

New Billing Project

ICP Enquiry (Billing) API Specifications Part 2



Revision History

Revision	Date	Description	Author
1.0	Jan 13, 2025	The 2nd list of ICP Enquiry that are interfaced with new billing API	Claudia Fung



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Objectives

This document is to provide the list of enquiry functions interfaced with Covalense Billing API for retrieval Billing information for the New Billing Project. Parallel run logic is also included.

ICP Enquiry (Billing) API Specifications

1. Payment Method Description

Purpose

To get payment method name / description

Interface Details

Production Endpoints: TBC

System	Endpoint (UAT)	
UAT	https://crm-uat.smartone.com/api/brm/v1/account	
TYK	https://tykapi-u.hksmartone.com/icp/NBill/brm/v1/account	

API: /paymentMethodDescription

Type: REST

Method: POST

Add Key to HTTP Request Header for TYK API:

Name	Auth_ID
Value	eyJvcmciOil2NGY2Y2I1ZmFiYzRhYWI4MGNlZDE1NTUiLCJpZCl6ljFiYzI4OGlzYzZjMTQxNjFiM2ZiMWUyNGJlMDAyN2
	FkliwiaCl6Im11cm11cjY0In0=

Request Parameters

Parameter	Data Type	Description	Possible Value	Remarks
paymentMethodId	String	Payment method ID		Mandatory
serviceType	String	Service type	<u>Value</u>	Mandatory
			PREPAID	
			POSTPAID	
parallelRun	String	parellelRun indicator to	<u>Value</u>	Mandatory
		determine the state of the	0 – existing system	
		workflow	1 – new billing	
			2 – parallel run in GNV & new	
			billing in OM	



Sample Request

```
{
    "paymentMethodId": 11,
    "serviceType": "POSTPAID",
    "parallelRun": "0"
}
```

Response Parameters

Parameter	Data Type	Description	Possible Value	Remarks
resultCode	String	Response result	See below table	
errorCode	String	Error code return from Covalense		
		billing api		
errorDesc	String	Error description return from		
		Covalense billing api		
paymentMethodDesc	String	Payment Method Description		
paymentMethodCode		Paymentnt Method Name (Code)		

Result Code

Result Code	Severity	Description
0	N/A	Success
-1	N/A	Missing input parameter
-2	N/A	Payment method name is not found

Success response

```
{
    "resultCode": "0",
    "errorDesc": "",
    "errorCode": "",
    "paymentMethodDesc": "OTDD :OTHDD - Credit Card DD (HK)",
    "paymentMethodCode": "OTDD "
}
```

```
{
    "resultCode": "-1",
    "errorCode": "-1",
    "errorDesc": "Missing input parameter"
}
```



2. Auto Payment Details

Purpose

To get auto payment details for the given customer number

Interface Details

Production Endpoints: TBC

System	Endpoint (UAT)	
UAT	https://crm-uat.smartone.com/api/brm/v1/account	
TYK	https://tykapi-u.hksmartone.com/icp/NBill/brm/v1/account	

API: /autoPaymentDetails

Type: REST

Method: POST

Add Key to HTTP Request Header for TYK API:

Name	Auth_ID
Value	eyJvcmciOil2NGY2Y2I1ZmFiYzRhYWI4MGNIZDE1NTUiLCJpZCl6ljFiYzI4OGlzYzZjMTQxNjFiM2ZiMWUyNGJIMDAyN2
	FkliwiaCl6Im11cm11cjY0In0=

Request Parameters

Parameter	Data Type	Description	Possible Value	Remarks
custNum	String	Customer number		Mandatory
parallelRun	String	parellelRun indicator to	<u>Value</u>	Mandatory
		determine the state of the	0 – existing system	
		workflow	1 – new billing	
			2 – parallel run in GNV & new	
			billing in OM	



Parameter	Data Type	Description	Possible Value	Remarks
resultCode	String	Response result	See below table	
errorCode	String	Error code return from Covalense		
		billing api		
errorDesc	String	Error description return from		
		Covalense billing api		
paymentMethodId	String	Payment Method Id		
paymentMethodCode	String	Payment Method Code		
paymentMethodDesc	String	Payment Description		

Result Code

Result Code	Severity	Description
0	N/A	Success
-1	N/A	Missing input parameter

Success response

```
{
    "resultCode": "0",
    "errorDesc": "",
    "errorCode": "",
    "paymentMethodId": "11"
    "paymentMethodCode": "OTDD "
    "paymentMethodDesc": "OTDD :OTHDD - Credit Card DD (HK)"
}
```

```
{
    "resultCode": "-1",
    "errorCode": "-1",
    "errorDesc": "Missing input parameter"
}
```



