

Pcounter (Netware NDPS) Installation Guide

Common Configurations and Options

Revised April 30, 2008

The Goal

The Goal of this document is to provide step by step configuration instruction for Pcounter in some of its most common configurations.

Common Challenges

The most challenging thing about configuring Pcounter is to identify how you would like to use the product. In general the Administrator installing Pcounter should ask themselves a few questions.

- 1) Do all users login to the PC's with an NDS account or are the computers pre-logged in? If they are pre-logged in as a default user pay close attention to Anonymous mode printing options.
- 2) Will it be necessary to assign a price per page (ever) to each print job or will a simple quota of pages be sufficient?
- 3) Do all user print to a NDPS or iPrint hosted printer currently? They should NOT be printing direct IP to the printers

Because of Pcounter's flexibility it is impossible to cover all configuration options in this manual. However, the most common configuration and options are listed below.

How to use this manual

This manual has four sections, *Basic Pcounter Installation*, *Configuration Options*, *Optional Add-On components* and *Macintosh Support*.

Basic Pcounter installation: Gives step by step instruction on how to install Pcounter and make it log basic printing information. If your goal is simply to collect data about the volume of printing this would be all you need.

Configurations Options: Lists 6 configuration options. ****NOTE See below** These configuration options are some of the most common configurations used by our customers. Each configuration option has a brief description of the work flow of the user as well as a list of what "typical" types of customer use each configuration. It is recommended to read each configuration and decide which best fits your needs.

Optional Add-On components: This section covers some additional products that AND Technologies offers to compliment the Pcounter server. There are brief description of what the component does and a list of an changes that would have to be made to the Configuration options that had been configure in the *Configuration Options* section.

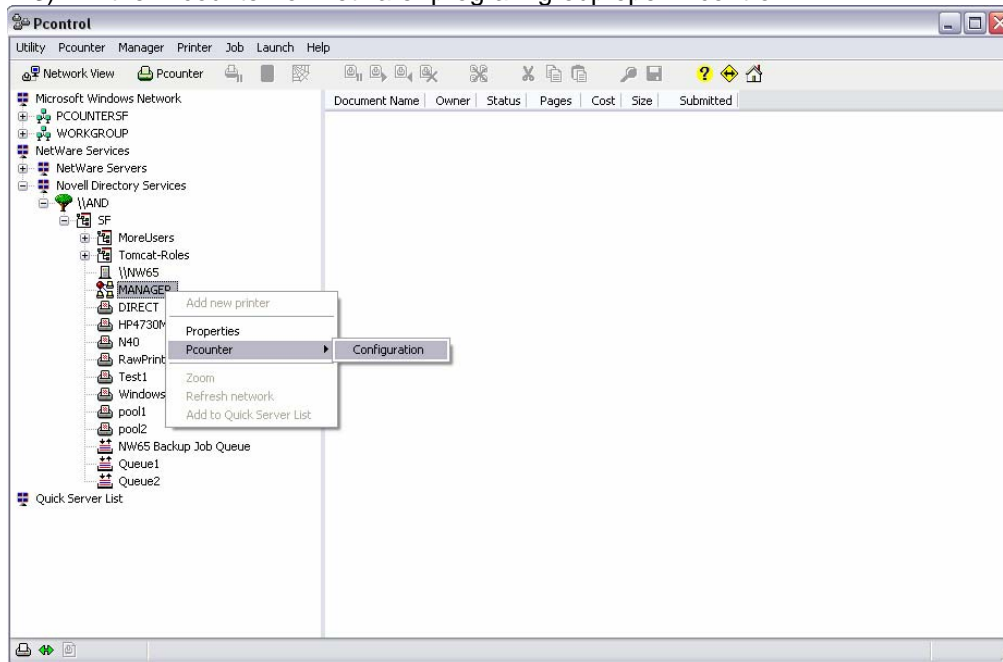
Macintosh Support: This section gives information on where Macintosh installation help can be downloaded from our web site, if you are using an all PC environment this section will not be needed.

****NOTE--** If you are using an environment where users do not log in to the computers as themselves then please pay close attention to the sections labeled "anonymous mode". These sections are specifically designed for scenarios where the computers are pre-logged in as a default user.

Basic Pcounter installation (Netware NDPS)

These instructions assume that you are at a PC workstation that is connected to the Netware server using Client 32 with NDPS support loaded. You will need to have admin rights to the Root of the NDS tree in order to install and configure Pcounter.

- 1) Download the most recent version of Pcounter for Netware. The software can be obtained at <http://www.pcounter.com/download.html>.
- 2) Extract the zip file to any directory on the local workstation and run the setup file. This will install a new program group in windows call "Pcounter for Netware".
- 3) In the "Pcounter for Netware" program group open Pcontrol



- 4) In the left pane of Pcontrol, browse the NDS tree and find the NDPS manager object. Right click on the NDPS manager object and select Pcounter → Configuration. A four tabbed window will appear with the tabs being *Global Settings*, *Printer Agents*, *Popup*, and *Web interface*.
- 5) Select the "Global Settings" tab and click on the "Install server files". A message should then be displayed saying that the pcountdp.nlm was successfully copied to the server system directory.
- 6) Click on the "Grant attribute rights" link and select the context in NDS that the users are in and click the "Grant" button (This step may need to be repeated if multiple contexts are used for user objects). A message pops up saying Success. If any error message appears the current user logged into the workstation does not have Admin rights to the Root of the NDS tree.
- 7) Select the "Printer Agents" tab and select the printer that you want Pcounter to monitor and then click on the "Add Accounting" button (an arrow will appear next to the printer object).
- 8) After adding the accounting feature click on the "Shutdown" button and then click on the "Startup" button (same button). On the server the pcountdp.nlm will load automatically. The accounting status of the printer should show as active with the Pcounter version in brackets.
- 9) Repeat instruction number 7 and 8 until all desired printers have accounting active on them.

