaUpdate
attributeId: 1.2.840.113556.1.4.481
attributeSyntax: 2.5.5.11
omSyntax: 24
isSingleValued: TRUE
schemaIdGuid: 1e2d06b4-ac8f-11d0-afe3-00c04fd930c9
```

```
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```

2.308 Attribute schemaVersion

This attribute specifies the version number for the schema. Currently not used.

```
cn: Schema-Version
ldapDisplayName: schemaVersion
attributeId: 1.2.840.113556.1.2.471
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: FALSE
schemaIdGuid: bf967a2c-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.309 Attribute scopeFlags

This attribute is not currently used.

```
cn: Scope-Flags
ldapDisplayName: scopeFlags
attributeId: 1.2.840.113556.1.4.1354
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 16f3a4c2-7e79-11d2-9921-0000f87a57d4
systemOnly: FALSE
```

2.310 Attribute sDRightsEffective

This constructed attribute returns a single DWORD value that can have up to three bits set: OWNER_SECURITY_INFORMATION, DACL_SECURITY_INFORMATION, and SACL_SECURITY_INFORMATION. If a bit is set, then the user has write access to the corresponding part of the security descriptor.

Note "Owner" means both owner and group.

```
cn: SD-Rights-Effective
ldapDisplayName: sDRightsEffective
attributeId: 1.2.840.113556.1.4.1304
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: c3dbafa6-33df-11d2-98b2-0000f87a57d4
systemOnly: FALSE
searchFlags: 0
attributeSecurityGuid: 59ba2f42-79a2-11d0-9020-00c04fc2d3cf
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_IS_CONSTRUCTED
```

2.311 Attribute searchFlags

This attribute contains a set of flags that specify search and indexing information for an attribute.

```
cn: Search-Flags
ldapDisplayName: searchFlags
attributeId: 1.2.840.113556.1.2.334
attributeSyntax: 2.5.5.9
omSyntax: 10
isSingleValued: TRUE
schemaIdGuid: bf967a2d-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.312 Attribute searchGuide

This attribute specifies information of suggested search criteria which may be included in some entries that are expected to be a convenient base-object for the search operation; for example, country/region or organization.

```
cn: Search-Guide
ldapDisplayName: searchGuide
attributeId: 2.5.4.14
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: bf967a2e-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.313 Attribute secretary

This attribute contains the distinguished name of the secretary for an account.

```
cn: secretary
ldapDisplayName: secretary
attributeId: 0.9.2342.19200300.100.1.21
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: 01072d9a-98ad-4a53-9744-e83e287278fb
systemOnly: FALSE
searchFlags: 0
showInAdvancedViewOnly: FALSE
```

2.314 Attribute seeAlso

This attribute specifies the list of distinguished names (DNs) related to an object.

```
cn: See-Also
ldapDisplayName: seeAlso
attributeId: 2.5.4.34
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: bf967a31-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.315 Attribute serialNumber

This attribute is part of the X.500 specification [\[X500\]](#). Not used by Active Directory.

```
cn: Serial-Number
ldapDisplayName: serialNumber
attributeId: 2.5.4.5
attributeSyntax: 2.5.5.5
omSyntax: 19
isSingleValued: FALSE
schemaIdGuid: bf967a32-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 64
```

2.316 Attribute serverReference

This attribute is found in a site computer object. Contains the distinguished name (DN) of the domain controller (DC) in the domain naming context.

```
cn: Server-Reference
ldapDisplayName: serverReference
attributeId: 1.2.840.113556.1.4.515
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: 26d9736d-6070-11d1-a9c6-0000f80367c1
systemOnly: FALSE
searchFlags: 0
linkID: 94
showInAdvancedViewOnly: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.317 Attribute serverReferenceBL

This attribute is found in the domain naming context. The distinguished name (DN) of a computer under the sites folder.

```
cn: Server-Reference-BL
```



```

ldapDisplayName: serverReferenceBL
attributeId: 1.2.840.113556.1.4.516
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: 26d9736e-6070-11d1-a9c6-0000f80367c1
systemOnly: TRUE
searchFlags: 0
linkID: 95
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED

```

2.318 Attribute shellContextMenu

This attribute specifies the order number and GUID of the context menu for this object.

```

cn: Shell-Context-Menu
ldapDisplayName: shellContextMenu
attributeId: 1.2.840.113556.1.4.615
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 553fd039-f32e-11d0-b0bc-00c04fd8dca6
systemOnly: FALSE

```

2.319 Attribute shellPropertyPages

This attribute specifies the order number and GUID of property pages for managing Active Directory objects. These property pages can be accessed from the Windows shell. For more information, see the document "Extending the User Interface for Directory Objects" [\[MSDN-ExtUserIntDirObj\]](#).

```

cn: Shell-Property-Pages
ldapDisplayName: shellPropertyPages
attributeId: 1.2.840.113556.1.4.563
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 52458039-ca6a-11d0-afff-0000f80367c1
systemOnly: FALSE

```

2.320 Attribute showInAdvancedViewOnly

This attribute is TRUE if the corresponding attribute is to be visible in the advanced mode of the UI.

```

cn: Show-In-Advanced-View-Only
ldapDisplayName: showInAdvancedViewOnly
attributeId: 1.2.840.113556.1.2.169
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: bf967984-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fCOPY | fATTINDEX

```

```
attributeSecurityGuid: 59ba2f42-79a2-11d0-9020-00c04fc2d3cf
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.321 Attribute siteLinkList

This attribute specifies a list of site links associated with this bridge.

```
cn: Site-Link-List
ldapDisplayName: siteLinkList
attributeId: 1.2.840.113556.1.4.822
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: d50c2cdd-8951-11d1-aebc-0000f80367c1
systemOnly: FALSE
searchFlags: 0
linkID: 142
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.322 Attribute siteList

This attribute specifies a list of sites connected to this link object.

```
cn: Site-List
ldapDisplayName: siteList
attributeId: 1.2.840.113556.1.4.821
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: d50c2cdc-8951-11d1-aebc-0000f80367c1
systemOnly: FALSE
searchFlags: 0
linkID: 144
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.323 Attribute siteObject

This attribute specifies the distinguished name (DN) for the site to which this subnet belongs.

```
cn: Site-Object
ldapDisplayName: siteObject
attributeId: 1.2.840.113556.1.4.512
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: 3e10944c-c354-11d0-aff8-0000f80367c1
systemOnly: FALSE
searchFlags: 0
linkID: 46
```

```
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.324 Attribute siteObjectBL

This attribute specifies the list of distinguished names (DNs) for subnets which belong to this site.

```
cn: Site-Object-BL
ldapDisplayName: siteObjectBL
attributeId: 1.2.840.113556.1.4.513
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: 3e10944d-c354-11d0-aff8-0000f80367c1
systemOnly: TRUE
searchFlags: 0
linkID: 47
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_NOT_REPLICATED
```

2.325 Attribute siteServer

This attribute specifies the licensing master server for a given site.

```
cn: Site-Server
ldapDisplayName: siteServer
attributeId: 1.2.840.113556.1.4.494
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: 1be8f17c-a9ff-11d0-afe2-00c04fd930c9
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.326 Attribute sn

This attribute contains the family or last name for a user.

```
cn: Surname
ldapDisplayName: sn
attributeId: 2.5.4.4
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf967a41-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fANR | fATTINDEX
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
isMemberOfPartialAttributeSet: TRUE
```

2.327 Attribute sourceObjectGuid

ms-DS-Source-Object-Guid

```
cn: ms-DS-Source-Object-Guid
ldapDisplayName: sourceObjectGuid
attributeId: 1.2.840.113556.1.4.1885
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: 8f9e0bf5-0e35-4258-bc62-48e35ceaf21f
searchFlags: fATTINDEX
```

2.328 Attribute st

This attribute specifies the name of a user's state or province.

```
cn: State-Or-Province-Name
ldapDisplayName: st
attributeId: 2.5.4.8
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf967a39-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fCOPY
rangeLower: 1
rangeUpper: 128
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
             FLAG_ATTR_REQ_PARTIAL_SET_MEMBER
```

2.329 Attribute street

This attribute specifies the street address.

```
cn: Street-Address
ldapDisplayName: street
attributeId: 2.5.4.9
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf967a3a-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: fCOPY
rangeLower: 1
rangeUpper: 1024
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
             FLAG_ATTR_REQ_PARTIAL_SET_MEMBER
```

2.330 Attribute streetAddress

This attribute specifies the user's address.

```
cn: Address
ldapDisplayName: streetAddress
attributeId: 1.2.840.113556.1.2.256
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: f0f8ff84-1191-11d0-a060-00aa006c33ed
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 1024
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
```

2.331 Attribute structuralObjectClass

This constructed attribute stores a list of classes contained in a class hierarchy, including abstract classes. This list contains dynamically linked auxiliary classes.

```
cn: Structural-Object-Class
ldapDisplayName: structuralObjectClass
attributeId: 2.5.21.9
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: FALSE
schemaIdGuid: 3860949f-f6a8-4b38-9950-81ecb6bc2982
systemOnly: FALSE
searchFlags: 0
systemFlags: 20
```

2.332 Attribute subClassOf

The parent class of a class.

```
cn: Sub-Class-Of
ldapDisplayName: subClassOf
attributeId: 1.2.840.113556.1.2.21
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: TRUE
schemaIdGuid: bf967a3b-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: fPRESERVEONDELETE
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.333 Attribute subRefs

This attribute specifies a list of subordinate references of a naming context.

```
cn: Sub-Refs
```

```

ldapDisplayName: subRefs
attributeId: 1.2.840.113556.1.2.7
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: bf967a3c-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
  FLAG_ATTR_REQ_PARTIAL_SET_MEMBER | FLAG_ATTR_NOT_REPLICATED

```

2.334 Attribute subSchemaSubEntry

This attribute specifies the distinguished name (DN) for the location of the subschema object where a class or attribute is defined.

