

Frameworkx Standard

Business Process Framework (eTOM)

Tecnotree

TM Forum Frameworkx 19.0 Certification

Business Process Framework (eTOM)

Self-Assessment Process Mapping Report

DCBS 5.0.2 - Digital Convergent Billing System

Version 3 Review Final

September 2020

By Reference to: GB921 Addendum D - Release 19.0 - July 2019

Table of Contents

TABLE OF CONTENTS	2
PROCESS DECOMPOSITIONS & DESCRIPTIONS.....	3
1.3. CUSTOMER MANAGEMENT DOMAIN.....	3
1.3.9 BILL INVOICE MANAGEMENT.....	3
<i>Bill Invoice Management.....</i>	<i>3</i>
<i>Create Customer Bill Invoice.....</i>	<i>4</i>
<i>Produce & Distribute Bill.....</i>	<i>6</i>
1.3.10 BILL PAYMENTS & RECEIVABLES MANAGEMENT	8
<i>Bill Payments & Receivables Management.....</i>	<i>8</i>
<i>Manage Customer Billing Account</i>	<i>8</i>
<i>Manage Customer Payments.....</i>	<i>9</i>
<i>Manage Customer Debt Collection.....</i>	<i>10</i>
REFERENCED SUPPORTING EVIDENCE	11

Process Decompositions & Descriptions

1.3. Customer Management Domain

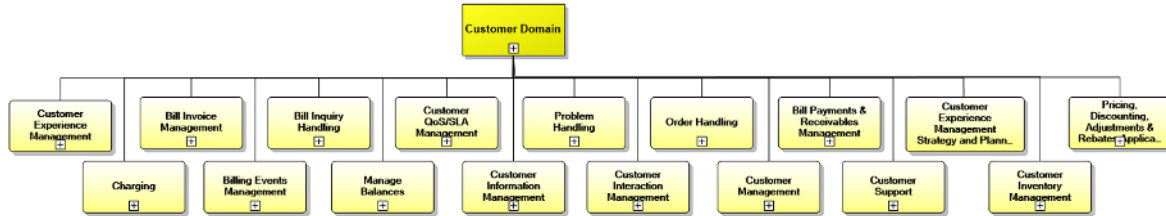


Figure 1 1.3. Customer Management Domain

1.3.9 Bill Invoice Management

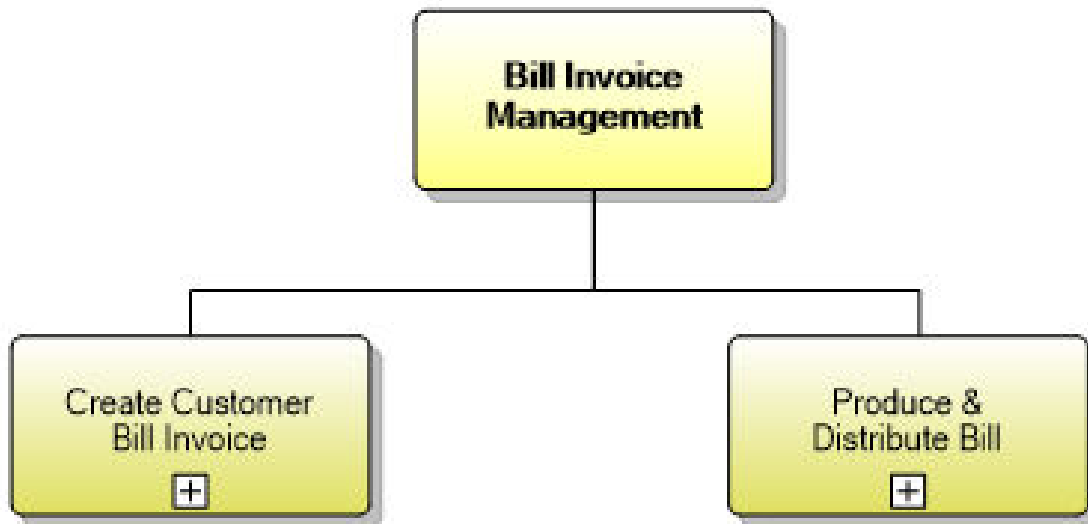


Figure 2 1.3.9 Bill Invoice Management

Bill Invoice Management

Process Identifier: 1.3.9

Brief Description

Ensure the bill invoice is created, physically and/or electronically produced and distributed to customers, and that the appropriate taxes, discounts, adjustments, rebates and credits for the products and services delivered to customers have been applied.

