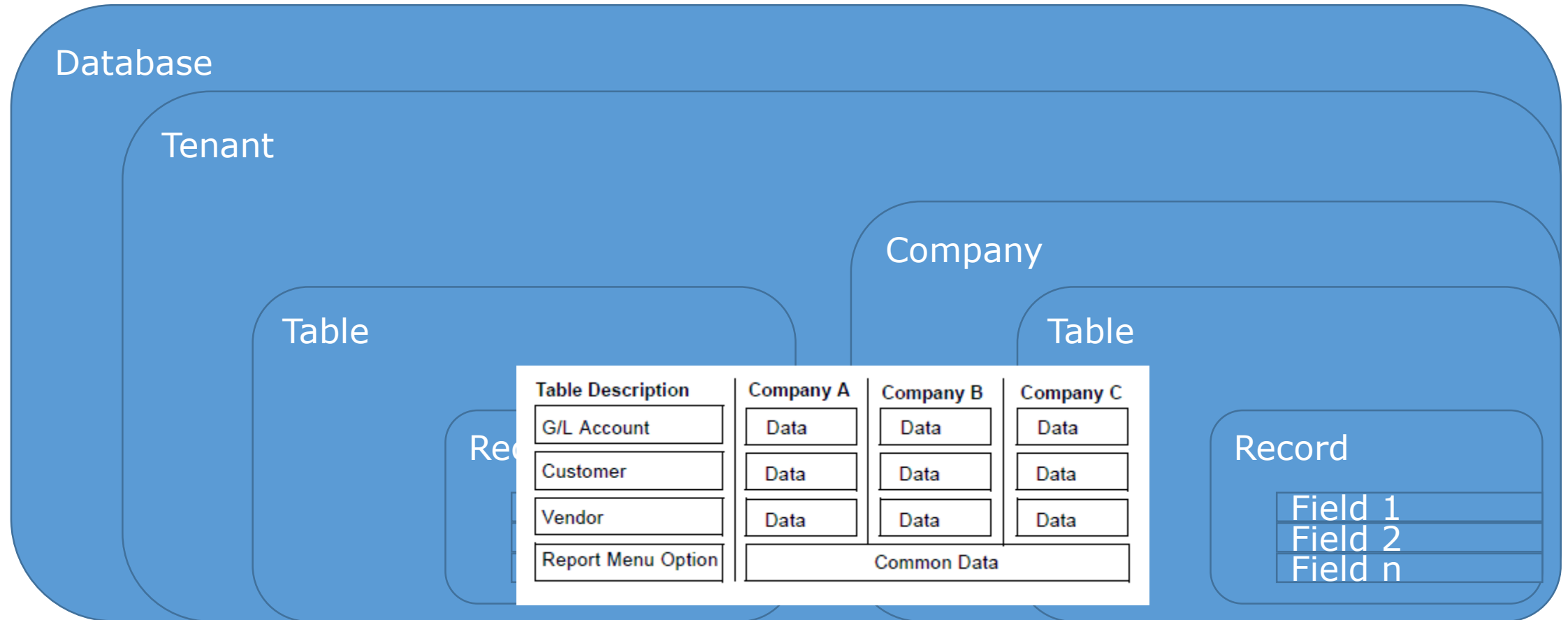# W01 - Business Central Dataset

Program

- Logical and Physical Database
- Tables
- Pages
- Reports
- Extensions
- Posting Routines
