

# Guide to the an online transect input system for butterfly monitoring - eBMS




This online system is to support the recording of butterfly transects. It can be used anywhere in the world, although is currently tailored to use within Europe (e.g. uses a European list of species). We recommend that you use national systems where a formal monitoring scheme is in place. For schemes in Europe, refer to the list [here](#).

## Quick Guide:

These are the simple steps to get you started with entering data on the new online system.

1. [Register](#) for an account.
2. Go to '[My Sites](#)' to setup new transect routes, or review the details of existing ones. Here you will draw your transect by sections and include its details. This only needs to be done once.
3. Go to '[My Walks](#)' to enter the data for your transect routes. . Here you will input the visits made in your transect writing the species and weather conditions.
4. Go to '[Annual Report](#)' to review your butterfly data, and to see what's been entered for other transects.

Step-by-step instructions for the key parts of the system are detailed below. Key links to click are given in red text. Key areas of relevant web pages are highlighted through a red circle, e.g. 

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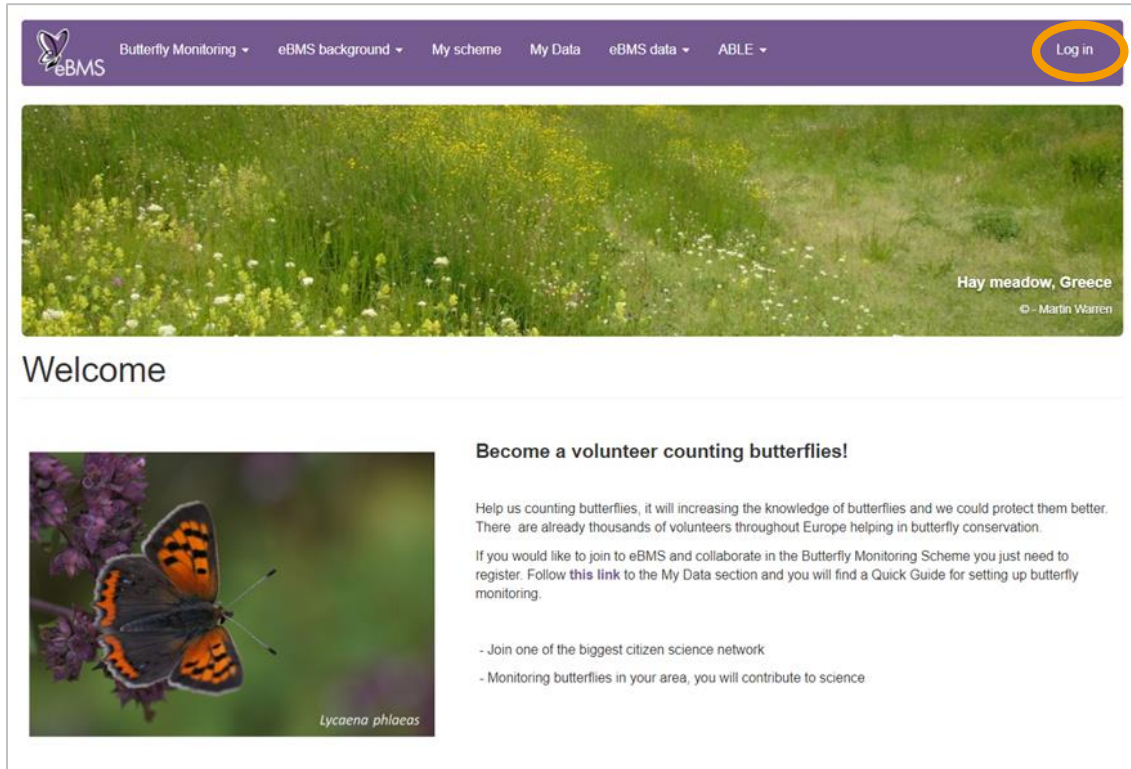
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## Setting up a new account

The account registration approach uses email verification to minimise risks for spam accounts.

Go to <http://www.butterfly-monitoring.net/mydata> and click on 'Register' (top right of home page).



