

CHOOSING RUGGED VEHICLE MOUNT COMPUTERS



White Paper

DELIVER FLAWLESS
FULFILLMENT

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Introduction

The on-demand economic climate tests your front-line employees-- featuring forklift drivers-- to pack purchases quicker, with no reduction of reliability. Made for severe stockroom, Cold Chain Logistics, and lawn atmospheres, ultra-rugged vehicle-mounted pcs can easily furnish all of them to increase their job efficiency to brand-new elevations. They're brought in to become placed on product managing tools and stand up to excessive temps, surprise, and resonance to keep the functional connection.

The ability to mount mobile devices and computers to forklifts, trucks, tuggers and inventory pickers is essential in the warehouse environment. From inventory management to order fulfillment, asset tracking, and shipping and receiving, the warehouse floor is a complex ecosystem that requires high-efficiency technology to run smoothly. Rugged vehicle-mount computers, designed to fit seamlessly into forklifts and other warehouse vehicles, will help minimize errors, streamline ordering and inventory management, and improve operational efficiencies. When flexible docking options, quick mounting and dismounting, and mobility are needed, Vehicle-Mount Computer meets the need.

For more than 25 years, Winmate Inc.- has provided robust and reliable solutions to our customers and partners. Robust and elegant designs with years of experience producing rugged electronics solutions have made Winmate Inc. the leader in this field. We strive to provide excellent availability of our products, recognizing the need of our customers for timely delivery and long-term availability. During the design phase, we carefully select our components to ensure an extended state of construction – in addition, we have a system to handle end-of-life issues for our customers' benefit.

At numerous of these requiring offices, laborers likewise require their palms-free of charge, which is actually where rough automobile place personal computers arrive right into play. Docking firmly on vehicle and also vehicle control panels, as correctly as on forklifts, pallet vehicles, purchase pickers and also various other kinds of product managing devices, uncompromising lorry install tools give vital as well as simple accessibility to the electronic devices and also records that laborers need to have on the functional face product line.



Key Factors to Consider

To be as practical and functional as possible within harsh conditions and extreme environments, rugged vehicle mount computers need several key features:

1. EXPERT TOUCHSCREENS/VOICE CONTROL -

Standard mobile phone pcs and also cell phones might possess touchscreens, yet it is improbable they'll maintain functioning if revealed to dirt as well as filth, water, and also falls coming from elevation. A ruggedized unit includes ultra-tough, ultra-responsive touchscreen innovation, also via thick handwear covers and also in severe temperature levels, along with integrated monitor thawing for chilly establishment states.

2. HANDLING POWER -

Industrial-grade uncompromising tools for automobiles flaunt even more electrical power than your familiar individual or even business level mobile phone personal computer. You'll require this so that your employees may operate several requests effortlessly and without delaying packing opportunities as they log work improvement and accessibility working information.

3. ONE-HANDED DOCKING AND UNDOCKING -

Challenging commercial environments entail continuously transforming work as well as switching concerns. Employees require extremely versatile equipment that can easily stay up to date with all of them as they shift coming from one job to an additional. Ensure you're decided on auto-install personal computers operate around various autos, vehicles, and vehicles and maybe dropped anchor, undocked, and redocked swiftly as well as conveniently, despite having one palm as well as while using handwear covers.



TRY TO FIND ROBUST ENVIRONMENT PERFORMANCE

Most essentially, uncompromising lorry place computer systems need to hold up against complex working states with no plunge in functionality. Product managing devices are massive machines constructed to take influence and powerful resonance, so any placed tools require carrying out the same. Ruggedized units will not need to have steady repair work or even substitute when positioned in a rough workplace, applied for when driving, or even regularly anchored and undocked coming from lorry places, creating much more than worth the expenditure.

1. Ideal electrical power style for cars - Rugged VMC deals with 2 forms of vast array electrical power elements-- 9 to 32 VDC and 18 to 60 VDC. Electric battery-style guard terminals are coming from unpredictable electrical power input throughout the auto function. UPS electric battery delivers backup energy.

