

# *Presstimator BHR*

USER MANUAL

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# NOTES

# INTRODUCTION

Welcome to *Presstimator BHR*, the definitive solution to establishing precise costing and estimating standards for the Graphic Arts community. In our industry, success hinges on precision in pricing as well as in workmanship. The most common problem in preparing accurate estimates is the lack of current costing information. If your selling prices do not provide for the recovery of all of your operational costs (rent, taxes, office supplies, management salaries, expenses and other overhead expenditures) your company may not show a profit, even though you may have marked up the direct supplies, direct labor and added a contingency factor for overhead.

There are many questionable ways to ‘analyze’ your business’s operational costs. Some people will determine the direct costs of producing a product, including wages, raw materials and miscellaneous supplies and then add an arbitrary percentage to this cost to account for overhead. This is neither accurate nor recommended! Overhead cost allocations can be impacted by cost centers’ varying production hours, job complexity, etc.

*Presstimator BHR* gives you the tools and flexibility to customize cost centers in any manner which is appropriate for your unique business. As a new feature in this release of *Presstimator BHR*, You may also allocate overhead in any manner that suits your business. Cost Center files now include additional user-definable fields that permit you to track any costs that you wish.

Having accurate Budgeted Hourly Rates (BHRs) is the first step in ensuring that your organization moves forward on a profitable course. These rates reflect a recovery of *your* true costs of doing business. You will be assured of being able to maintain your company on a profitable course once you know the exact sources of your organization’s operational costs and the effect they have on the costing of individual jobs.

*Presstimator BHR* will provide you with this critical information that is needed to make proactive and sound business decisions!

## Presstimator BHR Features

- ▶ *Presstimator BHR* provides you with a systematic analysis of all costs incurred by each Cost Center including occupancy, labor and benefits costs as well as each Cost Center's portion of the General Factory and Administrative overheads.
- ▶ *Presstimator BHR* provides you with a default hourly rate at 100% productivity and four user-selected levels of productivity for each cost center.
- ▶ *Presstimator BHR* provides you with the ability to override the program's calculation of each cost center's available production hours.
- ▶ *Presstimator BHR* utilizes NAPL (National Association of Printers & Lithographers-US), PIA (Printing Industries of America) and BPIF (British Printing Industries Federation) recommended costing methodologies.
- ▶ *Presstimator BHR* calculates additional BHRs based on manufacturing cost (i.e., no Administrative overhead) and on a direct costing basis (i.e., omitting Factory and Administrative overheads).
- ▶ The program provides the facilities to build forecasts and multiple scenarios to predict the impact of changes to staffing, inventory, capital equipment or any other expenditure that your company may incur.
- ▶ The QuickCheck feature can provide production cost analyses on a job by job basis that can help you determine each job's exact threshold of profitability. Do you want to adjust prices? Find out how low you can go.....and still make a profit! These pro-forma analyses can be performed on any "what-if" scenarios that you have created!

## Installing and Using Presstimator BHR on a network

In order to ascertain that the program is installed properly and can be activated to “FULL” (non-demo) mode, please ensure that the person installing the software has Windows administrative rights for the installation process. These rights are generally assigned by network IT folks and are only required for the installation process, not for using the software.

- 1) Create a folder on the network/shared drive where you want the data to reside  
e.g. z:....\Presstimator BHR\DB\
- 2) Install the BHR application on one machine.
- 3) ‘Map Network Drive...’ (within Microsoft Windows) to establish a new network connection to the network/shared drive, if necessary.
- 4) Load the BHR application. Select HELP|ABOUT|UPGRADE and enter a valid Product Key to unlock the Demo mode (NOTE: each PC requires a unique Product Key).
- 5) Exit Presstimator BHR.
- 6) Move all files from the local 'DB' folder, except the PRODKEY.DBF, PRODKEY.CDX and USERPASS.DBF files into the new folder on the network/shared drive (user passwords and Product Keys will reside on the local machines, not on the network/shared drive folder).
- 7) Load Presstimator BHR and select FILE, CHANGE DATABASE PATH and modify the Local Database Path to point to the local machine's installation folder. (e.g. c:\program files\Presstimator BHR\DB\), if necessary.
- 8) Change the Network Database Path to be the location of the new DB folder on the network/shared drive (e.g. z:\DB\).
- 9) After entering valid Product Keys, make the appropriate changes to each installation on the local machines that will share the network/shared drive database by repeating steps 7 and 8 for each machine.

### Notes:

- \* Only one user will be able to access the database at any one time.
- \* As all users will be using the same database, changes made by one user will be reflected when another user accesses Presstimator BHR.
- \* User's passwords and Product Keys reside on the local machines, not on the network's shared drive folder.
- \* Users will be logged out of the program after 30 minutes of inactivity.

## 10 Steps To Obtaining Precise BHRs with Presstimator BHR

or

*“If-I-Wanted-To-Read-The-Manual-I-Would-Have-Said-So-When-I-Bought-The-Program”*

- Step 1: Load Presstimator BHR and enter “BHR” (upper-case) when prompted for a password.
- Step 2: Click HELP | ABOUT | UPGRADE and copy the Machine Key into an e-mail and send it to us. We will send you a new Product Key which will activate the full Presstimator BHR.
- Step 3: Click on FILE, NEW SCENARIO, select BLANK SCENARIO, give it a new name, click SAVE, close the screen (see page 7).
- Step 4: Click the COMPANY INFO icon (1st one in the left column), right-click anywhere in the body of the screen, click OPEN and then DELETE DEMO (see page 11).
- Step 5: Complete the COMPANY DEFAULTS, PRODUCTIVITY FACTORS and WAGES & BENEFITS sections. Click SAVE (see page 12).
- Step 6: Select the COST CENTER INFO icon. Create files for each Cost Center and enter the appropriate data for each. You should also create one “Factory” cost center and set its Type as “General Factory”. This cost center will be used for miscellaneous plant expenses that are not attributable to specific cost centers. In addition, create one “Admin” cost center and set its Type as “Administrative”. This cost center will be used for expenses that are not attributable to productive cost centers, such as telephone, travel, entertainment and automobile expenses (see page 18).
- Step 7: Select the EMPLOYEE INFO icon. Create files for each Employee and enter the appropriate data for each (see page 23).
- Step 8: Click on the BENEFITS icon. Create individual benefits for such items as medical, dental, life insurance, drugs, disability coverage, etc. You may also track additional payroll taxes in this section (see page 25 for details).
- Step 9: Click on the BENEFITS PACKAGES icon. Double click the line items in the left column that you wish to add to your benefits package (they will move to the right column). Enter a name in the PACKAGE NAME box when you have completed the package and click SAVE. Repeat this process to create additional benefit packages (see page 26).

*You may choose to ignore the section on BENEFITS (it was written by someone with too much time on his hands) and let the program assign default benefits to each employee. The default benefit value for an employee is calculated as follows: the sum of the Benefits from the General Factory and Administrative boxes of the Company Information screen is divided by the sum of the Wages from the General Factory and Administrative boxes and the resulting percentage is multiplied by the employee’s remuneration. For example, if wages total \$1,000,000 and Benefits total \$200,000, Presstimator BHR will assign 20% of each employee’s wages as his/her benefits. Whether you choose to establish BENEFIT PLANS or use the default calculations, your choice will have minimal effect on your company’s BHRs.*

You have completed all required steps to obtain precise BHRs for your company. Select REPORTS from the menu and print the BHR reports, head to the nearest yuppie coffee establishment for an over-priced large cappuccino or latté and read the reports when you get back.

*(OK, we lied. It was only 9 steps)*

## MENU OPTION: FILE

### Scenarios

*Presstimator BHR* allows you to create an unlimited number of “what-if” scenarios. The scenarios permit you to determine the effect of changing staff, payroll, equipment and other expenses that can affect your BHRs. Once you have entered your core data, you may create your first scenario. Subsequent scenarios can be based on any other ones that you created previously.

For example, you can entertain the option of buying new equipment, adding or eliminating shifts, or providing new employee benefits using *Presstimator BHR*. Once you have created scenarios based on these options, you can use the QuickCheck option to see the effect on your job costs. You will know whether you can continue to sell your work at a profitable level - before you make a commitment to any of the changes! You can make an unlimited number of changes to each scenario. You may use any descriptive names that you wish in order to readily identify the scenarios, such as “*New 4-Color*”, “*Next Year Pay Increases*” or “*Additional Shifts*”.

If your company experiences periodic sales fluctuations, you can adjust the entries for staffing, shift lengths, or for any other operational changes and see how the changes affect your BHRs.

#### **New Scenario:**

Select this option to create a blank scenario or a new scenario based on an existing one. For the latter choice, *Presstimator BHR* will create a duplicate of the existing database, allowing you to make changes and create “what-if” scenarios.

