

# Font Guide

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## Working with Fonts

### EPSON BarCode Fonts (Windows Only)

EPSON BarCode Fonts let you easily create and print many types of bar codes.

Normally, bar code creation is a laborious process requiring you to specify various command codes, such as Start bar, Stop bar and OCR-B, in addition to the bar code characters themselves. However, EPSON BarCode Fonts are designed to add such codes automatically, allowing you to easily print bar codes that conform to a variety of bar code standards.

EPSON BarCode Fonts support the following types of bar codes.

| Bar code Standard        | EPSON BarCode       | OCR-B | Check Digit | Comments  |
|--------------------------|---------------------|-------|-------------|---|
| EAN                      | EPSON EAN-8         | Yes   | Yes         | Creates EAN (abbreviated version) bar codes.                            |
|                          | EPSON EAN-13        | Yes   | Yes         | Creates EAN (standard version) bar codes.                               |
| UPC-A                    | EPSON UPC-A         | Yes   | Yes         | Creates UPC-A bar codes.  |
| UPC-E                    | EPSON UPC-E         | Yes   | Yes         | Creates UPC-E bar codes.  |
| Code39                   | EPSON Code39        | No    | No          | Printing of OCR-B and check digits can be specified with the font name. |
|                          | EPSON Code39 CD     | No    | Yes         |   |
|                          | EPSON Code39 CD Num | Yes   | Yes         |   |
|                          | EPSON Code39 Num    | Yes   | No          |   |
| Code128                  | EPSON Code128       | No    | Yes         | Creates Code128 bar codes.  |
| Interleaved 2 of 5 (ITF) | EPSON ITF           | No    | No          | Printing of OCR-B and check digits can be specified with the font name. |
|                          | EPSON ITF CD        | No    | Yes         |   |
|                          | EPSON ITF CD Num    | Yes   | Yes         |   |
|                          | EPSON ITF Num       | Yes   | No          |   |

|         |                      |     |     |  |
|---------|----------------------|-----|-----|--|
| Codabar | EPSON Codabar        | No  | No  | Printing of OCR-B and check digits can be specified with the font name.          |
|         | EPSON Codabar CD     | No  | Yes |  |
|         | EPSON Codabar CD Num | Yes | Yes |  |
|         | EPSON Codabar Num    | Yes | No  |  |
| EAN128  | EPSON EAN128         | Yes | Yes | Creates EAN128 barcodes.<br>Supported OS:<br>Windows<br>Vista/XP/2000/Server2003 |

### System requirements

To use EPSON BarCode Fonts, your computer system should meet the following requirements:

Computer: IBM PC series or IBM compatible with an i386SX or higher CPU

Operating system\*: Microsoft Windows Vista, XP, Me, 98, 2000, or Server 2003

Hard disk: 15 to 30 KB free space, depending on the font.


\* When using EPSON Barcode Fonts, make sure the printer driver is compatible with your computer's operating system.

### Installing EPSON BarCode Fonts

Follow the steps below to install EPSON BarCode Fonts. The procedure described here is for installation in Windows 98; the procedure for other Windows operating systems is nearly the same.

1. Make sure that the printer is off and that Windows is running on your computer.
2. Insert the printer software CD-ROM in the CD-ROM drive.

**Note:**

If the Epson Installation Program screen does not appear automatically, click  **Start**, then click **Computer** (for Windows Vista) or click the **My Computer** icon on the desktop (for Windows XP, Me, 98, 2000 or Server 2003). Right-click the **CD-ROM** icon, click **OPEN** in the menu that appears, then double-click **EPSetup.exe**.

3. If the language section window appears, select your language.
4. If the option selection window appears, click **User Installation**.
5. When the EPSON Installation Program screen appears, click **Custom Install**.

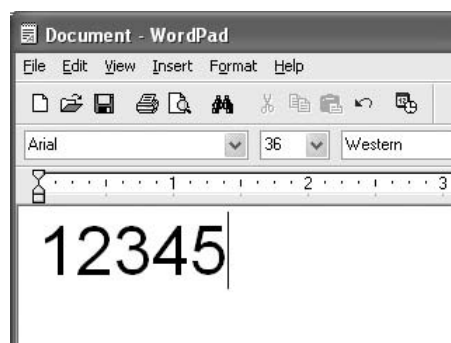
6. Click **EPSON BarCode Font**.
7. When the software license agreement screen appears, read the statement and then click **Accept**. Then follow the on-screen instructions.
8. When installation is complete, click **Exit**.

EPSON BarCode Fonts are now installed on your computer.

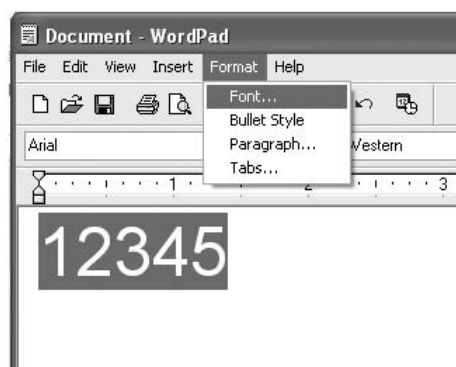
### ***Printing with EPSON BarCode Fonts***

Follow the steps below to create and print bar codes using EPSON BarCode Fonts. The application featured in these instructions is Microsoft WordPad. The actual procedure may differ slightly when printing from other applications.

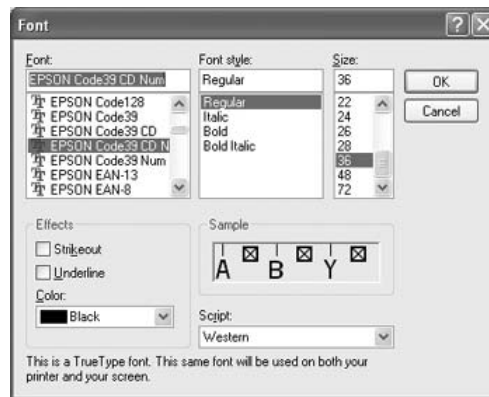
1. Open a document in your application and enter the characters you want to convert into a bar code.



