

ORGANIZATION OF NEMATOLOGISTS OF TROPICAL AMERICA ONTA NEWSLETTER http://www.ontaweb.org/ April 2018

50th ONTA ANNUAL MEETING



Fig. 1. Arequipa Plaza de Armas

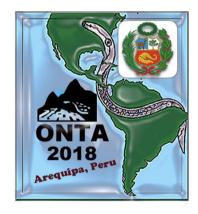
The Organization of Nematologists of Tropical America will be hosting its **50th Annual Meeting** during the week of **19 – 23 August 2018** in **Arequipa (Peru)** (Fig. 1). For more tourist information on Arequipa City visit http://www.goseewrite.com/2015/06/7-thingsto-do-in-arequipa-peru/.

Travel agency and excursion information can be found in the supplementary materials accompanying ONTA Newsletter Vol. 47 issue 2 (November 2017). Hotel Libertador is the official hotel and meeting site. Registration and accommodation details the meeting be found for can at https://aspefit.org/onta/

Early registration (before 1 June)

Please make a note in your diary to take advantage in time for the early bird registration rates:

ONTA members US\$550.00 Non-ONTA members US\$700.00



19 - 23 August 2018

Students US\$200.00 Accompanying person US\$100.00

Late registration (1 June or later)

ONTA members US\$650.00 Non ONTA members US\$800.00 Students US\$250.00 Accompanying person US\$150.00

Inside this issue:	р.
50 th ONTA Annual Meeting	1
From the ONTA Vice-President	3
From the ONTA President	5
From the Newsletter Editor	6
ONTA Members News	8
ONTA Notice Board	12
ONTA Foundation	13
ONTA Agenda	16
ONTA Active Membership	18
ONTA Gallery	19
Nematology New Books	20
ONTA Sponsors	22
ONTA Officers	23

Local Organizers and Local Arrangements Committee

The Local Arrangements Committee is hosted by the National University of St Agustin of Arequipa (Universidad Nacional de San Agustín de Aréquipa). Local Organizers also include the National Institute of Agraria Innovation (Instituto Nacional de Innovación Agraria), local and national universities, College of Engineers of Peru (Colegio de Ingenieros del Perú), Ministry of Agriculture and Irrigation (Ministerio de Agricultura y Riego), private enterprise and farmer associations.

The Local Organizers Committee members (Figs 2-5), lead by Alberto Anculle (albertoanculle@gmail.com) and Martín Augusto Delgado Junchaya (mdelgado@upao.edu.pe), are: Javier Franco Ponce (javierfrancoponce@gmail.com), and Carolina Cedano S. (caescesa1@yahoo.com).



Courtesy of Ed McGawley



Fig. 2. Alberto Anculle



Fig. 3. Martín A. Delgado



Fig. 4. Nahum Marbán-Mendoza and Javier Franco



Fig. 5. Carolina Cedano Saavedra

Scientific Program Committee

The scientific program is being jointly prepared by the Local Organizer Committee members and ONTA's Vice-President Ed McGawley and President Deb Neher. The program will include: Opening Ceremony (Special Program), conferences, oral presentations, poster sessions, field day, awards ceremony and gala party. Excursions (optional) will be held after 23 August. In preparation for the Arequipa meeting, ONTA Vice-President Ed McGawley (Fig. 6) and President Deb Neher (Fig. 7) encourage ONTA members to have an active participation in the program and meeting attendance. Their message follows.

FROM THE ONTA VICE-PRESIDENT

Ed McGawley – ONTA Vice-President 2017



Fig. 6. Ed McGawley - ONTA Vice-President 2017

21 March 2018

Greetings fellow ONTA members,

We are well into the new year now, the spring semester is almost over, researchers are planning field work for the summer of 2018 and preparations are well underway for the August 19 - 23 ONTA meeting in Arequipa, Peru.

The coordination of activities that result in a well planned, member-friendly and productive gathering of like minded scientists requires significant effort on the part of ONTA officers and Peruvian local arrangements committee (LAC) members, Drs Martín Delgado, Alberto Anculle, Javier Ponce and Carolina Cedano Saavedra. Dr Charles Overstreet and I will be travelling to Peru in mid-April to finalize all plans with the LAC. As I indicated in the last newsletter, the program will include invited presentations, regular and student paper and poster sessions as well as workshops and symposia. You should consult the meeting website (via the link from ontaweb.org) for all current meeting information.

Chairpersons for workshops and symposia are finalizing speakers on topics that include Potato Cyst Nematode (chaired by Dr. Louise-Marie Dandurand) nematode species important in Peru (3 symposia with a total of 9 speakers, chaired by Martín Delgado), Nematode Biocontrol and Soil Suppressiveness (Chaired by Dr Erwin Aballay) and The Future of Nematology chaired by Dr Nahum Marbán-Mendoza, a particularly relevant symposium that *all should attend*. In addition, Dr Ignacio Cid Del Prado will present a workshop on Phytoparasitic Nematodes: basic techniques, symptomatology, traditional taxonomy and population management.

On Wednesday the 22nd, there will be an agriculture field day tour with bus service, translators, refreshments and lunch compliments of ONTA. On the tour we will visit several agricultural areas in the Arequipa vicinity while being treated to a beautiful local landscape. On Thursday evening, the banquet and awards ceremony will be a truly unique event featuring local cuisine and entertainment and maybe even a surprise.

Following the meeting, there is a tour arranged that will take us to Machu Picchu, a 15th century Inca fortress in the Cusco region of Peru that was constructed as a retreat for the emperor Pachacuti. Machu Picchu was declared a Peruvian Historic Sanctuary in 1981 and a UNESCO World Heritage Site in 1983. In 2007, it was voted one of the New Seven Wonders of the World.

