Implementing QR Code

Overview

QR Code is a two dimensional Bar Code that contains information about the item to which it is attached to. QR Code works in the same way as a Bar Code and can be instantly scanned by the Smartphones having QR Code scanning apps. QR Codes are very popular now days and you can see their use in daily life from paying groceries bills, restaurant bills and almost at any place, you can make payments using them. Apart from using for payments, QR Code has many other benefits attached with it as it's a small piece of code that contains vast information.

In BUSY, you can use QR Codes for specifying relevant information about the invoice. As QR Code is a small piece of code and contain detailed information hence User can scan QR Code to get substantial details about the invoice. In BUSY you can also embed QR Code in Item Bar Code. Basically while designing Item Bar Code, you can use a QR Code and include item related details in it.

In this document, we will learn how you can design, print and scan QR Code in BUSY and how you can use QR Code in Item Bar Code. First we will discuss that how you can implement QR Code in BUSY. Implementing QR Code in BUSY is a three-step process:

1. Design QR Code Format
2. Tag QR Code Format to the Invoice format
3. Print / Scan QR Code

Design QR Code Format

QR Code Format first needs to be created and configured in BUSY. The format you will create for QR Code will contain all the details that you want to imbibe in the QR code i.e. all the details you want to read and scan from QR Code. For example, you want to include Party GSTIN, Party Address and Total Billed Amount in the QR Code then first you need to include all these fields in the QR Code format. To create a format for the QR Code, click *Administration → Configuration → Invoice / Document Printing → Advanced* option. Next, select the Voucher Type; here we are selecting *Sales Invoice* option as we are designing this format to be used in Sales Invoice. Click the *Add Format* button and specify a name for the format. Given below is a screenshot of *Document Configuration (Advanced)* window showing creation of a new format.
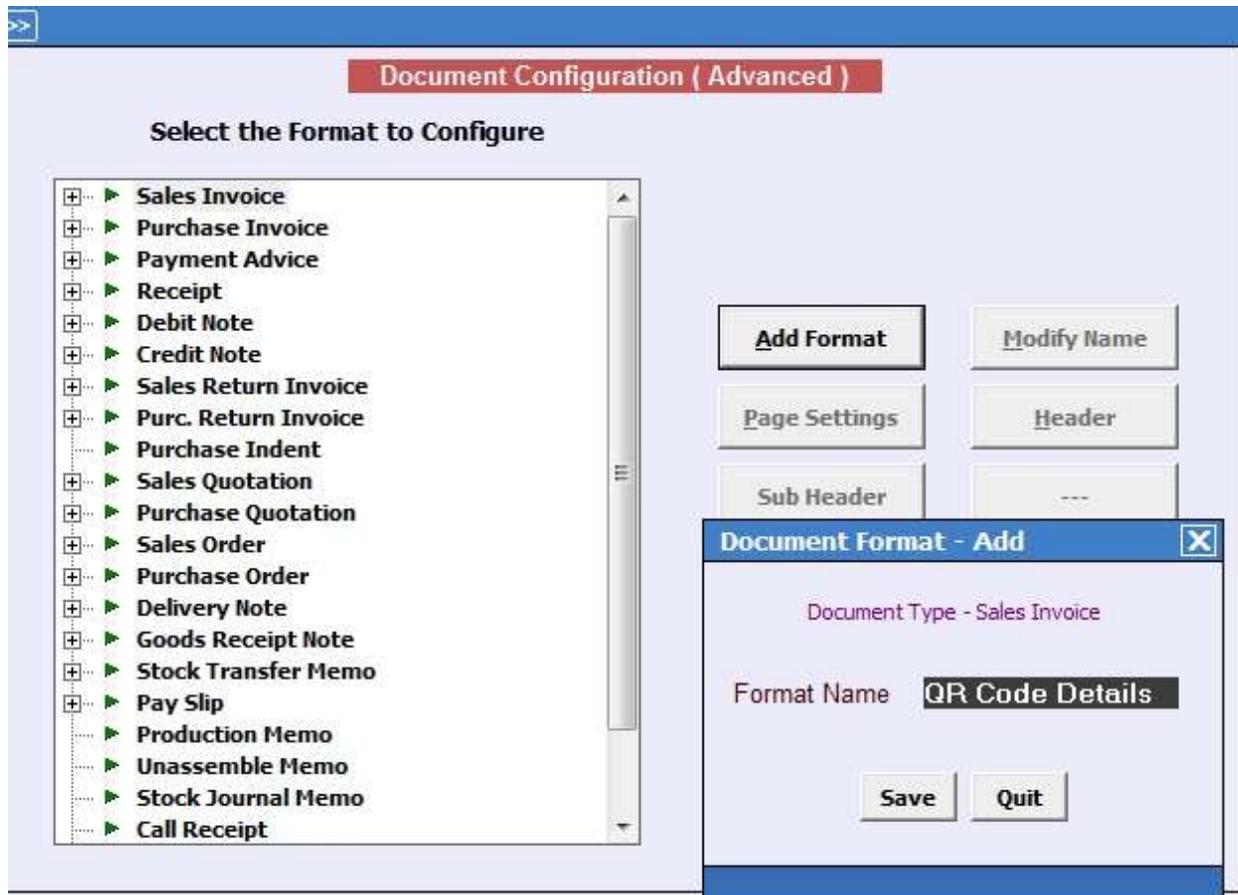
Once the format is created for QR Code, next you need to select the format and specify different fields to be used in the format i.e. the invoice details you want to read and scan from the QR Code. On selecting the format, click the *Header* button provided at the right hand side of the window. On clicking the *Header* button, a *Configure Sales Invoice (Header)* window will appear in which you can design the format.

