

DA14683 USB KIT

Design Name	DA14683_USB_KIT_vC
Ref. Number	224-46-C
Version	C
Date	27 Mar. 2018
Designer	Panagiotis Golfinopoulos

Configuration note

NOTE box

Changes on this version



T1 Label_Dialog_L6008

TP23 FIDUCIAL

TP24 FIDUCIAL

Version	Date	Comments
A00	18 / Dec. / 2017	Initial Schematic
B00	6 / Mar. / 2018	<p>Changes to current version:</p> <ul style="list-style-type: none"> - Change part Y3 to 9HT11-32.768KDZB-T - Change T25 to Header conn. type - Add TP25 for monitoring 5V - Add TP26 for monitoring VDD_3V3_SEG <p>Antenna matching circuit:</p> <ul style="list-style-type: none"> - R84 change to Z3 = 10pF - R85 change to L2 = 2.2nH - R86 change to L3 = 4nH - Z1 change to R88 (NP) - Z2 change to R89 (0ohm) <p>Change MikroBus power supply from VDD_3V3_SEG to VDD_3V3_HUB Change RESET circuit Set Resistor R9 as populated (1kohm) Set resistor R10 as No populated</p>
C00	29 / Mar. / 2018	<p>Changes to current version:</p> <ul style="list-style-type: none"> - Remove J2 (Segger connector) - Add TP30 (SWO/TDO) - Add TP28 (LDO_683) - Add TP29 (V33) - Add SW6 - Add U10 - Add 1uF Cap C50 & C51 - Remove R49, R50 - Change R87 from 4.7k to 1k

<Variant Name>



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Date: Thursday, March 29, 2018	Sheet: 1 of 5	

**D2/C1
VOLTAGE
RATE
MUST BE > 20V**

OVP

VBUS_HUB

VDD_3V3_HUB

VDD_3V3_HUB

VDD_3V3_HUB

VDD_3V3_HUB

USB HUB

**U1
USB2512B-AEZG**

Type A Through usb

J1

D3 ACPDQC5V0C-HF

D4 ACPDQC5V0C-HF

C1 100nF

R1 2.2k

R2 4.7k

Q1 BC807-25_215

Q2 DMP3099L-7

R3 10.0k

C2 100nF

R4 100.0k

R5 100.0k

R8 100.0k

C7 100nF

R7 12.0k

R6 10.0k

C8 18pF

C9 18pF

Y1 24.0000MHZ

C10 1.0uF

C11 100nF

R9 1.00k

R10 NP

R19 100.0k

R20 100.0k

R11 330

R12 100.0k

R13 10.0k

R14 NP

R15 10.0k

R16 NP

R17 NP

R18 10.0k

D5 LO L29K-H2L1-24-Z

C12 100nF

C13 100nF

C14 100nF

C15 100nF

C16 100nF

C17 100nF

C18 100nF

CRFILT

RESET_N

VBUS_DET

USBDP_UP

USBDP_UP

USBDP_1

USBDP_1

USBDP_2

USBDP_2

USBDM_1

USBDM_1

USBDM_2

USBDM_2

TP1 USBDP_2

TP2 USBDM_2

TP3 USB HUB LED

TP25 5V

TP26 HUB_RST

TP1

TP2

TP3

LDO_EN

CRFILT

RESET_N

VBUS_DET

USBDP_UP

USBDP_UP

USBDP_1

USBDP_1

USBDP_2

USBDP_2

USBDM_1

USBDM_1

USBDM_2

USBDM_2

TP1

TP2

TP3

LDO_EN

CRFILT

RESET_N

VBUS_DET

USBDP_UP

USBDP_UP

USBDP_1

USBDP_1

USBDP_2

USBDP_2

USBDM_1

USBDM_1

USBDM_2

USBDM_2

TP1

TP2

TP3

LDO_EN

CRFILT

RESET_N

VBUS_DET

USBDP_UP

USBDP_UP

USBDP_1

USBDP_1

USBDP_2

USBDP_2

USBDM_1

USBDM_1

USBDM_2

USBDM_2

TP1

TP2

TP3

LDO_EN

CRFILT

RESET_N

VBUS_DET

USBDP_UP

USBDP_UP

USBDP_1

USBDP_1

USBDP_2

USBDP_2

USBDM_1

USBDM_1

USBDM_2

USBDM_2

TP1

TP2

TP3

LDO_EN

CRFILT

RESET_N

VBUS_DET

USBDP_UP

USBDP_UP

USBDP_1

USBDP_1

USBDP_2

USBDP_2

USBDM_1

USBDM_1

USBDM_2

USBDM_2

TP1

TP2

TP3

LDO_EN

CRFILT

RESET_N

VBUS_DET

USBDP_UP

USBDP_UP

USBDP_1

USBDP_1

USBDP_2

USBDP_2

USBDM_1

USBDM_1

USBDM_2

USBDM_2

TP1

TP2

TP3

LDO_EN

CRFILT

RESET_N

VBUS_DET

USBDP_UP

USBDP_UP

USBDP_1

USBDP_1

USBDP_2

USBDP_2

USBDM_1

USBDM_1

USBDM_2

USBDM_2

TP1

TP2

TP3

LDO_EN

CRFILT

RESET_N

VBUS_DET

USBDP_UP

USBDP_UP

USBDP_1

USBDP_1

USBDP_2

USBDP_2

USBDM_1

USBDM_1

USBDM_2

USBDM_2

TP1

TP2

TP3

LDO_EN

CRFILT

RESET_N

VBUS_DET

USBDP_UP

USBDP_UP

USBDP_1

USBDP_1

USBDP_2

USBDP_2

USBDM_1

USBDM_1

USBDM_2

USBDM_2

TP1

TP2

TP3

LDO_EN

CRFILT

RESET_N

VBUS_DET

USBDP_UP

USBDP_UP

USBDP_1

USBDP_1

USBDP_2

USBDP_2

USBDM_1

USBDM_1

USBDM_2

USBDM_2

TP1

TP2

TP3

LDO_EN

CRFILT

RESET_N

VBUS_DET

USBDP_UP

USBDP_UP

USBDP_1

USBDP_1

USBDP_2

USBDP_2

USBDM_1

USBDM_1

USBDM_2

USBDM_2

TP1

TP2

TP3

LDO_EN

CRFILT

RESET_N

VBUS_DET

USBDP_UP

USBDP_UP

USBDP_1

USBDP_1

USBDP_2

USBDP_2

USBDM_1

USBDM_1

USBDM_2

USBDM_2

TP1

TP2

TP3

LDO_EN

CRFILT

RESET_N

VBUS_DET

USBDP_UP

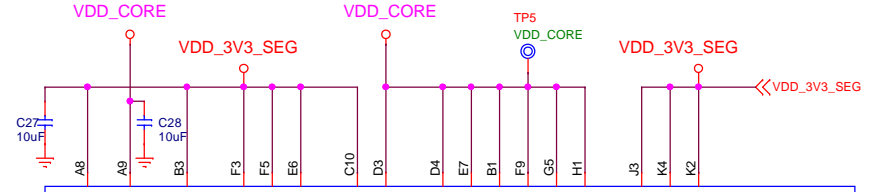
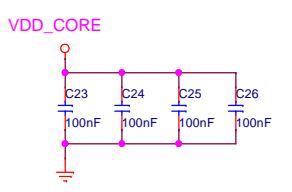
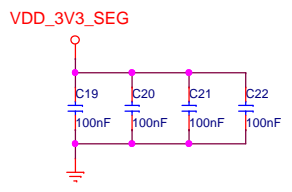
USBDP_UP