3. MSISDN Class

Purpose

To get MSISDN class name and ID

Interface Details

Production Endpoints: TBC

System	Endpoint (UAT)
UAT	https://crm-uat.smartone.com/api/brm/v1/inventory
ТҮК	https://tykapi-u.hksmartone.com/icp/NBill/brm/v1/inventory

API: /msisdnClass

Type: REST

Method: POST

Add Key to HTTP Request Header for TYK API:

Name	Auth_ID
Value	eyJvcmciOil2NGY2Y2I1ZmFiYzRhYWI4MGNIZDE1NTUiLCJpZCl6ljFiYzI4OGIzYzZjMTQxNjFiM2ZiMWUyNGJIMDAyN2
	FkliwiaCl6Im11cm11cjY0In0=

Request Parameters

Parameter	Data Type	Description	Possible Value	Remarks
msisdnClassName	String	Msisdn class name		Optional
				For no input, it will
				return all list

```
{
    "msisdnClassName": "CEO"
}
```



Parameter	Data Type	Description	Possible Value	Remarks
resultCode	String	Response result	See below table	
errorCode	String	Error code return from Covalense		
		billing api		
errorDesc	String	Error description return from		
		Covalense billing api		
msisdnClasses	JSON Array	Array for Msisdn classes list		
msisdnClassId	String	Msisdn class Id		
msisdnClass	String	Msisdn class name		

Result Code

Result Code	Severity	Description
0	N/A	Success

Success response

```
{
    "resultCode": "0",
    "errorDesc": "",
    "errorCode": "",
    "msisdnClasses": {
        "msisdnClasses": "1",
        "msisdnClass": "NORM "
        },{
        "msisdnClassId": "2",
        "msisdnClassId": "VIP "
    }
}
```

```
{
    "resultCode": "-1",
    "errorCode": "-999",
    "errorDesc": "Failure to call billing API"
}
```



4. HLR

Purpose

To get HLR id for a network element or vice versa

Interface Details

Production Endpoints: TBC

System	Endpoint (UAT)
UAT	https://crm-uat.smartone.com/api/brm/v1/inventory
TYK	https://tykapi-u.hksmartone.com/icp/NBill/brm/v1/inventory

API: /hlr

Type: REST

Method: POST

Add Key to HTTP Request Header for TYK API:

Name	Auth_ID
Value	eyJvcmciOiI2NGY2Y2I1ZmFiYzRhYWI4MGNIZDE1NTUiLCJpZCI6IjFiYzI4OGIzYzZjMTQxNjFiM2ZiMWUyNGJIMDAyN2
	FkliwiaCl6Im11cm11cjY0In0=

Request Parameters

Parameter	Data Type	Description	Possible Value	Remarks
phlr	String	PIN SMC Network		Either phir or hirld is mandatory
hirid	Integer	HLD ID		

```
Enquire by phlr

{
          "phlr": "SMC Network"
}

Enquire by hlrld

{
          "hlrld": 1
}
```



Parameter	Data Type	Description	Possible Value	Remarks
resultCode	String	Response result	See below table	
errorCode	String	Error code return from Covalense		
		billing api		
errorDesc	String	Error description return from		
		Covalense billing api		
phlr	String	Phir (network element)		
hlrld	String	HLR ID		

Result Code

Result Code	Severity	Description
0	N/A	Success
-1	N/A	Missing input parameters

Success response

```
{
    "resultCode": "0",
    "errorDesc": "",
    "errorCode": "",
    "phlr": "SMC Network",
    "hlrld": "1"
}
```

```
{
    "resultCode": "-1",
    "errorCode": "-1",
    "errorDesc": "Missing input parameters"
}
```



5. MSISDN Type

Purpose

To get MSISDN type for the given MSISDN Type ID

Interface Details

Production Endpoints: TBC

System	Endpoint (UAT)
UAT	https://crm-uat.smartone.com/api/brm/v1/inventory
TYK	https://tykapi-u.hksmartone.com/icp/NBill/brm/v1/inventory

API: /msisdnType

Type: REST

Method: POST

Add Key to HTTP Request Header for TYK API:

Name	Auth_ID
Value	eyJvcmciOil2NGY2Y2I1ZmFiYzRhYWI4MGNIZDE1NTUiLCJpZCl6ljFiYzI4OGlzYzZjMTQxNjFiM2ZiMWUyNGJIMDAyN2
	FkliwiaCl6Im11cm11cjY0In0=

Request Parameters

Parameter	Data Type	Description	Possible Value	Remarks
typeld	String	MSISDN Type Id		Mandatory

```
Enquire by typeId
{
    "typeId": "1"
}
```



Parameter	Data Type	Description	Possible Value	Remarks
resultCode	String	Response result	See below table	
errorCode	String	Error code return from Covalense		
		billing api		
errorDesc	String	Error description return from		
		Covalense billing api		
prefix	String	Prefix of this msisdn type		
length	String	Length of this msisdn type		
code	String	Type code for this msisdn type		
name	String	Type name for this msisdn type		

Result Code

Result Code	Severity	Description
0	N/A	Success
-1	N/A	Missing input parameters
-2	N/A	Invalid MSISDN Type ID provided in the input

Success response

```
{
    "resultCode": "0",
    "errorDesc": "",
    "errorCode": "",
    "prefix": "1",
    "length": "2",
    "code": "type code",
    "name": "type name"
}
```

```
"resultCode": "-2",
    "errorCode": "10047",
    "errorDesc": "Invalid MSISDN Type ID provided in the input"
}
```



6. MSISDN for SIM / IMSI

Purpose

To get MSISDN for the given SIM or IMSI

Interface Details

Production Endpoints: TBC

System	Endpoint (UAT)	
UAT	https://crm-uat.smartone.com/api/brm/v1/account	
TYK	https://tykapi-u.hksmartone.com/icp/NBill/brm/v1/account	

API: /msisdn

Type: REST

Method: POST

Add Key to HTTP Request Header for TYK API:

Name	Auth_ID			
Value	eyJvcmciOil2NGY2Y2I1ZmFiYzRhYWI4MGNIZDE1NTUiLCJpZCI6IJFiYzI4OGIzYzZJMTQxNJFiM2ZiMWUyNGJIMDAyNGIMDAYNG112NGY2Y2I1ZmFiYzRhYWI4MGNIZDE1NTUILCJpZCI6IJFiYzI4OGIzYzZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2Y2ZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2Y2ZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2Y2ZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2Y2ZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2Y2ZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2Y2ZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2Y2ZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2Y2ZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2Y2ZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2Y2ZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2Y2ZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2YZZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2YZZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2YZZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2YZZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2YZZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2YZZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2YZZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2YZZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2YZZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2YZZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2YZZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2YZZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2YZZJMTQxNJFiM2ZiMWUyNGJIMDAYNG112NGY2YZZJMTQxNJFiM2ZiMWUyNGJIMQxNJFiM2ZiMWUyNGJIMQxNJFiM2ZiMWUyNGJIMQxNJFIM2X			
	FkliwiaCl6Im11cm11cjY0In0=			

Request Parameters

Parameter	Data Type	Description	Possible Value	Remarks
imsi	String	lmsi number		Either IMSI or SIM is mandatory
sim	String	SIM number		



Parameter	Data Type	Description	Possible Value	Remarks
resultCode	String	Response result	See below table	
errorCode	String	Error code return from Covalense		
		billing api		
errorDesc	String	Error description return from		
		Covalense billing api		
subrNum	String	Subscriber number for the input		
		IMSI/ SIM		

Result Code

Result Code	Severity	Description
0	N/A	Success
-1	N/A	Missing input parameters

Success response

```
{
    "resultCode": "-1",
    "errorCode": "-1",
    "errorDesc": "Missing input parameters"
}
```



7. Disconnect Type

Purpose

To get disconnection description for the given disconnection code

Interface Details

Production Endpoints: TBC

System	Endpoint (UAT)	
UAT	https://crm-uat.smartone.com/api/brm/v1/account	
TYK	https://tykapi-u.hksmartone.com/icp/NBill/brm/v1/account	

API: /disconnectType

Type: REST

Method: POST

Add Key to HTTP Request Header for TYK API:

Name	Auth_ID
Value	eyJvcmciOil2NGY2Y2I1ZmFiYzRhYWI4MGNIZDE1NTUiLCJpZCl6ljFiYzI4OGlzYzZjMTQxNjFiM2ZiMWUyNGJIMDAyN2
	FkliwiaCl6Im11cm11cjY0In0=