Click NEW SCENARIO from the FILE menu option and then select **Blank Scenario** or **Based on Existing Scenario** on which to base this new one. You will be prompted to enter a descriptive name for this new scenario. *Presstimator BHR* will create the duplicate after you click OK. You may now make changes to the Administrative and General Factory Overheads, Cost Center and Employee data to determine new BHRs based on these changes.

There is no limit on the numbers of scenarios that you may create.

#### **Open Scenario:**

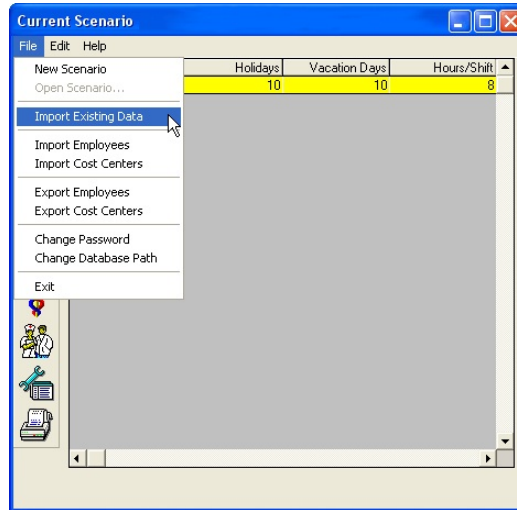
Selecting this option permits you to switch to or delete existing scenarios. Click OPEN SCENARIO and then choose a scenario from the list and click OPEN.

#### **Delete Scenario:**

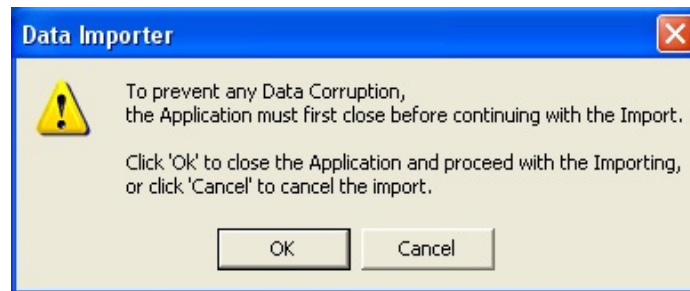
To delete a scenario, click FILE, OPEN SCENARIO, highlight the desired scenario from the list and click DELETE.

## IMPORTING DATA FROM PREVIOUS (OR OEM VERSIONS)

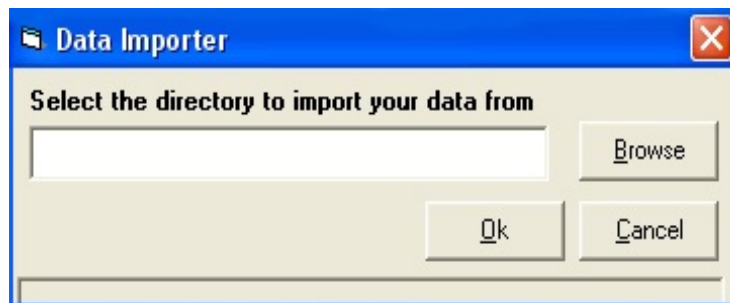
You should perform this function on initial installation if you are importing data from previous Presstimator BHR (or OEM) versions. Select FILE, IMPORT EXISTING DATA.



The program must be closed in order to proceed with the data importing, so click on OK if you are ready to proceed.



Point to the folder that contains the data (usually: \program files\Presstimator BHR\CDB) and click OK



Your new data set will be stored in a new \DB folder, located under the main program folder.

## IMPORTING / EXPORTING COST CENTER INFORMATION

Select **IMPORT COST CENTERS** or **EXPORT COST CENTERS** from the **FILE** menu option.

You may import cost center data from Microsoft Excel spreadsheets so long as you have a copy of Excel on the same PC on which Presstimator BHR is installed. The spreadsheet must be formatted with the following 13 columns in this exact order:

- Cost Center #
- Description (free-form text)
- Cost Center Type (Machine, Labor, Factory, Administrative)
- Shifts per week
- Hours per shift
- Weeks per year (no. of weeks in operation, typically 52)
- Floor space
- Supplies (annual value of indirect supplies)
- Repairs and Maintenance (annual costs)
- Lease Cost (annual cost)
- Asset 1 Description (free-form text)
- Asset 1 Value (current market or replacement value)
- Asset 1 Annual Rate of Depreciation (typically 10, 15, 20)

Each workbook may contain only one sheet and may have a one-line header row (i.e., a single row of column labels at the top). The data must appear as values, i.e., no formulae, no references to other cells. There must be no extraneous data in the spreadsheet, such as totals or comments and the data should not be formatted, i.e., "1000", not "\$1,000". You must enter zeros in fields for which you do not have data. You will be able to change the data from within *Presstimator BHR*.

If you want to import data into multiple scenarios, load Presstimator BHR and then switch to another scenario by selecting **FILE | NEW SCENARIO**. Then Select **IMPORT COST CENTERS** from the **FILE** menu option and follow the prompts. Be sure to indicate correctly whether you included a header row in the spreadsheet.

## IMPORT / EXPORT EMPLOYEE FILES:

**IMPORTANT** - you must create Cost Center files before importing Employee data (see previous section).

Select **IMPORT EMPLOYEES** or **EXPORT EMPLOYEES** from the **FILE** menu option.

You may import employee records from Microsoft Excel spreadsheets if you have a copy of Excel on the same PC on which Presstimator BHR is installed. The spreadsheet must be formatted with the following 27 columns in this exact order:

First name  
Last name  
Employee number  
Pay type (Hourly, Salaried, Temp)  
Wage (\$ per hour)  
Salary (for salaried employees only)  
Shifts per week  
Hours per shift  
Weeks per year (weeks on payroll; typically 52)  
Vacation days (work days per year; typically 5, 10, 15, 20....)  
Statutory Holidays (per year)  
Overtime 1 Hours (overtime hours worked per week)  
Overtime 1 Rate (overtime rate; typically 1.5x, 2.0x)  
Overtime 2 Hours (as above)  
Overtime 2 Rate (as above)  
Overtime 3 Hours  
Overtime 3 Rate  
Overtime 4 Hours  
Overtime 4 Rate  
Shift premium 1 Hours (non-standard hrs per week)  
Shift premium 1 Rate (premium for non-standard hours)  
Shift premium 2 Hours (as above)  
Shift premium 2 Rate (as above)  
Shift premium 3 Hours  
Shift premium 3 Rate  
Shift premium 4 Hours  
Shift premium 4 Rate  
Cost Center 1 (employee's primary cost center)\*  
Cost Center 1 allocation (% of time spent in this cost center)\*  
Cost Center 2 (additional cost centers as required)\*  
Cost Center 2 allocation (% of time spent in this cost center)\*  
Cost Center 3.....\*

Each workbook may contain only one sheet and may have a one-line header row (i.e., a single row of column labels at the top). The data must appear as values, i.e., no formulae, no references to other cells. You must not have any extraneous data in the spreadsheet, such as totals or comments and the data should not be formatted, i.e., "1000", not "\$1,000"; "10", not "10%". **You must enter zeros in fields for which you do not have data.** You will be able to change the data from within *Presstimator BHR* if you import incorrect information.

If you want to import data into multiple scenarios, load *Presstimator BHR* and then switch to another scenario by selecting **FILE | NEW SCENARIO**. Then Select **IMPORT COST CENTERS** from the **FILE** menu option and follow the prompts.

\* *Employee Allocations: Create two columns for each Cost Center. The first column should contain the Cost Center number and the adjacent column should show the percentage of time that the employee spends in this cost center. You may create as many allocations as you wish, however you must create two columns for each cost center. If you do not create allocations within Excel, you will have to perform the task from within Presstimator BHR.*

## **MENU OPTION: EDIT**

You may save the layout of the program's work area (column widths, etc.) by selecting SAVE DESKTOP CONFIGURATION from the EDIT menu. Select this option before changing screens.

## **Exiting Presstimator BHR**

As *Presstimator BHR* data is stored in a database format, it is not necessary to "save" data before exiting from the program - your data is written to the database on an ongoing basis. However, you must select *Save* to save data to Cost Center, Employee or other program files when working from within Presstimator BHR.