2. Constructed for the chilly and the heat - With optionally available monitor defroster, functioning motor vehicles can quickly go from the outsides to cold store atmospheres without any danger of

missing the show. Suitable for Cold Chain Logistics coordination and various other extreme situations, the Rugged VMC are measured to ask for the durability criteria of MIL-STD 810G & IP-66.

3. Industrial interactions for industry use - Multiple I/O options feature RS-232, RJ45, USB 2.0, Digital, CAN bus (SAE J1939/ OBDII sustained), video recording input, and earphone port.

4. Smooth communications - Stay associated with GNSS, WiFi, Bluetooth, & 4G/5G LTE alternatives. The integrated aerial could be a muscle-building supplement along with optionally available outside aerials

5. Excellent presence time and also night - The Rugged Vehicle Terminals show excellent particular in each background lighting disorder. The higher graphic shows make sure that each terminal could be reviewed in the harshest sunlight. The higher settlement, anti-reflection touchscreen, as well as auto-dimming see to it that you will not miss out on a trait.

Technology Options



Optimal power design for vehicles



Superb visibility day and night



IP-66



Built for the cold and the heat



Seamless communications



Industrial communications for field use

STORAGE FACILITY MANAGEMENT, MANUFACTURING, OR WASTE? WHICH DEVICES WORK BEST IN WHICH INDUSTRIES?