Butterfly Monitoring eBMS background My scheme My Data eBMS data ABLE Log in

Hay meadow, Greece  
© Martin Warren

### Welcome

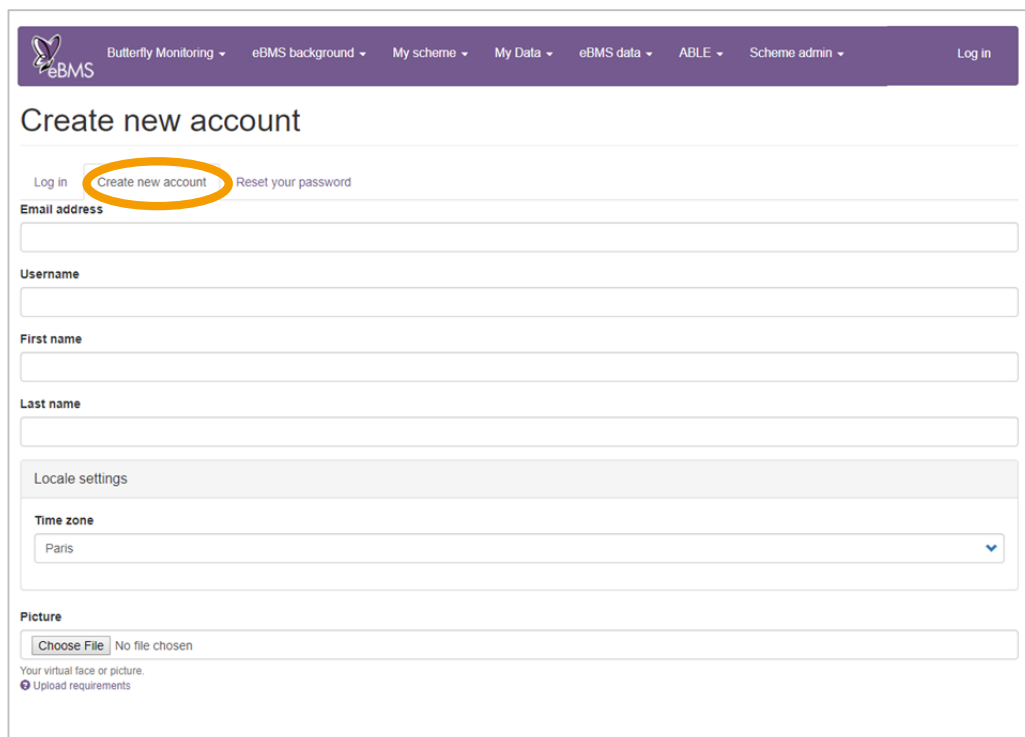
**Become a volunteer counting butterflies!**

Help us counting butterflies, it will increasing the knowledge of butterflies and we could protect them better. There are already thousands of volunteers throughout Europe helping in butterfly conservation.

If you would like to join to eBMS and collaborate in the Butterfly Monitoring Scheme you just need to register. Follow [this link](#) to the My Data section and you will find a Quick Guide for setting up butterfly monitoring.

- Join one of the biggest citizen science network
- Monitoring butterflies in your area, you will contribute to science

1. Enter a username, your email address and your proper name. Tick the Time Zone and the Country/scheme you are part of. Review the Terms of use for the site, and tick to agree to them. Enter the image code in the human verification. Then click on 'Create new account'.



Butterfly Monitoring eBMS background My scheme My Data eBMS data ABLE Scheme admin Log in

### Create new account

Log in **Create new account** Reset your password

Email address

Username

First name

Last name

Locale settings

Time zone  
Paris

Picture  
Choose File No file chosen

Your virtual face or picture.  
 Upload requirements

2. You will now receive an email indicating that your account has been registered.
3. This email will include the following text:

Thank you for registering at European Butterfly Monitoring. You may now log in by clicking this link or copying and pasting it to your browser:

<http://www.butterfly-monitoring.net/mydata/user/reset/17/1468321218/30vice-mLt67H11-Hxp5uw1zR-ltwOrEd20U0X7ETwc>

This link can only be used once to log in and will lead you to a page where you can set your password.

