

# SMTP Provider

## with SSL / TLS

Version 1.1.2

## User's Guide

January 11, 2024

[Remarks]

**[Revision History]**

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1.0.0	2014-09-12	First edition.
1.1.0	2018-11-09	Timeout command added.
1.1.1	2021-11-05	Updated OpenSSL version to 1.1.1k
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## 1. Introduction

SMTP provider is a provider that sends the Internet mail (e-Mail) according to protocol handling of SMTP.

It is possible to send an e-Mail to any address by using this provider.

This document describes the SMPT provider outline and the implemented CAO interfaces.

## 2. Outline of this provider

### 2.1. Installation

The SMTP provider module is constructed in following DLL. To use SMTP provider, you need to install ORiN2SDK, or, complete registration manually with the procedure shown below.

**Table 2-1 SMTP provider**

File name	CaoProvSMTP.dll
ProgID	CaoProv.SMTP
Registry registration	regsvr32 CaoProvSMTP.dll
Remove registry registration	regsvr32 /u CaoProvSMTP.dll

This provider uses OpenSSL library to connect to mail server with secure connection (SSL/TLS).

## 2.2. Method and Property

### 2.2.1. CaoWorkspace::AddController method

In SMTP provider, specify a parameter for device connection based on the syntax shown below when AddController execution.

**Syntax** AddController ( <bstrCtrlName:BSTR>, <bstrProvName:BSTR>, <bstrPcName:BSTR>, [**<bstrOption:BSTR>**] )

<bstrCtrlName > : [in] Controller name  
 <bstrProvName > : [in] Provider name (Fixed to" CaoProv.SMTP")  
 <bstrPcName> : [in] Provider execution machine name  
 <bstrOption> : [in] Option character string (unused)

### 2.2.2. CaoController::AddFile method

E-Mail is mapped to CaoFile object. You need to create the CaoFile object using CaoController::AddFile method specifying the arguments as below.

**Syntax** AddFile ( <bstrName:BSTR>, <bstrOption:BSTR> )

<bstrName > : [in] CaoFile object name  
 <bstrOption> : [in] Option string

Specify the option character string to connect to the Mail server. Each option item need to specify as the following format with comma separation.

<OptionName>=<Value>,<OptionName>=<Value>,..

Option list:

1. Server = <IP address>  
The Mail server IP address
2. Port=<no>  
The Mail server port number
3. Auth=<YES or NO>  
Authenticate setting
4. Security=<NONE or SSL or TLS>  
Security setting (\*1)
5. CharSet=<ISO-2022-JP or none>  
Character set code setting

Ex. : "Server=192.168.1.3, Port=587, Auth=YES, Security=SSL,

CharSet=ISO-2022-JP"

(\*1) Example of CharSet option

English : US-ASCII, Japanese(JIS) : ISO-2022-JP, Traditional Chinese : BIG5, Simplified Chinese : GB2312,  
Korean : ISO-2022-KR, European (French/German) : ISO-8859-1, Russian : ISO-8859-5, Arabic : ISO-8859-6,  
Unicode(UTF-8) : UTF-8

Refer to [Character set codes] for the details.

### **2.2.3. CaoFile::gut\_Value property**

Get the contents of the mail. The contents can change by put\_Value property or CaoFile::Execute("AddMsgLine") command.

### **2.2.4. CaoFile::put\_Value property**

Set the contents of the mail. When contents have been already set, it is overwritten.

## 3. Command Reference

### 3.1. File class

**Table 3-1 CaoFile::Execute command list**

Command	Function	Page
AddAttachment	Adds new attachment	9
AddBCCRecipient	Adds new BCC-recipient data (BCC)	9
AddCCRecipient	Adds new CC-recipient data (CC)	10
AddMsgLine	Adds new line in a message	10
AddRecipient	Adds new recipient data (TO)	11
ClearMessage	Clears the recipients and message body	11
DelAttachments	Deletes all attachments	12
DelBCCRecipients	Deletes all BCC recipients	12
DelCCRecipients	Deletes all CC recipients	13
DelMsgLines	Deletes message text	13
DelRecipients	Deletes all recipients	14
Send	Sends the mail	14
SetAttachFileName	Setting the attached file name	15
SetLogin	Setting the login of SMTP account's owner	15
SetPassword	Setting the password of SMTP account's owner	16
SetReplyTo	Setting the return address	16
SetSenderMail	Setting sender's mail	17
SetSenderName	Setting sender's name	17
SetSubject	Setting subject of the message	18
SetTimeout	Setting the timeout	18
SetXPriority	Setting priority of the message	18

### 3.1.1. CaoFile::Execute("AddAttachment") command

Adds new attachment.

