Phomemo M220 Printer

<u>Labelife 50mm X 80mm label header info from pcap.</u>

| 0000 | 1 b | 00 | 20 | 7a | се | fb | 0a | 8e | ff | ff | 00 | 00 | 00 | 00 | 09 | 00 |
|------|------------|----|----|----|----|----|------------|----|----|----|----|------------|----|----|----|----|
| 0010 | 00 | 01 | 00 | 06 | 00 | 01 | 03 | 98 | 7a | 00 | 00 | 1 b | 4e | 0d | 05 | 1b |
| 0020 | 4e | 04 | 0b | 1f | 11 | 0a | 1 d | 76 | 30 | 00 | 33 | 00 | 67 | 02 | 00 | 00 |
| 0030 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 |

- 1) USB control stuff.
- 2) Print speed = 5
- 3) Print density = 4
- 4) Media type = 0x0A (Label with gaps).
 5) Begin raster print (GS v0).
- 5) No bytes per line (0x33 = 51)
- 6) No. lines in the image = 0x0267 (615)

| | | | | | _ |
|-----|----------------------------|-------|---------------|------------|--------------------|
| 168 | 2023-07-11 16:08:43.363192 | host | 0xfffff 1.6.1 | 0x0000 USB | 31411 URB_BULK out |
| 169 | 2023-07-11 16:08:43.577368 | 1.6.1 | 0x00000 host | 0xffff USB | 27 URB_BULK out |
| 170 | 2023-07-11 16:08:43.577938 | host | 0xfffff 1.6.1 | 0x0000 USB | 35 URB_BULK out |
| 171 | 2023-07-11 16:08:43.578024 | 1.6.1 | 0x00000 host | 0xffff USB | 27 URB_BULK out |

Note: 51 bytes/line * 615 lines = 31,365 bytes. Wireshark packet dump captured 31,411 bytes with a message that the packet was padded with extra bytes. After the header, the entire print job was sent by the Labelife software.

Phomemo tools 50mm X 80mm label header info from pcap. (Cups Test page print)

| 0000 | 40 | 5e | ea | f8 | 91 | 9b | ff | ff | 53 | 03 | 01 | 14 | 01 | 00 | 2d | 00 |
|------|------------|----|------------|----|----|----|----|----|------------|----|----|----|----|------------|----|----|
| 0010 | e7 | d5 | ad | 64 | 00 | 00 | 00 | 00 | e 1 | 20 | 04 | 00 | 8d | ff | ff | ff |
| 0020 | 00 | 20 | 00 | 00 | 00 | 20 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 |
| 0030 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 |
| 0040 | 1 b | 40 | 1 b | 4e | 0d | 05 | 1b | 4e | 04 | 0a | 1f | 11 | 0a | 1 d | 76 | 30 |
| 0050 | 00 | 30 | 00 | ff | 00 | 00 | 00 | 00 | 00 | ΘΘ | 00 | 00 | 00 | 00 | 00 | 00 |

- 1) USB control stuff.
- 2) ESC @ = Init printer. *This is from M02 protocol Not needed for M220*.
 2) Print speed = 5
- 3) Print density = 10
- 4) Media type = 10 (Label with gaps).
 5) Begin raster print (GS v0).
- 5) No bytes per line (0x30 = 48)
- 6) No. lines in the image = 0xff(255)

| 690 4.888763 | host | 1.20.1 | USB | 8256 URB_BULK out |
|--------------|--------|--------|-----|-------------------|
| 697 4.912527 | 1.20.1 | host | USB | 64 URB_BULK out |
| 698 4.912699 | host | 1.20.1 | USB | 8256 URB_BULK out |
| 721 4.993097 | 1.20.1 | host | USB | 64 URB_BULK out |
| 722 4.993403 | host | 1.20.1 | USB | 8256 URB_BULK out |
| 825 6.410985 | 1.20.1 | host | USB | 64 URB_BULK out |
| 826 6.411242 | host | 1.20.1 | USB | 6205 URB_BULK out |

Note: 48 bytes/line * 255 lines = 12,240 bytes. Wireshark packet dump captured four separate packet sets to the printer totalling 30,973 bytes. There were GS v 0 bytes in three of the four packet sets. Each time the printer was sent a GS v0 packet after the first one – it caused the printer to seek to a new label and begin a new print job.