After setting your password, you will be able to log in at <http://www.butterfly-monitoring.net/mydata/user> in the future using:

username: Your username  
password: Your password

4. Click on the link provided in the email to confirm your registration, via validation of your email address.
5. Click on the 'Log in' button on the confirmation web page.
6. Enter your password for the site on the next page, making sure you enter it twice as required. Select your preferred language and time zone. Then click on 'Save'.

Your account is now ready to use

7. You can change your account details at any time by clicking on 'My Account' in the top right corner of any web page on the site, then selecting the 'Edit' tab.

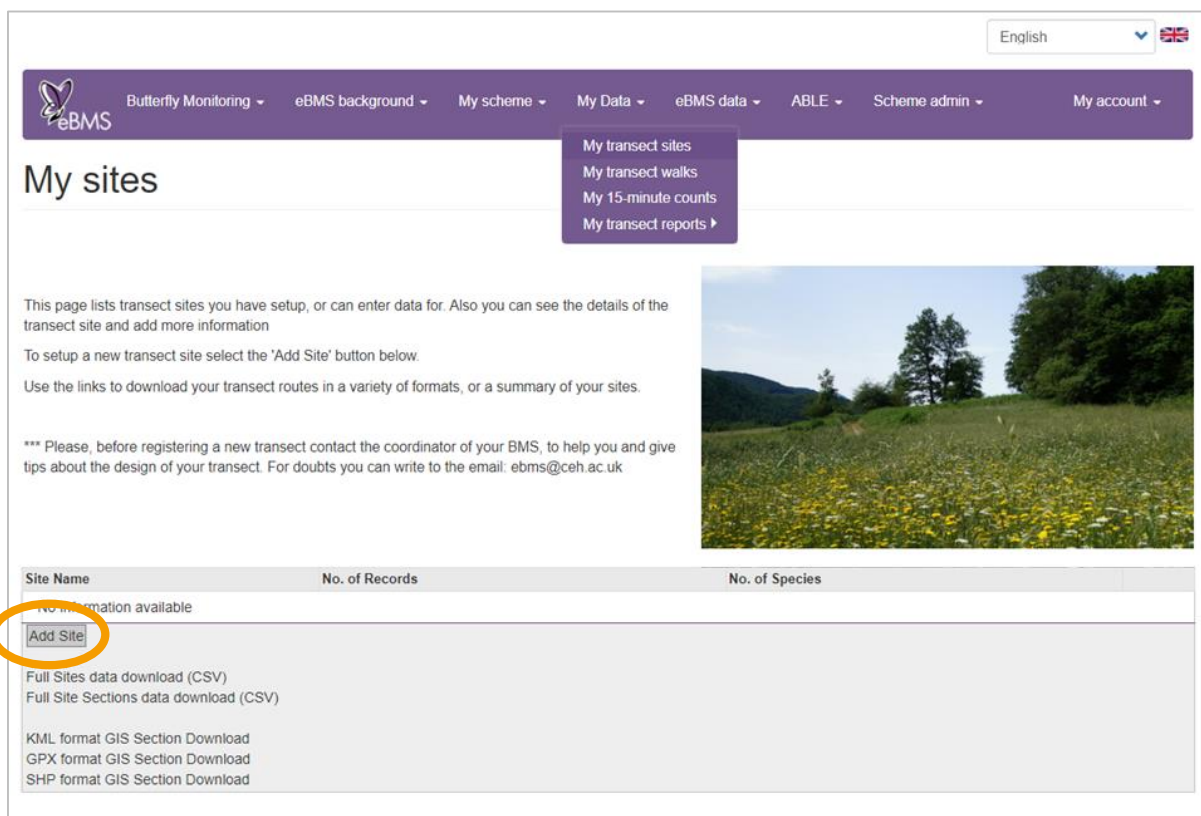
### Linking an existing transect route to your account


1. If you record butterflies on an existing transect that you know to be in the system, it is important that you do not recreate the transect route. Please contact the site administrators via [ebms@ceh.ac.uk](mailto:ebms@ceh.ac.uk) to request access to enter data for this route.
2. Click on 'My Sites' to see a list of transect routes associated with your account.

## Setting up a new transect site

If you are setting up a new transect, you will need to enter details of the site and draw the transect route, so please have these details to hand before you start.