Specify a file name (VT\_BSTR) or a file data (VT\_UI1|VT\_ARRAY) to the Data argument.

You need to carry out SetAttachFileName function beforehand, and to set a file name, when you set an attached file data.

**Syntax** AddAttachment (<Data>)

< Data > : [in] attachment file path (VT\_BSTR) or attachment data (VT\_UI1 | VT\_ARRAY)

**Example**

---

```
result = m_caoFile.Execute("AddAttachment", vntData)
```

---

### 3.1.2. CaoFile::Execute("AddBCCRecipient") command

Adds new BCC-recipient data (BCC).

**Syntax** AddBCCRecipient ( <Data> )

< Data > : [in] BCC address (VT\_BSTR)

**Example**

---

```
result = m_caoFile.Execute("AddBCCRecipient", vntData)
```

---

### 3.1.3. CaoFile::Execute("AddCCRecipient") command

Adds new CC-recipient data (CC).

**Syntax** AddCCRecipient ( <Data> )

< Data > : [in] CC address (VT\_BSTR)

**Example**

---

```
result = m_caoFile.Execute("AddCCRecipient", vntData)
```

---

### 3.1.4. CaoFile::Execute("AddMsgLine") command

Adds new line in a message.

**Syntax** AddMsgLine ( <Data> )

< Data > : [in] new line string (VT\_BSTR)

**Example**

---

```
result = m_caoFile.Execute("AddMsgLine", vntData)
```

---

### 3.1.5. CaoFile::Execute("AddRecipient") command

Adds new recipient data (TO).

**Syntax** AddRecipient ( <Data> )

<Data > : [in] TO address (VT\_BSTR)

**Example**

---

```
result = m_caoFile.Execute("AddRecipient", vntData)
```

---

### 3.1.6. CaoFile::Execute("ClearMessage") command

Clears the recipients and message body.

**Syntax** ClearMessage ()

**Example**

---

```
result = m_caoFile.Execute("ClearMessage")
```

---

**3.1.7. CaoFile::Execute("DelAttachments") command**

Deletes all attachments.

**Syntax** DelAttachments ()

**Example**

---

```
result = m_caoFile.Execute("DelAttachments")
```

---

**3.1.8. CaoFile::Execute("DelBCCRecipients") command**

Deletes all BCC recipients.

**Syntax** DelBCCRecipients ()

**Example**

---

```
result = m_caoFile.Execute("DelBCCRecipients")
```

---

**3.1.9. CaoFile::Execute("DelCCRecipients") command**

Deletes all CC recipients.

**Syntax** DelCCRecipients ()

**Example**

---

```
result = m_caoFile.Execute("DelCCRecipients")
```

---

**3.1.10. CaoFile::Execute("DelMsgLines") command**

Deletes message text.

**Syntax** DelMsgLines ()

**Example**

---

```
result = m_caoFile.Execute("DelMsgLines")
```

---

**3.1.11. CaoFile::Execute("DelRecipients") command**

Deletes all recipients.

**Syntax** DelRecipients ()

**Example**

---

```
result = m_caoFile.Execute("DelRecipients")
```

---

**3.1.12. CaoFile::Execute("Send") command**

Sends the mail.

**Syntax** Send ()

**Example**

---

```
result = m_caoFile.Execute("Send")
```

---

**3.1.13. CaoFile::Execute("SetAttachFileName") command**

Setting the attached file name.

Execute this command to set the attached file name before execute "AddAttachment" command with specifying a file data (VT\_U1|VT\_ARRAY).

**Syntax** SetAttachFileName ( <Data> )

< Data > : [in] attached file name (VT\_BSTR)

**Example**

---

```
result = m_caoFile.Execute("SetAttachFileName", vntData)
```

---

**3.1.14. CaoFile::Execute("SetLogin") command**

Setting the login of SMTP account's owner.

**Syntax** SetLogin ( <Data> )

< Data > : [in] SMTP account (VT\_BSTR)

**Example**

---

```
result = m_caoFile.Execute("SetLogin", vntData)
```

---

### 3.1.15. CaoFile::Execute("SetPassword") command

Setting the password of SMTP account's owner.

**Syntax** SetPassword ( <Data> )

< Data > : [in] password string (VT\_BSTR)

**Example**

---

```
result = m_caoFile.Execute("SetPassword", vntData)
```

---

### 3.1.16. CaoFile::Execute("SetReplyTo") command

Setting the return address.