Request Parameters

Parameter	Data Type	Description	Possible Value	Remarks
disconnecCode	String	Disconnection Code		Mandatory
serviceType	String	Service Type	POSTPAID	
			PREPAID	
parallelRun	String	parellelRun indicator to	<u>Value</u>	Mandatory
		determine the state of the	0 – existing system	
		workflow	1 – new billing	
			2 – parallel run in GNV	
			& new billing in OM	

```
{
    "disconnectCode": "CVINP",
    "serviceType": "PREPAID",
    "parallelRun": "1"
}
```



Parameter	Data Type	Description	Possible Value	Remarks
resultCode	String	Response result	See below table	
errorCode	String	Error code return from Covalense		
		billing api		
errorDesc	String	Error description return from		
		Covalense billing api		
disconnectDesc	String	Disconnection description		

Result Code

Result Code	Severity	Description
0	N/A	Success
-1	N/A	Missing input parameters

Success response

```
{
    "resultCode": "0",
    "errorDesc": "",
    "errorCode": "",
    "disconnectDesc": "Disconnect due to non-payment"
}
```

```
{
    "resultCode": "-1",
    "errorCode": "-1",
    "errorDesc": "Missing input parameters"
}
```



8. Query Attributes by Account

Purpose

To get the value of the attribute at the customer account in New Billing

Interface Details

Production Endpoints: TBC

System	Endpoint (UAT)		
UAT	https://crm-uat.smartone.com/api/brm/v1/account		
TYK	https://tykapi-u.hksmartone.com/icp/NBill/brm/v1/account		

API: /queryAttributesByAccount

Type: REST

Method: POST

Add Key to HTTP Request Header for TYK API:

Name	Auth_ID
Value	eyJvcmciOil2NGY2Y2I1ZmFiYzRhYWI4MGNIZDE1NTUiLCJpZCl6ljFiYzI4OGIzYzZjMTQxNjFiM2ZiMWUyNGJIMDAyN2
	FkliwiaCl6Im11cm11cjY0In0=

Request Parameters

Parameter	Data Type	Description	Possible Value	Remarks
accountNum	String	Account number		Mandatory
reqAttributes	Json Array	Array of request attributes		
		for query		
reqAttributes -> name	String	Name of request attributes		
parallelRun	String	parellelRun indicator to	<u>Value</u>	Mandatory
		determine the state of the	0 – existing system	
		workflow	1 – new billing	
			2 – parallel run in GNV & new	
			billing in OM	



List of Attribute Name

Attribute Name
ACCOUNT_IDENTIFICATION
INVOICE_REF
COMPANY_NAME
POSITION
INDUSTRY_CODE
BILL_LANGUAGE
LINE_CATEGORY
SPECIAL_USER_REF
SPECIAL_USER_REF_2
SPECIAL_USER_REF_3
LOGINNOW_AUTHORIZED
REVOKE_CDR_IND
BN_ORDER_NUMBER
BN_INSTALLATION_DATE
TRAVEL_SIM_EXPIRY_DATE
CHILD_TOPUP_ALLOWED
CONTACT_OWNER_COMMUNICATION
PRIMARY_LINE
PREV_USER_PROFILE
JOIN_SMC_DATE



Parameter	Data Type	Description	Possible Value	Remarks
resultCode	String	Response result	See below table	
errorCode	String	Error code return from Covalense billing api		
errorDesc	String	Error description return from Covalense billing api		
attributes	Json Array	Array of attribute name and value		
attributes -> name	String	Name of the attribute		
attributes -> value	String	Value of the attribute		

Result Code

Result Code	Severity	Description
0	N/A	Success
-1	N/A	Missing input parameter

Success response

```
{
  "resultCode": "-1",
  "errorCode": "-1",
  "errorDesc": "Missing input parameter"
}
```



9. Query Attributes by Customer

Purpose

To get the value of the attribute at the customer number in New Billing

Interface Details

Production Endpoints: TBC

System	Endpoint (UAT)		
UAT	https://crm-uat.smartone.com/api/brm/v1/account		
TYK	https://tykapi-u.hksmartone.com/icp/NBill/brm/v1/account		

API: /queryAttributesByCustomer

Type: REST

Method: POST

Add Key to HTTP Request Header for TYK API:

Name	Auth_ID
Value	eyJvcmciOil2NGY2Y2I1ZmFiYzRhYWI4MGNIZDE1NTUiLCJpZCl6ljFiYzI4OGIzYzZjMTQxNjFiM2ZiMWUyNGJIMDAyN2
	FkliwiaCl6Im11cm11cjY0In0=

