# **DESIGN STUDIO**

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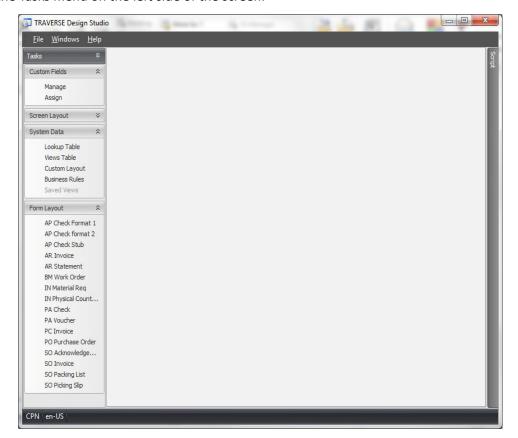
Design Studio Overview

## **DESIGN STUDIO OVERVIEW**

TRAVERSE Design Studio is a set of tools that allows you to make many kinds of customizations to your TRAVERSE applications. Though the tools vary in function and use, the goal is the same: to empower you to adapt the TRAVERSE software to your business needs.

### The TRAVERSE Design Studio Main Screen

The main screen of the TRAVERSE Design Studio gives you access to each of the design tools on the Tasks menu on the left side of the screen.



Click on one of the options under the Tasks menu to open the associated TRAVERSE Design Studio tool.

#### The Menu Bar

Click **File** to change TRAVERSE companies or to exit the TRAVERSE Design Studio.

Click Windows to view a list of the open windows.

TRAVERSE Design Studio includes the following tools:

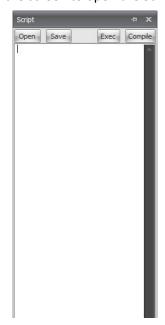
- Custom Fields
- Screen Layout
- System Data
- Form Layout
- Scripting

### The Script Window

Scripts are a specific type of programming that can be used to add functionality to the software without making changes to the source code of the program. Scripts can be used to add validations, restrictions, calculations and otherwise modify the behavior of the software.

In TRAVERSE, scripts are stored in files outside of the core software. This allows you to receive updates and enhancements to your software while generally leaving your customizations intact.

Click **Script** on the right side of the screen to open the Script window.



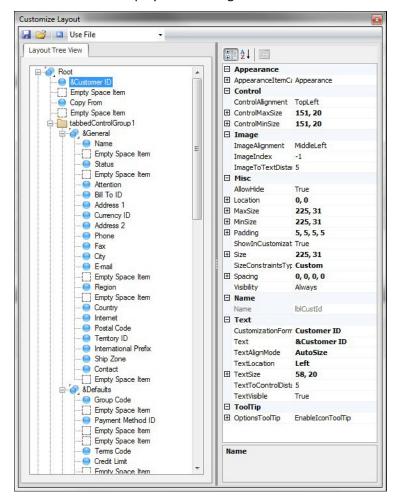
Using the Script Window, you can apply a script to a form, function, or field to modify its behavior.

NOTE: Iron Python scripting language is the recommended scripting language. You should be familiar with the scripting language prior to attempting to use scripting to change the behavior of a field.

### The Properties Window

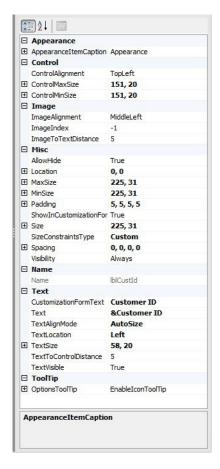
The properties of fields can be viewed and edited using the Customize Layout window.

When a Screen Layout is open with the customize layout window displayed the properties of the selected field will be displayed on the right side of the window.



A field can be selected in multiple manners: You can select the field from the layout tree view and the properties will be displayed in the properties window, or you can select the field in the design view of the form and in the customize layout window the field will be selected in the layout tree with the properties displayed.

The Properties box contains several sections to control different values within the field selected. The options for what can be changed will vary depending on the type of field that is selected.



Some of the common properties available to edit are:

Appearance: The appearance area will control things like the backcolor of the field, the font used, font size, font color, attributes of the font such as bold, italics and underline, options used for the fonts and colors and text options.

Control: The control area will control things like the allignment of the field and the minimum and maximum size of the field.

Image: The image area will control any image allignment, indexes and distance from the label to the text field.

### **DESIGN STUDIO**

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Design Studio Overview

Misc: The miscellaneous area will control things like allowing to hide the field, location, maximum and minimum field size, padding used around the field, the field size spacing and visibility.

Text: The text area will control things like customized form text, where the text is coming from, the text align mode, text location, text size and text visibility.

ToolTip: The tool tip area will control things like the tool tip options to control things like displaying the tool tip text entered when the field was created.

Using Design Studio

# **USING DESIGN STUDIO**

### **Custom Fields**

The Custom Fields functions in TRAVERSE Design Studio allow you to create and assign fields to maintenance and transaction forms. This capability replaces the user-defined field functions found in previous versions of TRAVERSE, and expands the functionality throughout the applications.

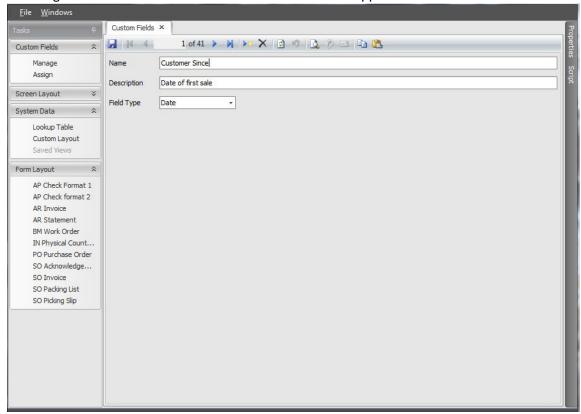
The Custom Fields section of the TRAVERSE Design Studio contains two functions:

- Manage-Use the Manage Custom Fields function to create, edit, and delete custom fields.
- Assign-Use the Assign function to add, move, or remove custom fields in application tables. Once you assign a field to an application table, you can use the field in the related TRAVERSE function.

After you assign a custom field to an application table, you can use the tools in the Screen Layout section of the TRAVERSE Design Studio to place the field where you want it on the associated form. See the "Screen Layout" section for more details.

#### Create a Custom Field

To create a custom field, click **Manage** under the Custom Fields heading in the TRAVERSE Design Studio Tasks window. The Custom Fields screen appears.



- 1. Click the **New Record** button to create a new custom field.
- 2. Enter the name of the custom field in the Name field.
- 3. Enter a **Description** for the custom field. When you add the field to the form, the contents of the Description field appear in a pop-up box when any user hovers the mouse over the custom field in TRAVERSE.
- 4. Choose a **Field Type**. Depending on the field type, parameter fields will appear which allow you to further define the custom field. See "Field Types" below for a description of each of the field types.
- 5. Click the **Save** button. You can create another custom field by clicking the **New Record** button.

Using Design Studio

### Field Types

Here are brief descriptions for each of the field types, including parameter fields required to set up the field:

#### Text

Use the Text field type to create a custom field that allows users to enter numbers, letters, and other characters in a form. This field type does not provide verification or have any interactive capability beyond text entry.

#### Parameters:

• Text Length-Choose the number of characters users may enter in this custom text field.

#### Number

Use the Number field type to create a field that allows users to enter only numbers within a range you specify.

#### Parameters:

- Maximum Value-Choose the highest allowable number for this custom field.
- Minimum Value-Choose the lowest allowable number for this custom field.

#### **Date**

Use the Date field type to create a custom field that allows users to enter or choose a date. Date fields will include a standard calendar control to help users select a date.

There are no other parameters to select for the date field type.

### YesNo

Use the YesNo field type to create a check box that users can check or clear.

There are no other parameters to select for the YesNo field type.

### List

Use the List field type to create a field with a list of values from which users can choose. You can enter the possible values, or use a preset Lookup ID to use values from an established TRAVERSE list field.

#### Parameters:

- Lookup ID-Select a Lookup ID if you would like your field to list values found in a table. Otherwise, leave the Lookup ID blank.
- **Display Values**-Use the Display Values field to enter specific values for the list field, separating each value with a semicolon.
- Limit to List-Check the Limit to List box to allow users to select only the values you have specified in the Display Values field or defined by the Lookup ID field. Leave the Limit to List box unchecked to allow users to enter their own value into the list field.

### Color

Use the Color field to assign a color to the field.

### **Entity**

Use the Entity field type to create an entity field with multiple values to choose from. You can enter the possible values for the user to choose, or use a preset Lookup ID to use values from an established TRAVERSE list field.

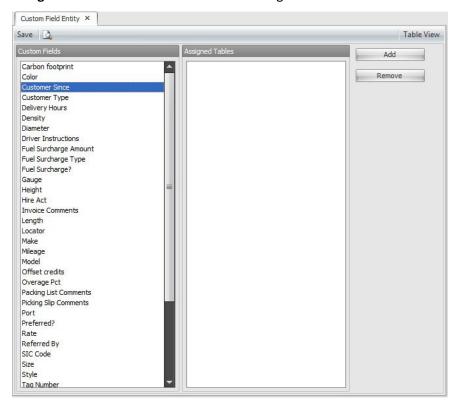
#### Parameters:

- Lookup ID-Select a Lookup ID if you would like your list field to offer the same possible values as a TRAVERSE list field. Otherwise, leave the Lookup ID blank.
- **Display Values**-Use the Display Values field to enter your own possible values for the list field, separating each value with a semicolon (;).
- Limit to List-Check the Limit to List box to only allow the user to select the values you have chosen in the Display Values field or defined by the Lookup ID field. Leave the Limit to List box unchecked to allow the user to enter their own value into the list field.

