

Customer Care & Billing: Functionality for Implementers Ed 7

Oracle Utilities

DURATION

10 Days

MODULES

11 Lectures

COURSE CODE

—

Course Overview

This Customer Care and Billing: Functionality for Implementers training provides in-depth information about the customer management product's configuration. You'll examine each CCB subsystem and discuss the configuration options and how they affect the system's operation.

What You Will Learn

Oracle Utilities Customer Care and Billing Overview

- Objectives
- The System
- Customer Information
- Sales & Marketing
- Device Management
- Field Work
- Meter Reading
- Billing
- Statements
- Rates
- Payments
- Adjustments
- Credit & Collections
- Budgets
- Deposits
- SA Relationships
- Service Credits
- Contract Management
- Loans
- Conservation Programs
- Framework Utilities

- Integration Tools
- Summary
- The System
- The Format of This Class
- The Documentation
- Caveat
- Summary

Control Central and User Interface Standards

- Objectives
- Practice 2-1
- The Anatomy Of All Pages
- Control Central
- Control Central Search Facilities
- Invoking Help
- Help: Finding Information
- Find a Customer/Premise
- The Dashboard
- Dashboard + Account Information = 360-Degree View of the Customer
- Portals Versus Fixed Pages
- Portals Have Zones
- Portal Preferences
- New Zones Appear in Account Information
- Dictating Portal Preferences
- The Dashboard Is a Portal Too
- Zone Patterns
- Explorer Zone Layout
- Broadcasting
- Explorer Zones May Have End-User Filters
- Dragging and Dropping
- Work Lists
- Working the List
- Starting Business Processes
- Practice 2-2
- Map Zones
- Section and Element Help
- Explorer Zones Are Configured, Not Programmed
- Special-Purpose Zones
- Special Feature – Timeline Zone
- More Special Feature Zones
- You’ve Seen Several BPA Scripts
- The BPA Menu
- BPA Scripts Are Everywhere
- BPA Scripts Reflect An Organization
- Scripts Are Configured

- Fixed Pages
- Object Maintenance Pages
- Search Pages
- Other Pages
- Some Transactions Use Both Metaphors
- Portal-Based Maintenance is Becoming More Common
- Why Evolve?
- Menu and Admin
- Context Menus
- Context Menu – Opening a Search Page
- Context Menu – Opening a Portal
- Practice 2-3
- Grids
- Scrolls
- Search
- Recap of General Layout
- Recap of Dialogs
- Demo Versus Empty Install
- A Configuration Tools Example
- The Configuration Tools Class
- Summary
- Review Questions

Metadata and Framework Overview

- Objectives
- Agenda
- Oracle Utilities Application Framework Overview
- Oracle Utilities Application Framework
- Browser UI Activities
- Web Server Activities
- Web Application Server Breakdown
- Application Server Activities
- Database Server Activities
- Entity Relationship Diagramming (ERD)
- Information Is Stored in Tables, Each Box In An ERD Is a Table
- Color-Coding Highlights the Subsystem Where the Table's Rows are Typically Maintained
- The PowerPoints Use Color-Coding To Group Tables into Logical Subsystems
- We use ERDs To Highlight Important Business Relationships
- Relationships Between Entities Are Highlighted with Arrows Between Boxes
- Dashed Lines Represent Columns on Entities With Predefined "Lookup" Values
- The Table and Field Metadata
- The Application Viewer Is Your Primary Documentation of Tables and Fields
- The Application Viewer Is Generated from Metadata
- Practice 3-1
- No Recurring Groups

- Prime Keys
- Prime and Foreign Keys In The Application Viewer
- Very Little (Almost No) Redundant Data
- Language Tables
- XML Extensions
- MO Definition
- Why MOs?
- MO, Table, Field Metadata
- MOs Are Also In the App Viewer
- MOs Encapsulate Core Business Rules
- Maintenance Objects Versus Business Objects
- A Maintenance Object Has Fields, A Business Object Has Elements
- A BO's Elements Must Physically Reside Somewhere in its MO's Tables
- BOs Encapsulate Core Business Rules
- BOs and SOA
- Older MOs = Object Maintenance Newer MOs = Portal Maintenance
- Plug-in = Algorithm
- An Algorithm Example
- Use a Base Package Plug-In or Write Your Own
- Creating a New Plug-In
- Some Objects Are Preconfigured
- The Application Viewer Also Contains Algorithms
- Practice 3-2
- User-Defined Fields Extend ...
- Many MOs Support Characteristics
- There Are Four Types of Char Types
- Predefined Char Types
- Ad Hoc Characteristic Types
- Foreign Key Reference Characteristic Types
- File Location Characteristic Types
- Characteristic Values Are Effective-Dated on some Entities
- A Char Type Can be Used on Multiple Entities
- Practice 3-3
- Owning Metadata
- Owner Flag ERD
- Owner Flag Is Ubiquitous
- The System Stamps Owner Flag On New Metadata Rows
- Don't Even Think About It
- Practice 3-4
- Web Services Architecture
- XAI / Web Services
- More Web Services Information
- Database and Operating System Security
- Application Services Are Secured
- Application Services Have Valid Actions
- Field-Level Security