1. To create a new site, in the main menu go to My Data -> Sites and click on 'My Sites' and then click on 'Add Site'.



English 

Butterfly Monitoring ▾ eBMS background ▾ My scheme ▾ My Data ▾ eBMS data ▾ ABLE ▾ Scheme admin ▾ My account ▾

### My sites


- My transect sites
- My transect walks
- My 15-minute counts
- My transect reports ▾

This page lists transect sites you have setup, or can enter data for. Also you can see the details of the transect site and add more information

To setup a new transect site select the 'Add Site' button below.

Use the links to download your transect routes in a variety of formats, or a summary of your sites.

\*\*\* Please, before registering a new transect contact the coordinator of your BMS, to help you and give tips about the design of your transect. For doubts you can write to the email: [ebms@ceh.ac.uk](mailto:ebms@ceh.ac.uk)



Site Name	No. of Records	No. of Species
No information available		
<a href="#">Add Site</a>		
<a href="#">Full Sites data download (CSV)</a>		
<a href="#">Full Site Sections data download (CSV)</a>		
<a href="#">KML format GIS Section Download</a>		
<a href="#">GPX format GIS Section Download</a>		
<a href="#">SHP format GIS Section Download</a>		

2. Select the Country in which you are setting up a transect. The list of countries excludes those for which an established Butterfly Monitoring Scheme exists, other than Luxembourg which use this system as its main transect input system. For other countries with an established monitoring scheme in Europe, refer to the list [here](#).
3. Enter the Name of your transect
4. Tick in the Grid Ref.: field. You will need to locate the approximate centre point of your site on the map provided. To find your site on the map use the search facility or move around or zoom into the map using the tools provided. When you click on the map, the lat/lon for your transect centre will be automatically filled in.
5. A Site Code will automatically be assigned to your transect. You can change this value if required.
6. Enter the number of sections for your transect (between 1 and 16).
7. Enter the Width of your transect. Normally is 5 metres (2.5m in each side), if not there is the option 6 and 10 metres.
8. Enter as many other general site details are possible (these are not mandatory).
9. Once your transect route is created you can download it in a variety of GIS formats.

Butterfly Monitoring ▾ eBMS background ▾ My scheme ▾ My Data ▾ eBMS data ▾ ABLE ▾ Scheme admin ▾ My account ▾

## Site details

Site Details

**Country**

Country:

<Please select>
▾
✖

Although you can set this field yourself, it will be filled in automatically when you draw the site on the map.

**Site Details**

Transect Name:

Grid Ref.:

4326
▾
✖

Click on the map to set the central grid reference.

**Internal ABLE site code:**

EBMS Portugal:[INDEX]
✖

**Details**


No. of sections:

Overall Length (m):

The overall length will be calculated once the transect route has been drawn.

Use the search box to find a nearby town or village, then drag the map to pan and click on the map to set the centre grid reference of the transect. Alternatively if you know the grid reference you can enter it in the Grid Ref box on the left.

**Search for Place:**



10. Click on 'Save'

11. Now you will need to draw the route of each section of your transect, as described below.

## Drawing the transect route section-by-section

1. After you have saved your new site details, you should now be looking at the 'Your Route' tab as shown below.
2. Make sure that the first section is highlighted ('S1') in order to draw and edit the route for that section.
3. Move the map around and zoom in or out so that you can see the area where you need to draw.

Site details

Transect\_16 Details **Your Route**

Select a section from the list then click on the map to draw the route and double click to finish. You can also select a section using the "Query" tool to click on the section lines. If you make a mistake in the middle of drawing a route, then you can use the "Erase Route" button to remove the last point drawn. After a route has been completed use the "Modify feature" tool to correct the line shape (either by dragging one of the circles along the line to form the correct shape, or by placing the mouse over a circle and pressing the "Delete" button on your keyboard to remove that point). Alternatively you could just redraw the line - this new line will then replace the old one completely. If you are not in the middle of drawing a line, the "Erase Route" button will erase the whole route for the currently selected section. To increase the number of sections, either return to the "Site Details" tab, and increase the value in the "No. of sections" field there (which will add new sections to the end of the list), or use the "Insert Section" button to add a new section immediately after the currently selected section. Once all route sections are drawn, select the "Section Details" tab (or use the "Complete section details" button) to co

