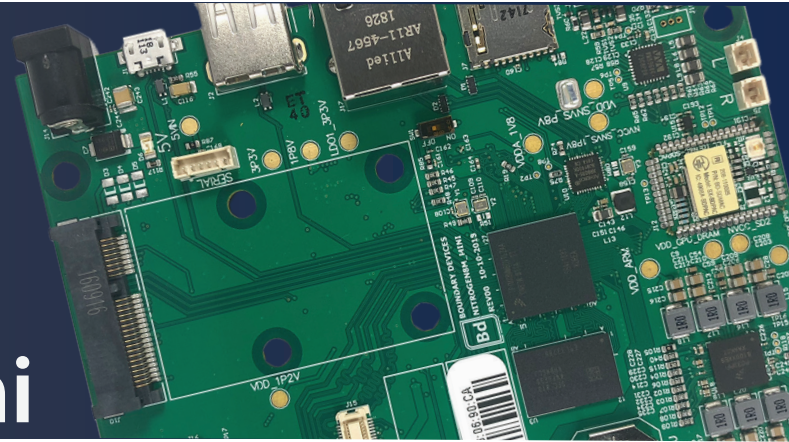


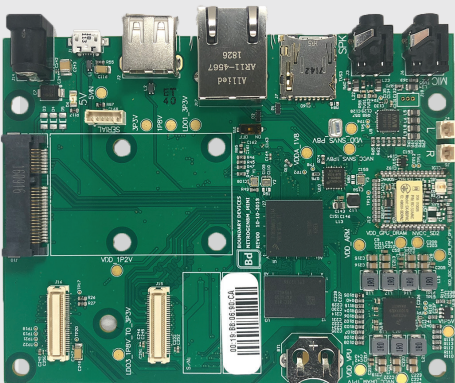
The first i.MX 8M Mini commercial SBC designed for the general embedded and IoT market



# NITROGEN8M\_Mini

## PRODUCT DESCRIPTION

Boundary Devices introduces the latest in our line of Nitrogen single board computers (SBC), the Nitrogen8M\_Mini. The Nitrogen8M\_Mini features NXP's i.MX 8M Mini Family of processors and is built with low-power, low-cost applications in mind. The Nitrogen8M\_Mini comes populated with a robust set of components to enable rapid development and a quick path to market. Notable options include: pre-certified 802.11AC Wifi + BT module, LPDDR4, PoE Module, industrial temperature & conformal coating.



## MAIN FEATURES

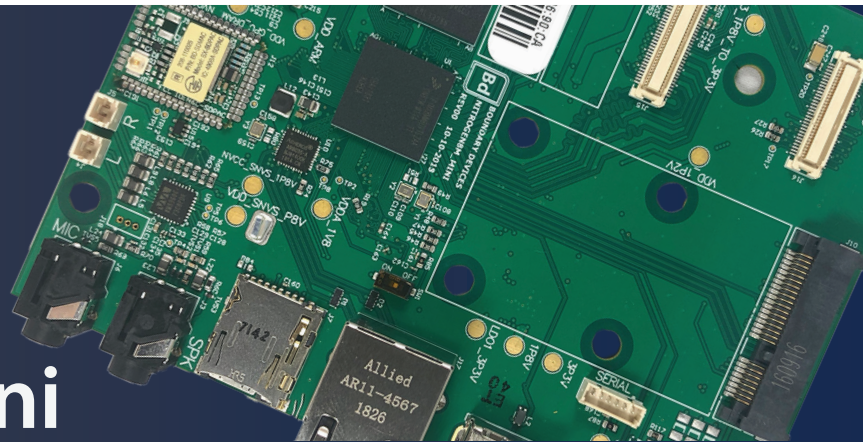
- Quad-Core processor at 1.5-2 GHz
- ARM® Cortex-A53 (64-bit) + Cortex-M4
- 2GB of LPDDR4 —Optional 4GB version
- 8GB of on-board eMMC—Expandable up to 128GB
- NXP's PF8100 PMIC (for low-power consumption)
- 1080p Video Capabilities
- 4-Lane MIPI-DSI Display (up to 1080p)
- Camera Inputs (4-Lane MIPI-CSI)
- 10/100/1G Ethernet
- Optional pre-certified WiFi (802.11ac) & Bluetooth (BT 4.1) module
- Optional PoE module available
- GC320 for 2D & GCNanoUltra for 3D graphics
- Stereo Audio (Headphone + Speaker)
- I2C/SPI/GPIO
- PCIe (x1 on-board, x1 via daughterboard)
- Android, Ubuntu, Buildroot, Debian and Yocto
- Industrial Temperature and Conformal Coating available
- Customization available

## OS SUPPORT



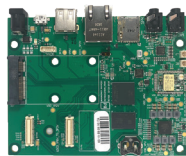
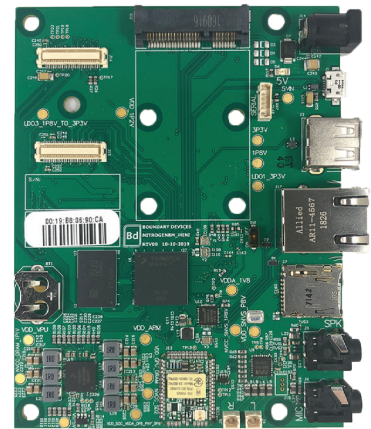
# Nitrogen8M\_Mini Ecosystem of Products and Compatible Accessories

## NITROGEN8M\_Mini



### ECOSYSTEM FEATURES

- Nitrogen8M\_Mini single board computers
- Nitrogen8M\_Mini system on modules + carrier board
- 5MP MIPI camera module available
- PoE Module Add-on
- Compatible with Displays up to 1080p
- Nitrogen8M\_Mini can be integrated with any display 3.5" and larger
- Customized Nitrogen8M\_Mini SBC & SOM + Carrier Board (Available on request)



Nitrogen8M\_Mini



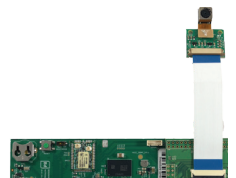
8" MIPI Display



7" LVDS Display



10.1" LVDS Display



5MP MIPI Camera

### PART NUMBERS

NIT8MQ\_Mini\_2r8e  
NIT8MQ\_Mini\_2r8e\_BRD  
NIT8MQ\_Mini\_2r8eWB  
NIT8MQ\_Mini\_2r8eWB\_BRD

BD080MCC1  
BD080MCC1\_NoPlexi  
BD080MCC1\_DSP

BD070LIC2\_8M  
BD070LIC2\_8M\_NoPlexi  
BD070LIC2\_DSP

BD101LCC2\_8M  
BD101LCC2\_8M\_NoPlexi  
BD101LCC2\_DSP

Nit8M\_5MP\_MIPI

### SPECIFICS

i.MX 8M Mini Quad  
2GB LPDDR4  
8GB On-Board eMMC

8" Leadtek Display  
1200x1920  
Integrated Touchscreen

7" Tianma Display  
1280x800  
Integrated Touchscreen

10.1" IVO Display  
1280x800  
Integrated Touchscreen

5MP OV5640 Camera  
MIPI Interface  
i.MX 8M Daughterboard