

SADC REGIONAL PROGRAMME FOR RHINO CONSERVATION

WILDB

LOCAL DATABASE
VERSION 1.33

REFERENCE MANUAL



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The Programme is contracted to CESVI and implemented through a regional consortium which comprises:

- The Secretariat of the Southern Africa Development Community (SADC)
- IUCN-ROSA (The World Conservation Union - Regional Office for Southern Africa)
- The IUCN African Rhino Specialist Group
- WWF-SARPO - (World Wide Fund for Nature - Southern Africa Regional Programme Office)
- CESVI (Cooperazione e Sviluppo)

The **Programme goal** is to contribute to maintain viable and well distributed metapopulations of Southern African rhino taxa as flagship species for biodiversity conservation within the SADC region.

The **Programme objective** is to implement a pragmatic regional rhino strategy within the SADC region following the acquisition of sound information on, firstly, the constraints and opportunities for rhino conservation within each range state and secondly, the constraints and opportunities for rhino metapopulation management at the regional level.

DISCLAIMER

The information, opinions and materials presented herewith do not necessarily reflect the official views of any of the organisations involved, including the Italian Ministry of Foreign Affairs, SADC, CESVI, IUCN-ROSA, WWF-SARPO, AfRSG or governments of SADC member countries.

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Introduction

The WILDb Local Database is a Microsoft Access Database Application designed primarily to assist with rhino monitoring in Southern Africa. It was developed for use by National Parks and Conservancies by WWF SARPO as part of the SADC Regional Programme for Rhino Conservation, funded by the Italian Ministry of Foreign Affairs, Directorate General for Development Cooperation. The developers (Craig Springett & Wendy Marshall) acknowledge the developers of the KZN Wildlife Animal Population Database (Rose Hamilton & Neil Langley), and the Malilangwe Wildlife Database (Sarah & Bruce Clegg), for the species tables used in this database, and the input of Graham Connear, Raoul du Toit and Rob Brett.

Using this manual

This document is a more detailed supplement to the WILDb “Getting Started” manual, and assumes you are familiar with the introductory material presented there.

It is broken into several parts, each providing a detailed description of one of the WILDb “zones” (see “Main Menu” on page 5).

Note that the screenshots in this manual containing example records do not necessarily represent realistic data.

Main Menu

The WILDb Main Menu provides access to the functional zones of the application using graphical buttons. Click one of these buttons to access a zone (or form). It is possible to have more than one form open at a time.



1. *Individuals* – This is where you record, view, and edit information about identifiable animals.
2. *Events* – This is where you record specific ‘happenings’ involving both known Individuals and animals that cannot be identified. Events recorded here may automatically update records in the Individuals zone.
3. *Population Summary* – Shows summarised details about the whole subpopulation, plus statistics derived from that data and the ability to record population counts.
4. *Customise WILDb* – Used to set up your own reference data such as Locations, Age Classification Systems, Observers, Activities, and much more. This reference data forms the lists from which you can choose values when entering Individual or Event data. The Customisation zone also allows you to define information about Species, select which subpopulation your data represents, and more.
5. *Export to National Database* – Use this to create a summarised version of your data ready for sending to the national coordinator.
6. *Import from Cybertracker* – With this facility you can import sightings recorded using the Cybertracker™ field computer into WILDb. You must configure WILDb to receive the data first – see “Import from Cybertracker zone” on page 35 for details.

Individuals Zone

From *Individuals* you can create, edit, delete and view details about identifiable animals in the subpopulation. These animals should be positively identifiable by significant markings – if you're not sure then don't record the animal here. Instead, sightings can be logged for "unidentified animals" in *Events*.

Individuals is split into four pages containing details about an Individual: "Individual Details", "Relationships", "History", and "Photos".

Individual Details Page

The screenshot shows the 'Individual Details' page in the WILDb software. The page is divided into several sections:

- Form Fields:** National ID (123), Species (rhino, black), Name (Mupunga), Sex (Female), Date of Birth (01-Oct-93), DOB Accuracy (Unknown), Mother (Bulawayo), Father (empty), Introduced? (checkbox), Current Status (Independent), Status Date (27-Jul-00), Recognised (27-Jul-00), Independent (checkbox).
- Identifying Image:** A photo of a rhino's face with a female symbol (♀) overlaid. Buttons for Reset, Clear, and Browse are present.
- Right Panel:** Species-> rhino, black; Nat ID-> 123; Name-> Mupunga; Goto Events button.
- Bottom Right Panel:** Print Report, Individual Filters (Off), Find Individual, New Individual buttons.
- Table of Active Markings:**

IDType	Position	Orientation	Marked	Expiry	Last Action	Action Date
Brand/Tattoo	Unspecif	Unknown	10/03/00		Marking Applied	10/03/00
Notch	Ear	Left	14/09/00		Marking Applied	2/02/01
Natural Marking	Shoulder	Right	10/02/00		Update Descripti	2/02/01
Transponder Chip	Horn	Anterior	14/09/00	14/03/01	Marking Applied	2/02/01

Details last updated: 28/04/01 15:19:07

This is the page on which you can directly edit details about an Individual. Required fields have red borders – the others you can ignore if you wish.

National ID is the ID allocated to this animal by the national coordinator. You should obtain it from them. After this is an **Alternate ID**, which is optional.

Species must be recorded (you can add a new species in the *Customise WILDb* zone). At the top of the drop down list are all the species for which Individuals have been recorded in your database. Following these are all other known species, in alphabetical order.

TIP: You cannot change an Individual's species if it has been involved in any Events with other animals. This is because each Event can pertain to only one species.



Date of Birth must be entered for all Individuals. This is because it is used in age calculations and population statistics. To select from a calendar, click the "Calendar" button. You can specify how accurate you think this birth date is with the **DOB Accuracy** field. Note that the Accuracy field does not currently affect calculations of age, etc.

If the **Mother** or **Father** is another Individual in the database then you can select them from the list provided. This will help WILDb build the data on the Relationships Page. Otherwise you can tick the "check for other" box to manually enter the name of the parent.

Introduced should be ticked if the animal was introduced into the subpopulation rather than having been born there. This can be used to filter introduced animals out of certain population statistics – for example "Average Age at First Calf" should ignore Mothers who may have had unrecorded calves before they arrived at this site. The date beside this checkbox represents **Introduced Date**. Again, you can use the "Calendar" button to choose from a calendar.

Current Status is listed as either Dependent, Independent, Dead, or Removed. The first two refer to the Individual's dependence on its mother (and/or father for some species). "Removed" means that the animal is no longer part of this subpopulation, so should be excluded from Population Statistics. **Status Date** is the date that the status was last set.

Certain Events can automatically update these fields. For example, when a "Death" Event is recorded the status of all Individuals involved can automatically be updated to "Dead". When an "Emigration" or "Removal" Event is entered, the status of Individuals can be updated to "Removed". In both cases, WILDb will ask you if you want to proceed with the status change(s).

Recognised date is the date when the Individual was first uniquely identifiable (this may be after having been tagged, for example). This will be initialised to the date you create an Individual record.

Independent date indicates when the Individual changed from *Dependent* to *Independent* status. This is set automatically when the status changes – whether that change is made manually or through an Event.



“Paint can” tool

The **Identifying Image** is based on a template that can be configured for each species (in the *Customise WILDb* form, on the Species page). To edit the image for an Individual double-click on it and you’ll be able to use Microsoft Paint to edit in-place. The Rhino images provided with WILDb contain outlined standard ear notches. To fill in the appropriate notches you can use the “paint can” tool.



Reset, Clear, and Browse buttons

Using the buttons to the right of the image you can reset it to the default (“Reset”), clear it (“Clear”), or insert a new image from a file (“Browse”).



This image represents Unknown sex

In **Notes** you can fill in any extra information about an animal you want to record. Just click in the box, and type away.

The *Individuals* main page also provides some summary information pertaining to the Individual. Apart from an image representing its *sex*, the animal’s current *age* (or age at death) is calculated and displayed here with the corresponding *Age Category* and whether this represents a *Breeding Age*. These categories are fully configurable for each species using the *Age Classifications* page on the *Customise WILDb* form.

Relationships Page

Individual Details Relationships History Photos

Mother: Bulawayo Father: *Unknown*

Species-> rhino, black
Nat ID-> 123
Name-> Mupunga

Go To Birth Event

Mupunga (Female Symbol)

Age at First Calf: 53.8 mths
Avg Calving Interval: 22.9 mths
Next Calf Expected: 11/02/02
Using Species Avg Interval: 05-Apr-03

Identified Siblings

Type	Name	Sex	Age(Mths)	AgeCategory	Status
Maternal	Khumalo	F	62	3.5-7 years	Independent
Maternal	Chando	M	39	3.5-7 years	Independent
Maternal	Bulawayo's calf	U	11	6-11 months	Dependent

(Double-click to edit individual)

Unidentified Offspring

Event ID	Sex	Age(Mths)	AgeCategory	Status
----------	-----	-----------	-------------	--------

(Double-click to edit event)

Identified Offspring

Name	Sex	Age(Mths)	AgeCategory	Status
Eline	F	39	3.5-7 years	Dependent
Mupunga's Calf	U	16	1-2 years	Independent

(Double-click to edit individual)

This page shows animals related to the Individual plus calving details for females. It is a view of the data only – it cannot be edited directly from this screen. You can, however, jump to the relevant *Events* and/or *Individuals* record by “double-clicking” on a row (as indicated on the screen).

Note that “**Identified**” Offspring are those that have been entered into the database as recognised Individuals. “**Unidentified**” Offspring are those which have not yet been recorded as Individuals – they only appear in the “Birth Details” page of a Birth Event.

You can:

- Double-click on a parent to view the parent details;
- Double-click on a sibling to view the sibling details;
- Double-click on an “Unidentified Offspring” to view the Event at which the calf was born;
- Double-click on an “Identified Offspring” to view the Calf details;
- Click the “Go To Birth Event” button (if enabled) to view the Event at which this Individual (Mupunga in the example above) was born.



Female Stats
explained

Female Statistics on the Relationships Page

If you are looking at a female animal, you will see some extra statistics in the *Relationships* form:

- **Age at first calf** is the calculated age of the Individual when it had its first *recorded* calf (whether the calf has now been identified or not)
- **Avg Calving Interval** is the average length of time between calves for this Mother (only shown if she has had at least two calves)
- **Next Calf Expected** is the date resulting from adding the Individual's Average Calving Interval to her last calving date
- **Next Calf using Species Avg Interval** is the same as the previous field, except that it uses the Average Calving Interval of the whole Species instead of just this Mother's average. Note that this average is calculated *including* Introduced mothers.

History Page

Individual Details | Relationships | History | Photos

Display "No Sighting" alarm after: months

Species-> rhino, black
Nat ID-> 123
Name-> Mupunga

Most Recent:	ID	Date	Type	Sub Type	Location	Place	Observer
Event	9153	27-Apr-01	Sighting	Visual	Masapas	6 - Paddock	Ranch Scout
Measurements	9149	28-Feb-01	Immobilisation	Ear Notching	6 - Paddock	Masapas	Ranch Scout
Samples	9149	28-Feb-01	Immobilisation	Ear Notching	Masapas	6 - Paddock	Ranch Scout
Toothwear	9149	28-Feb-01	Immobilisation	Ear Notching	Masapas	6 - Paddock	Ranch Scout

Event History:

Event Type: Show All Event Types
 SubType: Show All Sub Types
 Reporting Period: Show All Dates
 Start:
 End:

1 Records

Event	EventDate	SubType	Location	Place	Observer	Age at Event
9153	27/04/01	Visual	Masapas	6 - Paddock	Ranch Scout	> 7 years

This page lists significant past Events for the Individual, including details of the latest recorded Event, Body Measurements, Biological Samples and Toothwear for the Individual.

The “No Sighting alarm” will provide a warning if the Individual isn’t sighted for the specified number of months. There is a default for each Species (on the *Species* form in the *Customise WILDb* zone), but here you can override that default if required. This is optional – leave it blank to keep the Species value.

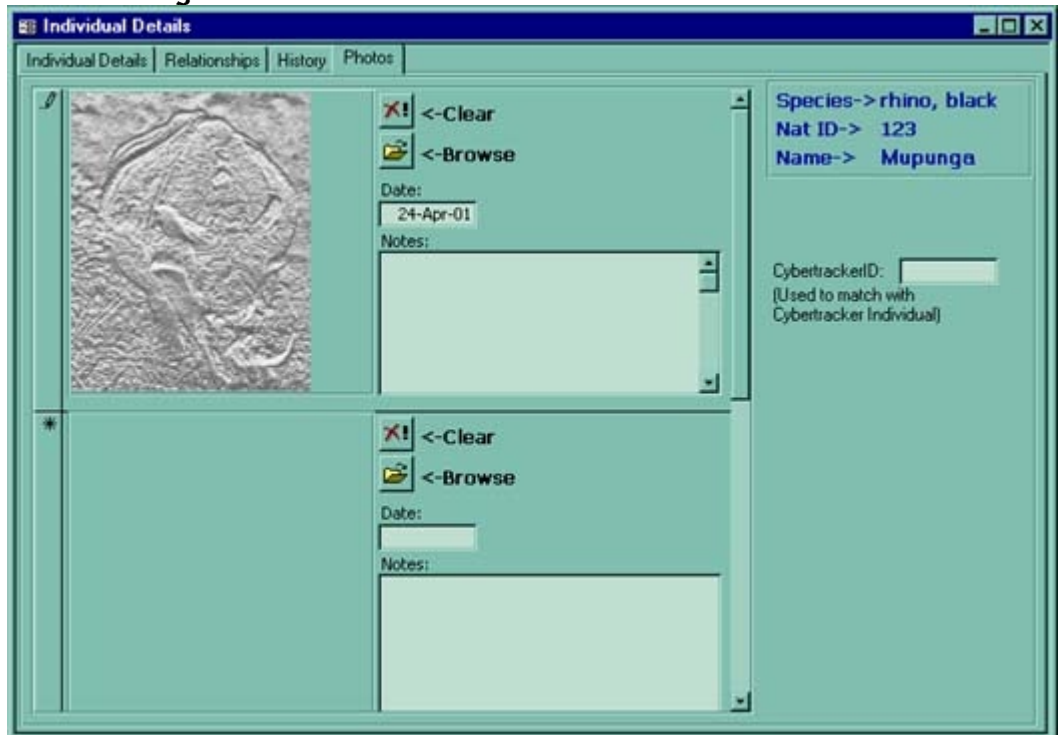


“Retrieve Results” button

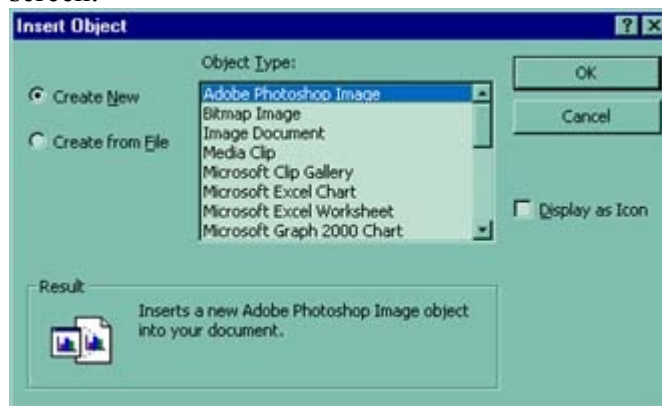
Click on the “Retrieve Results” button to see a count and list of recent Events for this Individual of the type specified under the “Event History” section. You can restrict the time period shown using “Reporting Period”. Choose the “Specify Range” period if you want to type in a date range yourself.

You can view details for any of the Events referred to on this page by double clicking on the relevant row.

Photos Page



On the final page in the *Individuals* form, you can record photographs of the animal and associated notes. Simply click on “Browse” to obtain the following screen:



Choose “Create from File”, and specify the location of your photo (or click on “Browse” again to find it using Explorer). Then click “OK”, and your photo will be copied to the WILDb database. These photos (along with the Identifying Images on the front page of *Individuals*) are stored in a separate file called WILDb_Images.mdb, in order to reduce the size of the main database file.



New Record



“Delete Record”
button

You can record as many photos as you want in this way (for a new photo, click “Browse” in the space for a new record). Against each photo you can record a date and notes, in the fields provided. To delete a photo record (a record includes the photo, notes, and date), click on one of the three fields then click on the “Delete Record” button.

TIP: If you record a photo that was stored as a JPG file instead of a bitmap (BMP) it may appear as an icon in WILDb. Double-click on the icon to view the full photo.

Cybertracker ID on the Photos Page

If you use the Cybertracker™ system (a device for accurately recording sightings, developed by Cybertracker Software in South Africa) you can record the Cybertracker ID of the Individual on this page. WILDb can then automatically log Events from Cybertracker sightings of the animal.

Events zone

In *Events*, you can Create, Edit, Delete and View details about Sightings, Births, Immobilisations, Translocations, and other important occurrences. Within these Events you can add *Participants* – recorded Individuals, unidentified animals, or both.

The zone contains a main “Event Details” page, and a number of other pages that may or may not be visible, depending on the *Event Type*.

Event Types

Events can be one of several broad types, each of which has a number of “subtypes”.

Following are the available Event Types:

- **Sighting** – for recording a sighting of animal(s).
- **Emigration** – for recording a migration *out* of the subpopulation
- **Immigration** – for recording a migration *in* to the subpopulation
- **Introduction** – for recording the *import* of an animal(s)
- **Removal** – for recording the *export* of an animal(s)
- **Death** – for recording the Death of an animal(s)
- **Reproduction** – for recording the Birth of an animal or “litter”
- **Immobilisation** – for recording the Immobilisation of an animal(s)

Of these Event Types, all but Sighting offer an “Extra Details” page where you can record information specific to that Event Type. You don’t need to fill this in if you don’t want it.

Event Details Page

Name	Sex	Age Category
Mupunga	F	3,5-7 years
Mary	F	> 7 years
1 Clean	M	> 7 years

Group Size-> 3

Participant Details

Body Condition: Good

Activity: Feeding

Notes:

Event Notes:

Details last updated: 9/07/2002 8:41:34 PM

Species-> rhino, black
Event ID-> 313
Partcpt-> Mupunga

<- Goto Individuals

<- Verify All

<- Export to GIS

<- Print Report

<- Event Filters (Off)

<- Find Event

<- New Event

Record 291 of 9136

This is the main detail page for Events. There are three main sections. The **Event Details** on the left side, the **Participant Details** in the middle, and the **Navigation and control buttons** on the right. The latter have mostly been explained in the “Getting Started” Manual. The others are described here.

Event Details

This is where you record general details about the Event. The fields are used by all event types, and are *not* recorded separately for each Participant. Fields outlined in red must be filled in.

Event Type holds one of the eight types listed above, and must be filled in. When you change it, the pages available to you will also change. Note that Reproduction events can only have one (female) participant – the mother.

Sub Type is the Event Subtype. These are specific to Event Type. The list can be amended by your national coordinator.

In **Date/Time** you can record the date and time that the Event *occured* (not the date of recording). This may be a “best guess” – Date **Accuracy** can be specified below. For Death Events, you can record the actual date of discovery on the *Death Details* page (see page 21).

Species Code will be disabled (greyed out) once a participant has been added, since you can only have participants of a single species in the Event. Species that have been recorded as Individuals in the database are at the top of the drop-down list.

Location is used to specify the broad section of the site in which the Event took place (eg Ranch, or Grid). **Place** is the detailed position within this location (eg waterhole, or pan). You can (and should) customise these for your own site –do this in the *Customise WILDb* zone.



Shortcut
“Customisation”
button

TIP: A number of **shortcuts** to the customisation form are provided – hit the one next to Location to immediately edit the list of locations (for example). When you close the *Customise WILDb* zone, you will be returned to *Events* and can now use the new locations.

You can add new **Coordinate Systems** in the *Customise WILDb* zone (to refer to a grid system, for example). UTM and Lat/Long should not be removed, however. The actual coordinates may be labelled “**Lat/Long**” or “**X/Y Coordinate**” depending on which coordinate system you specify. Fill these in to give precise positioning for the Event (they’ll be filled in automatically if you use the Cybertracker™ system and import your sightings from it). Perceived **Accuracy** of the coordinates can be recorded underneath.

Note that when recording **Latitude**, you must specify degrees, minutes, seconds, and either “N” or “S” depending on whether you are North or South of the Equator. For **Longitude**, use “E” or “W” depending on whether you are East or West of the Prime Meridian (Greenwich).

TIP: If you use *Customise WILDb* to set a Place’s coordinates, then the Event coordinates will be filled in automatically for you when you choose the Place. This can save a lot of time on data entry and improve reliability of coordinates, which are required if you want to later create a GIS file (Geographical Information System) for plotting/analysing your sightings on a map.



“Binoculars”
button

Observer shows who recorded the Event. If they are **Accredited** the “Acc?” checkbox will be ticked. **Observer Activity** describes what they were doing at the time, and **Distance Viewed** refers to how far away from it they were. **Weather** is self-explanatory. Data for all these fields (including Accredited status of observers) can be customised using *Customise WILDb*, to which you can jump using the shortcuts provided. The **Binoculars** button lets you flag whether or not binoculars were used by the observer.

Event Notes can be used to write miscellaneous notes specific to the Event. If you want to write notes about a participant, use the Participant Details section.

Tick **Data Verified** to indicate that you’ve checked the accuracy of the record. You may want to have sightings input by an administrator, for example, but don’t want to rely on the accuracy of the data until you’ve checked it yourself.



“Verify All”
button

TIP: You can use Filters to scroll through all non-verified records. Use the “**Verify All**” button to tick all records in the current filter (a Rhino researcher may not care about the accuracy of Leopard sightings, for example).

TIP: When you create a **new Event**, some fields will be copied forward to the new record. These fields are: Type, Subtype, Species, Place, Location, Coordinate System, and Observer.

Any active filters will be reset when you create a new event.


Details last updated tells you when the Event record was last changed.

Participant Details


 “Participants
View” button,
and


 “Unidentified
Participants
View” button

Event Participants			Unidentified Participants		
Name	Sex	Age Category	Sex	Age Category	No. Marked Complete
Mupunga	F	3,5-7 years			Y N Y N
Mary	F	> 7 years	M	> 7 years	1
1 Clean	M	> 7 years	* U		1

Select-> + - 

Group Size-> 3

Participant Details

Body Condition:

Activity:

Notes:

The Participant Details section has two alternative views as shown above – the “Event Participants” view and the “Unidentified Participants” view. The former shows the **Participants Listbox**, which lists *all* the animals involved in the Event. The latter contains the **Unidentified Participants Form**, which allows you to record those animals that were not successfully identified. You can toggle between these views using the buttons shown at left.

Note that you can only add known Individuals to the Event (see below) from the first view.

Select->
 “Select Individual”
 combo box

+
 “Add Individual”
 button

To **add an Individual** to an Event, you need to specify them in the “Select Individual” combo box, and then click the “Add Individual” button (you can only do this from the “Event Participants” view explained previously). The combo box will only show animals of the chosen Species, and only those who were “Active” at the time of the Event. For Reproduction Events, it only includes females.

Certain Event Types have implications for the Status of Individuals involved in them. When you add Individuals to these Events (or change the Event Type to one of them) you’ll be asked if you want **Individual Status** (and Status Date) to be updated accordingly. Similarly, if you remove Individuals or change Event Type away from one of the following the reverse update will be offered.

Event Type	Optional Effect on Individuals
Emigration	Status becomes “Removed”
Introduction	Introduced becomes “True”
Removal	Status becomes “Removed”
Death	Status becomes “Dead”

Note that if you add a female Individual who has **Dependent Offspring**, then you will be asked if you want to add her Dependants at the same time:

If you don’t want to add a dependant, click off the “Include?” checkbox. You can also change the offspring’s status with this form. If you do so, the status will be updated in the Individual’s details and/or in the Birth Event where they were born. Click “Done” when you’ve completed the form.



“Add New Individual” button



“Delete Participant” button

To create a brand new Individual record and add it to the Event in a single operation, click the “Add New Individual” button. This will jump to the *Individuals* zone with certain fields (such as “Recognised Date” and “Species Code”) initialised from the Event.

To **remove a participant** from the Event, highlight the animal or group in the participants listbox, and click the “Delete Participant” button. You can remove Individuals and Unidentified participants from the Event in this way.

To **add to or change the unidentified participants** in the Event, click on the “Unidentified Participants View” button, and fill in the small form provided. The row marked with an asterisk specifies a new record where you can specify a count of animals seen for a particular group description made up of **Sex**, **Age Category**, **Marked/Clean animals**, and **Complete/Incomplete sighting**. You can only record *one* group for each such combination – the group is collectively referred to as a participant. Age Categories can be customised for any species in *Customise WILDb*. “Marked” should be specified if the animal(s) in question do in fact exist as recorded Individuals in WILDb, but for some reason an accurate identification wasn’t made by the observer. Answer “Y” for “Complete” if the observer was able to view and record all identifying features.

TIP: If there is any doubt about the identity of an animal, they should be recorded as Marked but Unidentified participants, rather than attempting to guess their identity.



Shortcut “Customisation” button

The **Participant Details** at the bottom of this section pertain to the participant currently selected in the Participants Listbox *or* the Unidentified Participants form. In the screenshot on page 18 “Mupunga” has been sighted with a **Body Condition** of “Good”, and **Activity** of “Feeding”. Again, the values for these fields can be customised in *Customise WILDb*, by clicking on the shortcut buttons provided.

The currently selected participant is displayed in the top right hand corner of *Events*. This is the Individual or unidentified group to which all the extra pages of the form will refer.

Extra Detail pages

In *Events*, different Event Types will offer different “Extra Detail” pages after the front page. You don’t need to complete these pages if you are not interested in all or part of the detail. The following pages are available:

- *Migration Details* – for Immigration and Emigration Events
- *Translocation Details* – for Introduction and Removal Events
- *Death Details* – for Death Events
- *Offspring Details* – for Reproduction Events
- *Immobilisation Details* – for Immobilisation Events

They are only available after at least one participant has been added to the Event. All information on the Extra Details page relates to the currently selected participant (shown in the top right corner of the form).

TIP: If you change the Event Type for an Event, any “Extra Details” recorded against that Event will be deleted (since they are no longer relevant).

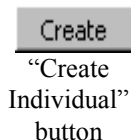
Most of the “Extra Detail” pages contain shortcut “Customisation” buttons, which can be used to add, change, or delete from customisable lists such as Immobilisation Officers, Emigration Destinations, etc. Some of the screens have extra features:

Death details

- The first field will be “Killer Species” if the Event Subtype indicates that another animal caused the Death. Otherwise it will be “Cause of Death”.
- If the Event Subtype is “Sport Hunting”, “Problem Animal Control”, or “Culling”, then a “License Details” subform will be shown.

Offspring details

- When the record is first entered, the Offspring Name will probably not be known (since it won’t be a recorded Individual until tagged). Thus the record only will contain sex and status (initially “Dependent”)
- Once identified, link an Individual to the Offspring record, by selecting it from the drop down list (which only includes Individuals born around the time of the Birth Event). If the Individual record does not yet exist, create it by clicking the “Create Individual” button
- Enter the new records one under the other to record multiple offspring



Create
“Create
Individual”
button

Immobilisation details

- Record as many Dart, Monitoring, and Drug detail records as you want – one under the other.
- Dart Number will be generated automatically when you start to fill in a new record. You don't need to do it yourself.

Individual Markings Page

IDType	Position	Orientation	MarkingDate	ExpiryDate
Notch	Ear	Left	14/09/00	
Natural Marking	Shoulder	Right	10/02/00	
Transponder Chip	Horn	Anterior	14/09/00	14/03/01
Brand/Tattoo	Unspecified	Unknown	10/03/00	

Use this page to record markings such as ear notches, natural markings, and radio collars. The markings page applies to the Individual you've currently selected on the front page, and is available to all Event types.

Use the Customisation Shortcut buttons to change the way you record markings (to add a new marking position, for example). Enter a new marking in the record indicated by an asterisk in the column on the left hand side.

Each time you add an Individual to an Event, a full list of its active and inactive markings are available on this page. Use it to add, change, or delete markings, or change their status (if a battery has run down, for example).

Note: Only currently Active markings are shown in the summary on the front page of the *Individuals* form.



Exporting to GIS

To create a file containing Event Coordinates for mapping on a GIS system (Geographical Information System) click the “Export to GIS” button (on the *Event Details* page of the *Events* zone):



You can only export Events with a single **Coordinate System**. Choose which one on this form, then specify Individual ID, Species, or Event SubType as the “**Z Value**”. This is the value that will be assigned to each point on the map. For example, if you want the GIS system to show all Black Rhinos in black and White Rhinos in white then specify “Species” here.

Finally you need to tell WILDb where to create the coordinate file. After clicking “Export”, you’ll be able to load this file into a GIS system. It is created as a text “XYZ” file.

TIP: Only Events captured in the current filter are exported. Thus to export, for example, coordinates of all Sightings of “Robbie the Rhino” set an appropriate filter in *Events* first.

Population Summary zone

This contains four pages that together provide a species-based analysis of your population.

You can view a summary of Individuals with Age Category breakdowns, see Breeding Statistics for the population, fetch a summary of Events, or record details of Population Counts. The latter can in turn be used to calculate the Population Growth rate.

Individuals Summary page

This page provides a summary of recorded Individuals. For a given Species, it shows the current count of *active* Individuals, the Average Age at Independence, and a list of all Individuals. It also provides a count of Individuals within each of the defined Age Categories for the species (these can be customised in the *Customise WILDb* zone).

To jump to the details of an Individual, double-click on the appropriate row.

Click the “No Sighting Alarms” button to see a list of all animals that haven’t been seen (recorded) for the pre-defined “alarm” period. This period is configurable for each Species (in *Customise WILDb*) and for each Individual (optional, on the “History” page of *Individuals*). The button is disabled if all Individuals are accounted for.

"No Sighting" Alarms

(1 Individual)

“No Sighting Alarms” button

Calving Summary page

This page shows a list of all recorded mothers for a given species, together with Calving statistics for each:

- Number of births
- Dates of first birth and most recent birth
- Estimate of when the next birth is due
- Their age when they first gave birth
- Average interval between births

Double-click on a mother to see her Individual details.

Also on the page is a “Calving Summary” showing a *species average* of ages at first calf and calving intervals, along with a count of recorded mothers and the current number of active breeding females (recorded Individuals only).

TIP: Calving stats include both identified and still “anonymous” offspring

You can choose to include or exclude **Introduced** mothers (those who were not born in the population). These animals may have had calves which have not been recorded in this database – so including them could bias the statistics (especially “age at first calf”).

You can also choose not to display birth details where the offspring have **died or been removed** from the population.

Finally, if you want to limit the **date range** upon which birth statistics are derived, turn off “calculate for all dates”. This will enable the “Start” and “End” date boxes – fill in one or both to focus on a particular period. Omit “End” date for “date X onwards”. Omit “Start” date for “up until date X”.

Event Summary page

Use this page to request a list of Events for a given Species, Event Type, Event SubType, and Time period. Leave out any of these parameters by ticking the “Show All” checkbox. Specify a custom reporting period by choosing “Specify Range”.



“Retrieve Results” button

Once you’ve entered your criteria, click the “Retrieve Results” button to show the list of Events. Double-click on any Event to see its details.

The list returned by this query contains one line for every participant in the Event, plus that participant’s age at the time of the Event.



Population Counts page

Adding up the Individuals recorded in WILDb only gives a count of known (tagged) animals. Use this page to record an *overall* count for a species.

Click the “Add” button to start. You’ll be asked for a **count date** – this defaults to “today”. You can record retrospective counts by changing the date.

The page is divided into several sections:

Count Breakdown

WILDb will initialise the “Count Breakdown” by filling in a count of the Recorded Individuals for each Sex / Age Category combination. It will initialise the **Definite**, **Probable**, and **Possible** totals to the same total. These numbers are your estimates of total numbers, in decreasing “confidence of accuracy”. “Definite Total” is the number you have “at least”. “Possible” is how many there might be, if you’re lucky (or they’re lucky, depending on your perspective!).

You cannot change the number of “Recorded Ids” if the Count Date is today. That’s because WILDb knows how many are recorded right now, so there’s no point telling it otherwise! If you are looking at a historical count, however, you can change all the numbers. WILDb doesn’t know what was recorded in the past – only what’s there now.

Each Sex / Age Category combination can only appear once. You don’t have to record them all.

Count Details

This section shows the **Date** of the count (which you can’t change), and a description of it. **Count type** is customisable (hit the shortcut button), but you must choose “Full Count” if you want to make the count **Available for Export**. This latter field identifies which counts will be included when you export your data for inclusion in the National level summary database. Only Full Counts can be exported – those which represent an estimate of your entire population of the species. Make these counts as complete as possible.

Estimate Units (eg “Individuals per hectare”) and **Count Method** (eg “Helicopter”) are also customisable.



Population Growth Rate

To obtain a calculation of Population Growth Rate between two population counts, choose a start and end count and click the "Calculate Growth Rate" button. The formula used is:

$$N_t = N_0 (1+r)^t$$

Where:

t is number of years,

N_t is Population after " t " years,

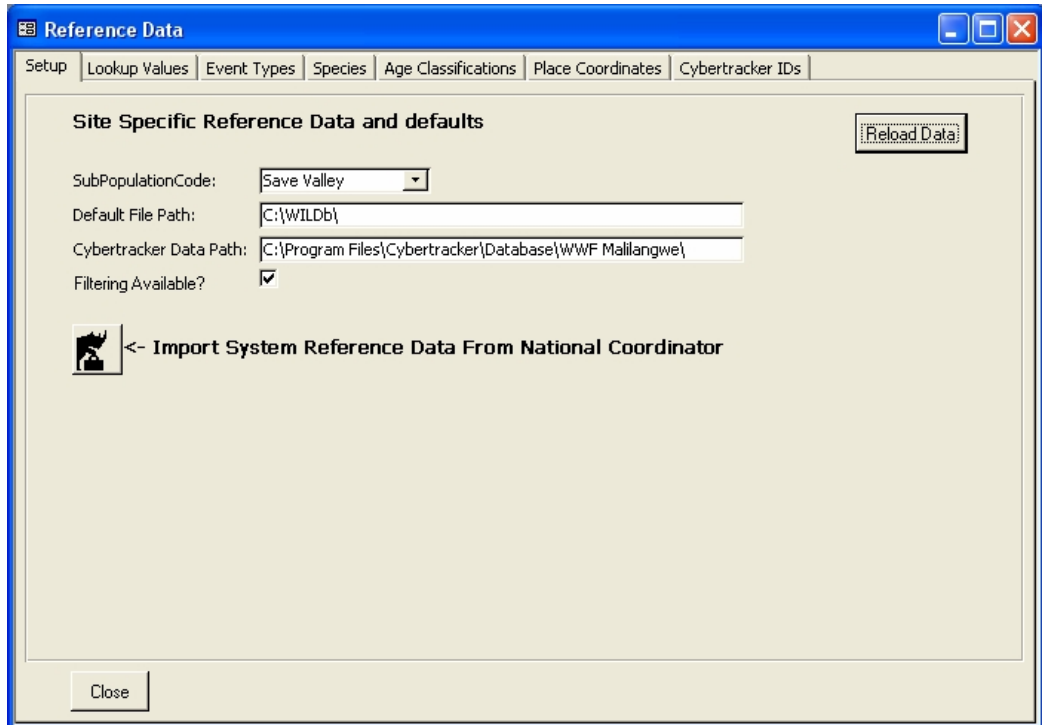
N_0 is starting Population, and

r is the growth rate.

The counts N_t and N_0 come from the *Definite* totals. WILDb works out the growth rate per annum.

Customise WILDb Zone

This zone contains seven pages that are used to configure WILDb to your needs.



Setup page

This is where you tell WILDb which national **SubPopulation** you are recording data for. If your SubPopulation doesn't appear in the list, contact your national WILDb administrator. If you don't work within a nationally coordinated program, choose "Unknown".

You can also change the **Default File Path** here, which affects where WILDb looks for Identifying Images, for example. The **Cybertracker Data Path** is only relevant if you intend to import sighting data from the Cybertracker™ system – it specifies where WILDb can find the Cybertracker database.

Turn off **Filtering available** if you want to disable filtering (if you feel it to be too potentially confusing for users, for example). If you do this, the Filter button won't appear in the *Individuals* or *Events* zones. Clicking "Goto Events" or "Goto Individuals" on those forms will *not* limit the records shown to the chosen Individual/Event.



Importing Reference Data

If you are using WILDb within a program of national coordination, you will be periodically sending extracts of your data to the national coordinator (see *Export to National Db Zone* on page 33). Similarly, the national coordinator will want to send you updates of reference data – which includes event subtypes and system lookups such as Subpopulations. Load these updates by clicking on *Import System Reference Data from National Coordinator*. You will be asked to specify the name of the reference data file (an explorer window will help you find it). Generally this filename will take the form WILDb_RefData_DDMMYY, but your national coordinator will provide the exact name.

Reloading Data from earlier versions

Occasionally a new release of WILDb requires a change in the underlying structure of the database. When this happens, you need to transfer your data into the new format. Do this as follows:

1. Move your current data (c:\WILDb\WILDb_LinkData.mdb and WILDb_ImageData.mdb) into a backup directory
2. Run Install.bat from the distribution CD
3. Start WILDb, and before doing anything else, go to the *Customise WILDb* zone.
4. Click on *Reload Data*. In the form that is shown, click on *Reload Data* again. Answer “yes” to the “are you sure?” prompt.
5. Unless your database is not clean (ie empty) you will then be shown an explorer window with which you should select the old database file backed up in step 1.
6. Once you’ve specified the filename, your data will be reloaded into the new clean database.
7. Customisable body part descriptions have been changed to a standardised format. You will be given the option of using these new descriptions. Whether or not you do so may depend on whether you’ve created your own customisations of this data

TIP: Version 1.32 adds the ability to mark observers as accredited or not. Once you’ve reloaded your v1.31 data, use *Customise WILDb* (Lookup Values page) to set up each of your observers as accredited or not. Then run the query updFixObserverAccredited by clicking Window->Unhide->WILDb Database, and double-clicking on the query. This will ensure your event data correctly reflects the presence of an accredited observer.



New record
indicator



“Delete Record”
button



“Cybertracker
ID” button

Lookup Values page

This is where you can customise all the “lookup data” (dropdown lists of options) for detail fields such as “Body Condition”, “Darting Method”, and so on. There are over 35 customisable fields. Add a new value by filling in the row marked with an asterisk. Delete a row by clicking on it, and then clicking the “Delete Record” button on the top toolbar.

Most lookups only allow a short and long **description**, and a list of associated **Cybertracker IDs**. The latter is only needed if you plan to import sightings from the Cybertracker™ system. To do so, you have to match Cybertracker Ids (also customisable in that system) to WILDb lookup values - do this by clicking the “Cybertracker ID” button. A new form will allow you to input one or more Ids that you want mapped to this lookup value.

The “Migration Locations” lookup has an extra checkbox – here you can record for each value whether that external location is **International**. The “Observer” lookup also has an extra checkbox – use it to record whether or not an observer is **accredited**. These two details become important at the national database level.

Finally, against each Place you can record the **Location** to which it belongs. A Location (such as a Ranch name) can be made up of many Places (such as waterholes, pans, etc). If you use a Grid system to divide up your property, you may choose to record squares at either Location or Place level - it depends on your specific needs. Note that you can record the **Coordinates** of each place on the *Place Coordinates* page.

After adding Age Classification Systems here, you need to configure them using the *Age Classifications* page.

Event Types page

If you are using the Cybertracker™ system, record the **Cybertracker ID** for each action (customisable in Cybertracker) against the appropriate WILDb Event Subtype. This enables WILDb to correctly map recorded Cybertracker sightings to WILDb ones.

Species page

This page contains details about all Species you wish to record data for. **Age Classification** refers to which of the configured classification systems applies to this Species (see “Age Classifications page”, below).

Image file location (optional) points to a bitmap file within the default WILDb file path (see “Setup page”, above), which contains the image to be used as the Species’ Identifying Image.

WILDb will tick the **Individuals Known** checkbox if there are any recorded Individuals for this Species.

The **No Sighting Alarm** provides the default period after which an alarm screen will be shown if an Individual of this Species has not been seen. This can be overridden at the Individual level if required.

Finally, if you are using the Cybertracker™ system set the **Cybertracker ID** field to the species ID in that system.

Age Classifications page

This is where Age Categories are assigned to Classification Systems, which in turn are listed in the *Lookup Values* page. You can add as many categories as you want for a Classification System, as long as the Start and End months don't overlap. The final (ie oldest) category should have an End month such as 99999 to signify "forever". Tick "Breeding Age" against the categories within which an animal would normally be expected to breed.

Place Coordinates page

On this page you can record coordinates (in any Coordinate System) for the Places you've entered in the *Lookup Values* page. After doing so, WILDb will automatically fill in the Coordinates when you specify the Place for an Event.

Cybertracker IDs page

This page shows the Cybertracker Ids you've configured in your Cybertracker™ system. WILDb automatically imports them when you click the *Import Cybertracker* button on the main menu. The page is intended for reference only. Use it to determine which IDs you need to match with WILDb Lookups, Individuals, etc. See "Import from Cybertracker zone" on page 35 for more information.

Export to National Db Zone

Sex	AgeCategory	Total Definite	Total Probable	Total Possible	Known Indivs
F	1-2 years	2	2	2	1
F	2-3.5 years	3	3	3	1
F	3.5-7 years	12	12	12	11
F	> 7 years	19	19	19	19
M	2-3.5 years	1	1	1	1
M	3.5-7 years	9	9	9	9
M	> 7 years	22	22	22	22
U	2-5 months	5	5	5	5
U	6-11 months	3	3	3	3
U	1-2 years	4	4	4	4
U	2-3.5 years	3	3	3	3

This zone is used to create an export file for sending to a National Coordinator. This Coordinator will use the file to import a summary of your local data into a separate database containing a National overview.



“Add to List”
button



“Remove from
List” button

The form contains two lists of Species – on the right are those to be included in the exported data, and on the left are all the other Species. You can add or remove Species from the export list using the “Add to List” and “Remove from List” buttons respectively.

In the lower screen is a summary (for information only) of the latest “Export Count” for the Species currently selected. An “Export Count” is one marked “Available for Export” on the *Population Counts* page of the *Population Summary* form.

To continue with the Export, click “Export”. WILDb will warn you if an exportable Population Count for any Species has not been created today. It is working under the assumption that you’ll want to update all your counts before sending a summary to the National Coordinator. If you want to continue regardless, answer “yes” to the question posed.

An explorer window will allow you to specify the location and name of the export file – call it whatever you like but don't overwrite existing database files! This file should then be sent (via floppy disk, email, or similar) to the National Coordinator. It contains a summary of your Individual and Event data (not Sightings, Coordinates, Locations, or any customisable lookup fields). It also contains your most recent Exportable Counts.

Import from Cybertracker zone



Use this zone to import Events (usually Sightings) from the Cybertracker™ system if you are using it.

Before doing anything, you need to tell WILDb where you've installed Cybertracker, using the *Customise WILDb* zone.

Before importing Events, you must click the "Import Structure" button to tell WILDb to connect to the Cybertracker database and extract a list of your Cybertracker "trackable items". Cybertracker itself can only be used once it has been configured with, amongst other things, a "list" of what you want to record – actions, species, places, etc. This makes up the structure of your Cybertracker project.

Once you've imported the structure, you need to map these items to corresponding WILDb Event types, lookup fields, Individuals, etc. Since every Cybertracker project is different, WILDb cannot do this automatically. You can see a list of the Cybertracker items and their Ids on the *Cybertracker Ids* page of *Customise WILDb*. Make sure you assign Cybertracker Ids to the following:

- Individuals, using the *Photos* page of *Individuals*.
- Lookup Values, using the *Lookup Values* page of *Customise WILDb*. Click the Cybertracker ID button to assign one or more Cybertracker items to a lookup (there could be more than one item – in which case an occurrence of either will cause the same WILDb sighting detail to be recorded). Note that most Lookups will not need Cybertracker items assigned to them.
- Event SubTypes, using the *Event Types* page of *Customise WILDb*
- Species, using the *Species Types* page of *Customise WILDb*

You only need to do all this setting up once (or again if your Cybertracker configuration changes). Try to map as many of your Cybertracker items to WILDb objects as you can. This will help minimise loss of detail.

Once it is done, click “Import Sightings” to tell WILDb to connect to the Cybertracker database and read in the Events. They should then appear, with associated Individuals and “unknown” Participants, in the *Events* zone.