### Assign Custom Fields to Application Tables

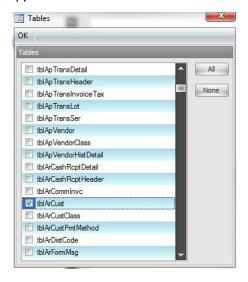
To use your custom fields in TRAVERSE functions, you must first assign them to the TRAVERSE application tables. Follow these steps to assign custom fields:

1. Click **Assign** in the Task window of TRAVERSE Design Studio.



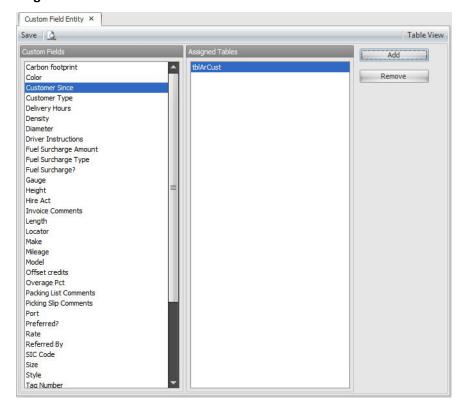
2. In the Custom Fields column, choose the custom field you want to assign. Click the Add button.

3. The **Tables** dialog box appears.



4. Check the table or tables to which you would like to assign the highlighted custom field, or click **All** to assign the custom field to all tables, and **None** to clear the check marks you've made.

5. When you finish assigning the field, click **OK** to close the Tables dialog box. In the Custom Field Entity window, the table to which you've chosen to assign the custom field appears in the Assigned Tables column.

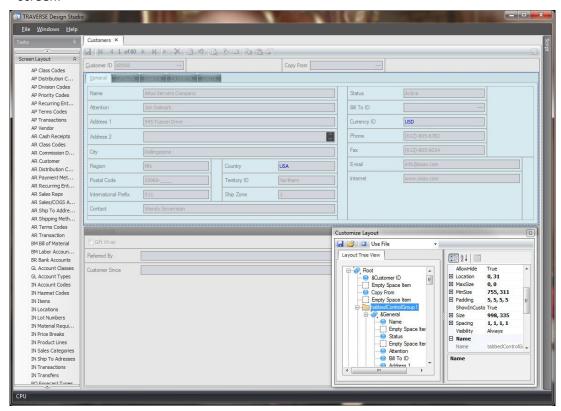


- 6. Click **Save** to assign the field to the tables you chose.
- 7. To remove a custom field from a table, highlight the table and click **Remove**.

After you assign a custom field to an application table, it appears in the associated TRAVERSE function in a section called Custom Fields.

Custom fields will automatically become available in the Lookup controls for key fields on forms and in the Column Chooser or Field List of any related Interactive Views and Lookup boxes, allowing you to include that field in the views and lookups as if it were one of the standard TRAVERSE fields.

For example, here is the customer form with custom fields appearing at the bottom of the screen:



You can move the custom field to a different place on the screen, as well as implement the custom fields in a specific workstation. See the "Screen Layout" section for instructions.

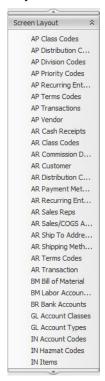
### Screen Layout

The TRAVERSE Design Studio Screen Layout functions allow you to relabel, reorganize, or hide fields on forms to best suit your workflow. If you add custom fields, you can also move those on the screen.

Using Design Studio

### Screen Layout Menu

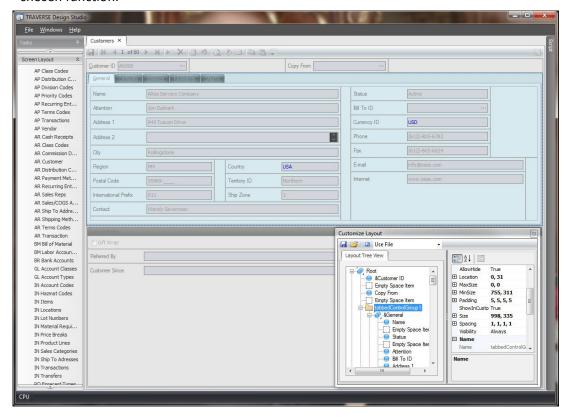
The Screen Layout menu in the Tasks window of TRAVERSE Design Studio lists all of the available functions for which you can adjust the field layout.



To edit a function's screen, choose that function from the list.

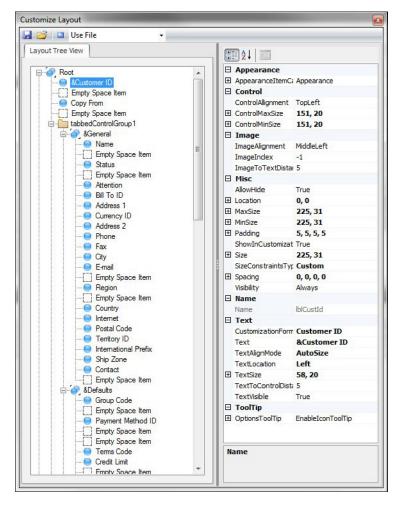
### Screen Layout Editing Screen

The function you chose to edit appears in the TRAVERSE Design Studio window, and the fields will appear to be partially greyed-out. The Customize Layout dialog box appears over your chosen function.



### The Customize Layout dialog box

Use the Customize Layout dialog box to perform several screen editing tasks in the Screen Layout function.

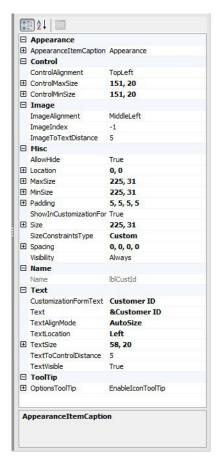


The properties of fields can be viewed and edited using the Customize Layout window.

When a Screen Layout is open with the customize layout window displayed the properties of the selected field will be displayed on the right side of the window.

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Control: The control area will control things like the allignment of the field and the minimum and maximum size of the field.

Image: The image area will control any image allignment, indexes and distance from the label to the text field.

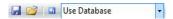
Using Design Studio

Misc: The miscellaneous area will control things like allowing to hide the field, location, maximum and minimum field size, padding used around the field, the field size spacing and visibility.

Text: The text area will control things like customized form text, where the text is coming from, the text align mode, text location, text size and text visibility.

**ToolTip**: The tool tip area will control things like the tool tip options to control things like displaying the tool tip text entered when the field was created.

Use the Save Layout button and Open Layout button to save and open the screens you customize. Use the **Reset Layout** button use to return the screen to the original settings. Because you can return the screen to the original state at any time by clicking the Reset Layout button, you can experiment with the screen layout safely. The **Use** field allows you to save your layout to the Database or a File. To open an existing screen layout saved to the database select Use Database from the selection box and then click on the Open button. The layout saved with the default description will be opened.



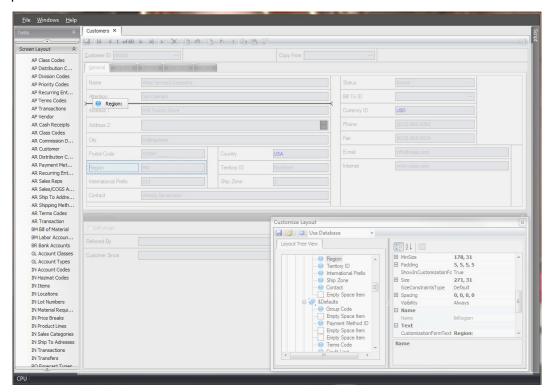
When saving to the database, by selecting Use Database, you are saving the changes you made and you can assign the new screen layout to users with the Custom Layout function in the System Data menu.

When saving to a file, by selecting Use File, you are saving your changes to a file to allow you to open the file to make further changes and then save to the database when satisfied with the layout.

The Customize Layout dialog box also contains a Layout Tree View of the fields on the screen. In addition to the drag-and-drop method of moving fields described below, you can grab and move fields within the Tree View to alter the screen.

#### Move a Field Within a Screen

To move a field within a screen, simply point to the field, hold down the mouse button, and drag it to the desired location on the screen. In the illustration below, the **Region** field will be positioned between the **Attention** and **Address 1** fields.

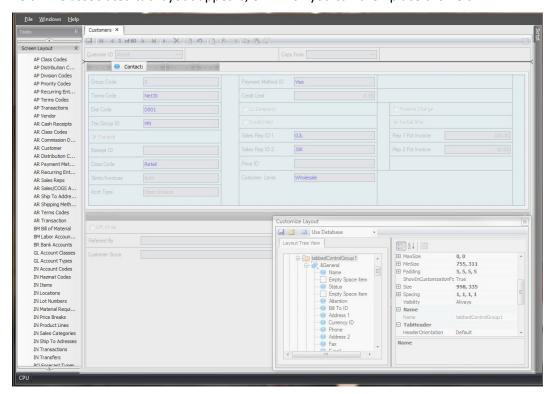


When you release the mouse button, the field is placed in the selected position, and the other fields are adjusted accordingly.

NOTE: If there is no data in the company database you will not be allowed to move the fields by dragging and dropping on the screen layout screen. Once there is data in the database and table the field is assigned to you will then be allowed to move the fields around on the screen.

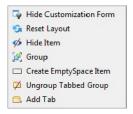
#### Move a Field from One Tab to Another

To move a field from one screen tab to another, point to the field you want to move, hold down the mouse button, and drag it to the tab heading on the screen to which you want to move the field. The associated tab layout appears, on which you can then place the field.