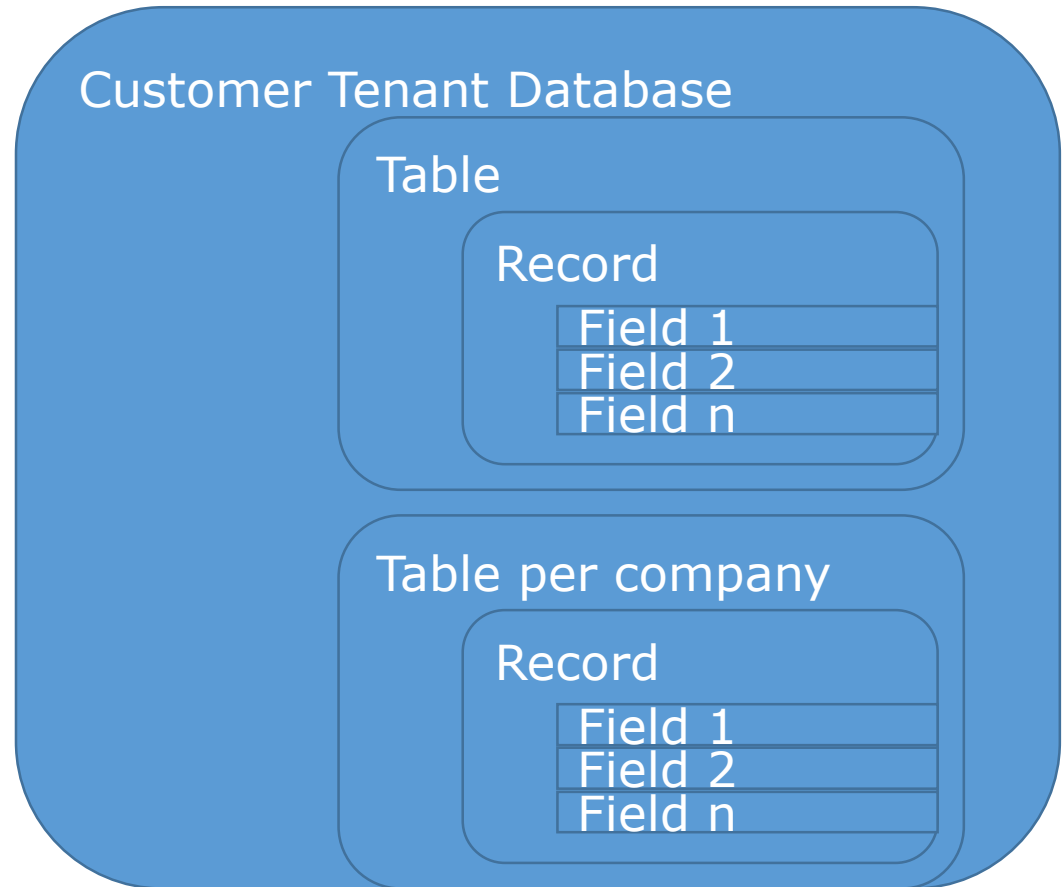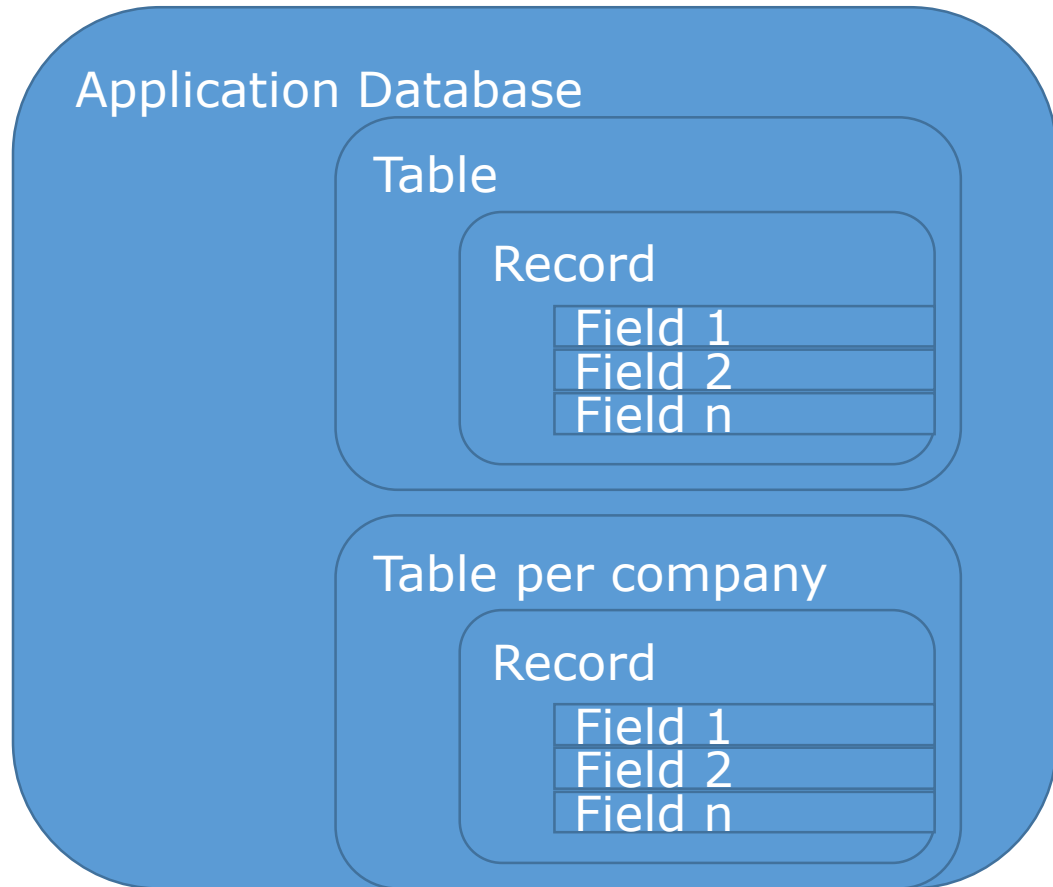- Get started with Business Central and ForNAV
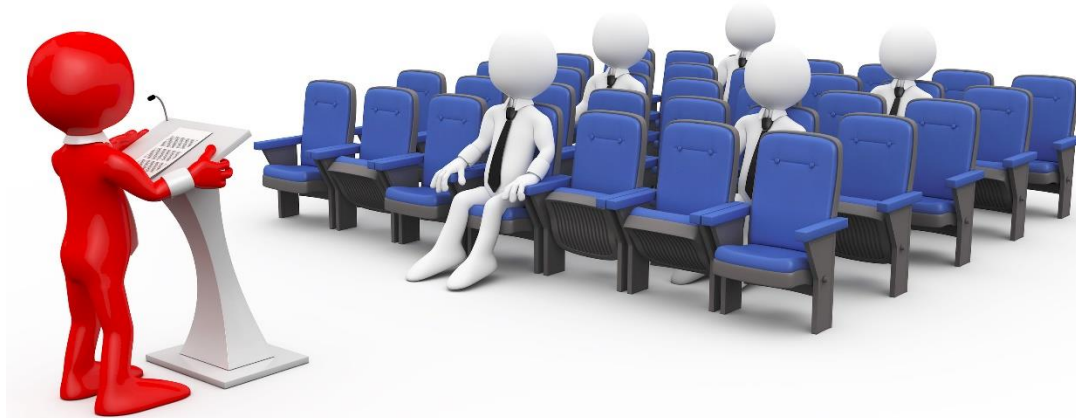
Questions?

