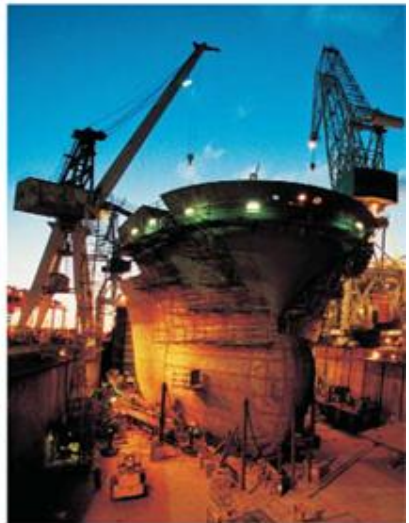


Smart Plant Reference Data *Labs*



Process, Power & Marine



Oct 2012



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Note: Replace all occurrence of <Init> in the labs with your initials. Replace all occurrence of <ID> with the id number assigned to you.

Lab 1. Login to SPRD / SP Materials

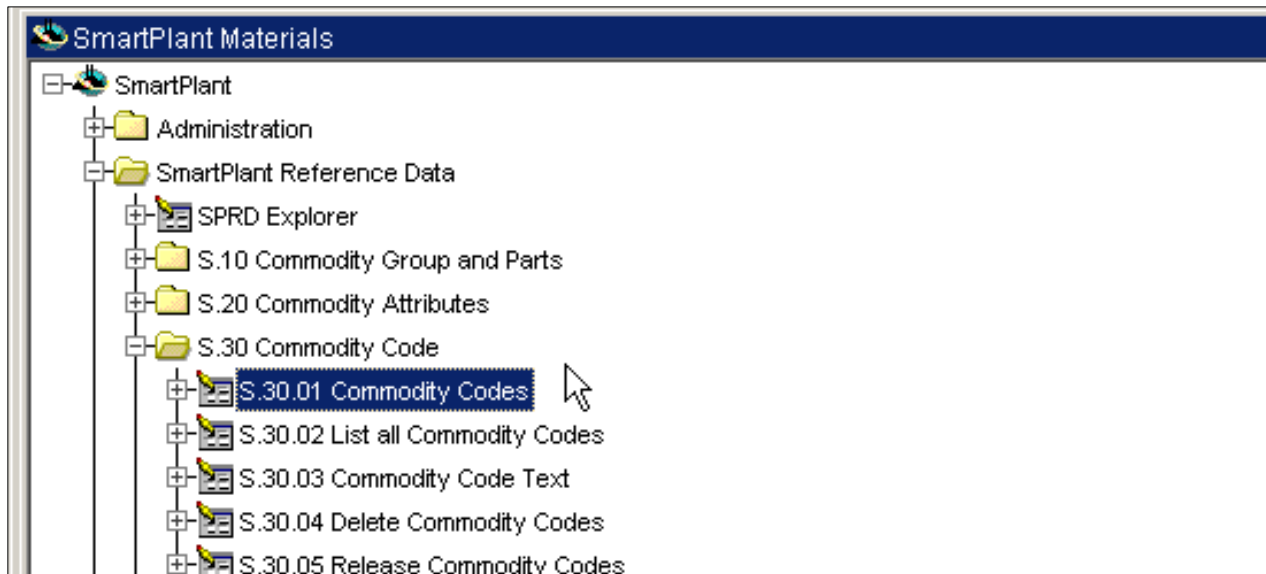
- Launch Internet Explorer and type in url for your SPRD installation
- FYI: If the Java component is not installed the system will automatically download and install it. Please accept all default prompts during installation.
- After installation you will be presented with the Login window. Type in your **User Name**, **Password** and set **Working With** to **PROJECT**. System will display a list of product groups / discipline.

Product Group	Description	Discipline	Language	Role	Last Login
SDB	SDB Standard Catalog	PIPING	English	PUBLIC	24-SEP-2012
SDB	SDB Standard Catalog	STRUCTURAL	English	PUBLIC	11-MAY-2012

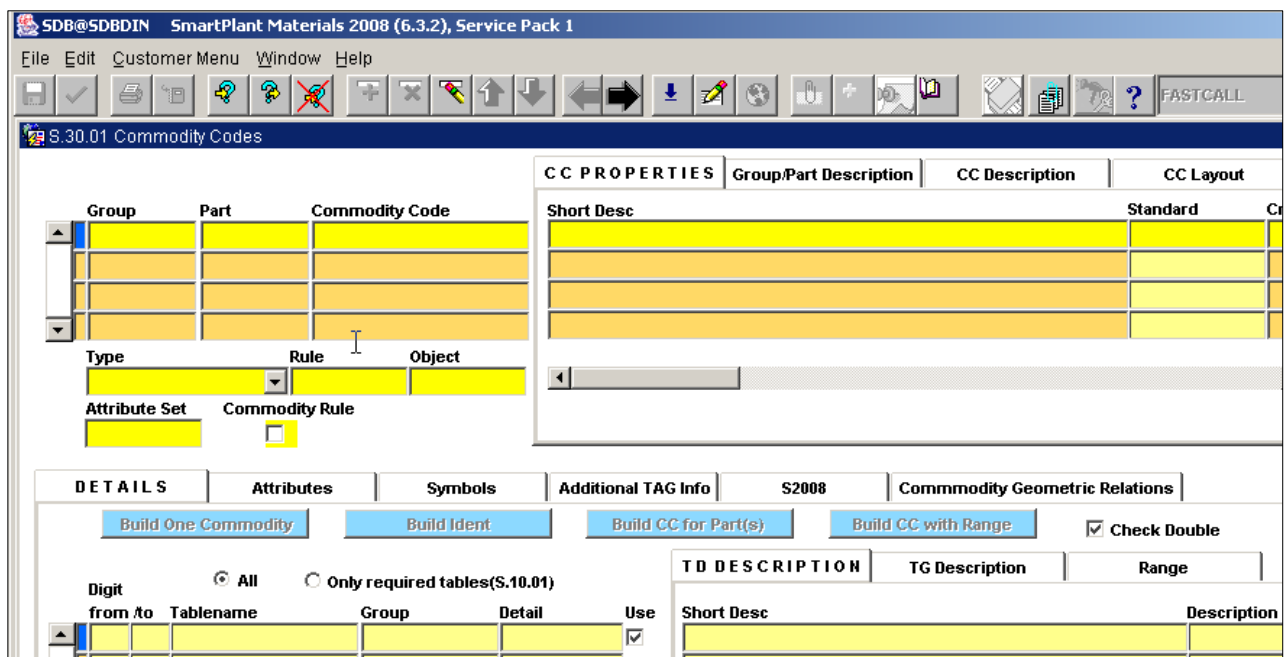
- Select **SDB TRAINING Project** and **Piping** discipline and **click** the **OK** button to login.
- On successful login you will be presented with the SPRD / SP Materials Menu.

Lab 2. Review toolbar icons

- Launch **"S.30.01 Commodity Codes"**


























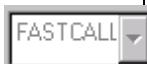
- FYI: By default the system opens this screen in the Query mode. Searchable fields such as Group, Part, Commodity Code, Short Desc etc. have a bright yellow background.



- b. Move the mouse over the toolbar icons and understand their function based on the list below



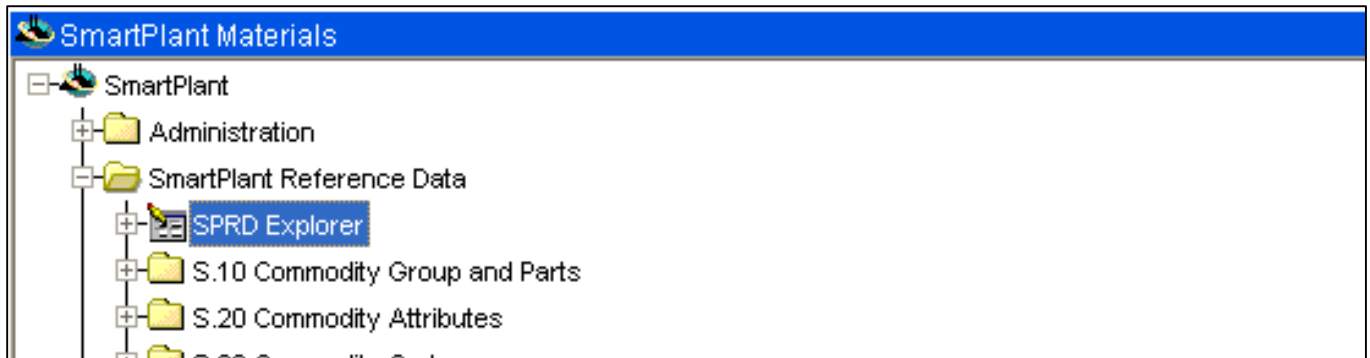
Icon	Function	Description
	Save	Saves record modifications
	Save and Proceed	Saves record changes and moves to the next record
	Print Screen	Prints a snapshot of the active SmartPlant Materials screen to the default printer
	Print to File	Prints the information in the displayed SmartPlant Materials screen to a data file in the default location.
	Enter Query, F7	Initiates Enter Query mode for a user to set up a database query. Search conditions in yellow fields restrict queries.
	Run Query, F8	Runs a database query after it is defined with Enter Query and displays the data in the SmartPlant Materials screen
	Cancel Query, CTRL+Q	Stops a query and changes from Enter Query mode to Input mode. In Input mode, users can insert records.
	New Record, F6	Adds (inserts) a new record behind the cursor
	Delete Record, SHIFT+F6	Deletes the selected record. If dependent data exists, the user is prompted to click the Delete Record icon again to delete the data and all of its dependent data.
	Clear Record, SHIFT+F4	Clears the record the cursor is on
	Go To Previous Record, SHIFT+↑	Moves to the previous record of a block
	Go To Next Record, SHIFT+↓	Moves to the next record of a block
	Go To Previous Block, CTRL+PgUp	Moves to the previous block
	Go To Next Block, CTRL+PgDn	Moves to the next block
	List of Values (LOV), F9	Displays the list of values (LOV). Click a value to select it for the input field. Click Cancel to dismiss the list and not select a value.

Icon	Function	Description
	Edit Field, CTRL+d	Opens an editor field to allow entry of extensive text into a field
	NLS Description, CTRL+>	Opens a window for polygot input. Click a second time to return to the previous block. (NLS = National Language Support.)
	Record Information	Displays detailed information about the selected record
	Where Condition	Displays the A.60.06 Query Condition screen, for a user to change selection limitations. It displays a user-defined list, for example, a list of all pipe carbon steel items.
	Comments	Allows users to add comments to the displayed SmartPlant Materials record.
	Valid Settings	Opens the Valid Settings dialog box with all project settings relative to the active SmartPlant Materials screen.
	JCS Monitor	Checks background processing initiated from the Start Batch icon available on screens where batch processing is possible. Displays the A.60.41 JCS Jobs screen (Job Control System) where the jobs are listed.
	Help, F2	Displays SmartPlant Materials Help
	FASTCALL	Displays a list of additional SmartPlant Materials screens related to the active task

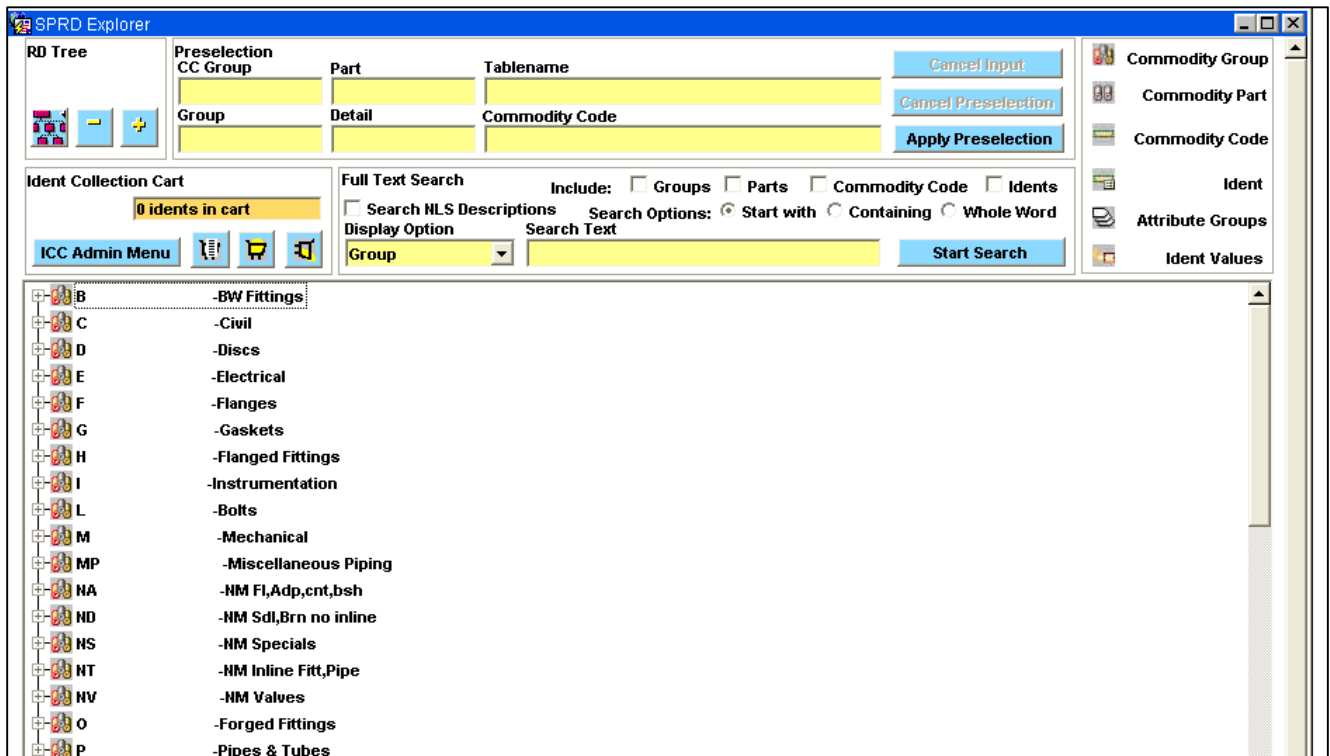
Keys	
Function	Key
Accept	F10
Cancel	Esc
Clear Block	Shift+F5
Clear Field/Item	Ctrl+u
Clear Form	Shift+F7
Count Matching Records	Shift+F2
Debug Mode	Ctrl+?
Delete Backward	Delete
Delete Backward	Backspace
Delete Record	Shift+F6
Display Error	Shift+F1
Down	Ctrl+l
Down	Down
Duplicate Field/Item	F3
Duplicate Record	F4
Edit	Ctrl+e
Exit	Ctrl+q
Help	F1
Left	Left
List of Values	F9
New Record	F6
Next Block	Ctrl+Page Down
Next Field/Item	Ctrl+Tab
Next Field/Item	Tab
Next Record	Shift+Down
NLS	Ctrl+>
Previous Block	Ctrl+Page Up
Previous Field/Item	Shift+Tab
Previous Field/Item	Shift+Ctrl+Tab
Previous Menu	Ctrl+Enter
Previous Record	Shift+Up
Print	Shift+F8
Return	Enter
Right	Right
Scroll Down	Page Down
Scroll Up	Page Up
Show Keys	Ctrl+F1
Toggle Query Mode	F5
Up	Up
Up	Ctrl+p

Lab 3. Search for a commodity using the SPRD Explorer

- a. Launch **"SPRD Explorer"** by double clicking on the SPRD Explorer menu option



- b. System displays a list of Commodity Groups defined in the Catalog
 - i. FYI: The catalog is classified into a two level hierarchy of Commodity Group and Commodity Parts.



- c. Click on the “+” sign to the left of the Group B – BW Fittings to display the parts defined for Butt Weld Fittings.
- d. Click on the “+” sign to the left of the Part E45 to display the Commodity Codes defined for 45 Deg Elbow 5D.

SPRD Explorer

RD Tree

Preselection

CC Group	Part	Tablename
Group	Detail	Commodity Code

Ident Collection Cart

0 idents in cart

Full Text Search

Include: ☐ Groups ☐ Parts

☐ Search NLS Descriptions

Search Options: ☒ Start with

Display Option: **Group** Search Text:

RD Tree

- B -BW Fittings
 - BLD -BLD
 - CAP -Cap
 - E11 -180 Deg. Elbow 10D
 - E13 -180 Deg. Elbow 3D
 - E15 -180 Deg. Elbow 5D
 - E1L -180 Deg. Elbow 1.5D
 - E1S -180 Deg. Elbow 1D
 - E43 -45 Deg. Elbow 3D
 - E45 -45 Deg. Elbow 5D
 - BE45AP2BEACKZZZ - 45 Deg. Elbow 5D , Manuf. Std , BE , A 234 Gr. WPB
 - BE45AP2BEACPZZZ - 45 Deg. Elbow 5D , Manuf. Std , BE , A 420 Gr. WPL6
 - BE45AP2BEAEEABA - 45 Deg. Elbow 5D , Manuf. Std , BE , API 5L Gr. B , SMLS
 - BE45AP2BEAEKABA - 45 Deg. Elbow 5D , Manuf. Std , BE , API 5L Gr. X60 , SMLS
 - BE45AP2BEAUVABA - 45 Deg. Elbow 5D , Manuf. Std , BE , A 790 Gr. S32760 , SMLS
 - E4L -45 Deg. Elbow 1.5D
 - E4S -45 Deg. Elbow 1D

- e. Let us say we want to search for all CC that have HANDWHEEL in their description.
- f. Check the Include: Commodity Code and Search NLS Description checkboxes.
- g. Set the Search Option to Containing
- h. Type HANDWHEEL in the Search Text as shown below.

SPRD Explorer

RD Tree

Preselection

CC Group

Part

Tablename

Cancel Input

Group

Detail

Commodity Code

Cancel Preselection

Apply Preselection

Ident Collection Cart

0 items in cart

ICC Admin Menu

Full Text Search

Include:

☐ Groups
 ☐ Parts
 ☒ Commodity Code
 ☐ Idents

☒ Search NLS Descriptions

Search Options:

☐ Start with
 ☒ Containing
 ☐ Whole Word

Display Option

Search Text

Group

HANDWHEEL

Start Search

Commodity Group

Commodity Part

Commodity Code

Ident

Attribute Groups

Ident Values

- i. Click on the Start Search button. The system will display a list of all Commodity Groups that have Commodity Codes containing the word HANDWHEEL.

[illegible]

- j. Click the **Apply to tree** button to narrow the Catalog tree.
- k. Expand the **Ball Valve** and **Diaphragm Valve** Groups by clicking on the “+” to their left to get a list of valves with **Handwheel Operator**.

The screenshot shows the SPRD Explorer application. The 'Full Text Search' section has 'HANDWHEEL' entered in the 'Search Text' field. The 'Include' checkboxes are set to 'Groups', 'Parts', and 'Commodity Code'. The 'Search Options' are set to 'Containing'. The 'Start Search' button is visible. The 'Ident Collection Cart' shows '0 idents in cart'. The 'RD Tree' on the left shows the 'VB' (Ball Valves) and 'VD' (Diaphragm Valves) groups expanded. The search results are displayed in a table below the tree.

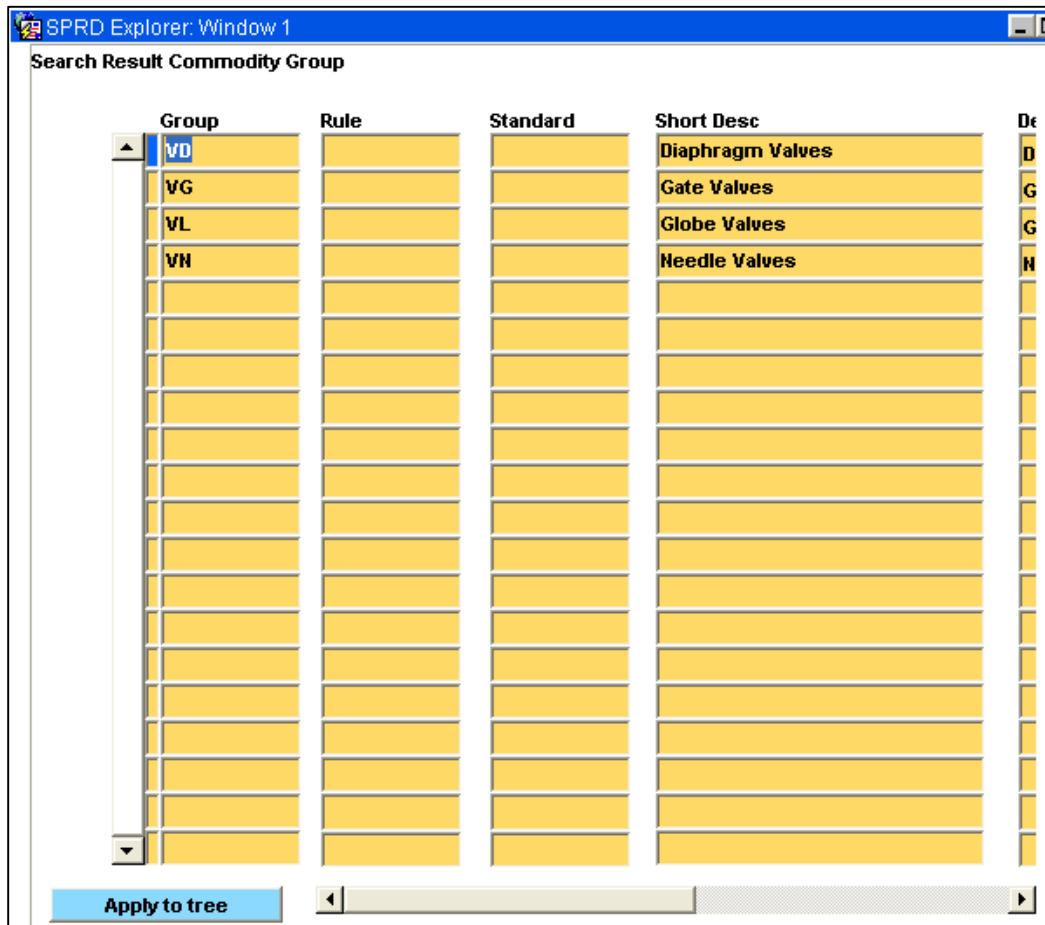
Group	Detail	Commodity Code
VB	-Ball Vlv LP FB	
VB	-Ball Vlv LP FB PAS 1057, EN 558-1, DIN 3357 PN 25, RF, One or Two piece Trun. Mount. ball, Handw	
VB	-Ball Vlv LP FB PAS 1057, EN 558-1, DIN 3357 PN 25, RF, One or Two piece Trun. Mount. ball, Handw	
VB	-Ball Vlv LP FB PAS 1057, EN 558-1, DIN 3357 PN 25, RF, One or Two piece Trun. Mount. ball, Handw	
VB	-Ball Vlv LP FB EN 558-1/27 PN 10, One or Two piece Trun. Mount. ball, Handwheel Operator - G20Mn5	
VD	-Diaphragm Vlv	
VD	-Diaphragm Vlv, Manf. Std., CL150, FF, Bltd Bonnet, Handwheel Operator, A 216 Gr. WCB, Bronze	
VD	-Diaphragm Vlv, Manf. Std., CL150, FF, Bltd Bonnet, Handwheel Operator, A 216 Gr. WCB, Bronze	
VD	-Diaphragm Vlv, Manf. Std., CL150, FF, Bltd Bonnet, Handwheel Operator, A 216 Gr. WCB, 5A to	
VD	-Diaphragm Vlv, Manf. Std., CL150, FF, Bltd Bonnet, Handwheel Operator, A 216 Gr. WCB, 5A to	
VD	-Diaphragm Vlv, Manf. Std., CL150, FF, Bltd Bonnet, Handwheel Operator, A105, Bronze trim, A	
VD	-Diaphragm Vlv, Manf. Std., CL150, FF, Bltd Bonnet, Handwheel Operator, A105, Bronze trim	
VD	-Diaphragm Vlv, Manf. Std., CL150, FF, Bltd Bonnet, Handwheel Operator, A105, 5A to API 594,	
VD	-Diaphragm Vlv, Manf. Std., CL150, FF, Bltd Bonnet, Handwheel Operator, A 350 Gr. LF2, Bronze	

- l. Let us say we wanted to further limit our search to just those Handwheel Operator valve with “A105” Material.
- m. Type **A105** in the **Search Text** and click on the **Start Search** button.

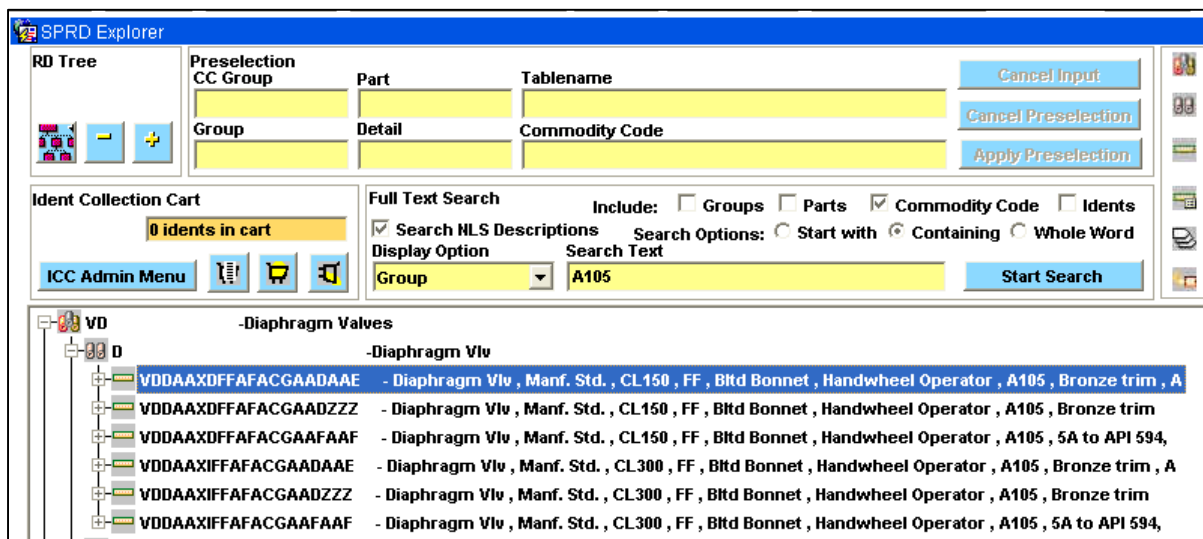
The screenshot shows the SPRD Explorer application. The 'Full Text Search' section has 'A105' entered in the 'Search Text' field. The 'Include' checkboxes are set to 'Groups', 'Parts', and 'Commodity Code'. The 'Search Options' are set to 'Containing'. The 'Start Search' button is visible. The 'Ident Collection Cart' shows '0 idents in cart'. The 'RD Tree' on the left shows the 'VB' (Ball Valves) and 'VD' (Diaphragm Valves) groups expanded. The search results are displayed in a table below the tree.