## PRESSTIMATOR BHR MENU ICONS



**Company Information**



**General Factory Overhead**



**Administrative Overhead**



**Cost Center files**



**Employee files**



**Benefit Packages**



**Benefit Details**



**QuickCheck**



**Reports**

## COMPANY INFORMATION SCREEN

Company Defaults	
Floor Space:	25,000
Holidays:	10
Vacation Days:	10
Hours Per Shift:	8


Productivity Factors			
PF1	PF2	PF3	PF4
85 %	75 %	70 %	65 %

Wages & Benefits		
	Admin	General Factory
Wages	\$4,000,000.00	\$8,500,000.00
Benefits	\$875,000.00	\$1,250,000.00

The first step to successfully completing the BHR analysis is to enter basic data into the Company Information screen. Presstimator BHR will use this information as defaulted values for certain calculations

To access the Company Information screen:

- Click on the *COMPANY INFORMATION* icon - 
- Place the cursor in the (white) work area
- Double-click (or click the right mouse button and select *Open*)

**IMPORTANT:** delete the demo data before entering your company data by clicking the *Delete Demo* button. Alternately, you may enter your data in a separate blank scenario (see page 10 for instructions on creating scenarios).

### Floor Space

This figure represents the entire area that the company occupies, including *all* administrative, productive, non-productive and common areas.

*Presstimator BHR* will assign charges to Cost Centers for rent, property tax and utilities based on the ratio of each *Cost Center's* space to the *entire non-Administrative occupied space*. For example, if the non-Administrative space totals 25,000 square feet and one Cost Center occupies 2,500 square feet of space, this Cost Center will be charged with 10% of the rent, property taxes and utilities costs.

The TOTALS page of the BHR reports will indicate the total square footage that you have entered in the cost center files. That figure should match the value entered in this field.

### **Holidays**

This number represents the default total days of statutory holidays that you give your employees and should *not* include vacation time. You will have the opportunity to change this figure in the individual employee files.

### **Vacation Days**

This figure represents the default average number of vacation days that you allow each employee. For example, if the majority of your employees get two weeks vacation, enter "10" work days; if the majority get three weeks vacation, enter "15" work days. You will have the opportunity to change this figure in the individual employee files.

### **Hours Per Shift**

Enter the most common shift length (in hours) in this field. Although this field will be used by *Presstimator BHR* as the default, you will be able to highlight exceptions in the individual Cost Center files.

### **Productivity Factors**

Although your goal may be to have your company operate at 100% productivity, in practice this does not often happen for extended periods. *Presstimator BHR* provides you with the option of identifying four default productivity levels which will generate four hourly rates in addition to rates at 100% productivity. You may assign a unique set of productivity levels for each cost center.

One percentage may represent the productivity level at which the cost centers normally operate. This figure can represent output, capacity, efficiency &/or other measures of productivity.

You may also enter three additional levels which can represent, for example, your targeted productivity plateau, previous year's productivity or any other level against which you want to measure performance.

*We recommend that you account for closures and regular inactive times in the individual Cost Center files by adjusting the available **Weeks**. For example, if your plant is closed for two (2) weeks per year, then reduce the available weeks figure to fifty (50), but do **not** adjust the productivity levels.*

*Employee vacation time will be reflected in the employees' files and should not be reflected in the Productivity Factors.*

### **Wages / Benefits**

The Administrative and General Factory wages and benefits figures will be used to calculate the value of each employee's benefits, *if you choose not to create individual benefits and plans* (see the Benefits section for further details).

The calculation is as follows:

Benefits ÷ wages = Ratio

Ratio X employee wage = employee benefits


For example, if the overall company benefits total \$240,000 and the overall company payroll totals \$1,500,000, then the ratio of benefits to wages is 16%. For example, an employee who earns \$50,000/year will be allocated \$8,000 in benefits costs.

## GENERAL FACTORY OVERHEAD

Description	Amount
Company Rent	\$27,500.00
Miscellaneous overhead, improvements	\$100,000.00

Total Overhead: \$873,644.00  
Page Subtotal: \$127,500.00

To access the General Factory Overhead screen:

- Click on the *GENERAL FACTORY* icon - 
- Place the cursor in the (white) work area
- Double-click (or click the right mouse button and select *Open*)

The tabs contained in this screen should be used to account for the miscellaneous factory expenses (overhead) that you want to allocate to all productive cost centers.

**Important: Expenses entered in Cost Center files should not be entered here!**

Materials and supplies that are **not** charged to specific jobs are considered to be *Indirect materials and supplies* and should be included in the appropriate Cost Center files.

In order to determine the precise costs of operating cost centers, the preferred method is to charge expenses to the cost centers that incur them. However, it is often not possible to identify the exact sources of all of the expenses. Items such as grease and wash are generally used in multiple cost centers and therefore difficult to assign to specific ones. These items can be charged to the General Factory service center and can include maintenance items, oil, rags, washroom supplies, floor cleaners, etc. Alternately, these items may be included in the "Other" tab of the General Factory Overhead screen.

The Cost Center files provide the facility for allocating depreciation, indirect supplies, repairs and maintenance. The Employee files will handle the allocations of regular, overtime and premium wages and benefits. Therefore these items should not be included in the General Factory Overhead section.

**General Factory Expenses tabs:**


- ▶ **Occupancy costs** - rent, mortgage interest, business taxes, etc.
- ▶ **Liability/Property insurance** - cost of insurance premiums.
- ▶ **Personal Property taxes** - taxes levied on the value of your company's assets, if applicable
- ▶ **Property Taxes** - taxes assessed on value of real estate that is paid to local municipalities or state; this item may be included with Occupancy costs.
- ▶ **Electricity** - annual cost of electricity.
- ▶ **Other Utilities** - gas, water, etc. (these items may be included in Occupancy costs if you prefer).
- ▶ **Other** - expense items not included in any of the above categories (telephone, courier, meals, etc.)

## ADMINISTRATIVE OVERHEAD

Description	Amount
Travel & entertainment	\$28,333.00
Advertising & promotion	\$30,000.00
Automobile allowances	\$13,776.00
Telephone & fax	\$13,092.00
Bank charges & interest	\$36,398.00
Software purchases	\$11,291.00
Custom computer programming charges	\$26,440.00
Professional fees	\$31,137.00
Fall office party	\$2,614.00
Commissions	\$35,000.00
Provision for bad debt	\$33,400.00

Total Overhead: \$313,525.00      Page Subtotal: \$261,481.00

To access the Administrative Overhead screen

- Click on the *ADMINISTRATIVE* icon - 
- Place the cursor in the (white) work area
- Double-click (or click the right mouse button and select *Open*)


The Administrative Screen provides tabs to capture administrative expenses that *Presstimotor BHR* will allocate to all productive centers including such items as telephone, stationery, automobile expenses, postage, courier, provision for bad debt, legal and accounting fees, bank charges, exorbitantly expensive executive lunches, etc.

The Cost Center files provide the facility for allocating depreciation, indirect supplies, repairs and maintenance. The Employee files handle the allocations of regular, overtime and premium wages and benefits. Therefore these items should not be included in the Administrative Overhead section.

The Administrative Overhead tabs are identical to those found in the General Factory section. They should be used to track expenses that can be identified as being uniquely Administrative, although this is not mandatory. You may lump all overhead expenses together in either the General Factory or Administrative Overhead sections. If you choose this option, the overhead allocations in the BHR Reports will be summarized in one of these two sections.

## COST CENTER INFORMATION SCREEN

To access the Cost Center Information Screen:

- Click on the COST CENTER icon - 
- Place the cursor in the (white) work area
- Double-click (or click the right mouse button and select *Open*)

A Cost Center is *an organizational segment for which there is reason to accumulate costs*. Does this definition seem as clear as mud to you? Another way to describe a Cost Center is that it is *a center of activity or production for which you wish to analyze operational costs*.

These activities or production centers should incur reasonable costs on a continual basis. Although you can conceivably track the costs of operating hand-held staplers, there would not likely be a sound business reason for doing so. The costs related to acquiring and maintaining them is probably insignificant.

Examples of Cost Centers:

- Electronic Imaging
- Camera & film stripping
- Plate-making
- Presses
- Finishing
- Shipping

If you have a number of identical pieces of equipment in a Cost Center, such as Mac stations in an Electronic Imaging center, you may wish to group all of them into one Cost Center. However, the reported BHRs will be a blended rate for each piece of equipment. We recommend that you track the costs of operating identical equipment separately if any of these following conditions are true:

- ▶ the machines are not utilized equally
- ▶ their current or replacement values are not similar
- ▶ the employees working on these machines earn differing wages

Cost Centers that participate directly in the production or handling of finished goods are sometimes called Product Centers and those centers that do not participate directly can be referred to as Service Centers.

Examples of Service Centers:

- Maintenance Shop
- General Factory
- Administration
- Sales

As each machine or activity in a department is a Product Center, you should establish at least one Service Center where the costs, that are *not* traceable to activities or machines, are accumulated. For example, if there are three presses in a Sheetfed Press department, we should establish a service center that absorbs the *miscellaneous* costs of operation, such as: supervisors' office and wages, washrooms, change rooms, forklift trucks and general storage areas. This is considered to be a "General Factory" service center.