To design the format, press the **Alt + F4** key or click the **Fields Available** button on the screen. A list displaying available fields will appear on screen and you can select the fields that you want to include in the QR Code. For example, you want Company GSTIN, Party GSTIN, Party Address, Voucher / Bill number & Date and Amount Grand Total to be included in the QR Code then you will select all these fields from the list. Given below is a screenshot of *Configure Sales Invoice (Header)* window displaying all the fields included in QR Code format.
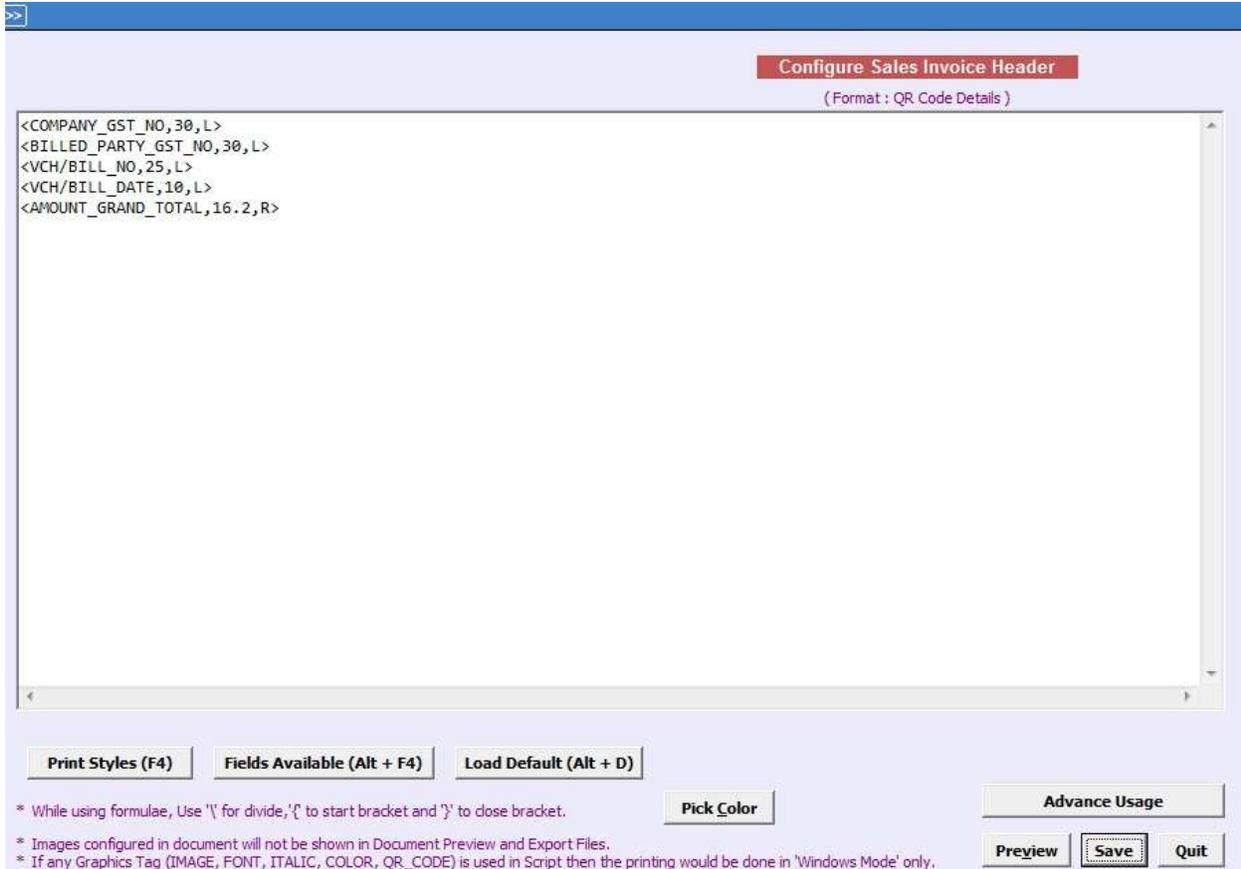
Now you are done with the process of creating format for specifying QR Code details and will move to next step of using this QR Code format in the format in which invoice is to be printed. Please note that these are two totally different concepts, first is designing format for QR Code and second is tagging this QR format in Invoice format. Designing QR Code format and then simply using it for printing invoice will not serve any purpose. You must tag QR Code format that you have designed to the format in which you are already printing your invoice in order to make QR Code a part of your actual invoices.