All of these elements combined will make ONTA 2018 a truly memorable event. Mark your calendars, visit the website early and register. I hope to see you there.

Ed McGawley, ONTA VP Vice-President

(EMcgawley@agcenter.lsu.edu)

FROM THE ONTA PRESIDENT



Fig. 7. Deb Neher

August.

April 2018 Newsletter for ONTA

Greetings!

Vice President Ed McGawley and I have been corresponding regularly in preparation for the 2018 ONTA meeting in Arequipa, Peru 19 - 23 August. I am excited that there will be a trio of Peruvian symposia featured in the program. Specifically, these symposia are relate to species, biological control, and Integrated Pest Management of phytopathogenic nematodes in Peru. This will help provide a backdrop to our field day on Wednesday, 22

During the past few months, we have completed the transition of *Nematropica* editorship to the Pacific under the helm of Brent Sipes, Editor in Chief. ONTA still has a vacancy for the office of Secretary office. In the meantime, Julia Meredith and I have been sharing the duties of tracking membership and distributing news. In early 2018, I reconfigured the membership of the awards and honors committee. Thanks to Forest Robinson (USA) for agreeing to chair the committee. Other members include Alejandro Esquivel (Costa Rica), Erwin Aballay (Chile), Ignacio Cid del Prado (Mexico), Larry Duncan (USA), and Paula Agudelo (USA, Columbia).

I look forward to seeing you in Arequipa in a few short months!

Sincerely yours,

Deborah (Deb) Neher ONTA President (Fig. 7)

(Deborah.neher@uvm.edu)

FROM THE ONTA NEWSLETTER EDITOR

50th Annual Meeting

Dear ONTA members,

Welcome to our new issue of the ONTA Newsletter where we will share with you some memories of the first ONTA meeting in Peru and highlights of the forthcoming ONTA annual meeting in Arequipa, Peru, next August 2018.

The first ONTA meeting celebrated in Peru took place in Lima in March 1977 and, 41 years later, ONTA is coming back to Peru. On this important occasion we will meet in Arequipa, a beautiful city in the Andean region, where we will celebrate another ONTA anniversary: the ONTA 50th Annual Meeting Anniversary. Last year we celebrated, in Mayagüez, Puerto Rico, ONTA's inception in 1967. One year later the first annual meeting of ONTA took place in Florida in 1968.

This year ONTA nematologists will be back in the Peruvian Andes. The Andean region has been regarded as 'a cyst nematode species factory' (Grenier *et al.*, 2010). *Globodera* spp. are among the best examples of major native pests of potato exported from the Andean region to other latitudes.

Potato (*Solanum tuberosum*) is a very important crop in Latin America not only because of the area of land dedicated to its cultivation, but also because of its nutritional properties. It is native to the Andean regions of South America where the Incas cultivated it some 2000 years ago. *Globodera rostochiensis* and *G. pallida* are the commonest cyst nematodes in Latin American potato growing areas. Records for *G. rostochiensis* began in 1952 in Peru (Manzanilla-López *et al.* 2006).

Important studies on potato cyst nematodes in Peru were started in La Molina Experimental Station by A. Martin in 1964. These studies were continued by M. Canto Sáenz, J. Franco and M. Scurrah (Figs 8 and 9) who elucidated the biology of these nematodes and selected potato varieties resistant to these pests at the International Potato Center, Lima (Fig. 9).



Fig. 8. Manuel Canto Sáenz

The false-root knot or rosary nematode. Nacobbus aberrans. is another serious pest of potato and other crops in the Andean region of South America. In Peru, P. Jatala (Fig. 9) studied the biology and biotypes of N. aberrans sensu lato. He was the first to consider this nematode a species complex. In Bolivia, J. Franco (Fig. 9) was involved for several years in applied and basic research on Nacobbus. His research studies were facilitated by the experience he acquired working on potato cyst nematodes in Peru.

As part of the Arequipa meeting program, local organizers have arranged a field day visit to 'La Joya' to see local agriculture, local agricultural crops and nematode problems such as root-knot (Meloidogyne) on pomegranate and Ditylenchus on onion.

We wish ONTA delegates a successful meeting and an unforgettable field day experience.

Best wishes,

Rosa ONTA Newsletter Editor



Fig. 9. Participants in the Second Nematode Planning Conference (CIP Headquarters in Lima, Peru). From left to right: A. S. Seshadri, R. D. Winslow, A. F. Van Der Wal, Bill Brodie, Ori T. Page, Humberto Mendoza, H. J. Jensen, R. Tarte, C. P. Madamba, Maria M. de Scurrah, Javier Franco, Parviz Jatala (picture copyright CIP, 1978).

References

- CIP. 1978. Developments in the control of nematode pests of potato. *Report of the 2nd nematode planning conference 1978.* Lima, Peru, 193 pp.
- Grenier, E., S. Fournet, E. Petit and G. Anthoine. 2010. A cyst nematode 'species factory' called the Andes. *Nematology* 12: 163-169.
- Manzanilla-López, R. H., P. Quénéhervé, J. Brito, R. Giblin-Davis, J. Franco, J. Román and R. N. Inserra. 2008. Contributions by Latin American nematologists to the study of nematode plant disorders and related impact on crop production. Pp. 191-218. *In* B. Eriksson, D. McNamara and J. Webster, eds. *An Anecdotal History of Nematology*. Pensoft Publishers, Bulgaria.