Request Parameters

Parameter	Data Type	Description	Possible Value	Remarks
custNum	String	Customer number		Mandatory
reqAttributes	Json Array	Array of request attributes		
		for query		
reqAttributes -> name	String	Name of request attributes		
parallelRun	String	parellelRun indicator to	<u>Value</u>	Mandatory
		determine the state of the	0 – existing system	
		workflow	1 – new billing	
			2 – parallel run in GNV & new	
			billing in OM	



List of Attribute Name

Attribute Name
DEALER_CODE
WRITE_OFF
CREDIT_COLL_AGENCY_CODE
BILL_FORMAT_CODE
INDICATORS
REGISTRANT
LOGINNOW_IND
EBILL_ATTACHMENT
PRINT_TAG
DEBIT_LIMIT
DIVERT_CODE
SEB_IND
BILL_EMAIL
SEB_ACCOUNTNUMBER
OLD_CUSTOMER_NUM



Parameter	Data Type	Description	Possible Value	Remarks
resultCode	String	Response result	See below table	
errorCode	String	Error code return from Covalense		
		billing api		
errorDesc	String	Error description return from		
		Covalense billing api		
attributes	Json	Array of attribute name and value		
	Array			
attributes -> name	String	Name of the attribute		
attributes -> value	String	Value of the attribute		

Result Code

Result Code	Severity	Description
0	N/A	Success
-1	N/A	Missing input parameter

Success response

```
{
    "resultCode": "-1",
    "errorCode": "-1",
    "errorDesc": "Missing input parameters"
}
```



10. Subscriber Status

Purpose

To get subscriber status of the subscriber from the new billing system

Interface Details

Production Endpoints: TBC

System	Endpoint (UAT)
UAT	https://crm-uat.smartone.com/api/brm/v1/account
TYK	https://tykapi-u.hksmartone.com/icp/NBill/brm/v1/account

API: /subscriberStatus

Type: REST

Method: POST

Add Key to HTTP Request Header for TYK API:

Name	Auth_ID
Value	eyJvcmciOil2NGY2Y2I1ZmFiYzRhYWI4MGNIZDE1NTUiLCJpZCl6ljFiYzI4OGlzYzZjMTQxNjFiM2ZiMWUyNGJIMDAyN2
	FkliwiaCl6Im11cm11cjY0In0=

Request Parameters

Parameter	Data Type	Description	Possible Value	Remarks
accountNum	String	Account number		Mandatory
parallelRun	String	parellelRun indicator to	<u>Value</u>	Mandatory
		determine the state of the	0 – existing system	
		workflow	1 – new billing	
			2 – parallel run in GNV & new	
			billing in OM	



Parameter	Data Type	Description	Possible Value	Remarks
resultCode	String	Response result	See below table	
errorCode	String	Error code return from Covalense		
		billing api		
errorDesc	String	Error description return from		
		Covalense billing api		
custNum	String	Customer number		
acctNum	String	Account number		
subrNum	String	Subscriber number		
lineCategory	String	Line category		
subrSwOn	Date	Switch on date		
subrSwOff	Date	Switch off date		
subrOffReason	String	Disconnect reason		
subrStatus	String	Subscriber status		
accountStatus	String	Account status		
cardStatus	String	Card status		
cardStatusReason	String	Card status reason		
cardStatusDate	Date	Card status date		
cardCreationDate	Date	Card creation date		
cardStatusTimeoutDate	Date	Card status timeout date		
portinind	String	Port-in Indicator (mnp inp indicator)		

Result Code

Result Code	Severity	Description
0	N/A	Success
-1	N/A	Missing input parameter



Success response

```
// Enquiry result for prepaid subscriber
         "resultCode": "0",
         "errorDesc": "",
         "errorCode": "",
         "custNum": "04297934",
         "acctNum": "04297934.00001",
         "subrNum": "91234567",
         "lineCategory": "P",
         "subrSwOn": "2023-12-31 01:01:01",
         "subrSwOff": "",
         "subrOffReason": "",
         "subrStatus": "OK",
         "accountStatus": "OK",
         "cardStatus": "OK",
         "cardStatusReason": "",
         "cardStatusDate": "2023-12-31 01:01:01",
         "cardCreationDate": "2023-12-30 01:01:01",
         "cardStatusTimeoutDate": "",
         "portInInd" : ""
```

```
{
  "resultCode": "-1",
  "errorCode": "-1",
  "errorDesc": "Missing input parameter"
}
```