Tagging QR Code Format to Invoice Format

Tagging QR Code format that you have just designed to the existing Invoice format you are using for printing of invoice is a very simple process. Click *Administration* → *Configuration* → *Invoice / Document Printing* → *Advance* option. Select the *Sales Invoice* option and then select the already created format you are using for invoice printing. Suppose you are currently printing your invoice in *Sales Bill* format then you will select the *Sales Bill* format and click the *Header* button. On clicking the *Header* button, a *Configure Sales Invoice (Header)* window will appear. Click the **Print Styles** button or press the **F4** key and you can see list of Print Styles appearing on the right hand side. The list will display a tag name **QR Code**. Given below is a

screenshot of *Configure Sales Invoice (Header)* window displaying QR Code tag in the list of Print Styles.
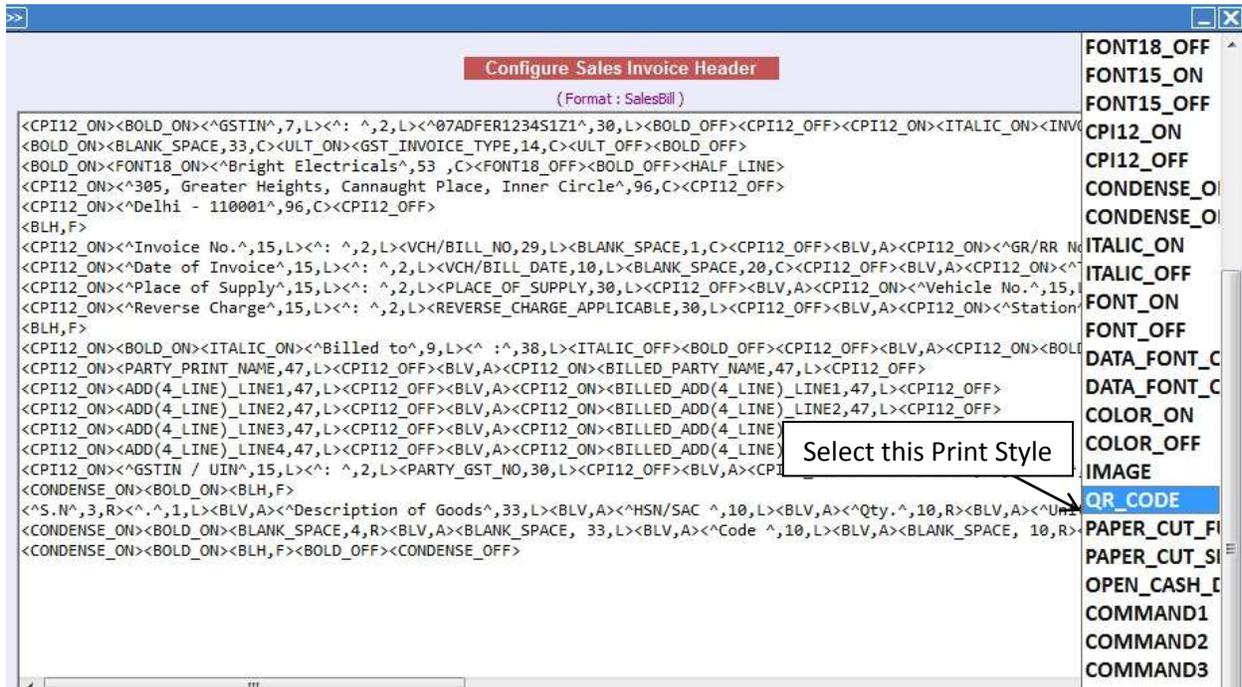
Place the cursor in the document at a place where you want to insert the QR Code tag and select the QR Code tag. In the QR Code tag, you need to specify the QR Code format name that you have designed using Step1.
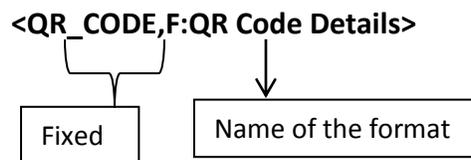
<QR_CODE,F:FORMAT NAME>

