

HY313x Series SPI Communication Application Notes

TOPIC

Executive Summary

Model Number

Notice

Suggestion

Executive Summary

- ◆ To provide notice and suggestion for using SPI to write in HY313x series products.

Model Number

◆ The suggestion may be apply to the models in below:

◇ **HY313x Series**

Models: HY3130 & HY3131

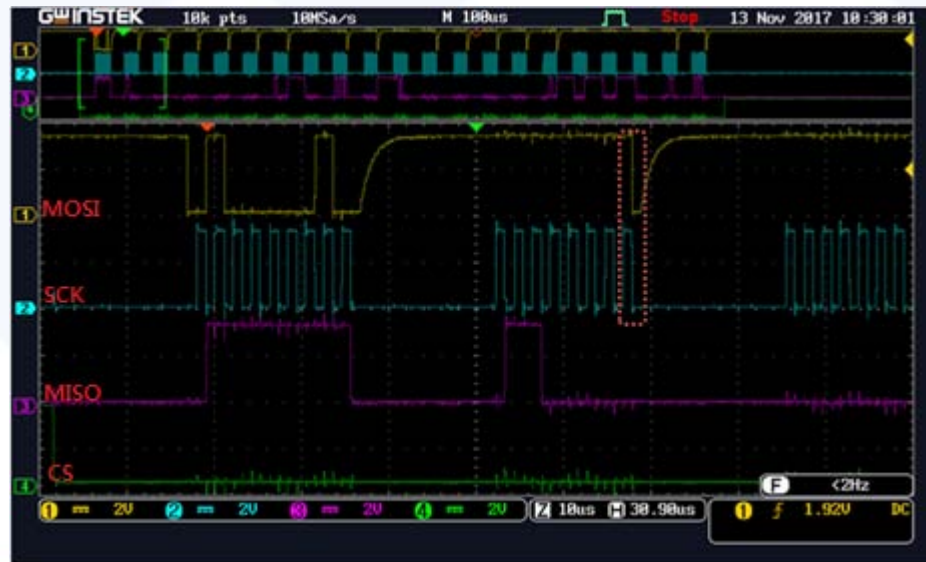
Notice

◆ Notice of using SPI to write HY313x series IC in MOSI status

Although MOSI(HY313x SDI) can be changed when SCK is low in SPI mode, **MOSI status cannot be changed when the last bit of every byte is in SCK falling-edge.**

MOSI can be changed only after 100nSec delay of SCK falling-edge.

HY3131 writing error is likely to happen as shown :



Suggestion

◆ Users need to confirm whether the phenomenon in below waveform is discovered when writing SPI in SPI Master end.

If the same situation occurred, it is suggested to use “**Software SPI**” to write HY313x(Slave). Users need to make sure that MOSI(HY313x SDI) is changed after 100nSec of SCK falling-edge (e.g. HY16F18x & HY16F19x)
SPI waveform in below can write HY313x normally :



Thank you