2. Select the characters, then select **Font** from the Format menu.



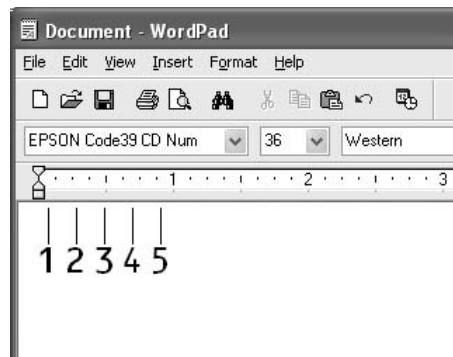
3. Select the EPSON BarCode Font you want to use, set the font size, then click **OK**.



**Note:**

*In Windows Vista, XP, 2000, or Server 2003, you cannot use font sizes larger than 96 points when printing bar codes.*

4. The characters you selected appear as bar code characters similar to those shown below.



5. Select **Print** from the File menu, select your EPSON printer, then click **Properties**. Make the following printer driver settings. Your printer is a Black-and-White printer. See the Black-and-White Printer Driver section in the table below.

|  | <b>Black-and-white Printer Driver</b> | <b>Color Printer Driver</b> | <b>Host Based Black-and-white Printer Driver</b> | <b>Host Based Color Printer Driver</b> |
|--|---------------------------------------|-----------------------------|--|--|
| Color  | (not available)                       | Black                       | (not available)                                  | Black                                  |
| Print Quality  | Text & Image*                         | Text & Image*               | Text & Image*                                    | Text & Image*                          |
| Toner Save   | Not selected                          | Not selected                | Not selected                                     | Not selected                           |
| Zoom Options   | Not selected                          | Not selected                | Not selected                                     | Not selected                           |
| Graphic mode (in the Extended Settings dialog box accessed through the Optional Settings tab)  | High Quality (Printer)                | (not available)             | (not available)                                  | (not available)                        |
| Printing Mode (in the Extended Settings dialog box accessed through the Optional Settings tab) | (not available)                       | High Quality (Printer)      | (not available)                                  | (not available)                        |

\* These settings are available when the **Automatic** check box is selected on the Basic Settings tab. When the **Advanced** check box is selected, click the **More Settings** button and set the Resolution or Print Quality to **600dpi**.

6. Click **OK** to print the bar code.

**Note:**

*If there is an error in the bar code character string, such as inappropriate data, the bar code will be printed as it appears on the screen, but it cannot be read by a bar code reader.*

### Notes on inputting and formatting bar codes

Please note the following when inputting and formatting bar code characters:

- Do not apply shading or special character formatting, such as bold, italic, or underline.
- Print bar codes in black and white only.
- When rotating characters, only specify rotation angles of 90°, 180°, and 270°.
- Turn off all automatic character and word spacing settings in your application.
- Do not use features in your application that enlarge or reduce the size of characters in only the vertical or horizontal direction.
- Turn off your application's auto-correct features for spelling, grammar, spacing, etc.
- To more easily distinguish bar codes from other text in your document, set your application to show text symbols, such as paragraph marks, tabs, etc.

- ❑ Because special characters such as Start bar and Stop bar are added when an EPSON BarCode Font is selected, the resulting bar code may have more characters than were originally input.
- ❑ For best results, use only the font sizes recommended in “BarCode Font specifications” on page 7 for the EPSON BarCode Font you are using. Bar codes in other sizes may not be readable with all bar code readers.

**Note:**

*Depending on the print density, or on the quality or color of the paper, bar codes may not be readable with all bar code readers. Print a sample and make sure the bar code can be read before printing large quantities.*

**BarCode Font specifications**

This section contains details on the character input specifications for each EPSON BarCode Font.

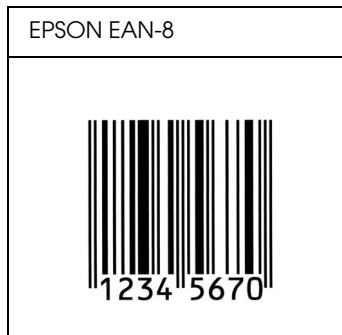
**EPSON EAN-8**

- ❑ EAN-8 is an eight-digit abbreviated version of the EAN bar code standard.
- ❑ Because the check digit is added automatically, only 7 characters can be input.

|                      |   |
|----------------------|---|
| Character type       | Numbers (0 to 9)  |
| Number of characters | 7 characters  |
| Font size            | 52 pt to 130 pt (up to 96 pt in Windows Vista/XP/2000/Server 2003). Recommended sizes are 52 pt, 65 pt (standard), 97.5 pt, and 130 pt. |

The following codes are inserted automatically and need not be input by hand:

- ❑ Left/Right margin
- ❑ Left/Right guard bar
- ❑ Center bar
- ❑ Check digit
- ❑ OCR-B

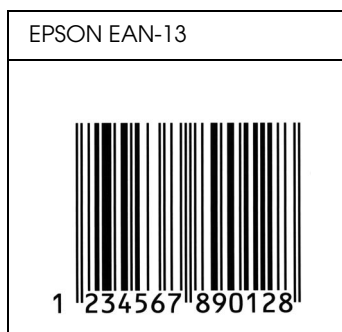
**Print sample***EPSON EAN-13*

- EAN-13 is the standard 13-digit EAN bar code.
- Because the check digit is added automatically, only 12 characters can be input.

|                      |  |
|----------------------|--|
| Character type       | Numbers (0 to 9)   |
| Number of characters | 12 characters  |
| Font size            | 60 pt to 150 pt (up to 96 pt in Windows Vista/XP/2000/Server 2003). Recommended sizes are 60 pt, 75 pt (standard), 112.5 pt, and 150 pt. |

The following codes are inserted automatically and need not be input by hand:

