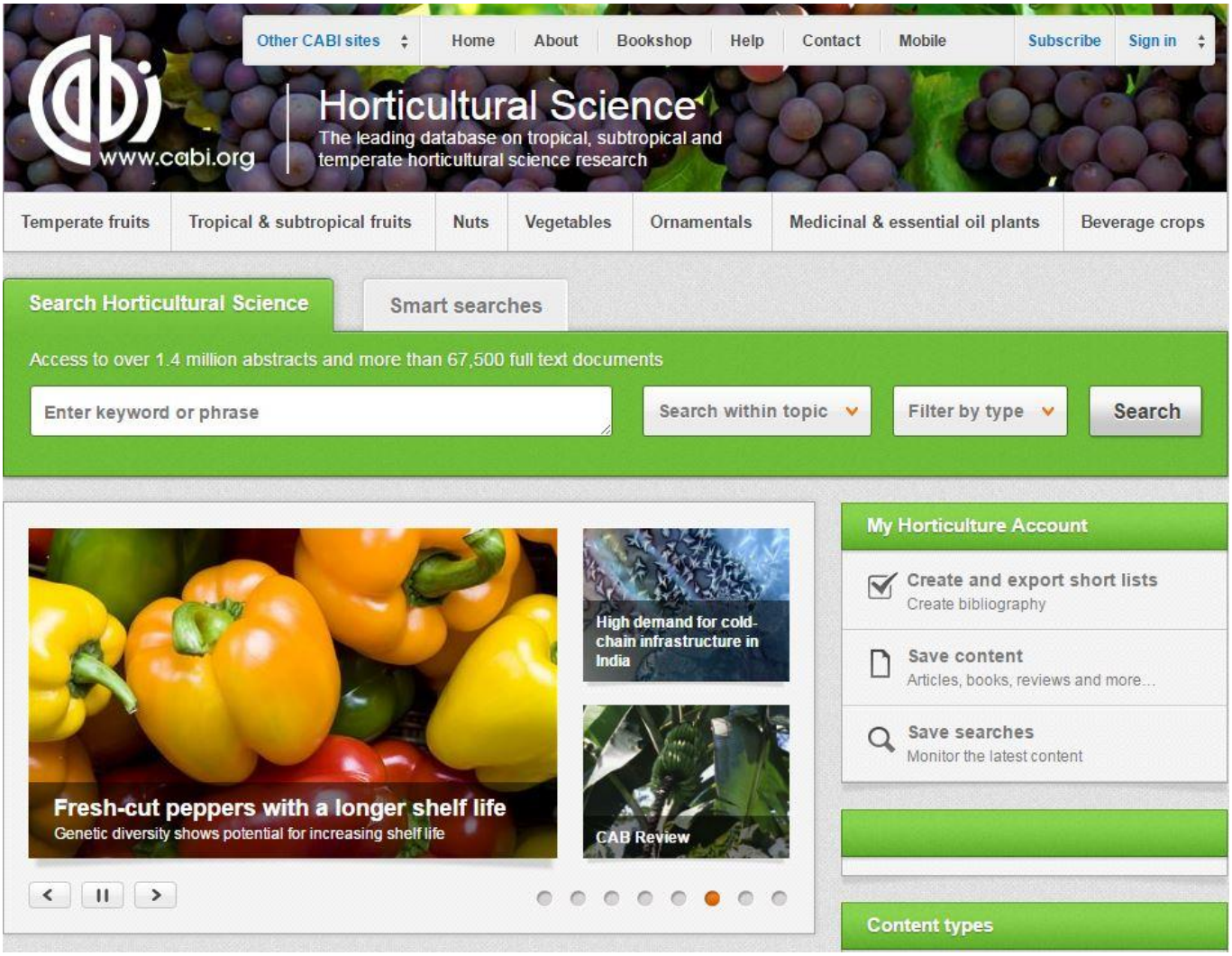



# CABI Training Materials

## Horticultural Science

## User Guide

KNOWLEDGE FOR LIFE
www.cabi.org

# Contents

# Introduction

Horticultural Science is an international database of abstracts, full text documents, news and reviews covering all aspects of horticultural science and technology related to tropical, subtropical and temperate crops and regions.

Developed from CAB Abstracts, the original applied life sciences database, Horticultural Science coverage includes genetic resources, breeding, propagation, crop management, pests and diseases, plant physiology, storage and marketing. Crops covered include:

- Temperate fruits
- Tropical and subtropical fruits
- Nuts
- Vegetables
- Ornamentals, including lawns and turf
- Medicinal, essential oil, culinary herb and spice plants
- Beverage crops
- Other main and minor industrial crops including perennial oil crops, hard fibre plants and rubber plants

For a more extensive description of coverage please visit our subject coverage page.

Horticultural Science includes the following information materials:

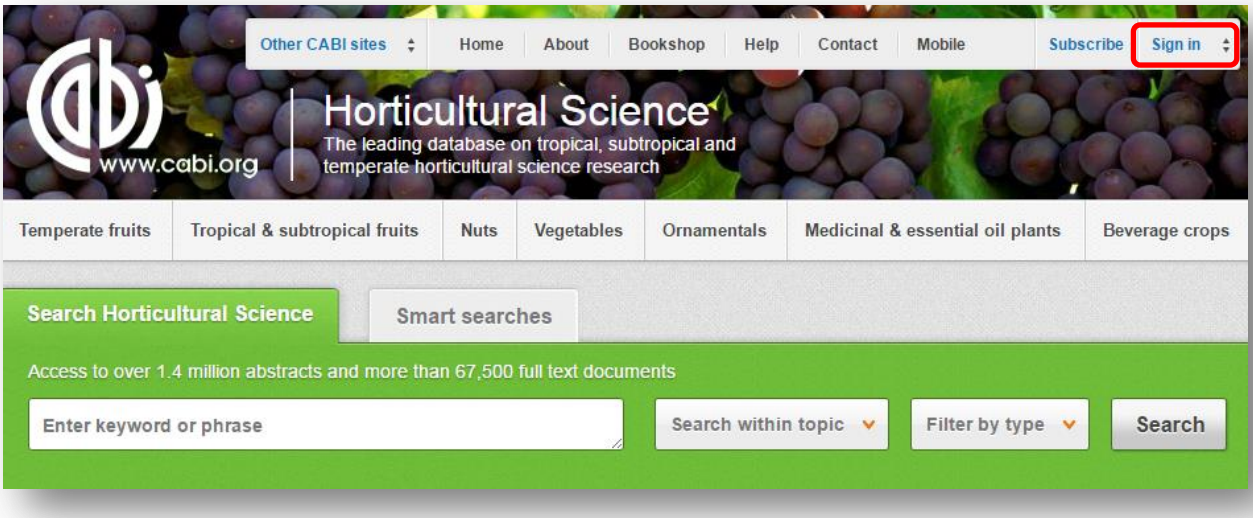
| | |
|---|---|
| *Abstracts records:* | Indexed records from the CAB Abstracts database relating to the subject of horticultural science |
| *Full text articles:* | Links to the complete scientific record for scholarly articles hosted on the CAB Abstracts database |
| *CAB Reviews:* | Comprehensive overviews and detailed reviews of the latest research, commissioned by CABI |
| *News articles:* | The latest news on developments in horticultural science written by subject experts, with references for further reading |

The following guide has been designed for all users of Horticultural Science to highlight various features available and enable our customers to easily navigate the interface. It will also introduce various search strategies that can be performed for new users of online databases and explain various techniques that can be used when searching to return the most relevant results.

# Accessing Horticultural Science

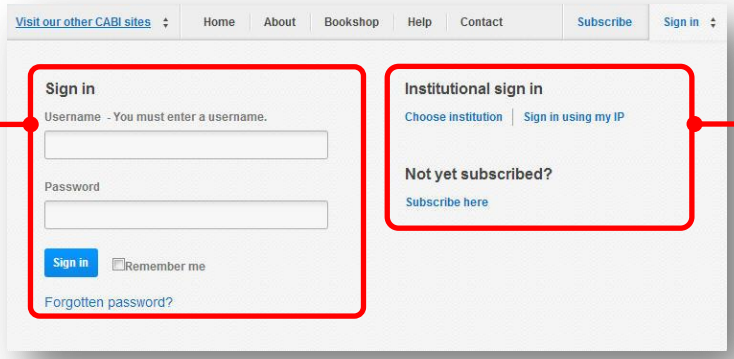
Horticultural Science is a web-based interface. To access the site visit [www.cabi.org/horticulture](www.cabi.org/horticulture)

To sign in to the Horticultural Science click on the Sign in button situated in the site menu as shown below:




There are three ways to login to the database depending on the access options your account has:

Personal credentials




IP address recognition

**By Personal Credentials:**

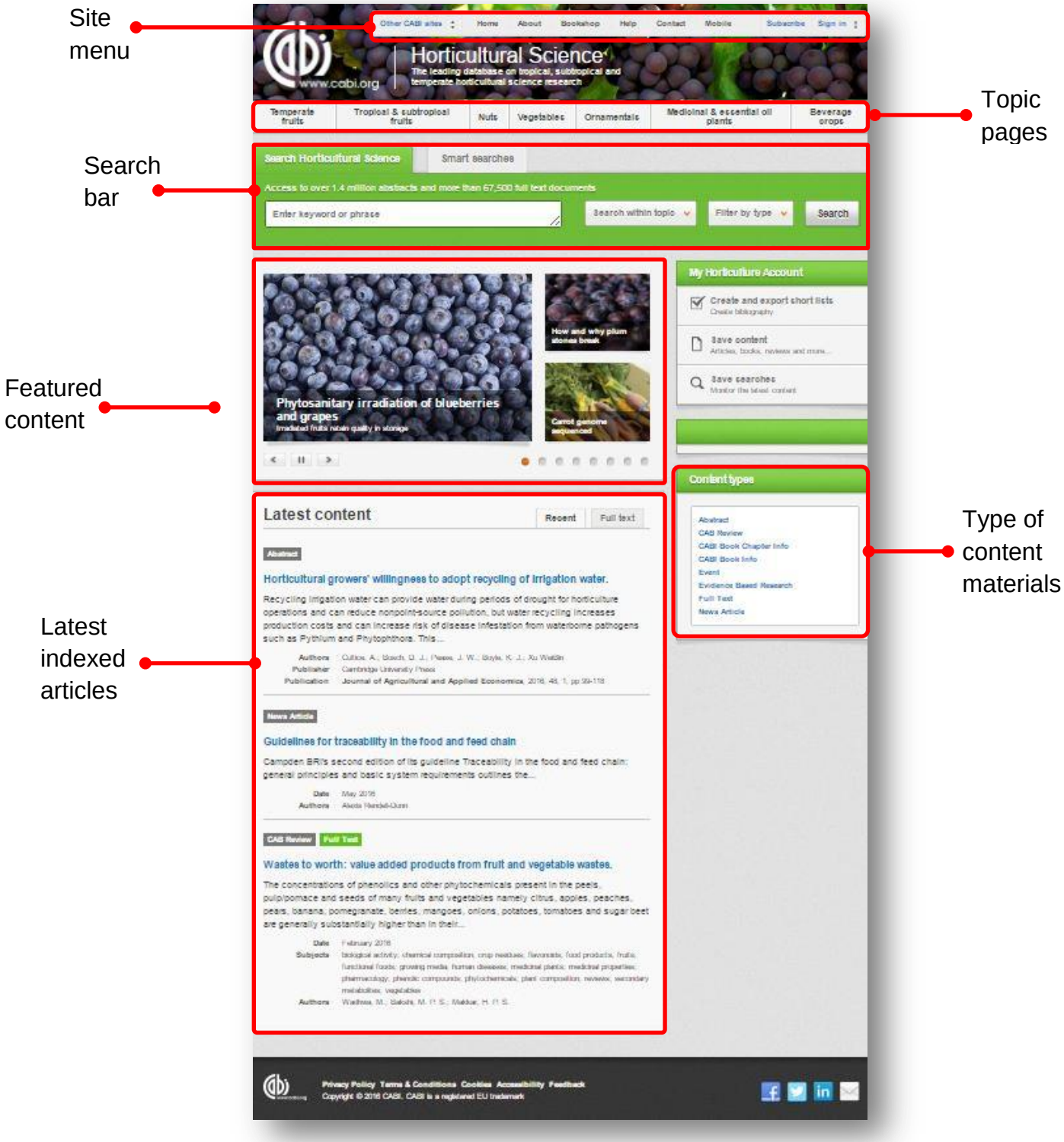
If you requested access to the site by a username and password please enter this in to the login box situated in the top left hand corner of the webpage.

**By IP Address:**

If your institution has a subscription to Horticultural Science and you are accessing through your institution's network, Horticultural Science will recognise your IP address as a registered user and automatically log you on to the site. If you aren't automatically recognised click the Sign in using my IP button.

# Navigating the Interface

Horticultural Science's interface has been designed to enable quick and comprehensive content searches. Below shows an image of the homepage and the various features displayed.



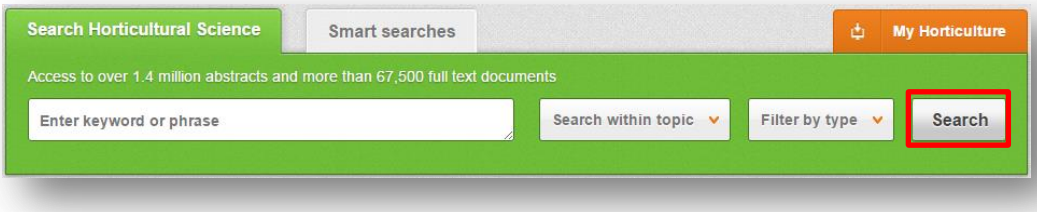
# Simple Site Searches

Horticultural Science offers a simple site search using a variety of basic search techniques to search content across the whole of the site such as Boolean operators and Phrase searching. These search techniques can be found in Appendix A.

## Conducting General Site Searches

A general site search conducts a search across all the various types of content and topics available in Horticultural Science. It will return a broad range of search results that will include all material types from all subject areas. It can be a useful place to begin a search.

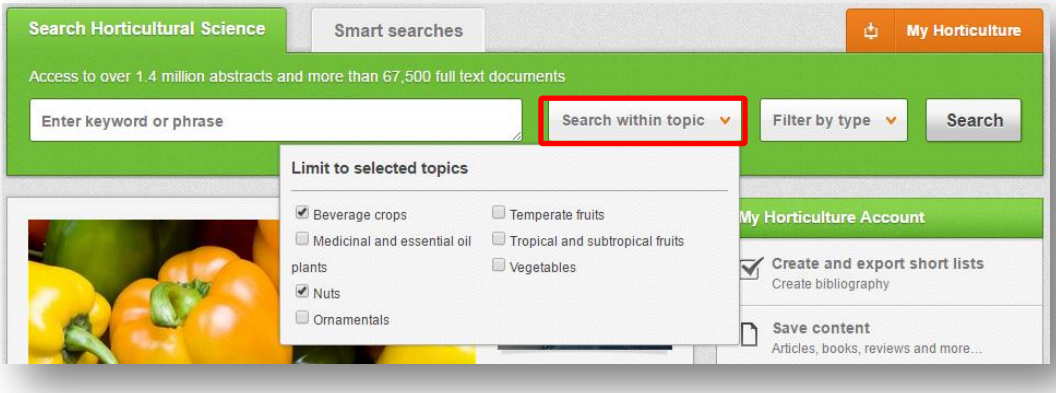
To conduct a general site search enter your search terms into the search box located in the search bar of the home page and click the Search button as shown below:

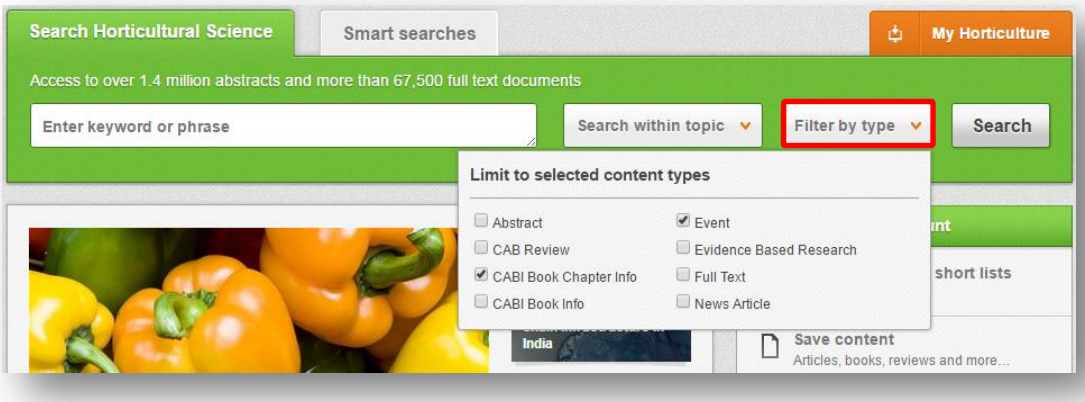



## Conducting Filtered Site Searches

A filtered site search can be used to limit a search to specific subjects or types of content on the Horticultural Science site. This will return a narrower range of search results and is particularly useful if you are trying to limit searches to particular areas or material types. You can limit the searches using a single filter or both simultaneously.

