



Paleonturology 21
19th INTERNATIONAL AWARD
IN PALAEOONTOLOGICAL RESEARCH

Fundación Conjunto Paleontológico de Teruel-Dinópolis (from now on FCPTD), with the purpose of rewarding palaeontological research and promoting it among teenagers, declare open the Nineteenth International Award in Palaeontological Research (**Paleonturology 21**) based on the following Requirements:

1st.- Any palaeontological research paper published in 2020 in any language and format can apply for the award. That is, the papers either published in 2020 or if the work is still in press in the moment of applying to the award, it must be justified that the year appearing on the first page of the paper must be 2020. If a work was published electronically during 2020 and was later printed with a date of 2021, the paper in electronic format could be presented to the award session **Paleonturology 21** or the printed version could be presented to **Paleonturology 22** (the author should select only one of these options).

2nd.- The papers can be entered by:

A) Their author/s. Supposing it is signed by several authors, one of them, preferably the first author, will certify that all the others accept to be represented by him/her to all intents and purposes before the organisation. In case there is more than one author, we understand by author the first person signing it or the one who can prove being the representative of the others.

B) Any other person or organisation.

3rd.- It is compulsory to present a printed copy or a PDF file and a registration form with the data required in Annex I. The author will ensure that the copy -or the file- and the Annex I are in the hands of the organisers before November 10, 2021. This is the address where these files/forms should be sent:

Fundación Conjunto Paleontológico de Teruel-Dinópolis
Avda. Sagunto s/n. E-44002 Teruel (Spain). e-mail: fundacion@dinopolis.com
Tel.: +34 978 61 76 30, Fax: +34 978 61 76 38

4th.- The jury will be made up of three outstanding researchers (appointed by the organisers) and by the Director of the FCPTD, acting as a Secretary, but without a right to vote. Its constitution will be known at the same time as their decision.

5th.- The jury will act with complete freedom and, in addition to their normal powers -to propose and make a decision, awarding or declaring the award void-, will interpret the present Requirements. The decision of the jury will be final.

6th.- The decision of the jury will be announced in Teruel before the end of the year 2021. It will also be advertised on the media. All the participants requesting a certificate of the decision will be sent a copy.

7th.- The Nineteenth International Award in Palaeontological Research **Paleonturology 21** is endowed with a Three Thousand Euros (3.000 €) prize, indivisible and subject to the current fiscal legislation, and, prior to its acceptance, the author will be committed to writing a version to popularise the awarded paper paying

special attention to additional graphics that may be required. It has to be sent to the organisation within a period of four months from the notification of the award and to relinquish the publication rights to the organisation. The organisation will use it to publish a popular version whose authors will be the same as those of the awarded paper (it will be translated, if necessary), and will collaborate with the author to reach the required didactic level (students between 15 and 17 years of age). The mentioned right has to be exercised within a year from the date of the decision.

The amount of the award will be paid in its 25% within a period of two months from the notification of the award and the remaining 75% when the popular version is handed in.

8th.- A previous jury, composed by experts in palaeontology, will select the number of papers they estimate relevant, in any case not less than ten. If a shortlisted paper has not been entered by its author, the organisation will propose to him/her the acceptance of the commitments established in the 7th requirement. In that case he/she will compete for the award; otherwise, or in the event of not replying within ten days, he/she will be withdrawn from the final deliberation.

9th.- The organisers of this award are neither committed to attend the mail nor to provide information on the titles selected by the previous jury. These titles will be entered in the record of the meeting of the jury.

10th.- Entering papers for this award implies the acceptance of these Requirements by the author.

PREVIOUS WINNERS:

PALEONTUROLOGY 03: *Faunal change, environmental variability and late Pliocene hominin evolution.* **René Bobe, Anna K. Behrensmeyer & Ralph E. Chapman** (Smithsonian Institution, Washington, USA). *Journal of Human Evolution*, 42: 475-497. 2002.

