



TKSQL Rosslare Enhancement

Release Notes

TKSQL: v05.09.09

11/19/09

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TKSQL Rosslare Release Notes

This is the Release Notes document for the Rosslare and FILO enhancements of version 5.09.09 of the TKSQL application. The following information is provided in this document:

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Assumptions

TKSQL was checked by the 32 bit SQL Server 2008 Express. Similar to the SQL 2005 Express and because of the limitations of the SQL server, the following are assumptions upon which this release of this **TK** version is based:

- A maximum of two users at one time are supported

The following are not supported:

- iBrowse
- OLAP Cubes
- Reporting Services and report generators

Enhancements

Integration with Rosslare Security Products

TimeKeeper can now be integrated with data from **Rosslare Security Products**.

Once **TimeKeeper** and Rosslare data are integrated, **Rosslare** tables are updated within several seconds after data is updated, changed or added in **TimeKeeper**, and vice versa.

Changes in Behavior in TimeKeeper when integrating with Rosslare

Time Polling from Rosslare in TimeKeeper

There are two time polling methods available:

- [Automatic Time Polling](#)
- [Manual Time Polling by Date Range](#)

Daily Activity Data File

All transactions for an employee can be viewed for a specific date (including transactions that are not attendance transactions) through the **Daily Activity Data** file. When **TimeKeeper** is integrated with **Rosslare**, the **Clocking Transaction Report** is available from the **Daily Activity Data File**. This report presents the following information:

- All line entries in the report are numbered sequentially for easy use of the report.
- Hour of reporting entry

- Direction of transaction—entry or exit
- Number and description of reader
- Code and description of event

Employee Profile Statuses

Following are the statuses that appear in the **Employee Profile** based on the integration between **Rosslare** and **TimeKeeper**:

Status	Description
0	Both systems are updated.
1	TimeKeeper is updating based on changes in Rosslare.
2	Employee to be deleted from TimeKeeper and Rosslare.
3	Rosslare system is updating based on changes in TimeKeeper.

Badge Functionality

When **Rosslare** and **TimeKeeper** are integrated, the **Badge** functionality changes in **TimeKeeper**. This section describes the new functionality. To use the new Rosslare Tags (Badges) dialog box, see [Adding New Employees Ongoing](#) and [Managing Rosslare Badges from TimeKeeper](#).

When adding badges to an employee, the **Rosslare Tags (Badges)** dialog box opens:

Following are the fields in the **Badge** dialog box that are shared by **TimeKeeper** and **Rosslare** (automatic updates in both systems) and are

updated in **TK_EMPLOYEE** and maintained in **ROSTKEMP** for matching between the systems:

- Last name
- First name
- Employment start date
- Employment end date

Following are the statuses that may appear in the **Rosslare Tags (Badges)** dialog box:

Status	Description
[Empty]	No entry exists in TK_EMPLOYEE.STATUS or in TK_TAG.STATUS
Updated	There is an entry in both TK_EMPLOYEE.STATUS and TK_TAG.STATUS with a value of 0.
Not updated	Any other status.

Following are the fields in the **General Data** tab of the **Rosslare Tags (Badges)** dialog box and the possible values:

Field	Description	Rules
Employee Number	TimeKeeper data	Read only. Updated automatically from the Employee Profile .
Rosslare Employee Number	Rosslare data.	Read only. Updated automatically when a new employee is created in Rosslare from TimeKeeper . See Adding New Employees Ongoing
Last Name	TimeKeeper data	Read only. Updated automatically from the Employee Profile .
First Name	TimeKeeper data	Read only. Updated automatically from the Employee Profile .
Mid Init	TimeKeeper data	Read only. Updated automatically from the Employee Profile .
Status	See the table above.	
ID Number	For example, a national identification number.	Read-only
NO APB	Rosslare data.	

Field	Description	Rules
Access Group	Authorization groups based on definitions in Rosslare .	Mandatory. Do not use 32001.
Department	Taken from the TimeKeeper tables.	Mandatory.
PIN Code	If used, must include only numerical characters and must be between 4-8 characters long.	Optional
Employment Start	TimeKeeper data	Read only. Updated automatically from the Employee Profile .
Employment End	TimeKeeper data	Read only. Updated automatically from the Employee Profile .