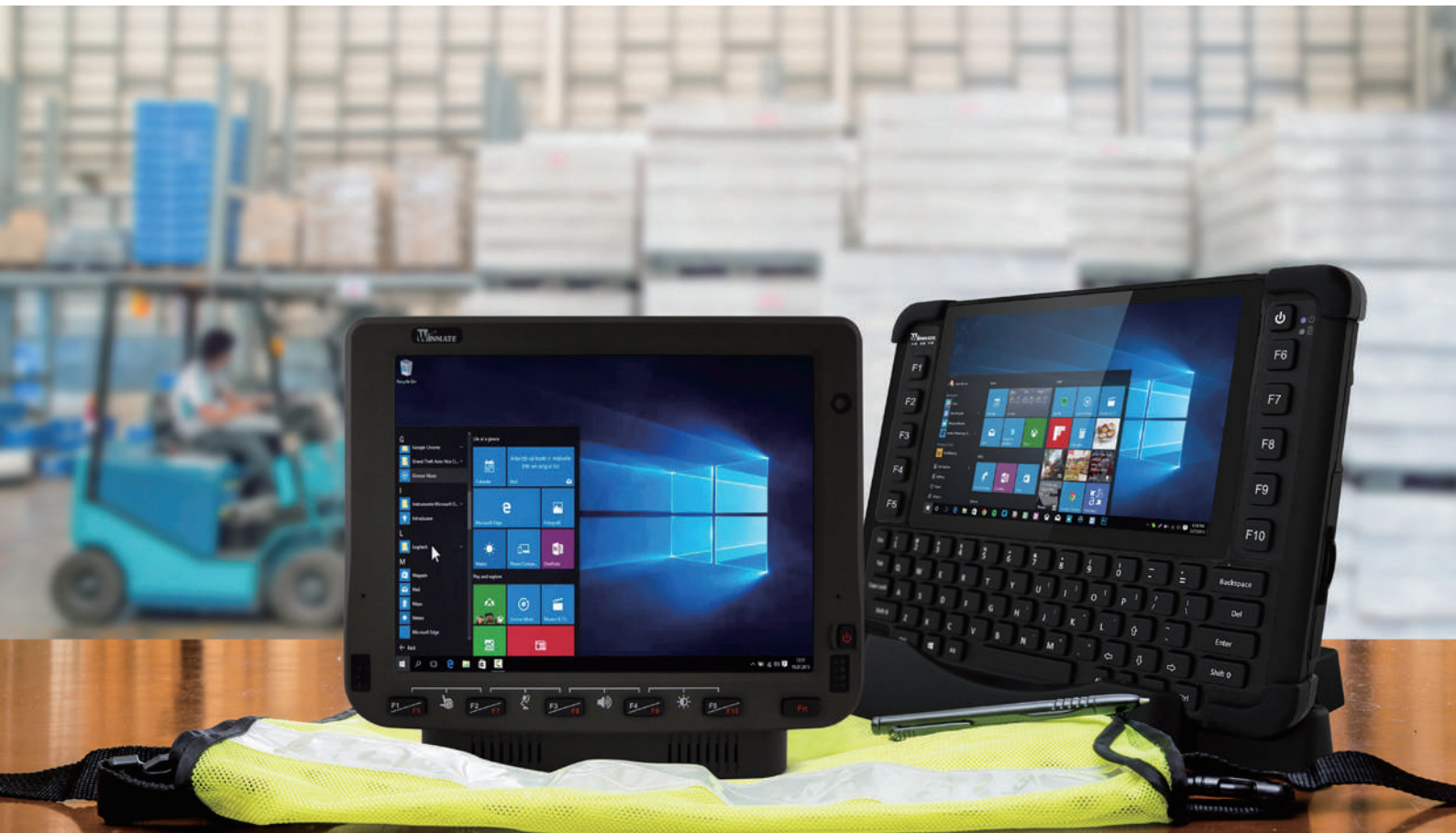
Winmate Rugged VMC Solution

Winmate's full line of rugged vehicle-mount computers, designed to fit seamlessly into forklifts and other warehouse vehicles, will help minimize errors, streamline ordering and inventory management, and improve operational efficiencies. One-Stop-Shop Service: HW + SW+ PM+ Factory with all-in-one solution.

DID YOU KNOW?

As a company that works with fleet professionals, we know how difficult it can be to maintain the reliability of mobile computing systems in the field. That's why Winmate has created whitepaper guide for Fleet Mobility, a new white paper designed to provide you with considerations for a more productive mobile office solution.

- ✓ OS: offers Android and Windows-based options with application-focused.
- ✓ Wireless communications: external antennas, broad power input, and ignition control.
- ✓ Safety Certification: IP65 waterproof and dustproof, Shock and vibration resistance according to MIL-STD-810G
- ✓ Product Longevity: 5 ~ 7 Years
- ✓ Standard Warranty: 2 Years
- ✓ Extended Warranty: 5+ Years



Winmate Products: Overview

Winmate offers Android and Windows-based options with application-focused features such as wireless communications, external antennas, broad power input, and ignition control.

1. 7~10.4" Windows-based vehicle-mounted computers: feature a low power consuming system and user-friendly touchscreen. Thanks to its compact vehicle form, forklift operators can maintain unobstructed line-of-sight during operations to increase efficiencies and minimize errors.

2. 7~10.4" Android-based vehicle-mounted computers: designed for warehouses, outdoor facilities, and cold chain environments. Forklift operators can now fulfill orders quicker and more efficiently than ever before with high-performance VMCs that feature multi-touch capabilities. Embrace enterprise-class functions on the Android OS for your in-vehicle solutions today.

With Windows no longer a viable option for many enterprises, Android has emerged as the top contender for an operating system compatible with the rugged environment. According to a VDC Research report, Android OS share grew from 24% to 37% of all rugged handheld devices from 2015 to 2016, while Windows Embedded Handheld 6.5X/Windows Mobile fell from 49% to 39% time. Affordably extend Android to your Rugged VMC without re-training workers.

The Winmate Vehicle Mounted Computer is engineered to fit seamlessly into forklifts, trucks, and other warehouse or heavy-duty vehicles, helping minimize errors, streamline operation, and improve efficiency.

■ **High-Performance Qualcomm® Snapdragon™ 660CPU with Android 9.0 OS**
The Winmate Vehicle Mounted Computer ships with Qualcomm® Snapdragon™ 660 Octa-core, a 2.2GHz processor, ensuring higher computing and graphics performance. Its Android 9.0 operating system benefits users thanks to its openness, customizable features, and robust ecosystem.