```

cn: SubSchemaSubEntry
ldapDisplayName: subSchemaSubEntry
attributeId: 2.5.18.10
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: FALSE
schemaIdGuid: 9a7ad94d-ca53-11d1-bbd0-0080c76670c0
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_IS_CONSTRUCTED

```

2.335 Attribute superiorDNSRoot

This system attribute is used for referrals generation.

```

cn: Superior-DNS-Root
ldapDisplayName: superiorDNSRoot
attributeId: 1.2.840.113556.1.4.532
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 5245801d-ca6a-11d0-afff-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

2.336 Attribute supplementalCredentials

This attribute specifies stored credentials for use in authenticating. The encrypted version of the user's password. This attribute is neither readable nor writable.

```

cn: Supplemental-Credentials
ldapDisplayName: supplementalCredentials
attributeId: 1.2.840.113556.1.4.125

```

```
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: bf967a3f-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.337 Attribute systemAuxiliaryClass

This attribute specifies a list of auxiliary classes that cannot be modified by the user.

```
cn: System-Auxiliary-Class
ldapDisplayName: systemAuxiliaryClass
attributeId: 1.2.840.113556.1.4.198
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: FALSE
schemaIdGuid: bf967a43-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.338 Attribute systemFlags

This attribute specifies an integer value that contains flags that define additional properties of the class.

```
cn: System-Flags
ldapDisplayName: systemFlags
attributeId: 1.2.840.113556.1.4.375
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: e0fa1e62-9b45-11d0-afdd-00c04fd930c9
systemOnly: TRUE
searchFlags: fPRESERVEONDELETE
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.339 Attribute systemMayContain

This attribute specifies the list of optional attributes for a class. The list of attributes can only be modified by the system.

```
cn: System-May-Contain
ldapDisplayName: systemMayContain
attributeId: 1.2.840.113556.1.4.196
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: FALSE
schemaIdGuid: bf967a44-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
```

```
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.340 Attribute systemMustContain

This attribute specifies the list of mandatory attributes for a class. These attributes must be specified when an instance of the class is created. The list of attributes can be modified only by the system.

```
cn: System-Must-Contain
ldapDisplayName: systemMustContain
attributeId: 1.2.840.113556.1.4.197
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: FALSE
schemaIdGuid: bf967a45-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.341 Attribute systemOnly

This attribute is a Boolean value that specifies whether only Active Directory can modify the class. System-only classes can be created or deleted only by the directory system agent.

```
cn: System-Only
ldapDisplayName: systemOnly
attributeId: 1.2.840.113556.1.4.170
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: bf967a46-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.342 Attribute systemPossSuperiors

This attribute specifies the list of classes that can contain this class. This list can only be modified by the system.

```
cn: System-Poss-Superiors
ldapDisplayName: systemPossSuperiors
attributeId: 1.2.840.113556.1.4.195
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: FALSE
schemaIdGuid: bf967a47-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
```


FLAG_ATTR_REQ_PARTIAL_SET_MEMBER

2.343 Attribute telephoneNumber

This attribute specifies the primary telephone number.

```
cn: Telephone-Number
ldapDisplayName: telephoneNumber
attributeId: 2.5.4.20
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf967a49-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 64
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.344 Attribute teletexTerminalIdentifier

This attribute specifies the Teletex terminal identifier, and optionally parameters, for a Teletex terminal associated with an object.

```
cn: Teletex-Terminal-Identifier
ldapDisplayName: teletexTerminalIdentifier
attributeId: 2.5.4.22
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: bf967a4a-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.345 Attribute telexNumber

This attribute specifies a list of alternate telex numbers.

```
cn: Telex-Number
ldapDisplayName: telexNumber
attributeId: 2.5.4.21
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: bf967a4b-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 32
```

```
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.346 Attribute thumbnailLogo

This attribute specifies a BLOB containing a logo for this object.

```
cn: Logo
ldapDisplayName: thumbnailLogo
attributeId: 2.16.840.1.113730.3.1.36
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: bf9679a9-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 32767
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.347 Attribute thumbnailPhoto

Picture

```
cn: Picture
ldapDisplayName: thumbnailPhoto
attributeId: 2.16.840.1.113730.3.1.35
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: 8d3bca50-1d7e-11d0-a081-00aa006c33ed
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 102400
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
```

2.348 Attribute title

This attribute contains the user's job title. This property is commonly used to indicate the formal job title, such as Senior Programmer, rather than occupational class, such as programmer. It is not typically used for suffix titles such as "Esq." or "DDS".

```
cn: Title
ldapDisplayName: title
attributeId: 2.5.4.12
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf967a55-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
```

```
rangeUpper: 64
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
```

2.349 Attribute tokenGroups

This computed attribute contains the list of SIDs due to a transitive group membership expansion operation on a given user or computer. Token groups cannot be retrieved if no global catalog is present to retrieve the transitive reverse memberships.

```
cn: Token-Groups
ldapDisplayName: tokenGroups
attributeId: 1.2.840.113556.1.4.1301
attributeSyntax: 2.5.5.17
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: b7c69e6d-2cc7-11d2-854e-00a0c983f608
systemOnly: FALSE
searchFlags: 0
attributeSecurityGuid: 037088f8-0ae1-11d2-b422-00a0c968f939
systemFlags: FLAG_SCHEMA_BASE_OBJECT | FLAG_ATTR_IS_CONSTRUCTED
```

2.350 Attribute tombstoneLifetime

This attribute specifies the number of days before a deleted object is removed from the directory services. This attribute assists in removing objects from replicated servers and in preventing restore operations from reintroducing a deleted object. This value is in the Directory Service object in the configuration NIC.

```
cn: Tombstone-Lifetime
ldapDisplayName: tombstoneLifetime
attributeId: 1.2.840.113556.1.2.54
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 16c3a860-1273-11d0-a060-00aa006c33ed
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.351 Attribute transportAddressAttribute

This attribute specifies the name of the address type for the transport.

```
cn: Transport-Address-Attribute
ldapDisplayName: transportAddressAttribute
attributeId: 1.2.840.113556.1.4.895
attributeSyntax: 2.5.5.2
omSyntax: 6
isSingleValued: TRUE
schemaIdGuid: c1dc867c-a261-11d1-b606-0000f80367c1
systemOnly: FALSE
searchFlags: 0
```

```
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.352 Attribute transportDLLName

This attribute specifies the name of the DLL that will manage a transport.

```
cn: Transport-DLL-Name
ldapDisplayName: transportDLLName
attributeId: 1.2.840.113556.1.4.789
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 26d97372-6070-11d1-a9c6-0000f80367c1
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 1024
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.353 Attribute transportType

This attribute specifies the distinguished name (DN) for a type of transport being used to connect sites together. This value can point to an IP or SMTP transport.

```
cn: Transport-Type
ldapDisplayName: transportType
attributeId: 1.2.840.113556.1.4.791
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: 26d97374-6070-11d1-a9c6-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.354 Attribute treatAsLeaf

This attribute defines a flag for display specifiers (see the [displaySpecifier](#) class in section 3). Display specifiers that have this attribute set to true force the related class to be displayed as a leaf class even if it has children.

```
cn: Treat-As-Leaf
ldapDisplayName: treatAsLeaf
attributeId: 1.2.840.113556.1.4.806
attributeSyntax: 2.5.5.8
omSyntax: 1
isSingleValued: TRUE
schemaIdGuid: 8fd044e3-771f-11d1-aeae-0000f80367c1
systemOnly: FALSE
```

2.355 Attribute trustParent

This attribute specifies the parent in the Kerberos trust hierarchy.

```
cn: Trust-Parent
ldapDisplayName: trustParent
attributeId: 1.2.840.113556.1.4.471
attributeSyntax: 2.5.5.1
omSyntax: 127
omObjectClass: 1.3.12.2.1011.28.0.714
isSingleValued: TRUE
schemaIdGuid: b000ea7a-a086-11d0-afdd-00c04fd930c9
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.356 Attribute uid

This attribute specifies the user ID.

```
cn: uid
ldapDisplayName: uid
attributeId: 0.9.2342.19200300.100.1.1
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 0bb0fca0-1e89-429f-901a-1413894d9f59
systemOnly: FALSE
searchFlags: fPRESERVEONDELETE
attributeSecurityGuid: 59ba2f42-79a2-11d0-9020-00c04fc2d3cf
showInAdvancedViewOnly: FALSE
```

2.357 Attribute unicodePwd

The password of the user in Windows NT one-way format (OWF). Windows 2000 uses the Windows NT OWF. This property is used only by the operating system.

Note The clear password cannot be derived back from the OWF form of the password.

```
cn: Unicode-Pwd
ldapDisplayName: unicodePwd
attributeId: 1.2.840.113556.1.4.90
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: TRUE
schemaIdGuid: bf9679e1-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.358 Attribute uPNSuffixes

This attribute specifies the list of User-Principal-Name suffixes for a domain.

```
cn: UPN-Suffixes
ldapDisplayName: uPNSuffixes
attributeId: 1.2.840.113556.1.4.890
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 032160bf-9824-11d1-aec0-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.359 Attribute url

This attribute specifies a list of alternate Web pages.

```
cn: WWW-Page-Other
ldapDisplayName: url
attributeId: 1.2.840.113556.1.4.749
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 9a9a0221-4a5b-11d1-a9c3-0000f80367c1
systemOnly: FALSE
searchFlags: 0
attributeSecurityGuid: e45795b3-9455-11d1-aebd-0000f80367c1
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.360 Attribute userCertificate

This attribute contains the DER-encoded X509v3 certificates issued to the user ([\[RFC3280\]](#)).