The **Tags (Badges)** tab in the **Rosslare Tags (Badges)** dialog box appears as follows:

General Data				Tags (Badges)	
				Tags List	
	Type	Code	Facility	Status	
	Clock and Data	7777774		Active	
▶	Wiegand 26 bits	64911	99	Active	

Following are the fields, actions and statuses in the **Tags (Badges)** tab of the **Rosslare Tags (Badges)** dialog box and the possible values:

Field	Description
Type	Read-only. Rosslare data.
Code	Read-only. Rosslare data.
Facility	Read-only. Rosslare data.
Status	Possible statuses: ■ Active ■ Inactive

NOTE: Lines in the tag list that are highlighted red are being processed, and therefore cannot be changed.

To use the **Tags (Badges)** tab, see [Managing Rosslare Badges from TimeKeeper](#).

Deleting Employee from TimeKeeper and Rosslare

When an employee is deleted from **TimeKeeper**, the following occurs in **TimeKeeper** and **Rosslare**:

1. Employee status is changed to 2 in **TK_EMPLOYEE**.
2. The association of all badges to the employee are removed from **TK_TAG**.
3. The employee entry is deleted from **ROSTKEM**.
4. The employee entry is deleted from **TK_EMPLOYEE**.

Requirements

Environment

- General SQL environment from v05.09.09
- For **Rosslare**—AxTrax AS-525 from v3.22

Files and Programs

Following are the files and programs necessary for the **Rosslare** integration:

Program/File Name	Last Update At Least On:	Special Instructions
DROCARDSSQL.dll	August 19, 2009	
RosEmpFind.dll	August 12, 2009	
DROSCNGSQL.dll	August 26, 2009	
TrxSqlRS.exe	August 17, 2009	
DBrwrSlrSQL.dll	July 26, 2009	
RosTkUTLSQL.dll	March 11, 2009	
AxTrax.exe	August 18, 2009	At least version 3.22
AxTraxCard.exe	August 3, 2009	
tk.exe	August 25, 2009	
DATA4IS.dll	August 25, 2009	
SYSCNFSQL.dll	August 18, 2009	
CompareDB.exe	August 26, 2009	

Program/File Name	Last Update At Least On:	Special Instructions
UsersSQL.dll	July 7, 2009	
DEmploySQL.dll	August 18, 2009	
EmpSaveSQL.dll	August 11, 2009	
TRXFSQL.dll	August 16, 2009	
DayBrwSQL.dll	August 12, 2009	
DATASET	September 2009	If dataset used is older than September 2009, then the next rows are mandatory.
CpRosctrl.sql	August 16, 2009	EXEC should be run for the first time only.
CpRostkemp.sql	August 16, 2009	EXEC should be run for the first time only.
CpConvSysNames_[Language].SQL	August 9, 2009	
MES80 + MES40	August 25, 2009	for Hebrew and English

New TimeKeeper Tables for Rosslare Integration

Following are the new tables in **TimeKeeper** that are used for **Rosslare** integration:

Table	Description
ROSTKEMP	Maintains the association between the Lavie Employee ID and the Rosslare Badge Number.
ROSCtrl	Stores the hour and date of the last reading from the clock. Every reading replaces the previous reading. The table entries are stored in the 99 backup.

Activating Rosslare Integration

To integrate Rosslare, perform the following:

- [Share AXTRAX Database on Server](#)
- [Activate Rosslare Scanning Driver from Workstation](#)
- [Activate Rosslare Integration from TimeKeeper](#)
- [Add Rosslare Data Initialization Menu Item](#)

- Initiating Employee and Badge Data in Rosslare
- Initiating Existing Rosslare Employee and Badge Data in TimeKeeper

