



The world's most advanced Fingerprint Time & Attendance System

# **EC500**

# **Time & Attendance System**



The Easy Clocking® EC500 is the World's most Advanced Employee Time and Attendance system. This award winning and patented multi-spectral imaging system captures superior images quickly, on all people, and in all environmental conditions with near zero failure. The EC500 was designed to work in any corporate environment, from small to large scale enterprise organizations. With the Easy Clocking state-of-the-art fingerprint authentication technology you can track employee's time and attendance with the touch of a finger. Biometric fingerprint authentication is the most accurate way to collect employee time and attendance information. The Easy Clocking® EC500 verifies an employees identity based on the characteristics of their fingerprint. Our research & development advances in biometrics have now made this technology surprisingly affordable to everyone.

#### Welcome to the Real World!

The true test of any biometrics technology is not how it behaves in the lab or how it behaves under ideal conditions, but how it performs in the real world. For many years now, the promise of biometrics has not been fully realized in large part because performance in the lab is not representative of performance in the field.

When biometrics fail, for whatever reason, the technology becomes more of a barrier than an aide. The net result is user frustration, resistance to adoption, and an inability to justify costs. Regardless of which biometric technology is chosen, it must work reliably under real world conditions. The real world is not always ideal. The real world is wet, it is dry, it is not always clean and users are not all young office workers with great skin conditions.



The Real World is Wet



The Real World is Dry



The Real World is Rough



The Real World is Diverse



The Real World Wears Gloves



The Real World is Cold

# How Do We Do it?

By reading fingerprint characteristics that are at beneath the surface of the skin. This enhanced data capture mitigates traditional system vulnerabilities and makes our technology the most secure and convenient alternative for identity authentication.

Our system is able to collect and process biometric images in a manner that makes fingerprint authentication and identification more robust, more inclusive and more reliable than other fingerprint sensors, which are vulnerable to a variety of conditions including the presence of topical contaminants, moisture, and bright ambient light. Simply stated, our sensors work where other technologies fail.

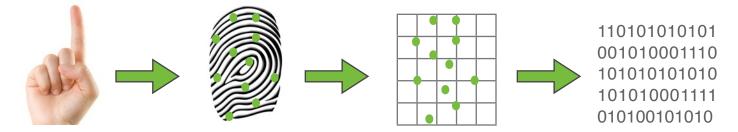
Unlike the surface fingerprint characteristics that can be obscured by moisture, dirt or wear, the "inner fingerprint" lies undisturbed and unaltered beneath the surface. When surface fingerprint information is combined with subsurface fingerprint information and reassembled in an intelligent and integrated manner, the results are more consistent, more inclusive and more tamper resistant.

Easy Clocking fingerprint sensors do not require perfect contact between the finger and the platen because they use multispectral imaging, a direct imaging technology. Rather than capturing information about the finger/sensor contact and creating an image from that, the Easy Clocking sensor effectively takes a snapshot of the fingertip. It is in this way that we sidestep the problems biometrics face today in the real world.

### **How Does our Fingerprint Scanner Work?**

A fingerprint scanner system has two basic jobs -- it needs to get an image of your finger, and it needs to determine whether the pattern of ridges and valleys in this image matches the pattern of ridges and valleys in pre-scanned images.

Only specific characteristics, which are unique to every fingerprint, are filtered and saved as an encrypted biometric key or mathematical representation. No image of a fingerprint is ever saved, only a series of numbers (a binary code), which is used for verification. The algorithm cannot be reconverted to an image, so no one can duplicate your fingerprints.