ONTA MEMBERS NEWS

Mexico

A presentation of the book 'Perspectives in sustainable nematode management through Pochonia chlamydosporia. Applications for root and rhizosphere health' was given by Dr Pedro Mendoza-De Gives (Fig. 10) on the 2 February 2018 at CEPROBI (Centre for Development of Biotic Products [Centro de Desarrollo de Productos Bióticos]) in Yautepec, Morelos (Mexico). This presentation was one among various events organized by CEPROBI to celebrate the 10th anniversary of the postgraduate program on Sustainable Management of Crops Pest and Diseases (Fig. 11). As a preamble to the book presentation, Dr Rosa H. Manzanilla-López gave a talk on the biological control of plant-parasitic nematodes with the fungus *Pochonia chlamydosporia* followed by Dr Mendoza-De Gives enthusiastic and positive overall review of the book. The event was attended by students and academics from different Mexican research institutes and Universities. Dr Pedro Mendoza-De Gives is a researcher from the National Centre for Disciplinary Research in Veterinary Parasitology (CENID-PAVET-INIFAP-MEXICO), and CEPROBI is a research and postgraduate education centre of the National Polytechnic Institute of Mexico.



Fig. 10. Dr Pedro Mendoza-De Gives



Fig 11. Students and staff of CEPROBI

Perspectives in Sustainable Nematode Management Through Pochonia chlamydosporia *Applications for Root and Rhizosphere Health*, edited by Rosa H. Manzanilla-López and Luis V. Lopez-Llorca. ISBN 978-3-319-59222-0 / BIC: PSTP / SPRINGER NATURE: SCL24035 1st ed. 2017, XXV, 411 p.

ONTA MEMBERS NEWS (CONT.)

Science and nematology young readers



Fig. 12. 'De la A hasta la Z, los nematodos colorean nuestras vidas!

To promote science reading among children, the editorial house of the 'Fundacion del Colegio de posgraduados (Mexico)' has published three volumes in the children books collection 'Cuete a la luna' (Rocket to the moon). The first title in the collection was: 'De

la A hasta la Z, los nematodos colorean nuestras vidas!' (Fig. 12). The Spanish version of the coloring nematode booklet for children entitled in English: 'From A to Z, nematodes color our lives!'(see also ONTA Newsletter Vol. 46 issue 1). New titles include: 'Genetics is a thing of game' (La genetic si es cosa de juego), and 'Science and I' (La ciencia y yo), which also includes a nematologist story. The books have been presented every year since at the children section of 2015 the International Book Fair hosted by the City of Guadalajara (Mexico). The books have recently received intense publicity and attention in different media (Mexican radio and newspapers). The three titles have sold out and their second editions will be available soon.

Across the Atlantic

Advances in Nematology, Linnean Society, London - 12th December 2017

Dr Matthew Back kindly shared with us the highlights of Advances in Nematology annual one-day meeting held at the historic Linnean Society in Piccadilly, London (UK). The meeting encourages early career researchers through to leading experts. The scope of the conference is diverse, including topics on biology, ecology, epidemiology, management of plant parasitic nematodes, entomopathogenic nematodes and diagnostic methods, and covers fundamental and applied research.

This year, 54 delegates attended from a range of countries including the UK, Germany, Belgium, Georgia, Norway and the USA, representing industry, academia and government. The pleasant atmosphere at this meeting encourages constructive discussions and networking between delegates. It also provides PhD students with a less stressful setting to present their first paper to their peers.

Our first invited speaker Professor Alison Woollard (University of Oxford) delivered a captivating presentation on her work on *Caenorhabditis elegans*. Professor Woollard (Fig. 13) did a marvellous job in summarizing a significant body of work on distinct topics such as factors affecting the ageing process and pesticide resistance. The remainder of the morning generally comprised presentations on topics around genomics, physiology and plant-nematode interactions. After the morning session, Rosa Manzanilla-López chaired the poster 'flash' one minute presentations. During the lunchbreak, delegates had an opportunity to view the posters and vote for their preferred paper Fig. 14).

In the afternoon, we welcomed our second invited speaker, Dr Matthias Daub, from the Julius Kühn Institute in Germany. Dr Daub (Fig. 13) gave a comprehensive presentation on the integrated management of beet cyst nematodes (*Heterodera shachtii*) on

Matthew Back, AAB Nematology Group

Fig. 13. Alison Woollard (University of Oxford) on the left and Dr Matthias Daub(Julius Kühn Institute) and Matt hew Back (Harper Adams University) on the right



Fig.15. Dr Lindy Holden-Dye and Alistair Wright (University of Nottingham)

sugar beet. Further presentations in the afternoon focused on a range of topics such as entomopathogenic nematodes, spatial dynamics and cover crops.

The day concluded with the presentation of the Brian Kerry Prize for the best platform presentation and the AAB prize for the best poster presentation. This year the best platform prize was awarded to Alistair Wright (University of Nottingham, Fig. 15) while the poster prize went to Christopher Bell (University of Leeds, Fig. 16).

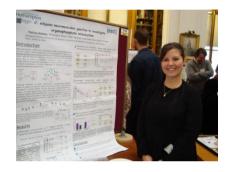


Fig. 14. Student poster competition. Patricia Gonzalez (University of Southampton)



Fig. 16. Left to right: Dr Rosa H. Manzanilla-Lopez, Christopher Bell (University of Leeds), and Dr Matthew Back

MUSA project and Workshop in Kampala, Uganda, 27 – 29 March 2018

The European Union recently funded the H2020 project MUSA, for management of Panama disease (*Fusarium oxysporum* f. sp. *cubense*), nematodes and weevils on banana and ensete, in Canary Islands, Caribbean and Africa. The four-year project is coordinated by A. Ciancio (IPSP CNR, Bari, Italy) joining a

Consortium of twelve partners from EU (Spain, UK, Belgium), Caribbean (Costa Rica, Cuba) and Africa (Nigeria, Kenya, Ethiopia). MUSA aims at using microbial consortia and banana germplasm, studying the plant response to biotic stresses, by screening and evaluating in the field some selected lines.