- Left/Right margin
- Left/Right guard bar
- Center bar
- Check digit
- OCR-B

**Print sample**



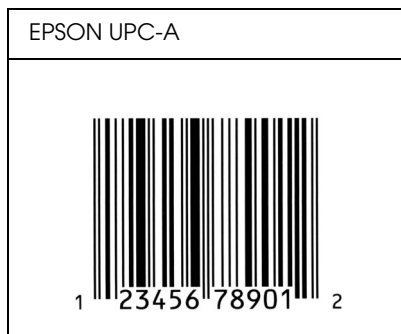
*EPSON UPC-A*

- UPC-A is the standard bar code specified by the American Universal Product Code (UPC Symbol Specification Manual).
- Only regular UPC codes are supported. Supplementary codes are not supported.

|                      |   |
|----------------------|---|
| Character type       | Numbers (0 to 9)  |
| Number of characters | 11 characters   |
| Font size            | 60 pt to 150 pt (up to 96 pt in Windows Vista/XP/2000/Server 2003). Recommended sizes are 60 pt, 75 pt (standard), 112.5 pt and 150 pt. |

The following codes are inserted automatically and need not be input by hand:

- Left/Right margin
- Left/Right guard bar
- Center bar
- Check digit
- OCR-B

**Print sample**

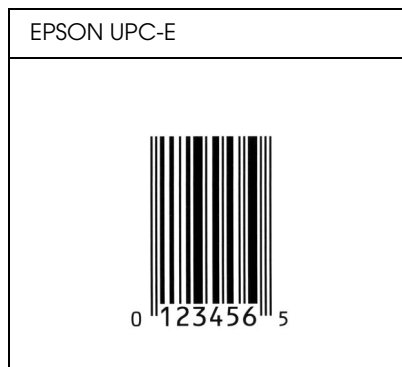
*EPSON UPC-E*

- UPC-E is the UPC-A zero-suppression (deletes extra zeros) bar code specified by the American Universal Product Code (UPC Symbol Specification Manual).

|                      |  |
|----------------------|--|
| Character type       | Numbers (0 to 9)   |
| Number of characters | 6 characters   |
| Font size            | 60 pt to 150 pt (up to 96 pt in Windows Vista/XP/2000/Server 2003). Recommended sizes are 60 pt, 75 pt (standard), 112.5 pt, and 150 pt. |

The following codes are inserted automatically and need not be input by hand:

- Left/Right margin
- Left/Right guard bar
- Check digit
- OCR-B
- The numeral "0"

**Print sample**

*EPSON Code39*

- ❑ Four Code39 fonts are available, allowing you to enable and disable the automatic insertion of check digits and OCR-B.
- ❑ The height of the bar code is automatically adjusted to 15% or more of its total length, in conformance to the Code39 standard. For this reason, it is important to keep at least one space between the bar code and the surrounding text to prevent overlapping.
- ❑ Spaces in Code39 bar codes should be input as “\_” underbars.
- ❑ When printing two or more bar codes on one line, separate the bar codes with a tab, or select a font other than a BarCode Font and input the space. If a space is input while a Code39 font is selected, the bar code will not be correct.

|                      |   |
|----------------------|---|
| Character type       | Alphanumeric characters (A to Z, 0 to 9) Symbols (- . space \$ / + %)   |
| Number of characters | No limit  |
| Font size            | When OCR-B is not used: 26 pt or more (up to 96 pt in Windows Vista/XP/2000/Server 2003). Recommended sizes are 26 pt, 52 pt, 78 pt, and 104 pt.<br>When OCR-B is used: 36 pt or more (up to 96 pt in Windows Vista/XP/2000/Server 2003). Recommended sizes are 36 pt, 72 pt, 108 pt, and 144 pt. |

The following codes are inserted automatically and need not be input by hand:

- ❑ Left/Right quiet zone
- ❑ Check digit
- ❑ Start/Stop character

**Print sample**

|                  |                     |
|------------------|---------------------|
| EPSON Code39     | EPSON Code39 CD     |
|                  |                     |
| EPSON Code39 Num | EPSON Code39 CD Num |
| 1 2 3 4 5 6 7    | 1 2 3 4 5 6 7 S     |

## EPSON Code128

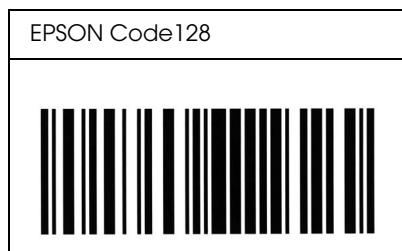
- ❑ Code128 fonts support code sets A, B, and C. When the code set of a line of characters is changed in the middle of the line, a conversion code is automatically inserted.
- ❑ The height of the bar code is automatically adjusted to 15% or more of its total length, in conformance to the Code128 standard. For this reason, it is important to keep at least one space between the bar code and the surrounding text to prevent overlapping.
- ❑ Some applications automatically delete the spaces at the end of lines or change multiple spaces into tabs. Bar codes containing spaces may not be correctly printed from applications that automatically delete spaces from the ends of lines or change multiple spaces into tabs.
- ❑ When printing two or more bar codes on one line, separate the bar codes with a tab, or select a font other than a BarCode Font and input the space. If a space is input while Code128 is selected, the bar code will not be correct.

|                      |  |
|----------------------|--|
| Character type       | All ASCII characters (95 in total)   |
| Number of characters | No limit   |
| Font size            | 26 pt to 104 pt (up to 96 pt in Windows Vista/XP/2000/Server 2003). Recommended sizes are 26 pt, 52 pt, 78 pt, and 104 pt. |

The following codes are inserted automatically and need not be input by hand:

- ❑ Left/Right quiet zone
- ❑ Start/Stop character
- ❑ Check digit
- ❑ Change code set character

### Print sample



*EPSON ITF*

- ❑ The EPSON ITF fonts conform to the USS Interleaved 2-of-5 standard (American).
- ❑ Four EPSON ITF fonts are available, allowing you to enable and disable the automatic insertion of check digits and OCR-B.
- ❑ The height of the bar code is automatically adjusted to 15% or more of its total length, in conformance to the Interleaved 2-of-5 standard. For this reason, it is important to keep at least one space between the bar code and the surrounding text to prevent overlapping.
- ❑ Interleaved 2 of 5 treats every two characters as one set. When there are an odd number of characters, EPSON ITF fonts automatically add a zero to the beginning of the character string.