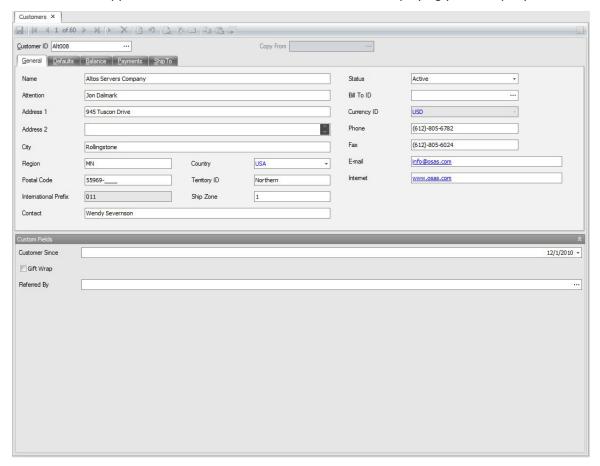


### Test a Screen Layout Within TRAVERSE Design Studio

Once you have finished making field changes to the screen, you can test the functionality of the rearranged screen by closing the Customize Layout dialog box. You also can get to the test mode by right clicking in the screen layout and selecting Hide Customization Form.



The screen appears to function as it will within TRAVERSE, displaying your company data.



NOTE: Changes made to your company data while testing screens within TRAVERSE Design Studio are not written to the database, and therefore will not affect the company data.

To return to the Customize Layout dialog box, right-click anywhere within the testing screen and choose Customize Layout.

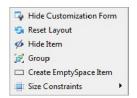


The Customize Layout dialog box reappears, and you can continue making changes to the screen. You can also right-click anywhere in the screen and choose Reset Layout to return the form to its original state.

### Right Click Menus

Changes can be made to the design of the form or some of the properties of a selected field using right click menus. The right click menu will vary depending on the area of the form you right click or the type of field you have selected when right clicking.

### **Right Click Blank Area**



The menu selections available are:

Hide Customization Form: This selection will hide the design view of the form and put you to the test mode of the screen layout.

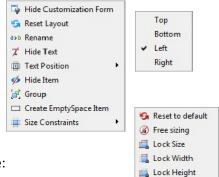
Reset Layout: This selection will reset the screen layout back to the default layout with no fields moved or properties modified.

**Hide Item**: This selection will hide the selected blank area from the screen layout.

**Group**: This selection will group multiple fields selected.

Create Empty Space Item: This selection will add an empty space item to the form to place where you want it.

### Right Click Field Selected



The menu selections available are:

Hide Customization Form: This selection will hide the design view of the form and put you to the test mode of the screen layout.

Reset Layout: This selection will reset the screen layout back to the default layout with no fields moved or properties modified.

Rename: This selection will allow you to rename the field label for the selected field.

**Hide Text**: This selection will allow you to hide the field label to display the field only.

Show Text: This selection will be visible if you have selected Hide Text to hide the field label. Selecting Show Text will display the field label again.

Text Position: This selection will allow you to change the text position within the field. You can place the text on the Top, Bottom, Left or Right.

**Hide Item**: This selection will hide the selected field from the screen layout.

**Group**: This selection will group multiple fields selected.

Create Empty Space Item: This selection will add an empty space item to the form to place where you want it.

Size Constraints: This selection will allow you to set the size constraints on the selected field. The size constraints that can be selected are: Reset to Default, Free Sizing, Lock Size, Lock Width and Lock Height.

### **Right Click Tab Form Section**



The menu selections available are:

**Hide Customization Form:** This selection will hide the design view of the form and put you to the test mode of the screen layout.

Reset Layout: This selection will reset the screen layout back to the default layout with no fields moved or properties modified.

**Hide Item:** This selection will hide the selected tab from the screen layout.

**Group**: This selection will group multiple fields selected.

Create Empty Space Item: This selection will add an empty space item to the form to place where you want it.

Ungroup Tabbed Group: This selection will ungroup any tabs that have been grouped together within an area on the screen. For example: in the Customers screen layout the tabs are grouped. Selecting this will eliminate the tabs and form different sections on the screen with each field from the tabs in a section of the screen layout. Be careful when selecting this selection, the only way to get the tabs back is to reset the layout.

Add Tab: This selection will allow you to add a tab to the form. The new tab will automatically be grouped with the other tabs on the form, if they are grouped. You can then name the tab and place custom fields, or move current fields to this new tab.

Add Tabbed Group: This selection will allow you to group tabs that have been added to the screen layout, if they currently are not grouped. This selection will only be visible if you do not currently have a tab group.

#### Save a Screen Layout

Once you are satisfied with the screen layout, you can save it for use within TRAVERSE on one or more workstations. You can save the layout as an FRM file that can be sent and imported into different databases, or save the layout in your current database which will over-write the previous layout in the system.

NOTE: If you save the layout to the database, all users who use the database will use the same layout for that function, if you do not assign the layout to a user or group using the System Data, Custom Data function.

### Save a screen layout to a file

If you choose to **Use File**, a dialog box will open when you click the **Save** button. This will allow you to save the form file. If you choose **Use Database**, the customizations will be saved into your database when you click the **Save** button.



1. Select Use File in the Customize Layout dialog box.

Saving a to a file is mainly used as a backup for your screen layout changes. You can save the file, present the new screen to the client to see if it needs modification. If the screen needs to be changed you can then open the saved file and modify it and save the file again.

- 2. Click the **Save** button on the Customize Layout dialog box.
- 3. Choose a location to save the **.FRM** file which contains the modified layout.
- 4. After you have saved the file, copy the **.FRM** file to the TRAVERSE root folder on each workstation you want to modify. When you subsequently open the function on the workstation, the modified screen will appear.

### Save a screen layout to the database

- 1. Select **Use Database** in the **Customize Layout** dialog box.
- Click the Save button on the Customize Layout dialog box. The layout will replace the current layout in your database, and will be used for that screen by all users who use the database.

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NOTE: Use the Custom Layout function in the System Data to assign the Screen Layout to specific users you want to see the modified screen. If you don't assign to specific users, ALL users will see the new screen lavout.

### Deployment

You may want certain users to work with different screen layouts; perhaps hiding certain fields for some users or changing the layout to optimize it for a user's role.

There are multiple ways to deploy the changes to the workstation.

You can save the screen layout to file and copy the file to workstations as described below.

For example, the default file name for a customized Customer screen is CustomerControl.FRM. You could change the name of the file when you save it to CustomerControl Acct.FRM for an accounting user, then make other changes to the form and save it again using the name CustomerControl\_Sale.FRM for a user in sales.

After saving the files, simply copy the appropriate file to each user's workstation, renaming it to the standard CustomerControl.FRM name on that user's workstation.

NOTE: You must rename the .FRM form back to the original name after copying to the client directory, or the TRAVERSE client will not recognize the changes.

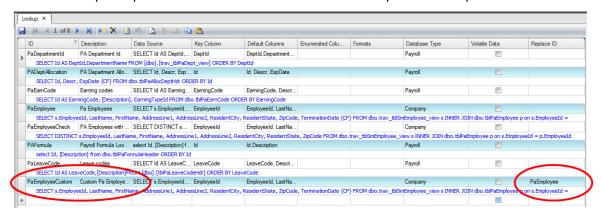
The second alternative to deploying the screen layout changes is to save the screen layout to a file and the database and assign the screen to users. Modify the screen for other users, save to a file with a different name (for backup purposes) and save the screen to the database again and assign that screen layout to users. Do this process for the different screen layouts you want for different users.

### **Customize the Lookups and Interactive Views**

The TRAVERSE Design Studio includes functions to edit the Lookup and (Interactive) View definitions. However, if you just change one of the standard definitions, it is possible that those changes will be overwritten by the automated update process.

There is a specific method to use to customize Lookup or View definitions so that they will not be overwritten by our updates. The example below references a Lookup definition, but the process is the same for View definitions.

<u>Copy</u> the definition that you want to change to a <u>new</u> record using the Lookup function of Design Studio. Create an ID to a unique value. In the example below we copied the PaEmployee ID to a new record and called it PaEmployeeCustom. In the new record, put the ID of the original record into the "Replace ID" column. Now make your changes to this new definition. The lookup function(s) that use the PaEmployee ID will now use the custom lookup, and our update process will not overwrite the custom entry in the lookup table.



### System Data

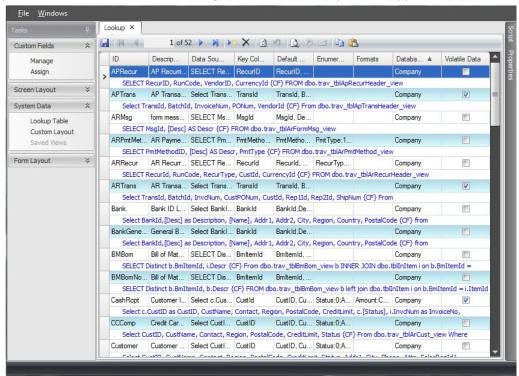
### Lookup Table

Use the System Data, Lookup Table function to configure the information shown when you use the Lookup command (F4) within TRAVERSE without making changes directly to SQL Server tables.

Use the Lookup Table function to define column heading names, whether you want a field to appear as search criteria, the order in which items appear in the Look By field, the order in which fields appear in the results area of the Search screen, and so on.

NOTE: Do not modify these fields unless you have knowledge of database design and administration.

To define what appears when you use the Lookup command, select Lookup Table from the System Data menu in TRAVERSE Design Studio. The Lookup screen appears.



Modify the lookup data as needed.

NOTE: Changes are not recommended to any columns except the Data Source and Default Columns. Changes to other columns may cause the lookup to not function properly.

The column definitions are:

ID

The Lookup ID used by the programs within TRAVERSE to open the lookup boxes.

### Description

The actual column heading name in the results section of the Search screen appears in the Description.

#### **Data Source**

The SQL query that the system uses to retrieve the data for this lookup ID.