Group	Detail	Commodity Code
VB	-Ball Vlv LP FB	
VB	-Ball Vlv LP FB PAS 1057, EN 558-1, DIN 3357 PN 25, RF, One or Two piece Trun. Mount. ball, Hand	
VB	-Ball Vlv LP FB PAS 1057, EN 558-1, DIN 3357 PN 25, RF, One or Two piece Trun. Mount. ball, Hand	
VB	-Ball Vlv LP FB PAS 1057, EN 558-1, DIN 3357 PN 25, RF, One or Two piece Trun. Mount. ball, Hand	
VB	-Ball Vlv LP FB EN 558-1/27 PN 10, One or Two piece Trun. Mount. ball, Handwheel Operator - G2	
VD	-Diaphragm Vlv	
VD	-Diaphragm Vlv, Manf. Std., CL150, FF, Bltd Bonnet, Handwheel Operator, A 216 Gr. WCB, Bronze	
VD	-Diaphragm Vlv, Manf. Std., CL150, FF, Bltd Bonnet, Handwheel Operator, A 216 Gr. WCB, Bronze	
VD	-Diaphragm Vlv, Manf. Std., CL150, FF, Bltd Bonnet, Handwheel Operator, A 216 Gr. WCB, 5A to	
VD	-Diaphragm Vlv, Manf. Std., CL150, FF, Bltd Bonnet, Handwheel Operator, A 216 Gr. WCB, 5A to	
VD	-Diaphragm Vlv, Manf. Std., CL150, FF, Bltd Bonnet, Handwheel Operator, A105, Bronze trim, A	
VD	-Diaphragm Vlv, Manf. Std., CL150, FF, Bltd Bonnet, Handwheel Operator, A105, Bronze trim	
VD	-Diaphragm Vlv, Manf. Std., CL150, FF, Bltd Bonnet, Handwheel Operator, A105, 5A to API 594,	
VD	-Diaphragm Vlv, Manf. Std., CL150, FF, Bltd Bonnet, Handwheel Operator, A 350 Gr. LF2, Bronze	

- n. The system will display those Groups where the operator is **Handwheel** and Material contains the word **A105**.



- o. Click on the **Apply to tree** button to view the Commodity Codes.



p. The same results could have been got in one search by typing in **HANDWHEEL%A105**

The screenshot shows the SPRD Explorer application. The 'Full Text Search' section has 'Group' set to 'VD' and 'Search Text' set to 'HANDWHEEL%A105'. The 'Start Search' button is highlighted. Below the search bar, a list of results is displayed under the heading '-Diaphragm Vlv'. The results include several entries with commodity codes and descriptions, such as 'VDDAAXDFFAFACGAADAAE - Diaphragm Vlv, Manf. Std., CL150, FF, Btld Bonnet, Handwheel Operator, A105, Bronze trim, A'.

q. Double click on the first **Commodity Code** to view the details

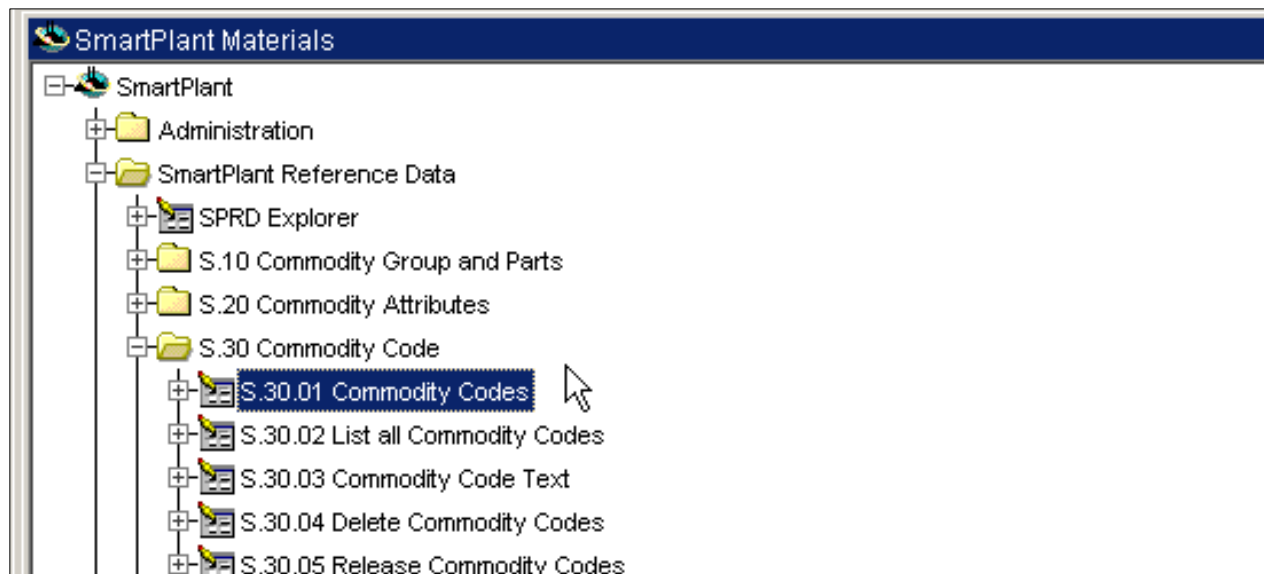
The screenshot shows the 'SPRD Explorer: Window 7' interface. The 'Commodity Code' section displays 'VDDAAXDFFAFACGAADAAE'. The 'Short Desc' is 'Diaphragm Vlv, Manf. Std., CL150, FF, Btld Bonnet, Handwheel Operator, A105'. The 'Description' is 'Diaphragm Valve, Manufacturer Standard, Class 150, Flat Face, Bolted Bonnet'. The 'Group' is 'VD', 'Part' is 'D', and 'Rule' is 'P_VLV_W_OP'. The 'Commodity Type' is 'Table Detail Based'. The 'Layout Short' section shows a detailed description: 'Diaphragm Vlv, Manf. Std., CL150, FF, Btld Bonnet, Handwheel Operator, A105, Bronze trim, ASME B16.5, 125 - 500 Ra Finish'. Below this, a table provides a breakdown of the commodity code digits and their corresponding table names and descriptions.

Digit from /to	Tablename	Group	Detail	Short desc	Description
7 / 7	P_RATING	RAT_US	D	, CL 150	, Class 150
8 / 9	P_END_PREP	VALVE	FF	, FF	, Flat Face
10 / 10	P_VLV_BODY_TYPE	NO_VB_ALL	A	, Btld Bonnet	, Bolted Bonnet
11 / 11	P_VLV_OPERATOR	ALL	F	, Handwheel Operator	, Handwheel Operator
12 / 12	P_MAT_SYSTEM	US	A		
13 / 14	P_MATERIAL	FORG_US	CG	, A105	, A105

r. Close all windows.

Lab 4. Search for an existing commodity

- Launch **"S.30.01 Commodity Codes"**



- Ensure you are in **Query mode** (fields will have a yellow background) by pressing function key **F7**

The screenshot shows the 'S.30.01 Commodity Codes' application window. The window is in 'Query mode', indicated by the yellow background of the input fields. The window is divided into several sections:

- CC PROPERTIES**: Contains a table with columns 'Group', 'Part', and 'Commodity Code'. Below this table are fields for 'Type', 'Rule', and 'Object'.
- Group/Part Description**: A section for entering descriptions.
- CC Description**: A section for entering commodity code descriptions.
- DETAILS**: A section with tabs for 'Attributes', 'Symbols', 'Additional TAG Info', 'S2008', and 'Commodity Geometric F'.
- Build One Commodity**: A button to build a single commodity.
- Build Ident**: A button to build an identifier.
- Build CC for Part(s)**: A button to build commodity codes for specific parts.
- Build CC with Range**: A button to build commodity codes for a range of parts.
- TD DESCRIPTION**: A section for entering tag descriptions.

- c. Type **VB** in the **Group Code** field and **Run the Query** by pressing **F8**. The system will display all the Ball Valves.

S.30.01 Commodity Codes

Group	Part	Commodity Code	CC PROPERTIES	Group/Part Description	CC Description	CC Layout
VB			Short Desc		Standard	Crea

S.30.01 Commodity Codes

Group	Part	Commodity Code	CC PROPERTIES	Group/Part Description	CC Description	CC Layout
VB	L	VBLAA9DFFOBACDCLAAH	Short Desc		Standard	Crea
VB	L	VBLAA9DFFOBACDCLZZZ	Ball Vlv LP FB , API 6D , CL150 , FF , Split body Fltg. ball , Gear Operator , A			M_S
VB	L	VBLAA9DFFOEACDACEZZZ	Ball Vlv LP FB , API 6D , CL150 , FF , Split body Fltg. ball , Gear Operator , A			M_S
VB	L	VBLAA9DFFOEACDCLZZZ	Ball Vlv LP FB , API 6D , CL150 , FF , Split body Fltg. ball , Wrench Operator			M_S

Type: Table Detail Based Rule: P_VLV_W_OP Object: P_1N_E

Attribute Set: Commodity Rule

DETAILS Attributes Symbols Additional TAG Info S2008 Commodity Geometric Relations

Build One Commodity Build Ident Build CC for Part(s) Build CC with Range ☒ Check Double

Digit	from	to	Tablename	Group	Detail	Use	TD DESCRIPTION	TG Description	Range
4	4		P_SYSTEM	US	A	<input checked="" type="checkbox"/>	Short Desc		Description
5	6		P_DIM_STD	VB_US	A9	<input checked="" type="checkbox"/>	, API 6D		, API 6D
7	7		P_RATING	RAT_US	D	<input checked="" type="checkbox"/>	, CL150		, Class 150
8	9		P_END_PREP	VALVE	FF	<input checked="" type="checkbox"/>	, FF		, Flat Face
10	10		P_VLV_BODY_TYPE	VB_ALL	O	<input checked="" type="checkbox"/>	, Split body Fltg. ball		, Split body Fl
11	11		P_VLV_OPERATOR	ALL	B	<input checked="" type="checkbox"/>	, Gear Operator		, Gear Operato
12	12		P_MAT_SYSTEM	US	A	<input checked="" type="checkbox"/>			
13	14		P_MATERIAL	CAST_US	CD	<input checked="" type="checkbox"/>	, A 216 Gr. WCB		, A 216 Grade \
15	17		P_ALIAS_TRIM	VB_US	ACL	<input checked="" type="checkbox"/>	, AISI 410 Ball , Soft Seat		, AISI 410 Ball ,
18	20		P_ALIAS	VB_US	AAH	<input checked="" type="checkbox"/>	, ASME B16.47 Series A		, ASME B16.47

- d. Press **F7** to back to the **Query Mode**

- e. Type **%SMLS%** in the **Short Desc** field and **Run the Query** by pressing **F8**.
 - i. FYI: In Query Mode **%** acts as a wildcard. So typing **%SMLS%** in the **Short Desc** field, tells the system to search for all commodities that have the word **SMLS** anywhere in the short description.
 - ii. FYI: If your Oracle is configured to be **“Case Sensitive”** then **%smls%** will not find the Seamless Components.

The screenshot shows the 'S.30.01 Commodity Codes' window. The 'Short Desc' field contains '%SMLS%'. The results table shows four entries:

Group	Part	Commodity Code	Short Desc	Standard	Crea
B	CAP	BCAPABMBEACKAAH	Cap , B16.9 , BE , A 234 Gr. WPB , Galvanized , SMLS		JT
B	CAP	BCAPABMBEACKABA	Cap , B16.9 , BE , A 234 Gr. WPB , SMLS		ASC
B	CAP	BCAPABMBEACLAH	Cap , B16.9 , BE , A 234 Gr. WPC , Galvanized , SMLS		JT
B	CAP	BCAPABMBEACLABA	Cap , B16.9 , BE , A 234 Gr. WPC , SMLS		ASC

Below the results, there are tabs for 'DETAILS', 'Attributes', 'Symbols', 'Additional TAG Info', 'S2008', and 'Commodity Geometric Relations'. The 'DETAILS' tab is active, showing a table with columns: Digit, from, to, Tablename, Group, Detail, Use, Short Desc, and Description.

Digit	from	to	Tablename	Group	Detail	Use	Short Desc	Description
5	5		P_SYSTEM	US	A	<input checked="" type="checkbox"/>		
6	7		P_DIM_STD	FIT_US	BM	<input checked="" type="checkbox"/>	, B16.9	, ASME B16.9
8	9		P_END_PREP	WELD	BE	<input checked="" type="checkbox"/>	, BE	, Bevelled End
10	10		P_MAT_SYSTEM	US	A	<input checked="" type="checkbox"/>		
11	12		P_MATERIAL	WRGT_US	CK	<input checked="" type="checkbox"/>	, A 234 Gr. WPB	, A 234 Grade V
13	15		P_ALIAS	BWFIT_US	AAH	<input checked="" type="checkbox"/>	, Galvanized , SMLS	, Galvanized , S

- f. Press **F7** to return to the **Query Mode**. Type **F** in the **Group** field and press **Tab** to move the **Part** field
- g. Click on the List of Values (**LOV**) icon or press **F9** to view a list of valid part
 - i. FYI: The title of the LOV has the screen name where the list is maintained
- h. Select **L** and click on the **OK** button

S.30.01 Commodity Codes

Group	Part	Commodity Code	Short Desc	CC Description	Status
F	LJ				

Find %

Part	Short Desc	Description
BL	Blind Flg.	Blind Flange
LJ	Lap Joint Flg.	Lap Joint Flange
O2	WN Ori Flg 0.5" Thd	Weldneck Orifice Flange with 0.5" Threaded Tap
O3	WN Ori Flg 0.75" Thd	Weldneck Orifice Flange with 0.75" Threaded Tap
O5	WN Ori Flg 0.5" S...	Weldneck Orifice Flange with 0.5" Socketweld Tap
O6	WN Ori Flg 0.75" S...	Weldneck Orifice Flange with 0.75" Socketweld Tap
OB	SO Ori Flg 0.5" Thd	Slip-on Orifice Flange with 0.5" Threaded Tap
RT	Red. Thd. Flg.	Reducing Threaded Flange
RW	Red. WN Flg.	Reducing Weldneck Flange
SO	SO Flg. - Hub Type	Slip-on Flange - Hub Type
SW	SW Flg.	Socketweld Flange
TH	Thd. Flg.	Threaded Flange

Find OK Cancel

- i. The system will set the **Part** field to **LJ**. Run the Query by pressing **F8** to view all the Lap Joint Flanges.

S.30.01 Commodity Codes

Group	Part	Commodity Code	Short Desc	Standard	Created
F	LJ				

S.30.01 Commodity Codes

Group	Part	Commodity Code	Short Desc	Standard	Created
F	LJ	FLJABLDFFACGA1A	Lap Joint Flg. , B16.5 , CL150 , FF , A105/A105N , 125 - 250 Ra Finish		AK
F	LJ	FLJABLDFFACGZZZ	Lap Joint Flg. , B16.5 , CL150 , FF , A105/A105N		AK
F	LJ	FLJABLDFFACHZZZ	Lap Joint Flg. , B16.5 , CL150 , FF , A 181 Cl. 60		AK
F	LJ	FLJABLDFFACJZZZ	Lap Joint Flg. , B16.5 , CL150 , FF , A 181 Cl. 70		AK

Type: Table Detail Based Rule: P_FLANGE Object: P_1H_E

Attribute Set: Commodity Rule

Build One Commodity Build Ident Build CC for Part(s) Build CC with Range Check Double

Digit	from	to	Tablename	Group	Detail	Use	Short Desc	Description
4	4		P_SYSTEM	US	A	✓		
5	6		P_DIM_STD	FLG_US	BL	✓	, B16.5	, ASME B16.5
7	7		P_RATING	RAT_US	D	✓	, CL150	, Class 150
8	9		P_END_PREP	FLANGE	FF	✓	, FF	, Flat Face Flange
10	10		P_MAT_SYSTEM	US	A	✓		
11	12		P_MATERIAL	FORG_US	CG	✓	, A105	, A105
13	15		P_ALIAS	FLG_US	A1A	✓	, 125 - 250 Ra Finish	, 125 - 250 Ra S

- j. Ensure you are in **Query Mode (F7)**. Type PPPABQBEACQAAG in the **Commodity Code** field and **Run the Query** by pressing **F8** to view details of the commodity

The screenshot shows the 'S.30.01 Commodity Codes' window. The 'CC PROPERTIES' tab is active. The 'Group' is 'P', 'Part' is 'PP', and 'Commodity Code' is 'PPPABQBEACQAAG'. The 'Short Desc' field is empty.

The screenshot shows the 'S.30.01 Commodity Codes' window with the 'DETAILS' tab active. The 'Build One Commodity' button is highlighted. The 'Type' is 'Table Detail Based', 'Rule' is 'P_PIPE', and 'Object' is 'P_1N1S_L'. The 'Attribute Set' is empty. The 'Commodity Rule' checkbox is unchecked. The 'Build CC for Part(s)' button is highlighted. The 'Check Double' checkbox is checked. The 'TD DESCRIPTION' tab is active, showing a table of digit details.

Digit	from	to	Tablename	Group	Detail	Use	Short Desc	Description
4	4		P_SYSTEM	US	A	✓		
5	6		P_DIM_STD	PIP_US	BQ	✓	, B36.10M	, ASME B36.1
7	8		P_END_PREP	PIPE	BE	✓	, BE	, Bevel End
9	9		P_MAT_SYSTEM	US	A	✓		
10	11		P_MATERIAL	PIPE_US	CQ	✓	, A 106 Gr. A	, A 106 Grade
12	14		P_ALIAS	PIPE_US	AAG	✓	, SMLS	, Seamless

- k. Click on the **CC Description** tab to view the complete description.

The screenshot shows the 'S.30.01 Commodity Codes' window with the 'CC DESCRIPTION' tab active. The 'Short Desc' field contains 'Pipe , B36.10M , BE , A 106 Gr. A , SMLS'. The 'Description' field contains 'Pipe , ASME B36.10M , Bevel End , A 106 Grade A , Seamless'.

- l. Do not close the **"S.30.01 Commodity Codes"** screen

Lab 5. Add new Material

- In the **Details** tab, click on the table **Detail** field **CQ** of the **P_MATERIAL** row
- Click on the **Fast Call** drop down to access the **"S.20.02 Tablenames with Details"** screen

S.30.01 Commodity Codes

Group	Part	Commodity Code	Short Desc
P	PP	PPPABQ8EACQAAG	Pipe , B36.10M , BE , A 106 Gr. A , SMLS

Type: Table Detail Based Rule: P_PIPE Object: P_1H1S_L

Attribute Set: Commodity Rule

DETAILS | Attributes | Symbols | Additional TAG Info | S2008 | Commodity Geometric Relations

Build One Commodity | Build Ident | Build CC for Part(s) | Build CC with Range | ☒ Check Double

Digit	from	to	Tablename	Group	Detail	Use	TD DESCRIPTION	TG Description	Range
4	4		P_SYSTEM	US	A	<input checked="" type="checkbox"/>			
5	6		P_DIM_STD	PIP_US	BQ	<input checked="" type="checkbox"/>	, B36.10M		, ASME B36.10M
7	8		P_END_PREP	PIPE	BE	<input checked="" type="checkbox"/>	, BE		, Bevel End
9	9		P_MAT_SYSTEM	US	A	<input checked="" type="checkbox"/>			
10	11		P_MATERIAL	PIPE_US	CQ	<input checked="" type="checkbox"/>	, A 106 Gr. A		, A 106 Grade A
12	14		P_ALIAS	PIPE_US	AAG	<input checked="" type="checkbox"/>	, SMLS		, Seamless

- System will display the material code and its description

S.20.02 Tablenames with Details

Tablename with Groups

Tablename	Group	Description
P_MATERIAL	PIPE_US	Pipe US

Details | Copy Table | Copy Tablegroup | Order by Description | Duplicate Details | Copy NLS

Table Detail	Short Desc	Description	Base_Mat	CM45
CQ	A 106 Gr. A	A 106 Grade A	CS	160

- d. Click on a blank row in the **Details** tab to add a new material **Y<ID>** with a description **Demo Material Y<ID>**. Note: The material will be added in the **PIPE_US** group, as shown in the **Tablename with Groups** section.

S.20.02 Tablenames with Details

Tablename with Groups

Tablename	Group	Description
P_MATERIAL	PIPE_US	Pipe US

Details

Copy Table Copy Tablegroup Order by Description Duplicate Details Copy NLS

Table Detail	Short Desc	Description	Base_Mat	CI145
CQ	, A 106 Gr. A	, A 106 Grade A	CS	160
Y1	Demo Material Y1	Demo Material Y1		

- e. **Save** the changes
- f. Close the **"S.20.02 Tablenames with Details"** to return to **"S.30.01 Commodity Codes"** screen.
- g. Do not close the **"S.30.01 Commodity Codes"** screen

Lab 6. Review Commodity Rule

- Click on the **Fast Call** drop down to access **"S.10.01 Commodity Rule"** screen

FASTCALL

- A.50.04 Attribute Sets
- S.10.01 Commodity Rules**
- S.10.02 Commodity Group
- S.10.03 Commodity Part
- S.10.04 Object Parameter
- S.10.06 Part Object Parameter
- S.20.01 Tablenames with Groups

Group	Part	Commodity Code	Short Desc	Star
P	PP	PPABQBACQAAG	Pipe , B36.10M , BE , A 106 Gr. A , SMLS	

Type: Table Detail Based Rule: P_PIPE Object: P_1H1S_L

Attribute Set: Commodity Rule

DETAILS | Attributes | Symbols | Additional TAG Info | S2008 | Commodity Geometric Relations

Build One Commodity | Build Ident | Build CC for Part(s) | Build CC with Range | ☒ Check Double

Digit from to Tablename Group Detail Use

Digit	from	to	Tablename	Group	Detail	Use
4	4		P_SYSTEM	US	A	<input checked="" type="checkbox"/>
5	6		P_DIM_STD	PIP_US	BQ	<input checked="" type="checkbox"/>
7	8		P_END_PREP	PIPE	BE	<input checked="" type="checkbox"/>
9	9		P_MAT_SYSTEM	US	A	<input checked="" type="checkbox"/>
10	11		P_MATERIAL	PIPE_US	CQ	<input checked="" type="checkbox"/>
12	14		P_ALIAS	PIPE_US	AAG	<input checked="" type="checkbox"/>

T D DESCRIPTION | TG Description | Range

Short Desc	Description
, B36.10M	, ASME B36.10M
, BE	, Bevel End
, A 106 Gr. A	, A 106 Grade /
, SMLS	, Seamless

- The screen **"S.10.01 Commodity Rules"** will open in the query mode
- Type **P_PIPE** in the **Rule** field and **Run the Query**
- System will display the tables required to build the commodity code with this rule.

S.10.01 Commodity Rules

Commodity Rules

Rule	Short Desc	Description	Shrink CC ?	CC exists	Ctrl	Run
P_PIPE	Pipe	Pipe	<input type="checkbox"/>	<input checked="" type="checkbox"/>	1	0

COMMODITY ATTRIBUTES | Ident Attributes

ATTRIBUTES | Table Description

Tablename	Required	Short	Long	Multi Select	Spec Template	Option	Ctrl
P_ALIAS	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Project Only	1
P_DIM_STD	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Project Only	1
P_END_PREP	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Project Only	1
P_MATERIAL	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Project Only	1
P_MAT_SYSTEM	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Project Only	1
P_SYSTEM	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Project Only	1

- e. Click on the **Go To Next Block** Icon (big black arrow pointing right) twice to open the **"S.10.01 Commodity Rules: Window 2"** screen, which shows how the Commodity Code will be built based on table details.
- f. Click on the **Go To Next Block** Icon to open the **S.10.01 Commodity Rules: Window 3"** screen, which shows how the descriptions will be built from table details

S.10.01 Commodity Rules: Window 3

Commodity Rules

Rule	Short Desc	Description	Shrink CC ?	CC exists	Ctrl	Rev Begin
P_PIPE	Pipe	Pipe	<input type="checkbox"/>	<input checked="" type="checkbox"/>	1	02-OCT-2006

COMMODITY ATTRIBUTES

Tablename	Required
P_ALIAS	<input type="checkbox"/>
P_DIM_STD	<input checked="" type="checkbox"/>
P_END_PREP	<input checked="" type="checkbox"/>
P_MATERIAL	<input checked="" type="checkbox"/>
P_MAT_SYSTEM	<input checked="" type="checkbox"/>
P_SYSTEM	<input checked="" type="checkbox"/>
	<input type="checkbox"/>
	<input type="checkbox"/>
	<input type="checkbox"/>
	<input type="checkbox"/>
	<input type="checkbox"/>
	<input type="checkbox"/>
	<input type="checkbox"/>
	<input type="checkbox"/>
	<input type="checkbox"/>
	<input type="checkbox"/>

COMMODITY KEYS

Digit Id	Tablename	Ins Char	Ctrl	Rev Begin
1	M_COMMODITY_GROUPS		1	02-OCT-2006
2	M_PARTS		1	02-OCT-2006
3	M_PARTS		1	02-OCT-2006
4	P_SYSTEM		1	02-OCT-2006
5	P_DIM_STD		1	02-OCT-2006
6	P_DIM_STD		1	02-OCT-2006
7	P_END_PREP		1	02-OCT-2006
8	P_END_PREP		1	02-OCT-2006
9	P_MAT_SYSTEM		1	02-OCT-2006
10	P_MATERIAL		1	02-OCT-2006
11	P_MATERIAL		1	02-OCT-2006
12	P_ALIAS	Z	1	02-OCT-2006
13	P_ALIAS	Z	1	02-OCT-2006
14	P_ALIAS	Z	1	02-OCT-2006

Layout for Rule P_PIPE

Nls: 1 English Manual: ☒ Ctrl: 1 Rev Begin: 09-OCT-2006 Rev End: 01-JAN-3000

Layout Short

#m_parts_short##p_dim_std_short##p_end_prep_short##p_material_short##p_alias_short##

- g. Close the three **"S.10.01 Commodity Rule"** screens to return to the **"S.30.01 Commodity Codes"** screen

Lab 7. Copy an existing Commodity Code

Note: If multiple students are working on the same server, it is possible that you may encounter an error in this lab, in which case, please repeat the lab by selecting a different commodity code in step a, l, m and n respectively.

Note: If you do not find the specific commodity code in your installation, choose the closest Commodity Code.

- Click on the commodity code **PPPABQBEACQAAG** to place the cursor in the upper section
- Add a new row by clicking on the **New Record** (Green Plus sign) icon
- Duplicate the commodity code by pressing function key **F4**
- The new commodity code will read as **DUPL:PPPABQBEACQAAG**
- In the **Details** tab, navigate to the **P_MATERIAL** row and change the Material code to **Y<ID>** using **List of Values** (press **F9** for **LOV**)
- Save the changes

The screenshot shows the 'S.30.01 Commodity Codes' window. The 'CC PROPERTIES' tab is active, displaying a table with columns: Group, Part, Commodity Code, Short Desc, Standard, and Crea. The table contains two rows: one for 'PPPABQBEACQAAG' and another for 'DUPL:PPPABQBEACQAAG'. Below the table, there are fields for Type (Table Detail Based), Rule (P_PIPE), and Object (P_1M1S_L). The 'DETAILS' tab is also visible, showing a table with columns: Digit, from to, Tablename, Group, Detail, and Use. The table contains rows for various tables, including P_SYSTEM, P_DIM_STD, P_END_PREP, P_MAT_SYSTEM, P_MATERIAL, and P_ALIAS. The 'P_MATERIAL' row is highlighted, and the 'Detail' field is set to 'Y1'. The 'Build One Commodity' button is visible at the top of the 'DETAILS' tab.