|                      |   |
|----------------------|---|
| Character type       | Numbers (0 to 9)  |
| Number of characters | No limit  |
| Font size            | When OCR-B is not used: 26 pt or more (up to 96 pt in Windows Vista/XP/2000/Server 2003). Recommended sizes are 26 pt, 52 pt, 78 pt, and 104 pt.<br>When OCR-B is used: 36 pt or more (up to 96 pt in Windows Vista/XP/2000/Server 2003). Recommended sizes are 36 pt, 72 pt, 108 pt, and 144 pt. |

The following codes are inserted automatically and need not be input by hand:

- ❑ Left/Right quiet zone
- ❑ Start/Stop character
- ❑ Check digit
- ❑ The numeral "0" (added to the beginning of character strings as needed)

**Print sample**

|  |  |
|--|--|
| EPSON ITF  | EPSON ITF CD   |
|                     |                     |
| EPSON ITF Num  | EPSON ITF CD Num   |
| <br>0 1 2 3 4 5 6 7 | <br>1 2 3 4 5 6 7 0 |

*EPSON Codabar*





- Four Codabar fonts are available, allowing you to enable and disable the automatic insertion of check digits and OCR-B.
- The height of the bar code is automatically adjusted to 15% or more of its total length, in conformance to the Codabar standard. For this reason, it is important to keep at least one space between the bar code and the surrounding text to prevent overlapping.
- When either a Start or a Stop character is input, Codabar fonts automatically insert the complementary character.
- If neither a Start nor a Stop character is input, these characters are automatically input as the letter "A".

|                      |   |
|----------------------|---|
| Character type       | Numbers (0 to 9)<br>Symbols (- \$ : / . +)  |
| Number of characters | No limit  |
| Font size            | When OCR-B is not used: 26 pt or more (up to 96 pt in Windows Vista/XP/2000/Server 2003). Recommended sizes are 26 pt, 52 pt, 78 pt, and 104 pt.<br>When OCR-B is used: 36 pt or more (up to 96 pt in Windows Vista/XP/2000/Server 2003). Recommended sizes are 36 pt, 72 pt, 108 pt, and 144 pt. |

The following codes are inserted automatically and need not be input by hand:

- Left/Right quiet zone
- Start/Stop character (when not input)
- Check digit

### Print sample

|   |   |
|---|---|
| EPSON Codabar   | EPSON Codabar CD  |
|                        |                          |
| EPSON Codabar Num   | EPSON Codabar CD Num  |
| <br>A 1 2 3 4 5 6 7 A | <br>A 1 2 3 4 5 6 7 4 A |

### EPSON EAN128

- EAN128 fonts support code sets A, B, and C. When the code set of a line of characters is changed in the middle of the line, a conversion code is automatically inserted.
- The following 4 kinds of the properties are supported as the Application Identifier (AI).
  - 01: Global traded item number
  - 10: Batch / Lot number
  - 17: Expiry date
  - 30: Quantity
- The height of the bar code is automatically adjusted to 15% or more of its total length, in conformance to the Code128 standard. For this reason, it is important to keep at least one space between the bar code and the surrounding text to prevent overlapping.
- Some applications automatically delete the spaces at the end of lines or change multiple spaces into tabs. Bar codes containing spaces may not be correctly printed from applications that automatically delete spaces from the ends of lines or change multiple spaces into tabs.

- ❑ When printing two or more bar codes on one line, separate the bar codes with a tab, or select a font other than a BarCode Font and input the space. If a space is input while EAN128 is selected, the bar code will not be correct.

|                      |  |
|----------------------|--|
| Character type       | Alphanumeric characters (A to Z, 0 to 9)<br>Parenthesis are only for identification of the Application Identifier (AI)<br>Only the capital letters are supported by the small letter key input.  |
| Number of characters | It changes with the Application Identifier (AI).<br>01: 4 characters "(01)" and 13 numbers<br>17: 4 characters "(17)" and 6 numbers<br>10: 4 characters "(10)" and maximum of 20 alphanumeric characters<br>30: 4 characters "(30)" and maximum of 8 numbers |
| Font size            | 36 pt or more<br>Recommended sizes are 36 pt, 72 pt  |

The following codes are inserted automatically and need not be input by hand:

- ❑ Left/Right quiet zone
- ❑ Start/Stop character
- ❑ FNC1 character

It inserts for discernment from Code128 and for a pause of the variable length application identifier.

- ❑ Check digit
- ❑ Change code set character

**Print sample**





## Available fonts

The following table lists the fonts that are installed in your printer. The names of all the fonts appear in your application software's font list if you are using the driver provided with the printer. If you are using a different driver, all of these fonts may not be available.

The fonts provided with the printer are shown below, according to the emulation mode.

### PCL5 mode

| Font Name           | Family                                     | HP Equivalent       |
|---------------------|--|---------------------|
| Courier             | Medium, Bold, Italic, Bold Italic          | Courier             |
| ITC Zapf Dingbats   | -  | ITC Zapf Dingbats   |
| CG Times            | Medium, Bold, Italic, Bold Italic          | CG Times            |
| CG Omega            | Medium, Bold, Italic, Bold Italic          | CG Omega            |
| Coronet             | -  | Coronet             |
| Clarendon Condensed | -  | Clarendon Condensed |
| Univers             | Medium, Bold, Medium Italic, Bold Italic   | Univers             |
| Univers Condensed   | Medium, Bold, Medium Italic, Bold Italic   | Univers Condensed   |
| Antique Olive       | Medium, Bold, Italic                       | Antique Olive       |
| Garamond            | Antiqua, Halbfett, Kursiv, Kursiv Halbfett | Garamond            |
| Marigold            | -  | Marigold            |
| Albertus            | Medium, Extra Bold                         | Albertus            |
| Ryadh               | Medium, Bold                               | Ryadh               |
| Malka               | Medium, Bold, Italic                       | Miryam              |
| Dorit               | Medium, Bold                               | David               |
| Naamit              | Medium, Bold                               | Narkis              |
| Arial               | Medium, Bold, Italic, Bold Italic          | Arial               |
| Times New           | Medium, Bold, Italic, Bold Italic          | Times New           |
| Helvetica           | Medium, Bold, Oblique, Bold Oblique        | Helvetica           |
| Helvetica Narrow    | Medium, Bold, Oblique, Bold Oblique        | Helvetica Narrow    |
| Palatino            | Roman, Bold, Italic, Bold Italic           | Palatino            |