Note This property contains the public key certificates issued to this user by Microsoft Certificate Service.

```
cn: X509-Cert
ldapDisplayName: userCertificate
attributeId: 2.5.4.36
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: bf967a7f-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeUpper: 32768
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
isMemberOfPartialAttributeSet: TRUE
```

2.361 Attribute userParameters

This attribute specifies the user's parameters. This attribute points to a Unicode string that is set aside for use by applications. This string can be a null string, or it can have any number of characters before the terminating null character. Microsoft products use this member to store user data specific to the individual program.

```
cn: User-Parameters
ldapDisplayName: userParameters
attributeId: 1.2.840.113556.1.4.138
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf967a6d-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 0
rangeUpper: 32767
attributeSecurityGuid: 4c164200-20c0-11d0-a768-00aa006e0529
```

2.362 Attribute userPassword

This attribute specifies the user's password in UTF-8 format. This is a write-only attribute.

```
cn: User-Password
ldapDisplayName: userPassword
attributeId: 2.5.4.35
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: bf967a6e-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 128
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.363 Attribute userPKCS12

This attribute specifies PKCS #12 PFX PDU for exchange of personal identity information.

```
cn: userPKCS12
ldapDisplayName: userPKCS12
attributeId: 2.16.840.1.113730.3.1.216
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: 23998ab5-70f8-4007-a4c1-a84a38311f9a
systemOnly: FALSE
searchFlags: 0
showInAdvancedViewOnly: FALSE
```

2.364 Attribute userPrincipalName

This attribute contains the UPN that is an Internet-style logon name for a user, as specified in [\[RFC822\]](#). The UPN is shorter than the distinguished name (DN) and easier to remember.

By convention, this attribute should map to the user e-mail name. The value set for this attribute is equal to the length of the user's ID and the domain name. For more information, see [\[MS-ADTS\]](#).

```

cn: User-Principal-Name
ldapDisplayName: userPrincipalName
attributeId: 1.2.840.113556.1.4.656
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: 28630ebb-41d5-11d1-a9c1-0000f80367c1
systemOnly: FALSE
searchFlags: fATTINDEX
rangeUpper: 1024
attributeSecurityGuid: e48d0154-bcf8-11d1-8702-00c04fb96050
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
  FLAG_ATTR_REQ_PARTIAL_SET_MEMBER

```

2.365 Attribute userSMIMECertificate

This attribute specifies a certificate distribution object or tagged certificates.

```

cn: User-SMIME-Certificate
ldapDisplayName: userSMIMECertificate
attributeId: 2.16.840.1.113730.3.140
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: e16a9db2-403c-11d1-a9c0-0000f80367c1
systemOnly: FALSE
searchFlags: 0
rangeUpper: 32768
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
isMemberOfPartialAttributeSet: TRUE

```

2.366 Attribute uSNChanged

This attribute specifies an update sequence number (USN) value assigned by the local directory for the latest change, including creation.

```

cn: USN-Changed
ldapDisplayName: uSNChanged
attributeId: 1.2.840.113556.1.2.120
attributeSyntax: 2.5.5.16
omSyntax: 65
isSingleValued: TRUE
schemaIdGuid: bf967a6f-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: fPRESERVEONDELETE | fATTINDEX
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
  FLAG_ATTR_REQ_PARTIAL_SET_MEMBER | FLAG_ATTR_NOT_REPLICATED

```

2.367 Attribute uSNCreated

This attribute specifies a [USN-Changed](#) value assigned at object creation.


```
cn: USN-Created
ldapDisplayName: uSNCreated
attributeId: 1.2.840.113556.1.2.19
attributeSyntax: 2.5.5.16
omSyntax: 65
isSingleValued: TRUE
schemaIdGuid: bf967a70-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: fPRESERVEONDELETE | fATTINDEX
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
  FLAG_ATTR_REQ_PARTIAL_SET_MEMBER | FLAG_ATTR_NOT_REPLICATED
```

2.368 Attribute uNDSALastObjRemoved

This attribute contains the update sequence number (USN) for the last system object that was removed from a server.

```
cn: USN-DSA-Last-Obj-Removed
ldapDisplayName: uNDSALastObjRemoved
attributeId: 1.2.840.113556.1.2.267
attributeSyntax: 2.5.5.16
omSyntax: 65
isSingleValued: TRUE
schemaIdGuid: bf967a71-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.369 Attribute USNIntersite

This attribute specifies the USN for inter-site replication.

```
cn: USN-Intersite
ldapDisplayName: USNIntersite
attributeId: 1.2.840.113556.1.2.469
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: a8df7498-c5ea-11d1-bbcb-0080c76670c0
systemOnly: FALSE
searchFlags: fATTINDEX
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.370 Attribute uSNLastObjRem

This attribute contains the update sequence number (USN) for the last non-system object that was removed from a server.

```
cn: USN-Last-Obj-Rem
ldapDisplayName: uSNLastObjRem
attributeId: 1.2.840.113556.1.2.121
attributeSyntax: 2.5.5.16
```

```
omSyntax: 65
isSingleValued: TRUE
schemaIdGuid: bf967a73-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
  FLAG_ATTR_REQ_PARTIAL_SET_MEMBER | FLAG_ATTR_NOT_REPLICATED
```

2.371 Attribute uSNSource

This attribute specifies the value of the **USN-Changed** attribute of the object from the remote directory that replicated the change to the local server.

```
cn: USN-Source
ldapDisplayName: uSNSource
attributeId: 1.2.840.113556.1.4.896
attributeSyntax: 2.5.5.16
omSyntax: 65
isSingleValued: TRUE
schemaIdGuid: 167758ad-47f3-11d1-a9c3-0000f80367c1
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.372 Attribute validAccesses

This attribute specifies the type of access that is permitted with an extended right.

```
cn: Valid-Accesses
ldapDisplayName: validAccesses
attributeId: 1.2.840.113556.1.4.1356
attributeSyntax: 2.5.5.9
omSyntax: 2
isSingleValued: TRUE
schemaIdGuid: 4d2fa380-7f54-11d2-992a-0000f87a57d4
systemOnly: FALSE
searchFlags: 0
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.373 Attribute wbemPath

This attribute specifies references to objects in other ADSI namespaces.

```
cn: Wbem-Path
ldapDisplayName: wbemPath
attributeId: 1.2.840.113556.1.4.301
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: FALSE
schemaIdGuid: 244b2970-5abd-11d0-afd2-00c04fd930c9
systemOnly: FALSE
searchFlags: 0
```

```
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.374 Attribute wellKnownObjects

This attribute contains a list of well-known object containers by GUID and distinguished name. The well-known objects are system containers. This information is used to retrieve an object after it has been moved by using just the GUID and the domain name.

Whenever the object is moved, the system will automatically update the distinguished name portion of the Well-Known-Objects values that referred to the object. The NTDSAPI.h file contains the following definitions which can be used to retrieve an object (the GUIDs associated with these objects are contained in NTDSAPI.h):

- GUID_USERS_CONTAINER_W
- GUID_COMPUTERS_CONTAINER_W
- GUID_SYSTEMS_CONTAINER_W
- GUID_DOMAIN_CONTROLLERS_CONTAINER_W
- GUID_INFRASTRUCTURE_CONTAINER_W
- GUID_DELETED_OBJECTS_CONTAINER_W
- GUID_LOSTANDFOUND_CONTAINER_W
- GUID_FOREIGNSECURITYPRINCIPALS_CONTAINER_W
- GUID_PROGRAM_DATA_CONTAINER_W
- GUID_MICROSOFT_PROGRAM_DATA_CONTAINER_W
- GUID_NTDS_QUOTAS_CONTAINER_W

```
cn: Well-Known-Objects
ldapDisplayName: wellKnownObjects
attributeId: 1.2.840.113556.1.4.618
attributeSyntax: 2.5.5.7
omSyntax: 127
omObjectClass: 1.2.840.113556.1.1.1.11
isSingleValued: FALSE
schemaIdGuid: 05308983-7688-11d1-aded-00c04fd8d5cd
systemOnly: TRUE
searchFlags: 0
rangeLower: 16
rangeUpper: 16
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
  FLAG_ATTR_REQ_PARTIAL_SET_MEMBER
```

2.375 Attribute whenChanged

This attribute specifies the date when this object was last changed. This value is not replicated and exists in the global catalog.

```

cn: When-Changed
ldapDisplayName: whenChanged
attributeId: 1.2.840.113556.1.2.3
attributeSyntax: 2.5.5.11
omSyntax: 24
isSingleValued: TRUE
schemaIdGuid: bf967a77-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
  FLAG_ATTR_REQ_PARTIAL_SET_MEMBER | FLAG_ATTR_NOT_REPLICATED

```

2.376 Attribute whenCreated

This attribute specifies the date when this object was created. This value is replicated and is in the global catalog.

```

cn: When-Created
ldapDisplayName: whenCreated
attributeId: 1.2.840.113556.1.2.2
attributeSyntax: 2.5.5.11
omSyntax: 24
isSingleValued: TRUE
schemaIdGuid: bf967a78-0de6-11d0-a285-00aa003049e2
systemOnly: TRUE
searchFlags: 0
isMemberOfPartialAttributeSet: TRUE
systemFlags: FLAG_SCHEMA_BASE_OBJECT |
  FLAG_ATTR_REQ_PARTIAL_SET_MEMBER

```

2.377 Attribute wWWHomePage

This attribute specifies the primary Web page.

```

cn: WWW-Home-Page
ldapDisplayName: wWWHomePage
attributeId: 1.2.840.113556.1.2.464
attributeSyntax: 2.5.5.12
omSyntax: 64
isSingleValued: TRUE
schemaIdGuid: bf967a7a-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 2048
attributeSecurityGuid: e45795b3-9455-11d1-aebd-0000f80367c1
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

2.378 Attribute x121Address

This attribute specifies the X.121 address for an object, as specified in [\[X121\]](#).

