



RAC7000

Android Industrial Computer
Ready to New Retail and Smart Vending Devices



INTRODUCTION

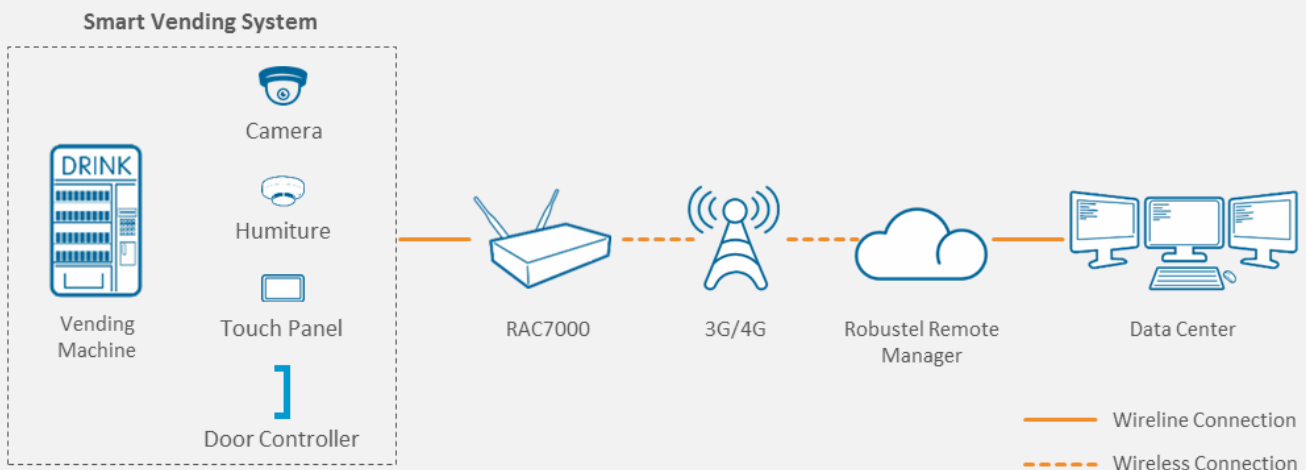
Designed with ARM® Cortex™-A9 core and Android operating system, Robustel RAC7000 Android Industrial Computer is a smart industrial control device with high-performance, high-reliability and high-stability. It supports Android 4.4/6.0 operating environment and powerful system function, and provides users with convenient interactive service between human and computer. By means of OpenGL ES2.0 and OpenVG™1.1 hardware accelerator and full-HD 1080P video codecs, RAC7000 provides users with a smooth and powerful video experience of multimedia playback.

RAC7000 supports Netcom 3G/4G real-time communication. In addition, it has wireless transmit function, rich peripheral interfaces and reliable management system which can access a variety of external devices such as card readers, printers, POS machines, LCD screens, etc., to meet different application scenarios.

KEY FEATURES

- > Dual/Quad-core Cortex-A9 processor architecture
- > Supporting OpenGL ES2.0 and OpenVG™1.1, 2D and 3D graphics acceleration
- > Android 4.4/6.0 system
- > 1080P HD full screen video decoding
- > Hiding status bar and navigation key
- > Specified applications for full screen auto-run and auto failover recovery
- > 3G/4G cellular network for fast auto dialing
- > APN adaptive dialing
- > RTC clock synchronization
- > 3G/4G network link self-detection and self-maintenance mechanism for abnormally fast auto recovery
- > Supporting Android system for self-development and application installation
- > HDMI, LVDS and double-screen display
- > Supporting Android Debug Bridge port command
- > Supporting double-row pin expansion board
- > WiFi and Bluetooth connections
- > Expansion of SD card for large storage
- > Rich peripheral interfaces including serial port, Ethernet, USB, audio, and video for access requirements of different machines
- > Supporting hardware watchdog

APPLICATION EXAMPLE



SPECIFICATIONS

Core

CPU	Dual/Quad-core Cortex-A9 1.0 GHz
RAM	2GB DDR3
Flash	8GB EMMC

Cellular Interface

Number of antennas	2 (MAIN + AUX)
Connector	SMA female
SIM slot	1 (3.0 V/1.8 V)
Standards	GSM/GPRS/EDGE/WCDMA/HSDPA/HSUPA/ HSPA+/TD-SCDMA/CDMA (CDMA 1X/EVDO)/FDD LTE/TDD LTE

Display Interface

Number of ports	1 x double-row pin LVDS interface with resolution up to 1920*1080P, 12V backlight optional 1*HDMI 1.4 standard interface with resolution up to 1920*1080P
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WiFi & Bluetooth Interface

Number of antennas	1
Connector	RP-SMA female
Standard	802.11a/b/g/n, BT4.0 Supporting AP and Client modes
Frequency band	2.412 - 2.485 GHz (2.4 GHz ISM band)
Security	Open, WPA, WPA2, WEP
Encryption	AES, TKIP, WEP64
Data speed	150 Mbps

Daughter Board Port

Number of ports	2
Type of ports	2 x 15-pin double-row

Device Interface

Ethernet interface	1x 10/100 Mbps, LAN/WAN
Serial port	5 x RS-232 (2 x DB9 + 3 x 3-pin) + 2 x RS-485 (2 x 3-pin)
USB port	6 x USB 2.0 host +1 x Micro USB otg
GPIO	2 x DI + 3 x DO

Audio Interface

Earphone	1 x 3.5 mm SPK connector
Microphone	1 x 3.5 mm MIC connector
Speaker	4 Ω 5 W

Others

SIM card	1 x Standard SIM connector
SD card	1 x Micro SD connector
Buttons	1 x Reset + 1 x ON/OFF
LED indicators	1 x RUN/NET
Battery	RTC button cell available for 5 years

Power Supply and Consumption

Connector	G X 12 air interface/DC female seat
Input voltage	12V DC
Power consumption	Idle: 350mA@+12V DC Maximum: 4.5A@+12V DC

Physical Characteristics

Ingress protection	IP30
Housing and weight	Metal, 1050g
Dimensions	208 x 149 x 50 mm
Installation	Desktop or wall mounting

ORDERING INFORMATION

Model	RAC7000-4L
Type of Display Interface	HDMI + LVDS
Air Interface	GSM/GPRS/EDGE/ WCDMA /HSDPA/HSUPA/HSPA+/ TD-SCDMA/CDMA (CDMA 1X/EVDO)/UMTS/FDD LTE/TDD LTE
Frequency Bands*	FDD LTE B1/B2/B3/B4/B5/B7/B8/B20 TDD LTE B38/B39/B40/B41
4G	
3G	UMTS B1 CDMA(CDMA1X/EVDO) BC0 TD-SCDMA B34/B39 HSDPA/HSUPA/HSPA+: B1/B2/B5/B8
2G	GSM/GPRS/EDGE: 850/900/1800/1900 MHz
Operating Temperature	-20 to +70 °C
Relative Humidity	5 to 95% RH

*For more information about frequency bands in different countries, please contact your Robustel sales representative.