- Click on the **Build One Commodity** button to create a new commodity code
- System will ask if you want to generate **Only CC** or **CC+Idents**
- Click on the **Only CC** button

k. System will assign a new Commodity Code **PPPABQBEAY<ID>AAG**

S.30.01 Commodity Codes

Group	Part	Commodity Code
P	PP	PPPABQBEACQAAG
P	PP	PPPABQBEAY1AAG

Type	Rule	Subject
Table Detail Based	P_PIPE	P_1N1S_L

Attribute Set Commodity Rule

☐

CC PROPERTIES | Group/Part Description | CC Description | CC Layout

Short Desc	Standard	Crea
Pipe , B36.10M , BE , A 106 Gr. A , SMLS		AK
Pipe , B36.10M , BE Demo Material Y1 , SMLS		RAJ

DETAILS | Attributes | Symbols | Additional TAG Info | S2008 | Commodity Geometric Relations

Build One Commodity Build Ident Build CC for Part(s) Build CC with Range ☒ Check Double

Digit All Only required tables(S.10.01)

from	To	Tablename	Group	Detail	Use
4	4	P_SYSTEM	US	A	<input checked="" type="checkbox"/>
5	6	P_DIM_STD	PIP_US	BQ	<input checked="" type="checkbox"/>
7	8	P_END_PREP	PIPE	BE	<input checked="" type="checkbox"/>
9	9	P_MAT_SYSTEM	US	A	<input checked="" type="checkbox"/>
10	11	P_MATERIAL	PIPE_US	Y1	<input checked="" type="checkbox"/>
12	14	P_ALIAS	PIPE_US	AAG	<input checked="" type="checkbox"/>

T D DESCRIPTION	TG Description	Range
Short Desc	Description	
, B36.10M	, ASME B36.10M	
, BE	, Bevel End	
Demo Material Y1	Demo Material	
, SMLS	, Seamless	

I. Similarly build a flange from **FSWABLDRFACGZZZ**

S.30.01 Commodity Codes			CC PROPERTIES		Group/Part Description	CC Description	CC Layout
Group	Part	Commodity Code	Short Desc		Standard		
F	SW	FSWABLDRFACGZZZ	SW Fig. , B16.5 , CL150 , RF , A105/A105H				
F	SW	FSWABLDRFAY1ZZZ	SW Fig. , B16.5 , CL150 , RF Demo Material Y1				
Type: Table Detail Based Rule: P_FLANGE Object: P_1H1S_E			<input type="checkbox"/>				
Attribute Set			Commodity Rule				

DETAILS	Attributes	Symbols	Additional TAG Info	S2008	Commodity Geometric Relations			
<input type="button" value="Build One Commodity"/> <input type="button" value="Build Ident"/> <input type="button" value="Build CC for Part(s)"/> <input type="button" value="Build CC with Range"/>		<input checked="" type="checkbox"/> Check Double						
Digit: <input checked="" type="radio"/> All <input type="radio"/> Only required tables(S.10.01)								
from	to	Tablename	Group	Detail	Use	TD DESCRIPTION	TG Description	Range
4	4	P_SYSTEM	US	A	<input checked="" type="checkbox"/>	Short Desc		
5	6	P_DIM_STD	FLG_US	BL	<input checked="" type="checkbox"/>	, B16.5		
7	7	P_RATING	RAT_US	D	<input checked="" type="checkbox"/>	, CL150		
8	9	P_END_PREP	FLANGE	RF	<input checked="" type="checkbox"/>	, RF		
10	10	P_MAT_SYSTEM	US	A	<input checked="" type="checkbox"/>			
11	12	P_MATERIAL	FORG_US	Y1	<input checked="" type="checkbox"/>	Demo Material Y1		
					<input type="checkbox"/>			

m. Similarly build a gasket from **GSWAB7DFFABBZZZ**

S.30.01 Commodity Codes			CC PROPERTIES			
Group	Part	Commodity Code	Group/Part Description	CC Description	CC Layout	
G	SW	GSWAB7DFFABBZZZ	Short Desc	Standard	Crea	
G	SW	GSWAB7DFFAY1ZZZ	Sp. Wound Gskt , B16.21 , CL150 , FF , 304 SS, graphite Fill, CS CR		AK	
			Sp. Wound Gskt , B16.21 , CL150 , FF Demo Material Y1		RAJI	

Type	Rule	Object
Table Detail Based	P_FLANGE	P_1N1T_E

Attribute Set: Commodity Rule ☐

DETAILS	Attributes	Symbols	Additional TAG Info	S2008	Commodity Geometric Relations																																										
<div style="display: flex; justify-content: space-between; align-items: center;"> <div>Build One Commodity</div> <div>Build Ident</div> <div>Build CC for Part(s)</div> <div>Build CC with Range</div> <div><input checked="" type="checkbox"/> Check Double</div> </div>																																															
<div style="display: flex; justify-content: space-between; align-items: center;"> <div> <p>Digit</p> <table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th>from</th> <th>to</th> <th>Tablename</th> <th>Group</th> <th>Detail</th> <th>Use</th> </tr> </thead> <tbody> <tr><td>4</td><td>4</td><td>P_SYSTEM</td><td>US</td><td>A</td><td><input checked="" type="checkbox"/></td></tr> <tr><td>5</td><td>6</td><td>P_DIM_STD</td><td>GSK_US</td><td>B7</td><td><input checked="" type="checkbox"/></td></tr> <tr><td>7</td><td>7</td><td>P_RATING</td><td>RAT_US</td><td>D</td><td><input checked="" type="checkbox"/></td></tr> <tr><td>8</td><td>9</td><td>P_END_PREP</td><td>GSKT</td><td>FF</td><td><input checked="" type="checkbox"/></td></tr> <tr><td>10</td><td>10</td><td>P_MAT_SYSTEM</td><td>US</td><td>A</td><td><input checked="" type="checkbox"/></td></tr> <tr><td>11</td><td>12</td><td>P_MATERIAL</td><td>GSK_US</td><td>Y1</td><td><input checked="" type="checkbox"/></td></tr> </tbody> </table> </div> <div> <p><input checked="" type="radio"/> All <input type="radio"/> Only required tables(S.10.01)</p> </div> </div>						from	to	Tablename	Group	Detail	Use	4	4	P_SYSTEM	US	A	<input checked="" type="checkbox"/>	5	6	P_DIM_STD	GSK_US	B7	<input checked="" type="checkbox"/>	7	7	P_RATING	RAT_US	D	<input checked="" type="checkbox"/>	8	9	P_END_PREP	GSKT	FF	<input checked="" type="checkbox"/>	10	10	P_MAT_SYSTEM	US	A	<input checked="" type="checkbox"/>	11	12	P_MATERIAL	GSK_US	Y1	<input checked="" type="checkbox"/>
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10	10	P_MAT_SYSTEM	US	A	<input checked="" type="checkbox"/>																																										
11	12	P_MATERIAL	GSK_US	Y1	<input checked="" type="checkbox"/>																																										
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, CL150	, Class 150																																														
, FF	, Flat Face																																														
Demo Material Y1	Y1																																														

n. Similarly build a ball valve from **VBMAAXMSWACDACAZZZ**

S.30.01 Commodity Codes

Group	Part	Commodity Code	CC PROPERTIES	Group/Part Description	CC Description	CC Layout
VB	M	VBMAAXMSWACADACAZ	Short Desc	Ball Vlv LP RB , Manf. Std. , CL800 , SWE , One or Two piece Trun. Mount. I	Standard	AK
VB	M	VBMAAXMSWACAY1ACAZ	Short Desc	Ball Vlv LP RB , Manf. Std. , CL800 , SWE , One or Two piece Trun. Mount. I	Standard	RAJ

Type: Table Detail Based Rule: P_VLV_W_OP Object: P_1H_E

Attribute Set: Commodity Rule

DETAILS Attributes Symbols Additional TAG Info S2008 Commodity Geometric Relations

Build One Commodity Build Ident Build CC for Part(s) Build CC with Range ☒ Check Double

Digit from to All Only required tables(S.10.01)

Digit	from	to	Tablename	Group	Detail	Use	TD DESCRIPTION	TG Description	Range
4	4	4	P_SYSTEM	US	A	<input checked="" type="checkbox"/>	Short Desc		Description
5	6	6	P_DIM_STD	VB_US	AX	<input checked="" type="checkbox"/>	, Manf. Std.		, Manufacture
7	7	7	P_RATING	RAT_US	M	<input checked="" type="checkbox"/>	, CL800		, Class 800
8	9	9	P_END_PREP	VALVE	SW	<input checked="" type="checkbox"/>	, SWE		, Socket Weld
10	10	10	P_VLV_BODY_TYPE	VB_ALL	A	<input checked="" type="checkbox"/>	, One or Two piece Trun. Mount. ball		, One or Two p
11	11	11	P_VLV_OPERATOR	ALL	C	<input checked="" type="checkbox"/>	, Lever Operator		, Lever Operat
12	12	12	P_MAT_SYSTEM	US	A	<input checked="" type="checkbox"/>			
13	14	14	P_MATERIAL	CAST_US	Y1	<input checked="" type="checkbox"/>	Demo Material Y1		Y1
15	17	17	P_ALIAS_TRIM	VB_US	ACA	<input checked="" type="checkbox"/>	, AISI 316 SS Trim , RPTFE Seat		, AISI 316 SS Tr

Lab 8. View Table Types

- Navigate to A.50.02 and Run a query for **COMMODITY CODE TABLES**

A.50.02 Tables

Table Types

Description: COMMODITY CODE TABLES Type: COMMATTR

Table Names

Name	Short Desc	Description	Ident NLS
PS_BOLT_COATING	Bolt Coating	Bolt Coating	<input type="checkbox"/>
PS_BOLT_DIAMETER	Bolt Diameter	Bolt Diameter	<input type="checkbox"/>
PS_BOLT_LENGTH	Bolt Length	Bolt Length	<input type="checkbox"/>
PS_BOLT_SET_QTY	Bolt Set Quantity	Bolt Set Quantity	<input type="checkbox"/>
PS_ENDPREP	End Preparation	End Preparation	<input type="checkbox"/>
PS_FLFCE_SURF_FIN	FlangeFaceSurfaceFin	FlangeFaceSurfaceFinish	<input type="checkbox"/>

- View the various tables in the second block, **Table Names**.

Lab 9. Query Table Name

- In the Second block, **Table Names**, run a query (F7) for **P_END%**.
- View the two tables queried.

The screenshot shows the 'A.50.02 Tables' window. The 'Table Types' section has a 'Description' field containing 'COMMODITY CODE TABLES' and a 'Type' dropdown menu set to 'COMMATTR'. The 'Table Names' section displays a table with the following data:

Name	Short Desc	Description	Ident NLS
P_END_PREP	End Prep. Codes	End Preparation Codes	<input type="checkbox"/>
P_END_STD	End Standard Codes	End Standard Codes	<input type="checkbox"/>
			<input type="checkbox"/>
			<input type="checkbox"/>
			<input type="checkbox"/>

- Close all the screens

Lab 10. Extending the SDB - Build a custom Commodity Rule

- Launch **"S.10.01 Commodity Rules"**
- Ensure you are in the **Data Entry** mode (Rule field will have a green background) and not the **Query Mode**. (Click the **Blue Question mark** with a **Red X** icon to change from **Query** mode to **Data Entry** mode)
- Enter a Rule code of **XX_RULE_<Init>** and Description (**Demo Rule <Init>**).
- Save the changes

Rule	Short Desc	Description	Shrink CC ?	CC exists	Ctrl
XX_RULE_RC	Demo rule RC	Demo rule RC	<input type="checkbox"/>	<input type="checkbox"/>	1

COMMODITY ATTRIBUTES		Ident Attributes	
Tablename	Required	Short	Long
P_ALIAS	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
P_MATERIAL	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
P_MAT_SYSTEM	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
P_DIM_STD	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
P_END_PREP	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

- Add the table **P_ALIAS** in the **Commodity Attributes** tab as **Not Required** by clicking on a blank row and pressing Function Key **F9** to select **P_ALIAS** from **LOV** for the **Tablename**.
- Similarly add the tables **P_MATERIAL**, **P_MAT_SYSTEM**, **P_DIM_STD**, **P_END_PREP** in the **Commodity Attributes** tab but mark them as **Required**.
- Save the changes

S.10.01 Commodity Rules

Commodity Rules

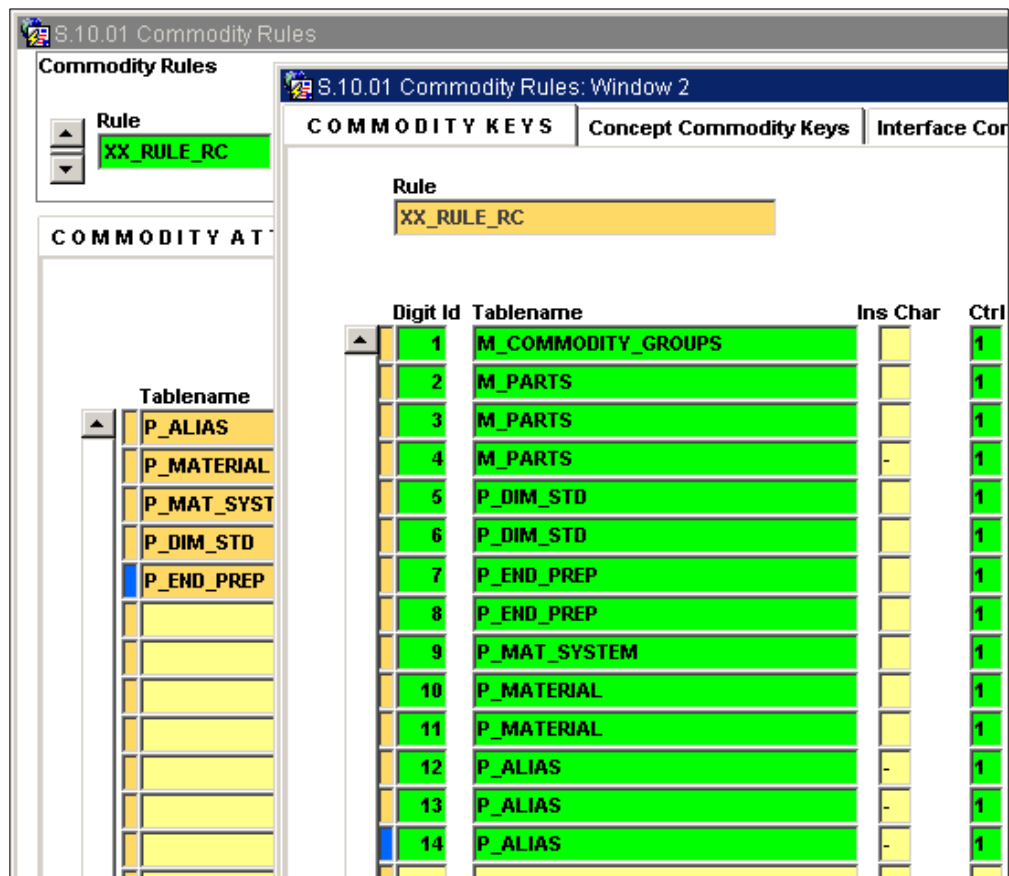
Rule	Short Desc	Description	Shrink CC ?	CC exists	Ctrl
XX_RULE_RC	Demo rule RC	Demo rule RC	<input type="checkbox"/>	<input type="checkbox"/>	1

COMMODITY ATTRIBUTES

Ident Attributes

Table Name	Required	Short	Long	Multi Select	Spec Template	Option	Ctrl
P_ALIAS	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Project Only	1
P_MATERIAL	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Project Only	1
P_MAT_SYSTEM	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Project Only	1
P_DIM_STD	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Project Only	1
P_END_PREP	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Project Only	1
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		

- h. Click on the **Go To Next Block** Icon to view **"S.10.01 Commodity Rules: Window 2"**.
- i. Enter the sequence in which the table codes will be concatenated to build the commodity code as follows
 1. M_COMMODITY_GROUPS
 2. M_PARTS
 3. M_PARTS
 4. M_PARTS (Ins Char: -)
 5. P_DIM_STD
 6. P_DIM_STD
 7. P_END_PREP
 8. P_END_PREP
 9. P_MAT_SYSTEM
 10. P_MATERIAL
 11. P_MATERIAL
 12. P_ALIAS (Ins Char: Z)
 13. P_ALIAS (Ins Char: Z)
 14. P_ALIAS (Ins Char: Z)
- j. Save the changes



- k. Click on the **Go To Next Block** Icon to view **"S.10.01 Commodity Rules: Window 3"**.
- l. View the default **Short** and **Long Layout** that will be used to generate the commodity description. Place a **comma** between each of the codes.

S.10.01 Commodity Rules: Window 3

Layout for Rule **XX_RULE_RC**

Nls **1** **English** ☒ Manual **1** Ctrl **1** Rev B **20-JA**

Layout Short

```
#m_commodity_code#,  
#m_commodity_groups_short#,  
#m_parts_short#,  
#p_alias_short#,  
#p_material_short#,  
..
```

Layout Long

```
#m_commodity_code#,  
#m_commodity_groups_long#,  
#m_parts_long#,  
#p_alias_long#,  
#p_material_long#,  
#p_mat_system_long#,  
#p_dim_std_long#,  
#p_end_prep_long#
```

- m. Save the changes
- n. Close all the screens.

Lab 11. Extending the SDB - Build a new Commodity Group

- Launch **"S.10.02 Commodity Group"**
- Ensure you are in the **Data Entry** mode and not the **Query Mode**
- Enter a Group Code **XX_GRP_<Init>** with description of **Demo Group XX <Init>**.

Group	Rule	Standard	Short Desc	Description
XX_GRP_RC			Demo Group XX RC	Demo Group XX RC

- Leave the **Rule** and the **Standard** field blank.
- Save the changes
- Close all the screens

Lab 12. Extending the SDB - Build a new Commodity Part

- Launch **"S.10.03 Commodity Part"**
- Ensure you are in the **Query Mode** and not the **Data Entry** mode
- In the upper section, type **XX_GRP_<Init>** in the Group Code and **Run the Query**
- In the bottom section, add a new Part **XX_PART_<Init>** with description **Demo Part XX <Init>**
- Select the **Rule XX_RULE_<Init>** created in previous lab via the **LOV (F9)**.
- Leave the **Standard** field blank. Ensure that the **Kind of Part** is set to **Variable**
- From the List of Values for **SP3D Part Class** select **PipeStock**. This will ensure that all the piping commodity codes created for this part will be exported in the PipeStock sheet in the SP3D Catalog workbooks.

The screenshot shows the 'S.10.03 Commodity Part' window. The 'Commodity Groups' section has a table with columns: Group, Short Desc, and Description. The 'Commodity Parts' section has tabs for TAG Desc Rules, Update Part CCs, SP3D Short Code, Part Symbols, and Special Attributes. The 'TAG Desc Rules' tab is active, showing a table with columns: Part, Rule, TAG Desc Rule, Standard, Short Desc, and Description. The 'Part' column has a dropdown menu with 'XX_PART_RC' selected. The 'Rule' column has a dropdown menu with 'XX_RULE_RC' selected. The 'Standard' column is blank. The 'Short Desc' column has 'Demo Part RC'. The 'Description' column has 'Demo Part RC'. To the right of the table, there are two dropdown menus: 'Kind of Part' with 'Variable' selected, and 'SP3D PartClass' with 'Group in PipeStock' selected.

Group	Short Desc	Description
XX_GRP_RC	Demo Group XX RC	Demo Group XX RC

Part	Rule	TAG Desc Rule	Standard	Short Desc	Description
XX_PART_RC	XX_RULE_RC			Demo Part RC	Demo Part RC

Kind of Part	SP3D PartClass
Variable	Group in PipeStock

- Save the changes
- Close all the screens.

Lab 13. Build a new Commodity Code

- Launch **"S.30.01 Commodity Codes"**
- Ensure you are in the **Data Entry** mode and not the **Query Mode**
- Set the **Group XX_GRP_<Init>** and **Part XX_PART_<Init>** from LOV (F9)
- Save the changes
- The system will assign a dummy commodity code **CC1234567**, Rule **XX_RULE_<Init>** and show the required tables in the **Details** tab based on the rule

S.30.01 Commodity Codes

Group	Part	Commodity Code
XX_GRP_RC	XX_PART_RC	CC79643

Type: Table Detail Based Rule: XX_RULE_RC Object:
 Attribute Set: Commodity Rule: ☐

CC PROPERTIES | **Group**

Short Desc

DETAILS | **Attributes** | **Symbols** | **Additional TAG Info**

Build One Commodity Build Ident Build CC for Part

Digit from /to Tablename Group Detail Use Short Desc

Digit	from	to	Tablename	Group	Detail	Use	Short Desc
5	6		P_DIM_STD			<input checked="" type="checkbox"/>	
7	8		P_END_PREP			<input checked="" type="checkbox"/>	
9	9		P_MAT_SYSTEM			<input checked="" type="checkbox"/>	
10	11		P_MATERIAL			<input checked="" type="checkbox"/>	
						<input type="checkbox"/>	

- In the **Details** tab click on the **Group** field and select the codes as shown below for each of the tables.
- Click on the **Digit From** field of the first blank row in the **Details** tab and select the **P_ALIAS** table from the LOV.
- Click on the **Group** field and select the group **PIPE_US** code **AAG** for **P_ALIAS** as shown below
- Save the changes

S.30.01 Commodity Codes

Group	Part	Commodity Code
XX_GRP_RC	XX_PART_RC	CC79643

Type: Table Detail Based Rule: XX_RULE_RC Object:
 Attribute Set:
 Commodity Rule: ☐

CC PROPERTIES

Group/Part Description	CC Description	CC Layout
Short Desc	Standard	Crea

DETAILS | Attributes | Symbols | Additional TAG Info | S2008 | Commodity Geometric Relations

Build One Commodity | Build Ident | Build CC for Part(s) | Build CC with Range | ☒ Check Double

Digit from to Table name Group Detail Use

Digit	from	to	Table name	Group	Detail	Use
5	6		P_DIM_STD	PIP_US	BR	<input checked="" type="checkbox"/>
7	8		P_END_PREP	PIPE	PE	<input checked="" type="checkbox"/>
9	9		P_MAT_SYSTEM	US	A	<input checked="" type="checkbox"/>
10	11		P_MATERIAL	PIPE_US	Y1	<input checked="" type="checkbox"/>
12	14		P_ALIAS	PIPE_US	AAG	<input checked="" type="checkbox"/>

T D DESCRIPTION | TG Description | Range

Short Desc	Description
, B36.19M	, ASME B36.19M
, PE	, Plain End
Demo Material Y1	Demo Material
, SMLS	, Seamless

- j. Click on the **Build One Commodity** button to create a new commodity code. System will ask if you want to generate **Only CC** or **CC+Idents**. Click on the **Only CC** button
- k. Verify that the system assigns the following commodity code **XXX_BRPEAY<ID>AAG**

S.30.01 Commodity Codes

Group	Part	Commodity Code
P	PP	PPPABQBEACQAAG
XX_GRP_RC	XX_PART_RC	XXX_BRPEAY1AAG

Type: Table Detail Based Rule: XX_RULE_RC Object:
 Attribute Set:
 Commodity Rule: ☐

CC PROPERTIES

Group/Part Description	CC Description	CC Layout
Short Desc	Standard	Crea

DETAILS | Attributes | Symbols | Additional TAG Info | S2008 | Commodity Geometric Relations

Build One Commodity | Build Ident | Build CC for Part(s) | Build CC with Range | ☒ Check Double

Digit from to Table name Group Detail Use

Digit	from	to	Table name	Group	Detail	Use
5	6		P_DIM_STD	PIP_US	BR	<input checked="" type="checkbox"/>
7	8		P_END_PREP	PIPE	PE	<input checked="" type="checkbox"/>
9	9		P_MAT_SYSTEM	US	A	<input checked="" type="checkbox"/>
10	11		P_MATERIAL	PIPE_US	Y1	<input checked="" type="checkbox"/>
12	14		P_ALIAS	PIPE_US	AAG	<input checked="" type="checkbox"/>

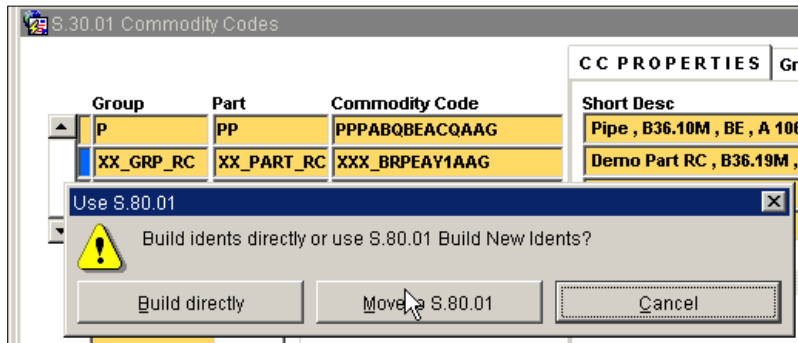
T D DESCRIPTION | TG Description | Range

Short Desc	Description
, B36.19M	, ASME B36.19M
, PE	, Plain End
Demo Material Y1	Demo Material
, SMLS	, Seamless

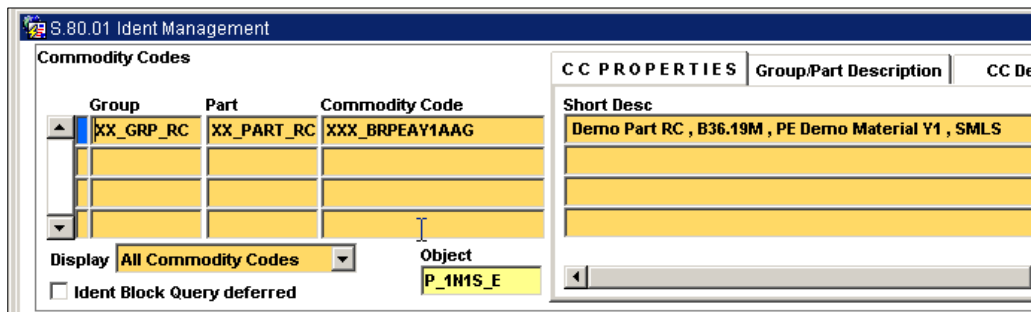
- l. Close all the screens

Lab 14. Build Idents using existing Geometrics

- d. Launch **"S.30.01 Commodity Codes"** Screen
- e. Search for commodity code **XXX_BRPEAY<ID>AAG** and click the **Build Ident** button



- f. From the prompted dialog, click on the **Move to S.80.01** screen button.
 - i. FYI: Alternatively you could have launched **"S.80.01 Ident Management"** screen and searched for the Commodity Code **XXX_BRPEAY<ID>AAG**.
- g. From the List of Values select **P_1N1S_E** for the **Object** field and save the changes



- h. Click on the **Object Parameter** tab to view the attributes needed to fully qualify the CC to build Idents. These attributes are associated with the **Object P_1N1S_E**.