- Field-Level Security Overview
- Security Rights Are Cached
- Practice 3-5
- Audit Trails
- Localization Support
- Isolating Implementation-Specific Business Rules
- The Conversion Tool
- Review Questions

Batch Processing

- Objectives
- Batch Processes
- Batch Processes Are Documented In the Application Viewer
- What You Can Count On
- Errors
- Parallel Processing
- Optimal Number of Threads
- Parameters
- Batch Processing ERD
- Practice 4-1
- Separate Application Servers
- Submitting Ad Hoc Requests
- Practice - Instructor-Led
- Batch Process Dependencies
- Classic Batch Job Versus Sample and Submit
- Step 1: Identify the Batch Job
- Step 2: Enter the Criteria
- Step 3 (optional): See the Sample
- The Request
- How To
- Some Processes Can Be Viewed as Plug-Ins
- Review Questions

Maintaining Customer Information

- Objectives
- Customer Information
- Customer = Person and Account
- Practice 5-1
- Important Person Concepts
- Person ERD
- Person Contacts
- Practice 5-3
- Important Account Concepts
- Account ERD
- Practice 5-2

- Customer Contact: Overview
- Customer Contact ERD
- Practice 5-4
- Customer Contacts Trigger To-Do Entries
- Customer Contacts Trigger Letters
- Letter Images
- Important Premise Concepts
- Premise ERD
- Important Service Point Concepts
- Types of Service Points
- Metered Service Points
- Badged Item-Based Service Points
- Unbadged Item-Based Service Points
- Two Ways to Handle Area Lights: Badged or Unbadged
- Service Point ERD
- Practice 5-5
- Review: Bills Are Sent to Customers
- A Bill Contains Charges for Services
- An Account Must Have a Service Agreement For Every Service That Is Billed
- Some SAs Are Linked to Premises via SPs
- Some SAs Are Not Linked to Premises
- Service Agreement ERD
- Account Security: Overview
- Persons Can Also Be Secured
- Premises Can Also Be Secured
- Data Access Groups and Roles
- An Account's Access Group
- More Account Security Information
- The V Diagram
- Two SAs, Each Linked to a Single SP (A Normal, Single-Family Residence Scenario)
- Two SAs Linked to the Same SP
- One SA linked to Two SPs (To Consolidate Consumption Charges)
- Typical Family Moves
- Non-Utility Customer
- Customers Share One Line, Usage Goes Through One Meter on the Way to Another Customer
- Corporate Pays For Usage, Operating Units Pay For Transport & Metering
- SA Type and SP Type Control the Valid Relationships
- Most SAs Are Created Via Start Service
- Start Options Control Default Values
- Practice 5-6
- Service Agreement States
- Activating Pending Start SAs
- Important Service-Oriented Concepts Still to Come
- The Alert Zone
- The Control Central Alert Plug-In Spot
- Jurisdictional Rules

- Division = Jurisdiction
- Replicators
- Alternate Names and Addresses
- Address Validation
- Configuring Address Validation
- Address Validation BPA
- Introducing Custom Address Validation Logic
- Account Management
- Account Management Portal – Account Update
- Supported Account Updates
- Supported Service Agreement Updates
- Notification Preferences
- Notification Preferences: Key Relationships
- Notification Preferences Management Process Overview – Enabling Customer Choice
- Push versus Subscription Notification Types
- Push-Based Notifications
- Account – Account Portal: Push Communications Preferences Zone
- Subscription-Based Notifications
- Account – Account Portal: Subscription Communication Preferences Zone
- Account – Persons: Notification Preferences
- Account – Account Portal: Maintaining Contact Details
- Master Configuration
- Practice 5-7
- Review Questions