The workshop program and meeting in Kampala (Uganda) was very well organized and coordinated by Danny Coyne and Laura (Fig. 16) Cortada-González from the International Institute of Tropical Agriculture (IITA). This was the second time that MUSA 2010 partners have met (Fig. 17). Workshop talks included the importance of banana and ensete as food, cash and industrial crops. Banana talks covered yield reduction and shortened plantation life, breeding for resistance to main pests and diseases (i.e. black sigatoka, plant-parasitic nematodes, banana weevil), fruit quality and acceptability of new varieties to farmers, commercial bioproduct implementation, commercial banana tissue culture. biocontrol in Africa, biopesticide regulation, and meta-analyses of banana pest and pathogen biocontrol studies. Talks were given by project participants from Uganda, Ethiopia and the United Kingdom (UK).

An invited presentation was also given by Aderito Pais da Cunha (Instituto Superior Politécnico do Kwanza Sul) on banana systems in Angola. Ensete (Musaceae) is an important crop for food security and rural livelihood in Ethiopia that, similarly to banana, has current limitations to crop production, including pests and diseases (bacterial wilt, nematodes, mealy bug, fusarium wilt), crop harvesting and processing mechanization.

Other workshop activities included a visit to banana farms (Fig. 16) a commercial tissue culture lab (Fig. 18) and IITA facilities (Fig. 19). Delegates also had the opportunity to attend a performance by the Ndere cultural and dance troupe (Figs 20 and 21) while enjoying a taste of local Niama Choma (barbecue).

For more information on the MUSA project visit https://www.facebook.com/H2020-Project-MUSA-1735663333397367/



Fig. 16. Laura Cortada and Danny Coyne



Fig. 18. Visit to Agro-genetic Technologies Ltd tissue culture laboratory



Fig. 17. MUSA Workshop attendants



Fig. 19. Visit to IITA



Fig. 20. Ndere cultural centre



Fig. 21. Ndere troupe

ONTA NOTICE BOARD

From ONTA Awards Committee Chair



Fig. 22. Dr Forest Robinson

Last chance to propose ONTA Award recipients for 2018!

Award categories include: 1. Appreciation Citation or Award 2. Local Arrangements Committee Recognition Award 3. Special Award 4. Distinguished Service Award 5. Honorary Member Award 6. Extraordinary Service in Nematology Award (50 or more years of contributions) Please send the name of the person you propose to the ONTA Awards Committee Chair, Dr Forest Robinson (Fig. 22), before 31 May 2018.

For awards 3-6, also send a biographical sketch justifying your proposal, a photograph if available, and a brief list of the award recipient's professional achievements and contributions made to ONTA. The Committee must have this information to evaluate the proposal and print the banquet brochure. If you have any questions, please send them to Forest at the same e-mail address before 10 May 2018. He will be unreachable the second half of May.

Thank you,

Dr Forest Robinson (RobinsonONTA@gmail.com)

VOL 48 ISSUE 1



Get busy! ONTA Foundation, Inc. status is clear and high. Open your wings and take a flight!

Dear ONTA member,

ONTA Foundation is ready for a campaign to request donations and expand its contributor base in a big way. ONTA Foundation can receive funds through several means: 1) checks made out to the ONTA Foundation and mailed to Janete Brito; 2) credit card, same information required as for membership payment; 3) wire transfer. Janete Brito and Renato Inserra have full codes for wiring if requested.

Please give generously to support the activities and projects of the ONTA Foundation.

ONTA FOUNDATION GRADUATE STUDENT TRAVELAWARDS

50th ONTA Annual Meeting Arequipa, Peru (19 – 23 August 2018)

The ONTA Foundation is once again requesting applications for four graduate student travel awards to attend the ONTA 51^{th} Annual Meeting, 19 - 23 August 2018 in Arequipa, Peru. Each of the awards will be for \$1,000.00 (USD). Full time graduate and undergraduate students, or post doctorates (completion of graduate degree requirements no more than 18 months before the meeting) are eligible to participate in the Competition The deadline for submission for these awards is 31 May 2018.

To be eligible for these awards, an individual must present an oral presentation or be part of the **Rod Rodríguez-Kábana Student Poster Competition**, submit **an abstract**, **travel award application form, one page biographical sketch** along with **a statement (letter) from the major professor** of need. Membership in the Organization of Nematologists of Tropical America is not required but encouraged.

To apply for these Travel Awards, please submit the requested information (abstract, travel award application form, biographical sketch, and the statement of need) to Dr. Charles Overstreet (coverstreet@agcenter.lsu.edu).

Please submit applications as soon as possible to allow the **ONTA Foundation Committee** sufficient time to make the award announcements.

- Submissions must be received by **31 May** to be considered.
- Applications can only be made in either English or Spanish.

VOL 48 ISSUE 1

ONTA FOUNDATION SPECIAL TRAVEL GRANT

The ONTA Foundation is offering a "Special Travel Grant" to be awarded exclusively to a qualified Brazilian student to attend the 50^{th} ONTA Annual Meeting, 19 - 23 August 2018 in Arequipa, Peru. The award will be for \$1,000.00 (USD). Full time graduate and undergraduate students, or post doctorates (completion of graduate degree requirements no more than 18 months before the meeting) are eligible to participate in the Competition. The deadline for submission for this award is 31 May 2018.