```
cn: X121-Address
ldapDisplayName: x121Address
attributeId: 2.5.4.24
attributeSyntax: 2.5.5.6
omSyntax: 18
isSingleValued: FALSE
schemaIdGuid: bf967a7b-0de6-11d0-a285-00aa003049e2
systemOnly: FALSE
searchFlags: 0
rangeLower: 1
rangeUpper: 15
attributeSecurityGuid: 77b5b886-944a-11d1-aebd-0000f80367c1
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

2.379 Attribute x500uniqueIdentifier

This attribute is used to distinguish between objects when a distinguished name (DN) has been reused.

Note This is a different attribute type from both the "uid" and "uniqueIdentifier" types.

```
cn: x500uniqueIdentifier
ldapDisplayName: x500uniqueIdentifier
attributeId: 2.5.4.45
attributeSyntax: 2.5.5.10
omSyntax: 4
isSingleValued: FALSE
schemaIdGuid: d07da11f-8a3d-42b6-b0aa-76c962be719a
systemOnly: FALSE
searchFlags: 0
showInAdvancedViewOnly: FALSE
```

3 Classes

The following sections specify the classes in the Active Directory Lightweight Directory Services schema.

Note Lines of text in the class definitions that are excessively long have been "folded" in accordance with [\[RFC2849\]](#) Note 2.

3.1 Class applicationSettings

This is the base class for server-specific application settings.

```
cn: Application-Settings
ldapDisplayName: applicationSettings
governsId: 1.2.840.113556.1.5.7000.49
objectClassCategory: 2
rdnAttId: cn
subClassOf: top
systemMayContain: msDS-Settings
systemPossSuperiors: server
schemaIdGuid:f780acc1-56f0-11d1-a9c6-0000f80367c1
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Application-Settings,CN=Schema,
  CN=Configuration,<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

3.2 Class applicationSiteSettings

This class specifies the container holding all site-specific settings.

```
cn: Application-Site-Settings
ldapDisplayName: applicationSiteSettings
governsId: 1.2.840.113556.1.5.68
objectClassCategory: 2
rdnAttId: cn
subClassOf: top
systemPossSuperiors: site
schemaIdGuid:19195a5c-6da0-11d0-afd3-00c04fd930c9
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Application-Site-Settings,CN=Schema,
  CN=Configuration,<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

3.3 Class attributeSchema

This class defines an attribute object in the schema.

```
cn: Attribute-Schema
ldapDisplayName: attributeSchema
governsId: 1.2.840.113556.1.3.14
objectClassCategory: 1
```

```

rdnAttId: cn
subClassOf: top
systemMustContain: schemaIDGUID, oMSyntax, LDAPDisplayName,
isSingleValued, cn, attributeSyntax, attributeID
systemMayContain: systemOnly, searchFlags, schemaFlagsEx, rangeUpper,
rangeLower, oMObjectClass, msDs-Schema-Extensions, msDS-IntId,
linkID, isMemberOfPartialAttributeSet, isEphemeral, isDefunct,
extendedCharsAllowed, classDisplayName, attributeSecurityGUID
systemPossSuperiors: dMD
schemaIdGuid:bf967a80-0de6-11d0-a285-00aa003049e2
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Attribute-Schema,CN=Schema,
CN=Configuration,<RootDomainDN>
systemFlags: FLAG_ATTR_NOT_REPLICATED34217744

```

3.4 Class classSchema

This class defines a class object in the schema.

```

cn: Class-Schema
ldapDisplayName: classSchema
governsId: 1.2.840.113556.1.3.13
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMustContain: subClassOf, schemaIDGUID, objectClassCategory,
governsID, defaultObjectCategory, cn
systemMayContain: systemPossSuperiors, systemOnly, systemMustContain,
systemMayContain, systemAuxiliaryClass, schemaFlagsEx, rDNAttID,
possSuperiors, mustContain, msDs-Schema-Extensions, msDS-IntId,
mayContain, LDAPDisplayName, isDefunct, defaultSecurityDescriptor,
defaultHidingValue, classDisplayName, auxiliaryClass
systemPossSuperiors: dMD
schemaIdGuid:bf967a83-0de6-11d0-a285-00aa003049e2
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Class-Schema,CN=Schema,CN=Configuration,
<RootDomainDN>
systemFlags: FLAG_ATTR_NOT_REPLICATED34217744

```

3.5 Class configuration

This class is a container that holds the configuration information for a domain.

```

cn: Configuration
ldapDisplayName: configuration
governsId: 1.2.840.113556.1.5.12
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMustContain: cn
systemMayContain: msDS-ReplAuthenticationMode

```

```

systemPossSuperiors: domainDNS
schemaIdGuid:bf967a87-0de6-11d0-a285-00aa003049e2
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: TRUE
defaultObjectCategory: CN=Configuration,CN=Schema,CN=Configuration,
<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.6 Class container

This class is used to hold other classes.

```

cn: Container
ldapDisplayName: container
governsId: 1.2.840.113556.1.3.23
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMustContain: cn
systemMayContain: schemaVersion
possSuperiors: msDS-AzScope, msDS-AzApplication, msDS-AzAdminManager
systemPossSuperiors: subnet, server, nTDSservice, domainDNS,
organization, configuration, container, organizationalUnit
schemaIdGuid:bf967a8b-0de6-11d0-a285-00aa003049e2
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Container,CN=Schema,CN=Configuration,
<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.7 Class controlAccessRight

Identifies an extended right that can be granted or revoked via an access control list (ACL).

```

cn: Control-Access-Right
ldapDisplayName: controlAccessRight
governsId: 1.2.840.113556.1.5.77
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMayContain: validAccesses, rightsGuid, localizationDisplayId,
appliesTo
systemPossSuperiors: container
schemaIdGuid:8297931e-86d3-11d0-afda-00c04fd930c9
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Control-Access-Right,CN=Schema,
CN=Configuration,<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```


3.8 Class country

This class specifies the country/region in the address of the user. This is the full name.

```
cn: Country
ldapDisplayName: country
governsId: 2.5.6.2
objectClassCategory: 0
rdnAttId: c
subClassOf: top
systemMustContain: c
systemMayContain: co, searchGuide
systemPossSuperiors: domainDNS, organization
schemaIdGuid:bf967a8c-0de6-11d0-a285-00aa003049e2
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Country,CN=Schema,CN=Configuration,
<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

3.9 Class crossRef

This class holds knowledge information about all directory service (DS) naming contexts and all external directories to which referrals can be generated.

```
cn: Cross-Ref
ldapDisplayName: crossRef
governsId: 1.2.840.113556.1.3.11
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMustContain: nCName, cn
systemMayContain: trustParent, superiorDNSRoot, rootTrust,
nETBIOName, msDS-Other-Settings, Enabled, msDS-SDReferenceDomain,
msDS-Replication-Notify-Subsequent-DSA-Delay,
msDS-Replication-Notify-First-DSA-Delay, msDS-NC-Replica-Locations,
msDS-DnsRootAlias, msDS-Behavior-Version, dnsRoot
systemPossSuperiors: crossRefContainer
schemaIdGuid:bf967a8d-0de6-11d0-a285-00aa003049e2
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Cross-Ref,CN=Schema,CN=Configuration,
<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

3.10 Class crossRefContainer

This class holds cross-reference objects for all naming contexts.

```
cn: Cross-Ref-Container
ldapDisplayName: crossRefContainer
governsId: 1.2.840.113556.1.5.7000.53
```

```

objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMayContain: uPNSuffixes, msDS-UpdateScript,
  msDS-ExecuteScriptPassword, msDS-Behavior-Version
systemPossSuperiors: configuration
schemaIdGuid:ef9e60e0-56f7-11d1-a9c6-0000f80367c1
defaultSecurityDescriptor: D:S:
defaultHidingValue: FALSE
systemOnly: TRUE
defaultObjectCategory: CN=Cross-Ref-Container,CN=Schema,
  CN=Configuration,<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.11 Class displaySpecifier

This class describes the context menus and property pages to be used with an object in the directory.

```

cn: Display-Specifier
ldapDisplayName: displaySpecifier
governsId: 1.2.840.113556.1.5.84
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMayContain: treatAsLeaf, shellPropertyPages, shellContextMenu,
  scopeFlags, queryFilter, iconPath, extraColumns, creationWizard,
  createWizardExt, createDialog, contextMenu, classDisplayName,
  attributeDisplayNames, adminPropertyPages,
  adminMultiselectPropertyPages, adminContextMenu
systemPossSuperiors: container
schemaIdGuid:e0fale8a-9b45-11d0-afdd-00c04fd930c9
systemOnly: FALSE
defaultObjectCategory: CN=Display-Specifier,CN=Schema,
  CN=Configuration,<RootDomainDN>

```

3.12 Class dMD

This class specifies the Directory Management Domain. In Active Directory, this is the class that holds the schema.

```

cn: DMD
ldapDisplayName: dMD
governsId: 1.2.840.113556.1.3.9
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMustContain: cn
systemMayContain: schemaUpdate, schemaInfo, prefixMap,
  msDs-Schema-Extensions, msDS-IntId, dmdName
systemPossSuperiors: configuration
schemaIdGuid:bf967a8f-0de6-11d0-a285-00aa003049e2
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE

```

```
systemOnly: TRUE
defaultObjectCategory: CN=DMD,CN=Schema,CN=Configuration,
<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

3.13 Class domain

This class contains information about a domain.