The BHR for a Cost Center is calculated by determining the *all-inclusive* costs or *fully-absorbed* costs of operating the Cost Center for a period and dividing this cost by the number of available hours in that period. The all-inclusive costs include wages, benefits, equipment depreciation, occupancy costs, etc., as well as a portion of the rent, property taxes, heat and other costs that the Factory and Administrative service centers incur.

Example:

If the all-inclusive cost of operating a press in a year is \$1,000,000 and the press operates for two 8-hour shifts per day, 5 days per week for 52 weeks each year, the press's BHR at 100% productivity would be calculated as follows:

- A)  $2 \text{ shifts/day} \times 8 \text{ hrs/shift} \times 5 \text{ days/week} \times 52 \text{ weeks} = 4,160 \text{ hours per year}$
- B)  $\$1,000,000 \div 4,160 \text{ hours} = \$240.38/\text{hour}$

Although there are differences between the different types of Centers, we will often use the generic term "Cost Center" when describing Product and Service centers. The Reports menu option refers to a *Cost Center Report*, which provides the cost analysis report for productive cost centers, and to the *Service Center Report* which includes data for the General Factory, Administrative and other "non-productive" centers (we are confident that your administrative personnel will be pleased at being classified as non-productive!).

## Cost Center Information

The following data must be entered into your Cost Center files:

### TYPE

There are four options that can be selected:

#### **Machine:**

The total annual productive hours in a *machine-based* cost center is simply the number of hours that the machine is available. In the example on the previous page, this total is 4,160 hours.

If the machine was available only one shift per day, then the total annual productive hours would be 2,080. These types of cost centers can include: electronic imaging computers, presses, folders, etc.

A simple method of determining whether a cost center is machine-based is to ask the question: "If we add additional personnel to this cost center, will we gain additional productive hours?" If the answer is "no", then the cost center is machine-based.

For example: If a press operates 40 hours/week, 52 weeks/year and you decide to add an extra person to its crew, you will not gain added productive time. The only way to gain productive time in a machine-based cost center is to increase the length of the shifts and/or the number of shifts.

The maximum number of hours available per year in a machine-based cost center is 8,760.

#### **Labor:**

The total annual productive hours in a *labor-based* cost center is dependent on the number of employees in the cost center and their available hours. If a film stripper works 8 hours per day, 5 days per week, 49 weeks per year (52 weeks minus 3 weeks for vacation) and is allowed 9 days off for statutory holidays, then this employee works 1,888 hours per year:

8 hours per day x 5 days per week x 49 weeks  
minus (8 hours per day x 9 holidays) = **1,888 hrs./year**

To determine if a cost center is labor-based, we ask ourselves the following question: "If we add additional personnel to this cost center, will we gain additional productive hours?" If the answer is "yes", then this is a labor-based cost center. An additional stripper working the same number of hours and weeks as the above stripper will provide the company with an additional 1,888 hours per year and (hopefully) at least twice as much output.

These types of cost centers can include: film stripping centers, hand finishing, packing or any other labor-based activities.

There is (theoretically) no maximum number of available hours in a labor-based cost center.

#### **Administrative:**

For the purpose of calculating BHRs, the function of the *Administrative* Service Centers is to absorb the company's overhead costs including such costs as: executive, office and sales personnel wages and benefits, rent, taxes, utilities, telephone, office expenses, postage, advertising, legal and accounting fees. *Presstimator BHR* will automatically distribute all Administrative costs to the productive cost centers.

Although you may wish to create more than one Administrative service center in order to track their individual costs, such as for Sales or Support centers, Administrative service centers will not have hourly rates so there is no requirement to create more than one.

**General Factory:**

Factory centers are production-related Service Centers that absorb costs that are not directly traceable to products and are not considered to be Administrative overhead. They can include the costs of operating lift equipment, operating the plant washrooms and cafeteria as well as the plant foremen's wages and benefits. Storage space and common area space should also be assigned to the General Factory service center. *Presstimator BHR* will distribute automatically all Factory costs to the productive cost centers.

Although you may wish to create multiple General Factory service centers in order to track their individual costs, General Factory cost centers' costs of operation are allocated to the productive cost centers, so there is no need to create more than one.

You may override the default Productivity Factors contained in the next four boxes. The BHRs for each cost center will be calculated based on these Productivity Factors.

We will now enter on the next line the items described below:

- 1. Shifts/week:** The number of shifts that this cost center operates per week. For example: if a press operates one shift per day, five days per week, enter "5" in this field. If the cost center operates two shifts each day from Monday to Friday and one shift on Saturdays, enter "11" in this field.
- 2. Hours/shift:** Enter the number of hours that constitutes a shift for this cost center, if you wish to override the default value that you entered in the Company Information screen.
- 3. Weeks/year:** Enter the number of weeks that this cost center is available annually. If this cost center is available all year, enter "52". If there are periodic cost center or plant shutdowns, then reduce the available weeks accordingly.
- 4. Floor Space:** Enter the approximate square footage that the cost center occupies, including a reasonable amount of surrounding work space.

The easiest way to calculate the space occupied by the General Factory service center is to total the space of all other cost centers and subtract that total from the overall space entered in the Company Information screen.

- 5. Hours:** This represents the number of hours that the cost center is available annually. *This value is calculated automatically.*

For *Machine-based* cost centers, this figure is calculated by multiplying the number of shifts per week x the number of hours per shift x the number of weeks that each cost center is available annually.

For *Labor-based* cost centers, this figure is calculated by totaling the number of hours that each employee spends in each cost center.

If you have access to data collection information, you may prefer to simply override this calculation and enter your number of available annual hours in this field. Your value will be used to calculate the BHRs. The report will show only one BHR as your number should reflect actual productivity.

*As the number of available hours in Service Centers does not affect productivity or costs, and as Service Centers do not have BHRs, Presstimator BHR does not report this information.*

- 6. Wages:** This figure represents the value of wages paid to employees who have been assigned to this cost center on a full- or part-time basis (e.g., if 25% of an employee's time is assigned to this cost center, then 25% of the employee's wages will be charged to it). *This field is calculated automatically.*
- 7. Benefits:** This figure represents the value of benefits paid to employees assigned to this cost center on a full-time or part-time basis (e.g., if 25% of an employee's time is assigned to this cost center, then 25% of the employee's benefits will be charged to it). *This field is calculated automatically.*
- 8. Supplies:** Enter the approximate value of the *indirect* supplies consumed annually in this cost center. These supplies can include such items such as rags, grease, fluids, etc.. Items that are billed to your clients, such as paper, ink, plates and film (i.e., *direct supplies*) should **not** be included.  
  
In order to determine the precise costs of operating cost centers, the preferred method is to charge expenses to the cost centers that incur them. However, it is often not possible to identify the exact sources of all expenses. Items such as grease, oil, washroom supplies and floor cleaners are used in multiple cost centers and difficult to assign to specific ones and should be charged to the General Factory service center.
- 9. Repairs/Maint :** Enter the estimated annual expenditure on repairing and maintaining the equipment in this cost center.
- 10. Lease Cost:** Enter the annual cost for leased equipment in this box.
- 11. User definable:** These fields are used to track unique expenses. Field descriptions set in one Cost Center are carried forward to all Cost Centers. Click Additional Custom Fields to access up to 12 more fields.
- 12. Elec. Cons.** The Electrical Consumption field may be used to enter the rated consumption capacity of the equipment (amperage x voltage, kilowatt rating or horsepower). The costs will be allocated based on the ratio of the values entered in this field as compared to the total value of all Electrical Consumption fields in all cost centers (see the following section for detailed examples)
- 13. No. of Employ':** *Presstimator BHR* calculates the number of employees in each cost center based on your allocations of their times (see Employee Info Screen).
- 14. Details:** You can access a list of the employees assigned to a cost center by clicking on the Details button. You may then access an individual employee's file by double-clicking the name. Clicking on Cancel in the Employee Information file will return you to the Cost Center screen.
- 15. Add'l Fields** The Additional Fields section allows the use of up to 12 fields that can be used for unique needs. For users preferring to utilize process-based costing analysis, these fields can be used to enter personalized overhead allocations. By entering the values here and NOT utilizing the Admin & Factory Overhead sections, you have the flexibility of assigning overhead in any manner you like.

## Using Electricity Consumption fields

### Method 1:

This works best when all of the machines have similar Available Hours.

Step 1 - Enter the annual costs of electricity in the Electrical Expenses tabs in the General Factory &/or Administrative Overhead sections

Step 2 - Enter values in the "Elec. Cons." fields in the Cost Center (C/C) screens. These values can be: amperage, watts or any other value.