PALEONTUROLOGY 04: *Rib fabrication in Ostreoidea and Plicatuloidea (Bivalvia, Pteriomorpha) and its evolutionary significance.* **Antonio G. Checa & Antonio P. Jiménez-Jiménez** (Universidad de Granada, Spain). *Zoomorphology*, 122: 145-159. 2003.

PALEONTUROLOGY 05: *Dinosaur gastralia; origin, morphology and function.* **Leon P.A.M. Claessens** (Harvard University, USA). *Journal of Vertebrate Paleontology*, 24: 89-106. 2004.

PALEONTUROLOGY 06: *Postcranial Skeletal Pneumaticity in Sauropods and Its Implications for Mass Estimates.* **Mathew J. Wedel** (University of California Museum of Paleontology, Berkeley, California, USA). In: *The Sauropods: Evolution and Paleobiology* (Curry, K.A. & Wilson, J.A., ed.). Univ. California Press, 201-228. 2005.

PALEONTUROLOGY 07: *The eyes of trilobites: The oldest preserved visual system.* **Euan Clarkson, Riccardo Levi-Setti & Gabor Horváth** (Univ. Edimburgo, Univ. Chicago & Univ. Lorand Eötvös, Budapest). *Arthropod Structure & Development*, 35: 247-259. 2006.

PALEONTUROLOGY 08: *First trace and body fossil evidence of a burrowing, denning dinosaur.* **David J. Varricchio, Anthony J. Martin & Yoshihiro Katsura** (Montana State University, Bozeman, USA; Emory University, Atlanta, USA & Gifu Prefectural Museum, Japan). *Proc. R. Soc. B*, 274: 1361-1368. 2007.

PALEONTUROLOGY 09: *Fossilization potential of iron-bearing minerals in acidic environments of Rio Tinto, Spain: Implications for Mars exploration.* **David C. Fernández-Remolar & Andrew H. Knoll** (Centro de Astrobiología, INTA, España; (Harvard University, Cambridge, EEUU). *Icarus*, 194: 72-85. 2008.

PALEONTUROLOGY 10: *Physiological and life history strategies of a fossil large mammal in a resource-limited environment.* **Meike Köhler & Salvador Moyà-Solà** (Instituto Catalán de Paleontología, Universidad Autónoma de Barcelona, Spain). *PNAS*, 106 (48): 20354-20358. 2009.

PALEONTUROLOGY 11: *The digital Plateosaurus II: An assessment of the range of motion of the limbs and vertebral column and of previous reconstructions using a digital skeletal mount.* **Heinrich Mallison** (Museum für Naturkunde Berlin, Germany). *Acta Palaeontologica Polonica*, 55 (3): 433-458. 2010.

PALEONTUROLOGY 12: *Anatomically modern Carboniferous harvestmen demonstrate early cladogenesis and stasis in Opiliones.* **Russell J. Garwood, Jason A. Dunlop, Gonzalo Giribet & Mark D. Sutton** (Imperial College London, Humboldt University Berlin & Harvard University Cambridge). *Nature Communications*, 2: 444, 1-7. 2011.

PALEONTUROLOGY 13: *Plated Cambrian Bilaterians Reveal the Earliest Stages of Echinoderm Evolution.* **Samuel Zamora, Imran A. Rahman & Andrew B. Smith** (The Natural History Museum, London & University of Birmingham, Reino Unido). *PLoS ONE*, 7(6): e38296. doi: 10.1371/journal.pone.0038296. 2012.

PALEONTUROLOGY 14: *Primary biogenic skeletal structures in Multithecopora (Tabulata, Pennsylvanian).* **Ismael Coronado, Alberto Pérez-Huerta & Sergio Rodríguez** (Universidad Complutense de Madrid, Instituto de Geociencias, IGEO, CSIC-UCM, University of Alabama, Tuscaloosa). *Palaeogeography, Palaeoclimatology, Palaeoecology*, 386: 286-299. 2013.

PALEONTUROLOGY 15: *Hallucigenia's onychophoran-like claws and the case for Tactopoda.* **Martin R. Smith & Javier Ortega-Hernández** (Department of Earth Sciences, Downing Site, University of Cambridge, Cambridge, UK). *Nature*, 514: 363-366. 2014.

