



# IMIdigital – REST API Gateway

## Partner

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Reviewed

## 1. Introduction

This document details out the functional scope for delivery of DPDP Platform to Telenor - Grameenphone based on the requirements from the Telenor GP RFP. The functional scope details will be mapped with each requirement in the RFP. SIT & UAT will be done based on the agreed functional scope outlined in this document.

### 1.1 Glossary of Terms

Term	Description
MO	Mobile Originated
MT	Mobile Terminated
AO	Application Originated
AT	Application Terminated
DPDP	Digital Product Delivery Platform
SMSC	Short Message Service Center
IN	Intelligent Network (Charging Gateway)
USSD	Unstructured Supplementary Service Data
IVR	Interactive Voice Response
OTP	One Time Password
GGSN	Gateway GPRS Support Node
CG	Consent Gateway
ACK	Acknowledge
BU	Business Unit
CG	Consent Gateway



## 2. Send SMS

This is used by the Partners for sending of MT SMS to a single recipient, this supports both Charged and Free SMS Transaction.

### 2.1 URL

<https://ip:port/digital5/messaging/v5.0/sendsms>

### 2.2 Request

#### 2.2.1 Parameters

Parameter	Data Type	Description
<b>accessInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the user access properties for the API call.</b>
servicekey	String (M)	The service key is assigned to access the API Method.
endUserId	String (M)	Virtual MSISDN given by the Platform.
accesschannel	String (M)	Valid values list 1. MTSMS
referenceCode	String (M)	Unique Transaction code assigned by the partner for the Transaction.
<b>charge</b>	<b>JSON Object (M)</b>	<b>This object defines the cost-charging properties for the API call.</b>
code	String (M)	The unique charging code, given by the platform for the price amount.
amount	Decimal(O)	Amount associated with the charge code. Ex: xxxx.xx
taxAmount	Decimal(O)	Tax Amount for the Amount to be

		charged. Ex: xxxx.xxx
description	String (M)	The text to be used for information and billing.
currency	String (M)	The currency identifier as defined in ISO 4217 [9]. “BDT” → Only Allowed
<b>smsInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the SMS properties for the API call.</b>
msgTransactionId	String (O)	The Unique Transaction ID assigned by the platform for the Incoming Message that is notified to the partner in SMS / USSD / IVR
language	String (M)	Message Language EN → English BN → Bangla AR → Arabic HI → Hindi TH → Thai
senderId	String (M)	The Sender ID is to be used in the SMS
message	String (M)	Message to be sent in the SMS
msgType	String (M)	Type of product Ex: Text / Binary / WAP Push / Flash
validity	String (O)	Validity in days for expiry of SMS
deliveryReport	String (M)	0 → Disabled (Default)

		1 ➔ Enabled
--	--	-------------

### 2.2.2 Format

```
{
  "accessInfo": {
    "servicekey": "String",
    "endUserId": "String",
    "accesschannel": "String",
    "referenceCode": "String"
  },
  "charge": {
    "code": "String",
    "amount": "BigDecimal",
    "taxAmount": "BigDecimal",
    "description": "String",
    "currency": "String"
  },
  "smsInfo": {
    "msgTransactionId": "String",
    "language": "String",
    "senderId": "String",
    "message": "String",
    "msgType": "String",
    "validity": "String",
    "deliveryReport": "String"
  }
}
```

## 2.3 Response

### 2.3.1 Parameters

Parameter	Data Type	Description
<b>statusInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the Transaction Status properties for the API call.</b>
statusCode	String (M)	200 → Success 500 → Error
referenceCode	String (M)	Unique Transaction code given by the partner for the Transaction.
serverReferenceCode	String (M)	Unique Transaction code assigned by the platform for the Transaction.
totalAmountCharged	Decimal (M)	Amount charged for the transaction Ex: xxx.xx
<b>errorInfo</b>	<b>JSON Object (O)</b>	<b>This object defines the Error properties for the API call.</b>
errorCode	String (M)	Error Code given by the Platform
errorDescription	String (M)	Description of the error code

### 2.3.2 Success Format

```
{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverReferenceCode": "String",
    "totalAmountCharged": "Decimal"
  }
}
```

### 2.3.3 Error Format

```
{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverReferenceCode": "String",
    "errorInfo" {
      "errorCode": "String",
      "errorDescription": "String"
    }
  }
}
```

## 3. GROUP SMS

This is used by the Partners for sending of MT SMS for a single or multiple recipients who are subscribed to a particular service and are in active state, this supports both Charged and Free SMS Transaction.