To be eligible for this award, an individual must present an oral presentation or be part of the **Rod Rodríguez-Kábana Student Poster Competition** (Fig. 23), submit an **abstract, travel award application form, one page biographical sketch** along with a **statement (letter) from the major professor** of need. Membership in the Organization of Nematologists of Tropical America is not required but encouraged.

To apply for these Travel Awards, please submit the requested information (**abstract, travel award application form, biographical sketch, and the statement of need**) to **Dr Charles Overstreet** (coverstreet@agcenter.lsu.edu).

Please submit applications as soon as possible to allow the **ONTA Foundation Committee** sufficient time to make the award announcements. Submissions must be received by **31 May** to be considered.

• Applications can only be made in either English or Spanish.



Fig. 23. Luciany Favoreto (center) Student Best Poster Competition winner (Maceio, Brazil, 2009)

ROD RODRÍGUEZ-KÁBANA STUDENT POSTER COMPETITION

Competition Guidelines:

• Full time graduate and undergraduate students are eligible to participate in the annual **Rod Rodríguez-Kábana Student Poster Competition** (Fig. 24) sponsored by the ONTA Foundation.

• At least one of the authors of the poster must be an ONTA member (*i.e.*, preferably the student applying to enter the competition). Students are encouraged to become ONTA members. Please go to (http://www.ontaweb.org/) to become a member.

• Posters should be written and presented in English. Abstract and poster guidelines will soon be available on the ONTA website (http://www.ontaweb.org/).

• Each student will have **12 minutes to present his/her poster** to the Competition Committee and **3 minutes** to answer questions.

• Research subject must be original and performed by the student, with preferably no more than five authors.

• Deadline for abstract submission: 31 May 2018.

If you have any questions regarding the Student Poster Competition, please contact **Dr Janete Brito** (email: janete.brito@freshfromflorida.com or britojanete1@gmail.com).

Before submitting your abstract, please check that you have selected "Student Poster Competition" in the Abstract submission form. Please send a copy of your abstract to Dr Janete Brito.

Awards will be given during the ONTA Honors and Awards Banquet. First, second and third place will be given monetary awards as follows:

- First place: US\$500.00
- Second place: US\$350.00
- Third place: US\$250



Fig. 24. Student Best Poster Competition (Cancun, Mexico, 2012)

NEMATOLOGY AGENDA

NEMATOLOGY COURSES



Basic Nematology Course 21 – 26 May 2018. Trujillo, La Libertad (Peru). The course, sponsored by the Asociación Peruana de Fitopatología, La Universidad Nacional de Trujillo and ONTA, will be taught by Dr Ignacio Cid del Prado-Vera (Colegio de Posgraduados, Mexico).

Identification of Terrestrial and Freshwater Nematodes. 11 – 22 June 2018. Summer course. Wageningen, The Netherlands. An annual course offered by the Centre for Soil Ecology and focuses on routine morphology-based identification of terrestrial and freshwater nematodes. Contact for more information and registration: Lisette Groeneveld (lisette.groeneveld@wur.nl), www.soilecology.eu; www.wageningenur.nl/nem

Nairobi, Kenya



International MSc in Agro- and Environmental Nematology is organizing in collaboration with IITA/ICIPE Kenya, a Basic Crash Course in Nematology at ICIPE campus, Nairobi Kenya. 10 – 14 December 2018. This one week course will be organized in 2018, 2019, 2020 and 2021 and scholarships for VLIR-UOS countries are available. Contact person: Inge Dehennin, Coordination Office. Tel: +32 9 264 52 16 Email: inge.dehennin@ugent.be



Identification course on Aquatic Nematodes, Campus Ledegance, Ghent, Belgium. Marine nematodes: 10 – 14 December 2018. Freshwater nematodes: 17 – 21 December 2018. Contact person: Inge Dehennin, Coordination Office. Tel: +32 9 264 52 16 Email: inge.dehennin@ugent.be

NEMATOLOGY AGENDA (CONT.)

MEETINGS AND CONFERENCES

2018



XXXV Congresso Brasileiro de Nematologia (24 – 29 June 2018) at the Hotel Dall'Onder Grande Hotel, Bento Gonçalves, Rio Grande do Sul.

http://www.35cbn.com.br/



SON Meeting: Albuquerque, New Mexico (22 -25 July 2018) at the Hyatt Regency -Downtown, adjacent to the Albuquerque Convention Center in the heart of downtown Albuquerque.



INTAGRI Third International Congress of Horticultural Crops Fitosanitation 16 - 17 August 2018. Hotel Hilton, Guadalajara, Jalisco, Mexico. For more information: intagri@intagri.com.mx Contact person: Dilmar Santiago R. Tels. Mexico: (461)616-084 +521 (461)228-8534

ESN Meeting: Gent, Belgium 9 – 13 September 2018.



MEETINGS AND CONFERENCES (CONT.)

2019

III International Seminar on Animal and Plant Health, Varadero, Cuba, 6 - 10 May, 2019. The National Center for Animal and Plant Health (CENSA) is pleased to invite you to participate in the III International Seminar on Animal and Plant Health to be held in Meliá Marina Varadero, Cuba, with the central motto "The agricultural sciences for One Health". This third edition will be dedicated specially to the 50^{th} Anniversary of the foundation of CENSA. More information at www.cwnsa.edu.cu. Contact person: 1health-sisa 2019@censa.edu.cu

2020

Seventh International Congress of Nematology 2020: Continuing a tradition we can all support



IFNS President Larry Duncan The ICN 2020 website will be launched immediately following the ESN meeting in September 2018. In the meanwhile, keep abreast of congress plans many other and things 'nematological' at the IFNS Twitter site @Nematologists.