Logical Database

Table Description	Company A	Company B	Company C
G/L Account	Data	Data	Data
Customer	Data	Data	Data
Vendor	Data	Data	Data
Report Menu Option	Common Data		

Database
Tenant
Company
Table
Table
Record
Record
Field 1
Field 2
Field n

Physical Database

Application Database

Table

Record

Field 1
Field 2
Field n

Table per company

Record

Field 1
Field 2
Field n

Customer Tenant Database

Table

Record

Field 1
Field 2
Field n

Table per company

Record

Field 1
Field 2
Field n

ForNAV
Reports made easy

Physical database

- Have a look at SQL

Objects

Tenant

Object Metadata Table

| Tables |
| Pages |
| Reports |
| Codeunits |
| Queries |
| XML Ports |
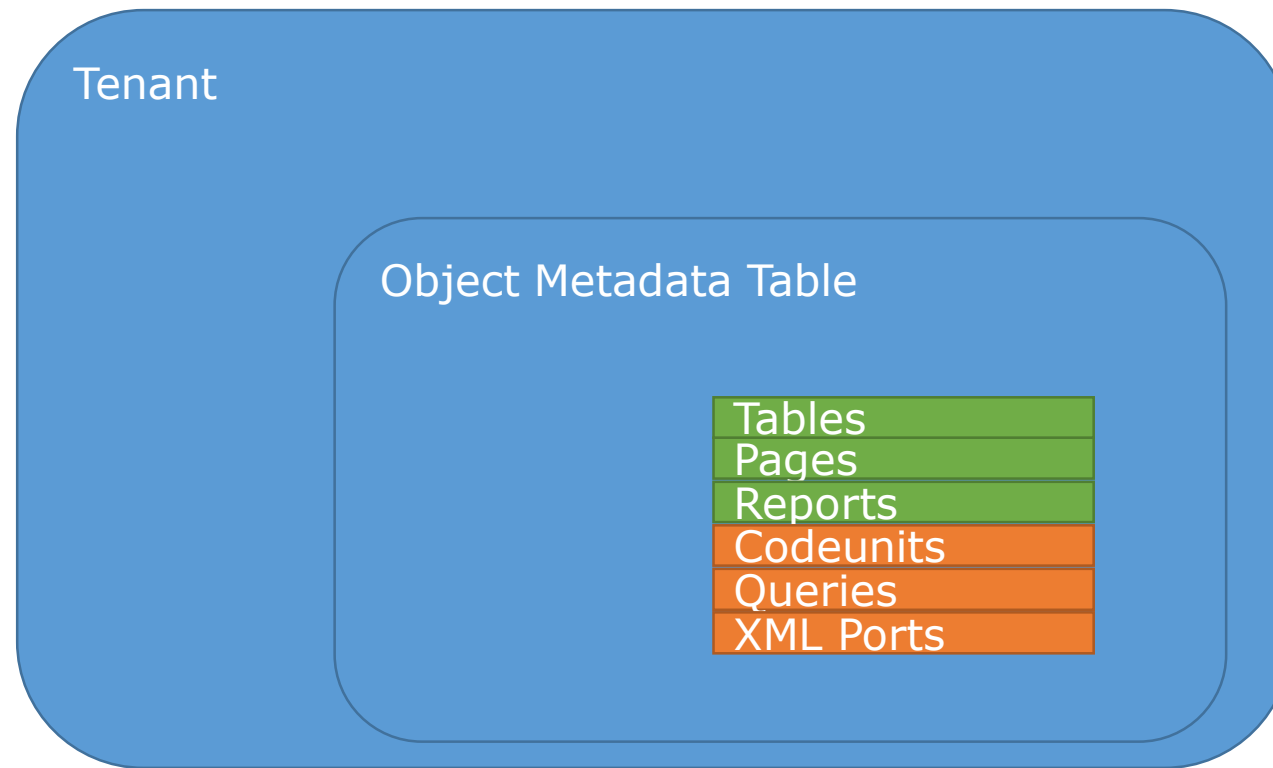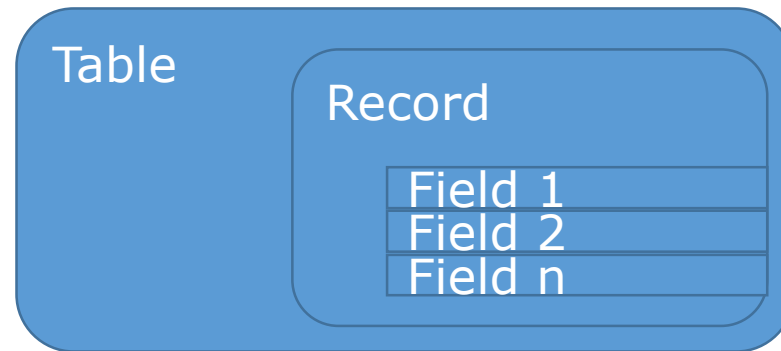
Tables