To conduct a filtered site search enter your search terms in to the search box located in the search bar of the home page. Click on the filter options to the right of the search box and select the categories you would like to limit the search to. The ☑ indicates which categories have been selected. Below shows the examples for both the subject and content filters:

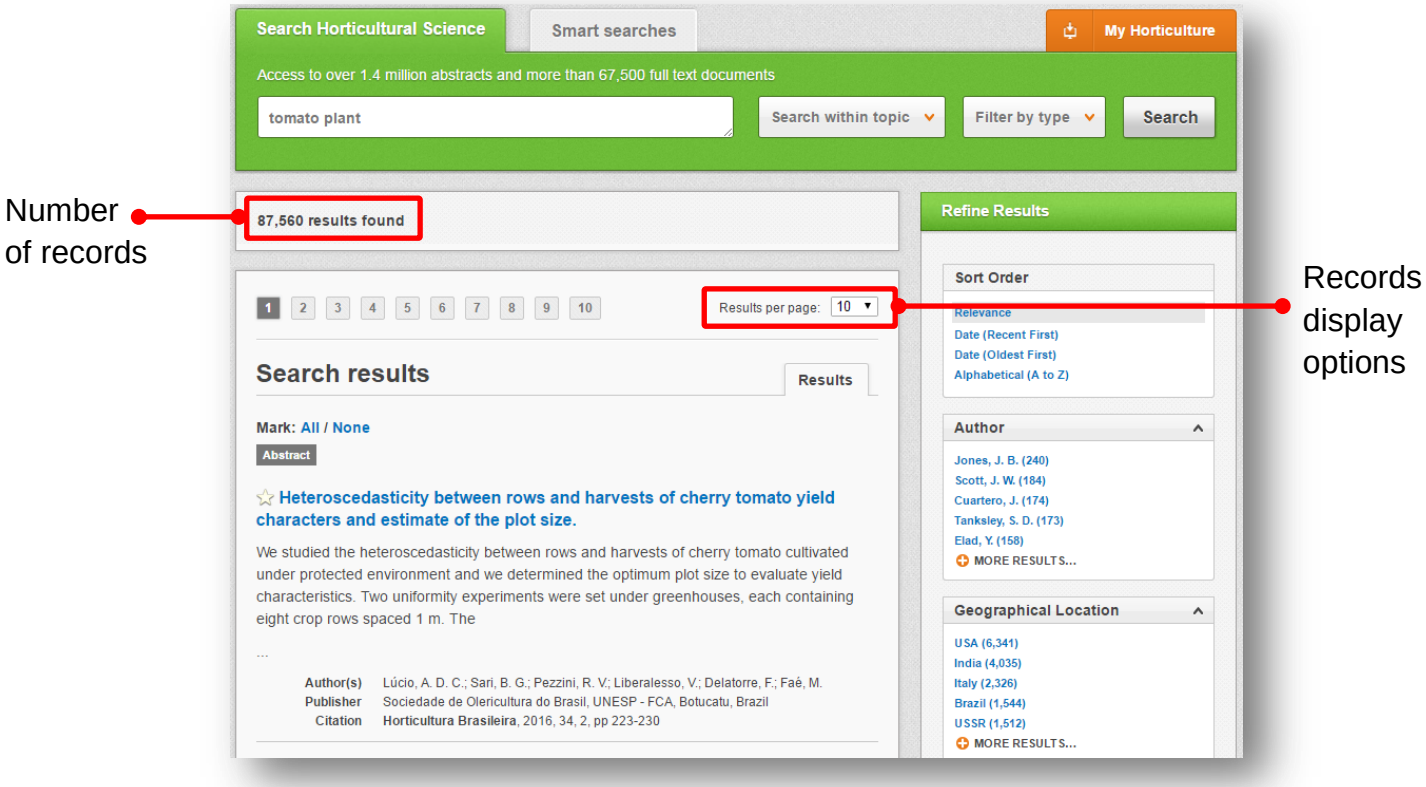




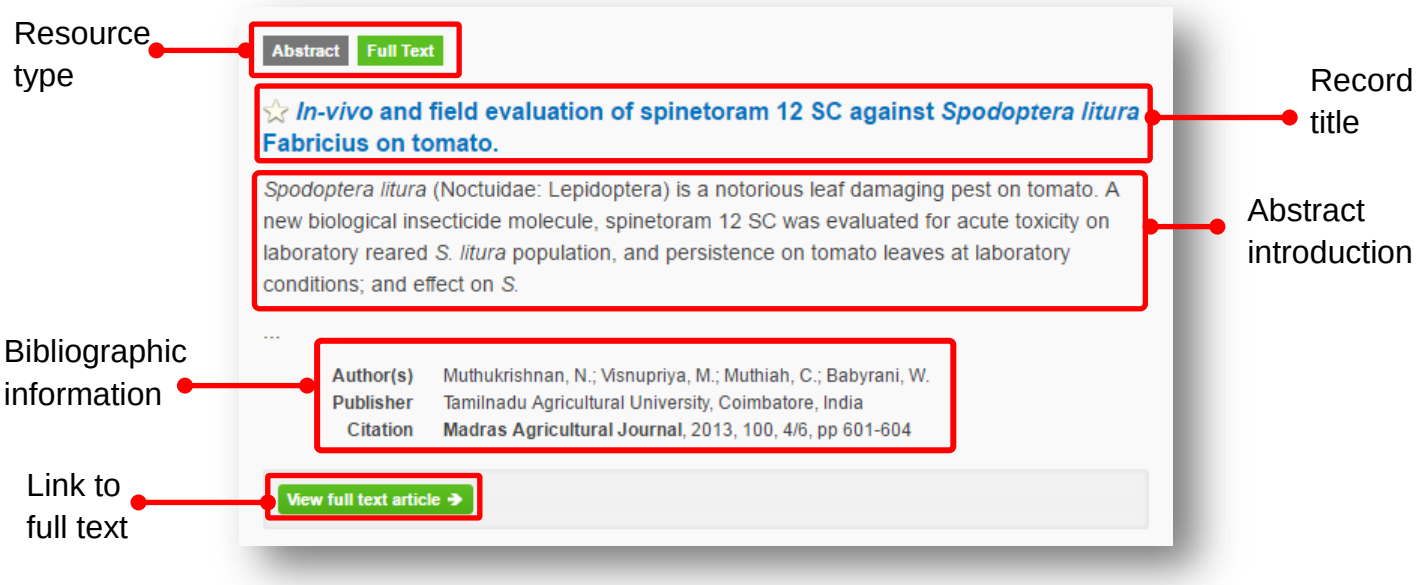

Once selected click the Search button.

## Viewing Search Results

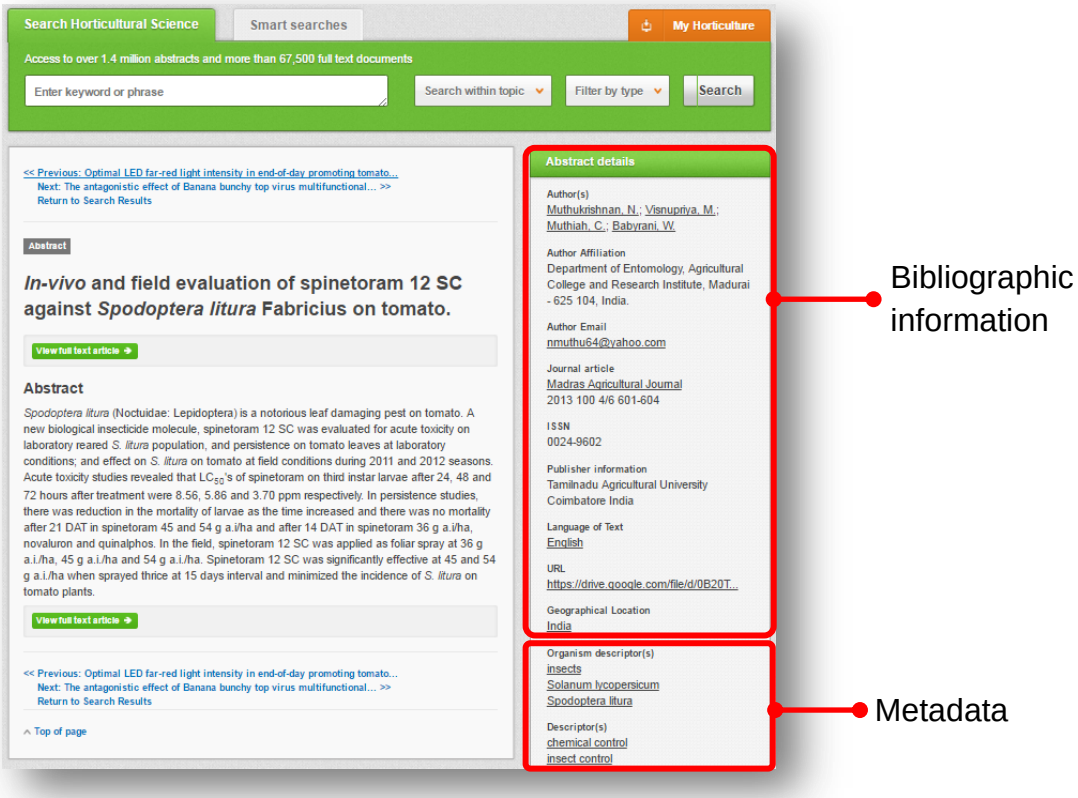
The returned results will be displayed on the search results page as shown below. The figure below the search box indicates the number of returned results from your search string query. The search results are displayed in the box below and can be ordered by most recently indexed first or relevance. At the top and bottom of the search results screen there are also options to vary the number of records displayed on the current page.



Below shows an example of an article header from the returned results. You can see the resource type, the article title, the leading sentence of the article abstract and further bibliographic information for the record. If the full text article is available the View full text article button is displayed which gives access to the full text article.

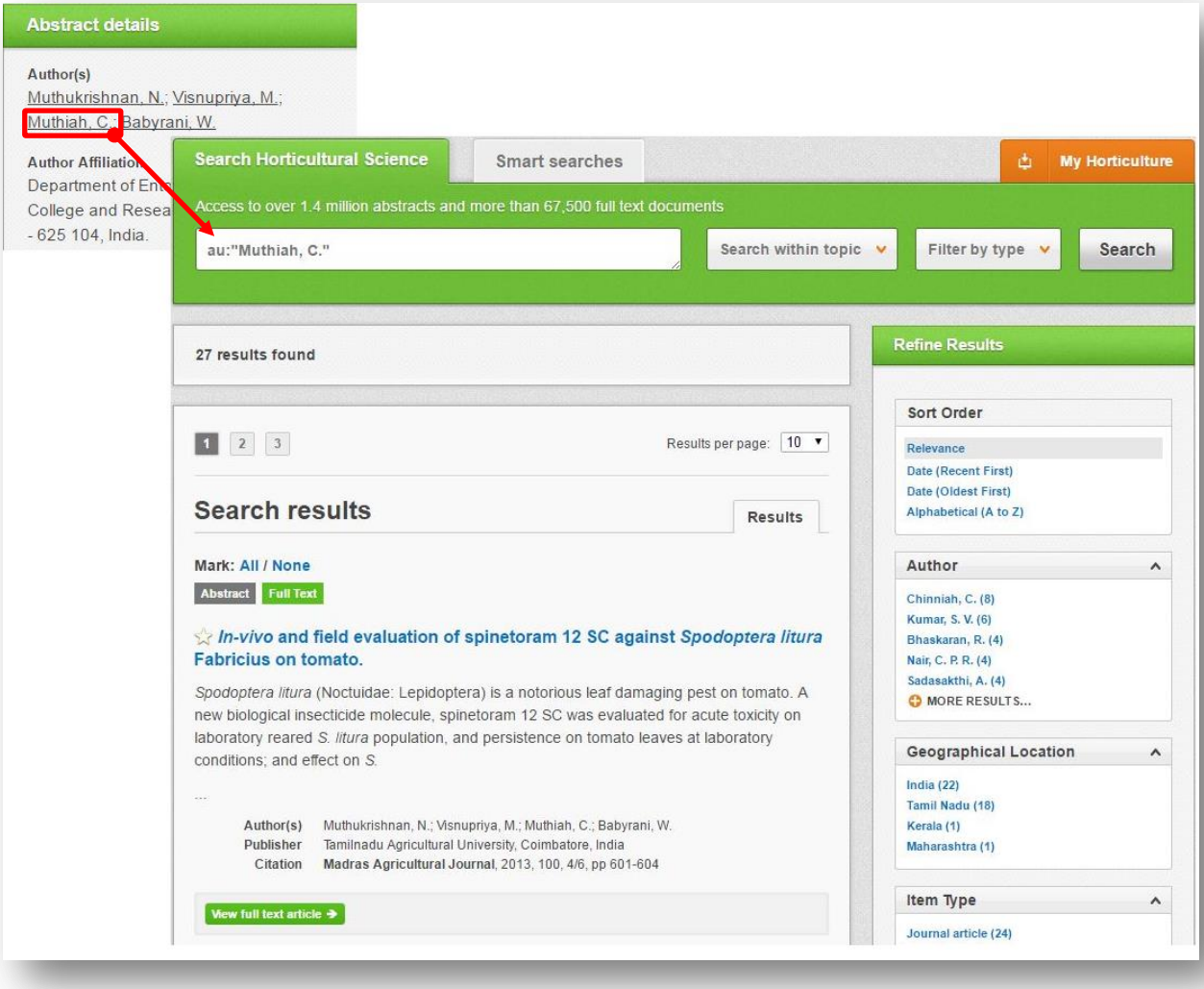



When clicked, the article title will take you to the record page listing the full bibliographic details of the record as shown below.



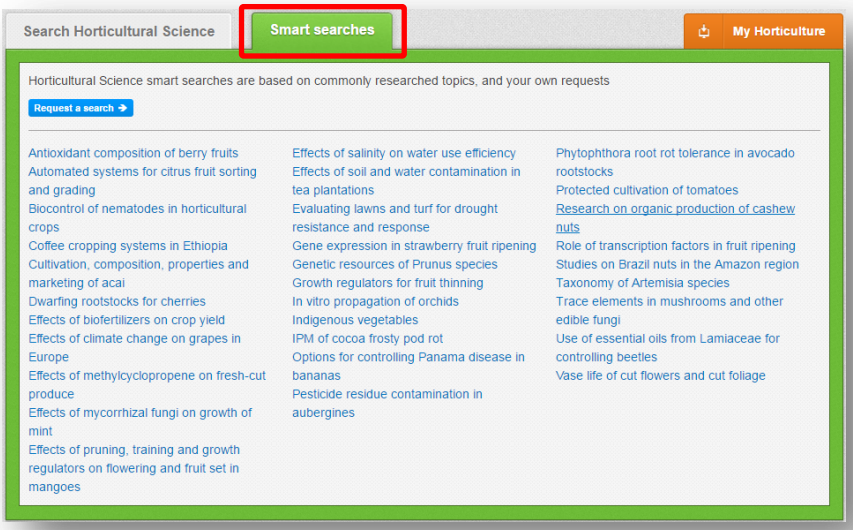
As well as the full abstract the page will also include the full bibliographic information and indexing keywords that were assigned to the record during the indexing process. This can be found under the Abstract details pane on the right of the page.

All these terms are intuitive links which when clicked performs a search on that term. The example below shows a section of the Abstract details pane. In this example we have clicked on the author name “Muthiah, C”. This has performed a site search using the search string “au: Muthuiah, C.” which has returned all records this author has contributed to.

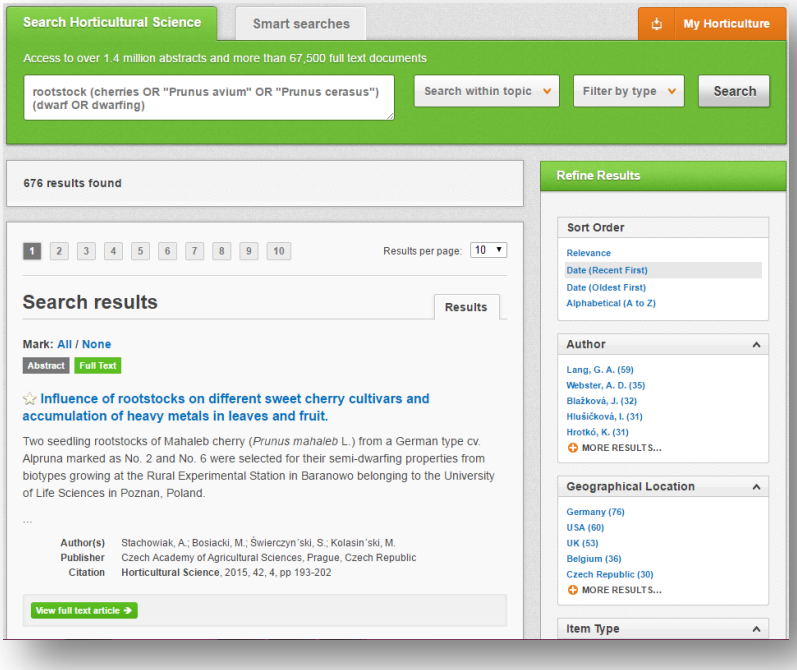


# Smart Searches

To help you search for literature in common or key topics of interest our subject experts have created predefined search strings. These have been created using complex search techniques such as field tags and multiple Boolean operators to return the most relevant results. To access the Smart searches click on the Smart searches tab above the search box as shown below.




This will show you a list of smart searches and the associated topics that are available. To conduct a smart search click on the topic of your choice. The screenshot below shows you the results for the smart search “Dwarfing rootstocks for cherries".




Note: To narrow results further you can either use the refine panel to the right hand side of the page or add terms manually to the end of the predefined search string.

# Advanced Searching

## Field Searching

The search box for the Horticultural Science site also allows you to conduct advanced field searching using the index field tags.