**Syntax** SetReplyTo ( <Data> )

< Data > : [in] return address (VT\_BSTR)

**Example**

---

```
result = m_caoFile.Execute("SetReplyTo", vntData)
```

---

**3.1.17. CaoFile::Execute("SetSenderMail") command**

Setting sender's mail.

**Syntax** SetSenderMail ( <Data> )

< Data > : [in] sender's mail (VT\_BSTR)

**Example**

---

```
result = m_caoFile.Execute("SetSenderMail", vntData)
```

---

**3.1.18. CaoFile::Execute("SetSenderName") command**

Setting sender's name.

**Syntax** SetSenderName ( <Data> )

< Data > : [in] sender's name (VT\_BSTR)

**Example**

---

```
result = m_caoFile.Execute("SetSenderName", vntData)
```

---

### 3.1.19. CaoFile::Execute("SetSubject") command

Setting subject of the message.

**Syntax** SetSubject ( <Data> )

< Data > : [in] subject of the message (VT\_BSTR)

**Example**

---

```
result = m_caoFile.Execute("SetSubject", vntData)
```

---

### 3.1.20. CaoFile::Execute("SetTimeout") command

Sets the timeout for messages.

The timeout can be set in seconds. The timeout of all commands for sending mail will be set to the time specified here.

**Syntax** SetTimeout ( <Data> )

< Data > : [in] timeout (VT\_BSTR)

**Example**

---

```
result = m_caoFile.Execute("SetTimeout", vntData)
```

---

### 3.1.21. CaoFile::Execute("SetXPriority") command

Setting priority of the message.

Set either "HIGH" (high importance), "NORMAL" (medium importance), or "LOW" (low importance).

**Syntax** SetXPriority ( <Data> )

< Data > : [in] priority of the message ("HIGH" or "NORMAL" or "LOW")  
(VT\_BSTR)

**Example**

---

```
result = m_caoFile.Execute("SetXPriority", vntData)
```

---

## 4. Example program

Below is a simple sample program of C# to send e-mail using SMTP provider.

### List 4-1

### frmCaoSmtplibSample.cs

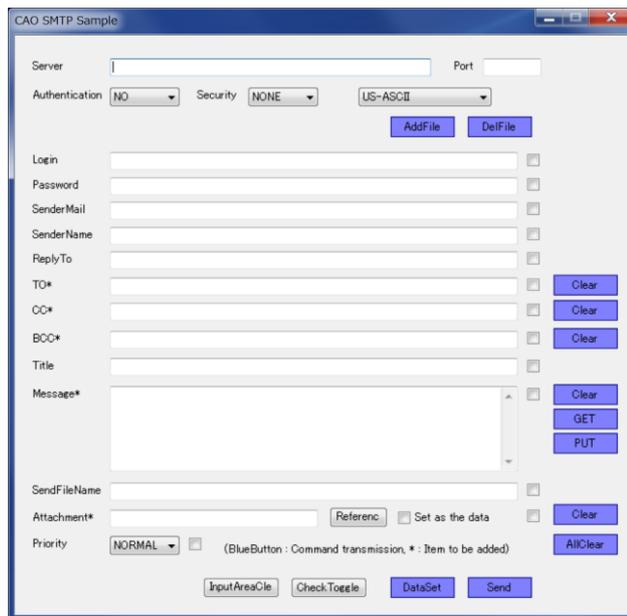


Figure 4-1 CAO SMTP sample application

#### Example

‘ Add a file

```
m_cFile = m_caoCtrl.AddFile("mail1", "Server=my.mail.com, Port=25, Auth=NO, Security=NONE, CharSet=ISO-2022-JP");
```

‘ Write a mail

```
m_cFile.Execute("SetSenderMail", "my@my.mail.com");
m_cFile.Execute("AddRecipient", "friend@your.mail.com");
m_cFile.Execute("SetSubject", "Hello!");
m_cFile.Execute("AddMsgLine", "How are you?");
```

‘ Send the mail.

```
m_cFile.Execute("Send", null);
```

## 5. Character set codes

The following table defines the list of possible values for the character set codes.