```
cn: Domain
ldapDisplayName: domain
governsId: 1.2.840.113556.1.5.66
objectClassCategory: 2
rdnAttId: dc
subClassOf: top
systemMustContain: dc
systemPossSuperiors: domain, organization
schemaIdGuid:19195a5a-6da0-11d0-afd3-00c04fd930c9
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Domain-DNS,CN=Schema,CN=Configuration,
<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

3.14 Class domainDNS

This class specifies a Windows NT domain with DNS-based (DC=) naming.

```
cn: Domain-DNS
ldapDisplayName: domainDNS
governsId: 1.2.840.113556.1.5.67
objectClassCategory: 1
rdnAttId: dc
subClassOf: domain
systemMayContain: msDS-Behavior-Version, msDS-AllowedDNSSuffixes,
managedBy
systemPossSuperiors: domainDNS
schemaIdGuid:19195a5b-6da0-11d0-afd3-00c04fd930c9
defaultSecurityDescriptor: D:S:
defaultHidingValue: FALSE
systemOnly: FALSE
defaultObjectCategory: CN=Domain-DNS,CN=Schema,CN=Configuration,
<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

3.15 Class dSUISettings

This class is used to store configuration settings used by the Active Directory Users and Computers snap-in.

```
cn: DS-UI-Settings
ldapDisplayName: dSUISettings
governsId: 1.2.840.113556.1.5.183
```

```

objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMayContain: msDS-Security-Group-Extra-Classes,
  msDS-Non-Security-Group-Extra-Classes, msDS-FilterContainers,
  dSUIShellMaximum, dSUIAdminNotification, dSUIAdminMaximum
systemPossSuperiors: container
schemaIdGuid:09b10f14-6f93-11d2-9905-0000f87a57d4
systemOnly: FALSE
defaultObjectCategory: CN=DS-UI-Settings,CN=Schema,CN=Configuration,
  <RootDomainDN>

```

3.16 Class dynamicObject

If present in an entry, this class indicates that this entry has a limited lifetime and may disappear automatically when its time-to-live has reached 0. If the client has not supplied a value for the entryTtl attribute, the server will provide one.

```

cn: Dynamic-Object
ldapDisplayName: dynamicObject
governsId: 1.3.6.1.4.1.1466.101.119.2
objectClassCategory: 3
rdnAttId: cn
subClassOf: top
systemMayContain: msDS-Entry-Time-To-Die, entryTTL
schemaIdGuid:66d51249-3355-4c1f-b24e-81f252aca23b
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Dynamic-Object,CN=Schema,CN=Configuration,
  <RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.17 Class foreignSecurityPrincipal

This class specifies the security principal from an external source.

```

cn: Foreign-Security-Principal
ldapDisplayName: foreignSecurityPrincipal
governsId: 1.2.840.113556.1.5.76
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMustContain: objectSid
systemPossSuperiors: container
schemaIdGuid:89e31c12-8530-11d0-afda-00c04fd930c9
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Foreign-Security-Principal,CN=Schema,
  CN=Configuration,<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.18 Class group

This class stores a list of user names. Used to apply security principals on resources.

```
cn: Group
ldapDisplayName: group
governsId: 1.2.840.113556.1.5.8
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemAuxiliaryClass: securityPrincipal
systemMustContain: groupType
mayContain: msDS-AzGenericData, msDS-AzObjectGuid,
  msDS-AzApplicationData, msDS-AzLastImportedBizRulePath,
  msDS-AzBizRuleLanguage, msDS-AzBizRule, msDS-AzLDAPQuery
systemMayContain: msDS-NonMembers, primaryGroupToken, member,
  managedBy, desktopProfile
possSuperiors: msDS-AzScope, msDS-AzApplication, msDS-AzAdminManager
systemPossSuperiors: container, organizationalUnit, domainDNS
schemaIdGuid:bf967a9c-0de6-11d0-a285-00aa003049e2
defaultSecurityDescriptor: D:S:
defaultHidingValue: FALSE
systemOnly: FALSE
defaultObjectCategory: CN=Group,CN=Schema,CN=Configuration,
  <RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

3.19 Class groupOfNames

Group-Of-Names

```
cn: Group-Of-Names
ldapDisplayName: groupOfNames
governsId: 2.5.6.9
objectClassCategory: 0
rdnAttId: cn
subClassOf: top
systemMustContain: cn
systemMayContain: member, businessCategory, o, ou, owner, seeAlso
systemPossSuperiors: container, organization, locality,
  organizationalUnit
schemaIdGuid:bf967a9d-0de6-11d0-a285-00aa003049e2
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Group-Of-Names,CN=Schema,CN=Configuration,
  <RootDomainDN>
```

3.20 Class inetOrgPerson

This class represents people who are associated with an organization in some way.

```
cn: inetOrgPerson
ldapDisplayName: inetOrgPerson
governsId: 2.16.840.1.113730.3.2.2
```

```

objectClassCategory: 1
rdnAttId: cn
subClassOf: user
mayContain: audio, businessCategory, carLicense, departmentNumber,
displayName, employeeNumber, employeeType, givenName, homePhone,
homePostalAddress, initials, jpegPhoto, labeledURI, mail, manager,
mobile, o, pager, photo, preferredLanguage, roomNumber, secretary,
uid, userCertificate, userPKCS12, userSMIMECertificate,
x500uniqueIdentifier
possSuperiors: container, organizationalUnit, domainDNS
schemaIdGuid: 4828cc14-1437-45bc-9b07-ad6f015e5f28
defaultSecurityDescriptor:
  D: (OA;;CR;ab721a53-1e2f-11d0-9819-00aa0040529b;;PS)S:
showInAdvancedViewOnly: FALSE
defaultHidingValue: FALSE
systemOnly: FALSE
defaultObjectCategory: CN=Person,CN=Schema,CN=Configuration,
<RootDomainDN>

```

3.21 Class interSiteTransport

This class specifies an optional attribute of [nTDSConnection](#) objects. If present, holds the DN of an interSiteTransport object in the CN=Inter-Site Transports,CN=Sites,CN=Configuration,... container.

```

cn: Inter-Site-Transport
ldapDisplayName: interSiteTransport
governsId: 1.2.840.113556.1.5.141
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMustContain: transportDLLName, transportAddressAttribute
systemMayContain: replInterval, options
systemPossSuperiors: interSiteTransportContainer
schemaIdGuid: 26d97376-6070-11d1-a9c6-0000f80367c1
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Inter-Site-Transport,CN=Schema,
  CN=Configuration,<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.22 Class interSiteTransportContainer

This class holds Inter-Site-Transport objects.

```

cn: Inter-Site-Transport-Container
ldapDisplayName: interSiteTransportContainer
governsId: 1.2.840.113556.1.5.140
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemPossSuperiors: sitesContainer
schemaIdGuid: 26d97375-6070-11d1-a9c6-0000f80367c1
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE

```

```
systemOnly: FALSE
defaultObjectCategory: CN=Inter-Site-Transport-Container,CN=Schema,
  CN=Configuration,<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

3.23 Class leaf

This class is the base class for leaf objects.

```
cn: Leaf
ldapDisplayName: leaf
governsId: 1.2.840.113556.1.5.20
objectClassCategory: 2
rdnAttId: cn
subClassOf: top
schemaIdGuid:bf967a9e-0de6-11d0-a285-00aa003049e2
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Leaf,CN=Schema,CN=Configuration,
  <RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

3.24 Class locality

This class contains a locality, such as a street address, city, and state.

```
cn: Locality
ldapDisplayName: locality
governsId: 2.5.6.3
objectClassCategory: 1
rdnAttId: 1
subClassOf: top
systemMustContain: 1
systemMayContain: street, st, seeAlso, searchGuide
systemPossSuperiors: domainDNS, country, organizationalUnit,
  organization, locality
schemaIdGuid:bf967aa0-0de6-11d0-a285-00aa003049e2
defaultSecurityDescriptor: D:S:
defaultHidingValue: FALSE
systemOnly: FALSE
defaultObjectCategory: CN=Locality,CN=Schema,CN=Configuration,
  <RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

3.25 Class lostAndFound

This class is a special container for orphaned objects.

```
cn: Lost-And-Found
ldapDisplayName: lostAndFound
governsId: 1.2.840.113556.1.5.139
objectClassCategory: 1
```

```

rdnAttId: cn
subClassOf: top
systemMayContain: moveTreeState
systemPossSuperiors: configuration, domainDNS, dMD
schemaIdGuid: 52ab8671-5709-11d1-a9c6-0000f80367c1
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Lost-And-Found, CN=Schema,
  CN=Configuration, <RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.26 Class msDS-AzAdminManager

This class specifies the root of Authorization Policy store instance.

```

cn: ms-DS-Az-Admin-Manager
ldapDisplayName: msDS-AzAdminManager
governsId: 1.2.840.113556.1.5.234
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
mayContain: msDS-AzGenericData, msDS-AzObjectGuid
systemMayContain: description, msDS-AzMinorVersion,
  msDS-AzMajorVersion, msDS-AzDomainTimeout,
  msDS-AzScriptEngineCacheMax, msDS-AzScriptTimeout,
  msDS-AzGenerateAudits, msDS-AzApplicationData
systemPossSuperiors: container, organizationalUnit, domainDNS
schemaIdGuid: cfee1051-5f28-4bae-a863-5d0cc18a8ed1
defaultSecurityDescriptor: D: (A;;RPWPCRCCDCLCLORCWOWDSDDTSW;;;DA)
  (A;;RPWPCRCCDCLCLORCWOWDSDDTSW;;;SY) (A;;RPLCLORC;;;AU)
  (A;;RPWPCRCCDCLCLORCWOWDSDDTSW;;;CO)
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=ms-DS-Az-Admin-Manager, CN=Schema,
  CN=Configuration, <RootDomainDN>

```

3.27 Class msDS-AzApplication

This class defines an installed instance of an application bound to a particular policy store.

