

# [MS-OXWSCOS]: Unified Contact Store Web Service Protocol Specification

## Intellectual Property Rights Notice for Open Specifications Documentation

- **Technical Documentation.** Microsoft publishes Open Specifications documentation for protocols, file formats, languages, standards as well as overviews of the interaction among each of these technologies.
- **Copyrights.** This documentation is covered by Microsoft copyrights. Regardless of any other terms that are contained in the terms of use for the Microsoft website that hosts this documentation, you may make copies of it in order to develop implementations of the technologies described in the Open Specifications and may distribute portions of it in your implementations using these technologies or your documentation as necessary to properly document the implementation. You may also distribute in your implementation, with or without modification, any schema, IDL's, or code samples that are included in the documentation. This permission also applies to any documents that are referenced in the Open Specifications.
- **No Trade Secrets.** Microsoft does not claim any trade secret rights in this documentation.
- **Patents.** Microsoft has patents that may cover your implementations of the technologies described in the Open Specifications. Neither this notice nor Microsoft's delivery of the documentation grants any licenses under those or any other Microsoft patents. However, a given Open Specification may be covered by Microsoft [Open Specification Promise](#) or the [Community Promise](#). If you would prefer a written license, or if the technologies described in the Open Specifications are not covered by the Open Specifications Promise or Community Promise, as applicable, patent licenses are available by contacting [iplg@microsoft.com](mailto:iplg@microsoft.com).
- **Trademarks.** The names of companies and products contained in this documentation may be covered by trademarks or similar intellectual property rights. This notice does not grant any licenses under those rights.
- **Fictitious Names.** The example companies, organizations, products, domain names, e-mail addresses, logos, people, places, and events depicted in this documentation are fictitious. No association with any real company, organization, product, domain name, email address, logo, person, place, or event is intended or should be inferred.

**Reservation of Rights.** All other rights are reserved, and this notice does not grant any rights other than specifically described above, whether by implication, estoppel, or otherwise.

**Tools.** The Open Specifications do not require the use of Microsoft programming tools or programming environments in order for you to develop an implementation. If you have access to Microsoft programming tools and environments you are free to take advantage of them. Certain Open Specifications are intended for use in conjunction with publicly available standard specifications and network programming art, and assumes that the reader either is familiar with the aforementioned material or has immediate access to it.

**Preliminary Documentation.** This Open Specification provides documentation for past and current releases and/or for the pre-release (beta) version of this technology. This Open Specification is final

documentation for past or current releases as specifically noted in the document, as applicable; it is preliminary documentation for the pre-release (beta) versions. Microsoft will release final documentation in connection with the commercial release of the updated or new version of this technology. As the documentation may change between this preliminary version and the final version of this technology, there are risks in relying on preliminary documentation. To the extent that you incur additional development obligations or any other costs as a result of relying on this preliminary documentation, you do so at your own risk.

## Revision Summary

| Date       | Revision History | Revision Class | Comments               |
|------------|------------------|----------------|------------------------|
| 07/16/2012 | 0.1              | New            | Released new document. |

# Table of Contents

|   |           |
|---|-----------|
| <b>1 Introduction .....</b>                                       | <b>8</b>  |
| 1.1 Glossary .....  | 8         |
| 1.2 References .....  | 8         |
| 1.2.1 Normative References .....                                  | 8         |
| 1.2.2 Informative References .....                                | 9         |
| 1.3 Overview .....  | 9         |
| 1.4 Relationship to Other Protocols .....                         | 10        |
| 1.5 Prerequisites/Preconditions .....                             | 10        |
| 1.6 Applicability Statement .....                                 | 10        |
| 1.7 Versioning and Capability Negotiation .....                   | 10        |
| 1.8 Vendor-Extensible Fields .....                                | 11        |
| 1.9 Standards Assignments .....                                   | 11        |
| <b>2 Messages.....</b>  | <b>12</b> |
| 2.1 Transport .....   | 12        |
| 2.2 Common Message Syntax .....                                   | 12        |
| 2.2.1 Namespaces .....  | 12        |
| 2.2.2 Messages .....  | 12        |
| 2.2.3 Elements .....  | 12        |
| 2.2.4 Complex Types .....   | 13        |
| 2.2.4.1 ArrayOfImGroupType .....                                  | 13        |
| 2.2.4.2 ImGroupType .....   | 13        |
| 2.2.4.3 ImItemListType .....                                      | 14        |
| 2.2.4.4 NonEmptyArrayOfExtendedFieldURIs .....                    | 14        |
| 2.2.5 Simple Types .....  | 14        |
| 2.2.6 Attributes .....  | 14        |
| 2.2.7 Groups .....  | 14        |
| 2.2.8 Attribute Groups .....                                      | 15        |
| <b>3 Protocol Details .....</b>                                   | <b>16</b> |
| 3.1 ExchangeServicePortType Server Details .....                  | 16        |
| 3.1.1 Abstract Data Model .....                                   | 16        |
| 3.1.2 Timers .....  | 16        |
| 3.1.3 Initialization .....  | 16        |
| 3.1.4 Message Processing Events and Sequencing Rules .....        | 16        |
| 3.1.4.1 AddDistributionGroupToImList .....                        | 17        |
| 3.1.4.1.1 Messages .....  | 17        |
| 3.1.4.1.1.1 AddDistributionGroupToImListSoapIn .....              | 18        |
| 3.1.4.1.1.2 AddDistributionGroupToImListSoapOut .....             | 18        |
| 3.1.4.1.2 Elements .....  | 19        |
| 3.1.4.1.2.1 AddDistributionGroupToImList .....                    | 19        |
| 3.1.4.1.2.2 AddDistributionGroupToImListResponse .....            | 19        |
| 3.1.4.1.3 Complex Types .....                                     | 20        |
| 3.1.4.1.3.1 AddDistributionGroupToImListType .....                | 20        |
| 3.1.4.1.3.2 AddDistributionGroupToImListResponseMessageType ..... | 20        |
| 3.1.4.1.4 Simple Types .....                                      | 21        |
| 3.1.4.1.5 Attributes .....  | 21        |
| 3.1.4.1.6 Groups .....  | 21        |
| 3.1.4.1.7 Attribute Groups .....                                  | 21        |
| 3.1.4.2 AddImContactToGroup .....                                 | 21        |

|             |   |    |
|-------------|---|----|
| 3.1.4.2.1   | Messages .....                                  | 22 |
| 3.1.4.2.1.1 | AddImContactToGroupSoapIn .....                 | 22 |
| 3.1.4.2.1.2 | AddImContactToGroupSoapOut.....                 | 22 |
| 3.1.4.2.2   | Elements.....                                   | 23 |
| 3.1.4.2.2.1 | AddImContactToGroup .....                       | 23 |
| 3.1.4.2.2.2 | AddImContactToGroupResponse.....                | 23 |
| 3.1.4.2.3   | Complex Types .....                             | 23 |
| 3.1.4.2.3.1 | AddImContactToGroupType .....                   | 24 |
| 3.1.4.2.3.2 | AddImContactToGroupResponseMessageType .....    | 24 |
| 3.1.4.2.4   | Simple Types .....                              | 24 |
| 3.1.4.2.5   | Attributes.....                                 | 24 |
| 3.1.4.2.6   | Groups.....                                     | 25 |
| 3.1.4.2.7   | Attribute Groups .....                          | 25 |
| 3.1.4.3     | AddImGroup .....                                | 25 |
| 3.1.4.3.1   | Messages .....                                  | 25 |
| 3.1.4.3.1.1 | AddImGroupSoapIn .....                          | 26 |
| 3.1.4.3.1.2 | AddImGroupSoapOut .....                         | 26 |
| 3.1.4.3.2   | Elements.....                                   | 27 |
| 3.1.4.3.2.1 | AddImGroup .....                                | 27 |
| 3.1.4.3.2.2 | AddImGroupResponse.....                         | 27 |
| 3.1.4.3.3   | Complex Types .....                             | 27 |
| 3.1.4.3.3.1 | AddImGroupType .....                            | 27 |
| 3.1.4.3.3.2 | AddImGroupResponseMessageType .....             | 28 |
| 3.1.4.3.4   | Simple Types .....                              | 28 |
| 3.1.4.3.5   | Attributes.....                                 | 28 |
| 3.1.4.3.6   | Groups.....                                     | 28 |
| 3.1.4.3.7   | Attribute Groups .....                          | 28 |
| 3.1.4.4     | AddNewImContactToGroup .....                    | 28 |
| 3.1.4.4.1   | Messages .....                                  | 29 |
| 3.1.4.4.1.1 | AddNewImContactToGroupSoapIn .....              | 29 |
| 3.1.4.4.1.2 | AddNewImContactToGroupSoapOut .....             | 30 |
| 3.1.4.4.2   | Elements.....                                   | 31 |
| 3.1.4.4.2.1 | AddNewImContactToGroup .....                    | 31 |
| 3.1.4.4.2.2 | AddNewImContactToGroupResponse.....             | 31 |
| 3.1.4.4.3   | Complex Types .....                             | 31 |
| 3.1.4.4.3.1 | AddNewImContactToGroupType .....                | 31 |
| 3.1.4.4.3.2 | AddNewImContactToGroupResponseMessageType ..... | 32 |
| 3.1.4.4.4   | Simple Types .....                              | 32 |
| 3.1.4.4.5   | Attributes.....                                 | 32 |
| 3.1.4.4.6   | Groups.....                                     | 32 |
| 3.1.4.4.7   | Attribute Groups .....                          | 32 |
| 3.1.4.5     | GetImItemList.....                              | 32 |
| 3.1.4.5.1   | Messages .....                                  | 33 |
| 3.1.4.5.1.1 | GetImItemListSoapIn.....                        | 33 |
| 3.1.4.5.1.2 | GetImItemListSoapOut.....                       | 34 |
| 3.1.4.5.2   | Elements.....                                   | 34 |
| 3.1.4.5.2.1 | GetImItemList.....                              | 35 |
| 3.1.4.5.2.2 | GetImItemListResponse .....                     | 35 |
| 3.1.4.5.3   | Complex Types .....                             | 35 |
| 3.1.4.5.3.1 | GetImItemListType .....                         | 35 |
| 3.1.4.5.3.2 | GetImItemListResponseMessageType .....          | 36 |
| 3.1.4.5.4   | Simple Types .....                              | 36 |
| 3.1.4.5.5   | Attributes.....                                 | 36 |

|  |    |
|--|----|
| 3.1.4.5.6 Groups.....  | 36 |
| 3.1.4.5.7 Attribute Groups .....                                       | 36 |
| 3.1.4.6 GetImItems .....   | 36 |
| 3.1.4.6.1 Messages .....   | 37 |
| 3.1.4.6.1.1 GetImItemsSoapIn .....                                     | 37 |
| 3.1.4.6.1.2 GetImItemsSoapOut .....                                    | 38 |
| 3.1.4.6.2 Elements.....  | 38 |
| 3.1.4.6.2.1 GetImItems .....   | 38 |
| 3.1.4.6.2.2 GetImItemsResponse.....                                    | 39 |
| 3.1.4.6.3 Complex Types .....  | 39 |
| 3.1.4.6.3.1 GetImItemsType .....                                       | 39 |
| 3.1.4.6.3.2 GetImItemsResponseMessageType .....                        | 39 |
| 3.1.4.6.4 Simple Types.....  | 40 |
| 3.1.4.6.5 Attributes.....  | 40 |
| 3.1.4.6.6 Groups.....  | 40 |
| 3.1.4.6.7 Attribute Groups .....                                       | 40 |
| 3.1.4.7 RemoveContactFromImList .....                                  | 40 |
| 3.1.4.7.1 Messages .....   | 41 |
| 3.1.4.7.1.1 RemoveContactFromImListSoapIn .....                        | 41 |
| 3.1.4.7.1.2 RemoveContactFromImListSoapOut .....                       | 42 |
| 3.1.4.7.2 Elements.....  | 42 |
| 3.1.4.7.2.1 RemoveContactFromImList .....                              | 42 |
| 3.1.4.7.2.2 RemoveContactFromImListResponse .....                      | 42 |
| 3.1.4.7.3 Complex Types .....  | 43 |
| 3.1.4.7.3.1 RemoveContactFromImListType .....                          | 43 |
| 3.1.4.7.3.2 RemoveContactFromImListResponseMessageType .....           | 43 |
| 3.1.4.7.4 Simple Types.....  | 44 |
| 3.1.4.7.5 Attributes.....  | 44 |
| 3.1.4.7.6 Groups.....  | 44 |
| 3.1.4.7.7 Attribute Groups .....                                       | 44 |
| 3.1.4.8 RemoveDistributionGroupFromImList .....                        | 44 |
| 3.1.4.8.1 Messages .....   | 45 |
| 3.1.4.8.1.1 RemoveDistributionGroupFromImListSoapIn .....              | 45 |
| 3.1.4.8.1.2 RemoveDistributionGroupFromImListSoapOut .....             | 46 |
| 3.1.4.8.2 Elements.....  | 46 |
| 3.1.4.8.2.1 RemoveDistributionGroupFromImList .....                    | 47 |
| 3.1.4.8.2.2 RemoveDistributionGroupFromImListResponse.....             | 47 |
| 3.1.4.8.3 Complex Types .....  | 47 |
| 3.1.4.8.3.1 RemoveDistributionGroupFromImListType .....                | 47 |
| 3.1.4.8.3.2 RemoveDistributionGroupFromImListResponseMessageType ..... | 48 |
| 3.1.4.8.4 Simple Types.....  | 48 |
| 3.1.4.8.5 Attributes.....  | 48 |
| 3.1.4.8.6 Groups.....  | 48 |
| 3.1.4.8.7 Attribute Groups .....                                       | 48 |
| 3.1.4.9 RemoveImContactFromGroup .....                                 | 48 |
| 3.1.4.9.1 Messages .....   | 49 |
| 3.1.4.9.1.1 RemoveImContactFromGroupSoapIn .....                       | 49 |
| 3.1.4.9.1.2 RemoveImContactFromGroupSoapOut .....                      | 50 |
| 3.1.4.9.2 Elements.....  | 50 |
| 3.1.4.9.2.1 RemoveImContactFromGroup .....                             | 51 |
| 3.1.4.9.2.2 RemoveImContactFromGroupResponse .....                     | 51 |
| 3.1.4.9.3 Complex Types .....  | 51 |
| 3.1.4.9.3.1 RemoveImContactFromGroupType.....                          | 51 |

|   |           |
|---|-----------|
| 3.1.4.9.3.2 RemoveImContactFromGroupResponseType .....            | 52        |
| 3.1.4.9.4 Simple Types .....                                      | 52        |
| 3.1.4.9.5 Attributes .....  | 52        |
| 3.1.4.9.6 Groups .....  | 52        |
| 3.1.4.9.7 Attribute Groups .....                                  | 52        |
| 3.1.4.10 RemoveImGroup .....                                      | 52        |
| 3.1.4.10.1 Messages .....   | 53        |
| 3.1.4.10.1.1 RemoveImGroupSoapIn .....                            | 53        |
| 3.1.4.10.1.2 RemoveImGroupSoapOut .....                           | 54        |
| 3.1.4.10.2 Elements .....   | 54        |
| 3.1.4.10.2.1 RemoveImGroup .....                                  | 54        |
| 3.1.4.10.2.2 RemoveImGroupResponse .....                          | 54        |
| 3.1.4.10.3 Complex Types .....                                    | 55        |
| 3.1.4.10.3.1 RemoveImGroupType .....                              | 55        |
| 3.1.4.10.3.2 RemoveImGroupResponseMessageType .....               | 55        |
| 3.1.4.10.4 Simple Types .....                                     | 55        |
| 3.1.4.10.5 Attributes .....                                       | 56        |
| 3.1.4.10.6 Groups .....   | 56        |
| 3.1.4.10.7 Attribute Groups .....                                 | 56        |
| 3.1.4.11 SetImGroup .....   | 56        |
| 3.1.4.11.1 Messages .....   | 56        |
| 3.1.4.11.1.1 SetImGroupSoapIn .....                               | 57        |
| 3.1.4.11.1.2 SetImGroupSoapOut .....                              | 57        |
| 3.1.4.11.2 Elements .....   | 58        |
| 3.1.4.11.2.1 SetImGroup .....                                     | 58        |
| 3.1.4.11.2.2 SetImGroupResponse .....                             | 58        |
| 3.1.4.11.3 Complex Types .....                                    | 58        |
| 3.1.4.11.3.1 SetImGroupType .....                                 | 58        |
| 3.1.4.11.3.2 SetImGroupResponseMessageType .....                  | 59        |
| 3.1.4.11.4 Simple Types .....                                     | 59        |
| 3.1.4.11.5 Attributes .....                                       | 59        |
| 3.1.4.11.6 Groups .....   | 59        |
| 3.1.4.11.7 Attribute Groups .....                                 | 59        |
| 3.1.4.12 SetImListMigrationCompleted .....                        | 59        |
| 3.1.4.12.1 Messages .....   | 60        |
| 3.1.4.12.1.1 SetImListMigrationCompletedSoapIn .....              | 60        |
| 3.1.4.12.1.2 SetImListMigrationCompletedSoapOut .....             | 61        |
| 3.1.4.12.2 Elements .....   | 62        |
| 3.1.4.12.2.1 SetImListMigrationCompleted .....                    | 62        |
| 3.1.4.12.2.2 SetImListMigrationCompletedResponse .....            | 62        |
| 3.1.4.12.3 Complex Types .....                                    | 62        |
| 3.1.4.12.3.1 SetImListMigrationCompletedType .....                | 62        |
| 3.1.4.12.3.2 SetImListMigrationCompletedResponseMessageType ..... | 63        |
| 3.1.4.12.4 Simple Types .....                                     | 63        |
| 3.1.4.12.5 Attributes .....                                       | 63        |
| 3.1.4.12.6 Groups .....   | 63        |
| 3.1.4.12.7 Attribute Groups .....                                 | 63        |
| 3.1.5 Timer Events .....  | 63        |
| 3.1.6 Other Local Events .....                                    | 63        |
| <b>4 Protocol Examples.....</b>                                   | <b>64</b> |
| <b>5 Security.....</b>  | <b>67</b> |

|           |   |           |
|-----------|---|-----------|
| 5.1       | Security Considerations for Implementers.....                             | 67        |
| 5.2       | Index of Security Parameters .....  | 67        |
| <b>6</b>  | <b>Appendix A: Full WSDL.....</b>   | <b>68</b> |
| <b>7</b>  | <b>Appendix B: Full XML Schema .....</b>                                  | <b>75</b> |
| 7.1       | http://schemas.microsoft.com/exchange/services/2006/messages Schema ..... | 75        |
| 7.2       | http://schemas.microsoft.com/exchange/services/2006/types Schema .....    | 79        |
| <b>8</b>  | <b>Appendix C: Product Behavior .....</b>                                 | <b>81</b> |
| <b>9</b>  | <b>Change Tracking.....</b>   | <b>83</b> |
| <b>10</b> | <b>Index .....</b>  | <b>84</b> |

# 1 Introduction

The Unified Contact Store Web Service Protocol enables clients to use a **Web service** to create, retrieve, update, and delete instant messaging contacts and groups.

Sections 1.8, 2, and 3 of this specification are normative and can contain the terms MAY, SHOULD, MUST, MUST NOT, and SHOULD NOT as defined in RFC 2119. Sections 1.5 and 1.9 are also normative but cannot contain those terms. All other sections and examples in this specification are informative.

## 1.1 Glossary

The following terms are defined in [\[MS-GLOS\]](#):

**Hypertext Transfer Protocol (HTTP)**

**Hypertext Transfer Protocol over Secure Sockets Layer (HTTPS)**

The following terms are defined in [\[MS-OXGLOS\]](#):

**endpoint**

**instant messaging**

**mailbox**

**Simple Object Access Protocol (SOAP)**

**SOAP action**

**SOAP body**

**SOAP header**

**SOAP message**

**Web service**

**Web Services Description Language (WSDL)**

**WSDL message**

**WSDL operation**

**WSDL port type**

**XML namespace**

**XML namespace prefix**

**XML schema**

The following terms are specific to this document:

**MAY, SHOULD, MUST, SHOULD NOT, MUST NOT:** These terms (in all caps) are used as described in [\[RFC2119\]](#). All statements of optional behavior use either MAY, SHOULD, or SHOULD NOT.

## 1.2 References

References to Microsoft Open Specifications documentation do not include a publishing year because links are to the latest version of the technical documents, which are updated frequently. References to other documents include a publishing year when one is available.

### 1.2.1 Normative References

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](mailto: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.