■ **Optional High Brightness 1000 nits Panel**
With the 10.4" compact screen size, vehicle operators maintain unobstructed line-of-sight during operations to increase efficiencies and minimize errors. The screen boasts PCAP multi-touch technology and anti-scratch properties to deliver an excellent user experience with better environmental resistance. The configuration of 1000 nits high brightness panel assures excellent outdoor readability.

■ **One-Click Latch for Easy Removal of the Device**
Designed with an enterprise mobility solution in mind, the Winmate Vehicle Mounted Computer contains the dock with a one-click top latch to allow easy removal of the device from the dock.

■ **Magnesium Aluminum Alloy Housing with MIL-STD-810G & IP65 Ratings**
When it comes to industrial usage, the

DID YOU KNOW?

Winmate manufactures mobile office computing and mounting solutions for a variety of industries. For over 25 years, our mission has been to increase worker productivity with products that are built to the highest safety and quality standards and are designed with comfort in mind.



rugged device to survive harsh environments is a must. Its solid enclosure proves the Winmate VMC series durability with MIL-STD-810G certification and IP65 rating.

■ **Rich I/O Ports** - The Winmate Vehicle Mounted Computer boasts rich I/O interfaces, including USB 3.0 Type C, DB9 connector for USB2.0 ports, COM, LAN with PoE, CAN bus, Dual-Nano SIM card slot, and Micro SD card slot, to support multiple onboard peripherals and deliver a steady output, impressive expandability and maximum efficiency for either in-vehicle or field operations.

■ **Screen Blanking to Improve Safety** - Once activated helps reduce visual and cognitive distractions and improves safety by limiting device functionality when the vehicle is moving.

■ **10-60V DC Wide Range Power Input and Power Ignition Control** - The broad range power input (10-60V DC) gives the FM10Q Vehicle Mounted Computer easy device compatibility with many vehicles while handling unstable voltage from the cars. The power ignition control allows users to control when the vehicle-mounted computer turns on/off when the vehicle is started.

■ **WiFi, 4G LTE, Bluetooth and GPS Wireless Connectivity** - The Android-based Vehicle Mounted Computer contains various wireless connectivity options such as WiFi a/b/g/n/ac, Bluetooth 5.0, 4G, and GPS to enable records to be updated in real-time, ensure that the most up-to-date information is always available, and, optimize vehicle tracking and route optimization.



Summary

The best-ruggedized motor vehicle places personal computers for your company will likewise rely on your service's attributes. Storage facilities, as an example, require durable lorry install gadgets that function together with hooked-up ruggedized checking modern technology for reliable supply monitoring, while producing organizations often need to have durable equipment that produces easy decentralized command around each factor a source establishment.

Organizations in the oil and gasoline industry ought to appear for tough automobile install computer systems along with ATEX standard-- the formal governing basic makes sure the protection of items made use of in likely eruptive settings. Whatever your organization's emphasis, an expert sturdy mobile phone equipment distributor like Winmate may assist you to limit the market to discover suited sturdy automobile position computer systems for you. Certainly not just that, our pro specialists are positioned to assist you to incorporate your brand new rugged equipment right into your function, as well as our recurring consumer assistance solutions and also onsite repair guarantee you'll consistently receive the very most coming from your specialist.



10.4" Vehicle Mounted Computer

Qualcomm®
Snapdragon™ 660
Octa-Core 2.2 GHz



7" Vehicle Mounted Computer

Android-based i.MX
6 Dual Core 1 GHz
Processor



8" Vehicle Mounted Computer

Intel® Celeron® N2930
Windows Vehicle
Mounted Computer

About Winmate

Founded in 1996, Winmate Inc. is a pioneer in rugged computing technology. For over two decades, Winmate has provided business leaders worldwide with reliable, rugged solutions made for the most challenging industrial conditions. From R&D to manufacturing to in-house testing, Winmate Inc. manages the entire product development process with ready-made products available for quick deployment. Today Winmate's innovative approach has helped countless enterprises at every level with equipment automation and seamless Industrial Internet of Things (IIoT) integration.

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