



Summary of Printer Firmware Changes

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V 8.10 (EZD)

System

- * Fix plugging in issue for Ethernet interface
- * Add restart function after printer crash
- * Fix printer printing mileage issue

ZPL emulator

- * Fix max. limit to 999999 for ^GF binary byte count & graphic field count

V 8.04

ZPL emulator

- * Fix XML printing issues

EPL emulator

- * Add EPL1

V 8.03

TSPL2

- * Fix Print x,y issue for SET ERROR_PUTBMP command
- * Add GETSETTING\$("CONFIG","BT","MAC ADDRESS") for external BT module
- * Add daylight saving time
- * Add RECORDSET command

ZPL emulator

- * Fix Code128 Invocation Code:"<>" issue
- * Filter out ">" character for ^BQ command

EPL emulator

- * Fix data return issue for ^ee command
- * Modify item a of Ver 8.02.h2 again
- * Set the default to 1 for Barcode origin point of PDF417
- * Set vertically centered for PDF417
- * Add a scaling ratio 3 between row and column when truncated flag = 1 for PDF417

V 8.02

TSPL2

- * Add SET ERROR_PUTBMP x,y,"filename"[,bpp][,contract]
- * Add SET ERROR_BMP_POSITION x,y

EPL emulator

- * Fix 2D Bar Code Binary data issue

V 8.01

TSPL2

- * Add SET RS232_REWINDER RASING/FALLING/OFF
- * Fix DATA MARTIX with ASCII & BASE64
- * Fix SET RS232_REWINDER "RASING"
- * Add DATAMATRIX rectangular coding
DMATRIX x,y,width,height,[c#,x#,r#,a#,row,col,]"content"
- * Fix SET RS232_REWINDER
- * Fix <ESC>!. On "SET PRINTKEY ON" mode

ZPL emulator

- * Add TCF ZPL CHARACTERSET
- * Fix ^DF end of judgment error
- * Fix xml second page cannot print issue
- * Fix QRcode printing position issue

EPL emulator

- * Fix <ESC>K command, support Asian fonts K1,K2,K3,K4,K5,K6,K8,K9,KA,KB,KD
- * Fix Px,y , "y" issue

V 8.00

If you would like to update the firmware V8.00 EZ for the printer, please note that:

- 1. Your data in the printer's FLASH memory will be cleared out after updating V8.00 EZ from the version which is older than V6.95EZ (not include).**
- 2. If you use USB interface, you will need to install the driver again after updating this firmware from the version which is older than V6.95 EZ (not include).**

TSPL2

- * Fix Denmark keyboard capital/small letter issue
- * Support Codepage:
 - PC-850
 - CP1250 - Latin 2 (Central Europe)
 - CP1251 - Cyrillic
 - CP1252 - Latin 1 (Western Europe)
 - CP1253 - Greek
 - CP1254 - Latin 5 (Turkish)
 - CP1255 – Hebrew
- * Modify replace command string failed issue
- * Fix Data Matrix shut down issue
- * Add LABELRATIO command

EPL emulator

- * Fix ImageBuffer issue

ZPL emulator

- * Fix ^PQ & ^PP conflict issue
- * Remove UTF8 for #define IS_BIDI_TYPE (AgfaText.c)→ Solve Arabic printing issue

SBPL emulator

- * Add built-in X20 ~ X24 Bitmap font

- * Modify EZS File system flash address form 0x160000 to 0x1A0000, add 256Kbyte code buffer

System

- * Support French LCD display for TTP-225/TTP-323 series
- * Fix Ethernet delay bug
- * Modify Ribbon THRESHOLD for TTP243Pro/TTP342Pro series

V 7.09

If you would like to update the firmware V7.09 EZ for the printer, please note that:

- 1. Your data in the printer's FLASH memory will be cleared out after updating V7.09 EZ from the version which is older than V6.95EZ (not include).**
- 2. If you use USB interface, you will need to install the driver again after updating this firmware from the version which is older than V6.95 EZ (not include).**

TSPL2

- * Disable Imm-commands when parser the Bitmap command
- * Add SET RESPONSE ON/OFF/BATCH
- * Support Denmark keyboard
- * Add UPCE1 Barcode

EPL emulator

- * Modify Thai-font printing issue
- * Modify GW bitmap command issue
- * Modify LINE Shift issue (when X < 0)
- * Modify EAN128 issue (when ratio <= 2; 90° & 270°)
- * Modify UTF16 LITTLE END & BIG END printing problem
- * Add ^FWr,z command (z justification)

DPL emulator

- * Modify SOH D SOH B SOH C issue
- * Modify serial printing 270° barcode issue

V 7.08

If you would like to update the firmware V7.08 EZ for the printer, please note that:

- 3. Your data in the printer's FLASH memory will be cleared out after updating V7.08 EZ from the version which is older than V6.95EZ (not include).**
- 4. If you use USB interface, you will need to install the driver again after updating this firmware from the version which is older than V6.95 EZ (not include).**

System

- * Fix the issue for Code16K barcode
- * Disable the line mode power-on utility function
- * Add the Serbian language shown on LCD for TTP-2410M series

TSPL2

- * Fix the issue for Code93 ascii '-' character
- * Modify the SET VERIFIER command
- * Fix the issue that "@" global variable can't be set
- * Fix the issue for LOB() command
- * Add PUTBMP command to support .GRF format
- * Fix the issue for daylight saving time
- * Fix the @MONTH, @DATE, @HOUR, @MINUTE, @SECOND commands to support two-digit format

ZPL2 emulator

- * Fix the issue for Datamatrix ECC200
- * Add MXML command
- * Add ~JE command (exit dump mode)
- * Add ~JR command (power-on reset)
- * Fix the ~DB character code
- * Fix the issue that ~DB command & FontMulit Height isn't correct

EPL2 emulator

- * Fix the TD command
- * Fix the issue that code128 decode the FUN1~FUN4 isn't correct
- * Fix the DataMatrix 2D Barcode
- * Ignore it if all the bytes are 0x20

V 7.06

If you would like to update the firmware V7.06 EZ for the printer, please note that:

- 5. Your data in the printer's FLASH memory will be cleared out after updating V7.06 EZ from the version which is older than V6.95EZ (not include).**
- 6. If you use USB interface, you will need to install the driver again after updating this firmware from the version which is older than V6.95 EZ (not include).**

System

- *The LPR command supports TSPL immediate commands, but there is no any feedback message.
- * Retrieve the information of the SNMP mileage, label mileage & printer status from the SNMP protocol (mib: 1.3.6.1.4.1.51966.2.6.3.3311.1~3)
- * As long as the ribbon encoder sensor detects ribbons, the ribbon end sensor will be enabled automatically for TTP268M and TTP366M.
- * Fix the issue that the rewinder of the TTP-366M will stop working when printing a long label.
- * Read the ribbon flag and change the unit of mileage from mm to cm from the SNMP protocol.
- * Add the print speed of 1 IPS for the TTP-644M.
- * Fix the deadlock problem for the Datamatrix encoding.
- * Diagnostic Tool supports the reading of the current IP, Mask, Gateway addresses for the external WiFi module.
- * Fix the Polish characters shown on LCD problem.
- * Add the feature of the auto sensor calibration in the functional page of the Web-interface.
- * Increase the file name length of the flash and ram systems from 15 to 32 characters.
- * Disable the D-cache for the TTP-366M and TTP-268M.
- * Fix the Central Europe fonts shown on LCD issue.
- * Fix the issue for QR Code and Datamatrix when the image size is larger than 60K. (Increased to 192K.)
- * Enable SD Card power save mode for TTP-268M and TTP-384M series.

TSPL2

- *Add the extra parameters for the SET RIBBON_I command to modify the silver ribbon reference.
- * Add the FORMAT\$(Number,"###.##") command.
- * Fix the issue for the INPUT FILTER command when the filtered string is part of the contents.
- * Fix the issue when the name of a BAS file is beginning with TT and TD.

ZPL2 emulator

- * Modify the Maxicode to ignore ',' in U.S. Style Postal Code parameter.
- * Increase the file name length of ZPL system from 8 to 32 characters.
- * Fix the issue for the ~DG command when the download file width is larger than TPH width, there will be an error for the download data.
- * Fix the issue for the FB function when the content is only one line.

EPL2 emulator

- * For a Maxicode, if there is no class code, set the class code to 0.
- * For a Datamatrix, if the 'r' parameter is used before the 'c' parameter, it will be ignored.

- * EPL expression will be finished when there is a space, tab, CR or LF.
- * Ignore the spaces in the front of the number as a parameter.