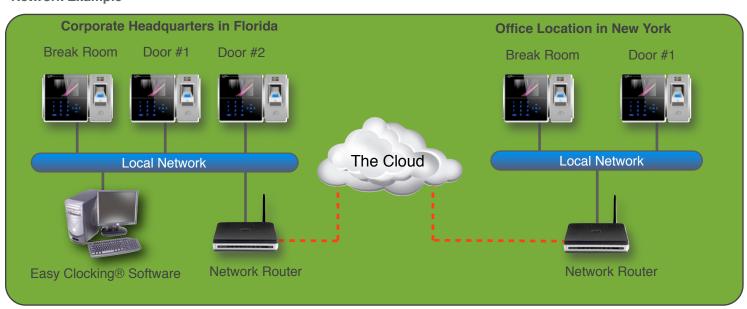


## **Powerful System Features**

- ✓ The world's most advanced fingerprint time attendance system
- Works in all environmental conditions, cold, dry, humid and wet climates in near zero failure
- ✓ Download Employee Records to a PC with a USB Memory
- ✓ Good for up to 3000 users
- Designed to work in any corporate environment
- IP connectivity for LAN or WAN networks
- Built in Wi-Fi, no need to run cables (optional)
- ✓ Integrated Smart-card RFID reader (125 Khz)

- √ 360° authentication fingerprint sensor
- Does not need a computer to operate, stores 100,000 transactions in it's built-in memory
- ✓ High Speed ARM9 Processor
- ✓ Easy to read full color 3.2" LCD display
- ✓ Direct door relay, connects to any 12 volt door lock
- ✓ Wiegand 26/34 bit outputs for secure access control
- ✓ Touch sensing digital keypad
- User alert voice prompts
- ✓ Upload your company logo to the display screen

# **Network Example**



# **Technical Specifications**

#### Size & Weight

Weight: 2 Lbs.



5.4" in / 137mm

7" in / 180mm

#### Memory & CPU

ARM / 400MHZ Processor:

Fingerprint Capacity: 3.000

Storage Capacity: 100.000 Records





### **Power Supply Requirements**

Power: DC 12 Volts Operational Current: 0.5A - 1.0A Idle Current: 0.50A



#### Display

TFT LCD Display Type: Full Color Color: 3.2 inches Size:



#### **Door Access Control**

26 / 34 Bit - Input / Output Wiegand:

Door Sensor: Yes Exit Button: Yes

Door Relay: Connects Direct to 12V Electronic Lock

Strike / Deadbolt / Magnet / Automatic Door

**Imaging System & Biometric Functions** 

500 DPI

17.4mm x 13mm

Patented Multispectral Imaging Sensor

Identification Methods: 1:1 / 1:N False Acceptance Rate: 0.00001% False Rejection Rate: 0.0000001% Identification Time: Under 2 Second

### **Communication Interface**

TCP/IP (LAN or WAN Networks)

USB Flash Download Wiegand In / Out Wi-Fi (Optional)

Technology:

Imaging Area:

Image Resolution:



#### **Environmental**

Temperature (Operating): 14° to 140° F / -10° to 60° C

Humidity: 20% to 80% **ESD Tolerance** -15000V



#### **Proximity Card Functions**

**EM RFID Proximity** Technology:

125 Khz Frequency:

Identification Methods: Card / Pin Number Identification Time: Under 1 Second



#### The Software

Easy Clocking® Time and Attendance Software helps you manage your workforce and track employee time and attendance in an easier, more efficient and affordable way. The Easy Clocking® intuitive, easy to use interface will dramatically reduce the number of hours required to process employee time and attendance and automatically calculate total worked hours including overtime, vacation, sick days and holidays. With the click of a button employee data can be imported to create many informative time and attendance reports.

#### **Control Labor Cost & Start Saving Today**

According to research, companies without an automated time and attendance solution tend to overpay employees by 1.5% to 10% of gross payroll due to intentional and error driven time theft, costing U.S. businesses billions of dollars each year. For a company with 10 employees, that can amount to more than \$10,000 a year. Easy Clocking® time and attendance solution helps you eliminate calculation errors by helping you accurately calculate hourly totals and automatically applying overtime policies accordingly.

#### **Software Features**

- Integration with Quickbooks, ADP, Paychex & most payroll providers
- Powerful, Reliable & Secure Microsoft SQL Database
- Scheduling
- Customizable Shifts & Breaks
- Paid Time Off Tracking



- Powerful Employee Time Card Dashboard
- Many Informative Time & Attendance Reports
- Administrator Feature to Edit, Add or Delete Records
- Tracks Employee Time (In / Out, Lunch, Breaks, Overtime, Holidays & Absences)
- Set up Rules Governing How Employee Time is Accounted for (Rounding, Early In or Late Out, Overtime)