To Do Lists

- Objectives
- Oracle Utilities Customer Care and Billing
- What Is To Do Processing?
- To Do Summary
- To Do List
- To Do Summary Zone
- Practice 6-1
- To Do Type
- Message
- To Do Roles
- Special Message Handling
- Role Assignment
- How Entries Are Created
- Batch Process
- The Creator Supplies Other Attributes
- Filling In The Blanks
- To Do Entry Summary ERD
- Practice 6-2
- Related To Do's
- Related Entries Are Also Shown in the Dashboard

- Related To Do ERD
- Practice 6-3
- To Do Entry Lifecycle
- Forwarding
- Manual Completion
- Batch Processes Can Complete Entries
- To Do Entries Have Logs
- Log Entries
- To Do Search Is Powerful
- Practice 6-4
- Entry Priority
- Priority Assignment
- Priority Updates: Scenario
- Assigning Entries to Users
- On Demand Assignment
- On Demand – How It Works
- Skill-Based Assignment: Overview
- Skill Level ERD
- Skill Level Override for a Specific Message ERD
- Skill-Based Summary
- The Benefits
- Supervisor Push
- Summary of Entries by User
- Supervisor Assignment
- Pick and Choose
- Multi-Use Pages
- Practice 6-5
- To Do Entries May be Routed To an External System
- Configuration to Implement External Routing
- Practice 6-6
- To Do Types Are Documented in the Application Viewer
- What To Do Entries Aren't
- Purging Old Entries
- Review Questions
- Creating New To Do Types
- Introducing a New Type of Entry Involves the Following Steps
- Analysis Example: Account has active SAs, but has no bill cycle
- Example Setup: Account has active SAs, but has no bill cycle
- Example Programming: Account has active SAs, but has no bill cycle
- 7a Sales & Marketing
- Objectives 7a-2
- Sales & Marketing 7a-3
- Definitions 7a-4
- Practice 7-1 7a-5
- What Just Happened? 7a-6
- The Order's Campaign Controls Many Things 7a-8

- Campaign ERD 7a-9
- Practice 7-2 7a-10

A Campaign may have Zero or More Packages. A Campaign's Packages Define what is Sold 7a-12

- Package ERD 7a-13
- Practice 7-3 7a-14
- Business Process Flow Is Flexible 7a-16
- Business Process Flow 1 – Upload Prospects from a Marketing Database 7a-17
- Business Process Flow 2 – Market to a Pre-Selected Customer Segment 7a-18
- Business Process Flow 3 – Ad hoc Upselling to Existing Customers 7a-19
- Business Process Flow 4 – Ad hoc Selling to New Customers 7a-20
- Business Process Flow 5, 6, 7, 8 – Packages Are Optional 7a-21
- An Order's Questions & Misc. Fields 7a-23
- All Q&MFs Are Defined on the Campaign 7a-25
- Q&MF Responses 7a-26
- Q&MF ERD 7a-27
- Groups of Columns 7a-28
- Practice 7-4 7a-29
- Use Case 1: Marketing Surveys 7a-31
- Practice 7-5 7a-32
- Use Case 2: Setting Up a Customer Prior to Start/Stop 7a-33
- Practice 7-6 7a-34
- Use Case 3: Setting Up a One-Time Charge 7a-35
- Use Case 4: Creating Service Agreements and Service Points 7a-36
- There Are Two Types of Eligibility Rules 7a-38
- Package Eligibility Rules: Eligibility Groups Contain Criteria 7a-39
- Schematic of a Sample Package's Eligibility Rules 7a-40
- Eligibility Criteria 7a-42
- Another Example 7a-43
- Eligibility Criteria ERD 7a-44
- Eligibility Group ERD 7a-45
- Practice 7-7 7a-46
- Campaign versus Package Eligibility Rules 7a-48
- Campaign Eligibility Algorithms 7a-50
- Campaign State Transition Rules 7a-52
- Package State Transition Rules 7a-53
- Order State Transition Rules 7a-54

An Order's Questions & Misc. Fields Are Used to Record Information That Isn't Kept in "Real" Fields on the Order 7a-55

Characteristic-Oriented Q&MFs can Cause Characteristics on Account, Person, Premise and Order to be Created or Updated 7a-56

Column-Oriented Q&MFs can Cause Fields on Almost any Object to be Created or Updated 7a-57