V 7.05

If you would like to update the firmware V7.05 EZ for the printer, please note that:

- 7. Your data in the printer's FLASH memory will be cleared out after updating V7.05 EZ from the version which is older than V6.95EZ (not include).**
- 8. If you use USB interface, you will need to install the driver again after updating this firmware from the version which is older than V6.95 EZ (not include).**

System

- *The LPR command supports TSPL immediate commands, but there is no any feedback message.
- * Retrieve the information of the SNMP mileage, label mileage & printer status from the SNMP protocol (mib: 1.3.6.1.4.1.51966.2.6.3.3311.1~3)
- * As long as the ribbon encoder sensor detects ribbons, the ribbon end sensor will be enabled automatically for TTP268M and TTP366M.
- * Fix the issue that the rewinder of the TTP-366M will stop working when printing a long label.
- * Read the ribbon flag and change the unit of mileage from mm to cm from the SNMP protocol.
- * Add the print speed of 1 IPS for the TTP-644M.
- * Fix the deadlock problem for the Datamatrix encoding.
- * Diagnostic Tool supports the reading of the current IP, Mask, Gateway addresses for the external WiFi module.
- * Fix the Polish characters shown on LCD problem.
- * Add the feature of the auto sensor calibration in the functional page of the Web-interface.
- * Increase the file name length of the flash and ram systems from 15 to 32 characters.
- * Disable the D-cache for the TTP-366M and TTP-268M.
- * Fix the Central Europe fonts shown on LCD issue.
- * Fix the issue for QR Code and Datamatrix when the image size is larger than 60K. (Increased to 192K.)

TSPL2

- *Add the extra parameters for the SET RIBBON_I command to modify the silver ribbon reference.
- * Add the FORMAT\$(Number,"###.##") command.
- * Fix the issue for the INPUT FILTER command when the filtered string is part of the contents.
- * Fix the issue when the name of a BAS file is beginning with TT and TD.

ZPL2 emulator

- * Modify the Maxicode to ignore ',' in U.S. Style Postal Code parameter.

- * Increase the file name length of ZPL system from 8 to 32 characters.
- * Fix the issue for the ~DG command when the download file width is larger than TPH width, there will be an error for the download data.
- * Fix the issue for the FB function when the content is only one line.

EPL2 emulator

- * For a Maxicode, if there is no class code, set the class code to 0.
- * For a Datamatrix, if the 'r' parameter is used before the 'c' parameter, it will be ignored.
- * EPL expression will be finished when there is a space, tab, CR or LF.
- * Ignore the spaces in the front of the number as a parameter.

V 7.04

If you would like to update the firmware V7.04 EZ for the printer, please note that:

- 9. Your data in the printer's FLASH memory will be cleared out after updating V7.04 EZ from the version which is older than V6.95EZ (not include).**
- 10. If you use USB interface, you will need to install the driver again after updating this firmware from the version which is older than V6.95 EZ (not include).**

System

- *The LPR command supports TSPL immediate commands, but there is no any feedback message.
- * Retrieve the information of the SNMP mileage, label mileage & printer status from the SNMP protocol (mib: 1.3.6.1.4.1.51966.2.6.3.3311.1~3)
- * As long as the ribbon encoder sensor detects ribbons, the ribbon end sensor will be enabled automatically for TTP268M and TTP366M.
- * Fix the issue that the rewinder of the TTP-366M will stop working when printing a long label.
- * Read the ribbon flag and change the unit of mileage from mm to cm from the SNMP protocol.
- * Add the print speed of 1 IPS for the TTP-644M.
- * Fix the deadlock problem for the Datamatrix encoding.
- * Diagnostic Tool supports the reading of the current IP, Mask, Gateway addresses for the external WiFi module.
- * Fix the Polish characters shown on LCD problem.
- * Add the feature of the auto sensor calibration in the functional page of the Web-interface.
- * Increase the file name length of the flash and ram systems from 15 to 32 characters.
- * Disable the D-cache for the TTP-366M and TTP-268M.
- * Fix the Central Europe fonts shown on LCD issue.
- * Fix the issue for QR Code and Datamatrix when the image size is larger than 60K. (Increased to 192K.)

TSPL2

- * Add the extra parameters for the SET RIBBON_I command to modify the silver ribbon reference.
- * Add the FORMAT\$(Number,"###.##") command.
- * Fix the issue for the INPUT FILTER command when the filtered string is part of the contents.
- * Fix the issue when the name of a BAS file is beginning with TT and TD.

ZPL2 emulator

- * Modify the Maxicode to ignore ',' in U.S. Style Postal Code parameter.
- * Increase the file name length of ZPL system from 8 to 32 characters.
- * Fix the issue for the ~DG command when the download file width is larger than TPH width, there will be an error for the download data.
- * Fix the issue for the FB function when the content is only one line.

EPL2 emulator

- * For a Maxicode, if there is no class code, set the class code to 0.
- * For a Datamatrix, if the 'r' parameter is used before the 'c' parameter, it will be ignored.
- * EPL expression will be finished when there is a space, tab, CR or LF.
- * Ignore the spaces in the front of the number as a parameter.