- [MS-OXWSCDATA] Microsoft Corporation, "[Common Web Service Data Types](#)".
- [RFC2119] Bradner, S., "Key words for use in RFCs to Indicate Requirement Levels", BCP 14, RFC 2119, March 1997, <http://www.rfc-editor.org/rfc/rfc2119.txt>
- [RFC2818] Rescorla, E., "HTTP Over TLS", RFC 2818, May 2000, <http://www.ietf.org/rfc/rfc2818.txt>
- [RFC3066] Alvestrand, H., "Tags for the Identification of Language", RFC 3066, January 2001, <http://www.ietf.org/rfc/rfc3066.txt>
- [SOAP1.1] Box, D., Ehnebuske, D., Kakivaya, G., et al., "Simple Object Access Protocol (SOAP) 1.1", May 2000, <http://www.w3.org/TR/2000/NOTE-SOAP-20000508/>
- [WSDL] Christensen, E., Curbera, F., Meredith, G., and Weerawarana, S., "Web Services Description Language (WSDL) 1.1", W3C Note, March 2001, <http://www.w3.org/TR/2001/NOTE-wsdl-20010315>
- [XMLNS] Bray, T., Hollander, D., Layman, A., et al., Eds., "Namespaces in XML 1.0 (Third Edition)", W3C Recommendation, December 2009, <http://www.w3.org/TR/2009/REC-xml-names-20091208/>
- [XMLSCHEMA1] Thompson, H.S., Ed., Beech, D., Ed., Maloney, M., Ed., and Mendelsohn, N., Ed., "XML Schema Part 1: Structures", W3C Recommendation, May 2001, <http://www.w3.org/TR/2001/REC-xmleschema-1-20010502/>
- [XMLSCHEMA2] Biron, P.V., Ed. and Malhotra, A., Ed., "XML Schema Part 2: Datatypes", W3C Recommendation, May 2001, <http://www.w3.org/TR/2001/REC-xmleschema-2-20010502/>

## 1.2.2 Informative References

- [MS-GLOS] Microsoft Corporation, "[Windows Protocols Master Glossary](#)".
- [MS-OXDSCLI] Microsoft Corporation, "[Autodiscover Publishing and Lookup Protocol Specification](#)".
- [MS-OXGLOS] Microsoft Corporation, "[Exchange Server Protocols Master Glossary](#)".
- [MS-OXWSADISC] Microsoft Corporation, "[Autodiscover Publishing and Lookup SOAP-Based Web Service Protocol Specification](#)".
- [RFC2616] Fielding, R., Gettys, J., Mogul, J., et al., "Hypertext Transfer Protocol -- HTTP/1.1", RFC 2616, June 1999, <http://www.ietf.org/rfc/rfc2616.txt>

## 1.3 Overview

This protocol describes the Unified Contact Store, which is a centralized storage mechanism for contacts for **instant messaging** clients. It provides two folders: ImContactList and QuickContacts. The ImContactList folder contains groups, which in turn refer to contacts. In a typical contact list, the PDLs represent the groups in the contact list. The contacts are stored in the QuickContacts folder. These contacts contain the information displayed in the contact list, for example, display name, instant messaging address, phone number, and so on.

This protocol provides operations for adding and removing instant messaging groups by adding and removing PDLs in the ImContactList folder, and adding, removing, and changing the group of a contact in the instant messaging groups by adding or removing a contact in the QuickContact folder, and then modifying the membership in the PDLs in the ImContactList folder.

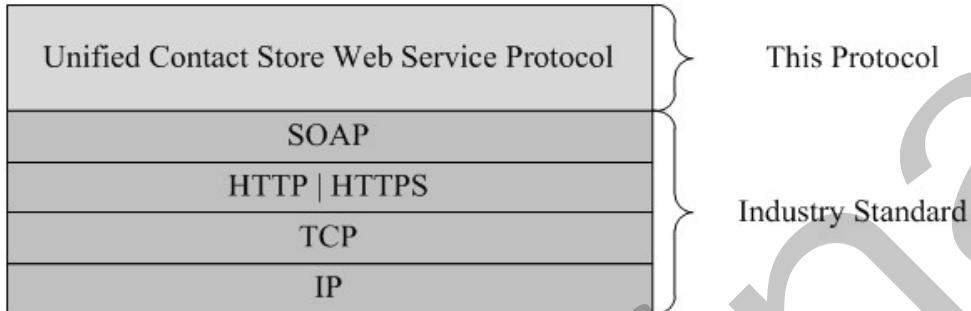
This protocol simplifies integration with the Unified Contact Store. This enables instant messaging clients to store, access, and make changes to instant messaging contact lists without requiring additional calls and business logic.

## 1.4 Relationship to Other Protocols

A client that implements this protocol can use the Autodiscover Publishing and Lookup SOAP-Based Web Service Protocol, as described in [\[MS-OXWSADISC\]](#), or the Autodiscover Publishing and Lookup Protocol, as described in [\[MS-OXDSCLI\]](#), to identify the target **endpoint (4)** to use for each operation.

This protocol uses the SOAP Protocol, as described in [\[SOAP1.1\]](#), to specify the structure information that is exchanged between the client and the server. This protocol uses the XML Protocol, as described in [\[XMLSCHEMA1\]](#) and [\[XMLSCHEMA2\]](#), to describe the message content that is sent to and from the server.

This protocol uses **SOAP over HTTP**, as described in [\[RFC2616\]](#), and **SOAP over HTTPS**, as described in [\[RFC2818\]](#), as shown in the following layering diagram.



**Figure 1: This protocol in relation to other protocols**

## 1.5 Prerequisites/Preconditions

The endpoint (4) URL that is returned by either the Autodiscover Publishing Lookup SOAP-Based Web Service Protocol, as specified in [\[MS-OXWSADISC\]](#), or the Autodiscover Publishing and Lookup Protocol, as specified in [\[MS-OXDSCLI\]](#), is required to form the HTTP request to the Web server that hosts this protocol. The operations that this protocol defines cannot be accessed unless the correct endpoint (4) is identified in the HTTP Web requests that target this protocol.

## 1.6 Applicability Statement

This protocol is applicable to environments that use Web services to implement the Unified Contact Store. This protocol is applicable to all SOAP-based clients, as described in [\[SOAP1.1\]](#).

## 1.7 Versioning and Capability Negotiation

This document covers versioning issues in the following areas:

- **Supported Transports:** This protocol uses SOAP 1.1, as described in section [2.1](#).
- **Protocol Versions:** This protocol describes only one **WSDL port type** version. The **WSDL** version of the request is identified by using the **t:RequestServerVersion** element, as described in [\[MS-OXWSCDATA\]](#) section 2.2.5.9, and the version of the server responding to the request is identified by using the **t:ServerVersionInfo** element, as described in [\[MS-OXWSCDATA\]](#) section 2.2.5.10.
- **Security and Authentication Methods:** This protocol relies on the Web server that is hosting it to perform authentication.

- **Capability Negotiation:** This protocol does not support version negotiation.

## 1.8 Vendor-Extensible Fields

None.

## 1.9 Standards Assignments

None.

## 2 Messages

In the following sections, the schema definition might differ from the processing rules imposed by the protocol. The WSDL in this specification provides a base description of the protocol. The schema in this specification provides a base description of the message syntax. The text that specifies the WSDL and schema might specify restrictions that reflect actual protocol behavior. For example, the schema definition might allow for an element to be empty, null, or not present but the behavior of the protocol as specified restricts the same elements to being non-empty, not null, or present.

### 2.1 Transport

The SOAP version used for this protocol is SOAP 1.1, as specified in [\[SOAP1.1\]](#).

This protocol relies on the Web server that hosts the application to perform authentication. The protocol SHOULD use secure communications by means of HTTPS, as specified in [\[RFC2818\]](#).

### 2.2 Common Message Syntax

This section contains common definitions that are used by this protocol. The syntax of the definitions uses **XML schema**, as specified in [\[XMLSHEMA1\]](#) and [\[XMLSHEMA2\]](#), and Web Services Description Language (WSDL), as specified in [\[WSDL\]](#).

#### 2.2.1 Namespaces

This specification defines and references various **XML namespaces** using the mechanisms specified in [\[XMLNS\]](#). Although this specification associates a specific **XML namespace prefix** for each XML namespace that is used, the choice of any particular XML namespace prefix is implementation-specific and not significant for interoperability.

| Prefix | Namespace URI  | Reference  |
|--------|--|--|
| m      | http://schemas.microsoft.com/exchange/services/2006/messages |  |
| soap   | http://schemas.xmlsoap.org/wsdl/soap/                        | <a href="#">[SOAP1.1]</a>                                  |
| t      | http://schemas.microsoft.com/exchange/services/2006/types    |  |
| wsdl   | http://schemas.xmlsoap.org/wsdl/                             | <a href="#">[WSDL]</a>                                     |
| wsi    | http://ws-i.org/schemas/conformanceClaim/                    |  |
| xs     | http://www.w3.org/2001/XMLSchema                             | <a href="#">[XMLSHEMA1]</a><br><a href="#">[XMLSHEMA2]</a> |

#### 2.2.2 Messages

This specification does not define any common **WSDL message** definitions.

#### 2.2.3 Elements

This specification does not define any common XML schema element definitions.

## 2.2.4 Complex Types

The following table summarizes the set of common XML schema complex type definitions defined by this specification. XML schema complex type definitions that are specific to a particular operation are described with the operation.

| Complex type                     | Description   |
|----------------------------------|---|
| ArrayOfImGroupType               | The <b>ArrayOfImGroupType</b> complex type specifies an array of instant messaging groups.                          |
| ImGroupType                      | The <b>ImGroupType</b> complex type specifies an instant messaging group.   |
| ImItemListType                   | The <b>ImItemListType</b> complex type specifies an array of groups of <b>ImGroupType</b> and an array of personas. |
| NonEmptyArrayOfExtendedFieldURIs | The <b>NonEmptyArrayOfExtendedFieldURIs</b> complex type specifies an array of extended URIs.                       |

### 2.2.4.1 ArrayOfImGroupType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/types>

The **ArrayOfImGroupType** complex type specifies an array of instant messaging groups.

```
<xs:complexType name="ArrayOfImGroupType" xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:choice minOccurs="0" maxOccurs="unbounded">
    <xs:element name="ImGroup" type="t:ImGroupType"/>
  </xs:choice>
</xs:complexType>
```

**ImGroup:** Represents a single instant messaging group.

### 2.2.4.2 ImGroupType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/types>

The **ImGroupType** complex type specifies an instant messaging group.

```
<xs:complexType name="ImGroupType" xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:sequence>
    <xs:element name="DisplayName" type="t:NonEmptyStringType"/>
    <xs:element name="GroupType" type="t:NonEmptyStringType"/>
    <xs:element minOccurs="0" name="ExchangeStoreId" type="t:ItemIdType"/>
    <xs:element minOccurs="0" name="MemberCorrelationKey"
      type="t:NonEmptyArrayOfItemIdsType"/>
    <xs:element minOccurs="0" name="ExtendedProperties"
      type="t:NonEmptyArrayOfExtendedPropertyType"/>
    <xs:element minOccurs="0" name="SmtpAddress" type="xs:string"/>
  </xs:sequence>
</xs:complexType>
```

**DisplayName:** Represents the display name for a new instant messaging contact or instant messaging group.

**GroupType:** Identifies the group class.

**ExchangeStoreId:** Represents the instant messaging group identifier.

**MemberCorrelationKey:** Represents the identifiers of the contacts that are part of the group.

**ExtendedProperties:** Contains an array of additional properties.

**SmtpAddress:** Represents the SMTP address of the group.

### 2.2.4.3 ImItemType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/types>

The **ImItemType** complex type specifies an array of groups of **ImGroupType** and an array of personas.

```
<xs:complexType name="ImItemType" xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:sequence>
    <xs:element minOccurs="0" name="Groups" type="t:ArrayOfImGroupType"/>
    <xs:element minOccurs="0" name="Personas" type="t:ArrayOfPeopleType"/>
  </xs:sequence>
</xs:complexType>
```

**Groups:** Represents an array of instant messaging groups.

**Personas:** Represents an array of contacts.

### 2.2.4.4 NonEmptyArrayOfExtendedFieldURIs

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/types>

The **NonEmptyArrayOfExtendedFieldURIs** complex type specifies an array of extended URIs.

```
<xs:complexType name="NonEmptyArrayOfExtendedFieldURIs"
  xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:choice maxOccurs="unbounded">
    <xs:element name="ExtendedProperty" type="t:PathToExtendedFieldType"/>
  </xs:choice>
</xs:complexType>
```

**ExtendedProperty:** Represents an extended property for the Unified Contact Store. Extended properties are typically private properties on contacts that are used for application-specific functions

## 2.2.5 Simple Types

This specification does not define any common XML schema simple type definitions.

## 2.2.6 Attributes

This specification does not define any common XML schema attribute definitions.

## 2.2.7 Groups

This specification does not define any common XML schema group definitions.

## 2.2.8 Attribute Groups

This specification does not define any common XML schema attribute group definitions.

Preliminary

### 3 Protocol Details

In the following sections, the schema definition might be less restrictive than the processing rules imposed by the protocol. The WSDL in this specification matches the WSDL that shipped with the product and provides a base description of the schema. The text that introduces the WSDL specifies additional restrictions that reflect actual Microsoft product behavior. For example, the schema definition might allow for an element to be empty, null, or not present but the behavior of the protocol as specified restricts the same elements to being non-empty, not null and present.

#### 3.1 ExchangeServicePortType Server Details

This protocol defines a single WSDL port type.

##### 3.1.1 Abstract Data Model

None.

##### 3.1.2 Timers

None.

##### 3.1.3 Initialization

None.

##### 3.1.4 Message Processing Events and Sequencing Rules

The following table summarizes the list of operations as defined by this specification:

| Operation                         | Description  |
|-----------------------------------|--|
| AddDistributionGroupToImList      | The <b>AddDistributionGroupToImList</b> operation creates a new instant messaging group from an existing distribution group.                                       |
| AddImContactToGroup               | The <b>AddImContactToGroup</b> operation adds an existing contact to an instant messaging group.   |
| AddImGroup                        | The <b>AddIMGroup</b> operation creates a new instant messaging group in a <b>mailbox</b> .  |
| AddNewImContactToGroup            | The <b>AddNewIMContactToGroup</b> operation adds a new contact to an instant messaging group.  |
| GetImItemList                     | The <b>GetImItemList</b> operation retrieves the identifiers of instant messaging contacts on the contact list.  |
| GetImItems                        | The <b>GetImItems</b> operation retrieves the contact personas for the specified contacts, either by direct or indirect reference by specifying group identifiers. |
| RemoveContactFromImList           | The <b>RemoveContactFromImList</b> operation removes the specified contact from all instant messaging groups.  |
| RemoveDistributionGroupFromImList | The <b>RemoveDistributionGroupFromImList</b> operation removes a distribution group from an instant messaging list.  |
| RemoveImContactFromGroup          | The <b>RemoveImContactFromGroup</b> operation removes an   |

| <b>Operation</b>            | <b>Description</b>   |
|-----------------------------|--|
|                             | instant messaging contact from a group.  |
| RemoveImGroup               | The <b>RemoveImGroup</b> operation removes the instant messaging and all of the contacts in the group. If a contact is a member of only this group, it is removed from the QuickContacts folder. |
| SetImGroup                  | The <b>SetImGroup</b> operation changes the display name of an instant messaging group.  |
| SetImListMigrationCompleted | The <b>SetImListMigrationCompleted</b> operation indicates whether the instant messaging contacts in a mailbox have been migrated to the Exchange server.  |

### 3.1.4.1 AddDistributionGroupToImList

The **AddDistributionGroupToImList** operation creates a new instant messaging group from an existing distribution group.

```
<wsdl:operation name="AddDistributionGroupToImList"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:input message="m:AddDistributionGroupToImListSoapIn"/>
  <wsdl:output message="m:AddDistributionGroupToImListSoapOut"/>
</wsdl:operation>
```

The following is the WSDL binding specification of the **AddDistributionGroupToImList** operation.

```
<wsdl:operation name="AddDistributionGroupToImList"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <soap:operation
    soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/AddDistributionGroup
    ToImList" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
    <wsdl:input>
      <soap:header message="m:AddDistributionGroupToImListSoapIn" part="Impersonation"
        use="literal" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
      <soap:header message="m:AddDistributionGroupToImListSoapIn" part="MailboxCulture"
        use="literal" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
      <soap:header message="m:AddDistributionGroupToImListSoapIn" part="RequestVersion"
        use="literal" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
      <soap:body use="literal" parts="request"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
    </wsdl:input>
    <wsdl:output>
      <soap:body use="literal" parts="AddDistributionGroupToImListResult"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
      <soap:header message="m:AddDistributionGroupToImListSoapOut" part="ServerVersion"
        use="literal" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
    </wsdl:output>
  </wsdl:operation>
```

This operation does not create a distribution group.

#### 3.1.4.1.1 Messages

The following table summarizes the set of WSDL message definitions that are specific to this operation.

| Message                             | Description  |
|-------------------------------------|--|
| AddDistributionGroupToImListSoapIn  | Specifies the request to add a distribution group to the instant messaging list. |
| AddDistributionGroupToImListSoapOut | Specifies the response to the <b>AddDistributionGroupToImListSoapIn</b> request. |

### 3.1.4.1.1.1 AddDistributionGroupToImListSoapIn

The **AddDistributionGroupToImListSoapIn** WSDL message specifies the request to add a distribution group to the instant messaging list.

The following is the **AddDistributionGroupToImList** WSDL message specification.

```
<wsdl:message name="AddDistributionGroupToImListSoapIn"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="request" element="m:AddDistributionGroupToImList"/>
  <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
  <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
  <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
</wsdl:message>
```

The **AddDistributionGroupToImList** WSDL message is the input message for the **SOAP action** <http://schemas.microsoft.com/exchange/services/2006/messages/AddDistributionGroupToImList>.

The parts of the **AddDistributionGroupToImList** WSDL message are described in the following table.

| Part name      | Element/type   | Description  |
|----------------|--|--|
| request        | m:AddDistributionGroupToImList<br>(section <a href="#">3.1.4.1.2.1</a> )     | Specifies the <b>SOAP body</b> of the request containing the information that is required to query for availability.                                       |
| Impersonation  | t:ExchangeImpersonation<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.3) | Specifies a <b>SOAP header</b> that identifies the user whom the client is impersonating. <a href="#"><u>&lt;1&gt;</u></a>                                 |
| MailboxCulture | t:MailboxCulture<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.4.39)       | Specifies a SOAP header that identifies the culture to be used for accessing the mailbox. The cultures are defined in <a href="#">RFC3066</a> .            |
| RequestVersion | t:RequestServerVersion<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.9)  | Specifies a SOAP header that identifies the schema version for the <b>AddDistributionGroupToImList</b> operation request. <a href="#"><u>&lt;2&gt;</u></a> |

### 3.1.4.1.1.2 AddDistributionGroupToImListSoapOut

The **AddDistributionGroupToImListSoapOut** WSDL message specifies the response to the **AddDistributionGroupToImListSoapIn** request.

The following is the **AddDistributionGroupToImList** WSDL message specification.

```

<wsdl:message name="AddDistributionGroupToImListSoapOut"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="AddDistributionGroupToImListResult"
    element="m:AddDistributionGroupToImListResponse"/>
  <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
</wsdl:message>

```

The **AddDistributionGroupToImList** WSDL message is the output message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/AddDistributionGroupToImList>.