Extended Description

Bill Invoice Management processes ensure the bill invoice is created, physically and/or electronically produced and distributed to customers, and that the appropriate taxes, discounts, adjustments, rebates and credits for the products and services delivered to customers have been applied. These processes are accountable for assuring that enterprise revenue is billed and invoices delivered appropriately to customers.

These processes are responsible for, but not limited to:

- Establishment and application of taxes and charges to the services delivered to customers;
- Application of the adjustment (adjustment decision done in Bill Inquiry Handling);
- Creation of accurate bill invoices including all adjustments, rebates, discounts, credits, etc.
- Production & distribution of bill in physical and/or electronic form to customers in accordance with the billing cycle;
- Forecasting of physical resources associated with bill production, such as paper and envelope quantities;
- Alignment and management of promotional material insertion into distributed bills
- Establishment and management of third party arrangements to support bill invoice generation, production and distribution.

Create Customer Bill Invoice

Process Identifier: 1.3.9.2

Brief Description

Production of a timely and accurate invoice in accordance with the specific billing cycles and reflective of the final charges for services, together with any adjustments, delivered to the customer by the Service Provider and respective other parties.

Extended Description

The primary purpose of the Create Customer Bill Invoice process is the production of a timely and accurate invoice in accordance with the specific billing cycles and reflective of the final charges for services, together with any adjustments, delivered to the customer by the Service Provider and respective other parties. This process contains the invoicing components of the Service Provider's business. This includes the rendering/formatting of an invoice, the delivery of an electronic copy of an invoice to customers and the processes that verify invoice quality prior to distribution to the customer in electronic form, or to the process responsible for physical invoice production and distribution. The flow of this process can be viewed as an extension of the company's e-business strategy. In this case, the Service Provider would render an invoice electronically, via the Internet for example.

Furthermore, this process provides specifications for the formatting of invoices in different ways and to achieve different publishing possibilities, and supports the creation of different invoice formats for different publication media. The process is further responsible for splitting and re-arranging invoices for customers (particularly customers with complex account structures) according to agreements made with these customers.

Additionally these processes store the customer invoice for a period of time to address regulation and/or internal requirements, during which they can be accessed to support any customer or regulator agency inquiries on bill invoices. **AM**

DCBS (Digital Convergent Billing System) allows DSPs to conveniently manage a mix of multiple services from themselves and partners alike. By providing a ready billing capability Tecnotree Digital Convergent Billing ensures accurate billing every time while supporting a broad range of flexible payment options. By monetizing all customers across business lines and types of service on a single platform the DSPs can rationalize the often-inefficient legacy interfaces previously in place across various network elements, significantly reducing the possibility of revenue leakage and resulting bad debts. All the above put together allows DSPs to concentrate on running a business rather than worrying about maintaining their billing infrastructure. Further customer experience is improved by allowing the choice of a single bill for all services, along with access to accurate real-time information over self-care.

During the creation of customer bill invoice following key Billing and Invoicing Processes are involved:

- Pre Bill and Post Bill checks
- Bill Calculation
 - Advance Rentals
 - Usage Charges
 - Roaming Charges
 - Billing Discounts
 - Rentals
 - MMU (Minimum Monthly Usage) Calculation
 - Calculated Charges
 - Tax
- Invoice Confirmation or roll back
- Bill Printing
- Electronic Bill

The billing information of a subscriber is maintained in what is known as an invoice account. A subscriber can have multiple invoice accounts associated to his/her account. Having multiple invoice accounts allows subscribers to receive as many Invoice/s, each having independent payment terms and invoice amount. Each Invoice account can be assigned a unique bill cycle, dunning schedule, tax policy, and payment terms.

DCBS stores the customer invoice in an online storage based on legal requirements and agreed policies of the contract between customer and the DSP, after which it is archived in an offline storage.

[\[Tecnotree PD CCBI\]](#)

Produce & Distribute Bill

Process Identifier: 1.3.9.3

Brief Description

Physical production and distribution of bills to customers in accordance with the specified billing cycle.

Extended Description

The purpose of the Produce & Distribute Customer Bill Invoice process is the physical production and distribution of bills to customers in accordance with the specified billing cycle. This process is responsible for all activities associated with ensuring a physical bill is delivered to customers.