V 7.00

If you would like to update the firmware V7.00 EZ for the printer, please note that:

- 1. Your data in the printer's FLASH memory will be cleared out after updating V7.00 EZ from the version which is older than V6.95EZ (not include).**
- 2. If you use USB interface, you will need to install the driver again after updating this firmware from the version which is older than V6.95EZ (not include).**

TSPL2

- * Modified DMATRIX (DataMatrix) command to support rotation 0, 90, 180, and 270 degree.
- * Modified DMATRIX (DataMatrix) command for GS1 rule.
- * Modified BITMAP command to support gray-scale graphic printing.
- * Modified INPUT command which didn't work fine in TTP-225 LCD model with USB keyboard.
- * Added new command <ESC>!F to feed an empty label just like pressing FEED button.
- * Added new command <ESC>!. to cancel all print jobs in printer's buffer.
- * Added optional parameters in command LIMITFEED for simplifying sensor calibration of preprinted

label.

- * Supported CODEPAGE 864 (Arabic).
- * Fixed the return value of global RTC variables DAY and WEEK.

EPL2 emulator

- * Modified oR command for printing Euro sign.
- * Modified the height of barcode EAN 13 and EAN 8.

ZPL2 emulator

- * Modified the internal fonts to support Windows codepage 125x.
- * Modified the human readable characters of barcode ^BC (UCC/EAN 128) which can auto adjust the position by barcode width.
- * Modified if ^A@ was not specified the font name, it will use font which was specified by ^CF.
- * Modified (enlarged) the width of dash (-) symbol.
- * Modified ^BQ (QR code) to support binary mode.
- * Supported ^MMD and ~JK commands.
- * Supported ~JA to cancel all print jobs in printer's buffer.
- * Fine tune the vertical printing position of Font 0.

Network

- * Modified the ping loss and packet loss issues.
- * Modified NET NAME command. If the name is not changed, the printer will not restart itself.
- * Supported FTP file system mode.

LCD display

- * For industrial printers, a **Reprint** mode was added into ZPL2 setting menu. Once it is enabled, the <UP> key can be used for reprinting the last label.

Others

- * Modified SELFTEST page from 4" to 2" width.
- * Supported UTF-16 data format.

- * Supported External Wi-Fi module. (Please use DiagTool V1.54)
- * Supported External Bluetooth module. (Please use DiagTool V1.54)*

V 6.95

If you would like to update the firmware V6.95 EZ for the printer, please note that:

- 11. Your data in the printer's FLASH memory will be cleared out after updating V6.95 EZ from the older version.**
- 12. If you use USB interface, you will need to install the driver again after updating this firmware V6.95 EZ.**

TSPL2

- * Added barcode CODABLOCK (Codablock F only).
- * Added barcode DPI (Deutsche Post Identcode) and DPL (Deutsche Post Leitcode).
- * Added barcode LOGMARS which symbol is the same as CODE 39.
- * Added barcode TELEPEN (Telepen), TELEPENN (Telepen number), PLANET (Planet) and CODE49 (Code 49).
- * Added barcode TLC39 to support TCIF Linked Bar Code 3 of 9
- * Added CODEPAGE 857(Turkish) and 8859-7(Greek)
- * Added CODEPAGE 861, 855, 866, 737, 851 and 869.
- * Added command BLOCK.
- * Added command DATEADD (interval\$, number, date) to convert the new date/time.
- * Added command ELLISE to draw the oval.
- * Added command GET to read the data with one byte.
- * Added command INP(number) to receive 1-byte data from communication interface.
- * Added command PUT to write 1-byte date into file.
- * Added command SELFTEST PATTERN to print the print head test pattern.
- * Added command SET BLINE REVERSE/OBVERSE to reverse/obvert the function of black mark sensor.
- * Added command SET RIBBONEND ON/OFF to enable/disable the ribbon end sensor.
- * Added command SET VERIFIER
- * Added command VERIFYTRIGGER for barcode verifier usage.
- * Added condition FAULT VERIFIER in command SET GPO.
- * Added global variable NOW to return the real time.
- * Added internal Baltic bitmap font.
- * Added parameters for command OUT to return message from the specific interface. (OUT PORT "Data", PORT can be set for COM, NET and USB).
- * Fixed AZTEC command to support data with specific length.
- * Fixed BITMAP command to support grayscale printing. (For direct thermal printing mode only)

- * Fixed INPUT FILTER command to support empty string.
- * Fixed multiplication factor of TEXT command to support float data type.
- * Fixed SIZE command issue. If the setting of label width is larger than the width of print head, the label width will be the same as print head.
- * Fixed the issue of accuracy when converting float data.
- * Fixed the issue of conditional command IF.
- * Fixed the issue of the BITMAP image if it is over the label size.
- * Fixed the rule of EAN14 generation.
- * For SET VERIFIER, the printer sends ETX out when verification is finished.
- * When command error happens, printer returns syntax error message to PC via RS232 only.