### **Key Column**

Defines the leading column in the lookup display, independent of user input or changes.

#### **Default Columns**

Names of the columns that you want displayed by default, independent of user input or changes.

#### **Enumerated Columns**

Provides an alternative description of the numeric values stored in a table. For example, TRAVERSE stores the inventory item status as 1, 2, 3 or 4. You may want to view these values as Active, Discontinued, Superseded, and Obsolete.

#### **Formats**

Use to format information that appears in the results section of the Search screen. For example, the social security format is &&&-&&&.

#### **Database Type**

Describes the database from which that lookup's information is taken (e.g. Company, System, Payroll).

### **Volatile Data**

Indicates that the data is constantly changing. Used for the transactions screens, where transaction records are being added and taken away often.

#### Replace ID

Use the replace ID function to indicate the original Lookup ID you used when copying an existing ID to a new record. If you are going to make changes to one of the lookup ID's you should use this method to modify it so updates will not overwrite your changes. The replace ID will indicate which search box will be used by your new modified Lookup ID. See Customize the Lookups and Interactive Views in TRAVERSE Edit (page 3-29) for more details.

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When you finish making changes to the Lookup table, click the Save button to save your changes. Close the Lookup screen without saving to abandon changes.

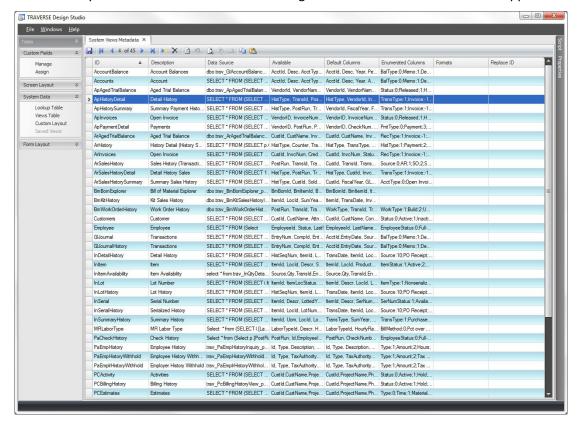
#### Views Table

Use the System Data, Views Table function to configure the information shown in the interactive views within TRAVERSE without making changes directly to SQL Server tables.

Use the Views Table function to define columns available for the view, whether you want a field to appear as filter criteria, any joins and grouping that need to be made when pulling data from multiple tables, the default fields to display when opening the view and resetting the view once it has been changed within TRAVERSE, the order in which fields appear in the results area, any enumerated values that need to be translated, and so on.

NOTE: Do not modify these fields unless you have knowledge of database design and administration.

To define what appears and is available when interactive views are opened, select Views Table from the System Data menu in TRAVERSE Design Studio. The Views Table screen appears.



Modify the lookup data as needed.

NOTE: Changes are not recommended to any columns except the Data Source, Available, and Default Columns. Changes to other columns may cause the view to not function properly.

The column definitions are:

ID

The name assigned to the view.

#### Description

The description of what the view shows.

Using Design Studio

#### **Data Source**

The SQL guery that the system uses to retrieve the data for this view ID.

SELECT \*FROM (SELECT CASE p. [EntryNum] WHEN -1 THEN 4 WHEN -2 THEN 5 WHEN -3 THEN 6 ELSE 3 END AS [histType], h. [PostRun], h. [IrvoiceNum], h. [InvoiceNum], h. [DistCode], h. [DueDate1], h. [DueDate2], h. [DueDate3], sIGN(h. [TransType]) \*h. [PmtAmt1] AS [PmtAmt1], SIGN(h. [TransType]) \*h. [PmtAmt2] AS [PmtAmt2] AS [PmtAmt2] AS [PmtAmt2], SIGN(h. [TransType]) \*h. [PmtAmt2] AS [PmtAmt3], SIGN(h. [TransType]) \*h. [SalesTax], SIGN(h. [TransType]) \*h. [Freight] AS [Freight], SIGN(h. [TransType]) \*h. [Misc], SIGN(h. [TransType]) \*h. [CashDisc], AS [CashDisc], AS [CashDisc], SIGN(h. [TransType]) \*h. [PmtAmt1], h. [CurrencyId], h. [ExchRate], h. [PmtCurrencyId], h. [PmtExchRate], SIGN(h. [TransType]) \*h. [SubtotalFign], AS [PmtAmt1Fign], SIGN(h. [TransType]) \*h. [SubtotalFign], AS [PmtAmt2Fign], SIGN(h. [TransType]) \*h. [SubtotalFign], AS [SubtotalFign], SIGN(h. [TransType]) \*h. [SubtotalFign], AS [SubtotalFign], SIGN(h. [TransType]) \*h. [SubtotalFign], SIGN(h. [TransType]) \*h. [SubtotalFign], SIGN(h. [TransType]) \*h. [TransType]) \*h. [SubtotalFign], SIGN(h. [TransType]) \*h. [TransType]) \*h. [SubtotalFign], SIGN(h. [TransType]) \*h. Cancel

> The script displayed in this window may be edited to include new columns, columns from tables not currently in the view, or other programming that may be changed for the view.

### **Available**

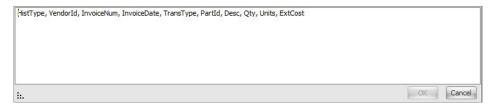
Defines columns available when doing server filters and also when the Column Chooser is selected.



From the columns selected in the Data Source script you can list the columns that will be available for server filtering and the column chooser.

#### **Default Columns**

Names of the columns that you want displayed by default, independent of user input or changes. When you click the Reset button in the Interactive View these columns will be on the screen when the view refreshes.



#### **Enumerated Columns**

Provides an alternative description of the numeric values stored in a table. For example, TRAVERSE stores the inventory item status as 1, 2, 3 or 4. You may want to view these values as Active, Discontinued, Superseded, and Obsolete.

#### **Formats**

Use to format information that appears in the results section of the Search screen. For example, the social security format is &&&-&&&-.

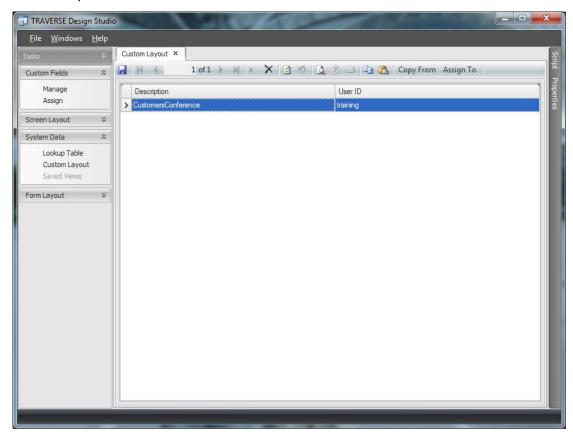
### Replace ID

Use the replace ID function to indicate the original View ID you used when copying an existing ID to a new record. If you are going to make changes to one of the view ID's you should use this method to modify it so updates will not overwrite your changes. The replace ID will indicate which view will be used by your new modified View ID. See Customize the Lookups and Interactive Views in TRAVERSE Edit (page 3-29) for more details.

When you finish making changes to the Views table, click the Save button to save your changes. Close the Views screen without saving to abandon changes.

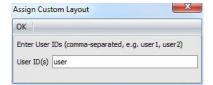
# **Custom Layout**

Use the System Layout, Custom Layout to assign custom screen layouts to users, when the screen layout has been saved to database.

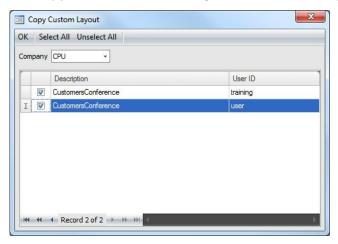


You will see any screen layouts that have been saved using the Use Database function in the screen layout function.

- 1. Edit the description to describe the user or group of users you want to assign the screen to.
- 2. Click **Assign To** to assign the screen to users or groups(roles).



- 3. Enter the user ID or role name you want the selected custom screen layout assigned to. Separate the users or roles with a comma (,).
- 4. Click **OK** once you are finished with the user or role assignment.
- 5. Click **Copy From** to copy the custom screen assignment from one company to another.



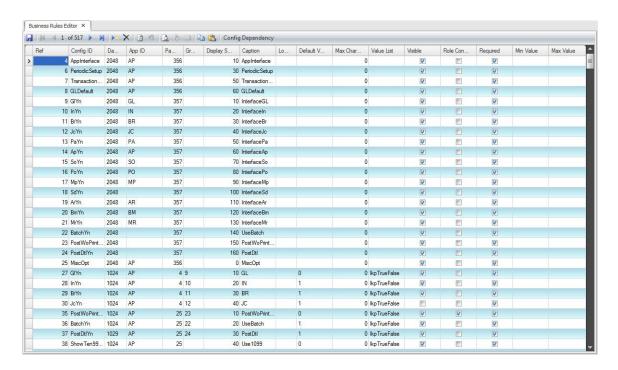
- 6. Select the **Company** to copy from and the **Description** and **User ID** list will appear, for screen layouts saved to that company.
- 7. Check the box next to the screens and users you want to copy to the company you are currently attached to in design studio.
- 8. Select **Select All** or **Unselect All** to check or uncheck all boxes.
- 9. Click **OK** to save the copy from one company to your current company.

# **Business Rules**

The business rules function will display all the business rules available in TRAVERSE. The main purpose of this function is to make it easier for developers to add their own new business rules.

The business rules you see listed are coming from the tblSmConfig and tblSmConfigDep tables in the SYS database. This list of business rules will be available for all companies.

NOTE: \*\*\*\*\*Warning\*\*\*\*\*\*\* We do not recommend editing existing rules!!!