|                          |  |                                 |
|--------------------------|--|---------------------------------|
| ITC Avant Garde          | Book, Demi, Book Oblique, Demi Oblique | ITC Avant Garde Gothic          |
| ITC Bookman              | Light, Demi, Light Italic, Demi Italic | ITC Bookman                     |
| New Century Schoolbook   | Roman, Bold, Italic, Bold Italic       | New Century Schoolbook          |
| Times                    | Roman, Bold, Italic, Bold Italic       | Times                           |
| ITC Zapf Chancery Italic | -                                      | ITC Zapf Chancery Medium Italic |
| Symbol                   | -                                      | Symbol                          |
| SymbolPS                 | -                                      | SymbolPS                        |
| Wingdings                | -                                      | Wingdings                       |
| Letter Gothic            | Medium, Bold, Italic                   | Letter Gothic                   |
| Naskh                    | Medium, Bold                           | Naskh                           |
| Koufi                    | Medium, Bold                           | Koufi                           |
| CourierPS                | Medium, Bold, Oblique, Bold Oblique    | CourierPS                       |
| Line Printer             | -                                      | Line Printer                    |
| OCR A                    | -                                      | -                               |
| OCR B                    | -                                      | -                               |
| Code39                   | 9.37cpi, 4.68cpi                       | -                               |
| EAN/UPC                  | Medium, Bold                           | -                               |

When selecting fonts in your application software, choose the font name listed in the HP Equivalent column.

**Note:**

*Depending on the print density, or on the quality or color of the paper, OCR A, OCR B, Code39, and EAN/UPC fonts may not be readable. Print a sample and make sure the fonts can be read before printing large quantities.*

**ESC/P 2 and FX modes**

| Font Name        | Family       |
|------------------|--------------|
| Courier          | Medium, Bold |
| EPSON Prestige   | -            |
| EPSON Roman      | -            |
| EPSON Sans serif | -            |
| Arial*           | Medium, Bold |
| Letter Gothic    | Medium, Bold |
| Times New Roman* | Medium, Bold |
| EPSON Script     | -            |
| OCR A            | -            |
| OCR B            | -            |

\* Available only in ESC/P2 mode.

**Note:**

*Depending on the print density, or on the quality or color of the paper, OCR A and OCR B fonts may not be readable. Print a sample and make sure the fonts can be read before printing large quantities.*

**I239X mode**

| Font Name        | Family       |
|------------------|--------------|
| Courier          | Medium, Bold |
| EPSON Prestige   | -            |
| EPSON Gothic     | -            |
| EPSON Orator     | -            |
| EPSON Script     | -            |
| EPSON Presentor  | -            |
| EPSON Sans serif | -            |
| OCR B            | -            |

**Note:**

*Depending on the print density, or on the quality or color of the paper, the OCR B font may not be readable. Print a sample and make sure the font can be read before printing large quantities.*

**PS 3 mode**

Seventeen scalable fonts. The fonts include: Courier, Courier Oblique, Courier Bold, Courier Bold Oblique, Helvetica, Helvetica Oblique, Helvetica Bold, Helvetica Bold Oblique, Helvetica Narrow, Helvetica Narrow Oblique, Helvetica Narrow Bold, Helvetica Narrow Bold Oblique, Times Roman, Times Italic, Times Bold, Times Bold Italic, and Symbol.

**PCL6 mode**

For symbol set, see “In the PCL6 Mode” on page 30.

*Scalable Font*

| <b>Font Name</b>       | <b>Symbol Set</b> |
|------------------------|-------------------|
| Courier                | *1                |
| Courier Bold           | *1                |
| Courier Italic         | *1                |
| Courier Bold Italic    | *1                |
| Letter Gothic          | *1                |
| Letter Gothic Bold     | *1                |
| Letter Gothic Italic   | *1                |
| CourierPS              | *1                |
| CourierPS Bold         | *1                |
| CourierPS Oblique      | *1                |
| CourierPS Bold Oblique | *1                |
| CG Times               | *1                |
| CG Times Bold          | *1                |
| CG Times Italic        | *1                |
| CG Times Bold Italic   | *1                |
| CG Omega               | *1                |
| CG Omega Bold          | *1                |
| CG Omega Italic        | *1                |
| CG Omega Bold Italic   | *1                |
| Coronet                | *1                |
| Clarendon Condensed    | *1                |
| Univers Medium         | *1                |

|                                 |    |
|---------------------------------|----|
| Univers Bold                    | *1 |
| Univers Medium Italic           | *1 |
| Univers Bold Italic             | *1 |
| Univers Medium Condensed        | *1 |
| Univers Bold Condensed          | *1 |
| Univers Medium Condensed Italic | *1 |
| Univers Bold Condensed Italic   | *1 |
| Antique Olive                   | *1 |
| Antique Olive Bold              | *1 |
| Antique Olive Italic            | *1 |
| Garamond Antiqua                | *1 |
| Garamond Halbfett               | *1 |
| Garamond Kursiv                 | *1 |
| Garamond Kursiv Halbfett        | *1 |
| Marigold                        | *1 |
| Albertus Medium                 | *1 |
| Albertus Extra Bold             | *1 |
| Arial                           | *1 |
| Arial Bold                      | *1 |
| Arial Italic                    | *1 |
| Arial Bold Italic               | *1 |
| Times New Roman                 | *1 |
| Times New Roman Bold            | *1 |
| Times New Roman Italic          | *1 |
| Times New Roman Bold Italic     | *1 |
| Helvetica                       | *1 |
| Helvetica Bold                  | *1 |
| Helvetica Oblique               | *1 |
| Helvetica Bold Oblique          | *1 |
| Helvetica Narrow                | *1 |
| Helvetica Narrow Bold           | *1 |
| Helvetica Narrow Oblique        | *1 |