Select section: **S1** S2 S3 S4

Save Route Complete section details Insert Section Erase Route Remove Section

\* Tools for drawing your section route

\* Click on the map to start the section, draw the route, then double-click to finish the section

Finish

4. You need to use the line-drawing tool, which will show a small circle on the point of your cursor.
5. Click on the map at the start of your section, then draw the route by clicking on each corner or turning point until you get to the end of the section. **Double-click at the end of the section to finish** drawing the line.
6. When finished, the complete section should be shown as a yellow dashed line. Now click on the button for the next section (e.g. S2) and draw the next section. When clicking on the next section you will be prompted to save the route drawn so far.
7. Continue until all the sections have been drawn. You can include new sections with the button "**Insect section**"

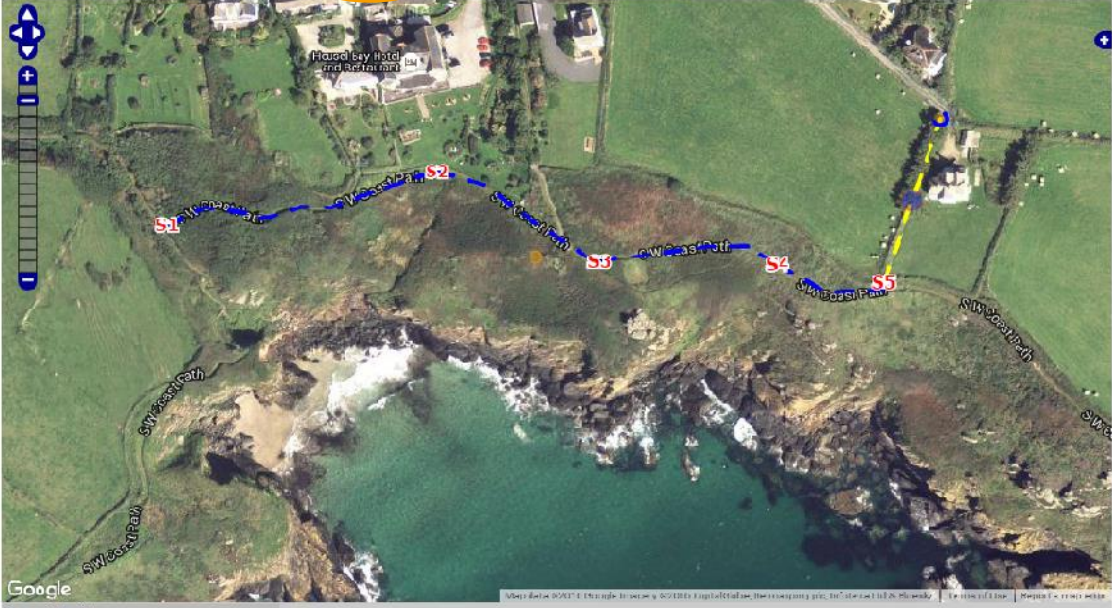
## Site details

Transect\_16 Details **Your Route**

Select a section from the list then click on the map to draw the route and double click to finish. You can also select a section using the "Query" tool to click on the section lines. If you make a mistake in the middle of drawing a route, then you can use the "Erase Route" button to remove the last point drawn. After a route has been completed use the "Modify feature" tool to correct the line shape (either by dragging one of the circles along the line to form the correct shape, or by placing the mouse over a circle and pressing the "Delete" button on your keyboard to remove that point). Alternatively you could just redraw the line - this new line will then replace the old one completely. If you are not in the middle of drawing a line, the "Erase Route" button will erase the whole route for the currently selected section. To increase the number of sections, either return to the "Site Details" tab, and increase the value in the "No. of sections" field there (which will add new sections to the end of the list), or use the "Insert Section" button to add a new section immediately after the currently selected section. Once all route sections are drawn, select the "Section Details" tab (or use the "Complete section details" button) to complete the route setup.

Select section: S1 S2 S3 S4 S5

**Save Route** **Complete section details** **Insert Section** **Erase Route** **Remove Section**



Map of at pointer

Finish

8. Drawing the route can be a challenge. So, if you are not happy with the result, there are several ways to make amendments. Firstly, make sure the relevant section is highlight by selecting the route section (e.g. S5).
9. The simplest option is to just redraw a new line over the top. When you double-click to finish, you will get a warning to confirm that it is ok to replace the existing section.
10. If you want to get the current line out of the way, you can click on the 'Erase Route', which should then remove the line for that section. If you have made a mistake mid-section, this button will also remove the latest node on the line.
11. If you just need to move one or two corner points, then you can use the **Modify tool**. Small blue circles will appear at each node on the line, and these can be dragged around into new positions. You can also add new nodes by dragging the mid-section of a line.
12. Once the sections are drawn, please click on the '**Complete section details**' button. Then click on the '**Section Details**' tab and enter as many details as you can about each section, saving as you go along.

# Site Details

Language English

Site Details Your Route Section Details

Section Details

Select section: **S1** S2 S3 S4 S5

Section Grid Ref.: 49.964N, 5.197W \*

Section

Details

Section Length (m): 108

Habitat and management

Habitat etc

Primary Habitat Present: Agricultural

2nd Habitat Present: Forest

Primary Land Management Present: Mowing (or other vegetation clearance, e.g. herbicide spraying, burning etc.)

2nd Land Management Present: Grazing

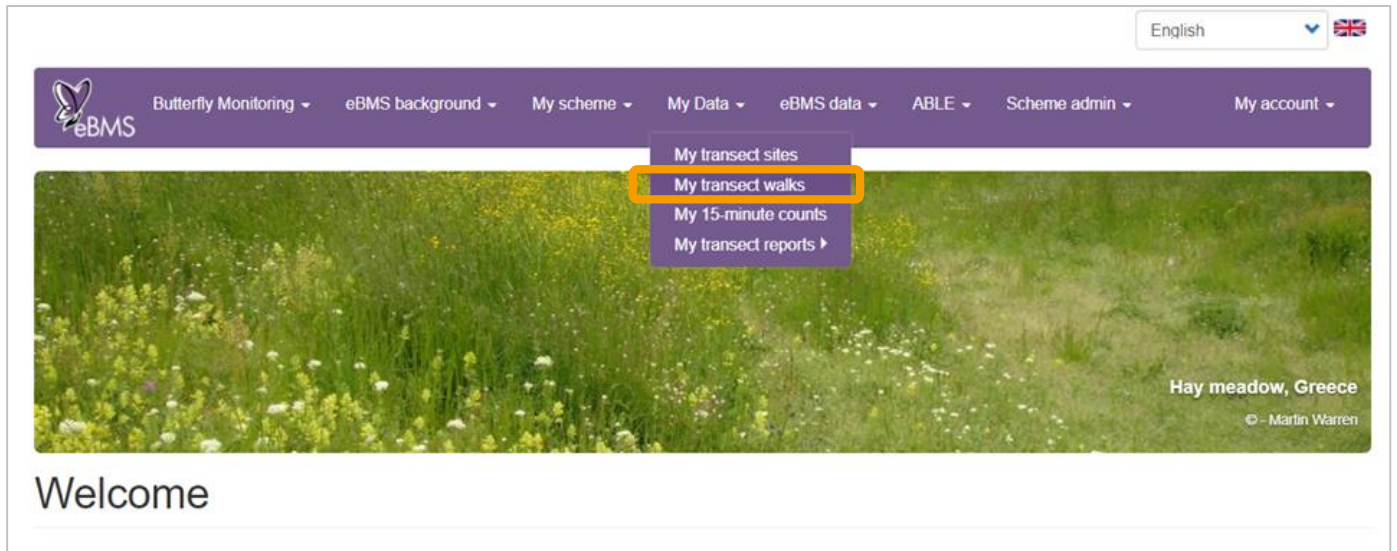
Notes on Land use and management: Pasture next to forest

Save



## Entering the results of a transect walk

1. In the main menu go to “My Data” -> “Transect Walks” and click on “My Walks” to see a calendar, showing all the walks that you have entered so far.



2. “My Walks” page will appear and you'll see the calendar that shows all the counts you've entered so far.