### 3.1 URL

<https://ip:port/digital5/messaging/v5.0/groupsms>

### 3.2 Request

#### 3.2.1 Parameters

Parameter	Data Type	Description
accessInfo	JSON Object (M)	This object defines the user access properties for the API call.
servicekey	String (M)	The service key is assigned to access the API Method.
endUserId	String Array (M)	Virtual MSISDN given by the Platform.  Note: At least one VMSISDN is mandatory.  <b>Note</b> : Max of 200 recipients only

accesschannel	String (M)	Valid values list 2. MTSMS
referenceCode	String (M)	Unique Transaction code assigned by the partner for the Transaction
charge	JSON Object (M)	<b>This object defines the cost-charging properties for the API call.</b>
code	String (M)	The unique charging code, given by the platform for the price amount.
amount	Decimal(O)	Amount associated with the charge code Ex: xxxx.xx
taxAmount	Decimal(O)	Tax Amount for the amount to be charged Ex: xxxx.xxx
description	String (M)	The text to be used for information and billing.
currency	String (M)	The currency identifier as defined in ISO 4217 [9]. “BDT” → Only Allowed
smsInfo	JSON Object (M)	<b>This object defines the SMS properties for the API call.</b>
msgTransactionId	String (M)	The Unique Transaction ID assigned by the platform for the Incoming Message that is notified to the partner in SMS / USSD / IVR
language	String (M)	Message Language EN → English BN → Bangla AR → Arabic

		HI → Hindi TH → Thai
senderId	String (M)	The Sender ID to be used in the SMS
message	String (M)	Message to be sent in the SMS
msgType	String (M)	Type of product Ex: Text / Binary / WAP Push / Flash
validity	String (O)	Validity in days for expiry of SMS
deliveryReport	String (M)	0 → Disabled (Default) 1 → Enabled

### 3.2.2 Format

```
{
  "accessInfo": {
    "servciekey": "String",
    "endUserId": ["String","String","String","String"],
    "accesschannel": "String",
    "referenceCode": "String"
  },
  "charge": {
    "code": "String",
    "amount": "BigDecimal",
    "taxAmount": "BigDecimal",
    "description": "String",
    "currency": "String"
  },
  "smsInfo": {
```

```
"msgTransactionId": "String",  
"language": "String",  
"senderId": "String",  
"message": "String",  
"msgType": "String",  
"validity": "String"  
"deliveryReport": "String"  
  
}
```

### 3.3 Response

#### 3.3.1 Parameters

Parameter	Data Type	Description
<b>statusInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the Transaction Status properties for the API call.</b>
statusCode	String (M)	200 → Success 500 → Error
referenceCode	String (M)	Unique Transaction code given by the partner for the Transaction
serverBatchReference Code	String (M)	Unique Batch Transaction code assigned by the Platform for the Transaction
<b>errorInfo</b>	<b>JSON Object (O)</b>	<b>This object defines the Error properties for the API call.</b>



errorCode	String (M)	Error Code given by the Platform
errorDescription	String (M)	Description of the error code

**Note:** In case of multiple recipients, multiple server Reference Code's will be generated, with the same order of the recipients submitted in the request.

### 3.3.2 Success Format

```
{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverBatchReferenceCode": "String",
  }
}
```

### 3.3.3 Error Format

```
{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverReferenceCode": "String",
    "errorInfo" {
      "errorCode": "String",
      "errorDescription": "String"
    }
  }
}
```

## 4. Push Alert (Alert Trigger)

This method will be used by Partners for sending the trigger to push alerts to all the active subscribers of the service. This supports both charging & Free push as well.

### 4.1 URL

<https://ip:port/digital5/messaging/v5.0/pushalertsms>

### 4.2 Request

#### 4.2.1 Parameters

Parameter	Data Type	Description
<b>accessInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the user access properties for the API call.</b>
servicekey	String (M)	The service key assigned for accessing the API Method
accesschannel	String (M)	Valid values list 1. PUSHALERT
referenceCode	String (M)	Unique Transaction code assigned by the partner for the Transaction
<b>charge</b>	<b>JSON Object (O)</b>	<b>This object defines the cost-charging</b>

		<b>properties for the API call.</b>
code	String (M)	The unique charging code, given by the platform for the price amount.
amount	Decimal(O)	Amount associated with the charge code Ex: xxxx.xx
taxAmount	Decimal(O)	Tax Amount for the Amount to be charged Ex: xxxx.xxx
description	String (M)	The text to be used for information and billing
currency	String (M)	The currency identifier as defined in ISO 4217 [9]. “BDT” → Only Allowed
<b>smsInfo</b>	<b>JSON Array Object (M)</b>	<b>This object defines the SMS properties for the API call.</b>
productIdentifier	String (M)	The Product ID assigned by the Platform
senderId	String (M)	The Sender ID to be used in the SMS
language	String (M)	Message Language EN → English BN → Bangla AR → Arabic HI → Hindi TH → Thai
message	String (M)	Message to be sent in the SMS
msgType	String (M)	Type of product Ex: Text / Binary / WAP Push / Flash

validity	String (O)	Validity in days for expiry of SMS
deliveryReport	String (M)	0➔ Disabled (Default) 1➔ Enabled