| Fixed | Specify the invoice format in which QR Code details have been specified |

Hence the tag will look like:

<QR_CODE,F:QR Code Details>

| Fixed | Name of the format |

Given below is a screenshot of *Configure Sales Invoice (Header)* window displaying the QR Code Print Style with format name specified in it.

(Format : SalesBill)

Print Style i.e. tag used for printing QR Code

F: is used for adding format name designed for QR Code
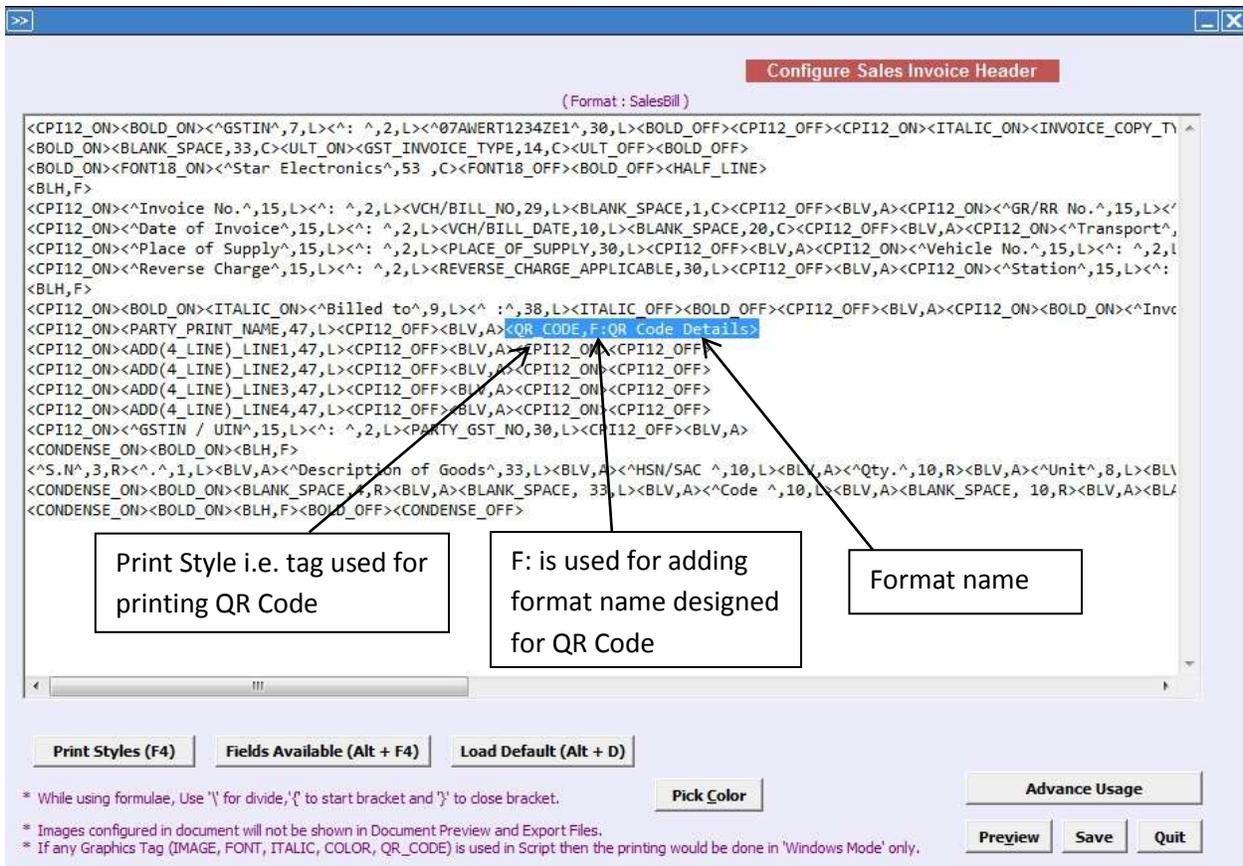
Format name