Pcounter will now log all jobs that are printed through the printers with accounting enabled (arrows next to them). If logging is the only desired action, then configuration is finished, if not proceed to *Configuration Options*.

Configuration Options

There are four options listed below choose the option that would best suit your needs. Under each option is a brief **Description** of how the work flow would go for the user. There is also a **Where Used** section that has a brief listing of what types of schools and businesses would use the type of configuration described. **Make sure you have completed the *Basic Pcounter Configuration Section* before configuring these options.**

Open Pcontrol and find your NDPS manager object, right click and select Pcounter → Configuration. This will present a four tabbed windows that you see in the configuration options below.

Option #1 Simple page tracking and quotas. (Anonymous Mode)

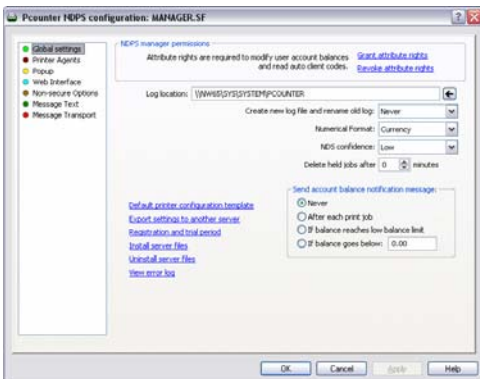
Description:

This option assumes all workstations are pre-logged in as a default user. Pcounter will present a Popup for the user so that the user can authenticate to their Novell NDS user object. The user name is authenticated, and the balance verified to be sufficient for the job. The job will be debited versus their Pcounter account balance once the NDPS manager notifies Pcounter it has printed.

Where Used:

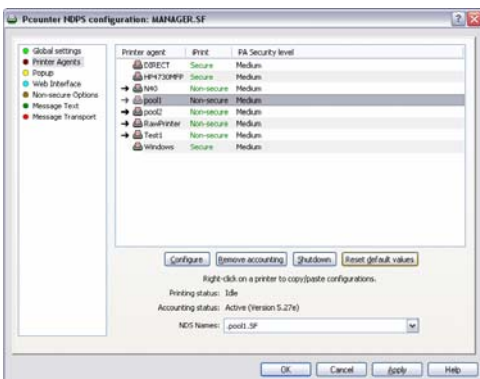
- 1) K-12 school labs where all computers are pre-logged in as a default user.
- 2) Any School or office that only wishes to give a page quota to users.

Global Settings Tab:



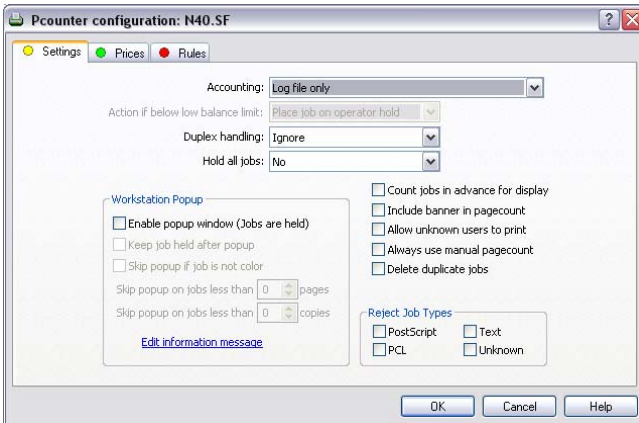
- 1) Change *Numerical Format* to **Pages**
- 2) Set the *Delete held jobs after* to some number of minutes that you would want the system to delete the job if the user has not answered the popup. Most sites set this between **15-30** minutes

Printer Agents Tab



- 1) Select a printer that has an *arrow* next to it and then select *Configure*.
- 2) Once the next window appears refer to the next section **Printer configuration** Follow steps 1-6 in that section. After *Printer configuration* is done click the Shutdown and Startup button (same button) to make the changes take affect for each printer you configure. Repeat this procedure on all *arrowed* printers.

Printer configuration



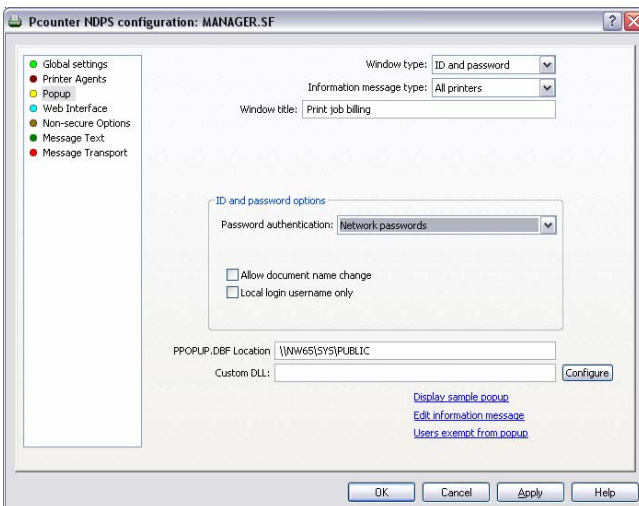
- 1) Change *accounting* to **Account Balances and Log File**
- 2) Select the *Action if below low balance limit* to either **Delete job from queue** or **Place job on operator hold**. If set to operator, hold an administrator will need to resume the print job for the user.
- 3) **Check the Box** next to *Enable popup window*
- 4) Go to the prices tab and click *Enabled Color Detection*
- 5) Click on *set all prices*, set the Black and White and Color prices.
- 6) Click ok to accept changes

Special Consideration

If Pcounter Station will be used add the following configuration change.