11. Subscriber Other Details

Purpose

To get the subscriber other information from the billing system

Interface Details

Production Endpoints: TBC

System	Endpoint (UAT)
UAT	https://crm-uat.smartone.com/api/brm/v1/account
TYK	https://tykapi-u.hksmartone.com/icp/NBill/brm/v1/account

API: /subscriberOtherDetails

Type: REST

Method: POST

Add Key to HTTP Request Header for TYK API:

Name	Auth_ID
Value	eyJvcmciOil2NGY2Y2I1ZmFiYzRhYWI4MGNIZDE1NTUiLCJpZCl6ljFiYzI4OGlzYzZjMTQxNjFiM2ZiMWUyNGJIMDAyN2
	FkliwiaCl6Im11cm11cjY0In0=

Request Parameters

Parameter	Data Type	Description	Possible Value	Remarks
accountNum	String	Account number		Mandatory
parallelRun	String	parellelRun indicator to	<u>Value</u>	Mandatory
		determine the state of the	0 – existing system	
		workflow	1 – new billing	
			2 – parallel run in GNV & new	
			billing in OM	



Parameter	Data Type	Description	Possible Value	Remarks
resultCode	String	Response result	See below table	
errorCode	String	Error code return from Covalense		
		billing api		
errorDesc	String	Error description return from		
		Covalense billing api		
custNum	String	Customer number		
acctNum	String	Account number		
subrNum	String	Subscriber number		
industryCode	String	Industry code		
position	String	position		
company	String	Company		
invoiceRef	String	Invoice Reference		
revokeCdrIndicator	String	Revoke CDR Indicator		
bnOrderNumber	String	BN order number to the subscriber		
bnInstallationDate	Date	BN installation date		
travelSimExpDate	Date	Travel SIM Expiry Date		
joinSmcDate	String	The date to join SMC		
specialUserRef	Date	Special User Reference 1		
specialUserRef2	Date	Special User Reference 2		
specialuserRef3	Date	Special User Reference 3		

Result Code

Result Code	Severity	Description
0	N/A	Success
-1	N/A	Missing input parameter



Success response

```
// Enquiry result for prepaid subscriber
         "resultCode": "0",
         "errorDesc": "",
         "errorCode": "",
         "custNum": "04297934",
         "acctNum": "04297934.00001",
         "subrNum": "91234567",
         "industryCode": "INC",
         "position": "SALES",
         "company": "SMC",
         "invoiceRef": "INC11",
         "revokeCdrIndicator": "N",
         "bnOrderNumber": "",
         "bnInstallationDate":"",\\
         "travelSimExpDate": "",
         "joinSmcDate": "2023-12-31 01:01:01",
         "specialUserRef": "",
         "specialUserRef2": "",
         "specialUserRef3" : ""
```

```
{
    "resultCode": "-1",
    "errorCode": "-1",
    "errorDesc": "Missing input parameter"
}
```



12. Customer Other Details

Purpose

To get the customer other information from the billing system

Interface Details

Production Endpoints: TBC

System	Endpoint (UAT)
UAT	https://crm-uat.smartone.com/api/brm/v1/account
TYK	https://tykapi-u.hksmartone.com/icp/NBill/brm/v1/account

API: /customerOtherDetails

Type: REST

Method: POST

Add Key to HTTP Request Header for TYK API:

Name	Auth_ID
Value	eyJvcmciOil2NGY2Y2I1ZmFiYzRhYWI4MGNIZDE1NTUiLCJpZCl6ljFiYzI4OGlzYzZjMTQxNjFiM2ZiMWUyNGJIMDAyN2
	FkliwiaCl6Im11cm11cjY0In0=

Request Parameters

Parameter	Data Type	Description	Possible Value	Remarks
custNum	String	Customer number		Mandatory
parallelRun	String	parellelRun indicator to	<u>Value</u>	Mandatory
		determine the state of the	0 – existing system	
		workflow	1 – new billing	
			2 – parallel run in GNV & new	
			billing in OM	



