I2C

System

PRIMARY MCU

SECONADRY MCU

I2C

UART

AC/DC Source IN

Bootloader

Bootloader

Main APP

Main APP

Calibration Data, Event Log, FRU

256 BYTE EEPROM

PSU

12V\_ORING\_MCU, I\_OUT\_MCU

12V\_OUT\_MCU, ISHARE\_IN

STB\_I\_OUT\_MCU, CS\_OUT\_READ, T\_SR\_MCU, STB\_5V\_OUT\_MCU

FAN\_PWM

12V\_SOFT\_TRIM

RELAY\_CTL

(Optional)

256 BYTE EEPROM

T\_ambient

T\_PRI

VDC

Vin\_L

Vin\_N

HR1001A

ADC/CMP

I2C

Secondary

output

PWM

ADC

System

I2C

PWM

Primary

LLC\_EN

UART

I2C

I2C

PS\_ON

UART

UART

I\_PFC\_MCU

CMP

AC\_OK

input

input

PFC\_OK

output

Capture

output

PW\_GOOD

AC\_OK

ORINF\_EN\_MCU,

LED1, STB\_ORING\_EN\_MCU

SR\_EN\_MCU,

FAN\_RPM

Relay CTRL

PFC\_ON

LED1

**Primary**

**AC Input**

Vbulk,Ipfc Detection

440V

**+**

To LLC

CCM Boost PFC stage

EMI Stage

UART

PFC OK

AC OK

Isolator

Input Voltage

Temperature Sensor

Input Current

Digital Control

Primary Side DSP

Relay

NTC

**Relay control**

**Secondary**

440V

36V Main

Sync Rec

DC-DC

transformer

OR-ing MOSFETs

Half Bridge

LLC

From PFC

Output

Secondary DSP

**Sync Rec Control**

AC OK

SDA/SCL

ISHARE

SMB\_ALERT

POWER GOOD

Digital Control

UART

PFC OK

AC OK

Temperature sensor

FAN RPM

FAN PWM

Isolator

Isolation

IC