- 1) On the *printer configuration* tab check the box that says “**keep jobs paused after popup**”.

Popup Tab



- 1) Change the *Window Type* to **ID and Password**
- 2) Change *Information Message type* to **All printers**
- 3) Click on *Edit information message* and type in what you would like the user to see when the popup is displayed.
- 4) Set *Password authentication* to **Network passwords**

Post Configuration:

Down the NDPS manager and reload it, this will make sure all changes made have taken affect. Copy ppopup.exe on to the client workstations and have it load in the startup group, this .exe can be found in C:\Program files\Pcounter for Netware\Netware\. **The users will not get a popup without Ppopup.exe running in the task bar.**

Option #2 Account Balance tracking with Deposits (Anonymous Mode)

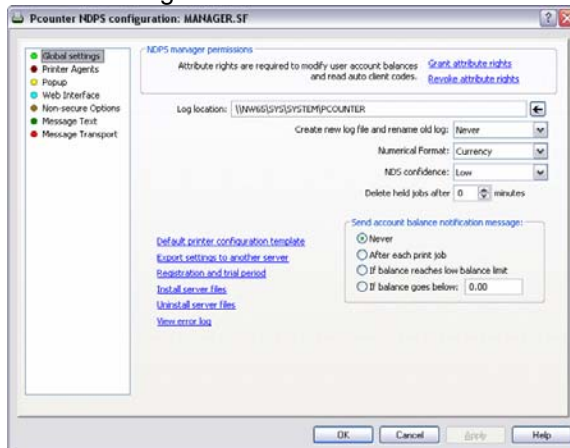
Description:

This option assumes all workstations are pre-logged in as a default user. Pcounter will present a Popup for the user so that the user can authenticate to their Novell NDS user object. The user name is authenticated, and the balance (in Currency) is verified to be sufficient for the job. The job will be debited versus their Pcounter account balance once the NDPS manager notifies Pcounter it has printed. This option is very similar to **Option #1**, the primary difference is that account balances are tracked in dollars instead of pages. This gives the advantage of adding a TBS9500 deposit station to the network to handle the user's deposits. Further information on the TBS9500 is listed in the *Optional add-on Components* section later in this manual.

Where Used:

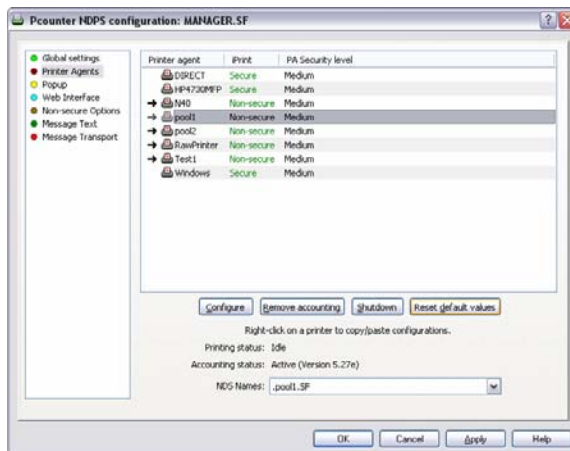
- 1) Higher Education school labs where all computers are pre-logged in as a default user.

Global Settings Tab:



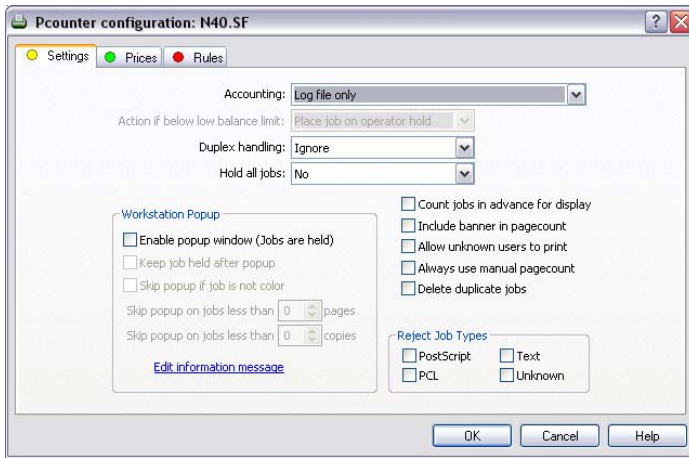
- 1) Change *Numerical Format* to **Currency**
- 2) Set the *Delete held jobs after* to some number of minutes that you would want the system to delete the job if the user has not answered the popup. Most sites set this between **15-30** minutes

Printer Agents Tab



- 1) Select a printer that has an *arrow* next to it and then select *Configure*.
- 2) Once the next window appears refer to the next section **Printer configuration** Follow steps 1-6 in that section. After *Printer configuration* is done click the Shutdown and Startup button (same button) to make the changes take affect for each printer you configure. Repeat this procedure on all *arrowed* printers.