PALEONTUROLOGY 16: *A Cretaceous eutriconodont and integument evolution in early mammals.* **Thomas Martin, Jesús Marugán-Lobón, Romain Vullo, Hugo Martín-Abad, Zhe-Xi Luo & Angela D. Buscalioni** (Universität Bonn, Universidad Autónoma de Madrid, Natural History Museum of Los Angeles, Université de Rennes & The University of Chicago). *Nature*, 526: 380-385, Supplementary Information. 2015.

PALEONTUROLOGY 17: *Fossilization of melanosomes via sulfurization.* **Maria E. McNamara, Bart E. Van Dongen, Nick P. Lockyer, Ian D. Bull & Patrick J. Orr** (University College Cork, Ireland, University of Manchester, UK, University of Bristol, UK & University College Dublin, Ireland). *Palaeontology*, 59 (3): 337-350, 2016.

PALEONTUROLOGY 18: *Regional endothermy as a trigger for gigantism in some extinct macropredatory sharks.* **Humberto Ferrón** (Instituto Cavanilles de Biodiversidad y Biología Evolutiva, Universidad de Valencia, Spain). *PLOS ONE*, 12 (9): e0185185, 2017.

PALEONTUROLOGÍA 19: *Ribcage measurements indicate greater lung capacity in Neanderthals and Lower Pleistocene hominins compared to modern humans.* **Daniel García-Martínez, Nicole Torres-Tamayo, Isabel Torres-Sánchez, Francisco García-Río, Antonio Rosas & Markus Bastir** (Museo Nacional de Ciencias Naturales-CSIC, Hospital Universitario La Paz Madrid). *Communications Biology*, 117, 2018.

PALEONTUROLOGY 20: *Diminutive fleet-footed tyrannosauroid narrows the 70-million-year gap in the North American fossil record.* **Lindsay E. Zanno, Ryan T. Tucker, Aurore Canoville, Haviv M. Avrahami, Terry A. Gates & Peter J. Makovicky** (North Carolina State University-North Carolina Museum of Natural Sciences USA, Field Museum of Natural History Chicago, USA, Stellenbosch University, South Africa). *Communications Biology*, 2:64, doi.org/10.1038/s42003-019-0308-7, 2019.

**ANNEX I. REGISTRATION FORM
Paleonturology 21**

19th INTERNATIONAL AWARD IN PALAEONTOLOGICAL RESEARCH

A) PAPER ENTERED BY THE AUTHOR/S

Title of the publication:

Author/s:

Contact address (postal address, telephone, fax, e-mail):

The author/s of this paper accepts the Requirements of the award, specifically, the 7th:

*The Nineteenth International Award in Palaeontological Research **Paleonturology 21** is endowed with a Three Thousand Euros (3.000 €) prize, indivisible and subject to the current fiscal legislation, and, prior to its acceptance, the author will be committed to writing a version to popularise the awarded paper paying special attention to additional graphics that may be required. It has to be sent to the organisation within a period of four months from the notification of the award and to relinquish the publication rights to the organisation. The organisation will use it to publish a popular version whose authors will be the same as those of the awarded paper (it will be translated, if necessary), and will collaborate with the author to reach the required didactic level (students between 15 and 17 years of age). The mentioned right has to be exercised within a year from the date of the decision.*

The amount of the award will be paid in its 25% within a period of two months from the notification of the award and the remaining 75% when the popular version is handed in.

Signature of the author (in the case of several authors, all of them sign accepting to be represented to all intents and purposes of this award by one of them) and date:

B) PAPERS ENTERED BY A PERSON OR ORGANIZATION DIFFERENT FROM THEIR AUTHOR

Title of the publication:

Author/s:

Author/s' contact address (postal address, telephone, fax, e-mail):

Paper entered by:

Contact address (postal address, telephone, fax, e-mail):

Signature of the person who enters the paper and date: