



Vulcanys

Android User Guide

How to use the Vulcanys™ Mobile Software

Copyright @ AAB Software Limited 2018

Contents

1.0	Introduction.	3
2.0	Installation.	4
2.1	Running for the first time and configuration	4
2.2	Registering the Mobile Device	5
2.3	Initial Synchronisation.....	7
3.0	Using Vulcanys.	9
3.1	Creating and Editing Work Items	11
3.2	Work item Detail Screen	12
4.0	Settings.....	15
4.1	Un-register the Mobile Device.....	16

1.0 Introduction.

The Vulcanys application is a mobile works management application designed for Android mobile devices running Android 5.1 or higher. The application allows your head office system to instruct workers in the field whilst at the same time receive an electronic record of the work done in the field. The Vulcanys application can also be used to record the GPS position of your worker s in remote locations so that for health and safety reasons you know where they are. The type of instructions issued to your workers and the data received is configured via the website at www.AABSoftware.co.uk, for instructions on configuring the work sets for the mobile device the reader is referred to the companion document, Vulcanys Cofiguration Guide.

The Vulcanys application is designed to work without a permanent data connection to our servers. This means that when working in locations without a phone signal/data connection, your employees can continue recording their work which is uploaded once the mobile device establishes a connection to our servers.

2.0 Installation.

To install the Vulcanys application, the installation file must first be downloaded from the following web page, www.aabsoftware.co.uk/Home/Vulcanys. In order to be able to download the file you must first be logged into the website. By clicking the Android icon at the bottom of the web page, the Vulcanys.APK file will be downloaded onto your computer or mobile device, depending upon which device you use to access the website. If you are using a computer, you will need to locate the downloaded file and copy onto the mobile device. Once the Vulcanys.APK file is on the Android mobile device, browse to the files location on the mobile device and click on the Vulcanys.apk file. This will start the installation process and you just need to follow the onscreen instructions. Once the application has been installed, you are ready to start using the application.

2.1 Running for the first time and configuration

When the Vulcanys application starts up for the first time you are presented with the screen shown in Figure 1.1. The screen shown in Figure 1.1 is the main screen for the application and from this screen it is possible to create new work records, modify and/or delete existing work records. It is also from this screen that you send and receive work to/from your head office system, respectively.

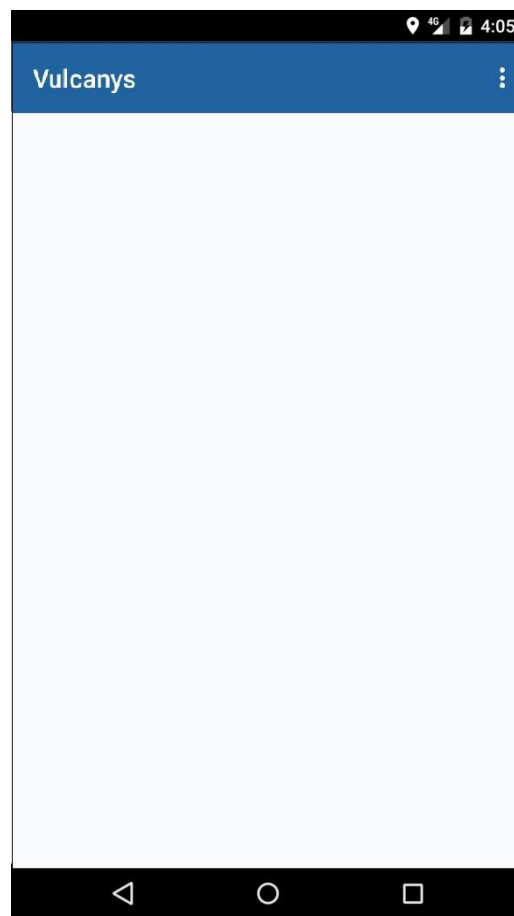


Figure 2.1 The Initial screen displayed.

However, at this stage the application has no knowledge of your account details, what services you have subscribed to and what if any items of work you have configured on our servers. To connect the mobile device to our services you need to first register the mobile app with our servers which is done via the registration screen, see section 1.3 for further reading. The initial blank screen shown in Figure 1.1 has two menu options which are accessed via the three dots shown in the top right corner of figure 1:-

- Register:- This allows you to connect the mobile device with your account on our servers. For further reading the reader is referred to section 2.3.

2.2 Registering the Mobile Device

In order for the mobile device to send and receive data from your head office system via our servers, it must first be registered with our server. By selecting the register menu option, you are presented with the screen shown in Figure 2.2. The registration process requires you to enter a username, password and a description for the device. When entering the Username and Password into the registration screen, the username and password fields should be the same as those used to log into the website at aabsoftware.co.uk. The description field is used to identify the mobile device on the server and head office system and should be as unique as possible.

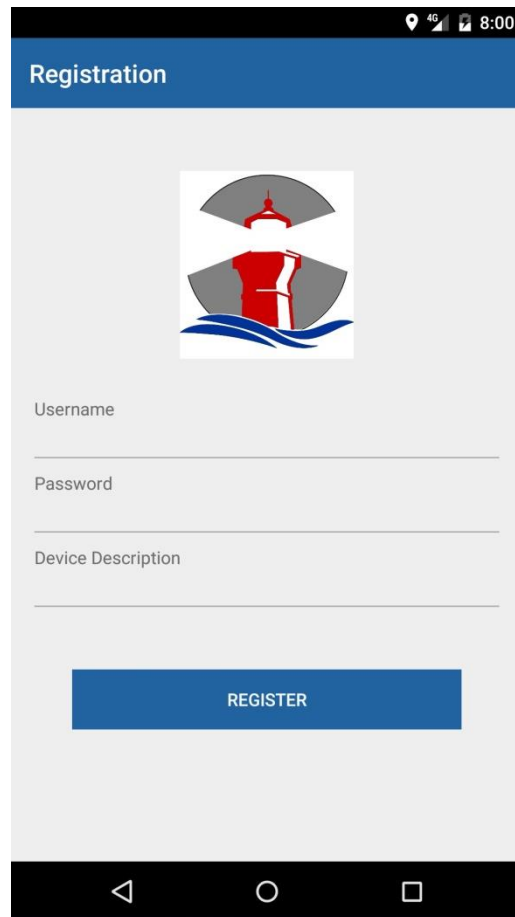


Figure 2.2 The Registration screen.

Once all of the details have been entered, pressing the register button will connect the mobile device to your account on our servers. Depending upon what you have already entered as part of the mobile configuration will affect the rest of registration process. If you have entered two or more device groups into the system via our website then as part of the registration process you will be displayed a screen like that shown in Figure 2.3 which lists all of the device groups you can assign the mobile device to.

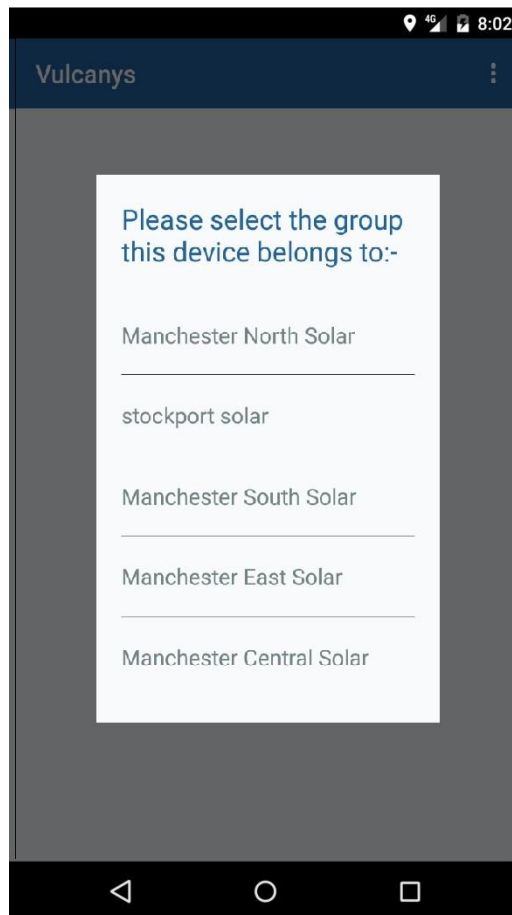


Figure 2.3 The Device Group selection screen.

If you have configured fewer than two device groups then you won't see figure 1.3 as part of the registration process. Instead, if you only have one device group set up on our system then the mobile device will automatically be assigned to that one device group. If you have not set up any device groups on our system then the mobile device won't be assigned to a device group which has the knock on effect of prevent the mobile device from receiving and sending work records to your head office system.

The registration process is a onetime process that cannot be repeated unless you first unregister the device via the unregister functionality of the software, see section 4.1, or is delete on the website and the mobile device synchronised with the server. If at registration you had no device groups setup you can enter them via the website, assign the mobile device to a group and when the device synchronises it will pick up this change and allow work to received and sent to your head office system.

2.3 Initial Synchronisation.

The Synchronise menu option starts the application's synchronisation process. It is this process that handles the transfer of data between the mobile device and our servers. In order for the synchronisation process to work the device must be assigned to a device group, either via the web site or as part of the registration process. When the synchronisation process is run for the first

time, all of the work items associated with the allocated device group are downloaded from the server. Subsequent synchronisations will only download changes the work items.

After the work items have been downloaded onto the mobile device a new menu option is added to the initial screen shown in figure 2.1. This menu option allows you to record new work records. For further reading the reader is referred to section 3 for normal use of the software.

3.0 Using Vulcanys.

Once you have performed the initial setup of the software on the mobile device you will be presented with the Initial screen shown in Figure 3.1. This screen is the main screen of the application and from here it is possible to create new work records, edit existing ones, send and receive work to and from your head office. Additionally, it is from this screen that you can create more work records direct from the device.

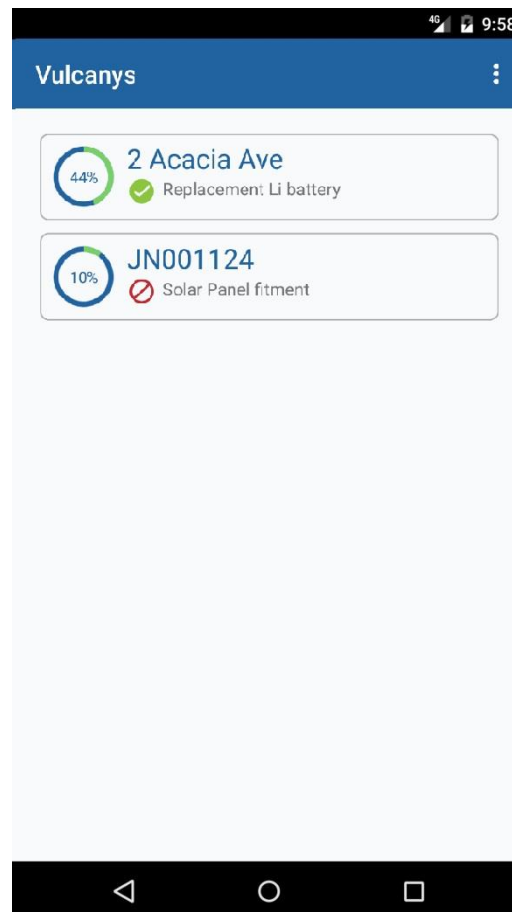


Figure 3.1. The Initial screen displayed.

The sample screen shown in Figure 3.1 shows that there are 5 different work jobs currently being recorded on the device. This list can contain any number of entries and each entry in the list consists of four elements, as shown in Figure 3.2.

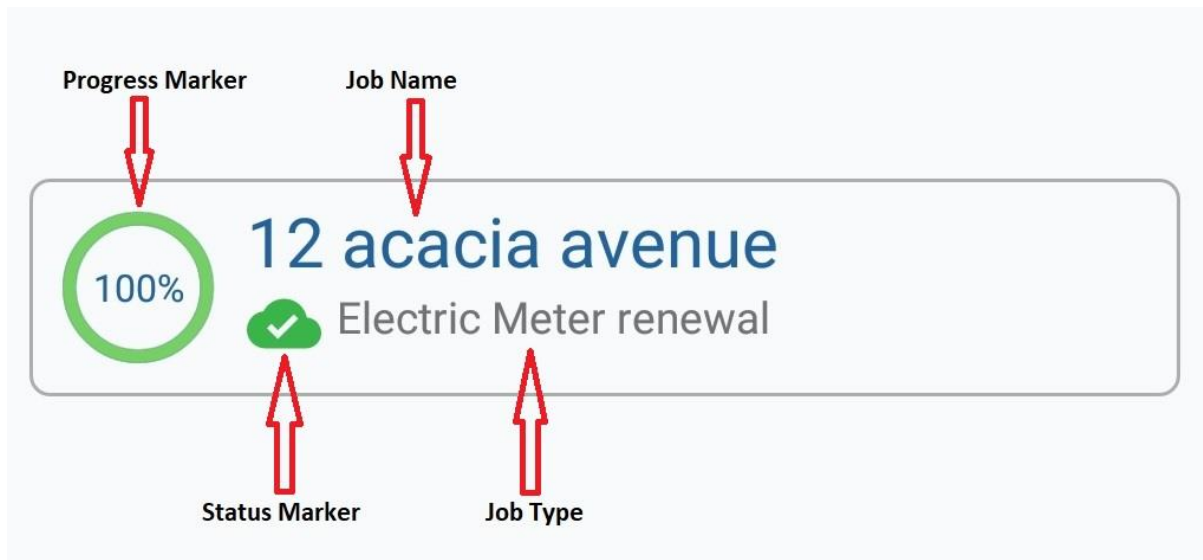






Figure 3.2. Each entry on the initial screen.

The Progress Marker shown in Figure 3.2 indicates the progress of recording the job as a percentage. The Job Name is the description of the works location which in this case as a street address. The job Type is what you have set up on our website as a work item. This determines what the mobile user has to record as part of the job and can also be used to guide the mobile device user. The Status Marker is an icon indicating the status of the job record and can have one of the following values:-

- 
The Work Item is in progress and has compulsory questions that must be answered before it can be uploaded to your head office system.
- 
The Work Item is in progress and can be uploaded to your head office system as all compulsory questions (if any) have been answered.
- 
The Work Item is complete and awaiting uploading to head office.
- 
The Work Item has been uploaded to the head office system and is now closed awaiting purging from the mobile device.

Each work record has a context based menu option which is activated by pressing and holding on a particular row entry. After about 2 seconds a popup menu will be displayed to the left of the screen which allows you to perform one of the following actions:-

- **Open:-** When a work item is selected in the List shown in Figure 1, this menu option opens the specific entry so that you can view/modify the details of the work. For further reading the reader is referred to section 2.6.
- **Delete:-** This permanently removes an item of work from the application and cannot be recovered.

- Complete:- Allows the user to mark a work item as complete so that it will be uploaded to head office next time a synchronisation takes places. For further reading the reader is referred to section 2.8.

Once all compulsory questions for a Work Item have been answered, the mobile user has the option of marking the Work Item as complete. Only Work Items marked as Complete are uploaded to the head office system during the synchronisation process and once the Work Item has been uploaded, its status is changed to indicate that it has been uploaded. If a Work Item that has been completed and not uploaded or a Work Item that has been uploaded is opened, any changes made to the Work Item and saved, reset the status of the Work Item to being in progress.

3.1 Creating and Editing Work Items

The creation of Work Items on the mobile device can be performed in one of two ways. The first way is when the mobile device synchronises with head office and new Work Items are downloaded onto the device and displayed on the initial screen shown in Figure 3.1. The mobile user would then need to open/edit the appropriate Work Item which causes the screen shown in Figure 3.4 to be displayed. Alternative, if head office has configured the mobile device to allow the mobile user to create their own Work Items, then the mobile user can create their own Work Items by selecting the “New” menu option from the initial screen causes the screen shown in Figure 3.3 to be displayed.

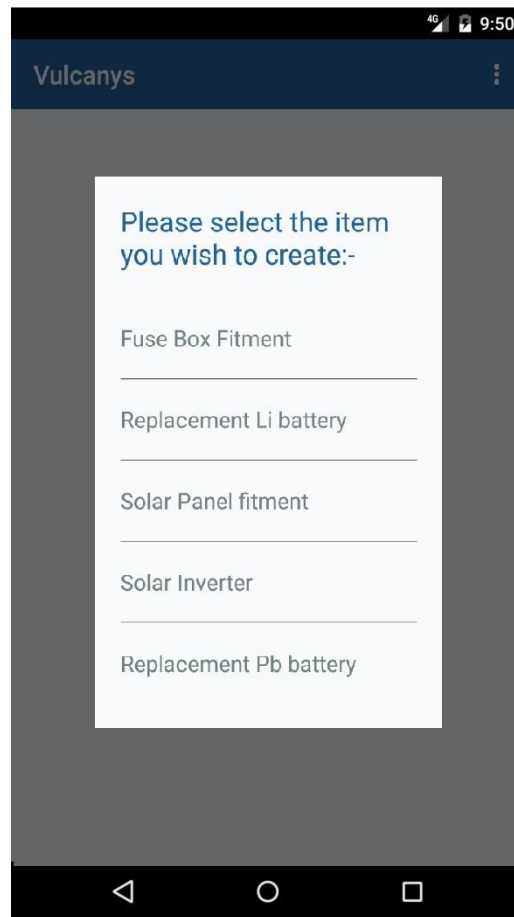


Figure 3.3. Creating a new Work Item.

Figure 3.3 shows a list of all work items associated with the mobile device's group that have been set up to allow the mobile user to create their own records. This list can change as a result of the synchronisation process to reflect any configuration changes made via the website since the last synchronisation took place. Selecting an entry from the list takes you to the detail screen for the selected work item shown in Figure 3.4.

3.2 Work item Detail Screen

The work item detail screen is the main screen for recording the work done for a work item and consists of a series of questions and answer entry fields as shown in Figure 3.4. The exact layout of the work item will depend upon how head office has configured each question along with the order that each question appears on the screen.

Figure 3.4. Work Item Entry screen

From the example screen shown in Figure 3.4, the work item was configured to record the cars registration number, the cost of a battery, the date the battery was fitted and also the customer's signature to confirm the battery has been fitted. The work item could easily as well have been configured to also capture the serial number of the battery and request a picture of the old and new batteries.

The actual composition of the work item detail screen is completely dynamic and based solely upon what question types you specify for a work item and the order that those questions appear. Each question that forms part of a Work Item will conform to one of the following formats:-

- Barcode
- Currency
- Date selection
- List selection
- Number entry
- Photograph
- Question group
- Signature
- Text entry.

When a question is configured to be of type barcode or photograph, the application uses the mobile devices camera to capture the required information. Signature based questions capture the user's signature via an entry screen and list and date fields only allow you to select a pre-existing value. Those configured as a Currency only allow you to enter a value that matches the mobile devices currency setting, whereas, those configured as a Number entry will only allow whole numbers to be entered into the field and those configured as text entry will allow anything to be typed into the field.

Not only can head office configure the questions order and type, they can also specify that a question being answered is optional or compulsory. Compulsory questions have to be answered before you can upload the work item to your head office and questions of this type are denoted by an asterisk prefixing the question.

In order for you changes to a work item to be persisted until such time as it's uploaded to your head office, you must use the save menu option. Using the android back key or the cancel menu option will not save your changes on the mobile device.

4.0 Settings.

The settings screen shown in Figure 4.1 allows you to configure some of the automatic behaviour of the application. The exact layout of the settings screen will depend upon what subscriptions you have configured for the mobile device.

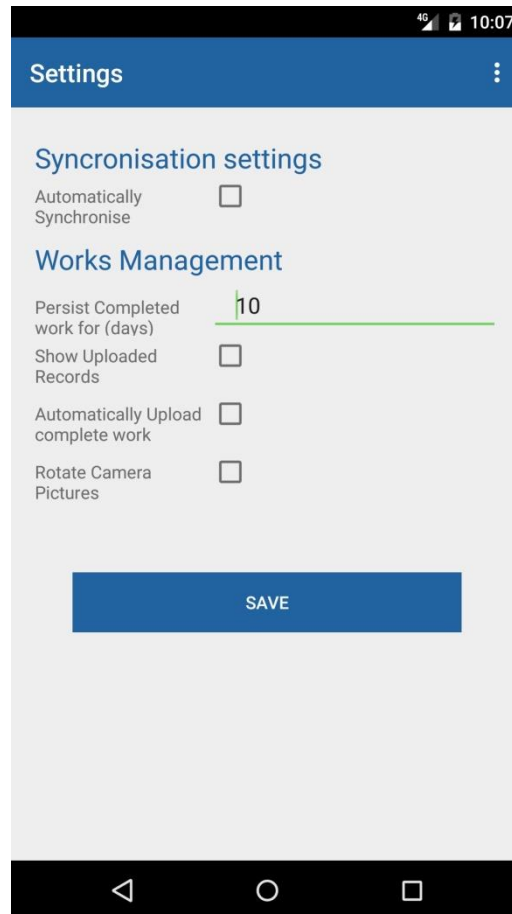


Figure 4.1. Settings screen

The default synchronisation process is set to occur on a daily basis but this can be turned off so that the synchronisation process becomes a manual process.

If the mobile device has been configured for GPS tracking you will be able to change how your GPS position data is uploaded to the server, If you configure the device to continually update the servers then every time your position changes by more than two meters since the last logged position, the GPS coordinate is automatically sent up to our servers. If you turn of this feature then the GPS data is only uploaded to the server when a synchronisation process takes place.

If the mobile device is configured to use the works management service, the end user is presented with the works management section shown in Figure 4.1. When a particular item of work is set to complete by the mobile user, the work record remains on the device waiting to be uploaded to the server until the next synchronisation process uploads it to the server. When the synchronisation process sends the work record up to the server, the record exists on our servers and is no longer required to be held on the mobile device. You have the option to configure how long you store uploaded work entries on the mobile device. This allows you to modify work items already

uploaded to head office without the need to have them resent back to the mobile device by head office. Additionally, this ensures that even in the event of a server failure that is not covered by a system backup, you can always re-upload a work item to head office. It is advisable to persist uploaded work for a minimum of two days.

When an work item is uploaded to our servers, it's status changes to indicate that it has been uploaded and is removed from the initial screen list of work shown in Figure 3.1. The displaying of uploaded work in the initial screen shown in figure 3.1 can be toggled on and off by the show uploaded tick box. This allows you to review/modify uploaded work that still resides on the mobile device which can then be re-uploaded to our servers for collection by your head office.

When pictures are taken with the mobile devices camera, the image can appear to be rotated by 90 degrees. This is caused by different hardware being used by the different mobile devices. To cater for this, you have the ability to specify that the image be rotated which will correct the image layout for the mobile device via the Rotate Camera Pictures option shown in Figure 4.1.

In addition to being able to configure the Vulcanys application the setting screen also allows you access to the unregister functionality via the menu option on the settings screen, see section 4.1 for further information.

4.1 Un-register the Mobile Device.

The un-registration process removes the details of the mobile device from the server and prevents the mobile device from synchronising with head office. Selecting the un-register menu option on the settings screen displays the screen shown in Figure 4.2.

To unregister a mobile device, it is necessary to enter the same credentials used to log into the website into the username and password so as to confirm that only an authorised person can unregister the device. It is noteworthy that the un-registration process is one-way process that cannot be undone. If the device is subsequently re-registered, the device gets a new identity on the server and work items uploaded prior to unregistering, are displayed separately to any uploads made from the re-registered device.

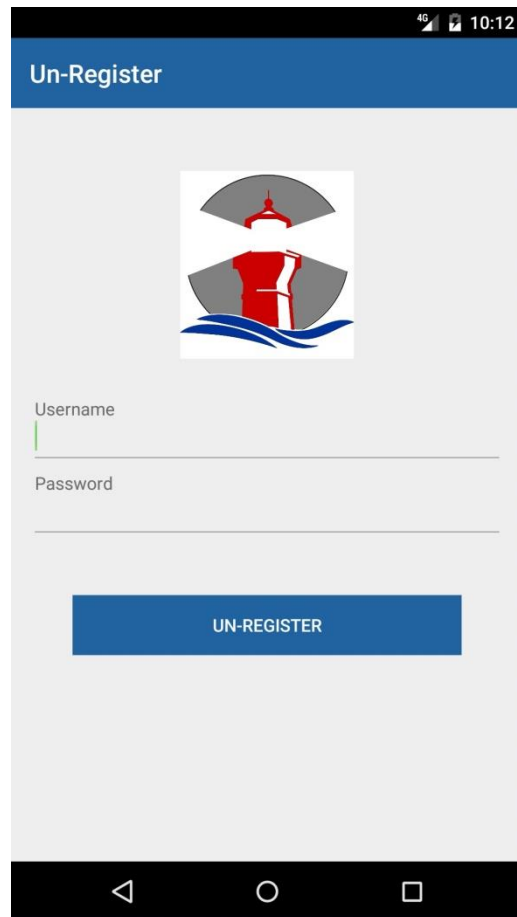


Figure 4.2. Un-Register screen