Here an important point to note is that if you want to generate QR Code for some fixed plain text then instead of designing format for QR Code, simply add QR Code Print Style in the Invoice format you are already using and in place of format name specify the plain text in it with **T:** as prefix i.e. instead of **F:**, you will write **T:**. For example, you want QR Code to be generated only for your Company's website URL then you can write website URL in the QR Code Print Style and the tag will look like **<QR_CODE,T:www.busy.in>** where www.busy.in is the website URL and **T:** symbolizes that it is a plain text and not a format name. Now whenever the QR Code will be scanned, www.busy.in will get displayed. This implies that in QR Code Print Style, if **F:** is added then succeeding text will be treated as format name and if **T**: is added then succeeding text will be treated as plain text.

Given here is a screenshot of *Configure Sales Invoice (Header)* window displaying the QR Code Print Style for generating QR Code for static text.

Click *Save* button to save the format and now you are ready to print the QR Code in the invoice.

Printing / Scanning QR Code

To print QR Code in the Invoice, you must select the format in which you have tagged the QR Code format and not the QR Code format that you have designed. This basically implies that you will use the format you are already using for printing invoice and now you have just added QR Code tag in that format also. To print an invoice, we will open a Sales transaction in *Modify* mode and click the *Print* button. Now we will select the Invoice format. Given below is a screenshot displaying various invoice formats.
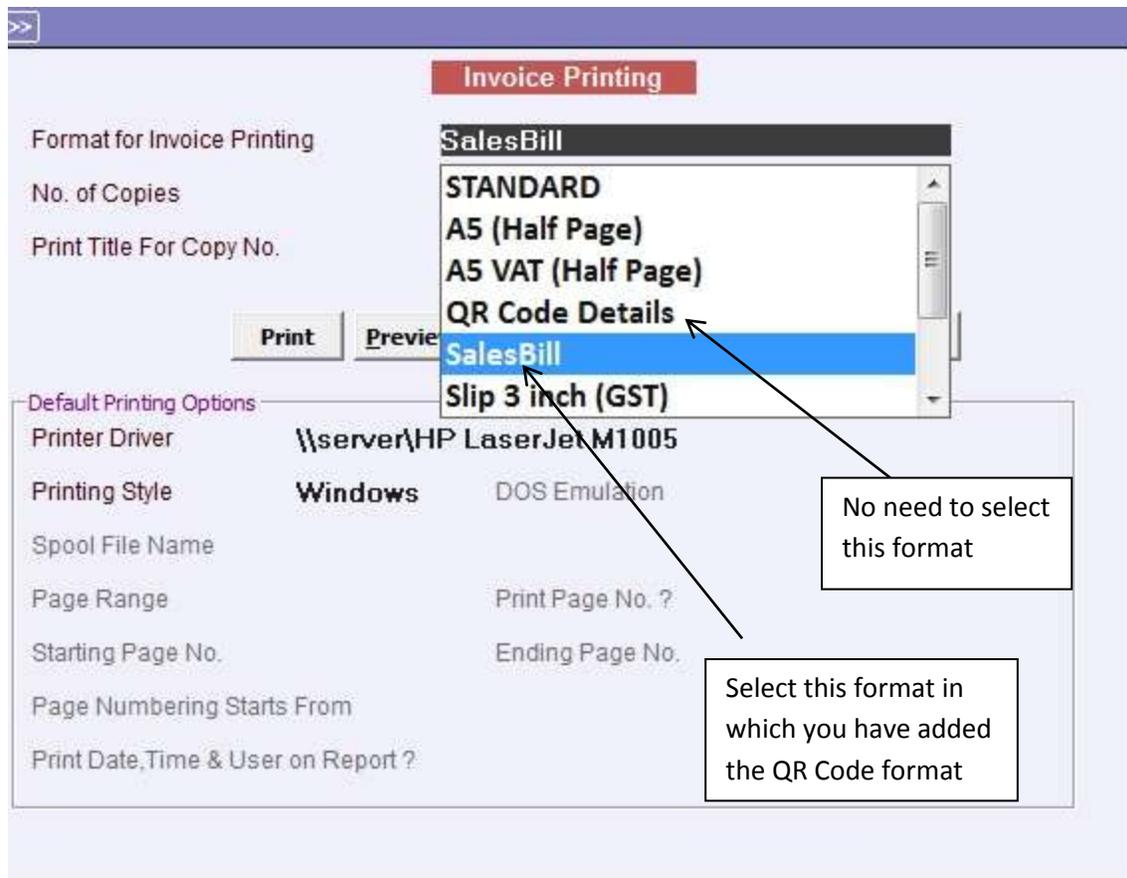
Select the required invoice format and click the *Print* button. Here we are exporting the file to PDF format hence clicking the *Export* button and then *pdf* option. You can now see the preview of the QR code printed in the invoice. Given below is a screenshot of the preview of the Invoice with QR Code.