Table

Record

Field 1
Field 2
Field n

Table Keys

Field 1	Field 2	Field n
1	Data	Entry
1	Data2	Entry2
2	Data	Entry

Header Line Pattern

Table 1
Record
- No.
- Field 2
- Field n

Table 2
Record
- Table 1 No.
- No.
- Field n

Sales Order
Sales Invoice
Purchase Order
Purchase Invoice

ForNAV
Reports made easy

Singleton Pattern

Company Information
ForNAV Setup
Sales & Receivables Setup

Table 1

Record

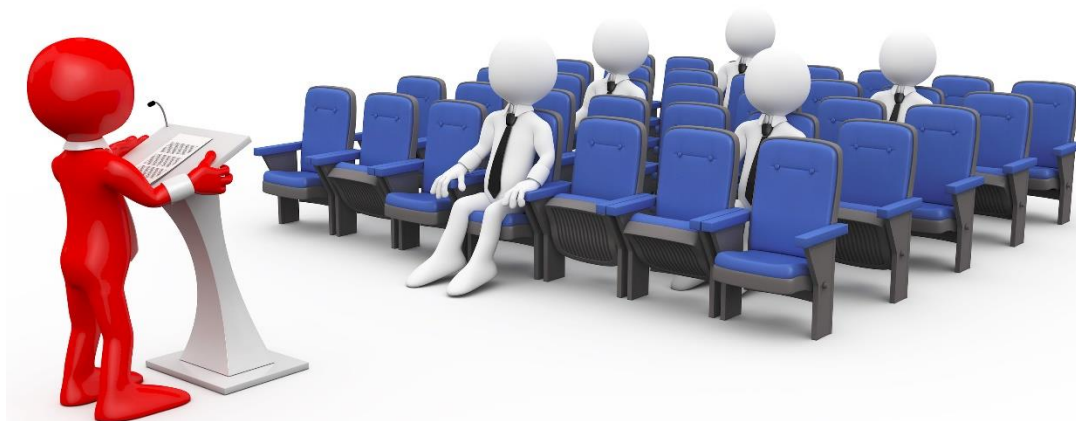| Key, empty |
| Field 2 |
| Field n |

Entries Pattern

General Ledger
Item Ledger
Customer Ledger
Vendor Ledger

Table 1
Record
Key, Integer
Field 2
Field n

Pages

- Show data in tables
- Types
  - List
  - Card
  - API
- Can be published as web service (SOAP, Odata, or API)

Pages

Reports

- Iterates through a predefined Dataset to visualize data or perform Business Logic

- Can

- Outp

- Data

- Output layout can be changed without changing the object – No programming necessary