The column definitions are:

## Ref

The reference ID in the tblSmConfig table.

## **Config ID**

The configuration ID for what the business rule does.

# **Data Type**

The kind of data that will be input into the business rule. Select the data type from the list of available data types.

# App ID

The application the business rule will appear in.

#### **Parent Ref**

The reference to the parent config ID value. For example, 4 is the parent reference for the AP interfaces to other apps.

## **Group Ref**

The reference to the group of rule types. For example, 558 is the reference for the audit group.

## **Display Seq**

The order it will appear in the list of business rules for the application.

## Caption

The captioin ID for what will appear on the screen for the business rule.

## Lookup ID

The lookup Id to use if a selection needs to be made from a list of records. For example, for the default GL accounts the lookup ID would be GLAccounts.

# **Default Value**

If there is a default value for the business rule, what should the default value be.

#### **Max Characters**

What is the maximum number of characters allowed in the field for the business rule.

## **Value List**

The function that should be used to retrieve a list of values.

## Visible

Should the business rule be displayed on the screen.

# **Role Configurable**

Is the business rule used in the role specific application of the business rule. Can it be applied to specific groups to act differently for different groups within TRAVERSE.

Using Design Studio

# Required

Is it required to have a value in the business rule when saving and exiting the business rules.

## Min Value

If the business rule requires a number to be put in, what is the minimum value accepted.

## **Max Value**

If the business rule requires a number to be put in, what is the maximum value accepted.

NOTE: Only experienced programmers familiar with TRAVERSE programming and with knowledge of how the Business Rule configuration tables are related should use this function.

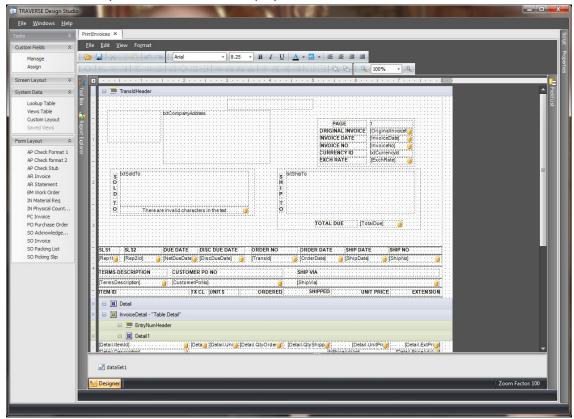
## Form Layout

Use the Form Layout tool of TRAVERSE Design Studio to edit the appearance of TRAVERSE forms such as invoices, statements, checks, picking slips, and more.

## Form Layout Menu

The Form Layout menu in the Tasks window of TRAVERSE Design Studio lists all of the available functions for which you can adjust the field layout.

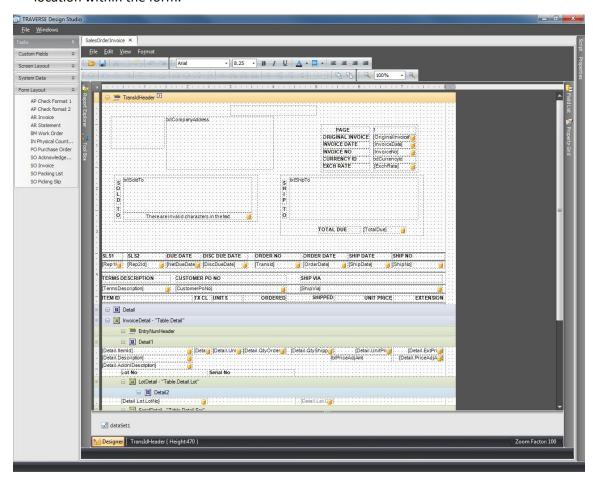
To edit the layout of a form, choose the form from the list. The Form Layout window opens with the form you've chosen to edit displayed in the window.



You can change the layout of the forms using the sections of the Form Layout window. You can drag, resize, or dock any section in or outside the main form at your discretion.

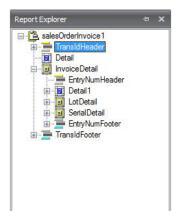
# Designer

The designer section of the Form Layout function displays the elements of the form and their location within the form.



# Report Explorer

The Report Explorer provides easy navigation through report elements. You can use the explorer when you build a form to quickly access all the elements of a report and their properties, and to see the whole form's structure.



## **Tool Box**

The Tool Box displays report elements that you may drop into the form. To do so, select a Tool Box item and drop it onto one of the report bands.



# **Property Grid**

The Property Grid displays the property values of any element you highlight in the form.



## Toolbar

Use the toolbar buttons to change the font properties of text elements within the form, or to zoom in or out on the form. You can also use any of a number of element alignment options when selecting one or more elements in the Designer section.



To save your form changes, click Save in the Form Layout toolbar.

# Scripting

# The Script Window

Scripts are a specific type of programming that can be used to add functionality to the software without making changes to the source code of the program. Scripts can be used to add validations, restrictions, calculations and otherwise modify the behavior of the software.

In TRAVERSE, scripts are stored in files outside of the core software. This allows you to receive updates and enhancements to your software while generally leaving your customizations intact.

Click **Script** on the right side of the screen to open the Script window.

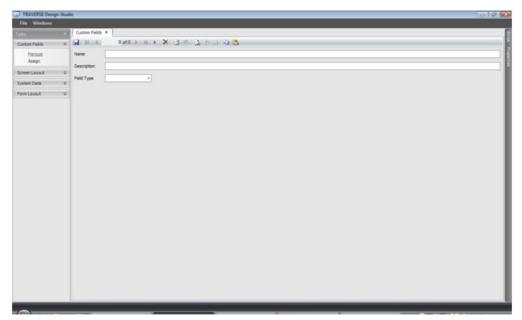


# **DESIGN STUDIO EXAMPLES**

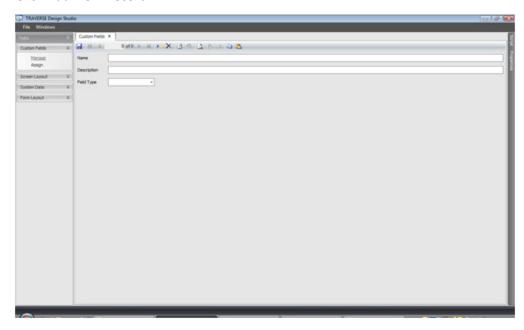
# **Custom Fields**

Manage - used to create/modify custom fields to be used within TRAVERSE.

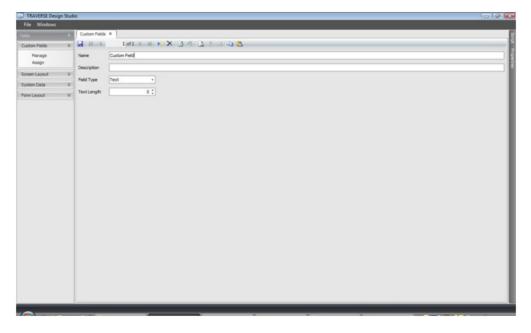
- \*\*\* Data is stored in tblSmCustomFields in the company database.
- 1. Click Manage.



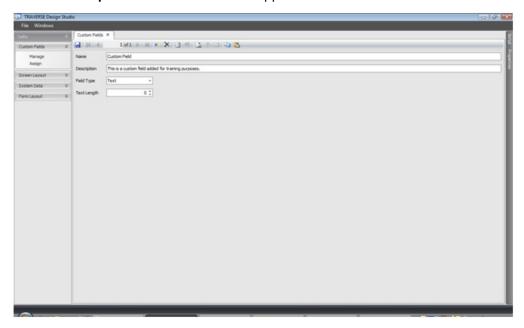
2. Click Add New Record.



3. Enter the **Name** - Name of the field as it appears on the TRAVERSE screen. We will call it **Custom Field**.



4. Enter a **Description** - This is text that will appear in TRAVERSE when the field is hovered over.



## 5. Select a **Field Type**

• Text - Field is alpha-numeric.

Assign a Text Length.

• Number - Field is numeric only.

Assign Maximum and Minimum Values.

- **Date** Field is a date.
- YesNo Field shows in TRAVERSE as checkbox for True/False or Yes/No.
- List Field is a drop down containing a list of values.

Select a Lookup Id or enter Display Values.

If using Lookup Id, select a TRAVERSE Search Id to populate the drop down in TRA-VERSE.

If using Display Values, enter values that will populate the drop down in TRAVERSE; you can also limit the values a user can select by checking the Limit to List checkbox.

Design Studio Examples

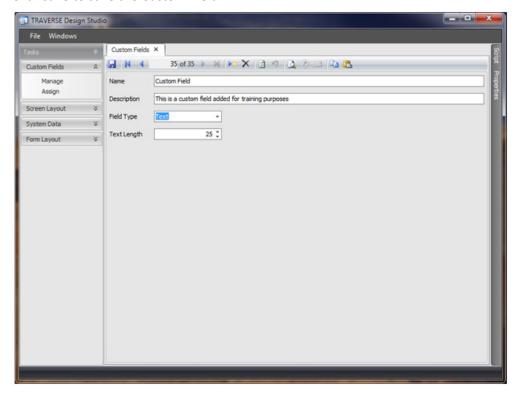
- Color Field is a color (will show color pallet in TRAVERSE).
- Entity List Field is a drop down containing a list of values.

Select a Lookup Id or enter Display Values.

If using Lookup Id, select a TRAVERSE Search Id to populate the drop down in TRAVERSE.

If using Display Values, enter values that will populate the drop down in TRAVERSE; you can also limit the values a user can select by checking the Limit to List checkbox.