ONTA ACTIVE MEMBERSHIP

Dear ONTA Member,

A list of active members with their e-mail addresses and countries has been posted on the ONTA website (http://www.ontaweb.org/ontamembership-directory/). Please verify your membership status on the posted list. Contact Julia Meredith (jmeredith@cox.net) if your membership status is not updated.

Thanks,

Julia Meredith (Fig. 25) ONTA Acting Secretary



Fig. 25. Julia Meredith

VOL 48 ISSUE 1

ONTA GALLERY



Fig. 26. Emilio Fernández, Belkis Peteira, Rosa H. Manzanilla and Mayra Rodríguez enjoying a sunny day in Habana (Cuba) after the CENSA course and workshop on the 'Preparation of the scientific paper' (11 - 15 July 2016).

New Nematology Books

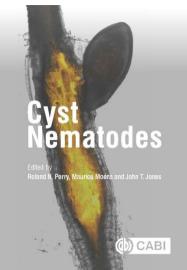


Fig. 26. Cyst Nematodes book

Cyst nematodes are among the most damaging plant parasites of some of the world's most important crops, with research and development into their control occurring on a global scale. A new book, Cyst Nematodes, coedited by Roland Perry, Maurice Moens and John Jones contains up-to-date information on molecular aspects of host-parasitic relationships, resistance and taxonomy, written by a team of international experts. The book covers all of the latest research in the expanding areas of molecular biology and management practices of these economically

New book: *Cyst Nematodes* (Eds Roland N. Perry, Maurice Moens and John T. Jones)

Cover image (Fig. 26): Beet cyst nematode, *Heterodera schachtii*, female parasitizing a root of *Arabidopsis thaliana*. The syncytial feeding site has been stained with ThioTracker.

important plant parasites. It is an important resource for researchers, lecturers and students in nematology, parasitology, agriculture and agronomy, industries with an interest in chemical and biological control products for management of plant-parasitic nematodes, and quarantine and advisory services The book is published by CABI, Wallingford, UK (https://www.cabi.org/bookshop/book/978178 6390837).

ONTA NEWSLETTER INVITATION

Dear ONTA member,

Do you have a passion for nematodes and nematology? Would you like to share nematology news with our ONTA members? If so, welcome aboard!

We would like to extend a warm invitation to send or share information for our next ONTA Newsletter issue.

Please contact us. We are looking forward to hearing from you and to learn of your local nematology events and news.

Kind regards,

Rosa H. Manzanilla-López ONTA Newsletter Editor (rosa.manzanilla@gmail.com)

Acknowledgements

The editor would like to thank all ONTA Newsletter contributors. Cartoons were kindly provided by Dr Ed McGawley.

ONTA Sustaining Members

ONTA gratefully recognizes the support received during 2017-2018 from the following sustaining members: ADAMA, AMVAC, BAYER, CORBANA, CORTEVA AGRISCIENCE, DUPONT, E-NEMA, KOPPERT BIOLOGICAL SYSTEMS, MARKETING ARM INTERNATIONAL, PIONEER CHEMICALS and SYNGENTA.



ONTA OFFICERS

EXECUTIVE COMMITTEE

PRESIDENT: Deborah Neher, Department of Plant & Soil Science, 63 Carrigan Drive, University of Vermont, Burlington, VT 05405 USA. Tel: 802-656-5390; Fax: 802-656-4656; Web: www.uvm.edu/~dneher; email: <Deborah.neher@uvm.edu>

VICE-PRESIDENT: Edward C. McGawley, Department of Plant Pathology & Crop Physiology 302 Life Sciences Bldg.; Louisiana State University, Baton Rouge, LA 70803 USA. Tel: 225-578-7145; Fax: 225-578-1415; Mobile: 225-229-7638; email: <EMgawley@agcenter.lsu.edu>

PAST PRESIDENT: Ignacio Cid del Prado-Vera, Colegio de Postgraduados Montecillo. Km 36.5 Carretera México-Texcoco, Montecillo CP 56230. Texcoco, Edo. México. Tel: 595-20200 Ext. 1667; FAX: 015959520200 Ext. 1632; email: icid@colpos.mx

ACTING SECRETARY: Julia Meredith. PO Box 140357, Gainesville FL 32614-03572; e-mail: <jmeredith@cox.net>

TREASURER: Renato N. Inserra, Florida Department of Agriculture and Consumer Services, Division of Plant Industry, Nematology Section, P.O. Box 147100, Gainesville FL 32614-7100, USA. Tel: 1-352-395-4755; FAX: 1-352-395-4614; e-mail: <renato.inserra@freshfromflorida.com>

NEMATROPICA EDITOR: Editor-in-Chief: Brent S. Sipes (Chair), Department of Plant & Environmental Protection Sciences, 3190 Maile Way, Honolulu, HI 96822, St. John 309A, USA. Tel: (808)956-7813; FAX: (808)956-2832; email: <sipes@hawaii.edu>

NEWSLETTER EDITOR: Rosa H. Manzanilla-López, 16 Coleswood Road, Harpenden, Herts AL5 1EQ, United Kingdom. E-mail: <rosa.manzanilla@gmail.com>

MEMBERS AT LARGE:

Danny Coyne, IITA, Kasarani, P.O. Box 30772-00100, Nairobi, Kenya; e-mail: <d.coyne@cgiar.org>. **Mayra G. Rodríguez**, Laboratorio de Nematología, Centro Nacional Agropecuario (CENSA), Apartado 10, San José de Las Lajas, Havana, Cuba; Tel: 53 64 63014 ext. 48; e-mail <mrguez@censa.edu.cu>

BUSINESS MANAGER: Janete Brito, Florida Department of Agriculture and Consumer Services, Division of Plant Industry, Nematology Section, P.O. Box 147100, Gainesville FL 32614-7100, USA. Tel: 1-352-395-4752; FAX: 1-352-935-4624; e-mail: <Janete.brito@freshfromflorida.com>

COMMITTEES AND REPRESENTATIVES

ARCHIVE COMMITTEE: William Crow, Department of Entomology and Nematology, University of Florida, P.O. Box 110620, Gainesville FL 32611-0620, USA; e-mail: <wtcr@ufl.edu>.