Parameter	Data Type	Description	Possible Value	Remarks
resultCode	String	Response result	See below table	
errorCode	String	Error code return from Covalense		
		billing api		
errorDesc	String	Error description return from		
		Covalense billing api		
oldCustomerRef	String	The previous customer number before		
		the changeowner		
caCode	String	Credit collection agent code		
printTag	String	Print tag of this customer		
sebAccountNum	String	SEB account number of this customer		
paymentMethodId	String	The unique reference of payment		
		method		
paymentMethodDesc	String	Payment method description		
bankAcHolder	String	Masked value of bank account holder		
		name		
bankBranchNum	String	Masked value of the branch number		
debtorIdType1	String	ID Type of the first customer of the		
		joint account for the payment by bank		
debtorld1	String	Maksed value of IDBR for the first		
		customer of the joint account		
debtorIdType2	String	ID Type of the 2nd customer of the		
		joint account for the payment by bank		
debtorId2	String	Maksed value of IDBR for the 2md		
		customer of the joint account		
debitLimit	String	Debit limit amount of payment		
		method by bank		
cardNum	String	Masked value of credit card holder		
		name of payment method by card		
cardholder	String	Masked value of		
cardExpiryDate	String	Masked value of credit card expiry		
		date for payment method by card		
cardIssueBank	String	Masked value of credit card expiry		
		date for payment method by card		
lastPaymentDate	String	Last payment date		
dealerCode	String	Dealer code at the customer level		
writeOff	String	Y - customer is write-off		
		N – customer is not write-off		
billFormatCode	String	Bill format code		
ebillAttachment	String	e-Bill attachment		
Registrant	String	Registrant		

Result Code

Result Code	Severity	Description
0	N/A	Success
-1	N/A	Missing input parameter



Success response

```
// Enquiry result for prepaid subscriber
         "resultCode": "0",
         "errorDesc": "",
         "errorCode": "",
         "caCode": "CC1",
         "printTag": "A1",
         "sebAccountNum": "5123456.00001",
         "paymentMethodId": "11",
         "paymentMethodDesc": "CC. Credit Card",
         "bankAcHolder": "",
         "bankAcNum" : "",
         "debtorIdType1": "",
         "debtorId1": "",
         "debtorIdType2": "",
         "debtorId2": "",
         "debitLimit": "",
         "cardNum": "450188XXXXXX9011",
         "cardHolder": "FUNGXXXXXX",
         "cardExpiryDate": "03XXXX",
         "cardIssueBank": "HSBC",
         "lastPaymentDate": "2004-10-05",
         "dealerCode": "PIM00000052",
         "writeOff": "",
         "billFormatCode": "",
         "eBillAttachment": "",
         "registrant": ""
}
```

```
{
    "resultCode": "-1",
    "errorCode": "-1",
    "errorDesc": "Missing input parameter"
}
```



13. Payment Transasction History

Purpose

To get the payment transation history for the given subscriber number, account number and start & end date

Interface Details

Production Endpoints: TBC

System	Endpoint (UAT)
UAT	https://crm-uat.smartone.com/api/brm/v1/payment
TYK	https://tykapi-u.hksmartone.com/icp/NBill/brm/v1/payment

API: /transactionHistory

Type: REST

Method: POST

Add Key to HTTP Request Header for TYK API:

Name	Auth_ID
Value	eyJvcmciOiI2NGY2Y2I1ZmFiYzRhYWI4MGNIZDE1NTUiLCJpZCI6IJFiYzI4OGIzYzZJMTQxNjFiM2ZiMWUyNGJIMDAyN2
	FkliwiaCl6Im11cm11cjY0In0=

Request Parameters

Parameter	Data Type	Description	Possible Value	Remarks
accountNum	String	Account number		Mandatory
startDate	String	Start date	Format YYYY-MM-DD HH24:MI	Optional
		If it's not passed, all of		
		records are extracted		
endDate	String	End Date	Format YYYY-MM-DD HH24:MI	Optional
parallelRun	String	parellelRun indicator to	<u>Value</u>	Mandatory
		determine the state of the	0 – existing system	
		workflow	1 – new billing	
			2 – parallel run in GNV & new	
			billing in OM	



Parameter	Data Type	Description	Possible Value	Remarks
resultCode	String	Response result	See below table	
errorCode	String	Error code return from Covalense		
		billing api		
errorDesc	String	Error description return from		
		Covalense billing api		
custNum	String	Customer number		
acctNum	String	Account number		
subrNum	String	Subscriber number		
paymentCnt	String	Count of payment records		
paymentInfo	JSON Array	Payment Information array list		
paymentInfo ->	String	Payment ID by BRM during payment		
paymentId		collect		
paymentInfo ->	String	Effective date		
postedDate				
paymentInfo ->	String	Payment amount		
amount				
paymentInfo ->	String	Payment method code		
paymentMethodCode				
paymentInfo ->	String	Opening balance before		
openingBalance		topup/payment		
paymentInfo ->	String	Closing balance after topup/		
closingBalance		payment		
paymentInfo ->	String	Payment Reference		
paymentRef				
paymentInfo ->	String	Payment text		
paymentText				