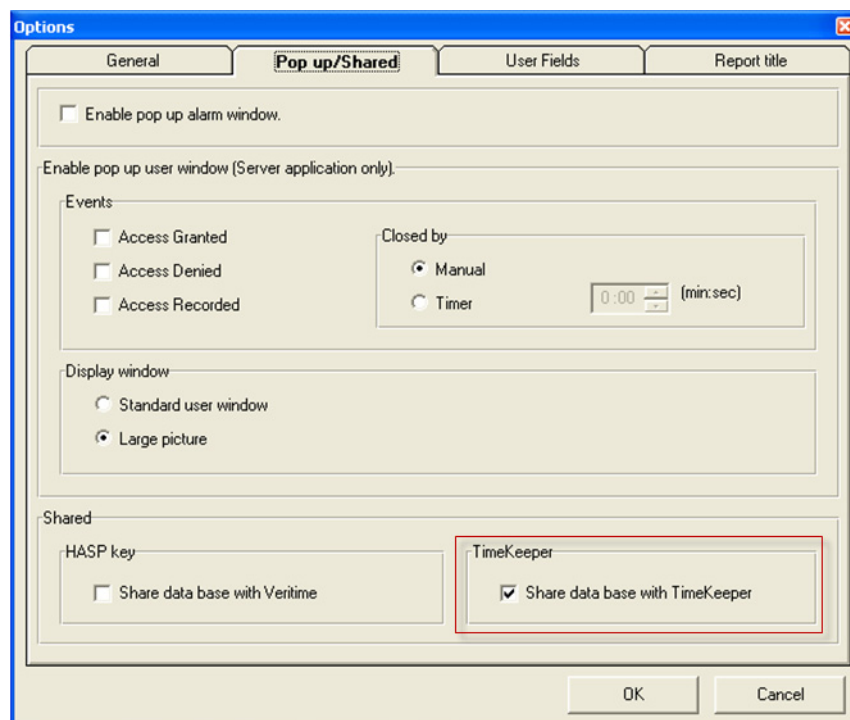
Share AXTRAX Database on Server

The **AXTRAX** database on the server must be shared with **TimeKeeper** when **Rosslare** is integrated because employee data and statuses from shared tables are updated every few seconds.



To share the AXTRAX database:

1. From the AXTRAX program, select **Tools=>Options**.
The **Options** dialog box opens.
2. From the **Options** dialog box, select the **Pop up/Shared** tab:



3. Check mark the **Share data base with TimeKeeper** option.
4. Click **OK**.

Activate Rosslare Scanning Driver from Workstation



To activate the Rosslare scanning driver from the workstation:

1. From the workstation PC, open C:\WINDOWS\system32.
2. Paste **AxTraxCard.exe** in the folder.
3. Select **Start=>Run**
4. Enter C:\WINDOWS\system32\AxTraxCard.exe \regserver and click **OK**.

Activate Rosslare Integration from TimeKeeper

NOTE: In order to update configuration definitions in TimeKeeper, the administrator password must be entered.

NOTE: Only one external program can be activated at a time.



To activate the Rosslare integration from TimeKeeper:

1. Select **Set-Up=>Add/Edit Configuration Files=>Edit/View System Environment Definitions**.

The **System Configuration** dialog box opens.

Field	Value
User Name	
Software ID	905124
Installation Date	12/30/2002
Version	5.09.09
Version Date	09/30/2009
Maximum Employees	99999
Current No. of Emp.	1
Demo End-Date	12/31/2009

- From the **System Configuration** dialog box, expand the **External Programs** item and select **Rosslare**:

The screenshot shows the 'System Configuration' dialog box. On the left, the 'External Programs' folder is expanded, and 'Rosslare' is selected. The main area displays the following configuration fields:

Rosslare Installed	Rosslare (MS-SQL) System
SQL Server Name	sql2005\rd
Database Name	VERITRAX5
Authentication Mode	WINDOWS Authentication
SQL User Name	sa
SQL Password	XXXXXXXXXXXXXXXXXXXX
Confirm Password	XXXXXXXXXXXXXXXXXXXX

- From the **External Programs** item select **Key Fields Format**:

The screenshot shows the 'System Configuration' dialog box with 'Key Fields Format' selected under 'External Programs'. The main area displays the following configuration fields:

Badge No. Format	Numeric	Badge No. Length	15
Employee No. Format	Numeric	Employee No.	
Sort Code 1 Format	Numeric	Profession Format	Numeric
Sort Code 2 Format	Numeric	Plant No. Format	Numeric
Sort Code 3 Format	Numeric	Site No. Format	Numeric
Id Number Format	Numeric	Id Number Masking	
Contract No. Format	Numeric	Code Definition	Numeric
Department No.	Numeric	City Code	Numeric

When working with **Rosslare**, the badge number and employee number are equivalent. Therefore, ensure that the **Badge No. Format** and **Employee**

No. Format fields are identical.