Field searching is a technique by which users can search for keyword terms in specific indexing fields. These indexing fields are used when adding a bibliographic record to CAB Direct e.g. Abstract title, author. Each indexing field has an associated field tag which can be used in conjunction with search keywords to return a more precise set of results. Below is a list of the indexing fields and their associated tag:

| Common Search Fields | |
|---|---|
| **Description** | **Field Tag** |
| Abstract | ab |
| Author affiliation | aa |
| Descriptor | de |
| Organism Descriptor | od |
| Geographic Location | gl |
| Broad term | up |
| Identifier | id |
| Publication source | do |
| Publisher | pb |
| CABICODE | cc |
| Conference | ct |
| Language | la |
| Publication type | it |
| Year | yr |
| Record number | pa |
| DOI | oi |
| ISSN | sn |
| ISBN | bn |

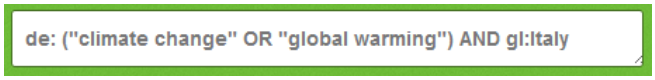
| Additional Search Fields | | | |
|---|---|---|---|
| **Description** | **Field Tag** | **Description** | **Field Tag** |
| Additional Authors | ad | Personal Author | au |
| Author Affiliation | aa | Personal Author Variants | av |
| CAS Registry Numbers | ry | Publisher | pb |
| Conference Dates | cd | CABI Product Code | sc |
| Conference Title | ct | Up-posted Descriptors | up |
| Corporate Author | ca | Web URL | ur |
| Country of Publication | cp | Year of Publication | yr |
| Descriptors | de | | |
| Digital Object Identifier | oi | | |
| Document Editors | ed | | |
| Document Title | do | | |
| Email | em | | |
| English Item Title | et | | |
| Non English Item Title | ft | | |
| Geographic Location | gl | | |
| Identifiers | id | | |
| ISBN | bn | | |
| ISSN | sn | | |
| Item Type | it | | |
| Language(s) of Summary | ls | | |
| Language(s) of Text | la | | |
| Location of Publisher | lp | | |
| Main Abstract | ab | | |
| Organism Descriptors | od | | |

To conduct a field search, type the associated field tag (must be lowercase) into the search box followed by a colon. Next enter your search term/s. Field searching can also be conducted using the variety of simple search techniques outlined previously such as multiple word searches and Boolean operators. Below show some examples:

**Single word search:**


**Multiple word search:**


**Searching with parentheses:**




## Index Terms or "Descriptors"

If you are looking only for important papers on a particular subject, where you want a high level of relevance, you should restrict your search to one or more of the CABI indexing or Descriptor fields. Every record on the database is indexed with terms that describe all the important concepts within a paper. The index terms may be added to one of five different indexing fields. The indexing fields that CABI uses are:

| Fields | Tags | Description | Example |
|---|---|---|---|
| Organism Descriptor | od: | The Organism Descriptor field is used for names of animals, plants and other organisms | od:"Prunus persica" |
| Geographic Location | gl: | Geographic Location field is used for country and other geographic names | gl:Germany |
| Descriptor | de: | The Descriptor field is used for all the "other" terms that are neither animal, plant nor geographic | de:global warming |
| Broad Term (Up-posted Term) | up: | The broad term is used to search for more general taxonomic or geographic terms as defined in CAB Thesaurus | up:Africa |
| Identifier | id: | This field is used for non-preferred (non-Thesaurus) index terms | id: lipins |

**Please note:** When searching the organism descriptor all animals are indexed with their scientific names. However, plants are indexed with both their scientific and their common names.

## Super Indexes

Super indexes allow users to search multiple indexes across related fields. They are useful tools for users if they are unsure which fields they need to specify when trying to conduct advanced field searching. They can be searched in the same way as other fields as the super indexes have their own field tag associated to them. Horticultural Science also has three super indexes.

The first two super indexes shown in the table below are used when searching bibliographic information relating to either the article title or the article authors. The table below shows the field tag, field indexes that are searched and an example of a search.

| Super index name | Super index field tag | Fields searched | Example |
|---|---|---|---|
| Title | title: | English title<br>Foreign title |  |
| Author | author: | Personal author<br>Author variant<br>Additional author<br>Document editor<br>Corporate author |  |

The third super index called the subject index is used when searching for the indexing terms or metadata that is recorded or assigned to each resource record. The table below shows the field tag, field indexes that are searched and an example of a search.

| Super index name | Super index field tag | Fields searched | Example |
|---|---|---|---|
| Subject | subject: | Descriptor<br>Geographic location<br>Organism descriptor<br>Identifier |  |

## CABICODES

In addition to adding index terms to a record, broad concepts are also “indexed” with a classification system known as CABICODES. The CABICODES are a hierarchical list of classification codes that divide the subject coverage of the CAB ABSTRACTS database into 23 major sections. Each section then includes a series of codes that divides that subject into more specific subjects. The codes themselves are typically used to code for subjects that would be difficult to describe with keywords alone. These CABICODES shown below display a selection of the CABICODES for horticulture and their associated topic area. For a full list of CABICODES and their topic areas visit the **CABICODE list.**

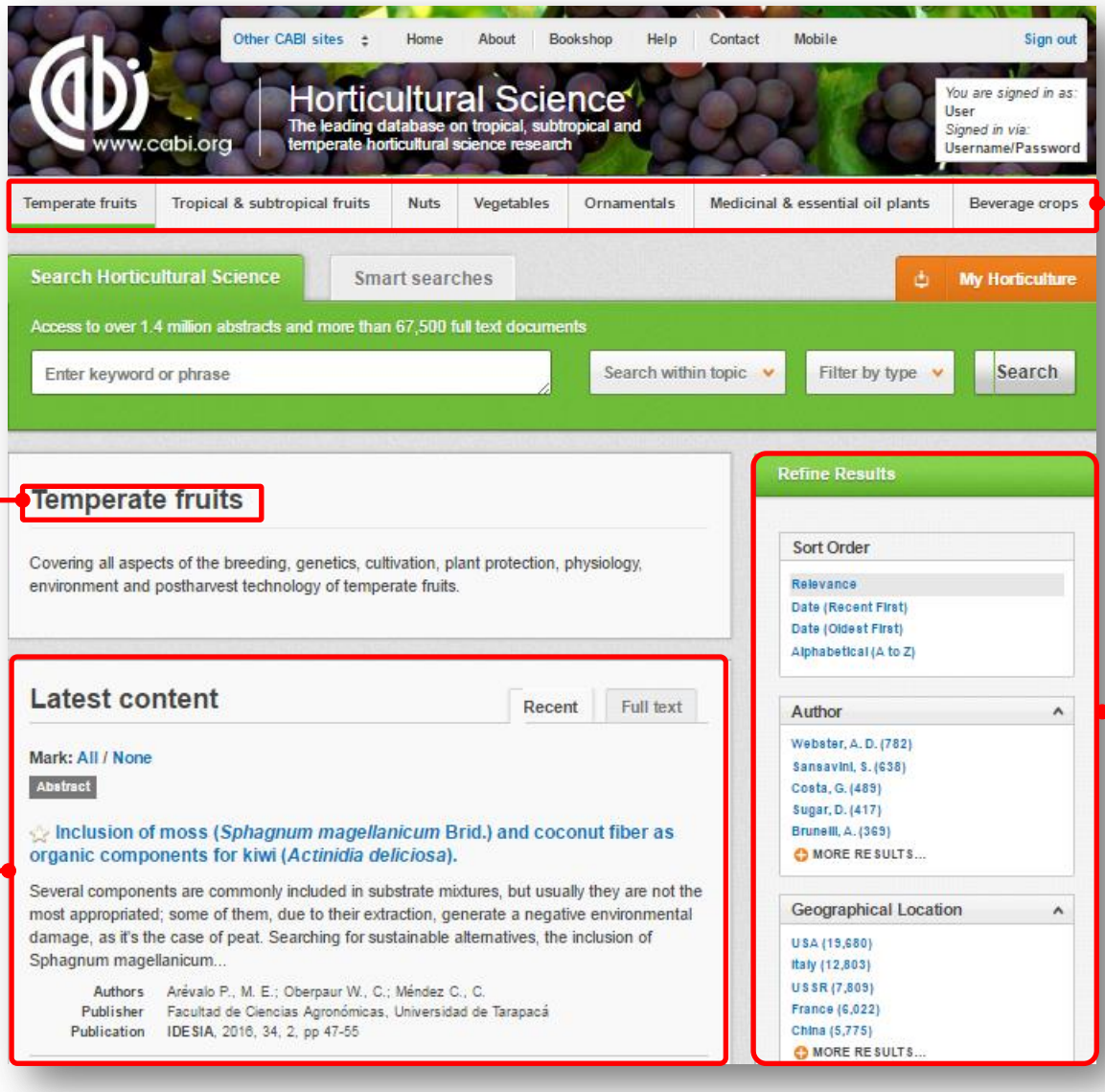
FF000 Plant Science (General)
FF003 Horticultural Crops (From March 2000)
FF005 Field Crops (From March 2000)
FF007 Forage and Fodder Crops (From March 2000)
FF020 Plant Breeding and Genetics
FF030 Plant Morphology and Structure
FF040 Plant Composition
FF060 Plant Physiology and Biochemistry
FF061 Plant Nutrition
FF062 Plant Water Relations
FF100 Plant Production
FF150 Plant Cropping Systems
FF160 Plant Propagation
FF170 in vitro Culture of Plant Material
FF400 Mycorrhizas and Fungi of Economic Importance; Symbiotic Nitrogen Fixation (Discontinued March 2000)
FF500 Weeds and Noxious Plants
FF600 Pests, Pathogens and Biogenic Diseases of Plants (Discontinued March 2000)
FF610 Viral, Bacterial and Fungal Diseases of Plants (From March 2000)
FF620 Plant Pests (From March 2000)
FF700 Plant Disorders and Injuries (Not caused directly by Organisms)
FF800 Plant Toxicology
FF900 Environmental Tolerance of Plants

The CABICODES can be searched just like any other field tag. Two field tags are assigned to the CABICODE field and these are described below. Please note, as other field tags these must be entered in lowercase.