Report Dataset

Report Iteration

Report Dataset
Sales Invoice Header
Sales Invoice Line

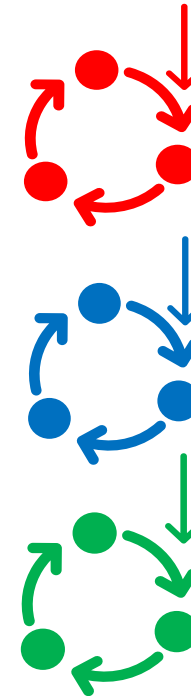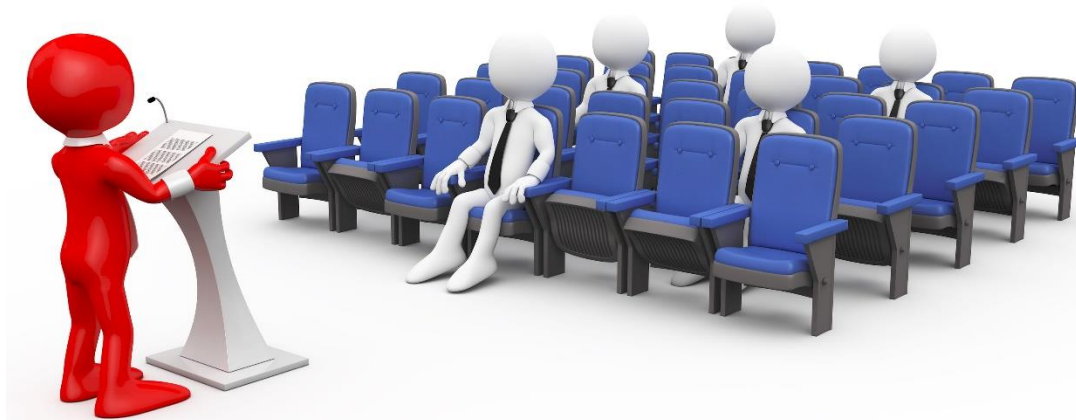| |
|---|
| Sales Invoice Header 1 |
| Sales Invoice Line 1 - 1 |
| Sales Invoice Line 1 - 2 |
| Sales Invoice Line 1 - n |
| Sales Invoice Header 2 |
| Sales Invoice Line 2 - 1 |
| Sales Invoice Line 2 - 2 |
| Sales Invoice Line 2 - n |
| Sales Invoice Header n |
| Sales Invoice Line n - 1 |
| Sales Invoice Line n - 2 |
| Sales Invoice Line n - n |