No.	Input?	Name	Ident ?	Opt ?	Attr Name	Unit	Kind of Detail	Short Des
1	<input checked="" type="checkbox"/>	NPS	<input checked="" type="checkbox"/>	<input type="checkbox"/>	NPS1	in	1. Nominal Size	NPS 1
2	<input checked="" type="checkbox"/>	SCH	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	SCH1	-	1. Schedule	SCH 1

- Click on the **Commodity Geometric Relations** tab
- Add a new relation by selecting the **Geometric** table **P_BI_1NPS_1SCH** (via LOV) with **From** and **To** range of **.5** to **24**. Also check the **Ident?** Checkbox.
- Save the changes
- System will display all the Size / Schedule combinations associated with the **Geometric P_BI_1NPS_1SCH** in the **Geom Details** section of the **Only New Idents** tab.

Unit System	NPS1	SCH1	Unused	Unused	Unused	Unused
IMP/MET	.5	S-10	0	0	0	
IMP/MET	.5	S-10S	0	0	0	
IMP/MET	.5	S-160	0	0	0	
IMP/MET	.5	S-30	0	0	0	
IMP/MET	.5	S-40	0	0	0	

- i. FYI: In the **Commodity Geometric Relations** tab, if the **Idents?** Is checked then the relationship will be used to build idents. Other relationships can be defined to specify unit weight, surface area and physical dimensions such as Face to Face, Face to Center etc. required by Designing and Modeling tools such as SP3D, PDS, PDMS. Do not check the **Idents?** for these relationships.
- i. FYI: There are the four types of Geometric Tables i.e. **Commodity Geometrics** (to build Idents), **Standard Geometrics** (dimensions as per Standards), **Other Geometrics** (Non Commodity or Standards related geometric i.e. Gasket thickness) and **Filter Geometrics** (to limit valid idents for Specs).
- ii. FYI: Multiple relationships can be defined for the Commodity Group / Part by qualifying it with filters based on sizes and table details.
- m. Let us assume that for this pipe we use only the Extra Strong Schedule. To limit the idents to those sizes associated with schedule S-XS, press **F7** to enter **Query Mode**. Type **S-XS** in **Sch1** field and **Run the Query**.

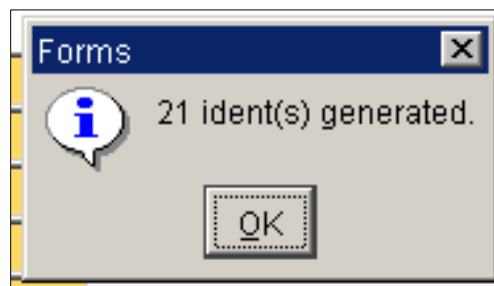
Group	Part	Commodity Code	Short Desc
XX_GRP_RC	XX_PART_RC	XXX_BRPEAY1AAG	Demo Part RC

Display: All Commodity Codes Object: P_1M1S_E

☐ Ident Block Query deferred

Unit System	Nps1	Sch1	Ident Code
IMP/MET	.5	S-XS	
IMP/MET	.75	S-XS	
IMP/MET	1	S-XS	
IMP/MET	1.25	S-XS	
IMP/MET	1.5	S-XS	
IMP/MET	2	S-XS	
IMP/MET	2.5	S-XS	
IMP/MET	3	S-XS	
IMP/MET	3.5	S-XS	

- n. Click on the **Build Queried Idents** to build idents with schedule **S-XS**. System will display the number of Idents created.



- o. Click on the **Existing Idents** tab to review the idents that have been created.
- p. Let us assume that for this pipe, the sizes .75", 1.25", 2.5" and 3.5" are not valid. **Click** on any field in these rows and press the **Delete** icon to delete the idents associated with sizes **.75, 1.25, 2.5 and 3.5**

S.80.01 Ident Management

Commodity Codes

Group	Part	Commodity Code
XX_GRP_RC	XX_PART_RC	XXX_BRPEAY1AAG

Display **All Commodity Codes** Object **P_1H1S_ET**

☐ Ident Block Query deferred

CC PROPERTIES Group/Part Description CC Desc

Short Desc
Demo Part RC , B36.19M , PE Demo Material Y1 , SMLS

Only new Idents EXISTING IDENT S Commodity Geometric Relations Object Para

Delete Idents Ident Structure Invalid Idents Inter

Ident	Ident Code	Unit System	Ctrl	Project/PG	Nps1	Sch1
3675225	I3675225	IMP/MET	1	SDB	.5	S-XS
3675227	I3675227	IMP/MET	1	SDB	1	S-XS
3675229	I3675229	IMP/MET	1	SDB	1.5	S-XS
3675235	I3675235	IMP/MET	1	SDB	2	S-XS
3675240	I3675240	IMP/MET	1	SDB	3	S-XS
3675242	I3675242	IMP/MET	1	SDB	4	S-XS
3675243	I3675243	IMP/MET	1	SDB	5	S-XS
3675244	I3675244	IMP/MET	1	SDB	6	S-XS
3675245	I3675245	IMP/MET	1	SDB	8	S-XS
3675230	I3675230	IMP/MET	1	SDB	10	S-XS
3675231	I3675231	IMP/MET	1	SDB	12	S-XS

Ident Layout

4" x S-XS XXX_BRPEAY1AAG,
Demo Group XX RC,

- i. FYI: Every **Ident** is assigned a unique no. (**Ident** field). Additionally the system assigns an **Ident Code** (default is **Ident no** with a prefix of **I**). Rules can be defined to build ident codes as per user requirement.
- q. Close all the screens

Lab 15. Extending the SDB – Build a new Commodity Geometric Table

- Launch **“S.40.12 Commodity Geometrics”** screen to create a new Commodity Geometric table.
- Ensure you are in the **Data Entry** mode and not the **Query Mode**
- Type **X<Init>_BI_1NPS_1SCH** in the **Geometric** field and select **Tablename** of **P_BI_1NPS_1SCH** from **LOV**.
- Type in a **Description** of **1NPS 1SCH** and select **Standard** of **US** from **LOV**.

Geometric	Tablename	Short Desc	Description
X_RC_BI_1NPS_1SCH	P_BI_1NPS_1SCH	1NPS 1SCH	1NPS 1SCH

- Save the changes
- Double Click on the **Tablename P_BI_1NPS_1SCH** to view the attributes associated with it. Note that the table **P_BI_1NPS_1SCH** has two input fields **NPS1** and **SCH1**, which means that our Geometric table will consist of size and schedule.

Table Type	Table Type Description	Tablename
GEOM_S4012	Commodity Geometrics	P_BI_1NPS_1SCH

Attr Name	Data Type	Form Width	Precision	Physical Attribute	Kind Of Attribute	Unit
NPS1	NUMBER	8	3	GD.IN1	1. Nominal Size	in
SCH1	CHAR	8	0	GD.IN2	1. Schedule	-
P_NULL	CHAR	7	0	GD.OUT15	Others	-

- Close the **“A.50.03 Tables/Attributes”** screen to return to **“S.40.12 Commodity Geometrics”**
- Click on the **Go To Next Block** Icon to move to **“S.40.12 Commodity Geometrics: Window 2”** to enter the valid size / schedule combinations.

- i. Enter Size / Schedule combinations as shown below and save the changes

S.40.12 Commodity Geometrics: Window 2

Geometric Table Definition

Calc Geom Geometric Short Desc
 Apply Calculation X_RC_BI_1NPS_1SC 1NPS 1SCH

Geom Details

Copy Geom

Unit System	NPS1	SCH1	P_NULL	Ctrl
IMP/MET	1	S-XS		1
IMP/MET	2	S-XS		1
IMP/MET	3	S-XS		1
IMP/MET	4	S-XS		1
IMP/MET	6	S-XS		1

- j. Close all the screens

Lab 16. Building Idents using the new Geometric Table

- a. Build a new Commodity Code
 - i. Launch **"S.30.01 Commodity Codes"**
 - ii. Ensure you are in the **Data Entry** mode and not the **Query Mode**
 - iii. Set the **Group XX_GRP_<Init>** and **Part XX_PART_<Init>** from **LOV (F9)**
 - iv. Save the changes
 - v. The system will assign a dummy **commodity code CC1234567**, Rule **XX_RULE_<Init>** and required tables in the **Details** tab.

- vi. In the **Details** tab click on the **Group** field and select the codes as shown below for each of the tables.

Tablename	Group	Detail	Short Desc
P_DIM_STD	PIP_US	BR	, B36.19M
P_END_PREP	PIPE	BE	, BE
P_MAT_SYSTEM	US	A	
P_MATERIAL	PIPE_US	Y<ID>	Demo Material <ID>

- vii. Click on the **Digit From** field of the first blank row in the **Details** tab and select the **P_ALIAS** table from the **LOV**.
- viii. Click on the **Group** field and select the code **AAG** as shown below
- ix. Save the changes
- x. Click on the **Build One Commodity** button to create a new commodity code. System will ask if you want to generate **Only CC** or **CC+Idents**. Click on the **Only CC** button

- xi. Verify that the system assigns the commodity code **XXX_BRBEAY<ID>AAG**.
 - i. FYI: Note that the system assigned the **Object P_1N1S_E** based on the first commodity code we created for **Group XX_GRP_<Init>** and **Part XX_PART_<Init>**

Group	Part	Commodity Code	Short Desc	Standard	Crea
XX_GRP_RC	XX_PART_RC	XXX_BRBEAY1AAG	Demo Part RC , B36.19M , BE Demo Material Y1 , SMLS		RAJI

Type	Rule	Object
Table Detail Based	XX_RULE_RC	P_1N1S_E

Digit	from	to	Tablename	Group	Detail	Use
5	6		P_DIM_STD	PIP_US	BR	<input checked="" type="checkbox"/>
7	8		P_END_PREP	PIPE	BE	<input checked="" type="checkbox"/>
9	9		P_MAT_SYSTEM	US	A	<input checked="" type="checkbox"/>
10	11		P_MATERIAL	PIPE_US	Y1	<input checked="" type="checkbox"/>
12	14		P_ALIAS	PIPE_US	AAG	<input checked="" type="checkbox"/>

TD DESCRIPTION	TG Description	Range
Short Desc		Description
, B36.19M		, ASME B36.19M
, BE		, Bevel End
Demo Material Y1		Demo Material
, SMLS		, Seamless

b. Build Idents using the new Geometric Table

- i. Click on the **Build Ident** button

Group	Part	Commodity Code	Short Desc
P	PP	PPPABQBEACQAAG	Pipe , B36.10M , BE , A 106
XX_GRP_RC	XX_PART_RC	XXX_BRPEAY1AAG	Demo Part RC , B36.19M , F

Use S.80.01

Build idents directly or use S.80.01 Build New Idents?

Build directly Move to S.80.01 Cancel

- ii. From the prompted dialog, click on the **Move to S.80.01** screen button.
- iii. Click on the **Object Parameter** tab to view the attributes needed to fully qualify the CC to build Idents.

S.80.01 Ident Management

Commodity Codes

Group	Part	Commodity Code
XX_GRP_RC	XX_PART_RC	XXX_BRBEAY1AAG

Display **All Commodity Codes** ☐ Ident Block Query deferred

Object **P_1N1S_E**

CC PROPERTIES | Group/Part Description | CC Description

Short Desc
Demo Part RC , B36.19M , BE Demo Material Y1 , SMLS

Only new Idents | Existing Idents | Commodity Geometric Relations | OBJECT PARAM

Parameter Details

No.	Input?	Name	Ident ?	Opt?	Attr Name	Unit	Kind of Detail	Short De
1	<input checked="" type="checkbox"/>	NPS	<input checked="" type="checkbox"/>	<input type="checkbox"/>	NPS1	in	1. Nominal Size	NPS 1
2	<input checked="" type="checkbox"/>	SCH	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	SCH1	-	1. Schedule	SCH 1

- iv. Click on the **Commodity Geometric Relations** tab
- v. Add a new relation by selecting the **Geometric** table **X_<Init>_BI_1NPS_1SCH** (via **LOV**) with **From** and **To** range of **.5** to **24**. Also check the **Ident?** checkbox and save the changes
- vi. System will display all the Size / Schedule values associated with the **Geometric P_BI_1NPS_1SCH** in the **Geom Details** section.

S.80.01 Ident Management

Commodity Codes

Group	Part	Commodity Code
XX_GRP_RC	XX_PART_RC	XXX_BRBEAY1AAG

Display **All Commodity Codes** ☐ Ident Block Query deferred

Object **P_1N1S_E**

CC PROPERTIES | Group/Part D

Short Desc
Demo Part RC , B36.19M , BE Demo

Only new Idents | Existing Idents | **COMMODITY GEOMETRIC RELATIONS** | Object

Date/Time created **22-JAN-2009 14:09:31** ☒ Ident?

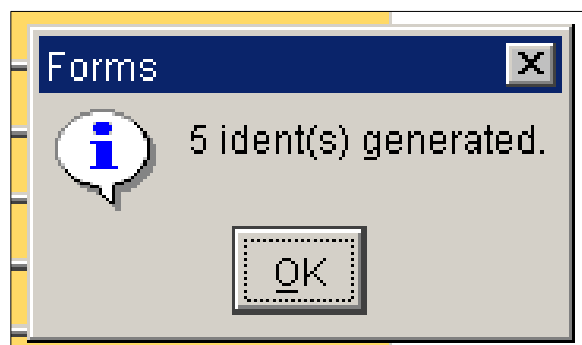
Geometric **X_RC_BI_1NPS_1SC** Project/PG **SDB** From **.5** To **24**

Show reasons

Geom Details

Unit System	NPS1	SCH1	Unused	Unused	Unused	Unused
IMP/MET	1	S-XS	0	0	0	
IMP/MET	2	S-XS	0	0	0	
IMP/MET	3	S-XS	0	0	0	
IMP/MET	4	S-XS	0	0	0	
IMP/MET	6	S-XS	0	0	0	

- vii. Click on the **Only New Idents** tab to see which idents can be created.
- viii. Click on the **Build All Idents**. System will create the 5 idents.



- ix. Click on the **Existing Idents** tab to review the new idents

S.80.01 Ident Management

Commodity Codes

Group	Part	Commodity Code
XX_GRP_RC	XX_PART_RC	XXX_BRBEAY1AAG

Display: **All Commodity Codes** ☐ Ident Block Query deferred

Object: **P_1N1S_E**

CC PROPERTIES | Group/Part Description | CC Des

Short Desc: Demo Part RC , B36.19M , BE Demo Material Y1 , SMLS

Only new Idents | **EXISTING IDENT S** | Commodity Geometric Relations | Object Par

Delete Idents | **Ident Structure** | **Invalid Idents** | **Inte**

Ident	Ident Code	Unit System	Ctrl	Project/PG	Nps1	Sch1
3675246	I3675246	IMP/MET	1	SDB	1	S-XS
3675247	I3675247	IMP/MET	1	SDB	2	S-XS
3675248	I3675248	IMP/MET	1	SDB	3	S-XS
3675249	I3675249	IMP/MET	1	SDB	4	S-XS
3675250	I3675250	IMP/MET	1	SDB	6	S-XS

- l. FYI: Every **Ident** is assigned a unique no. (**Ident** field). Additionally the system assigns an **Ident Code** (default is **Ident no** with a prefix of **I**). Rules can be defined to build ident codes as per user requirement.
- c. Close all the screens

Lab 17. Extending the SDB – Build a new Geometric Rule

- Launch **"S.40.21 Geometric Rules"** to create a new Geometric Rule
- Ensure you are in the **Data Entry** mode and not the **Query Mode**
- Type **XX_<Init>** as the **Rule** name and set **Def. Formula** to **P_DUMMY**
- Type in a **Short Comment** of **Demo Rule** and **Comment** of **Demo Group Part Rule**

Rule	Def. Formula	Short Comment	Comment
XX_RC	P_DUMMY	Demo Rule	Demo Group Part Rule

- Save the changes
- Click on the **Geometric Rule Definition** section and create new definition as follows

Field	Value
No.	1
Group	XX_GRP_<Init>
Part	XX_PART_<Init>
Geometric	X_<Init>_BI_1NPS_1SCH
Formula	P_DUMMY
Ident	Check
Input 1 From	1
Input 1 To	24

- Click on the **Used Tables and Groups** section to limit the definition to the Demo Material Y<ID> as follows

Field	Value
No.	1
Tablename	P_MATERIAL
Table Group	PIPE_US
Table Detail	Y<ID>

S.40.21 Geometric Rules

Geometric Rule

Rule	Def. Formula	Short Comment	Comment
XX_RC	P_DUMMY	Demo Rule	Demo Group Part Rule

Commodity Relation by Rule

Geometric Rule Definition

No.	Group	Part	Commodity Code	Geometric	Formula	Ident
1	XX_GRP_RC	XX_PART_RC		X_RC_BI_1NPS_15t	P_DUMMY	<input checked="" type="checkbox"/>

Input 1: From 1 To 24

Input 2: From To

Used Tables and Groups

No.	Tablename	Table Group	Table Detail
1	P_MATERIAL	PIPE_US	Y1

- h. Save the changes
- i. In the **Geometric Rule Definition** section click on the **No.** field
- j. Add a new rule to link the Dimensional Standard to the Part, by clicking on the **New Record** icon and entering the following values

Section	Field	Value
Geometric Rule Definition		
	No.	1001
	Group	XX_GRP_<Init>
	Part	XX_PART_<Init>
	Geometric	P_PPP_DSTD_B36_19
	Formula	P_DUMMY
	Ident	Not Checked
Used Tables and Groups		
	No.	1
	Tablename	P_DIM_STD
	Table Group	PIP_US
	Table Detail	BR

S.40.21 Geometric Rules

Geometric Rule

Rule	Def. Formula	Short Comment	Comment
XX_RC	P_DUMMY	Demo Rule	Demo Group Part Rule

Commodity Relation by Rule

Geometric Rule Definition

No.	Group	Part	Commodity Code	Geometric	Formula	Ident
1001	XX_GRP_RC	XX_PART_RC		P_PPP_DSTD_B36_19	P_DUMMY	<input type="checkbox"/>

Input 1: From 1 To 24

Input 2: From To

Used Tables and Groups

No.	Tablename	Table Group	Table Detail
1	P_DIM_STD	PIP_US	BR

- k. Save the changes
- l. Add a new rule to link the Weights to the Part, by clicking on the **New Record** icon and entering the following values

Section	Field	Value
Geometric Rule Definition		
	No.	1002
	Group	XX_GRP_<Init>
	Part	XX_PART_<Init>
	Geometric	P_PPP_WGHT_B36_19_STL
	Formula	P_DUMMY
	Ident	Not Checked
Used Tables and Groups		
	No.	1
	Tablename	P_DIM_STD
	Table Group	PIP_US
	Table Detail	BR

S.40.21 Geometric Rules

Geometric Rule

Rule: XX_RC Def. Formula: P_DUMMY Short Comment: Demo Rule Comment: Demo Group Part Rule

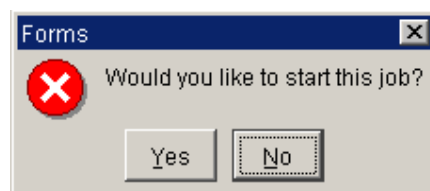
Geometric Rule Definition

No.: 1002 Group: XX_GRP_RC Part: XX_PART_RC Geometric: P_PPP_WGHT_B36 Formula: P_DUMMY Ident: ☐

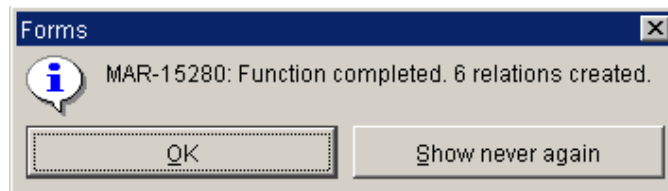
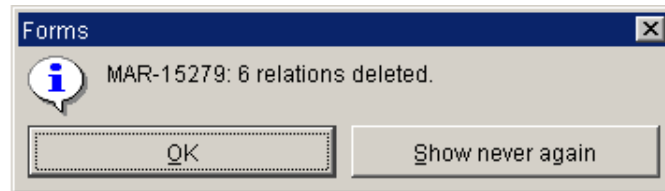
Used Tables and Groups

No.: 1 Tablename: P_DIM_STD Table Group: PIP_US Table Detail: BR

- m. Save the changes
- n. Click on the **Commodity Relation** button to recreate all the Commodity Geometric Relationships associated with this **Group / Part**.



- o. The system will display messages indicating the number of relationships deleted and created. Note any relationships created manually will not be deleted.



- p. Close all screens
- q. Click on **"S.40.22 Commodity Geometric Relations"** to view the new relationships that have been created.
- r. Ensure you are in the **Query Entry** mode and search for the **Group XX_GRP_<Init>**
- s. In the **Commodity Parts** section system will display the parts associated with this group as shown below.

S.40.22 Commodity Geometric Relations		
Commodity Groups		
Group	Short Desc	Description
XX_GRP_RC	Demo Group XX RC	Demo Group XX RC
Commodity Parts		
Part	Short Desc	Description
XX_PART_RC	Demo Part RC	Demo Part RC

- t. Click on the **Go To Next Block** to view **"S.40.22 Commodity Geometric Relations: Window 2"**
- u. System will display the **Commodity Code XX_BREAY<ID>AAG** along with the first relationship to the **Geometric X_<Init>_BI_1NPS_1CSH**. Note the **Ident** and **Manual** checkboxes are checked indicating that this relationship was manually created and will be used to build idents.

S.40.22 Commodity Geometric Relations: Window 2

Commodity Code	Short Desc				
XXX_BRBEAY1AAG	Demo Part RC , B36.19M , BE Demo Material Y1 ,				

Date/Time created	Geometric	Project/PG	From	Input 1
22-JAN-2009 14:09:31	X_RC_BI_1NPS_1S	SDB		.5
<input checked="" type="checkbox"/> Ident?	<input checked="" type="checkbox"/> Manual?		To	24

Geom Details

Unit System	Nps1	Sch1	Input 3	Input 4	Input 5
IMP/MET	1	S-XS	0	0	0
IMP/MET	2	S-XS	0	0	0
IMP/MET	3	S-XS	0	0	0
IMP/MET	4	S-XS	0	0	0
IMP/MET	6	S-XS	0	0	0

- v. In the middle section which displays Geometric, **click** on the **down arrow** of the scroll bar to see the system generated relationships tying the weights to the commodity based on the size schedule.
 - I. FYI: Note the size / schedule combinations don't match the geometric table that will be used to build ident's, as this geometric table is being used by other Groups / Parts.

S.40.22 Commodity Geometric Relations: Window 2

Commodity Code	Short Desc				
XXX_BRBEAY1AAG	Demo Part RC , B36.19M , BE Demo Material Y1 , SMLS				

Date/Time created	Geometric	Project/PG	From	Input 1	Input 2	Input 3	Input 4	Input 5
26-JAN-2009 07:06:09	P_PPP_WGHT_B36	SDB		1				
<input type="checkbox"/> Ident?	<input type="checkbox"/> Manual?		To	24				

Geom Details

Unit System	Nps1	Sch1	Input 3	Input 4	Input 5	Weights	Water_Wgt	Surf_Area	P_Sch_Thk
IMP/MET	1	S-10S	0	0	0	2.09			0.109
IMP/MET	1	S-40S	0	0	0	2.5			0.133
IMP/MET	1	S-5S	0	0	0	1.3			0.065
IMP/MET	1	S-80S	0	0	0	3.24			0.179
IMP/MET	1.25	S-10S	0	0	0	2.7			0.109
IMP/MET	1.25	S-40S	0	0	0	3.39			0.14
IMP/MET	1.25	S-5S	0	0	0	1.65			0.065
IMP/MET	1.25	S-80S	0	0	0	4.47			0.191
IMP/MET	1.5	S-10S	0	0	0	3.11			0.109
IMP/MET	1.5	S-40S	0	0	0	4.05			0.145

- w. In the middle section which displays Geometric, **click** on the **down arrow** of the scroll bar to see the system generated relationships tying the weights to the commodity based on the size schedule

S.40.22 Commodity Geometric Relations: Window 2

Commodity Code	Short Desc				
XXX_BRBEAY1AAG	Demo Part RC , B36.19M , BE Demo Material Y1 , SMLS				

Date/Time created	Geometric	Project/PG	Input 1	Input
26-JAN-2009 07:06:09	P PPP_DSTD_B36	SDB	From 1	
<input type="checkbox"/> Ident?	<input type="checkbox"/> Manual?		To 24	

Geom Details

Unit System	Nps1	Sch1	Input 3	Input 4	Input 5	P_Pipe_Od1
IMP/MET	1	0	0	0	0	1.315
IMP/MET	1.25	0	0	0	0	1.66
IMP/MET	1.5	0	0	0	0	1.9
IMP/MET	2	0	0	0	0	2.375
IMP/MET	2.5	0	0	0	0	2.875
IMP/MET	3	0	0	0	0	3.5
IMP/MET	3.5	0	0	0	0	4
IMP/MET	4	0	0	0	0	4.5
IMP/MET	5	0	0	0	0	5.563
IMP/MET	6	0	0	0	0	6.625
IMP/MET	8	0	0	0	0	8.625

- x. Close all screens

Lab 18. Extending the SDB – Build a new Nominal Sizes Table

- Launch **“S.40.01 Nominal Sizes”** to create a new Nominal Size table
- Ensure you are in the **Data Entry** mode and not the **Query Mode**
- Type **X_<Init>_D0024** in the **Nom Size** field and **Unit** as **in**
- Type in a **Description** of **Upto 24 in** and select **Standard** of **US** from **LOV**.