#### 4.2.2 Format

```
{
  "accesInfo": {
    "servciekey": "String",
    "endUserId": "String",
    "accesschannel": "String",
    "referenceCode": "String"
  },
  "charge": {
    "code": "String",
    "amount": "BigDecimal",
    "taxAmount": "BigDecimal",
    "description": "String",
    "currency": "String"
  },
  "smsInfo": [ {
    "productIdentifier": "String",
    "language": "String",
    "senderId": "String",
    "message": "String",
    "msgType": "String",
    "validity": "String",
```

```
{
  "deliveryReport": "String",
},
{
  "productIdentifier": "String",
  "language": "String",
  "senderId": "String",
  "message": "String",
  "msgType": "String",
  "validity": "String",
  "deliveryReport": "String"
}
}
```

## 4.3 Response

### 4.3.1 Parameters

Parameter	Data Type	Description
<b>statusInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the Transaction Status properties for the API call.</b>
statusCode	String (M)	200 → Success 500 → Error
referenceCode	String (M)	Unique Transaction code given by the partner for the Transaction
serverReferenceCode	String (M)	Unique Transaction code assigned by the Platform for the Transaction
<b>errorInfo</b>	<b>JSON Object (O)</b>	<b>This object defines the Error properties for the API call.</b>
errorCode	String (M)	Error Code given by the Platform
errorDescription	String (M)	Description of the error code

#### 4.3.2 Success Format

```
{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverReferenceCode": "String",
    "endUserId": "String"
  }
}
```

#### 4.3.3 Error Format

```
{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverReferenceCode": "String",
    "errorInfo" {
      "errorCode": "String",
      "errorDescription": "String"
    }
  }
}
```

## 5. Notify Message

This will be pushed by the platform to the configured Service URL registered by the partner for receiving SMS MO's & USSD Triggers from the platform. This Method needs to be implemented by the Partner for receiving of notification Messages from SMS MO and USSD Trigger.

### 5.1 Push Request Format.

#### 5.1.1 Parameters

Parameter	Data Type	Description
<b>accessInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the user access properties for the API call.</b>
endUserId	String (M)	Virtual MSISDN of the User
language	String (M)	End User Profile Language EN → English BN → Bangla AR → Arabic HI → Hindi TH → Thai
accesschannel	String (M)	Valid values list  1. SMS  2. USSD
serverReferenceCode	String (M)	Unique Transaction code assigned by the Platform for the Transaction
<b>messageInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the Message properties for the API call.</b>
serviceIdentifier	String (M)	The service ID assigned by the Platform
productIdentifier	String (M)	The Product ID assigned by the Platform

msgTransactionId	String (M)	The Unique Transaction ID assigned by the platform for the Message that was notified to the partner
shortcode	String (M)	Shortcode to which the SMS was sent
msgType	String (M)	Type of product Ex: SMS Text / SMS Binary / USSD String
message	String (M)	Message that was sent in the SMS / Received from USSD
totalAmountCharged	Decimal (M)	Amount charged for the transaction Ex: xxx.xx

### 5.1.2 Format

```
{  
  "accessInfo": {  
    "endUserId": "String",  
    "language": "String",  
    "accesschannel": "String",  
    "serverReferenceCode": "String"  
  },  
  "smsInfo": {  
    "serviceIdentifier": "String",  
    "productIdentifier": "String",  
    "msgTransactionId": "String",  
    "shortcode": "String",  
    "msgType": "String",  
    "message": "String",  
  }  
}
```



```

    "totalAmountCharged": "1.0"
  }
}

```

## 5.2 Response

The server expects the below response from the partner system, In case if the server does not receive any response from the partner system, Server will retry as per the retry schedule configured at the service.

### 5.2.1 Parameters

Parameter	Data Type	Description
<b>statusInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the Transaction Status properties for the API call.</b>
statusCode	String (M)	200 → Success
referenceCode	String (M)	Unique Transaction code given by the partner for the Transaction
serverReferenceCode	String (M)	Unique Transaction code given by the Platform for the Message Transaction

### 5.2.2 Success Format

```

{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverReferenceCode": "String",
  }
}

```

## 6. Notify SMS DR

This will be pushed by the platform to the configured Service MT Delivery Notification URL registered by the partner for receiving DR's from the platform. Platform will push only final status of delivery received from SMSC. This Method needs to be implemented by the Partner for receiving of SMS DR notification.