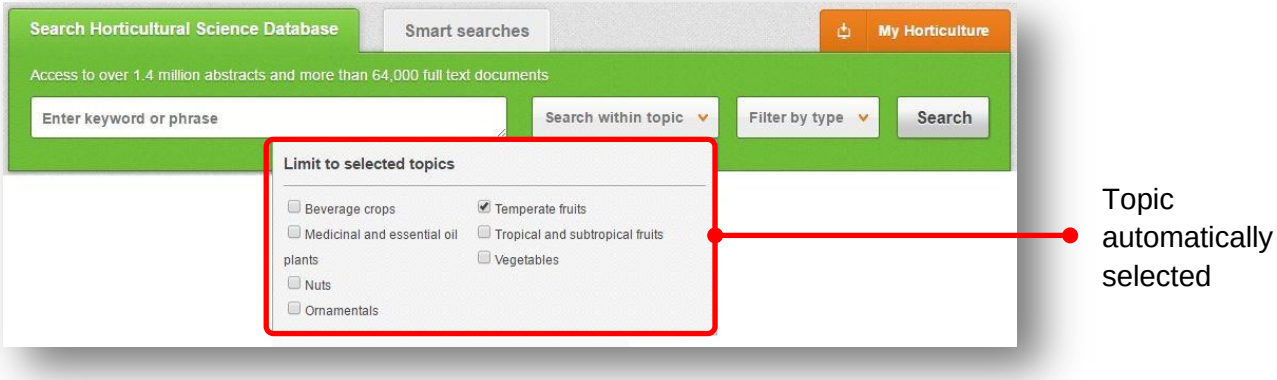
| Field tag | Definition | Example |
|---|---|---|
| **cc:** | Allows users to search the index of the alphanumerical assigned code e.g. FF160 | **cc: FF160** |
| **cabicode:** | Allows users to search both the alphanumerical assigned code index as above and the CABI code title index e.g. Plant Propagation | **cabicode: FF160 or cabicode: Plant Propagation** |

# Topic Pages

Topic pages enable you to focus searching on specific areas of horticultural science. The topic page can be selected from the horizontal menu bar shown in the screen shot below. These topic pages are structured in a similar format as the homepage but only include content items that refer to the selected topic. For example, the screen shot below shows the topic page for temperate fruits. Therefore the latest content section on the temperate fruits topic page will only show recent articles that refer to temperate fruits. The green underline in the horizontal topic page menu and the page title indicate which topic page you are currently viewing.



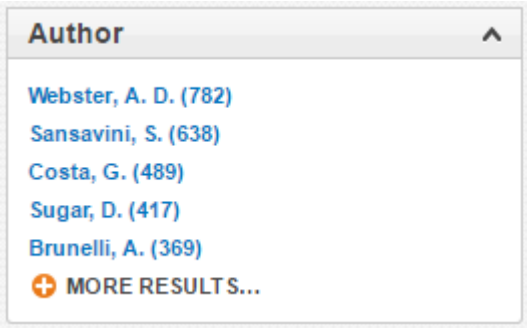
When conducting a search from a topic page, the relevant option is automatically selected from the topic filter section as shown below. This means that any search conducted from the topic page will limit searches to only content relating to that subject.




## Refine Options

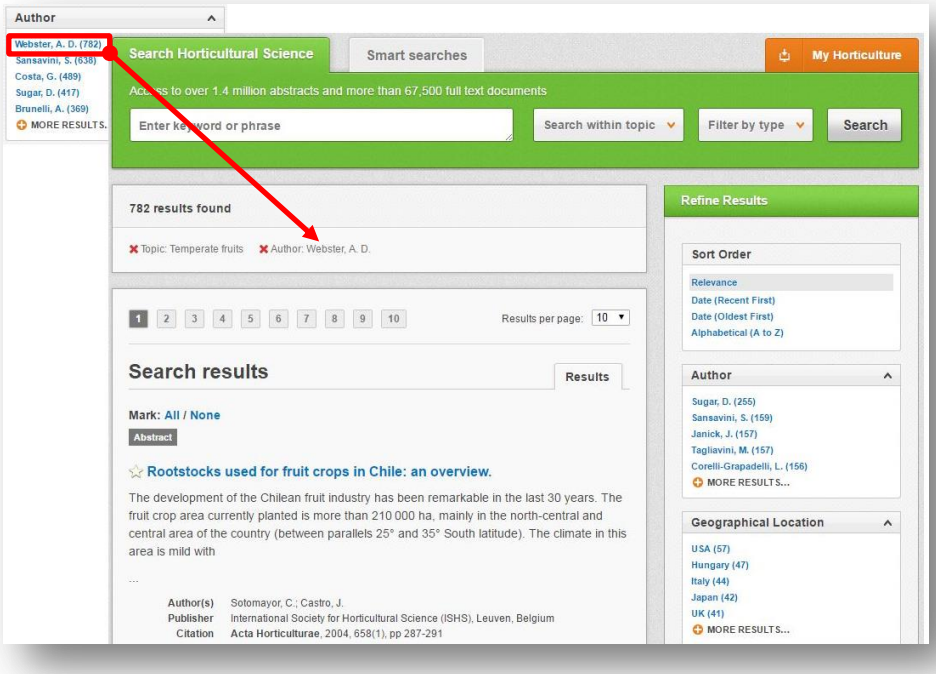
On the right side of the topic page there is a Refine results pane. This allows you to organise the display of the results alphabetically or by date or relevance. The refine pane also allows users to refine content even further using the following index fields:

- Author
- Geographic location
- Item type
- Language
- Organisms
- Subject topics




Each field is listed in a separate box in the refine results pane. These can be collapsed by using the ^ in the field box header. Blue text indicates the keyword and the bracketed number indicate the amount of records associated to it.

Clicking on a blue keyword conducts a search to return results specific to the selected topic and the relevant keyword from the associated field. For example, below we can see that by clicking on the author Webster, A. D. (782) listed in the author field box a filtered search is generated limiting results the author: “Webster, A. D.”. This is displayed in the filter display at the top of the results page.




# My Horticulture

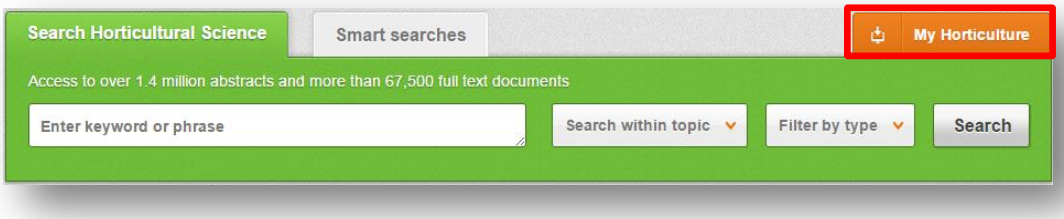
The My Horticulture feature improves search functionality for users allowing users to:

- Combine and save searches
- Save records
- Export citations
- Create Alerts

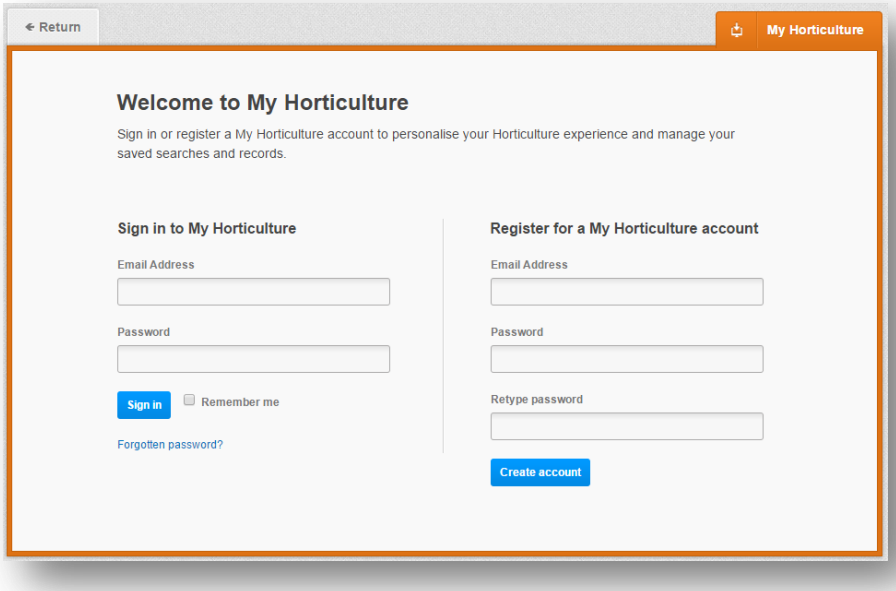
To gain the full functionality of My Horticulture and for the system to record and recall your searching activity you must be signed in. It is therefore recommended that you sign-in to My Horticulture at the beginning of all your search sessions on Horticultural Science.