S.40.01 Nominal Sizes

Nominal Size Table Definition

Nom Size	Unit (Dn)	Short Desc	Description	Standard
X_RC_D0024	in	Upto 24 in	Upto 24 in	US

- Save the changes
- Click on the **Go To Next Block** Icon to move to **“S.40.01 Nominal Sizes: Window 2”** to enter the valid nominal sizes.
- Enter sizes shown below and save the changes

S.40.01 Nominal Sizes: Window 2

Nominal Size Table Definition

Nom Size	Unit (Dn)	Stand
X_RC_D0024	in	US

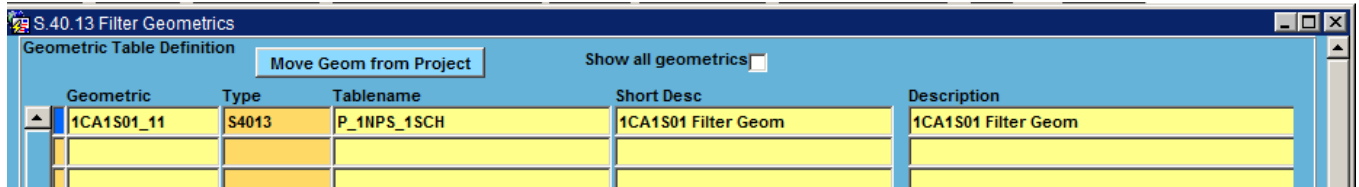
Nominal Sizes

Dn	Comment
1	1"
2	2"
4	4"
6	6"
8	8"
10	10"
12	12"
16	16"
20	20"
24	24"

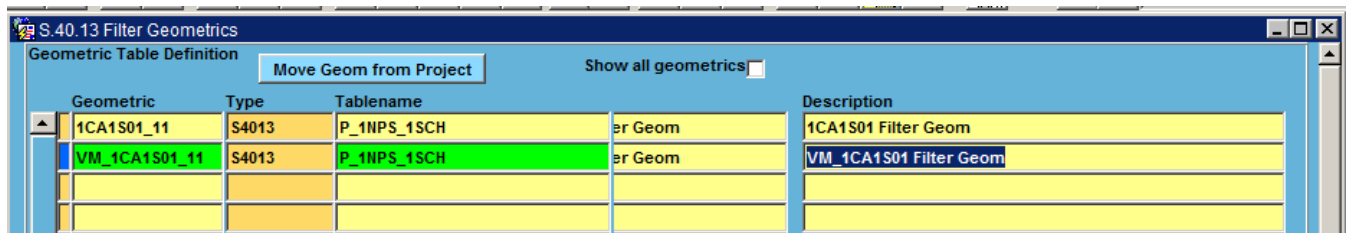
h. Close all the screens

Lab 19. Extending the SDB – Copy Spec Filter

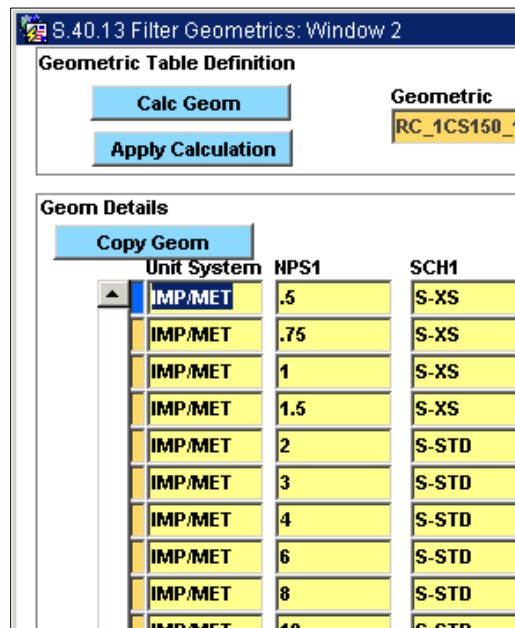
- Launch **“S.40.13 Filter Geometrics”** to create a spec filter
- Ensure you are in the **Query Mode** and search for the filter **1CA1S01_11**



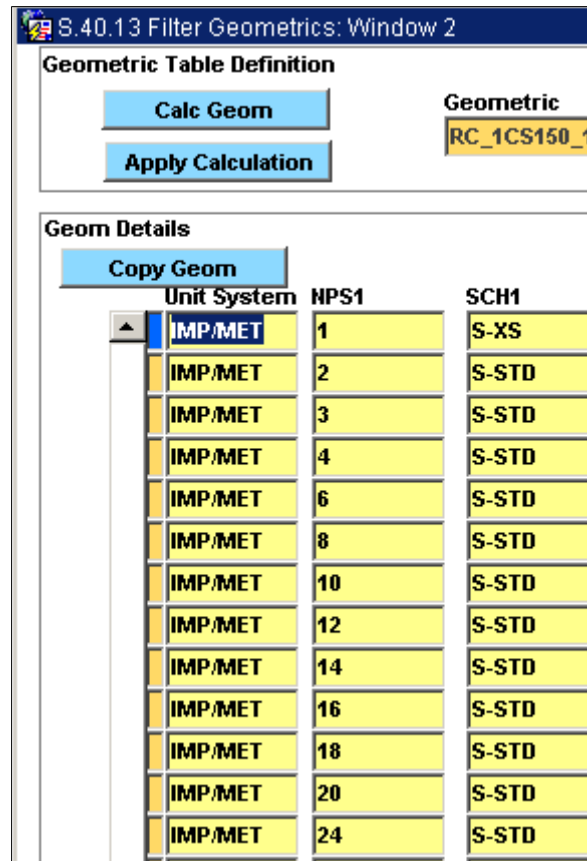
- Click on the first blank row and **Duplicate above record** by pressing **F4**. The system will duplicate the previous row details.
- Change the name of the Spec Filter **Geometric** to **<Init>_1 CA1S01_11**



- Save the changes.
- Click on the **Go to Next Block** icon to specify the valid Size / Schedule combination in the **“S.40.13 Filter Geometrics: Window 2”**. The system will display all the size / schedule combinations from the geometric **1CA1S01_11** as it did a deep copy.



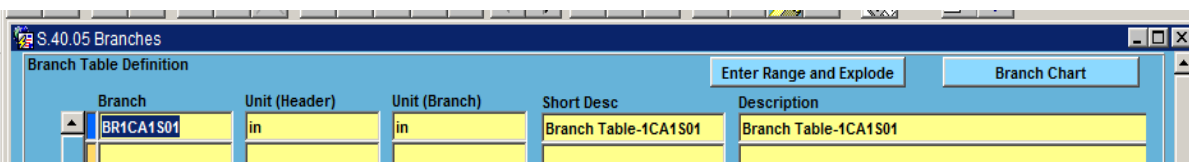
- g. **Delete** the following sizes **.5, .75, 1.5, 2.5** and **all sizes above 24** as shown below.



- h. Save the changes
i. Close all screens

Lab 20. Extending the SDB – Copy Branch Filter

- a. Launch **“S.40.05 Branches”**
b. Ensure you are in the **Query Mode** and search for the filter **BR1CA1S01**



- c. **Click** on the first blank row and **Duplicate above record** by pressing **F4**. The system will duplicate the previous row details.
d. Change the name of the **Branch** to **<Init>_1CA1S01_BR_90**

Branch	Unit (Header)	Unit (Branch)	Short Desc	Description
BR1CA1S01	in	in	Branch Table-1CA1S01	Branch Table-1CA1S01
VM_1CA1S01_BR_90	in	in	Branch Table-1CA1S01	Branch Table-1CA1S01

- Save the changes
- Click on the **Go to Next Block** icon to specify the valid Size / Schedule combination in the **"S.40.05 Branches: Window 2"**
- The system will display all the Header & Branch sizes with corresponding Parts from the branch table **BR1CA1S01** as it performed a deep copy.

Branch	Unit (Header)	Unit (Branch)	Standard
RC_1CS150_BR_90	in	in	US

Pref	Dn Header	Dn Branch	Group	Part	Short Desc	Break Type
1	.5	.5	0	ETE	89.5deg 90.5deg	STANDARD
1	.75	.5	0	RTE	89.5deg 90.5deg	STANDARD
1	.75	.75	0	ETE	89.5deg 90.5deg	STANDARD
1	1	.5	0	RTE	89.5deg 90.5deg	STANDARD
1	1	.75	0	RTE	89.5deg 90.5deg	STANDARD
1	1	1	0	ETE	89.5deg 90.5deg	STANDARD
1	1.5	.5	0	RTE	89.5deg 90.5deg	STANDARD
1	1.5	.75	0	RTE	89.5deg 90.5deg	STANDARD
1	1.5	1	0	RTE	89.5deg 90.5deg	STANDARD

- Press **F7** to **Enter Query** mode and search for header size with fractions by typing in **%.%** in the **Dn Header** field and **Run the Query**.

Branch	Unit (Header)	Unit (Branch)	Standard
RC_1CS150_BR_90	in	in	US

Pref	Dn Header	Dn Branch	Group	Part
	%.%			

- System will display all the branches with fractional header sizes

S.40.05 Branches: Window 2

Branch Table Definition

Branch: VM_1CA1S01_BR_90 Unit (Header): in Unit (Branch): in Standard: US

Branch Chart Order by DN Branch

Enter Range and Explode Export to Spec

Header/ Branches

Pref	Dn Header	Dn Branch	Group	Part	Short Desc	Break Type	Ctrl	P_M
1	.5	.5	O	ETE	%	STANDARD	1	
1	.75	.5	O	RTE	%	STANDARD	1	
1	.75	.75	O	ETE	%	STANDARD	1	
1	1	.5	O	RTE	%	STANDARD	1	
1	1	.75	O	RTE	%	STANDARD	1	
1	1	1	O	ETE	%	STANDARD	1	
1	1.5	.5	O	RTE	%	STANDARD	1	
1	1.5	.75	O	RTE	%	STANDARD	1	
1	1.5	1	O	RTE	%	STANDARD	1	

- j. **Delete** all the branch details
- k. Save the changes
- l. Press **F7** to **Enter Query** mode and search for header size with fractions by typing in **%.%** in the **Dn Branch** field and **Run the Query**.

S.40.05 Branches: Window 2

Branch Table Definition

Branch: VM_1CA1S01_BR_90 Unit (Header): in Unit (Branch): in Standard: US

Header/ Branches

Pref	Dn Header	Dn Branch	Group	Part
		%.%		

- m. System will display all the fractional branch sizes

S.40.05 Branches: Window 2

Branch Table Definition

Branch

Unit (Header)

Unit (Branch)

Standard

RC_1CS150_BR_90

in

in

US

Branch Chart

Order by DN

Enter Range and Explode

Export to

Header/ Branches

Pref	Dn Header	Dn Branch	Group	Part	Short Desc	Break Type
1	1	.5	0	RTE	89.5deg 90.5deg	STANDARD
1	1	.75	0	RTE	89.5deg 90.5deg	STANDARD
2	2	.5	0	SOC	89.5deg 90.5deg	STANDARD
1	2	.5	0	RTE	89.5deg 90.5deg	STANDARD
1	2	.75	0	RTE	89.5deg 90.5deg	STANDARD
1	2	1.5	0	RTE	89.5deg 90.5deg	STANDARD
1	3	.5	0	SOC	89.5deg 90.5deg	STANDARD
1	3	.75	0	SOC	89.5deg 90.5deg	STANDARD
1	3	1.5	0	SOC	89.5deg 90.5deg	STANDARD
1	4	.5	0	SOC	89.5deg 90.5deg	STANDARD
1	4	.75	0	SOC	89.5deg 90.5deg	STANDARD
1	4	1.5	0	SOC	89.5deg 90.5deg	STANDARD

- n. **Delete** all the branch details and Save the changes
- o. Press **F8** to **Run the Query** and retrieve all branch details. Scroll to the bottom of the list and **delete** all branch sizes **greater than 24"**.

S.40.05 Branches: Window 2

Branch Table Definition

Branch

Unit (Header)

Unit (Branch)

Standard

RC_1CS150_BR_90

in

in

US

Branch Chart

Order by DN

Enter Range and Explode

Export to

Header / Branches

Pref	Dn Header	Dn Branch	Group	Part	Short Desc	Break Type
1	24	18	B	RPA	89.5deg 90.5deg	STANDARD
1	24	20	B	RPA	89.5deg 90.5deg	STANDARD
1	24	24	B	TEE	89.5deg 90.5deg	STANDARD
1	30	1	O	SOC	89.5deg 90.5deg	STANDARD
1	30	2	B	WEL	89.5deg 90.5deg	STANDARD
1	30	3	B	WEL	89.5deg 90.5deg	STANDARD
1	30	4	B	WEL	89.5deg 90.5deg	STANDARD
1	30	6	B	WEL	89.5deg 90.5deg	STANDARD
1	30	8	B	WEL	89.5deg 90.5deg	STANDARD
1	30	10	B	WEL	89.5deg 90.5deg	STANDARD
1	30	12	B	RPA	89.5deg 90.5deg	STANDARD
1	30	14	B	RPA	89.5deg 90.5deg	STANDARD
1	30	16	B	RPA	89.5deg 90.5deg	STANDARD
1	30	18	B	RPA	89.5deg 90.5deg	STANDARD
1	30	20	B	RPA	89.5deg 90.5deg	STANDARD
1	30	24	B	RPA	89.5deg 90.5deg	STANDARD
1	30	30	B	TEE	89.5deg 90.5deg	STANDARD
1	36	1	O	SOC	89.5deg 90.5deg	STANDARD

p. Save the changes.

S.40.05 Branches; Window 2

Branch Table Definition

Branch	Unit (Header)	Unit (Branch)	Standard	Branch Chart	Order by D
RC_1CS150_BR_90	in	in	US	Enter Range and Explode	Export to

Header/ Branches

	Pref	Dn Header	Dn Branch	Group	Part	Short Desc	Break Type
	1	1	1	O	ETE	89.5deg/90.5deg	STANDARD
	1	2	1	O	RTE	89.5deg/90.5deg	STANDARD
	1	2	2	O	ETE	89.5deg/90.5deg	STANDARD
	1	3	1	O	SOC	89.5deg/90.5deg	STANDARD
	1	3	2	O	SOC	89.5deg/90.5deg	STANDARD
	1	3	3	B	TEE	89.5deg/90.5deg	STANDARD
	1	4	1	O	SOC	89.5deg/90.5deg	STANDARD
	1	4	2	B	RWE	89.5deg/90.5deg	STANDARD
	1	4	3	B	RWE	89.5deg/90.5deg	STANDARD
	1	4	4	B	TEE	89.5deg/90.5deg	STANDARD
	1	6	1	O	SOC	89.5deg/90.5deg	STANDARD

q. Close all screens

Lab 21. Create a new Spec Header similar to the 1CA1S01

- Launch **"S.50.06 Specification Management"**
- Ensure you are in the **Query Mode** and search for the Spec **1CA1S01**

S.50.06 Specification Management

Specification Headers

Display Options

☐ Project Only ☒ Highest Rev. issued or not
☐ Product Group Only ☐ All
☒ Both ☐ Not issued and highest Rev

Buttons: Additional Info, Delete Spec, Build Idents - All Specs, Force D, Comr

Spec Type	Spec Code	PN / Class	Ctrl
SDB_PIP	1CA1S01		1

SPEC REVISIONS

Rev	Issued	Published	Active	Revis
0	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

- Click on the first blank row and **Duplicate above record** by pressing **F4**. The system will duplicate the previous row details.
- Change the name of the **Spec** to **<Init>_1CA1S01**
- Save the changes

S.50.06 Specification Management

Specification Headers

Display Options

☐ Project Only ☒ Highest Rev. issued or not
☐ Product Group Only ☐ All
☒ Both ☐ Not issued and highest Rev

Buttons: Additional Info, Delete Spec, Build Idents - All Specs

Spec Type	Spec Code	PN / Class	Ctrl
SDB_PIP	VM_1CA1S01		1

SPEC REVISIONS

Rev	Issued	Published	A
0	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

- In the **Spec Header Geometric** tab add the branch details by, entering a **Short Code** of **90%**, **Table Type** of **Branch Filter** and **Table Name** of **<Init>_1CA1S01_BR_90** and size range **1 – 24, 1 – 24**. Check the **Filter** checkbox.

SPEC HEADER GEOMETRIC

Specification Groups Specification Details Specification Notes Specification Limits Specification Symbols

Ident

☒ Filter ☐ Create Unit System: IMP/MET Short Code: 90% Group: Part: Table Type: Branches Table Name: VM_1CA1S01_BR From1: 1 To1: 24 From2: 1 To2: 24 Ctrl: 1

- g. Similarly specify the nominal sizes by, entering a **Short Code** of %, **Table Type** of **Nominal Sizes** and **Table Name** of **X_<Init>_D024** and specifying size range **1 – 24**. Do not check the **Filter** checkbox.

SPEC HEADER GEOMETRIC											
Specification Groups											
Specification Details											
Specification Notes											
Specification Limits											
Ident											
Filter	Create	Unit System	Short Code	Group	Part	Table Type	Table Name	From1	To1	From2	To2
<input checked="" type="checkbox"/>	<input type="checkbox"/>	IMP/MET	90%			Branches	RC_1CS150_BR_9	1	24	1	24
<input type="checkbox"/>	<input type="checkbox"/>	IMP/MET	%			Nominal Sizes	X_RC_D0024	1	24		

- h. Specify the spec filter to limit the size schedule combinations for all components in the spec by, entering a **Short Code** of %, **Table Type** of **User Defined Filter** and **Table Name** of **X_<Init>_BI_1NPS_1SCH** and size range **1 – 6**. Check the **Filter** checkbox.
- i. FYI: System will not let you select a value greater than 6 as the Geometric table **X_<Init>_BI_1NPS_1SCH** does not have larger size / schedule entries.

SPEC HEADER GEOMETRIC											
Specification Groups											
Specification Details											
Specification Notes											
Specification Limits											
Ident											
Filter	Create	Unit System	Short Code	Group	Part	Table Type	Table Name	From1	To1	From2	To2
<input checked="" type="checkbox"/>	<input type="checkbox"/>	IMP/MET	90%			Branches	RC_1CS150_BR_9	1	24	1	24
<input type="checkbox"/>	<input type="checkbox"/>	IMP/MET	%			Nominal Sizes	X_RC_D0024	1	24		
<input checked="" type="checkbox"/>	<input type="checkbox"/>	IMP/MET	%			User defined	X_RC_BI_1NPS_1	1	6		

- i. Specify the spec filter to limit the size schedule combinations for Gaskets in the spec by, entering a **Short Code** of **GSK**, **Table Type** of **User Defined Filter** and **Table Name** of **1CA1S01_GSK** and size range **1 – 24, 3 - 4**. Do not check the **Filter** checkbox.
- j. Save the changes

S.50.06 Specification Management

Specification Headers

Display Options

☐ Project Only ☒ Highest Rev. issued or not
☐ Product Group Only ☐ All
☒ Both ☐ Not issued and highest Rev

Additional Info Copy Spec Revise Spec
 Delete Spec Force Delete Spec Batch (Build Comm)
 Build Idents - All Specs Common SHGs

Spec Type	Spec Code	PN / Class	Ctrl	Rev	Issued	Published	Active	Revise	Date	XRev	Version
SDB_SPECS	SDB_1CS150		1	0	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		0	0
SDB_SPECS	RC_1CS150		1	0	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		0	0
					<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>			
					<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>			
					<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>			
					<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>			
					<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>			
					<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>			
					<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>			
					<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>			
					<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>			

SPEC REVISIONS Spec Header Description Spec Type Description Variable

SPEC HEADER GEOMETRIC Specification Groups Specification Details Specification Notes Specification Limits

Ident

Filter	Create	Unit System	Short Code	Group	Part	Table Type	Table Name	From1	To1	From2	To2
<input checked="" type="checkbox"/>	<input type="checkbox"/>	IMP/MET	90%			Branches	RC_1CS150_BR_3	1	24	1	24
<input type="checkbox"/>	<input type="checkbox"/>	IMP/MET	%			Nominal Sizes	X_RC_D0024	1	24		
<input checked="" type="checkbox"/>	<input type="checkbox"/>	IMP/MET	%			User defined	X_RC_BI_1NPS_1	1	6		
<input type="checkbox"/>	<input type="checkbox"/>	IMP/MET	GSK			User defined	SDB_1CS150_GSK	1	24	3	4

k. Click on the **Specification Groups** tab and add following groups via **LOV**

Seq	Table Name	Group
1	P_SERVICE	ALL
2	P_RATING_CLASS	ANSI
3	P_TEMP_LIMIT	ALL
4	P_CORR_ALLOWANCE	ALL
5	P_MATERIAL_TYPE	ANSI
6	P_DESIGN_CODE	ANSI
7	P_STRESS_RELIEF	ANSI
8	P_EXAMINATION	ANSI

S.50.06 Specification Management

Specification Headers

Display Options

☐ Project Only
 ☒ Highest Rev. issued or not
☐ Product Group Only
 ☐ All
☒ Both
 ☐ Not issued and highest Rev

Additional Info

Delete Spec

Build Idents - All Specs

Spec Type	Spec Code	PN / Class	Ctrl	Rev	Issued	Published
SDB_SPECS	SDB_1CS150		1	0	<input type="checkbox"/>	<input type="checkbox"/>
SDB_SPECS	RC_1CS150		1	0	<input type="checkbox"/>	<input type="checkbox"/>
					<input type="checkbox"/>	<input type="checkbox"/>
					<input type="checkbox"/>	<input type="checkbox"/>
					<input type="checkbox"/>	<input type="checkbox"/>
					<input type="checkbox"/>	<input type="checkbox"/>
					<input type="checkbox"/>	<input type="checkbox"/>
					<input type="checkbox"/>	<input type="checkbox"/>
					<input type="checkbox"/>	<input type="checkbox"/>
					<input type="checkbox"/>	<input type="checkbox"/>
					<input type="checkbox"/>	<input type="checkbox"/>

SPEC REVISIONS

Spec

Spec Header Geometric **SPECIFICATION GROUPS** **Specification Details**

Seq	Tablename	Group	Description
1	P_SERVICE	ALL	Service
2	P_RATING_CLASS	ANSI	Rating Class - ANSI
3	P_TEMP_LIMIT	ALL	Temperature Limits
4	P_CORR_ALLOWANCE	ALL	Corrosion Allowances
5	P_MATERIAL_TYPE	ANSI	Type of Material
6	P_DESIGN_CODE	ANSI	ANSI DESIGN CODES
7	P_STRESS_RELIEF	ANSI	Stress Relief conditions
8	P_EXAMINATION	ANSI	Type of Examination

- I. Click on the **Specification Details** tab and add the details via **LOV** as shown below

Seq	Table Name	Group	Detail
1	P_SERVICE	ALL	AA
2	P_RATING_CLASS	ANSI	AA
3	P_TEMP_LIMIT	ALL	AA
4	P_CORR_ALLOWANCE	ALL	AA
5	P_MATERIAL_TYPE	ANSI	AA
6	P_DESIGN_CODE	ANSI	AA
7	P_STRESS_RELIEF	ANSI	AA

8
P_EXAMINATION
ANSI
AA

S.50.06 Specification Management

Specification Headers

Display Options

☐ Project Only

☒ Highest Rev. issued or not

☐ Product Group Only

☐ All

☒ Both

☐ Not issued and highest Rev

Spec Type	Spec Code	PN / Class	Ctrl
SDB_SPECS	SDB_1CS150		1
SDB_SPECS	RC_1CS150		1

SPEC REVISIONS

Rev	Issued	Published	Active	Revise D
0	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
0	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Spec Header Description

Rev	Issued	Published	Active	Revise D

Spec Header Geometric
Specification Groups
SPECIFICATION DETAILS
Specification Notes

Seq	Tablename	Group	Detail	Short Desc
1	P_SERVICE	ALL	AA	Process
2	P_RATING_CLASS	ANSI	AA	150, ASME B16.5a - 1998
3	P_TEMP_LIMIT	ALL	AA	-20F to 800F
4	P_CORR_ALLOWANCE	ALL	AA	0.063 in (0.05 in MIN)
5	P_MATERIAL_TYPE	ANSI	AA	Carbon Steel
6	P_DESIGN_CODE	ANSI	AA	ASME B31.3-1999
7	P_STRESS_RELIEF	ANSI	AA	Per ASME B31.3
8	P_EXAMINATION	ANSI	AA	Per ASME B31.3

- m. Save the changes
- n. Click on the **Specification Notes** tab and add the predefined note **NRES-017** at the header level, using the **LOV. This Note** field represents the sequence in which the notes will be printed.

66

S.50.06 Specification Management

Specification Headers

Display Options

☐ Project Only
 ☒ Highest Rev. issued or not
☐ Product Group Only
 ☐ All
☒ Both
 ☐ Not issued and highest Rev

Additional Info
 Delete Spec
 Build Idents - All Specs
 Copy Spec
 Force Delete Spec
 Common SHGs

Spec Type	Spec Code	PN / Class	Ctrl
SDB_SPECS	SDB_1CS150		1
SDB_SPECS	RC_1CS150		1

SPEC REVISIONS

Rev	Issued	Published	Active	Revise	Date	XRe
0	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		0
0	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		0
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		

Spec Header Geometric | **Specification Groups** | **Specification Details** | **SPECIFICATION NOTES** | **Specification**

Note Code | **Description** | **This Note**

NRES-017 | THIS PIPE SPECIFICATION MAY BE USED FOR DESIGN CONDITIONS DOWN TO -29 DEG. C (-20 DEG. F) ONLY AT LOCATIONS WHERE CARBON STEEL IS NOT | 10

- o. Save the changes
- p. Click on the **Specification Limits** tab and specify the Pressure / Temperature details as follows

Pressure	Unit	Temperature	Unit
285	kPA	-29	C
260	kPA	93	C
230	kPA	149	C
200	kPA	204	C
170	kPA	260	C

S.50.06 Specification Management

Specification Headers

Display Options

☐ Project Only
 ☒ Highest Rev. issued or not
☐ Product Group Only
 ☐ All
☒ Both
 ☐ Not issued and highest Rev

Additional Info
 Delete Spec
 Build Idents - All Specs

Copy Spec
 Force Delete Spec
 Common SHGs

Re
 Batch (B

Spec Type	Spec Code	PN / Class	Ctrl
SDB_SPECS	SDB_1CS150		1
SDB_SPECS	RC_1CS150		1

SPEC REVISIONS				Spec Header Description	Spec Type Description	
Rev	Issued	Published	Active	Revise	Date	XRev
0	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		0
0	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		0
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		

Spec Header Geometric Specification Groups Specification Details Specification Notes SPECIFICATION LIMITS

Pressure	Unit (Press)	Temp	Unit (Temp)	Comments	Ctrl
285	kPA	-29	C		1
260	kPA	93	C		1
230	kPA	149	C		1
200	kPA	204	C		1
170	kPA	260	C		1

q. Save the changes

r. Click on the Report Icon and **Select the Report S.50.R.US.03 PIP Spec Report** (or any other Spec Report if the PIP Spec Report is not available).

A.30.06.01 Attached Menu Reports

Menu Reports

Menu Item	Item Label	
S50R07	S.50.R.07 Spec Items with Idents	Select Report
S50R07L	S.50.R.07L Spec Items List	Select Report
S50R10	S.50.R.10 Piping Class Index	Select Report
S50R11	S.50.R.11 Piping Class	Select Report
S50R14	S.50.R.14 Spec Compare	Select Report
S50RUS03	S.50.RUS.03 PIP Spec Report	Select Report
		Select Report

- s. From the **LOV** for **Spec Code** select your spec **<Init>_1CS150** and click on the **Start Report** button.

A.60.71 Start Reports

Menu Items

Menu Item	Item Name
S50RUS03	S.50.RUS.03 PIP Spec Report

Run Options

Execution Mode: **Online**

Parameter: ☐ Suppress Cover ☐ Table Of Content

Comment:

Process Status: **NEW**

Run Parameter

Parameter	Value	Value Description
Destype	Cache	
Desformat	pdf	
Name of the report	S50RUS03.pdf	
Spec Code	RC_1CS150	Class 150, CS
Source Revision	0	

Save Settings Parameter Info Start Report

- t. System should display a pdf file showing the Spec header details, Pressure / Temperature Ratings, Branch Table and Notes. Note that no items are printed.