### 6.1 Push Request Format

#### 6.1.1 Parameters

Parameter	Data Type	Description
<b>statusInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the user access properties for the API call.</b>
endUserId	String (M)	Virtual MSISDN of the User
referenceCode	String (M)	Unique Transaction code given by the partner for the Transaction
msgTransactionId	String (M)	Unique Transaction code assigned by the Platform for the SMS MT Transaction
msgStatus	String (M)	Status of Submitted SMS

#### 6.1.2 Format

```
{
  "statusInfo": {
    "endUserId": "String",
    "referenceCode ": "String",
    "msgTransactionId ": "String",
    "msgStatus": "String",
  }
}
```

## 6.2 Response

The server expects the below response from the partner system, In case if the server does not receive any response from the partner system, Server will retry as per the retry schedule configured at the service.

### 6.2.1 Parameters

Parameter	Data Type	Description
<b>statusInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the Transaction Status properties for the API call.</b>
statusCode	String (M)	200 → Success
referenceCode	String (M)	Unique Transaction code given by the partner for the Transaction
serverReferenceCode	String (M)	Unique Transaction code given by the Platform for the Transaction

### 6.2.2 Success Format

```
{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverReferenceCode": "String",
  }
}
```

## 7. Get Charging URL

This is used by the partner to get the Consent Gateway Redirection URL for transferring of the Subscriber to the consent Gateway.

### 7.1 URL

<https://ip:port/digital5/charging/v5.0/getchargingurl>

### 7.2 Request

#### 7.2.1 Parameters

Parameter	Data Type	Description
accessInfo	JSON Object (M)	This object defines the user access properties for the API call.
servicekey	String (M)	The service key assigned for accessing the API Method.
accesschannel	String (M)	Source Channel. Valid values list, <ol style="list-style-type: none"> <li>1. WAP</li> <li>2. APP</li> </ol>
charging	JSON Object (M)	This object defines the cost-charging properties for the API call.
code	String (M)	The unique charging code, given by the platform for the price amount.
amount	Decimal(O)	Amount associated with the charge code Ex: xxxx.xx
taxAmount	Decimal(O)	Tax Amount for the added to the base price Ex: xxxx.xxx
description	String (M)	The text to be used for information and

		billing
currency	String (M)	The currency identifier as defined in ISO 4217 [9]. “BDT” → Only Allowed
referenceCode	String (M)	Unique Transaction code assigned by the partner for the Transaction
<b>productInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the event properties for the API call.</b>
id	String (M)	The Unique ID assigned by the partner
type	String (M)	Type of product Ex: Wallpaper / Video / Game / RBT Song /
title	String (M)	Title for identification of content
thumbnailUrl	String (M)	URL for displaying the thumbnail
successUrl	String (M)	URL to which the Consent gateway need to redirect the user on successful charging
failureUrl	String (M)	URL to which the Consent gateway need to redirect the user on charging failure
cancelUrl	String (M)	URL to which the Consent gateway need to redirect the user cancels charging
notifyUrl	String (M)	URL to which the Consent gateway will inform about the transaction status
downloadUrl	String (O)	URL to be used by CC agent for re-push to the user for downloading the content

validity	String (M)	Validity in days for expiry of download content download URL
----------	------------	---

### 7.2.2 Format

```
{
  "accessInfo": {
    "servicekey": "String",
    "accesschannel": "String"
  },
  "charge": {
    "code": "String",
    "amount": "BigDecimal",
    "taxAmount": "BigDecimal",
    "description": "String",
    "currency": "String",
    "referenceCode": "String"
  },
  "productInfo": {
    "id": "String",
    "type": "String",
    "title": "String",
    "thumbnailUrl": "String",
    "successUrl": "String",
    "failureUrl": "String",
    "cancelUrl": "String",
    "notifyUrl": "String",
    "downloadUrl": "String",
    "validity": "String"
  }
}
```

}

## 7.3 Response

### 7.3.1 Parameters

Parameter	Data Type	Description
<b>statusInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the Transaction Status properties for the API call.</b>
statusCode	String (M)	200 → Success 500 → Error
referenceCode	String (M)	Unique Transaction code given by the partner for the Transaction
serverReferenceCode	String (M)	Unique Transaction code assigned by the platform for the Transaction
chargeRedirectUrl	String (M)	URI to be used for redirecting of the user by the partner to the consent gateway page
<b>errorInfo</b>	<b>JSON Object (O)</b>	<b>This object defines the Error properties for the API call.</b>
errorCode	String (M)	Error Code given by the Platform
errorDescription	String (M)	Description of the error code