The parts of the **AddDistributionGroupToImList** WSDL message are described in the following table.

| Part name                          | Element/type   | Description   |
|------------------------------------|--|---|
| AddDistributionGroupToImListResult | m:AddDistributionGroupToImListResponse<br>(section <a href="#">3.1.4.1.2.2</a> ) | Specifies the SOAP body of the response that contains the requested availability information. |
| ServerVersion                      | t:ServerVersionInfo<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.10)        | Specifies a SOAP header that identifies the server version for the response.                  |

### 3.1.4.1.2 Elements

The following table summarizes the XML schema element definitions that are specific to this operation.

| Element                              | Description   |
|--------------------------------------|---|
| AddDistributionGroupToImList         | The input data for the <b>AddDistributionGroupToImList WSDL operation</b> . |
| AddDistributionGroupToImListResponse | The result data for the <b>AddDistributionGroupToImList</b> WSDL operation. |

#### 3.1.4.1.2.1 AddDistributionGroupToImList

The input data for the **AddDistributionGroupToImList** WSDL operation.

```

<xs:element name="AddDistributionGroupToImList" type="m:AddDistributionGroupToImListType"
  xmlns:xs="http://www.w3.org/2001/XMLSchema"/>

```

#### 3.1.4.1.2.2 AddDistributionGroupToImListResponse

The result data for the **AddDistributionGroupToImList** WSDL operation.

```

<xs:element name="AddDistributionGroupToImListResponse"
  type="m:AddDistributionGroupToImListResponseMessageType"
  xmlns:xs="http://www.w3.org/2001/XMLSchema"/>

```

### 3.1.4.1.3 Complex Types

The following table summarizes the XML schema complex type definitions that are specific to this operation.

| Complex type                                    | Description   |
|---|---|
| AddDistributionGroupToImListType                | Specifies a distribution group to be added to the instant messaging list.             |
| AddDistributionGroupToImListResponseMessageType | Specifies the response message for the <b>AddDistributionGroupToImList</b> operation. |

#### 3.1.4.1.3.1 AddDistributionGroupToImListType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **AddDistributionGroupToImListType** complex type specifies a distribution group to be added to the instant messaging list.

```
<xs:complexType name="AddDistributionGroupToImListType"
  xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:BaseRequestType">
      <xs:sequence>
        <xs:element name="SmtpAddress" type="t:NonEmptyStringType"/>
        <xs:element name="DisplayName" type="t:NonEmptyStringType"/>
      </xs:sequence>
    </xs:extension>
  </xs:complexContent>
</xs:complexType>
```

**SmtpAddress:** Represents the SMTP address of the group.

**DisplayName:** Represents the display name of the group.

#### 3.1.4.1.3.2 AddDistributionGroupToImListResponseMessageType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **AddDistributionGroupToImListResponseMessageType** complex type specifies the response message for the **AddDistributionGroupToImList** operation.

```
<xs:complexType name="AddDistributionGroupToImListResponseMessageType"
  xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:ResponseMessageType">
      <xs:sequence>
        <xs:element minOccurs="0" name="ImGroup" type="t:ImGroupType"/>
      </xs:sequence>
    </xs:extension>
  </xs:complexContent>
</xs:complexType>
```

**ImGroup:** Represents a single instant messaging group.

#### **3.1.4.1.4 Simple Types**

None.

#### **3.1.4.1.5 Attributes**

None.

#### **3.1.4.1.6 Groups**

None.

#### **3.1.4.1.7 Attribute Groups**

None.

### **3.1.4.2 AddImContactToGroup**

The **AddImContactToGroup** operation adds an existing contact to an instant messaging group.

```
<wsdl:operation name="AddImContactToGroup" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:input message="m:AddImContactToGroupSoapIn"/>
  <wsdl:output message="m:AddImContactToGroupSoapOut"/>
</wsdl:operation>
```

The following is the WSDL binding specification of the **AddImContactToGroup** operation.

```
<wsdl:operation name="AddImContactToGroup" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <soap:operation
    soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/AddImContactToGroup"
    xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
  <wsdl:input>
    <soap:header message="m:AddImContactToGroupSoapIn" part="Impersonation" use="literal"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
    <soap:header message="m:AddImContactToGroupSoapIn" part="MailboxCulture" use="literal"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
    <soap:header message="m:AddImContactToGroupSoapIn" part="RequestVersion" use="literal"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
    <soap:body use="literal" parts="request"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
  </wsdl:input>
  <wsdl:output>
    <soap:body use="literal" parts="AddImContactToGroupResult"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
    <soap:header message="m:AddImContactToGroupSoapOut" part="ServerVersion" use="literal"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
  </wsdl:output>
</wsdl:operation>
```

This operation can accept only existing contacts. If you want to add a new IM contact to the Unified Contact Store, use the **AddNewImContactToGroup** operation.

### 3.1.4.2.1 Messages

The following table summarizes the set of WSDL message definitions that are specific to this operation.

| Message                    | Description   |
|----------------------------|---|
| AddImContactToGroupSoapIn  | Specifies the request to add an instant messaging contact to a group.   |
| AddImContactToGroupSoapOut | Specifies the response to the <b>AddImContactToGroupSoapIn</b> request. |

#### 3.1.4.2.1.1 AddImContactToGroupSoapIn

The **AddImContactToGroupSoapIn** WSDL message specifies the request to add an instant messaging contact to a group.

The following is the **AddImContactToGroup** WSDL message specification.

```
<wsdl:message name="AddImContactToGroupSoapIn" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="request" element="m:AddImContactToGroup"/>
  <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
  <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
  <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
</wsdl:message>
```

The **AddImContactToGroup** WSDL message is the input message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/AddImContactToGroup>.

The parts of the **AddImContactToGroup** WSDL message are described in the following table.

| Part name      | Element/type   | Description   |
|----------------|--|---|
| request        | m:AddImContactToGroup<br>(section <a href="#">3.1.4.2.2.1</a> )              | Specifies the SOAP body of the request containing the information that is required to query for availability.                                     |
| Impersonation  | t:ExchangeImpersonation<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.3) | Specifies a SOAP header that identifies the user whom the client is impersonating. <a href="#"><u>&lt;3&gt;</u></a>                               |
| MailboxCulture | t:MailboxCulture<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.4.39)       | Specifies a SOAP header that identifies the culture to be used for accessing the mailbox. The cultures are defined in <a href="#">[RFC3066]</a> . |
| RequestVersion | t:RequestServerVersion<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.9)  | Specifies a SOAP header that identifies the schema version for the <b>AddImContactToGroup</b> operation request. <a href="#"><u>&lt;4&gt;</u></a> |

#### 3.1.4.2.1.2 AddImContactToGroupSoapOut

The **AddImContactToGroupSoapOut** WSDL message specifies the response to the **AddImContactToGroupSoapIn** request.

The following is the **AddImContactToGroup** WSDL message specification.

```

<wsdl:message name="AddImContactToGroupSoapOut"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="AddImContactToGroupResult" element="m:AddImContactToGroupResponse"/>
  <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
</wsdl:message>

```

The **AddImContactToGroup** WSDL message is the output message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/AddImContactToGroup>.

The parts of the **AddImContactToGroup** WSDL message are described in the following table.

| Part name                 | Element/type  | Description   |
|---------------------------|---|---|
| AddImContactToGroupResult | m:AddImContactToGroupResponse<br>(section <a href="#">3.1.4.2.2.2</a> )   | Specifies the SOAP body of the response that contains the requested availability information. |
| ServerVersion             | t:ServerVersionInfo<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.10) | Specifies a SOAP header that identifies the server version for the response.                  |

### 3.1.4.2.2 Elements

The following table summarizes the XML schema element definitions that are specific to this operation.

| Element                     | Description  |
|-----------------------------|--|
| AddImContactToGroup         | The input data for the <b>AddImContactToGroup</b> WSDL operation.  |
| AddImContactToGroupResponse | The result data for the <b>AddImContactToGroup</b> WSDL operation. |

#### 3.1.4.2.2.1 AddImContactToGroup

The input data for the **AddImContactToGroup** WSDL operation.

```

<xs:element name="AddImContactToGroup" type="m:AddImContactToGroupType"
  xmlns:xs="http://www.w3.org/2001/XMLSchema"/>

```

#### 3.1.4.2.2.2 AddImContactToGroupResponse

The result data for the **AddImContactToGroup** WSDL operation.

```

<xs:element name="AddImContactToGroupResponse"
  type="m:AddImContactToGroupResponseMessageType" xmlns:xs="http://www.w3.org/2001/XMLSchema"/>

```

### 3.1.4.2.3 Complex Types

The following table summarizes the XML schema complex type definitions that are specific to this operation.

| <b>Complex type</b>                    | <b>Description</b>   |
|--|--|
| AddImContactToGroupType                | Specifies a request to add an instant messaging contact to a group.          |
| AddImContactToGroupResponseMessageType | Specifies the response message for the <b>AddImContactToGroup</b> operation. |

### 3.1.4.2.3.1 AddImContactToGroupType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **AddImContactToGroupType** complex type specifies a request to add an instant messaging contact to a group.

```
<xs:complexType name="AddImContactToGroupType" xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:BaseRequestType">
      <xs:sequence>
        <xs:element name="ContactId" type="t:ItemIdType"/>
        <xs:element minOccurs="0" name="GroupId" type="t:ItemIdType"/>
      </xs:sequence>
    </xs:extension>
  </xs:complexContent>
</xs:complexType>
```

**ContactId:** Represents the identifier of the contact.

**GroupId:** Represents the identifier of the group.

### 3.1.4.2.3.2 AddImContactToGroupResponseMessageType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **AddImContactToGroupResponseMessageType** complex type specifies the response message for the **AddImContactToGroup** operation.

```
<xs:complexType name="AddImContactToGroupResponseMessageType"
  xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:ResponseMessageType"/>
  </xs:complexContent>
</xs:complexType>
```

### 3.1.4.2.4 Simple Types

None.

### 3.1.4.2.5 Attributes

None.

### 3.1.4.2.6 Groups

None.

### 3.1.4.2.7 Attribute Groups

None.

### 3.1.4.3 AddImGroup

The **AddIMGroup** operation creates a new instant messaging group in a mailbox.

```
<wsdl:operation name="AddImGroup" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:input message="m:AddImGroupSoapIn"/>
  <wsdl:output message="m:AddImGroupSoapOut"/>
</wsdl:operation>
```

The following is the WSDL binding specification of the **AddIMGroup** operation.

```
<wsdl:operation name="AddImGroup" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <soap:operation
    soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/AddImGroup"
    xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
    <wsdl:input>
      <soap:header message="m:AddImGroupSoapIn" part="Impersonation" use="literal"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
      <soap:header message="m:AddImGroupSoapIn" part="MailboxCulture" use="literal"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
      <soap:header message="m:AddImGroupSoapIn" part="RequestVersion" use="literal"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
      <soap:body use="literal" parts="request"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
    </wsdl:input>
    <wsdl:output>
      <soap:body use="literal" parts="AddImGroupResult"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
      <soap:header message="m:AddImGroupSoapOut" part="ServerVersion" use="literal"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
    </wsdl:output>
  </wsdl:operation>
```

This operation takes only a single display name parameter. This operation returns the display name, group type, and Exchange store identifier of the new group.

If a distribution list with the specified **DisplayName** is found, this operation fails.

### 3.1.4.3.1 Messages

The following table summarizes the set of WSDL message definitions that are specific to this operation.

| Message          | Description  |
|------------------|--|
| AddImGroupSoapIn | Specifies the request to add an instant messaging group. |

| Message           | Description  |
|-------------------|--|
| AddImGroupSoapOut | Specifies the response to the <b>AddImGroupSoapIn</b> request. |

### 3.1.4.3.1.1 AddImGroupSoapIn

The **AddImGroupSoapIn** WSDL message specifies the request to add an instant messaging group.

The following is the **AddImGroup** WSDL message specification.

```
<wsdl:message name="AddImGroupSoapIn" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="request" element="m:AddImGroup"/>
  <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
  <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
  <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
</wsdl:message>
```

The **AddImGroup** WSDL message is the input message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/AddImGroup>.

The parts of the **AddImGroup** WSDL message are described in the following table.

| Part name      | Element/type   | Description   |
|----------------|--|---|
| request        | m:AddImGroup<br>(section <a href="#">3.1.4.3.2.1</a> )                       | Specifies the SOAP body of the request containing the information that is required to query for availability.                                     |
| Impersonation  | t:ExchangeImpersonation<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.3) | Specifies a SOAP header that identifies the user whom the client is impersonating. <a href="#"><u>&lt;5&gt;</u></a>                               |
| MailboxCulture | t:MailboxCulture<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.4.39)       | Specifies a SOAP header that identifies the culture to be used for accessing the mailbox. The cultures are defined in <a href="#">[RFC3066]</a> . |
| RequestVersion | t:RequestServerVersion<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.9)  | Specifies a SOAP header that identifies the schema version for the <b>AddImGroup</b> operation request. <a href="#"><u>&lt;6&gt;</u></a>          |

### 3.1.4.3.1.2 AddImGroupSoapOut

The **AddImGroupSoapOut** WSDL message specifies the response to the **AddImGroupSoapIn** request.

The following is the **AddImGroup** WSDL message specification.

```
<wsdl:message name="AddImGroupSoapOut" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="AddImGroupResult" element="m:AddImGroupResponse"/>
  <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
</wsdl:message>
```

The **AddImGroup** WSDL message is the output message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/AddImGroup>.

The parts of the **AddImGroup** WSDL message are described in the following table.

| Part name        | Element/type  | Description   |
|------------------|---|---|
| AddImGroupResult | m:AddImGroupResponse<br>(section <a href="#">3.1.4.3.2.2</a> )            | Specifies the SOAP body of the response that contains the requested availability information. |
| ServerVersion    | t:ServerVersionInfo<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.10) | Specifies a SOAP header that identifies the server version for the response.                  |

### 3.1.4.3.2 Elements

The following table summarizes the XML schema element definitions that are specific to this operation.

| Element            | Description   |
|--------------------|---|
| AddImGroup         | The input data for the <b>AddImGroup</b> WSDL operation.  |
| AddImGroupResponse | The result data for the <b>AddImGroup</b> WSDL operation. |

#### 3.1.4.3.2.1 AddImGroup

The input data for the **AddImGroup** WSDL operation.

```
<xs:element name="AddImGroup" type="m:AddImGroupType"
  xmlns:xs="http://www.w3.org/2001/XMLSchema"/>
```

#### 3.1.4.3.2.2 AddImGroupResponse

The result data for the **AddImGroup** WSDL operation.

```
<xs:element name="AddImGroupResponse" type="m:AddImGroupResponseMessageType"
  xmlns:xs="http://www.w3.org/2001/XMLSchema"/>
```

### 3.1.4.3.3 Complex Types

The following table summarizes the XML schema complex type definitions that are specific to this operation.

| Complex type                  | Description   |
|-------------------------------|---|
| AddImGroupType                | Specifies a request to add an instant messaging group.              |
| AddImGroupResponseMessageType | Specifies the response message for the <b>AddImGroup</b> operation. |

#### 3.1.4.3.3.1 AddImGroupType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **AddImGroupType** complex type specifies a request to add an instant messaging group.

```

<xs:complexType name="AddImGroupType" xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:BaseRequestType">
      <xs:sequence>
        <xs:element name="DisplayName" type="t:NonEmptyStringType"/>
      </xs:sequence>
    </xs:extension>
  </xs:complexContent>
</xs:complexType>

```

**DisplayName:** Represents the display name of the contact.

#### 3.1.4.3.3.2 AddImGroupResponseMessageType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **AddImGroupResponseMessageType** complex type specifies the response message for the **AddImGroup** operation.

```

<xs:complexType name="AddImGroupResponseMessageType"
  xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:ResponseMessageType">
      <xs:sequence>
        <xs:element minOccurs="0" name="ImGroup" type="t:ImGroupType"/>
      </xs:sequence>
    </xs:extension>
  </xs:complexContent>
</xs:complexType>

```

**ImGroup:** Represents a single instant messaging group.

#### 3.1.4.3.4 Simple Types

None.

#### 3.1.4.3.5 Attributes

None.

#### 3.1.4.3.6 Groups

None.

#### 3.1.4.3.7 Attribute Groups

None.

#### 3.1.4.4 AddNewImContactToGroup

The **AddNewIMContactToGroup** operation adds a new contact to an instant messaging group.

```

<wsdl:operation name="AddNewImContactToGroup" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:input message="m:AddNewImContactToGroupSoapIn"/>

```

```

<wsdl:output message="m:AddNewImContactToGroupSoapOut"/>
</wsdl:operation>

```

The following is the WSDL binding specification of the **AddNewImContactToGroup** operation.

```

<wsdl:operation name="AddNewImContactToGroup" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <soap:operation
    soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/AddNewImContactToGro
    up" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
    <wsdl:input>
      <soap:header message="m:AddNewImContactToGroupSoapIn" part="Impersonation" use="literal"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
      <soap:header message="m:AddNewImContactToGroupSoapIn" part="MailboxCulture" use="literal"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
      <soap:header message="m:AddNewImContactToGroupSoapIn" part="RequestVersion" use="literal"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
      <soap:body use="literal" parts="request"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
    </wsdl:input>
    <wsdl:output>
      <soap:body use="literal" parts="AddNewImContactToGroupResult"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
      <soap:header message="m:AddNewImContactToGroupSoapOut" part="ServerVersion" use="literal"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
    </wsdl:output>
  </wsdl:operation>

```

If there are already over 1000 contacts, this operation fails. If the contact already exists, this operation does nothing.

#### 3.1.4.4.1 Messages

The following table summarizes the set of WSDL message definitions that are specific to this operation.

| Message                       | Description  |
|-------------------------------|--|
| AddNewImContactToGroupSoapIn  | Specifies the request to add a new instant messaging contact to a group.   |
| AddNewImContactToGroupSoapOut | Specifies the response to the <b>AddNewImContactToGroupSoapIn</b> request. |

##### 3.1.4.4.1.1 AddNewImContactToGroupSoapIn

The **AddNewImContactToGroupSoapIn** WSDL message specifies the request to add a new instant messaging contact to a group.

The following is the **AddNewImContactToGroup** WSDL message specification.

```

<wsdl:message name="AddNewImContactToGroupSoapIn"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="request" element="m:AddNewImContactToGroup"/>
  <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
  <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
  <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>

```

```
</wsdl:message>
```

The **AddNewImContactToGroup** WSDL message is the input message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/AddNewImContactToGroup>.

The parts of the **AddNewImContactToGroup** WSDL message are described in the following table.

| Part name      | Element/type   | Description  |
|----------------|--|--|
| request        | m:AddNewImContactToGroup<br>(section <a href="#">3.1.4.4.2.1</a> )           | Specifies the SOAP body of the request containing the information that is required to query for availability.  |
| Impersonation  | t:ExchangeImpersonation<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.3) | Specifies a SOAP header that identifies the user whom the client is impersonating. <a href="#"><u>&lt;7&gt;</u></a>                                  |
| MailboxCulture | t:MailboxCulture<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.4.39)       | Specifies a SOAP header that identifies the culture to be used for accessing the mailbox. The cultures are defined in <a href="#">RFC3066</a> .      |
| RequestVersion | t:RequestServerVersion<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.9)  | Specifies a SOAP header that identifies the schema version for the <b>AddNewImContactToGroup</b> operation request. <a href="#"><u>&lt;8&gt;</u></a> |

### 3.1.4.4.1.2 AddNewImContactToGroupSoapOut

The **AddNewImContactToGroupSoapOut** WSDL message specifies the response to the **AddNewImContactToGroupSoapIn** request.

The following is the **AddNewImContactToGroup** WSDL message specification.

```
<wsdl:message name="AddNewImContactToGroupSoapOut"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="AddNewImContactToGroupResult" element="m:AddNewImContactToGroupResponse"/>
  <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
</wsdl:message>
```

The **AddNewImContactToGroup** WSDL message is the output message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/AddNewImContactToGroup>.

The parts of the **AddNewImContactToGroup** WSDL message are described in the following table.

| Part name                    | Element/type   | Description   |
|------------------------------|--|---|
| AddNewImContactToGroupResult | m:AddNewImContactToGroupResponse<br>(section <a href="#">3.1.4.4.2.2</a> ) | Specifies the SOAP body of the response that contains the requested availability information. |
| ServerVersion                | t:ServerVersionInfo<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.10)  | Specifies a SOAP header that identifies the server version for the response.                  |

#### 3.1.4.4.2 Elements

The following table summarizes the XML schema element definitions that are specific to this operation.

| Element                        | Description   |
|--------------------------------|---|
| AddNewImContactToGroup         | The input data for the <b>AddNewImContactToGroup</b> WSDL operation.  |
| AddNewImContactToGroupResponse | The result data for the <b>AddNewImContactToGroup</b> WSDL operation. |

##### 3.1.4.4.2.1 AddNewImContactToGroup

The input data for the **AddNewImContactToGroup** WSDL operation.

```
<xs:element name="AddNewImContactToGroup" type="m:AddNewImContactToGroupType"
  xmlns:xs="http://www.w3.org/2001/XMLSchema"/>
```

##### 3.1.4.4.2.2 AddNewImContactToGroupResponse

The result data for the **AddNewImContactToGroup** WSDL operation.

```
<xs:element name="AddNewImContactToGroupResponse"
  type="m:AddNewImContactToGroupResponseMessageType"
  xmlns:xs="http://www.w3.org/2001/XMLSchema"/>
```

#### 3.1.4.4.3 Complex Types

The following table summarizes the XML schema complex type definitions that are specific to this operation.

| Complex type                              | Description  |
|---|--|
| AddNewImContactToGroupType                | Specifies a request to add a new instant messaging contact to a group.         |
| AddNewImContactToGroupResponseMessageType | Specifies the response message for an <b>AddNewImContactToGroup</b> operation. |

##### 3.1.4.4.3.1 AddNewImContactToGroupType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **AddNewImContactToGroupType** complex type specifies a request to add a new instant messaging contact to a group.

```
<xs:complexType name="AddNewImContactToGroupType"
  xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:BaseRequestType">
      <xs:sequence>
        <xs:element name="ImAddress" type="t:NonEmptyStringType"/>
```

```
<xs:element minOccurs="0" name="DisplayName" type="t:NonEmptyStringType"/>
<xs:element minOccurs="0" name="GroupId" type="t:ItemIdType"/>
</xs:sequence>
</xs:extension>
</xs:complexContent>
</xs:complexType>
```

**ImAddress:** Represents the instant messaging address of the contact.

**DisplayName:** Represents the display name of the contact.

**GroupId:** Represents the identifier of the group.

#### 3.1.4.4.3.2 AddNewImContactToGroupResponseMessageType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **AddnewImContactToGroupResponseMessageType** complex type specifies the response message for an **AddNewImContactToGroup** operation.

```
<xs:complexType name="AddNewImContactToGroupResponseMessageType"
  xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:ResponseMessageType">
      <xs:sequence>
        <xs:element minOccurs="0" name="Persona" type="t:PersonaType"/>
      </xs:sequence>
    </xs:extension>
  </xs:complexContent>
</xs:complexType>
```

**Persona:** Represents an instant messaging contact.

#### 3.1.4.4 Simple Types

None.