## Creating a My Horticulture Account

Before you can access the features of My Horticulture you first need to create an account. Click on the My Horticulture button in the top-right hand corner of the search box as shown below:

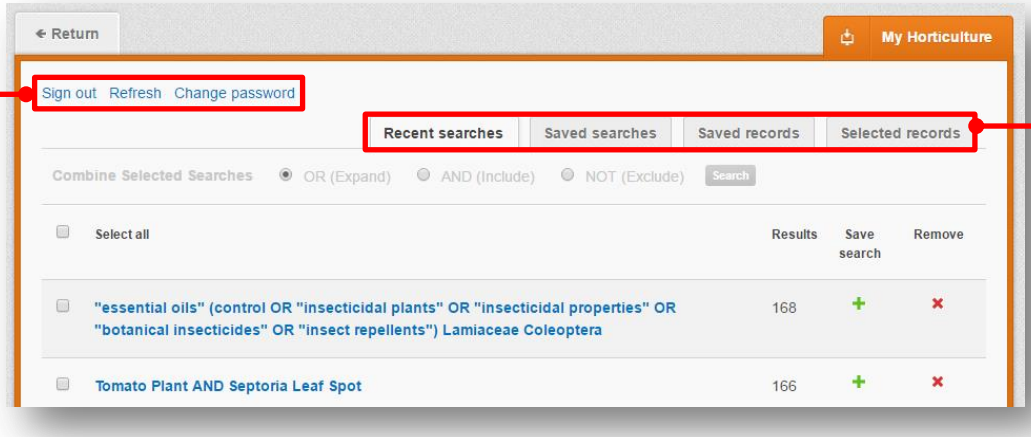


This will direct you to the sign-in page as shown below. The right hand side of the page allows new users to register an account. The left hand side of the page allows users already registered to sign in. Once registered, fill in your unique credentials to sign-in.




Below shows the My Horticulture page. At the top of the display box are the different tabs to display the different types of search activities. By default the display automatically shows the recent searches that you have conducted. To the left hand side of the page there is also an option to sign-out or change your account password. To permanently remove a search from your recent search display click on the remove button: ✖

Sign out / Refresh / Change password

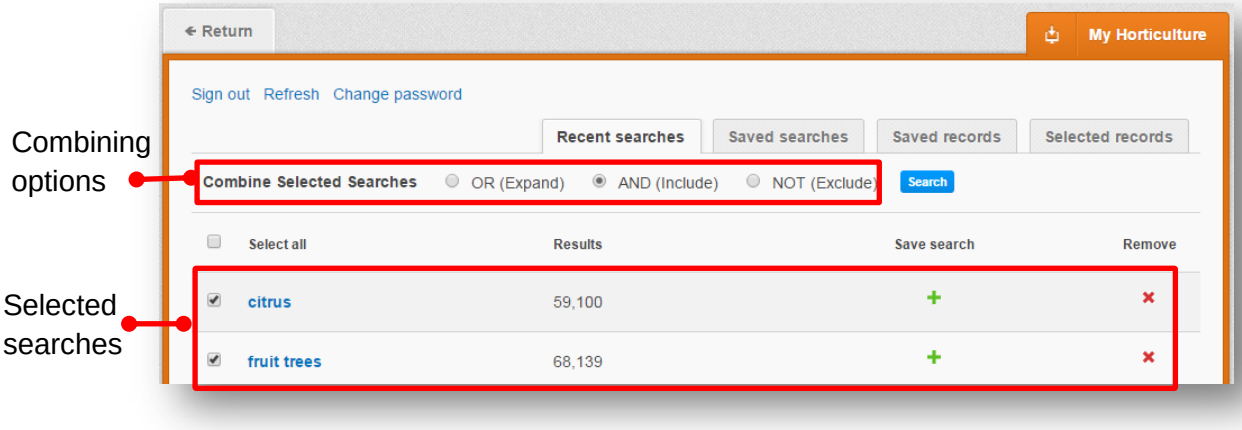



Display tabs

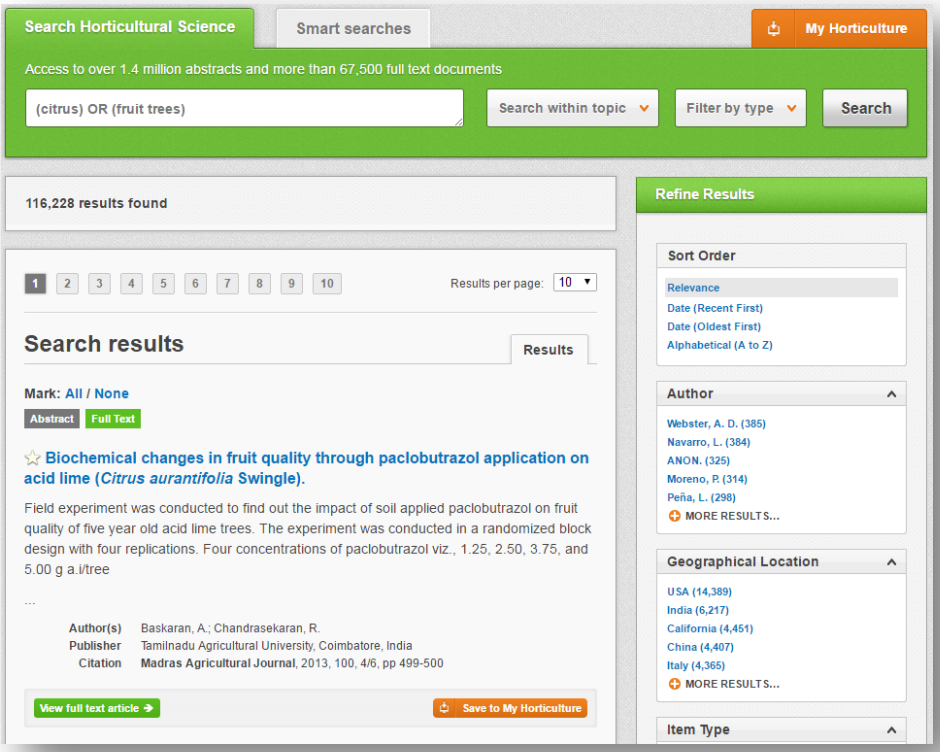
## Combining Searches

Combined searches are a useful tool for when compiling long and complex search strings which contain multiple Boolean operators and parentheses. To simplify the process and minimise the chance of input errors this function allows the user to perform two or more separate searches and combine them with either the AND, OR and NOT Boolean operators.

In the example below we can see in the recent search tab two searches have recently been conducted. These two have been selected using the checkbox ☑ and the AND Boolean operator has been chosen from the combined search options.

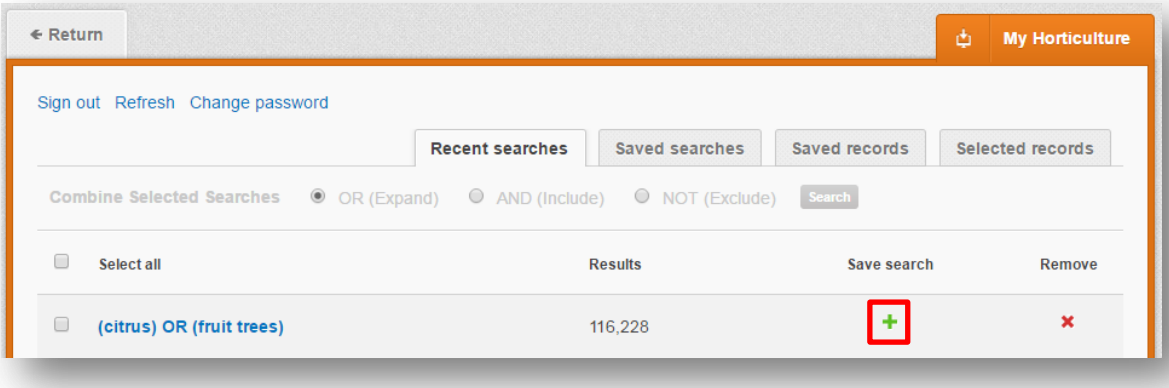


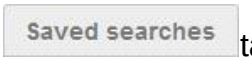

Once your options have been selected perform the search by clicking the Search button. This will conduct the search and direct you to the results page as shown below. You can see that the search string of the two combined searches is displayed in the search box. By combining these searches with the AND operator we have limited the results further to return 11,011 records but alternatively by using this feature with the OR operator we can also expand results.