```

cn: ms-DS-Az-Application
ldapDisplayName: msDS-AzApplication
governsId: 1.2.840.113556.1.5.235
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
mayContain: msDS-AzGenericData, msDS-AzObjectGuid
systemMayContain: description, msDS-AzApplicationName,
  msDS-AzClassId, msDS-AzApplicationVersion, msDS-AzGenerateAudits,
  msDS-AzApplicationData
systemPossSuperiors: msDS-AzAdminManager
schemaIdGuid: ddf8de9b-cba5-4e12-842e-28d8b66f75ec
defaultSecurityDescriptor: D: (A;;RPWPCRCCDCLCLORCWOWDSDDTSW;;;DA)
  (A;;RPWPCRCCDCLCLORCWOWDSDDTSW;;;SY) (A;;RPLCLORC;;;AU)

```



```
(A;;RPWPCRCDCCLCLORCWOWDSDDTSW;;;CO)
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=ms-DS-Az-Application,CN=Schema,
CN=Configuration,<RootDomainDN>
```

3.28 Class msDS-AzOperation

This class describes a particular operation supported by an application.

```
cn: ms-DS-Az-Operation
ldapDisplayName: msDS-AzOperation
governsId: 1.2.840.113556.1.5.236
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMustContain: msDS-AzOperationID
mayContain: msDS-AzGenericData, msDS-AzObjectGuid
systemMayContain: description, msDS-AzApplicationData
systemPossSuperiors: container, msDS-AzApplication
schemaIdGuid: 860abe37-9a9b-4fa4-b3d2-b8ace5df9ec5
defaultSecurityDescriptor: D: (A;;RPWPCRCDCCLCLORCWOWDSDDTSW;;;DA)
(A;;RPWPCRCDCCLCLORCWOWDSDDTSW;;;SY) (A;;RPLCLORC;;;AU)
(A;;RPWPCRCDCCLCLORCWOWDSDDTSW;;;CO)
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=ms-DS-Az-Operation,CN=Schema,
CN=Configuration,<RootDomainDN>
```

3.29 Class msDS-AzRole

This class defines a set of operations that can be performed by a particular set of users within a particular scope.

```
cn: ms-DS-Az-Role
ldapDisplayName: msDS-AzRole
governsId: 1.2.840.113556.1.5.239
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
mayContain: msDS-AzGenericData, msDS-AzObjectGuid
systemMayContain: description, msDS-MembersForAzRole,
msDS-OperationsForAzRole, msDS-TasksForAzRole, msDS-AzApplicationData
systemPossSuperiors: container, msDS-AzApplication, msDS-AzScope
schemaIdGuid: 8213eac9-9d55-44dc-925c-e9a52b927644
defaultSecurityDescriptor: D: (A;;RPWPCRCDCCLCLORCWOWDSDDTSW;;;DA)
(A;;RPWPCRCDCCLCLORCWOWDSDDTSW;;;SY) (A;;RPLCLORC;;;AU)
(A;;RPWPCRCDCCLCLORCWOWDSDDTSW;;;CO)
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=ms-DS-Az-Role,CN=Schema,CN=Configuration,
<RootDomainDN>
```

3.30 Class msDS-AzScope

This class describes a set of objects managed by an application.

```
cn: ms-DS-Az-Scope
ldapDisplayName: msDS-AzScope
governsId: 1.2.840.113556.1.5.237
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMustContain: msDS-AzScopeName
mayContain: msDS-AzGenericData, msDS-AzObjectGuid
systemMayContain: description, msDS-AzApplicationData
systemPossSuperiors: msDS-AzApplication
schemaIdGuid: 4feae054-ce55-47bb-860e-5b12063a51de
defaultSecurityDescriptor: D:(A;;RPWPCRCDCCLCLORCWOWDSDDTSW;;;DA)
(A;;RPWPCRCDCCLCLORCWOWDSDDTSW;;;SY)(A;;RPLCLORC;;;AU)
(A;;RPWPCRCDCCLCLORCWOWDSDDTSW;;;CO)
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=ms-DS-Az-Scope,CN=Schema,CN=Configuration,
<RootDomainDN>
```

3.31 Class msDS-AzTask

This class describes a set of operations.

```
cn: ms-DS-Az-Task
ldapDisplayName: msDS-AzTask
governsId: 1.2.840.113556.1.5.238
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
mayContain: msDS-AzGenericData, msDS-AzObjectGuid
systemMayContain: description, msDS-AzBizRule,
msDS-AzBizRuleLanguage, msDS-AzLastImportedBizRulePath,
msDS-AzTaskIsRoleDefinition, msDS-AzApplicationData,
msDS-OperationsForAzTask, msDS-TasksForAzTask
systemPossSuperiors: container, msDS-AzApplication, msDS-AzScope
schemaIdGuid: led3a473-9b1b-418a-bfa0-3a37b95a5306
defaultSecurityDescriptor: D:(A;;RPWPCRCDCCLCLORCWOWDSDDTSW;;;DA)
(A;;RPWPCRCDCCLCLORCWOWDSDDTSW;;;SY)(A;;RPLCLORC;;;AU)
(A;;RPWPCRCDCCLCLORCWOWDSDDTSW;;;CO)
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=ms-DS-Az-Task,CN=Schema,CN=Configuration,
<RootDomainDN>
```

3.32 Class msDS-BindableObject

This class specifies an auxiliary class to represent a bindable object. Any user-defined class that represents an entity that can be used to bind to the directory (that is, a user) should include this auxiliary class.

```

cn: ms-DS-Bindable-Object
ldapDisplayName: msDS-BindableObject
governsId: 1.2.840.113556.1.5.244
objectClassCategory: 3
rdnAttId: cn
subClassOf: securityPrincipal
systemMayContain: lastLogonTimestamp, accountExpires,
  msDS-User-Account-Control-Computed, ms-DS-UserAccountAutoLocked,
  msDS-UserPasswordExpired, ms-DS-UserEncryptedTextPasswordAllowed,
  ms-DS-UserPasswordNotRequired, msDS-UserAccountDisabled,
  msDS-UserDontExpirePassword, ntPwdHistory, lockoutTime, badPwdCount,
  badPasswordTime, pwdLastSet, unicodePwd
schemaIdGuid:89f4a69f-4416-6b49-821d-6e3c4a0ff802
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=ms-DS-Bindable-Object,CN=Schema,
  CN=Configuration,<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.33 Class msDS-BindProxy

This class specifies an auxiliary class to represent a bind proxy in AD/LDS. A bind proxy references a Windows security principal via its [objectSid](#) attribute. When a user performs a simple bind against a bind-proxy object, the bind is redirected to the corresponding Windows principal.

```

cn: ms-DS-Bind-Proxy
ldapDisplayName: msDS-BindProxy
governsId: 1.2.840.113556.1.5.245
objectClassCategory: 3
rdnAttId: cn
subClassOf: top
systemMustContain: objectSid
systemMayContain: msDS-PrincipalName
schemaIdGuid:717532ab-66e9-684d-a62b-8af1e3985e2f
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=ms-DS-Bind-Proxy,CN=Schema,
  CN=Configuration,<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.34 Class msDS-QuotaContainer

This class specifies a special container that holds all quota specifications for the directory database.

```

cn: ms-DS-Quota-Container
ldapDisplayName: msDS-QuotaContainer
governsId: 1.2.840.113556.1.5.242
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMustContain: cn
systemMayContain: msDS-TopQuotaUsage, msDS-QuotaUsed,
  msDS-QuotaEffective, msDS-TombstoneQuotaFactor, msDS-DefaultQuota
systemPossSuperiors: configuration, domainDNS

```

```

schemaIdGuid:da83fc4f-076f-4aea-b4dc-8f4dab9b5993
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=ms-DS-Quota-Container,CN=Schema,
  CN=Configuration,<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.35 Class msDS-QuotaControl

This class is used to represent quota specifications for the directory database.

```

cn: ms-DS-Quota-Control
ldapDisplayName: msDS-QuotaControl
governsId: 1.2.840.113556.1.5.243
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMustContain: msDS-QuotaAmount, msDS-QuotaTrustee, cn
systemPossSuperiors: msDS-QuotaContainer
schemaIdGuid:de91fc26-bd02-4b52-ae26-795999e96fc7
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=ms-DS-Quota-Control,CN=Schema,
  CN=Configuration,<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.36 Class msDS-ServiceConnectionPointPublicationService

This class stores configuration options for the SCP publication service in AD/LDS.

```

cn: ms-DS-Service-Connection-Point-Publication-Service
ldapDisplayName: msDS-ServiceConnectionPointPublicationService
governsId: 1.2.840.113556.1.5.247
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMayContain: Enabled, msDS-SCPCContainer,
  msDS-DisableForInstances, keywords
systemPossSuperiors: nTDSservice
schemaIdGuid:d33f5da6-b009-7e48-8268-b2305529e933
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: TRUE
defaultObjectCategory:
  CN=ms-DS-Service-Connection-Point-Publication-Service,CN=Schema,
  CN=Configuration,<RootDomainDN>

```

3.37 Class nTDSConnection

This class specifies a connection from a remote domain controller (DC).