The SA Creation Rules Linked to the Package Selected on the Order, Control the SAs and SPs That Are Created 7a-58

- When an Order Is Created, The "V" is Set Up 7a-59
- The Sequence of Events at Completion Time 7a-60
- Reminder: Your Campaigns Can Do Many Things 7a-62
- The Design Process Can Be Challenging 7a-63
- Use the Documentation 7a-65
- Order Versus Start/Stop 7a-67

- Premise Characteristics 7a-69
- Service Point Characteristics 7a-70
- To Do Processing 7a-71
- Post Completion Processing 7a-72
- When Are V Objects Created 7a-73
- Review Questions 7a-74
- 7b Sales & Marketing
- Objectives 7b-2
-   Before We Begin 7b-3
- Program Management 7b-5
- Primary Functional Components 7b-6
- Program Management: Related Tables and Maintenance Objects 7b-7
- Similarities: Structure 7b-9
- Differences: Inward Versus Outward 7b-10
- Differences: Business Objects 7b-11
- Program Management: Lead 7b-12
- Lead Lifecycle 7b-13
- Practice 7-1: Create a Lead 7b-14
- Initiative Overview 7b-16
- Initiative Hierarchy 7b-17
- Program Management: Initiative 7b-18
- Initiative Lifecycle 7b-19
- Practice 7-2: Explore the Initiative Configuration 7b-20
- When to Create Eligibility Rules 7b-22
- Eligibility Rules 7b-23
- Eligibility Criteria: Example of Criteria for Segmentation 7b-24
- Practice 7-3: Explore Eligibility Criteria 7b-25
- Lead Events 7b-27
- Program Management: Lead Event 7b-28
- Lead Event Lifecycle 7b-29
- Practice 7-4: Explore Lead Event Type Configuration 7b-30
- Practice 7-5: Configure a Lead Event Type 7b-31
- Practice 7-6: Configure an Initiative 7b-32
- Individuals or Groups 7b-34
- Program Management: Representative 7b-35
- Third Party Representative 7b-37
- Sales Representatives Versus Third Party Representatives 7b-38
- Program Management: Representative 7b-39
- Practice 7-7: Explore the Sales Representative Configuration 7b-40
- Initiative Portal 7b-42
- Master Configuration 7b-45
- Practice 7-8: Add a Lead to a Customer 7b-46
- Summary 7b-47
- Review Questions 7b-48

- Objectives
- Checkpoint
- Review: Service Points Define Services at a Premise
- Review: There are Three Types of Service Points
- Review: Metered Service Points
- A Meter's Registers Measure How Much Was Used
- Every Register Has Many Attributes
- A Register's Attributes Can Change Over Time
- Meter ERD
- There Are Many Ways to Identify a Meter
- Service Types Must Be in Sync ERD
- Practice 8-1
- A Configuration's Registers Are Read
- Subtractive Versus Consumptive Registers
- Meter Read ERD
- Important SP/Meter Installation Concepts
- Meter Installation ERD
- Practice 8-2
- How to Exchange the Meter at an SP
- Remember That There Are Two Types of Item-Oriented SPs
- This Discussion Concerns Badged Items
- When to Use a Badged Item
- Badged Item ERD
- There Are Two Ways to Identify a Badged Item
- Item Replicator
- Important SP/Item Installation Concepts
- Item Installation ERD
- Important Item Exchange Concepts
- Unbadged Items Are an Alternative
- Meter/Item Search Page
- Practice 8-3
- Review Questions
- 9a Field Work: Managing Field Work
- Objectives 9a-2
- Checkpoint 9a-3
- Field Activities 9a-4
- Field Activity ERD 9a-5
- Field Activity State Transition 9a-6
- Practice 9-1 9a-7
- Operations Areas 9a-9
- Dispatch Groups and Representatives 9a-10
- Field Service Control Is a Multidimensional Matrix 9a-11
- Dispatch Group Assignment Is in a Plug-In 9a-12
- Practice 9-2 9a-13