### 7.3.2 Success Format

```
{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverReferenceCode": "String",
```

```
    "chargeRedirectUrl": "String"  
  }  
}
```

### 7.3.3 Error Format

```
{  
  "statusInfo": {  
    "statusCode": "String",  
    "referenceCode": "String",  
    "serverReferenceCode": "String",  
    "errorInfo" {  
      "errorCode": "String",  
      "errorDescription": "String"  
    }  
  }  
}
```

Review



## 8. Notify Charging Status

This will be pushed by the platform to the configured Service Charging Notification URL received in the Charging URL. This Method need to be implemented by the Partner for receiving of Charging status.

### 8.1 Push Request Format

#### 8.1.1 Parameters

Parameter	Data Type	Description
<b>statusInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the Transaction Status properties for the API call.</b>
statusCode	String (M)	200 → Success 500 → Error
referenceCode	String (M)	Unique Transaction code given by the partner for the Transaction
serverReferenceCode	String (M)	Unique Transaction code assigned by the platform for the Transaction.
serverBatchReference Code	String (O)	Unique Batch Transaction code assigned by the platform for the Batch Transaction.
totalAmountCharged	Decimal (M)	Amount charged for the transaction Ex: xxx.xx

#### 8.1.2 Format

```
{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverReferenceCode": "String",
    "serverBatchReferenceCode": "String",
```

```

    "totalAmountCharged": "1.0"
  }
}

```

## 8.2 Response

The server expects the below response from the partner system, In case if the server does not receive any response from the partner system, Server will retry as per the retry schedule configured at the service.

### 8.2.1 Parameters

Parameter	Data Type	Description
<b>statusInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the Transaction Status properties for the API call.</b>
statusCode	String (M)	200 → Success
referenceCode	String (M)	Unique Transaction code given by the partner for the Transaction
serverReferenceCode	String (M)	Unique Transaction code given by the Platform for the Transaction

### 8.2.2 Success Format

```

{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverReferenceCode": "String",
  }
}

```

Reviewed

## 9. Push OTP

This is used by the partner to request the OTP Push to the subscriber over SMS by the Consent Gateway.

### 9.1 URL

<https://ip:port/digital5/charging/v5.0/pushotp>

### 9.2 Request

#### 9.2.1 Parameters

Parameter	Data Type	Description
<b>accessInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the user access properties for the API call.</b>
servicekey	String (M)	The service key assigned for accessing the API Method
endUserId	String (M)	MSISDN of the Subscriber in international Format
accesschannel	String (M)	Valid values list 1. APP
<b>charging</b>	<b>JSON Object (M)</b>	<b>This object defines the cost-charging properties for the API call.</b>
code	String (M)	The unique charging code, given by the platform for the price amount.
amount	Decimal(O)	Amount associated with the charge code Ex: xxxx.xx
taxAmount	Decimal(O)	Tax Amount for the added to the base price Ex: xxxx.xxx

description	String (M)	The text to be used for information and billing
currency	String (M)	The currency identifier as defined in ISO 4217 [9].  “BDT” → Only Allowed
referenceCode	String (M)	Unique Transaction code assigned by the partner for the Transaction

### 9.2.2 Format

```
{
  "accessInfo": {
    "servicekey": "String",
    "endUserId": "String",
    "accesschannel": "String",
    "referenceCode": "String"
  }
  "charge": {
    "code": "String",
    "amount": "BigDecimal",
    "taxAmount": "BigDecimal",
    "description": "String",
    "currency": "String",
    "referenceCode": "String"
  }
}
```

## 9.3 Response

### 9.3.1 Parameters

Parameter	Data Type	Description
<b>statusInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the Transaction Status properties for the API call.</b>
statusCode	String (M)	200 → Success 500 → Error
referenceCode	String (M)	Unique Transaction code given by the partner for the Transaction
serverReferenceCode	String (M)	Unique Transaction code assigned by the platform for the Transaction
OTPTransactionId	String (M)	Unique Transaction Id assigned by the platform for the OTP Generation
<b>errorInfo</b>	<b>JSON Object (O)</b>	<b>This object defines the Error properties for the API call.</b>
errorCode	String (M)	Error Code given by the Platform
errorDescription	String (M)	Description of the error code

### 9.3.2 Success Format

```
{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverReferenceCode": "String",
    "OTPTransactionId": "String "
  }
}
```

### 9.3.3 Error Format

```
{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverReferenceCode": "String",
    "errorInfo" {
      "errorCode": "String",
      "errorDescription": "String"
    }
  }
}
```

Reviewed

## 10. Charge OTP Transaction

This is used by the partner to charge the subscriber based on the OTP PIN given by Consent Gateway to the subscriber.