To scan the QR Code from the invoice, you can use any QR Code Scanning app from your phone and all the details as contained in QR Code will be displayed on your Mobile screen. As we have added Company GSTIN, Party GSTIN, Voucher Number, Voucher Date and Grand Total hence all these details will be displayed on your Mobile screen.

The above screenshot shows the QR Code generated for the QR Code format we have added in the Invoice format. Now we will have a look at the preview of the QR Code printed in invoice for static text.

Now when you scan this QR Code www.busy.in will be scanned as we have mentioned this as static text in the QR Code Print Style.

Adding QR Code in Item Bar Code

Apart from printing and scanning QR Code in invoices, you can also include QR Code in the Item Bar Code label. Adding QR Code to the label provides better readability while scanning and is more popular means now a day as it can be scanned using any QR Code scanning app. To include QR Code in Item Bar Code, click *Item Bar-code Printing Add*-on and select the *Configure Bar-Code Labels* option. On selecting this option, a *Select Format for Bar Code Configuration* window appears in which you can either create a new format or can select a format you are already using. To create a new format, click *Add Format* button and specify name of the format. This will create a new format. Given below is a screenshot of *Select Format for Bar-Code Configuration* window.

BUSY
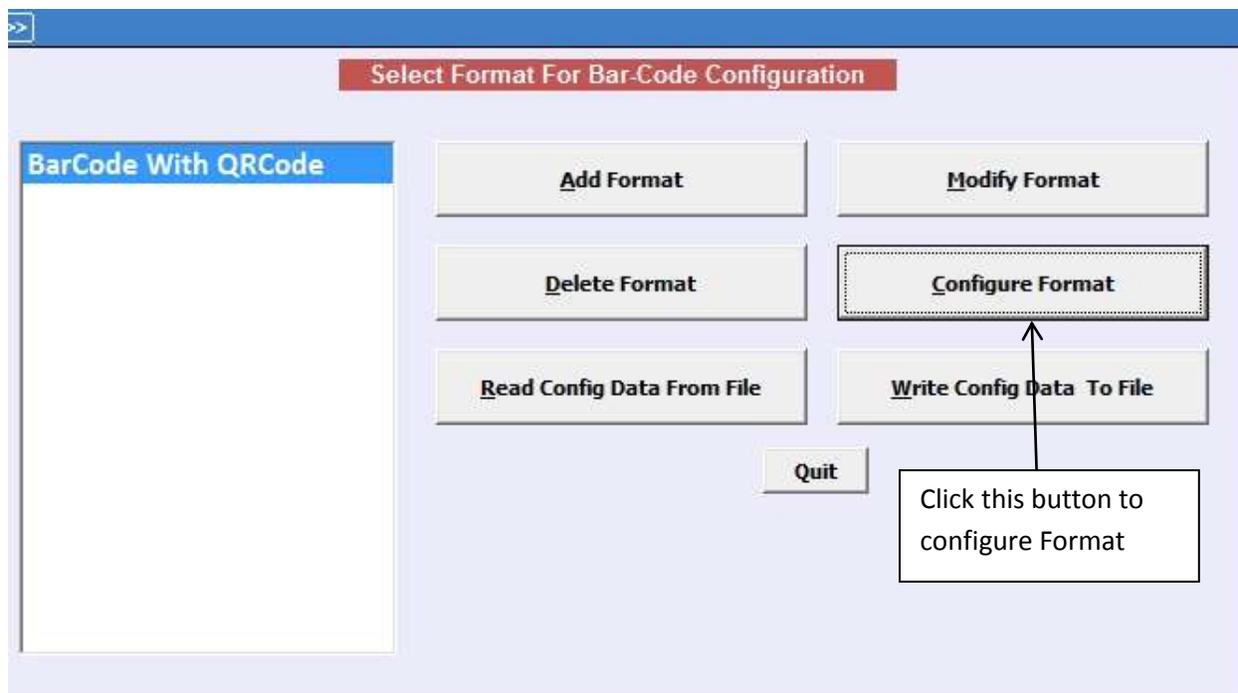
Now select the format and click *Configure Format* button. On clicking the *Configure Format* button, a *Bar Code Sheet Configuration* window will appear. Given here is a screenshot of *Bar Code Sheet Configuration* window.