Piping Material Specification Line Class:RC_1CS150
Rev. No.: 0

P_SERVICE: Process
RATING CLASS: Tap-003
P_TEMP_LIMIT: -20F to 800F
P_MATERIAL_TYPE: Carbon Steel
P_STRESS_RELIEF: Per ASME B31.3
GENERAL NOTES: 10

CORROSION ALLOW.: 0.063 in. (1.6 mm)
P_RATING_CLASS: 150, ASME B16.5a - 1998
P_CORR_ALLOWANCE: 0.063 in (0.05 in MIN)
P_DESIGN_CODE: ASME B31.3-1999
P_EXAMINATION: Per ASME B31.3

Pressure - Temperature Ratings

Temp.C	-29	93	149	204	260	371	427
Press. kPag	285	260	230	200	170	110	80

Temp.F	-20	200	300	400	500	700	800
Press. Psig	41	38	33	29	25	16	12

ITEM	Rev. Notes	NPS1	NPS2	Comm.Code	Description
------	------------	------	------	-----------	-------------

NOTES:

Legend:

RPA	Reinforcing Pad
WEL	Weldolet
ETE	Equal Tee
SOC	Sockolet
RWE	Reinforcing Weld
RTE	Red. Tee
TEE	Eq. Tee

HEADER

10 THIS PIPE SPECIFICATION MAY BE USED FOR DESIGN CONDITIONS DOWN TO -29 DEG. C (-20 DEG. F) ONLY AT LOCATIONS WHERE CARBON STEEL IS NOT RESTRICTED TO A MINIMUM TEMPERATURE OF -10 DEG. C (14 DEG. F).

- u. Close all the screens

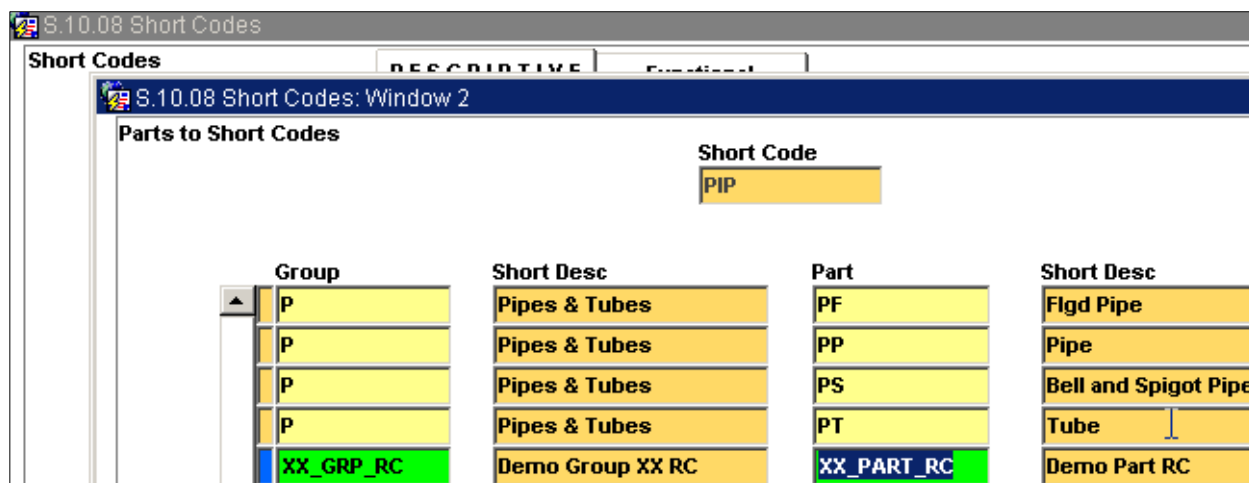
Lab 22. Extending the SDB - Add new Group / Part to Short Code

- Launch **"S.10.08 Short Codes"** to view the Short Codes
- Ensure you are in the **query** mode
- Search for the **Short Code PIP** and **Run the query**



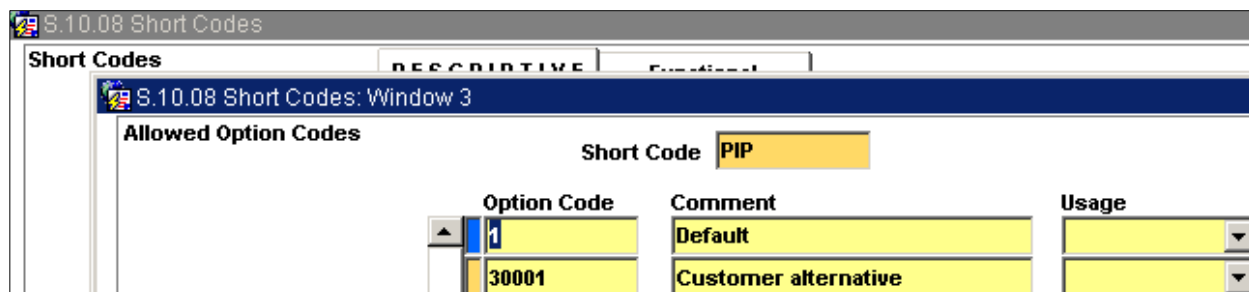
Short Code	DESCRIPTIVE	Functional
Short Desc	Description	
PIP	Piping	Piping

- Click on the **Go To Next Block Icon** to view **"S. 10.08 Short Codes Window 2"**
- Add a new row with **Group XX_GRP_<Init>** and **Part XX_PART_<Init>**
- Save the changes



Group	Short Desc	Part	Short Desc
P	Pipes & Tubes	PF	Fldg Pipe
P	Pipes & Tubes	PP	Pipe
P	Pipes & Tubes	PS	Bell and Spigot Pipe
P	Pipes & Tubes	PT	Tube
XX_GRP_RC	Demo Group XX RC	XX_PART_RC	Demo Part RC

- Click on the **Go To Next Block Icon** to view **"S. 10.08 Short Codes Window 3"**, which shows the list of allowed option codes for the short code PIP.



Option Code	Comment	Usage
1	Default	
30001	Customer alternative	

- Close all the screens

Lab 23. Add items to the Spec

- a. Launch **"S.50.06 Specification Management"** and enter the query mode
- b. Search for the spec you created by typing in <Init> **1CS150** in the Spec Code and
Running the query

S.50.06 Specification Management

Specification Headers

Display Options

☐ Project Only ☒ Highest Rev. issued or not
☐ Product Group Only ☐ All
☒ Both ☐ Not issued and highest Rev

Spec Type	Spec Code	PN / Class	Ctrl
SDB_SPECS	RC_1CS150		1

- c. Double Click on the **Spec Code** to add the Items
 - i. FYI: Spec Items consists of a combination of **Short Code, Group, Part** and **Commodity Code**. Specify a valid **Option Code** if you want to use different commodity codes for the same Short Code / Size combination.
 - ii. FYI: It is a good idea to add items with **Seq** in multiples of **10**, to allow addition of items in the future.
- d. Click on the blank row in the **Specification Items** section and add the first item to the spec with **Seq = 10, Short Code = PIP, Group = XX_GRP_<Init>** and **Part = XX_PART_<Init>**

S.50.06 Specification Management: Window 2

Specification Headers

Spec Type: SDB_SPECS

Spec Code: RC_1CS150

☐ Enable Spec Compare

SPEC DESCRIPTION

Short Desc: Class 150, CS

Description: Class 150, Carbon

Missing Idents

Specification Items

Create Functional

Seq	Short Code	Group	Part	Option	Commodity
10	PIP	XX_GRP_RC	XX_PART_RC	1	

LAYOUT

- e. In the **Layout** tab, click on the **Commodity code** field and press **F9** to open the **LOV**. Search for the pipe you created earlier by **clicking** in the **Group** field of the **P_MATERIAL** table and setting the **Group = PIPE_US** and **Table Detail = Y<ID>**

The screenshot shows the 'S.50.06 Specification Management Window 2' with the 'SPEC DESCRIPTION' tab selected. The 'Spec Type' is 'SDB_SPECS' and the 'Spec Code' is empty. The 'Short Desc' is 'Class 150, CS' and the 'Description' is 'Class 150, Carbon Ste'. Below this, the 'S.30.01 List Commodity Codes (Related to Table Details or Attribute Values)' dialog box is open, showing the 'DETAILS' tab. The dialog box contains a table with columns 'Tablename', 'Group', and 'Table Detail'. The table lists five tables: P_DIM_STD, P_END_PREP, P_MATERIAL, P_MAT_SYSTEM, and P_ALIAS. The 'P_MATERIAL' row is selected, showing 'PIPE_US' in the 'Group' column and 'Y1' in the 'Table Detail' column. Below the table is a 'Commodity Codes' section with two empty fields for 'Commodity Code' and 'Description'. At the bottom of the dialog box are four buttons: 'Find', 'Reset Query', 'Reset All', and 'OK'.

Tablename	Group	Table Detail
P_DIM_STD	%	%
P_END_PREP	%	%
P_MATERIAL	PIPE_US	Y1
P_MAT_SYSTEM	%	%
P_ALIAS	%	%

Commodity Code	Description

- f. **Click** the **Find** button to search for matching commodity codes. System should display the two commodities you created in the previous labs.

S.50.06 Specification Management: Window 2

Specification Headers

Spec Type: SDB_SPECS

Spec Code:

SPEC DESCRIPTION

Short Desc: Class 150, CS

Description: Class 150, Carbon Steel, 0.063" C.A., Process

S.30.01 List Commodity Codes (Related to Table Details or Attribute Values)

DETAILS | **Attributes**

Tablename	Group	Table Detail	Required	Link
P_DIM_STD	PIP_US	BR	<input checked="" type="checkbox"/>	<input type="checkbox"/>
P_END_PREP	PIPE	PE	<input checked="" type="checkbox"/>	<input type="checkbox"/>
P_MATERIAL	PIPE_US	Y1	<input checked="" type="checkbox"/>	<input type="checkbox"/>
P_MAT_SYSTEM	US	A	<input checked="" type="checkbox"/>	<input type="checkbox"/>
P_ALIAS	PIPE_US	AAG	<input type="checkbox"/>	<input type="checkbox"/>

Commodity Codes

Commodity Code	Description
XXX_BRBEAY1AAG	Demo Part RC , ASME B36.19M , Bevel End Demo Material Y1 , Seamless
XXX_BRPEAY1AAG	Demo Part RC , ASME B36.19M , Plain End Demo Material Y1 , Seamless

Find Reset Query Reset All OK

- g. Select the **Plain End** pipe and click the **OK** button to add it to the spec.

S.50.06 Specification Management: Window 2

Specification Headers

Spec Type: SDB_SPECS

Spec Code: RC_1CS150

☐ Enable Spec Compare

SPEC DESCRIPTION

Short Desc: Class 150, CS

Description: Class 150, Carbon Steel, 0.063" C.A., Process

Missing Idents Validation

Specification Items

Create Functional

Seq	Short Code	Group	Part	Option	Commodity Code
10	PIP	XX_GRP_RC	XX_PART_RC	1	XXX_BRPEAY1AAG

LAYOUT | **Geometric**

- h. Click on the **Geometric** tab and note that the system assigned the **Geometric P_BI_1NPS_1SCH** to the item and a size range of **.5" to 24"**, because of the **Commodity Geometric Relationships** we defined earlier.

S.50.06 Specification Management: Window 2

Specification Headers

Spec Type: SDB_SPECS

Spec Code: RC_1CS150

☐ Enable Spec Compare

SPEC DESCRIPTION

Short Desc: Class 150, CS

Description: Class 150, Carbon Steel, 0.063" C.A., Process

Missing Idents Validation Build Comm

Specification Items

Create Functional

Seq	Short Code	Group	Part	Option	Geometric 1	From 1	To 1	Unit
10	PIP	XX_GRP_RC	XX_PART_RC	1	P_BI_1NPS_1SCH	.5	24	

- Save the changes
- Click on the **Go To Next Block** Icon to open **"S.50.06 Specification Management Window 3"** screen to view the idents associated with the Spec for the pipe.

S.50.06 Specification Management: Window 3

Specification Items

Spec Code: RC_1CS150

Validation Build Idents Batch

Short Code	Group	Part	Option	Commodity Code	From	To1
PIP	XX_GRP_RC	XX_PART_RC	1	XXX_BRPEAY1AAG	1	24

From To3 From To4

Commodity Description

XXX_BRPEAY1AAG,
Demo Group XX RC,
Demo Part RC,

Geometric Nominal Sizes Schedules

0 0

SPEC ITEM IDENTs

Missing Nom. Sizes

Ident	Ident Code	Nps1	Sch1	Input 3	Input 4

- Press **F8** to retrieve the Idents. System will display the Idents based on the **Geometrics** table **P_BI_1NPS_1SCH** and size range **.5" to 24"**.

S.50.06 Specification Management: Window 3

Specification Items Spec Code **RC_1CS150** Validation Build Idents Batch

Short Code Group Part Option Commodity Code From To1

PIP XX_GRP_RC XX_PART_RC 1 XXX_BRPEAY1AAG .5 24

From To3 From To4

Commodity Description XXX_BRPEAY1AAG,
Demo Group XX RC,
Demo Part RC,

Geometric Nominal Sizes Schedules

0 0

SPEC ITEM IDENTIS Missing Nom. Sizes

Ident	Ident Code	Nps1	Sch1	Input 3	Input 4
3675225	I3675225	.5	S-XS	0	0
3675227	I3675227	1	S-XS	0	0
3675229	I3675229	1.5	S-XS	0	0
3675235	I3675235	2	S-XS	0	0
3675240	I3675240	3	S-XS	0	0
3675242	I3675242	4	S-XS	0	0
3675243	I3675243	5	S-XS	0	0
3675244	I3675244	6	S-XS	0	0
3675245	I3675245	8	S-XS	0	0

- l. Close the **"S.50.06 Specification Management Window 3"** to return to the **"S.50.06 Specification Management Window 2"** Spec Item screen
- m. In the **Geometric** tab erase the entry in the **Geometric 1** field and set the size range to **1" to 24"**.

S.50.06 Specification Management: Window 2

Specification Headers Spec Type SDB_SPECS Spec Code RC_1CS150

Enable Spec Compare

SPEC DESCRIPTION

Short Desc Class 150, CS Description Class 150, Carbon Steel, 0.063" C.A., Process

Missing Idents Validation Build Comm

Specification Items Create Functional

Layout GEOMETRIC Misc

Seq	Short Code	Group	Part	Option	Geometric 1	From 1	To 1	Unit
10	PIP	XX_GRP_RC	XX_PART_RC	1		1	24	in

- n. Save the changes.
- o. Click on the **Go To Next Block** Icon to open the **"S.50.06 Specification Management Window 3"** screen to view the ids associated with the Spec.

- p. System will display the idents stored in its memory from the previous query. Press **F8** to refresh the Ident list. Now the system will display only those Idents that are valid for the Spec Filter **X_<Init>_BI_1NPS_1SCH** specified in the **Spec Header Geometrics** tab.

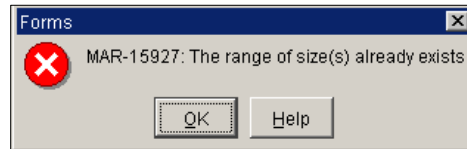
Ident	Ident Code	Nps1	Sch1	Input 3	Input 4
3675227	I3675227	1	S-XS	0	0
3675235	I3675235	2	S-XS	0	0
3675240	I3675240	3	S-XS	0	0
3675242	I3675242	4	S-XS	0	0
3675244	I3675244	6	S-XS	0	0

- q. Close the **“S.50.06 Specification Management Window 3”** to return to the **“S.50.06 Specification Management Window 2”** Spec Item screen.
- r. In the **Specification Items** section, click on the first blank row to add a new item with **Seq = 20**, **Short Code = PIP**, **Group = P**, **Part = PP**, **Option = 1** and **Commodity Code = PPPABQPEACQAAG**.

Seq	Short Code	Group	Part	Option	Commodity Code
10	PIP	XX_GRP_RC	XX_PART_RC	1	XXX_BRPEAY1AAG
20	PIP	P	PP	1	PPPABQPEACQAAG

- s. Try to save the changes.

- t. The system will display an error message to the effect that **the range of size(s) already exists**. This is because when we added the second pipe to the spec the system assigned it a size range of **.5" to 80"**.
 - i. FYI: A spec cannot have two items with the same short code with overlapping size range with the same **Option** code. So we need to either change the size ranges or the option code.



- u. Click on the **Option** field and press **F9** to display a **LOV**. Select the **Option Code 30001** from the **LOV**

- v. The **Option** field will be set to **30001**
- w. Change the size range to **1" to 24"** and save the changes. The system should not report any errors

- x. Click on the **Go To Next Block** icon to view the idents associated with the flange. Press **F8** to retrieve all the idents. System will display only those Idents whose size / schedules match the entries in **Geometric** table **P_BI_1NPS_1SCH** in the size range **1" to 24"**.

S.50.06 Specification Management: Window 3

Specification Items Spec Code **RC_1CS150** Validation Build Idents Batch

Short Code **PIP** Group **P** Part **PP** Option **30001** Commodity Code **PPPABQPEACQAAG** From **1** To1 **24**

From To3 From To4

Commodity Description **Pipe, B36.10M, PE, A 106 Gr. A, SMLS**

Geometric Nominal Sizes Schedules

0 0

SPEC ITEM IDENTs Missing Nom. Sizes

Ident	Ident Code	Input 1	Input 2	Input 3	Input 4
128200	I0128200	1	S-10	0	0
128202	I0128202	1	S-160	0	0
128203	I0128203	1	S-30	0	0
128205	I0128205	1	S-5	0	0
128208	I0128208	1	S-STD	0	0
128209	I0128209	1	S-XS	0	0
128210	I0128210	1	S-XXS	0	0
128222	I0128222	1.5	S-10	0	0
128224	I0128224	1.5	S-160	0	0

- y. Close the **"S.50.06 Specification Management: Window 3"** to return back to the Item screen.
- z. In the **Geometric** tab erase the entry in the **Geometric 1** field and Save the changes.

S.50.06 Specification Management: Window 2

Specification Headers

Spec Type: **SDB_SPECS**

Spec Code: **RC_1CS150**

☐ Enable Spec Compare

SPEC DESCRIPTION

Short Desc: **Class 150, CS**

Description: **Class 150, Carbon Steel, 0.063" C.A., Process**

Missing Idents **Validation** **Build C**

Specification Items **Create Functional**

Layout: **GEOMETRIC**

Seq	Short Code	Group	Part	Option	Geometric 1	From 1	To 1	Unit
10	PIP	XX_GRP_RC	XX_PART_RC	1		1	24	in
20	PIP	P	PP	30001		1	24	in

- aa. Click on the **Go To Next Block** icon to view the idents associated with the second pipe. Press **F8** to retrieve all the idents. Now the system will display only those Idents that are valid for the Spec based on the filter **X_<Init>_BI_1NPS_1SCH** specified in the **Spec Header Geometrics** tab.

S.50.06 Specification Management: Window 3

Specification Items Spec Code: **RC_1CS150** **Validation** **Build Idents** **Batc**

Short Code: **PIP** Group: **P** Part: **PP** Option: **30001** Commodity Code: **PPPABQPEACQAAG** From: **1** To1: **24**

From: To3: From: To4:

Commodity Description: **Pipe, B36.10M, PE, A 106 Gr. A, SMLS**

Geometric: Nominal Sizes: **0** Schedules: **0**

SPEC ITEM IDENTIS **Missing Nom. Sizes**

Ident	Ident Code	Nps1	Sch1	Input 3	Input 4
128209	I0128209	1	S-XS	0	0
128316	I0128316	2	S-XS	0	0
128387	I0128387	3	S-XS	0	0
128433	I0128433	4	S-XS	0	0
128467	I0128467	6	S-XS	0	0

- bb. Close the **"S.50.06 Specification Management: Window 3"** to return back to the Item screen.
- cc. Click on the blank row and add a flange as **Spec Item 30** by setting the **Short Code** to **FLG**, **Group** to **F** and **Part** to **SW**.

S.50.06 Specification Management: Window 2

Specification Headers

Spec Type: SDB_SPECS

Spec Code: RC_1CS150

☐ Enable Spec Compare

SPEC DESCRIPTION

Short Desc: Class 150, CS

Description: Class 150, Carbon Steel, 0.06

Missing Idents

Validation

Specification Items

Create Functional

Seq	Short Code	Group	Part	Option	Commodity Code
10	PIP	XX_GRP_RC	XX_PART_RC	1	XXX_BRPEAY1AAG
20	PIP	P	PP	30001	PPPABQPEACQAAG
30	FLG	F	SW	1	

LAYOUT Geometri

dd. In the layout tab click on the **Commodity Code** and press **F9** to select a from **LOV**

ee. Click on the **Group** field of the **Table** **P_MATERIAL** and select **FORG_US** from the **LOV**. Then select the **table detail Y1** from the second **LOV**. Click on the **Find** button to search for the flange we created earlier.

S.50.06 Specification Management: Window 2

Specification Headers

Spec Type: SDB_SPECS

Spec Code: RC_1CS150

SPEC DESCRIPTION

Short Desc: Class 150, CS

Description: Class 150, Carbon Steel, 0.06

S.30.01 List Commodity Codes (Related to Table Details or Attribute Values)

DETAILS Attributes

Table	Table Name	Group	Table Detail
P_DIM_STD		%	%
P_END_PREP		%	%
P_MATERIAL		FORG_US	Y1
P_MAT_SYSTEM		%	%
P_RATING		%	%

Commodity Codes

Commodity Code	Description

Find Reset Query Reset All OK

ff. Select the flange **FSWABLDRFAY1ZZZ** and click the **OK** button.

S.50.06 Specification Management: Window 2

Specification Headers

Spec Type: SDB_SPECS

Spec Code:

SPEC DESCRIPTION

Short Desc: Class 150, CS

Description: Class 150, Carbon Steel

S.30.01 List Commodity Codes (Related to Table Details or Attribute Values)

DETAILS | Attributes

Sp

Tablename	Group	Table Detail
P_DIM_STD	FLG_US	BL
P_END_PREP	FLANGE	RF
P_MATERIAL	FORG_US	Y1
P_MAT_SYSTEM	US	A
P_RATING	RAT_US	D

Commodity Codes

Commodity Code	Description
FSWABLD RFAY1ZZZ	Socketweld Flange , ASME B16.5 , Class 150 , Ra

Find Reset Query Reset All OK

gg. System will assign the **Commodity Code FSWABLD RFAY1ZZZ** to spec item **30**.

S.50.06 Specification Management: Window 2

Specification Headers

Spec Type: SDB_SPECS

Spec Code: RC_1CS150

☐ Enable Spec Compare

SPEC DESCRIPTION

Short Desc: Class 150, CS

Description: Class 150, Carbon Steel, 0.063" C.A., Process

Missing Idents Validation Build Commodity Build Idents

Specification Items

Create Functional

Seq	Short Code	Group	Part	Option	Commodity Code	TAG Number	Commodity Code Layo
10	PIP	XX_GRP_RC	XX_PART_RC	1	XXX_BRPEAY1AAG		XXX_BRPEAY1AAG, □De
20	PIP	P	PP	30001	PPPABQPEACQAAG		Pipe, B36.10M, PE, A 10
30	FLG	F	SW	1	FSWABLD RFAY1ZZZ		SW Flg., B16.5, CL150, R

L A Y O U T Geometric Misc Specification Item Notes

hh. Click on the **Geometric** tab to see that the system assigned a geometric **P_FSW_DSTD_B10.19** and did not set the size range.

S.50.06 Specification Management: Window 2

Specification Headers

Spec Type: SDB_SPECS

Spec Code: RC_1CS150

☐ Enable Spec Compare

SPEC DESCRIPTION

Short Desc: Class 150, CS

Description: Class 150, Carbon Steel, 0.063" C.A., Process

Missing Idents Validation Build C

Specification Items

Create Functional

Seq	Short Code	Group	Part	Option	Geometric 1	From 1	To 1	Unit
10	PIP	XX_GRP_RC	XX_PART_RC	1		1	24	in
20	PIP	P	PP	30001		1	24	in
30	FLG	F	SW	1	P_FSW_DSTD_B1			in

Layout GEOMETRIC

- ii. We do not want to control the valid size / schedule combination for the flange at the item level, hence erase the entry in the **Geometric 1** field and change the size range to **1** to **24** in.

S.50.06 Specification Management: Window 2

Edit field

Specification Headers

Spec Type: SDB_SPECS

Spec Code: RC_1CS150

☐ Enable Spec Compare

SPEC DESCRIPTION

Short Desc: Class 150, CS

Description: Class 150, Carbon Steel, 0.063" C.A., Process

Missing Idents Validation Build C

Specification Items

Create Functional

Seq	Short Code	Group	Part	Option	Geometric 1	From 1	To 1	Unit
10	PIP	XX_GRP_RC	XX_PART_RC	1		1	24	in
20	PIP	P	PP	30001		1	24	in
30	FLG	F	SW	1		1	24	in

Layout GEOMETRIC

- jj. Save the changes
- kk. Click on the **Go To Next Block** icon to view the idents associated with the flange. Press **F8** to retrieve all the idents. Since no idents have been built for this commodity, there are no entries in the **Spec Item Idents** tab.

S.50.06 Specification Management: Window 3

Specification Items

Spec Code: RC_1CS150

Short Code: FLG, Group: F, Part: SW, Option: 1, Commodity Code: FSWABLDREFAY1ZZZ, From: 1, To1: 24

Commodity Description: SW Flg., B16.5, CL150, RFDemo Material Y1

Geometric: , Nominal Sizes: 0, Schedules: 0

Ident	Ident Code	Nps1	Sch1	Input 3	Input

- II. Click on the **Build Idents** button and Click the **Yes** button when the system asks for a confirmation to generate idents.

Forms

Would you like to create ident(s) for this specification item?

Yes No

- mm. System will display a message indicating the number of idents created. Click the **OK** button.

Forms

3 ident(s) created.

OK

- nn. System will display the generated idents. Note that only 3 idents were generated (sizes **1"**, **2"** and **3"**).

S.50.06 Specification Management: Window 3

Specification Items Spec Code **RC_1CS150** Validation Build Idents Batch

Short Code **FLG** Group **F** Part **SW** Option **1** Commodity Code **FSWABLD RFAY1ZZZ** From **1** To1 **24**

From To3 From To4

Commodity Description **SW Flg., B16.5, CL150, RFDemo Material Y1**

Geometric Nominal Sizes **0** Schedules **0**

SPEC ITEM IDENT S Missing Nom. Sizes

Ident	Ident Code	Nps1	Sch1	Input 3	Input 4
3675582	I3675582	1	S-XS	0	0
3675621	I3675621	2	S-XS	0	0
3675648	I3675648	3	S-XS	0	0

oo. To understand why it did so, **Double Click** on the **Commodity Code FSWABLD RFAY1ZZZ** to view the details of the Flange.