### 10.1 URL

<https://ip:port/digital5/charging/v5.0/chargeopt>

### 10.2 Request

#### 10.2.1 Parameters

Parameter	Data Type	Description
<b>accessInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the user access properties for the API call.</b>
servicekey	String (M)	The service key assigned for accessing the API Method
endUserId	String (M)	MSISDN of the Subscriber in international Format
accesschannel	String (M)	Valid values list 1. APP
OTPTransactionId	String (M)	Unique OTP Transaction Id given by the Platform
transactionPIN	String (M)	OTP PIN (5Digits) entered by the partner in the partner portal
referenceCode	String (M)	Unique Transaction code assigned by the partner for the Transaction
<b>productInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the event properties for the API call.</b>
id	String (M)	The Unique ID assigned by the partner



type	String (M)	Type of product Ex: Wallpaper / Video / Game / RBT Song /
title	String (M)	Title for identification of content
thumbnailUrl	String (O)	URI for displaying the thumbnail
downloadUrl	String (O)	URI to be used by CC agent for re-push to the user for downloading the content
validity	String (O)	Validity in days for expiry of download content download URL

### 10.2.2 Format

```
{
  "accessInfo": {
    "servicekey": "String",
    "endUserId": "String",
    "accesschannel": "String",
    "OTPTtransactionId ": "String "
    "transactionPIN ": "String "
    "referenceCode": "String"
  },
  "productInfo": {
    "id": "String",
    "type": "String",
    "title": "String",
    "thumbnailUrl": "String",
    "downloadUrl": "String",
```

```

    "validity": "String"
  }
}

```

## 10.3 Response

### 10.3.1 Parameters

Parameter	Data Type	Description
<b>statusInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the Transaction Status properties for the API call.</b>
statusCode	String (M)	200 → Success 500 → Error
referenceCode	String (M)	Unique Transaction code given by the partner for the Transaction
serverReferenceCode	String (M)	Unique Transaction code assigned by the platform for the Transaction
totalAmountCharged	Decimal (M)	Amount charged for the transaction Ex: xxx.xx
<b>errorInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the Error properties for the API call.</b>
errorCode	String (M)	Error Code given by the Platform
errorDescription	String (M)	Description of the error code

### 10.3.2 Success Format

```

{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverReferenceCode": "String",

```

```

    "totalAmountCharged": "1.0"
  }
}

```

### 10.3.3 Error Format

```

{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverReferenceCode": "String",
    "errorInfo" {
      "errorCode": "String",
      "errorDescription": "String"
    }
  }
}

```

## 11. Get Service Subscription Status

This can be used by partner to get the Subscription status of the user for a service.

### 11.1 URL

<https://ip:port/digital5/subscription/v5.0/getsubscriptionstatus>

### 11.2 Request

#### 11.2.1 Parameters

Parameter	Data Type	Description
accessInfo	JSON Object (M)	This object defines the user access properties for the API call.
servciekey	String (M)	The service key assigned for accessing the API Method
endUserId	String (M)	Virtual MSISDN of the Subscriber
accesschannel	String (M)	Valid values list 1. IVR

		2. RBT 3. WAP 4. APP
referenceCode	String (M)	Unique Transaction code assigned by the partner for the Transaction

### 11.2.2 Format

```
{
  "accesInfo": {
    "servciekey": "String",
    "endUserId": "String",
    "accesschannel": "String",
    "referenceCode": "String"
  }
}
```

## 11.3 Response

### 11.3.1 Parameters

Parameter	Data Type	Description
<b>StatusInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the Transaction Status properties for the API call.</b>
statusCode	String (M)	200 → Success 500 → Error
referenceCode	String (M)	Unique Transaction code given by the partner for the Transaction
serverReferenceCode	String (M)	Unique Transaction code assigned by the platform for the Transaction
<b>subscriptionInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the Subscription</b>