|                                     |    |
|-------------------------------------|----|
| Helvetica Narrow Bold Oblique       | *1 |
| Palatino Roman                      | *1 |
| Palatino Bold                       | *1 |
| Palatino Italic                     | *1 |
| Palatino Bold Italic                | *1 |
| ITC Avant Garde Gothic Book         | *1 |
| ITC Avant Garde Gothic Demi         | *1 |
| ITC Avant Garde Gothic Book Oblique | *1 |
| ITC Avant Garde Demi Oblique        | *1 |
| ITC Bookman Light                   | *1 |
| ITC Bookman Demi                    | *1 |
| ITC Bookman Light Italic            | *1 |
| ITC Bookman Demi Italic             | *1 |
| New Century Schoolbook Roman        | *1 |
| New Century Schoolbook Bold         | *1 |
| New Century Schoolbook Italic       | *1 |
| New Century Schoolbook Bold Italic  | *1 |
| Times Roman                         | *1 |
| Times Bold                          | *1 |
| Times Italic                        | *1 |
| Times Bold Italic                   | *1 |
| ITC Zapf Chancery Medium Italic     | *1 |
| Symbol                              | *2 |
| Wingdings                           | *3 |
| ITC Zapf Dingbats                   | *4 |
| SymbolPS                            | *2 |

*Bitmap Font*

| Font Name    | Symbol Set |
|--------------|------------|
| Line Printer | *5         |

## ***Printing font samples***

You can print samples of the fonts available in each mode by using the control panel's Information Menu. Follow these steps to print font samples.

1. Make sure that paper is loaded.
2. Make sure the LCD panel displays *Ready* or *Standby*, then press the  **Enter** button.
3. Press the **▼ Down** button to select the font sample for the appropriate mode.
4. Press the  **Enter** button to print the selected font sample sheet.

## ***Adding more fonts***

You can add a wide variety of fonts to your computer. Most font packages include an installer for this purpose.

See your computer documentation for instructions on installing fonts.

## ***Selecting fonts***

Whenever possible select fonts in your application. See your software documentation for instructions.

If you are sending unformatted text to the printer directly from DOS or if you are using a simple software package that does not include font selection, you can select fonts using the printer's control panel menus when in the PCL, ESC/P 2, FX, or I239X emulation mode.

## ***Downloading fonts***

Fonts that reside on your computer's hard disk can be downloaded, or transferred, to the printer so they can be printed. Downloaded fonts, also called soft fonts, remain in printer memory until you turn off the printer or otherwise reset it. If you plan on downloading many fonts, make sure your printer has sufficient memory.

Most font packages make it easy to manage fonts by providing their own installer. The installer gives you the option of having the fonts automatically downloaded whenever you start your computer or having fonts downloaded only when you need to print a particular font.

## EPSON Screen Fonts (Windows Only)

**Note:**

*If your printer is host based, EPSON Screen Fonts are not included in the software CD-ROM because they cannot be used with host based printers.*

EPSON Screen Fonts provide you with 131 software fonts.

### System requirements

To use EPSON Screen Fonts, your computer system should meet the following requirements:

|                    |  |
|--------------------|--|
| Computer:          | IBM PC series or IBM compatible with an 486 or higher CPU                                    |
| Operating system*: | Microsoft Windows Vista, XP, Me, 98, 2000, or Server 2003<br>Internet Explorer 4.0 or higher |
| Hard disk:         | At least 15 MB of free space   |


\* When using EPSON Barcode Fonts, make sure the printer driver is compatible with your computer's operating system.

### Installing EPSON Screen Fonts

Follow the steps below to install EPSON Screen Fonts.

1. Make sure that the printer is off and that Windows is running on your computer.
2. Insert the printer software CD-ROM in the CD-ROM drive.

**Note:**

*If the Epson Installation Program screen does not appear automatically, click  **Start**, then click **Computer** (for Windows Vista) or click the **My Computer** icon on the desktop (for Windows XP, Me, 98, 2000 or Server 2003). Right-click the **CD-ROM** icon, click **OPEN** in the menu that appears, then double-click **EPSetup.exe**.*

3. If the language selection window appears, select your language.
4. If the option selection window appears, click **User Installation**.
5. When the EPSON Installation Program screen appears, click **Custom Install**.
6. Click **EPSON Screen Fonts**. Then follow the on-screen instructions.
7. When installation is complete, click **Exit**.

EPSON Screen Fonts are now installed on your computer.



## Symbol Sets

### Introduction to symbol sets

Your printer can access a variety of symbol sets. Many of these symbol sets differ only in the international characters specific to each language.

**Note:**

*Since most software handles fonts and symbols automatically, you will probably never need to adjust the printer's settings. However, if you are writing your own printer control programs, or if you are using older software that cannot control fonts, refer to the following sections for symbol set details.*

When you are considering which font to use, you should also consider which symbol set to combine with the font. Available symbol sets vary depending on which emulation mode you use and which font you choose.