The ratio of the value in each Cost Center to the total values in all Cost Centers will be used to allocate the Electrical Consumption. For example:

C/C #1 machine is rated at 50 amps  
C/C #2 machine is rated at 25 amps  
C/C #3 machine is rated at 15 amps  
C/C #4 machine is rated at 35 amps

Total amperage = 125 amps

C/C #1 will be allocated 40% (50/125) of the Electrical Consumption costs  
C/C #2 will be allocated 20% (25/125) of the Electrical Consumption costs  
C/C #3 will be allocated 12% (15/125) of the Electrical Consumption costs  
C/C #4 will be allocated 28% (35/125) of the Electrical Consumption costs

### Method 2:

This works best when you have a reasonable approximation of the cost of Electrical Consumption for each machine. For example:

C/C #1 machine consumes approximately 10% of the total cost  
C/C #2 machine consumes approximately 20% of the total cost  
C/C #3 machine consumes approximately 30% of the total cost  
C/C #4 machine consumes approximately 40% of the total cost

Enter "10", "20", "30" and "40" in the Electrical Consumption boxes of C/C #'s 1, 2, 3 & 4 respectively. Presstimator BHR will use these values to allocate the Electrical cost to each Cost Center.

### Method 3 (weighted average)

In Method 1 we used the values of each machine's amps to allocate the Electrical costs. If the machines are not used for comparable numbers of hours each year, the costs will be skewed. You will need to adjust the values to properly reflect these usage differences using the "weighted average" method. The following steps will ensure accurate allocations of Electrical costs.

Multiply the amperage of each machine x the number of hours that the machine is used each year. Express these values as percentages in the Electrical Consumption fields for each C/C. For example:

C/C #1 machine is rated at 50 amps and the machine is used 1800 hours each year

C/C #2 machine is rated at 25 amps and the machine is used 3800 hours each year

C/C #3 machine is rated at 15 amps and the machine is used 4700 hours each year

C/C #4 machine is rated at 35 amps and the machine is used 2500 hours each year

C/C #1 calculation =  $50 \times 3810 = 190500$

C/C #2 calculation =  $25 \times 1867 = 46675$

C/C #3 calculation =  $15 \times 4765 = 71475$

C/C #4 calculation =  $35 \times 2610 = 91350$

Total = 400000

C/C #1 will be allocated 47.6% of the electrical costs

C/C #2 will be allocated 11.7% of the electrical costs

C/C #3 will be allocated 17.9% of the electrical costs

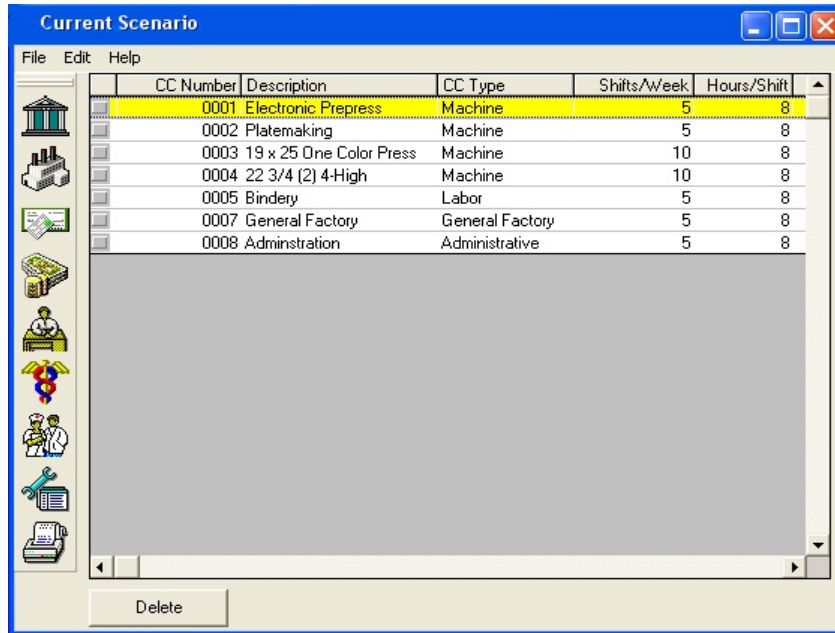
C/C #4 will be allocated 22.8% of the electrical costs

### Capital Equipment Details

Enter a description of the equipment, its current market value or replacement value and a depreciation rate. If your equipment operates one shift per day, use 10% depreciation; for two daily shifts, increase the depreciation to 15% and for three shifts, the depreciation should be in the range of 20% annually.

*The PIA, NAPL and BPIF recommend that you use a straight-line depreciation rate and maintain a fixed/constant value for your equipment, regardless of how it is being depreciated in your financial records. This will eliminate fluctuations in your annual BHRs and costing analyses. If the equipment is depreciated over a period of more than 7 years, the net results will not vary significantly whether you use straight-line, declining balance or sum of the year's digits depreciation methods.*

## Deleting Cost Centers



You may delete individual Cost Center files by loading them and then clicking on the DELETE buttons. You may delete multiple Cost Center files by clicking in the boxes to the left of the CC Numbers. Once you are satisfied with your selection, click on the DELETE button at the bottom left side of the screen. This operation cannot be undone, so be careful!

Employees who were assigned to the deleted Cost Centers must be reassigned to other ones. Unassigned employees will show as "Unallocated" on the main Cost Center screen which is accessed by clicking the Employee icon on the left side of the screen.

## EMPLOYEE INFORMATION SCREEN

**Employee Information - Alphonse, Albert**

Employee Information

First Name: Albert Last Name: Alphonse

Number: 00000044 Benefit Package: Company Default Pay Type: Hourly

Save Delete

Payroll Information

Hourly Wage	Annual Salary	Hrs/Shift	Shifts/Wk	Paid Weeks	Vacation	Holidays
\$22.00	\$0.00	12.00	5.00	52	15.0	10.00
Annual Pay		Annual Benefits		Productive Hours		
\$68,640.00		\$11,668.80		2,820.0		

Overtime

0.00 hrs/wk at	1.50 x hourly wage
0.00 hrs/wk at	2.00 x hourly wage
0.00 hrs/wk at	2.50 x hourly wage
0.00 hrs/wk at	3.00 x hourly wage

Shift Premiums


0.00 hrs/wk at	\$0.00 premium/hr
0.00 hrs/wk at	\$0.00 premium/hr
0.00 hrs/wk at	\$0.00 premium/hr
0.00 hrs/wk at	\$0.00 premium/hr

Cost Center Allocations

Cost Center	%
0004 - 22 3/4 (2) 4-High	100
Unallocated ...	0 %

Cancel

To access the Employee Information Screen:

- Click on the *EMPLOYEE INFORMATION* icon- 
- Place the cursor in the (white) work area
- Double-click (or click the right mouse button and select *Open*)

To create a new employee file, follow these steps:

- 1- Enter the employee's name and number (as 01, 02, 03 or 001, 002, 003 to force employee records to sort properly, i.e., use the same number of integers for all employee numbers).
- 2- Select a Pay Type (*Hourly*, *Salaried* or *Temporary*) by clicking on the drop-down menu. Employees who are designated as *Temporary* are not assigned Benefits coverage costs.
- 3- Select an appropriate benefit group if you wish by clicking on the drop-down menu. If you bypass this field, *Presstimator BHR* will set a value based on the overall company Benefits/Wages ratio using the values entered in the Company Information Screen.

## Payroll Information

We will now enter the payroll and attendance information in the next seven boxes.

1. **Hourly Wages:** Hourly employees' wage.
2. **Annual Salary:** Salaried employees' annual earnings.
3. **Hrs/Shift:** The number of hours worked per shift.
4. **Shifts/Wk:** Number of shifts worked each week.
5. **Paid Weeks:** Number of weeks per year that the employee is on the company's payroll (usually 52).
6. **Vacation:** Number of vacation days each year (1 week = 5 work days).
7. **Holidays:** Number of annual paid legal/statutory holidays.
8. **Annual Pay:** This figure is calculated by *Presstimator BHR* and includes regular wages, vacation pay, overtime and shift premiums.
9. **Annual Benefits:** This figure is calculated by *Presstimator BHR* and is based on the Benefit group that you select or on the default Benefits/Wages ratio from the Company Information Screen.
10. **Productive Hrs:** This figure is calculated by *Presstimator BHR* and is calculated as follows:  
  
Days per wk x Hrs per shift x Wks  
*minus* (Vacation days x Hrs/shift)  
*minus* (Holidays x Hrs/shift)

The next section is to be used to enter the expected numbers of overtime and premium hours that the employees will work each week.

## Overtime

Enter a figure that represents the expected number of overtime hours that this employee will work each week. You may select two overtime rates in addition to the default 1½ x hourly wage and 2 x hourly wage.

## Shift Premiums

Enter the expected number of shift premium hours that this employee will work each week in this field. You must also enter the premium that he or she will earn for these hours; you may select up to four premium hours and rates.

## Cost Center Allocations

Employee times and remuneration can be allocated to individual or multiple cost centers. Right-click in the Cost Center Allocation box and select **Insert**. Select the appropriate cost centers from the list and approximate percent of time that the employee spends in each cost center. To remove a cost center allocation, place the cursor on the appropriate line, right click the mouse button and select **Delete**.