- Field Orders Are Premise Oriented Field Activities Are SP Oriented 9a-15
- Different Dispatch Groups Result in Different Field Orders 9a-16
- Field Orders May Be Assigned a Specific Rep 9a-17
- Field Order and Rep ERD 9a-18
- Field Order State Transition 9a-19
- Capturing Reasons 9a-21
- Enabled with a Feature Configuration 9a-22
- The Pages Change 9a-23
- Reschedule Reason Audits 9a-24
- The Group Premise FAs Alternative 9a-26
- The Group Premise FAs Page 9a-27
- Lowest Common Denominator Dispatch Group 9a-28
- Batch Dispatcher 9a-29
- Practice 9-3 9a-30
- Automatic Field Activity Creation 9a-32
- Field Activity Type Profile 9a-34
- Field Activity Type Profile is a Multidimensional Matrix 9a-35
- FA Type Profile Also Defines Valid FA Types 9a-36
- Service-Oriented Field Activities Are Created by a Plug-In 9a-37
- When Service-Oriented Activities Are Created 9a-38
- You Don't Know About Schedule Read Dates Yet... 9a-39
- Not All Automated FA Creations Use FA Type Profiles 9a-41
- Dispatching Field Orders 9a-43
- Dispatched to Completed 9a-44
- Complete Activities, Then Complete Order 9a-45
- Completion Algorithms 9a-46
- Completion Algorithms ERD 9a-47
- Practice 9-4 9a-48
- Completion Upload 9a-50
- Two Batch Process Are Used To Download Field Orders 9a-52
- Process FDS: Create Download Staging 9a-53
- Each Download Record Gets Marked with a Batch Control and Run 9a-54
- FODL Creates a Flat File 9a-55
- FODL Executes an Algorithm to Format the Flat File Information 9a-56
- An Aside: Ongoing Instructions and Warnings 9a-57
- Metered SAs Need Start Reads to Bill 9a-59
- SA Activation Batch Process 9a-60
- Metered SA's Need Stop Reads to Final Bill 9a-61
- SA Activation Also Handles Pending Stops 9a-62
- SA / FA / MR Flow 9a-63
- Credit & Collections 9a-64
- Practice 9-5 9a-65
- Field Activities are for All SP-Related Efforts 9a-67
- Review Questions 9a-68
- 9b Field Work: Appointments
- Objectives 9b-2

- Appointment Scheduling 9b-3
- A Dispatch Group Refresher Before We Start 9b-5
- Dispatch Group Assignment ERD 9b-6
- Appointment Periods and Appointments 9b-8
- Limiting the Number of Appointments 9b-9
- Appointment Period Maintenance 9b-10
- Updating Appointment Periods 9b-11
- Practice 9-1: Creating and Updating Appointment Periods 9b-12
- Scheduling An Appointment 9b-14
- Default Dispatch Group and Date 9b-15
- Available Appointments are Controlled By an Algorithm 9b-16
- The Base-Package Available Appointments Algorithm 9b-17
- Canceling Appointments 9b-18
- Practice 9-2: Scheduling and Cancelling Appointments 9b-19
- Penalties 9b-21
- Review Questions 9b-22
- 10a Devices Inventory and Testing: Equipment Management
- Objectives 10a-2

Equipment, Meters, and Items Are Installed at a Premise to Regulate and Measure Service 10a-3

- There are Two Types of Items 10a-4
- Equipment May Be Associated with Meters 10a-5
- Equipment May Be Associated with Service Points and Items 10a-6
- Preventing Invalid Equipment Linkages 10a-7
- Foreshadowing: Equipment Is NOT Billed 10a-8
- Generic Equipment 10a-9
- Generic Equipment – How To Do It 10a-10
- An Installation Service Point Holds Multiple Pieces of Equipment 10a-12
- Installation SP ERD 10a-13
- Practice 10-1 10a-14
- Review Questions 10a-15
- 10b Devices Inventory and Testing: Device Testing
- Objectives 10b-2
- Item and Meter Tests 10b-3
- Device Test Example 10b-4
- Badged Items and Meters Can be Tested 10b-5
- Device Test Type Example 10b-6
- The Control Tables Are Sophisticated 10b-7
- Device Test Lifecycle 10b-8
- Practice 10-1 10b-9
- Device Tests Occur Because of Field Activities 10b-11
- How to Create Device Test Field Activities 10b-12
- Test Selection Creates Field Activities Based on an Algorithm 10b-13
- Review Questions 10b-14
- 10c Devices Inventory and Testing: Asset Inventory
- Objectives 10c-2
- Stock Location Tracking 10c-3

- Stock Location 10c-4
- Stock Location Characteristics 10c-5
- Asset Stock Location History 10c-6
- Asset Stock Location History ERD 10c-7
- Default Location for SP Removals 10c-8
- Manually Changing an Asset's Stock Location 10c-9
- Practice 10-1 10c-10
- Review Questions 10c-11