The responsibilities of the process include, but are not limited to:

- Establishing and managing the physical bill production cycle;
- Establishing the requirements for, and managing the agreed commercial arrangements with, appropriate outsourced suppliers of the production and distribution capabilities;
- Delivery of invoice information to the physical production processes;
- Coordinating with promotional processes for any billing insertions to be included with the bill;
- If internal processes are used, managing availability of paper and envelope volumes to meet the needs of the physical production process;
- If internal production facilities are used, managing the production runs to create the bills
- Quality management of the physical production and distribution processes

Note that in the above processes for establishing arrangements with outsourced other parties that the other party Capability Delivery processes are used as the vehicle for creating the commercial agreements. **AM**

The Bill layout designer of DCBS provides a powerful yet easy to use interface to design you bills and finally use it to publish the bills and send it to subscribers. It allows you to design the bills and create a template especially by a marketing user before publishing. This is also based on the capabilities of the format, marketing content, printer support within the DSP ecosystem for the physical publishing of the bills and distribution. The Bill Layout Designer add-on module allows users with an Operator profile type to connect Digital Convergent Billing database to create one or more data source repositories. Each repository is a collection of subscriber & invoice data sources. The data sources are further associated with elements/attributes of a Designed Bill Template.

[\[Tecnotree_PD_PDB\]](#)

1.3.10 Bill Payments & Receivables Management

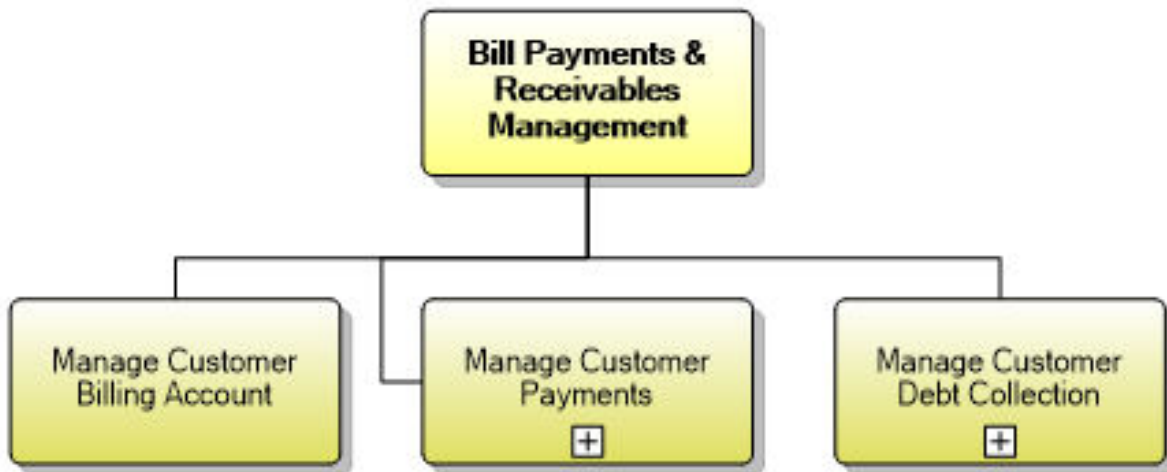


Figure 3 1.3.10 Bill Payments & Receivables Management

Bill Payments & Receivables Management

Process Identifier: 1.3.10

Brief Description

Ensure that enterprise revenue is collected through pre-established collection channels and put in place procedures to recover past due payments.

Extended Description

The purpose of the Bill Payments & Receivables Management processes is to ensure that enterprise revenue is collected through pre-established collection channels and put in place procedures to recover past due payments. These processes are responsible for managing customer's billing account, processing their payments, performing payment collections and monitoring the status of the account balance.

These processes are responsible for, but not limited to:

- Establishment and management of customer payment processes and channels;
- Establishment and management of debt collection processes
- Establishment and management of third party arrangements to support collection and recovery of past due payments.

Manage Customer Billing Account

Process Identifier: 1.3.10.1

Brief Description

Ensure effective management of the customer's billing account as it relates to the products purchased and consumed throughout the appropriate billing cycle.

Extended Description

Manage Customer Billing Account's purpose pertains to effective management of the customer's billing account as it relates to the products purchased and consumed throughout the appropriate billing cycle. This

process focuses on managing changes to the customer's billing account (for example, customer billing address, etc.) as it relates to the customer's service portfolio, such as ensuring that the correct purchased products are assigned to the customer's billing account for accurate billing. **AM**

DCBS maintains comprehensive information of DSP's customer account. The application has the customer's profile account, invoice account and subscription (One or Many service) account. Each having its own characteristic value and parameters that is maintained within the system. DCBS integrates with various BSS systems to maintain an up to date information related to these accounts. The accuracy of information with respect to a customer is paramount for DCBS as a customer invoice represents the brand of the DSP.

[\[Tecnotree PD MCBA\]](#)

Manage Customer Payments

Process Identifier: 1.3.10.2

Brief Description

Collect payments made by the customer and reconcile the payments to the invoices.

Extended Description

The purpose of the Manage Customer Payments process is to collect payments made by the customer and reconcile the payments to the invoices. This process is meant to match these payments with the services/invoices delivered to this customer. These processes can include credit/debit/EFT payments using various channels, either directly or through third parties, and cash or check payments, either directly or through third parties.