EPL2 emulator

- * Fixed MAXICODD to support AIM ITS mode in mode2 and mode3.
- * Fixed PDF417, DataMatrix, and AZTEC to support variable command V.
- * Fixed the counter command C to support +-* / operations.
- * Fixed the issue of human readable in Code 128 UCC serial shipping container code.
- * Fixed the relationship between variables V and RTC.
- * Fixed the rule of barcode generation in command B.
- * Fixed the rule of CODE30 generation in command B when printing it in 90 and 180 degree.
- * Revised the internal bitmap fonts (FONT1 to FONT5).

ZPL2 emulator

- * Added ^BL command
- * Added ^FC command
- * Added ^GE command
- * Added ^MU command
- * Fixed ^BZ to support postal code type 3 (USPS Intelligent Mail bar code).
- * Fixed ^FB issue when printing it in 90 and 180 degrees.
- * Fixed ^FN to support 100 filed numbers.
- * Fixed ^FT issue when printing internal TTF font 0.
- * Fixed ^PQ to support the parameter p (labels between pauses).
- * Fixed ~SD## and ~TA### formats.
- * Fixed rule of ^FB when it includes spaces.
- * Fixed the decoding rule of ^CI14.
- * Fixed the font type of human readable characters in UPC/EAN.
- * Fixed the issue, the last command line will be ignored, when running *.ZPL format.
- * Fixed the rule of ^BX generation. If parameter h hasn't been set in ^BX, it uses the setting of ^BY instead.

- * Fixed the rule of ^GF. The parameter "binary byte count" can be omitted.
- * Fixed the rule of code128 generation in auto mode.
- * Fixed the rule of RSS14 barcode generation.
- * Fixed the rule when using fonts P, Q, R, S, T, U and V.
- * Fixed the size of human readable characters in barcode ^BS (UPC/EAN).
- * If the value of parameter is discontinuous in ZPL command, the discontinuous part will be ignored.
- * If the value of parameter is with space in ZPL command, the space will be ignored.
- * If the wrong font name has been used in ZPL, printer uses A.FNT instead.
- * Redefined the escape sequence control character from underscore '_' to tilde '~' in barcode ^BX (DataMatrix).

Network

- * Added NET MODE SPEED,DUPLEX to change the communication rate and multiplexer mode. SPEED = 10/100/AUTO, DUPLEX = FULL/HALF
- * Fixed the lease time issue.
- * Fixed the network FTP server to support ftp -n printing

Power-on utility

- * Added power on key function, manual sensor calibration to support PREPRINTED label
[MENU] + [UP] for preprinted label with gap.
[MENU] + [DOWN] for preprinted label with black mark.
[MENU] + [SELECT] for continuous preprinted label.
- * Added the function to initialize the Ethernet setting while opening top cover. (For desk series printer)
- * Added the function to switch line mode and page mode while opening top cover. (For desk series printer)

USB communication

- * Enable USB serial number function. (The feature may cause PC to install a copy-1 driver if a driver has been installed already.)
- * Improve the USB communication issue, especially user turns on PC while printer is in on-line mode.

LCD display

- * Revised Russian menu in LCD display.
- * Added Czech menu in LCD display.
- * Added Portuguese menu in LCD display.
- * Added the "Format Convert" item in ZPL2 LCD menu for converting the resolution.
- * Added the date/time setting item in LCD menu.
- * Added the function to cancel print jobs in PAUSE mode. (For industrial series printer)

Others

- * Canceled the function of head open sensor in TTP-244M Pro/342M Pro series printer.
- * Canceled the function to add FNC1 into EAN128 barcode automatically.
- * Changed the direction of self-test page for easy read.
- * Changed the scale of print speed adjustment from 1 IPS to 0.5 IPS in desktop printers.
- * Cut the text if its position is over the beginning of label.
- * Decrease the torque of DC motor in TTP-234 series printer while backing labels.
- * Fixed RTC issue when setting the parameter YEAR over 2000.
- * Fixed the deadlocked issue in printing DATAMATRIX barcode.
- * Fixed the encoding issue of the code 128 if the data length is too long.
- * Fixed the peel-off sensor issue, especially when user does sensor calibration on peel-off mode.
- * Fixed the rule of EAB128 generation.
- * Fixed the rule when printing truncated PDF417.
- * Fixed the sampling time of sensor calibration in TTP-243 Pro series printer.
- * Increase the FLASH memory to 1.5MB for firmware usage. (The printer clears all the data in FLASH after updating V6.95EZ from the older version.)
- * Increased the max. printing length to 100 inches for TTP-644M series printer.
- * Increased the max. printing length to 1000 inches for TTP-2410M series printer.
- * Increased the max. printing length to 200 inches for TTP-384M series printer.
- * Increased the max. printing length to 450 inches for TTP-346M series printer.
- * Move the print head test pattern to bottom of self-test page.
- * Optimized the rule of CODE128 generation.
- * Supported 1.5 IPS as the minimum printing speed in TT(D)P-245/245C/225 series printer.
- * Supported 2 IPS as the minimum printing speed in TTP-2410M series printer.
- * Revised the AI table for EAN128.
- * Revised the condition of NO PAPER.
- * Added new command <ESC>!P to pause printer, and use <ESC>!O to cancel pause mode.
- * Supported the cursive (Handwriting) font, ex: Arabic.