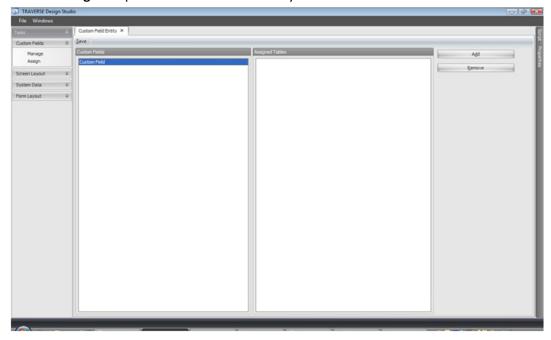
6. Click save to save the Custom Field.



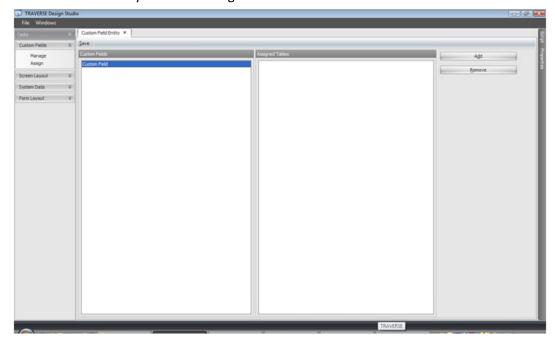
**Assign** - used to assign custom fields to TRAVERSE tables / screens.

\*\*\* Data is stored in tblSmCustomFieldsEntity in the company database.

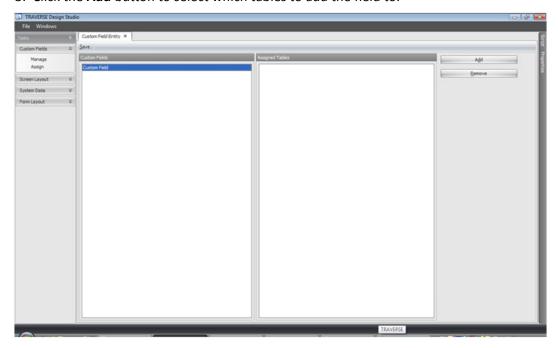
1. Click **Assign** to open the Custom Fields Entity screen.



2. Click on the field you wish to assign to a table. We should see **Custom Field**.

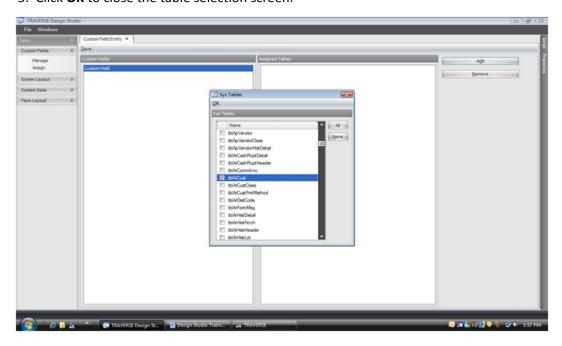


3. Click the **Add** button to select which tables to add the field to.

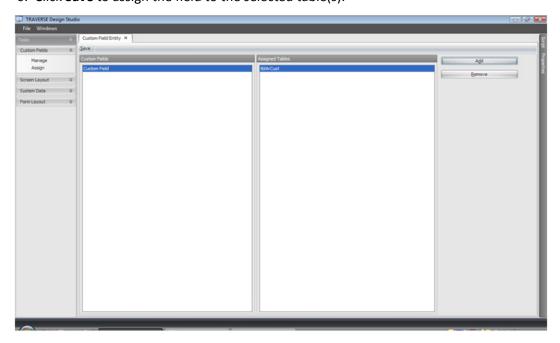


4. Select the table(s) to add field to "tblArCust" (selecting **All** will check all tables, **None** will uncheck all tables).

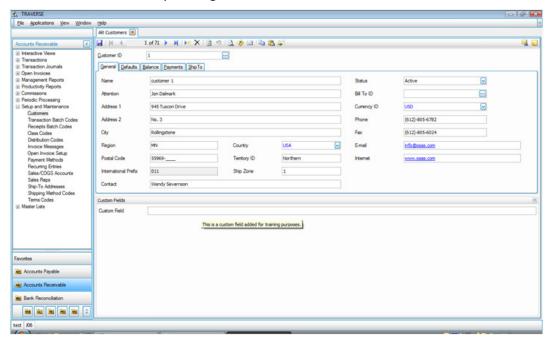
5. Click **OK** to close the table selection screen.



6. Click **Save** to assign the field to the selected table(s).

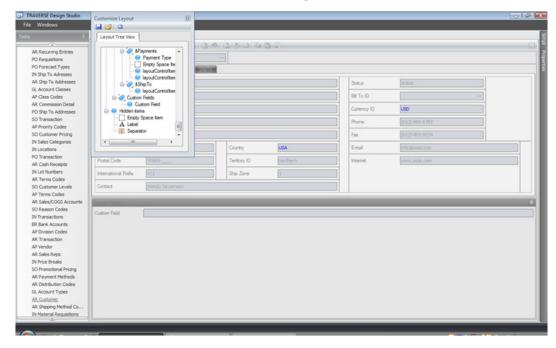


After the custom field has been created and assigned, you can open TRAVERSE, Accounts Receivable, Setup and Maintenance, Customers and the field should appear on the screen associated with the table you assigned the field to.



Screen Layout - used to modify TRAVERSE screens (TRAVERSE menus).

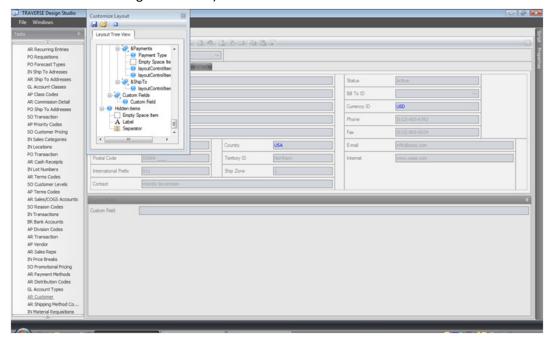
- \*\*\* Contains a list of TRAVERSE screens available to modify via Design Studio.
- 1. Click on a specific screen to modify it, AR Customer. The custom field will appear on screens that use the table(s) the custom field was assigned to.

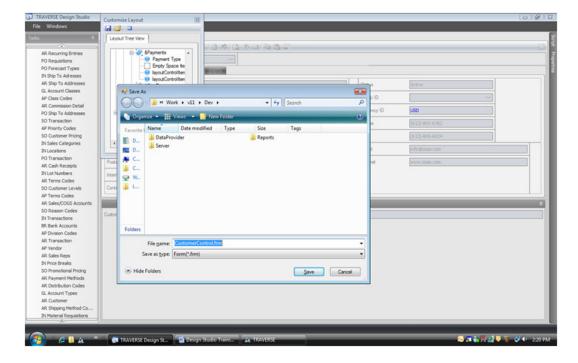


2. Modify the screen as desired. Drag and drop the Custom Field under the Internet field.

NOTE: Custom fields must be created and assigned to get them to appear as fields available for the modified screen.

3. Click **Save** using the Use File, to save the modified screen to a build folder (you must accept the default naming convention).

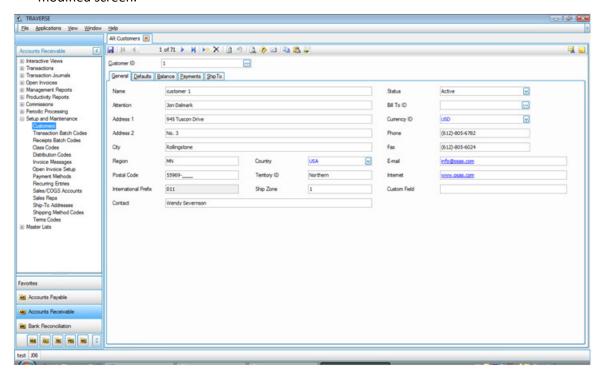




## **DESIGN STUDIO**

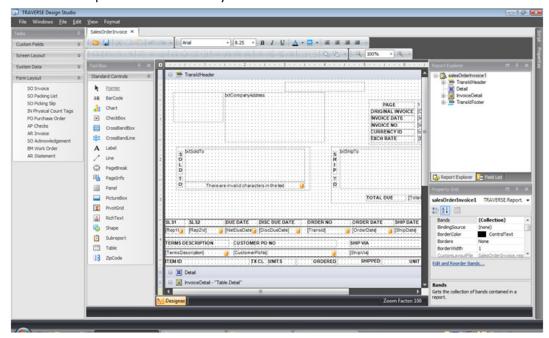
Design Studio Examples

After you have moved the field where you would like it and saved it to your build folder, copy it to your TRAVERSE client install folder. You can open TRAVERSE and you should see your modified screen.



Form Layout - used to modify TRAVERSE forms (invoices, statements, etc).

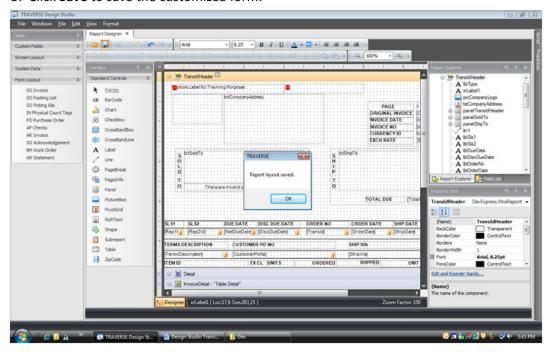
- \*\*\* Contains a list of TRAVERSE forms available to modify via Design Studio.
- 1. Click on a specific form to modify.