Report Iteration with filter

Report Dataset
Sales Invoice Header
Filter: No. = 1
Sales Invoice Line

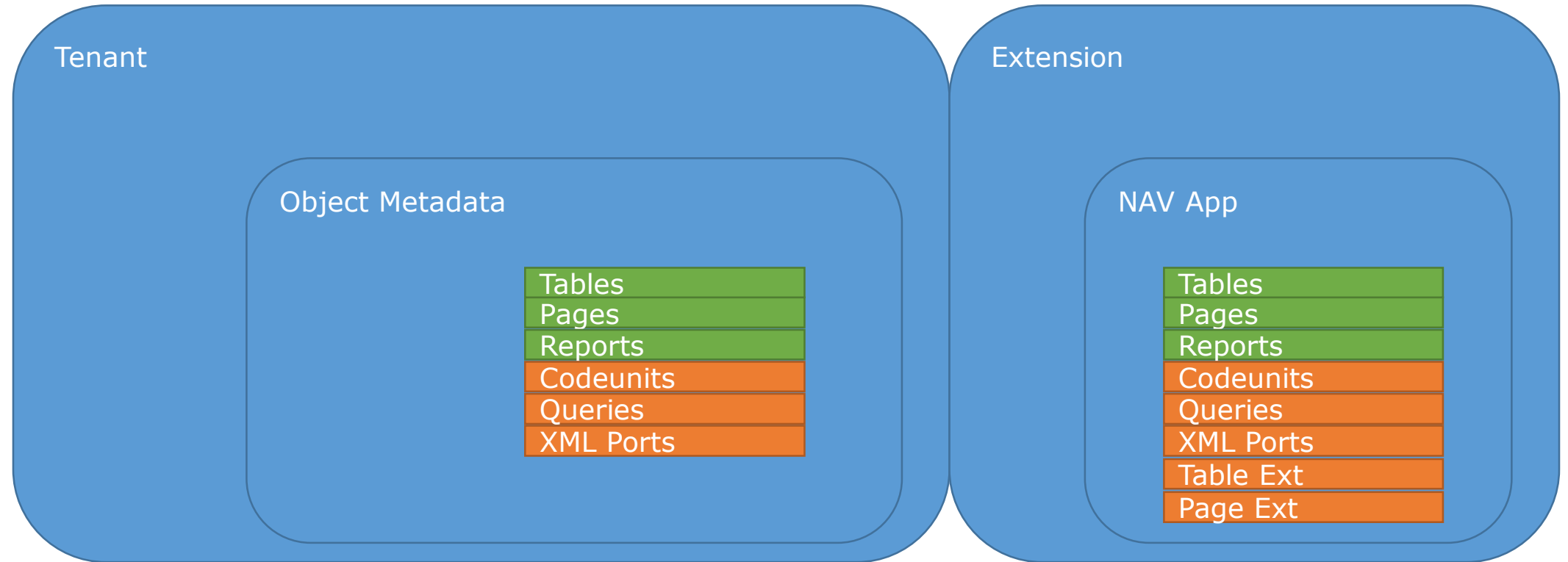| Sales Invoice Header 1 |
| --- |
| Sales Invoice Line 1 - 1 |
| Sales Invoice Line 1 - 2 |
| Sales Invoice Line 1 - n |
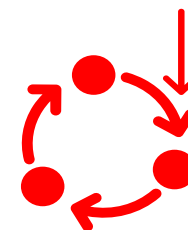
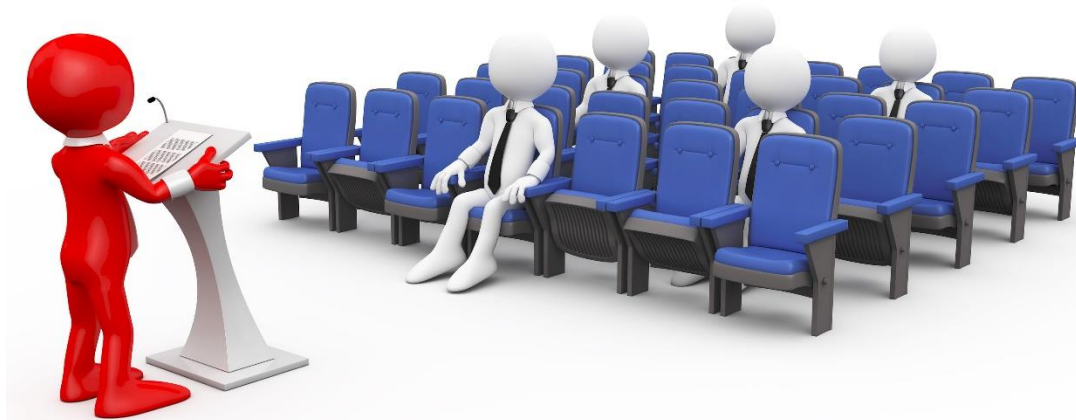Insert Demo of a report from BC

Reports

Extensions

- Add or change Objects
- Customizes a Business Central Tenant and all companies in that Tenant
- Can be App Source Extensions or Tenant specific customization
- Created in Visual Studio Code