code	Description
IBM037	IBM EBCDIC US-Canada
IBM437	OEM United States
IBM500	IBM EBCDIC International
ASMO-708	Arabic (ASMO 708)
DOS-720	Arabic (Transparent ASMO); Arabic (DOS)
ibm737	OEM Greek (formerly 437G); Greek (DOS)
ibm775	OEM Baltic; Baltic (DOS)
ibm850	OEM Multilingual Latin 1; Western European (DOS)
ibm852	OEM Latin 2; Central European (DOS)
IBM855	OEM Cyrillic (primarily Russian)
ibm857	OEM Turkish; Turkish (DOS)
IBM00858	OEM Multilingual Latin 1 + Euro symbol
IBM860	OEM Portuguese; Portuguese (DOS)
ibm861	OEM Icelandic; Icelandic (DOS)
DOS-862	OEM Hebrew; Hebrew (DOS)
IBM863	OEM French Canadian; French Canadian (DOS)
IBM864	OEM Arabic; Arabic (864)
IBM865	OEM Nordic; Nordic (DOS)
cp866	OEM Russian; Cyrillic (DOS)
ibm869	OEM Modern Greek; Greek, Modern (DOS)
IBM870	IBM EBCDIC Multilingual/ROECE (Latin 2); IBM EBCDIC Multilingual Latin 2
windows-874	ANSI/OEM Thai (ISO 8859-11); Thai (Windows)
cp875	IBM EBCDIC Greek Modern
shift_jis	ANSI/OEM Japanese; Japanese (Shift-JIS)
gb2312	ANSI/OEM Simplified Chinese (PRC, Singapore); Chinese Simplified (GB2312)
ks_c_5601-1987	ANSI/OEM Korean (Unified Hangul Code)
big5	ANSI/OEM Traditional Chinese (Taiwan; Hong Kong SAR, PRC); Chinese Traditional (Big5)

---

IBM1026	IBM EBCDIC Turkish (Latin 5)
IBM01047	IBM EBCDIC Latin 1/Open System
	IBM EBCDIC
IBM01140	US-Canada (037 + Euro symbol); IBM EBCDIC (US-Canada-Euro)
	IBM EBCDIC
IBM01141	Germany (20273 + Euro symbol); IBM EBCDIC (Germany-Euro)
	IBM EBCDIC
IBM01142	Denmark-Norway (20277 + Euro symbol); IBM EBCDIC (Denmark-Norway-Euro)
	IBM EBCDIC
IBM01143	Finland-Sweden (20278 + Euro symbol); IBM EBCDIC (Finland-Sweden-Euro)
	IBM EBCDIC
IBM01144	Italy (20280 + Euro symbol); IBM EBCDIC (Italy-Euro)
	IBM EBCDIC
IBM01145	Latin America-Spain (20284 + Euro symbol); IBM EBCDIC (Spain-Euro)
	IBM EBCDIC
IBM01146	United Kingdom (20285 + Euro symbol); IBM EBCDIC (UK-Euro)
	IBM EBCDIC
IBM01147	France (20297 + Euro symbol); IBM EBCDIC (France-Euro)
	IBM EBCDIC
IBM01148	International (500 + Euro symbol); IBM EBCDIC (International-Euro)
	IBM EBCDIC
IBM01149	Icelandic (20871 + Euro symbol); IBM EBCDIC (Icelandic-Euro)
utf-16	Unicode UTF-16, little endian byte order (BMP of ISO 10646); available only to managed applications
unicodeFFFE	Unicode UTF-16, big endian byte order; available only to managed applications
windows-1250	ANSI Central European; Central European (Windows)
windows-1251	ANSI Cyrillic; Cyrillic (Windows)
windows-1252	ANSI Latin 1; Western European (Windows)
windows-1253	ANSI Greek; Greek (Windows)
windows-1254	ANSI Turkish; Turkish (Windows)
windows-1255	ANSI Hebrew; Hebrew (Windows)
windows-1256	ANSI Arabic; Arabic (Windows)
windows-1257	ANSI Baltic; Baltic (Windows)