		<b>properties for the API call.</b>
servcieIdentifier	String (M)	Unique Service ID assigned by the Platform in a service
productIdentifier	String (M)	Unique Product ID assigned by the Platform in a service
subscriptionId	String (M)	Unique Subscription ID assigned by the Platform for the Subscription
subscriptionStatus	String (M)	Unique Subscriber ID assigned by the Platform for the Subscription
registrationDate	String (O)	Date on which subscribed was registered to the service
activationDate	String (O)	Date on which subscribed was activated to the service
lastRenewalDate	String (O)	Date on which last renewal happened for the Subscription
nextRenewalDate	String (O)	Date on which next renewal will happen for the Subscription
statusChargedDate	String (M)	Date on which the Subscription status was changed for the User
lastChargedAmount	Decimal (M)	Amount that was charged
<b>errorInfof</b>	<b>JSON Object (O)</b>	<b>This object defines the Error properties for the API call.</b>
errorCode	String (M)	Error Code given by the Platform
errorDescription	String (M)	Description of the error code

### 11.3.2 Success Format

```
{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverReferenceCode": "String",
  },
  "subscriptionInfo": {
    "serviceIdentifier": "String",
    "productIdentifier": "String",
    "subscriptionId": "String",
    "subscriptionStatus": "String",
    "registrationDate": "String",
    "activationDate": "String",
    "lastRenewalDate": "String",
    "nextRenewalDate": "String",
    "statusChangedDate": "String",
    "lastChangedAmount": "1.0"
  }
}
```

### 11.3.3 Error Format

```
{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverReferenceCode": "String",
    "errorInfo": {
      "errorCode": "String",
      "errorDescription": "String"
    }
  }
}
```

## 12. Unsubscribe Subscriber

This can be used by partner to unsubscribe a user from a service

### 12.1 URL

<https://ip:port/digital5/subscription/v5.0/unsubscribe>

### 12.2 Request

#### 12.2.1 Parameters

Parameter	Data Type	Description
accessInfo	JSON Object (M)	This object defines the user access properties for the API call.
servicekey	String (M)	The service key assigned for accessing the API Method
endUserId	String (M)	Virtual MSISDN of the user
accesschannel	String (M)	Valid values list <ol style="list-style-type: none"> <li>1. IVR</li> <li>2. RBT</li> <li>3. WAP</li> <li>4. APP</li> </ol>
referenceCode	String (M)	Unique Transaction code assigned by the partner for the Transaction
subscriptionInfo	JSON Object (O)	This object defines the Subscription properties for the API call.
subscriptionId	String (M)	Unique Subscription ID assigned by the Platform for the Subscription

### 12.2.2 Format

```
{
  "accesInfo": {
    "servciekey": "String",
    "endUserId": "String",
    "accesschannel": "String",
    "referenceCode": "String"
  },
  "subscriptionInfo": {
    "subscriptionId": "String"
  }
}
```

## 12.3 Response

### 12.3.1 Parameters

Parameter	Data Type	Description
<b>statusInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the Transaction Status properties for the API call.</b>
statusCode	String (M)	200 → Success 500 → Error
referenceCode	String (M)	Unique Transaction code given by the partner for the Transaction
serverReferenceCode	String (M)	Unique Transaction code assigned by the Platform for the Transaction
<b>subscriptionInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the Subscription properties for the API call.</b>
subscriptionId	String (M)	Unique Subscription ID assigned by the Platform for the Subscription



subscriptionStatus	String (M)	Unique Subscriber ID assigned by the Platform for the Subscription
validity	Decimal (M)	No of Days to left in the subscription
<b>errorInfo</b>	<b>JSON Object (O)</b>	<b>This object defines the Error properties for the API call.</b>
errorCode	String (M)	Error Code given by the Platform
errorDescription	String (M)	Description of the error code

### 12.3.2 Success Format

```
{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverReferenceCode": "String",
  },
  "subscriptionInfo": {
    "subscriptionId": "String",
    "subscriptionStatus": "String",
    "validity": "1.0",
  }
}
```

### 12.3.3 Error Format

```
{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverReferenceCode": "String",
    "errorInfo" {
```

```
        "errorCode": "String",  
        "errorDescription": "String"  
    }  
}
```

Reviewed

## 13. Notify Service Subscription

This will be pushed by the platform to the configured Service URL registered by the partner for receiving subscription notifications from the platform. This Method needs to be implemented by the Partner for receiving of notification for each of the below transactions.