### In the PCL5 mode

The following symbol sets are available in PCL5 emulation mode.

| Available typefaces  | Symbol set name: |                      |
|--|------------------|----------------------|
| <b>19 Typefaces</b><br><b>Courier</b><br><b>CG Times</b><br><b>Universe</b><br><b>Letter Gothic</b><br><b>Line Printer</b> | IBM-US (10U)     | Roman-8 (8U)         |
|  | ECM94-1 (0N)     | 8859-2 ISO (2N)      |
|  | 8859-9 ISO (5N)  | 8859-10ISO (6N)      |
|  | IBM-DN (11U)     | PcMultilingual (12U) |
|  | Legal (1U)       | 8859-15ISO (9N)      |

|  |                              |  |
|--|------------------------------|--|
| <b>19 Typefaces</b><br><b>Courier</b><br><b>CG Times</b><br><b>Universe</b><br><b>Letter Gothic</b>  | PcBit775 (26U)               | Pc1004 (9J)                                    |
|  | WiBALT (19L)                 | DeskTop (7J)                                   |
|  | PstText (10J)                | Windows (9U)                                   |
|  | McText (12J)                 | MsPublishi (6J)                                |
|  | PiFont (15U)                 | VeMath (6M)                                    |
|  | VeInternational (13J)        | VeUS (14J)                                     |
|  | PcE.Europe (17U)             | PcTk437 (9T)                                   |
|  | WiAnsi (19U)                 | WiE.Europe (9E)                                |
|  | WiTurkish (5T)               | UK (1E)  |
|  | Swedis2 (0S)                 | Italian (0I)                                   |
|  | Spanish (2S)                 | German (1G)                                    |
|  | Norweg1 (0D)                 | French2 (1F)                                   |
|  | Roman-9 (4U)                 | PcEur858 (13U)                                 |
| <b>19 Typefaces</b><br><b>Courier</b><br><b>CG Times</b><br><b>Universe</b><br><b>Letter Gothic</b><br><b>Dorit</b><br><b>Malka</b><br><b>Naamit</b><br><b>Naskh</b><br><b>Koufi</b><br><b>Ryadh</b> | PsMath (5M)                  | Math-8 (8M)                                    |
|  | ANSI ASCII (0U)              |  |
| <b>Courier</b><br><b>CG Times</b><br><b>Universe</b><br><b>Letter Gothic</b>   | Pc866Cyr (3R)                | Pc866Ukr (14R)                                 |
|  | WinCyr (9R)                  | Pc8Grk (12G)                                   |
|  | Pc851Grk (10G)               | WinGrk (9G)                                    |
|  | ISOGrk (12N)                 | Greek8 (8G)                                    |
| <b>Courier</b><br><b>CG Times</b><br><b>Universe</b><br><b>Letter Gothic</b><br><b>Line Printer</b>  | ISOCyr (10N)                 |  |
| <b>Line Printer</b>  | Roman Extension (0E)         |  |
| <b>Courier</b><br><b>Letter Gothic</b><br><b>Dorit</b><br><b>Naamit</b><br><b>Malka</b>  | Hebrew7 (0H)<br>Hebrew8 (8H) | ISO 8859/8 Hebrew (7H)<br>PC-862, Hebrew (15H) |

|                                    |                                      |                      |
|------------------------------------|--------------------------------------|----------------------|
| <b>Koufi<br/>Naasskh<br/>Ryadh</b> | Arabic8 (8V)<br>PC-864, Arabic (10V) | HPWARA (9V)          |
| <b>Symbol</b>                      | Symbol (19M)                         |                      |
| <b>Wingdings</b>                   | Wingdings (579L)                     |                      |
| <b>ITC Zapf Dingbats</b>           | ZapfDingbats (14L)                   |                      |
| <b>OCR A</b>                       | OCR A (00)                           |                      |
| <b>OCR B</b>                       | OCR B (10)                           | OCR B Extension (3Q) |
| <b>Code3-9</b>                     | Code3-9 (0Y)                         |                      |
| <b>EAN/UPC</b>                     | EAN/UPC (8Y)                         |                      |

The 19 typefaces refer to those listed below:

CG Omega  
 Coronet  
 Clarendon Condensed  
 Univers Condensed  
 Antique Olive  
 Garamond  
 Marigold  
 Albertus  
 Arial  
 Times New  
 Helvetica  
 Helvetica Narrow  
 Palatino  
 ITC Avant Garde Gothic  
 ITC Bookman  
 New Century Schoolbook  
 Times  
 ITC Zapf Chancery Medium Italic  
 CourierPS

***In the ESC/P 2 or FX Modes***

| Character Table       | Available typefaces |           |   |                                  |
|-----------------------|---------------------|-----------|---|----------------------------------|
|                       | OCR B               | Courier   | EPSON Roman<br>EPSON Sans serif<br>EPSON Prestige<br>EPSON Script | Letter Gothic Arial<br>Times New |
| <b>PcUSA</b>          | available           | available | available   | available                        |
| <b>PcMultilingual</b> | not available       | available | available   | available                        |
| <b>PcPortuguese</b>   | not available       | available | available   | available                        |
| <b>PcCanFrench</b>    | not available       | available | available   | available                        |
| <b>PcNordic</b>       | not available       | available | available   | available                        |
| <b>PcE.Europe</b>     | not available       | available | not available   | available                        |
| <b>PcTurk2</b>        | not available       | available | not available   | available                        |
| <b>PcIcelandic</b>    | not available       | available | not available   | available                        |
| <b>BpBRASCI</b>       | not available       | available | not available   | available                        |
| <b>BpAbicomp</b>      | not available       | available | not available   | available                        |
| <b>Roman-8</b>        | not available       | available | available   | available                        |
| <b>PcEur858</b>       | available           | available | available   | available                        |
| <b>ISO Latin1</b>     | not available       | available | not available   | available                        |
| <b>8859-15ISO</b>     | not available       | available | available   | available                        |
| <b>PcSI437*</b>       | not available       | available | not available   | not available                    |
| <b>PcTurk1*</b>       | not available       | available | not available   | not available                    |
| <b>8859-9 ISO*</b>    | not available       | available | not available   | not available                    |
| <b>Mazowia*</b>       | not available       | available | not available   | not available                    |
| <b>CodeMJK*</b>       | not available       | available | not available   | not available                    |
| <b>PcGk437*</b>       | not available       | available | not available   | not available                    |
| <b>PcGk851*</b>       | not available       | available | not available   | not available                    |
| <b>PcGk869*</b>       | not available       | available | not available   | not available                    |
| <b>8859-7 ISO*</b>    | not available       | available | not available   | not available                    |
| <b>PcCy855*</b>       | not available       | available | not available   | not available                    |
| <b>PcCy866*</b>       | not available       | available | not available   | not available                    |
| <b>Bulgarian*</b>     | not available       | available | not available   | not available                    |
| <b>PcUkr866*</b>      | not available       | available | not available   | not available                    |