V 6.86

[Basic System Command]

- * Added new command AUTODETECT to detect the sensor type and measure the label length.

[EPL]

- * Fixed if the coordinate is ignored, it will be set as 0.
- * Fixed the content of EAN2 and EAN5 add-on barcode if the data length is too long.
- * Fixed the definition of q (set label width) command. If the setting of q command is larger than the

width of print head, the q command equals to the width of print head.

- * Fixed the height of EAN2 and EAN5 add-on barcode if the human-readable value is disable.
- * Fixed the image buffer of EPL emulation is the half of total image buffer.
- * Fixed Code 128 to support function characters F1 as FNC1, such as F1"42092626".
- * Fixed the letter l in font 1 of 300 dpi printer.
- * Fixed the letter J k l in font 1 of 300 dpi printer.
- * Fixed the LS command. If the length of horizontal is larger than vertical, using the horizontal slash.
- * Support Aztec.
- * Support US command.
- * UCC/EAN 128 uses ASCII 06 as FNC1 to delimit variable length fields.
- * Use overwrite mode to generate barcode.

[TSPL]

- * Added new command FORMAT\$() to return the format string of date and time.
- * Added new command NOW\$() to return the printer's date and time.
- * Added new command STRCOMP(STR1\$, STR2\$[, COMP]) to return the result of a string comparison.
- * Added new command LTRIM\$(STR\$[,LIST\$]) to return a string containing a copy of a specified string with no leading spaces or specify characters.
- * Added new command RTRIM\$(STR\$[,LIST\$]) to return a string containing a copy of a specified string with no trailing spaces or specify characters.
- * Added new command TRIM\$(STR\$[,LIST\$]) to return a string containing a copy of a specified string with no leading or trailing spaces or specify characters.
- * Added new command LOC() to return the current position within an open file.
- * Added new command SET AUTORUN to define the auto-run file.
- * Added new command POSTINPUT.
- * Added new command PREINPUT.
- * Added new command SET FILTER.
- * Fixed the data type of numerical variable as double.
- * Fixed the definition of EAN128. For the unknown AI, the default length of AI is 2 and the default length of data is 6.
- * Fixed the WEEK command to return the correct information.
- * Enlarge the maximum reading length of READ command to 16 Kbytes.
- * Enlarge the string variables from 50 to 200.
- * Internal bitmap font 1 to 5 support UTF-8 encoding.
- * Internal bitmap font 1 to 5 support CODEPAGE 1251 and 1253.
- * Fixed internal bitmap font "LATIN CAPITAL LETTER I WITH DOT ABOVE (U+0130)" in font 1 to 4.
- * Fixed internal bitmap font "LATIN CAPITAL V (U+0056) and GREEK CAPITAL LAMDA (U+039B)" in font 3.

- * Fixed the AUTO.BAS priority. DRAM>CARD>FLASH
- * Fixed the DIAGONAL command. If the length of horizontal is larger than vertical, using the horizontal slash.
- * Support CODEPAGE 862 for downloading true type font.

[ZPL]

- * Base64 has the added benefit of avoiding the caret(^) and tilde(~)
- * Fixed ^B3 (code 39) to filter out invalid asterisk(*).
- * Fixed ^BC (code 128) UCC check digit.
- * Fixed ^BD (UPS MaxiCode Bar Code) of mode 3.
- * Fixed ^BX(Data Matrix Bar Code) to support escape sequence control character.
- * Fixed ^IS (image save) command to save the correct image.
- * Fixed ~DB (Download Bitmap Font) to support ZebraDesigner Font Downloader
- * Fixed the barcode to support printing empty string.
- * Fixed the maximum number of bytes per row of ~DG (Download Graphic) command to 32000.
- * Fixed the no selected mode and UCC/EAN Mode of ^BC (code 128).
- * Fixed the origin is wrong in ^PON and ^MNY.
- * Font A to H support UTF-8 encoding.
- * Ignore the invalid control character in ZPL format.
- * Fixed the ^FB (field block) to correct the Carriage-Return issue.
- * Support ^BB (single row only)
- * Support ^MNA (auto-detects the type of media during calibration)
- * The internal TTF supports printing NULL character.