#### 3.1.4.4.5 Attributes

None.

#### 3.1.4.4.6 Groups

None.

#### 3.1.4.4.7 Attribute Groups

None.

#### 3.1.4.5 GetImItemList

The **GetImItemList** operation retrieves the identifiers of instant messaging contacts on the contact list.

```

<wsdl:operation name="GetImItemList" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:input message="m:GetImItemListSoapIn"/>
  <wsdl:output message="m:GetImItemListSoapOut"/>
</wsdl:operation>

```

The following is the WSDL binding specification of the **GetImItemList** operation.

```

<wsdl:operation name="GetImItemList" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <soap:operation
    soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/GetImItemList"
    xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
    <wsdl:input>
      <soap:header message="m:GetImItemListSoapIn" part="Impersonation" use="literal"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
      <soap:header message="m:GetImItemListSoapIn" part="MailboxCulture" use="literal"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
      <soap:header message="m:GetImItemListSoapIn" part="RequestVersion" use="literal"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
      <soap:body use="literal" parts="request"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
    </wsdl:input>
    <wsdl:output>
      <soap:body use="literal" parts="GetImItemListResult"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
      <soap:header message="m:GetImItemListSoapOut" part="ServerVersion" use="literal"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
    </wsdl:output>
  </wsdl:operation>

```

### 3.1.4.5.1 Messages

The following table summarizes the set of WSDL message definitions that are specific to this operation.

| Message              | Description   |
|----------------------|---|
| GetImItemListSoapIn  | Specifies the request to retrieve an instant messaging item list. |
| GetImItemListSoapOut | Specifies the response to the <b>GetItemListSoapIn</b> request.   |

#### 3.1.4.5.1.1 GetImItemListSoapIn

The **GetImItemListSoapIn** WSDL message specifies the request to retrieve an instant messaging item list.

The following is the **GetImItemList** WSDL message specification.

```

<wsdl:message name="GetImItemListSoapIn" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="request" element="m:GetImItemList"/>
  <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
  <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
  <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
</wsdl:message>

```

The **GetImItemList** WSDL message is the input message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/GetImItemList>.

The parts of the **GetImItemList** WSDL message are described in the following table.

| Part name      | Element/type   | Description  |
|----------------|--|--|
| request        | m:GetImItemList<br>(section <a href="#">3.1.4.5.2.1</a> )                    | Specifies the SOAP body of the request containing the information that is required to query for availability.                                    |
| Impersonation  | t:ExchangeImpersonation<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.3) | Specifies a SOAP header that identifies the user whom the client is impersonating. <a href="#"><sup>&lt;9&gt;</sup></a>                          |
| MailboxCulture | t:MailboxCulture<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.4.39)       | Specifies a SOAP header that identifies the culture to be used for accessing the mailbox. The cultures are defined in <a href="#">RFC3066</a> .  |
| RequestVersion | t:RequestServerVersion<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.9)  | Specifies a SOAP header that identifies the schema version for the <b>GetImItemList</b> operation request. <a href="#"><sup>&lt;10&gt;</sup></a> |

### 3.1.4.5.1.2 GetImItemListSoapOut

The **GetImItemListSoapOut** WSDL message specifies the response to the **GetItemListSoapIn** request.

The following is the **GetImItemList** WSDL message specification.

```
<wsdl:message name="GetImItemListSoapOut" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="GetImItemListResult" element="m:GetImItemListResponse"/>
  <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
</wsdl:message>
```

The **GetImItemList** WSDL message is the output message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/GetImItemList>.

The parts of the **GetImItemList** WSDL message are described in the following table.

| Part name           | Element/type  | Description   |
|---------------------|---|---|
| GetImItemListResult | m:GetImItemListResponse<br>(section <a href="#">3.1.4.5.2.2</a> )         | Specifies the SOAP body of the response that contains the requested availability information. |
| ServerVersion       | t:ServerVersionInfo<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.10) | Specifies a SOAP header that identifies the server version for the response.                  |

### 3.1.4.5.2 Elements

The following table summarizes the XML schema element definitions that are specific to this operation.

| Element               | Description  |
|-----------------------|--|
| GetImItemList         | The input data for the <b>GetImItemList</b> WSDL operation.  |
| GetImItemListResponse | The result data for the <b>GetImItemList</b> WSDL operation. |

### 3.1.4.5.2.1 GetImItemList

The input data for the **GetImItemList** WSDL operation.

```
<x:element name="GetImItemList" type="m:GetImItemListType"
  xmlns:x="http://www.w3.org/2001/XMLSchema"/>
```

### 3.1.4.5.2.2 GetImItemListResponse

The result data for the **GetImItemList** WSDL operation.

```
<x:element name="GetImItemListResponse" type="m:GetImItemListResponseMessageType"
  xmlns:x="http://www.w3.org/2001/XMLSchema"/>
```

### 3.1.4.5.3 Complex Types

The following table summarizes the XML schema complex type definitions that are specific to this operation.

| Complex type                     | Description  |
|----------------------------------|--|
| GetImItemListType                | Specifies a request to retrieve an instant messaging item list.      |
| GetImItemListResponseMessageType | Specifies the response message for a <b>GetImItemList</b> operation. |

#### 3.1.4.5.3.1 GetImItemListType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **GetImItemListType** complex type specifies a request to retrieve an instant messaging item list.

```
<xs:complexType name="GetImItemListType" xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:BaseRequestType">
      <xs:sequence>
        <xs:element minOccurs="0" name="ExtendedProperties"
          type="t:NonEmptyArrayOfExtendedFieldURIs"/>
      </xs:sequence>
    </xs:extension>
  </xs:complexContent>
</xs:complexType>
```

**ExtendedProperties:** Contains an array of additional properties.

### 3.1.4.5.3.2 GetImItemListResponseMessageType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **GetImItemListResponseMessageType** complex type specifies the response message for a **GetImItemList** operation.

```
<xs:complexType name="GetImItemListResponseMessageType"
  xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:ResponseMessageType">
      <xs:sequence>
        <xs:element minOccurs="0" name="ImItemList" type="t:ImItemListType"/>
      </xs:sequence>
    </xs:extension>
  </xs:complexContent>
</xs:complexType>
```

**ImItemList:** Represents a list of instant messaging contacts.

### 3.1.4.5.4 Simple Types

None.

### 3.1.4.5.5 Attributes

None.

### 3.1.4.5.6 Groups

None.

### 3.1.4.5.7 Attribute Groups

None.

### 3.1.4.6 GetImItems

The **GetImItems** operation retrieves the contact personas for the specified contacts, either by direct or indirect reference by specifying group identifiers.

```
<wsdl:operation name="GetImItems" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:input message="m:GetImItemsSoapIn"/>
  <wsdl:output message="m:GetImItemsSoapOut"/>
</wsdl:operation>
```

The following is the WSDL binding specification of the **GetImItems** operation.

```
<wsdl:operation name="GetImItems" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <soap:operation
    soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/GetImItems"
    xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/"/>
  <wsdl:input>
    <soap:header message="m:GetImItemsSoapIn" part="Impersonation" use="literal"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/"/>
```

```

<soap:header message="m:GetImItemsSoapIn" part="MailboxCulture" use="literal"
xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
<soap:header message="m:GetImItemsSoapIn" part="RequestVersion" use="literal"
xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
<soap:body use="literal" parts="request"
xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
</wsdl:input>
<wsdl:output>
<soap:body use="literal" parts="GetImItemsResult"
xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
<soap:header message="m:GetImItemsSoapOut" part="ServerVersion" use="literal"
xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
</wsdl:output>
</wsdl:operation>

```

### 3.1.4.6.1 Messages

The following table summarizes the set of WSDL message definitions that are specific to this operation.

| Message           | Description  |
|-------------------|--|
| GetImItemsSoapIn  | Specifies the request to retrieve instant messaging items.     |
| GetImItemsSoapOut | Specifies the response to the <b>GetImItemsSoapIn</b> request. |

#### 3.1.4.6.1.1 GetImItemsSoapIn

The **GetImItemsSoapIn** WSDL message specifies the request to retrieve instant messaging items.

The following is the **GetImItems** WSDL message specification.

```

<wsdl:message name="GetImItemsSoapIn" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="request" element="m:GetImItems"/>
  <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
  <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
  <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
</wsdl:message>

```

The **GetImItems** WSDL message is the input message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/GetImItems>.

The parts of the **GetImItems** WSDL message are described in the following table.

| Part name      | Element/type   | Description  |
|----------------|--|--|
| request        | m:GetImItems<br>(section <a href="#">3.1.4.6.2.1</a> )                       | Specifies the SOAP body of the request containing the information that is required to query for availability.        |
| Impersonation  | t:ExchangeImpersonation<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.3) | Specifies a SOAP header that identifies the user whom the client is impersonating. <a href="#"><u>&lt;11&gt;</u></a> |
| MailboxCulture | t:MailboxCulture<br>( <a href="#">[MS-OXWSCDATA]</a> section                 | Specifies a SOAP header that identifies the culture to be used for accessing the mailbox. The cultures are           |

| Part name      | Element/type  | Description  |
|----------------|---|--|
|                | 2.2.4.39)   | defined in <a href="#">[RFC3066]</a> .   |
| RequestVersion | t:RequestServerVersion<br>( <a href="#">[IMS-OXWSCDATA]</a> section<br>2.2.5.9) | Specifies a SOAP header that identifies the schema version for the <b>GetImItems</b> operation request. <a href="#">&lt;12&gt;</a> |

### 3.1.4.6.1.2 GetImItemsSoapOut

The **GetImItemsSoapOut** WSDL message specifies the response to the **GetImItemsSoapIn** request.

The following is the **GetImItems** WSDL message specification.

```
<wsdl:message name="GetImItemsSoapOut" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="GetImItemsResult" element="m:GetImItemsResponse"/>
  <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
</wsdl:message>
```

The **GetImItems** WSDL message is the output message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/GetImItems>.

The parts of the **GetImItems** WSDL message are described in the following table.

| Part name        | Element/type  | Description   |
|------------------|---|---|
| GetImItemsResult | m:GetImItemsResponse<br>(section <a href="#">3.1.4.6.2.2</a> )                | Specifies the SOAP body of the response that contains the requested availability information. |
| ServerVersion    | t:ServerVersionInfo<br>( <a href="#">[IMS-OXWSCDATA]</a> section<br>2.2.5.10) | Specifies a SOAP header that identifies the server version for the response.                  |

### 3.1.4.6.2 Elements

The following table summarizes the XML schema element definitions that are specific to this operation.

| Element            | Description   |
|--------------------|---|
| GetImItems         | The input data for the <b>GetImItems</b> WSDL operation.  |
| GetImItemsResponse | The result data for the <b>GetImItems</b> WSDL operation. |

### 3.1.4.6.2.1 GetImItems

The input data for the **GetImItems** WSDL operation.

```
<xss:element name="GetImItems" type="m:GetImItemsType"
  xmlns:xss="http://www.w3.org/2001/XMLSchema"/>
```

### 3.1.4.6.2.2 GetImItemsResponse

The result data for the **GetImItems** WSDL operation.

```
<xs:element name="GetImItemsResponse" type="m:GetImItemsResponseMessageType"
  xmlns:xs="http://www.w3.org/2001/XMLSchema"/>
```

### 3.1.4.6.3 Complex Types

The following table summarizes the XML schema complex type definitions that are specific to this operation.

| Complex type                  | Description   |
|-------------------------------|---|
| GetImItemsType                | Specifies a request to retrieve instant messaging items.            |
| GetImItemsResponseMessageType | Specifies the response message for the <b>GetImItems</b> operation. |

#### 3.1.4.6.3.1 GetImItemsType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **GetImItemsType** complex type specifies a request to retrieve instant messaging items.

```
<xs:complexType name="GetImItemsType" xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:BaseRequestType">
      <xs:sequence>
        <xs:element minOccurs="0" name="ContactIds" type="t:NonEmptyArrayOfBaseItemIdsType"/>
        <xs:element minOccurs="0" name="GroupIds" type="t:NonEmptyArrayOfBaseItemIdsType"/>
        <xs:element minOccurs="0" name="ExtendedProperties"
          type="t:NonEmptyArrayOfExtendedFieldURIs"/>
      </xs:sequence>
    </xs:extension>
  </xs:complexContent>
</xs:complexType>
```

**ContactIds:** Represents the identifiers of the contacts.

**GroupIds:** Represents the identifiers of the groups.

**ExtendedProperties:** Contains an array of additional properties.

#### 3.1.4.6.3.2 GetImItemsResponseMessageType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **GetImItemsResponseMessageType** complex type specifies the response message for the **GetImItems** operation.

```
<xs:complexType name="GetImItemsResponseMessageType"
  xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:ResponseMessageType">
      <xs:sequence>
```

```
<xs:element minOccurs="0" name="ImItemList" type="t:ImItemListType"/>
</xs:sequence>
</xs:extension>
</xs:complexContent>
</xs:complexType>
```

**ImItemList:** Represents a list of instant messaging contacts.

#### 3.1.4.6.4 Simple Types

None.

#### 3.1.4.6.5 Attributes

None.

#### 3.1.4.6.6 Groups

None.

#### 3.1.4.6.7 Attribute Groups

None.

### 3.1.4.7 RemoveContactFromImList

The **RemoveContactFromImList** operation removes the specified contact from all instant messaging groups.

```
<wsdl:operation name="RemoveContactFromImList" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:input message="m:RemoveContactFromImListSoapIn"/>
  <wsdl:output message="m:RemoveContactFromImListSoapOut"/>
</wsdl:operation>
```

The following is the WSDL binding specification of the **RemoveContactFromImList** operation.

```
<wsdl:operation name="RemoveContactFromImList" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <soap:operation
    soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/RemoveContactFromImList"
    xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
  <wsdl:input>
    <soap:header message="m:RemoveContactFromImListSoapIn" part="Impersonation" use="literal"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
    <soap:header message="m:RemoveContactFromImListSoapIn" part="MailboxCulture"
      use="literal" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
    <soap:header message="m:RemoveContactFromImListSoapIn" part="RequestVersion"
      use="literal" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
    <soap:body use="literal" parts="request"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
  </wsdl:input>
  <wsdl:output>
    <soap:body use="literal" parts="RemoveContactFromImListResult"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
    <soap:header message="m:RemoveContactFromImListSoapOut" part="ServerVersion"
      use="literal" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
  </wsdl:output>
</wsdl:operation>
```

```

    </wsdl:output>
</wsdl:operation>

```

### 3.1.4.7.1 Messages

The following table summarizes the set of WSDL message definitions that are specific to this operation.

| Message                        | Description   |
|--------------------------------|---|
| RemoveContactFromImListSoapIn  | Specifies the request to remove a contact from the instant messaging list.  |
| RemoveContactFromImListSoapOut | Specifies the response to the <b>RemoveContactFromImListSoapIn</b> request. |

#### 3.1.4.7.1.1 RemoveContactFromImListSoapIn

The **RemoveContactFromImListSoapIn** WSDL message specifies the request to remove a contact from the instant messaging list.

The following is the **RemoveContactFromImList** WSDL message specification.

```

<wsdl:message name="RemoveContactFromImListSoapIn"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="request" element="m:RemoveContactFromImList"/>
  <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
  <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
  <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
</wsdl:message>

```

The **RemoveContactFromImList** WSDL message is the input message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/RemoveContactFromImList>.

The parts of the **RemoveContactFromImList** WSDL message are described in the following table.

| Part name      | Element/type   | Description  |
|----------------|--|--|
| request        | m:RemoveContactFromImList<br>(section <a href="#">3.1.4.7.2.1</a> )          | Specifies the SOAP body of the request containing the information that is required to query for availability.  |
| Impersonation  | t:ExchangeImpersonation<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.3) | Specifies a SOAP header that identifies the user whom the client is impersonating. <a href="#"><u>&lt;13&gt;</u></a>                                 |
| MailboxCulture | t:MailboxCulture<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.4.39)       | Specifies a SOAP header that identifies the culture to be used for accessing the mailbox. The cultures are defined in <a href="#">[RFC3066]</a> .    |
| RequestVersion | t:RequestServerVersion<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.9)  | Specifies a SOAP header that identifies the schema version for the <b>RemoveContactFromList</b> operation request. <a href="#"><u>&lt;14&gt;</u></a> |

### 3.1.4.7.1.2 RemoveContactFromImListSoapOut

The **RemoveContactFromImListSoapOut** WSDL message specifies the response to the **RemoveContactFromImListSoapIn** request.

The following is the **RemoveContactFromImList** WSDL message specification.

```
<wsdl:message name="RemoveContactFromImListSoapOut"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="RemoveContactFromImListResult"
    element="m:RemoveContactFromImListResponse"/>
  <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
</wsdl:message>
```

The **RemoveContactFromImList** WSDL message is the output message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/RemoveContactFromImList>.

The parts of the **RemoveContactFromImList** WSDL message are described in the following table.

| Part name                     | Element/type  | Description   |
|-------------------------------|---|---|
| RemoveContactFromImListResult | m:RemoveContactFromImListResponse<br>(section <a href="#">3.1.4.7.2.2</a> ) | Specifies the SOAP body of the response that contains the requested availability information. |
| ServerVersion                 | t:ServerVersionInfo<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.10)   | Specifies a SOAP header that identifies the server version for the response.                  |

### 3.1.4.7.2 Elements

The following table summarizes the XML schema element definitions that are specific to this operation.

| Element                         | Description  |
|---------------------------------|--|
| RemoveContactFromImList         | The input data for the <b>RemoveContactFromImList</b> WSDL operation.  |
| RemoveContactFromImListResponse | The result data for the <b>RemoveContactFromImList</b> WSDL operation. |

#### 3.1.4.7.2.1 RemoveContactFromImList

The input data for the **RemoveContactFromImList** WSDL operation.

```
<xsd:element name="RemoveContactFromImList" type="m:RemoveContactFromImListType"
  xmlns:xsd="http://www.w3.org/2001/XMLSchema"/>
```

#### 3.1.4.7.2.2 RemoveContactFromImListResponse

The result data for the **RemoveContactFromImList** WSDL operation.

```

<xs:element name="RemoveContactFromImListResponse"
type="m:RemoveContactFromImListResponseMessageType"
xmlns:xs="http://www.w3.org/2001/XMLSchema"/>

```

### 3.1.4.7.3 Complex Types

The following table summarizes the XML schema complex type definitions that are specific to this operation.

| Complex type                               | Description  |
|--|--|
| RemoveContactFromImListType                | Specifies a request to remove a contact from an instant messaging list.        |
| RemoveContactFromImListResponseMessageType | Specifies the response message for a <b>RemoveContactFromImList</b> operation. |

#### 3.1.4.7.3.1 RemoveContactFromImListType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **RemoveContactFromImListType** complex type specifies a request to remove a contact from an instant messaging list.

```

<xs:complexType name="RemoveContactFromImListType"
xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:BaseRequestType">
      <xs:sequence>
        <xs:element name="ContactId" type="t:ItemIdType"/>
      </xs:sequence>
    </xs:extension>
  </xs:complexContent>
</xs:complexType>

```

**ContactId:** Represents the identifier of the contact.

#### 3.1.4.7.3.2 RemoveContactFromImListResponseMessageType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **RemoveContactFromImListResponseMessageType** complex type specifies the response message for a **RemoveContactFromImList** operation.

```

<xs:complexType name="RemoveContactFromImListResponseMessageType"
xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:ResponseMessageType"/>
  </xs:complexContent>
</xs:complexType>

```

#### **3.1.4.7.4 Simple Types**

None.

#### **3.1.4.7.5 Attributes**

None.