Result Code

Result Code	Severity	Description
0	N/A	Success
-1	N/A	Missing input parameter



Success response

```
// Enquiry result for prepaid subscriber
         "resultCode": "0",
         "errorDesc": "",
         "errorCode": "",
         "custNum": "04297934",
         "acctNum": "04297934.00001",
         "subrNum": "91234567",
         "paymentCnt": "2",
         "paymentInfo": {
                  "paymentId": "P-12344",
                  "postedDate": "2024-11-30 01:00:00",
                  "amount": "350",
                  "paymentMethodCode": "VC",
                  "openingBalance": "50",
                  "closingBalance": "400",
                  "paymentRef": "N1243655",
                  "paymentText" : "|50|0"
         }, {
                  "paymentId": "P-12345",
                  "postedDate": "2024-12-30 01:00:00",
                  "amount" : "350",
                  "paymentMethodCode": "VC",
                  "openingBalance": "350",
                  "closingBalance": "750",
                  "paymentRef" : "N1243656",
                  "paymentText" : "|350|0"
         }
}
```

```
{
    "resultCode": "-1",
    "errorCode": "-1",
    "errorDesc": "Missing input parameter"
}
```



14. Tag On Details

Purpose

To get the tag-on hierarchy of the main (parent) and secondary (child) subscribers for tag-on (such as family) plan from the billing system

Interface Details

Production Endpoints: TBC

System	Endpoint (UAT)
UAT	https://crm-uat.smartone.com/api/brm/v1/subscription
TYK	https://tykapi-u.hksmartone.com/icp/NBill/brm/v1/subscription

API: /tagOnDetails

Type: REST

Method: POST

Add Key to HTTP Request Header for TYK API:

Name	Auth_ID
Value	eyJvcmciOil2NGY2Y2I1ZmFiYzRhYWI4MGNIZDE1NTUiLCJpZCI6IjFiYzI4OGIzYzZjMTQxNjFiM2ZiMWUyNGJIMDAyN2
	FkliwiaCl6Im11cm11cjY0In0=

Request Parameters

Parameter	Data Type	Description	Possible Value	Remarks
custNum	String	Customer number		Mandatory
parallelRun	String	parellelRun indicator to	<u>Value</u>	Mandatory
		determine the state of the	0 – existing system	
		workflow	1 – new billing	
			2 – parallel run in GNV & new	
			billing in OM	



Parameter	Data Type	Description	Possible Value	Remarks
resultCode	String	Response result See below table		
errorCode	String	Error code return from Covalense		
		billing api		
errorDesc	String	Error description return from		
		Covalense billing api		
tagOnList	JSON Array	Array for tag-on (or family)		
		hierarchy		
tagOnList ->	String	Payment ID by BRM during		
tagOnCode		payment collect		
tagOnList ->	String	Parent customer number		
parentCustNum				
tagOnList ->	String	Parent subscriber number		
parentSubrNum				
tagOnList ->	String	Child customer number		
childCustNum				
tagOnList ->	String	Child subscriber number		
childSubrNum				
tagOnList ->	String	Start date of the child in the family		
startDate				
tagOnList ->	String	End date of the dhile in the family		
endDate				
tagOnList ->	String	Status of tag-on hierarchy	A – Active	
status			C – Cancelled child	
			M – Suspended parent	
			T – Suspended child	

Result Code

Result Code	Severity	Description
0	N/A	Success
-1	N/A	Missing input customer number



Success response

```
"resultCode": "0",
"errorDesc": "",
"errorCode": "",
"tagOnList": {
         "parentCustNum": "00001234",
         "parentSubrNum" : "91234567",
         "childCustNum": "00001234",
         "childSubrNum": "61234567",
         "startDate": "2024-10-01 00:00:00",
         "endDate" : "",
         "status": "A",
}, {
         "parentCustNum": "00001234",
         "parentSubrNum": "91234567",
         "childCustNum" : "00001234",
         "childSubrNum" : "51234567",
         "startDate": "2024-10-01 00:00:00",
         "endDate": "2024-12-01 00:00:00",
         "status": "C",
}
```

```
{
    "resultCode": "-1",
    "errorCode": "-1",
    "errorDesc": "Missing input customer number"
}
```