Printer configuration



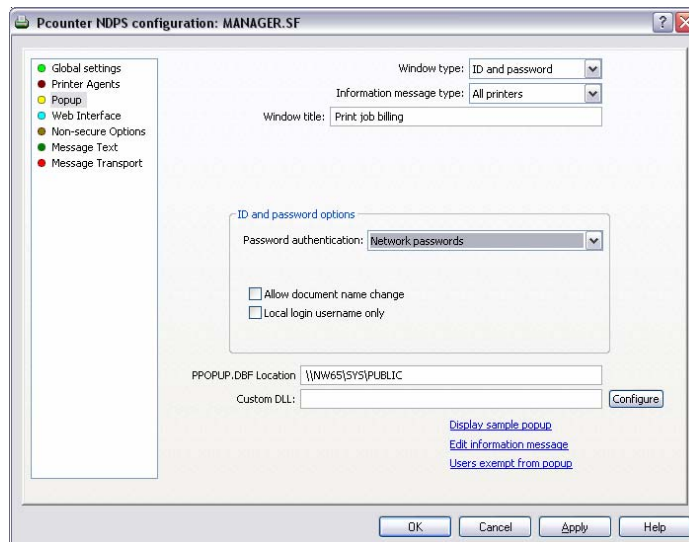
- 1) Change *accounting* to **Account Balances and Log File**
- 2) Select the *Action if below low balance limit* to either **Delete job from queue** or **Place job on operator hold**. If set to operator hold, an administrator will need to resume the print job for the user.
- 3) **Check the Box** next to *Enable popup window*
- 4) Go to the prices tab and click *Enabled Color Detection*
- 5) Click on *set all prices*, set the Black and White and Color prices.
- 6) Click ok to accept changes

Special Consideration

If Pcounter Station will be used add the following configuration change.

- 2) On the *printer configuration* tab check the box that says “**keep jobs paused after popup**”.

Popup Tab



- 1) Change the *Window Type* to **ID and Password**
- 2) Change *Information Message type* to **All printers**
- 3) Click on *Edit information message* and type in what you would like the user to see when the popup is displayed.
- 4) Set *Password authentication* to **Network passwords**

Post Configuration:

Down the NDPS manager and reload it, this will make sure all changes made have taken affect. Copy ppopup.exe on to the client workstations and have it load in the startup group, this .exe can be found in C:\Program files\Pcounter for Netware\Netware\. **The users will not get a popup without Ppopup.exe running in the task bar.**

Option #3 Client Code Logging (Authenticated and Anonymous mode)

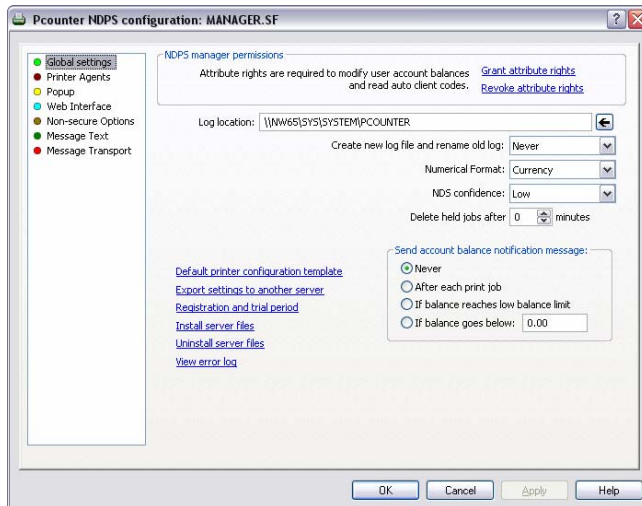
Description:

This option works the same whether the users are logged in to the network as them self or logged in as a default user. Pcounter will present a Popup so that the user can manually type in or select a client code from a list. Because the goal is to track codes and not users no authentication is necessary. If tracking users is required then all users must authenticate to their workstation with their own NDS login.

Where Used:

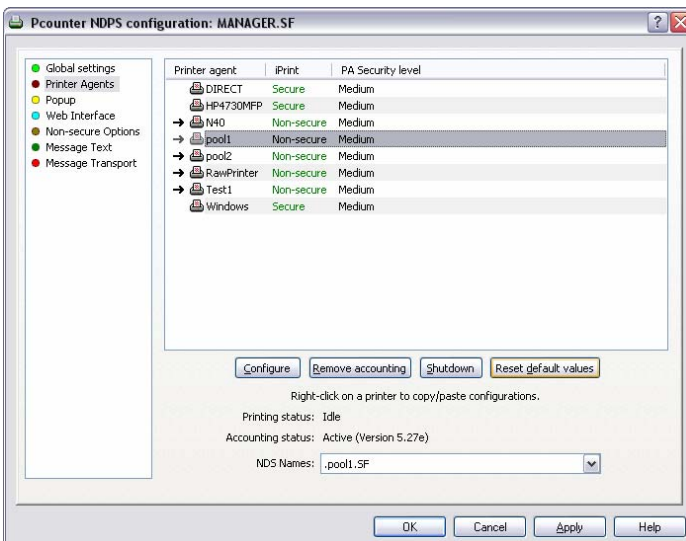
- 1) Any schools that wish to prompt departments for billing codes
- 2) Law Offices, Architectural Offices, Engineering offices.