Meter Reading

- Objectives
- There are Many Sources of Meter Reads
- Meter Read ERD
- Meter Read Remarks Can Trigger Other Events
- Consumption Estimation Is in a Plug-In
- Important Estimation Concepts
- How Does MR EST TREND Work?
- An Example: Estimating Consumption for February
- An Example: Estimating Non-Peak Consumption
- An Example: Estimating Peak Consumption
- Trend ERD
- Ensuring a Statistically Significant Sample
- Trend Is Updated in Batch
- High/Low Limits Are Calculated in a Plug-In
- High/Low Check Plug-In
- High/Low Factor ERD
- Failing High/Low and Use on Bill
- Reviewing Readings That Failed High/Low Checks
- Practice 11-1
- Review Questions

Route Management and Field Activity Upload

- Objectives
- Important Service Cycle Concepts
- SP Type Controls The Number of Cycles on a Service Point
- Single Service Cycle ERD
- SPs Also Need a Route and Sequence
- Renumbering Service Points in a Route
- Transferring a Route
- Practice 12-1
- Downloading Meter-Read Requests
- When Cycle and Route Frequency Differ
- The Three Download Batch Processes
- Process MSR: Create MR Schedule Routes
- Process MDS: Create Download Staging

- Process MDL: Create Download Flat File
- The Source of the Batch Control
- Summary: Meter Read Download ERD
- Important! The Service Cycle Schedule Is Also Used by Billing
- Practice 12-2
- The Upload Processes
- Process X: Populate Upload Staging
- Process MUP1: Populate Meter Config
- Process MUP2: Create Meter Reads
- Important: The MR Upload Has Other Uses
- Purging Upload Records
- Practice 12-3
- Demo Database Contains a Sample Transaction
- Find a Scheduled Date for a Route Zone
- See Service Points in a Route for a Scheduled Selection Date Zone
- See Register Reads in a Route for a Scheduled Selection Date Zone
- Multiple Service Cycles
- Waste Collection Background Information
- Multi-Service Cycle ERD
- Waste Collection Scenario 1
- Waste Collection Scenario 2
- The Three Download Batch Processes
- Service Route Download ERD
- Field Order Completion Details Can Be Uploaded
- Step Types That Are Supported By the Batch Completion Process
- The Upload Processes
- Process X: Populate Upload Staging
- Processes MUP1 and MUP2: Create Reads
- Process FACOMPL: Complete Field Activities
- Process FACOMPL: Complete Field Activities – Errors
- Purging Upload Records
- Uploading “Generic” Step Types
- Review Questions

Financial Transactions

- Objectives
- FTs Determine an Account’s Balance
- Source of FTs
- Bill Segments Create FTs
- Payment Segments Create FTs
- Adjustments Create FTs
- Practice 13-1
- Current Balance Versus Payoff Balance
- Every FT Contains Current Amt and Payoff Amt
- Practice 13-2
- Examples When Current Balance Does Not Equal Payoff Balance

- GL Details
- Examples of FTs Without GL Details
- How Old is the Debt?
- Specific Days are Shown on Several Transactions
- Arrears Date
- Arrears Date is Typically Populated by Billing
- Practice 13-3
- FT Algorithms Control how FTs are Created
- FT Status
- FTs Affect More Than Balances
- Updating the General Ledger
- The the GL Download Processes
- Process GLASSIGN
- Process GLS: Prepare FTs for Download
- Process GLDL: Create Download Flat File
- Practice 13-4
- Overview of Balance Control
- The Balance Control Batch Processes
- Process BCGNEW: Create a New Balance Control Group
- Process BCASSIGN: Assign New FTs a Balance Control Group
- Process BCGSNAP: Insert Balance Control Members And Check Financial Integrity
- Review Questions
- 14a Billing
- Objectives 14a-2
- Checkpoint 14a-3
- A Bill Contains Charges for Services 14a-4