FOUNDATION COMMITTEE: Charles Overstreet (Chair), Louisiana Cooperative Extension Service, P.O. Box 25100, Baton Rouge LA 70894-5100, USA; Tel: 1-225-578-2186; FAX: 1-225-578-2478; e-mail: <coverstreet@agctr.lsu.edu>. Janete Brito (see address under Executive Committee); Larry W. Duncan, University of Florida, Citrus Research and Education Center, 700 Experiment Station Road, Lake Alfred FL 33850-2299, USA; Tel: 1-863-956-1151; FAX: 1-863-956-4631; e-mail: <lwduncan@ufl.edu>; Jim Rich, University of Florida, 155 Research Road, Quincy FL 32351-9500, USA, Tel: 1-850-875-7130; FAX: 1-850-875-7148; e-mail: <Jimmyr@pineland.net>. Rodrigo Rodríguez-Kábana, Department of Plant Pathology, Auburn University, Auburn, AL 36849-5409, e-mail: USA. Tel: 1-334-844-4714; FAX: 1-334-844-1948; <rrodrigu@acesag.auburn.edu>. Lee Simmons, 504 Capstone Lane, Tallassee AL 36078, USA; email: <lsimmons@agbiome.com>.

HONORS AND AWARDS COMMITTEE: Forest Robinson (Chair), 2949 Mirrormere Cir, Bryan TX 77807 USA, email: <RobinsonONTA@gmail.com>. Alejandro Esquivel, Lab. Nematología, Escuela de Ciencias Agrarias, Universidad Nacional, AP 86-3000, Heredia, Costa Rica. Tel: 277 32 99; FAX: 261 00 35; e-mail:<aesquive@una.ac.cr>. Erwin Aballay, Universidad de Chile, Fac. Ciencias Agrarias, Dept. Sanidad Vegetal, P.O. Box 1004 or Avenida Santa Rosa # 11.135, La Pintana, Santiago, Chile; Tel: 56-2-6785821 or 56-9-4346229; FAX: 56-2-6785812; email: <erwinaba@uchile.cl>. Ignacio Cid del Prado, Mexico (address under Past President). Larry Duncan, (address under Foundation Committee). Paula Agudelo, School of Agricultural, Forest, and Environmental Sciences, Clemson University. Clemson, SC, USA; e-mail <pagudelo@clemson.edu>. Wilfrida Decraemer, Royal Belgian Institute of Natural Sciences, Vautier Street 29, B1000 Brussels, Belgium; email: <Wilfrida.Decraemer@Ugent.be>.

LOCAL ARRANGEMENTS COMMITTEE: Alberto Anculle <albertoanculle@gmail.com>, Martín Augusto Delgado Junchaya <mdelgado@upao.edu.pe>, Javier Franco Ponce <javierfrancoponce@gmail.com>, Carolina Cedano Saavedra <caescesa1@yahoo.com>.

NEMATROPICA EDITORIAL COMMITTEE: Brent S. Sipes (Chair) (see address under Executive Committee). Terrence L. Kirkpatrick (Past Editor-in-Chief), University of Arkansas, Southwest Research and Extension Center, 362 Highway 174 North, Hope, AR 71801 USA, Tel: 870-777-9702; FAX: 870-777-0963; e-mail: tkirkpatrick@uaex.edu. Janete Brito (Senior Editor, Portuguese) (see address under Executive Committee). Regina M. D. G. Carneiro, Embrapa, Recursos Genéticos e Biotecnologia, Brasilia, DF, Brazil (Senior Editor, Portuguese). Patrick Quénéhervé (Senior Editor, French) (address under Nomination Committee). Miguel Talavera Rubia (Senior Editor, Spanish), Área de Protección de Cultivos, IFAPA, Centro Camino de Purchil, Instituto de Investigación y formación Agraria y Pesquera. Junta de Andalucía, Apdo. Correos 2027, 18080-Granada, Spain; Tel: 958 895 251; Fax: 958 895 203; e-mail: <miguelf.talavera.ext@juntadeandalucia.es>. Associate Editors. Paula Agudelo (address under Honors and Awards Committee). Claudia Regina Dias Arieira, Universidade Estadual de Maringá,

Campus Regional de Umuarama, Umuarama, PR, BR. **Marco Cordero López**, Universidad Nacional Experimental del Táchira, San Cristobal, Venezuela; e-mail: <mercocordero06@outlook.com>. **Thalita S. A. Monteiro**, Plant Pathology Department, Universidade Federal de Viçosa, Viçosa, MG, Brasil; e-mail: <thalitavelar@yahoo.com.br>. **Larry W. Duncan**, (Coordinator of the electronic version of *Nematropica*, see address under Honors and Awards Committee).