Global Settings Tab



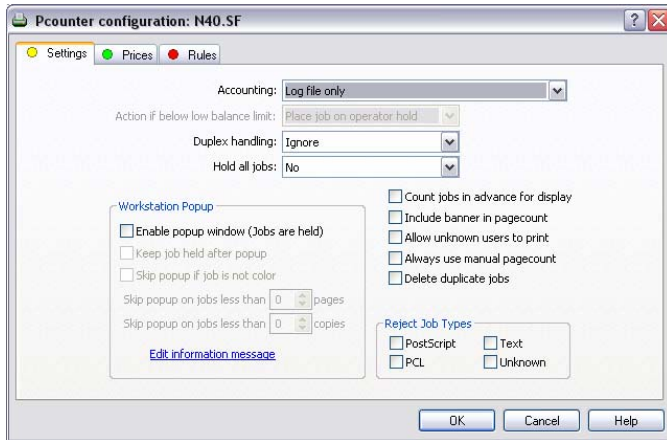
- 1) Change *Numerical Format* to **Currency**
- 2) Set the *Delete held jobs after* to some number of minutes that you would want the system to delete the job if the user has not answered the popup. Most sites set this between **15-30** minutes

Printer Agents Tab



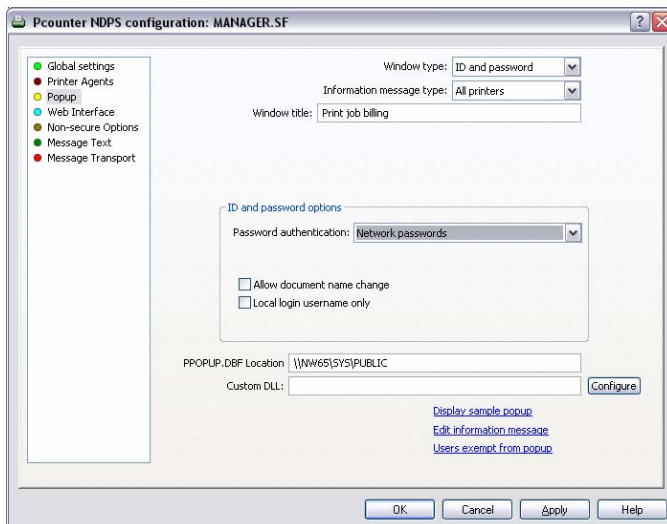
- 1) Select a printer that has an *arrow* next to it and then select *Configure*.
- 2) Once the next window appears refer to the next section **Printer configuration** Follow steps 1-5 in that section. After *Printer configuration* is done click the *Shutdown and Startup* button (same button) to make the changes take affect for each printer you configure. Repeat this procedure on all *arrowed* printers.

Printer configuration



- 1) Change *accounting* to **Log file only**
- 2) **Check the Box** next to *Enable popup window*
- 3) Go to the prices tab and click *Enabled Color Detection*
- 4) Click on *set all prices*, set the Black and White and Color prices.
- 5) Click Ok to accept changes

Popup Tab



- 1) Change the *Window Type* to **Client Code list** if you are using single codes. Choose **Matter Numbers** if you are using Sub codes.
- 2) Change *Information Message type* to **All printers**
- 3) Click on *Edit information message* and type in what you would like the user to see when the popup is displayed.
- 4) Choose the *list options* desired. Please see description of each list option below.

Client Code only from list—Allows the user to select the codes which have been imputed by the Admin using Pcounter Administrator. If this option is not checked a user can type any code they would like for tracking, that code will NOT be added to the database.

Subcode only from list—Allows the user to select the sub codes which have been imputed by the Admin using Pcounter Administrator. If this option is not checked a user can type any sub code they would like for tracking, that code will NOT be added to the database.

Associate Client Codes with Network users and group names—This option will only allow client codes and sub codes to be show to those users who the admin has assigned the codes. Codes are assigned using Pcounter Administrator. IMPORTANT be careful using this option, by Default no association are made and the lists would come up blank.

Remember previous selection—This allows popup to remember the last client code selected.

Allow non-chargeable jobs—Allows users to select a check box on the popup flagging the jobs as non chargeable.

Allow Auto-response—This will allow the user to select a time period where PPopup will automatically respond with the current code and sub code.

- 1) On the *printer configuration* tab check the box that says “**keep jobs paused after popup**”.

Post Configuration:

Down the NDPS manager and reload it, this will make sure all changes made have taken affect. Copy ppopup.exe on to the client workstations and have it load in the startup group, this .exe can be found in C:\Program files\Pcounter for Netware\Netware\. **The users will not get a popup without Ppopup.exe running in the task bar.**

Option #4 Page tracking via page Quotas or Balance (Authenticated Printing)

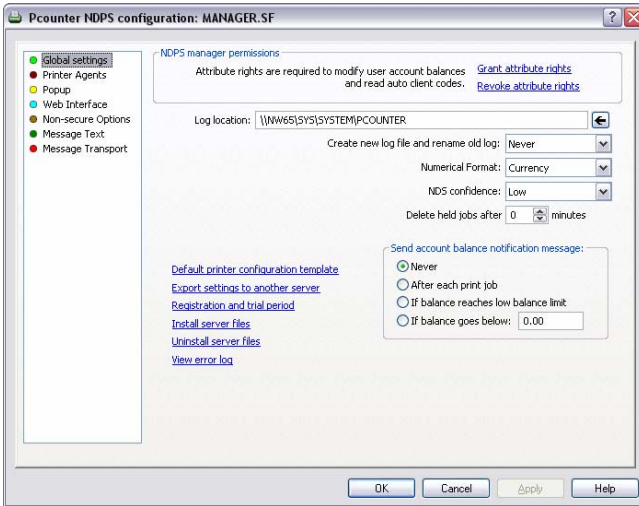
Description:

This is probably one of the most direct ways to charge students a simple print quota. This configuration also has the ability to connect a TBS 9500 deposit station to it so students can add their own currency to the system (Currency Only). Each student logs into the computer with their own NDS login credentials and Pcounter calculate either the number page or currency needed for the job and compare it against the Pcounter balance. The job will be debited versus their Pcounter account balance once the NDPS manager notifies Pcounter it has printed. Once their Pcounter balance has reached Zero the student can not print.