|                     |               |           |               |               |
|---------------------|---------------|-----------|---------------|---------------|
| <b>Hebrew7*</b>     | not available | available | not available | not available |
| <b>Hebrew8*</b>     | not available | available | not available | not available |
| <b>PcHe862*</b>     | not available | available | not available | not available |
| <b>PcAr864*</b>     | not available | available | not available | not available |
| <b>PcLit771*</b>    | not available | available | not available | not available |
| <b>PcLit774*</b>    | not available | available | not available | not available |
| <b>Estonia*</b>     | not available | available | not available | not available |
| <b>ISO Latin 2*</b> | not available | available | not available | not available |
| <b>PcLat866*</b>    | not available | available | not available | not available |
| <b>PcAr864Ara*</b>  | not available | available | not available | not available |
| <b>PcAr720*</b>     | not available | available | not available | not available |

\* Available only in ESC/P2 mode.

Times New is a type face compatible with RomanT.

Letter Gothic is a type face compatible with OratorS.

Arial is a type face compatible with SansH.

### ***International character sets***

You can select one of the following international character sets using the ESC R command:

Character sets: USA, France, Germany, UK, Japan, Denmark1, Denmark2, Sweden, Italy, Spain1, Spain2, Norway, Latin America, Korea\*, Legal\*

\* Available for ESC/P 2 emulation only

### Characters available with the ESC (^ command

To print the characters in the table below, use the ESC (^ command.

| CODE | 0 | 1  | 7 |
|------|---|----|---|
| 0    |   | ▶  |   |
| 1    | ☺ | ◀  |   |
| 2    | ⊗ | ↕  |   |
| 3    | ♥ | !! |   |
| 4    | ◆ | ¶  |   |
| 5    | ♣ |    |   |
| 6    | ♠ | -  |   |
| 7    | • | ±  |   |
| 8    | ■ | ↑  |   |
| 9    | ○ | ↓  |   |
| A    | ◉ | →  |   |
| B    | ♂ | ←  |   |
| C    | ♀ | ↵  |   |
| D    | ♪ | ↔  |   |
| E    | ♫ | ▲  |   |
| F    | ♬ | ▼  | △ |

### In the I239X Emulation Mode

The available symbol sets in the I239X mode are PcUSA, PcMultilingual, PcEur858, PcPortuguese, PcCanFrench, PcNordic. See “In the ESC/P 2 or FX Modes” on page 28.

The available fonts are EPSON Sans Serif, Courier, EPSON Prestige, EPSON Gothic, EPSON Presentor, EPSON Orator, and EPSON Script.

### In the PCL6 Mode

| Symbol Set Name          | Attribute | Font Classification |    |    |    |    |
|--------------------------|-----------|---------------------|----|----|----|----|
|                          |           | *1                  | *2 | *3 | *4 | *5 |
| ISO 60: Danish/Norwegian | 4         | ○                   | -  | -  | -  | -  |
| ISO 15: Italian          | 9         | ○                   | -  | -  | -  | -  |
| ISO 8859/1 Latin 1       | 14        | ○                   | -  | -  | -  | ○  |
| ISO 11: Swedish          | 19        | ○                   | -  | -  | -  | -  |
| ISO 6: ASCII             | 21        | ○                   | -  | -  | -  | -  |
| ISO 4: United Kingdom    | 37        | ○                   | -  | -  | -  | -  |
| ISO 69: French           | 38        | ○                   | -  | -  | -  | -  |
| ISO 29: German           | 39        | ○                   | -  | -  | -  | -  |
| Legal                    | 53        | ○                   | -  | -  | -  | ○  |

|                             |       |   |   |   |   |   |
|-----------------------------|-------|---|---|---|---|---|
| ISO 8859/2 Latin 2          | 78    | ○ | - | - | - | ○ |
| ISO 17: Spanish             | 83    | ○ | - | - | - | - |
| Roman-9                     | 149   | ○ | - | - | - | - |
| Ps Math                     | 173   | ○ | - | - | - | - |
| ISO 8859/9 Latin 5          | 174   | ○ | - | - | - | ○ |
| Windows 3.1 Latin 5         | 180   | ○ | - | - | - | - |
| Microsoft Publishing        | 202   | ○ | - | - | - | - |
| ISO 8859/10 Latin 6         | 206   | ○ | - | - | - | ○ |
| DeskTop                     | 237   | ○ | - | - | - | - |
| Math-8                      | 269   | ○ | - | - | - | - |
| Roman-8                     | 277   | ○ | - | - | - | ○ |
| Windows 3.1 Latin 2         | 293   | ○ | - | - | - | - |
| Pc1004                      | 298   | ○ | - | - | - | - |
| ISO 8859/15 Latin 9         | 302   | ○ | - | - | - | - |
| PC-8 Turkish                | 308   | ○ | - | - | - | - |
| Windows 3.0 Latin 1         | 309   | ○ | - | - | - | - |
| PS Text                     | 330   | ○ | - | - | - | - |
| PC-8, Code Page 437         | 341   | ○ | - | - | - | ○ |
| PC-8, D/N, Danish/Norwegian | 373   | ○ | - | - | - | ○ |
| MC Text                     | 394   | ○ | - | - | - | - |
| PC-850, Multilingual        | 405   | ○ | - | - | - | ○ |
| PcEur858                    | 437   | ○ | - | - | - | - |
| Pi Font                     | 501   | ○ | - | - | - | - |
| PC852, Latin 2              | 565   | ○ | - | - | - | - |
| Unicode 3.0                 | 590   | ○ | - | - | - | - |
| Windows Baltic              | 620   | ○ | - | - | - | - |
| Windows 3.1 Latin/Arabic    | 629   | ○ | - | - | - | - |
| PC-755                      | 853   | ○ | - | - | - | - |
| Wingdings                   | 18540 | - | - | ○ | - | - |
| Symbol                      | 621   | - | ○ | - | - | - |
| ZapfDigrabs                 | 460   | - | - | - | ○ | - |