#### **3.1.4.7.6 Groups**

None.

#### **3.1.4.7.7 Attribute Groups**

None.

### **3.1.4.8 RemoveDistributionGroupFromImList**

The **RemoveDistributionGroupFromImList** operation removes a distribution group from an instant messaging list.

```
<wsdl:operation name="RemoveDistributionGroupFromImList"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:input message="m:RemoveDistributionGroupFromImListSoapIn"/>
  <wsdl:output message="m:RemoveDistributionGroupFromImListSoapOut"/>
</wsdl:operation>
```

The following is the WSDL binding specification of the **RemoveDistributionGroupFromImList** operation.

```
<wsdl:operation name="RemoveDistributionGroupFromImList"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <soap:operation
    soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/RemoveDistributionGr
    oupFromImList" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
    <wsdl:input>
      <soap:header message="m:RemoveDistributionGroupFromImListSoapIn" part="Impersonation"
        use="literal" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
      <soap:header message="m:RemoveDistributionGroupFromImListSoapIn" part="MailboxCulture"
        use="literal" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
      <soap:header message="m:RemoveDistributionGroupFromImListSoapIn" part="RequestVersion"
        use="literal" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
      <soap:body use="literal" parts="request"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
    </wsdl:input>
    <wsdl:output>
      <soap:body use="literal" parts="RemoveDistributionGroupFromImListResult"
        xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
      <soap:header message="m:RemoveDistributionGroupFromImListSoapOut" part="ServerVersion"
        use="literal" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
    </wsdl:output>
  </wsdl:operation>
```

### 3.1.4.8.1 Messages

The following table summarizes the set of WSDL message definitions that are specific to this operation.

| Message                                  | Description   |
|--|---|
| RemoveDistributionGroupFromImListSoapIn  | Specifies the request to remove a distribution group from the instant messaging list. |
| RemoveDistributionGroupFromImListSoapOut | Specifies the response to the <b>RemoveDistributionGroupFromImListSoapIn</b> request. |

#### 3.1.4.8.1.1 RemoveDistributionGroupFromImListSoapIn

The **RemoveDistributionGroupFromImListSoapIn** WSDL message specifies the request to remove a distribution group from the instant messaging list.

The following is the **RemoveDistributionGroupFromImList** WSDL message specification.

```
<wsdl:message name="RemoveDistributionGroupFromImListSoapIn"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="request" element="m:RemoveDistributionGroupFromImList"/>
  <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
  <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
  <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
</wsdl:message>
```

The **RemoveDistributionGroupFromImList** WSDL message is the input message for the SOAP action

<http://schemas.microsoft.com/exchange/services/2006/messages/RemoveDistributionGroupFromImList>.

The parts of the **RemoveDistributionGroupFromImList** WSDL message are described in the following table.

| Part name      | Element/type  | Description   |
|----------------|---|---|
| request        | m:RemoveDistributionGroupFromImList<br>(section <a href="#">3.1.4.8.2.1</a> ) | Specifies the SOAP body of the request containing the information that is required to query for availability.   |
| Impersonation  | t:ExchangeImpersonation<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.3)  | Specifies a SOAP header that identifies the user whom the client is impersonating. <a href="#">&lt;15&gt;</a>   |
| MailboxCulture | t:MailboxCulture<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.4.39)        | Specifies a SOAP header that identifies the culture to be used for accessing the mailbox. The cultures are defined in <a href="#">[RFC3066]</a> .         |
| RequestVersion | t:RequestServerVersion<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.9)   | Specifies a SOAP header that identifies the schema version for the <b>RemoveDistributionGroupFromImList</b> operation request. <a href="#">&lt;16&gt;</a> |

### 3.1.4.8.1.2 RemoveDistributionGroupFromImListSoapOut

The **RemoveDistributionGroupFromImListSoapOut** WSDL message specifies the response to the **RemoveDistributionGroupFromImListSoapIn** request.

The following is the **RemoveDistributionGroupFromImList** WSDL message specification.

```
<wsdl:message name="RemoveDistributionGroupFromImListSoapOut"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="RemoveDistributionGroupFromImListResult"
    element="m:RemoveDistributionGroupFromImListResponse"/>
  <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
</wsdl:message>
```

The **RemoveDistributionGroupFromImList** WSDL message is the output message for the SOAP action  
<http://schemas.microsoft.com/exchange/services/2006/messages/RemoveDistributionGroupFromImList>.

The parts of the **RemoveDistributionGroupFromImList** WSDL message are described in the following table.

| Part name                               | Element/type  | Description   |
|---|---|---|
| RemoveDistributionGroupFromImListResult | m:RemoveDistributionGroupFromImListResponse<br>(section <a href="#">3.1.4.8.2.2</a> ) | Specifies the SOAP body of the response that contains the requested availability information. |
| ServerVersion                           | t:ServerVersionInfo<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.10)             | Specifies a SOAP header that identifies the server version for the response.                  |

### 3.1.4.8.2 Elements

The following table summarizes the XML schema element definitions that are specific to this operation.

| Element                                   | Description   |
|---|---|
| RemoveDistributionGroupFromImList         | The input data for the <b>RemoveDistributionGroupFromImList</b> WSDL operation. |
| RemoveDistributionGroupFromImListResponse | The result data for the <b>RemoveDistributionGroupFromImList</b> WSDL           |

| Element | Description |
|---------|-------------|
|         | operation.  |

### 3.1.4.8.2.1 RemoveDistributionGroupFromImList

The input data for the **RemoveDistributionGroupFromImList** WSDL operation.

```
<xs:element name="RemoveDistributionGroupFromImList"
type="m:RemoveDistributionGroupFromImListType" xmlns:xs="http://www.w3.org/2001/XMLSchema"/>
```

### 3.1.4.8.2.2 RemoveDistributionGroupFromImListResponse

The result data for the **RemoveDistributionGroupFromImList** WSDL operation.

```
<xs:element name="RemoveDistributionGroupFromImListResponse"
type="m:RemoveDistributionGroupFromImListResponseMessageType"
xmlns:xs="http://www.w3.org/2001/XMLSchema"/>
```

### 3.1.4.8.3 Complex Types

The following table summarizes the XML schema complex type definitions that are specific to this operation.

| Complex type   | Description  |
|--|--|
| RemoveDistributionGroupFromImListType                | Specifies a request to remove a distribution group from an instant messaging list.       |
| RemoveDistributionGroupFromImListResponseMessageType | Specifies the response message for a <b>RemoveDistributionGroupFromImList</b> operation. |

### 3.1.4.8.3.1 RemoveDistributionGroupFromImListType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **RemoveDistributionGroupFromImListType** complex type specifies a request to remove a distribution group from an instant messaging list.

```
<xs:complexType name="RemoveDistributionGroupFromImListType"
xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:BaseRequestType">
      <xs:sequence>
        <xs:element name="GroupId" type="t:ItemIdType"/>
      </xs:sequence>
    </xs:extension>
  </xs:complexContent>
</xs:complexType>
```

**GroupId:** Represents the identifier of the group.

### 3.1.4.8.3.2 RemoveDistributionGroupFromImListResponseMessageType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **RemoveDistributionGroupFromImListResponseMessageType** complex type specifies the response message for a **RemoveDistributionGroupFromImList** operation.

```
<xs:complexType name="RemoveDistributionGroupFromImListResponseMessageType"
  xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:ResponseMessageType"/>
  </xs:complexContent>
</xs:complexType>
```

### 3.1.4.8.4 Simple Types

None.

### 3.1.4.8.5 Attributes

None.

### 3.1.4.8.6 Groups

None.

### 3.1.4.8.7 Attribute Groups

None.

### 3.1.4.9 RemoveImContactFromGroup

The **RemoveImContactFromGroup** operation removes an instant messaging contact from a group.

```
<wsdl:operation name="RemoveImContactFromGroup"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:input message="m:RemoveImContactFromGroupSoapIn"/>
  <wsdl:output message="m:RemoveImContactFromGroupSoapOut"/>
</wsdl:operation>
```

The following is the WSDL binding specification of the **RemoveImContactFromGroup** operation.

```
<wsdl:operation name="RemoveImContactFromGroup"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <soap:operation
    soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/RemoveImContactFromGroup"
    xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/"/>
  <wsdl:input>
    <soap:header message="m:RemoveImContactFromGroupSoapIn" part="Impersonation"
      use="literal" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/"/>
    <soap:header message="m:RemoveImContactFromGroupSoapIn" part="MailboxCulture"
      use="literal" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/"/>
    <soap:header message="m:RemoveImContactFromGroupSoapIn" part="RequestVersion"
      use="literal" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/"/>
```

```

<soap:body use="literal" parts="request"
xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
</wsdl:input>
<wsdl:output>
<soap:body use="literal" parts="RemoveImContactFromGroupResult"
xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
<soap:header message="m:RemoveImContactFromGroupSoapOut" part="ServerVersion"
use="literal" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/">
</wsdl:output>
</wsdl:operation>

```

### 3.1.4.9.1 Messages

The following table summarizes the set of WSDL message definitions that are specific to this operation.

| Message                         | Description                                |
|---------------------------------|--|
| RemoveImContactFromGroupSoapIn  | Contains the inbound <b>SOAP message</b> . |
| RemoveImContactFromGroupSoapOut | Contains the outbound SOAP message.        |

#### 3.1.4.9.1.1 RemoveImContactFromGroupSoapIn

The **RemoveImContactFromGroupSoapIn** WSDL message specifies the request to remove an instant messaging contact from a group.

The following is the **RemoveImContactFromGroup** WSDL message specification.

```

<wsdl:message name="RemoveImContactFromGroupSoapIn"
xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
<wsdl:part name="request" element="m:RemoveImContactFromGroup"/>
<wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
<wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
<wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
</wsdl:message>

```

The **RemoveImContactFromGroup** WSDL message is the input message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/RemoveImContactFromGroup>.

The parts of the **RemoveImContactFromGroup** WSDL message are described in the following table.

| Part name      | Element/type   | Description  |
|----------------|--|--|
| request        | m:RemoveImContactFromGroup<br>(section <a href="#">3.1.4.9.2.1</a> )         | Specifies the SOAP body of the request containing the information that is required to query for availability.        |
| Impersonation  | t:ExchangeImpersonation<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.3) | Specifies a SOAP header that identifies the user whom the client is impersonating. <a href="#"><u>&lt;17&gt;</u></a> |
| MailboxCulture | t:MailboxCulture<br>( <a href="#">[MS-OXWSCDATA]</a> section                 | Specifies a SOAP header that identifies the culture to be used for accessing the mailbox. The cultures               |

| Part name      | Element/type  | Description   |
|----------------|---|---|
|                | 2.2.4.39)   | are defined in <a href="#">[RFC3066]</a> .  |
| RequestVersion | t:RequestServerVersion<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.9) | Specifies a SOAP header that identifies the schema version for the <b>RemoveImContactFromGroup</b> operation request. <a href="#"><u>&lt;18&gt;</u></a> |

### 3.1.4.9.1.2 RemoveImContactFromGroupSoapOut

The **RemoveImContactFromGroupSoapOut** WSDL message specifies the response to the **RemoveImContactFromGroupSoapIn** request.

The following is the **RemoveImContactFromGroup** WSDL message specification.

```

<wsdl:message name="RemoveImContactFromGroupSoapOut"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/"
    <wsdl:part name="RemoveImContactFromGroupResult"
      element="m:RemoveImContactFromGroupResponse"/>
    <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
  </wsdl:message>

```

The **RemoveImContactFromGroup** WSDL message is the output message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/RemoveImContactFromGroup>.

The parts of the **RemoveImContactFromGroup** WSDL message are described in the following table.

| Part name                      | Element/type   | Description   |
|--------------------------------|--|---|
| RemoveImContactFromGroupResult | m:RemoveImContactFromGroupResponse<br>(section <a href="#">3.1.4.9.2.2</a> ) | Specifies the SOAP body of the response that contains the requested availability information. |
| ServerVersion                  | t:ServerVersionInfo<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.10)    | Specifies a SOAP header that identifies the server version for the response.                  |

### 3.1.4.9.2 Elements

The following table summarizes the XML schema element definitions that are specific to this operation.

| Element                          | Description   |
|----------------------------------|---|
| RemoveImContactFromGroup         | The input data for the <b>RemoveImContactFromGroup</b> WSDL operation.  |
| RemoveImContactFromGroupResponse | The result data for the <b>RemoveImContactFromGroup</b> WSDL operation. |

### 3.1.4.9.2.1 RemoveImContactFromGroup

The input data for the **RemoveImContactFromGroup** WSDL operation.

```
<xs:element name="RemoveImContactFromGroup" type="m:RemoveImContactFromGroupType"
xmlns:xs="http://www.w3.org/2001/XMLSchema"/>
```

### 3.1.4.9.2.2 RemoveImContactFromGroupResponse

The result data for the **RemoveImContactFromGroup** WSDL operation.

```
<xs:element name="RemoveImContactFromGroupResponse"
type="m:RemoveImContactFromGroupResponseMessageType"
xmlns:xs="http://www.w3.org/2001/XMLSchema"/>
```

### 3.1.4.9.3 Complex Types

The following table summarizes the XML schema complex type definitions that are specific to this operation.

| Complex type                                | Description   |
|---|---|
| RemoveImContactFromGroupType                | Specifies a request to remove an instant messaging contact from a group.        |
| RemoveImContactFromGroupResponseMessageType | Specifies the response message for a <b>RemoveImContactFromGroup</b> operation. |

#### 3.1.4.9.3.1 RemoveImContactFromGroupType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **RemoveImContactFromGroupType** complex type specifies a request to remove an instant messaging contact from a group.

```
<xs:complexType name="RemoveImContactFromGroupType"
xmlns:xs="http://www.w3.org/2001/XMLSchema">
<xs:complexContent mixed="false">
<xs:extension base="m:BaseRequestType">
<xs:sequence>
<xs:element name="ContactId" type="t:ItemIdType"/>
<xs:element name="GroupId" type="t:ItemIdType"/>
</xs:sequence>
</xs:extension>
</xs:complexContent>
</xs:complexType>
```

**ContactId:** Represents the identifier of the contact.

**GroupId:** Represents the identifier of the group.

### 3.1.4.9.3.2 RemoveImContactFromGroupResponseMessageType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **RemoveImContactFromGroupResponseMessageType** complex type specifies the response message for a **RemoveImContactFromGroup** operation.

```
<xs:complexType name="RemoveImContactFromGroupResponseMessageType"
  xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:ResponseMessageType"/>
  </xs:complexContent>
</xs:complexType>
```

### 3.1.4.9.4 Simple Types

None.

### 3.1.4.9.5 Attributes

None.

### 3.1.4.9.6 Groups

None.

### 3.1.4.9.7 Attribute Groups

None.

## 3.1.4.10 RemoveImGroup

The **RemoveImGroup** operation removes the instant messaging and all of the contacts in the group. If a contact is a member of only this group, it is removed from the QuickContacts folder.

```
<wsdl:operation name="RemoveImGroup" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:input message="m:RemoveImGroupSoapIn"/>
  <wsdl:output message="m:RemoveImGroupSoapOut"/>
</wsdl:operation>
```

The following is the WSDL binding specification of the **RemoveImGroup** operation.

```
<wsdl:operation name="RemoveImGroup" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <soap:operation
    soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/RemoveImGroup"
    xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/"/>
  <wsdl:input>
    <soap:header message="m:RemoveImGroupSoapIn" part="Impersonation" use="literal"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/"/>
    <soap:header message="m:RemoveImGroupSoapIn" part="MailboxCulture" use="literal"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/"/>
    <soap:header message="m:RemoveImGroupSoapIn" part="RequestVersion" use="literal"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/"/>
    <soap:body use="literal" parts="request"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/"/>
  </wsdl:input>
```

```

</wsdl:input>
<wsdl:output>
  <soap:body use="literal" parts="RemoveImGroupResult"
  xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
  <soap:header message="m:RemoveImGroupSoapOut" part="ServerVersion" use="literal"
  xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/" />
</wsdl:output>
</wsdl:operation>

```

### 3.1.4.10.1 Messages

The following table summarizes the set of WSDL message definitions that are specific to this operation.

| Message              | Description   |
|----------------------|---|
| RemoveImGroupSoapIn  | Specifies the request to remove an instant messaging group.       |
| RemoveImGroupSoapOut | Specifies the response to the <b>RemoveImGroupSoapIn</b> request. |

#### 3.1.4.10.1.1 RemoveImGroupSoapIn

The **RemoveImGroupSoapIn** WSDL message specifies the request to remove an instant messaging group.

The following is the **RemoveImGroup** WSDL message specification.

```

<wsdl:message name="RemoveImGroupSoapIn" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="request" element="m:RemoveImGroup"/>
  <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
  <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
  <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
</wsdl:message>

```

The **RemoveImGroup** WSDL message is the input message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/RemoveImGroup>.

The parts of the **RemoveImGroup** WSDL message are described in the following table.

| Part name      | Element/type   | Description   |
|----------------|--|---|
| request        | m:RemoveImGroup<br>(section <a href="#">3.1.4.10.2.1</a> )                   | Specifies the SOAP body of the request containing the information that is required to query for availability.                                     |
| Impersonation  | t:ExchangeImpersonation<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.3) | Specifies a SOAP header that identifies the user whom the client is impersonating. <a href="#">&lt;19&gt;</a>                                     |
| MailboxCulture | t:MailboxCulture<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.4.39)       | Specifies a SOAP header that identifies the culture to be used for accessing the mailbox. The cultures are defined in <a href="#">[RFC3066]</a> . |
| RequestVersion | t:RequestServerVersion<br>( <a href="#">[MS-OXWSCDATA]</a> section           | Specifies a SOAP header that identifies the schema version for the <b>RemoveImGroup</b> operation   |

| Part name | Element/type | Description                 |
|-----------|--------------|-----------------------------|
|           | 2.2.5.9)     | request. <a href="#">20</a> |

### 3.1.4.10.1.2 RemoveImGroupSoapOut

The **RemoveImGroupSoapOut** WSDL message specifies the response to the **RemovImGroupSoapIn** request.

The following is the **RemoveImGroup** WSDL message specification.

```
<wsdl:message name="RemoveImGroupSoapOut" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="RemoveImGroupResult" element="m:RemoveImGroupResponse"/>
  <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
</wsdl:message>
```

The **RemoveImGroup** WSDL message is the output message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/RemoveImGroup>.

The parts of the **RemoveImGroup** WSDL message are described in the following table.

| Part name           | Element/type  | Description   |
|---------------------|---|---|
| RemoveImGroupResult | m:RemoveImGroupResponse<br>(section <a href="#">3.1.4.10.2.2</a> )      | Specifies the SOAP body of the response that contains the requested availability information. |
| ServerVersion       | t:ServerVersionInfo<br>( <a href="#">MS-OXWSCDATA</a> section 2.2.5.10) | Specifies a SOAP header that identifies the server version for the response.                  |

### 3.1.4.10.2 Elements

The following table summarizes the XML schema element definitions that are specific to this operation.

| Element               | Description  |
|-----------------------|--|
| RemoveImGroup         | The input data for the <b>RemoveImGroup</b> WSDL operation.  |
| RemoveImGroupResponse | The result data for the <b>RemoveImGroup</b> WSDL operation. |

### 3.1.4.10.2.1 RemoveImGroup

The input data for the **RemoveImGroup** WSDL operation.

```
<xss:element name="RemoveImGroup" type="m:RemoveImGroupType"
  xmlns:xss="http://www.w3.org/2001/XMLSchema"/>
```

### 3.1.4.10.2.2 RemoveImGroupResponse

The result data for the **RemoveImGroup** WSDL operation.

```
<xs:element name="RemoveImGroupResponse" type="m:RemoveImGroupResponseMessageType"
xmlns:xs="http://www.w3.org/2001/XMLSchema"/>
```

### 3.1.4.10.3 Complex Types

The following table summarizes the XML schema complex type definitions that are specific to this operation.

| Complex type                     | Description  |
|----------------------------------|--|
| RemoveImGroupType                | Specifies a request to remove an instant messaging group.            |
| RemoveImGroupResponseMessageType | Specifies the response message for a <b>RemoveImGroup</b> operation. |

#### 3.1.4.10.3.1 RemoveImGroupType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **RemoveImGroupType** complex type specifies a request to remove an instant messaging group.

```
<xs:complexType name="RemoveImGroupType" xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:BaseRequestType">
      <xs:sequence>
        <xs:element name="GroupId" type="t:ItemIdType"/>
      </xs:sequence>
    </xs:extension>
  </xs:complexContent>
</xs:complexType>
```

**GroupId:** Represents the identifier of the group.

#### 3.1.4.10.3.2 RemoveImGroupResponseMessageType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **RemoveImGroupResponseMessageType** complex type specifies the response message for a **RemoveImGroup** operation.

```
<xs:complexType name="RemoveImGroupResponseMessageType" xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:ResponseMessageType"/>
  </xs:complexContent>
</xs:complexType>
```

### 3.1.4.10.4 Simple Types

None.