NEWSLETTER COMMITTEE: Rosa H. Manzanilla-López (Chair), (see address under Executive Committee); **Brent S. Sipes** (see address under Nematropica Editor-in-Chief). **Terrence L. Kirkpatrick**, (see address under *Nematropica* Editorial Committee). **Kimberly Rowe**, Arkansas Plant Pathology, University of Arkansas, Department of Plant Pathology, Hope, AR 71801 USA; Tel: 870-438-2044; e-mail: <krowe@uaex.edu>

NOMINATIONS COMMITTEE: Rosa H. Manzanilla-López (Chair), 16 Coleswood Road, Harpenden, Herts, AL5 1EQ, UK; e-mail: rosa.manzanilla@gmail.com. Renato N. Inserra, (address under Executive Committee). Forest Robinson (address under Honors and Awards Committee). Patrick Quénéhervé (Chair), ORSTOM Laboratoire de Nématologie, BP 8006-97259 Fort de France Cedex, Martinique (French West Indies); Tel: 596-645750; FAX: 596-717316; e-mail: <queneherve@ird-mq.fr>. Juan Carlos Magunacelaya, Avda. Brasil 2950, Valparaiso 4059, Chile, Tel: 56 2 678 5821; e-mail: <jmagunac@ucv.cl>. Jim Rich, University of Florida, 155 Research Road, Quincy FL 32351-9500, USA; Tel: 1-850-875-7130; FAX: 1-850-875-7148; e-mail: <Jimmyr@pineland.net>

SUSTAINING MEMBER COMMITTEE: Johan Desaeger (Chair), University of Florida, Gulf Coast Research and Education Center 14625 CR 672, Wimauma, Florida 33598, USA Tel: 1-813-633-4123 or 813-431-6246; e-mail: <jad @ufl.edu>. **Luis A. Payan (Co-Chair)**, Syngenta Crop Protection, PO Box 18300, Greensboro NC 27409, USA Tel: 336-632-6000; e-mail: <luis.payan@syngenta.com>. **Janete A. Brito** (see address under Executive Committee). **Donald W. Dickson**, University of Florida, Entomology and Nematology Department, Gainesville, FL 32611-0620, USA Tel: 352-392-1901 (135); e-mail: <dwd@ufl.edu>. **Jenny Escobar**, Junin 116 y Panama, Guayaquil Guayas 09-13293, Ecuador; e mail: <jenny.escobar@bayercropscience.com>. **Gustavo Fallas Meji**, Apartado 4595-1000, Edificio Rodfon C5 y Av.1, San Jose, Costa Rica. E-mail <gfallas@chiquita.com>. **Jimmy Rich**, (See address under Nominations Committee). **Lee Simmons**, (see address under ONTA Foundation committee). **Prem Warrior**, Valent BioScience Corporation, 6131 RFD, Oakwood Road, Long Grove, IL 60047, USA Tel: 1-847-968-4901; Fax: 1-847-968-4970; e-mail: cmail: cprem.warrior@valent.com>

WEB PAGE COMMITTEE: Terrence L. Kirkpatrick (Chair), (see address under Executive Committee). Larry W. Duncan (address under Foundation Committee and Honors and Awards Committee). Erwin O. Aballay, (address under Honors and Awards Committee). Kimberly Rowe, Arkansas Plant Pathology, University of Arkansas, Department of Plant Pathology, Hope, AR 71801 USA; Tel: 870-438-2044; e-mail: <krowe@uaex.edu>. Leopoldo Hidalgo, Centro Nacional de Sanidad Agropecuaria (CENSA), Apartado 10, San José de las Lajas, Habana, Cuba clhidalgo@censa.edu.cu>. César Ornat Longaron (Co-Chair), Dep. Enginiyria Agroalimentária i Biotecnologia, Universitat Politecnica de Catalunya, Avinguda del Canal Olímpic s/n, 08860 Castelldefels, Barcelona Spain. Tel: 34-935-521-072; FAX: 34-935-521-001; e-mail: <Cesar.Ornat@upc.edu>. Jimmy Rich, (See address under Nominations Committee). Miguel Talavera Rubia, (see address under Nematropica Editorial Committee).

REGIONAL REPRESENTATIVES: Erwin Aballay, (see address under Web Page Committee). Janete Brito, (see address under Nematropica Editorial Committee), Ana M. Casassa, Universidad del Zulia, Facultad de Agronomía, Instituto de Investigaciones Agronomicas, Ciudad Universitaria, Agropecuario, Av. 16 (Guajira), Maracaibo, Núcleo ZU 4005, Venezuela; e-mail: <casassae@cantv.ve>. Alejandro Esquivel (see address under Honors and Awards Committee). Eleodoro Herrera Alvariño, Calle 27 No. 376 Urbanizacion Córpac, San Isidro, Lima, Peru; e-mail eherrera@hotmail.com. Francisco Franco-Navarro, Phytopathology Program-Colegio de Postgraduados, Montecillo 56230, Mexico State, Mexico; e-mail: <ffranco@colpos.mx>. Mayra G. Rodríguez (see address under Members at Large). Betty Tello, Junin 116 y Panama, Guayaquil Guayas 09-13293, Ecuador; e mail: <jenny.escobar@aventis.com>. Myrian Tigano, CENARGEN-EMBRAPA, Pg. EB - Av. W 3 Norte Final, Brasilia, DF, 70770-970, Brasil. Tel: 55-61-4348-4678; email: <myrian@cenargen.embrapa.br>. Soledad Verdejo-Lucas, IFAPA Centro La Mojonera, Camino de San Nicolás nº 1, 04745 La Mojonera, Almería, Spain; Tel: 34 950156453 ext.632031; email: <soledad.verdejo@juntadeandalucia.es>

REPRESENTATIVES IN THE IFNS: Aurelio Ciancio, Istituto per la Protezione Sostenible delle Piante, C.N.R., Sezione Bari, via Amendola122-D, 70126 Bari, Italy; Tel: 39-80-5929-221; FAX: 39-80-5929-230; e-mail: <aurelio.ciancio@ipsp.cnr.it>. **Rosa H. Manzanilla-López** (see address under Executive Committee).