S.30.01 Commodity Codes

CC PROPERTIES Group/Part Description CC Description CC Layout

Group **F** Part **SW** Commodity Code **FSWABLD RFAY1ZZZ**

Short Desc **SW Flg. , B16.5 , CL150 , RF Demo Material Y1** Standard Crea

Type **Table Detail Based** Rule **P_FLANGE** Object **P_1M1S_E**

Attribute Set Commodity Rule

DETAILS Attributes Symbols Additional TAG Info S2008 Commodity Geometric Relations

Build One Commodity Build Ident Build CC for Part(s) Build CC with Range ☒ Check Double

Digit from /to ☒ All ☐ Only required tables(S.10.01)

Digit	from /to	Tablename	Group	Detail	Use
4	4	P_SYSTEM	US	A	<input checked="" type="checkbox"/>
5	6	P_DIM_STD	FLG_US	BL	<input checked="" type="checkbox"/>
7	7	P_RATING	RAT_US	D	<input checked="" type="checkbox"/>
8	9	P_END_PREP	FLANGE	RF	<input checked="" type="checkbox"/>
10	10	P_MAT_SYSTEM	US	A	<input checked="" type="checkbox"/>
11	12	P_MATERIAL	FORG_US	Y1	<input checked="" type="checkbox"/>

TD DESCRIPTION	TG Description	Range
Short Desc		Description
, B16.5		, ASME B16.5
, CL150		, Class 150
, RF		, Raised Face
Demo Material Y1		Y1

pp. Click on the **Commodity Geometric Relations** tab to view geometric table and size limitations for ident creation.

- i. Note that the geometric table **P_BI_1NPS_1SCH** was used to build identrs for size ranging from **.5"** to **3"**. This explains why sizes greater than **3"** were not built.
- ii. However the table **P_BI_1NPS_1SCH** has other size / schedule combinations such as **.5", 1", 1.5", 2"** for which identrs were not created.

S.30.01 Commodity Codes

Group	Part	Commodity Code	Short Desc
F	SW	FSWABLDRFAY1ZZZ	SW Flg., B16.5, CL150, R

Type: Table Detail Based Rule: P_FLANGE Object: P_1N1S_E

Attribute Set: Commodity Rule: ☐

CC PROPERTIES

Details | Attributes | Symbols | Additional TAG Info

Date/Time created: 20-JAN-2009 13:49:19 Geometric: P_BI_1NPS_1SCH Project/PG: SDB From: .5 To: 3

☒ Ident? ☐ Manual?

Geom Details

Unit System	NPS1	SCH1	Unused	Unused	Unused
IMP/MET	.5	S-10	0	0	0
IMP/MET	.5	S-10S	0	0	0
IMP/MET	.5	S-160	0	0	0
IMP/MET	.5	S-30	0	0	0
IMP/MET	.5	S-40	0	0	0
IMP/MET	.5	S-40S	0	0	0
IMP/MET	.5	S-5	0	0	0

qq. To understand why identrs were not created for all the size /schedule combinations we need to review the spec filter.

rr. Close the Commodity Code and Item screens and return back to the **"S.50.06 Specification Management"** screen.

S.50.06 Specification Management

Specification Headers

Display Options

☐ Project Only
 ☒ Highest Rev. issued or not
☐ Product Group Only
 ☐ All
☒ Both
 ☐ Not issued and highest Rev

Additional Info
 Delete Spec
 Build Idents - All Specs
 Copy Spec
 Force Delete Spec
 Common SHGs
 Revise Spec
 Batch (Build Comm

Spec Type	Spec Code	PN / Class	Ctrl
SDB_SPECS	RC_1CS150		1

SPEC REVISIONS				Spec Header Description	Spec Type Description	Variable /	
Rev	Issued	Published	Active	Revise	Date	XRev	Version
0	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		0	0
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>			
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>			
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>			
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>			
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>			
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>			
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>			
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>			
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>			

SPEC HEADER GEOMETRIC | Specification Groups | Specification Details | Specification Notes | Specification Limits

Ident	Filter	Create	Unit System	Short Code	Group	Part	Table Type	Table Name	From1	To1	From2	To2
	<input checked="" type="checkbox"/>	<input type="checkbox"/>	IMP/MET	90%			Branches	RC_1CS150_BR_9	1	24	1	24
	<input type="checkbox"/>	<input type="checkbox"/>	IMP/MET	%			Nominal Sizes	X_RC_D0024	1	24		
	<input type="checkbox"/>	<input type="checkbox"/>	IMP/MET	GSK			User defined	SDB_1CS150_GSK	1	24	3	4
	<input checked="" type="checkbox"/>	<input type="checkbox"/>	IMP/MET	%			User defined	X_RC_BI_1NPS_1	1	6		

- ss. In the **Spec Header Geometric** tab, **Double Click** on the Spec Filter **X_<Init>_BI_1NPS_1SCH** to view the Size / Schedule combinations valid for this spec. As you can see from the screen below only the sizes **1", 2", 3", 4", 5"** and **6"** with a schedule **S-XS** are allowed. Hence only three idents were created for the flange, one each for **1", 2"** and **3"** with schedule **S-XS**.

S.40.12 Commodity Geometrics: Window 2

Geometric Table Definition

Calc Geom
 Apply Calculation

Geometric
 X_RC_BI_1NPS_1SC

Short Desc
 1NPS 1SC

Geom Details

Copy Geom

Unit System	NPS1	SCH1	P_NULL
IMP/MET	1	S-XS	
IMP/MET	2	S-XS	
IMP/MET	3	S-XS	
IMP/MET	4	S-XS	
IMP/MET	6	S-XS	

- tt. Click on the **Report** Icon and print the Spec using the **S.50.R.US.03 PIP Spec Report** (or any other Spec Report if the PIP Spec Report is not available). From **LOV** select your spec name and click on the **Start Report** button. System should display a pdf file showing the Spec header details, Pressure / Temperature Ratings, Branch Table, Notes and the Items.

Piping Material Specification Line Class:RC_1CS150

Rev. No.: 0

P_SERVICE:

RATING CLASS:

P_TEMP_LIMIT:

P_MATERIAL_TYPE:

P_STRESS_RELIEF:

GENERAL NOTES:

Process

Tap-003

-20F to 800F

Carbon Steel

Per ASME B31.3

10

CORROSION ALLOW.:

P_RATING_CLASS:

P_CORR_ALLOWANCE:

P_DESIGN_CODE:

P_EXAMINATION:

0.063 in. (1.6 mm)

150, ASME B16.5a - 1998

0.063 in (0.05 in MIN)

ASME B31.3-1999

Per ASME B31.3

Pressure - Temperature Ratings

Temp.C	-29	93	149	204	260	371	427
Press. kPag	285	260	230	200	170	110	80

Temp.F	-20	200	300	400	500	700	800
Press. Psig	41	38	33	29	25	16	12

ITEM	Rev. Notes	NPS1	NPS2	Comm.Code	Description
Demo Group XX RC		1 - 24	-	XXX_BRPEAY1AAG	XXX_BRPEAY1AAG.Demo Group XX RC,Demo Part RC SMLS ,Demo Material Y1, B36.19M PE
Pipes & Tubes		1 - 24	-	PPPABQPEACQAAG	Pipe, B36.10M, PE, A 106 Gr. A, SMLS
Flanges		1 - 24	-	FSWABLDRFAY1ZZZ	SW Flg., B16.5, CL150, RFDemo Material Y1

Piping Material Specification Line Class:RC_1CS150
Rev. No.: 0

90 Degree BRANCH CONNECTION
Legend and chart

NOTES:

Branchtable: RC_1CS150_

Legend:

RPA	Reinforcing Pad
WEL	Weldolet
ETE	Equal Tee
SOC	Sockolet
RWE	Reinforcing Weld
RTE	Red. Tee
TEE	Eq. Tee

B
R
A
N
C
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24	TEE																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																			
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- uu. Close all the screens

Lab 24. Create a new Spec

- a. Launch **"S.50.06 Specification Management"**
- b. **Add the Header**
 - i. Ensure you are in the **Query Mode** and search for the Spec **1CA1S01**
 - ii. **Click** on the first blank row and **Duplicate above record** by pressing **F4**. The system will duplicate the previous row details.
 - iii. Change the name of the **Spec** to **<Init>_2CS150**
 - iv. Save the changes
- c. **Add Header Geometrics**
 - i. In the **Spec Header Geometric** tab add the branch details by, entering a **Short Code** of **90%**, **Table Type** of **Branch Filter** and **Table Name** of **BR1CA1S01** and size range **1 – 24, 1 – 24**. Check the **Filter** checkbox.
 - ii. Similarly specify the nominal sizes by, entering a **Short Code** of **%**, **Table Type** of **Nominal Sizes** and **Table Name** of **1CA1S01** and specifying size range **1 – 24**. Do not check the **Filter** checkbox.
 - iii. Specify the spec filter to limit the size schedule combinations for all components in the spec by, entering a **Short Code** of **%**, **Table Type** of **User Defined Filter** and **Table Name** of **P_BI_1NPS_1SCH** and size range **1 – 24**. Check the **Filter** checkbox.
 - iv. Save the changes
- d. **Specify Spec Details**
 - i. Click on the **Specification Groups** tab and add following groups via **LOV**

Seq	Table Name	Group
1	P_SERVICE	ALL
2	P_RATING_CLASS	ANSI
3	P_TEMP_LIMIT	ALL
4	P_CORR_ALLOWANCE	ALL
5	P_MATERIAL_TYPE	ANSI
6	P_DESIGN_CODE	ANSI
7	P_STRESS_RELIEF	ANSI
8	P_EXAMINATION	ANSI

- ii. Click on the **Specification Details** tab and add following details via **LOV**

Seq	Table Name	Group	Detail
1	P_SERVICE	ALL	AA
2	P_RATING_CLASS	ANSI	AA
3	P_TEMP_LIMIT	ALL	AA
4	P_CORR_ALLOWANCE	ALL	AA
5	P_MATERIAL_TYPE	ANSI	AA
6	P_DESIGN_CODE	ANSI	AA
7	P_STRESS_RELIEF	ANSI	AA
8	P_EXAMINATION	ANSI	AA

- iii. Save the changes

e. Add notes

- i. Click on the **Specification Notes** tab and add the predefined note **NRES-017** at the header level, using the **LOV**. **This Note** field represents the sequence in which the notes will be printed.
- ii. Save the changes

f. Specify P/T limits

- i. Click on the **Specification Limits** tab and enter the Pressure / Temperature details as follows

Pressure	Unit	Temperature	Unit
285	kPA	-29	C
260	kPA	93	C
230	kPA	149	C
200	kPA	204	C
170	kPA	260	C

- ii. Save the changes

g. Print the Spec

- i. Click on the Report Icon and **Select the Report S.50.R.US.03 PIP Spec Report** (or any other Spec Report if the PIP Spec Report is not available).
- ii. Print a copy of the Spec using the From **LOV** select your spec name and click on the **Start Report** button.
- iii. System should display a pdf file showing the Spec header details, Pressure / Temperature Ratings, Branch Table and Notes. Note that no items are printed.

- h. Close all the screens

Lab 25. Add Pipes to the Spec

- Launch **"S.50.06 Specification Management"** and **enter the query** mode
- Search for the spec you created by typing in **<Init>_2CS150** in the Spec Code and **Running the query**
- Double Click on your **Spec Code** to add the following Items

Seq	Short Code	Group	Part	Option	Commodity Code	Geometric	From1	To1	Unit	From 2	To2	Unit
10	PIP	P	PP	1	PPPABQPEACRAAG	.5	1.5	in				
20	PIP	P	PP	1	PPPABQBEADLAAB	4	24	in				
30	PIP	P	PP	1	PPPABQBEAEEAAH	26	30	in				
40	PIP	P	PP	1	PPPABQBEAEEAAH	36	48	in				

- Click on the **Go To Next Block** Icon to view **"S.50.06 Specification Management Window 3"** to view the list of associated idents with each item and generate any missing idents.
- Click on the **Report** Icon and print the Spec using the **S.50.R.US.03 PIP Spec Report** (or any other Spec Report if the PIP Spec Report is not available). From **LOV** select your spec and click on the **Start Report** button. System should display a pdf file showing the Spec header details, Pressure / Temperature Ratings, Notes and the Items.
- Close all the screens

Lab 26. Add Flanges to the Spec

- Launch **"S.50.06 Specification Management"** and **enter the query** mode
- Search for the spec you created by typing in **<Init>_2CS150** in the Spec Code and **Running the query**
- Double Click on your **Spec Code** to add the following Items to the spec

Seq	Short Code	Group	Part	Option	Commodity Code	Geometric	From1	To1	Unit	From 2	To2	Unit
50	FLG	F	SW	1	FSWABLDRFACGZZZ	.5	1.5		in			
60	FLG	F	SW	211	FSWABLDFFACGZZZ	.5	1.5		in			
70	FLG	F	SW	773	FSWABLIRFACGZZZ	.5	1.5		in			
80	FLG	F	SO	1	FSOABLDRFACGZZZ	2	24		in			
90	FLG	F	SO	211	FSOABLIRFACGZZZ	2	24		in			
100	FLG	F	WN	171	FWNABLDRFACGZZZ	2	24		in			
120	FLG	F	WN	221	FWNABLIRFACGZZZ	2	24		in			
130	FLG	F	WN	1	FWNABJDRFACGZZZ	26	48		in			

- Click on the **Go To Next Block** Icon to view **"S.50.06 Specification Management Window 3"** to view the list of associated idents and generate any missing idents.
- Click on the **Report** Icon and print the Spec using the **S.50.R.US.03 PIP Spec Report** (or any other Spec Report if the PIP Spec Report is not available). From **LOV** select your spec and click on the **Start Report** button. System should display a pdf file showing the new items.
- Close all the screens

Lab 27. Add Gaskets to the Spec

- Launch **"S.50.06 Specification Management"** and **enter the query** mode
- Search for the spec you created by typing in **<Init>_2CS150** in the Spec Code and **Running the query**
- Click on the **Spec Header Geometric** tab
- Specify the spec filter to limit the size schedule combinations for Gaskets in the spec by, entering a **Short Code** of **GSK**, **Table Type** of **User Defined Filter** and **Table Name** of **1CA1S01_GSK** and size range **0.5 – 24, 3 - 4**. Do not check the **Filter checkbox**.
- Save the changes
- Double Click on your **Spec Code** to add the following Items to the spec

Seq	Short Code	Group	Part	Option	Commodity Code	Geometric	From1	To1	Unit	From 2	To2	Unit
140	GSK	G	SW	1	GSWAB7DFFABBZZZ	1CA1S01_GSK	.5	24	in			
150	GSK	G	SW	1	GSWAB6DRFABBZZZ	1CA1S01_GSK	26	48	in			
160	GSK	G	SW	773	GSWAB6IRFABBZZZ	1CA1S01_GSK	.5	24	in			

- Click on the **Go To Next Block** Icon to view **"S.50.06 Specification Management Window 3"** to view the list of associated idents and generate any missing idents.
- Click on the **Report** Icon and print the Spec using the **S.50.R.US.03 PIP Spec Report** (or any other Spec Report if the PIP Spec Report is not available). From **LOV** select your spec name and click on the **Start Report** button. System should display a pdf file showing the new items.
- Close all the screens

Lab 28. Add Gate Valves to the Spec

- a. Launch **"S.50.06 Specification Management"** and **enter the query** mode
- b. Search for the spec you created by typing in **<Init>_2CS150** in the Spec Code and **Running the query**
- c. Double Click on your **Spec Code** to add the following Items to the spec

Seq	Short Code	Group	Part	Option	Commodity Code	Geometric	From1	To1	Unit	From 2	To2	Unit
180	VGAT	VG	R	1	VGRAAADRFAFACDAAEA1A	.5	2		in			
190	VGAT	VG	R	521	VGRAAXMSWAFACGAAPA1H	.5	2		in			
200	VGAT	VG	R	714	VGRAAXMSFAFACGAAGA1G	.5	2		in			
210	VGAT	VG	R	1	VGRAAADRFAFACDAAGA1B	3	24		in			
220	VGAT	VG	R	1	VGRAAADFFAFACDAAGA1N	26	48		in			

- j. Click on the **Go To Next Block** Icon to view **"S.50.06 Specification Management Window 3"** to view the list of associated idents and generate any missing idents.
- d. Click on the **Report** Icon and print the Spec using the **S.50.R.US.03 PIP Spec Report** (or any other Spec Report if the PIP Spec Report is not available). From **LOV** select your spec name and click on the **Start Report** button. System should display a pdf file showing the new items.
- e. Close all the screens

Lab 29. Add Globe Valves to the Spec

- Launch **"S.50.06 Specification Management"** and **enter the query** mode
- Search for the spec you created by typing in **<Init>_2CS150** in the Spec Code and **Running the query**
- Double Click on your **Spec Code** to add the following Items to the spec

Seq	Short Code	Group	Part	Option	Commodity Code	Geometric	From1	To1	Unit	From 2	To2	Unit
230	VGLB	VL	R	1	VLRAAXMSWAFACGAAGAAD	.5	2		in			
240	VGLB	VL	R	1	VLRAAADRFACDAAGAAD	3	12		in			

- Click on the **Go To Next Block** Icon to view **"S.50.06 Specification Management Window 3"** to view the list of associated idents and generate any missing idents.
- Click on the **Report** Icon and print the Spec using the **S.50.R.US.03 PIP Spec Report** (or any other Spec Report if the PIP Spec Report is not available). From **LOV** select your spec name and click on the **Start Report** button. System should display a pdf file showing the new items.
- Close all the screens

Lab 30. Add Check Valves to the Spec

- Launch **"S.50.06 Specification Management"** and **enter the query** mode
- Search for the spec you created by typing in **<Init>_2CS150** in the Spec Code and **Running the query**
- Double Click on your **Spec Code** to add the following Items to the spec

Seq	Short Code	Group	Part	Option	Commodity Code	Geometric	From1	To1	Unit	From 2	To2	Unit
250	VCHK	VC	BC	1	VCBCAAXMSWAACG1AGZZZ	.5	2		in			
260	VCHK	VC	SC	1	VCSCAAADRFAACD1AGZZZ	3	24		in			
270	VCHK	VC	SC	1	VCSCAAADRFAACD1AGAAL	26	48		in			
280	VCHK	VC	WX	33	VCWXAA2DRT1ACD1CVAAM	3	24		in			
290	VCHK	VC	WX	33	VCWXAA2DRT1ACD1CVAAL	26	48		in			

- Click on the **Go To Next Block** Icon to view **"S.50.06 Specification Management Window 3"** to view the list of associated idents and generate any missing idents.
- Click on the **Report** Icon and print the Spec using the **S.50.R.US.03 PIP Spec Report** (or any other Spec Report if the PIP Spec Report is not available). From **LOV** select your spec name and click on the **Start Report** button. System should display a pdf file showing the new items.
- Close all the screens

Lab 31. Add Ball Valves to the Spec

- a. Launch **"S.50.06 Specification Management"** and **enter the query** mode
- b. Search for the spec you created by typing in **<Init>_2CS150** in the Spec Code and **Running the query**
- c. Double Click on your **Spec Code** to add the following Items to the spec

Seq	Short Code	Group	Part	Option	Commodity Code	Geometric	From1	To1	Unit	From 2	To2	Unit
300	VBAL	VB	M	1	VBMAAXMSWACDACAZZZ	.5	2		in			
310	VBAL	VB	M	1	VBMAAADRFACDACAZZZ	3	6		in			
320	VBAL	VB	L	24	VBMAAADRFACDACAZZZ	3	6		in			
330	VBAL	VB	L	24	VBMAAADRFABACDACAZZZ	8	24		in			
340	VBAL	VB	L	24	VBMAAADRFABACDACA1S	26	48		in			
350	VBAL	VB	M	1	VBMAAADRFABACDACAZZZ	8	24		in			
360	VBAL	VB	M	1	VBMAAADRFABACDACA1S	26	48		in			

- d. Click on the **Go To Next Block** Icon to view **"S.50.06 Specification Management Window 3"** to view the list of associated idents and generate any missing idents.
- e. Click on the **Report** Icon and print the Spec using the **S.50.R.US.03 PIP Spec Report** (or any other Spec Report if the PIP Spec Report is not available). From **LOV** select your spec name and click on the **Start Report** button. System should display a pdf file showing the new items.
- f. Close all the screens

Lab 32. Add 90 Deg Elbows to the Spec

- Launch **"S.50.06 Specification Management"** and **enter the query** mode
- Search for the spec you created by typing in **<Init>_2CS150** in the Spec Code and **Running the query**
- In the **Spec Header Geometric** tab add the branch details by, entering a **Short Code** of **90%**, **Table Type** of **Branch Filter** and **Table Name** of **BR1CA1S01** and size range **0.75 – 24, .5 – 20**. Check the **Filter checkbox**.
- Save the changes
- Double Click on your **Spec Code** to add the following Items to the spec

Seq	Short Code	Group	Part	Option	Commodity Code	Geometric	From1	To1	Unit	From 2	To2	Unit
370	E90	O	E90	1	OE90AB2SSWACGZZZ		.5	1.5	in			

- Click on the **Go To Next Block** Icon to view **"S.50.06 Specification Management Window 3"** to view the list of associated idents and generate any missing idents.
- Click on the **Report** Icon and print the Spec using the **S.50.R.US.03 PIP Spec Report** (or any other Spec Report if the PIP Spec Report is not available). From **LOV** select your spec name and click on the **Start Report** button. System should display a pdf file showing the new items.
- Close all the screens

Lab 33. Add 45 Deg Elbows to the Spec

- a. Launch **"S.50.06 Specification Management"** and enter the query mode
- b. Search for the spec you created by typing in **<Init>_2CS150** in the Spec Code and
Running the query

- c. Double Click on your **Spec Code** to add the following Items to the spec

Seq	Short Code	Group	Part	Option	Commodity Code	Geometric	From1	To1	Unit	From 2	To2	Unit
440	E45	O	E45	1	OE45AB2SSWACGZZZ		.5	1.5	in			

- d. Click on the **Go To Next Block** Icon to view **"S.50.06 Specification Management Window 3"** to view the list of associated idents and generate any missing idents.
- e. Click on the **Report** Icon and print the Spec using the **S.50.R.US.03 PIP Spec Report** (or any other Spec Report if the PIP Spec Report is not available). From **LOV** select your spec name and click on the **Start Report** button. System should display a pdf file showing the new items.
- f. Close all the screens

Lab 34. Add Swages to the Spec

- Launch **"S.50.06 Specification Management"** and **enter the query** mode
- Search for the spec you created by typing in **<Init>_2CS150** in the Spec Code and **Running the query**
- Double Click on your **Spec Code** to add the following Items to the spec

Seq	Short Code	Group	Part	Option	Commodity Code	Geometric	From1	To1	Unit	From 2	To2	Unit
380	SWGC	O	SGC	1	OSGCAM8BEACKZZZ		.75	1.5	in	.5	1	in
390	SWGE	O	SGE	1	OSGEAM8BEAS7AAC		.75	1.5	in	.5	1	in

- Click on the **Go To Next Block** Icon to view **"S.50.06 Specification Management Window 3"** to view the list of associated idents and generate any missing idents.
- Click on the **Report** Icon and print the Spec using the **S.50.R.US.03 PIP Spec Report** (or any other Spec Report if the PIP Spec Report is not available). From **LOV** select your spec name and click on the **Start Report** button. System should display a pdf file showing the new items.
- Close all the screens

Lab 35. Add Olets to the Spec

- Launch **"S.50.06 Specification Management"** and **enter the query mode**
- Search for the spec you created by typing in **<Init>_2CS150** in the Spec Code and **Running the query**
- Double Click on your **Spec Code** to add the following Items to the spec

Seq	Short Code	Group	Part	Option	Commodity Code	Geometric	From1	To1	Unit	From 2	To2	Unit
400	90SOL	O	SOC	1	OSOCAM9SSWACGZZZ	3	48	in	.5	2	in	
410	90TOL	O	THL	1	OTHLAM9STFACGZZZ	3	48	in	.5	2	in	
420	EBL	O	EBL	1	OEBLAP2SSWACGZZZ	3	48	in	.5	1.5	in	
430	EBL	O	EBL	541	OEBLAP2STFACGZZZ	3	48	in	.5	1.5	in	
450	45LOL	O	L45	1	OL45AP2SSWACGZZZ	3	48	in				
460	45LOL	O	L45	541	OL45AP2STFACGZZZ	3	48	in				

- Click on the **Go To Next Block** Icon to view **"S.50.06 Specification Management Window 3"** to view the list of associated idents and generate any missing idents.
- Click on the **Report** Icon and print the Spec using the **S.50.R.US.03 PIP Spec Report** (or any other Spec Report if the PIP Spec Report is not available). From **LOV** select your spec name and click on the **Start Report** button. System should display a pdf file showing the new items.
- Close all the screens

Lab 36. Issue / Revise / Publish Spec

- Launch the “**S.50.13 Issue / Release Project Spec**” screen
- Find the spec <Init>_1CS150 you created in previous Lab

S.50.13 Issue/Release Project Spec

Specification Revisions

Project / PG	Revision	Rev. Character	Revision Date	Active	Display
SDB	2		17-DEC-2008	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>

Display Options

☐ Project Only
 ☒ Project Revision
☐ Product Group Only
 ☐ Spec Revision
☒ Both
 ☐ Highest Spec Revision

Specification Headers

Issue	Published	Revise	Spec Type	Spec Code	Rev No.	Date	XRev	Version	Short Desc	Description
<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	SDB_P1057	010CA01B1	0				PN 10 P235GH	Standard Spec PN 10 Pipe M
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	SDB_P1057	010CA01B1	1		1	0	PN 10 P235GH	Standard Spec PN 10 Pipe M
<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	SDB_P1057	010CC01B1	0		0	0	PN 10 16Mo3	Standard Spec PN 10 Pipe M
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	SDB_P1057	010HC01B1	0		0	0	PN 10 1.4541	Standard Spec PN 10 Pipe M
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	SDB_P1057	010HC01B1	1		0	1	PN 10 1.4541	Standard Spec PN 10 Pipe M
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	SDB_SPECS	1CS150	1		0	1	Class 150, CS, Proc.	Class 150, Carbon Steel, 0.0
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	SDB_SPECS	1CS150	2		0	2	Class 150, CS, Proc.	Class 150, Carbon Steel, 0.0
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	SDB_SPECS	DEMO_1CS150	0		0	1	Class 150, CS	Class 150, Carbon Steel, 0.0
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	SDB_SPECS	P621	0		0	0	P621	P621
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	SDB_SPECS	RC_1CS150	0		0	0	Class 150, CS	Class 150, Carbon Steel, 0.0
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	SDB_SPECS	SDB_1CS150	0		0	0	Class 150, CS	Class 150, Carbon Steel, 0.0

- Click the **Issued** checkbox and **Save** the changes to issue the spec
- The system will prompt you for a confirmation and inform you that the spec will be frozen; additional changes would not be possible without revising the spec. **Click** the **Yes** button.

Store spec item ids?

Do you want to store the spec item ids permanently?
This means that the result of ids for this specification will be frozen. This can take some time.

