

## **BOXPC-38**



### **APPLICATIONS**

The **EM Box® PC-38** is the perfect Plug&Play system solution, especially designed for fanless applications. It is optimal adapted for:

- \_ Industrial Control &
  Automation
  scalable, long term availability,
  flexible expansion
- \_ Measurement & Control multiple graphics
- \_ Medical Solutions Intel® Atom™ performance, high resolution graphics
- Infotainment
- \_ Remote Management
- **Extended Industrial Router**

#### **F-SERIES**





Full software compatibility.



Integration-, applicationand training-services available.



Simultaneous use of UMTS and WLAN for extended router applications.



BoxPC system in a strong aluminum housing.



Rugged & reliable choice for demanding embedded applications.



Wide range DC power input and AC power option.







#### **SPECIFICATIONS**

CPU Intel® Atom™ processors E38x series Single, Dual (opt.) and Quad Core¹

Max. memory Up to 8 GB DDR3L memory / 667 MHz

Gigabit Ethernet 2 Intel® I210 with IEEE1588

LTE/4G (OPTIONAL) 300 Mbps max./EMEA, APAC/Diversity/GNSS

WiFi/BT (OPTIONAL) 802.11 AC with diversity/Bluetooth Version 5

 SSD (OPTIONAL)
 mSATA / 64 - 512 GB

 USB ports
 1 USB 3.1 Gen1 | 4 USB 2.0

Serial port 1 RS-232

Serial ports (OPTIONAL) 2 RS-232 | 1 RS-422/485

CAN port (OPTIONAL) 1 port, 1 Mbps per port

DVI-I connector 1 DVI-I with VGA support

Sound (OPTIONAL) 3.5 mm MIC In / headphone Out

Health management Hardware monitoring and watchdog

Power supply Min. 8 V / Max. 32 V (DC)

AC power supply (OPTIONAL) Internal wide range 100 V to 240 V | 50/60 Hz

Fanless

Designed for fanless operation

Max. operating temp. 0°C to +60°C ambient comm. grade

-40°C to +85°C ambient ind. grade (optional)

Max. storage temp.  $-20^{\circ}$ C to  $+105^{\circ}$ C

Max. rel. humidity 95 % @ 40°C, non-condensing

Housing Aluminum case

Mounting Stand alone or hat rail

Dimensions approx. DC version: 235 x 150 x 44 mm

AC version: 235 x 230 x 44 mm

Weight approx. DC version: 1250 grams + options

AC version: 2200 grams + options

Conformity CE, ROHS, REACH

OS support Microsoft® Windows® 10;

Microsoft® Windows® 10 IoT Enterprise;

Linux (Ubuntu 18.04 LTS,

Yocto Project 2.5.1)

<sup>1</sup>15 years availability according to CPU manufacturers specification

# FANLESS DESIGN WITH VARIOUS SERIAL PORTS



## OVERVIEW

The EM Box® PC is powered by Intel® Atom™ processors E38xx series.

An optional wireless module supporting LTE/4G is available.

At the same time an optional WiFi module can be used.

#### **SUMMARY**

- ► Fanless operation
- ► Gigabit Ethernet port
- ► SATA interfacing
- ► Modem solution with SIM Card reader

Ordering Code System	Description	Туре
BPC38Q	F-Series System	Atom™ E3845 / 4C / 4T / 1.91 GHz / 10 W
BPC38S	F-Series System	Atom™ E3815 / 1C / 1T / 1.46 GHz / 5 W
2GB-F38	Main Memory	2 GB
4GB-F38	Main Memory	4 GB
8GB-F38	Main Memory	8 GB

SSA	LTE	WBT
Χ	Χ	1
Χ	-	Х
-	Χ	Х

SSA, LTE, WBT combination matrix

OPTION	Description	
SSA	SATA SSD 64 - 512 GB	
LTE	LTE/4G Modem	
WBT	WiFi/BT card	
CM2	COM 2 RS-232 Port	
CM3	COM 3 RS-232 Port	
CM4	COM 4 RS-485 Port	
CAN	CAN Port	
SND	3.5 mm / MIC In / Headphone Out	
ACP	AC Power Supply	
W10	Microsoft® Windows® 10	
WIE	Microsoft® Windows® 10 IoT Enterprise	
LNX	Linux Ubuntu 18.04 LTS	

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