The screenshot shows the 'My Walks' page on the eBMS website. It features a calendar for 2019 with a 'Filter by site' dropdown menu set to 'All my sites'. A callout box points to the dropdown menu, and another callout box points to a green plus sign on a date in the calendar.

**\* Use the drop-down list to filter the calendar for just one site**

**\* Click on the green 'plus' sign to enter data from a walk on that date**

Week Number		Mon	Tue	Wed	Thu	Fri	Sat	Sun
1	Dec	31	1	2	3	4	5	6
2	Jan	7	8	9	10	11	12	13
3	Jan	14	15				19	20
4	Jan	21	22				26	27
5	Jan	28	29				2	3
6	Feb	4	5	6	7	8	9	10
7	Feb	11	12	13	14	15	16	17
8	Feb	18	19	20	21	22	23	24
9	Feb	25	26	27	28	1	2	3
10	Mar	4	5	6	7	8	9	10

3. If you walk several different sites, you can use the drop-down list to only show walks from one site.
4. Locate the date of your walk, click on the green 'plus' sign to create the new walk, and you will be presented with the 'Walk Data Entry' screen.
5. Make sure the right transect site is selected. Check the recorder name and edit if needed. Enter the start and finish times, temperature and wind information.
6. If you enter a value for the % sun on this screen, it will fill in this value for all sections. Alternatively, individual %sun values for each section can be entered on the next screen.
7. Remember to write in the Notes tab any change happened in the transect.

## Walk Data Entry

In the species grid visible after the visit details are entered, the field "Reliability" allows you to record the count reliability at each section level. The meaning of each code is as follows:

1. Suitable conditions, the count reflects the butterfly abundance.
2. Unsuitable conditions (for instance too much wind, running cows around the observer...). The count does not reflect the butterfly abundance although some butterflies have been observed.
3. The section could not be surveyed, for instance due to accessibility.

Select Transect:

please select
▼ \*

Date: 18/06/2019

Recorder Name:

García Sanchez , Cristina
✖

Start Time (hh:mm):

---:--
\* Use 24hr clock
✖

End Time (hh:mm):

---:--
✖

% Sun:

Temp (Deg C):

▼ \*

Wind Direction:

▼

Wind Speed:

▼ \*

Notes:

Use this space to input comments about this week's walk.

Next
Cancel

8. Once all the basic walk information has been entered, click on 'Next'.

9. On the butterfly data entry screen, the default table shows the whole European species list in taxonomic order. You can choose alternative lists using the drop-down list. However, the first time entering a visit to the transect, it will appear the whole list by default. After, in the second time entering a visit, you will see only the species saw before in your transect.

**Walk Data Entry**

Language English

**Lizard on 2016-04-28**

Butterflies

**Use species list :** All species

*\* Use drop-down list if you want to choose a shorter species list*

Sections	All species	S3	S4	S5	Total
% Sun	Species known at this site	.00	100	100	
	Species I have recorded				
<i>Erynnis tages</i>					0
<i>Erynnis marloyi</i>					0
<i>Carcharodus alceae</i>					0
<i>Carcharodus tripolinus</i>					0
<i>Carcharodus lavatherae</i>					0
<i>Carcharodus flocciferus</i>					0
<i>Carcharodus orientalis</i>					0
<i>Carcharodus baeticus</i>					0
<i>Carcharodus stauderi</i>					0
<i>Spialia phlomidis</i>					0
<i>Spialia sertorius</i>					0
<i>Spialia orbifer</i>					0
<i>Spialia therapne</i>					0
<i>Muschampia proto</i>					0
<i>Muschampia tessellum</i>					0
<i>Muschampia cribrellum</i>					0
<i>Pyrgus carthami</i>					0
<i>Pyrgus sidae</i>					0
<i>Pyrgus andromedae</i>					0
<i>Pyrgus cacaliae</i>					0
<i>Pyrgus centaureae</i>					0
<i>Dumetia malvae</i>					0

10. If you are using a short list, but have seen a new species, you can add this species to your list by typing its name in the box below the data grid. This box will auto-complete when you start typing a name (as shown below). Select the relevant species when it appears and it will be added to the bottom of your list.