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Bar- Code Sheet Configuration for Format- 'BarCode With QRCode'.

Pick Bar-Code Values From

○ Busy Data   ○ Excel Sheet

Select Format Type

Bar-Code Type	Item Only
Bar-Code Structure	
Select Sheet Type	Custom
Select Sheet for Printing	
Select Scale Mode for Printing	Millimeter

Print Settings

Set Printer Configuration	N	
Printer Driver		
Printing Style		
DOS Emulation		
Select Paper Type	Cut Sheet	
No. of Labels in one Row	4	
No. of Rows in one Page	10	
Top Margin (Page)	12.700	(mm)
Left Margin (Page)	0.000	(mm)

Click this button to configure Bar Code label

Label Settings

|		
Label Height	25.400	(mm)
Label Width	50.800	(mm)
Horizontal Gap Between labels	0.000	(mm)
Vertical Gap Between labels	0.000	(mm)

Configure Label

Save

Quit

In the window, click the *Configure Label* button. On clicking the *Configure Label* button, a *Bar-Code Label* window appears. Given below is a screenshot of *Bar-Code Label* window.
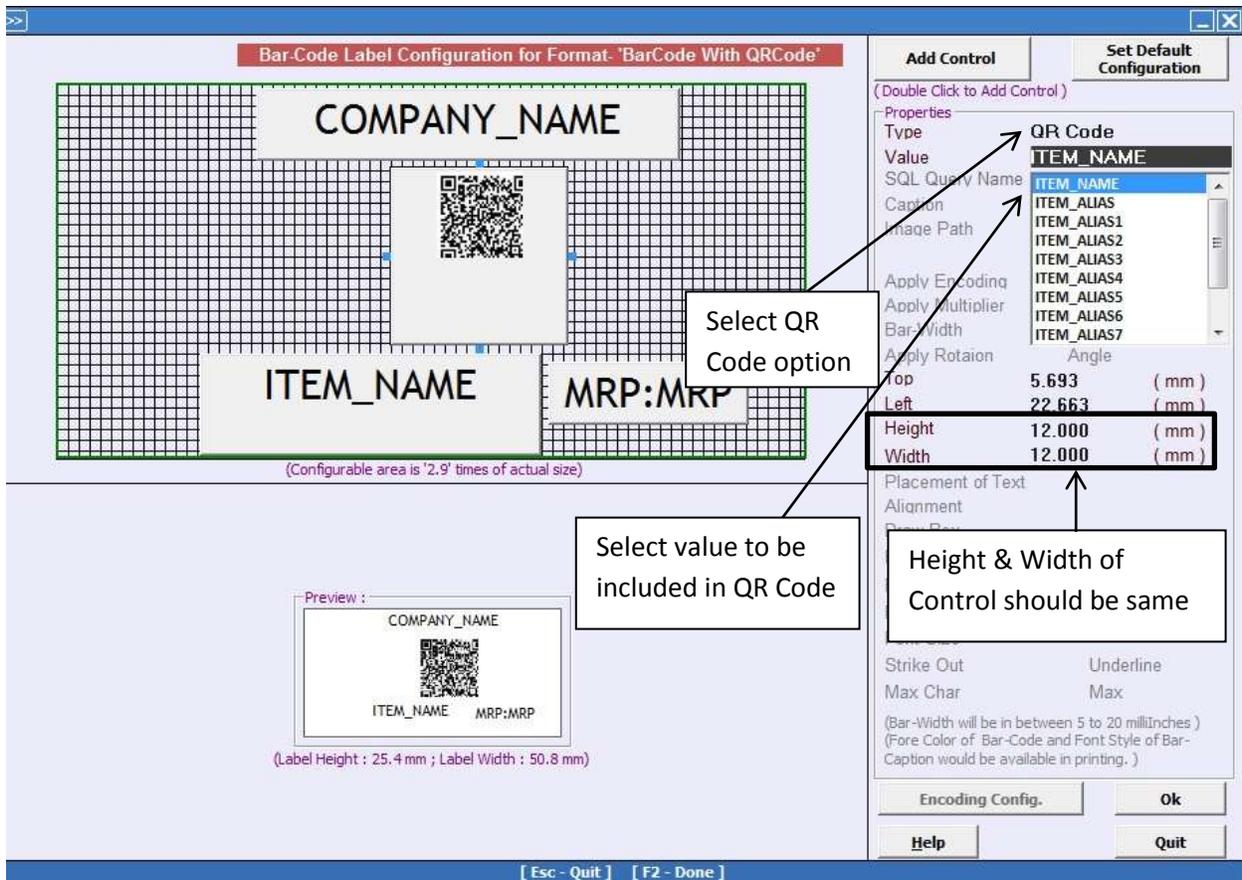
In the window, first double click the *Add Control* button to add a control to the form and drag & drop that control to the desired place in the form. An important point to note here is that height & width of the control should be same because usually QR Codes are square in shape and it will ease in scanning the QR Code from QR Code scanning apps.