```

cn: NTDS-Connection
ldapDisplayName: nTDSConnection
governsId: 1.2.840.113556.1.5.71
objectClassCategory: 1
rdnAttId: cn
subClassOf: leaf
systemMustContain: options, fromServer, enabledConnection
systemMayContain: transportType, schedule, mS-DS-ReplicatesNCREason,
generatedConnection
systemPossSuperiors: nTDSDSA
schemaIdGuid:19195a60-6da0-11d0-afd3-00c04fd930c9
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=NTDS-Connection,CN=Schema,CN=Configuration,
<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.38 Class nTDSDSA

This class represents the Active Directory DSA process on the server.

```

cn: NTDS-DSA
ldapDisplayName: nTDSDSA
governsId: 1.2.840.113556.1.5.7000.47
objectClassCategory: 1
rdnAttId: cn
subClassOf: applicationSettings
systemMayContain: msDS-DefaultNamingContext, serverReference,
msDS-RetiredReplNCSignatures, retiredReplDSASignatures,
queryPolicyObject, options, networkAddress, msDS-ServiceAccount,
msDS-ServiceAccountDNSDomain, msDS-PortSSL, msDS-PortLDAP,
msDS-ReplicationEpoch, msDS-HasInstantiatedNCs, msDS-hasMasterNCs,
msDS-HasDomainNCs, msDS-Behavior-Version, managedBy,
lastBackupRestorationTime, invocationId, hasPartialReplicaNCs,
hasMasterNCs, dMDLocation
systemPossSuperiors: organization, server
schemaIdGuid:f0f8ffab-1191-11d0-a060-00aa006c33ed
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: TRUE
defaultObjectCategory: CN=NTDS-DSA,CN=Schema,CN=Configuration,
<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.39 Class nTDSservice

This class is used for an NTDS services object, which contains information about the configuration of the directory service forest. This object is kept in the CN=Directory Service,CN=Windows NT,CN=Services,CN=Configuration,... container.

```

cn: NTDS-Service
ldapDisplayName: nTDSservice
governsId: 1.2.840.113556.1.5.72

```

```

objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMayContain: tombstoneLifetime, replTopologyStayOfExecution,
  msDS-Other-Settings, garbageCollPeriod, dsHeuristics
systemPossSuperiors: container
schemaIdGuid:19195a5f-6da0-11d0-afd3-00c04fd930c9
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=NTDS-Service,CN=Schema,CN=Configuration,
  <RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.40 Class nTDSiteSettings

This class specifies a container for holding all Active Directory site-specific settings.

```

cn: NTDS-Site-Settings
ldapDisplayName: nTDSiteSettings
governsId: 1.2.840.113556.1.5.69
objectClassCategory: 1
rdnAttId: cn
subClassOf: applicationSiteSettings
systemMayContain: schedule, queryPolicyObject, options,
  msDS-Preferred-GC-Site, managedBy, interSiteTopologyRenew,
  interSiteTopologyGenerator, interSiteTopologyFailover
systemPossSuperiors: site
schemaIdGuid:19195a5d-6da0-11d0-afd3-00c04fd930c9
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=NTDS-Site-Settings,CN=Schema,
  CN=Configuration,<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.41 Class organizationalPerson

This class is used for objects that contain organizational information about a user, such as the employee number, department, manager, title, and office address.

```

cn: Organizational-Person
ldapDisplayName: organizationalPerson
governsId: 2.5.6.7
objectClassCategory: 0
rdnAttId: cn
subClassOf: person
mayContain: homePostalAddress, houseIdentifier
systemMayContain: streetAddress, assistant, company, countryCode,
  c, department, destinationIndicator, division, mail, employeeID,
  facsimileTelephoneNumber, generationQualifier, givenName, initials,
  internationalISDNNumber, l, thumbnailLogo, manager, o, ou,
  middleName, personalTitle, otherFacsimileTelephoneNumber, homePhone,
  otherHomePhone, otherIpPhone, ipPhone,
  primaryInternationalISDNNumber, otherMobile, mobile, otherTelephone,

```

```

otherPager, pager, physicalDeliveryOfficeName, thumbnailPhoto,
postOfficeBox, postalAddress, postalCode, preferredDeliveryMethod,
registeredAddress, st, street, teletexTerminalIdentifier,
telexNumber, primaryTelexNumber, co, title, comment, x121Address
systemPossSuperiors: container, organization, organizationalUnit
schemaIdGuid:bf967aa4-0de6-11d0-a285-00aa003049e2
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Person,CN=Schema,CN=Configuration,
<RootDomainDN>

```

3.42 Class organization

This class stores information about a company or organization.

```

cn: Organization
ldapDisplayName: organization
governsId: 2.5.6.4
objectClassCategory: 1
rdnAttId: o
subClassOf: top
systemMustContain: o
systemMayContain: x121Address, userPassword, telexNumber,
teletexTerminalIdentifier, telephoneNumber, street, st, seeAlso,
searchGuide, registeredAddress, preferredDeliveryMethod, postalCode,
postalAddress, postOfficeBox, physicalDeliveryOfficeName, l,
internationalISDNNumber, facsimileTelephoneNumber,
destinationIndicator, businessCategory
systemPossSuperiors: locality, country, domainDNS
schemaIdGuid:bf967aa3-0de6-11d0-a285-00aa003049e2
defaultSecurityDescriptor: D:S:
defaultHidingValue: FALSE
systemOnly: FALSE
defaultObjectCategory: CN=Organization,CN=Schema,CN=Configuration,
<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.43 Class organizationalUnit

This class specifies a container for storing users, computers, and other account objects.

```

cn: Organizational-Unit
ldapDisplayName: organizationalUnit
governsId: 2.5.6.5
objectClassCategory: 1
rdnAttId: ou
subClassOf: top
systemMustContain: ou
systemMayContain: x121Address, userPassword, uPNSuffixes, co,
telexNumber, teletexTerminalIdentifier, telephoneNumber, street, st,
seeAlso, searchGuide, registeredAddress, preferredDeliveryMethod,
postalCode, postalAddress, postOfficeBox,
physicalDeliveryOfficeName, managedBy, thumbnailLogo, l,
internationalISDNNumber, facsimileTelephoneNumber,

```

```

    destinationIndicator, desktopProfile, defaultGroup, countryCode, c,
    businessCategory
systemPossSuperiors: country, organization, organizationalUnit,
    domainDNS
schemaIdGuid:bf967aa5-0de6-11d0-a285-00aa003049e2
defaultSecurityDescriptor: D:S:
defaultHidingValue: FALSE
systemOnly: FALSE
defaultObjectCategory: CN=Organizational-Unit,CN=Schema,
    CN=Configuration,<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.44 Class person

This class contains personal information about a user.

```

cn: Person
ldapDisplayName: person
governsId: 2.5.6.6
objectClassCategory: 0
rdnAttId: cn
subClassOf: top
systemMustContain: cn
mayContain: attributeCertificateAttribute
systemMayContain: seeAlso, serialNumber, sn, telephoneNumber,
    userPassword
systemPossSuperiors: container, organizationalUnit
schemaIdGuid:bf967aa7-0de6-11d0-a285-00aa003049e2
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Person,CN=Schema,CN=Configuration,
    <RootDomainDN>

```

3.45 Class queryPolicy

This class holds administrative limits for LDAP server resources for sorted and paged results.

```

cn: Query-Policy
ldapDisplayName: queryPolicy
governsId: 1.2.840.113556.1.5.106
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMayContain: LDAPIPDenyList, LDAPAdminLimits
systemPossSuperiors: container
schemaIdGuid:83cc7075-cca7-11d0-afff-0000f80367c1
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Query-Policy,CN=Schema,CN=Configuration,
    <RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```


3.46 Class securityPrincipal

This class contains the security information for an object.

```
cn: Security-Principal
ldapDisplayName: securityPrincipal
governsId: 1.2.840.113556.1.5.6
objectClassCategory: 3
rdnAttId: cn
subClassOf: top
systemMustContain: objectSid
systemMayContain: supplementalCredentials, tokenGroups,
  nTSecurityDescriptor
schemaIdGuid: bf967ab0-0de6-11d0-a285-00aa003049e2
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Security-Principal, CN=Schema,
  CN=Configuration, <RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

3.47 Class server

This class represents a server computer within a site.

```
cn: Server
ldapDisplayName: server
governsId: 1.2.840.113556.1.5.17
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMayContain: mailAddress, serverReference, managedBy,
  nETBIOSName, dNSHostName, bridgeheadTransportList
systemPossSuperiors: serversContainer
schemaIdGuid: bf967a92-0de6-11d0-a285-00aa003049e2
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Server, CN=Schema, CN=Configuration,
  <RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

3.48 Class serversContainer

This class holds server objects within a site.

```
cn: Servers-Container
ldapDisplayName: serversContainer
governsId: 1.2.840.113556.1.5.7000.48
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemPossSuperiors: site
schemaIdGuid: f780acc0-56f0-11d1-a9c6-0000f80367c1
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
```

```
systemOnly: FALSE
defaultObjectCategory: CN=Servers-Container,CN=Schema,
  CN=Configuration,<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

3.49 Class site

This class specifies a container for storing server objects. This class represents a physical location containing computers; used to manage replication.

```
cn: Site
ldapDisplayName: site
governsId: 1.2.840.113556.1.5.31
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMayContain: notificationList, managedBy, location
systemPossSuperiors: sitesContainer
schemaIdGuid:bf967ab3-0de6-11d0-a285-00aa003049e2
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Site,CN=Schema,CN=Configuration,
  <RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

3.50 Class siteLink

This object represents the connection between two sites.

```
cn: Site-Link
ldapDisplayName: siteLink
governsId: 1.2.840.113556.1.5.147
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMustContain: siteList
systemMayContain: schedule, replInterval, options, cost
systemPossSuperiors: interSiteTransport
schemaIdGuid:d50c2cde-8951-11d1-aebc-0000f80367c1
defaultSecurityDescriptor: D:S:
defaultHidingValue: FALSE
systemOnly: FALSE
defaultObjectCategory: CN=Site-Link,CN=Schema,CN=Configuration,
  <RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

3.51 Class siteLinkBridge

This class specifies an object for tracking the site links that are transitively connected.