[Others]

- * List files in printer's web page.
- * Supported downloading files through printer's internal web page.
- * Added password protection on printer's internal web page.
- * Added the function of using the printer's internal web page to send file to the printer.
- * Added the functions of delete file, run file and format memory device from printer's internal web page .
- * Fixed the issue of updating firmware file from the printer's internal web page.
- * Added the function to set the auto-run file from the front panel (LCD display).
- * Added the function to set the date and time information from the front panel (LCD display).
- * Added the Korean language for the front panel (LCD display).
- * Updated the Chinese language for the front panel (LCD display).
- * Updated the German language for the front panel (LCD display).
- * Support ignoring AUTO.BAS by pressing MENU key when turn on the printer.
- * Support printing printer serial number on SELFTEST label.
- * Make the settings of TSPL SHIFT and OFFSET commands to effect ZPL format.

- * Fixed the error when printing DATAMATRIX with NULL character.
- * Fixed the problem of Ethernet loses the last data packet.
- * Support Hebrew printing (right to left).
- * Support UTF-8 representation of the BOM (byte order mark).
- * Fixed the bi-directional communication issue of USB.
- * Solve the issue of IP is changed after firmware update.
- * Support care label cutter module function.
- * Change the cutter error condition to "if the cutter is not equipped, the cutter error doesn't occur."

V 6.79

TTP-384M Model

- * Modify the torque of ribbon supply spindle.

TTP-644M Model

- * Modify the print head missing printing dot problem.

V 6.78

New Features

[TSPL]

- * Add the codepage UTF-8. (Unicode character set)
- * Add the **LSTRIM\$(STR\$)** function to remove the 0x00~0x20 characters front the variable string.
- * Add the **RSTRIM\$(STR\$)** function to remove the 0x00~0x20 characters rear the variable string.
- * Add the **STRIM\$(STR\$)** function to remove the 0x00~0x20 characters front and rear the variable string.
- * Add the **OUTR** command, sends data through the printer RS-232 port.

[EPL]

- * Add the codepage 737, 851, 869 and 1253 build fonts. (Font 1 ~ 5)
- * Add the codepage 855, 866 and 1251 build fonts for 200 dpi. (Font 1 ~ 5)

[COMMON]

- * Add the **<ESC>!Q** command, the printer can be restart and skip AUTO.BAS program when running the basic file.

Issues Corrected

[TSPL]

- * Modify the 2D Barcode data can not use <CR> <LF> problem.
- * Modify the COUNTER from @51~@55 to @51~@60, those variables will be save when turn off the power.
- * Modify the EAN128 that can use the !102 to insert the FNC by manual.
- * Modify the EAN128 that will auto check AI code to insert the FNC1.
- * Modify the **OPEN** command that can open the designate device.
- * Modify the **TEXT** command that can select the parameter to align left, center or align right.
- * Modify the @ global variables will be updated real time when printing.

[TPLE]

- * Modify **I** command (Character set selection) to support 7 bit data.

[TPLZ]

- * Support the **^B0** (Aztec Bar Code)
- * Support **^JM** (Set Dots per Millimeter)
- * Support **~DY** (Download Objects) Incomplete.
- * Support LZ77/ Base 64(Z64) decode.
- * Modify **^BK** (ANSI Codabar Bar Code), filter out invalid data source.
- * Modify **^BP** (Plessey Bar Code)
- * Modify **^BY** (Bar Code Field Default), module width accepted values: 1 to 32000.
- * Modify **^BY** (Bar Code Field Default), module width takes floating to round off.
- * Modify **^CI** (Change International Font), add ^CI28 to ^CI36.
- * Modify **^CI17** (Deprecated - UCS-2 Big Endian) as UTF-8 encoding.
- * Modify **^CM** (Change Memory Letter) setting value can be saved by ^JUS.
- * Modify **^FB** (Field Block) Incomplete, support \& (carriage return/line feed)
- * Modify **^XG** (Recall Graphic), If Y-axis not be specified than it will be X-axis.
- * Modify **~HS** (Host Status Return) added labels remaining in batch.

[COMMON]

- * Modify the D-Link DP-G310 print server USB port issue.
- * Modify the peel-off mode setting, check if label has been removed during the printing to avoid peel off error issue.