Add Rosslare Data Initialization Menu Item



Update the **TimeKeeper** menu with the **Initialize data from Rosslare system** option:

1. From **TimeKeeper**, select **Set-up=>Add/Edit Configuration Files=>Edit/View Menu Configuration**.
2. From the **General Menu Structure** tab, click in the menu item list where the new **Initialize data from Rosslare system** option should be added.

3. From the **General Menu Structure** tab, enter the following information:

❑ **Menu name:** Initialize data from Rosslare system

❑ **Program Name:** DRSCONG

❑ **Program Type:** Program

❑ **Menu Attributes:** select **Enabled** and **Visible**

4. Click 

5. Exit the dialog box, and exit **TimeKeeper**.

6. Restart **TimeKeeper**.

Initiating Employee and Badge Data in Rosslare

This process should be performed for customers who previously used **Rosslare** and therefore, for whom data already exists in the **Rosslare** system, when integrating with **TimeKeeper**.

This process updates the following tables in **Rosslare**:

■ TK_TAG

■ TK_EMPLOYEE

In addition, the process connects the **Rosslare** employees to the **TimeKeeper** employees.



To initiate the employee and badge data from Rosslare

1. Open the **Initialize data from Rosslare system** from the menu (where you configured it as is described in [Add Rosslare Data Initialization Menu Item](#)).

2. Enter the **Last Polling date from Rosslare** and the **Last Polling time from Rosslare** to determine the starting point from which to run the initialization.

NOTE: Data prior to the date and time entered will not be imported to TimeKeeper.

3. Click **Start**.

Data from Rosslare is imported to **TimeKeeper** and the **TK_EMPLOYEE** and **TK_TAG** tables are updated.

NOTE: Start is only available for systems that are integrated with Rosslare for the first time based on no existing entries in TK_EMPLOYEE and no existing entries in TK_TAG.

Initiating Existing Rosslare Employee and Badge Data in TimeKeeper

Once **Rosslare** and **TimeKeeper** are integrated, employees already existing in **Rosslare** should be added to **TimeKeeper**. This is a one-time only process to be activated when initializing the integration.



To initiate employee and badge data in TimeKeeper:

1. Ensure that the initialization process for data from **TimeKeeper** to **Rosslare** is activated first. For more information, see [Initiating Employee and Badge Data in Rosslare](#).
2. From the **Employee Profile**, enter a new employee.
3. From the **Badge Number** box, click **More**. The **Rosslare Tags (Badges)** dialog box opens:

4. Click . The **Connect to Rosslare** dialog box opens:

5. Select the employee to be updated in **TimeKeeper** from Rosslare by selecting an employee from the **Rosslare Employee** dropdown list.
6. Click .

Adding New Employees Ongoing

Once **Rosslare** and **TimeKeeper** are integrated, new employees added to **TimeKeeper** are also added to **Rosslare**. Alternatively, employees that already exist in **Rosslare** can be added afterwards to **TimeKeeper** (see [Initiating Existing Rosslare Employee and Badge Data in TimeKeeper](#)).



To add new employees to Rosslare and to TimeKeeper:

1. Open the Employee Profile and enter all mandatory information for the new employee.
2. Click .
3. From the **Badge Number** box, click **More**. The **Rosslare Tags (Badges)** dialog box opens:

4. Enter any necessary changes for the new employee.
5. Click . The following confirmation appears:

6. Click **Yes**. The following confirmation appears:



- Click **Yes** to create a new, parallel employee in **Rosslare** that is connected to the new employee in **TimeKeeper**.

Managing Rosslare Badges from TimeKeeper

This section describes how to manage badges for a specific employee.