USBDP_1

USBDP_1

USBDP_2

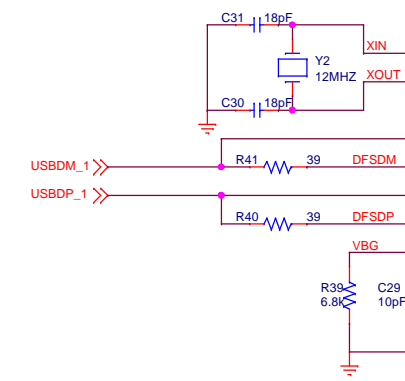
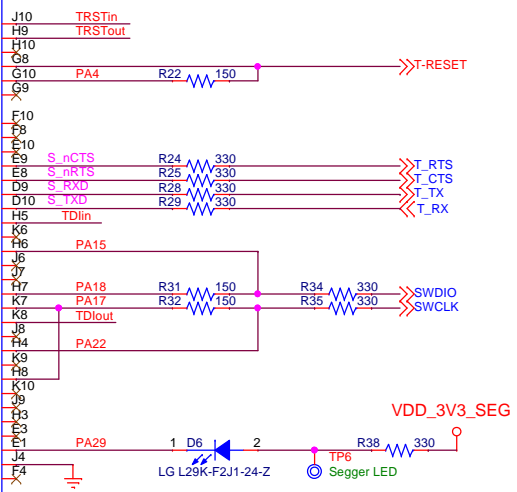
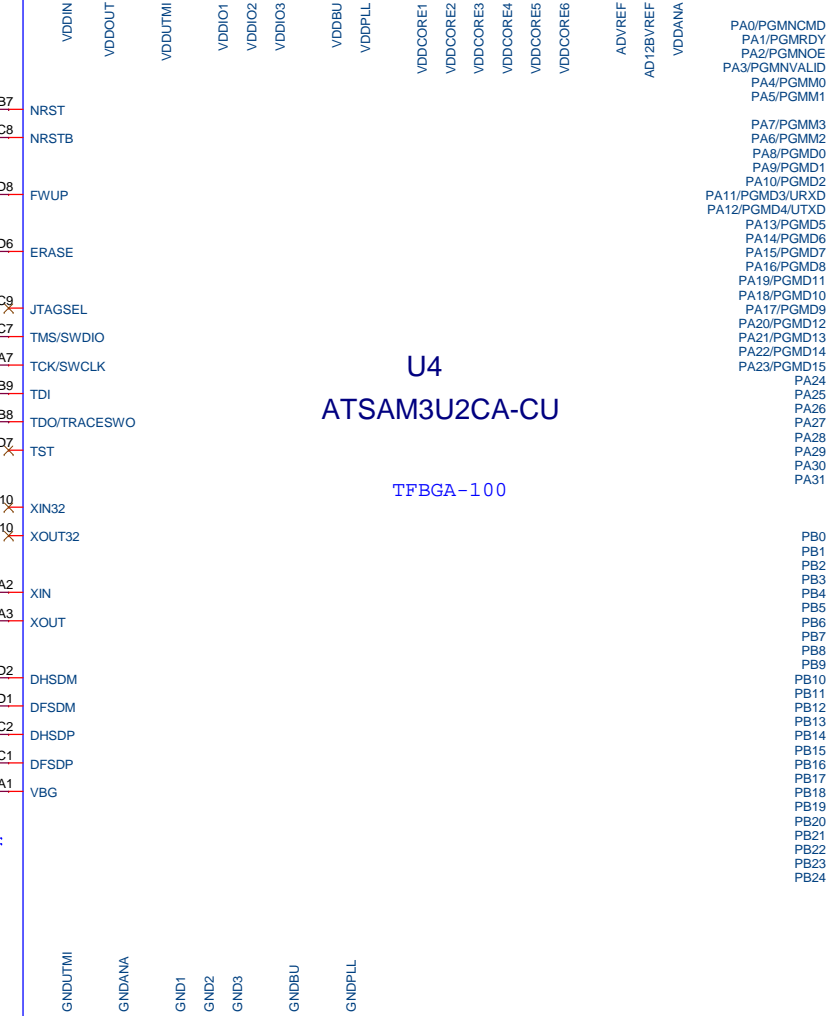
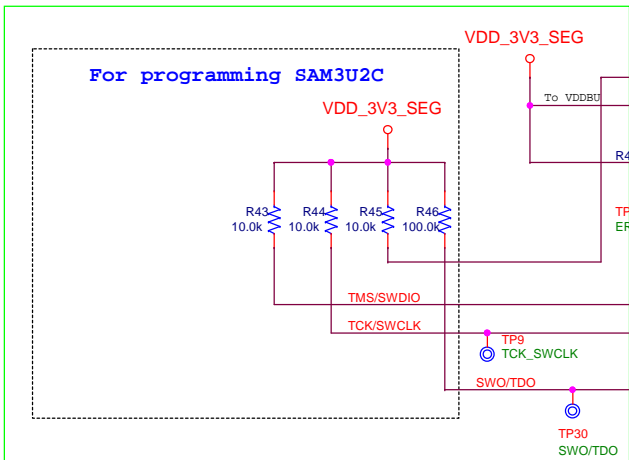
USBDP_2



