UNITAS MALACOLOGICA



Newsletter

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3

4

5

6

10

What's inside

President's Message
Secretary's Column
UM Travel Grants
Treasurer's Column
Student Research
Award 2014 Report
WCM 2016 Call for
Abstracts

Dear members,

We are feeling a little festive in this newsletter. Happy autumn to most countries and happy spring to our friends in the Southern Hemisphere! As we are pushing through the final quarter of 2015, it's never a better time for us to reflect on the milestones in our lives, be grateful and acknowledge the support we have been given and learn from our shortcomings.

In this issue of the Newsletter, you will find a message from our President, Aileen Tan Shau-Hwai, on the confirmed World Congress of Malacology 2016 symposia themes, awards and grants update from our Secretary, Jesús Troncoso and very exciting news from our Treasurer, Jackie Van Goethem on lifetime memberships! We even have the first promotional circular from the WCM 2016 Penang Secretariat!

Perhaps the readers would have noticed that the newsletter is sounding (and looking) a little different right about now. I would like to inform everyone that Dr. Julia Sigwart is no longer editing the newsletters (perhaps she's happy as a clam right about now) and that I will be taking over. Thank you, Dr. Julia for your long term (ten years!) commitment in taking on the production of the Unitas Malacologica Newsletter.

I hope the readers will enjoy this newsletter. The next newsletter should be out by Spring 2016 to coincide with the UM Travel Grant winners and, we will also feature Student Research Awardees' Reports.

GOC

Our aim is to further the study of Mollusca by individuals, societies and institutions world-wide

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World Congress of Malacology Penang, Malaysia – 18-24th July 2016

Dear friends,

I believe it is prime time for the highly anticipated WCM 2016 Penang, Malaysia update. The WCM 2016 Secretariat has indeed been working very hard to secure the venues and sponsors in making this congress a success. The official dates of WCM 2016 will fall on 18-24th July 2016 at Hotel Jen, Penang, Malaysia.

In line with that, I have great pleasure in announcing the 14 symposia themes confirmed for WCM 2016, which are:

- Ecology of Marine Molluscs
- Freshwater Bivalves of The World: Diversity, Distribution, Evolution & Ecology
- "How to quantify shell form?"
- Integrating Molecules, Morphology, Biology & Biogeography in "Opisthobranch" Research
- Integrative Research on Molluscan Phylogenetics: A Tribute to the Late Professor Salvini-Plawen
- Limestone Biodiversity & Conservation Issue
- Molluscan Aquaculture in a Changing Climate
- Molluscan Biodiversity & Biogeography in the Indo-West Pacific
- Mollusks in Climate Change Research: New Uses of an Old Group
- Morphology Based Systematics in Action
- Planktic Gastropod
- Predators of Molluscs
- Tropical Marine Mollusc Programme (TMMP): Past & Present
- Tsunami & Marine Life in Asia

I hope that with this diversity of themes, we can tickle your interests to register for WCM 2016. I believe that this is a good platform for researchers in Asia-Pacific region,

especially the students, to participate in since there are many connecting flights to Malaysia! In addition to that, letters requesting partnerships to propose travel grants and student prizes have been sent out to respective affiliated societies and are awaiting hopefully, wonderfully supportive replies.



I have also been informed by the WCM 2016 Secretariat that they have the participant received first few registrations via the website http://wcm2016.usm.my. We are so excited to get the registrations started that we even initiated a WCM 2016 countdown on the website, which happens to be ... 9 months away!

With that, from the WCM 2016 Secretariat and I, we would like to warmly welcome all Mollusc enthusiasts to Penang for WCM 2016. We can't wait to see you in Penang!

Aileen Tan Shau-Hwai President aileen@usm.my

Secretary's Column

Dear Members,

There were plenty of activities this year, most of them related to the Student Research Awards (SRA) assessment and the arrangements for WCM 2016.

In April 2015, we have received a total of 13 SRA applications from very diverse topics in different malacological fields from 7 countries: Australia, Brazil, Italy, Norway, Spain, The Netherlands and the United States. The final decision was difficult because the quality of most projects presented were high but, unfortunately, we only have resources to grant two awards. Many thanks to all evaluators for their hard and excellent work. Presenting the SRA 2015 Awardees:

Gizelle Akiate Batomalaque

Drexel University, USA.

Awarded 1000.00 euros for the project: "Phylogenetic reconstruction and biogeography of the Philippine Helicostylinae (Eupulmonata: Stylommatophora)"

Trond Roger Oskars

University Museum of Bergen, Norway. Awarded 1000.00 euros for the project: "Speciation and biogeography in the deep sea: A systematic review and phylogenetic analysis of the gastropod genus *Scaphander*"

Congratulations to both awardees!

Travel Grants for WCM 2016

In 2016, all UNITAS expenditures will be focused on Travel Grants to support the participation of students in WCM 2016, Penang. Interested individuals can find the application form on the main page of UNITAS website and some information below. Remember, the deadline for submissions will be **1st February 2016**.