*You must allocate exactly 100% of employees' time to one or more cost centers or you will be unable to update your changes.*

## Deleting Employees



The screenshot shows a window titled "Current Scenario" with a menu bar (File, Edit, Help) and a toolbar on the left. The main area contains a table with the following columns: Employee Number, Employee Name, Benefit, Pay Type, Wage, Salary, Shifts/Week, Hours/Shift, Weeks/Year, Vacation, Holidays, and OT 1 Hours. The first row is highlighted in yellow.

Employee Number	Employee Name	Benefit	Pay Type	Wage	Salary	Shifts/Week	Hours/Shift	Weeks/Year	Vacation	Holidays	OT 1 Hours
00000002	Smith, Sam	Company D	Hourly	\$25.00	\$0.00	3	12	52	10	10	0.00
00000006	Johnson, Jesse	Family	Hourly	\$17.50	\$0.00	5	8	52	10	10	0.00
00000007	Davis, Kevin	Company D	Hourly	\$23.00	\$0.00	5	8	52	10	10	0.00
00000008	Mathews, David	Company D	Hourly	\$24.00	\$0.00	5	8	52	10	10	0.00
00000009	Ashford, Jim	Single	Hourly	\$17.00	\$0.00	5	8	52	10	10	0.00
00000010	Martin, Harold	Company D	Hourly	\$15.00	\$0.00	5	8	52	10	10	0.00
00000019	Smith, Sally	Company D	Hourly	\$18.00	\$0.00	5	8	52	10	10	0.00
00000044	Alphonse, Albert	Single	Hourly	\$22.00	\$0.00	5	12	52	15	10	0.00
00000088	Pearlygates, Bill	Company D	Salaried	\$18.00	\$0.00	5	8	52	15	10	0.00
00000116	Doe, Jane	Company D	Hourly	\$0.00	\$38,500.00	5	8	52	10	10	0.00
00000177	Smythe, Mike	Company D	Hourly	\$18.00	\$0.00	5	8	52	10	10	0.00
00000234	Queen, Debbie	Company D	Salaried	\$0.00	\$47,588.00	5	8	52	15	0	0.00
00000722	Jones, Germaine	Family	Hourly	\$24.00	\$0.00	5	8	52	15	10	0.00


At the bottom left of the window, there is a "Delete" button.

You may delete individual employee files by loading them and then clicking on the DELETE buttons. You may delete multiple employee files by going to the Employee summary screen (shown above) and then clicking boxes to the left of the Employee Numbers. Once you are satisfied with your selections, click on the DELETE button at the bottom left side of the screen. This operation cannot be undone, so be careful!

## BENEFITS SCREEN

Description	Percentage %	Fixed Rate	Maximum	Minimum
Long Term Disability (LTD)	2.25	\$0.00	\$99,999.00	\$0.00
Short Term Disability (STD)	2.50	\$0.00	\$99,999.00	\$0.00
Prescription drugs (family)	0.00	\$360.00	\$0.00	\$0.00
Prescription drugs (single)	0.00	\$144.00	\$0.00	\$0.00
Porsche 956	0.00	\$42,000.00	\$0.00	\$0.00
Life Insurance	2.00	\$0.00	\$0.00	\$0.00
Medical & dental (family)	0.00	\$255.00	\$0.00	\$0.00
Medical & dental (single)	0.00	\$85.00	\$0.00	\$0.00
Miscellaneous Benefit # 2	2.30	\$0.00	\$2,500.00	\$50.00
Miscellaneous Benefit # 1	1.70	\$0.00	\$12,000.00	\$1,000.00

To access the Benefits Screen:

- Click on the  BENEFITS icon -
- Place the cursor in the (white) work area
- Double-click (or click the right mouse button and select *Open*)

If your organization pays for all or part of your employees' benefits *and* you wish to track the costs of each employee's benefits, the Benefits Packages and Benefits screens provide the tools to do so.

*Benefits likely do not have a significant effect on your BHRs, therefore you may choose to skip this process. If you do not create Benefits packages, the program will use the ratio of Annual Benefits to Wages from the Company Information Screen to assign benefit values.*

To illustrate the establishment of a group, we will assume that your company provides Prescription Drug and Dental coverage to its employees and the costs of the coverage are:

Drug prescriptions (single)	-	\$ 30.00/month
Drug prescriptions (family)	-	\$ 65.00/month
Dental coverage (single)	-	\$ 35.00/month
Dental coverage (family)	-	\$ 85.00/month

In this case, we establish benefits for each of the above examples and name them Medical coverage (single), Medical coverage (family), Dental coverage (single), Dental coverage (family) or other appropriate names. To create the benefits:

- 1- Click the Benefit Packages Info icon
- 2- Right-click and select **NEW**
- 3- Right-click, select **INSERT ROW**
- 4- Enter "Prescription drugs (single)" in the Description column
- 5- Enter \$360.00 (\$30.00/month x 12) in the Fixed Rate column (if there are maximum &/or minimum annual premiums, we would enter the values in the appropriate columns)
- 5- Click **NEW**, create a new line and enter "Prescription Drugs (family)" in the Description column
- 6- Enter \$780.00 in the Fixed Rate column
- 7- Follow steps 2 to 5 to add Dental (single) and Dental(family) benefits
- 8 - Click on the **SAVE** button when you have finished

## BENEFITS PACKAGES

*You must complete the Benefits section before creating Benefit Packages (see page 32).*

To access the Benefits Package screen:

- Click on the **BENEFITS PACKAGES INFO** icon
- 
- Place the cursor in the (white) work area
- Double-click (or click the right mouse button and select **NEW**)



- 1- Double-click each of the benefits in the left column that you want to include in the first package. The selected items will appear in the right column (double-clicking right column benefits will place them back in the left column).
- 2- When you have selected all of the appropriate benefits, enter a benefits plan name in the **PACKAGE NAME** box at the top of the screen.
- 3- Click the **SAVE** button.
- 4- Repeat above steps to create additional packages.

You may now assign benefit packages to the individual employees using the **EMPLOYEES WITHOUT PACKAGE** and **EMPLOYEES WITH PACKAGE** boxes (NOTE: you may also assign Benefit Packages to employees from the individual employee screens).

Select a Benefit Package from the drop-down list and then double-click on each employee name from the **EMPLOYEES WITHOUT PACKAGE** that you want to assign to this benefit package. Once you have completed your selection(s), click **SAVE** to assign the benefit packages to the selected employees. Repeat this process for other benefit packages and employees. Employees with asterisks in front of their names have been previously assigned to packages, however you may make changes to these employees simply by following the above steps.

# QUICKCHECK

Cost Center	Factor	BHR	Hours	Markup %	Line Total
0001 - Electronic Prepress	90%	\$83.86	8.00	0.00	\$670.88
0004 - 22 3/4 (2) 4-High	85%	\$291.33	3.00	0.00	\$873.99

Item	Unit Cost	Units	Markup %	Line Total
Materials	\$624.79	1.00	0.00	\$624.79

Total: \$2,169.66

To access the QuickCheck screen:

- Click on the **QuickCheck** icon -

We have included a very valuable feature called QuickCheck, which has been referred to as management's *cheat sheet*, or a *pro forma estimating worksheet*. However, unlike estimating systems, this feature allows you to determine if you can produce profitable jobs based on any of the *what-if* scenarios that you have created (see page 10).

Example:

A publisher offers you the opportunity of printing a monthly 6-color magazine. The company guarantees to pay you a monthly sum based on a minimum run quantity and will commit to this quantity for a three-year period. You do not have a six-color press, so how can you run it? Can you produce the work profitably on your 4- or 5-color?

Can you afford to buy a 6-color press and still make money on this job? Will you need to hire additional staff to operate the press? How will these hires affect your costs? Will you need to modify your existing premises? If so, at what cost? How will this cost affect your BHRs and your ability to produce profitable work?

Deciding on the proper response to this opportunity usually involves the President, Controller, Production Manager and Estimator consuming vast quantities of coffee, chewing the ends off many pencils and burning the midnight oil for at least a week in order to determine an appropriate answer. The data required to provide the proper response to this scenario can be generated by *Presstimator BHR* in less than 15 minutes!

Simply follow these steps:

- 1- Create a new scenario called “New Six Color” (see page 7).
- 2- Create a cost center that includes the new equipment.
- 3- Determine the number of shifts and hours that the equipment will operate (or create multiple scenarios with different shift combinations).
- 4- Determine the approximate amount of space that the cost center will occupy (be sure to adjust the areas of other cost centers accordingly)
- 5- Enter the estimated annual supplies, repairs and maintenance costs.
- 6- Enter an approximate value of the new equipment and set an annual depreciate rate.
- 7- Assign employees along with their wages and hours to the new cost center.
- 8- Load QuickCheck.
- 9- Create a profile for the job by selecting the appropriate cost centers.
- 10- Enter the approximate number of hours for each production process.
- 11- Enter the values of direct materials and outside purchases to be charged to this job.