Needed for Segger software

TRSTin
TRSTout

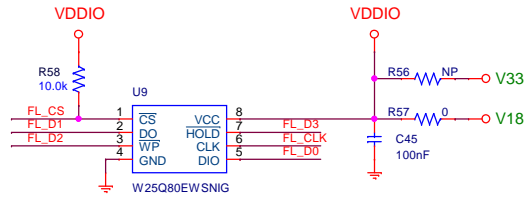
TDlin
TDIout



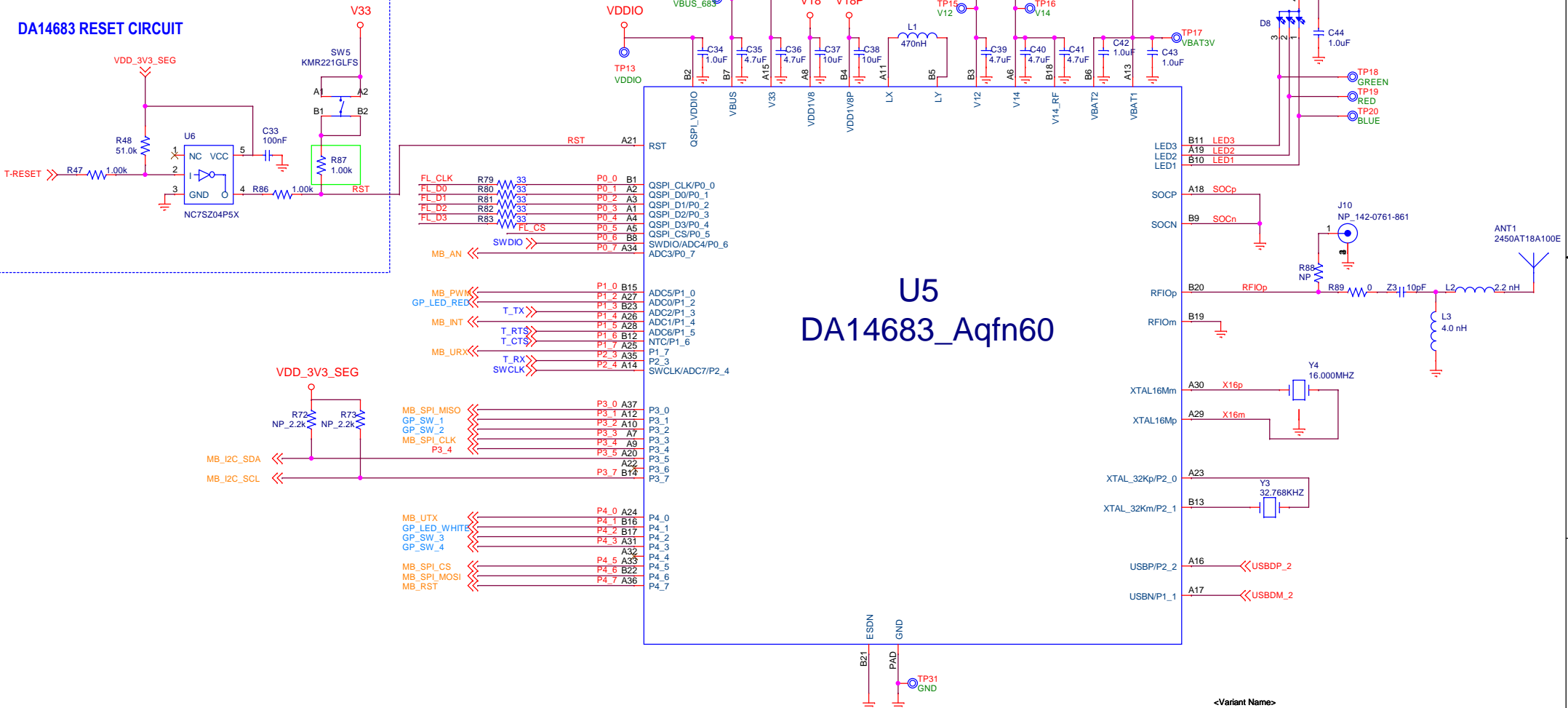
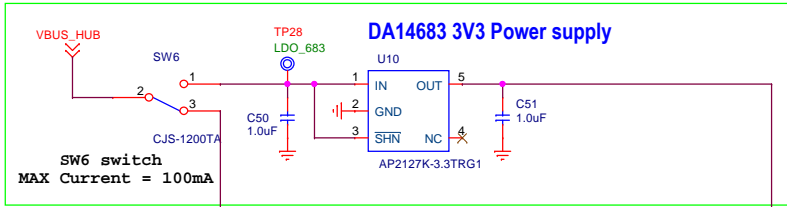
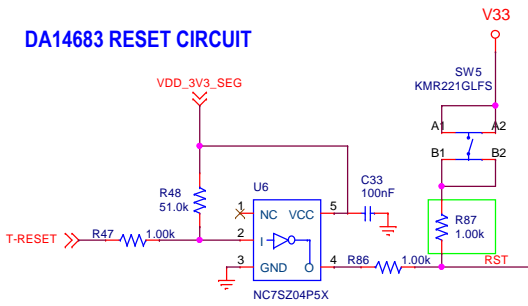
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Date: Thursday, March 29, 2018		Sheet: 3 of 5	