The last council meeting was held on 4th June 2015 in University Sains Malaysia (Penang). All the issues discussed were related to the next congress, the local team is doing a great job and I am sure it will be an excellent conference.



Our President and the Local Committee showed and explained to us an extraordinary program. Enjoy reading the circular, please visit the conference website http://wcm2016.usm.my and mark the dates (18-24th July 2016) in your calendar.

Jesús Troncoso UM Secretary **UM Travel Grants**

TRAVEL GRANTS TO ATTEND THE WORLD CONGRESS OF MALACOLOGY PENANG, MALAYSIA 18-24 JULY, 2016

Unitas Malacologica will provide travel grants to help students of malacology attend the World Congress of Malacology 2016 in Penang. An anticipated sum of € 25,000 will be set aside for this purpose. Travel Grants will be allocated depending on basic travel costs: a maximum amount of 400 euros will be awarded for relatively short distance travel, while a maximum amount of 800 euros is reserved for long distance travel.

Anyone actively involved in the study of molluscs may apply, whether student, amateur or professional. Preference will be given to registered postgraduate students and malacologists who do not have access to significant alternative funding. A major aim is to encourage wider representation of malacology students at congresses from areas such as Asia, Africa, South America and Eastern Europe.

Competition for these awards is high and established malacologists with permanent institutional posts are encouraged to seek funding elsewhere. Awards will be made on the basis of merit and need, as determined by the Council of UM. To be eligible, applicants must be a member of Unitas Malacologica or of an affiliated organisation, and all applicants must indicate that they will present either an oral paper or a poster. Successful applicants will receive their awards upon registration at the congress venue in Penang.

In addition to the completed form, applicants must include an abstract or summary of the proposed paper or poster presentation, brief statement of motivation for the application, and a supporting letter from a referee or supervisor outlining the qualities of the applicant and their work.

An electronic application form is available from the UM website:

unitasmalacologica.org/projects/TG_form_2016.doc

The completed form, together with the abstract/summary of the presentation and the letter of support should be emailed to the UM Secretary Jesús Souza Troncoso (troncoso@uvigo.es).

The closing date for applications is 1st February, 2016.

Treasurer's Column

Dear members,

Spontaneous membership payments, at least 48.00 euros for a three years period, become more and more seldom... And it is very time-consuming for a treasurer to check and to send a couple of hundred reminders for payment year after year. Maybe you can understand that *I had a dream*: most UM members sending a payment for a life time membership.

Unitas Malacologica, through its Endowment Fund, will contribute to the World Congress of Malacology 2016 in Penang, Malaysia, a minimum of 25,000.00 euros, enabling some 40 PhD students and young researchers to participate. However, in order to achieve that ideal, smooth payment of dues would certainly allow a substantial increase to that amount.

The modus for calculating the amount for a lifetime membership has been 'invented' by Liew THOR SENG, and is explained in my Column published in Newsletter 34. In a nutshell: deduct your age from life expectancy in your country. Multiply the remaining years with 16 euros and consider finalizing the amount upward... ©

You may wish to use the form 'Payment of Membership' which is available at the UM website http://www.unitasmalacologica.org/memb ership.html.

Donations to the Endowment Fund are key to set up activities for the benefit of PhD students and young researchers, in particular for the congress travel grants, the 1,000 euros research awards and the congress prizes.

With great pleasure, I would like to mention some individual donations to the Endowment Fund received in the period September 2014 – August 2015:

- a generous donation by Guido and Philippe POPPE of 350.00 euros,
- other donations by A.C. VAN BRUGGEN, Robert A.D. CAMERON, Jürgen JUNGBLUTH, Alan R. KABAT, Yolanda MANGA GONZALEZ, Ilmari VALOVIRTA and Ton DE WINTER.

Thank you all very much!!

Best wishes.

Jackie Van Goethem UM Treasurer Mating behaviour in *Jeanneretia* ss. (Helicoidea: Cepolidae), endemic of the western region of Cuba

Background

The helicoid family Cepolidae Ihering, 1909 is distributed in the Greater Antilles and some Lesser Antilles, Cayman Islands, in Florida and Florida Keys, but reaches its highest genus-level richness in Cuba, where it is represented by ten genera (Schileyko, 2004). Current taxonomic and ecological knowledge on cepolids in Cuba is however, still very limited, particularly with respect to their mating behaviour. Only studies on Polymita exist (Bidart et al., 1998; Reyes Tur et al., 2000; Reyes-Tur and Koene, 2007; Toirac, 2012). Against this background, the cepolid Jeanneretia is particularly challenging because the first descriptions of the genital parts of these snails (Hernandez and Backeljau, 2013) (before 2013 only the shells of Jeanneretia were known) suggest some interesting features like (1) the presence of an auxiliary copulatory organ, (2) an extremely long flagellum that can exceed 20 cm and (3) very large accessory glands. It is expected that these genital peculiarities may be related to differences in the mating behaviour and reproductive strategies of Jeanneretia compared to other cepolids.