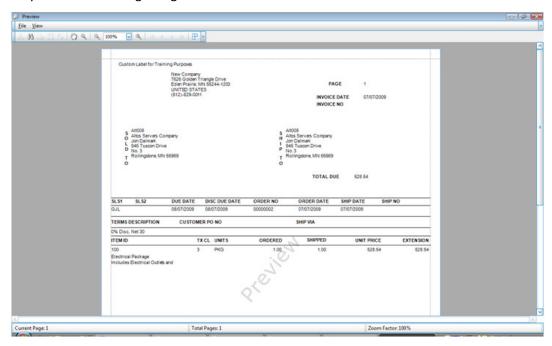
2. Modify the form as desired.

NOTE: At this time, custom fields are not available for forms.

3. Click Save to save the customized form.



4. After you have modified and saved your form, copy it to your TRAVERSE client install folder. You can open TRAVERSE and you should see your modified form when you print the form you modified using Design Studio.



# Add an image (logo) to a form in Design Studio

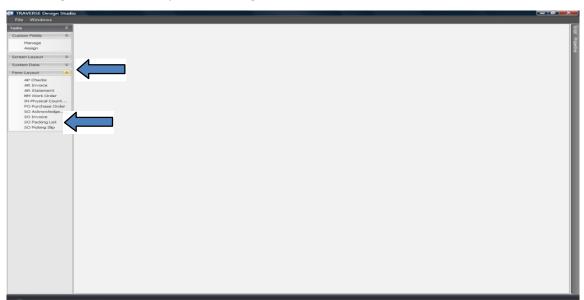
To add a logo to one of the printed forms using design studio follow these steps:

1. Created logo and saved as a jpg. Logo size 100x100 pixels.

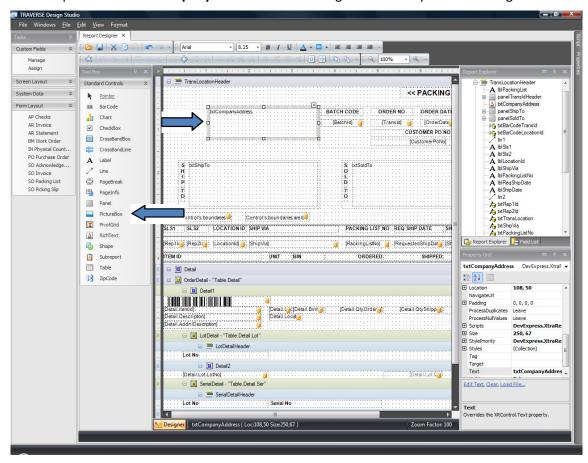


2. Open Design Studio.

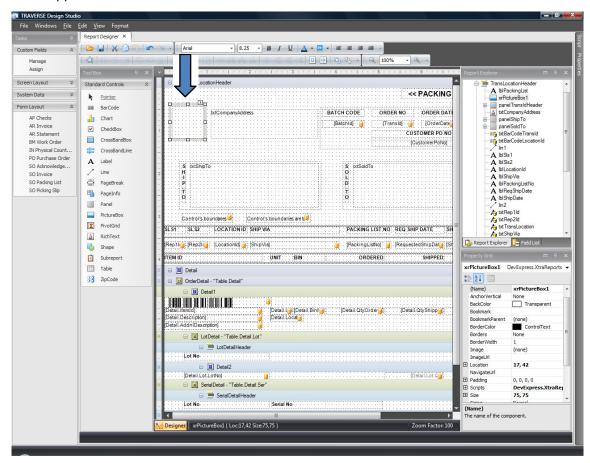
3. Select **Form Layout** drop down on the left and then select the form you would like to have logo added to, example **SO Packing List**.



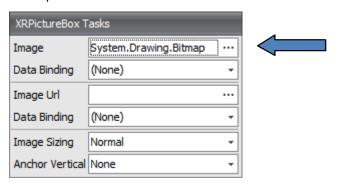
4. Reposition the txtCompanyAddress box to the right to create space for the logo.

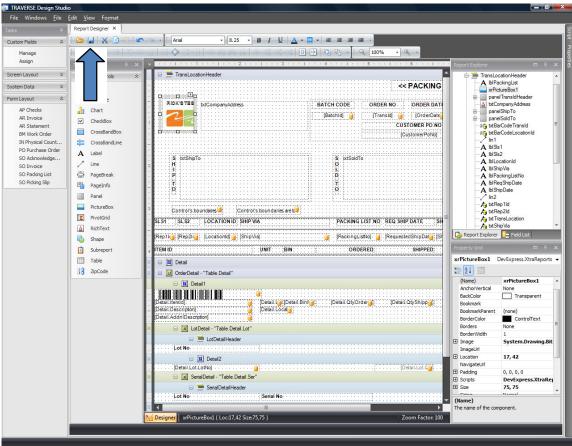


5. Select Picturebox under Standard Controls and position it where you would like logo to appear on the form.



6. Click arrow at top of box to open the **XRPicturebox Tasks** and in the image field browse to the jpg that was saved in step 1.

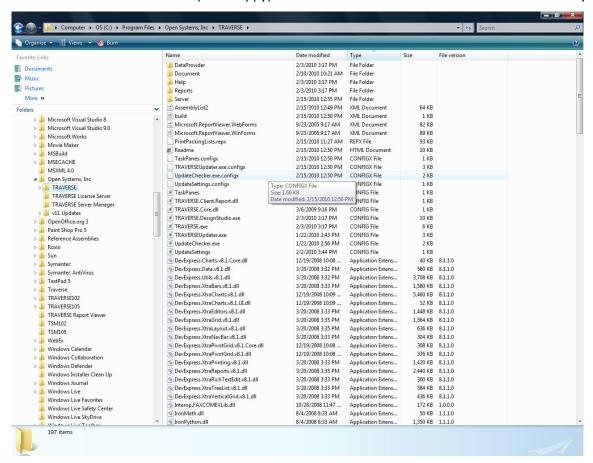




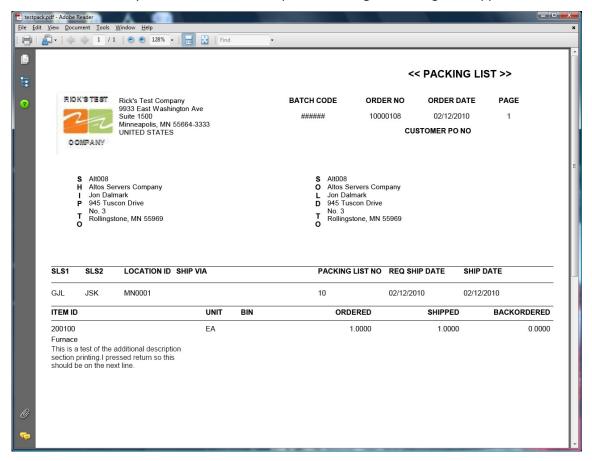
#### **DESIGN STUDIO**

Design Studio Examples

7. Click on the **Save** button (blue floppy) to save the new form in the **Traverse Client** directory.



8. The next time you launch Traverse and print a Packing List the logo will appear on the form.



# **Design Studio - System Data**

NOTE: When editing the Lookup Table and Views Table you should not edit the existing records. Make a new record and copy from the existing. Then edit the new record and refer to the original using the Replace ID field.

Using Design Studio to format the information displayed using the Lookup Command.

There are many fields in Traverse that use the Lookup command, they can be distinguished by the use of the browse button in the field. Some examples of these would be:



#### \*AR Customer

	Customer ID	Name	Contact	Region	Postal Code	Status	
P							
	Alt008	Altos Servers Company	Wendy Severnson	MN	55969	Active	
	Arg026	ARG Systems Inc.	Sue Rogers		1600023	Active	
	Atm047	Asynchronous Networking Tech.		MN	56444	Active	
	Atm053	ATM Switches Inc.		SD	57442	Active	
	Axi040	Axis Electronics	David Johanson	ND	58079	Active	
	Bet023	Beta Dynamics Inc.		WI	53500	Active	
	Bit020	Bitstream Technololgy		IA	50300	Inactive	П

Transaction No	00000018	•••
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## **\*SO Transaction No**

	Trans ID	Batch Code	Invoice No.	PO No.	Customer ID	Sales Rep 1	Sales Rep 2	Ship To ID	Trans Type
7									
	00000018	*****	55		Pol014	GJL	MSL		RMA
	00000021	Quotes			Mou027	GJL			Price Quote
	00000022	Verify			Atm053	JSK			Picked
	00000027	*****			Alt008	GJL	JSK		Verified
	00000028	=====			Alt008	GJL	JSK		Invoice
	00000029	*****		5455	Pol014	GJL	MSL		New

Design Studio allows you to change the information displayed when using these functions. There are several points you need to know before starting this process.

- 1. Do not modify these fields unless you have knowledge of database design and administration.
- 2. Make a backup of your SYS database before attempting any changes. When you save changes, made in this section of Design Studio, it will change your SYS database, and there is no UNDO button to back out these changes.

Information for these lookups are stored in the SYS database, TblSYSLookup, changes made in Design Studio, update the table when you use the SAVE button. Changes will affect all Users, all Companies.

NOTE: Changes are not recommended to any columns except the "DATA SOURCE" and "Default Columns". Changes made to other columns may cause the lookup to not function properly.