## Saving Searches and Creating Alerts

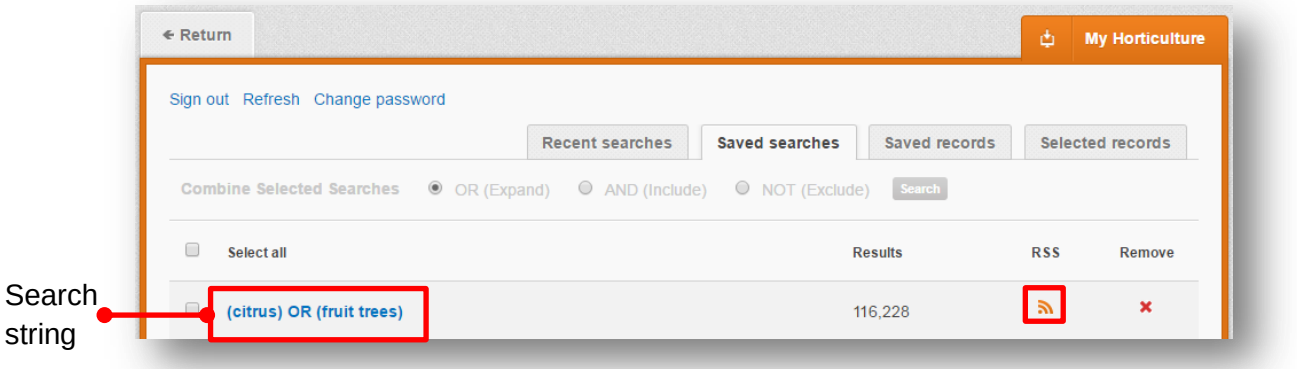
For searches you would like to run on a regular basis, users can save searches for future reference by using My Horticulture. To save a search visit the recent search tab from the My Horticulture page and click on the save search button 




To view your saved searches click on the saved searches 

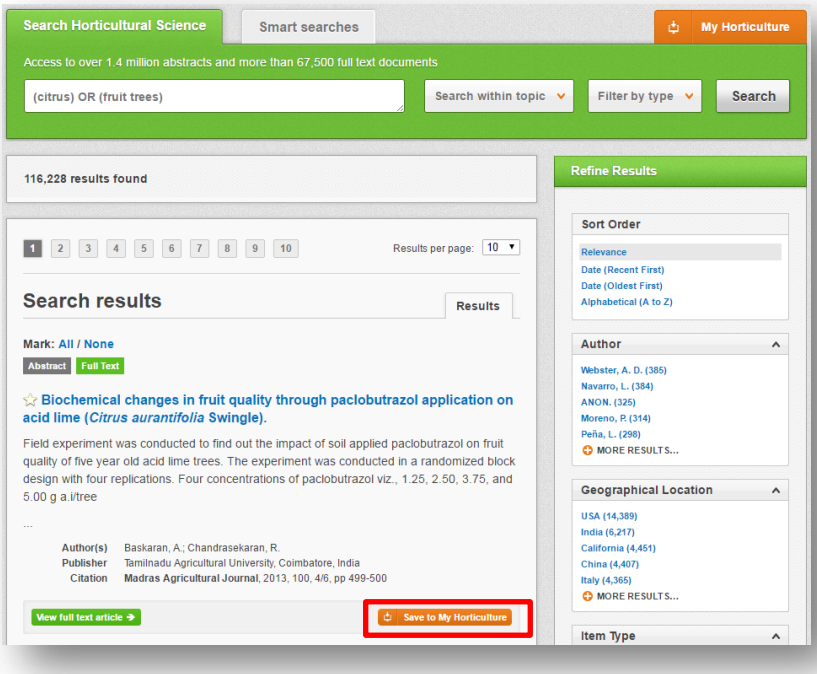
tab. The saved searches tab allows the user to conduct a saved search by clicking on the blue

search string displayed. For each saved search there is also an option to set up an RSS feed which automatically notifies the user when new records relating to that search string are added to the Horticultural Science site. These notifications can be viewed through all RSS readers such as Microsoft Outlook and Feedly. To find out more about RSS and how to setup an account with an RSS reader read more here. To set up an RSS feed for your search string click on the RSS feed button

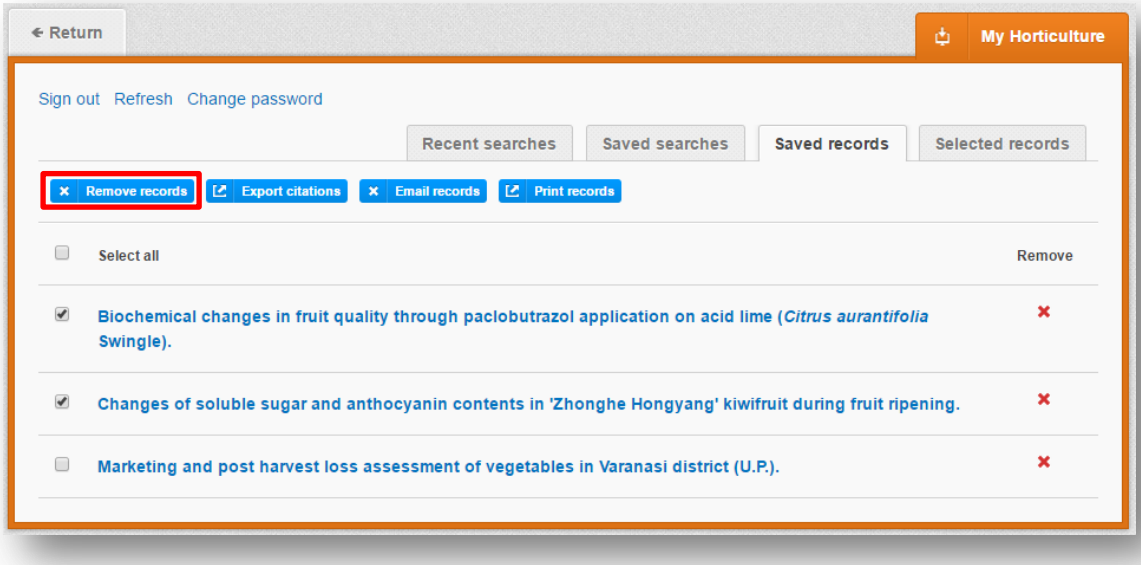



## Saving and Exporting Records

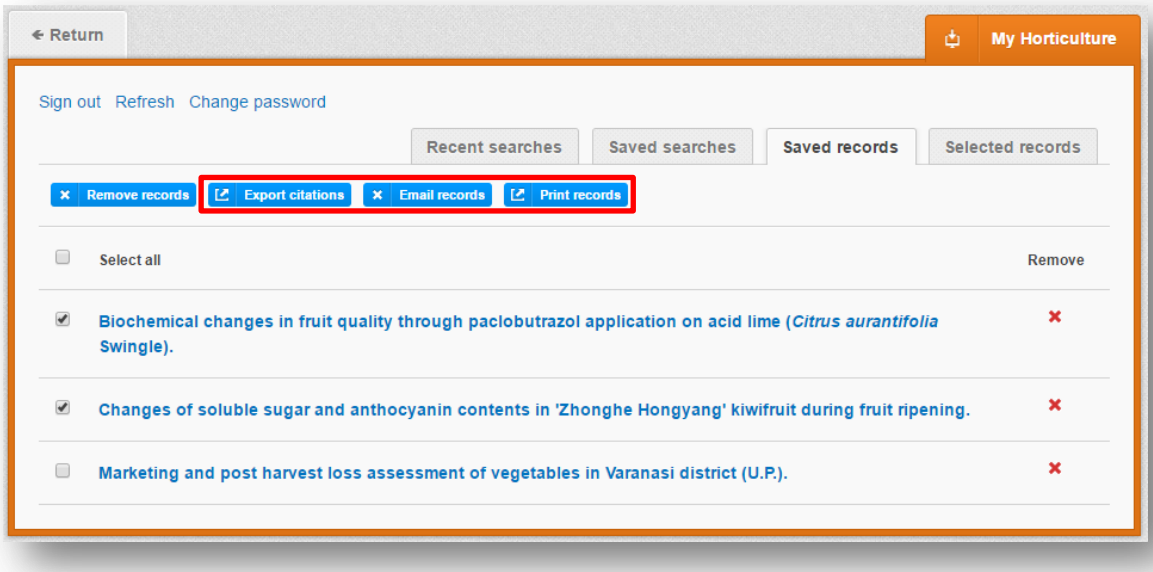
The My Horticulture tool also allows you to save individual article records for future reference and export these to reference management software to create your own bibliographies or reference lists. To save a record to the saved records repository you must first be signed into the My Horticulture tool before conducting searches. When signed in and a search has been conducted each record in the displayed results will have a Save to My Horticulture button associated. Click this button to save the record.



To view your saved records click on the saved records tab Saved records in the My Horticulture pages. This will display the title of all saved records. To view a specific record, click on the title. Records can be removed individually by using the ✖ button. To delete multiple records check the boxes ☑ next to the records and click the ✖ Remove records button as shown below.




Citations can also be exported to reference management software in a RIS file format. To export citations, select the records you would like to be included in the reference list using the checkbox ☑ and click the Export citations button as shown below. You can also ✖ Email records and Print records.



# Appendix A: Search Techniques

| Search technique | Example | Description | Function | Reason to use |
|---|---|---|---|---|
| **Single word search** | irrigation | Searches using a single word term | Returns a broad range of results for a particular word/topic | Provides a broad overview of a scientific area of interest |
| **Boolean search** | irrigation AND yield | Searches using the operators AND, OR and NOT | Performs searches on multiple concepts that provides specific keyword searching for an area of interest that can include or exclude other concepts. | Allows the user to conduct more controlled searching. Can be used to omit homophones |
| **Phrase searching** | "climate change" | Use quotation marks before and after a multiple word phrase | Returns results only containing the entire phrase | Narrows searching to records that only contain the whole phrase |
| **Parentheses** | "gene expression" AND (ripening OR senescence) | Searches using keywords, Boolean operators and parentheses. | Used for searches that contain multiple Boolean operators to define the correct search logic | Refines searches with Boolean operators further to provide limited search results |
| **Truncation & wild cards** | mulch* and weed* | Uses the symbols * and ? in keyword search | Using the * returns results with different word stems for the root word<br><br>Using the ? symbol allows users to specify unknown characters | The * allows users to broaden results to keywords with differing word stems e.g. pop* = popular, population, etc.<br><br>The ? returns results using a keyword that may differ in spelling |