An Account Must have a Service Agreement For Every Service that is Billed 14a-5

- An SA's SA Type Controls Many Billing Functions 14a-6
- Definitions 14a-8
- Bill ERD 14a-10
- Bill Lifecycle 14a-11
- Most Bills are Produced in Batch 14a-13
- Bill Cycles 14a-14
- Window Billing 14a-15
- Other Bill Cycle Schedule Functions 14a-17
- How an Account Gets its Bill Cycle 14a-18
- If the SP's Meter-Read Cycle Changes 14a-19
- Practice 14-1 14a-20
- Bill Segment Creation Algorithms 14a-22
- Get Consumption is First 14a-24
- Bill Segment Consumption Snapshot ERD 14a-25
- Creating Estimated Reads 14a-26
- Estimating Earlier Than the Schedule Allows 14a-27
- Creating Bill Segments by Applying a Rate 14a-28
- Rated Bill Segment ERD 14a-29
- An Aside: Bill Segments are Snapshots 14a-30

- Multiple Bill Segments May Be Created 14a-31
- Control Processing Sequence 14a-33
- Processing Sequence on SA Type 14a-34
- Review: Bill Segments' FTs 14a-36
- Practice 14-2 14a-37
- Metered SAs are Special 14a-39
- Time Period Derivation for Non-Metered Service 14a-40
- Use a Bill Period to Derive the End Date 14a-41
- Anniversary Date 14a-42
- The Default – Current Business Date 14a-43
- Preventing Short Bill Segments 14a-44
- More to Come 14a-45
- Bill Segment Lifecycle 14a-47
- Freeze at Bill Completion 14a-48
- Classic Errors 14a-50
- Bill Segment Errors 14a-51
- Bill Segment Remarks 14a-52
- Bill Errors 14a-53
- Errors After The Window Closes 14a-54
- Bill Lifecycle 14a-56
- Bill Completion is Intensive 14a-57
- SA Type Pre-Completion Algorithms 14a-58
- Customer Class Pre-Completion Algorithms 14a-59
- Bill Due-Date Calculation ERD 14a-60
- LPC Computation – Levying The Charge 14a-61
- LPC – Manual Intervention 14a-63
- Bill Routings 14a-64
- Bill Routing ERD 14a-65
- Route Method 14a-66
- Four Potential Mailing Addresses ERD 14a-67
- An Aside: Reprints 14a-68
- Customer Class Bill-Completion Algorithms 14a-69
- SA Type Bill-Completion Algorithms 14a-70
- Messages can be Linked to a Bill And/Or Bill Segments 14a-71
- Messages can be Linked to a Bill and/or Bill Segments 14a-72
- Messages with Variables 14a-74
- A Bill Summarizes Financial Transactions 14a-75
- All New FTs will be Swept onto the Bill 14a-76
- Customer Class Post Completion Algorithms 14a-77
- Practice 14-3 14a-78
- Overriding SQs and Items 14a-80
- Review: Bill Routing ERD 14a-82
- Postal Routing 14a-83
- Marking a Routing Record With a Batch Control and Run 14a-84
- Process POSTROUT: Create Download Flat File For Postal Routing 14a-85
- Configurable Bill Print Extract 14a-86

- Bill Print Extract Record Types 14a-87
- How is the XML Extract Constructed? 14a-88
- Extending the XML Extract 14a-89
- Bill-Print Intercept 14a-90
- UI Interlude 14a-92
- Bill Summary Differs for Open-Item Customers 14a-93
- Bill Segments Differ for Accounts with Many SAs 14a-94
- Bill – Bill Segment for Large Accounts 14a-95
- Other Places Where Bills Are Displayed 14a-96
- Financial Information Dashboard Zone 14a-97
- Online Bill Image 14a-98
- Bill Info is Constructed by a Plug-In 14a-99
- Warning: Demo Portals and Zones Ahead 14a-100
- Bill History Zone on Control Central 14a-101
- Bill Segment Calc Lines Zone 14a-102
- View Bill Zone 14a-103
- SA Billing History Portal 14a-104
- SP Consumption Summary Portal 14a-106
- Practice 14-4 14a-107
- Bill Print Groups 14a-109
- Bill ERD 14a-110
- Bill Segments Produced by Applying a Rate 14a-112

When the Flat File is Created, the Language Tables are Accessed to Download Language Dependent Values 14a-113

