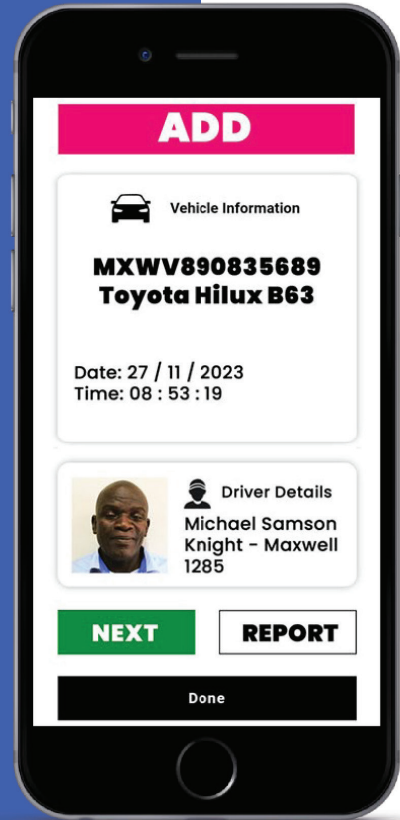**DigiCargo**

TRAINING MANUAL

Module 1 :

Stevedoring App Overview

Introduction to the Course

Welcome to the Stevedoring App Training Course! Throughout this course, you will learn how to effectively use the Stevedoring App to enhance your daily operations. This training is divided into four modules, each focusing on a key aspect of the app:

Module 1: Stevedoring App Overview

An introduction to the app's core features and how they fit into daily operations.

Module 2: Data Cleaning

Practical skills for cleaning, formatting, and importing VIN lists.

Module 3: Web Portal Administration

How to manage portal functions, including consignment and staff management.

Module 4: Operations Management

Techniques for managing port operations, support, and reporting within the app.

By the end of this training, you will:

1. Understand the purpose and features of the Stevedoring App.
2. Learn how to navigate the app and web portal effectively.
3. Master the data cleaning process and maintain accurate records.
4. Manage operations efficiently using the Stevedoring App.

Requistes

Given that the course is happening online, here are additional requirements to consider for the trainees to effectively participate in the training:

Online Course Requirements

1. **Device:**
   - A laptop, desktop, or tablet with an internet browser (preferably Chrome, Firefox, or Safari) for an optimal experience.
   - Mobile devices can also be used but may have limited functionality for certain course features.

2. **Internet Connection:**
   - A stable and high-speed internet connection (at least 3 Mbps download speed) to stream video content and participate in interactive features without disruptions.

3. **Audio:**
   - Speakers or headphones are required for listening to video content and audio instructions.

4. **Webcam (Optional):**
   - A webcam is recommended for certain interactive or instructor-led sessions if required by the course.

5. **Browser:**
   - Ensure that your browser is up-to-date for the best experience with the course platform. We recommend using the latest versions of Chrome, Firefox, or Safari.

6. **Software:**
   - Ensure that you have access to common software like PDF readers (for any course materials) and the ability to open common file formats (like .docx, .pdf, .xlmns etc.).
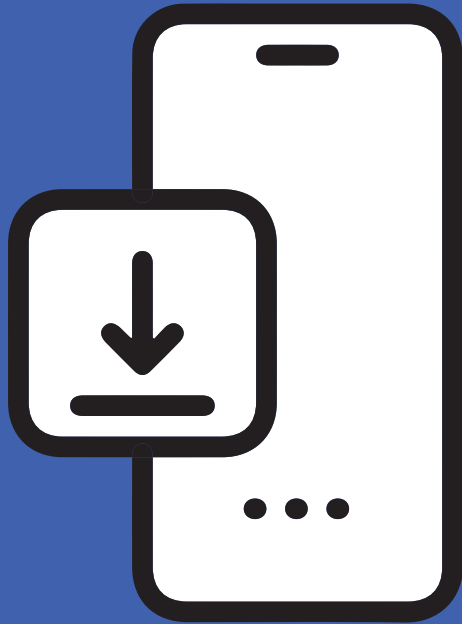
App Installation and Device Requirements

To get started with the Stevedoring App, ensure that your device meets the following minimum requirements:

- **Version:** 1.2.10

- **Operating System:** Android 5.0 (Lollipop) or higher

- **Compatibility:** The app is compatible with most Android devices.

- **Download Size:** 33 MB

- **Internet Connection:** A stable internet connection is required for syncing data and using features such as reporting incidents or receiving notifications.

- **Permissions:** The app may request certain permissions to work properly, such as access to your device's location and camera (for incident reporting).

- **Storage Space:** Ensure your device has enough free storage to install the app and store any necessary data.

Introduction to the Stevedoring App

History and Future of the Stevedoring App

The Stevedoring App was born out of a clear need in the cargo handling industry: to streamline vehicle tracking, improve data accuracy, and enable real-time visibility in port operations. Prior to its development, much of the stevedoring process relied on manual paperwork, radios, and delayed data capture, leading to inefficiencies, frequent errors, and operational delays.