- New Registration
- Activation Success
- Activation Pending
- Renewal Success.
- Grace Entry
- Parking Entry
- De-Registered
- De-Activated
- Unsubscribed

### 13.1 Push Request Format

#### 13.1.1 Parameters

Parameter	Data Type	Description
accessInfo	JSON Object (M)	This object defines the user access properties for the API call.
endUserId	String (M)	Virtual MSISDN of the Subscriber
language	String (M)	End user Profile Language EN → English BN → Bangla AR → Arabic HI → Hindi TH → Thai
accesschannel	String (M)	Valid values list  1. SMS

		2. USSD 3. IVR 4. RBT 5. WAP 6. APP 7. CRM
serverReferenceCode	String (M)	Unique Transaction code assigned by the Platform for the Transaction
<b>subscriptionInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the Subscription properties for the API call.</b>
serviceIdentifier	String (M)	Unique Service ID assigned by the Platform in a service
productIdentifier	String (M)	Unique Product ID assigned by the Platform in a service
subscriptionId	String (M)	Unique Subscription ID assigned by the Platform for the Subscription
subscriptionStatus	String (M)	Unique Subscriber ID assigned by the Platform for the Subscription
registrationDate	String (O)	Date on which subscribed was registered to the service
activationDate	String (O)	Date on which subscribed was activated to the service
lastRenewalDate	String (O)	Date on which last renewal happened for the Subscription
validity	Decimal (O)	No. of Days to Activate the subscription

nextRenewalDate	String (O)	Date on which next renewal will happen for the Subscription
statusChangedDate	String (O)	Date on which the Subscription status was changed for the User
lastChangedAmount	Decimal (O)	Amount that was charged

### 13.1.2 Format

```
{
  "accesInfo": {
    "servciekey": "String",
    "endUserId": "String",
    "language": "String",
    "accesschannel": "String",
    "referenceCode": "String"
  },
  "subscriptionInfo": {
    "serviceIdentifier": "String",
    "productIdentifier": "String",
    "subscriptionId": "String",
    "subscriptionStatus": "String",
    "registrationDate": "String",
    "activationDate": "String",
    "lastRenewalDate": "String",
    "validity": "1.0",
    "nextRenewalDate": "String",
    "statusChangedDate": "String",
    "lastChangedAmount": "1.0"
  }
}
```

```
}
```

## 13.2 Response

The server expects the below response from the partner system, In case if the server does not receive any response from the partner system, Server will retry as per the retry schedule configured at the service.

### 13.2.1 Parameters

Parameter	Data Type	Description
statusInfo	JSON Object (M)	This object defines the Transaction Status properties for the API call.
statusCode	String (M)	200 → Success
referenceCode	String (M)	Unique Transaction code given by the partner for the Transaction

### 13.2.2 Success Format

```
{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",
    "serverReferenceCode": "String",
  }
}
```

## 14. Get Transaction Status

This will be used by partner to query the status of the transaction submitted by the partner.

Note: Partner can only Query the transactions that were made in last 10 min only.

### 14.1 URL

<https://ip:port/digital5/transaction/v5.0/querytransactionstatus>

### 14.2 Request

#### 14.2.1 Parameters

Parameter	Data Type	Description
accessInfo	JSON Object (M)	This object defines the user access properties for the API call.
servicekey	String (M)	The service key assigned for accessing the API Method
endUserId	String (M)	Virtual MSISDN of the user
accesschannel	String (M)	Valid values list  1. WAP  2. APP
referenceCode	String (M)	Unique Transaction code assigned by the partner for the Transaction

#### 14.2.2 Format

```
{  
  "accessInfo": {  
    "servicekey": "String",  
    "endUserId": "String",  
    "accesschannel": "String",
```

```

    "referenceCode": "String"
  }
}

```

## 14.3 Response

### 14.3.1 Parameters

Parameter	Data Type	Description
<b>statusInfo</b>	<b>JSON Object (M)</b>	<b>This object defines the Transaction Status properties for the API call.</b>
statusCode	String (M)	200 → Success 500 → Error
referenceCode	String (M)	Unique Transaction code given by the partner for the Transaction
serverReferenceCode	String (M)	Unique Transaction code assigned by the platform for the Transaction
totalAmountCharged	Decimal (M)	Amount charged for the transaction Ex: xxx.xx
<b>errorInfo</b>	<b>JSON Object (O)</b>	<b>This object defines the Error properties for the API call.</b>
errorCode	String (M)	Error Code given by the Platform
errorDescription	String (M)	Description of the error code

### 14.3.2 Success Format

```

{
  "statusInfo": {
    "statusCode": "String",
    "referenceCode": "String",

```



```
        "serverReferenceCode": "String",  
        "totalAmountCharged": "1.0"  
    }  
}
```

### 14.3.3 Error Format

```
{  
  "statusInfo": {  
    "statusCode": "String",  
    "referenceCode": "String",  
    "serverReferenceCode": "String",  
    "errorInfo" {  
      "errorCode": "String",  
      "errorDescription": "String"  
    }  
  }  
}
```

REVIEW

## 15. Sign Off

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Designation	Solution Architect - DPDP
Date	04.01.2017
Place	GP House, Bashundhara, Dhaka
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Name	Surendra Jangid
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