V 6.73

Issues Corrected

[TSPL]

- * Modify the printing content shift problem.

V 6.69

Issues Corrected

- * Modify the Menu Key can not enter problem.
- * Modify the Cutter I/O control setting.

V 6.65

New Features

[TSPL]

- * Add Network HTTP Server function.
- * Add E-mail notification for printer error messages function.
- * Add Network LPQ function.
- * Define command BLINE 0,0 to detect the continuous label by BLACK MARK sensor.

Issues Corrected

[TSPL]

- * Modify the Thai font to correct some characters not print problem.
- * Modify if the label length is larger than LIMITFEED setting, the error paper jam occurs when printing.
- * Modify the total downloading files into DRAM for 50 to 256.
- * Keep the IP settings when restoring the printer to factory default settings.

[TPLE]

- * Modify the command FR issue.
- * Modify the MAXICODE printing issue.
- * Modify the rule of using the command R and q together.

[TPLZ]

- * Modify the ^CI command.
- * Modify the problem when using the command ^FR and ^FN together.
- * Modify the DATAMATRIX (^BX) printing issue.
- * Modify the rules of commands ^FO ^FT and ^FM.
- * Modify the rule of CODE39.
- * Modify the problem when using the commands ^IL and ^LH together.

Note: This printer firmware V6.65 works with DiagTool V1.16 and later versions

V 6.62

It is for use with the following printer models:

- * TTP-2410M

New Features

[TSPL]

- * Add Network HTTP Server function.
- * Add E-mail notification for printer error messages function.
- * Add Network LPQ function.
- * Define command BLINE 0,0 to detect the continuous label by BLACK MARK sensor.

Issues Corrected

[TSPL]

- * Modify if the label length is larger than LIMITFEED setting, the error paper jam occurs when printing.
- * Modify the total downloading files into DRAM for 50 to 256.
- * Keep the IP settings when restoring the printer to factory default settings.

[TPLE]

- * Modify the command FR issue.
- * Modify the MAXICODE printing issue.
- * Modify the rule of using the command R and q together.

[TPLZ]

- * Modify the problem when using the command ^FR and ^FN together.
- * Modify the DATAMATRIX (^BX) printing issue.
- * Modify the rules of commands ^FO ^FT and ^FM.
- * Modify the rule of CODE39.

- * Modify the problem when using the commands ^IL and ^LH together.

V 6.60

It is for use with the following printer models:

- * TTP-2410M series
- * TTP-245 Plus series
- * TDP-245 Plus series
- * TTP-245C series
- * TTP-244 Plus series

New Features

[TSPL]

- * Add LTRIM\$() function to remove the redundant spaces before the string.
- * Add RTRIM\$() function to remove the redundant spaces at the right side of string.
- * Add TRIM\$() function to remove the redundant spaces at left side and right side of the string.
- * Add cancel printing job feature. (TTP-2410M series only)
- * Support PS/2 barcode scanner. (TTP-2410M series only)
- * Add command to work with Diagnostic V1.12 Ethernet interface.
- * Ethernet improvement. Add Ethernet printer name setting.
- * Ethernet improvement. Add Network printer name to IP address.
- * Support PS-utility V3.0. Users can use 245 internal print server PS-utility to setup 2410M series print server.

[TPLZ]

- * Support Base64-only (B64) graphic encoding.

Issues Corrected

[TSPL]

- * Modify TEXT command x-multi and y-multi parameter for TTF font.
- * Modify AZTEC barcode format.
- * Modify SHIFT command to let the setting take effect since first label printing.
- * Modify IF command. If "IF" statement is written in one line, no need to include this statement in the DOWNLOAD...EOP header and footer.
- * Correct Thai font rotation 180 and 270 degree not correct problem.
- * INSTR\$([START, STR1\$, STR2\$) function to return the searched string location.
- * Modify PS/2 keyboard <F1> file list display menu. (TTP-2410M series only)
- * Modify PS/2 keyboard Num lock, Caps lock, Scroll lock LEDs function. (TTP-2410M series only)
- * Modify USB sometimes can't be detected by PC if connected with USB hub issue.
- * Modify paper empty criteria. Change the criteria from 80 dots to 10 dots.
- * Improve Ethernet sometimes disconnect issue if there are 2 or 3 threads access the print server at the same time.

[TPLE]

- * Modify I command to support KDU Country Code.

[TPLZ]

- * Modify ^B1 ^B2 ^B3 ^BA ^BK ^BM ^BP ^BZ to support interpretation line above code.
- * Modify ^LT(Label Top) to effect printing position since first label printing.
- * Modify ^PQ(Print Quantity), If cut value parameter of ^PQ is not set, it is cut batch.