QUAD SPI FLASH



DA14683 RESET CIRCUIT

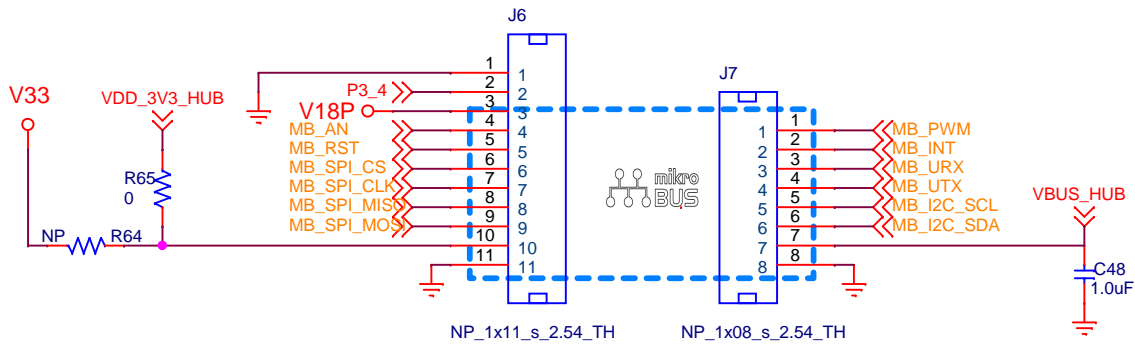


U5 DA14683_Aqfn60

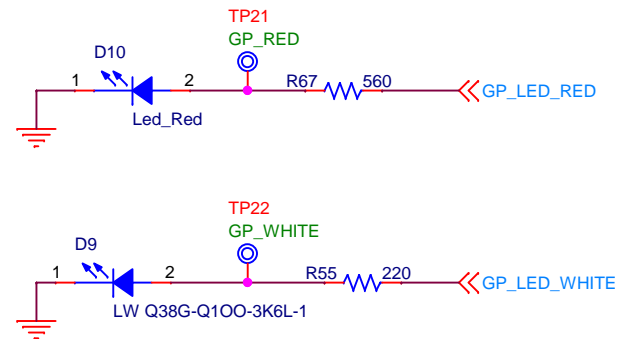
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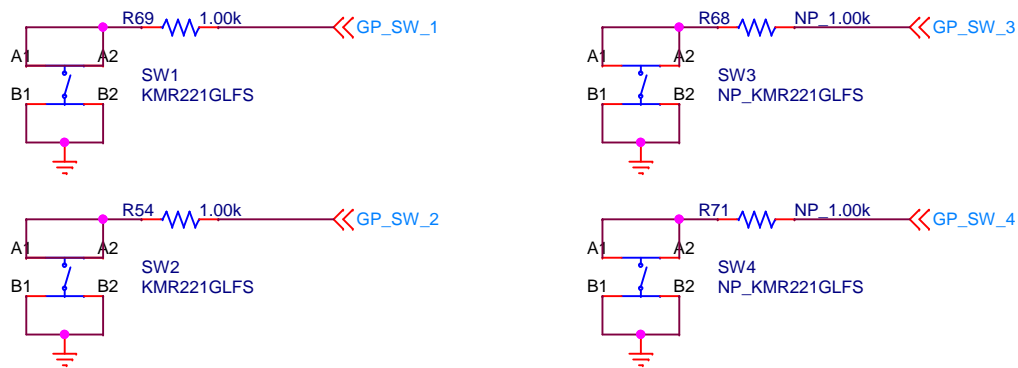
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Date:	Thursday, March 29, 2018	Sheet:	4	of	5	



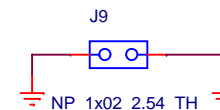
MIKROBUS & GENERAL PURPOSE CONNECTORS



GENERAL PURPOSE LEDs



GENERAL PURPOSE SWITCHES



GND SUPPORT POINT

<Variant Name>



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