Where Used:

- 1) K-12 or Higher Education computer labs.
- 2) Any School or office that only wishes to give a page quota to its users.

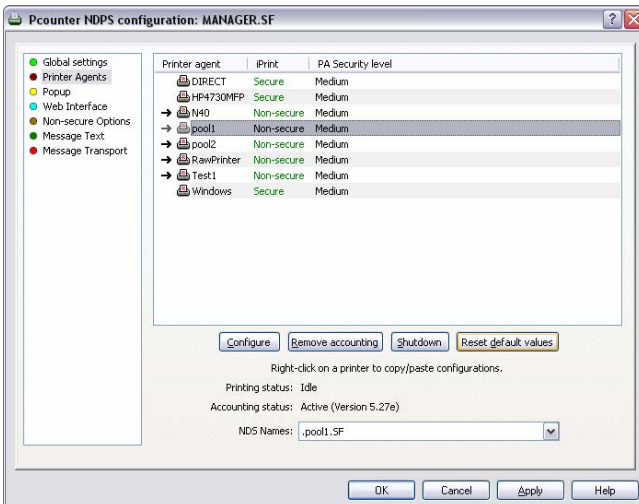
Global Settings Tab:



- 1) Change *Numerical Format* to **Pages** or **Currency****

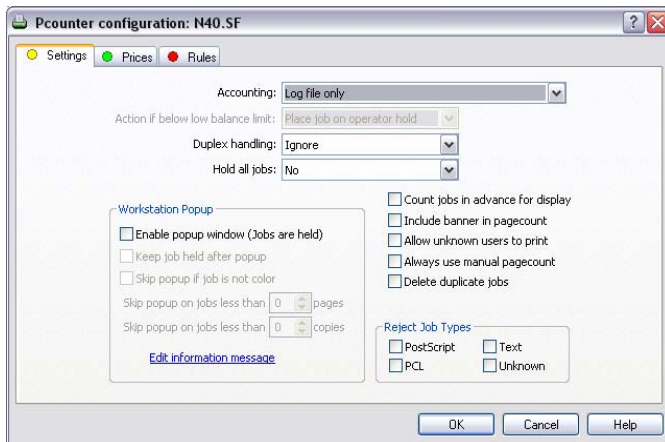
Note** Currency is required if the TBS9500 going to be used for the students to self deposit money, or if you intend to charge Decimal amounts for printing.

Printer Agents Tab



- 1) Select a printer that has an *arrow* next to it and then select *Configure*.
- 2) Once the next window appears refer to the next section **Printer configuration** Follow steps 1-5 in that section. After *Printer configuration* is done click the Shutdown and Startup button (same button) to make the changes take affect for each printer you configure. Repeat this procedure on all *arrowed* printers.

Printer configuration



- 1) Change *accounting* to **Account Balances and Log File**
- 2) Select the *Action if below low balance limit* to either **Delete job from queue** or **Place job on operator hold**. If set to operator hold, an administrator will need to resume the print job for the user.
- 3) Go to the prices tab and click *Enabled Color Detection*
- 4) Click on *set all prices*, set the Black and White and Color prices.
- 5) Click ok to accept changes

Special Consideration

If Pcounter Station will be used add the following configuration change.

- 1) On the *printer configuration* tab check the box that says “**Enable popup window**”.

Post Configuration:

Down the NDPS manager and reload it, this will make sure all changes made have taken affect.

Option #5 Anonymous simple print release with Pcounter Station (with or without vending)

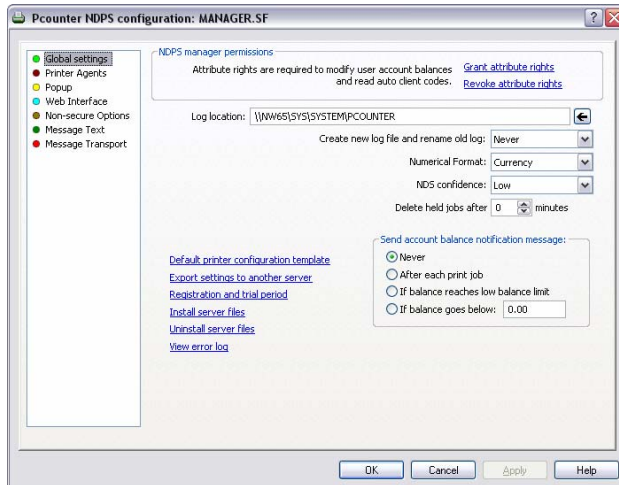
Description:

This option is designed specifically for use with Pcounter Station. If a Pcounter Station release station is not being used, this configuration should not be used. This configuration is a simple **non secure** print release format. Users print from workstations that are usually logged in with a default user. The user then goes to a Pcounter Station release station to release the jobs to the printer. A charge to an external device can be added if required.

Where Used:

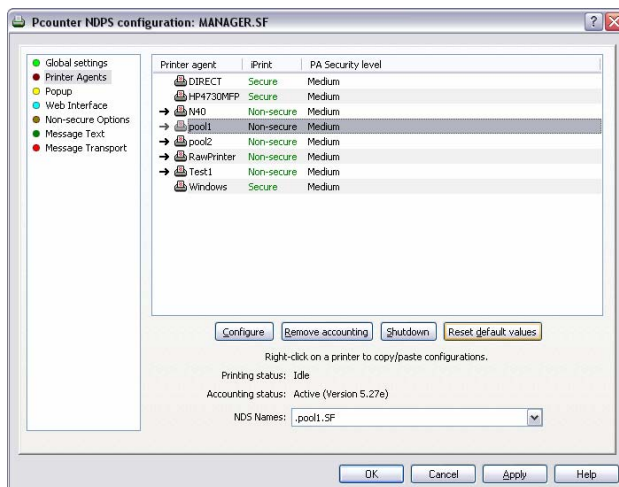
- 1) K-12 school labs where all computers are pre-logged in as a default user.
- 2) Universities and colleges where lab machines are pre-logged in and need to charge to an external card charging system such as a magnetic or smart card reader.
- 3) Universities and colleges where lab machines are pre-logged in and need to charge to an external card charging system such as a Blackboard, CBORD or CardSmith.