```
cn: Site-Link-Bridge
ldapDisplayName: siteLinkBridge
```

```

governsId: 1.2.840.113556.1.5.148
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMustContain: siteLinkList
systemPossSuperiors: interSiteTransport
schemaIdGuid:d50c2cdf-8951-11d1-aebc-0000f80367c1
defaultSecurityDescriptor: D:S:
defaultHidingValue: FALSE
systemOnly: FALSE
defaultObjectCategory: CN=Site-Link-Bridge,CN=Schema,
  CN=Configuration,<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.52 Class sitesContainer

This class specifies a container for storing site objects. Located in the configuration naming context.

```

cn: Sites-Container
ldapDisplayName: sitesContainer
governsId: 1.2.840.113556.1.5.107
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemPossSuperiors: configuration
schemaIdGuid:7a4117da-cd67-11d0-afff-0000f80367c1
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Sites-Container,CN=Schema,CN=Configuration,
  <RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.53 Class subnet

This class represents a specific subnet in the network to which servers and workstations are attached.

```

cn: Subnet
ldapDisplayName: subnet
governsId: 1.2.840.113556.1.5.96
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMayContain: siteObject, location
systemPossSuperiors: subnetContainer
schemaIdGuid:b7b13124-b82e-11d0-afee-0000f80367c1
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Subnet,CN=Schema,CN=Configuration,
  <RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.54 Class subnetContainer

This class specifies a container for holding all subnet objects.

```
cn: Subnet-Container
ldapDisplayName: subnetContainer
governsId: 1.2.840.113556.1.5.95
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemPossSuperiors: sitesContainer
schemaIdGuid:b7b13125-b82e-11d0-afee-0000f80367c1
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=Subnet-Container,CN=Schema,CN=Configuration,
<RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT
```

3.55 Class subSchema

This class contains the schema definition.

```
cn: SubSchema
ldapDisplayName: subSchema
governsId: 2.5.20.1
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemMayContain: objectClasses, modifyTimeStamp, extendedClassInfo,
extendedAttributeInfo, dITContentRules, attributeTypes
systemPossSuperiors: dMD
schemaIdGuid:5a8b3261-c38d-11d1-bbc9-0080c76670c0
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: TRUE
defaultObjectCategory: CN=SubSchema,CN=Schema,CN=Configuration,
<RootDomainDN>
systemFlags: FLAG_ATTR_NOT_REPLICATED34217744
```

3.56 Class syncEngineAuxConfiguration

ms-DS-Sync-Engine-Aux-Configuration

```
cn: ms-DS-Sync-Engine-Aux-Configuration
ldapDisplayName: syncEngineAuxConfiguration
governsId: 1.2.840.113556.1.4.1891
objectClassCategory: 3
rdnAttId: cn
subClassOf: top
systemMayContain: configurationFile
schemaIdGuid:b48e82d3-14fd-436e-aa22-b75d01367eea
systemOnly: FALSE
defaultObjectCategory: CN=ms-DS-Sync-Engine-Aux-Configuration,
```

CN=Schema,CN=Configuration,<RootDomainDN>

3.57 Class syncEngineAuxObject

ms-DS-Sync-Engine-Aux-Object

```
cn: ms-DS-Sync-Engine-Aux-Object
ldapDisplayName: syncEngineAuxObject
governsId: 1.2.840.113556.1.4.1890
objectClassCategory: 3
rdnAttId: cn
subClassOf: top
systemMayContain: nonIndexedMetadata, lastAgedChange,
  configurationFileGuid, sourceObjectGuid
schemaIdGuid: 21abb25e-5d70-4e27-ad8a-10aace85986a
systemOnly: FALSE
defaultObjectCategory: CN=ms-DS-Sync-Engine-Aux-Object,CN=Schema,
  CN=Configuration,<RootDomainDN>
```

3.58 Class top

This class is the top-level class from which all classes are derived.

```
cn: Top
ldapDisplayName: top
governsId: 2.5.6.0
objectClassCategory: 2
rdnAttId: cn
subClassOf: top
systemMustContain: objectClass, objectCategory, nTSecurityDescriptor,
  instanceType
mayContain: directReports, ownerBL, msDS-TasksForAzRoleBL,
  msDS-OperationsForAzRoleBL, msDS-TasksForAzTaskBL,
  msDS-OperationsForAzTaskBL
systemMayContain: url, wWWHomePage, whenCreated, whenChanged,
  wellKnownObjects, wbemPath, uSNSource, uSNLastObjRem, USNIntersite,
  uSNSALastObjRemoved, uSNCreated, uSNChanged, systemFlags,
  subSchemaSubEntry, subRefs, structuralObjectClass, siteObjectBL,
  serverReferenceBL, sDRightsEffective, revision, repsTo, repsFrom,
  replUpToDateVector, replPropertyMetaData, name, queryPolicyBL,
  proxyAddresses, proxiedObjectName, possibleInferiors,
  partialAttributeSet, partialAttributeDeletionList,
  otherWellKnownObjects, objectVersion, objectGUID, distinguishedName,
  msDS-DisableForInstancesBL, msDS-ServiceAccountBL,
  msDS-ReplValueMetaData, msDS-ReplAttributeMetaData,
  msDS-NCReplOutboundNeighbors, msDS-NCReplInboundNeighbors,
  msDS-NCReplCursors, msDS-NonMembersBL, msDS-MembersForAzRoleBL,
  msDs-masteredBy, msDS-DefaultNamingContextBL, mS-DS-ConsistencyGuid,
  mS-DS-ConsistencyChildCount, msDS-Approx-Immed-Subordinates,
  modifyTimeStamp, masteredBy, managedObjects, lastKnownParent,
  memberOf, isDeleted, isCriticalSystemObject, showInAdvancedViewOnly,
  fsmORoleOwner, fromEntry, dSASignature, dSCorePropagationData,
  displayName, description, createTimeStamp, cn, canonicalName,
  bridgeheadServerListBL, allowedChildClassesEffective,
  allowedChildClasses, allowedAttributesEffective, allowedAttributes,
```

```

    adminDisplayName, adminDescription
systemPossSuperiors: lostAndFound
schemaIdGuid:bf967ab7-0de6-11d0-a285-00aa003049e2
defaultSecurityDescriptor: D:S:
defaultHidingValue: TRUE
systemOnly: TRUE
defaultObjectCategory: CN=Top,CN=Schema,CN=Configuration,
    <RootDomainDN>
systemFlags: FLAG_SCHEMA_BASE_OBJECT

```

3.59 Class userProxy

This class is the sample class for bind proxy implementation.

```

cn: User-Proxy
ldapDisplayName: userProxy
governsId: 1.2.840.113556.1.5.246
objectClassCategory: 1
rdnAttId: cn
subClassOf: top
systemAuxiliaryClass: msDS-BindProxy
systemMayContain: userPrincipalName
possSuperiors: organization, container, organizationalUnit, domainDNS
schemaIdGuid:60d6186f-f3b6-4898-b0ad-6535afc07620
defaultSecurityDescriptor:
    D: (OA;;CR;ab721a53-1e2f-11d0-9819-00aa0040529b;;PS)S:
defaultHidingValue: TRUE
systemOnly: FALSE
defaultObjectCategory: CN=User-Proxy,CN=Schema,CN=Configuration,
    <RootDomainDN>

```

3.60 Class userProxyFull

This class is the sample user proxy class with the same properties as the native user class.

```

cn: User-Proxy-Full
ldapDisplayName: userProxyFull
governsId: 1.2.840.113556.1.5.248
objectClassCategory: 1
rdnAttId: cn
subClassOf: organizationalPerson
systemAuxiliaryClass: msDS-BindProxy
mayContain: audio, carLicense, departmentNumber, displayName,
employeeNumber, employeeType, givenName, homePostalAddress,
jpegPhoto, labeledURI, photo, preferredLanguage, roomNumber,
secretary, uid, userPKCS12, userSMIMECertificate,
x500uniqueIdentifier
systemMayContain: defaultClassStore, dynamicLDAPServer,
    lastLogonTimestamp, preferredOU, userParameters, userPrincipalName,
    userCertificate, businessCategory, homePhone, initials, mail,
    manager, mobile, o, pager
systemPossSuperiors: domainDNS, organizationalUnit
schemaIdGuid:2210527a-eb01-4ff0-b883-186f40a92979
defaultSecurityDescriptor:
    D: (OA;;CR;ab721a53-1e2f-11d0-9819-00aa0040529b;;PS)S:

```

```
defaultHidingValue: FALSE
systemOnly: FALSE
defaultObjectCategory: CN=Person,CN=Schema,CN=Configuration,
<RootDomainDN>
```

3.61 Class user

This class is used to store information about an employee or contractor who works for an organization. It is also possible to apply this class to long-term visitors.

```
cn: User
ldapDisplayName: user
governsId: 1.2.840.113556.1.5.9
objectClassCategory: 1
rdnAttId: cn
subClassOf: organizationalPerson
systemAuxiliaryClass: msDS-BindableObject, securityPrincipal
mayContain: audio, carLicense, departmentNumber, displayName,
employeeNumber, employeeType, givenName, homePostalAddress,
jpegPhoto, labeledURI, photo, preferredLanguage, roomNumber,
secretary, uid, userPKCS12, userSMIMECertificate,
x500uniqueIdentifier
systemMayContain: defaultClassStore, dynamicLDAPServer,
lastLogonTimestamp, preferredOU, userParameters, userPrincipalName,
userCertificate, businessCategory, homePhone, initials, mail,
manager, mobile, o, pager
systemPossSuperiors: domainDNS, organizationalUnit
schemaIdGuid:bf967aba-0de6-11d0-a285-00aa003049e2
defaultSecurityDescriptor:
D: (OA;;;CR;ab721a53-1e2f-11d0-9819-00aa0040529b;;;PS)S:
defaultHidingValue: FALSE
systemOnly: FALSE
defaultObjectCategory: CN=Person,CN=Schema,CN=Configuration,
<RootDomainDN>
```

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