---

windows-1258	ANSI/OEM Vietnamese; Vietnamese (Windows)
Johab	Korean (Johab)
macintosh	MAC Roman; Western European (Mac)
x-mac-japanese	Japanese (Mac)
x-mac-chinesetrad	MAC Traditional Chinese (Big5); Chinese Traditional (Mac)
x-mac-korean	Korean (Mac)
x-mac-arabic	Arabic (Mac)
x-mac-hebrew	Hebrew (Mac)
x-mac-greek	Greek (Mac)
x-mac-cyrillic	Cyrillic (Mac)
x-mac-chinesesimp	MAC Simplified Chinese (GB 2312); Chinese Simplified (Mac)
x-mac-romanian	Romanian (Mac)
x-mac-ukrainian	Ukrainian (Mac)
x-mac-thai	Thai (Mac)
x-mac-ce	MAC Latin 2; Central European (Mac)
x-mac-icelandic	Icelandic (Mac)
x-mac-turkish	Turkish (Mac)
x-mac-croatian	Croatian (Mac)
utf-32	Unicode UTF-32, little endian byte order; available only to managed applications
utf-32BE	Unicode UTF-32, big endian byte order; available only to managed applications
x-Chinese_CNS	CNS Taiwan; Chinese Traditional (CNS)
x-cp20001	TCA Taiwan
x_Chinese-Eten	Eten Taiwan; Chinese Traditional (Eten)
x-cp20003	IBM5550 Taiwan
x-cp20004	TeleText Taiwan
x-cp20005	Wang Taiwan
x-IA5	IA5 (IRV International Alphabet No. 5, 7-bit); Western European (IA5)
x-IA5-German	IA5 German (7-bit)
x-IA5-Swedish	IA5 Swedish (7-bit)
x-IA5-Norwegian	IA5 Norwegian (7-bit)
us-ascii	US-ASCII (7-bit)
x-cp20261	T.61
x-cp20269	ISO 6937 Non-Spacing Accent
IBM273	IBM EBCDIC Germany
IBM277	IBM EBCDIC Denmark-Norway
IBM278	IBM EBCDIC Finland-Sweden
IBM280	IBM EBCDIC Italy
IBM284	IBM EBCDIC Latin America-Spain
IBM285	IBM EBCDIC United Kingdom
IBM290	IBM EBCDIC

	Japanese Katakana Extended
IBM297	IBM EBCDIC France
IBM420	IBM EBCDIC Arabic
IBM423	IBM EBCDIC Greek
IBM424	IBM EBCDIC Hebrew
x-EBCDIC-KoreanExtended	IBM EBCDIC Korean Extended
IBM-Thai	IBM EBCDIC Thai
koi8-r	Russian (KOI8-R); Cyrillic (KOI8-R)
IBM871	IBM EBCDIC Icelandic
IBM880	IBM EBCDIC Cyrillic Russian
IBM905	IBM EBCDIC Turkish
	IBM EBCDIC
IBM00924	Latin 1/Open System (1047 + Euro symbol)
x-cp20936	Simplified Chinese (GB2312); Chinese Simplified (GB2312-80)
x-cp20949	Korean Wansung
cp1025	IBM EBCDIC Cyrillic Serbian-Bulgarian
koi8-u	Ukrainian (KOI8-U); Cyrillic (KOI8-U)
iso-8859-1	ISO 8859-1 Latin 1; Western European (ISO)
iso-8859-2	ISO 8859-2 Central European; Central European (ISO)
iso-8859-3	ISO 8859-3 Latin 3
iso-8859-4	ISO 8859-4 Baltic
iso-8859-5	ISO 8859-5 Cyrillic
iso-8859-6	ISO 8859-6 Arabic
iso-8859-7	ISO 8859-7 Greek
iso-8859-8	ISO 8859-8 Hebrew; Hebrew (ISO-Visual)
iso-8859-9	ISO 8859-9 Turkish
iso-8859-13	ISO 8859-13 Estonian
iso-8859-15	ISO 8859-15 Latin 9
x-Europa	Europa 3
iso-8859-8-i	ISO 8859-8 Hebrew; Hebrew (ISO-Logical)
	ISO 2022
csISO2022JP	Japanese with halfwidth Katakana; Japanese (JIS-Allow 1 byte Kana)
iso-2022-jp	ISO 2022 Japanese JIS X 0201-1989; Japanese (JIS-Allow 1 byte Kana - SO/SI)
iso-2022-kr	ISO 2022 Korean
x-cp50227	ISO 2022 Simplified Chinese; Chinese Simplified (ISO 2022)
euc-jp	EUC Japanese
EUC-CN	EUC Simplified Chinese; Chinese Simplified (EUC)
euc-kr	EUC Korean
hz-gb-2312	HZ-GB2312 Simplified Chinese; Chinese Simplified (HZ)

GB18030	GB18030 Simplified Chinese (4 byte); Chinese Simplified (GB18030)
x-iscii-de	ISCII Devanagari
x-iscii-be	ISCII Bengali
x-iscii-ta	ISCII Tamil
x-iscii-te	ISCII Telugu
x-iscii-as	ISCII Assamese
x-iscii-or	ISCII Oriya
x-iscii-ka	ISCII Kannada
x-iscii-ma	ISCII Malayalam
x-iscii-gu	ISCII Gujarati
x-iscii-pa	ISCII Punjabi
utf-7	Unicode (UTF-7)
utf-8	Unicode (UTF-8)