The analysis is complete! You now have an estimate of the costs of producing this new work based on a new set of hourly rates calculated using the data in this *what-if* scenario. Compare the results to the costs obtained by running this job through the 4- or 5-color. You have all of the information that will help you decide whether to say *yes* or *no*!

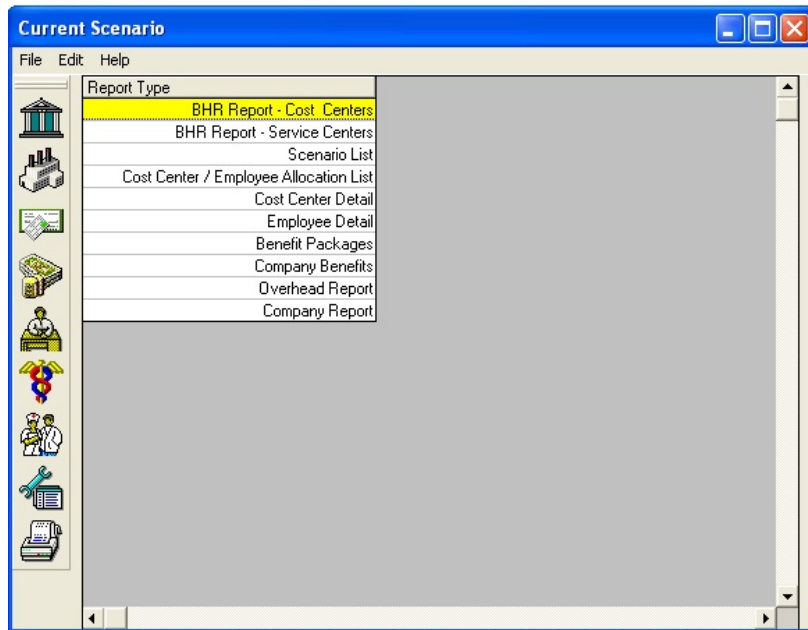
You will notice that by adding a new cost center and assigning costs to it that the BHRs in the other cost centers have most likely *decreased*. This is a result of the General Factory and Administrative overhead being spread over an additional cost center. You should keep this in mind when contemplating changes to staffing levels, numbers of shifts or when acquiring equipment.

*Presstimator BHR* also provides you with an opportunity to use Direct and Factory costs in this analysis. If you choose to cost items with only General Factory overhead costs or without any overhead costs included in the BHRs, you may do so by clicking the appropriate BHR Type at the top of the screen. Your selection must be made prior to entering data and you may use only one type of costing method per QuickCheck model.


Printers often use this option when they wish to cost a job at a “bare bones” value to attract new work or new clients. Other printers have been known to recover their overhead costs prior to their fiscal year-end. They then sell their work on a Direct Costs basis after that point!

***Remember that if you consistently use rates other than your All-inclusive BHRs, you will not fully recover your overhead costs. This may result in severely eroded profits! Therefore we do not recommend using this approach!***

## REPORTS:



To access the Reports screen:

- Click on the **REPORTS** icon - 
- Place the cursor on the desired report and double-click, or
- Click the right mouse button and select *View* or *Print*.

### BHR Reports

You have the option of viewing or printing the Budgeted Hourly Rates and the detailed costs attributed to each machine or labor Cost Center.

The first page of the BHR Report - Service Centers summarizes the Total company costs. Each cost center displays five BHRs which represent the costs at the four user-defined productivity levels as well as a rate at 100% productivity. If you overridden the Available Hours in a cost center, the report will show one BHR only.

The Service Center Report lists the detailed costs attributed to each General Factory or Administrative service center.

### Scenario List

This report itemizes the scenarios that you have created.

### Cost Center / Employee Allocation List

This report lists all cost centers and employees, as well as the percentage of time that employees spend in each cost center.

### Cost Center Detail

This report provides a summary of all information contained in the Cost Center Information screens.

### Employee Detail

The Employee List details personnel information including wages, benefits, shifts per week, hours per shift, overtime, shift premiums, etc.

### Benefit Packages

This report itemizes the benefits packages that you have created. The combinations of various benefits comprise the user-defined Benefits Packages.

### Company Benefits

The individual company benefits and their values are included in this report.

### Overhead Report

This report details all of the overhead expenses that were entered into the General Factory and Administrative overhead screens.

# APPENDIX

# Budgeted Hourly Rate Report - Cost Centers

## Current Scenario

Cost Center Name	Totals
Available Annual Hours	11,740.00
Number of Employees	13.00
Number of Shifts	0.00
Hours Per Shift	0.00
Available Weeks Per Year	0.00
Capital Equipment	\$973,000.00
Average Depreciation Rate	9.74%
Floor Space	9,300.00
Asset Depreciation	\$94,800.00
Lease Cost	\$0.00
Occupancy Cost	\$158,220.00
Utilities	\$132,500.00
Insurance	\$12,287.99
Property Taxes	\$72,679.99
Total Fixed Expenses	\$470,487.98
Wages	\$564,488.00
Benefits	\$70,973.06
Total Labor	\$635,461.06
Indirect Supplies	\$44,400.00
Repairs and Maintenance	\$22,100.00
Total Direct Costs	\$1,983,930.04
Distribution of General Factory overhead	\$0.00
Total Manufacturing Costs	\$1,609,888.24
Distribution of Administrative overhead	\$0.00
All-Inclusive Costs	\$1,983,930.04

# Budgeted Hourly Rate Report - Cost Centers

Current Scenario

Cost Center Number	1
Cost Center Name	Electronic Prepress
Type	Machine
Available Annual Hours	2,080.00
Number of Employees	1.50
Number of Shifts per Week	5.00
Hours Per Shift	8.00
Available Weeks Per Year	52.00
Capital Equipment	\$40,000.00
Average Depreciation Rate	10%
Floor Space	100
Asset Depreciation	\$4,000.00
Lease Cost	\$0.00
Occupancy Cost	\$1,829.13
Utilities	\$1,531.79
Insurance	\$532.62
Property Taxes	\$840.23
Total Fixed Expenses	\$8,733.67
Wages	\$56,160.00
Benefits	\$6,964.60
Total Labor	\$63,124.60
Indirect Supplies	\$1,500.00
Repairs and Maintenance	\$700.00
Total Direct Costs	\$74,058.27
Distribution of General Factory overhead	\$97,871.52
Total Manufacturing Costs	\$171,929.79
Distribution of Administrative overhead	\$39,946.21
All-Inclusive Costs	\$211,876.00

Productivity Factors	All-Inclusive	Manufacturing	Direct
Budgeted Hourly Rate at 100.00%	\$101.86	\$82.66	\$35.60
Budgeted Hourly Rate at 90.00%	113.18	91.84	39.56
Budgeted Hourly Rate at 85.00%	119.84	97.25	41.89
Budgeted Hourly Rate at 80.00%	127.33	103.32	44.51
Budgeted Hourly Rate at 70.00%	145.52	118.08	50.86

# Budgeted Hourly Rate Report - Cost Centers

Current Scenario

Cost Center Number	2
Cost Center Name	Platemaking
Type	Machine
Available Annual Hours	2,080.00
Number of Employees	1.00
Number of Shifts per Week	5.00
Hours Per Shift	8.00
Available Weeks Per Year	52.00
Capital Equipment	\$35,000.00
Average Depreciation Rate	10%
Floor Space	150.00
Asset Depreciation	\$3,500.00
Lease Cost	\$0.00
Occupancy Cost	\$2,743.70
Utilities	\$2,297.69
Insurance	\$465.96
Property Taxes	\$1,260.35
Total Fixed Expenses	\$10,267.70
Wages	\$37,440.00
Benefits	\$2,939.80
Total Labor	\$40,379.80
Indirect Supplies	\$3,000.00
Repairs and Maintenance	\$1,400.00
Total Direct Costs	\$55,047.50
Distribution of General Factory overhead	\$72,747.88
Total Manufacturing Costs	\$127,795.38
Distribution of Administrative overhead	\$29,692.01
All-Inclusive Costs	\$157,487.39

Productivity Factors	All-Inclusive	Manufacturing	Direct
Budgeted Hourly Rate at 100.00%	\$75.72	\$61.44	\$26.47
Budgeted Hourly Rate at 90.00%	84.13	68.27	29.41
Budgeted Hourly Rate at 85.00%	89.08	72.28	31.14
Budgeted Hourly Rate at 80.00%	94.64	76.80	33.08
Budgeted Hourly Rate at 70.00%	108.16	87.77	37.81