The journey began in 2018 when James Zwane, representing Pace Online, introduced a mobile app concept to Siyamdumisa Dube and SA Cargo Services. This was the start of what would become a five-year transformation, with a dedicated task team led by Zakhele Gumede and analysis led by Bongathini Mofokeng and Xolani Nyuswa. Though originally tailored for a single client, it quickly became evident that the app had potential far beyond one company.

Between 2018 and 2023, the team focused on deep research, workflow analysis, and hands-on development. Analysts and developers worked closely with field teams to identify friction points and validate solutions. Each iteration of the app responded directly to challenges faced on the ground.

The first pilot deployment in early 2024 marked a major milestone. Operational challenges sparked key innovations—manual VIN entry for poor lighting conditions, and offline mode for areas with unreliable connectivity. These weren't afterthoughts; they were essential features born from necessity. Recognition followed quickly: a usability score of 8 out of 10 from Hoegh Autoliners confirmed that the app was both practical and scalable.

The tireless effort across departments saw the product delivered on time and ready for broader use.

Today, the Stevedoring App is more than a digital tool—it's a flexible, mobile-first platform built for real-time cargo visibility, streamlined coordination, and structured data management. It has matured from a prototype into a commercial-ready product with the capacity to support global operations.

Looking ahead, the future of the app lies in expanding its impact: integrating advanced analytics, predictive insights, and seamless real-time data sharing across systems. These enhancements aim to further improve accuracy, decision-making, and efficiency at every level of port operations.

The story of the Stevedoring App is not just one of innovation—it is one of perseverance, partnership, and purpose. Every challenge was met with creativity, every setback with determination. And now, with a solid foundation in place, the app is set to shape the next generation of cargo management.

How the Stevedoring App Works

The Stevedoring App is designed to streamline cargo handling through a seamless integration between its web portal and mobile app. Together, they ensure efficient data flow, real-time updates, and smoother port operations.

Web Portal to App and Back:

Understanding the Relationship

The **Web Portal** and the **Mobile App** work in tandem to manage the entire cargo lifecycle, from planning to execution:

- **Web Portal:** Primarily used for administrative functions, such as importing VIN lists, managing vessel schedules, and overseeing staff assignments. It serves as the control center where key data is entered and managed.

- **Mobile App:** Used for field-level tasks, including vehicle scanning, incident reporting, and real-time task updates. It allows users on the ground to interact directly with cargo data as they work.

Data Flow: Ensuring Real-Time Coordination

Data entered into the **Web Portal** is synced to the **Mobile App**, ensuring real-time updates. Similarly, any information collected in the field via the app—such as scanned VINs or incident reports—syncs back to the portal, allowing supervisors to track progress and make informed decisions.

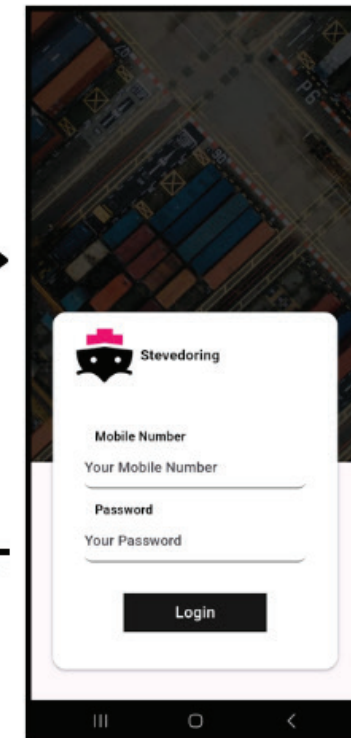This seamless flow of data helps maintain accuracy and accountability throughout operations.

How Data Flows in the Stevedoring App
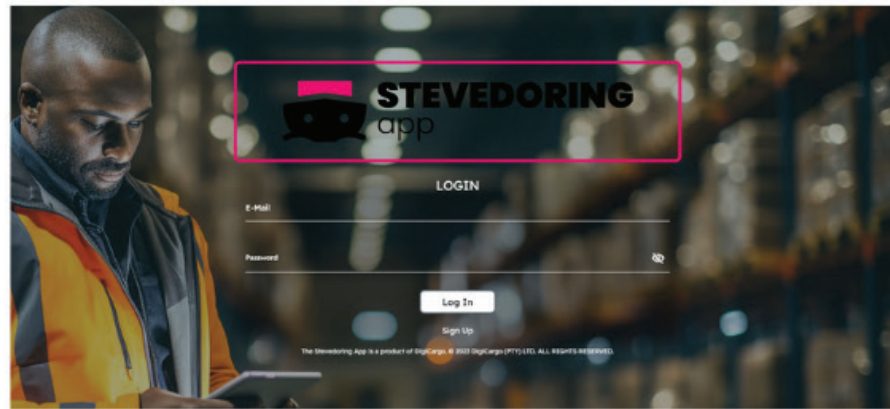
VIN list, vessel schedules etc

Scanned vehicles, ,incidents etc

Web Portal Login Screen
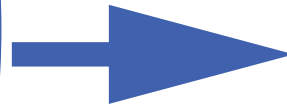
Mobile App Login Screen

Web Portal Features

The **web portal** serves as the administrative backbone of the Stevedoring App. Its key features include:

1. **Vessel Scheduling:** Plan and organize vessel arrivals, departures, and related cargo management activities.