- ForNAV is an extension
- New ForNAV reports need to be in an extension

Extensions

Tenant

Object Metadata

Tables
Pages
Reports
Codeunits
Queries
XML Ports

Extension

NAV App

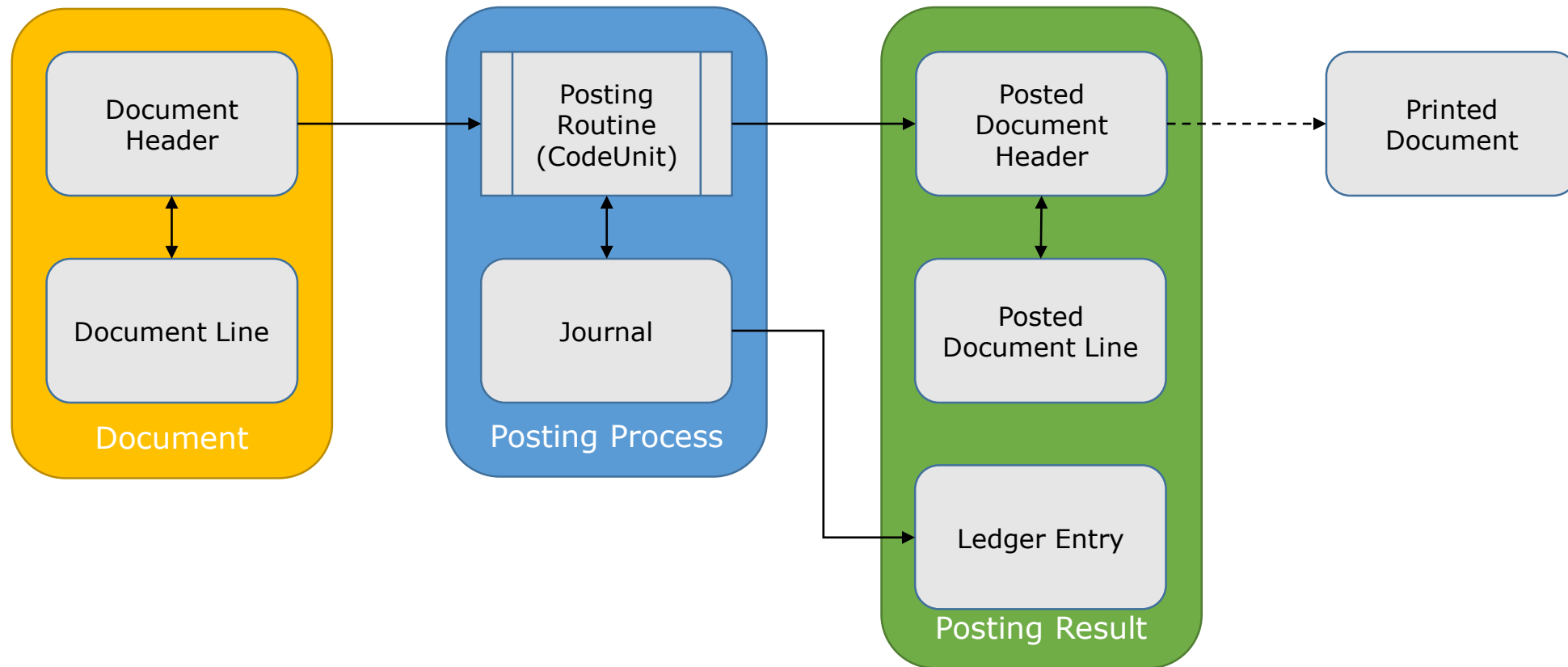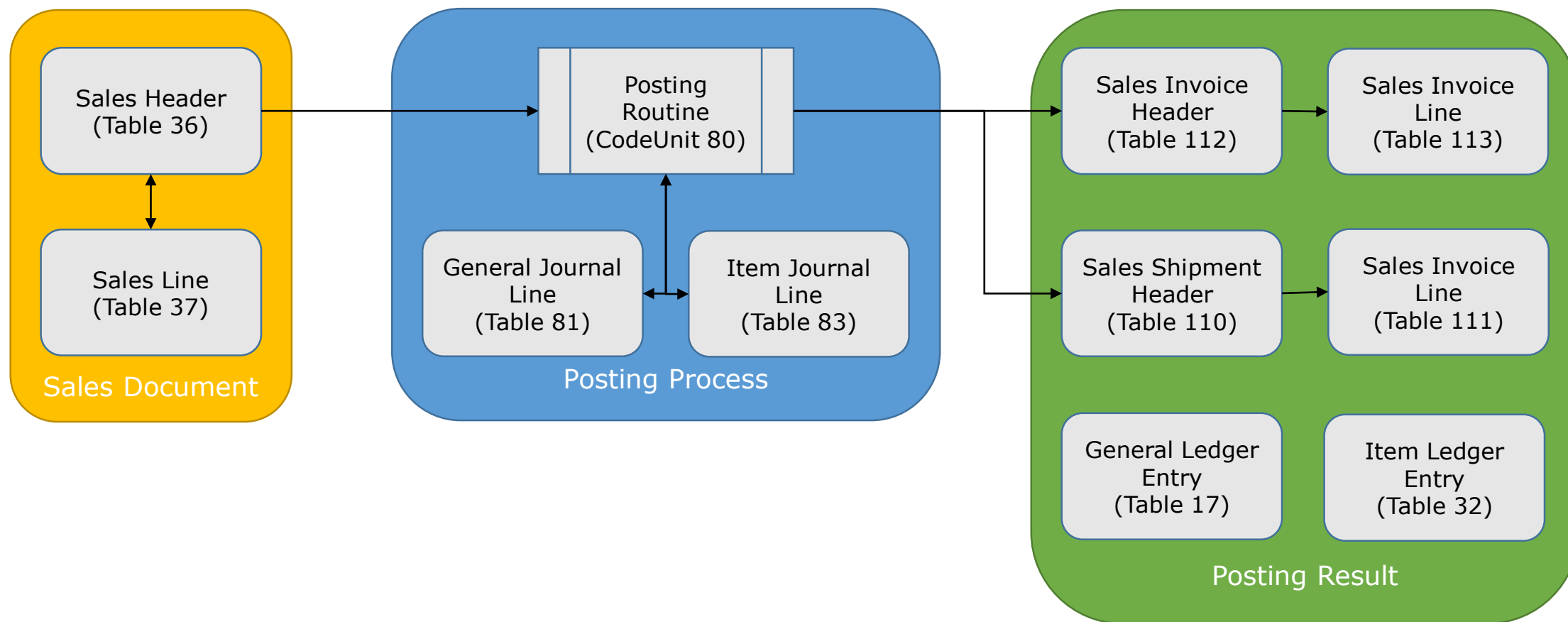| Tables |
|---|
| Pages |
| Reports |
| Codeunits |
| Queries |
| XML Ports |
| Table Ext |
| Page Ext |