# Budgeted Hourly Rate Report - Cost Centers

Current Scenario

Cost Center Number	3
Cost Center Name	19 x 25 1C Press
Type	Machine
Available Annual Hours	4,160.00
Number of Employees	1.50
Number of Shifts per Week	10.00
Hours Per Shift	8.00
Available Weeks Per Year	52.00
Capital Equipment	\$75,000.00
Average Depreciation Rate	10%
Floor Space	1,000.00
Asset Depreciation	\$0.00
Lease Cost	\$0.00
Occupancy Cost	\$18,291.33
Utilities	\$15,317.92
Insurance	\$998.48
Property Taxes	\$8,402.31
Total Fixed Expenses	\$43,010.04
Wages	\$68,640.00
Benefits	\$7,637.00
Total Labor	\$76,277.00
Indirect Supplies	\$7,500.00
Repairs and Maintenance	\$5,000.00
Total Direct Costs	\$131,787.04
Distribution of General Factory overhead	\$174,162.83
Total Manufacturing Costs	\$305,949.87
Distribution of Administrative overhead	\$71,084.46
All-Inclusive Costs	\$377,034.33

Productivity Factors	All-Inclusive	Manufacturing	Direct
Budgeted Hourly Rate at 100.00%	\$90.63	\$73.55	\$31.68
Budgeted Hourly Rate at 90.00%	100.70	81.72	35.20
Budgeted Hourly Rate at 85.00%	106.63	86.52	37.27
Budgeted Hourly Rate at 80.00%	113.29	91.93	39.60
Budgeted Hourly Rate at 70.00%	129.48	105.07	45.26

# Budgeted Hourly Rate Report - Cost Centers

Current Scenario

Cost Center Number	4
Cost Center Name	25 x 60 4C Press 19 x
Type	Machine
Available Annual Hours	2,080.00
Number of Employees	3.00
Number of Shifts per Week	10.00
Hours Per Shift	8.00
Available Weeks Per Year	52.00
Capital Equipment	\$750,000.00
Average Depreciation Rate	10%
Floor Space	2,000.00
Asset Depreciation	\$75,000.00
Lease Cost	\$0.00
Occupancy Cost	\$36,582.66
Utilities	\$30,635.84
Insurance	\$9,984.83
Property Taxes	\$16,804.62
Total Fixed Expenses	\$169,007.95
Wages	\$163,028.00
Benefits	\$19,309.26
Total Labor	\$182,337.26
Indirect Supplies	\$20,000.00
Repairs and Maintenance	\$10,000.00
Total Direct Costs	\$381,345.21
Distribution of General Factory overhead	\$503,965.80
Total Manufacturing Costs	\$885,311.01
Distribution of Administrative overhead	\$205,693.36
All-Inclusive Costs	\$1,091,004.37

Productivity Factors	All-Inclusive	Manufacturing	Direct
Budgeted Hourly Rate at 100.00%	\$524.52	\$425.63	\$183.34

# Budgeted Hourly Rate Report - Cost Centers

Current Scenario

Cost Center Number	5
Cost Center Name	Hand Bindery
Type	Labor
Available Annual Hours	1,920.00
Number of Employees	1.00
Number of Shifts per Week	5.00
Hours Per Shift	8.00
Available Weeks Per Year	52.00
Capital Equipment	\$1,000.00
Average Depreciation Rate	10%
Floor Space	300.00
Asset Depreciation	\$100.00
Lease Cost	\$0.00
Occupancy Cost	\$5,487.40
Utilities	\$4,595.38
Insurance	\$13.31
Property Taxes	\$2,520.69
Total Fixed Expenses	\$12,716.78
Wages	\$38,500.00
Benefits	\$0.00
Total Labor	\$38,500.00
Indirect Supplies	\$0.00
Repairs and Maintenance	\$0.00
Total Direct Costs	\$51,216.78
Distribution of General Factory overhead	\$67,685.41
Total Manufacturing Costs	\$118,902.19
Distribution of Administrative overhead	\$27,625.76
All-Inclusive Costs	\$146,527.95

Productivity Factors	All-Inclusive	Manufacturing	Direct
Budgeted Hourly Rate at 100.00%	\$76.32	\$61.93	\$26.68
Budgeted Hourly Rate at 90.00%	84.80	68.81	29.64
Budgeted Hourly Rate at 85.00%	89.78	72.86	31.38
Budgeted Hourly Rate at 80.00%	95.40	77.41	33.34
Budgeted Hourly Rate at 70.00%	109.02	88.47	38.11

# Budgeted Hourly Rate Report - Service Centers

## Current Scenario

Cost Center Number	6
Cost Center Name	Shipping Shrink
Type	General Factory
Number of Employees	1.00
Number of Shifts per Week	5.00
Hours Per Shift	8.00
Available Weeks Per Year	52.00
Capital Equipment	\$10,000.00
Average Depreciation Rate	10%
Floor Space	1,800.00
Asset Depreciation	\$100.00
Lease Cost	\$0.00
Occupancy Cost	\$32,924.39
Utilities	\$27,572.25
Insurance	\$133.13
Property Taxes	\$15,124.16
Total Fixed Expenses	\$76,753.93
Wages	\$35,360.00
Benefits	\$6,011.20
Total Labor	\$41,371.20
Indirect Supplies	\$4,000.00
Repairs and Maintenance	\$1,000.00
General Factory Expenses	\$184,805.26
Administrative Expenses	
Total Direct Costs	\$307,930.39
Distribution of General Factory overhead	(\$307,930.39)
Distribution of Administrative overhead	\$0.00
All-Inclusive Costs	\$0.00

# Budgeted Hourly Rate Report - Service Centers

## Current Scenario

Cost Center Number	7
Cost Center Name	General Factory
Type	General Factory
Number of Employees	2.00
Number of Shifts per Week	5.00
Hours Per Shift	8.00
Available Weeks Per Year	52.00
Capital Equipment	\$12,000.00
Average Depreciation Rate	10%
Floor Space	3,300.00
Asset Depreciation	\$1,200.00
Lease Cost	\$0.00
Occupancy Cost	\$60,361.39
Utilities	\$50,549.13
Insurance	\$159.76
Property Taxes	\$27,727.63
Total Fixed Expenses	\$139,997.91
Wages	\$81,120.00
Benefits	\$13,790.40
Total Labor	\$94,910.40
Indirect Supplies	\$5,400.00
Repairs and Maintenance	\$3,000.00
General Factory Expenses	\$365,194.74
Administrative Expenses	
Total Direct Costs	\$608,503.05
Distribution of General Factory overhead	(\$608,503.05)
Distribution of Administrative overhead	\$0.00
All-Inclusive Costs	\$0.00

# Budgeted Hourly Rate Report - Service Centers

## Current Scenario

Cost Center Number	8
Cost Center Name	Administration
Type	Administrative
Number of Employees	2.00
Number of Shifts per Week	5.00
Hours Per Shift	8.00
Available Weeks Per Year	52.00
Capital Equipment	\$50,000.00
Average Depreciation Rate	20%
Floor Space	650.00
Asset Depreciation	\$10,000.00
Lease Cost	\$0.00
Occupancy Cost	\$0.00
Utilities	\$0.00
Insurance	\$0.00
Property Taxes	\$0.00
Total Fixed Expenses	\$10,000.00
Wages	\$84,240.00
Benefits	\$14,320.80
Total Labor	\$98,560.80
Indirect Supplies	\$3,000.00
Repairs and Maintenance	\$1,000.00
General Factory Expense	\$0.00
Administrative Expenses	\$261,481.00
Total Direct Costs	\$374,041.80
Distribution of General Factory overhead	\$0.00
Distribution of Administrative overhead	(\$374,041.80)
All-Inclusive Costs	\$0.00

## Troubleshooting

Problem: You cannot install Presstimator BHR, or the program will only run in "Demo" mode.

When something works as an administrator and NOT as a regular user, it points to a permissions problem. In a corporate environment where people log into a corporate domain, they usually don't have a lot of permissions on local machines. Try adding the DOMAIN user account "domain\*(appropriate name)*" for instance to the LOCAL MACHINE Administrators group.

You do this by right clicking on "My Computer" icon and selecting Manage. Open the "Local Users and Groups" tree view node (click on the plus sign) and click on Groups.

Double-click "Administrators". Click "Add...". Enter the domain\*username* and click "Check Names". When it is underlined, click OK. If this solves the problem, it is an issue with that PC's permission settings and may point to a issue with the network policies.

The application reads from the following key in the registry:

*HKEYLOCALMACHINE\Software\Microsoft\Windows\CurrentVersion*

Please be sure the user has access to read from this key. There are no necessary 'write' permissions that need to be enabled in the Registry in order to register the application.

Allow access to the registry path:

HKEY\_CURRENT\_USER|Software|VB and VBA Program Settings

and everything underneath it and see how it works. It may be that the network management folks have prevented users from installing programs on their machines.