Global Settings Tab:



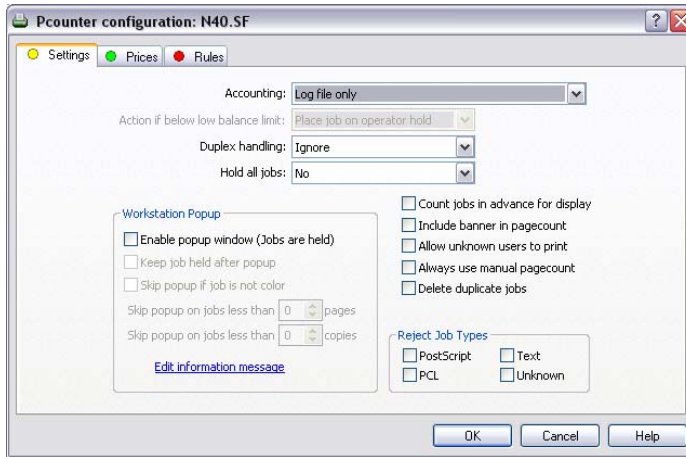
- 1) Change *Numerical Format* to **Currency**
- 2) Set the *Delete held jobs after* to some number of minutes that you would want the system to delete the job if the user has not released job at the Pcounter Station release station. Most sites set this between **30-120** minutes

Printer Agents Tab



- 1) Select a printer that has an *arrow* next to it and then select *Configure*.
- 2) Once the next window appears refer to the next section **Printer configuration** Follow steps 1-6 in that section. After *Printer configuration* is done click the Shutdown and Startup button (same button) to make the changes take affect for each printer you configure. Repeat this procedure on all *arrowed* printers.

Printer configuration



- 1) Change *accounting* to **Log File only**
- 2) **Check the Box** next to *Enable popup window*
- 3) Verify that *Count jobs in advance for display* is Checked.
- 4) Go to the prices tab and click *Enabled Color Detection*
- 5) Click on *set all prices*, set the Black and White and Color prices.
- 6) Click ok to accept changes

Post Configuration:

Down the NDPS manager and reload it, this will make sure all changes made have taken affect. Install and configure Pcounter Station on the computer that will be used for print release. An Installation guide for Pcounter Station can be found here.

<http://www.pcounter.com/support/pcounter-station-installation.pdf>

Option #6 Secure Simple print release with Pcounter Station (with or without vending)

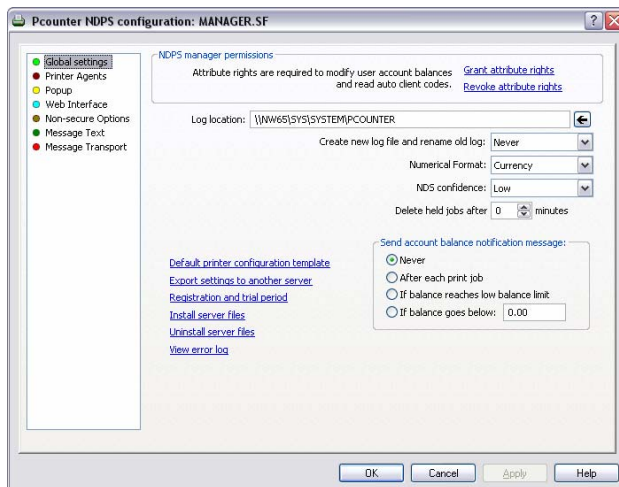
Description:

This option is designed specifically for use with Pcounter Station. If a Pcounter Station release station is not being used, this configuration should not be used. This configuration is a simple **secure** print release format. Users print from workstations that are usually logged in with a default user, Pcounter presents a popup to ask the user for an ID and an optional password. These ID and password are completely “made up” by the user. The user then goes to a Pcounter Station release station and types in the same ID and optional password to release the job(s) to the printer. A charge to an external device can be added if required.

Where Used:

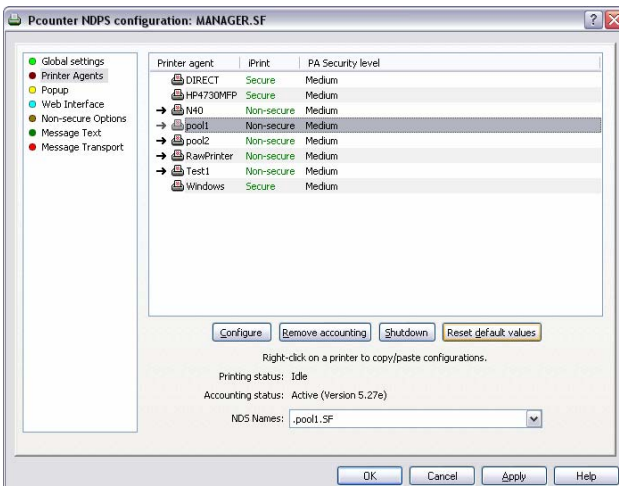
- 1) K-12 school labs where all computers are pre-logged in as a default user.
- 2) Universities and colleges where lab machines are pre-logged in and need to charge to an external card charging system such as a magnetic or smart card reader.
- 3) Universities and colleges where lab machines are pre-logged in and need to charge to an external card charging system such as a Blackboard, CBORD or CardSmith.