**Butterflies**

Use species list : Species known at this site ▼

Species Sort Order:

Taxonomic Sort Order  
 Species name

Sections	S1	S2	S3	S4	Total
% Sun	50	50	50	50	
<i>Carcharodus tripolinus</i>					0
<i>Pyrgus carthami</i>					0
<i>Pyrgus andromedae</i>					0
<i>Pyrgus cacaliae</i>					0
<i>Pyrgus alveus</i>					
<i>Thymelicus lineola</i>					
<i>Thymelicus sylvestris</i>					
<i>Zerynthia polyxena</i>					0
<i>Pieris rapae</i>					0
<i>Pontia daplidice</i>					0
<i>Callophrys rubi</i>					0
<i>Celastrina argiolus</i>					0
<i>Aricia morronensis</i>					0
<i>Argynnis aglaja</i>					0
<i>Aglais io</i>					0
Total	0	4	2	1	

\* This box will auto-complete.  
Select the relevant name

Add species to list:

*Aglais ichnusa*  
*Aglais io*  
*Aglais urticae*

11. Check/enter the % sun (at the top of the data table) figures for each section.
12. Enter the butterfly counts for **each species/section**. The data are saved as you go.
13. Once you have entered all your data, click on '**Finish and return to walk list**'

## Reviewing the data from your transects

Please note that data just entered into the system does not appear immediately within the annual summary. There are two reasons this may happen:

1) there is a process that must run every 15 minutes to calculate the summary values and estimates, and 2) there is some caching (storing of calculated summaries) of the data to speed up the page response times. To bypass the caching, untick the option box below (but beware that the page may take longer to respond). In the meantime, newly entered data should still be visible in your 'My Walks' page.

1. In the main menu go to My Data -> Reporting and click on the 'Annual Report' tab to show a summary of the transect data. Initially you will see all data for the current year from all sites that you have linked to your account. However, there are several options for looking at other summaries or other years.

### Annual report

Annual Summary data shows a summary of the data arranged by weeks of the year.

In *Estimated table*, figures shown in red are (or include) estimates for missing weeks, based on a simple interpolation.

*Raw data* will just show the counts (in black font) exactly as entered. When looking at single sites in *Raw data* form, you can edit your counts by clicking on the sample link at the top of the column.

Please be aware that there will be delay between entering the walk data, and that data appearing on this page. There are two reasons this may happen:

1. There is a process that must run every 15 minutes to calculate the summary values and estimates
2. There is some caching of the data to speed up the page response times.

To bypass the caching, untick the option box below (but beware that the page may take longer to respond). In the meantime, newly entered data should still be visible in your 'My Walks' page.

2019
Filter: My data
[No sites allocated.]  Use cached data

Summary Table
Summary Chart
Estimate Table
Estimate Chart
Raw Data
Downloads

Week	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26
Date	Jan 01	Jan 08	Jan 15	Jan 22	Jan 29	Feb 05	Feb 12	Feb 19	Feb 26	Mar 05	Mar 12	Mar 19	Mar 26	Apr 02	Apr 09	Apr 16	Apr 23	Apr 30	May 07	May 14	May 21	May 28	Jun 04	Jun 11	Jun 18	Jun 25
Carcharodus tripolinus														0					1							
Pyrgus carthami														0					1							
Pyrgus andromedae														0					1							
Pyrgus cacaliae														0					1							
Pyrgus alveus														0					1							
Thymelicus lineola														0					1							
Thymelicus sylvestris														0					1							
Zerynthia polyxena														0					1							
Pieris rapae														0					2							
Pontia daplidice														0					1							

2. You can **change the year** by clicking on the black arrows (top left)
3. You can choose to view everyone's data in the system, or just your own, by using the 'Filter by recorder'
4. You can choose to view all sites, or individual sites linked to your account, by using 'Filter by site'
5. You can use the tabs to view raw data or summary data or include simple estimates for missing weeks. You can also choose to display the information as a chart.

6. The best way to check through your own data is to select your site from the drop down list and view 'raw data'. In this mode, if you spot a mistake that needs to be corrected, you can go directly through to the Data Entry screen for an individual walk by clicking on the date at the top of the column.
7. You can download your data in a variety of formats via the Downloads tab.

*Parnassius apollo*  
By Chris van Swaay