- Reopening a Completed Bill 14a-115
- Mass Reopen 14a-117
- How to Avoid Reopening 14a-118
- Freezing and Completing 14a-119
- Closing Bills (... Bill Segments, really) 14a-121
- Sequential Bill Numbers 14a-123
- When Sequential Bill Numbers are Assigned 14a-124
- Correction via Cancellation 14a-126
- Different Correction Methods 14a-128
- The Cancel / Rebill Method 14a-130
- Cancel Only 14a-131
- Online Cancel / Rebill 14a-132
- Mass-Cancel an Entire Batch 14a-133
- Automatic Cancel Rebill 14a-134
- Automatic Cancel Rebill: An Example 14a-136
- Credit Notes 14a-137
- Online Credit Note Creation 14a-138
- Correction Notes 14a-139
- Online Correction Note Creation 14a-140
- Bill Segment Remarks 14a-141
- Cancellations Prior to Completion 14a-142
- Practice 14-5 14a-144
- Checkpoint 14a-146

- Billable Charges 14a-148
- Billable Charges may have Bill Lines 14a-149
- A Different Bill Segment Creation Algorithm 14a-150
- Billable Charge ERD 14a-151
- Billable Charges with Service Quantities 14a-153
- Billable Consumption ERD 14a-154
- Billable Charge Bill Segment ERD 14a-155
- Billable Charge Read Details 14a-157
- Billable Charge Read Details ERD 14a-158
- Billable-Charge Line Characteristics ERD 14a-160
- Billable Charge Templates Save Typing 14a-162
- How are Billable Charge Templates Used? 14a-163
- Practice 14-6 14a-164
- Billable Charge Upload Overview 14a-166
- The Upload Processes 14a-167
- Process X: Populate Upload Staging 14a-168
- Process BCU1: Populate and Validate SA ID and Line Details 14a-170
- Process BCU2: Create Billable Charge 14a-171
- Purging Upload Records 14a-173
- Strict and Wait Options 14a-174
- Recurring Charge SAs 14a-176
- Recurring Charge Bill Segment ERD 14a-178
- More to Come 14a-179
- Review Questions 14a-180
- 14b Billing Part 2: Off-Cycle Bill Generator
- Objectives 14b-2
- Financial Transactions on Bills 14b-3
- Off-Cycle Bill Generator Overview 14b-4
- Off-Cycle Bill Generator ERD 14b-5
- Off-Cycle Bill Generator Lifecycle 14b-6
- Creating the Bill 14b-7
- Practice 14-1 The Off-Cycle Bill Generator Business Object 14b-8
- Off-Cycle Bill Generator Portal 14b-9
- Standard Bill Page 14b-11
- Off-Cycle Bill Generator Query Portal 14b-12
- How to Access The Off-Cycle Bill Generator Portal 14b-13
- How to Create an Off-Cycle Bill Generator 14b-14
- Realigned Standard Bill Page Functions 14b-16
- Practice 14-2 Creating an Off-Cycle Bill 14b-17
- Summary 14b-18
- 14c Billing Part 3: Usage Requests
- Objectives 14c-2
- Not Applicable to All Implementations 14c-3
- Integration Overview 14c-4

BPTEL Orchestrates the Transformation and Load of Payloads Between CCB and MDM 14c-5

- Billing Creates Usage Requests 14c-6

- MDM Responds with Bill Determinants (or Errors) 14c-7
- The Usage Object Generates a Bill Segment 14c-8
- Usage Requests Are Not for Meters Only 14c-10
- SA Type Controls Everything 14c-11
- Get Consumption 14c-12
- Scalar Processing Details 14c-15
- Interval Processing Details 14c-16
- Usage Request Example 14c-17
- Bill Segment Creation 14c-18
- Practice 14-1 BD-oriented SA Configuration 14c-21
- Usage Business Objects 14c-23
- Usage ERD 14c-24
- Usage Request BO Lifecycle 14c-25
- Creating the Outbound Message 14c-30
- External Message Configuration 14c-31
- Practice 14-2 The Usage Request Business Objects 14c-32
- Usage Request Portal (Request) 14c-34
- Usage Request Portal (Response) 14c-35
- Usage Interval Data Overlay 14c-36
- Usage Request Portal (Exceptions) 14c-37
- Usage Request Log 14c-38
- Standard Bill Segment Page 14c-39
- Usage Request Query Portal 14c-41
- Practice 14-3 View a Usage Request 14c-42
- Corrected Reads 14c-44
- Corrected Reads BO 14c-45
- Corrected Read BO Lifecycle 14c-46
- Corrected Read Portal 14c-47
- Cancel/Rebill 14c-49
- Navigating to MDM 14c-51
- Summary 14c-53
- Review Questions 14c-54

Managing Statements

- Objectives
- Checkpoint
- A Statement Consolidates SA FTs
- Statements Can Also Be