Study location and collection

Individuals were collected with plastic containers and stored in

waterhomes. Collections were not very successful during the first half of the project, perhaps due to high temperatures and drought. Nevertheless, some specimens were collected in several localities:

Locality	Species
Sierra de Tumbadero	Jeanneretia parraiana
	depressa
Maravillas de	Jeanneretia parraiana
Viñales	arangoi
Sierra de la Guira	Jeanneretia p. parraiana
Mogote de	Jeanneretia parraiana cf.
Valeriano	parraiana
Hoyo del Guamá	Jeanneretia parraiana cf.
	parraiana

Results

Current results show that the complete copula duration lasts more than one hour. The courting duration was generally short and the beginning of courtship can happen when an individual everts the auxiliary copulatory organ (ACO) and presses it on the potential partner that does not show signs of genital pore eversion. It was also observed that initiation of tactile contacts with the genital pore in any one of the phases of eversion between two individuals signals the beginning of courtship. Three types of tactile contacts were detected: tentacletentacle (more frequent), tentacle-body (near the genital pore) and mouth-foot (the individual appears to be biting the other one, fig. 1). Besides that, individuals frequently climbing on top of one another was also observed. Multiple eversions and the picking up of ACO several times was possible in the courtship. Although these courting initiation happen, individuals which are not in the condition to copulate will reserve themselves in their domes.



Figure 1. Courting between two *Jeanneretia* parraiana cf. parraiana individuals. The individual on the left is protruding its genital pore which meets and contacts the mouth in the zone of the genital pore of the individual on the right.

During the phase of the copula, individuals are practically immovable and only small movements of the cephalic tentacles and ACO lobe are noticeable. In the mating of *Jeanneretia parraiana cf parraiana* (Hoyo del Guamá) the ACO lobe is lodged under the foot, near the head (fig. 2). The presence of a very fine spermatophore tail suspended between two individuals during mating signifies the end of spermatophore transfer (fig 3(a)) after which, an individual will cut off part of the spermatophore tail (fig. 3 (b) and (c)).



Figure 2. Two *Jeanneretia parraiana* cf. *parraiana* individuals copulating in ventral view. The auxiliary copulatory organ is in contact of the bottom side of the foot

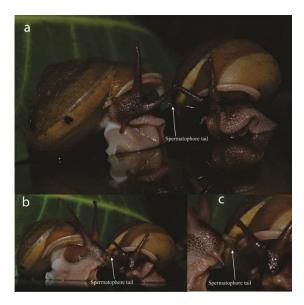


Figure 3. Last phase of copula. a – the visible spermatophore tail; b - individual on the left cutting the spermatophore tail; c – b magnified

The longest copula duration observed in *Jeanneretia parraiana depressa* was 80 minutes. For this subspecies, the location of the ACO was found to be behind the head, between the cephalic tentacles and next to the lobe corresponding to the penis (fig. 4).



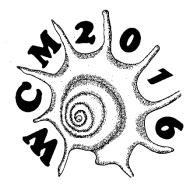
Figure 4. Copula between *Jeanneretia parraiana depressa* individuals; a - Vaginal pore; b - penial lobe; c - auxiliary copulatory organ lobe

The most significant finding in the project until now has been the variability in the location of ACO and the absence of a sensitive zone which can be observed in Polymita muscarum (Reyes-Tur et al., 2000) and *Polymita picta* (Reyes-Tur et al., 2015). Another important finding is the total duration of the copula which is relatively short (maximum of 80 minutes) unlike in other genera such as Polymita (Reyes Tur et al., 2000; Reyes-Tur and Koene, 2007; Reyes Tur et al., 2015), Coryda (Reyes -ur, Com. pers.), Hemitrochus (Reyes-Tur, Com. pers.) and Cepolis (Webb, 1952) where copulation lasts more than 80 minutes and reaching up to more than 200 minutes.

Maike Hernández Quinta

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World Congress of Malacology 2016

Unitas Malacologica in collaboration with Universiti Sains Malaysia, is proud to host the 19th World Congress of Malacology in Penang Island, Malaysia. WCM 2016's theme is *'Unity in Diversity'*.

CALL FOR ABSTRACTS

Date: 18-24th July 2016

Venue: Hotel Jen Penang



EARLY BIRD SPECIALS!

Register between now and 15th March 2016 to receive early bird registration fees starting from RM 750! (~160 euros)

Visit us now: http://wcm2016.usm.my





The available symposia include:

- Ecology of Marine Molluscs
- Freshwater Bivalves of The World: Diversity,
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- "How to quantify shell form?"
- Integrating Molecules, Morphology, Biology & Biogeography in "Opisthobranch" Research
- Integrative Research on Molluscan Phylogenetics: A Tribute to the Late Professor Salvini-Plawen
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