To manage Rosslare badges from TimeKeeper:

- From the **Badge Number** box in the **Employee Profile**, click **More**. The **Rosslare Tags (Badges)** dialog box opens:

- Click the **Tags (Badges)** tab. The **Tags (Badges)** tab appears:

General Data			Tags (Badges)	
			Tags List	
Type	Code	Facility	Status	
Clock and Data	7777774		Active	
▶ Wiegand 26 bits	64911	99	Active	

Following are the action buttons that may be used for employees that exist and are integrated between **TimeKeeper** and **Rosslare** and their uses

from the **Tags (Badges)** tab:

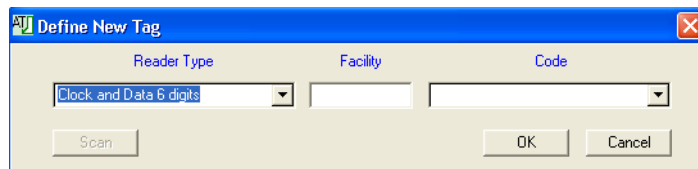
Button	Description
	Add badge —enables the user to select a badge from the badges available in the database and to associate that badge to the specific employee. A maximum of 16 badges can be associated to one employee. Clicking this button opens the Define New Tag dialog box. For more information, see To define a new tag: .
	Detach badge —removes the badge from the list of badges associated with the specific employee.
	Delete badge —deletes the badge from the database. The badge status in TK_TAG is updated to 2 to indicate to Rosslare during synchronization that the tag should be removed from the database in Rosslare and then the badge is also removed from TK_TAG. For more information about statuses see Employee Profile Statuses .
Status change	Status updates automatically when Detach badge or Delete badge is selected, per statuses defined in Employee Profile Statuses .



To define a new tag:

1. From the Tags (Badges) tab, click .

The **Define New Tag** dialog box opens:



The **Reader Type** loads based on the user definitions in the **USERS.CLOCK_TYPE** field, or if the reader type is not defined for the specific user, the field appears empty.

Following are the reader types available with **Rosslare**:

Lavie Numbers	Reader Type	Maximum Card ID	Maximum Facility	Scan
0	Wiegand 26 bits	65535	255	Yes
1	Clock and Data	99999999999	None	
2	HID Corporate 1000	1048575	4095	
3	Wiegand 37 bits	34359738367	None	

Lavie Numbers	Reader Type	Maximum Card ID	Maximum Facility	Scan
4	Wiegand 32 bits	4294967296	None	Yes
5	Wiegand 32 bits data reversed	4294967296	None	Yes
6	Wiegand 34 bits	4294967296	None	Yes
7	Wiegand 40 bits	4294967296	None	Yes
8	Wiegand 40 bits PCSC	65535	65535	
9	Wiegand 64 bits	18446744073709551615	None	
10	Wiegand 37 bits with Facility Code	65535	1023	
11	Clock and Data 6 digits	999999	None	

2. From the **Reader Type** dropdown list, select a badge from the list of available tags.

NOTE:

If the Rosslare database has not been updated recently, tags that are already in use for other employees may appear in the list. If a tag that is already in use is selected, an error message appears. Click **OK** and select a different tag from the list.

3. Select a code from the **Code** dropdown list to automatically populate the **Facility**.

4. For cards that need to be scanned (based on the table in step 1.) click **Scan**.

- a. Click **Scan**.

- b. Pass the card through the scanner attached to the PC.

The COM exit details are scanned and checked for the current user based on the USERS.COM_PORT field and the type of scanner in use. The results should be returned within three seconds. If a result is not returned within three seconds, the error "Tag cannot be read." is returned.

If the COM port definitions for the defined user are incorrect, the error "TAG number cannot be read: COM Port is wrong." is returned.

If the tag can be read, the tag becomes **Active** in the status field of the tab.

5. Click **OK**.

Time Polling

There are two time polling methods available:

- [Automatic Time Polling](#)
- [Manual Time Polling by Date Range](#)

Automatic Time Polling

A program activated from within **TimeKeeper** runs to automatically collect new clock transactions from **Rosslare** based on the last time that clock transactions were collected.



To run the automatic time polling:

From **TimeKeeper**, click .