Yes No Cancel

S.50.13 Issue/Release Project Spec

Specification Revisions

Project / PG: SDB Revision: 2 Rev. Character: Revision Date: 17-DEC-2008 Active: ☒ Display: ☒

Display Options

☐ Project Only ☒ Project Revision
☐ Product Group Only ☐ Spec Revision
☒ Both ☐ Highest Spec Revision

Specification Headers

Issue	Published	Revise	Spec Type	Spec Code	Rev No.	Date	XRev	Version	Short Desc	Description
<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	SDB_P1057	010CA01B1	0				PN 10 P235GH	Standard Spec PN 10 Pipe Mate
<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	SDB_P1057	010CA01B1	1		1	0	PN 10 P235GH	Standard Spec PN 10 Pipe Mate
<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	SDB_P1057	010CC01B1	0		0	0	PN 10 16Mo3	Standard Spec PN 10 Pipe Mate
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	SDB_P1057	010HC01B1	0		0	0	PN 10 1.4541	Standard Spec PN 10 Pipe Mate
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	SDB_P1057	010HC01B1	1		0	1	PN 10 1.4541	Standard Spec PN 10 Pipe Mate
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	SDB_SPECS	1CS150	1		0	1	Class 150, CS, Proc.	Class 150, Carbon Steel, 0.063"
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	SDB_SPECS	1CS150	2		0	2	Class 150, CS, Proc.	Class 150, Carbon Steel, 0.063"
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	SDB_SPECS	DEMO_1CS150	0		0	1	Class 150, CS	Class 150, Carbon Steel, 0.063"
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	SDB_SPECS	P621	0		0	0	P621	P621
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	SDB_SPECS	RC_1CS150	0		0	0	Class 150, CS	Class 150, Carbon Steel, 0.063"

- e. Close all screens
- f. Open the **"S.50.06 Specification Management"** screen and navigate to your spec. Verify that the issued check box is turned on.

S.50.06 Specification Management

Specification Headers

Display Options

☐ Project Only ☒ Highest Rev. issued or not
☐ Product Group Only ☐ All
☒ Both ☐ Not issued and highest Rev

Additional Info

Delete Spec

Build Idents - All Spec

SPEC REVISIONS

Spec Type	Spec Code	PN / Class	Ctrl	Rev	Issued	Published
SDB_SPECS	RC_1CS150		1	0	<input checked="" type="checkbox"/>	<input type="checkbox"/>
					<input type="checkbox"/>	<input type="checkbox"/>

- g. Double click on the spec to view the spec item. Note the Add / Delete icons are disabled and you cannot add, modify or delete items.

S.50.06 Specification Management: Window 2

Specification Headers

Spec Type
SDB_SPECS

Spec Code
RC_1CS150

☐ Enable Spec Compare

SPEC DESCRIPTION

Short Desc
Class 150, CS

Description
Class 150, Carbon Steel, 0.063"

Missing Idents

Validation

Specification Items

Create Functional

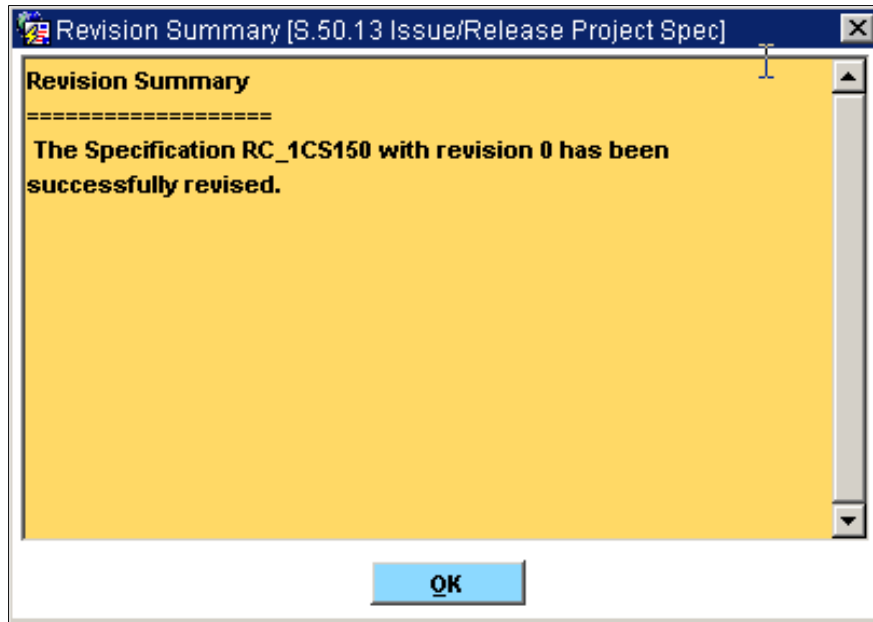
Seq	Short Code	Group	Part	Option	Commodity Code
10	PIP	XX_GRP_RC	XX_PART_RC	1	XXX_BRPEAY1AAG
20	PIP	P	PP	30001	PPPABQPEACQAAG
30	FLG	F	SW	1	FSWABLDRFAY1ZZZ

L A Y O U T Geometric

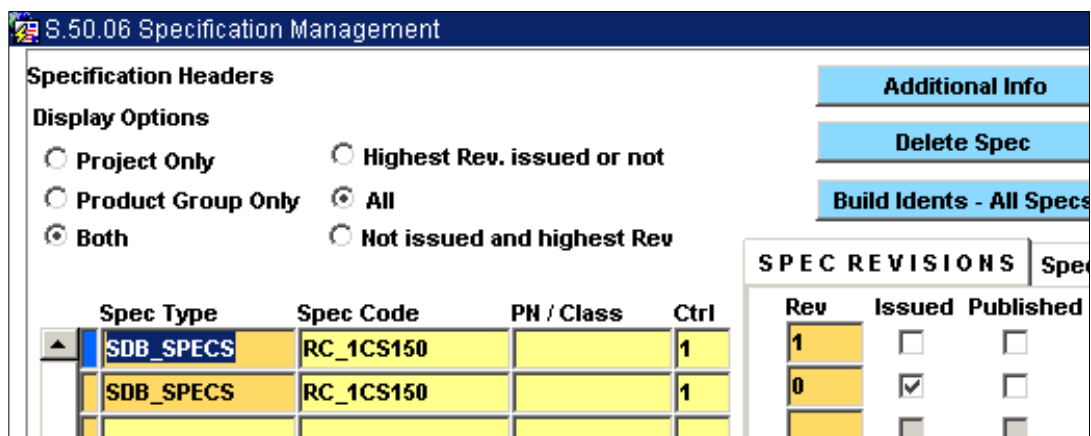
h. Close all screens

Lab 37. Revise a Spec

- Open the **"S.50.13 Issue / Release Project Spec"** screen
- Navigate to the spec **<Init>_1CS150** you issued above
- Select it and **click** on the **Revise Spec** button. The system will display a message, indicating that your spec has been successfully revised. **Click** the **OK** button.



- Close all the screens
- Open the **"S.50.06 Specification Management"** and press **F8** to retrieve all specs. Check the **Display All** radio button to show all the revs for the specs.
- Search for your spec **<Init>_1CS150** and verify that the issued **check box** is checked only for rev 0 and not for rev 1.



- g. **Double click** on the rev 1 of your Spec <Init>_1CS150 to view the spec items. Note the Add / Delete icons are enabled.
- h. Add following items to the spec

Seq	Short Code	Group	Part	Option	Commodity Code	Geometric	From1	To1	Unit	From 2	To2	Unit
490	90TEE	O	ETE	1	OETEAB2SSWACGZZZ	.5	1.5	in				
500	90TRE	O	RTE	1	ORTEAB2SSWACGZZZ	.75	2	in		.5	1.5	in

- i. Change the size range for the item 40 from 4 - 24 to 2 - 24

Seq	Short Code	Group	Part	Option	Commodity Code	Geometric	From1	To1	Unit	From 2	To2	Unit
40	PIP	P	PP	1	PPPABQBEADLAAB	2	24	in				

- j. Delete the first item XXX_BRPEAY<ID>AAG
- k. Check the **Enable Spec Compare** and click on the **Modifications** tab
- l. Click the **Compare All** button and review the comments in the **Changes** field
- m. Click on the **Spec Compare** tab to specify the rev numbers to be compared. The **Compare Specification** field shows the current rev of the spec. In the **With Specification** field enter a lower rev no.

S.50.06 Specification Management Window 2

Specification Headers

Spec Type: SDB_SPECS

Spec Code: RC_1CS150

☒ Enable Spec Compare

Spec Description: SPEC COMPARE

Rev	Published	Date	XRev	Version
1	<input type="checkbox"/>		0	1
With Specification	0	<input type="checkbox"/>	0	0

Specification Items

Create Functional 1 Deleted Spec Items

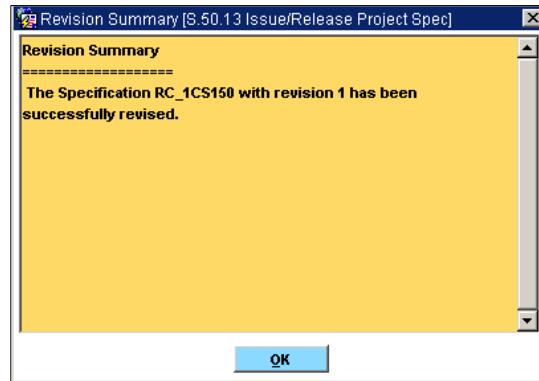
Seq	Short Code	Group	Part	Option	Modification	Changes	Compare All
20	PIP	P	PP	30001	MODIFIED	PRESENT From 1: 2 <==> COMPARED From 1:	Compare
30	FLG	F	SW	1	NO CHANGE		Compare
40	GSK	G	SW	1	NEW		Compare

- n. Close Window 2 to return to the **"S.50.06 Specification Management"**
- o. **Check** the **issued** checkbox of rev 1 and **save** the changes to issue it. The system will prompt you with a message the spec will be frozen. Click **Yes** to continue. Try to add items to the spec, the system will not let you add items or make any changes.

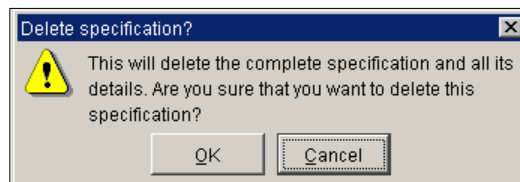
p. Close all screens

Lab 38. Delete a Spec Revision

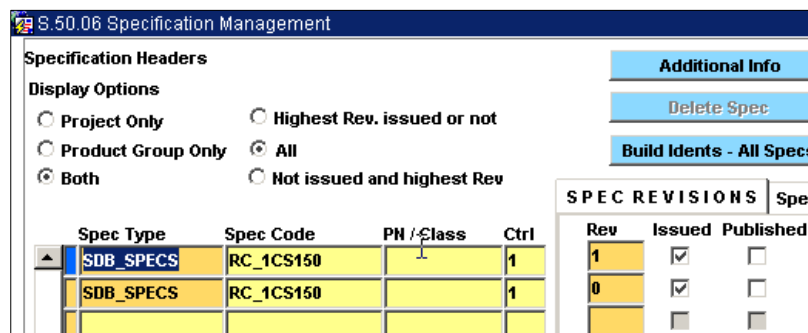
- Open the “**S.50.13 Issue / Release Project Spec**” screen.
- Navigate to Rev 1 of the spec <Init>_1CS150 and **click** on the **Revise Spec** button. The system will display a message, indicating that your spec has been successfully revised. **Click** the **OK** button.



- Close all the screens
- Open the “**S.50.06 Specification Management**” and press **F8** to retrieve all specs. Check the **Display All** radio button to show all the revs and search for your specs.
- Navigate to Rev 2 of the spec <Init>_1CS150 and **click** on the **Delete Spec** button to delete rev 2.
- The system will ask for a confirmation to delete the spec. **Click** the **OK** button.



- Search for your spec <Init>_1CS150 to confirm that rev 0 and 1 of the spec exists and only rev 2 was deleted.



- h. Close all the screens

Lab 39. Publish a Spec

- a. Launch the **“S.50.13 Issue / Release Project Spec”** screen.
- b. Check the **Published check** box for rev 1 of your spec <Init>_1CS150
- c. Save the changes.
 - i. FYI: Only Issued Specs should be published. Specs are published to keep track of distribution to external sources i.e. Client, PMT, Modeling, Fabrication etc.
 - ii. FYI: **Unissue spec** functionality should be used very sparingly, only if the spec was issued incorrectly.
 - iii. FYI: **Project Rev and Spec Rev no:** Spec Rev No are the revisions associated with a spec but the Project Rev No. are associated with the Project. A given Spec may be revised multiple times before a Project rev is bumped up. In most cases project rev no. is controlled by the client and may be based on the phase / progress of the project.
- d. Close all the screens

Lab 40. Create a Project

- a. Open the **"A.60.02.01 Create New Project"** screen
- b. Specify a Project Code <Init> **_PROJECT** & Title **Demo Project <Init>**.
- c. From the **LOV** select **DEFAULT** as the **Project Group**.
- d. Enter your **user id** as the default **user**
- e. Select **Product Group = SDB, Discipline = PIPING, Nls Description = English, Role = SUPER USER** via **LOV**

A.60.02.01 Create new Project

Parameters for Create new Project

Project	Description	Password	Project Group	Proposal Project
RC_PROJECT	Demo Project RC	*****	DEFAULT	<input type="checkbox"/>

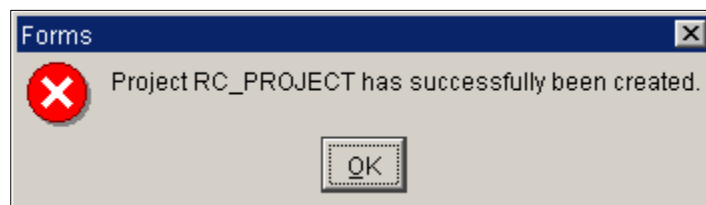
Defaults for the User Securities

User	RAJESH
Product Group	SDB
Discipline	PIPING
Nls Description	English
Role	SUPER USER
View Name	

Set default role active ☒

Create new Project

- f. Click on the **Create New Project** button to create the project. System will display a message indicating that the project was successfully created.



- g. Open “A20.12 Project Defaults” and verify the **Unit System ZX_UNITSYS** default in the **General** tab is set to **IMP/MET**.

A.20.12 Project Defaults

Projects / Product Groups

Project / PG: SDB Description: SDB Standard Catalog Company: Use Company Idents

Project / Product Group Defaults

Query Options: ☒ All ☐ With Value ☐ Mandatory No Value ☐ Mandatory ☐ Without Value ☐ Mandatory With Value

Copy Values

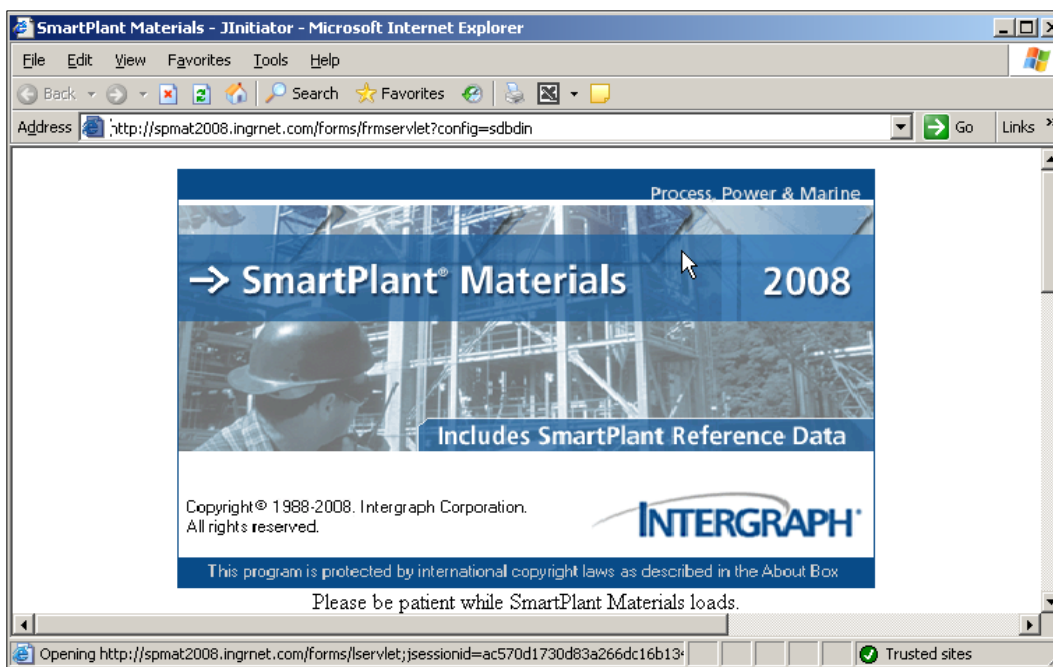
GENERAL | SPRD | E+PI (BOM) | E+PI (Req) | MSCM | Site | Integrator | Account Codes | Others

Param. Description	Parameter	Value	Value Description	Defined on	Mandatory	Default Value
Query case sensitive	ZX_QRY_CS	./.	./.	Product Group	<input type="checkbox"/>	Y
Filter data on DP	ZX_QRY_DP	./.	./.	Product Group	<input type="checkbox"/>	
Alt. reports form	ZX_REP_FMX	./.	./.	Product Group	<input type="checkbox"/>	
Spec Revision active	ZX_REV_ACT	./.	./.	Product Group	<input type="checkbox"/>	N
Superuser A.20.06.21	ZX_SUPUSER	./.	./.	Product Group	<input type="checkbox"/>	
Temperature Unit-Id	ZX_TEMPER	./.	./.	Discipline	<input type="checkbox"/>	
Project Theme	ZX_THEME	./.	./.	Product Group	<input type="checkbox"/>	
Unit for Ton	ZX_TON	./.	./.	Product Group	<input type="checkbox"/>	
Unit System	ZX_UNITSYS	5001	IMP/MET	Product Group	<input type="checkbox"/>	
Update revision	ZX_UPD_RE	./.	./.	Product Group	<input type="checkbox"/>	N
Visualization active	ZX_VISUAL	./.	./.	Product Group	<input checked="" type="checkbox"/>	N
Default Volume Unit	ZX_VOLUME	./.	./.	Product Group	<input type="checkbox"/>	
Default Weight Unit	ZX_WEIGHT	5304	kg	Product Group	<input type="checkbox"/>	
Walthickness Unit	ZX_WT_UNIT	./.	./.	Product Group	<input type="checkbox"/>	

- h. Close all screens

Lab 41. Login to a Project

- a. Launch Internet Explorer and type in the url for your SPRD installation



- b. In the Login window type in your **User Name**, **Password** and select **Working With Project**. System will display the available projects. Select the Project **<Init>_PROJECT** and **Piping** discipline.

Log On To SmartPlant Materials

User Name	RAJESH	Project	RC_PROJECT	Nls	English
Password	*****	Product Group	SDB	Role	SUPER USER
Database	SDBDIN	Discipline	PIPING	Last Analyzed	06-AUG-2008
Working With	Project	Version	2008 (6.3.2)	<input checked="" type="checkbox"/> Get Batch Re	
		Service Pack	1		

Project	Description	Product Group	Discipline	Language	Role
RC_PROJ	NEW PROJECT	SDB	EL_IN_CAT	English	SUPER USER
RC_PROJ	NEW PROJECT	SDB	INSTRUMENT	English	SUPER USER
RC_PROJ	NEW PROJECT	SDB	MECHANICAL	English	SUPER USER
RC_PROJ	NEW PROJECT	SDB	PIPING	English	SUPER USER
RC_PROJ	NEW PROJECT	SDB	STRUCTURAL	English	SUPER USER
RC_PROJECT	Demo Project RC	SDB	DEFAULT	English	SUPER USER
RC_PROJECT	Demo Project RC	SDB	ELECTRICAL	English	SUPER USER
RC_PROJECT	Demo Project RC	SDB	EL_IN_CAT	English	SUPER USER
RC_PROJECT	Demo Project RC	SDB	INSTRUMENT	English	SUPER USER
RC_PROJECT	Demo Project RC	SDB	MECHANICAL	English	SUPER USER
RC_PROJECT	Demo Project RC	SDB	PIPING	English	SUPER USER
RC_PROJECT	Demo Project RC	SDB	STRUCTURAL	English	SUPER USER

c. On successful login you will be presented with the SPRD / SP Materials Menu.

SmartPlant Materials

- SmartPlant
 - Administration
 - SmartPlant Reference Data
 - SPRD Explorer
 - S.10 Commodity Group and Parts
 - S.20 Commodity Attributes
 - S.30 Commodity Code
 - S.40 Geometric
 - S.50 Specification
 - S.60 Fluids
 - S.70 Assemblies
 - S.80 Idents
 - S.90 Common Rules
 - PDS Interface
 - PDMS Interface
 - SP3D Interface
 - I-Sketch Interface
 - SmartPlant PID Interface
 - SmartPlant Materials
 - Integrator
 - Others
 - Guided Tours
 - Discoverer
 - Company Menu
 - My Menu

Session Information

User: RAJESH

Company:

License Expire Date: 07-NOV-2009

Oracle Database Version: 10.2.0.3.0

Compatibility: 10.2.0.2.0

USID: 9454

Role: SUPER USER

Version: 2008 (6.3.2)

Service Pack: 1

Service Pack Date: 30-SEP-2008

Search for

RAJESH	RC_PROJECT	SDB	PIPING	US	English	Revision OFF
--------	------------	-----	--------	----	---------	--------------

- d. Do not log out from the project.

Lab 42. Release Spec to a Project

- a. Ensure you are logged in to the project **<Init>_Project** and **Piping** discipline.
 - i. FYI: You can **click** on the **Set Project/Discipline** button to change from Product Group to Project or from one Project to another or from one discipline to another.
- b. Open the **"A.20.10 Open Release Spec"** screen
- c. Ensure you are in the **Query** mode
- d. Select the Spec Type **SDB_SPECS** and **Run the Query**

The screenshot shows the 'A.20.10 Release Spec' window. At the top, there are three fields: 'Spec Type' with a dropdown arrow, 'Short Desc', and 'Description'. Below these is a table titled 'Specification Headers' with columns: 'Rel' (checkbox), 'Spec Code', 'Short Desc', and 'Description'. A 'Release All' button is located to the right of the table. The 'Spec Type' dropdown is set to 'SDB_SPECS'.

- e. Navigate to Rev 2 of your spec **<Init>_1CS150** and check the **Rel** checkbox.
- f. Save the changes to release the spec to your project

The screenshot shows the 'A.20.10 Release Spec' window after a query. The 'Spec Type' dropdown is still 'SDB_SPECS'. The 'Short Desc' and 'Description' fields now contain 'Sample Specs'. The 'Specification Headers' table is populated with the following data:

Rel	Spec Code	Short Desc	Description
<input type="checkbox"/>	1CS150	1	Class 150, CS, Proc.
<input checked="" type="checkbox"/>	RC_1CS150	2	Class 150, CS
<input type="checkbox"/>	SDB_1CS150-RC1	0	Class 150, CS
<input type="checkbox"/>	SDB_1CS150_RC	1	Class 150, CS, RC

The 'Release All' button is still present on the right.

- g. Close all screens

Lab 43. Copy Spec to a Project

- a. Ensure you are logged in to the project **<Init>_Project** and **Piping** discipline.
 - i. FYI: You can **click** on the **Set Project/Discipline** button to change from Product Group to Project or from one Project to another or from one discipline to another.
- b. Open **"S.50.05 Specification Copy"** screen
- c. Ensure you are in the **Data Entry** mode.
- d. Select Spec Type of **SDB_SPECS** and **Spec Code Dest** of **PROJ_<Init>_CS150**. This is the name of the new spec for the project.
- e. Enter the spec title of **Project Spec <Init>**
- f. **Save** the changes

S.50.05 Specification Copy

Specification Header

Spec Type	Spec Code Dest	Short Desc	Description
SDB_SPECS	PROJ_RC_CS150	0	Project Spec

- g. Select the Product Group **SDB** in the **Project Source** field
- h. Select the spec **1CA1S01** to be copied in the **Spec Code Source** field
- i. **Check** the **Create Log File?** Checkbox

S.50.05 Specification Copy

Specification Header

Spec Type	Spec Code Dest	Short Desc	Description
SDB_SPECS	PROJ_RC_SPEC	0	Project Spec

Specification Header Relations

Proj Source	Spec Code Source	Comm Code	Copied	Comment
SDB	SDB_1CS150	0	Insert	27-JAN-09

Header

Nls	Insert
Company	None
Interface	None
Detail	Insert
Group	Insert
Note	Insert
Geometrics	Insert
Limits	Insert
Group Notes	Insert
Append Char	

Items

Item	Insert
Company	None
Interface	None
Group	None
Note	Insert

☐ Use Order Seq

Definitions

SP3D Def.	None
Functional Def.	None

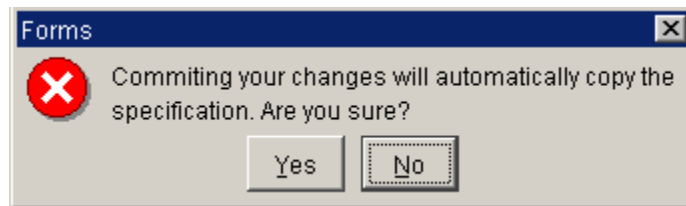
Options

☒ Create Log File?

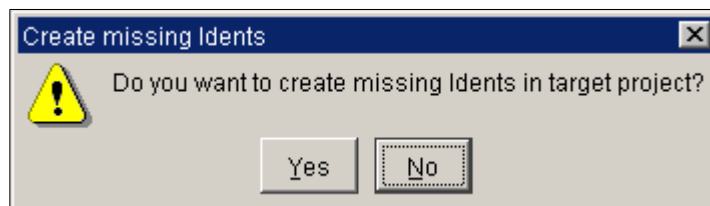
Log File

View Log File

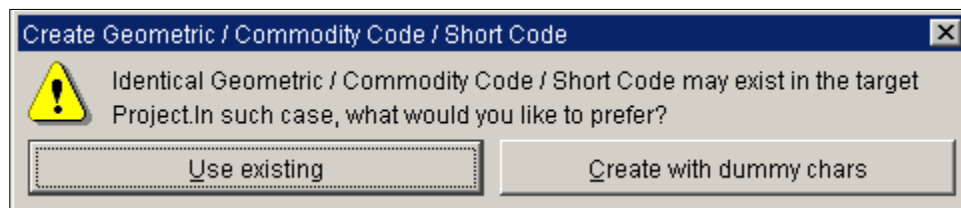
- j. Save the changes to copy the spec **1CA1S01** into **PROJ_<Init>_CS150**.
- k. System will prompt you for a confirmation to copy the spec. **Click the Yes button.**



- l. System will prompt you for a creation of missing idents in target project. **Click the No button.**



- m. System will prompt you for creation or using existing Geometric, Commodity and Short Code. **Click the Use existing button.**



- n. Close all screens