In all the above cases these processes are responsible for the processes interacting with the customers and/or the third parties. The processes are also responsible for establishing managing back-end bank accounts for receipt of the customer payments and for the transfer of funds collected by third parties. These processes are responsible for reconciling the money received into the bank accounts against the payments expected in the invoices. Additionally these processes inform the Financial Management on all those payments for updating the ledger.

These processes are responsible for establishing the requirements for, and managing any commercial arrangements agreed with, other parties. Note that the other Party Capability Delivery process is used to deliver the commercial agreements.

To the extent that processing of any payments is undertaken internally, i.e. check processing, these processes are responsible for managing the operation and quality of the internal processing.

Where payments do not match invoices, this process is responsible for informing the Manage Customer Debt Collection Manage Debt Management processes of any underpayments, and the Bill Inquiry Handling processes for any over-payments. Underpayments and overpayments are handled appropriately by these separate processes. **AM**

The collections module of DCBS manages the complete payment lifecycle of the subscriber. It is used to track all the financial transactions carried out within DCBS and to post the transactions to an external accounting system.

Payments can be collected from the Subscribers against invoice or purchase of items and services and from the Dealers against purchase of items and services.

DCBS provides CSP's with multiple options to accept payments from subscribers towards Invoice account or unpaid invoice/s using multiple options. Payments can be in the form of Cash, Cheque, credit card, debit card, wallets, Payment at bank in cash, Payment in bank by cheque, direct debit, loyalty vouchers, coupons and ATM.

Finally invoice disputes, with DCBS manage any invoice disputes efficiently. Customers can raise concerns/dispute about certain charges of invoice or the whole invoice. DCBS helps in managing these disputes efficiently using its dispute lifecycle process.

[\[Tecnotree PD MCP\]](#)

Manage Customer Debt Collection

Process Identifier: 1.3.10.3

Brief Description

Collect past due payments from the customer.

Extended Description

The purpose of the Manage Customer Debt Collection process is to collect past due payments from the customer. This process monitors the amount due from the customer, i.e. check whether the payments are made on time, and implements necessary activities and policies to recover amounts overdue.

The responsibilities of this process include, but are not limited to:

- Identifying invoices which are overdue for payment;
- Initiating and managing follow-up with customers having overdue amounts;
- Arranging and monitoring payment plans to allow customers to pay overdue amounts in installments;
- Initiating debt recovery activities in accordance with appropriate commercial practice and policies;
- Managing the aged customer debt portfolio;
- Establishing and managing customer debt profiles to assist in managing debt recovery and debt risk on a customer, product or customer group basis;
- Establishing and managing commercial arrangements with third parties for the recovery of aged debt, and/or for the write-off and selling of parts of the debt portfolio to third parties

Note that these processes may initiate a direct enquiry to the customer and attempt to manage the initial recovery through the Bill Inquiry Handling processes. These processes use policies established by the Support Bill Payments & Receivable Management process to direct any escalation of the recovery processes being employed.

Note that where third party arrangements need to be put in place, these processes are responsible for establishing the requirements for, and managing any commercial arrangements agreed with, third party suppliers. The Party Tender Management and Party Agreement Management processes are used deliver the commercial agreements. **AM**

The customer debt collection process is managed in DCBS through its Dunning process. Dunning is a process of a methodical automatic reminder of overdue payments. This is achieved by monitoring the unpaid outstanding invoices of the subscriber.

This process restricts the subscriber from availing the services (for example in the case of GSM subscriber, IDD, Roaming, SMS, MMS, Outgoing calls, and Incoming calls), if he/she has not cleared the invoice dues by the payment due date. A subscriber is automatically reconnected on clearing the due amount by the process.

In case the dunning process doesn't elicit any response from customer, then based on the business policies of the CSP the accounts are then sent to a third party debt collection agency to recover the due amount.

[\[Tecnotree_PD_MCDC\]](#)

Referenced Supporting Evidence

[Tecnotree_PD_CCBI] - Tecnotree_PD_CreateCustomerBillInvoice_v.0.1.docx

[Tecnotree_PD_PDB] – Tecnotree_PD_ProduceDistributeBill_v.0.1.docx

[Tecnotree_PD_MCBA] – Tecnotree_PD_ManageCustomerBillingAccount_v.0.1

[Tecnotree_PD_MCP] – Tecnotree_PD_ManageCustomerPayment_v.0.1

[Tecnotree_PD_MCDC] – Tecnotree_PD_ManageCustomerDebtCollection_v.0.1