### 3.1.4.10.5 Attributes

None.

### 3.1.4.10.6 Groups

None.

### 3.1.4.10.7 Attribute Groups

None.

## 3.1.4.11 SetImGroup

The **SetImGroup** operation changes the display name of an instant messaging group.

```
<wsdl:operation name="SetImGroup" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:input message="m:SetImGroupSoapIn"/>
  <wsdl:output message="m:SetImGroupSoapOut"/>
</wsdl:operation>
```

The following is the WSDL binding specification of the **SetImGroup** operation.

```
<wsdl:operation name="SetImGroup" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <soap:operation
    soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/SetImGroup"
    xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
  <wsdl:input>
    <soap:header message="m:SetImGroupSoapIn" part="Impersonation" use="literal"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
    <soap:header message="m:SetImGroupSoapIn" part="MailboxCulture" use="literal"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
    <soap:header message="m:SetImGroupSoapIn" part="RequestVersion" use="literal"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
    <soap:body use="literal" parts="request"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
  </wsdl:input>
  <wsdl:output>
    <soap:body use="literal" parts="SetImGroupResult"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
    <soap:header message="m:SetImGroupSoapOut" part="ServerVersion" use="literal"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
  </wsdl:output>
</wsdl:operation>
```

### 3.1.4.11.1 Messages

The following table summarizes the set of WSDL message definitions that are specific to this operation.

| Message           | Description  |
|-------------------|--|
| SetImGroupSoapIn  | Specifies the request to set an instant messaging group.       |
| SetImGroupSoapOut | Specifies the response to the <b>SetImGroupSoapIn</b> request. |

### 3.1.4.11.1.1 SetImGroupSoapIn

The **SetImGroupSoapIn** WSDL message specifies the request to set an instant messaging group.

The following is the **SetImGroup** WSDL message specification.

```
<wsdl:message name="SetImGroupSoapIn" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="request" element="m:SetImGroup"/>
  <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
  <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
  <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
</wsdl:message>
```

The **SetImGroup** WSDL message is the input message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/SetImGroup>.

The parts of the **SetImGroup** WSDL message are described in the following table.

| Part name      | Element/type   | Description   |
|----------------|--|---|
| request        | m:SetImGroup<br>section <a href="#">3.1.4.11.2.1</a> )                       | Specifies the SOAP body of the request containing the information that is required to query for availability.                                     |
| Impersonation  | t:ExchangeImpersonation<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.3) | Specifies a SOAP header that identifies the user whom the client is impersonating. <a href="#">&lt;21&gt;</a>                                     |
| MailboxCulture | t:MailboxCulture<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.4.39)       | Specifies a SOAP header that identifies the culture to be used for accessing the mailbox. The cultures are defined in <a href="#">[RFC3066]</a> . |
| RequestVersion | t:RequestServerVersion<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.9)  | Specifies a SOAP header that identifies the schema version for the <b>SetImGroup</b> operation request. <a href="#">&lt;22&gt;</a>                |

### 3.1.4.11.1.2 SetImGroupSoapOut

The **SetImGroupSoapOut** WSDL message specifies the response to the **SetImGroupSoapIn** request.

The following is the **SetImGroup** WSDL message specification.

```
<wsdl:message name="SetImGroupSoapOut" xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="SetImGroupResult" element="m:SetImGroupResponse"/>
  <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
</wsdl:message>
```

The **SetImGroup** WSDL message is the output message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/SetImGroup>.

The parts of the **SetImGroup** WSDL message are described in the following table.

| <b>Part name</b> | <b>Element/type</b>  | <b>Description</b>  |
|------------------|--|---|
| SetImGroupResult | m:SetImGroupResponse<br>(section <a href="#">3.1.4.11.2.2</a> )          | Specifies the SOAP body of the response that contains the requested availability information. |
| ServerVersion    | t:ServerVersionInfo<br>( <a href="#">IMS-OXWSCDATA</a> section 2.2.5.10) | Specifies a SOAP header that identifies the server version for the response.                  |

### 3.1.4.11.2 Elements

The following table summarizes the XML schema element definitions that are specific to this operation.

| <b>Element</b>     | <b>Description</b>  |
|--------------------|---|
| SetImGroup         | The input data for the <b>SetImGroup</b> WSDL operation.  |
| SetImGroupResponse | The result data for the <b>SetImGroup</b> WSDL operation. |

#### 3.1.4.11.2.1 SetImGroup

The input data for the **SetImGroup** WSDL operation.

```
<xss:element name="SetImGroup" type="m:SetImGroupType"
  xmlns:xss="http://www.w3.org/2001/XMLSchema"/>
```

#### 3.1.4.11.2.2 SetImGroupResponse

The result data for the **SetImGroup** WSDL operation.

```
<xss:element name="SetImGroupResponse" type="m:SetImGroupResponseMessageType"
  xmlns:xss="http://www.w3.org/2001/XMLSchema"/>
```

### 3.1.4.11.3 Complex Types

The following table summarizes the XML schema complex type definitions that are specific to this operation.

| <b>Complex type</b>           | <b>Description</b>  |
|-------------------------------|---|
| SetImGroupType                | Specifies a request to set an instant messaging group.            |
| SetImGroupResponseMessageType | Specifies the response message for a <b>SetImGroup</b> operation. |

#### 3.1.4.11.3.1 SetImGroupType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **SetImGroupType** complex type specifies a request to set an instant messaging group.

```
<xss:complexType name="SetImGroupType" xmlns:xss="http://www.w3.org/2001/XMLSchema">
```

```

<xs:complexContent mixed="false">
  <xs:extension base="m:BaseRequestType">
    <xs:sequence>
      <xs:element name="GroupId" type="t:ItemIdType"/>
      <xs:element name="NewDisplayName" type="t:NonEmptyStringType"/>
    </xs:sequence>
  </xs:extension>
</xs:complexContent>
</xs:complexType>

```

**GroupId:** Represents the identifier of the group.

**NewDisplayName:** Represents the new display name of the contact.

#### 3.1.4.11.3.2 SetImGroupResponseMessageType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **SetImGroupResponseMessageType** complex type specifies the response message for a **SetImGroup** operation.

```

<xs:complexType name="SetImGroupResponseMessageType"
  xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:complexContent mixed="false">
    <xs:extension base="m:ResponseMessageType"/>
  </xs:complexContent>
</xs:complexType>

```

#### 3.1.4.11.4 Simple Types

None.

#### 3.1.4.11.5 Attributes

None.

#### 3.1.4.11.6 Groups

None.

#### 3.1.4.11.7 Attribute Groups

None.

#### 3.1.4.12 SetImListMigrationCompleted

The **SetImListMigrationCompleted** operation indicates whether the instant messaging contacts in a mailbox have been migrated to the Exchange server.

```

<wsdl:operation name="SetImListMigrationCompleted"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:input message="m:SetImListMigrationCompletedSoapIn"/>
  <wsdl:output message="m:SetImListMigrationCompletedSoapOut"/>

```

```
</wsdl:operation>
```

The following is the WSDL binding specification of the **SetImListMigrationCompleted** operation.

```
<wsdl:operation name="SetImListMigrationCompleted"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <soap:operation
    soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/SetImListMigrationCompleted" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
  <wsdl:input>
    <soap:header message="m:SetImListMigrationCompletedSoapIn" part="Impersonation"
      use="literal" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
    <soap:header message="m:SetImListMigrationCompletedSoapIn" part="MailboxCulture"
      use="literal" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
    <soap:header message="m:SetImListMigrationCompletedSoapIn" part="RequestVersion"
      use="literal" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
    <soap:body use="literal" parts="request"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
  </wsdl:input>
  <wsdl:output>
    <soap:body use="literal" parts="SetImListMigrationCompletedResult"
      xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
    <soap:header message="m:SetImListMigrationCompletedSoapOut" part="ServerVersion"
      use="literal" xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap://" />
  </wsdl:output>
</wsdl:operation>
```

When the user's mailbox has been migrated to Unified Contact Store (UCS) mode, the **ImListMigrationCompleted** property is set on the user's Active Directory object.

### 3.1.4.12.1 Messages

The following table summarizes the set of WSDL message definitions that are specific to this operation.

| Message                            | Description   |
|------------------------------------|---|
| SetImListMigrationCompletedSoapIn  | Specifies the request to indicate whether the instant messaging migration to the Exchange server is complete. |
| SetImListMigrationCompletedSoapOut | Specifies the response to the <b>SetImListMigrationCompletedSoapIn</b> request.                               |

#### 3.1.4.12.1.1 SetImListMigrationCompletedSoapIn

The **SetImListMigrationCompletedSoapIn** WSDL message specifies the request to indicate whether the instant messaging migration to the Exchange server is complete.

The following is the **SetImListMigrationCompleted** WSDL message specification.

```
<wsdl:message name="SetImListMigrationCompletedSoapIn"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="request" element="m:SetImListMigrationCompleted"/>
  <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
  <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
  <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
```

```
</wsdl:message>
```

The **SetImListMigrationCompleted** WSDL message is the input message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/SetImListMigrationCompleted>.

The parts of the **SetImListMigrationCompleted** WSDL message are described in the following table.

| Part name      | Element/type   | Description  |
|----------------|--|--|
| request        | m:SetImListMigrationCompleted<br>(section <a href="#">3.1.4.12.2.1</a> )     | Specifies the SOAP body of the request containing the information that is required to query for availability.  |
| Impersonation  | t:ExchangeImpersonation<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.3) | Specifies a SOAP header that identifies the user whom the client is impersonating. <a href="#"><u>&lt;23&gt;</u></a>                                       |
| MailboxCulture | t:MailboxCulture<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.4.39)       | Specifies a SOAP header that identifies the culture to be used for accessing the mailbox. The cultures are defined in <a href="#">[RFC3066]</a> .          |
| RequestVersion | t:RequestServerVersion<br>( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.9)  | Specifies a SOAP header that identifies the schema version for the <b>SetImListMigrationCompleted</b> operation request. <a href="#"><u>&lt;24&gt;</u></a> |

### 3.1.4.12.1.2 SetImListMigrationCompletedSoapOut

The **SetImListMigrationCompletedSoapOut** WSDL message specifies the response to the **SetImListMigrationCompletedSoapIn** request.

The following is the **SetImListMigrationCompleted** WSDL message specification.

```
<wsdl:message name="SetImListMigrationCompletedSoapOut"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:part name="SetImListMigrationCompletedResult"
    element="m:SetImListMigrationCompletedResponse"/>
  <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
</wsdl:message>
```

The **SetImListMigrationCompleted** WSDL message is the output message for the SOAP action <http://schemas.microsoft.com/exchange/services/2006/messages/SetImListMigrationCompleted>.

The parts of the **SetImListMigrationCompleted** WSDL message are described in the following table.

| Part name                         | Element/type   | Description   |
|-----------------------------------|--|---|
| SetImListMigrationCompletedResult | m:SetImListMigrationCompletedResponse<br>(section <a href="#">3.1.4.12.2.2</a> ) | Specifies the SOAP body of the response that contains the requested availability information. |
| ServerVersion                     | t:ServerVersionInfo  | Specifies a SOAP  |

| Part name | Element/type                                       | Description   |
|-----------|--|---|
|           | ( <a href="#">[MS-OXWSCDATA]</a> section 2.2.5.10) | header that identifies the server version for the response. |

### 3.1.4.12.2 Elements

The following table summarizes the XML schema element definitions that are specific to this operation.

| Element                             | Description  |
|-------------------------------------|--|
| SetImListMigrationCompleted         | The input data for the <b>SetImListMigrationCompleted</b> WSDL operation.  |
| SetImListMigrationCompletedResponse | The result data for the <b>SetImListMigrationCompleted</b> WSDL operation. |

#### 3.1.4.12.2.1 SetImListMigrationCompleted

The input data for the **SetImListMigrationCompleted** WSDL operation.

```
<xss:element name="SetImListMigrationCompleted" type="m:SetImListMigrationCompletedType"
  xmlns:xss="http://www.w3.org/2001/XMLSchema"/>
```

#### 3.1.4.12.2.2 SetImListMigrationCompletedResponse

The result data for the **SetImListMigrationCompleted** WSDL operation.

```
<xss:element name="SetImListMigrationCompletedResponse"
  type="m:SetImListMigrationCompletedResponseMessageType"
  xmlns:xss="http://www.w3.org/2001/XMLSchema"/>
```

### 3.1.4.12.3 Complex Types

The following table summarizes the XML schema complex type definitions that are specific to this operation.

| Complex type                                   | Description  |
|--|--|
| SetImListMigrationCompletedType                | Specifies whether the migration of a contact list from Exchange to an instant messaging system is complete |
| SetImListMigrationCompletedResponseMessageType | Specifies the response message for the <b>SetImListMigrationCompleted</b> operation.                       |

#### 3.1.4.12.3.1 SetImListMigrationCompletedType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **SetImListMigrationCompletedType** complex type specifies whether the migration of a contact list from Exchange to an instant messaging system is complete.

```
<xs:complexType name="SetImListMigrationCompletedType">
  xmlns:xs="http://www.w3.org/2001/XMLSchema">
    <xs:complexContent mixed="false">
      <xs:extension base="m:BaseRequestType">
        <xs:sequence>
          <xs:element name="ImListMigrationCompleted" type="xs:boolean"/>
        </xs:sequence>
      </xs:extension>
    </xs:complexContent>
  </xs:complexType>
```

**ImListMigrationCompleted:** Contains a Boolean value that indicates whether migration is complete.

### 3.1.4.12.3.2 SetImListMigrationCompletedResponseMessageType

**Namespace:** <http://schemas.microsoft.com/exchange/services/2006/messages>

The **SetImListMigrationCompletedResponseMessageType** complex type specifies the response message for the **SetImListMigrationCompleted** operation.

```
<xs:complexType name="SetImListMigrationCompletedResponseMessageType">
  xmlns:xs="http://www.w3.org/2001/XMLSchema">
    <xs:complexContent mixed="false">
      <xs:extension base="m:ResponseMessageType"/>
    </xs:complexContent>
  </xs:complexType>
```

### 3.1.4.12.4 Simple Types

None.

### 3.1.4.12.5 Attributes

None.

### 3.1.4.12.6 Groups

None.

### 3.1.4.12.7 Attribute Groups

None.

## 3.1.5 Timer Events

None.

## 3.1.6 Other Local Events

None.

## 4 Protocol Examples

The following example of an **AddImGroup** operation request shows how to create an instant messaging group named "MyCustomerGroup".

```
<?xml version="1.0" encoding="UTF-8"?>
<soap:Envelope xmlns:soap="http://schemas.xmlsoap.org/soap/envelope/"
    xmlns:t="http://schemas.microsoft.com/exchange/services/2006/types"
    xmlns:m="http://schemas.microsoft.com/exchange/services/2006/messages">
    <soap:Header>
        <t:RequestServerVersion Version="Exchange2012" />
        <t:MailboxCulture>en-US</t:MailboxCulture>
        <t:TimeZoneContext>
            <t:TimeZoneDefinition Id="GMT Standard Time"/>
        </t:TimeZoneContext>
    </soap:Header>
    <soap:Body>
        <m:AddImGroup>
            <m:DisplayName>MyCustomGroup</m:DisplayName>
        </m:AddImGroup>
    </soap:Body>
</soap:Envelope>
```

The following example shows a successful response to an **AddImGroup** operation request. The Exchange store identifier has been shortened to preserve readability.

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
    <s:Header>
        <h:ServerVersionInfo MajorVersion="15"
            MinorVersion="0"
            MajorBuildNumber="349"
            MinorBuildNumber="0"
            Version="Exchange2012"
            xmlns:h="http://schemas.microsoft.com/exchange/services/2006/types"
            xmlns="http://schemas.microsoft.com/exchange/services/2006/types"
            xmlns:xsd="http://www.w3.org/2001/XMLSchema"
            xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"/>
    </s:Header>
    <s:Body xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
        xmlns:xsd="http://www.w3.org/2001/XMLSchema">
        <AddImGroupResponse ResponseClass="Success"
            xmlns="http://schemas.microsoft.com/exchange/services/2006/messages">
            <ResponseCode>NoError</ResponseCode>
            <ImGroup>
                <DisplayName
                    xmlns="http://schemas.microsoft.com/exchange/services/2006/types">MyCustomGroup</DisplayName>
                <GroupType
                    xmlns="http://schemas.microsoft.com/exchange/services/2006/types">IPM.DistList.MOC.UserGroup</GroupType>
                <ExchangeStoreId Id="AAMkAGQ1MjJjMTBkLTc4Y2UtNDA5Ny04ZjU5LWI3MAAA="
                    ChangeKey="EgAAAA==">
                    xmlns="http://schemas.microsoft.com/exchange/services/2006/types"/>
            </ImGroup>
        </AddImGroupResponse>
    </s:Body>
</s:Envelope>
```

```
</AddImGroupResponse>
</s:Body>
</s:Envelope>
```

The following code example shows how to add a contact to an IM group. The group and contact identifiers have been shortened to preserve readability.

```
<?xml version="1.0" encoding="UTF-8"?>
<soap:Envelope xmlns:soap="http://schemas.xmlsoap.org/soap/envelope/"
    xmlns:t="http://schemas.microsoft.com/exchange/services/2006/types"
    xmlns:m="http://schemas.microsoft.com/exchange/services/2006/messages">
    <soap:Header>
        <t:RequestServerVersion Version="Exchange2012" />
        <t:MailboxCulture>en-US</t:MailboxCulture>
    </soap:Header>
    <soap:Body>
        <m:AddImContactToGroup>
            <m:ContactId Id="AAMkAGQ1MjJjMTBkLTC4Y2AA="
                ChangeKey="EQAAABYAAABtF8oI7i"/>
            <m:GroupId Id="AAMkAGQ1MjJjMTBkzzAAAQKAAA="
                ChangeKey="EgAAAA=="/>
        </m:AddImContactToGroup>
    </soap:Body>
</soap:Envelope>
```

The following example shows a successful response to an **AddImContactToGroup** operation request.

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
    <s:Header>
        <h:ServerVersionInfo MajorVersion="15"
            MinorVersion="0"
            MajorBuildNumber="349"
            MinorBuildNumber="0"
            Version="Exchange2012"
            xmlns:h="http://schemas.microsoft.com/exchange/services/2006/types"
            xmlns="http://schemas.microsoft.com/exchange/services/2006/types"
            xmlns:xsd="http://www.w3.org/2001/XMLSchema"
            xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"/>
    </s:Header>
    <s:Body xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
        xmlns:xsd="http://www.w3.org/2001/XMLSchema">
        <AddImContactToGroupResponse ResponseClass="Success"
            xmlns="http://schemas.microsoft.com/exchange/services/2006/messages">
            <ResponseCode>NoError</ResponseCode>
        </AddImContactToGroupResponse>
    </s:Body>
</s:Envelope>
```

The following example of a **RemoveImGroup** operation request shows how to remove an IM group. The group identifier has been shortened to preserve readability,

```
<?xml version="1.0" encoding="UTF-8"?>
<soap:Envelope xmlns:soap="http://schemas.xmlsoap.org/soap/envelope/"
    xmlns:t="http://schemas.microsoft.com/exchange/services/2006/types"
    xmlns:m="http://schemas.microsoft.com/exchange/services/2006/messages">
    <soap:Header>
        <t:RequestServerVersion Version="Exchange2012" />
        <t:MailboxCulture>en-US</t:MailboxCulture>
        <t:TimeZoneContext>
            <t:TimeZoneDefinition Id="GMT Standard Time"/>
        </t:TimeZoneContext>
    </soap:Header>
    <soap:Body>
        <m:RemoveImGroup>
            <m:GroupId Id="AAMkAGQ1MjJjMTBkLTC4Y2UtNDA5hQoTbWAAAAAAQRAAA=" ChangeKey="EgAAAA==" />
        </m:RemoveImGroup>
    </soap:Body>
</soap:Envelope>
```

The following example shows a successful response to a **RemoveImGroup** operation request.