Global Settings Tab:



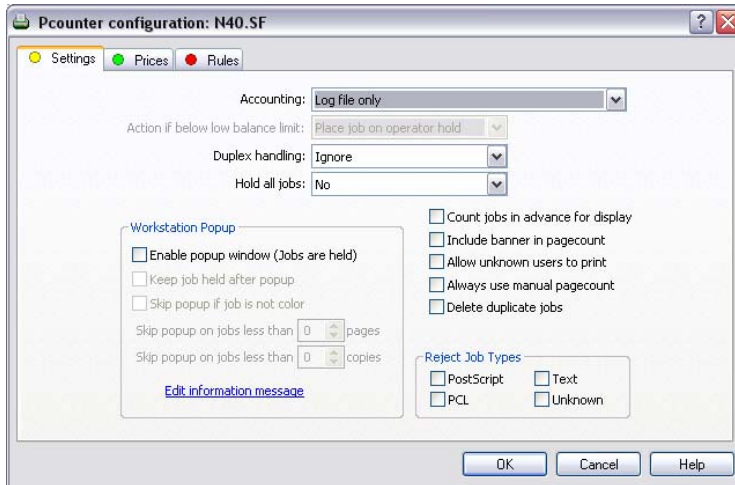
- 1) Change *Numerical Format* to **Currency** or **Pages**
- 2) Set the *Delete held jobs after* to some number of minutes that you would want the system to delete the job if the user has not answered the popup. Most sites set this between **15-30** minutes

Printer Agents Tab



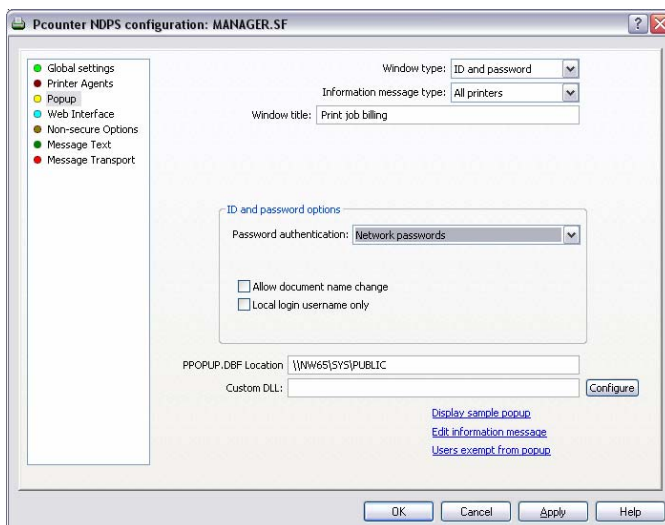
- 1) Select a printer that has an *arrow* next to it and then select *Configure*.
- 2) Once the next window appears refer to the next section **Printer configuration**. Follow steps 1-6 in that section. After *Printer configuration* is done click the Shutdown and Startup button (same button) to make the changes take affect for each printer you configure. Repeat this procedure on all *arrowed* printers.
- 3) Once all printers have been configured proceed to the **Popup Tab** section.

Printer configuration



- 1) Change *accounting* to **Log File only**
- 2) **Check the Box** next to *Enable popup window*
- 3) Verify *Count jobs in advance for display* is checked
- 4) Go to the prices tab and click *Enabled Color Detection*
- 5) Click on *set all prices*, set the Black and White and Color prices.
- 6) Click ok to accept changes

Popup Tab



- 1) Change the *Window Type* to **ID and Password**
- 2) Change *Information Message type* to **All printers**
- 3) Change the Password authentication to one of the following
 - a) **Job ID – No Job Password**
users make up ID and do not use password
 - b) **Job ID – Job password required**
users make up ID and make up a password
 - b) **Job ID – Job password option**
users make up ID and optionally use password

Post Configuration:

Down the NDPS manager and reload it, this will make sure all changes made have taken affect. Copy ppopup.exe on to the client workstations and have it load in the startup group, this .exe can be found in C:\Program files\Pcounter for Netware\Netware\. **The users will not get a popup without Ppopup.exe running in the task bar.** Install and configure Pcounter Station on the computer that will be used for print release. An Installation guide for Pcounter Station can be found here. <http://www.pcounter.com/support/pcounter-station-installation.pdf>

Optional Add-on Components

Pcounter Station (Release Station)

Pcounter Station is a Kiosk style print release station software that runs on a PC that you provide. After the users supply Pcounter with the information in the educational configurations previously mentioned, the jobs are paused before going to the printer. The user must then walk up and log into Pcounter Station and release their print job. An Installation guide for Pcounter Station can be found here. <http://www.pcounter.com/support/pcounter-station-installation.pdf>

TBS9500 (Deposit Station)

The TBS9500 is a coin and bill acceptor that can be used to add money to users NDS accounts. The unit is sold in both US and Canadian models. The TBS9500 includes a free license of Pcounter station. More information about the TBS9500 can be found here. <http://www.pcounter.com/tbs9500.html>

Configuration Changes Needed:

The only configuration option to be aware of is Currency MUST be the default accounting type.

Macintosh Support

For complete instructions on how to configure Pcounter for NDPS with Macintosh computers, please download our MAC support documentation here. <http://www.pcounter.com/support/Mac-Novell-install.pdf> This document covers in detail how to handle Macintosh printing through the Netware NDPS system.