Next in the *Data Type* field, select the *QR Code* option and then in the *Value* field, select the required data field i.e. the value that you want to embed in the QR Code.

Click *Ok* button to save the format. Now whenever you will print the Bar-Code labels, QR Code will be printed in the Bar-Code label and you can scan them using any QR code scanning apps. Given below is a preview of QR Code printed in the Item Bar-Code Label while printing Item Bar –codes from Item master.
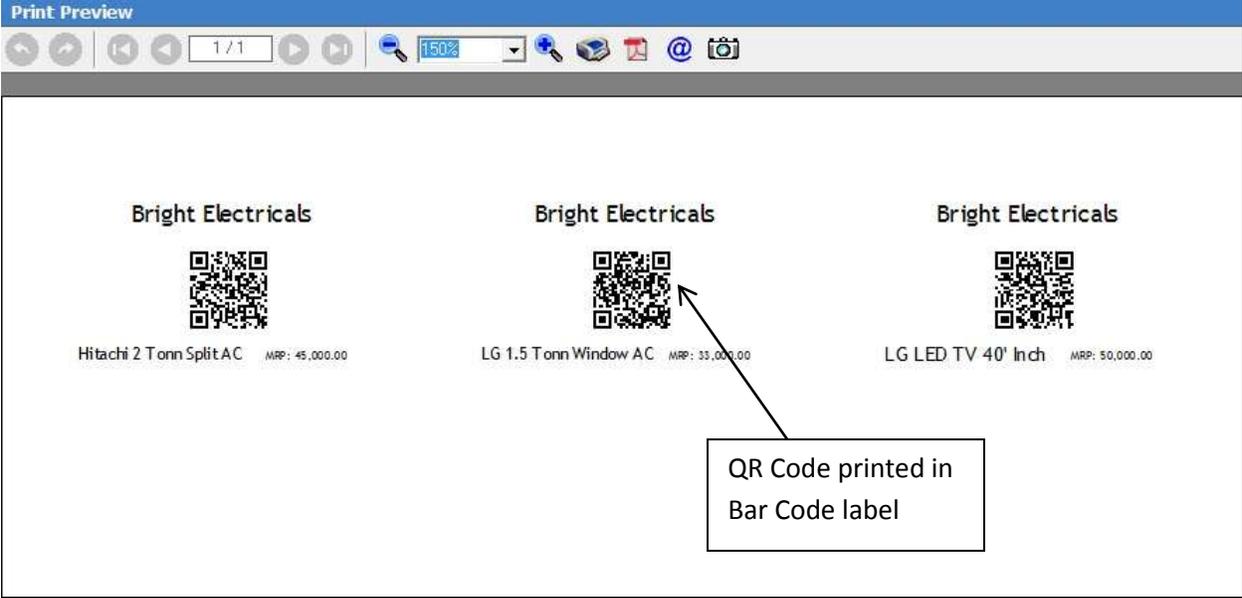
With this we have completed the process of implementing QR Code in BUSY.

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