2. **VIN Lists Importing:** Upload and maintain accurate lists of Vehicle Identification Numbers (VINs) that will be processed during port operations.

3. **Portal Content Management:** Keep all operational data up to date, including vehicle details, schedules, and consignment information.

4. **Reports:** Generate detailed reports on port operations, vehicle movements, and performance metrics for analysis and record-keeping.

5. **Staff Management:** Manage the assignment and roles of port staff, ensuring that the right people are handling the correct tasks.

6. **Incident Reporting:** Record and track any incidents that occur during cargo handling and port operations, ensuring accountability and prompt resolution.

7. **Archiving:** Store historical data, including past reports and VIN lists, for future reference and compliance requirements.

App Features

The mobile app complements the web portal by facilitating ground-level operations. Its primary features include:
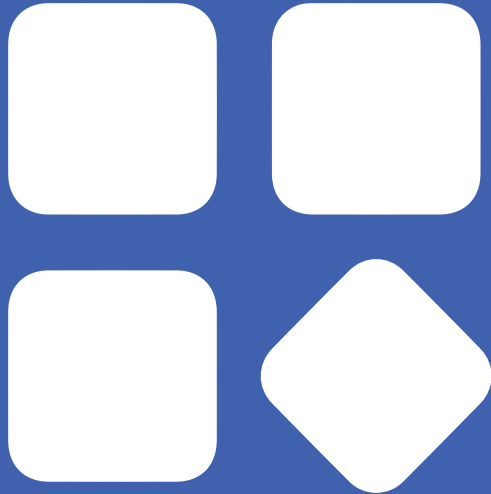
1 Vehicle Scanning:

Using the app's scanning feature to register and track vehicles in real-time.

2 Incident Reporting:

Logging any issues or irregularities encountered during cargo handling.

3 Task Updates:

Updating the status of cargo operations directly from the field.

4 Real-Time Sync:

Ensuring that all on-the-ground data is instantly shared with the web portal.

Stevedoring App Operation

A typical Stevedoring App operation involves the following steps to ensure efficient and accurate cargo handling:

1. **Data Preparation:**

- VIN List Import: VIN lists are imported through the web portal for accurate tracking.
- Data Validation: Verifying that the imported data is complete and accurate.
- User and Role Management: Adding or updating user profiles and assigning appropriate roles.

2. **Pre-Operation Checks:**

- System Accessibility: Ensuring that both the web portal and mobile app are accessible to authorized users.
- Device Readiness: Verifying that scanning devices are functioning correctly and synced with the app.
- Operation Briefing: Conducting pre-operation meetings to discuss schedules and roles.

3. **On-the-Ground Activities:**

- Vehicle Scanning: Using the mobile app to scan vehicle barcodes for tracking.
- Data Entry: Manually entering VINs when scanning is not feasible.
- Consignment Updates: Updating the status of consignments in real time.
- Incident Reporting: Logging any irregularities, damages, or issues encountered during the operation.

4. **Operational Coordination:**

- Team Communication: Using the app to communicate cargo status updates.
- Real-Time Updates: Syncing data from the app to the web portal for monitoring by supervisors.
- Status Monitoring: Keeping track of vehicles handled, pending tasks, and reported incidents.

5. **Post-Operation Review:**

- Data Verification: Cross-checking the scanned VINs against the imported list for accuracy.
- Incident Analysis: Reviewing reported issues and documenting resolutions.
- Feedback Collection: Gathering feedback from ground staff for continuous improvement.

6. **Reporting and Analysis:**

- Performance Reports: Generating reports on completed operations, incidents, and performance metrics.
- Data Archiving: Storing historical data for future reference and compliance.
- Management Review: Analyzing reports to identify areas for improvement and ensure compliance with operational standards.

Summary: Key Takeaways

The **Stevedoring App** is built to connect planning with execution—linking the administrative tools in the **Web Portal** with the field tools in the **Mobile App**.

The two platforms work together in real time, making sure everyone—from managers to ground crews—is working from the same accurate, up-to-date data.

The **Web Portal** is your command center for setup, oversight, and analysis. The **Mobile App** is your go-to for scanning vehicles, reporting issues, and updating tasks on the move.

When used together, they help reduce errors, improve communication, and keep cargo flowing smoothly.

By now, you should have a solid understanding of how the Stevedoring App fits into daily port operations. In Module 2, we'll dive deeper into data preparation—starting with VIN list importing and validation.