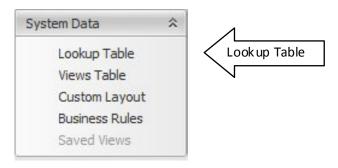
# **Example of a Lookup Table modification:**

A user would like to see a field for "Terms Code" when looking up SO Transactions Numbers. The generic lookup for SO Transactions has these fields:

SO Transactions Number Lookup fields - generic



- 1. Open Design Studio, and under Tasks Select System Data
- 2. Select System data Lookup Table



3. Find the Lookup Table that you want to edit. In our example we need **SOTrans**.

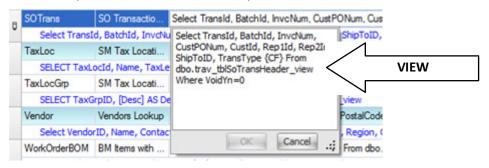
# **SO Trans Lookup**



4. As noted above, we are only going to edit the "Data Source" and "Default Columns" fields. The first column to edit is the "Data Source". The default information in that column is"

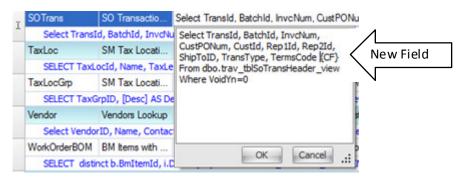
SO Trans Lookup - Data Source column - Select Transld, Batchld, InvcNum, CustPONum, Custld, Rep1ld, Rep2ld, ShipToID, TransType {CF} From dbo.trav\_tblSoTransHeader\_view Where VoidYn=0

- 5. If you click in the field you can see this display:
  - SO Trans Lookup Data Source column dropdown



6. For our example, the first thing we need to do is verify that the field "Terms Code" is available in the VIEW used in this data source column. That VIEW is dbo.trav tblSoTransHeader view. Using SQL Management Studio, we find the View. We look under our v11 SQL instance - Databases - CPU (Company ID) - Views dbo.trav tblSoTransHeader view. Expand the View and then expand the Columns - this will display a list of the columns available for our lookup. We will find a "TermCode" on the list, so we can add it to the lookup.

To add "Terms Code" to the lookup we will add to the "Data Source Column" just after the "TransType" field. Click in the "Data Source Column" (as displayed above) and put the cursor in the field just after TransType and insert our new field, just as it appears in the View - "TermsCode". The field names need to be separated by a comma. The column should now look like this:



(Select Transld, Batchld, InvcNum, CustPONum, Custld, Rep1ld, Rep2ld, ShipToID, TransType, TermsCode {CF} From dbo.trav\_tblSoTransHeader\_view Where VoidYn=0)

7. Next we want to update the "Default Column", the generic column should be:

SO Trans Lookup - "Default Column" - generic

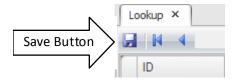
TransId, BatchId, InvcNum, CustPONum, CustId, Rep1Id, Rep2Id, ShipToID, TransType

8. To add "Terms Code" to the lookup we will add it to the "Default Column" just after the "TransType" field. Click in the "Default Column" (as displayed above) and put the cursor in the field just after TransType and insert our new field, just as it appears in the View - "TermsCode". The field names need to be separated by a comma. The column should now look like this:

SO Trans Lookup - Default Column" column - After Edit

TransId, BatchId, InvcNum, CustPONum, CustId, Rep1Id, Rep2Id, ShipToID, TransType, TemsCode

9. Save your changes using the **Save** button.



10. Now we want to open Traverse to see if our changes worked out correctly. Open SO - Transactions - and select the browse button for a Transaction number. The screen should display our changes.

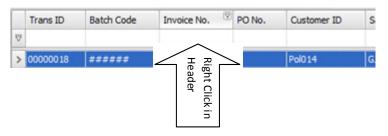
SO Transactions Number Lookup fields - after changes

	Trans ID	Batch Code	Invoice No.	PO No.	Customer ID	Sales Rep 1	Sales Rep 2	Ship To ID	Trans Type	TermsCode
7										
	00000018	*****	55		Pol014	GJL	MSL		RMA	1%Disc
	00000021	Quotes			Mou027	GJL			Price Quote	Net30
	00000022	Verify			Atm053	JSK			Picked	Net30
	00000027	*****			Alt008	GJL	JSK		Verified	Net30

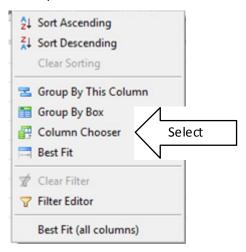
NOTE: If you do not see your changes when you open the dropdown, use the "Column Chooser" to see if they are available to add to the display.

.

Right click in a column header field

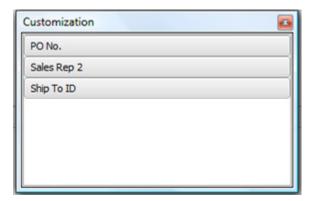


You should now see these options,



11. Select the "Column Chooser" to see the columns available to add to the display.

Available column fields display

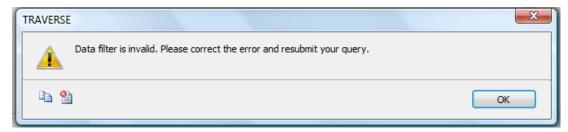


12. Move the fields To-From the column Chooser, by dragging them with your mouse.

## Possible Errors:

If we had made a mistake with our modification, we could see a message like this opening the SO Transaction screen:

SO Transaction screen - Data Filter error



- ---I deliberately entered too many commas in the "Data Source" column to get this error
- --- The incorrect text from Design Studio is:

Error in "Data Source" Column

, TransType, , TermsCode {CF} From dbo.trav\_tblSoTransHea...

If I select the "Error Flag" above ... ध ,,, you can see the error detail.

Message displayed in Traverse



To fix this go back to Design Studio and take out the extra comma and save the lookup.

The next time you go into SO transactions the error should not appear.

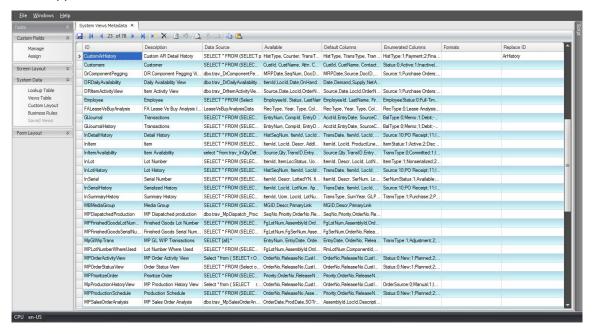
## **Editing the System Views Table**

Use the System Data, Views Table function to configure the information shown in the interactive views within TRAVERSE without making changes directly to SQL Server tables.

Use the Views Table function to define columns available for the view, whether you want a field to appear as filter criteria, any joins and grouping that need to be made when pulling data from multiple tables, the default fields to display when opening the view and resetting the view once it has been changed within TRAVERSE, the order in which fields appear in the results area, any enumerated values that need to be translated, and so on.

NOTE: Do not modify these fields unless you have knowledge of database design and administration.

1. To define what appears and is available when interactive views are opened, select Views Table from the System Data menu in TRAVERSE Design Studio. The Views Table screen appears.



- 2. Select the new record button to add a new record to the list of view tables.
- 3. We are going to edit the ARHistory view data.
- 4. Enter CustomARHistory into the ID field, Custom AR Detail History into the Description field and ARHistory into the ReplaceID field.

5. Browse up to the ARHistory view record and click in the Data Source field. The selection script will appear. You can pull the lower right corner of the box to extend the field to view more of the script.

- 6. Highlight the whole script in the box and press Ctrl C to copy the script.
- 7. Find your CustomARHistory record and paste the script into the Data Source field.
- 8. Do the same copy and paste for the Available, Default Columns and Enumerated Columns fields

We want to add the custom fields assigned to the Customer maintenance table as available column chooser fields.

The custom fields can be added using a couple of different methods.

One method is this:

## Design Studio Examples

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You can use the {CF} after the last field listed in the select statement. Don't put any commas before or after the {CF}.

Change the table the {CF} is coming from to the view (dbo.trav\_tblxxxxxx\_view).

The fields will be automatically brought into the view as available fields.

If you use the {CF} you can only have one view in the select statement. It will bring in the {CF} fields only from the first view it finds.

If you have multiple select statements with UNION ALL in between them you must put the same thing at the end of the select statement before the FROM.

#### Another method is this:

For more than one table to bring in the custom fields use s.[cf\_custom field 1 name], s.[cf\_custom field 2 name] as the custom fields at the end of the select statement.

NOTE: The s. refers to the tblArCust table in this view script. Find the letter indicating the table you want the custom field to be brought in from within the script.

Then in the available field you would add [cf\_custom field 1 name], [cf\_custom field 2 name] at the end of the list.

Or you can alias them like: s.[cf\_custom field 1 name] AS Custom Field 1, s.[cf\_custom field 2 name] AS Custom Field 2

Then in the available field you would add Custom Field 1, Custom Field 2 with the alias names as the field 1 and field 2.

- 9. We will use the first method described on the previous page to add the custom fields.
- 10. In the select script for our custom view table find the first occurance of FROM and go up one line and add {CF} to the end of that line.

, h.GlAcctGainLoss, NULL AS GLAcctSales, NULL AS GLAcctCOGS, NULL AS GLAcctInv {CF}

FROM [{COMP}].dbo.tblArHistPmt p

11. Find the next occurance of FROM in the next section of the select script and do the same thing with the {CF} and so on until you have the {CF} in each of the select sections.

Design Studio Examples

12. In the sections starting with the FROM statement, find the listing for tblArCust and change it to dbo.trav\_tblArCust\_View.

FROM [{COMP}].dbo.tblArHistPmt p

 $LEFT\ JOIN\ [\{COMP\}]. dbo.tblArHistHeader\ h\ ON\ p.[PostRun] = h.[PostRun]\ AND\ p.[TransId] = h.[TransId]$ 

left Join [{COMP}]. $dbo. trav_tblARCust\_view s on p.CustId = s.CustId WHERE p.[VoidYn] = 0$ 

**UNION ALL** 

- 13. Edit each of the From and Join sections to rename the table to a view as above.
- 14. You should now have the custom fields available as column chooser fields in the Accounts Receivable, Interactive Views, Detail History View within the TRAVERSE 11 client software.