The program (**TRXSQLRS**) runs as follows:

1. The **Rosslare** database is read for transactions from the **EVENT_VIEW** view (located in the **Rosslare** database).
 - a. Only new transactions since the last reading are searched, based on the **TimeKeeper ROSCTRL.AUTONUM** field.
 - b. **EVENT_VIEW** is scanned for the first number that is greater than the number from the **ROSCTRL.AUTONUM** field.
 - c. Transactions that are identified are marked with the date and time of the current reading in the **ROSCTRL.AUTONUM** field so that they are not re-read the next time the program is run.
2. A transaction file is produced according to the pre-defined **Lavie** format and is stored in the table defined from the configuration table. The file contains all the clock transactions from the scan as described in step 1.
3. **TRXSQLRS** takes the data and updates the **TimeKeeper** tables with entry and exit transactions only.

Manual Time Polling by Date Range

Manual time polling enables the clock transactions that were already ready by the automatic polling to be re-read based on date range.



To re-read clock transactions

1. Update the **TimeKeeper** menu with the **Rosslare Time Polling** option:
 - a. From **TimeKeeper**, select **Set-up=>Add/Edit Configuration Files=>Edit/View Menu Configuration**.
 - b. From the **General Menu Structure** tab, click in the menu item list where the new **Rosslare Time Polling** option should be added.
 - c. From the **General Menu Structure** tab, enter the following information:
 - ❖ **Menu name:** Rosslare Time Polling
 - ❖ **Program Name:** TRXSQLRS
 - ❖ **Program Type:** Program
 - ❖ **Program Parameter:** 1
 - ❖ **Menu Attributes:** select **Enabled** and **Visible**
 - d. Click 
 - e. Exit the dialog box, and exit **TimeKeeper**.
 - f. Restart **TimeKeeper**.
2. From the new menu item that you inserted, open the **Rosslare Time Polling** dialog box:



3. Enter the date range for which to run the polling.

4. Click .

First In Last Out Clock Transaction Readings

First In Last Out (FILO) functionality is now available per employee. **First In Last Out** dictates that the first clock transaction reading of the day is received as the **Entry** time and the last clock transaction of the day is received as the **Exit** time for the employees indicated.

The **FILO** readings can be applied to specific employees in the system.

Requirements

Environment

General SQL environment

Files and Programs

Following are the files and programs necessary for use of the **FILO** functionality:

Program/File Name	Last Update At Least On:
TRXFSQL.dll	July 2, 2009
SYSCNFSQL.dll	July 19, 2009
MES40 + MES40	July 2009