Extensions

Posting routines

- Finalizes a posting
- Starts with a document
- Ends with Ledger Entries and Posted Documents
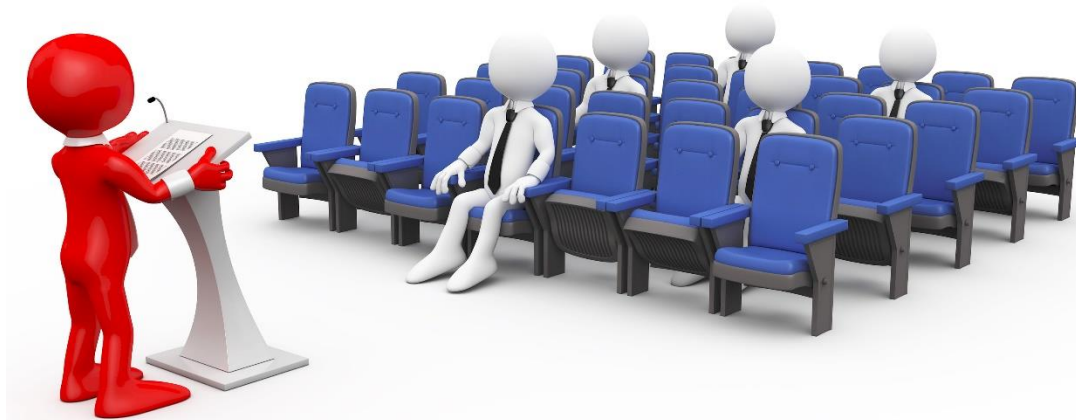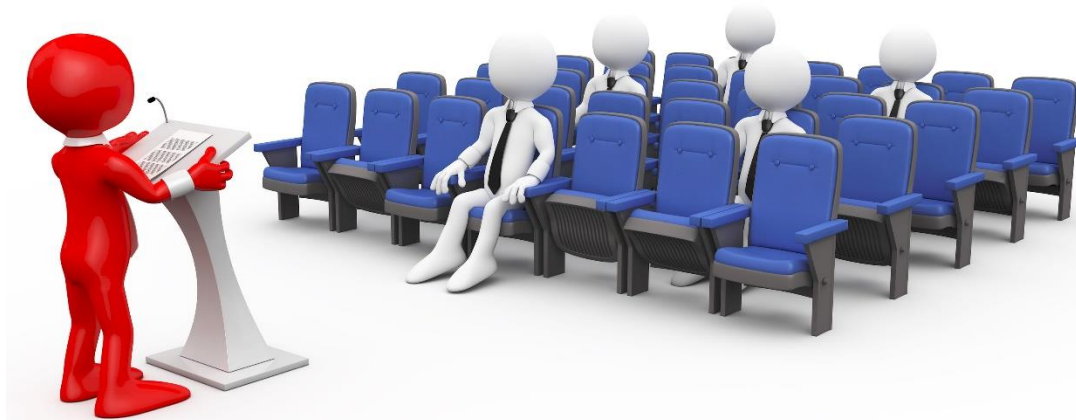
Posting routines

Posting routine Example

Posting routines

Get started with Business Central and ForNAV

Exercise

- Create a Business Central sandbox;
- Setup ForNAV on your system;
- Get the ForNAV Business Central app downloaded on your sandbox;
- Install the training extension on your sandbox;
- Run a few ForNAV reports.

Questions?

Further Learning

- How Do I: Read and Understand the Posting Routines in Microsoft Dynamics NAV 2013 R2
- https://www.youtube.com/watch?v=Wetd1Fa0rmw
- Get started with ForNAv in the cloud
- https://www.youtube.com/watch?v=fMWN39dSCkk
- Create a Microsoft Dynamics NAV Business Central sandbox environment
- https://docs.microsoft.com/en-us/dynamics365/business-central/dev-itpro/developer/devenv-get-started-container-sandbox