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
    <s:Header>
        <h:ServerVersionInfo MajorVersion="15"
            MinorVersion="0"
            MajorBuildNumber="349"
            MinorBuildNumber="0"
            Version="Exchange2012"
            xmlns:h="http://schemas.microsoft.com/exchange/services/2006/types"
            xmlns="http://schemas.microsoft.com/exchange/services/2006/types"
            xmlns:xsd="http://www.w3.org/2001/XMLSchema"
            xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"/>
    </s:Header>
    <s:Body xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
        xmlns:xsd="http://www.w3.org/2001/XMLSchema">
        <RemoveImGroupResponse ResponseClass="Success"
            xmlns="http://schemas.microsoft.com/exchange/services/2006/messages">
            <ResponseCode>NoError</ResponseCode>
        </RemoveImGroupResponse>
    </s:Body>
</s:Envelope>
```

## 5 Security

### 5.1 Security Considerations for Implementers

This protocol relies on the web server that hosts the application to perform authentication. The protocol SHOULD use secure communications by means of HTTPS, as defined in [\[RFC2818\]](#).

### 5.2 Index of Security Parameters

None.

## 6 Appendix A: Full WSDL

For ease of implementation, the full WSDL is provided in this appendix.

```
<?xml version="1.0"?>
<wsdl:definitions xmlns:soap="http://schemas.xmlsoap.org/wsdl/soap/"
  xmlns:m="http://schemas.microsoft.com/exchange/services/2006/messages"
  xmlns:t="http://schemas.microsoft.com/exchange/services/2006/types"
  targetNamespace="http://schemas.microsoft.com/exchange/services/2006/messages"
  xmlns:wsdl="http://schemas.xmlsoap.org/wsdl/">
  <wsdl:types/>
  <wsdl:message name="AddDistributionGroupToImListSoapIn">
    <wsdl:part name="request" element="m:AddDistributionGroupToImList"/>
    <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
    <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
    <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
  </wsdl:message>
  <wsdl:message name="AddDistributionGroupToImListSoapOut">
    <wsdl:part name="AddDistributionGroupToImListResult"
      element="m:AddDistributionGroupToImListResponse"/>
    <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
  </wsdl:message>
  <wsdl:message name="AddImContactToGroupSoapIn">
    <wsdl:part name="request" element="m:AddImContactToGroup"/>
    <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
    <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
    <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
  </wsdl:message>
  <wsdl:message name="AddImContactToGroupSoapOut">
    <wsdl:part name="AddImContactToGroupResult" element="m:AddImContactToGroupResponse"/>
    <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
  </wsdl:message>
  <wsdl:message name="AddImGroupSoapIn">
    <wsdl:part name="request" element="m:AddImGroup"/>
    <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
    <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
    <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
  </wsdl:message>
  <wsdl:message name="AddImGroupSoapOut">
    <wsdl:part name="AddImGroupResult" element="m:AddImGroupResponse"/>
    <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
  </wsdl:message>
  <wsdl:message name="AddNewImContactToGroupSoapIn">
    <wsdl:part name="request" element="m:AddNewImContactToGroup"/>
    <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
    <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
    <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
  </wsdl:message>
  <wsdl:message name="AddNewImContactToGroupSoapOut">
    <wsdl:part name="AddNewImContactToGroupResult"
      element="m:AddNewImContactToGroupResponse"/>
    <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
  </wsdl:message>
  <wsdl:message name="GetImItemListSoapIn">
    <wsdl:part name="request" element="m:GetImItemList"/>
    <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
    <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
    <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
  </wsdl:message>
```

```

<wsdl:message name="GetImItemListSoapOut">
  <wsdl:part name="GetImItemListResult" element="m:GetImItemListResponse"/>
  <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
</wsdl:message>
<wsdl:message name="GetImItemsSoapIn">
  <wsdl:part name="request" element="m:GetImItems"/>
  <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
  <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
  <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
</wsdl:message>
<wsdl:message name="GetImItemsSoapOut">
  <wsdl:part name="GetImItemsResult" element="m:GetImItemsResponse"/>
  <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
</wsdl:message>
<wsdl:message name="RemoveContactFromImListSoapIn">
  <wsdl:part name="request" element="m:RemoveContactFromImList"/>
  <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
  <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
  <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
</wsdl:message>
<wsdl:message name="RemoveContactFromImListSoapOut">
  <wsdl:part name="RemoveContactFromImListResult"
element="m:RemoveContactFromImListResponse"/>
  <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
</wsdl:message>
<wsdl:message name="RemoveDistributionGroupFromImListSoapIn">
  <wsdl:part name="request" element="m:RemoveDistributionGroupFromImList"/>
  <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
  <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
  <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
</wsdl:message>
<wsdl:message name="RemoveDistributionGroupFromImListSoapOut">
  <wsdl:part name="RemoveDistributionGroupFromImListResult"
element="m:RemoveDistributionGroupFromImListResponse"/>
  <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
</wsdl:message>
<wsdl:message name="RemoveImContactFromGroupSoapIn">
  <wsdl:part name="request" element="m:RemoveImContactFromGroup"/>
  <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
  <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
  <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
</wsdl:message>
<wsdl:message name="RemoveImContactFromGroupSoapOut">
  <wsdl:part name="RemoveImContactFromGroupResult"
element="m:RemoveImContactFromGroupResponse"/>
  <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
</wsdl:message>
<wsdl:message name="RemoveImGroupSoapIn">
  <wsdl:part name="request" element="m:RemoveImGroup"/>
  <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
  <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
  <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
</wsdl:message>
<wsdl:message name="RemoveImGroupSoapOut">
  <wsdl:part name="RemoveImGroupResult" element="m:RemoveImGroupResponse"/>
  <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
</wsdl:message>
<wsdl:message name="SetImGroupSoapIn">
  <wsdl:part name="request" element="m:SetImGroup"/>

```

```

<wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
<wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
<wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
</wsdl:message>
<wsdl:message name="SetImGroupSoapOut">
  <wsdl:part name="SetImGroupResult" element="m:SetImGroupResponse"/>
  <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
</wsdl:message>
<wsdl:message name="SetImListMigrationCompletedSoapIn">
  <wsdl:part name="request" element="m:SetImListMigrationCompleted"/>
  <wsdl:part name="Impersonation" element="t:ExchangeImpersonation"/>
  <wsdl:part name="MailboxCulture" element="t:MailboxCulture"/>
  <wsdl:part name="RequestVersion" element="t:RequestServerVersion"/>
</wsdl:message>
<wsdl:message name="SetImListMigrationCompletedSoapOut">
  <wsdl:part name="SetImListMigrationCompletedResult"
element="m:SetImListMigrationCompletedResponse"/>
  <wsdl:part name="ServerVersion" element="t:ServerVersionInfo"/>
</wsdl:message>
<wsdl:portType name="ExchangeServicePortType">
  <wsdl:operation name="AddImContactToGroup">
    <wsdl:input message="m:AddImContactToGroupSoapIn"/>
    <wsdl:output message="m:AddImContactToGroupSoapOut"/>
  </wsdl:operation>
  <wsdl:operation name="AddNewImContactToGroup">
    <wsdl:input message="m:AddNewImContactToGroupSoapIn"/>
    <wsdl:output message="m:AddNewImContactToGroupSoapOut"/>
  </wsdl:operation>
  <wsdl:operation name="AddImGroup">
    <wsdl:input message="m:AddImGroupSoapIn"/>
    <wsdl:output message="m:AddImGroupSoapOut"/>
  </wsdl:operation>
  <wsdl:operation name="AddDistributionGroupToImList">
    <wsdl:input message="m:AddDistributionGroupToImListSoapIn"/>
    <wsdl:output message="m:AddDistributionGroupToImListSoapOut"/>
  </wsdl:operation>
  <wsdl:operation name="GetImItemList">
    <wsdl:input message="m:GetImItemListSoapIn"/>
    <wsdl:output message="m:GetImItemListSoapOut"/>
  </wsdl:operation>
  <wsdl:operation name="GetImItems">
    <wsdl:input message="m:GetImItemsSoapIn"/>
    <wsdl:output message="m:GetImItemsSoapOut"/>
  </wsdl:operation>
  <wsdl:operation name="RemoveContactFromImList">
    <wsdl:input message="m:RemoveContactFromImListSoapIn"/>
    <wsdl:output message="m:RemoveContactFromImListSoapOut"/>
  </wsdl:operation>
  <wsdl:operation name="RemoveDistributionGroupFromImList">
    <wsdl:input message="m:RemoveDistributionGroupFromImListSoapIn"/>
    <wsdl:output message="m:RemoveDistributionGroupFromImListSoapOut"/>
  </wsdl:operation>
  <wsdl:operation name="RemoveImContactFromGroup">
    <wsdl:input message="m:RemoveImContactFromGroupSoapIn"/>
    <wsdl:output message="m:RemoveImContactFromGroupSoapOut"/>
  </wsdl:operation>
  <wsdl:operation name="RemoveImGroup">
    <wsdl:input message="m:RemoveImGroupSoapIn"/>
    <wsdl:output message="m:RemoveImGroupSoapOut"/>
  </wsdl:operation>

```

```

        </wsdl:operation>
        <wsdl:operation name="SetImGroup">
            <wsdl:input message="m:SetImGroupSoapIn"/>
            <wsdl:output message="m:SetImGroupSoapOut"/>
        </wsdl:operation>
        <wsdl:operation name="SetImListMigrationCompleted">
            <wsdl:input message="m:SetImListMigrationCompletedSoapIn"/>
            <wsdl:output message="m:SetImListMigrationCompletedSoapOut"/>
        </wsdl:operation>
    </wsdl:portType>
    <wsdl:binding name="ExchangeServiceBinding" type="m:ExchangeServicePortType">
        <wsdl:documentation>
            <wsi:Claim conformsTo="http://ws-i.org/profiles/basic/1.0" xmlns:wsi="http://ws-i.org/schemas/conformanceClaim"/>
        </wsdl:documentation>
        <soap:binding transport="http://schemas.xmlsoap.org/soap/http"/>
        <wsdl:operation name="AddDistributionGroupToImList">
            <soap:operation
                soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/AddDistributionGroupToImList"/>
            <wsdl:input>
                <soap:header message="m:AddDistributionGroupToImListSoapIn" part="Impersonation" use="literal"/>
                <soap:header message="m:AddDistributionGroupToImListSoapIn" part="MailboxCulture" use="literal"/>
                <soap:header message="m:AddDistributionGroupToImListSoapIn" part="RequestVersion" use="literal"/>
                <soap:body use="literal" parts="request"/>
            </wsdl:input>
            <wsdl:output>
                <soap:body use="literal" parts="AddDistributionGroupToImListResult"/>
                <soap:header message="m:AddDistributionGroupToImListSoapOut" part="ServerVersion" use="literal"/>
            </wsdl:output>
        </wsdl:operation>
        <wsdl:operation name="AddImContactToGroup">
            <soap:operation
                soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/AddImContactToGroup"/>
            <wsdl:input>
                <soap:header message="m:AddImContactToGroupSoapIn" part="Impersonation" use="literal"/>
                <soap:header message="m:AddImContactToGroupSoapIn" part="MailboxCulture" use="literal"/>
                <soap:header message="m:AddImContactToGroupSoapIn" part="RequestVersion" use="literal"/>
                <soap:body use="literal" parts="request"/>
            </wsdl:input>
            <wsdl:output>
                <soap:body use="literal" parts="AddImContactToGroupResult"/>
                <soap:header message="m:AddImContactToGroupSoapOut" part="ServerVersion" use="literal"/>
            </wsdl:output>
        </wsdl:operation>
        <wsdl:operation name="AddImGroup">
            <soap:operation
                soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/AddImGroup"/>
            <wsdl:input>
                <soap:header message="m:AddImGroupSoapIn" part="Impersonation" use="literal"/>
                <soap:header message="m:AddImGroupSoapIn" part="MailboxCulture" use="literal"/>

```

```

<soap:header message="m:AddImGroupSoapIn" part="RequestVersion" use="literal"/>
<soap:body use="literal" parts="request"/>
</wsdl:input>
<wsdl:output>
  <soap:body use="literal" parts="AddImGroupResult"/>
  <soap:header message="m:AddImGroupSoapOut" part="ServerVersion" use="literal"/>
</wsdl:output>
</wsdl:operation>
<wsdl:operation name="AddNewImContactToGroup">
  <soap:operation
    soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/AddNewImContactToGro
    up"/>
  <wsdl:input>
    <soap:header message="m:AddNewImContactToGroupSoapIn" part="Impersonation"
      use="literal"/>
    <soap:header message="m:AddNewImContactToGroupSoapIn" part="MailboxCulture"
      use="literal"/>
    <soap:header message="m:AddNewImContactToGroupSoapIn" part="RequestVersion"
      use="literal"/>
    <soap:body use="literal" parts="request"/>
  </wsdl:input>
  <wsdl:output>
    <soap:body use="literal" parts="AddNewImContactToGroupResult"/>
    <soap:header message="m:AddNewImContactToGroupSoapOut" part="ServerVersion"
      use="literal"/>
  </wsdl:output>
</wsdl:operation>
<wsdl:operation name="GetImItemList">
  <soap:operation
    soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/GetImItemList"/>
  <wsdl:input>
    <soap:header message="m:GetImItemListSoapIn" part="Impersonation" use="literal"/>
    <soap:header message="m:GetImItemListSoapIn" part="MailboxCulture" use="literal"/>
    <soap:header message="m:GetImItemListSoapIn" part="RequestVersion" use="literal"/>
    <soap:body use="literal" parts="request"/>
  </wsdl:input>
  <wsdl:output>
    <soap:body use="literal" parts="GetImItemListResult"/>
    <soap:header message="m:GetImItemListSoapOut" part="ServerVersion" use="literal"/>
  </wsdl:output>
</wsdl:operation>
<wsdl:operation name="GetImItems">
  <soap:operation
    soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/GetImItems"/>
  <wsdl:input>
    <soap:header message="m:GetImItemsSoapIn" part="Impersonation" use="literal"/>
    <soap:header message="m:GetImItemsSoapIn" part="MailboxCulture" use="literal"/>
    <soap:header message="m:GetImItemsSoapIn" part="RequestVersion" use="literal"/>
    <soap:body use="literal" parts="request"/>
  </wsdl:input>
  <wsdl:output>
    <soap:body use="literal" parts="GetImItemsResult"/>
    <soap:header message="m:GetImItemsSoapOut" part="ServerVersion" use="literal"/>
  </wsdl:output>
</wsdl:operation>
<wsdl:operation name="RemoveContactFromImList">
  <soap:operation
    soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/RemoveContactFromImL
    ist"/>
  <wsdl:input>

```

```

<soap:header message="m:RemoveContactFromImListSoapIn" part="Impersonation"
use="literal"/>
<soap:header message="m:RemoveContactFromImListSoapIn" part="MailboxCulture"
use="literal"/>
<soap:header message="m:RemoveContactFromImListSoapIn" part="RequestVersion"
use="literal"/>
<soap:body use="literal" parts="request"/>
</wsdl:input>
<wsdl:output>
<soap:body use="literal" parts="RemoveContactFromImListResult"/>
<soap:header message="m:RemoveContactFromImListSoapOut" part="ServerVersion"
use="literal"/>
</wsdl:output>
</wsdl:operation>
<wsdl:operation name="RemoveDistributionGroupFromImList">
<soap:operation
soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/RemoveDistributionGr
oupFromImList"/>
<wsdl:input>
<soap:header message="m:RemoveDistributionGroupFromImListSoapIn" part="Impersonation"
use="literal"/>
<soap:header message="m:RemoveDistributionGroupFromImListSoapIn"
part="MailboxCulture" use="literal"/>
<soap:header message="m:RemoveDistributionGroupFromImListSoapIn"
part="RequestVersion" use="literal"/>
<soap:body use="literal" parts="request"/>
</wsdl:input>
<wsdl:output>
<soap:body use="literal" parts="RemoveDistributionGroupFromImListResult"/>
<soap:header message="m:RemoveDistributionGroupFromImListSoapOut"
part="ServerVersion" use="literal"/>
</wsdl:output>
</wsdl:operation>
<wsdl:operation name="RemoveImContactFromGroup">
<soap:operation
soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/RemoveImContactFromG
roup"/>
<wsdl:input>
<soap:header message="m:RemoveImContactFromGroupSoapIn" part="Impersonation"
use="literal"/>
<soap:header message="m:RemoveImContactFromGroupSoapIn" part="MailboxCulture"
use="literal"/>
<soap:header message="m:RemoveImContactFromGroupSoapIn" part="RequestVersion"
use="literal"/>
<soap:body use="literal" parts="request"/>
</wsdl:input>
<wsdl:output>
<soap:body use="literal" parts="RemoveImContactFromGroupResult"/>
<soap:header message="m:RemoveImContactFromGroupSoapOut" part="ServerVersion"
use="literal"/>
</wsdl:output>
</wsdl:operation>
<wsdl:operation name="RemoveImGroup">
<soap:operation
soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/RemoveImGroup"/>
<wsdl:input>
<soap:header message="m:RemoveImGroupSoapIn" part="Impersonation" use="literal"/>
<soap:header message="m:RemoveImGroupSoapIn" part="MailboxCulture" use="literal"/>
<soap:header message="m:RemoveImGroupSoapIn" part="RequestVersion" use="literal"/>
<soap:body use="literal" parts="request"/>

```

```
</wsdl:input>
<wsdl:output>
  <soap:body use="literal" parts="RemoveImGroupResult"/>
  <soap:header message="m:RemoveImGroupSoapOut" part="ServerVersion" use="literal"/>
</wsdl:output>
</wsdl:operation>
<wsdl:operation name="SetImGroup">
  <soap:operation
    soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/SetImGroup"/>
  <wsdl:input>
    <soap:header message="m:SetImGroupSoapIn" part="Impersonation" use="literal"/>
    <soap:header message="m:SetImGroupSoapIn" part="MailboxCulture" use="literal"/>
    <soap:header message="m:SetImGroupSoapIn" part="RequestVersion" use="literal"/>
    <soap:body use="literal" parts="request"/>
  </wsdl:input>
  <wsdl:output>
    <soap:body use="literal" parts="SetImGroupResult"/>
    <soap:header message="m:SetImGroupSoapOut" part="ServerVersion" use="literal"/>
  </wsdl:output>
</wsdl:operation>
<wsdl:operation name="SetImListMigrationCompleted">
  <soap:operation
    soapAction="http://schemas.microsoft.com/exchange/services/2006/messages/SetImListMigrationCompleted"/>
  <wsdl:input>
    <soap:header message="m:SetImListMigrationCompletedSoapIn" part="Impersonation" use="literal"/>
    <soap:header message="m:SetImListMigrationCompletedSoapIn" part="MailboxCulture" use="literal"/>
    <soap:header message="m:SetImListMigrationCompletedSoapIn" part="RequestVersion" use="literal"/>
    <soap:body use="literal" parts="request"/>
  </wsdl:input>
  <wsdl:output>
    <soap:body use="literal" parts="SetImListMigrationCompletedResult"/>
    <soap:header message="m:SetImListMigrationCompletedSoapOut" part="ServerVersion" use="literal"/>
  </wsdl:output>
</wsdl:operation>
</wsdl:binding>
</wsdl:definitions>
```

## 7 Appendix B: Full XML Schema

For ease of implementation, the following sections provide the full XML schema for this protocol.

| Schema name  | Prefix | Section             |
|--|--------|---------------------|
| http://schemas.microsoft.com/exchange/services/2006/messages | m      | <a href="#">7.1</a> |
| http://schemas.microsoft.com/exchange/services/2006/types    | t      | <a href="#">7.2</a> |

### 7.1 http://schemas.microsoft.com/exchange/services/2006/messages Schema

This section contains the full XML schema for messages.