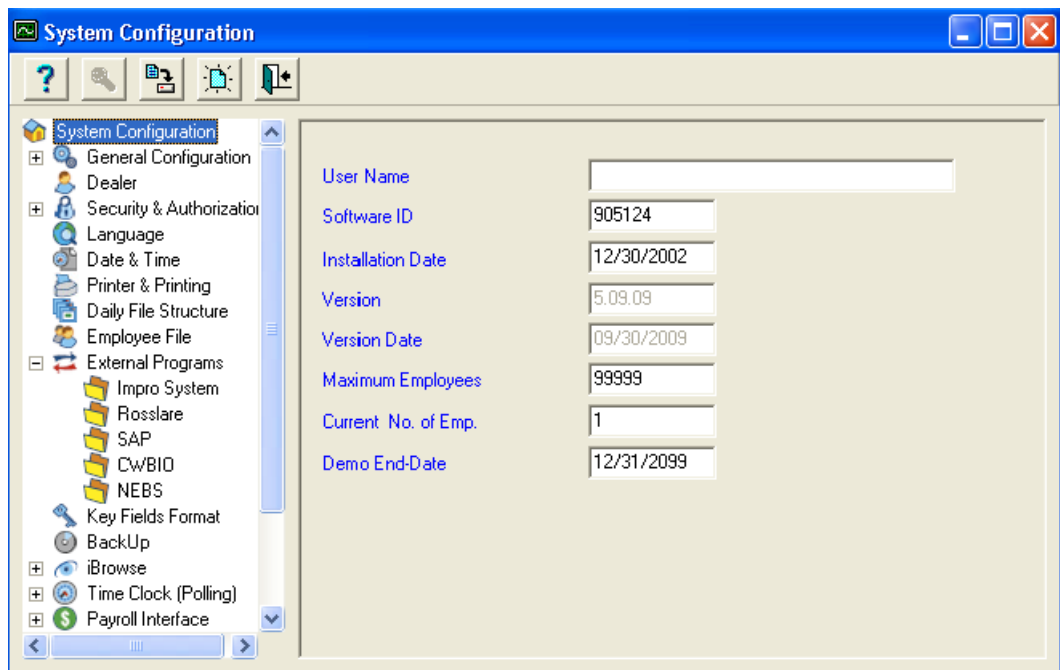
Applying FILO



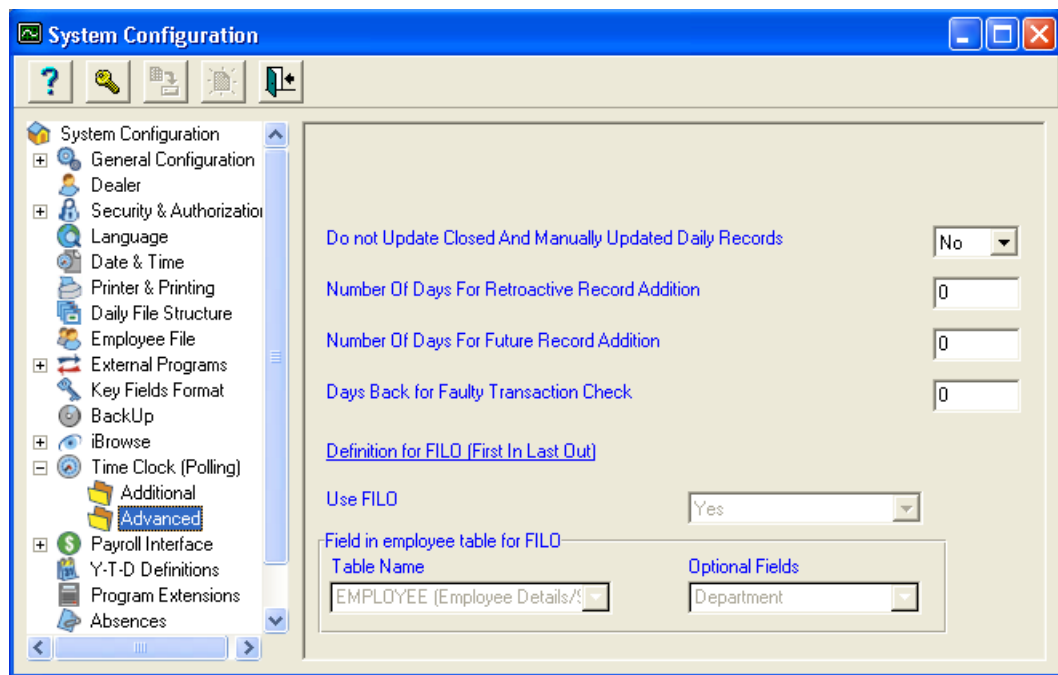
To apply FILO:

1. Select **Set-Up=>Add/Edit Configuration Files=>Edit/View System Environment Definitions.**

The **System Configuration** dialog box opens.



2. From the **System Configuration** dialog box, expand the **Time Clock (Polling)** menu and select **Advanced**. The following dialog box appears:



NOTE: In order to update configuration definitions in TimeKeeper, the administrator password must be entered.

3. From the **Use FILO** field select:

- ☐ **No**—to disable **FILO** system-wide
- ☐ **For IMPRO Only**—to enable **FILO** for **IMPRO** transactions only
- ☐ **Yes**—to enable **FILO** for use on any employee in the system

NOTE: Use any field that accept the value 2 for more than one employee.

4. If **Yes** is selected for the **Use FILO** field, select the **Table Name** and the corresponding field from the **Optional Fields** dropdown to indicate where the information is stored per employee.
5. Save and exit **TimeKeeper**.
6. Open the **EMPLOYEE PROFILE FOR WHICH** to activate **FILO**.
7. To activate **FILO**, enter 2 (absolute value) in the field corresponding to the field

that was selected from the **System Configuration** dialog box.

EXAMPLE: FLEX_DEF_FIELD_1 enables decimal use. This field is selected in which to store the value 2 for FILO, then the absolute number 2 must be entered in the field per employee. Decimals cannot be used, or the FILO will not be activated.