```
<?xml version="1.0"?>
<xss:schema elementFormDefault="qualified"
targetNamespace="http://schemas.microsoft.com/exchange/services/2006/messages"
version="Exchange2012" id="messages" xmlns:xss="http://www.w3.org/2001/XMLSchema"
xmlns:m="http://schemas.microsoft.com/exchange/services/2006/messages"
xmlns:t="http://schemas.microsoft.com/exchange/services/2006/types">
  <xss:import namespace="http://schemas.microsoft.com/exchange/services/2006/types"/>
  <xss:include schemaLocation="MS-OXWSCOS-messages.xsd"/>
  <xss:complexType name="AddDistributionGroupToImListType">
    <xss:complexContent mixed="false">
      <xss:extension base="m:BaseRequestType">
        <xss:sequence>
          <xss:element name="SmtpAddress" type="t:NonEmptyStringType"/>
          <xss:element name="DisplayName" type="t:NonEmptyStringType"/>
        </xss:sequence>
      </xss:extension>
    </xss:complexContent>
  </xss:complexType>
  <xss:complexType name="AddDistributionGroupToImListResponseMessageType">
    <xss:complexContent mixed="false">
      <xss:extension base="m:ResponseMessageType">
        <xss:sequence>
          <xss:element minOccurs="0" name="ImGroup" type="t:ImGroupType"/>
        </xss:sequence>
      </xss:extension>
    </xss:complexContent>
  </xss:complexType>
  <xss:element name="AddDistributionGroupToImListResponse"
type="m:AddDistributionGroupToImListResponseMessageType"/>
  <xss:element name="AddDistributionGroupToImList" type="m:AddDistributionGroupToImListType"/>
  <xss:complexType name="AddImContactToGroupType">
    <xss:complexContent mixed="false">
      <xss:extension base="m:BaseRequestType">
        <xss:sequence>
          <xss:element name="ContactId" type="t:ItemIdType"/>
          <xss:element minOccurs="0" name="GroupId" type="t:ItemIdType"/>
        </xss:sequence>
      </xss:extension>
    </xss:complexContent>
  </xss:complexType>
  <xss:complexType name="AddImContactToGroupResponseMessageType">
    <xss:complexContent mixed="false">
      <xss:extension base="m:ResponseMessageType"/>
    </xss:complexContent>
  </xss:complexType>
</xss:schema>
```

```

        </xs:complexContent>
    </xs:complexType>
    <xs:element name="AddImContactToGroupResponse"
type="m:AddImContactToGroupResponseType"/>
    <xs:element name="AddImContactToGroup" type="m:AddImContactToGroupType"/>
    <xs:element name="AddImGroup" type="m:AddImGroupType"/>
    <xs:complexType name="AddImGroupResponseMessageType">
        <xs:complexContent mixed="false">
            <xs:extension base="m:ResponseMessageType">
                <xs:sequence>
                    <xs:element minOccurs="0" name="ImGroup" type="t:ImGroupType"/>
                </xs:sequence>
            </xs:extension>
        </xs:complexContent>
    </xs:complexType>
    <xs:complexType name="AddImGroupType">
        <xs:complexContent mixed="false">
            <xs:extension base="m:BaseRequestType">
                <xs:sequence>
                    <xs:element name="DisplayName" type="t:NonEmptyStringType"/>
                </xs:sequence>
            </xs:extension>
        </xs:complexContent>
    </xs:complexType>
    <xs:element name="AddImGroupResponse" type="m:AddImGroupResponseMessageType"/>
    <xs:element name="AddNewImContactToGroup" type="m:AddNewImContactToGroupType"/>
    <xs:element name="AddNewImContactToGroupResponse"
type="m:AddNewImContactToGroupResponseType"/>
    <xs:complexType name="AddNewImContactToGroupResponseMessageType">
        <xs:complexContent mixed="false">
            <xs:extension base="m:ResponseMessageType">
                <xs:sequence>
                    <xs:element minOccurs="0" name="Persona" type="t:PersonaType"/>
                </xs:sequence>
            </xs:extension>
        </xs:complexContent>
    </xs:complexType>
    <xs:complexType name="AddNewImContactToGroupType">
        <xs:complexContent mixed="false">
            <xs:extension base="m:BaseRequestType">
                <xs:sequence>
                    <xs:element name="ImAddress" type="t:NonEmptyStringType"/>
                    <xs:element minOccurs="0" name="DisplayName" type="t:NonEmptyStringType"/>
                    <xs:element minOccurs="0" name="GroupId" type="t:ItemIdType"/>
                </xs:sequence>
            </xs:extension>
        </xs:complexContent>
    </xs:complexType>
    <xs:complexType name="GetImItemListType">
        <xs:complexContent mixed="false">
            <xs:extension base="m:BaseRequestType">
                <xs:sequence>
                    <xs:element minOccurs="0" name="ExtendedProperties"
type="t:NonEmptyArrayOfExtendedFieldURIs"/>
                </xs:sequence>
            </xs:extension>
        </xs:complexContent>
    </xs:complexType>
    <xs:element name="GetImItemList" type="m:GetImItemListType"/>

```

```

<xs:complexType name="GetImItemListResponseMessageType">
  <xs:complexContent mixed="false">
    <xs:extension base="m:ResponseMessageType">
      <xs:sequence>
        <xs:element minOccurs="0" name="ImItemList" type="t:ImItemListType"/>
      </xs:sequence>
    </xs:extension>
  </xs:complexContent>
</xs:complexType>
<xs:element name="GetImItemListResponse" type="m:GetImItemListResponseMessageType"/>
<xs:complexType name="GetImItemsType">
  <xs:complexContent mixed="false">
    <xs:extension base="m:BaseRequestType">
      <xs:sequence>
        <xs:element minOccurs="0" name="ContactIds"
type="t:NonEmptyArrayOfBaseItemIdsType"/>
        <xs:element minOccurs="0" name="GroupIds" type="t:NonEmptyArrayOfBaseItemIdsType"/>
        <xs:element minOccurs="0" name="ExtendedProperties"
type="t:NonEmptyArrayOfExtendedFieldURIs"/>
      </xs:sequence>
    </xs:extension>
  </xs:complexContent>
</xs:complexType>
<xs:element name="GetImItems" type="m:GetImItemsType"/>
<xs:complexType name="GetImItemsResponseMessageType">
  <xs:complexContent mixed="false">
    <xs:extension base="m:ResponseMessageType">
      <xs:sequence>
        <xs:element minOccurs="0" name="ImItemList" type="t:ImItemListType"/>
      </xs:sequence>
    </xs:extension>
  </xs:complexContent>
</xs:complexType>
<xs:element name="GetImItemsResponse" type="m:GetImItemsResponseMessageType"/>
<xs:complexType name="RemoveContactFromImListType">
  <xs:complexContent mixed="false">
    <xs:extension base="m:BaseRequestType">
      <xs:sequence>
        <xs:element name="ContactId" type="t:ItemIdType"/>
      </xs:sequence>
    </xs:extension>
  </xs:complexContent>
</xs:complexType>
<xs:element name="RemoveContactFromImList" type="m:RemoveContactFromImListType"/>
<xs:complexType name="RemoveContactFromImListResponseMessageType">
  <xs:complexContent mixed="false">
    <xs:extension base="m:ResponseMessageType"/>
  </xs:complexContent>
</xs:complexType>
<xs:element name="RemoveContactFromImListResponse"
type="m:RemoveContactFromImListResponseMessageType"/>
<xs:complexType name="RemoveDistributionGroupFromImListType">
  <xs:complexContent mixed="false">
    <xs:extension base="m:BaseRequestType">
      <xs:sequence>
        <xs:element name="GroupId" type="t:ItemIdType"/>
      </xs:sequence>
    </xs:extension>
  </xs:complexContent>
</xs:complexType>

```

```

    </xs:complexType>
    <xs:element name="RemoveDistributionGroupFromImList"
type="m:RemoveDistributionGroupFromImListType">
        <xs:complexType name="RemoveDistributionGroupFromImListResponseMessageType">
            <xs:complexContent mixed="false">
                <xs:extension base="m:ResponseMessageType"/>
            </xs:complexContent>
        </xs:complexType>
    <xs:element name="RemoveDistributionGroupFromImListResponse"
type="m:RemoveDistributionGroupFromImListResponseMessageType"/>
    <xs:complexType name="RemoveImContactFromGroupType">
        <xs:complexContent mixed="false">
            <xs:extension base="m:BaseRequestType">
                <xs:sequence>
                    <xs:element name="ContactId" type="t:ItemIdType"/>
                    <xs:element name="GroupId" type="t:ItemIdType"/>
                </xs:sequence>
            </xs:extension>
        </xs:complexContent>
    </xs:complexType>
    <xs:element name="RemoveImContactFromGroupResponse"
type="m:RemoveImContactFromGroupResponseMessageType"/>
    <xs:complexType name="RemoveImContactFromGroupResponseMessageType">
        <xs:complexContent mixed="false">
            <xs:extension base="m:ResponseMessageType"/>
        </xs:complexContent>
    </xs:complexType>
    <xs:element name="RemoveImContactFromGroup" type="m:RemoveImContactFromGroupType"/>
    <xs:complexType name="RemoveImGroupType">
        <xs:complexContent mixed="false">
            <xs:extension base="m:BaseRequestType">
                <xs:sequence>
                    <xs:element name="GroupId" type="t:ItemIdType"/>
                </xs:sequence>
            </xs:extension>
        </xs:complexContent>
    </xs:complexType>
    <xs:element name="RemoveImGroup" type="m:RemoveImGroupType"/>
    <xs:complexType name="RemoveImGroupResponseMessageType">
        <xs:complexContent mixed="false">
            <xs:extension base="m:ResponseMessageType"/>
        </xs:complexContent>
    </xs:complexType>
    <xs:element name="RemoveImGroupResponse" type="m:RemoveImGroupResponseMessageType"/>
    <xs:complexType name="SetImGroupType">
        <xs:complexContent mixed="false">
            <xs:extension base="m:BaseRequestType">
                <xs:sequence>
                    <xs:element name="GroupId" type="t:ItemIdType"/>
                    <xs:element name="NewDisplayName" type="t:NonEmptyStringType"/>
                </xs:sequence>
            </xs:extension>
        </xs:complexContent>
    </xs:complexType>
    <xs:element name="SetImGroup" type="m:SetImGroupType"/>
    <xs:complexType name="SetImGroupResponseMessageType">
        <xs:complexContent mixed="false">
            <xs:extension base="m:ResponseMessageType"/>
        </xs:complexContent>
    </xs:complexType>

```

```

</xs:complexType>
<xs:element name="SetImGroupResponse" type="m:SetImGroupResponseMessageType"/>
<xs:complexType name="SetImListMigrationCompletedType">
  <xs:complexContent mixed="false">
    <xs:extension base="m:BaseRequestType">
      <xs:sequence>
        <xs:element name="ImListMigrationCompleted" type="xs:boolean"/>
      </xs:sequence>
    </xs:extension>
  </xs:complexContent>
</xs:complexType>
<xs:element name="SetImListMigrationCompleted" type="m:SetImListMigrationCompletedType"/>
<xs:complexType name="SetImListMigrationCompletedResponseType">
  <xs:complexContent mixed="false">
    <xs:extension base="m:ResponseMessageType"/>
  </xs:complexContent>
</xs:complexType>
<xs:element name="SetImListMigrationCompletedResponse" type="m:SetImListMigrationCompletedResponseMessageType"/>
</xs:schema>

```

## 7.2 <http://schemas.microsoft.com/exchange/services/2006/types> Schema

This section contains the full XML schema for types.

```

<?xml version="1.0"?>
<xs:schema xmlns:t="http://schemas.microsoft.com/exchange/services/2006/types"
elementFormDefault="qualified"
targetNamespace="http://schemas.microsoft.com/exchange/services/2006/types"
version="Exchange2012" id="types" xmlns:xs="http://www.w3.org/2001/XMLSchema">
  <xs:import namespace="http://www.w3.org/XML/1998/namespace"/>
  <xs:include schemaLocation="MS-OXWSCDATA-types.xsd"/>
  <xs:include schemaLocation="MS-OXWSBTRF-types.xsd"/>
  <xs:complexType name="ArrayOfImGroupType">
    <xs:choice minOccurs="0" maxOccurs="unbounded">
      <xs:element name="ImGroup" type="t:ImGroupType"/>
    </xs:choice>
  </xs:complexType>
  <xs:complexType name="ImGroupType">
    <xs:sequence>
      <xs:element name="DisplayName" type="t:NonEmptyStringType"/>
      <xs:element name="GroupType" type="t:NonEmptyStringType"/>
      <xs:element minOccurs="0" name="ExchangeStoreId" type="t:ItemIdType"/>
      <xs:element minOccurs="0" name="MemberCorrelationKey" type="t:NonEmptyArrayOfItemIdsType"/>
      <xs:element minOccurs="0" name="ExtendedProperties" type="t:NonEmptyArrayOfExtendedPropertyType"/>
      <xs:element minOccurs="0" name="SmtpAddress" type="xs:string"/>
    </xs:sequence>
  </xs:complexType>
  <xs:complexType name="ImItemListType">
    <xs:sequence>
      <xs:element minOccurs="0" name="Groups" type="t:ArrayOfImGroupType"/>
      <xs:element minOccurs="0" name="Personas" type="t:ArrayOfPeopleType"/>
    </xs:sequence>
  </xs:complexType>
  <xs:complexType name="NonEmptyArrayOfExtendedFieldURIs">
    <xs:choice maxOccurs="unbounded">

```

```
<xs:element name="ExtendedProperty" type="t:PathToExtendedFieldType"/>
</xs:choice>
</xs:complexType>
</xs:schema>
```

Preliminary

---

80 / 85

[MS-OXWSCOS] – v20120630  
Unified Contact Store Web Service Protocol Specification

Copyright © 2012 Microsoft Corporation.

Release: July 16, 2012

## 8 Appendix C: Product Behavior

The information in this specification is applicable to the following Microsoft products or supplemental software. References to product versions include released service packs:

- Microsoft® Exchange Server 2013 Preview
- Microsoft® Lync® 2013 Preview

Exceptions, if any, are noted below. If a service pack or Quick Fix Engineering (QFE) number appears with the product version, behavior changed in that service pack or QFE. The new behavior also applies to subsequent service packs of the product unless otherwise specified. If a product edition appears with the product version, behavior is different in that product edition.

Unless otherwise specified, any statement of optional behavior in this specification that is prescribed using the terms SHOULD or SHOULD NOT implies product behavior in accordance with the SHOULD or SHOULD NOT prescription. Unless otherwise specified, the term MAY implies that the product does not follow the prescription.

[<1> Section 3.1.4.1.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **Impersonation** header. The **Impersonation** header was introduced in Exchange 2010 SP2.

[<2> Section 3.1.4.1.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **RequestVersion** header. The **RequestVersion** header was introduced in Exchange 2010 SP2.

[<3> Section 3.1.4.2.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **Impersonation** header. The **Impersonation** header was introduced in Exchange 2010 SP2.

[<4> Section 3.1.4.2.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **RequestVersion** header. The **RequestVersion** header was introduced in Exchange 2010 SP2.

[<5> Section 3.1.4.3.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **Impersonation** header. The **Impersonation** header was introduced in Exchange 2010 SP2.

[<6> Section 3.1.4.3.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **RequestVersion** header. The **RequestVersion** header was introduced in Exchange 2010 SP2.

[<7> Section 3.1.4.4.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **Impersonation** header. The **Impersonation** header was introduced in Exchange 2010 SP2.

[<8> Section 3.1.4.4.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **RequestVersion** header. The **RequestVersion** header was introduced in Exchange 2010 SP2.

[<9> Section 3.1.4.5.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **Impersonation** header. The **Impersonation** header was introduced in Exchange 2010 SP2.

[<10> Section 3.1.4.5.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **RequestVersion** header. The **RequestVersion** header was introduced in Exchange 2010 SP2.

[<11> Section 3.1.4.6.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **Impersonation** header. The **Impersonation** header was introduced in Exchange 2010 SP2.

[<12> Section 3.1.4.6.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **RequestVersion** header. The **RequestVersion** header was introduced in Exchange 2010 SP2.

[<13> Section 3.1.4.7.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **Impersonation** header. The **Impersonation** header was introduced in Exchange 2010 SP2.

[<14> Section 3.1.4.7.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **RequestVersion** header. The **RequestVersion** header was introduced in Exchange 2010 SP2.

[<15> Section 3.1.4.8.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **Impersonation** header. The **Impersonation** header was introduced in Exchange 2010 SP2.

[<16> Section 3.1.4.8.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **RequestVersion** header. The **RequestVersion** header was introduced in Exchange 2010 SP2.

[<17> Section 3.1.4.9.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **Impersonation** header. The **Impersonation** header was introduced in Exchange 2010 SP2.

[<18> Section 3.1.4.9.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **RequestVersion** header. The **RequestVersion** header was introduced in Exchange 2010 SP2.

[<19> Section 3.1.4.10.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **Impersonation** header. The **Impersonation** header was introduced in Exchange 2010 SP2.

[<20> Section 3.1.4.10.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **RequestVersion** header. The **RequestVersion** header was introduced in Exchange 2010 SP2.

[<21> Section 3.1.4.11.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **Impersonation** header. The **Impersonation** header was introduced in Exchange 2010 SP2.

[<22> Section 3.1.4.11.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **RequestVersion** header. The **RequestVersion** header was introduced in Exchange 2010 SP2.

[<23> Section 3.1.4.12.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **Impersonation** header. The **Impersonation** header was introduced in Exchange 2010 SP2.

[<24> Section 3.1.4.12.1.1:](#) Exchange 2007, Exchange 2010, and Exchange 2010 SP1 do not use the **RequestVersion** header. The **RequestVersion** header was introduced in Exchange 2010 SP2.

## 9 Change Tracking

No table of changes is available. The document is either new or has had no changes since its last release.

Preliminary

## 10 Index

### A

Abstract data model  
  [server](#) 16  
[Applicability](#) 10  
[ArrayOfImGroupType complex type](#) 13  
[Attribute groups](#) 15  
[Attributes](#) 14

### C

[Capability negotiation](#) 10  
[Change tracking](#) 83  
[Complex types](#) 13  
  [ArrayOfImGroupType](#) 13  
  [ImGroupType](#) 13  
  [ImItemListType](#) 14  
  [NonEmptyArrayOfExtendedFieldURIs](#) 14

### D

Data model - abstract  
  [server](#) 16

### E

Events  
  [local - server](#) 63  
  [timer - server](#) 63

### F

[Fields - vendor-extensible](#) 11  
[Full WSDL](#) 68  
[Full XML Schema](#) 75  
  <http://schemas.microsoft.com/exchange/services/2006/messages Schema> 75  
  <http://schemas.microsoft.com/exchange/services/2006/types Schema> 79

### G

[Glossary](#) 8  
[Groups](#) 14

### I

[ImGroupType complex type](#) 13  
[ImItemListType complex type](#) 14  
[Implementer - security considerations](#) 67  
[Index of security parameters](#) 67  
[Informative references](#) 9  
Initialization  
  [server](#) 16  
[Introduction](#) 8

### L

Local events

[server](#) 63

### M

Message processing  
  [server](#) 16  
Messages  
  [ArrayOfImGroupType complex type](#) 13  
  [attribute groups](#) 15  
  [attributes](#) 14  
  [complex types](#) 13  
  [elements](#) 12  
  [enumerated](#) 12  
  [groups](#) 14  
  [ImGroupType complex type](#) 13  
  [ImItemListType complex type](#) 14  
  [namespaces](#) 12  
  [NonEmptyArrayOfExtendedFieldURIs complex type](#) 14  
  [simple types](#) 14  
  [syntax](#) 12  
  [transport](#) 12

### N

[Namespaces](#) 12  
[NonEmptyArrayOfExtendedFieldURIs complex type](#) 14  
[Normative references](#) 8

### O

Operations  
  [AddDistributionGroupToImList](#) 17  
  [AddImContactToGroup](#) 21  
  [AddImGroup](#) 25  
  [AddNewImContactToGroup](#) 28  
  [GetImItemList](#) 32  
  [GetImItems](#) 36  
  [RemoveContactFromImList](#) 40  
  [RemoveDistributionGroupFromImList](#) 44  
  [RemoveImContactFromGroup](#) 48  
  [RemoveImGroup](#) 52  
  [SetImGroup](#) 56  
  [SetImListMigrationCompleted](#) 59  
[Overview \(synopsis\)](#) 9

### P

[Parameters - security index](#) 67  
[Preconditions](#) 10  
[Prerequisites](#) 10  
[Product behavior](#) 81

### R

[References](#) 8  
  [informative](#) 9  
  [normative](#) 8

[Relationship to other protocols](#) 10

<http://schemas.microsoft.com/exchange/services/2006/types> Schema 79

## S

Security

[implementer considerations](#) 67  
[parameter index](#) 67

Sequencing rules

[server](#) 16

Server

[abstract data model](#) 16  
[AddDistributionGroupToImList operation](#) 17  
[AddImContactToGroup operation](#) 21  
[AddImGroup operation](#) 25  
[AddNewImContactToGroup operation](#) 28  
[GetImItemList operation](#) 32  
[GetImItems operation](#) 36  
[initialization](#) 16  
[local events](#) 63  
[message processing](#) 16  
[RemoveContactFromImList operation](#) 40  
[RemoveDistributionGroupFromImList operation](#) 44  
[RemoveImContactFromGroup operation](#) 48  
[RemoveImGroup operation](#) 52  
[sequencing rules](#) 16  
[SetImGroup operation](#) 56  
[SetImListMigrationCompleted operation](#) 59  
[timer events](#) 63  
[timers](#) 16  
[Simple types](#) 14  
[Standards assignments](#) 11

Syntax

[messages - overview](#) 12

## T

Timer events

[server](#) 63

Timers

[server](#) 16

[Tracking changes](#) 83

[Transport](#) 12

Types

[complex](#) 13

[simple](#) 14

## V

[Vendor-extensible fields](#) 11

[Versioning](#) 10

## W

[WSDL](#) 68

## X

[XML Schema](#) 75

<http://schemas.microsoft.com/exchange/services/2006/messages> Schema 75